



Rabobank International

Insuring fair prices for farmers in developing countries

The prices of many agricultural products exported by the developing world are highly volatile, their fluctuation being dependant on a mixture of fundamental factors, such as supply and demand, and technical factors. If the growing season for coffee, for example, was particularly good in Brazil or Vietnam (the world's two largest coffee producers), coffee prices will be low, due to abundant supplies. When a frost damages coffee in Vietnam, chances are that the international price for coffee will go up, because supply will be lower than expected.

From a macro-perspective, this volatility can be devastating: more than 50 developing countries depend on three or fewer leading commodities (such as coffee, sugar cane, cotton, wheat, maize) for at least half their export earnings. The prices earned on international commodity markets therefore influence the government's fiscal revenue and public expenditure, its foreign reserves and its creditworthiness.

The same is true on a micro-level: volatility leaves a farmer uncertain about whether he will receive a high price or a low price for his crops at the end of the season. The problem is, however, not limited to how much cash a farmer receives for his harvest. Every investment decision a farmer makes during the crop cycle is a difficult one, since he doesn't know whether he will be able to pay back the loan for the investment (labor, fertilizer, equipment & repairs, etc.). Uncertain prices also create risks for banks that might lend to farmers. Often, they will raise interest rates to cover uncertain risks, or simply refuse to provide credit at all. As a result, it is not surprising that a lack of price risk management is one of the foremost reasons why poor farmers stay poor.

Price stabilization measures for farmers are not a new idea. Several non market-based mechanisms adopted in the 1970s were dropped soon after because they proved to be unsustainable and inequitable. Even though developing countries produce enormous volumes of commodities, they are not as active in price hedging as the developed world. In fact, developing countries account for only about 2% of the futures and options instruments traded worldwide. This is most likely due to a lack of capital, know-how and access to information.

The World Bank's International Task Force

To counter this problem, in 1999 the World Bank formed the International Task Force (ITF) to increase the use of commodity price risk insurance in developing countries. This partnership between private and public sector organizations explores new market-based approaches for assisting small-scale producers in developing countries to better manage their vulnerability to commodity price fluctuations. The World Bank is taking the lead in the development and implementation of this market-based approach. It is partially supported through contributions from donor countries (e.g. Switzerland contributed US\$2 million). Other stakeholders include farmer's organizations, commodity exchanges and companies, such as Rabobank, Marsh, ABN AMRO, Archer Daniels Midlands, Zurich Re and Credit Lyonnais.



The program delivers technical assistance to educate farmers on the design and implementation of price risk management programs and links providers of such services directly with the farmers' cooperatives. The preferred risk-hedging tool is a simple put option, which is a contract that gives the cooperative the right to sell its crop at a certain price, irrespective of the market price at that point. It thus sets a minimum price that farmers will receive.

The cooperative is very important in these transactions because it would be difficult for individual farmers to use commodity derivative markets directly. These markets are based on large volumes handled by exporters, large local traders, importers and large local processors -- for example, a London International Financial Futures and Options Exchange lot of coffee is five (5) tons. Unless farmers have large commercial farms, they lack the volume and do not have the resources necessary to access derivative markets. An average farmer in Uganda, for example, produces two and a half (2.5) tons of coffee on his five (5) acre lot per year.

The benefits go beyond better financial planning. Producers who buy price insurance are likely to benefit from improved access to credit, and better terms of credit as a result of reduced risk.

However, a price risk mechanism such as a put option does not address other risks that growers are exposed to, including disease, weather and quality.

Rabobank's Commodity Price Risk Management unit and the International Task Force

Rabobank is a leading Dutch financial institution whose roots lie in agriculture. What began at the end of the nineteenth century as a collection of small rural banks has grown into an extensive financial group with assets of US\$450 billion. The bank is particularly recognized for its expertise in the food and agribusiness sector, reflecting its roots as one of Europe's best-established cooperative organizations.

