

## Providing Cost-Effective Credit to Small-Scale Single-Crop Farmers: The Case of Financiera El Comercio

By Bettina Wittlinger and Tiodita Mori Tuesta

### The Challenge: Finding Appropriate Mechanisms to Finance Single-Crop Farmers in Paraguay

#### I. Introduction

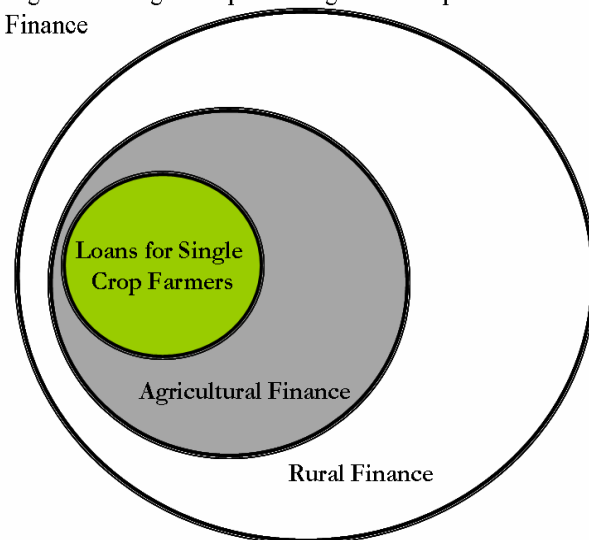
Single-crop farmers have traditionally been unable to access credit through formal financial institutions. The vast majority of financial institutions find such farmers too risky or too costly to serve. For this reason, many such farmers find that they can only receive credit from those businesses with whom they regularly buy from and sell to, i.e. traders, processors, suppliers, storage facilities and exporters in the same value chain.

This *InSight* discusses the case of Financiera El Comercio, a regulated microfinance institution in Paraguay. El Comercio has implemented a partnership—the only one of its kind in Paraguay—with silos that enables it to provide small loans to single crop soybean farmers despite their higher risk profile. It discusses why and how El Comercio entered this market, and the necessary conditions for this type of credit. Finally, this *InSight* discusses lessons learned from this type of credit and other successful models of financing small farmers.

#### II. Challenges in Rural Finance

Development of the financial sector in rural areas has generally lagged behind that of urban areas. A widely dispersed population and underdeveloped infrastructure can make transaction costs higher, and it is often difficult for financial institutions to achieve economies of scale. Financing agriculture in rural areas is an even greater challenge. Farmers and other agribusinesses have a diverse set of needs—ranging from seeds and tools to transportation and processing services for the crop. Agricultural production is generally seasonal, and crop cycles of certain lengths do not mesh well with the loan cycles of financial institutions. Finally, loans made by financial institutions to farmers can carry severe risks of weather, plagues and price fluctuations.

Figure 1: Single Crop Farming as a Component of Rural Finance



These difficulties are amplified for farmers who dedicate themselves to farming a single type of crop without any additional sources of income to diversify risks. Financial institutions are wary of lending to multiple farmers with similar risk profiles.

### III. The Rationale for Providing Credit to Small-Scale Single-Crop Farmers

#### *El Comercio's Rural Strategy*

El Comercio began offering credit to soybean farmers as part of its larger rural expansion strategy. El Comercio is a finance company regulated by Central Bank of Paraguay with 30 years of experience. In 1998, it initiated microfinance operations in urban areas, although it had already experimented with agricultural loans to the Mennonite population of Curuguaty. In 2002, it formally expanded its rural operations with technical assistance provided by ACCION International and support from the Inter-American Development Bank's Multilateral Development Fund (MIF). As of March 2006, it has more than 12,497 active microenterprise clients, of which 80 percent are rural. It operates from 18 branches, 12 in rural areas.

El Comercio wanted to aid soybean farmers because of the importance of the sector in the local economy. Agriculture contributes 30 percent of Paraguay's \$7.1 billion dollar GDP<sup>1</sup>, and 43 percent of its population lives in rural areas. Soybean is the main agricultural product of Paraguay, and El Comercio was keenly interested in increasing its outreach in new rural areas by developing a product to satisfy the financial needs of this important market. Also, providing credit to farmers without access to formal sector financial services was seen as part of El Comercio's social mission and something that its Board of Directors strongly promoted. Finally, El Comercio was interested in continuing its success with rural projects which had favorable repayment rates relative to the urban credit portfolio.

