ASSESSING AND MANAGING RISK

SHARED RISKS ENHANCE THE VALUE CHAIN MODEL

Partnering with a significant member of a targeted agriculture value chain provides reach and defrays costs but also demands rigorous risk evaluation and monitoring, not only of the partner firm, but of specific, identifiable risks across the value chain itself.

Quick jump for topics

INTRODUCTION

This step considers how credit assessment and risk management change when using a VCF approach, with the emphasis shifting from the individual farmer to the lead firm. In addition to evaluating the financial health of the firm,

banks need to assess the firm's relationship and capacity to manage collection and distribution functions within the chain. Differences between standalone loans and those in a VCF model are considered.

ASSESSING CREDITWORTHINESS

The emphasis in risk management using a value chain approach shifts from the individual smallholder farmer to the lead firm – usually an aggregator – who is the bank's entry point to the value chain and who might serve as the bank's commission agent in selecting and servicing farmer borrowers.

The first step in risk management is determining that financing is going to creditworthy parties within the value chain. Three criteria are crucial in determining creditworthiness in the value chain:

- The first is that the lending decision is based on how the borrower relates to the sector's or industry's key success factors reviewed earlier in Step 2.
- The second is that the loan reflects value chain participants' business needs. Among the more common purposes are: a) capacity expansion; b) crop finance; c) support for growth of working capital; d) equipment finance; e) inventory finance; and f) to move supplier advances/loans transactions off the balance sheet. For example, the loan product might be targeted to market-oriented farmers who are eager to improve productivity through better quality animals or more profitable crops.
- The third factor that must be considered is the lead player's cash flow to ensure that the client has the ability to repay the financing.

In the following example, see how HDFC Bank's lending requirements change when moving to VCF arrangements:

Credit Proposal of VCF

The actors in a VC

Company (processor)	Aggregator	Farmer

Can be financed by a bank on a standalone basis

Company (processor)	Aggregator	Farmer
Standard Financial Analysis for Corporate Lending	• Cash Rich ones use bank credit for money lending activities • Other aggregations are generally not eligible for bank credit	Mortgaged / Collateral based standalone credit

Or financed under VCF arrangements

Company (processor)	Aggregator	Farmer
1. Standard Financial Analysis 2. VC Process Evaluation	1. Working capital lines basis VC cash flows & VC Contract 2. Convert to Bank service providers, loan origination and collection agents, First-loss guarantee (replace money lending activity)	1. Evaluate cash flows 2. Contract with aggregator 3. Crop / Produce knowledge 4. Support system (VC Process)

Source: HDFC Bank, India

AGGREGATOR RISK

Due to the importance of the aggregator (particularly when it assumes the role of commission agent or business correspondent), banks need to conduct thorough due diligence of these actors. There are a number of criteria commonly used for selection:

- **Process Management.** Evaluation of the systems and the process that the aggregator has in place for interaction with farmers and other downstream value chain participants, both formal and informal.

- **Credit management experience.** Given that the aggregator performs a number of the credit process functions, it is important that the company has had experience and success in such work.
- **Data quality.** The aggregator should have accurate farm-related information that is available, verifiable, and reliable.
- **Dependence within the chain.** The aggregator should not be overly dependent on other participants within the value chain and should use internal mitigation strategies.
- **Financial strength.** A review should include the aggregator's financial situation, particularly if the company provides a first-loss guarantee or acts as a aggregator.
- **Farm-level losses.** Important for measuring the risk related to the primary production process, for identifying risk-mitigating strategies and for determining the products and costs for mitigating risks.
- **Contracts.** Establish whether formal contracts exist between the aggregator and the farmers and if they are enforceable.
- **Reputation.** The aggregator must be held in high regard in the value chain, given the bank assumes the reputation risk of its associated agents.

MARKET RISK

Market risks can be moderated when working with a leading firm that is able to transmit market signals along the value chain; this serves to ensure that the financial services reflect and meet market demand. In some of cases, the aggregator provides technical support to small producers, which can be crucial to mitigating risk and aiding in the success of the value chain proposition.

In the Pakistan milk value chain, the technical assistance role is an integral part of the structure. Personnel of the milk collecting/processing company will provide advice on feeding practices, vaccination and deworming, and general management of the more demanding animals. At the same time, the processor would be involved in selection and purchase of the animals.

FUNDAMENTAL DIFFERENCES : STANDALONE V/S VCF CREDIT

Open Market (Standalone)	VCF
Collateral Based Focus on perfecting the collateral process • Cash flows & incomes are assumed basis an applied formula for crop & cost • Loan amount limited by value of collateral	**Information Based** • Cash flows visible through the payment systems • Detailed knowledge of the crop and farmers available through the VC partners
Limited Supervision & Monitoring • Density of HNW farmers ranges from 2 to 4 per village • Sales manager covers 75 to 100 farmers • Spread across 50-60 villages in a radius of 50km from the base branch • Monitoring is done once per crop cycle • Cost constraints reduce the frequency of supervision	**Multilevel Supervision & Monitoring** • VC partners monitor the crop at each stage • Bank Business Correspondent (BC) in village are in regular touch • Bank officials can visit more often due to the economic density created • 1 executive covers 3 BCs each, managing 3-4 villages of 15-25 farmers each • Daily / weekly - high frequency monitoring
Impact of credit on production volumes are not easily measurable. Possibilities of misuse of credit by large borrowers	There is a measurable impact on production through cash flows.

A KEY AGGREGATOR RISK : SIDE SELLING

A Key Aggregator Risk : Side Selling

Causes and effects of side selling for a bank

- Side selling risk at the farm level is limited to aggregators poaching associated producers
- Opportunistic aggregators may side sell part of the contracted produce at better prices
- Payments received from the aggregator in individual farmers accounts may not cover the loan servicing requirements

Mitigating side selling risks using first loss deficiency guarantees

- Aggregator takes a stake in the loan transaction and covers delinquency up to 10%; any loss beyond 10% is borne by the bank
- The aggregator provides the bank with collateral upfront matching the 10 % guarantee
- Aggregator negotiates an income sharing arrangement, becoming a loan collection and servicing agent

Arriving at a first loss deficiency guarantee and income sharing

- Based on the expected delinquency of the portfolio
- Aggregator is remunerated to provide incentive
- Evaluation of the product quality and side selling possibility
- Reviewed annually based on quality of the portfolio and reduced through increased lending

Aggregator also acts as business correspondent in the payment system

- First loss deficiency guarantee also covers the operating risk of the aggregator as business correspondent

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