PN-ABF-404

BOLIVIAN RURAL FINANCIAL MARKETS

Bureau for Private Enterprise
U.S. Agency for International Development

Prepared by: *J. Ladman*

Sponsored by: *Financial Markets Project*
Project Number: 940-2005
Prime Contractor: Arthur Young

December, 1987

Arthur Young
A MEMBER OF ARTHUR YOUNG INTERNATIONAL

TABLE OF CONTENTS

CHAPTER		PAGE
	Preface	i
I.	**Introduction**	1
II.	**Overview of Bolivian RFMs**	3
	Historical Development	3
	Conclusions	15
III.	**Refinancing for Agricultural Sector: Bolivian Central Bank and PL-480**	17
	Introduction	17
	Bolivian Central Bank	17
	PL-480 Secretariat	25
	Conclusions	34
IV.	**Bolivian Agricultural Bank**	36
	Overview of Credit Operations	36
	Characteristics of New Loans in 1985	37
	BAB's Transition, 1978-1985	37
	Sources of Funds	41
	Financial Analysis	42
	Structure and Personnel	45
	Credit Delivery System	46
	Conclusions	48
V.	**Commercial Banks**	52
	Introduction	52
	Structure	53
	Source of Funds	53
	Growth of Credit	54
	Distribution of Credit	54
	Credit Delivery System	55
	Conclusions	57

VI. FENACRE, Credit Unions and Integral Cooperatives 59

Introduction 59
Organization and Structure 59
Sources of Loanable Funds 60
Savings Mobilization 61
Credit Operations 62
Integral Cooperatives 63
Conclusions 63

VII. FINCA 65

Introduction and Background 65
The Future of FINCA 66
Conclusions 68

VIII. Other Agricultural Credit Institutions 70

Introduction 70
Center for Economic and Social Development 70
Private Voluntary Organizations 72
National Savings and Loan Housing Bank 72
Regional Development Projects 73
Producer/Farmer Organizations 74
Breweries and Other Agribusiness 75
Informal Market 76

IX. Recommendations 78

Bolivian Rural Financial Markets 78
Recommendations 79

PREFACE

This report was prepared in the second semester of 1986 and presented to USAID/Bolivia in draft form. Because of some data and scheduling problems the final version was not prepared until late 1987. It should be emphasized, however, that the report does not pretend to be current as of the revised date, rather it deals with the state of events in mid-1986.

Since mid-1986, there has been a considerable amount of additional study and some restructuring of Bolivian financial markets. In 1986, USAID sponsored a financial sector assessment. (See James S. Munson and Robert Barbery, Bolivia Financial Sector Assessment, prepared for USAID/Bolivia under contract with Arthur Young, May 1986.)

In 1986, the World Bank had team in Bolivia to study financial markets. Their confidential report was published in June 1987 under the title Financial Sector Study: Bolivia. This study has had an important impact. Prior to publication, however, the recommendations contained therein circulated among relevant government officials and action was begun in the restructuring process. One major institutional change was the reorganization of the Central Bank. Many other changes were incorporated in the July 1987 executive branch's Supreme Decree which dealt with the government's strategy for reactivating the economy. Of particular importance were the decree's provisions for restructuring the Bolivian Agricultural Bank, very much along the lines recommended in Chapter IV of the present document.

In 1987, the PL-480 program was subjected to a thorough evaluation. The final report contains an in-depth analysis of the Executive Secretariat's refinancing programs. (See Tropical Research and Development, Inc., Evaluation of PL-480 Title I and Title III Agreements, prepared for USAID/Bolivia, Contract No. 511-0000-C-00-7203, July 1987.)

The USAID Agricultural Sector Assessment is currently being completed by Chemonix. It includes a section on agricultural credit. USAID is also undertaking some additional studies on agricultural finance. Among these are a set of research projects on informal markets and credit unions under a contract with Checchi and Company under the Agroindustry and Artisanry Project.

The upshot is that there is considerable recent and current analysis of both the Bolivian financial system and agricultural credit. Change is a foot and new programs are continually being proposed, both by Bolivia and foreign donors. It is hoped that the present document will be useful in understanding the Bolivian situation. While not the most current report, its breadth, historical approach and extensive treatment of both the Bolivian Agricultural Bank and Central Bank and PL-480 refinancing should be useful in putting Bolivian rural financial markets in perspective. Furthermore, the recommendations presented at the end of the several chapters in Chapter IV are almost as relevant to day as they were in 1986.

I

INTRODUCTION

This document is an assessment of Bolivian rural financial markets (RFMs) through mid-1986. Its main purpose is to provide a description and analysis of the institutional structure and the operations of these RFMs and to make recommendations to improve their performance.

The topic is timely. There is a wide-spread interest within both the Bolivian private and public sectors, as well as by the major suppliers of foreign assistance--in particular the United States Agency for International Development (USAID), the World Bank (IBRD) and the Inter-American Development Bank (IDB)-- to take advantage of the propitious times of the current Bolivian economic crisis to revise the institutional structure and the policy framework that guides the performance of financial markets in general and RFMs in specific. The hard lessons of the 1978-1982 redemocratization period and the 1983-1985 hyperinflation period have led to this groundswell of interest and a stated commitment on the part of the Paz Estenssoro government to make significant changes in financial market structure and policies. There are two broad but interdependent goals.

First, in the near term, now that the government apparently has been successful in obtaining price and exchange rate stability, there is an urgency to reactivate overall economic activity in general and agricultural production in specific. This requires credit for operating and investment capital.

Second, in the medium and long terms, there is the need to create a financial system and set of policies that will effectively and efficiently perform the roles of financial intermediation in both the urban and rural sectors, create viable financial institutions and reduce the system's dependency on financing or subsidies from internal or external sources. To accomplish these goals, the system, its institutions and policies must be placed under careful scrutiny. There is no doubt that considerable changes must be made, in particular with respect to the roles that public-sector financial institutions will play in a restructured system.

This document addresses both of these goals, based upon an analysis of Bolivian RFMs, their institutional structures and the policy framework. Alternative solutions are presented and recommendations are set forth.

The document is organized as follows. Chapter II presents an overview of Bolivian RFMs. It briefly examines the historical development of institutional agricultural credit in Bolivia, especially in the boom years of the 1970s, and then presents a picture of the problems that occurred in the first half of the 1980s in the periods of redemocratization and hyperinflation. Current problems in the system are identified. Chapter III contains an analysis of credit policy and Central Bank and PL-480 refinancing. Chapter IV deals with the very important Bolivian Agricultural

Bank. Chapter V analyzes the private sector banks. Chapter VI provides brief analyses of credit unions, FENACRE, and integral cooperatives. Chapter VII covers FINCA. Chapter VIII presents a brief description of other credit programs. Finally, chapter IX presents recommendations for improving the performance of Bolivian RFMs.

There was insufficient time allotted to this project to do justice to all RFM institutions. At the beginning, priorities were established by the USAID/Bolivia Rural Development Office. Consequently, this report concentrates mostly on the overview, the Bolivian Agricultural Bank, Central Bank and PL-480 refinancing for the banking system, and FINCA and to a much lesser extent on the Federation of Credit Unions and other more minor institutions.

II

OVERVIEW OF BOLIVIAN RFMs

Introduction

This chapter focuses on the historical development of Bolivian rural financial markets (RFMs) up to mid-1986. The objective is to describe current RFMs, but in a historical context. This approach facilities an understanding of the contemporary situation by showing the important influence of past events, foreign assistance and government policy. Furthermore, it sets the stage for succeeding chapters. The chapter concludes with a general critique of RFMs and their institutions, leaving more specific analysis to later chapters.

Historical Development

There are three distinct periods in the research history of Bolivian rural financial markets. Prior to 1970, 1970-1978, and 1979-1986. The following sections present overviews and analyses of the agricultural credit programs and the financial institutions in each of these periods.

Early Developments

In 1942, the Bolivian Agricultural Bank (BAB) was established as a government development bank to provide financing for the agricultural sector since such credit for the sector was not being offered in quantity by commercial banks. This was the first effort to have a specific agriculturally-oriented credit institution.

Until the late 1960s, BAB was virtually the only financial institution that provided farmers with credit. In the latter part of that decade this began to change. In 1967 the Bolivian government (GOB), with assistance from USAID, established regulations requiring that the commercial banks hold at least 70 percent of their loan portfolio in loans for productive purposes, including agriculture. Simultaneously, USAID provided funding to establish a Bolivian Central Bank (BCB) development-oriented refinancing line, the Special Fund for Economic Development (D.S. 07911), which was to be used to refinance banking system credit extended for productive purposes.

1970 - 1978

The 1970s marked a period of major growth in agricultural credit. Not only was there an increase in demand, especially from the commercial farming regions of the Bolivian Eastern lowlands, but there were major increases in supply, which derived from the initiative of international donors, especially USAID. In the early 1970s the international agencies' goals were to increase agricultural output. By the middle of the decade, however, the

donors' emphasis had shifted almost exclusively to small-farmer and rural agroindustry credit programs. Three major mechanisms were employed: (a) additional BCB revolving-fund refinancing lines, (b) a major small-farmer credit program for BAB, and (c) other specific credit projects or community and/or organizational development projects that had credit components.

BCB Refinancing. In 1971, the First Agricultural Refinancing Fund (FRA-1) was established in the BCB by USAID to provide financing to increase the production of basic food stuffs and substitute for food imports. This was followed in 1975 by the Second Agricultural Refinancing Fund (FRA-2), also financed by USAID, which was to be used to refinance paper on small-farmer loans in the public and private-sector banking system.

In 1978, the USAID-funded Agroindustry and Artisanry Program (A and A) was established to refinance credit for the development of rural industry and handcrafts in order to improve incomes in rural areas. Simultaneously, a Technical Assistance Fund (FAT) was established by USAID as a complement to A and A and other BCB refinancing lines. Under this fund, refinancing was made available for technical assistance and feasibility studies for possible refinanciable projects.

In the same year, the IDB financed the second phase of a Livestock Development Loan Fund for the departments of Santa Cruz and Tarija. The first phase was established in 1969.

The Bolivian government also made resources directly available to BCB for rediscounting, which were called the Bank's Own Funds. These were often targeted to specific activities, such as milk and wheat production, as well to the targeted production objectives for a given agricultural year.

BAB Small-Farmer Credit Programs. The World Bank established the Agricultural and Livestock Development Fund (ALDP) in 1975. ALDP was to provide credit to small- and medium-size farmers. To operate this program, BAB established a separate administrative unit.

In 1975, USAID provided funding (T-053) to establish a Small-Farmer Credit Program (PCPA) within BAB to serve the regions of the central mountain valleys and the Eastern lowlands. In 1977, additional funds (T-059) were made available to extend the coverage of the program to Tarija and other areas of Chuquisaca and Potosí as well as to fund the Yacuiba Land Clearing Project. In 1978, the Japanese government provided funds to BAB for the acquisition of machinery and fertilizers. PCPA had its own semi-autonomous administrative unit within BAB. This unit managed all of these funds as well as the FRA-2 refinancing from BCB.

The funds for all of these programs, except FRA-2, were grants to BAB to be used to build up capital in the PCPA. After two years of operation, the PCPA was expanding and was financially viable. Meanwhile, BAB's regular program was in increasingly deep financial trouble, principally due to high rates of delinquency in its non-PCPA portfolio. Much of this bad debt was obtained in the early and mid-1970s when loans to large farmers in the Eastern lowlands to grow cotton and soybeans were not repaid. To make

matters worse, in a political move, the government purchased considerable bad debt derived from financing these same crops from several foreign private banks and placed it in BAB. The delinquency rate for other BAB loans in the regular program was also high. Therefore, the Bank had few available loanable funds to make new loans nor on which to earn income; revenues fell. The Bank's difficult financial situation was exacerbated by the institution's high financial costs on its moribund portfolio. BAB also had high operations costs brought about by excessive paperwork and a large staff, especially in the central office. Under these circumstances, BAB required continued subsidization. In 1979, in an effort to gain access to additional resources to help cover its losses, BAB integrated the financially-healthy PCPA into its total program, an act which rapidly decapitalized PCPA and significantly reduced its lending capacity.

Specific Projects. In the 1970s, a number of specific projects for community or organization development were established with foreign assistance. In 1974, USAID financed a Revolving Fund for Agricultural Colonization Credit for the San Julian and Chane-Pirai colonization projects.

In 1976, 1978, and 1979, the World Bank established the small-farmer integrated rural development projects in the altiplano sites of Ingavi, Ulla Ulla and Omasuyos-Los Andes.

In this same period, the recently-established regional development corporations began agricultural credit programs. In 1974, CORDEPAZ developed a small-farmer credit program. In 1977, CODETAR participated with BAB in the Yacuiba Land Clearing Project. In 1976, CORDECHUQ had a credit component in a Swine Development Project financed by IDB. All were oriented to small farmers.

In 1976, USAID took another major initiative to reach small farmers when it initiated CROFOC, the Revolving Fund for Community Development (T-055), to provide agricultural credit to newly-formed integral cooperatives in the departments of Cochabamba, Potosí, Santa Cruz and Tarija. The National Community Development Service administered the program. Later, the credit component was transferred to PCPA and, ultimately, to PL-480.

IDB established a Fruit-dairy Development Project in 1979 for the region of Cochabmaba. In the same year IDB set up a credit fund for the Irrigation Development Project in the Bolivian Chaco. BAB administered credit funds for both of these projects.

In 1978, the National Federation of Credit Unions (FENACRE) began to aggressively pursue agricultural finance with efforts to obtain outside financing that it could onlend to member credit unions. Although the credit union movement had been established in Bolivia in 1961 by the Maryknoll fathers, up to this point it had not sought much outside financing for agriculture. FENACRE was successful in obtaining credit from the Latin American Federation of Credit Unions (COLAC) and sought Intermediate Credit Institution (ICI) status in order to be eligible for BCB refinancing. The

latter was granted in 1982.

In this same period, two large multipurpose cooperatives grew out of credit unions: Madre and Maestra in Tarija and La Merced in Santa Cruz. Both had active small-farmer credit programs.

The non-profit Center for Economic and Social Development (DESEC) had been established in 1963. It expanded considerably in the 1970s in the regions of Cochabamba and Santa Cruz. DESEC arranged financing from commercial banks to sponsor limited programs of small farmer credit, especially for growing potatoes. Much of the Center's operating expenses were funded by grants from European organizations affiliated with the Catholic church.

Analysis of the 1970s

The year 1978 represents a turning point in Bolivian history because in that year Bolivia began the politically unstable redemocratization process, which continued through October 1982. Therefore, it is useful to review the status of RFMs as of 1978.

Growth of Credit. The late 1960s and the 1970s were periods of rapid growth of agricultural credit in Bolivia. As shown in Table II-1, between 1967 and 1978 there were substantial increases in the value of annual flows of agricultural credit in the banking system (BAB and commercial banks). When converted to real terms (1980 prices) the growth is even more impressive. As shown in Table II-2, between 1967 and 1987 there was a 409 percent increase in total annual agricultural credit flows.

Particularly noteworthy in this period was the increase in lending activity by the commercial banks. Much of this increase can be attributed to the use of BCB refinancing lines. In 1978, commercial banks accounted for 51.1 percent of the total bank credit and BAB held the rest. This is a major shift in the relative importance of the commercial banks; in 1967 BAB had 90.1 percent of the total. Nevertheless, agricultural credit accounted for only a small portion of the commercial banks' total portfolio; Central Bank statistics show it was only 5.6 percent. It should be noted that beginning in 1976 the State Bank (the only commercial bank owned by the Bolivian government) withdrew from agricultural lending because of its bad experience in collecting on its large volume of loans made for cotton and soybeans in the previous years. To this date, the State Bank does not lend for agricultural and livestock production.

Table II-3 summarizes the agricultural credit system in 1978. The preponderant roles of BAB and the commercial banks are clear; they respectively accounted for 45.5 and 47.5 percent of total volume of credit, i.e., 93 percent to total volume of loans granted. BCB also played an important role, financing 17.0 percent of the loans granted by these two classes of banks. Among the other institutions, the integral cooperatives (CROFOC), CORDEPAZ and FENACRE were the most important sources of credit.

Measured in terms of numbers of small farmers served CORDEPAZ, BAB, and

Table II-1

ANNUAL CREDIT FLOW TO AGRICULTURAL PRIVATE SECTOR
IN BOLIVIAN BANKING SYSTEM, 1967-1985
(Millions of Current Pesos)

		Agricultural Credit		% of Total Agr. Credit	
Year	Total	Bolivian Agricultural Bank	State Bank & Private Comm. Banks[a]	Bolivian Agricultural Bank	State Bank & Private Comm. Banks
1967	46.3	41.7	4.6	90.1	9.9
1968	53.4	39.5	13.9	74.0	26.0
1969	95.5	79.1	16.4	82.8	17.2
1970	136.1	112.4	23.7	82.6	17.4
1971	158.1	69.4	88.7	43.9	56.1
1972	307.0	211.4	95.7	68.8	31.2
1973	497.8	312.4	185.4	62.8	37.2
1974	610.5	403.8	206.7	66.1	33.9
1975	610.8	350.2	260.6	57.3	42.7
1976	521.7	395.1	126.6	75.7	24.3
1977	662.5	327.8	334.7	49.5	50.5
1978	840.1	410.6	429.5	48.8	51.1
1978	686.6	453.0	233.6	66.0	34.0
1980	1,066.7	658.0	408.7	61.7	38.3
1981	1,268.2	837.0	431.2	66.0	34.0
1982	2,138.5	952.0	1,186.5	44.5	55.5
1983	12,727.5	6,541.0	6,186.5	51.4	48.6
1984	424,739.7	230,754.0	193,985.7	53.4	45.7
1985	50,343,584.5	15,313,865.0	35,029,719.5	30.4	69.6

Source: 1967-1985 Bolivian Central Bank, Boletín Estadístico, Marzo 1978 and Diciembre 1978.

1979-1985 Bolivian Agricultural Bank for BAB figures.
Development Department, Bolivian Central Bank and Executive Secretariat, PL-480 for private commercial bank figures.

[a]Consists of refinancing of agriculture, agribusiness and artisanry from Bolivian Central Bank and PL-480 as well as commercial bank counterpart funds for this refinancing. Other credits extended by commercial banking system to agricultural sector are not included. However, the amount of such credit should be minimal since the commercial banking system relies almost entirely on refinancing to extend credit to agriculture.

Table II-2

REAL VALUE OF ANNUAL CREDIT FLOWS TO AGRICULTURE IN PRIVATE SECTOR IN BOLIVIAN BANKING SYSTEM 1967-1985
(Millions 1980 Pesos[a])

Year	Total	Agricultural Credit Bolivian Agricultural Bank	State Bank Private Comm. Banks
1967	291	262	29
1968	318	235	83
1969	555	460	95
1970	791	653	138
1971	855	376	479
1972	1,559	1,073	486
1973	1,922	1,206	716
1974	1,450	959	491
1975	1,342	770	573
1976	1,096	830	266
1977	1,289	638	651
1978	1,482	724	758
1979	1,011	667	344
1980	1,067	658	409
1981	960	634	326
1982	722	322	400
1983	1,148	590	558
1984	2,772	1,506	1,266
1985	2,772	843	1,929

Source: Same as Table II-1.

[a]: Based on Consumer Price Index for La Paz.

TABLE II-3

OVERVIEW OF THE BOLIVIAN AGRICULTURAL CREDIT SYSTEM, 1978.

Institution	Year Founded	Year Began Major Emphasis in Agricultural Credit	Agricultural Loans Granted 1978 (Million Pesos)	Percent of Total	Number of Farmers Granted Loans, 1978	Percent of Loan Numbers Granted to Small Farmers
Bolivian Central Bank	-	1967	143.0	c	b	b
Bolivian Agricultural Bank	1942	1942	410.6	45.5	6.366	66
Commercial Banks	d	d	429.6	47.6	858[h]	b
Revolving Credit Fund for Cooperative Development (SNDC-CROFOC)	1976	1976	25.8	2.9	3.133[c]	100
National Federation of Credit Unions	1961	1978	10.4	1.1	199[h]	Large
La Merced Multipurpose Cooperative	1964	1974	1.8	0.2	384	100
Madre y Maestra Multi-purpose Cooperative	1964	1969	1.8	0.2	185	100
Center for Economic & Social Development	1963	1964	3.2	0.4	526	100
Ingavi Integrated Rural Development Project	1976	1976	6.0	0.7	1.646	100
Chuquisaca Swine Development Project	1976	1978	1.2	0.1	155[g]	Large
La Paz Development Corporation (CORDEPAZ)	-	1974	13.0	1.4	10.000	100
T O T A L			903.4	100.1[i]	23.374	

SOURCE: Various institutions.

[a]These are funds rediscounted and disbursed to BAB and commercial banks through BCB special rediscount lines.
[b]Information is not available.
[c]Not included in total because these amounts are included in BAB and commercial banks.
[d]There are eighteen commercial banks in Bolivia. Dates of establishment and agricultural lending will be varied.
[e]This is an estimate based on total cooperative membership.
[f]There are two other integrated rural development projects, Ulla-Ulla established in 1978, and Omasuyos-Los Andes established in 1979. They are not listed because they did not disburse credit in 1978.
[g]This is the total loan volume and loan numbers as of November 1979. Most loans were granted in 1978.
[h]Estimates.
[i]Does not sum to 100% due to rounding.

SOURCE: Jerry R. Ladman, et.al., Bolivian Financial Sector Assessment, Report prepared for USAID/Bolivia by the Ohio State University, November 1, 1979.

the integral cooperatives were the most important institutions. The other credit projects were of a much smaller scale. They were localized and region or project specific.

Analysis. It is clear that in the 1970s there was a very major increase in the amount of credit flowing to agriculture. Although the large bulk of the increase came through new BAB programs and BCB refinancing, there was also considerable effort to develop smaller specific projects and establish new credit institutions. Most striking is the major shift in emphasis to small-farmer credit beginning in the mid-1970s. Equally striking is the broad front--PCPA, BCB, CROFOC, etc.--on which USAID launched major efforts to reach small farmers. It is clear that USAID was the major catalyst to this new effort.

Nevertheless, although the formal-market agricultural credit system had expanded rapidly and more adequately served the needs of many more Bolivian small farmers, there were a number of apparent and interrelated weaknesses or problems with the system.

1.- Number of farmers served. There was only an estimated 6 percent of the farm families that received credit from formal market sources. This figure is considerably larger than the 3.6 percent obtained in the 1976 farm survey in Chuquisaca and Potosí (James T. Riorden, "An Assessment of the Target Region for USAID/Bolivia's Agricultural Sector Loan II," Washington, D.C.: United States Agency for International Development, LA/DR/RD, July, 1977, mimeo, Table F-4). Both figures clearly show that only a small portion of the nation's farmers were using credit from formal market sources.

2. Little emphasis on financial intermediation and savings mobilization Virtually all of the programs were exclusively credit-oriented (Exceptions were the forced savings features of the credit unions and the integral cooperatives and the savings operations of commercial banks. However, there was little effort on the part of banks to mobilize savings in rural areas. An important reason was undoubtedly the inexpensive sources of funds made available through BCB refinancing). There is no evidence that the mobilization of domestic resources in the countryside was an important policy consideration. The result was that programs were built upon foundations of credit and not financial intermediation and savings mobilization. The basic concept was to provide for rotating credit funds both within institutions as well as within the BCB refinancing lines.

This policy approach had serious implications for the system's dependency on outside funding, the development of financial markets and viable financial institutions. Moreover, lack of savings opportunities in financial institutions deprived many rural residents of income-earning possibilities from savings accounts, and forced them to save in forms which kept their savings out of the financial system.

3.- Dependency and substitution. A large majority of the new funds directed to agricultural credit came from foreign sources on financing terms that were very favorable to the Bolivian government. There is little doubt that these inexpensive sources of credit became substitutes for the country's own need to mobilize domestic savings. The result was that GOB and the agricultural credit system became dependent on foreign assistance and that the funds thus obtained were substitutes for domestic savings mobilization.

4.- Non-viable financial institutions. There was a similar effect on most of the financial institutions serving agriculture. With such easy access to special credit programs that featured very favorable financial terms, the institutions found it easy to rely on these sources for their loanable funds. Therefore, they also became dependent on outside funding, and did not need to make major efforts to mobilize domestic resources. The end result was that most credit institutions came to depend on continued subsidies or outside funding for their existence.

5.- Concessionary interest rates. The philosophy of the government and foreign donors was to provide concessionary interest rates, i.e., rates less than the true opportunity cost of capital. The objective was to subsidize the borrower through an income transfer and, thus, encourage agricultural production and investment. The result of this philosophy led to a number of undesirable results.

(a) Savings mobilization was discouraged because the low loan rates did not allow credit institutions to pay attractive interest rates on savings deposits and simultaneously offer a sufficient interest rate spread for the institution.

(b) Financial institutions were basically credit oriented, financially viable and were dependent on outside sources of funding or subsidies.

(c) The low loan interest rates created an excess demand for credit and, therefore, caused credit institutions to use non-price rationing mechanisms such as high loan transactions costs and larger loan guarantees to allocate credit. Rationing raised the cost of borrowing and lowered small farmers' access to credit.

(d) Because of the higher costs of doing business with small farmers, financial institutions were encouraged to lend more to larger farmers.

(e) The low loan interest rates created an incentive for borrowers to use excess amounts of credit and, therefore, contributed to an uneconomical allocation of financial and real resources. As a result, credit ostensibly directed to

agriculture often was diverted to non-agricultural purposes, creating an overstatement or illusion about the extent of agricultural credit.

(f) Because of the possibilities of credit diversion, the various credit programs felt a need to employ control and supervision systems, which raised their administrative costs.

(g) The implicit income transfers with the low interest rates created the possibilities for using credit as a political instrument. Because these loans were politically motivated they often were those most subject to delinquency.

(h) The high lending costs associated with agricultural loans in combination with the low interest rates limited the interest spreads for financial institutions. Therefore, the institutions were discouraged from using BCB rediscount lines.

6.- Fragmented and targeted programs. The agricultural credit system was characterized by fragmentation, i.e., a number of different specific credit programs. Even within a given institution there was fragmentation. There were several different rediscount lines at BCB and numerous different credit lines at BAB. Many of these programs had different requirements and procedures for administration, lending and accunting. As a result, administrative costs of financial institutions and BCB were increased substantially. The different lines had targeted objectives for credit use. This meant that there was a need for institutions to develop expensive control and supervision systems, which contributed to their high operating costs.

7.- Problems with BCB rediscounts for small farmers. The funds in FRA-2 and A and A moved slowly, especially within the commercial banks. A principal problem was the lack of sufficient incentives due to the low interest rate spread, the large amount of costly paperwork, and the delays in loan approval by BCB.

