

Agricultural Value Chain Finance in Indonesia

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Introduction

Smallholder farmers in developing countries face substantial constraints that limit their ability to reach their production potential. Two constraints—risk exposure and limited access to liquidity—pose particular challenges. Smallholders face a wide variety of risks that constrain both the choices they can make and their willingness to make investments. Limited availability of affordable credit, borrowing and saving products poorly aligned with the needs of the agriculture sector, and prohibitive borrowing eligibility requirements all impede farmers' access to the liquidity necessary for investing in new, more profitable crops and technologies (International Finance Corporation, 2014). Observers have noted that a large share of long-term credit needs is not being met in Southeast Asia, despite its location near some of the world's largest consumer markets (Shakhovskoy & Wendle, 2013). While existing financial services may be suitable for some farmers, not all farmers have access to finance.

The Inclusive Agricultural Value Chain Finance project is working to understand potential models for improving access to agricultural value chain finance among disadvantaged groups in three countries in Southeast Asia: Indonesia, Myanmar, and Viet Nam. "Agricultural Value Chain Financing" refers to formal financing that links at least three value chain participants: a financial institution, an end borrower, and at least one other facilitator or beneficiary. The third party is also a value chain participant and can either be directly or indirectly involved in providing finance to the end borrower. Direct involvement could involve taking on formal loans to provide informal trade credit financing upstream or downstream in the value chain, or purchasing a wholesale insurance product, while indirect involvement could include providing information, a guarantee, facilitation of loan collection, in-kind distribution of inputs, or some other support that reduces the risk of lending to specific end borrowers.

This report describes the present state of agricultural value chain finance in Indonesia and suggests policies that could help expand its availability where formal financial services have been unable to meet value chain actors' needs. We first consider the features of a policy environment needed for agricultural value chain finance to flourish. Key points related to the policy environment are:

- Allow interest rates for loans from the formal sector to be priced by the market;
- Support secure, inclusive payment systems and transaction frameworks;
- Develop a legal framework that supports both the use of movable collateral in loans and a warehouse receipts system;
- Develop a legal and/or regulatory framework that supports contract farming among smallholders;
- And allow for a more open, technology-driven financial architecture that facilitates market entry among nontraditional financial service providers.

These broad policy goals can help increase credit supply while reducing barriers for potential entrants, creating an environment for more accessible agricultural value chain finance. Where new types of providers can enter credit markets, current providers begin to face competition and, in general, services around credit should improve. To ensure that relatively marginalized farmers are not excluded from agricultural value chain finance, it is important to ensure that systems must allow for assets other than land to be used as collateral, and policymakers should not neglect savings and insurance. The first section of the report considers how agricultural value chain finance products can be designed for growth and inclusion in general, before turning to Indonesia in the remainder. Throughout, we provide examples and lessons from different value chains that could lend insights for other value chains.

Indonesia Country Situation

Since the Asian Financial Crisis, Indonesia's economy has steadily grown to become the world's 7th largest economy in purchasing power parity terms. Similar to other growing economies, agricultural growth has lagged overall economic growth and agriculture's share in employment has declined. Nonetheless, the poor and vulnerable remain disproportionately rural, and its large and growing domestic urban markets imply that there are substantial and growing opportunities for high value agricultural production.

As in much of Asia, rice is Indonesia's most important commodity, and Indonesia follows policies attempting to ensure that domestic supply can meet domestic demand. Broadly, Indonesia's policy targets value chains to improve food security and enhance domestic production. The report demonstrates that food crops (e.g. wheat, rice, maize), horticultural crops, and livestock tend to be imported, while estate crops (e.g. palm oil, coffee, rubber) make up the bulk of Indonesia's agricultural exports. It stands to reason that as incomes are rising, there will be increasing opportunities to further develop horticultural crops and livestock, as higher value products, among smallholders for the domestic market.

Agricultural finance in Indonesia is largely available from two sources. First, the formal or commercial banking sector provides a portion of agricultural finance. The banking sector is dominated by four main banks, three of which are state owned, which hold 48 percent of all assets. The *Bank Rakyat Indonesia* (BRI) is most active in the agricultural sector, primarily because it issues most *Kredit Usaha Rakyat* (KUR) loans, which carry a fixed annual interest rate of 6 percent, and are subsidized by the government. KUR loans below 50 million rupiah (about US\$3500) do not require collateral, and 28 percent of all KUR loans go to agriculture. Nonetheless, a substantial share of Indonesians (66 percent) remain unbanked, with a larger share of the unbanked residing in rural areas.