### IV. Identifying the Value Chain

Before lending to single-crop farmers, El Comercio analyzed the *value chain* for soybean production. The value chain consists of the various actors who produce, transform, or supply the product as it moves from input suppliers to farmers. It also includes those who commercialize, i.e. connect the final product with the market, many of whom are international or Brazilian traders and exporters.<sup>2</sup> El Comercio had 12 rural branches, and its staff had strong knowledge of the rural sector and was familiar with many of the input providers in the value chain. Still, before launching this new product, the staff visited each input provider, small farmer cooperatives, local and international exporters, and storage facility providers ("silos"). They learned about the relationships among each player in the value chain, with the purpose of identifying any existing financial gaps or constraints in the value chain of soybean.

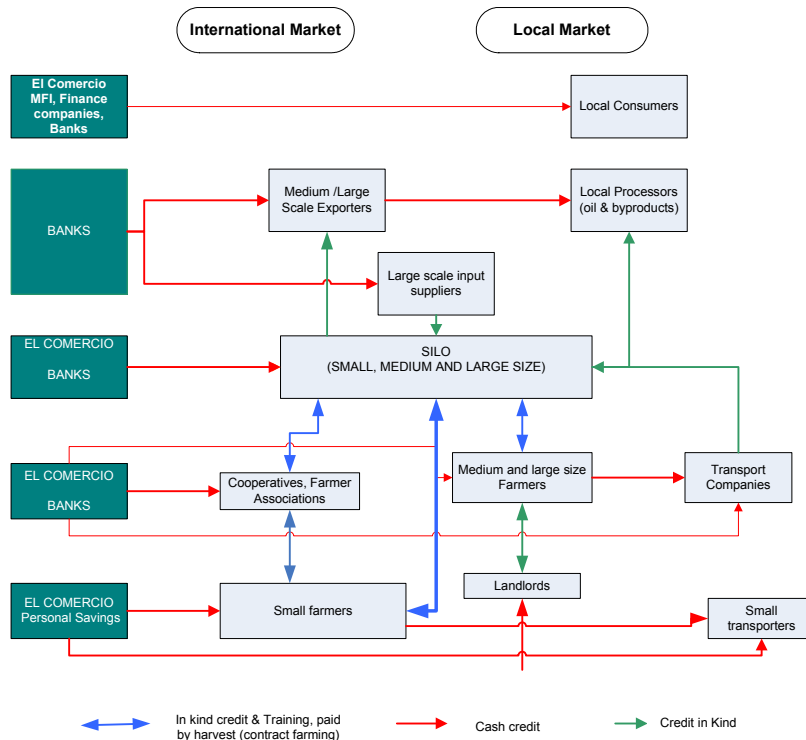
Identifying and understanding the value chain was critical for El Comercio. First, it enabled the institution to have a better understanding of relationships and information flows between the different participants. Through the participants in the value chain, El Comercio receives additional information on each potential client farmer, which enables the institution to learn about the potential client's level of responsibility, experience and financial dependency on input suppliers and traders. Understanding the value chain enabled El Comercio staff to determine business opportunities and identify potential risks as well as to identify gaps and constraints in existing financing to those involved in soybean production.

<sup>1</sup> World Bank. "Paraguay Country Data." The World Bank Group, 2004.

<sup>2</sup> RAFI (Rural and Agricultural Finance Initiative) notes, "Value Chain Finance," USAID, June 2005

Figure 1 provides a graphic representation of the participants in the soybean value chain, whose activities are described below. The financing activities of El Comercio and other financial institutions are reflected on the left hand side of the chain.

**Figure 1: The Soy Value Chain**



- The soy value chain begins with **small farmers**, located at the bottom of Figure 1. In this context, this refers to farmers that are producing one crop—in this case soy—who typically possess between 5 and 20 hectares of land. The strategic alliance described below enables El Comercio to finance these farmers.
- **Landlords** hold land that would traditionally be dedicated to the grazing of livestock or to another crop. Due to the high price of soy, El Comercio sometimes finances the purchase or rent of additional land to be used for cultivation. This land is often subleased to large farmers or silos.
- **Transportation services** are critical expenses for farmers, since they typically are paid in cash, rather than financed by in-kind credit from the silo. Small farmers sometimes use credit from El Comercio to pay for small **informal transportation services**, such as an individual with a van, during high season. Other times they pay **transportation service companies** which move crops, machinery, and inputs year-round.
- **Cooperatives or other associations of farmers** are associations made up of farmers with multiple objectives: education, health. El Comercio sometimes provides loans to these associations, who in turn, provide loans to association members.
- **Large-scale farmers** generally possess large plots of land—more than 80 hectares—and have basic storage infrastructure (small silos) to store their grains before they are

sold to the silo. Sometimes small farmers use their El Comercio loans pay for storage in these small silos before its final sale to the main silo.