8.- Delinquency. The experience showed that agricultural credit experienced high rates of delinquency. BAB's record shows, however, that delinquency was much higher among the medium- and large-sized farmers than among small farmers.

The above indicate that although there were major increases in agricultural credit activity in the 1970s' which undoubtedly brought formal-market credit to a considerably larger of farmers, especially small farmers, there were many fundamental weaknesses. A major shortcoming was that the new credit programs were not designed to create a system of independent nor financially viable institutions that would be able to deliver credit to large numbers of small farmers and rural industry over the long run without continued infusions of new capital. This dependency was to became abundantly clear, both in the following period of redemocratization

and, later, when foreign sources of financing were cut off and when the financial institutions were decapitalized due to hyperinflation.

1979 - 1986

There are two distinct subperiods within this eight-year period. The first is the subperiod of redemocratization that began in 1978 and ran through October 1982. The second is the subperiod of hyperinflation, which began in 1983 but became very severe in 1984 and 1985 and continued until inflation was brought under control by the end of the first quarter in 1986. In between the two periods, in 1983, were the simultaneous natural disasters of floods and draughts. The two subperiods as well as the disasters were to have significant effects on agricultural credit and rural financial markets.

Redemocratization

This subperiod was marked by economic and political instability. In the last half of 1978, USAID temporarily cut off economic assistance during the military regime of General Pereda Asbun. Later, in July 1980, when General Garcia Meza came to power by force of a military coup, U.S. assistance was again terminated. The U.S. action was followed by most other international donors. During the following two years until October 1982, when the democratic government of Hernán Siles Zuazo was installed, Bolivia received little economic assistance and no new agricultural credit program was established through foreign aid.

It was in this subperiod that BAB experienced serious difficulties and in which USAID terminated its official relations with this bank. The problems emanated from the Bank's decision in 1979 to incorporate the financially successful and semi-autonomous PCPA into the main operations of the Bank. Ostensibly, this action was taken to give the economically troubled Bank direct access to the financially healthy PCPA's loan reflows and capital. This would allow the Bank to use these funds to make loans in its regular portfolio, which had become paralyzed by the high degree of delinquency. In fact, the Bank used PCPA funds to pay salaries and to meet other Bank expenses. This was disturbing to USAID. In 1981, USAID was successful in getting BAB to again make PCPA semi-autonomous. This lasted until 1983 when the PCPA was again incorporated into the Bank and PCPA funds were again used to meet the institution's payroll. With this action, USAID terminated its relations with the Bank. Subsequently, when USAID funds were made available for Bolivian credit, for example through BCB or PL-480 refinancing lines, there were conditions placed upon the use of funds such that none were to be used by BAB. Therefore, at the present, BAB does not receive any financing from USAID.

The real values of annual agricultural credit flows by the banking system are shown in Table II-2. The flows fell sharply in 1979, remained about the same in 1980, declined in 1981 and fell drastically in 1982. The changes in activity between 1979 and 1981 mostly came from the private-sector commercial banks while BAB's real level of activity remained constant. The private banks obtained their funds through the BCB's refinancing lines lending.

In 1982 the real value of agricultural lending fell by 26 percent, a rate that was double the rate of decline in total bank credit. The bulk of the agricultural credit decline came from decreases in BAB activity, undoubtedly this decrease was a result of the Bank's weak financial situation as well as the inability of the politically unstable government to provide financial support through BCB refinancing.

Disasters

The year 1983 was a horrible year for Bolivian agriculture. The simultaneous effects of El Niño in causing floods in the East and draughts in the mountain valleys and the altiplano virtually destroyed agricultural production. This was to have an important impact on agricultural credit because of the massive inflows of foreign assistance for emergency credit, of which there were two dimensions.

The first dimension was a result of the large and continuing donations of basic grains from the United States under the PL 480 program that generated large volumes of local currency. USAID, for lack of program funding, creatively worked with PL 480 to develop agricultural credit programs using these funds. One of the first programs was the 1984 grant to FINCA to develop rotating community credit funds in a large number of Bolivian rural towns.

In the same year, the Pilot Title III Trust Fund Program was established under which private-sector commercial banks could obtain refinancing for credits to small farmers artisans and small- and medium-sized agribusiness firms. Later, in 1985 this program was regularized.

From this beginning many other programs emerged or are currently being established in PL 480. There are several reasons: (1) availability of PL 480 funds, (2) unavailability of traditional program funds for credit through USAID, (3) decapitalization by hyperinflation of existing trust funds in BCB, (4) discontent with the normal refinancing mechanisms in BCB, and (5) satisfaction by USAID and ICIs with the ease and agility of the PL 480 refinancing mechanism.

The other PL-480 refinancing programs are the following. First, because of the decapitalization of the CROFOC line for the integral cooperatives in BAB, a new line was created in PL-480 so that FENACRE could refinance small-farmer lending to these four cooperatives. Second, in 1984 a line was activated for use by the Refinancing Credit Units (UCFs) in the regional development corporations to refinance agribusiness enterprises, artisans and small- and medium-sized farmers. Currently, this program is being extended and restructured under the Market Town Capital Formation Project. Third, in 1984 a refinancing line for the Chapare Project was established.

At the present, four new PL-480 lines are being established. The first is the Low-cost Housing Project for refinancing through CACEN. The second is the Emergency Credit for Housing, to rebuild houses damaged by the recent

floods in the Lake Titicaca region. The third is the Wheat and Seeds Project. The fourth is the Small-enterprise Project.

It is clear that since 1984 the PL-480 refinancing mechanism has been rapidly developed as a source of credit and it now plays an important role in Bolivia by refinancing credits, mostly through private-sector commercial banks, for a number of different but relatively small projects. Its total effort, however, is a distant second to the BCB's refinancing for the agricultural sector.

The second dimension of the disasters on agricultural credit was the large inflow of new resources to provide loans to the sector. Most of these resources were channeled through BCB refinancing. There were four principal sources. First, in 1983, IDB established a $32 million Agricultural Sector Line for imports of agricultural inputs (BID/712). Second, in the following, year IDB created a $19.6 million refinancing line in BCB for seed imports (BID/741). Third, in 1985, USAID funded an $10 million Emergency Agricultural Credit Fund (511-T-0581 and 511-F-069) to which Bolivian government added an equal amount. The purpose of the loan was to provide credit through private sector institutions to acquire agricultural inputs during the 1985-1986 planting season for small- and medium-sized farmers. Fourth, the Bolivian government also made a substantial contribution by increasing the resources available under the BCB's Own-Funds lines for refinancing. The bulk of these funds were directed to BAB. The effect of all of these programs was to considerably raise the amount of funds available from BCB refinancing, an important factor giving rise to the larger annual flows of credit between 1983 and 1986.

Hyperinflation

Between 1983 and 1985 Bolivia experienced extreme hyperinflation, which was largely due to excessive government deficit financing. As shown in Table II-4, the average annual rates of increase in the Consumer Price Index of La Paz were 276, 1,281 and 11,750 percent in the years 1983, 1984 and 1985 respectively.

The effects of hyperinflation on the financial system were disastrous. The 1982 dedollarization policy of the Siles government and the continued lag of increases in real interest rates behind the rate of inflation over the whole period created many distortions. Borrowers were favored with major income transfers; loans were repaid in only a small fraction of their real value compared to their value at the time of borrowing. This encouraged wide-spread borrowing for speculation and investments in real goods. Financial institutions were rapidly decapitalized with the result that their lending capacity shrunk. In face of a strong demand for credit, all sorts of non-interest rationing mechanisms blossomed. Loan terms were shortened. BCB trust funds were also decapitalized. To compensate, BCB increased the volume of its refinancing lines for agricultural credit considerably, especially in 1984 and 1985. This was accomplished mostly by printing money, a factor that contributed to the inflation. The combined result of this move, plus the inflow of disaster funds, was that the real value of refinancing for agriculture in 1984 and 1985, measured in 1980 prices, was

TABLE II-4

AVERAGE ANNUAL RATES OF PRICE INCREASES, LA PAZ

CONSUMER PRICE INDEX 1978- 1985

Year	Anual Rate of Inflation
1978	10.36
1979	19.72
1980	47.24
1981	32.13
1982	123.54
1983	275.58
1984	1,281.33
1985	11,749.63

Source: Bolivian Central Bank, Boletin Estadístico, Diciembre 1985.

greater considerably than in any other year between 1979 and 1983. It meant, however, that the system had become totally dependent on BCB refinancing as its source of funds for agricultural credit.

The above changes are shown in the figures of Table II-2. In 1984, the total real amounts of agricultural credit more than doubled, because of the inflows of the IDB loans and increases in BCB's own Funds. In 1985, the annual real flows remained at the same level due to the USAID infusion and large increases in BCB funds. These increases were large, because the annual real flow was maintained in spite of the fact that hyperinflation was raging.

Beginning in 1982, the participation of BAB declined sharply. In 1981, this institution accounted for about two-thirds of the banking system's agricultural credit, a considerable rise from the levels of 30 to 50 percent in the 1970s. In 1982, however, the real value of BAB lending dropped off until 1984. Simultaneously, real commercial bank lending rose.

As will be shown in the next chapter, after 1984 BAB had become almost entirely dependent on BCB refinancing; more than 90 percent of its loanable funds came from this source. The BCB refinancing was mostly for annual operations. BAB took advantage of this favored treatment and disbursed record numbers of loans. For example, in both 1984 and 1985 the number of farmers served was four to five times greater than the number receiving credit in the previously high years of the late 1970s. Moreover, more than three-fourths of BAB's loans and a large majority of its loan volume was directed to small farmers. It is clear that the Bank was reaching a much larger number of small farmers across wider geographic regions than it had served in any previous year; BAB had taken on the characteristics of a nation-wide small-farmer bank.

The period clearly showed the vulnerability of the financial system to inflation. Financial institutions became decapitalized to the point where the public-sector banks are bankrupt and some private-sector banks may be forced out of business. Much of this can be attributed to the inadequate monetary policies that were taken in a highly politically unstable environment, lack of bank regulations, and the unwillingness of the government to curtail deficit spending. Indeed, the government chose to run the printing presses to finance agricultural credit and other government expenditures, rather than to try to raise the funds through taxes or voluntary savings.

These circumstances contributed to flagrant corruption, especially at BCB where bureaucrats and technicians had control to ration the limited supplies of foreign exchange and refinancing lines. Therefore, favors could be extracted from banks and clients who were fortunate enough to gain the cheap BCB refinanced credit and foreign exchange.

The aftermath of hyperinflation was to leave the financial system in a very difficult and precarious condition. There is a need to revamp not only the system in general but also RFMs in specific. The problems in RFMs today are virtually the same as outlined above for the late 1970s. Now, however,

they are more clear and more widely recognized. To summarize, the problems are:

1.- Extreme dependency and fragility. The RFMs are dependent on external financing. At the present time, the major sources of agricultural credit are BCB and PL-480 refinancing, both of which depend on outside sources of funding for growth. Therefore, the system is fragile; withdraw this refinancing support and agricultural credit will collapse. Furthermore, the current system places a big burden on the BCB to come up with the resources; to maintain the high levels of refinancing the government might have to resort to printing money.

2.- Non-viable institutions. Most of the institutions involved in agricultural credit, except the commercial banks, are permanently non-viable, e.g., they are structured to depend on outside funding for sources of financial resources and their costs exceed revenues. BAB is the most extreme case because of its delinquency problem and high operating costs.

3.- Emphasis on credit and not financial intermediation and saving mobilization. The policy emphasis is almost entirely placed on credit and not on financial intermediation. Most of the institutions involved in agricultural credit do not mobilize savings in rural areas. Thus, many farmers are denied the opportunity to earn income by setting aside cash as savings deposits. Without savings facilities, financial intermediation is limited in rural areas and financial institutions remain dependent on outside funding.

4.- Excessive targeting of credit. BCB targets credit to activities and regions on the basis of an overall agricultural plan. Whereas this planning exercise may serve as a means to estimate the amount of refinancing that is necessary, because of fungibility it is unrealistic in terms of expected results. Furthermore, the BCB has been inflexible in shifting targeted funds between regions, between activities and between banks. This practice leads to a less than optimal allocation of financial and real resources and results in unused credit lines.

Targeting also leads to a proliferation of credit lines within BCB and institutions. This requires both BCB and ICIs to keep costly separate records and accounts for each line, a factor which contributes to high operating costs.

Foreign assistance programs often contribute to targeting. Frequently, programs are designed to deal with certain products or clientele. Therefore, credit is targeted to meet these ends.

5. Term Structure of Loans. Most available credit is for short-term production purposes and not for longer-term investment in capital goods. Exceptions are PL-480 trust funds and the Central Bank IDB

refinancing line for imports. The bias towards annual production will limit investment for reactivation of the economy and long-term growth.

6.- BCB Refinancing Obstacles. Although BCB has greatly sped up disbursements through the Automatic Refinancing System (SIRA), there still remains a problem in providing timely notification to financial institutions about the availability of refinancing for future credit activities. Under these conditions ICIs have a difficult time in planning and in placing the credits opportunely. In some cases, information about the availability of funds is only available to ICIs after the planting season has begun.

7.- Number of farmers served. Since the late 1970s, there has been considerable improvement in the banking system's reaching small farmers, especially by BAB. Yet, all indications are that considerally less than 10 percent of farmers get credit. Undoubtedly, there are many more farmers who are credit worthy. Means should be developed to reach them.

8.- Interest rate structure. At present, the real interest rate on almost all agricultural loans from BAB, BCB and PL-480 refinancing and other small-fermer credit programs is 13 percent, with maintenance of value clause. This figure is concessionary, somewhat arbitrary and questionable as to its appropriateness. It is concessionary because it is less than the typical 25 percent rate on dollar-denominated loans currently charged by commercial banks. However, this bank rate maybe high because of the difficulties the banks currently encounter. There are expectations that the bank interest rate will fall as financial markets stabilize. This rate structure, as described in detail above, distorts credit markets, discourages deposit mobilization and works against the development of healthy financial institutions.

The 13 percent rate needs to be carefully examined. As markets stabilize two principles should be followed: (1) to ensure proper use of financial and real resources, do not use concessionary rates for agriculture; establish the rates on a par with interest rates for other sectors and preferably the opportunity cost of capital, and (2) to encourage financial intermediation and the development of viable financial institutions, be sure that the rate is sufficient for ICIs to offer attractive savings deposit interest rates and still have an adequate interest rate spread.

Conclusions

It is clear that in 1986 the Bolivian RFMs are in a state of crisis, in spite of relatively high levels of real agricultural credit activity. Although considerable changes have occurred over the past fifteen years, especially in getting formal-market credit in the hands of increasing

numbers of small farmers, RFMs are one sided--credit oriented--and are not structured to mobilize savings and enccurage financial intermediation. Therefore, they are dealing with only one aspect of the role of financial institutions in the economic development process.

As a result of this structure, as well as the severe impact of hyperinflation, Bolivian RFMs are comprised of a series of weak institutions that are highly dependent on outside funding and, therefore, are fragile. If it were not for BCB and PL 480 refinancing, much of which comes from foreign assistance, agricultural credit for small farmers in the country would collapse to almost nothing. Credit for medium large farmers would similarly be impacted because commercial banks also rely on BCB refinancing to finance this class of borrower.

This is an untenable situation for the financial system, agricultural production and investment, and economic development. Corrective action needs to be taken. To begin, appropriate monetary and credit policies should be developed, with particular attention to the interest rate structure and inflation control. Simultaneously, there is a need to restructure the whole financial system, beginning with the Central Bank. The roles of BCB and PL-480 as a second-story banks, the public-sector banks, private-sector ICI's, and PVOs need to be identified. Major modifications are necessary. Maybe some institutions should be eliminated. With respect to RFMS emphasis should be placed on establishing financial institutions that are: (1) financial intermediaries in rural areas, (2) financially viable and independent, and (3) capable of reaching large numbers of all classes of farmers, but especially small farmers. Of course to accomplish this, appropriate monetary and credit policies must be in place. If these are achieved, much will be done for the process of Bolivian economic development, especially in rural areas.

With the current crisis and the need to reactivate the economy, there is no more appropriate time to begin to restructure than now. The following chapters not only describe Bolivian RFMs and the several institutions, but also contain some ideas for restructing institutions. The report concludes with a final chapter of general recommendations.

III

REFINANCING FOR AGRICULTURAL SECTOR: BOLIVIAN CENTRAL BANK AND PL-480

Introduction

As noted in the previous chapter, refinancing of agricultural credit extended by Bolivian intermediary financial institutions (ICIs) has become increasingly important since 1967 when the first trust fund to refinance lending to agriculture and other productive sectors was established in the Bolivian Central Bank (BCB). The new trust fund, the Special Fund for Economic Development, was announced in Supreme Decree No. 07911. Since that time, twelve trust funds have been instituted in the BCB. In 1985 there were five active funds that were exclusively for agriculture or had important agricultural components. BCB also administers refinancing from its "own funds," which are resources from the BCB or the Bolivian government.

In 1984, PL-480 initiated a refinancing program using PL-480 Title III funds and others. PL-480 had previously had some credit programs but never on the scale of its current refinancing operations. PL-480 became involved in refinancing because of two factors. The first factor was, because of the flood and draught disasters in 1983, there was a rise in food imports. This meant that PL-480 had considerably more resources, and at a time when USAID did not have financing for credit programs through normal foreign aid channels. Therefore, USAID worked with PL-480 to use some of the new resources to establish refinancing funds. The second factor was that in this period BCB experienced considerable problems the interupted the timely and proper flows of refinancing. The Central Bank's labor union created considerable instability and turmoil as a result of the economic crisis and attempts by the government to exert more control over the Bank. Corruption was rampant as BCB officials rationed foreign exchange and refinancing. Under these conditions, USAID encouraged the development of PL-480 as a refinancing source in order to create an alternative to the problematical and troublesome BCB and to take advantage of the enlarged PL-480 resources.

This chapter consists of two main parts. The first part describes and analyses BCB refinancing for agriculture. The second deals with PL-480 refinancing. The chapter finishes with conclusions.

Bolivian Central Bank

Growth of Refinancing for Agriculture

As shown in Table III-1, the real value (expressed in 1980 prices) of total BCB refinancing for agriculture followed a downward trend between 1979 and 1982. In 1981 and 1982 there were sharp declines from the levels of

1979 and 1980. Then, in 1983 there was a major shift when refinancing doubled the level of the previous year. By 1984 it increased another 247 percent and in 1985 it grew slightly. The large increases beginning in 1983 were due to the huge inflows of foreign assistance funds following the flood and draught disasters in that year as well as the government's providing increased financing for the sector, especially for BAB. Since 1983 BCB refinancing became increasingly important as a source of funds for private and public-sector bank financing for the agricultural sector.

Relative Importance of Agricultural Refinancing

Since 1979 refinancing for agriculture has grown considerably in importance, relative to total refinancing. As shown in Table III-1, in that year agricultural refinancing accounted for 47 percent of the total. During the 1980-1982 period the proportion rose to about two-thirds and by 1983 and 1984 the percentage for agriculture exceeded 80 percent. In 1985 the sector's relative importance increased to over 90 percent.

The trend of increasing relative importance of refinancing of agricultural loans was due to three factors. The first factor was that over the 1980-1982 period refinancing for non-agricultural activities declined more rapidly than that for agriculture. The second factor was that in 1983 and 1984 non- agricultural refinancing grew at a lesser rate than that for agriculture. The third factor was that in 1985 non-agricultural refinancing declined while agricultural refinancing rose. All of these factors show the government's and the BCB's policy of increasingly using the refinancing mechanism to provide credit for agriculture.

Sources of Funds for Refinancing

BCB has two generic sources of refinancing funds: trust funds and its own funds. The trust funds mostly originate from foreign assistance and are placed with BCB to be used to refinance specific types of development activity. They are employed as rotating funds, i.e., interest and principal reflows are returned to the fund for future lending. The Bank's own funds consist of monies placed with BCB annually by the federal government or monies created by BCB through emission of currency. These funds are also rotating funds, but can be increased or decreased by the BCB, depending on the perceived needs for refinancing. Most are directed to specific types of activities, especially to cover financing of regular annual agricultural production. Compared to trust funds, there is more flexibility in the use of the funds because each year the government and BCB make decisions about the activities to be refinanced and the amounts of available funds.

As shown in Table III-2 trust funds were the principal source of refinancing resources over the 1979-1984 period. In 1985 their relative importance dropped precipitously. It should be noted that despite the relative dominance of trust funds in refinancing, their importance has followed a downward trend while refinancing from BCB's own funds has risen. This pattern reflects two interrelated factors: (a) the effects of inflation in causing a tendency of a decline in the real value of trust-funds available for refinancing over the period, and (b) the increased use of the

TABLE III - 1

BOLIVIAN CENTRAL BANK
PERCENT OF REFINANCED LOANS DIRECTED TO AGRICULTURE AND AGROINDUSTRY a/
1980 PRICES b/
(1,000 $b.)

SOURCE OF FUNDS	1979	1980	1981	1982	1983	1984	1985
TRUST FUNDS							
Total	658,934	625,815	296,836	367,390	669,149	1,972,512	623,057
Agriculture	517,049	495,915	243,623	250,743	562,559	1,770,362	376,298
Percent Agriculture	78.5	79.2	82.1	68.2	84.1	89.9	60.4
BANK'S OWN FUNDS							
Total	462,386	235,374	437,701	288,552	471,895	705,373	1,893,588
Agriculture	9,601	41,376	240,911	173,740	310,950	391,161	1,891,914
Percent Agriculture	2.1	17.6	55.0	60.2	74.4	55.5	99.2
TOTAL							
Total	1,121,320	861,189	734,537	656,243	1,089,044	2,677,885	2,516,645
Agriculture	526,650	537,291	484,534	424,483	873,509	2,161,523	2,268,312
Percent Agriculture	47.0	62.4	67.0	64.7	80.4	80.7	90.1

Source: Bolivian Central Bank, Development Department.
a/ Does not include Industry Refinancing Fund (FRI).
b/ Deflator, Consumer Price Index for La Paz.

TABLE III-2

REAL VALUE OF ANNUAL FLOWS OF BOLIVIAN CENTRAL BANK REFINANCING FOR AGRICULTURE AND AGROINDUSTRY a/

1980 PRICES b/
(1,000 $b.)

SOURCE OF FUNDS	1979	%	1980	%	1981	%	1982	%	1983	%	1984	%	1985	%
TRUST FUNDS	517,049	92.3	495,915	92.3	243,623	50.2	250,743	59.1	562,559	64.4	1,770,362	81.9	376,298	16.5
Development 07911 c/	31,050	5.9	50,512	9.4	16,109	3.3	21,107	5.0	74,171	8.5	82,100	3.8	14,900	0.7
Refinancing Fund (FRA I)	138,890	26.4	167,581	31.2	74,182	15.3	30,986	7.4	179,206	20.5	199,211	9.2	61,777	2.7
Refinancing Fund (FRA II)	321,242	61.0	163,294	30.4	78,069	16.1	46,297	10.1	165,329	18.9	191,796	8.9	149,507	6.6
IDB-Livestock			2,856	0.5										
Agro. Industry & Artisanry	25,764	4.9	108,567	20.2	72,341	14.9	132,719	31.6	143,622	16.4	168,327	7.8	3,143	0.1
Technical Assistance Fund	103	0.1	3,105	0.6	2,922	0.6	19,634	4.6	231	0.1	767	0.1		
IDB.Agriculture/Livestock											1,127,161	52.1	146,971	6.5
BANK'S OWN FUNDS														
Agriculture	9,601	1.8	41,376	7.7	240,911	49.8	173,740	40.9	310,950	35.6	391,161	18.1	1,891,914	83.5
Total	526,650	100.0	537,291	100.0	484,534	100.0	424,483	100.0	873,509	100.0	2,161,523	100.0	2,268,312	100.0

Source: Bolivian Central Bank, Development Department.
a/ Does not include Industry Refinancing Fund (FRI).
b/ Deflator, Consumer Price Index for La Paz.
c/ Includes refinancing made for agricultural purposes.

Bank's own funds to both compensate for this decline and to be used as the main instrument to augment total refinancing.

The figures of Table III-2 show this clearly. In 1985 the real value of the level of trust-fund refinancing for agriculture was 72.8 percent of the level of 1979. Over the seven-year period the real value of annual refinancing from this source followed a downward trend except in 1982, 1983 and 1984. In 1982 the value increased slightly. In 1983 it more than doubled and then tripled again in 1984. There were two reasons for the increases in these years. First, it appears that the BCB increased the size of the trust funds as a means to recapitalize them for their loss in real value from the effects of inflation. According to USAID, BCB was supposed to do this under the conditions of the trust fund arrangements. Morevoer, this was easily accomplished by the BCB's reallocating funds or creating new money. Second, in 1983 IDB established a major new trust fund (IDB-712) valued at $32 million. Most of this was disbursed in 1984, which accounted for the very sharp increase in trust-fund refinancing in that year. In 1985 both of these factors were absent. The result was in that year the real value of trust-fund refinancing fell almost 80 percent.

The 1985 decline in trust-fund refinancing for agriculture was more than offset, however, by a large increase in refinancing from the Bank's own funds. An important source was the $10 million loan from USAID to BCB to be used for emergency relief, but as part of the Bank's own funds. Under this arrangement the government was supposed to contribute an equal amount, but did not meet all of its obligation.

Indeed, the real value of own-fund refinancing for agriculture increased over the seven-year period. In only one year, 1982, did the real value decline. The relative importance of the Bank's own funds in total refinancing illustrates the magnitude of the change. In 1979 only 1.8 percent of total agricultural refinancing came from their own funds; by 1981 the percentage had risen to 49.8. The relative importance declined between 1982 and 1984 when the trust funds were expanded, but by 1985 refinancing from the Bank's own funds accounted for 83.4 percent.

It is clear that since 1979, with the exceptions of 1982, 1983 and 1984, the BCB strategy has been to increase its own funds rather than trust funds to expand refinancing. In 1985 BCB let the real value of the trust funds decline. Rather than maintain the real value of these funds it put new resources directly in the own funds category. One reason that this may have occurred is that USAID placed restrictions on the use of the trust funds it had established. The Mission had specified that trust funds and emergency funds not to be made available to BAB. To get around this sanction, it appears that BCB chose to use their resources to increase their own funds, which they could use to refinance BAB loans.

Trust Funds

Table III-2 presents figures on the amount of refinancing from the trust funds. A brief description of each of the funds follows.

Special Fund for Economic Development 07911. This fund was established in 1967 by USAID under an agreement whereby the peso equivalent of principal and interest from a previous USAID loan to COMIBOL would be placed in a special development fund. The loan was for $6.49 million of which $3.5 million was for agriculture and the remainder for other productive sectors.

First Agricultural Refinancing Fund: FRA-I. This fund was established in 1971 with a loan by USAID. Total USAID commitments have been $8.27 million. This fund was to be used to increase production of basic foodstuffs, to substitute for imports and meet domestic demand.