A second main source of agricultural finance in Indonesia is through cooperatives. In 2019, there were over 123,000 cooperatives operating with over 22 million members; they hold assets of 70 trillion rupiah in total (about US\$5 billion). There are two types of cooperatives in Indonesia: Multi-Business Cooperatives (*Koperasi Serba Usaha*) and Savings and Loans Cooperatives (*Koperasi Simpan Pinjam*). Many such cooperatives are located in rural areas and provide relatively substantial lending to agriculture.

Recently, information and communication technologies (ICT) have begun to play a major role in Indonesia's growth; over the past five years, the domestically led ICT sector has grown at 9 percent per year, much faster than the national economy. Digital financial services are growing rapidly; however, total asset holdings in 2019 were still only 5 trillion rupiah (\$352 million). The formal banking sector and cooperatives therefore remain the largest sources of finance for agricultural investments. Agricultural insurance operates as a government program, and it is considered promising. It has been introduced using subsidized premiums for rice and cattle, and the program is presently being expanded to include other strategic crops/commodities, including shallots, corn, and goats and sheep. Recently, a similar insurance pilot, without a premium subsidy, is being bundled with credit by the private sector for corn in limited areas.

Given rapid growth and urbanization in Indonesia, there are many opportunities to increase production of high value foods for urban markets in the near future. Still, the transformation of agriculture toward more high-value commodity production requires a significant investment in agricultural supply channels; close linkages among farmers, processors, traders, and retailers; and a customer-centric outlook. Increased adoption of suitable AVCF models could be an important factor in this transformation.

Indonesian Policy Context for Agricultural Value Chains

Indonesian policy relating to agricultural value chains comes from a number of different ministries and regulatory bodies. The most important policies related to agricultural value chain finance include financial policy, agricultural policy, and trade and industrial policy.

Other than the Bank of Indonesia, the most important financial regulatory body is the Financial Services Authority, or the *Otoritas Jasa Keuangan* (OJK). The OJK regulates banks, non-bank financial institutions, and technology firms that are now beginning to provide agricultural finance. Cooperatives fall instead under the Ministry of Cooperatives and Small and Medium Enterprises for regulation, which has similar requirements as OJK for collateral on loans.

Despite fixed interest rates for subsidized loans, many of the basic requirements for successful agricultural value chain finance policy listed above already exist in Indonesia. Specifically, regulation through the OJK supports inclusive payment systems and digital transactions, which can facilitate those payments. Collateral is not required by regulation on the smallest type of KUR loans, and warehouse receipts regulation exists. And contract farming is a type of partnership regulated by Law No. 20/2008 on Micro, Small, Medium sized Business (UMKM). So while conditions for AVCF to flourish exist, there are only a few examples of it so far. Further, lenders still typically ask for collateral, and there are only few instances of warehouse receipts being used as collateral.

Agricultural policy related to value chains in Indonesia places primary focus on strategic commodities. Many of these commodities relate to Indonesia's agricultural trade, either in terms of primary imports (e.g. rice, maize, soybeans, cattle) or exports (e.g. palm oil). From an import perspective, this concentration takes the form of input subsidies, development of improved irrigation infrastructure, or provision of pre- and post-harvest machinery. Given a challenging trade environment, in particular for soybeans, these policies may lead Indonesia away from comparative advantages instead of towards them.

Indonesia's long standing fertilizer subsidy has also likely influenced farmers' production choices. Since 1971, Indonesia has targeted fertilizer subsidies towards farmers with 2 hectares or less of land; subsidized fertilizer is produced by state owned firms. While the goal is to increase rice production and food security among targeted farms, there is likely some leakage to plantations.

Finally, trade policy can affect value chain opportunities. For example, in the rice sector the Indonesian logistics agency, BULOG, imports rice based on the GOI assignment when domestic rice production is deemed insufficient to meet local demand; it also buys rice from producers according to official floor price called as Government Purchase Price or *Harga Pembelian Pemerintah* (HPP), though it does not buy a large portion of any specific harvest. Export policies also affect the functioning of palm oil markets; levies have been placed in the past on crude palm oil, which incentivizes domestic refining. When these levies are reduced, domestic refineries experience a reduction in business. A more recent policy, going beyond trade, has increased requirements for biological sources in diesel fuel from 20 percent to 30 percent; this demand is also largely met through refined palm oil.