- The **silo** is the central actor in the soybean production chain. It is involved with practically every member of the value chain. Silos are national or multinational businesses that have the equipment and infrastructure to store the soybean and are generally located close to the farms. Silo staff also provides training, purchase the soybean crop for resale, finance the harvest and provide services for drying and storing the soybean. El Comercio has formed strategic alliances with 12 of the approximately 50 different silos in Paraguay. El Comercio also provides credito to these silos.
- **Large scale input suppliers** supplement the resources offered by silos by selling additional machinery, spare parts, services and technical assistance from agronomists, among other services.
- **Soybean processors** are multinational corporations that transform residual soybean for use by consumers, for example, as soybean oil, flour or livestock feed. These soybean processors generally receive credit from commercial banks, while El Comercio often provides credit to smaller-scale buyers.
- **Agricultural exporters** are multinational corporations with a presence in Paraguay that purchase the stored soybeans from the silos for sale to the **local** and **international** markets. Some of these agricultural exporters, such as Cargil, have their own silos, so they can negotiate more favorable terms.

#### V. How El Comercio Finances Small Farmers

Typically, small single-crop farmers of soybeans were only able to receive in-kind credit. This type of credit is given through a formal agreement or contract between the small farmer and an input supplier referred to as *contract farming*. These small farmers receive inputs, such as seed and fertilizer that were necessary to produce the crop on credit after signing an agreement to sell the future soybean crop to the silo. Repayment of this credit for the inputs is deducted when the farmer sells the crop.<sup>3</sup> At the time of signing the contract, the small farmer could set the soy price or leave it open to the market price at the moment of sale.

El Comercio identified a gap in the provision of cash credit to the smaller members of the value chain. Small farmers lack cash credit to cover additional needs during the growing cycle ranging from preparation of the soil, to purchase of additional inputs others than those the silo can provide for to consumption needs during the production cycle.

#### Identifying Partners for Alliances

To close the financing gap, El Comercio formed strategic alliances with silo companies to reduce the credit risk involved by financing small single crop farmers. During this process, El Comercio first evaluated the silo as a potential candidate for credit, since El Comercio finances both small and medium sized enterprises. Second, El Comercio looked at the silo's experience in serving small farmers. Finally, El Comercio examined references, made site visits and looked at the silo's overall experience in the business and region. If this is successful, El Comercio and the silo agree to work together. A number of small and medium sized silos in Paraguay do not qualify for a strategic alliance with El Comercio.

<sup>3</sup> Pearce, Douglas. "Buyer and Supplier Credit to Farmers: Do Donors have a Role to Play?" Rural Finance Innovation Case Study, CGAP.

If market conditions for soy are favorable and the silo has sufficient access to capital, it can be difficult for El Comercio to enter in new strategic alliances. Providing in-kind credit to small farmers is a profitable business for the silos. In times when financial resources are limited, as they have been for the last two years, El Comercio is able to enter new relationships with silos. Smaller silos are typically potential candidates for a strategic alliance with El Comercio because they have limited access to financial sources. These strategic alliances allowed El Comercio to understand the value chain of soybean production and regional agricultural production, while contributing to its rural expansion plan.

The strategic alliance functions as follows:

- 1) The **silo** provides in-kind inputs (like fertilizer and seeds) to the farmers and farm cooperatives, and the farmer commits to repay the silo for the in-kind credit from the proceeds of its future crop sales. The silo signs a contract with the farmer committing to purchase the farmer's future crop at either a fixed price or the market price at the time of the harvest. The silo then monitors the phases of crop production.
- 2) Typically, small farmers need additional cash to get them through the growing season, and the in-kind credit provided by the silo is insufficient. In these cases, the silo refers soybean farmers to **El Comercio** who provides them with credit. After conducting a credit analysis, El Comercio evaluates the credit risk for each farmer, offering a suitable credit product to them. The farmer signs a traditional credit contract with El Comercio accepting the loan conditions and promise of repayment of the loan after the harvest of the crop. El Comercio provides the farmer with his loan in cash—either from one of its rural branches or in the field. The farmers use this loan to pay for expenses such as farm equipment repair and transportation to move the soy from the farm to the silo.
- 3) When the **soybean farmer** harvests the crop and brings it to the silo, the silo buys the crop. In about one- third of El Comercio's relationships with silos, the silo automatically discounts both the cost of the production inputs given to the farmer and the loan repayment from the sale of the crop, and returns the loan repayment to El Comercio. As El Comercio becomes more comfortable with the risk profile of these loans, many of the newer alliances with silos do not include the automatic recovery of the loan from the farmer by the silo. El Comercio takes the credit risk and responsible for recovery in case of the farmer's failure to repay.