Rabobank's various units interact to varying degrees and levels with farmers and farming groups (e.g. cooperatives) in developing countries. Rabobank International, the corporate and investment banking arm of Rabobank, focuses on providing selected industry expertise and strong local knowledge to corporate and financial institutions. The Commodity Price Risk Management (CPRM) unit, a global unit with its trading center in London, provides customers with price risk management tools, including swaps and options for various commodities, including grains, cotton, sugar, cocoa, coffee and fertilizer.

The CPRM unit of Rabobank International has participated in several successful, innovative pilot transactions facilitated by the World Bank International Task Force in Commodity Price Risk Management.

In Uganda, Rabobank assisted a local East African business to be the first to use hedging as a tool to manage coffee price risk. This company purchased a small volume of price insurance for three primary producer societies producing coffee in Ishaka. It sold back the price insurance when it was no longer required. This initial small transaction benefited

Example:

A farmer's cooperative purchases a price insurance that allows it to sell its crop at 30 cents/pound (=strike price). The insurance premium is 4% of this strike price, 1.2 cents/pound. Suppose that by harvest time, the international market price of the commodity has fallen to 28 cents/pound or lower. Now, the insurance can be claimed. The cooperative will receive the agreed upon 30 cents/pound minus the insurance premium (1.2 cents/pound), equaling 28.8 cents/pound. The individual farmer knows that he will receive this amount as a minimum income and can therefore better plan his purchases and investments between the time he bought the insurance and the harvest.

What if the international market prices rise? Say, the prices increase to 35 cents/pound. The cooperative will fully benefit from these high prices. The only cost it incurs is the 1.2 cents/pound. So, in the end it receives 33.8 cents/pound.



about 450 Ugandan small coffee farmers. Further transactions occurred between December 2002 and February 2003.

In Tanzania, Rabobank worked with a large coffee cooperative. The cooperative purchased price insurance to manage its risk in October, November and December for the 2002/03 Arabica coffee selling season and sold back the insurance when physical sales contracts were committed. The hedging transactions by the Tanzanian cooperative were larger than the Ugandan transactions and benefited several thousand small coffee farmers.

Rabobank International's Commodity Price Risk Management group has worked closely with the World Bank's International Task Force advising coffee, cotton and cocoa clients in using exchange-based swaps as well as a series of unique made-to-order products, including cotton and fertilizer swaps. More transactions are in the pipeline.

Motivation for the International Task Force

A disconnect exists between growers in developing countries and the general derivatives markets available to developed countries. The ITF aims to "connect" the producers to tools that they have not been able to use before. Making derivative markets more accessible to smaller producers and the utilization of these tools will ultimately allow financial deepening to occur in the local communities. Allowing smaller commodity producers in developing countries to benefit from a reduction in the volatility of their earnings by using hedging tools based on derivative markets as a way of managing commodity risk decreases credit exposure, allows for credit expansion, and hence allows financial deepening.

Rabobank saw an opportunity in the ITF to support these initiatives. Originally, its involvement with the World Bank project was part of Rabobank's complex structured finance unit in Utrecht, the Netherlands. Now, it is part of the CPRM unit. The challenge is now to move into the next phase of the project. Rabobank did not expect these activities to be immediate money-makers, but engaged in them because they exemplify what the bank is all about: sustainable business. In the long term Rabobank believes that the initiative will be self-sustaining.

Actions

The CPRM unit is well positioned to provide its services to the cooperatives, as it is already providing similar services to all units down the commodity supply chain. The knowledge was pre-existing, but a new approach was required to make derivatives work for farmers in developing countries.

The CPRM unit interacts intermittently, at hedging times, with institutions in developing countries, but is by no means the only, or the most frequent, source of Rabobank contact: Rabo International Advisory Services (RIAS) provides consulting on establishing and restructuring agribusiness companies, as well as the provision of advice in establishing agricultural cooperatives; the Rabobank Foundation funds institutional development, loans for credit schemes, guarantees, and holdings in risk-bearing capital. The Foundation's funds are obtained partly from the local Rabobank branches, who allocate a percentage of their net profits to the Foundation, and partly from Rabobank Nederland, the central bank of the Rabobank Group, which doubles the contributions from the banks.