Second Agricultural Refinancing Fund: FRA-2. This fund was established by USAID in 1974 with a loan of $8 million to refinance loans for small farmers.

Agroindustry and Artisanry: A and A. This fund was established by USAID in 1978, with a loan of $9 million to undertake agribusiness and artisanry projects in rural areas that benefit small farmers.

Technical Assistance Fund: FAT. This fund was established by USAID in 1978 as a component of A and A. The loan was for $400,000 to be used by ICIs to undertake feasibility studies for possible A and A projects.

IDB-Livestock. This fund was established by a series of loans from IDB for refinancing of livestock. The first loan was made in 1969.

IDB-Livestock and Industry. This fund was established by Ia loan from IDB in 1983 to undertake small farmer livestock and agricultural production. The loan was for $32 million.

Distribution of Trust Funds

As shown in Table III-2, in 1985 there were only two trust funds that had significant disbursements: FRA-II and the IDB Agriculture/Livestock Loan. In 1984, FRA I, A and A, and 07911 were also important, but more than half the funds came from the newly-established IDB Agriculture/Livestock Fund. In each of the years between 1979 and 1983, FRA I, FRA II and A and A were the dominant trust funds.

Institutional Distribution of Refinancing

As shown in Table III-3, in 1985 the private banks received 67.0 percent of total BCB refinancing for agriculture and BAB the rest, except for a small amount used by the State Bank for agribusiness. When the total is disaggregated by source of funds, private banks received 72.2 of trust-fund refinancing and 65.9 percent of the refinancing from the BCB's own funds.

Between 1979 and 1984 the private banks received a majority of total financing in all years except 1984. They dominated trust-fund refinancing in all years except 1981 and they had more than half of refinancing from the Bank's own funds in all years except 1983 and 1984. Thus, it is clear that

TABLE III-3

DISTRIBUTION OF ANNUAL DISBURSEMENTS FROM BOLIVIAN CENTRAL BANK REFINANCING LINES FOR AGRICULTURE BY CLASS OF BANK, 1979-1985

1980 Prices
(1,000 $b.)

FINANCING LINE	1979	%	1980	%	1981	%	1982	%	1983	%	1984	%	1985	%
RUST FUNDS														
cial Funds D.S. 07911	31,047	100.0	50,512	100.0	16,110	100.0	21,107	100.0	74,171	100.0	82,100	100.0	14,371	100.0
.A.B.	11,912	38.4	11,316	22.4	9,891	61.4	4,797	22.7	57,861	78.0	8,953	10.9	5,354	37.3
tate Bank			35	0.1							21	0.1	964	6.7
vate Banks	19,135	61.6	39,161	77.5	6,219	38.6	16,310	77.3	16,310	22.0	73,126	89.0	8,053	56.0
I	138,890	100.0	167,581	100.0	74,182	100.0	30,986	100.0	179,206	100.0	199,211	100.0	61,777	100.0
.A.B.	63,644	45.8	53,293	31.8	38,241	57.5	12,048	38.9	11,068	6.2	33,929	17.0	395	0.6
te Bank	2,520	1.8	747	0.4					5	0.0	362	0.2		
vate Banks	72,726	52.4	113,541	67.8	35,941	48.5	18,938	61.1	168,133	93.8	164,920	82.8	61,382	99.4
A II	321,742	100.0	163,294	100.0	78,068	100.0	46,297	100.0	165,329	100.0	191,796	100.0	149,507	100.0
.B.	157,524	49.0	104,820	64.2	50,026	64.1	13,963	30.2	88,726	53.7	71,624	37.3	86,522	57.9
te Bank											4,265	2.2	286	0.2
ivate Banks	163,718	51.0	58,474	35.8	28,042	35.1	32,334	69.8	76,603	46.3	115,907	60.5	62,699	41.9
.B.- Livestock Program			2,856	100.0										
.A.B.			1,781	62.4										
tate Bank														
vate Banks			1,075	37.6										
roindustry & Artisanry	25,764	100.0	108,568	100.0	72,341	100.0	132,719	100.0	143,622	100.0	169,327	100.0	2,124	100.0
.B.	1,194	4.6	5,193	4.8	30,689	42.4	7,887	5.9	61	0.1	51,918	30.7	1,087	51.2
te Bank			1,124	1.0	470	0.7	446	0.3	657	0.4	18,993	11.2	397	18.7
vate Banks	24,570	95.4	102,251	94.2	41,182	56.9	124,386	93.8	142,904	99.5	98,416	58.1	640	30.1
.T.	103	100.0	3,105	100.0	2,922	100.0	19,296	100.0	231	100.0	767	100.0		
.B.														
tate Bank														
rivate Banks	103	100.0	3,105	100.0	2,922	100.0	19,296	100.0	231	100.0	767	100.0		
.B.- Agriculture/Livestock											1,127,161	100.0	146,971	100.0
.A.B.											654,351	58.0	9,091	6.2
te Bank											313	0.1		
vate Banks											472,487	41.9	137,880	93.8
otal Trust Funds	517,046	100.0	495,916	100.0	243,623	100.0	250,405	100.0	562,559	100.0	1,770,363	100.0	374,749	100.0
.B.	234,274	45.3	176,403	35.6	128,848	52.9	38,695	15.5	157,715	28.0	820,785	46.4	102,488	27.4
te Bank	2,520	0.5	1,906	38.4	470	0.2	446	0.2	662	0.1	23,954	1.4	1,647	0.4
rivate Banks	280,252	54.2	317,607	64.0	114,305	46.9	211,264	84.3	404,182	71.9	925,624	52.2	270,654	72.2
a Own Funds														
griculture	9,601	100.0	41,377	100.0	240,911	100.0	173,740	100.0	310,950	100.0	391,161	100.0	1,891,915	100.0
.A.B.	3,106	32.4	18,370	44.4	83,182	34.5	46,780	26.9	250,429	80.5	365,973	93.6	644,448	34.1
te Bank							4,888	2.8						
vate Banks	6,495	67.6	23,007	55.6	157,729	65.5	122,071	70.3	60,521	19.5	25,188	6.4	1,247,467	65.9
OTAL	526,647	100.0	537,293	100.0	484,534	100.0	424,144	100.0	873,509	100.0	2,161,524	100.0	2,266,664	100.0
al B.A.B.	237,380	45.1	194,773	36.3	212,030	43.8	85,475	20.2	408,144	46.7	1,186,758	54.9	746,896	32.9
al State Bank	2,520	0.5	1,906	0.4	470	0.1	5,334	1.3	662	0.1	23,954	1.1	1,647	0.1
otal Private Bank	286,747	54.4	340,614	63.3	272,034	56.1	333,335	78.5	464,703	53.2	950,812	44.0	1,518,121	67.0

urce: Bolivian Central Bank, Development Department.
a/ Real values at 1980 prices, deflator Consumer Price Index for La Paz.

the private banks have been the primary beneficiaries of BCB refinancing.

Nevertheless, it is important to note that beginning in 1983 and 1984 BAB received very substantial increases in real refinancing. Then, in 1985 the real value declined. This pattern reflects BCB's use of refinancing, especially from its own funds, to compensate BAB for the loss in real value of its own loanable funds. As will be shown in Chapter IV, BCB provided 91.1 percent of BAB's loanable funds in 1985. Furthermore, it is important to note that BCB used increasing portions of its own funds to finance BAB. As noted previously, this was to compensate for USAID's sanctions against BAB having access to USAID-financed resources. Indeed, BAB would have probably had a much bigger share of total BCB refinancing in 1985 had not the new Emergency Agricultural Fund come on stream as part of the Bank's own resources.

The institutional distribution of refinancing by the individual trust funds shows that BAB has been a principal user of FRA-II, A and A, and the Special Fund for Economic Development lines.

The Refinancing Mechanism

BCB informs the ICIs of the amounts of credit that will be available for each agricultural cycle. The amounts are based on: (a) an agricultural plan (described below) prepared by the BCB's Development Department, the entity that administers refinancing, and (b) the availability of refinancing resources as determined by BCB and government policy. Refinancing is available from both trust funds and BCB own funds; although the Bank's own funds are more flexible because they have fewer constraints on their use.

The ICIs prepare loan applications and present them to the BCB's regional office, usually in batches with a summary sheet listing the name of borrowers and key factors about each loan. Now, in a major change from the past practice of the BCB carefully reviewing each individual loan, refinancing from BCB's own funds, but not most trust funds, is subject to the new Automatic Refinancing System(SIRA). This means that upon presentation of the loan documents by the ICI the refinancing is automatically placed in the ICI's account at BCB. The process normally does not exceed 48 hours and therefore avoids the long delays in disbursements that used to occur when the BCB reviewed each farmer's application prior to disbursement. Previously, in many cases, the BCB undertook field inspections and feasibility studies before the loan was disbursed. SIRA is a major improvement. It places the responsibility for loan approval with the ICI and avoids delays in disbursements. Unfortunately, it is not employed with most trust funds because the BCB and foreign donors consider it important that inspections and careful loan application reviews take place to try to ensure that credits are to be used for their intended purpose.

Nevertheless, BCB continues to review the individual borrower applications, but after the funds are disbursed. If discrepancies are encountered, the ICI must return the refinancing and assume full responsibility for the loan. This BCB review procedure is probably mostly a

costly excercise in futility. It is clearly designed to try to avoid credit diversion by directing credit to the intended class of farmer and the targeted activities. It is doubtful that the review obtains the latter objective because of fungibility and substitution of borrowed funds for a farmer's own resources.

Private-sector ICIs can refinance up to 80 percent of the value of the loan, with the other 20 percent coming from their own resources. In contrast, BAB receives 100 percent refinancing because it does not have funds of its own to use. In the case of farmer-borrower default the ICI assumes all of the risk. Past due amounts on refinanced loans made to an ICI are substracted from the ICI's account with BCB. Therefore, BCB does not have any significant delinquency in its refinancing portfolio.

The current refinancing rate from BCB to the ICI is 8 percent. To this amount the ICI adds 4 percent and usually at least a 1 percent flat commission on the value of the loan as it onlends to the farmer. Thus, the ICI has a 4 to 5 percent spread. Most ICIs argue this spread is insufficient since they assume the bulk of the lending transactions costs and the risk.

The exchange rate risk is borne by the borrower. The loans have a maintenance of value clause pegged to the exchange rate for the dollar.

The loan interest rate is 13 percent. This rate is considerably lower than the free-market rates for similar loans in the commercial banking system; hence, it is concessionary. Therefore, the concessionary rate will encourage all classes of borrowers to prefer refinanced loans if they can obtain access to them. This situation undoubtedly leads to the diversion of agricultural credit for non-agricultural purposes. One effect is agricultural illusion which means that data on agricultural credit overstate the amount of resources that are used to finance this sector. If the refinanced rate were raised to the level of the market rate much of the BCB's concern for diversion would disappear and the costly control procedures could be cut considerably.

Planning

Since 1981 the BCB Development Department has prepared a financing plan for the agricultural sector for each agricultural cycle. The manner in which the plan is prepared is very simple and subjective. It is mostly undertaken by one person, Lic. Hugo Ossio, sub-director of the department.

The plan is designed to direct credit towards targeted activities. It is disaggregated by geographic region and ICI. The end result is that each ICI knows about how much refinancing will be available for specific activities in each region. Thus, the end objective is to allocate the distribution of refinanced credit according to pre-established criteria and goals.

According to Lic. Ossio, the base of the plan is last year's refinancing. This amount, broken down by regions and institutions, is then

adjusted for changes in production costs and hectarage. This information is obtained from the annual operating plan prepared by the Ministry of Agriculture and Peasants (MACA), regional development corporations, BAB, and producers associations. Finally, the amounts available are adjusted in accordance with the availability of foreign and domestic funds. The latter, of course, is influenced by government monetary and fiscal policies.

ICIs have complained about the timing of the planning process. ICIs are informed about the availability of refinancing funds without sufficient lead time to plan their lending nor to extend loans prior to the time that farmers need funds for land preparation and planting. Furthermore, ICIs report that they are unable to shift unusued funds from one region to another. As a result, some of the funds allocated for refinancing are unused.

The planning process may be useful to help estimate the demand for agricultural credit in a cycle. Yet it is naive to assume that credit will flow to the targeted objectives, especially if the refinanced loans carry concessionary interest rates; credit diversion is certain to occur on a wide scale. Therefore, the rigidity of the plan with respect to allocation of funds by activity, region and institution is going too far. Flexibility should be permitted to allow financial resources to flow in accordance with supply and demand. If the concessionary aspect of the interest rate were eliminated, credit diversion would be an unnecessary concern.

Conclusions

The BCB is the most important source of funds for agricultural credit in Bolivia today. Using the weighted average monthly exchange rate for 1985, BCB refinancing accounted for $59.4 million in agriculture credit in that year. Currently, the refinancing lines in Bolivia cover more than 90 percent of BAB's lending and the large majority of the agricultural credit extended by the private banks. If BCB refinancing were withdrawn, the Bolivian agricultural credit system would be in serious trouble. BAB would not have other viable sources of loanable funds, because its capital base is so small and its financial situation is very weak. The private banks would need to make more loans from their own funds. There is no doubt that if BCB refinancing were unavailable that the amount of agricultural credit would decline drastically.

BCB refinancing activities are concentrated in agriculture. In 1985, 90.1 percent of the total refinancing went to this sector.

In the last few years, BCB has been the recipient of several new sources of funds for refinancing; in 1983 it obtained $32 million from IDB and in 1985 the $10 million for the Agricultural Emergency Fund from USAID. These funds, plus increased injections by the BCB itself, have caused tremendous increases in the real value of refinanced agricultural credit since 1982, with the biggest rise occurring in 1984 after the agricultural disasters of 1983.

It is clear that in recent years BCB has decided to follow a strategy

of placing the bulk of its additional resources in its own-fund refinancing lines rather than in the trust funds, as it is supposed to do under its agreements with USAID. A probable explanation for this policy is that the Bank has much more flexibility with its own funds and that it wants to have additional resources for BAB, which is now excluded from access to USAID-sponsored trust funds. Furthermore, since SIRA is applied to their own funds and not the trust funds, disbursement is easier and more timely, something that appeals to both BCB and the ICIs.

In spite of these increases in funding, BCB continues to be plagued by a number of difficulties that have to one extent or another been present since the Bank entered refinancing in the late 1960s. These difficulties limit its effectiveness in refinancing.

First, the Development Department is undoubtedly inefficient. Records and ledgers are kept by hand. There is a need to computerize this department. If this were done, the work could be accomplished with far fewer employees. Indeed, this may be one reason it has not been done; the Bank's labor union is very strong and would resist labor-saving innovations.

Second, BCB refinancing has excessive targeting of credit both by clientele and activities financed. This has come about because of restrictions placed by foreign donors and domestic planning. The targeting requirements are likely to be futile in reaching the intended objectives, due to fungibility and substitution of funds for ICIs. Moreover, they increase BCB and ICI costs because of the additional reporting requirements. Efforts should be made to consolidate lines whenever possible and then reduce targeting to the bare minimum.

Third, there is a problem for the participating banks in the timing of information about the amount of available BCB refinancing. The root is that the government often does not make this decision until it is near the time for farmers to prepare land and plant, or even later. Thus, the banks cannot plan on specific amounts of resources. These circumstances lead to inefficient allocation of credit, delays in loan approval and the inopportune timing for credit use. Some results are that delinquency and credit diversion are increased.

Fourth, BCB is inflexible on the institutional and regional distribution of credit. Thus, whereas excesses of available funds may exist in one part of the country or for specific institutions, shortages may exist elsewhere. Means should be established to make the system more flexible.

Fifth, although SIRA is a big improvement to get around delays in disbursements it is not applied to all refinancing lines, i.e., the trust funds. This should be changed.

Sixth, BCB should demphasize the post-disbursements reviews of loan applications. This is time consuming for BCB and requires extra paper work by ICIs. The purpose of the review is to try to control credit use and ensure that the ICIs follow the rules. Means should be devised to accomplish the same objectives through less onerous methods such as spot

checks. The fact that the ICI has to assume the risk for the loan in case of borrower default, places a substantial burden on the ICI to make good loans.

Seventh, BCB has been accused of corruption in allocating credits. These practices should not be permitted. Fortunately they appear to have been reduced considerably since the propitious conditions of hyperinflation and a rapidly depreciation of currency have been eliminated. Nevertheless, the possibility for corruption arises anytime there is an excess demand for refinancing funds.

Finally, with the reorganiation of the financial system the role of the BCB refinancing program needs to be examined. My examination of the program suggests that the procedures and policies need to be thoroughly examined and revised to make the system more efficient and flexible. Alternative systems such as other second story institutions should be examined to make a decision whether or not the BCB deficiencies should be corrected within the bank or that a new refinancing institution be created.

PL-480 Executive Secretariat

Introduction

In 1979, the PL-480 Executive Secretariat was established in Bolivia to administer local currency derived from PL-480 sales of basic grains in Bolivia. The agreement to set up the Executive Secretariat contained provisions for PL-480 to extend credit. Between 1979 and 1984 its credit activity was confined to a grant to BAB to provide additional funds to the Bank for its Small Farmer Credit Program. Since 1984, the Secretariat has rapidly become an important source of refinancing for agricultural production, artisanry and agribusiness.

USAID has worked closely with the Executive Secretariat in the development of a number of special credit programs that are targeted towards specific ICIs including private banks, FENACRE and cooperatives, CACEN, and the UCFs of the regional development corporations. USAID's interest in developing PL-480 as a second-story refinancing institution came about as a result of its dissatisfaction with the handling of refinancing by BCB, the mission's discontinuation of support for BAB, a shift to private-sector emphasis from public-sector institutions, and the lack of new program funds to establish credit. Meanwhile, PL-480 had increasing funds as a result of the large inflows of basic grains following the 1983 disasters. It was natural, therefore, that USAID should look to the development of PL-480 as a refinancing institution, at least as a stop gap measure, until more program funds were available and problems with BCB could be resolved.

In 1984, a pilot trust fund program was established to refinance national private-sector banks with Title III funds (derived from sale of wheat under the 1978 agreement that was later augmented with an agreement in 1986). Based on the success of the pilot program, the bank trust refinancing program was formalized in 1985. Now, in addition to Title III funds, PL-480 also undertakes refinancing with Title I (based on sale of

wheat under a 1985 agreement) and Title IV (based on disaster relief in 1984) funds.

It is noteworthy that PL-480 does not provide refinancing for public-sector institutions, including BAB. This policy is consistent with USAID's recent emphasis on the private-sector and the mission's dissatisfaction with BAB.

Although, PL-480 refinancing has assumed an important role in Bolivia, it has been considerably less important than BCB refinancing. In 1985, the Secretariat had dirsbursed only 7 percent of the amount disbursed by BCB. Roughly, PL-480 refinancing for agriculture is about one-sixth of that of the Central Bank. The Secretariat, however, has programmed many other funds for disbursement, and, therefore, could become relatively more important in the future.

The PL-480 Secretariat entered refinancing with operational norms, policies and procedures that were designed to be simple, direct, flexible and easy to implement. Their program design appears to have been been successful in this regard. Participating ICIs have been very satisfied with the results, finding them much more desirable and functional than those of BCB.

Refinancing Lines

Overview and Distribution by ICI. There are three major refinancing lines administered by the Executive Secretariat: (a) trust funds for private banks, (b) trust funds for FENACRE to onlend to cooperatives, and (c) regional development projects. In addition, there are a number of other credit programs. Some of the more important are: (a) housing credits for CACEN, (b) agricultural credit for CACEN, and (c) trust funds for the Chapare. Each of these is discussed in detail below, following a brief overview.

Table III-4 shows the level of activity. As of July 23, 1986, $10.4 million was disbursed (dollar values are figured at the exchange rate at the time a commitment or disbursement took place). Of the total, the private bank trust funds were clearly the most important, accounting for 56.8 percent of the disbursements. Next in importance were the regional development projects with 30.8 percent of the disbursements. FENACRE followed with 9.8 percent. The Chapare trust fund had 2.6 percent. No disbursements had taken place under the two CACEN refinancing lines; these programs were only established in July 1986.

Norms and Procedures. The norms the Executive Secretariat established for each refinancing line are quite similar. Nevertheless, there is some variation in the specific requirements. The norms are established in a letter of understanding between the Secretariat and each ICI. The fundamental elements of the letter are the following.

First, under most lines the Secretariat makes the funds available to the ICI to establish a trust fund within the ICI, as is the case with

Table III-4

PL-480 DISBURSEMENTS FROM REFINANCING LINES
AS OF JULY 23, 1986
(Millions U.S. Dollars)

Refinancing Line	Disbursed	Percent
Bank Trust Funds	5,888	56.8
FENACRE and Cooperatives	1,019	9.8
Regional Development Projects	3,196	30.8
Chapare Trust Funds	.265	2.6
CACEN Housing	-	-
CACEN Agricultural Credit	-	-
TOTAL	10,368	100.0

Source: Executive Secretariat, PL-480.

private banks and FENACRE. When trust funds are established, the ICI has to keep the monies active in loans or return them to PL-480. The funds from the regional development lines are a major exception. In this case, the ICI repays the refinancing to the regional UCF, where it is placed in a rotating credit fund. Thus, in effect, the PL-480 funds end up as a grant to the UCF.

Second, there are conditions placed upon the use of funds. The purpose of loans may be specified. For example, for reconstruction of housing destroyed by floods (CACEN housing loans) or for agricultural production, artisanry and agribusiness (bank trust funds).

Third, there are limits placed on the size of loans in order to try to ensure that the refinancing is used to make credit available to the targeted groups of small- and medium-sized farmers or agribusiness and artisanry enterprises.

Fourth, the conditions under which the ICI receives the refinancing is spelled out. These include the refinancing interest rate, term of refinancing and reporting requirements. In most cases the refinancing rate is 8 percent and the loan interest rate to the final borrower is specified at 12 percent plus a 1 percent commission for a reserve for bad debts. PL-480 uses the development loan rate specified by the Central Bank as a guide in establishing its loan interest rate to the final borrower.

Fifth, the ICI is assigned the total responsibility for selecting clients to be refinanced (an exception is the Chapare Project, where the SDTB is involved), subject to the terms of the agreement. The ICI presents minimal paperwork to PL-480 to PL-480 in its loan application. This includes the final borrower's name, amount of credit and purpose of credit. There is no review of final borrower loan applications. This makes for speedy approval and disbursement. The Executive Secretariat, however, follows up the credit with the ICI in the course of the loan to try to ensure that the refinancing is being used as intended.

Sixth, the broad conditions of the terms of loans to the final borrowers are established. Of particular importance are the terms of the loan and the interest rates and commissions. The loan guarantees are left to the ICI to establish, but they should not be set so as to exclude target clientele. Provisions are established for extending a delinquent loan if there is a just cause.

Seventh, there are provisions for risk bearing and risk sharing. To guard against the effects of inflation and devaluation, all transactions, between PL-480 and the ICI, as well as between the ICI and the final borrower, have a maintenance of value clause pegged to the U.S. dollar at the official exchange rate. Most also provide for the creation of a reserve fund, financed by a one-time flat commission of 1 percent of loan value within the ICI, to be used to cover losses. If the losses in the ICI were to exceed the amount in the reserve fund, then the loss is assumed by the ICI.

Finally, there are provisions for amendments to the letter of understanding should circumstances warrant.

Bank Trust Fund

This program was initiated in December 1984 on a pilot basis. Based on the succcess of the pilot program, the bank trust fund was regularized in early 1986. Capital in this fund comes from Title I, and Title III. Only national private-sector commercial banks that have development departments are eligible. Refinanciable projects are agricultural production, artisanry and agribusiness. To obtain a disbursement, the ICI must present PL-480 a list of the needs for financing including the names of farmers to be financed, the amount of credit and the purpose of the credit. A letter of understanding is drawn up. PL-480 disburses the funds for a period of five years in the form of a trust fund. These funds must be disbursed by the ICI to the final borrower within 30 days. The ICI has use of the money for the period of the trust fund. A condition to keeping the money for this period is that the ICI must relend the interest and principal reflows from the loans within a period of 30 days.

In order to ensure that funds are lent to farmers and individual artisans, at least 60 percent of the amount refinanced must be lent to this clientele. Loan terms are up to one year for operations and up to five years for investment. Loans can be made to individuals or groups. There are upper limits on loan size of $15,000 for individual farmers and artisans and $70,000 for agribusiness firms. There is also a provision for larger loans for special projects, where the loans meet the objectives of the program. All special projects must be submitted to the Executive Secretariat for approval.

The interest rate structure consists of an 8 percent rate between PL-480 and the ICI. The ICI onlends to the borrower at 12 percent. It also charges the borrower a 1 percent one-time flat commission on the total loan that is used to establish a reserve fund for bad debts. This fund is held in the form of a time deposit account at the ICI. It is made in the name of PL-480 and earns a 10 percent rate of interest.

The ICI is free to choose the form of loan collateral. In case of a loan default, the ICI can recover the amount from the reserve fund, subject to the approval of PL-480. If the amounts in default exceed the available funds in the reserve fund the ICI assumes the rest of the loss.

FENACRE Trust Fund

On April 24, 1986, PL-480 entered into a letter of agreement with FENACRE to establish a trust fund so that FENACRE could operate as an ICI and make loans to integral cooperatives, its affiliated cooperatives and central cooperatives for purposes of agricultural production, artisanry and agribusiness. The initial trust fund was established for a three-year period beginning January 1, 1986, and consisted of the $475,134 in outstanding debt that FENACRE had with the Secretariat, all of which had been encumbered since September 1985. The bulk of FENACRE refinancing has

been directed to the four integral cooperatives.

FENACRE receives the funds from PL-480 at 7 percent. It onlends the funds to the cooperatives at 10 percent, which charges its members 12 percent. The cooperative members are charged a one-time flat commission of 1 percent, which is to be placed in a reserve fund for bad debts within the cooperative.

Of the funds that FENACRE receives from PL-480, FENACRE discounts 1 percent to place in a reserve funds for bad debts. In the case that this fund is insufficient to cover bad debts FENACRE must assume responsibility for the difference.

Regional Development Projects

PL-480 funds are used to promote regional development under the USAID-sponsored Departmental Development Corporations Project (DDC). There are grant funds for institutional development and credit funds. The credit funds are administered by the Credit Financing Units (UCFs) of the regional development corporation. The program was initiated in 1978, but was interrupted in the early 1980s due to Bolivia's political instability. In 1984, the credit line was activated. Refinancing is available for agribusiness, agriculture and livestock production and small- and medium-sized industry and artisanry. Agribusiness and livestock production loans are the biggest receipients of this credit. Most financing is directed to longer-term investment.