### Characteristics of El Comercio Loans to Single-Crop Farmers

Table 1 summarizes the terms of these loans. These loans to soybean farmers are made in United States dollars. Since soy is largely a crop that is produced for export, this enables El Comercio to match the currency of the loan to the currency of the borrower's income sources.

<b>Table 1. Terms of the single-crop loan to soybean farmers</b>	
<i>Values in US\$</i>	
Loan size	500-12,000
Interest rate	12-15% annual, paid at the time of receipt of the loan
Fixed Commission	20

According to El Comercio's own market study, other lenders make agricultural loans in local currency, but their equivalent interest rates are higher. The cost of the in-kind credit provided by

the silos is approximately 15 – 20 percent annually, higher than the interest rates on El Comercio’s loans.

## **VI. Conditions that Make This Financing of Single-Crop Farmers Successful**

Financing small farmers with a single crop to provide their income can be a risky venture, and microfinance institutions considering similar products for another crop or region should understand the conditions present that made this type of loan possible in the case of Paraguayan soybean. In this section, the characteristics of the value chain, the strategic alliance, and the soybean crop that permit the effective operations of such a loan are discussed.

- **Strong Value Chain**

Just because a value chain is identified by a microfinance institution, does not mean that the microfinance institution will be successful in financing farmers. A strong value chain where links between participants are transparent and mutually profitable is critical to the financing of single-crop farmers. In Paraguay, there exists a well-developed infrastructure for the soybean value chain-including storage facilities, transport, services, inputs and information. Other agricultural sectors in Paraguay are not as strong. For example, a value chain exists for those who raise livestock, but little relationship between small-scale livestock owners and larger producers exists, as it does in the case of soy. Corn is another important value chain in Paraguay, however, this crop is considered risky due to price fluctuations.

- **Formalized contracts between participants**

Another reason this case of single-crop financing is successful is that silos sign formal contracts to purchase the future crop of the farmers (contract farming) This assurance of repayment at harvest time enables El Comercio to have the confidence to lend to these small farmers. For other crops in Paraguay, such as canola and maize, value chains exist but lack these formal contracts to purchase the future crop, making loans by a financial institution much riskier. However, the risk mitigation effect of formal contracts varies for other crops. For example, in the case of tobacco, formal contracts exist, but the value chain is weak. Tobacco is not a traditional agricultural product for small farmers in Paraguay, and not many farmers are interested in borrowing for cultivation of this crop. Additionally, tobacco price is low, and it is not a very profitable crop.

- **Strategic Alliance With a Key Member of the Value Chain**

Although a strong value chain exists for soybean farmers in Paraguay, this project would have been impossible without the strategic alliance with the silos. This alliance with the silo to finance farmers resulted in improved information quality, reduced cost of providing and monitoring loans.

*Improved Information—leading to lower operating costs:* This partnership between input supplier/trader and microfinance institution enables El Comercio to overcome some of the obstacles to rural finance, such as the lack of credit history information for small farmers. The silo has a close interaction with the farmers and provides information about the prior history of the farmer to the loan officer that is used in the credit evaluation process. The silo provides a list of potential candidate farmers to El Comercio, minimizing the amount of time needed to identify clients. Phase-by-phase supervision of crop production is done by the silo, which means that loan officers spend much less time monitoring the loan. Furthermore, since the repayment of the loan to El Comercio is



automatically discounted from the sale of the crop to the silo, it is less costly for El Comercio to control repayment and to implement recovery strategies for late repayment.

Since El Comercio had improved information on potential farmer clients through the silo, the amount of time El Comercio dedicates to providing loans to these farmers is much lower than it would otherwise have been.

*Staffing:* El Comercio did not need to contract agricultural technicians as staff or loan officers because the silo staff had technical personnel in these areas and did the training and supervision of the credit through the crop cycle. Thus, El Comercio did not have to modify its traditional criteria to recruit, select and hire loan personnel. El Comercio hired staff with knowledge of the rural sector, but they did not need to hire trained agronomists.