Opportunities for Agricultural Value Chain Finance in Indonesia

AVCF projects or opportunities must work from within the institutional context of rural finance in Indonesia. There are two main types of finance that presently exist. First, subsidized KUR loans are available for agriculture, and they are clearly desirable as a first resort to farmers who can obtain them, due to the low interest rate. Second, financial cooperatives that exist provide a second avenue for rural lending, including agriculture. For AVCF to succeed, then, it must work either with KUR loans or within rural financial cooperatives, or find a third way with the understanding that farmers might prefer to obtain loans through either the KUR or cooperatives, due to favorable terms.

Our analysis demonstrates that several commodities that are promoted by the government (rice, maize, beef) seem ripe for value chain finance opportunities. Maize and beef were rated highest as they have especially strong growth opportunities. Fruit value chains also scored highly, suggesting that they also represent high potential for farmers to link to growing value chains for higher value products.

In particular for high value crops, Indonesia appears nearly ready for the rapid digitization of the agricultural value chain. With increasing digitization, financial flows can be matched with data flows in a process of value co-creation for all actors along the value chain, which facilitates AVCF by reducing transaction costs and uncertainty. Data can feasibly be captured from all actors in the value chain to not only streamline and create efficiencies but to create opportunities for enhanced financial flows and a shared understanding of production, processing, distribution, and consumption.

Key Policy Recommendations for Indonesia

For agricultural value chain finance to progress in Indonesia, we find two types of policy changes could be helpful. We consider both financial policies and agricultural policies that can help foster an environment for agricultural value chain finance to help meet unmet demand for agricultural finance more generally. Our recommendations are as follows:

Financial Policies

- ▶ **Consider flexibility in KUR loan terms.** Under the assumption that KUR loans are a pillar of small enterprise policy, more flexibility could allow growth in agricultural lending. For example, allowing alternative sources of collateral could be used to expand the maximum size of micro KUR loans without explicitly requiring collateral.
- ▶ **Catalyze the use of alternative forms of collateral** Regulation allows for alternative forms of collateral in Indonesia, but it is infrequently used at present. From an AVCF perspective, alternative

forms of collateral can help catalyze lending as it reduces the transaction costs to smallholder lending. Research through pilot projects could help build an understanding of the constraints against using alternative sources of collateral, which could lead to revised regulations to catalyze their use.

Agricultural Policies

- ▶ **Consider a gradual reduction of fertilizer subsidies** Fertilizer subsidies distort incentives for producers, which can change choices about what commodities to grow. Since the fertilizer subsidy has been a long-standing policy, a gradual reduction would reduce adjustment costs among farmers and input kiosks as they find more profitable opportunities with a different product mix. A subsidy reduction would also provide budget flexibility for the Ministry of Agriculture with which to pursue other policy priorities and would allow the Ministry to study the net benefits to fertilizer subsidy reduction (and stop it if negative effects outweigh the positives). Currently, the Government of Indonesia is trying to apply indirect subsidies to farmers using farmer ID cards for more effective distribution of subsidized fertilizer. In the future it is possible to adopt the cards for direct subsidies to farmers.
- ▶ **Support crops with comparative advantage** Agricultural trade allows countries to specialize in products for which they have comparative advantage. The goal of “food sovereignty” can work against comparative advantage by promoting products that are targeted to attempt to reduce imports. A better goal for support, through agricultural research and potentially through development of value chains, would be crops for which Indonesia has a comparative advantage. Given the rainfall, rich soil, varied topography, and varied climates, fruits, vegetables and spices or more specific examples of each are more likely to have comparative advantages on the world market.
- ▶ **Continue work on agricultural insurance** Agricultural insurance can be an effective tool to encourage investments that are viewed as risky by smallholder farmers but have high returns. Providing insurance linked to both global climate change and weather conditions reduces risks for farmers and allows them to make profitable investments. Indonesia’s government has piloted insurance schemes on rice and beef insurance and further pilots on other strategic commodities could help develop mutually advantageous products.

REFERENCES

International Finance Corporation. (2014). *Access to Finance for Smallholder Farmers*. Washington DC: International Finance Corporation.

Shakhovskoy, M., & Wendle, J. (2013). *Inflection Point: Unlocking growth in the era of farmer finance*. The Initiative for Smallholder Finance.

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