PL-480 refinances specific projects with some going for annual operations. It is important to note however, that, under this program the ICI loan contract is between the ICI and the UCF and not PL-480. Therefore, when the ICI cancels its loan the proceeds are paid the UCF to form part of a UCF revolving credit fund. In effect, the PL-480 refinancing is a donation to the UCF.

Under this arrangmenet, the ICI pays PL-480 6 percent and earns a 4 percent spread. The UCF receives a 2 percent spread and the final borrower pays 12 percent plus a 1 percent flat commission.

The DDC Project will terminate in March 1987. A follow-on program, the Market Town Capital Formation Project, is scheduled to carry on this important regional development effort.

CACEN-Housing Credit

On July 10, 1986, an agreement was reached between PL-480 and CACEN for a $7 million credit from Title I funds. The funds are to be used for housing loans and family necessities in the region of Lake Titicaca that was severely damaged by floods in February 1986. The loan was for 25 years and after a five-year grace period is to be paid back in equal one-year installments over a period of 20 years.

CACEN obtains the funds from PL-480 at 4 percent. It then onlends them

to its mutuals, which extends credit to the borrowers. The interest rates for the last two borrowers are not specified.

CACEN-Agricultural Credit

On July 10, 1986, CACEN entered into an agreement with PL-480 to use $300,000 in funds from the Disaster Recovery Component of the Agroindustry Reactivation Fund for purpose of establishing a trust fund at CACEN to extend credit for agricultural production by small farmers whose crops were destroyed by the February 1986 floods. Credit can be extended for up to two years for operations and up to five years for investments.

PL-480 disbursements to CACEN are for a period of five years. They must be onlent to the borrowers within a fifteen-day period after disbursement. PL-480 makes the funds available to CACEN at 6 percent on the value of the loan. The final borrower pays 12 percent. In addition, the mutual charges the borrower a one-time flat commission of 1 percent that is placed in a reserve fund for bad debts at that level. The loan to CACEN from PL-480 is guaranteed by the assets of CACEN and the mutuals.

Chapare Trust Fund

Funds had been assigned to the Chapare project in previous years. However, on June 30, 1986, this effort was formalized when PL-480 entered into an agreement with the Bank of Cochabamba to establish a $2,603,700 trust fund for revolving credit to support the Chapare coca-substitution project. Loans from this fund are for agricultural production, artisanry and agribusiness. The Bank of Cochabamba works very closely with the Secretariat for Bolivian Tropical Development (SDTB) in this endeavor. SDTB provides technical assistance and planning for the coca-substitution project in the chapare. The essence of the collaboration is that all of the Bank's loans and disbursements need to be approved by SDTB. This is obviously a mechanism to try to control the use of credit in this highly conflictive zone.

The loans can be up to ten years for investments. The upper loan limits are $25,000 for individual farmers and $100,000 for agribusiness.

PL-480 lends the funds to the Bank at 8 percent which onlends them to the borrower at 12 percent. The borrower also pays a one-time flat fee of 5 percent to be deposited in a reserve fund for bad debt.

Because these loans have a special risk, the provisions for covering bad debts are unique. The first recourse is the reserve fund for bad debts but it is only to be used for loans that are guaranteed by harvest. In this case, 80 percent of the bad debt is to be covered by the fund and 20 percent by the Bank. If the reserve funds are exhausted, the Bank will cover 30 percent and PL-480 70 percent. For loans that have a guarantee of urban property, the Bank must assume all the risk and has no recourse to the reserve fund.

Conclusions

In the last two years PL-480 has rapidly established itself as a refinancing entity for the agricultural sector, including agribusiness, in Bolivia. Originally employed as a temporary stopgap institution to get around obstacles that threatened agricultural credit the Executive Secretariat has developed into an important institution. Moreover, because of its simple and flexible approach to refinancing it has been well received by the various ICIs. It has proven much easier to work with that the BCB.

Another strength of the PL-480 program is that it has funds for longer-term investment financing. At present, Bolivian banks do not tie up their own money for more than 90 days, because of their fears of devaluation. Moreover, most Central Bank refinancing is limited to production credit. It is clear that Pl-480 refinancing is filling an important void.

PL-480 has concentrated its refinancing activity in the bank trust funds. The funds have been an important source of funding for the banks. The Executive Secretariat has been the lifeblood of FENACRE's refinancing, and has compensated the Federation for the decline in available funds in the inflation-riddled CROFOC and BCB refinancing. Under the new 1986 agreement, PL-480 promises to be even more important to the Federation. CACEN has also been an important beneficiary of PL-480. Because of the Secretariat's refinancing, CACEN will be able to enter rural housing and agricultural credit. This will allow CACEN to obtain goals that it has long sought.

The Executive Secretariat is negotiating additional refinancing lines, including a wheat and seed line. In addition, it is restructuring procedures and norms for the UCFs of the new Market Town Project. It is exploring working with FINCA.

The fundamental strengths of PL-480 as a refinancing entity are its simplicity and that it places the bulk of the responsibility for loan approval and risk on the ICIs. These features mean that the Executive Secretariat can work with a small staff and low overhead. At present, the Executive Secretariat runs its credit program with only about five or six persons: a coordinator, three field technicians who spend about 85 percent of their time on credit, and bookkeepers. Since their records and documents are computerized, PL-480 estimates that bookkeeping time per loan averages one hour per month.

The Executive Secretariat does not spend extraordinary time in loan approval and control. The only documentation that an ICI must provide the Executive Secretariat at the time of loan application is a list of borrowers, the amount of credit and purpose of credit. On the basis of these documents there is immediate disbursement, which facilitates the timely use of credit. Afterwards, the field agents make periodic checkups on the loans in the ICI offices to make sure that all is in order. They review about two loans per week.

This system places the responsibility on the ICI for selecting clients

and assuming risk. This properly puts pressure on the ICI to manage its loans well. The maintenance of value clause protects both the ICI and PL-480 against the potential loss of real value with devaluation.

The way that the reserve funds for bad debts are structured, with one-time flat commissions, means that the final borrowers pay the cost of this risk. However, if the commission were not assessed, the ICIs would probably want to charge a higher interest rate, explicit or implicit, to compensate for the risk. It remains to be seen if the commissions are sufficient to cover the risk. Experience in the program will provide the answer.

Another strength is that PL-480 is willing to negotiate and adjust the terms of refinancing depending on the situation. For example, the terms of CACEN housing and the Chapare credit are considerably different than the others. This is a positive feature, allowing flexibility when the situation warrants.

The trust fund arrangement that is typically employed is also an attractive feature because it gives the ICI at least a fixed sum of money to work with over a period of three to five years. The regulations requiring the ICI to keep the funds in specified purposes and clientele should minimize credit diversion by the ICIs.

Although the PL-480 program has many strengths there are some features that are problematical.

First, PL-480 refinancing is not subject to control by Bolivian monetary and credit authorities. In its present form, it is an ad-hoc financial institution. This condition, imposes limits on the Executive Secretariat to function as a financial institution, and does not allow the government to directly control PL-480 under monetary and credit policy.

Second, PL-480 depends upon Title I, III and IV grain sales as sources of revenues for loanable funds. These sources do not depend upon financial markets. As such, the Executive Secretariat has limits to its lending. It may also encounter problems with funding because the amounts available, from sales must be released to PL-480 by the Bolivian government. Furthermore, there are competing uses, e.g., grants, for available PL-480 funds. One solution to get around these constraints would be for the Executive Secretariat to enter financial markets and borrow to additional resources. To do this, however, it would need to have adequate collateral. This probably implies the government would need to provide a guarantee. Whether this would be forthcoming is uncertain.

Third, since PL-480 depends on the government to provide the Bolivian currency resulting from the grain sales there can be delays in the Executive Secretariat receiving the funds. Indeed, PL-480 has experienced this very problem in recent times as the government has tried to limit expenditures and money emission. This dependence on the government can be disruptive to the flow of disbursements and provides short-term limits to the availability of funds for refinancing.

Fourth, although the letters of understanding are legal documents, if an ICI encounters severe repayment problems from refinanced loans the Executive Secretariat does not have any immediate recourse to recover the delinquent funds, as does BCB. The BCB taps an ICI's reserves at the Central Bank. In contrast PL-480 does not have any such recourse available to it.

Fifth, it is not clear that the typical 12 percent interest rate is appropriate. This rate plus the one percent commission, means the final borrower pays an effective interest rate of 13 percent, which is the same that BCR employs for development loans. Compared to levels of interest for regular commercial bank loans, this credit is underpriced. This leads to credit diversion by borrowers and all of the other negative aspects of concessionary interest rates. Furthermore, the refinancing interest rate charged the ICI is low compared to the market interest rates paid on deposits. This condition encourages the ICIs to use the PL-480 funds rather than to mobilize savings and to substitute the refinancing for its own resources.

Sixth, the PL-480 program does not contain provisions for voluntary savings mobilization, only the forced mobilization for the reserve funds that are the property of the Executive Secretariat.

Finally, experience shows that the private banks tend not to lend to small farmers but rather they prefer to deal with medium-sized farmers and agribusiness. This would be expected. Indeed, to deal with this tendency the private bank trust fund has established requirements that at least 60 percent of the amount lent goes to farmers. Despite this provision there still appear to be problems in getting the banks to lend to small farmers.

The conclusion is that the PL-480 system cannot be expected to reach large numbers of small farmers through the banks. Transaction costs are too high relative to the size of the loan, given that the banks have the alternative to lend to larger producers. When lending to small farmers the banks typically use the group loan credit delivery system as a means to reduce risk and lending costs. This practice should be encouraged.

In contrast, PL-480 refinancing through FENACRE and CACEN should be more successful in dealing with small farmers. This type of farmer is the basic clientele of these institutions.

It is premature to make a definitive judgement on PL-480 refinancing. Due to the newness of the program the Executive Secretariat has had limited experience and much will be learned with the passage of time. Nevertheless, PL-480 has rapidly become recognized as a de facto refinancing institution for Bolivian agriculture and agribusiness. Furthermore, in contrast to the BCB experience, PL-480 has demonstrated that refinancing can be done simply by placing the bulk of the responsibility for loan approval and risk where it should be, with the ICI. One of the important questions is what is the future role of the Executive Secretariat in refinancing? This interrogation must be answered as part of the study of the reorganization and restructuring of the financial system.

Conclusions

The reader is referred to the previous and more detailed sections that summarize and draw conclusions about BCB and PL-480 refinancing. In this final section some broad conclusions are presented.

Refinancing from BCB and PL-480 is the backbone of the Bolivian agricultural credit system. Without it, there is little doubt that credit flowing to the sector would precipitously decline. Given BAB's precarious financial situation that Bank is unable to obtain other financing and, as such, is virtually totally dependent on BCB refinancing as a source of loanable funds. The private banks are also major users of refinancing. In comparison to using their own resources to finance agriculture, they strongly prefer refinancing because financial costs are less and because they do not want to tie up their own funds in loans with terms that exceed several months. In addition, refinancing provides them access to additional resources.

In the total picture, BCB refinancing is much more important than that of PL-480. There are several reasons. First, the BCB has many more resources than PL-480. BCB not only has direct access to foreign assistance but also can create its own funds. In contrast, PL-480 is limited by the volume of U.S. grain sales.

Second, BCB refinancing is not limited to private-sector institutions. Therefore, it is available to BAB, whereas PL-480 refinancing is not.

Third, the private banks rely on refinancing from BCB for the large bulk of their agricultural credit. In contrast, their use of the PL-480 refinancing is limited in scope and is used to refinance relatively small and specific projects.

PL-480 refinancing, however, has been very significant. Beginning in 1984 the Executive Secretariat entered into a variety of refinancing lines that benefit not only clients of private banks but also clients of institutions such as FENACRE and CACEN, entities that have limited access to BCB refinancing. The PL-480 program is more successful than BCB in directing funds to small farmers through the private banks. Furthermore, it provides the banks with a source of intermediate-term investment credit, whereas most BCB refinancing is limtied to annual operations. In addition, PL-480 lending filled a void for USAID to fund some special programs, when the Agency was unable to obtain program funding for agricultural credit from the normal foreign aid sources.

Perhaps, the most significant long-run contribution of the PL-480 program, however, has been its demonstration effect. Its policies and procedures appear to have offered significant improvements over those of the BCB. Although the PL-480 program is too new to make definitive judgments, the available evidence and early indicators show that simple and flexible PL-480 refinancing norms and procedures work effectively. They properly place the responsibility on the ICI for loan approval and risk, thus

eliminating costly record keeping and multiple reviews of loan applications. An important testimony to PL-480's success is that the ICIs definitely prefer it to BCB refinancing. Under the Pl-480 system, costs for both the ICI and the refinancing institution are lowered. When the financial system is restructured and new policies and procedures as well as the institutional location of refinancing are determined, the PL-480 experience will be invaluable.

The tendency of both BCB and PL-480 to overplan and overtarget refinancing is another important factor for consideration in the restructuring process. Targeting should be limited as much as possible; it serves to raise administrative costs and often is not successful in avoiding credit diversion. Another factor for consideration is the loan interest rates. At present, the fixed interest rates of 13 and 12 percent appear to be too low and, thus, concessionary. The distortions created by this policy have considerable consequences including credit diversion, misallocation of financial and real resources, lack of incentives to mobilize domestic savings, and the creation of of opportunities for corruption. With financial market restructuring. With the restructuring of financial markets a policy of flexible rates should be established, to allow the rate to be the same as the market-determined rate for agricultural loans.

Refinancing will have an important role in the future of Bolivian agricultural credit. With the current changes being made in the Bolivian economy, the times are propitious to establish new norms, procedures and institutional structures. The roles that BCB and PL-480 as well as other alternative institutions need to be carefully examined. The above presents some ideas that should be useful in the process.

IV

BOLIVIAN AGRICULTURAL BANK

Introduction

The Bolivian Agricultural Bank (BAB) was established in 1942. Originally it was a full-service bank for the agricultural sector. In those days its operations were oriented to the large- and medium-sized farmer. In 1954, after land reform, BAB was reorganized to direct more credit to small farmers. There were additional reorganizations in 1963, 1974 and 1976; the objectives were to improve management and credit procedures.

The material in this chapter presents a detailed picture of BAB in the last several years with respect to its credit operations, sources of funds, financial situation, structure and personnel and credit delivery system. To put the present-day BAB in context, the presentation is made in an historical setting in order to exphasize the changes that have taken place within BAB within the last few years. Furthermore, this approach serves to establish the arguments for restructuring BAB as a small-farmer bank and lay the ground work for guidelines for the restructuring process.

Overview of Credit Operations

Growth in Lending 1971-1985

As shown in Table IV-1, BAB made 14,815 loans in 1985, benefiting 18,892 farm families (including those families that participated in group and cooperative loans). The real value, with a base of 1980, of these loans was $b843 million. In U.S. dollars, at the average 1985 exchange rate, the value was $22 million. BAB's activity in 1985 was considerably lower than in 1984 when the Bank reached an all-time high of 18,310 loans with a real value of $b 1,505.8 million. The reason for the big jump in activity in 1984 was the special effort made by the Bolivian government and foreign donors to provide financial relief following the widespread droughts and floods of 1983.

Over the longer term, BAB's real loan volume activity in 1984 and 1985 compares very favorably with the 1970s. From 1972 through 1974, there were numerous large loans for cotton and soybeans and the value of the Bank's loan portfolio lending was high. In 1975 lending fell off, but since then has followed an upward trend both in terms of loan numbers and real volume. In 1981 and 1982, due to BAB's financial problems, the instability in the military governments, and reductions in foreign assistance, there were declines in both loan numbers and real volumes. In 1983, with the installation of the democratic civilian government, there was a sharp growth in lending. In 1984, with the large infusions of funds for disaster relief, the level of lending grew. Despite the decline in 1985, it should be noted that the real amount lent in that year exceeded that for all years after 1974, with the exception of 1984.

TABLE IV - 1

NEW LOANS MADE BY THE BOLIVIAN AGRICULTURAL BANK 1971 - 1985

Year	Number of Loans	Current value (1.000 $B.)	Real Value at 1980 prices a/ (1.000 $b.)	Current Value: $us.	b/
1971	411	69.442	375.362	15.014.480	
1972	654	211.428	1.073.239	42.929.560	
1973	1.171	312.368	1.203.054	48.242.160	
1974	2.061	403.776	959.088	38.363.520	
1975	1.640	350.241	769.760	30.790.400	
1976	2.202	395.130	830.105	33.204.200	
1977	2.411	327.836	637.813	25.512.520	
1978	3.338	410.641	724.235	28.969.400	
1979	3.918	453.044	667.222	26.688.880	
1980	4.099	658.574	658.574	26.342.960	
1981	3.597	837.779	634.201	25.368.040	
1982	2.222	951.869	322.231	12.889.240	
1983	9.082	6.541.012	589.599	23.583.960	
1984	18.310	230.754.234	1.505.836	60.233.440	
1985	14.815	15.313.865.000	843.348	33.733.920	
Total	89.931	15.556.542.374	11.796.667	471.866.680	

Source: Bolivian Agricultural Bank.

a/ Based on Consumer Price Index for La Paz.
b/ : Based on real values at 1980 prices.

The upward trend in the numbers of loans made in the last three years is particularly striking. The sharp increases reflect a change in BAB's strategy to use new funds to lend to small farmers.

Characteristics of New Loans in 1985

Distribution of Loans by Class of Borrower

In 1985, 72.6 percent of the new loans and 57.2 percent of the loan volume went to individual small farmers (see Table IV-2). Other farmers, societies, groups and cooperatives received 24.2, 4.0, 12.2 and 2.4 percent of the loan volume, respectively. The latter three groups probably consisted mostly of small farmers. Therefore, about three-fourths of both the loan numbers and loan volume went to small farmers.

Distribution of Loans by Activities Financed

As shown in Table IV-3, about 92 percent of both the loan numbers and loan volume were made to finance annual crop or tree crop activities. Lending was concentrated in basic foodstuffs. Of particular importance were potatoes, which received 39.9 percent of the loans and 45 percent of the loan volume. Rice and corn were the next most important crops. Among livestock activities dairying was by far the most important.

Distribution of Loans by Term Structure

As shown in Table IV-4, lending was concentrated in operations loans, with terms up to one year; 66.8 percent of the loans and 75.4 percent of the volume were made for this purpose. The rest of the loans were about evenly split between loans that had some investment component with terms between 12 and 18 months, and 18 months to 5 years. This term structure clearly favors lending for current operations and not longer-term investments.

Distribution of Loans by Region

As can be seen in Table IV-5, BAB's lending was spread somewhat evenly across the country in terms of numbers of farmers served by the ten regional offices, with the sole exception of the Pando where very few loans were made (Note, the figures for the Montero office can easily be combined with those of Santa Cruz, since both offices serve the area near the city of Santa Cruz). In terms of amounts lent across regions, the distribution was a little less even, reflecting differences between regions with respect to the capital intensity of activities financed and the incidence of medium- and large-sized farmers relative to small farmers.

BAB's Transition, 1978-1985

Indicators of Shifts in BAB Lending Patterns Between 1978 and 1985

The observed patterns of lending for 1985 contrast sharply with those of the late 1970s and early 1980s. It is useful to note these differences to help understand the transition BAB experienced during the periods of

TABLE IV - 2

DISTRIBUTION OF NEW LOANS MADE BY BOLIVIAN AGRICULTURAL BANK BY CLASS OF BORROWER 1985

Class	Number of Loans	%	Number of Families Benefited	Amount (100.000$b)	$us a/	%
Small farmers	10.754	72.6	10.754	8.762.560	12.647.617	57.2
Other famers	3.466	23.4	3.466	3.707.313	5.351.025	24.2
Societies	9	0.1	41	611.912	883.215	4.0
Groups	543	3.6	3.775	1.864.876	2.691.706	12.2
Cooperatives	43	0.3	856	367.204	530.011	2.4
Total	14.815	100.0	18.892	15.313.865	22.103.575	100.0

Source: Bolivian Agricultural Bank.
a/ Based on weighted average monthly exchange rate 1985.

TABLE IV-3

DISTRIBUTION OF NEW LOANS MADE BY BOLIVIAN AGRICULTURAL BANK BY ACTIVITIES FINANCED 1985

Activity	Number of Loans	%	Amount (1,000,000$b)	$us.	%
Livestock Poultry Sub-total	1.144	7.7	1.130.143	1.631.215	7.4
Beef	58	0.4	14.436	20.836	0.1
Diary	765	5.2	774.275	1.117.565	5.1
Hogs	42	0.3	67.537	97.481	0.4
Sheep	32	0.2	58.194	83.995	0.4
Paultry	97	0.6	80.570	116.292	0.5
Llama	150	1.0	135.131	195.044	0.9
Agriculture sub-total	13.671	92.3	14.183.722	20.472.360	92.6
Potatoes	5.904	39.9	6.896.876	9.954.745	45.0
Corn	1.539	10.4	1.192.439	1.721.131	7.8
Wheat	300	2.0	197.661	285.298	1.3
Vegetables	1.038	7.0	844.295	1.218.630	5.5
Rice	1.573	10.7	1.041.082	1.502.666	6.8
Soybeans	425	2.9	374.779	540.945	2.4
Peanuts	60	0.4	20.694	29.869	0.1
Cotton	451	3.0	1.513.993	2.185.252	9.9
Sugar cane	195	1.3	76.894	110.987	0.5
Rubber and Brazil nuts	450	3.0	843.170	1.217.006	5.5
Fruits	133	0.9	40.046	57.801	0.3
Grapes	178	1.2	80.079	115.584	0.5
Cacao	143	1.0	156.291	225.586	1.0
Citrus	122	0.8	75.657	109.201	0.5
Coffee	323	2.2	186.430	269.087	1.2
Other	837	5.6	640.336	924.242	4.3
TOTAL	14.815	100	15.313.865	22.103.575	100

Source: Bolivian Agricultural Bank.

TABLE IV - 4

TERM STRUCTURE OF BOLIVIAN AGRICULTURAL BANK LOANS 1985

Term	Number of Loans	%	(1.000.000 $b.)	Amount $us. /a	%
Up to 12 months	9.888	66.8	11.538.383	16.654.157	75.4
12 to 18 months	2.272	15.3	1.719.791	2.482.295	11.2
18 months to 5 years	2.635	17.8	2.026.126	2.924.450	13.2
5 to 12 years	20	0.1	29.565	42.673	0.2
More thas 12 years	-	-	-	-	-
Total	14.815	100.0	15.313.865	22.103.575	100.0

Source: Bolivian Agricultural Bank.
a/ Based on weighted exchange rate 1985.

TABLE IV - 5

DISTRIBUTION OF NEW LOANS MADE BY BOLIVIAN AGRICULTURAL BANK BY REGIONAL OFFICES 1985

Regional Office	Number of Loans	%	(1.000.000 $b.)	Amount $us. a/	%
Santa Cruz	1.084	7.3	1.896.838	2.737.839	12.4
Montero	134	0.9	621.129	896.519	4.1
Beni	2.490	16.8	1.781.583	2.571.491	11.6
Pando	46	0.3	119.760	172.858	0.8
Cochabamba	1.881	12.7	911.879	1.316.179	6.0
Chuquisaca	1.784	12.0	2.953.462	4.262.939	19.3
Tarija	3.113	21.1	1.666.536	2.405.428	10.9
La Paz	1.888	12.7	2.122.315	3.063.236	13.8
Potosi	1.029	7.0	1.377.935	1.988.870	9.0
Oruro	1.367	9.2	1.862.423	2.688.165	12.1
Total	14.815	100.0	15.313.365	22.103.575	100.0

Source: Bolivian Agricultural Bank.
a/ Based on weighted exchange rate 1985.

redemocratization and hyperinflation.

The transition can be summarized as a shift to serving much larger numbers of small farmers over wider geographic regions, and with smaller loans oriented towards annual operating expenses rather than longer-term investments. The figures comparing 1978 and 1985 that are presented in Table IV-6 tell the story. By 1985, in comparison with 1978, BAB was serving 2.5 times as many farmers with only 20 percent more real funds. The proportion of small farmer loans in the loan portfolio rose 11 percent, but the real volume of loans directed to them rose almost 36 percent. In 1985 the average loan size was 40 to 60 percent smaller (depending on the deflator used) and the number of operations loans with terms of one year or less rose from 12 to 67 percent, whereas longer-term investment loans declined correspondingly. Between 1978 and 1985 the percentage of loans directed to livestock declined from 17 to 8 percent. Moreover, by 1985 the relative importance to loans to Santa Cruz, the region containing the largest numbers of medium- and large-sized farmers had declined considerably, going from 18 to 9 percent in numbers of loans and 50 to 16 percent in loan volume.

Table IV-1 shows the beginning of the shift to increasing numbers of small-farmer loans started in 1983, it was highly accentuated in 1984 and continued at high levels in 1985. Associated with this shift were the complete array of changes in lending patterns observed for 1985. It can be concluded that in the short span of three years BAB changed its lending patterns considerably.

Factors Causing the Transition

There were three major, but interrelated, factors that caused the transition: BAB's financial difficulties, the disastrous floods and draughts in 1983, and the hyperinflation of 1984 and 1985. Each of these factors had an important impact on BAB's sources of financing and, consequently, on their patterns of credit.

Financial Difficulties. As will be discussed in detail below, in the late 1970s BAB's financial situation was precarious. The Bank had a large overhang of delinquent portfolio in many of its regular credit lines, of which the most important component was the debt resulting from cotton and soybean loans made in 1973 and 1974. Not only did BAB experience delinquency problems on these loans, but, in a political move, the government purchased large volumes of delinquent loans from several foreign commercial banks and placed them with BAB to service (pay principal and interest) and collect. The net result was that BAB was saddled with high financial costs on its delinquent loans, which, in turn, were earning little revenue because of low repayment. The problem was compounded by high delinquency rates on many other loans. With much of its portfolio in a state of delinquency, the Bank's income stream was considerably reduced. The fact that the Bank had a very high-cost operation, principally due to its big payroll and inefficient style of operation, meant that BAB encountered serious problems in meeting its expenses.

Correspondingly, in the late 1970s, the Bank's lending activity from

TABLE IV-6

INDICATORS OF SHIFTS IN BOLIVIAN AGRICULTURAL BANK LENDING PATERNS, 1978-1985

	1978	1985
Number of families receiving new credits in year. b/	5,458	18,892
New loans made in year (1980 prices)	$b724,235.000	$b 843,348,000
Individual small farmer loans relative to total loans per new loans in year		
Loan volume	21.5%	57.2%
Number of loans	62.0%	72.6%
Average size of new loan to individual small farmer in year		
1980 prices and exchange rate a/	$us 3.007	$us 1.795
current prices and exchange rate a/	$us 2.809	$us 1.176
Percent of new loans with term of one year or less		
Loan volume	46.8%	75.4%
Number of loans	11.8%	66.8%
Percent of total new loan volume for livestock and poultry in year	17.0%	8.0%
Importance of Santa Cruz relative to nation for new loans in year		
Loan volume	49.7%	16.4%
Number of loans	18.4%	8.6%

SOURCE: Bolivian Agricultural Bank.

a/ Figured at weighted average mounthly exchange rate for 1985.

b/ Includes number of families participating in group, society and cooperative lcans.

its regular lines dwindled rapidly to very low levels. This was to have an important long-run impact on BAB's lending patterns, because it was from these sources of funds that the institution had traditionally lent to larger farmers, especially in Santa Cruz and the Beni.