- **Favorable Growing and Price Conditions**

After the success of its loans to soybean farmers, El Comercio wished to apply the experience of value chain finance for soy to other products, like sesame, canola, and tobacco. However, soybean has a variety of unique conditions that makes it possible to finance single-crop farmers that El Comercio has yet to encounter in another crop.

The table below compares the conditions of soybean production to the conditions of sesame production, and explains why El Comercio finances single-crop production of soybean, but not of sesame.

	<b>Soy</b>	<b>Sesame</b>
Length of Production	< 6 months	<6 months
Geographic conditions	Excellent	Excellent
Climate	Excellent	Excellent
Price	Constant, with increasing international demand	Severe price fluctuations in the last 3 years
Strength of value chain	High due to strong competition between traders and exporters	Low, gaps exist and high dependence on few input providers and traders
Ownership of land	Own >10 hectares	Own < 10 hectares

Both soybean and sesame have relatively short production cycles (less than six months). Since loan terms are often based on the production cycle, a short production cycle is preferable from a risk perspective. Similarly, soil quality and weather in rural Paraguay are favorable for the production of soy and sesame, although sesame is not a traditional crop for Paraguayan farmers.

The two crops differ in their price trends. Soy has increasing international demand and a price that has remained constant or increasing over the last 10 years, whereas the price for sesame has fluctuated, making it riskier venture to finance. Even during the soy growing season from 2003-2004 which was affected by drought, the international price of soy reached its highest point of the last 10 years as shown in Table 3.

**Table 3: Historical Soy Prices**

	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005
Soy (\$/ton) <sup>4</sup>	188	204	217	245	252
Soy change year/year (%)	-	8.5	6.4	12.9	2.9

Finally, the sesame value chain is not as stable as that of soy. Sesame has fewer participants competing within the value chain, particularly exporters and local silos. Also, sesame farmers do not generally sign formal contracts to sell their future crop to silo or other traders, making their future stream of income more questionable.

For all of these reasons—volatile prices, lack of guaranteed income stream, and a weaker value chain, El Comercio does not finance farmers who are exclusively growing sesame. However, it does finance farmers who are growing a mixture of crops *including* sesame, because they have a more diversified income stream and are less subject to the volatility of the sesame market. This is not a problem, as sesame is not a traditional product of Paraguay, and farmers generally have diversified income sources, such as traditional crops & dairy, and use only 1-2 hectares of their farm for the cultivation of sesame.

## VI. Lessons Learned on Financing Single-Crop Farmers

### 1) It is possible to integrate small scale single-crop farmers into the formal sector financial system in a cost-effective way, under the right conditions

El Comercio has been able to successfully offer credit to farmers that many previously considered “unbankable.” Tables 4 and 5 provide a brief summary of the characteristics of the loans authorized by El Comercio to single-crop soybean farmers, and their rates of repayment.

Table 4 shows loans to small-scale single crop farmers. The 2002-2003 growing season had the most favorable climate, reflected in the higher number of loans and portfolio amount relative to subsequent years.

**Table 4: Loans to Small-Scale Single Crop Soybean Farmers Through Alliances with Silos**

	Number of Loans	Portfolio Amount (US\$)	Average loan size (US\$)	Delinquency > 30 days (US\$)	Portfolio at Risk	Number of Alliances with Silos
December 2003	369	722,660	1,958	278	0.04%	2
December 2004	360	610,262	1,695	19,702	3.23%	7
December 2005	239	549,071	2,297	5,989	1.09%	12

The slight increase in portfolio at risk in 2004 and 2005 can be attributed to unfavorable drought conditions, which also led El Comercio to approve fewer loans in 2005.

In Table 5, we see different trends in the number of loans and average loan size to medium sized soybean farms. The number of loans to medium-sized soybean farmers increases dramatically in 2004 and 2005. This occurred because El Comercio was conservative in approving these larger

<sup>4</sup> Argentina Agriculture Secretariat, 2005



loans in the product’s first year. As the number of loans increased, the loan size fell as loans were approved to a wider range of medium sized farms, many with less need for credit.