"Our involvement underlines our commitment to the international cooperative movement and our leading edge position in soft commodity risk management. Our experience and expertise enables us to respond quickly to clients who wish to participate in hedging their price risk. We see this area as one of considerable potential for primary producers where Rabobank can make a real contribution to helping smaller producers in developing countries manage their commodity price risk independently. They are then free to market their physical product knowing they have a floor price in place."
-- Nigel Scott, Global Head of Commodity Price Risk Management, Rabobank International

Source: extract from Rabobank Nederland Press Department

These funds enable the Foundation to support an average of 150 projects each year: fifty in the Netherlands and one hundred in over 40 countries spread throughout Africa, Asia, Latin America and Eastern Europe.

All possible interactions of Rabobank units with developing countries could look something like figure 1:

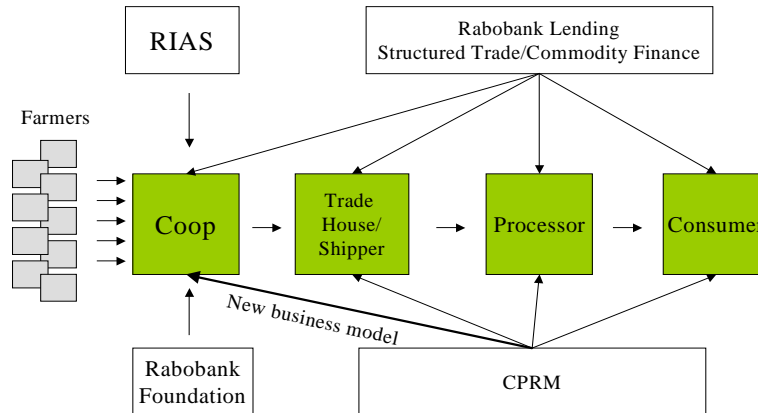


Figure 1

By applying an innovative business model, Rabobank can deliver derivatives to a sector that has never had access to them before. Before a transaction can take place, Rabobank needs to perform a variety of tasks: a) check the regulatory background in the respective country, b) get to know the client (farmer's cooperative) and check their capacity/ability of engaging in a transaction, c) advise the cooperative on risk management strategies. The World Bank provides assistance in this due diligence work.

Transactions

Actual completed transactions as of January 2003 include five for coffee in Nicaragua, Uganda and Tanzania, initially small in size but growing larger and with some repeats; transaction volumes range from 50-7,000 tons. The period of coverage ranged from one to six months consistent with physical transactions. Two hundred and fifty (250) farmers in Nicaragua, 450 in Uganda and a few thousand in Tanzania benefited from the scheme. All initial transactions were put options and premiums range from 2-9% of the strike price. Rabobank executed most of these ITF transactions. A positive side effect was that many thousands of African farmers, making up the membership of one specific large cooperative, saved half of their traditionally paid lending fee of 18%. A major result of hedging was that local banks extended credit to counterparts they had refused before.

There is great potential for a global business reaching the millions of farmers that export commodities. What would it take to turn this into a profitable business – at scale? Take the Uganda example: Rabobank helped 450 farmers each producing on average 2,500 kg of coffee per year; therefore the total transaction amount is about 1.13 million kg. With total coffee production in Uganda in 2002 at 3.1 million kg (source ICO), there is clearly room for growing the derivatives business.

About the WBCSD

The World Business Council for Sustainable Development (WBCSD) is a coalition of 175 international companies united by a shared commitment to sustainable development via the three pillars of economic growth, ecological balance and social progress. Our members are drawn from more than 35 countries and 20 major industrial sectors. We also benefit from a Global Network of 40 national and regional business councils and partner organizations involving more than 1,000 business leaders globally.