BAB had some special lines of credit that were administered autonomously, thus sheltered from encroachment by the rest of the Bank. The USAID-financed PCPA program was the most important. Since this program was showing an annual profit, BAB made an attempt to bring it into the Bank as part of its regular operations. In 1979 USAID agreed, as a means to help try to revitalize the whole bank. This proved to be a mistake. Under strong pressure from the Bank's labor union, BAB quickly used PCPA reflows from loan payments and drew upon its capital to pay current expenses in the rest of the Bank. In 1981 USAID was successful in correcting its mistake and got BAB to again set up a semi-autonomous PCPA office with the commitment that BAB would recapitalize the program. By this time, however, due to the decapitalization, PCPA's funds were at low levels, which severely limited the institution's lending capacity for small-farmer credit.

BAB did not live up to its commitment to recapitalize PCPA. In 1983 PCPA was again incorporated into the main bank. At this time, USAID decided to discontinue supporting BAB and direct its small-farmer credit efforts through other channels, especially the private sector. This decision was to have an important impact because it forced BAB and the Bolivian government to use other means to support small-farmer credit in the years of hyperinflation.

Disasters. As a result of the floods and draughts that simultaneously affected most of Bolivia in 1983 there was a sudden increase in funds to deal with the emergency. Resources became available to PL-480 from sales of grain, but, because of USAID's problems with BAB, they were unavailable to the Bank. In 1984 IDB established a major refinancing line in BCB. One year later, USAID created an emergency line in BCB, but again excluded BAB's participation. Thus, there were large amounts of new funds but those that came from U.S. sources were not available to BAB. To get around this exclusion, the Bolivian government established its own emergency line in BCB for BAB. The net result was that, despite the USAID sanctions, between 1983 and 1985 there was a big jump in resources available to BAB.

Hyperinflation. Over this whole period the effects of inflation were felt by BAB, but it was in the hyperinflationary years of 1984 and 1985 that the effects were the strongest. The principal effect of the inflation was that it eroded the real value of BAB's portfolio that was denominated in pesos, which included almost all of its lines except the dollar-denominated foreign cotton and soybean debt. As a consequence, over the whole period, but in particular in 1984 and 1985, the real value of resources in BAB's special credit line programs declined to virtually nothing. The case of PCPA is illustrative. In 1981 there were 528 new PCPA loans made from lines T-053 and T-059 valued at $1.5 million, an average of $2,867 per loan. In 1983, there were 294 new PCPA loans valued at $14,646, an average of $73 per loan. By 1985, there was only one new PCPA loan for $87.

In a similar fashion, as noted in chapter III, the trust funds held by BCB were seriously decapitalized. As a result, BAB's ability to draw upon these to refinance loans was curtailed. This may be somewhat moot, however, because, beginning in 1983, USAID prohibited their use by BAB.

The Transition

The transition is clearly shown in Table IV-7. Over the 1979-1985 period, the sources of BAB's financing for current annual lending shifted almost entirely to its regular line, consisting of its own capital and BCB refinancing. Prior to 1983, there had been much more reliance on the special funds.

In 1979 and 1980 about half the loan numbers and one-third of the loan volume came from special lines, mostly small-farmer programs. In 1981 the relative importance of special lines jumped sharply with large disbursements under the new Eastern Livestock Program. In 1982 there were few regular line funds disbursed because of BAB's financial difficulties, the widespread political problems and the financial difficulties of the government. Beginning in 1983, the effects of hyperinflation and the creation of special disaster relief refinancing lines at BCB lending began to be felt. Inflation eroded the real values of refinancing available from BCB trust funds. To compensate, as well as to add funds for disaster relief, the Bolivian government precipitously increased the real amount of BCB's Own Funds to refinance agriculture. Beginning with 1983, BAB's portion of refinancing out the BCB's own funds rose sharply. It was clear, that the government's strategy was increase BAB's capacity to extend agricultural credit.

The end result was that by 1985 BAB was almost entirely dependent on BCB refinancing for its source of loanable funds; 90.1 percent of its loans and 87.1 percent of its loan volume was financed from this source.

Since 1983 the BCB refinancing lines have been mostly oriented towards refinancing one-year operating loans. Furthermore, most have been oriented to small- and medium-sized farmers, especially those from the Agricultural Emergency Fund and the Annual Agricultural Campaigns. Without a doubt the development of these refinancing lines has been the major factor in explaining the increased importance of BAB's providing short-term credit for small farmers since 1983. Indeed, it might be argued that the BAB was pushed by the governmentin the direction of financing more of this class of farmers because BCB refinancing was its only major source of funds.

It should also be noted, however, that over the period BAB has gained access to several new and smaller lines of credit that have helped to further move the Bank to a small-farmer orientation. Since 1978, BAB has had grant funds under a continuing agreement with the Japanese. Beginning in 1985, the Dutch and Germans made grants to the Bank on the basis of one-year agreements. Moreover, in the same year, the International Fund for Agricultural Development (FIDA) began a program in Chuquisaca and the United Nations began a small coca-substitution program in the La Paz Yungas. All of these programs have a small-farmer orientation.

TABLE IV - 7

DISTRIBUTION OF BOLIVIAN AGRICULTURAL BANK LOANS
BETWEEN REGULAR a/ AND SPECIAL CREDIT LINES. 1979 - 1980

	Number of Loans	%	Amount (1.000 $b.)	%
1979	3.918	100.0	453.052	100.0
Regular	1.916	48.9	298.722	65.9
Special	1.942	49.6	154.330	34.1
1980	4.099	100.0	658.574	100.0
Regular	1.964	47.9	458.391	69.6
Special	2.135	52.1	837.779	30.4
1981	3.597	100.0	83.779	100.0
Regular	1.352	37.6	348.765	41.6
Special	2.245	62.4	489.014	58.4
1982	2.222	100.0	951.868	100.0
Regular	.651	29.3	510.615	53.6
Special	1.571	70.7	441.253	46.4
1983	9.082	100.0	6.541.011	100.0
Regular	7.886	86.8	5.879.243	89.9
Special	1.196	13.2	661.768	10.1
1984	18.310	100.0	230.754.234	100.0
Regular	16.883	92.2	208.203.881	90.2
Special	1.427	7.8	22.550.353	9.8
1985	14.815	100.0	15.313.865.000	100.0
Regular	14.220	96.0	14.702.926.000	96.0
Special	595	4.0	610.939.000	4.0

Source: Bolivian Agricultural Bank.

a/ Regular lines include Bank's own capital and refinancing from Bolivian Central Bank.

40A

Finally, it is important to note the impact of the sources of funding on the regional distribution of credit. The BCB refinancing lines were oriented towards the whole country. This is in contrast to earlier times when the Bank was making more loans to medium- and large-sized farmers who were heavily concentrated in Eastern lowlands, and the PCPA was limited to the Central and Southern regions plus Santa Cruz.

Sources of Funds

The above section describes the evolution of BAB's sources of funds over the 1979-1985 period. This section examines in detail the funds used in 1985, as presented in Table IV-8.

The Bank has two basic groupings of funds: regular and special lines. Within the regular group are the Bank's own funds and Central Bank refinancing. The Bank does not mobilize domestic savings by means of deposits.

As noted above, in 1985, BAB relied mostly on BCB refinancing. In that year, 90.1 percent of the loans and 87.1 percent of the funds lent came from BCB refinancing, 5.9 percent of the loans and 8.9 percent of the volume came from the Bank's own funds and 4.0 percent of the loans and 4.0 percent of the volume came from the Bank's special programs. It is useful to briefly describe the sources.

Bank's Own Funds

The Bank's capital is derived from earlier capital contributions and grants with provisions to use reflows from credit to build up capital. Examples are PCPA, the Japanese Agreement, and reflows from the Eastern Livestock Program. Needless to say with hyperinflation the real value of both the reflows and the Bank's capital shrunk considerably.

The other elements in the Bank's own funds are current grants from the Japanese, Dutch and Germans. Of these, the most important is the Dutch Grant, which accounted for the bulk of the lending from the Bank's own funds.

BCB Refinancing

In 1985, BAB made use of refinancing from four trust funds (FRA-1, FRA-2, A and A and IDB Agriculture) and six other annual BCB refinancing lines (BCB's own resources, Agricultural Campaign 84/85, Agricultural Campaign 85/86, Agricultural Emergency Fund, Cotton and Sugar Cane). Of these lines, three were the most important. The Agricultural Emergency Fund was the most significant; it accounted for 27.9 percent of BAB's total number of loans and 42.9 percent of the amount lent. BCB's own funds was next, with 29.2 percent of the loans and 17.0 percent of the volume. FRA-2 was third with 16.8 percent of the loans and 10.7 percent of the volume.

In 1985, BCB refinanced 100 percent of the value of each BAB loan (note

TABLE IV-8

NEW LOANS MADE BY BOLIVIAN AGRICULTURAL BANK BY SOURCE OF FINANCIAL RESOURCES, 1985

SOURCE OF FUNDS	Number of Loans	%	Loan Volume 1,000,000$b	US dollars[a/]	%
Regular Credit lines sub-total	14.220	96.0	14.702.926	21.221.763	96.0
Banks own funds sub-total	870	5.9	1.365.570	1.971.022	8.9
Capital	17	0.1	259.520	374.583	1.7
Japanese grant	78	0.5	194.662	280.969	1.3
Dutch grant	680	4.7	772.182	1.114.544	5.0
German grant	80	0.5	131.263	189.461	0.8
Oriente Livestock Program (PLO)	15	0.1	7.943	11.465	0.1
Central Bank refinancing sub-total	13.350	90.1	13.337.356	19.250.741	87.1
BCB's own resources	4.322	29.2	2.608.065	3.764.403	17.0
FRA - 1	6	0	5.609	8.096	0
FRA - 2	2.489	16.8	1.635.676	2.360.886	10.7
A and A	164	1.1	187.170	270.155	1.2
BID/BCB	231	1.6	47.950	69.209	0.3
Agricultural campaign 84/85	318	2.1	130.150	187.855	0.8
Agricultural campaign 85/86	1.199	8.1	608.396	878.141	4.0
Agricultural Emergency Fund (FAE)	4.137	27.9	6.570.697	9.483.948	42.9
Cotton	357	2.4	1.489.399	2.149.754	9.7
Sugar cane	127	0.9	54.244	78.294	0.5
Special Programs sub-total	595	4.0	610.939	881.811	4.0
FIDA-Chuquisaca	462	3.1	409.675	591.313	2.7
Yungas (La Paz) Project	106	0.7	200.844	289.892	1.3
Agricultural Machinery (MDE)	26	0.2	414	598	0
Small Farmer Credit Program (PCPA)	1	0	6	8	0
T O T A L	14.815	100	15.313.865	22.103.574	100

SOURCE: Bolivian Agricultural Bank.

a/ Figured at weighted average monthly exchange rate for 1985.

this differs from the 80 percent portion refinanced for commercial banks). In 1986, BCB charged 4 percent interest to BAB. The funds were lent to farmers at 13 percent. Thus, the Bank earns a 9 percent spread. In case of default, BCB takes the unpaid balance out of BAB's deposit account at the Central Bank. There is a fundamental problem with BCB refinancing. BCB does not give BAB sufficient notice about the availability of refinancing for the forthcoming agricultural cycle. In recent cycles the information arrived at the last minute or even late relative to farmers' needs. Under these conditions, the Bank cannot plan properly nor process loan applications on a timely basis. Furthermore, when the information becomes available, bank agents have to make loans and disburse funds very rapidly, and cannot be as careful in evaluating loan applications. This contributes to deliquency. The delinquency problem is further worsend by the late disbursements; when the funds arrive after they are needed the farmer may decide to use them for non-programmed purposes and, therefore, he may not have the liquidity at the time the loan repayment comes due.

Special Programs

The FIDE-Chuquisaca Project dominated this category accounting for the large bulk of loans in the category.

Conclusions

BAB is almost totally dependent on outside funding. It's own capital was equivalent to only 1.7 percent of the volume of new loans made in 1985. If grants are included, its own funds were only 8.9 percent. This condition seriously limits the institution's leveraging capacity to attract outside debt. As a result, the Bolivian government has had to step in and make refinancing available through BCB. Were this not available, BAB would have little lending capacity unless it were to obtain sizeable grants from other sources. The Bank has little chance of accomplishing this because of its very weak financial position. Clearly, BAB is in a precarious position. It is subject to the availability of refinancing fund by BCB as determined by monetary policy and government agricultural policy as well as the generosity of foreign donors. Were these funds to be reduced, the Bank would have to cut back its operations in direct proportion to the reduction. Ways should be sought to reduce the institution's precarious dependency and obtain more reliable sources of funds. To do this, the Bank's financial position needs to be improved by reducing its debt, increasing its capital and mobilizing domestic savings.

Financial Analysis

As noted previously, BAB has had a history of financial weakness. The Bank's financial difficulties emanate from two basic but interrelated sources: (1) the exceedingly large delinquent portfolio, and (2) the high costs relative to income.

Delinquency

Table IV-9 presents BAB's delinquency position as of 27 March, 1986. On

TABLE IV-9

DELINQUENCY, BOLIVIAN AGRICULTURAL BANK

MARCH 27, 1986

STATUS OF PORTFOLIO	NUMBER OF LOANS		AMOUNT	
	NUMBER	%	$US.	%
Normal	12.508	70	10.604.834	36
Delinquent	5.224	30	18.787.025	64
Past due	2.053	12	290.342	1
In Legal process	3.171	18	18.446.633	62
TOTAL	17.732	100	29.391.859	100

SOURCE: Bolivian Agricultural Bank.

that date, 30 percent of the number of outstanding loans and 64 percent of the outstanding loan volume was delinquent. These numbers, however, are misleading in terms of current delinquency because a very large majority of the delinquent volume is associated with the cotton, soybean and livestock loans made by BAB in the early and mid-1970s as well as the loans from the same period that were brought from several foreign banks by the government and transferred to BAB. The table provides an indication of the age structure of the past-due debt, by showing the totals that are being legally processed, an action that the Bank takes when a debt becomes long overdue. Some 18 of the 30 percent of the loan numbers and 62 of the 64 percent of the volume were being subjected to legal action.

Table IV-10 presents a breakdown of delinquency by source of financing. It is clear that the bulk of the bad loans come from the 1970s, e.g., cotton, CACEX, etc. These were large loans and concentrated among a few borrowers. These loans are the millstone around the Bank's neck today because they are difficult to collect. Many of the loans, or at least the lack of actively pursuing collection on the loans, were politically motivated and consisted of handsome income transfers to the borrowers. With the passage of time it will be increasingly difficult to collect these loans, partly because of the continuing political influence of the debtors.

The story about loan numbers is different; about two-thirds of the delinquent loans are with borrowers of BCB refinancing lines. Many of these are small farmers. BAB claims that in March 1986 this number was unusually high because of special circumstances surrounding interest rates. In June 1985, there was an attempt by the Siles government to pardon interest payments on BAB loans because of the high interest rates. Although this was not implemented, it did create psychological conditioning about repayment. In 1986, after interest rates fell sharply following the successful stabilization measures, farmers who had borrowed for the summer cycle in 1985 at 792 percent interest quickly realized that they were owing excessive amounts of interest in accordance with the new economic conditions. They protested, with support from producer and peasant groups. A resolution was reached. The loans are being reprogrammed such that the borrower pays the principal now and stretches out interest payments over a three-year period. Most loans are from BCB refinancing and each loan is reprogrammed individually by BCB. In the meantime, large-scale delinquency appears on the books. BAB estimates, however, that when the process is completed, less than 4 percent of their loans will be delinquent.

The large overhang of delinquent debt causes serious problems for the Bank. First and foremost, the debt sterilizes the Bank's assets such that they can not be recycled as new loans. The result is the Bank's lending capacity is seriously reduced. Second, since much of the interest is not being paid, the Bank's income is reduced while at the same time the Bank must cover administrative and financial costs. At the present, because of the nation's moratorium on foreign debt, the Bank has some reprieve because it does not have to service this portion of the debt. When the moratorium is lifted, BAB will again have to assume these costs. Third, the size of the debt, in combination with the Bank's low level of capital, puts the bank in a position where it is difficult to leverage more debt. This is another

TABLE IV-10

BOLIVIAN AGRICULTURAL BANK, DELINQUENCY BY CREDIT LINES

27 March, 1986

LINE	NUMBER OF LOANS Number	%	AMOUNT $US.	%
Cotton	279	5	12.344.186	66
Sugar Cane	130	2	1.332.851	7
Machinery and Equipment	22	0	320.889	2
RAEN	4	0	401.535	2
CACEX	9	6	1.679.928	9
ALPD	202	4	896.898	5
Ex-Banco do Brazil	32	1	803.237	4
BAB Funds	807	16	238.586	1
Refinancing BCB	3.379	66	305.800	2
Other	360	7	463.123	2
TOTAL	5.224	100	18.787.025	100

SOURCE: Bolivian Agricultural Bank.

factor that constrains growth in lending. Fourth, the huge amount of bad debt, as well as knowledge of the causes of the debt, serve to create a strong negative image for the Bank, such that it does not have the confidence of the Bolivian public nor many foreign donors.

For BAB to survive, the debt problem must be corrected. At the moment, BAB is only able to continue lending because of BCB refinancing. The Bank is in a very dependent and extremely precarious position.

Costs versus revenues

Table IV-11 presents BAB's abbreviated revenue statements for the period, 1980-1985. In each year expenses exceeded income. The relative size of the loss compared to income is shown in the bottom portion of the table. For the six-year period, tne size of the loss ranged from 0.5 to 61.9 percent.

Traditionally, BAB's revenue is mostly derived from interest on loans. It also receives revenue from commissions. In the last two years the Bank has charged a flat percentage commission on loans. At present it is 3 percent of the total loan. Another source of revenue comes from the sale fertilizers donated by Japan and other countries. In 1984 and 1985 the receipts from these sales were large and contributed considerably to revenue. Indeed, in 1985 this was the major source of revenue to the Bank, a factor that considerably reduced the Bank's loss in that year.

The Bank's principal costs are associated with personnel and debt service. When the Bank had relatively low levels of lending from 1980 through 1982, personnel costs were about half of the revenue. However, when lending increased in 1983 through 1985 personnel costs as a proportion of total costs declined accordingly.

There is considerable room to reduce personnel costs by computerization of record keeping and accounting. Of the Bank's 314 current employees, 144 (45.8 percent) are bookkeepers, accountants or economists. Costs could also be cut by further reducing the size of other employees in the central office. There are 56 employees in the main office, the equivalent of 18 percent of the personnel. It should noted that in 1985 and 1986 BAB reduced its total staff from 432 to 314. There was no corresponding reduction in costs; however, because the salary savings were reallocated to raise salaries for the remaining employees.

Debt servicing is the other major expenditure. These expenses are particularly large relative to income because of the huge delinquent portfolio. As noted previously, due to the moratorium was been little foreign debt service in 1984 and 1985. Were the moratorium to be lifted, the debt service costs would rise substantially.

Conclusions

BAB's precarious and fragile financial condition is clear. The institution's balance sheet at the end of 1985 presented in Table IV-12

TABLE IV-11
INCOME STATEMENTS BOLIVIAN AGRICULTURAL BANK, 1980-1985
(Current 1,000 $b)

	1980		1981		1982		1983		1984		1985	
	1,000 $b	%	1,000 $b	%	1,000 $b	%	1,000 $b	%	1,000 $b	%	1,000 $b	%
INCOME												
Interest	189,648	89.6	188,532	89.6	287,749	91.8	1.167,275	79.4	36.870,758	71.3	1.480,864,103	3.9
Commissims	3,090	1.5	5,152	2.4	4,432	1.4	83,849	5.7	8.503,218	16.4	570.119,569	1.5
Other	18,941	8.9	16,729	8.0	21,147	6.8	219,258	14.9	6.342,780	12.3	36,059,688,219	94.6
TOTAL INCOME	211,680	100	210,413	100	313,328	100	1.470.383	100	51.716,756	100	38.110,671,891	100
EXPENSES												
Total Personal Services	104,950	36.8	109,251	33.8	169,709	39.7	548,570	37.7	14.553,281	22.8	1.225,555,082	6.3
Internal Public Debt.	71,448	25.1	86,358	26.8	153,720	36.0	488,640	33.6	29.647,314	46.5	1.243,509,740	6.4
External Public Debt.	21,620	7.6	37,383	11.6	39,802	9.3	206,922	14.2	180,876	0.3	135,568	0
Depreciation	63,380	22.2	61,961	19.2	38,807	9.1	42,556	2.9	6.654,353	10.5	447,370,766	84.4
Other	23,522	8.3	27,823	8.6	25,002	5.9	168,320	11.6	12.666.692	19.9	562,471,38	2.9
TOTAL EXPENSES	284,920	100	322,776	100	427,040	100	1.455,008	100	63.702,516	100	39.479.038,494	100
L O S S	63,559		130,265		79,311		7.588		25,192,104		1.160,440,024	
% Personal services/Income	. 49.6		51.9		54.2		37.3		28.1		3.2	
% Internal Public Deb/Income	. 33.8		41.0		49.1		33.2		57.3		3.3	
% External Public Deb/Income	. 10.2		17.8		12.7		14.1		0.3		0	
% Depreciation/Income	. 29.9		29.4		12.4		2.9		12.9		43.2	
% Other expenses/Income	. 11.1		13.2		8.0		11.4		24.5		1.5	
% Loss/Income	. 30.0		61.9		25.3		0.5		48.7		3.0	

SOURCE: Bolivian Agricultural Bank.

TABLE IV-12

BALANCE SHEET BOLIVIAN AGRICULTURAL BANK

DECEMBER 31, 1.985

(1,000,000 $b)

ASSETS	
Cash	377.383
Net Loans and interest receivable	68.360.412
Accounts receivable	74.441.313
Inventaries	2.183.301
Fixed assets	151.609
Investments	1.680
Deferred charges	90
Special administrative programs	(11.384)
Operating in transit	(7.906.685)
Total assets	137.597.800
LIABILITIES AND NET WORTH	
Liabilities	
Accounts payable	64.692.999
Loans and interest payable	49.368.918
Accrued payroll and benefits	313.117
Referred interest	4.130.093
Total liabilities	118.525.264
NET WORTH	
Capital	4.355.264
Reserves	15.903.939
Loss	(1.186.533)
Total net worth	19.072.670
Total Liabilities and net worth	137.597.800

SOURCE: Bolivian Agricultural Bank.

shows this clearly. The Bank's capital is only 3.2 percent of its total liabilities and net worth compared to the position of 73.8 percent in 1980. This very significant decline clearly shows the combined effects of hyperinflation-induced erosion of the portfolio as well as the Bank's use of capital to cover some expenses. For its level of lending activity the Bank is exceedingly overleveraged, which means that if the Bank experiences any serious delinquency problems on its current loans it will be unable to meet its financial obligations, most of which consist of BCB refinancing.

There are four principal means to improve BAB's financial position. The first is to raise efficiency through reorganization, computerization and further reduction in staff. This implies reducing the size of the central office operation. The second is to write off or transfer out of the bank the huge outstanding debt corresponding to the old delinquent loans. If this were accomplished, administrative and financial costs would decline accordingly. The third is to increase the Bank's capital by means of government grants, foreign aid or sale of shares. This would increase the Bank's leveraging capacity. The fourth is to raise revenues through higher interest rates and/or commissions.

Structure and Personnel

BAB's structure consists of a central office, ten regional offices and fifty-one agencies. The regional distribution is presented in Table IV-13. The Bank is represented in all departments and its agencies are spread across the country. Indeed, BAB has the largest number of offices and the widest regional spread among all single Bolivian credit institutions.

As of July 1986, BAB had 314 employees. Of this number, 17.9 percent were in the central office, 33.1 percent in regional offices and 49 percent in the agencies.

The largest single category of employees was the combination of accountants, bookkeepers and economists, which accounted for 45.9 percent of the total. In contrast the technicians (mostly loan officers) accounted for only 33.8 percent. The preponderance of bookkeepers/accountants reflects the large amount of paper work and records that are processed and the fact that this work is done entirely without the use of computers.

The Bank has continually been criticized for its excessive number of employees. Recently BAB has taken some action. On June 30, 1985, the Bank had 432 employees. By July 1986 the number was reduced to 314 by attrition or the selective retirement of 118 employees, of which 36 came from the central office, 54 from regional offices and 28 from agencies. This was a major step. Nevertheless, staff reduction continues to be a prime candidate for reducing costs. More cuts can be made in the central and regional offices and a large number of bookkeepers/accountants could be released if computerization were installed.

Consideration needs to be given to raising salaries. Many of the best employees have already been attracted to other higher-paying jobs. Indeed, in a move to stem this flow the salary savings from the above retirements

Table IV-13

PERSONNEL DISTRIBUTION IN BOLIVIAN AGRICULTURAL BANK

July 1986

	Total	Technities	Economist Accountants Book Keepers	Others
Total	314	106	144	64
Central Office	56	9	30	20
Regional Offices				
La Paz	7	4	1	2
7 Agencies	16	6	9	1
Cochabamba	17	6	6	5
6 Agencies	19	12	7	0
Santa Cruz	26	3	9	14
8 Agencies	28	13	12	3
Montero	8	1	3	4
2 Agencies	12	5	7	0
Beni	10	2	5	3
6 Agencies	15	5	8	2
Pando				
1 Agency	2	1	1	0
Chuquisaca	11	3	5	3
8 Agencies	20	10	10	0
Tarija	9	3	4	2
5 Agencies	23	10	12	1
Potosi	8	2	4	2
5 Agencies	10	6	4	0
Oruro	8	3	3	2
3 Agencies	9	5	4	0
Total Regional offices	104	27	40	37
Agencies	154	73	74	7
Percent Distribution				
Central Office	17.9	5.7	20.8	31.3
Regional Offices	33.1	25.5	27.8	57.8
Agencies	49	68.8	51.4	10.9
Total	100	100	100	100

Source: Bolivian Agricultural Bank.

USA

were used to raise salaries among the remaining employees.

There is also a need to upgrade the Bank's personnel. The institution lost some of its best employees when they were attracted to other positions. Furthermore, the Bank needs to improve its managerial and banking skills by recruiting experienced high-quality persons.