**Table 5: Loans to Medium-Sized Single Crop Soybean Farmers through Alliances with Silos**

	Number of Loans	Portfolio Amount (US\$)	Average loan size (US\$)	Delinquency > 30 days	Portfolio at Risk	Number of Alliances with Silos
December 2003	38	1,292,104	34,002	46,450	3.59%	2
December 2004	106	1,737,720	16,393	36,450	2.10%	7
December 2005	102	1,797,063	17,618	36,450	2.03%	12

The success of El Comercio’s rural portfolio changed their thinking that rural portfolios are less productive than urban portfolios. El Comercio projected that the number of clients per loan officer in its rural branches would be lower than that of urban areas, but this has not been the case, mainly due to higher demand for access to credit and very low levels of indebtedness of potential clients in rural areas.

**2) Including a financial intermediary to finance small farmers can present a “win-win situation” for all parties involved preferable to a traditional system of in-kind credit.**

Soybean production would continue regardless of El Comercio’s financing of small farmers, through a two-party system of in-kind credit between farmers and those who supply them inputs. However, the reason for which this project has been successful is that both El Comercio and the silos are financing the needs of farmers in complementary ways such that each party gains.

*Gains for the farmer*

The farmer gains access to credit in the financial sector and the opportunity to build a formal credit history. Equally important, the farmer also reduces dependency on the silo and other input providers, because he can satisfy his credit needs from an additional financial source. By receiving cash, rather than in-kind credit, the farmer can fulfill other production or personal needs. That is, the farmer can pay any of his costs with the loan, including rent for land, the repair of machinery, and labor costs and satisfy personal needs during the production cycle.

Furthermore, the farmer can take advantage of his existing relationship with the silo to get cash credit quickly. The silo provides information to El Comercio that enables it to provide the loan, with minimal paperwork and credit evaluation time. When the silo connects a farmer with El Comercio, the loan officer calculates the farmer’s capacity to repay. El Comercio does not formalize an additional guarantee because the alliance between the silo and the farmer functions as a form of collateral. El Comercio generally does not visit the farm or home, as it would in the case of its other loans, because the farmer has already signed a commitment to repay the silo that incorporates these aspects. Finally, the farmer does not have to spend time going to a branch to repay the loan to El Comercio. The payment is automatically deducted from his crop sale.

*Gains for the Silo*

The silo also benefits from its strategic alliance with El Comercio. The silo connects farmers with a financial institution that can satisfy their demands, as the silo does not have sufficient liquidity to provide cash to farmers. Furthermore, El Comercio’s participation in the value chain

enables the silo to diversify its risk, because another institution is monitoring the repayment of the farmer. Although the silos with whom El Comercio works do not receive commissions, they take advantage of its strategic alliance by taking out larger corporate loans (approximately 100,000\$) from El Comercio to be used to buy inputs, fertilizers, fuel, and agricultural equipment for crop production.

*Gains for El Comercio*

El Comercio benefits from access to a new niche of customers with relatively high repayment rates. As mentioned earlier, the MFI also benefits from reduced collection costs, since loan repayments are debited automatically by the silo. Financing single-crop farmers enables El Comercio to improve its inroads into rural markets, fulfill its social mission and advance its “learning agenda” on rural microfinance as it learns how to replicate this type of financing with other crops and regions.

**3) Competition minimizes the exploitation of small farmers.**

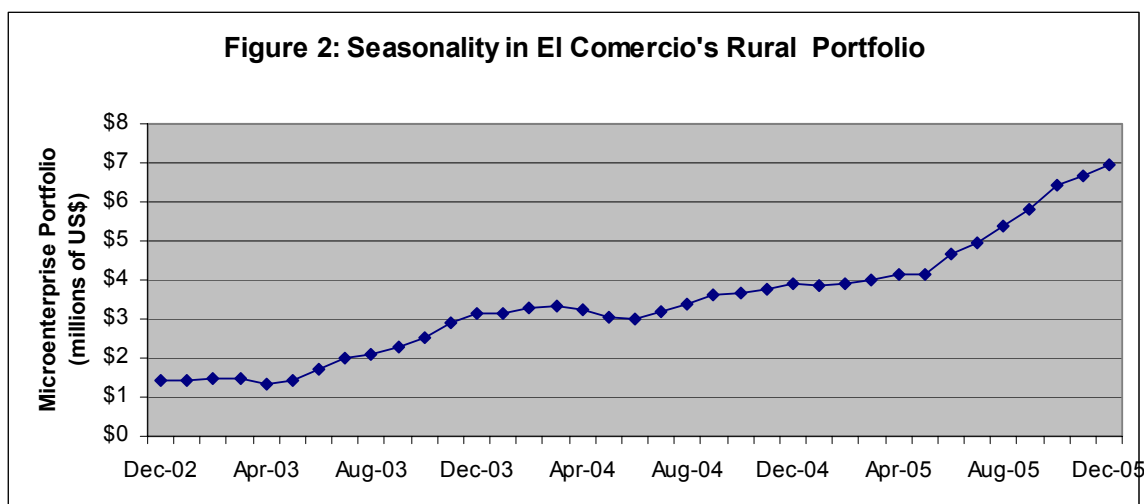
One of the key issues in this type of financing is the level of competition—does the farmer have a choice of where to sell his crop? If not, how does the farmer know he that is getting a good deal from the buyer? In the case of Paraguay, this type of exploitation is not a big issue for the following reasons.