Credit Delivery System

Procedures

The basis for the current BAB credit delivery system is based on the procedures implemented in 1978 upon the advice of the Moreno and Muñoz Consulting Firm, which assisted the Bank in its 1976 reorganization. The norms and procedures are spelled out in detail in a credit manual. A detailed analysis of that system is presented in an earlier report (Jerry R. Ladman, et.al., Bolivian Rural Financial Sector Assessment, Report prepared for USAID/BOLIVIA by the Ohio State University, November 1, 1979, pp. 171-182). Later field research based on borrower interviews (Jerry R. Ladman, "Loan Transactions Costs, Credit Rationing and Market Structure: The Case of Bolivia," in Undermining Rural Development With Cheap Credit, Dale W Adams, Douglas H. Graham and J.D. Von Pischke, eds. Boulder: Westview Press, 1984, pp. 104-119) found that the borrower's costs associated with credit delivery were high. Although not directly studied, it would be expected that the credit delivery costs for BAB would also be large. In particular, the above studies showed that the borrower's costs of time spent and money outlays were found to be high at the time of the loan application, especially in relation to obtaining required documents. These high costs not only raised the cost of borrowing but also served as a credit rationing device by discouraging farmers seeking small loans to apply to BAB. The recommendations were that BAB should pursue ways to lower simplify its credit delivery system in order to increase its accessibility and serve larger number of small farmers.

In the last three years BAB has done these very things. At present the Bank is using a much more simplified system, albeit informally, since its credit manual remains virtually the same as in 1978.

The current system typically consists of the following:

1.- The farmer visits a local BAB office to solicit credit. To be eligible he must meet the Bank's specifications for a small-farmer, and present acceptable evidence that he has the right to farm the land, such as a land title, supreme resolution, or a statement showing purchase of the land. If the farmer qualifies (and most applicants do) the bank agent arranges a farm visit.

2.- The bank agent visits the farm, inspects it and helps the farmer fill out a two-sided single page loan application. It is done with a ballpoint pen at the farm site in final copy to eliminate

the need for typing in the office (the old way). The agent makes 7-8 farm visits per day.

3.- If the application is in order, it is approved in the local office. At the office the bank agent prepares a standardized loan contract by filling in a few blanks on a prepared standarized form.

4.- The farmer comes to the office, signs the contract and takes it a few blocks to the office of a small claims judge where it is registered. This costs the farmer about $b3,000,000. The farmer then takes it to the nearby Government Rent Office to register the loan. For this service he pays 0.5 percent of the loan value. Both of these visits can usually be accomplished in one trip, but sometimes the Rent Office requires two days to complete its work.

5.- Once the loan document is completed, the Bank obtains refinancing from BCB. This is accomplished by BAB filling out a standardized form for each loan, which is then delivered in a batch of loans to the regional BCB office. Because BCB uses the automatic refinancing mechanism (SIRA), the funds are placed in BAB's account at the local State Bank within 48 hours of receipt of the forms. BAB writes the borrower a check who then cashes it at the Bank.

6.- Most loans have two disbursements: one at planting and the other at harvest.

7.- A BAB agent normally visits the farm site twice during the course of the loan. The first visit is for control to ensure that the activity of the stated purpose of the loan is being pursued. The second visit is prior to the harvest to check up on the crop and to advise the borrower of his forthcoming date of loan repayment. Agents often offer the farmers technical assistance on these visits.

8.- Repayment can take place in the field or at the office. It often takes place at the farm site.

9.- In cases of repayment problems due to factors beyond the control of the farmer, the loan is extended for another year. If the repayment problem is due to the farmer's negligence, the farmer is given a grace period with penalty interests. If repayment is not forthcoming, then legal proceedings are initiated.

The current system is simplified compared to what was originally used with PCPA. The large volume of smaller-sized loans has forced BAB to seek ways to cut its costs. In the process, the borrowers have benefited by the simplified procedures; their transactions costs have been lowered.

BAB has also employed group loans on a frequent basis. In this lending mode, a single loan is made to a group. A designated group leader acts on

behalf of the group and undertakes the large bulk of the paperwork and bank transactions. This procedure reduces both bank and borrower costs.

To better serve clients in very remote areas, BAB has experimented with a form of a mobile bank. In these cases a bank agent, bookkeeper and small claims judge go together to the area, make up the loan documents and disburse the credit all within one or two days. This has only been done for loans made from FIDA funds. The required procedures for BCB refinancing do not permit this system to be used for loans refinanced by the Central Bank.

BAB should be applauded for its innovations in credit delivery. However, there is more that might be done. For example, BAB should consider opening standing lines of credit for established and proven customers where these clients can obtain loans with only a bare minimum of paperwork.

Interest Rates

BAB's interest rates are determined by the Central Bank as part of the nation's structure of interest rates. Currently the annual rate on peso-denominated loans is 13 percent on the outstanding balance with a maintenance of value clause. The maintenance of value clause makes the nominal rate a good approximate of the real rate. In addition, the Bank charges a 3 percent flat commission on the amount of the loan. This raises the effective annual loan rate to the borrower to more than 16 percent since the term of the credit is usually less than twelve months.

For dollar-denominated loans the BAB charges other interest rates. For example, the cotton loans have a 28 percent interest, the same as the commercial bank rate. However, most of these dollar-denominated rates are meaningless, since they are applicable to the delinquent loans for which little interest is collected.

As noted previously, the interest rate structure needs to be reviewed in order to ensure that the rates are commensurate with the opportunity costs of capital. For example, as noted in previous chapters, there is no clear evidence that the 13 percent rate meets this criterion. Furthermore, loan rates should be established to allow sufficient margin over the rate paid on savings deposits. This difference is necessary to encourage BAB to mobilize savings.

Conclusions

BAB is a credit institution. It does not perform financial intermediation in rural areas because it does not mobilize deposits. This structure is a major shortcoming that denies most persons in rural areas the opportunity to save in financial institutions in the countryside. Furthermore, the lack of deposit mobilization activity weakens the potential of BAB as a financial institution, making it dependent entirely on grants and loans as sources of loanable funds.

BAB has evolved to become essentially a small-farmer development bank. It got its start in this direction in the mid-1970s with the major USAID

assistance to form the PCPA. Since 1983, it has been pushed much farther in that direction by the enormous amounts of BCB refinancing made available by the government. In the last three years, the Bank has demonstrated that it can serve large numbers of small farmers across the nation through its fifty-one agency offices. Furthermore, it has shown that it can extend loans efficiently through streamlined and simplified credit delivery systems that both reduce the Bank's costs and lower borrower transactions costs. The number of loans made in 1984 and 1985 were four to five times the numbers made in the late 1970s during the height of the PCPA.

BAB believes that it can serve even more farmers. In the 1986 winter agricultural cycle, it made loans of about $5.2 million that reached some 4,000 farmers. The Bank had been allocated $7 million by the BCB but since the Central Bank made the funds available at such a late date BAB could not place all of the funds prior to the end of the planting season. Therefore, many farmers who had applied for credit couldn't get it. BAB officials estimate that they could easily have placed loans with 50 to 100 percent more farmers had the funds been available and opportune.

In the forthcoming 1986/87 summer agricultural cycle BAB has plans to lend $31.9 million. Of this amount, $25 million will come from BCB refinancing, $4.3 million for other BAB funds (Japanese and Dutch grants, etc.) and $2.6 million from the United Nations Yungas programs. About three-fourths of the credit will be extended for annual operations purposes. BAB believes it can reach about 37,000 farmers with these funds. To accomplish this, BAB plans to utilize group lending extensively. These plans are very ambitious because they represent a considerably larger loan volume and greater loan numbers compared to the record numbers of recent years. Nonetheless, the Bank believes that it can meet the challenge. If the Bank succeeds, it will take another major step to show its ability to serve as a credit institution for small farmers.

In spite of BAB's recent success and plans for expansion in 1986, the Bank is a very dependent and financially fragile institution with serious weaknesses. Its fragility derives from the facts that its annual revenues are always exceeded by costs, its capital has declined drastically relative to its liabilities, and that it is saddled with a huge overhang of old delinquent loans for which there are limited possibilities of collecting. Under these conditions, the Bank has lost credibility with some major sources of foreign assistance, especially USAID, and is virtually unable to leverage any other credit. Fortunately for BAB, BCB has been very generous in providing refinancing. This is now the major source of BAB's resources and the Bank is virtually dependent on the BCB for its livelihood. Were this support to be withdrawn, the Bank would collapse.

Given the fact that the BAB has demonstrated its ability to work as a small-farmer development bank, strong consideration should be given to restructuring the Bank in order to put it on a sound financial basis as a rural financial intermediary, including deposit mobilization. With the current interest within the government to restructure the financial sector, BAB should be included. It is the only institution on the horizon that appears to be able to extend financial services to small farmers on a

wide-scale basis. The following are preliminary recommendations and quidelines for restructuring the Bank.

1.- Because BAB has many structural and operational defects, consideration needs to be given whether to dissolve the present bank and start over or rehabilitate the Bank. In either case the end result should be to have a "new" bank. Technical assistance for restructuring should be provided to the new bank through grant funds.

2.- The new bank would be exclusively for small farmers and agribusiness in rural communities. It's name should be changed to reflect this in order to avoid identification with the BAB, which does not have a good public image.

3.- The new bank should be structured as a true financial intermediary that provides the economic development services of both credit and savings deposits accounts. The savings dimension should be developed across the institution as rapidly as possible, but only after there has been experimentation in a pilot program in three to five agencies, and after there has been careful planning for deposit management.

4.- The new bank should be decentralized. The role of the central office should be reduced to providing overall policy, direction, leadership, training, research and aggregate record keeping. The regional offices should have the responsibility for management and accounting. They should be semi autonomous.

5.- The existing infrastructure of regional offices and agencies should be kept mostly intact. Consideration should be given to consolidating agencies where the level of banking activity warrants.

6.- The new bank vitally will need new personnel with bank management and technical skills. Good employees with the correct skills would be retained. Other employees could be retired with a severance pay; the Bank estimates this to cost about $400,000.

7.- The new bank should be designed have a profit orientation in as much as possible and yet still maintain its social mission of economic development for small farmers. Agency and regional offices should be evaluated on the basis of their success in moving credit, recovering loans, mobilizing resources and operating efficiencies. To provide proper incentives, bank personnel should be rewarded accordingly, i.e., based on their performance in these activities.

8.- The new bank should be designed for efficient operations and lower costs. All record keeping and accounting functions should be computerized. Credit delivery systems should be further

streamlined. The new bank should not be assigned a major role in technical assistance. These activities should be provided by other agencies.

9.- The new bank should begin with a good dose of additional capital. The capital should be a combination of grants from the government and foreign assistance. The capital could then be used to leverage more financing for the bank.

10.- The problem of the delinquent debt overhang should be eliminated. Selected delinquent debt could be transferred from the bank and placed in a government trust fund. The government would assume responsibility for servicing this debt. The new bank, however, would assume responsibility for collecting on the debt. To give the new bank incentive to collect, all repayments of interest and principal would be placed in the bank's capital.

The new bank should then go on an all-out campaign to collect all delinquent loans. The campaign would not only gain the bank more resources but also it would show the institution's seriousness about collecting loans and give the new bank a good public image.

11.- An appropriate real interest rate structure should be established. In as much as possible, concessionary loan rates should be avoided for all of the well-known reasons. Attractive deposit rates should be offered to encourage savings.

12.- The new bank should have continuing long- and short-term training programs for its employees. Short-term training could be done in house and/or with contracted instructors. Selected persons should be given scholarships to obtain MBA or MS degrees in appropriate fields. To initiate these activities, grant funds should be provided for education and institution building.

13.- The new bank should have a small research department to carry out studies dealing with rural financial markets and bank operations. At the outset, technical assistance for these activities could be provided through grant funds.

14.- Means need to be developed to insulate the new bank from political interference. This implies keeping the bank's decision making separate from the government. Perhaps some form of mixed public and private sector ownership could be arranged, including partial ownership by the bank's clientele.

V

COMMERCIAL BANKS

Introduction

When speaking of commercial banks and agricultural credit in Bolivia, the reference is to private-sector commercial banks. Since the mid-1970s the state-owned commercial bank, the State Bank, has not made new loans for agricultural production and has only had a slight involvement in lending to agribusiness.

In the last twenty years, the Bolivian government, with much encouragement and financial support from USAID, has looked to the commercial banks for a more active role in credit for agriculture, agroindustry and rural development. The main policy mechanism has been refinancing lines, which were available to both the commercial banks and BAB. These began in 1967 with the Special Fund for Economic Development in the BCB. Central Bank refinancing was expanded with FRA-I in 1971, which was designed to increase agricultural output. In 1974, with FRA-II, a distributional dimension was added when the emphasis was switched to refinancing small-farmer credit. Later, in 1978, with the Agroindustry and Artisanry Fund (A and A) the emphasis was broadened to include rural industry development. The A and A project was amended with the Technical Assistance Fund (FAT) to provide funds for feasibility studies.

Generally speaking, refinancing activity from the BCB funds moved slower than hoped. One reason was that the banks did not find it advantageous to lend to small farmers and rural industry. In an attempt to correct this, in 1984, USAID contracted with Chemonix consulting firm to undertake a project to improve the systems for agricultural credit in private banks. An important component of this project was assisting private banks in establishing development departments that would carry out development financing for small-farmer credit. Another component was to work with BCB to try to make its cumbersome refinancing system more fluid and efficient.

In 1984, a major new source of refinancing for commercial banks was established when USAID worked with PL-480 to develop a pilot study for a Bank Trust Fund. In 1986 this program was regularized. Under this arrangement PL-480 makes refinancing available to national private banks, including those working with the UCFs of the regional development corporation.

The results of the above-mentioned refinancing programs have been mixed. Major problems developed in the mid-1970s when banks experienced serious delinquency problems with FRA-I loans. For several years this fund was immobilized for lack of reflows. In the late 1970s BCB encountered difficulties in disbursing FRA-II funds. Likewise, the A and A and FAT funds did not move as well as was planned. The sluggishness of the activity in FRA-II, FAT and A and A was attributed to several causes. The banks

complained about the onerous and time-consuming loan approval procedures practiced by BCB, as well as the terms and conditions of the refinancing arrangements, especially the interest rate spread, which the banks considered inadequate to cover costs and risk. Consequently, the private banks were not attracted to use these funds. In the last few years these conditions have changed somewhat. The BCB has used the Automatic Refinancing System (SIRA) to speed up disbursements. Furthermore, the Central Bank has increasingly used the less cumbersome and more flexible BCB's own funds, rather than trust funds, as a source of refinancing. Finally, given the hyperinflation, refinancing has virtually become the only source of funds that the banks will use for agricultural credit.

When the PL-480 refinancing lines came on stream, they were designed to remedy many of the problems that the BCB had experienced. As shown in Chapter III, the short record to date suggests that PL-480 programs have been successful. The simplicity and flexibility of these programs and lesser delays in disbursement of refinancing have proven quite attractive to the private banks. Furthermore, the banks have been willing to lend these funds to limited numbers of small and medium-sized farmers.

Refinancing is virtually the only source of loanable funds for the private banks to extend agricultural credit. Some of this credit has gone to small farmers, especially under the PL-480 program. The above-described experience of the 1970s suggests, however, that there are limits to the extent that these banks would provide financing this group of farmers. More recent experience corroborates this view. Most of the banks' agricultural credit goes to large and medium-sized operators. Banks tend to lend to limited number of small farmers when they are coerced or seduced by means of program conditions, although some banks, especially the Bank of Cochabamba, claim to make a special effort because they believe it important for national development.

Structure

There are thirteen private-sector domestically-owned commercial banks in Bolivia and three active foreign-owned commercial banks. All of the domestic banks had some lending to the agricultural sector in 1985, but the foreign-owned banks had virtually no activity. Among the domestic banks agricultural lending was concentrated in five institutions: the Bolivian-American Bank, the Bank of Cochabamba, the Bank of Santa Cruz, the National Bank of Bolivia and the Bank of Potosi.

Sources of Funds

The private banks have three basic sources of loanable funds for agriculture: their own funds, BCB refinancing and PL-480 refinancing. In interviews with bankers it was learned that the banks are not inclined to use their own funds for agricultural loans. Under present conditions in Bolivia, bank loans have maximum terms of about 90 days and most agricultural lending is for a longer period. Moreover, the bank's financial cost is less with refinancing. In August 1986, the refinancing interest rate was 8 or 9 percent, depending on the source of funds, and the deposit

rate on dollar-denominated savings accounts was 14-16 percent. Thus, on both accounts the banks prefer refinancing, especially if their transactions costs associated with refinancing are low. These costs appear to be low with PL-480 refinancing procedures. In the case of BCB, the transactions costs and costly delays that were the banes of the private banks have been reduced considerably by SIRA for refinancing from the BCB's own funds. However, similar modifications have not been made for refinancing from trust funds.

All of these factors caused the interviewed bankers to report that they wanted to use refinancing as much as possible to finance agriculture and employ their own funds for shorter-term commercial and personal credit. It should be noted, however, that when the banks use BCB refinancing they typically must also use some of their own funds. This is because most refinancing arrangements only give the bank 80 percent of the value of the loan and the banks are required to put up the remaining 20 percent. In contrast, most PL-480 refinancing is made for 100 percent of the loan value.

The PL-480 refinancing is mostly available for medium-term investment projects. Indeed, it is one of the few sources of credit for these purposes. Consequently, both banks and borrowers look to PL-480 to satisfy the needs for financing this type of activity. It is clear that by providing investment credit, PL-480 is filling an important void in Bolivian agricultural finance.

There is yet another factor that encourages the banks to use the refinancing mechanism rather than their own funds: the borrowers prefer it, because they can gain handsome income transfers. The borrower loan rates for refinanced loans are so much more favorable, 12 or 13 percent, versus the current 24 percent rates on the best dollar-denominated non-refinanced loans. Consequently, all classes of borrowers want access to the inexpensive credit.

Growth of Credit

As shown in Table V-1, between 1979 and 1985 the real amount (in 1980 pesos) of agricultural credit extended by the private commercial banks increased 4.5 times, going from $b344 million to $b1,929 million. After 1980 there was a decline in 1981 due to the problems associated with political instability. However, after that year there were increases. In both 1984 and 1985 there were sharp and large rises. The reasons for the increase were the government's policy of raising the level of BCB refinancing and the infusion of funds that were made available by foreign assistance after the agricultural emergency of 1983. The establishment of PL-480 1984 should not be overemphasized as a major reason for the increase. In 1985, PL-480 refinancing was only about 7 percent of that provided by the Central Bank.

Distribution of Credit

Central Bank information shows that the department of Santa Cruz continues to receive the large bulk of private bank agricultural credit. In

Table V-1

AGRICULTURAL CREDIT EXTENDED BY BOLIVIAN PRIVATE COMMERCIAL BANKING SYSTEM, 1979-1985[a]

Year	Current Pesos (1,000)	1980 Pesos[b] (1,000)
1979	233,641	344,096
1980	408,737	408,736
1981	431,228	326,440
1982	1,181,605	400,002
1983	6,186.494	557,644
1984	193,985,726	1,265,927
1985	35,029,719,543	1,929,120

Source: Development Department, Bolivian Central Bank and Executive Secretariat, PL-480.

[a]Consists of refinancing of agriculture, agribusiness and artisanry from Bolivian Central Bank and PL-480 as well as commercial bank counterpart funds for this refinancing. Other credits extended by commercial banking system to agricultural sector are not included. However, the amount of such credit should be minimal since the commercial banking system relies almost entirely on refinancing to extend credit to agriculture.

[b]Real values at 1980 prices. Deflator is Consumer Price Index for La Paz.

the last half of 1985, two-thirds of the new agricultural credit extended by the private banking system went to this department. The other important departments were Cochabamba, La Paz and Oruro.

Information on the distribution by class of farmer is not available, but it appears that most BCB refinancing through the private banks is going for medium- and large-size farmers. The PL-480 private bank trust fund refinancing has directed private bank credit to small- and medium-sized farmers. It should be noted, however, that PL-480 had to set up regulations to force more of its refinancing to farmers, rather than to agribusiness.

Most of the agricultural credit extended by the private banks is for short-term operational expenses. An exception is the PL-480 refinancing, much of which goes for longer-term investments. Short-term lending is normally what banks prefer for agriculture, but with the hyperinflationary conditions of recent years the banks' inclination to extend short-term credit has been accentuated. The hyperinflationary conditions in combination with interest rates that lagged behind the rate of inflation caused the banks to seek a rapid turnover of funds. The new and ubiquitous maintenance of value clause, which pegs the loan principle and interest payments to the exchange rate for the dollar, has mitigated somewhat this tendency in recent months.

Credit Delivery System

Virtually all bank lending to agriculture uses BCB refinancing. Therefore, the standard loan interest rate is the development loan rate of 13 percent. The BCB refinancing rate is 9 percent and the bank gets a 4 percent spread. In the case of PL-480 refinancing, the bank gets the funds at 8 percent and lends them at 12 percent but tacks on a 1 percent flat commission on the value of the loan. As noted previously, these development rates are arbitrarily determined and are considerably less than the market-determined rates charged by banks for regular loans. In August 1986 the regular rates were about 24 percent for dollar-denominated loans. Therefore, when possible the banks seek additional ways to raise the effective rate; for example, through compensating balances and other commissions.

Bank loans almost always have the maintainence of value clause, whereby the repayment of interest and principal in pesos is pegged to the exchange rate for the dollar.

The banks do not appear to require excessive paper work of farmers. Most use the standard BCB credit application form for agricultural credit. The loan documentation is standard. Borrowers must get the loan recorded in the local Government Rent Office. This process usually requires two days.

Loans are made mostly to individuals, but in the cases of small farmers some banks are making a form of group loans in order to reduce risk and lower costs. Under this arrangement loans are made to individual farmers but the group members are expected to jointly assume the risk for the loan. Group leaders often are selected to carry out paperwork for the group,

including filing the loan applications and picking up the disbursements. This operational procedure reduces both bank and borrower transaction costs.

Banks typically demand real property as loan collateral. Normally, they prefer urban real estate. Therefore, guarantees are a problem in lending to small farmers because they have little mortagageable property. For this class of borrower the bank usually holds the land title, but it realizes that it would not try to collect in case of default. Nevertheless, the banks believe that the title serves as a psychological mechanism for the farmer to encourage repayment. In addition, most banks use the financed crop as a guarantee for small farmer loans. Moreover, the group loan mode serves as a form of guarantee because members assume joint liability. In the cases of individual loans, oftentimes co-signers are required. Nevertheless, it is clear that the lack of adequate loan collateral is a major stumbling block for private banks to lend to small farmers. The bankers readily state that the small-farmer is very conscious about repaying his credit; indeed, more so than the larger farmers. Nevertheless, given the inherant risks in agricultural lending, the lack of solid collateral limits the potential for these banks to lend to small farmers is limited.

The banks typically exercise control measures to supervise the use of the borrowed money and to enhance repayment. Farm inspections are made prior to making the loan and usually one to three times per year following disbursement. The last visit is usually prior to harvest. The banks, however, admit that it is difficult to make as many farm visits to small farmers as would be desired after disbursement because of the time and costs involved.

Credit is typically disbursed in cash. In some cases credit is provided in kind. For example, under a prior arrangement the farmer obtains fertilizer from a local supply store and then the store is paid by the bank.

The biggest and most common complaint among bankers about the credit delivery system was with the availability of funds from PL-840 and BCB refinancing sources. The bankers reported that sometimes PL-480 did not have the funds on hand for disbursement because the Executive Secretariat had not received funds from the government. The bankers were more concerned, however, with the BCB. They complained that BCB was tardy in announcing the funds available for refinancing. Under this condition, the banks could not plan their operations very well. As such they were not able to make as many loans nor place these funds as effectively as they would be able to do if they had more time.

Apart from these complaints the bankers were reasonably satisfied with the credit delivery system and refinancing. They found the SIRA system of BCB to be a great improvement. The bankers did indicate, however, that PL-480 was much easier to work with than BCB. The bankers reported that small-farmer lending was very costly per peso lent, a factor which discourages them from working with this clientele. Several bankers suggested the 4 percent spread on refinanced loans was insufficient for small-farmer loans.

Conclusions

Private-bank credit is important for financing Bolivian agriculture. The private banking system is mostly dependent on refinancing. The BCB is by far the most important source. In 1985 it provided more than ten times the amount refinanced by PL-480, the other source. The private banks are the principal recipients of refinancing. In 1985 about two-thirds of BCB refinancing and nearly nine-tenths of PL-480 refinancing was channeled through these banks. The banks prefer refinancing as a source of funds to extend agricultural credit because it is extremely advantageous to them. Likewise, borrowers prefer refinanced loans because the lower interest rates provide them a sizeable income transfer.

The lower interest rates, however, may lead to unintended and undesirable outcomes. These outcomes were discussed in length in Chapter II and elsewhere, and need not be repeated here. It is important to note, however, that the concessionary rates will undoubtedly contribute to credit diversion and, therefore, agricultural illusion, i.e., there may be a significant portion of the apparent demand for agricultural credit that is a demand for credit to be used for other purposes.

The private banks credit delivery system appears to be reasonably simple and direct. Nevertheless, the relatively high costs of extending credit, risk and lack of guarantees are problematical for the banks, especially in lending to small farmers. Some banks have tried innovations such as group loans to try to reduce costs and to lower the repayment risks in working with this class of clientele. The banks, however, readily admit that there are limits to working with this class of clientele. Their activity in small-farmer lending is mostly confined to the PL-480 refinancing. Experience with this program, however, shows that PL-480 had to establish minimum percentages for the volume of the total portfolio directed to small- and medium-sized farmer loans in order to force the banks to make loans to this class of clientele rather than agribusiness.

Banks consider agricultural lending risky. They are concerned that they have adequate collateral to back up their loans. Although most bankers believe that the small farmer is more consciousness about repayment than larger farmers, they are still reluctant to lend to the small farmer because he lacks collateral. There is also a political factor; bankers became more wary after the peasants' union lobbied the government in 1985 and 1986 to get interest rates reduced, and, in the meantime, held up loan repayment. Some bankers fear this could reoccur.

The banks respond more favorably to lending to small-farmers when there is another institution that provides help in identifying clients and providing technical assistance. Examples of these institutions include DESEC, the UCFs of the regional development corporations and the Confederation of Agricultural Organizations in Santa Cruz. These organizations reduce the banks' costs of seeking out clients and identifying good financiable projects. They also organize the farmers into groups and may provide technical assistance, thus lowering the risk of loan default.

Future small-farmer credit programs for private banks should try to incorporate such programs when practical.

Finally, the banks' programs for the agricultural sector are credit oriented. There is no or little emphasis, either within the banks or within national monetary and credit policies, on savings mobilization and financial intermediation, especially among small farmers. More attention should be directed to this important part of rural financial markets. This is a major argument for getting the interest rate structure in order.

VI

FENACRE, CREDIT UNIONS AND INTEGRAL COOPERATIVES

Introduction

This chapter deals with the National Federation of Credit Unions (FENACRE) group. The group consists of the Federation, whose offices are in Cochabamba; the 216 affiliated credit unions, that are located throughout all of Bolivia; four integral cooperatives for which FENACRE serves as a source of financing, and several companies in which FENACRE has total or partial ownership. The emphasis of the chapter is placed on FENACRE's role as a financial institution.

FENACRE, the credit unions and the integral cooperatives are in financial trouble. The hyperinflationary years of 1983 through 1985 had serious negative impacts. Members were discouraged from saving. Meanwhile, the cooperatives and FENACRE were decapitalized and the real value of assets diminished considerably. As a result, the lending capacity from their own funds diminished considerably. FENACRE was forced to look more to outside funding through BCB and PL-480 refinancing in order to provide loanable funds to its affiliates and the integral cooperatives. The credit unions and integral cooperatives have to begin to rebuild their capital.

Organization and Structure

FENACRE was founded in 1962; at that time it had fifteen affiliated credit unions with some 2,500 members. As shown in Table VI-1 by mid-1986 the number of affiliated credit unions had grown to 216 with some 180,500 active members. Of the total cooperatives, 122 (56.5 percent) are located in urban areas and account for about 70 percent of active members. There are 94 rural-based cooperatives (43.5 percent), which have about 30 percent of the active members.

FENACRE is affiliated with the Confederation of Latin American Credit Unions (COLAC) and the World Council of Credit Unions (WOLAC). Since the mid-1970s COLAC has been an important source of financing for FENACRE's agricultural credit programs.

FENACRE provides several basic services to the affiliated credit unions, including: the formation of new credit unions, cooperative education and training programs, auditing and other forms of technical assistance. The Federation also develops special credit projects for affiliated credit unions and the integral cooperatives. In this capacity, FENACRE is an intermediate credit institution (ICI) that serves as a bridge for credit between the participating credit unions or cooperatives and outside sources of funding such as COLAC, Bolivian Central Bank (BCB) refinancing and PL-480 refinancing.

In 1984 FENACRE assumed the role of ICI for the integral cooperatives that had been established in May 1976 under the USAID-sponsored Revolving

TABLE VI-1

CREDIT UNIONS AFFILIATED WITH FENACRE, JULY 1986

Department	Number of Active Members	Credit Unions		
		Urban	Rural	Total
Beni - Pando	8.403	5	8	13
Cochabamba	56.298	24	18	42
Chuquisaca	5.793	10	4	14
La Paz	30.717	35	18	53
Oruro	10.859	11	6	17
Potosí	13.765	4	7	11
Santa Cruz	32.349	27	28	55
Tarija	22.378	6	5	11
TOTAL	180.562	122	94	216
Percent		56.5	43.5	100.0

SOURCE: FENACRE.

Credit Fund for Peasant Development (CROFOC). Originally, this program was administered by the National Community Development Service. Later, it was transferred to the Bolivian Agricultural Bank. However, with inflation, the CROFOC fund was decapitalized. Therefore, the operations were shifted to FENACRE so that it could serve as an ICI to channel credit to the cooperatives from refinancing sources, such as the Central Bank and PL-480. In 1986, there are four integral cooperatives: Cochabamba Ltda. located in Punata, Cochabamba; Tahuantinsuyo, Ltda. located in Betanzos, Potosí; Gran Chaco Ltda., located in Yacuiba, Tarija; and Santa Cruz Norte Ltda. located in Montero, Santa Cruz.

FENACRE is involved in several business operations. For many years it was a principal stockholder of the Bolivian Cement Company (COBCE). By 1986, however, it had divested its majority interest. The Federation has several other enterprises. It is the owner of the Bolivia Livestock Food Company (COBOLDE) and FENACRE's Printing Department contracts many jobs outside the Federation. In 1985 and 1986 there was talk of opening a bakery in La Paz and developing an insurance company.

During 1984 and 1985 FENACRE became a major distributor of chemical fertilizers. These were made available to Bolivia and FENACRE under highly favorable exchange rates as part of the USAID emergency relief programs following the 1983 weather disaster. Later these commercial activities were expanded to include farm tools and agricultural machinery. In these two years the profits on these sales were the major sources of FENACRE's income, but by 1986 these activities had fallen off considerably as the emergency funds dried up and the new exchange rate regime made the operation much less profitable. As a result, FENACRE's normally profitable position is threatened this year. It is seeking funds to expand its credit portfolio in order to earn more revenues.

Sources of Loanable Funds

FENACRE has four fundamental sources of funds: its own resources, loans from IBD/COLAC, refinancing from the Bolivian Central Bank (BCB) and refinancing from PL-480.

FENACRE obtains its own funds from affiliated credit unions' contributions to capital. This is achieved by three requirements: (1) that the credit unions annually purchase a specific amount of stock, (2) that the credit unions keep 5 percent of their members' deposits in a FENACRE investment fund, and (3) that credit unions that obtain financing from FENACRE keep 10 percent of the size of the loan in a capitalization fund. The latter is non-refundable when the loan is repaid. Because of the heavy decapitalization of FENACRE resulting from hyperinflation the real value of FENACRE's capital declined considerably in 1984 and 1985.

The IDB/COLAC loans have been an important source of external financing for FENACRE since the mid-1970s. Most of these loans were obtained by FENACRE to onlend for agricultural and livestock projects in the member credit unions. Hyperinflation completely destroyed the real value of the outstanding loans that were received from this source. FENACRE is currently

negotiating a new $4 million loan with COLAC for agricultural credit. As noted above, FENACRE needs this loan to be able to generate the revenues to keep it from operating at a loss.

BCB refinancing became an important source of loanable funds for FENACRE once the Federation was accorded ICI status in 1982. FENACRE used this source extensively in 1984 and 1985 when BCB administered large refinancing lines from IBD, USAID and BCB's own resources for emergency relief programs. In 1986 FENACRE has not used BCB refinancing lines because it believes the terms and conditions of these loans are not as favorable as these from PL-480. Specifically, BCB interest charges are higher and paperwork is much more excessive. For example, lists of all cooperative members must be provided as part of the paperwork.

In 1984, PL-480 became a source of refinancing. A special fund was established by PL-480 to provide refinancing of FENACRE loans to the four integral cooperatives. This fund was designed to substitute for the heavily decapitalized CRFOC fund that BAB had administered. The Federation is very satisfied with the PL-480 program. Indeed, the relationship was expanded when a new letter of understanding between FENACRE and PL-480 was signed on April 26, 1986. Under this agreement, PL-480 establishes a trust fund for FENACRE. Its operation will be similar to those of the PL-480 bank trust fund described in Chapter III.

Table VI-2 presents FENACRE's outstanding loan portfolio, disaggregated by the sources of loanable funds for the Federation. There were forty outstanding loans. Of the total amounts outstanding, 75.5 percent were financed with BCB refinancing, 15.4 percent from PL-480 refinancing, 9.0 percent from FENACRE's own resources and less than one percent from IDB/COLAC funds. The effect of hyperinflation and disaster relief on the portfolio are clear. Hyperinflation decapitalized the value of FENACRE's own funds and the IDB/COLAC loans. Large refinancing was made available from BCB for emergency relief. The refinancing was further increased by FENACRE becoming the ICI for PL-480 refinancing of the integral cooperatives.

Savings Mobilization

Credit unions mobilize savings by requiring their members to make monthly non-interest bearing deposits. These deposits are a form of forced savings and can then be used by the member to leverage a loan. A typical ratio is $b3 loan for each $b1 on deposit. Most credit unions do not have voluntary savings windows.

FENACRE's three means of capitalization, described above, are also forms of forced savings. In this instance it is forcing the credit unions to save with FENACRE.

In 1984 FENACRE instituted a savings mobilization program in an attempt to capture voluntary savings. The objective was to encourage affiliated credit unions to place their deposits of excess liquidity with FENACRE rather than in commercial banks, as was their custom. The timing was not

TABLE VI-2

OUTSTANDING FENACRE LOAN PORTFOLIO, 31 DECEMBER 1986

DEPARTMENT	NUMBER OF LOANS	Portfolio disaggregated by Source of Funds				
		OWN RESOURCES	IDB/COLAC	PL-480	CENTRAL BANK	TOTAL
Cochabamba	20	36.393'070.638	38'047.900	69.183'909.320	578.473'787.500	684.088'815.358
La Paz	4	35.322'790.725	-	649'606.000	27.628'295.000	63.600'691.725
Santa Cruz	7	50'000.000	-	10.529'325.000	3.391'385.000	13.970'710.000
Oruro	1	50'000.000	-	-	-	50'000.000
Chuquisaca	-	-	-	-	-	-
Potosí	6	1.152'301.648	-	42.883'500.000	-	44.035'801.648
Tarija	2	50'000.000	-	1.238'966.800	-	1.288'966.800
Beni - Pando	-	-	-	-	-	-
TOTAL	40	73.018'163.011	38'047.900	124.485'307.120	609.493'467.500	807.034'985.531
PERCENTAGE		9.0	0.0	15.4	75.5	100.0

SOURCE: FENACRE

propitious because hyperinflation eroded the credit unions' capital and discouraged savings in financial institutions. By mid-1986 only four credit unions had deposits in the program.

The interest rate structure will limit the success of this program. FENACRE can obtain loanable funds from BCB and PL-480 at interest rates that are considerably below competitive deposit rates. Under this structure, FENACRE has little incentive to mobilize resources through deposits.

The interest rate structure will limit the success of this program. FENACRE can obtain loanable funds from BCB and PL-480 at interest rates that are considerably below competitive deposit rates. Under this structure, FENACRE's incentive to mobilize resources is reduced.

Credit Operations

As shown in Table VI-2, at the end of 1985 FENACRE had an outstanding loan portfolio consisting of forty loans summing to $b807,084 million, the equivalent of $1.2 million (with the conversion based on the average exchange rate for 1985).

FENACRE's loans were heavily concentrated in Cochabamba. The integral cooperative and credit unions in this department held half the numbers of loans and nearly 85 percent of the loan volume. The other important departments receiving the larger amounts of credit were La Paz, Potosí and Santa Cruz.

Aggregate data are not available for the sectoral distribution of loans in 1985, but, an analysis by source of funds in 1984 shows that most are for agriculture and livestock. BCB and PL-480 refinancing are directed almost exclusively to agriculture. Most of these credits went to the four integral cooperatives. The IDB/COLAC loans were made to credit unions for purposes of agriculture, livestock, artisanry and small enterprises. FENACRE's own funds were directed to credit unions, but were used mostly for general purpose or consumer loans.

It is clear, therefore, that the large bulk of FENACRE's resources obtained from external sources were used to finance agriculture. Furthermore, most of the agricultural loans went to the four integral cooperatives. This implies that, despite the predominance of urban credit unions in FENACRE's membership, the rural areas received a disproportionate share of the Federation's loans. Furthermore, it means that credit unions receive only a small proportion of the financing. A large majority goes to the integral cooperatives.

Two factors have accelerated this trend. The first was FENACRE assuming the role of an ICI for the integral cooperatives. Most of the Federation's agricultural lending has gone to these four entities using BCB or PL-480 refinancing. The second was the large increase in BCB refinancing in 1984 and 1985 through the IDB and USAID emergency relief programs.

Delinquency has not been a problem with FENACRE's loans to the credit

unions and cooperatives because FENACRE can take a cooperative's delinquent payments out of the cooperative's deposit with the Federation. At the end of 1984 the rate of delinquency as measured by the amount of delinquent payments as a percentage of the outstanding loan portfolio was less than 1 percent.

FENACRE's interest rate structure on PL-480 refinancing loans is as follows. PL-480 lends to FENACRE at 7 percent. The Federation onlends to the credit union or integral cooperative at 10 percent, thus obtaining a spread of 3 percent. The cooperative then lends to its members at 12 percent. Each of the successive loans has a maintenance of value clause.

Integral Cooperatives

Table VI-3 presents information on credit obtained by the integral cooperatives in the 1984-1985 agricultural year. The four cooperatives received nearly $1 million, of which the largest portions went to the Gran Chaco (43.2 percent) and Cochabamba (26.1 percent) cooperatives. Of the total funds disbursed, 41 and 59 percent came from BCB and PL-480, respectively.

There were some 8,150 members of the cooperatives, of which FENACRE estimated that 80 percent (6,520) benefited from the Federation's credit. The average loan size per member benefited was $147.

Conclusions

The Bolivian credit union system is in serious financial trouble. Hyperinflation in 1984 and 1985 discouraged savings and decapitalized the credit unions, integral cooperatives and FENACRE. Therefore, the lending capacity of all three entities has declined. As a consequence, the system has become much more dependent on outside sources of funding, especially BCB and PL-480 refinancing. Most of FENACRE's credit has been directed to the integral cooperatives. Consequently, the global figures could be misleading to the uniformed observer. Very few credit unions receive financing from FENACRE. This is a weakness in the system. More credit unions should be receiving loans from FENACRE.

FENACRE has been able to survive in these difficult times because of increases in lending using PL-480 and BCB refinancing as well as the windfall gains made in the sale of fertilizers. Now that the fertilizer sales are almost completed, FENACRE is concerned that its expenses will exceed revenues. To counteract this affect, the Federation is actively seeking additional financing in order to expand its credit operations.

The situation in FENACRE and the credit unions deserves special attention. Ways must be sought to recapitalize the individual credit unions. At present, their lending capacity is extremely low. One means to increase capacity would be to simply create members deposits in some multiple of the existing level. This, however, would be inflationary. Another is to undertake a campaign to increase savings deposits. Yet another would be to increase the loan deposit ratio for credit. The

TABLE VI-3

FENACRE LOANS TO INTEGRAL COOPERATIVES 1984-1985 AGRICULTURAL YEAR

INTEGRAL COOPERATIVE	NUMBER OF MEMBERS	PRINCIPAL AGRICULTURAL CROPS	DISBURSED CREDIT ($US). (JULY 1984-JUNE 1985)		
			PL-480	CENTRAL BANK	TOTAL
"Cochabamba" Ltda. Punata, Cochabamba	5,000	- Potatoes - Corn - Sweet corn - Barley - Wheat	165,000	86,000	251,000
"Tahuantinsuyo" Ltda. Betanzos, Potosí	1,600	- Potatoes - Vegetables	112,000		112,000
"Gran Chaco" Ltda. Yacuiba, Tarija	550	- Soybeans - Corn - Cotton - Chiles - Sorghum	207,000	208,000	415,000
"Santa Cruz Norte" Ltda. Montero, Santa Cruz	1,000	- Rice - Corn - Soybeans - Vegetables	82,800	100,000	182,800
TOTAL	8,150		566,800	394,000	960,800

SOURCE: FENACRE

implementation of the maintenance of value clause will serve to encourage savings and avoid decapitalization problems with new and current loans, but it does not recover past losses.

FENACRE also needs assistance. Its leveraging capacity has been diminished. It could benefit from grants to add to its capital.

FENACRE's relationship with the integral cooperatives appears to be working quite satisfactorily. The refinancing procedures established by PL-480 have facilitated the lending process. Large numbers of members of the integral cooperatives are being served with credit, mostly with operating capital.

The credit union system offers a good vehicle to develop financial intermediation services and enhance savings mobilization in rural areas. By its very nature it extracts forced saving. However, with better interest rate incentives in combination with maintenance of value it is very likely that considerable voluntary savings could be mobilized by credit unions at low additional costs. FENACRE should explore ways to link up with programs which as FINCA and DESEC to jointly work together to establish credit unions in areas served by these institutions.

The Savings Mobilization Program established by FENACRE in 1985 was designed to redirect credit union deposits from commercial banks to FENACRE and hence to generate more funds for FENACRE's use. The program has barely been started. At present only four credit unions are participating, but, nevertheless, the program offers good possibilities. This program might well be the first step towards a long-term dream of FENACRE: the establishment of a cooperative bank to serve the financial needs of the Bolivian cooperative system. The interest rate structure, however, is a major probelm because it does not provide incentives for FENACRE to capture voluntary deposits. The low-cost source of loanable funds from BCB and PL-480 refinancing is a major disincentive to FENACRE to mobilize resources at higher interest rates.

VII

FINCA

Introduction and Background

FINCA (Fomento de Integral Campesino) is a relatively new credit organization that was established in 1984 to work with small-farmers in remote Bolivian rural communities. The concept of FINCA was developed by Dr. John Hatch, an agricultural economist and international consultant, who formed a parent organization, FINCA/International to launch similar programs in several Latin American countries. The objective of FINCA was to make five-year loans from a Central FINCA Revolving Fund to numerous rural communities. The communities would onlend this money to their members. Upon repayment of these individual loans, part of the proceeds would be used to capitalize a local community rotating credit fund. Part also would be used to repay the FINCA Revolving Fund. Once the original FINCA loan was repaid the community would have established a rotating credit fund the size of the original loan. Furthermore, upon repayment, the community could then apply for another loan from FINCA. To protect the real value of the loans --the program was established in a period of hyperinflation-- all loans were indexed to products: mostly potatoes.

In addition to its credit function, FINCA also had a marketing dimension. It was planned that FINCA would market the communities' indexed product, not only to realize repayment of the loans, but also to obtain more favorable prices for the producers.

Funding for the program came from three sources: (1) contributions from FINCA International, which raised money from foundations, and other sources; (2) PL 480-Title II which made a grant of $ 2.8 billion for the Rotating Credit Fund; and (3) USAID, which made a grant to acquire vehicles.

The program was rapidly implemented in 402 communities in 1984, with 24,289 families participating. To do this FINCA formed six regions-- Northern and Central La Paz, Southern La Paz and Oruro, Cochabamba, Northern Potosí, Southern Potosí, and Chuquisaca and Tarija-- each of which was administered by a regional supervisor, who was assisted by a number of local promoters in the communities. Table VII-I presents the data on FINCA's first year of operations.

The program, however, suffered from a number of structural weaknesses and was less successful than originally envisioned. The first problem was that, because of hyperinflation, the real value of FINCA's Revolving Fund declined rapidly before disbursement, thus making the loans to the individual farmers to be very small, about $9.00. Second, a large percentage of the communities did not establish a community rotating credit fund. Third, there was no provision to capitalize the FINCA Revolving Fund. Fourth, there was a reasonably high rate of delinquency. Fifth, FINCA had a high-cost administrative structure, relative to its credit portfolio. Sixth, its marketing system did not function well. (For more detailed analysis of

T A B L E VII-1

FINCA's CREDIT FLOWS TO RURAL COMMUNITIES IN 1984

REGIONS	NUMBER OF LOANS	NUMBER OF FAMILIES BENEFITED	AMOUNT OF LOANS (1,000$b.)	(US$.)
Norte y Centro La Paz	66	3.976	358.630.-	33.952.-
Sud La Paz y Oruro	79	4.522	344.285.-	36.413.-
Cochabamba	66	4.209	351.946.-	36.135.-
Norte de Potosí	51	4.219	351.388.-	32.688.-
Sud de Potosí	76	4.139	335.098.-	41.013.-
Chuquisaca y Tarija	64	3.224	325.224.-	31.832.-
Total	402	24.289	2.066.571.-	212.033.-

Source: FINCA.

FINCA see: Jerry R. Ladman, Gonzalo Afcha and José Isaac Torrico, "Evaluation of the FINCA/Bolivia Community Revolving Fund Porgram," Prepared for USAID/Bolivia, Contract No. 511-0000-6-00-5083, August 18, 1985.)

As a result of these problems, FINCA was forced to cut back its operations considerably in 1985 and 1986. In these years FINCA did not extend any loans to new communities, but made additional loans to 84 of the 110 communities that had repaid their previous year's loans in full (See Table VII-2). These loans were for one year, indexed to products, and had a very small average value per family benefited of $5.00. Because of the reduction in the scope of the program, FINCA reorganized its structure by collapsing the six regions into three, thus reducing its field costs. The three remaining regions are Sucre, North and Central La Paz and Southern La Paz and Oruro.

The Future of FINCA

Because of its difficulties FINCA is searching for a new mode of operations in order to continue serving the rural communities that have not been reached by formal sources of credit. It maintains a strong commitment to working with low-income farmers. At present FINCA is proposing two new models. Both are in early stages of development and need to be carefully reviewed and tested. If either is to be implemented it should be done on a pilot study basis in order to learn by trial and error.

The first model consists of FINCA serving as a credit link between an ICI and a rural community, where the ICI would obtain refinancing from PL 480. This model has been pushed to the point where PL 480 has recently agreed to make a total of $400,000 available to the Banco de Cochabamba, Banco Hipotecario and CACEN to lend to rural communities through FINCA on a pilot project basis. Estimates are that there will be funds to serve some 700 to 2,000 farm families with loans valued at $ 200 to $600 per farmer. Under these arrangement, a group of farmers in the community will receive a loan from the ICI, but with FINCA's assistance. The ICI will receive its money from PL 480 at 6 percent, the ICI will earn a 4 percent spread, and FINCA will charge an additional 4 percent commission. Thus the groups will pay 14 percent interest. All transactions will have the maintenance of value clause. The ICI will assume 100 percent of the loan recovery risk, but will require the community to maintain a compensating balance in an interest-bearing savings account equivalent to 20 percent of the loan.

Under this arrangement there is a built-in feature of savings mobilization but it is not voluntary, nor does it provide the farmer with liquidity upon demand since it must be maintained during the life of the loan. The effective interest rate paid by the borrower will be about 18 percent because of the compensating balance.

The program is based on a group-loan model and may encounter repayment problems if the individual group members are not willing to cover delinquent debts by other members. It is not clear if the loans will be distributed among group members on an equal or unequal basis. It can be expected that group members will have different needs and thus want different sized loans.

T A B L E VII-2

FINCA CREDIT FLOWS TO RURAL COMMUNITIES IN 1985 AND THROUGH FEBRUARY 1986

REGIONS	NUMBER OF LOANS	NUMBER OF FAMILIES BENEFITED	AMOUNT OF LOANS (1,000 $b.)	(US$.)
Norte y Centro La Paz	10	472	4.517.300	2.909.97
Sud La Paz y Oruro	32	1.931	11.825.875	8.387.16
Cochabamba	14	900	6.721.336	6.616.33
Norte de Potosí	2	123	345.600	420.34
Sud de Potosí	4	146	557.600	779.64
Chuquisaca y Tarija	22	1.065	3.215.700	4.013.94
Total	84	4.637	27.183.411	23.127.38

Source: FINCA.

Yet, with different sized debts there may be problems in getting group members to agree to be responsible for the repayment of each other's loans.

The biggest question, however, is the role of FINCA. This has not been clearly specified. It appears that FINCA will be expected to identify credit worthy communities and help form groups in those communities. It may also be expected to identify and help develop community projects and to provide technical assistance in farming activities and community organization. If it does these things FINCA's assistance would lower both the ICI's lending costs and reduce their risk and thus facilitate ICI lending to small farmers.

Whatever FINCA's role, it is doubtful if it will be able to cover its costs. At present, FINCA's total monthly expenses are about $6,000. Assuming 100 percent loan recovery, its annual income from loans of $400,000 will be $16,000. Even if FINCA substantially cuts expenses, which is unlikely, it will still run a considerable loss and need a subsidy. In the longer run, if FINCA expands its operations, some economies of scale can be expected, especially in the central office. Nevertheless, FINCA will probably need to be subsidized indefinitely unless it raises its commission for its services.

The second model, which is much less well advanced, is the proposal of Dr. Hatch. I his enthusiasm to continue to serve FINCA's established clientele it is his desire to soon implement the model on a wide scale.

Under this model farmers in rural communities would form a number of small groups. Each group member would be expected to put a specific amount in savings with the group on a regular basis. When the group has a minimum amount saved it would be eligible for a loan from an ICI. The loan size would be in direct proportion to the amount held in savings. The ICI would obtain its funds by means of refinancing, probably from PL 480. While the group has its credit it would be expected to continue to save and, as such, build up its leveraging capacity for future loans. Dr. Hatch views the credit cycle to be every ten weeks. Therefore, the group would build its borrowing capacity rapidly.

This model has some inherent difficulties: (1) Will the group members be willing to save at the same time they are borrowing?, (2) The effective rates of interest will be higher than the loan rate because of the required compensating balances and the continuous savings, (3) How will the group's funds be managed and kept safely?, (4) How will the loans be distributed among the group's members, equally or according to need?, (5) How will responsibility for repayment be determined in case of a member's default?, (6) Is the ten-week cycle reasonable, in terms of credit needs and cash flows?, (7) Will the ICIs be willing to participate in small group loans on a wide scale?, (8) The program is dependent on outside funding to increase its credit since the savings are designed to be kept in the group's fund, (9) There is no plan to pay interest on the savings deposits, therefore a member's only incentive to save is to have future access to credit. On this basis, how much will he be willing to save? (10) Finally, this model does not define clearly the role for FINCA.

An alternative to this model, but one that would maintain many of the essential features of the Hatch formulation would be for FINCA to work with rural communities or groups of rural communities to form local credit unions or local savings and loan associations. Under this alternative, farmers would have much more flexibility for savings and credit use. The credit unions or savings and loan associations, through affiliation with FENACRE or CACEN, could access PL 480 funds through standard refinancing mechanisms. Moreover, the credit union or association could be used to finance community development projects. The formation of credit unions and/or associations would create a structure of self-sustaining intermediaries in rural areas that would serve these communities over the long run.

Conclusions

FINCA, after getting off to a robust start in 1984 by providing small loans to very large numbers of small-farm families in remote Bolivian rural communities, encountered difficulties due to flaws in program design. It is now regrouping and searching for a way to continue to be of service to this group of clientele. Although, it has obtained limited financing from PL 480 for a pilot program it is still lacking a clear definition of its role in the financial process and/or in community or small-farmer development. This needs to be dealt with immediately or FINCA could experience another major failure.

Under any circumstances FINCA will have to be content to work with a much smaller number of communities and farmers than it did in 1984, until it can prove itself and gain experience to expand its program to a larger scale.

The implicit model of the pilot study is for FINCA to work with communities to identify and develop economically viable community projects and/or economic activities as well as to provide technical assistance to the communities for agriculture and community organization. This model is justified as there appears to be a need for this type of activity to overcome obstacles in rural areas in order to improve economic and social welfare. Before designing its model in final detail, FINCA should interact with the corporation for Economic and Social Development (DESEC) in Cochabamba as well as the National Community Development Service (SNDC) to learn from the extensive experience of these organizations in this type of activity. Such consultation should help FINCA avoid mistakes in program design.

The role of FINCA in this model should <u>not</u> be that of a credit organization. Rather it should provide technical services. FINCA's plan to use ICIs as the credit institution is correct,
because it keeps the financial aspects in the realm of the financial system and does not create a new credit institution.

The Hatch model proposed for FINCA needs to be much more fully developed before it is even implemented on a pilot basis.