- Paraguay has more than fifty silos that store soy, a healthy competitive market in which farmers can choose where to sell their crop under the best conditions. In some cases, the silo seeds its own fields, leading to more competition.
- Cooperatives and other farmers associations negotiate effectively with the silos to assist farmers. They use the market share they get from aggregating the crops from different farmers to achieve higher prices for buyers.
- Farmers are not forced to sell their entire crop to one silo. For example, if a farmer that has 15 hectares of land and has enough money to finance the farming of 10 hectares, he must only promise to sell the 5 hectares at a fixed price to the silo in exchange for seeds and fertilizer and has liberty to sell the remaining silo 10 hectares. However, the smaller the farmer, the more they need supply and harvesting services and the more indebted to the silo they are.
- The farmers in Paraguay have access to daily pricing of the soybeans, through cooperatives, suppliers or the Internet. Although the farmers may promise a portion of their future crop in exchange for inputs, they can make an educated decision about the projected price of the international market using the historical data on soybean prices that is available. Information about the production of other markets, storage conditions, and about innovations and harvest technology is also available via the Internet.

**4) The seasonality of crop production affects and its effect on the loan portfolio.**

The soy crop is a “summer crop” which implies a seasonal need for financing. Farmers receive loans during the period of the growing season. After the harvest is sold, there exists a period of inactivity (about 4-5 months) where the credit is not renewed and the portfolio size of this region drops. “Winter crops” that these farmers could produce, such as sunflower, corn and wheat are not in great demand, so farmers do not show much interest in borrowing for these crops. Although El Comercio’s loan offers encourage these farmers finance their other crops outside of the soy growing season, their portfolio levels never reach the level of the soy growing season.

Figure 2 shows the drops that occur in El Comercio’s rural portfolio after each May.



Another strategy El Comercio applies to minimize an excess of liquidity in its rural portfolio is to have multi-product loan officers, who offer different financial services and credit products to other rural borrowers that do not exclusively attend to small farmers.

Finally, El Comercio adjusted its incentive structure for loan officers and branch managers to minimize this winter drop in portfolio. Normally, loan officers are evaluated according to the following criteria: portfolio size, portfolio at risk, and number and amount of loans to new clients. For rural credit officers, the portfolio size criteria were eliminated, and their incentives are based on number of loans to new clients and the recovery rate of the loans. Portfolio size was removed, because agricultural credits that were authorized in August and repaid in April, which created a one-time short-term swelling of the portfolio. After the repayment is made, portfolio size is low, and delinquency is lower during this period.

**Other Ways to Finance Small Farmers**

El Comercio created a strategic alliance with Paraguayan silos so that it could finance small farmers. Similar mechanisms from other regions are discussed below.

**Equity Building Society and the Kenya Tea Development Agency**

Another example of farmers using agribusiness contracts to secure loans is provided by the Equity Building Society in Kenya (“Equity”). This microfinance institution developed two products for its agricultural customers: a crop advance loan and a farm input loan. The crop advance loan is based on expected farm production and enables farmers to get financing for expenses to invest in another enterprise before crop sales have been realized. The farm input loan can be used to purchase fertilizer, pesticide, farm labor, and other seasonal inputs. Farmers pay commercial interest rates. To mitigate risk, loans are made only to farmers who have agribusiness contracts and receive regular payments by produce processing and marketing companies.