In my view, consideration should also be given to a role that FINCA

might play to assist in the development of local rural credit unions and/or savings and loan associations. If this were done, long lasting formal-market financial institutions would be established in rural areas and FINCA would be able to leave behind a good legacy for future financial services in the rural communities that it has served.

Under any of these models there is little doubt that FINCA will need subsidization because its operational costs are sure to exceed income. This may be a role for FINCA/International to play by raising monies to cover their deficits and to allow FINCA to expand its activities. In the beginning USAID might make FINCA a small grant to get started.

USAID should proceed very cautiously in its work with FINCA. Before the Mission makes a commitment to FINCA, the institution should be expected to show a concrete plan of organization and action that indicates its capacity to deliver the services expected of it. Under any circumstances, FINCA should only proceed on a pilot study basis until it has proven its ability to succeed.

VIII

OTHER AGRICULTURAL CREDIT INSTITUTIONS

Introduction

There are a number of other agricultural credit programs operating in Bolivia. The purpose of this chapter is to provide an overview of some of the more important ones, including a brief look at informal credit markets. The credit programs covered are: Center for Economic and Social Development, private voluntary organizations, National Savings and Loan Housing Bank, departmental development corporations, producer and farmer organizations, breweries and other agribusiness.

Center for Economic and Social Development

The Center for Economic and Social Development (DESEC) is a non-profit umbrella organization for a number of entities that work in rural development. It was founded in 1963 and has its office in Cochabamba. DESEC is national in scope. Nevertheless, its activities are concentrated in the department of Cochabamba. DESEC is funded largely by contributions from European sources, mostly those affiliated with the Catholic church. Credit funds, however, are obtained by loans from Bolivian commercial banks. The entities in the DESEC system are: Rural Agricultural Action for Organized Development (ARADO), Association of Artisan and Rural Services (ASAR), Association of Popular Housing (VIPO), Peasant Education Institute (ICE), an artisanry marketing business (Amerinda), Organization of Potato Seed Producers (UPS) and Popular Health Services (SEPA).

Each of these entities has an assigned function. DESEC's role is to plan and coordinate as well as to provide leadership and direction for the system and its components.

Credit

DESEC and ARADO are the two entities directly involved with agricultural credit. ARADO is a federation of community-based organizations called centers. The centers are grouped by zones and the zones are organized into regions. The regions are consolidated at the departmental level. Finally, there is a national directorate. At present there are seventy-two ARADO centers.

ARADO works with the centers to identify credit projects. Once this is accomplished, DESEC searches out funding sources through an intermediate credit institution (ICI), usually a commercial bank. Note, neither DESEC nor ARADO is a financial institution, they are only facilitators. The ICI obtains funds, usually through BCB or PL-480 refinancing, and lends them to ARADO. ARADO uses the loan to purchase in-kind inputs to onlend to the center. ARADO charges the center the same rate of interest that ARADO pays to the ICI. ARADO supervises the loan and provides technical assistance. The center repays the ARADO loan in kind. ARADO sells the product and uses

the proceeds to cancel the loan with the ICI.

AT present there are forty-six centers that receive credit through ARADO. Some 600 families are direct beneficiaries. The loans are short-term loans to cover operating expenses for the production of potatoes and potato seed. In July 1986 ARADO had a total amount of credit of $434,000; therefore, the average loan size per farmer is $723. DESEC arranged financing through two commercial banks: Banco Hipotecario and Banco de Cochabamba. The banks obtained their funds through both BCB and PL-480 refinancing. The terms and conditions of these loans are the same as for other commercial bank loans to farmers that are refinanced.

In addition, DESEC arranged $6,000 in loans to farmers of selected communities to grow barley for the Taquiña Brewery of Cochabamba. The loan is made directly from the brewery to the farmers and consists of providing in-kind credit in the form of quality barley seed. In return for the credit, the farmers have the obligation to sell their harvest to the brewery.

DESEC has plans to expand its credit operations. In 1986, ASAR, the technical assistance arm of DESEC, has actively searched for new areas in which more community-based organization could be established. The decision has been made to extend the program to the higher altitude regions in the department of Cochabamba. The goal is to bring more communities into their program. Credit will be obtained for the communities for the production of potatoes, barley and green beans.

Conclusions

DESEC is a good example of an organization that can provide a relatively small number of farmers with credit and serve them well. One of DESEC's strengths is that it provides the participating farmers with a package of services related to production, i.e., credit, quality potato seeds, technical assistance and some marketing. Furthermore, the system provides another set of social services such as health and housing. Thus, credit is only one component of a system that is addressing different needs of the rural communities and their families.

It is very appropriate that DESEC is not a credit institution, rather it is facilitator and provider of related services. In this modality, DESEC uses the existing financial system rather than trying to create a new financial institution. Undoubtedly, DESEC plays an important role in encouraging ICI's to make credit available to small farmers. The credit program appears to function well.

DESEC's major weakness is that its system is very dependent on grants to cover much of their operations expenses. Were the grants to be withdrawn, it would be expected that much of the system would disappear for lack of support. The credit program would likely falter for the lack of an institution to provide the facilitating role.

To correct this weakness, in the area of credit, DESEC should give

consideration to working with FENACRE to develop credit unions in regions where DESEC operates. If this were accomplished, residents of the rural communities would be able to have local financial institutions to provide the services of both credit and savings. Eventually, the credit union might have sufficient resources that it could supplant commercial bank financing or it could obtain resources through FENACRE. Moreover, if healthy credit unions were established and then DESEC were to withdraw, the communities would be left with a local financial institution.

Private Voluntary Organizations

DESEC is the most prominent example of a private voluntary organization (PVO) credit project in Bolivia. It is classified as a PVO because it is non-profit and receives its funding entirely from private sector philanthropic organizations. There are a number of other PVO's operating in Bolivia. Prominent among them are Catholic Relief Services, CARITAS, Food for the Hungry, etc.

PVO's typically undertake rural and community development activities of a social and economic nature. Often they have small credit programs. These programs are targeted towards specific production objectives and are localized in scope. Most are offered in combination with technical assistance. The terms of credit are usually highly concessionary. In most instances the credit program is not tied into the financial system. Therefore, the credit program is dependent on outside financing which means that if the PVO withdraws the credit program is likely to falter and perhaps be discountinued.

There was insufficient time to inventory the PVO credit activities. It is likely, however, that the sum of their combined efforts would not prove to be of relative importance when compared to the whole picture. This is not, however, to negate their positive contributions to rural development. Undoubtedly, they have important impacts in the localized areas where they work. It should be useful to try to measure the extent of their activities and to analyze their credit projects, just to see how they contribute to rural finance.

National Savings and Loan Housing Bank

The National Savings and Loan Housing Bank (CACEN) has been exclusively an urban-oriented financial institution. The thirty-five offices of the twelve affiliated savings and loan associations are located in urban sites, where they receive savings deposits and make housing loans. For a number of years CACEN has wanted to open financial operations in rural areas. To a large extent this has been the personal goal of CACEN president, Ing. Ernesto Wende, who has a rural background and two U.S. university degrees in agriculture. In 1979, CACEN formally proposed the formation of Rural Banks. The proposal, however, encountered opposition from the Central Bank, ASOBAN, BAB and the government; it was not approved.

Since that time CACEN has been granted ICI status by the Central Bank. Ing. Wende is again ready to lead CACEN into the countryside. This time,

however, in a different modality. CACEN proposes to have one of the associations, La Primera, establish an office at a rural site. The opening to do this was provided by both CACEN's ICI status and the availability of funds through PL-480. There are two programs. First, is a $300 thousand USAID-sponsored emergency fund to undertake agricultural production in the flood-devastated areas near Lake Titicaca. Second, is a $7 million credit from Title I funds to be used for housing loans and family necessities in the same devastated areas. Letters of agreement between CACEN and the Executive Secretariat for both projects were signed July 10, 1986.

USAID has agreed that CACEN should proceed on the agricultural production project on a pilot study basis. La Primera will open an office in Huatajata. If it is successful, CACEN might then consider opening other offices in rural locations. These offices would mobilize savings and make loans for housing, agriculture and other purposes.

CACEN plans to make all classes of loans based on the same criteria as those employed for their regular savings and loan operations. Borrowers would be expected to have at least 10 percent of the value of their loan in deposits. This forced savings would encourage savings mobilization. Voluntary savings would be promoted. Loan guarantees for production loans would be provided by land titles, co-signers or other personal guarantees.

CACEN would like to link up with an organization to help La Primavera identify clients, provide technical assistance. It has had exploratory discussions with CARITAS but the latter was reluctant because there would be interest charges. CACEN may talk with FINCA. At the moment, however, CACEN is inclined to have its own personnel to carry out these activities.

Regional Development Projects

In 1978, in order to encourage rural regional development, USAID established the Rural Development Planning Project. The project was done in conjunction with the Ministry of Planning and Coordination. To continue this initiative, in 1979, USAID financed a complementary project, the Departmental Development Corporations Project (DDC). This project is designed to both strengthen the corporations and provide a line of credit to finance investment projects in the various departments. The credit line used PL-480 funds and was administered by the Executive Secretariat. The projects to be refinanced from this line are in the areas of agriculture, livestock, agroindustry, small- and medium-sized industry and artisanry. The new project also contains considerable grant funds to strengthen and further develop the capacities of the development corporations. Unfortunately, the program encountered difficulties in implementation due to Bolivia's political instability. Indeed, it was suspended for awhile in 1982-1983. It was not until 1984 that the credit line was activated. The DDC Project is scheduled to be terminated on March 31, 1987. A follow-on project, the Market Town Capital Formation Project is planned.

In the DDC Project, there are credit funds from both PL-480 and USAID. The later are administered directly by USAID. These funds, in U.S. dollars, are used to purchase imported machinery and equipment. They are available

at the official exchange rate, which provides a subsidy to importers, since it is less than the free-market rate.

The credit project is tied closely to the regional development corporations. Each corporation (except Pando) established a Financial credit Unit (UCF) as a financing entity. The UCF obtains its loanable funds from its own resources and accesses refinancing from PL-480 and USAID. The roles of the UCF are to promote its credit activity and work with prospective clients in planning projects, undertaking feasibility studies and arranging financing. For those projects that are approved by the UCF and are eligible for refinancing, the client makes contacts with eligible ICIs, the national private sector banks. If the ICI is disposed to finance the project, the paperwork is sent to the DDC National Project Coordinating Unit (UCP) for review. Once it is approved at this level, then it is forwarded by both PL-480 and USAID for review and a decision about final approval. Once the loan is approved, loan disbursement begins. The biggest complaint of the ICIs and borrowers is that this multiple loan review process is time consuming and causes significant delays before disbursement.

It is important to note that the ICI loan contract is between the ICI and the UCF, the funds do not revert to PL-480. Rather, they are deposited in the UCF to form part of a UCF rotating credit fund. Therefore, the PL-480 refinancing is in fact a donation to the UCF.

PL-480 has two credit lines to finance the UCF activity: the Title I Regional Rotating Development Funds and the Title III (1978) Regional Development Project. As of July 23, 1986, the total disbursements for credit were $3.2 million. In addition, USAID directly finances considerably more credit through the UCFs.

PL-480 refinancing for regional development has been concentrated in Santa Cruz, Cochabamba and Tarija. Twelve commercial banks have participated as ICIs. The bulk of the loan volume and loan numbers have been in agroindustry and agricultural/livestock production.

Producer/Farmer Organizations

There are three basic types of producer/farmer organizations in Bolivia. The first type is the peasant unions which date from the 1953 land reform. The unions are mostly political and use their collective influence to pressure the government on behalf of peasant interests. The second type is peasant cooperatives. These also emanate from the period of land reform and are organized mostly on social grounds. They have not been very successful. The third type is the producers associations. In contrast to the unions and cooperatives, these have developed mostly in the commercial farming regions and are structured on a product-specific basis. Their fundamental objective was to lobby the government for their specific interests. In Santa Cruz, several producer associations joined forces to form the Eastern Agricultural Chamber (CAO) in order to enhance their strength and influence with the government.

None of these organizations has been directly involved in providing

credit to their membership. Rather they have relied upon formal market institutions such as BAB and commercial banks. The organizations have, however, lobbied or pressured the government for more agricultural credit. Undoubtedly, they have had success, not only in obtaining more funds but also in gaining more advantageous terms for their loans.

USAID is implementing a new project, the Private Agricultural Producers' Organizations Project (511-0589), to try to strengthen selected producers' organizations in order that the organizations can become more effective vehicles of rural development and especially for the development of agricultural exports. To meet these ends, the project will have a staff to work with the participating associations to provide: technical assistance for marketing; training and technical assistance for organization, administration and management; grants for investment capital; technical assistance for crop and animal production systems; installation or improvement of computer facilities; and access to production credit for members.

With respect to production credit, the associations will have access to PL-480 refinancing through ICI's. Project staff will work with the associations in identifying projects and planning financing. It is very appropriate that neither the project nor the associations are expected to develop their own financial institutions. This function will remain in the hands of established financial intermediaries. Rather, the project and the associations will serve only as a facilitators. The fact that credit will be provided to the associations and their members as only one component of a package of services should enhance the success of credit.

Breweries and Other Agribusiness

Bolivian breweries have established credit programs as a means to ensure a supply of quality raw material--barley. Time did not permit a study of these programs in 1986, however, it is understood that they function more or less in the following manner. The brewery identifies potential barley growers directly or indirectly through an organization such as DESEC. The brewery extends in-kind credit in the form of barley seed to the participating farmers. The farmers then have the obligation to sell their crop to the brewery.

This system provides farmers with a part of their working capital and also guarantees them a market for their harvest. There are, however, a number of questions that need to be answered. Does the brewery pay the farmer a fair price for the product, or does it have monopoly power and use it to make a gain on the purchase? Does the farmer receive technical assistance? What is the interest rate? What is the value to the farmer of a guaranteed market? Does the farmer need additional credit? What are the loan guarantees and, who assumes the risk in case of a crop failure?

This system is worth further study because it may be very relevant for Bolivia as it tries to expand agribusiness and non-traditional exports. Experience in other countries, such as the Dominican Republic, suggest that agribusiness enterprises might be used to successfully channel credit to

small farmers. In this credit mode the enterprise would obtain a bank loan and then onlend to farmers with the commitment that the farmer sell the product financed to the firm. The enterprise, being interested in a quality product, might be motivated to provide a package of services consisting of technical assistance and marketing as well as credit. As Bolivia tries to encourage agribusiness and agricultural exports, this system might be very applicable to the nation's needs.

Informal Market

There was insufficient time to undertake study of informal credit markets. However, some impressions about these markets were gained by interviews in Punata, Cochabamba, with the persons that record informal market loans, the small claims judges.

The Punata market is structured as follows. Numerous persons with excess liquidity lend money to friends, neighbors or others who are known to them. Most loans are made by persons who have excess liquidity from some other business enterprise. Therefore, money lending is done by many different persons. There is only a handful of individuals who make a major business of money lending. The procedures are simple. The lender, who usually lives nearby the borrower, has accumulated information about his client. On this basis, the lender makes a quick decision about whether or not to make the loan. The only paperwork required is that the borrowers typically are asked to register the loan with a small claims judge so that the lender has legal resource in case of a default. It is a simple and cost-efficient system.

The lenders charge varying interest rates. In August 1986, the small claims judges, who record this information in their registers, reported the rates to be 10 to 40 percent per month for peso-denominated loans and about 18-20 percent for loans in dollars. Clearly, these rates are considerably in excess of the going bank loan rates. The variance in the peso and dollar rates relects uncertainty about the future value of the Bolivian currency. The term of the loan varies considerably depending on the purpose. Loans to finance agricultural production are normally six to eight months or less. Borrowing for agricultural purposes was frequent although there were many loans for other purposes. Especially common was lending for buying and selling livestock.

It appears that informal market activity in this region has changed in the first-half of the 1980s. An important change has been a tendency to shift from peso loans to dollar loans. Undboutedly, this has been a means for the lender to protect the value of the loan against inflation. Given the excess demand for credit in the period of hyperinflation, it would have been expected that informal market activity would have risen and borrowers would have paid interest rates that were considerably higher that these of formal market institutions. This appears to be what happened. In 1986, however, with increasing price stabilization the level of informal lending activity appears to have diminished. Interest rates have fallen, but they remain at levels considerably in excess of bank rates.

Informal credit markets undoubtedly play an important role in rural Bolivia. Although money lenders charge high rates of interest, they provide borrowers with easy access to short-term credit at very low transactions costs for small-sized or very short-term loans. These credits are likely to be the least-cost source of credit available to the farmers.

IX

RECOMMENDATIONS

It is well recognized that the Bolivian financial system has gone through a crisis as a result of the hyperinflationary years of 1983-1985. This crisis has had an errosive effect on the capital of financial institutions and left many in a very pecarious postion. The crisis also served to show the fundamental weaknesses of the system, its institutions and policies. There is wide agreement that the system needs to be restructured as rapidly as possible in order that it may serve Bolivia better in the nation's urgent effort to reactivate the economy, now that price and exchange rate stabilization have been acheived.

This report is concerned with the financial sector as it deals with agriculture and rural areas. A number of recommendations based upon the content of the previous chapters follows. The recommendations are synthesized and consolidated. The reader is referred to Chapter II for a detailed overview of the problems of Bolivian rural financial markets. It is recommended that the reader consult to the individual chapters for more detailed presentation of these ideas and the analyses behind them.

It is difficult to deal with the financial system in agriculture, or rural financial markets (RFMs) as we are wont to call it today, without taking account of the whole financial system because the institutions and policies that pertain to the sector overlap and often are one in the same as those that deal with the rest of the economy. Moreover, there is the obvious crossover between the possible roles of the private and public sectors. The overall situation, however, is part of another study, and, therefore, will not be dealt with in detail in this document, except for some specific ideas on the role of refinancing and the institutional structure for same, and the roles of public-sector institutions such as an agricultural development bank. (There are two current studies dealing with the total financial system: James S. Munson and Robert Barbery, Bolivia Financial Sector Assessment, prepared for USAID/Bolivia under contract with Arthur Young, May 1986, and The World Bank, Financial Sector Survey: Bolivia Washington, D.C., June 1987). I am in full agreement, however, with the interests of USAID and the World Bank to work with the government to first study and then restructure the financial system. Restructuring is necessary to make an effective financial system consisting of both appropriate policies and viable institutions. It is important that the new policies and institutional structure that are to be developed should facilitate and provide low-cost financial intermediation services that simultaneously meet both the development and monetary/financial needs of Bolivia. Indeed, this should be the primary objective. The following recommendations for RFMs are designed to fit within that context.

Bolivian Rural Financial Markets

Bolivian RFMs were shown to be surprisingly active in credit activities, but with almost no emphasis on capturing domestic resources through

savings mobilization. Therefore, they are not performing complete financial intermediation services in rural areas and are denying many rural folk opportunities to earn income and safekeep liquidity through the financial system. In other words, the lack of these features in the system is a statement of underdevelpment of Bolivian RFMs, and are factors that inhibit rural development.

In addition, there appears to be an excess demand for agriculture credit at the present time and there is every reason to believe that in the near future there will be an even greater demand for financing production and agroindustry as Bolivian looks more to the agriculture as a leading sector to reactivate the economy and generate non-traditional exports. The implication is that more credit will be needed in the future. It should be noted, however, that some, or even a considerable portion of the excess credit demand may be attributable to the considerably lower and concessionary interest rates charged on refinanced loans. The low-priced credit will cause all classes of borrowers to seek these loans in order to gain the associated income transfers.

Bolivian agricultural credit is virtually totally dependent on refinancing from BCB and PL-480. Were refinancing not available from these sources, agricultural credit would collapse to a much smaller amount. Institutional credit to small farmers would virtually disappear. Small-farmers would be forced to rely on the informal market lenders for their credit needs. As such, the system and its institutions are in a very fragile state and highly dependent on outside funding. This is a situation that must be changed by the creation of a system consisting of more independent and financially viable institutions. A key element for the new system is savings deposit mobilization. If this is accomplished, not only will financial institutions become more viable but also rural folk will have the opportunity to store their excess liquidity in the financial system.

Recomendations

1.- **Multiple institutional structure**. There is room for a number of financial institutions to provide services to the agricultural sector, although, clearly, some may be much more important than others. Efforts should be made to provide an environment that will encourage the different types of institutions to enter the market; competition is healthy for the industry.

At this point, it would appear that there are four principal classes of financial institutions that are currently operating and should be encouraged to expand. The four are: (a) a restructured BAB in the form of a new small-farmer agricultural development bank, (b) commercial banks, (c) the FENACRE/CACEN complex including credit unions and saving and loan associations and (d) the Financial Credit Units (UCFs) of the regional development corporations. Financial resources should be made available to these institutions through loans and refinancing. Grants should be used for technical assistance. In addition, it should be expected that other financial intermadiaries such as DESEC and money lenders will operate. Given the stage of development of RFMs, these entities fill a need and

should not be discouraged.

2.- Role of non-financial service institutions. There is a general need for better marketing and technical assistance in the agricultural sector. In specific, there is a need for non-financial institutions to provide services to farmers and the agricultural sector to: (a) identify economically viable projects--either at the farm, community or regional levels (b) provide technical assistance in planning and executing these projects, and (c) help in obtaining financing for the projects. These institutions will be particularly important in the stage of reactivating the economy especially in export and agribusiness development. The regional development corporations, producers associations, DESEC and, perhaps, FINCA are examples of such institutions.

It is important, however, that these institutions should not be considered as credit institutions, rather they are facilitators and service institutions. If they were to be credit institutions they would most likely to be destined to become permanently dependent on outside funding; as, for example, FINCA was originally designed. Credit should be left to the extablished ICI.

The question arisis about how these service institutions will be financed. One means is to charge the user for their services. Consideration should also be given to charging the ICI since the financial institution also benefits from their services, because their loan transactions costs and risk are reduced.

3.- Small-farmer bank. BAB should be restructured to form a small-farmer development bank. BAB has demonstrated that it can serve large numbers of farmers with credit throughout its 50 regional offices. The new bank should be expected to be the principal national source of credit for Bolivian small farmers.

The new bank should be decentralized to the regional level, and should establish a pilot savings mobilization program. Based upon this pilot experience, plans should be made to extend the deposit operations to all agencies. In vet a later stage, the bank might take the form of a rural bank, with checking deposits and authorization to lend for all needs in rural communities.

With the reorganization, the new bank will need capital donations; some major changes in personnel, especially those with banking skills and technology; and a computarized record-keeping accounting system. Plans should be made to provide technical assistance to the new bank during its transformation.

4.- Commercial banks. Commercial banks can be expected to meet the needs of medium- and large-sized farmers as well as those of agroindustry. Because of risk and high costs of extending credit to small farmers, their work with the class of clientele will be limited to only those that are the best of lot.

These banks should be encouraged to lend to agriculture through their development divisions and with the assistance of service organizations, such as the UCFs and DESEC. More technical service and training programs, such as was provided by Chemonix is desirable. The banks cannot be expected to use much of their own resources for agricultural credit, except for farmers or firms that have excellent guarantees. Therefore, these banks will continue to rely mostly on refinancing from BCB or PL 480.

5.- **FENACRE and CACEN**. Both of these federations want to expand their activities in rural areas. An advantage is that both institutions have deposit windows and, therefore, can provide financial intermediation services to small- and medium-sized farmers and others in the countryside. FENACRE has experience with agricultural credit with credit unions and the integral cooperatives. CACEN is just beginning with a pilot programs at Lake Titicaca with the emergency funds.

Both of these institutions have access to PL-480 refinancing. They could benefit from additional technical assistance to develop their agricultural programs.

6.- **Second-story banking and Refinancing.** The refinancing system needs to be improved and restructured. The current BCB system, although better than the past, is inadequate. There are serious delays in loan approval due to inefficiency and excessive review of loan documents. Announcements to ICIs, informing them of the availability of refinancing, are done at the last minute, resulting in poor credit planning by the ICI and untimely late disbursements to borrowers.

PL-480 is an ad hoc institution that is not directly subject to control by the monetary authorities. In its short life of offering refinancing, the Executive Secretariat has provided a demonstration effect on how to operate an agile refinancing program. Its program has been well received by ICIs. However, the Executive Secretariat is limited in its ability to undertake refinancing because its sources of funds largely depend on U.S. government grain sales.

A new arrangement needs to be established. The most appropriate approach appears to be to either reorganize the BCB Development Department or to create a new institution to replace it. Both have their merits, but in my view a new institution of mixed private and public sector capital is the most appropriate. Under this arrangement the institution would be able to borrow abroad with the collateral provided by the Bolivian government and at the same time be less politicized.

The role for PL-480 is less clear. There is no need to duplicate facilities. If the BCB is retructured the new institution could assume the PL-480 refinancing role, PL-480 funds could be made available to the new institution and the Executive Secretariat would revert to an institution building capacity. Nevertheless, much can be learned from the PL-480 experience that would be useful in restructuring BCB refinancing.

The new institution should place virtually full responsibility on the

ICI to make the loan and assume risk. Therefore, there is only a need for mimimal review of applications for refinancing and to delay in disbursement.

7.- Reduce targeting. Presently, BCB targets agricultural credit within and across institutions, using as a basis national plans and past credit patterns. While planning is useful to estimate resource needs for credit, detailed targeting is an exercise in futility because credit is fungible and is substitutable for a borrower's own funds. Moreover, targeting raises costs for both ICIs and the refinancing entity because it creates a need for elaborate loan approval review procedures as well as need for costly control and inspection measures during the life of the loan. It is better to let the forces of supply and demand in product markets and financial markets determine credit flows. Targeting can be accomplished through technical assistance and planning activities, by institutions that are outside the financial system, but that can identify viable economic activities. An example is the work of the UCFs.

8.- Training, technical assistance and research. A number of the above recommendations call for training and technical assistance. This is an important role for foreign assistance. Training would consist of seminars for policy makers and bank officials, in-residence advisors in financial institutions and short-courses for bank employees. ASOBAN might be expected to help support these activities. The facilities of IDEA could be used.

There is a need for continuing research to help understand RFMs, formulate policy and provide inputs for improvements in institutional structures. This could be accomplished through foreign assistance, perhaps in combination with local universities and other researchers.

9.- Appropriate interest rate policy. Last, but far from least, is the need to make adjustments in the interest rate structure. The current concessionary interest rate structure for development loans is designed to encourage investment and agricultural production by means of income transfers to borrowers. There are a number of other effects, however, that call into question the wisdom of this policy. The concessionary rate distorts credit markets, leads to uneconomical allocation of real and financial resources, inhibits domestic savings mobilization, contributes to corruption and the use of credit for political purposes, fosters dependency on external funding and stands in the way of developing healthy financial institutions.

Efforts should be made to eliminate the concessionary rates, allowing the rates to represent the opportunity cost of capital. If this one thing were accomplished, much would have been done to straighten out RFM problems in Bolivia.