For example, the Kenya Tea Development Agency (KTDA) processes, markets and sells tea on behalf of farmers, paying them a monthly advance over the course of the growing season, followed by an annual bonus based on actual proceeds of the processed tea sales. To be eligible for Equity loans, farmers open a savings account with Equity, to which KTDA transfers monthly

and bonus payments. Upon approval, Equity loan proceeds and automatic loan repayments are posted to this account, backed by the KTDA contractual payments.<sup>5</sup>

### **Warehouse Receipts in Bulgaria**

In Bulgaria, grain farmers use warehouse receipts from storage facilities as collateral for their loans from Bulgarian banks. The Bulgarian National Grain Service provides certification and inspection services that leave banks with the confidence that those warehouses meet the standards for safe and secure storage. Certified and inspected grain storage facilities issue warehouse receipts that are used to guarantee the quality and quantity of a crop. The farmer who has the receipt can use that receipt as a pledge to secure a loan from a bank or other financial institution. The financial institution places a lien on the commodity, so it can not be sold without the proceeds first being used to repay the outstanding loan. In five years of an operating system, banks have issued more than \$27 million in loans against receipts.<sup>6</sup>

ACDI/VOCA conducted training programs on the warehouse receipt system for more than 400 grain producers, processors, bankers and insurance companies. As in the case of El Comercio, the records maintained by warehouses help to build a third-party history of the performance of these producers. Similarly, banks do not have to carry out this screening process for potential customers, since the possession of a legitimate receipt serves that purpose.

### **Cooperative Warehouses and Ethiopian Farmers**

Another example of a financial institution forming an alliance with a storage facility to provide credit to small farmers occurs in Ethiopia. ACDI/VOCA program Agricultural Cooperatives in Ethiopia (ACE) convinced a commercial bank to provide credit to grain and coffee producers by creating a guarantee fund. USAID funds were used to guarantee half of the potential net losses, and the Bank of Abyssinia has made \$1.2 million available to cooperative warehouses that purchase grain from their member cooperatives for later sale. This enables the cooperatives to increase the volume of grain and coffee they could market, and increase the number of members to whom they offer financial and marketing services.<sup>7</sup> The farmers pay the cooperative a storage fee and the costs of an advanced loan payment.

## **VIII. Conclusions**

The financing of single-crop farmers requires specific conditions for a successful outcome, such as the existence of a strong value chain, a strategic alliance with an important member of the value chain, and favorable geographic, climate, and price conditions. When these conditions exist, the participation of the financial institution makes it possible for these small-scale single-crop farmers to enter the formal financial sector and access credit.

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<sup>5</sup> Douglas Pearce and Myka Reinsch, "Equity Building Society of Kenya Reaches Rural Markets." CGAP Agricultural Microfinance Case Study No. 4. August 2005.

<sup>6</sup> Fries, Robert and Banu Akin. "Value Chains and their Significance for Addressing the Rural Finance Challenge." Accelerated Microfinance Advancement Project (AMAP). December 2004

<sup>7</sup> <http://www.acdivoca.org/acdivoca/Acdiweb2.nsf/whatwedo/ethiopiaace?opendocument>

## Bibliography

Argentina Agriculture Secretariat, USDA Soybean Report. November 2005

Buchenau, Juan. 2003. “Innovative Products and Adaptations for Rural Finance.” Theme Paper presented at “Paving the Way Forward for Rural Finance, An International Conference on Best Practices,” Washington, DC, June 2–4, 2003.

Dorward, A. , J. Kydd, F. Lyon, N. Poole, C. Poulton, L. Smith and Michael Stockbridge. “Commercial Financing of Seasonal Input Use by Smallholders in Liberalised Agricultural Marketing Systems. Overseas Development Institute. 1998

Fries, Robert and Banu Akin. “Value Chains and their Significance for Addressing the Rural Finance Challenge.” Accelerated Microfinance Advancement Project (AMAP). December 2004

Ministerio de Agricultura del Paraguay: [www.mag.gov.py](http://www.mag.gov.py) Accessed March 2006.

Pearce, Douglas. “Buyer and Supplier Credit to Farmers: Do Donors have a Role to Play?” Rural Finance Innovation Case Study, CGAP. Land Tenure Center, University of Wisconsin. June 2003

RAFI (Rural and Agricultural Finance Initiative) Notes, “Value Chain Finance,” USAID, June 2005

The World Bank Group. “Paraguay Country Data.” The World Bank, 2004.

CAPECO (Camera paraguaya de exportadores de cereales y oleaginosas), “La Soja y sus tres pilares principales,” Artículo publicado en : [www.capeco.org.py](http://www.capeco.org.py) / Agricultura. 2001.

This report was written by Tiodita Mori Tuesta, Senior Director, International Operations and Bettina Wittlinger, Vice President and Project Manager at ACCION International. Both authors worked with El Comercio from 2003-2005. Elisabeth Rhyne and Rekha Reddy edited this article.

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