

# Public-Private Cooperation in Agro-industrial Development

Cooperation between the public and the private sectors is increasingly being heralded as the “way forward” to promote agro-industrial development. There is an expanding body of literature dealing with private sector involvement in agro-industry investment, rural infrastructure and the provision of support services. In particular, considerable experiences have been gained of public-private sector partnership models for infrastructure development. However, the opportunities offered by closer collaboration between the public and private sectors to promote agro-industrialization have not been sufficiently addressed. Building on the existing literature on privatization, public-private cooperation and public-private partnerships in particular, this paper provides an overview of ongoing activities in these areas to promote agro-industrial development. The paper identifies ‘good practices’ and challenges and provides recommendations to assist policy-makers in developing agro-industries. The subject of public-private cooperation is viewed more broadly than conventional public-private partnership arrangements by also covering cooperation with the private sector in setting policy frameworks, creating a conducive regulatory environment and developing value chains. Public-private partnership models are also included in the paper and regarded as a suitable approach to build up much-needed capital for investments for vital infrastructure and services in developing countries. Agro-industries, as other economic sectors, can only be competitive and thrive when supported by a conducive enabling environment.

## INTRODUCTION

Public-private cooperation (PPC) can be defined as any form of formal or informal cooperation between the public and private sectors in the provision of public services. This might include setting a conducive policy framework and regulatory environment, developing value chains, mobilising finance for infrastructure investments, providing effective mechanisms of service delivery, and undertaking research. Some of the more formalized mechanisms of partnership include issuing service and management contracts, leasing land or other assets, concessional use of public assets, licensed user rights, authorization for carrying out regulated activities and outsourcing or franchising.

## ‘GOOD PRACTICES’ OF PUBLIC-PRIVATE COOPERATION

Methods of collaboration between the public and private sector for agro-industrial development are varied. Drawing from case studies of agro-industrial development promotion, a number of distinctive PPC modalities have been identified and characterized with relation to their specific objectives. These are discussed below.

### Research:

Returns from agricultural research in agri-business are often high, indicating the large potential payoffs in terms of added value. The public sector, however, continues to have an important role in focusing on basic research and in the development of prototype technologies. This category of research tends to be unappealing to the private sector and has faced difficulties in attracting private funds.

The Sustainable Agriculture Initiative Platform (SAI), comprises multinational food companies that develop and promote best agricultural practices for high value crops (e.g. coffee, fruits, vegetables and dairy). Member companies operating worldwide, such as Groupe Danone, Nestlé, Unilever, Coca-Cola, Kraft, and McDonald’s, have formed the SAI Platform, which has become a leading food industry and trade competence centre for the sustainable production of agricultural products.

Besides investing in research, the public sector has other roles: (i) establishing intellectual property rights over the results of research; and (ii) initiating and encouraging public-private cooperation as collaborative endeavours in performing agricultural research, funding and managing that research. While the potential for collaboration exists, there have been obstacles in finding effective ways for its operationalization. The common questions posed are: who should take the lead and how should collaborative funding arrangements be made? Competitive funds have been used in some situations to help mobilise the necessary resources. The challenge is to identify the minimum set of conditions that must be met in order to establish effective and equitable partnerships.

### Advisory services:

The privatization of agricultural extension services is occurring rapidly in developing countries through private business ventures and non-governmental agencies operating independently of the national public service. This shift in approach is encapsulated by the development of Business Development Services (BDS). The readjustment of extension services is a classic case of public-private sector co-operation. In Latin America, in particular, the private and non-governmental sectors have been actively brought in by governments as alternative service providers.

The provision of advisory services can be disaggregated into three components: financing of the service, its delivery and its assurance and regulation. Any aspect of these components can be provided through the public sector. The degree of privatization of each component is likely to differ depending on circumstances. For example, government might decide to regulate some of the services that farmers finance themselves. At the same time, farmers may decide that the production of the service would be most effectively conducted by the private sector under contract.

Nevertheless, there is a very real role for the public sector to provide a public good for the poorer and more vulnerable populations living in remote and marginal areas. Extension programmes with welfare goals are always likely to require public funding.

### Transportation, storage and irrigation:

There is broad recognition that rural infrastructure development cannot be seen as solely a responsibility of governments. Whilst the public sector has increasingly withdrawn from the construction, management and financing of rural infrastructure works, the private sector has been slow to step in. Due to the lower return on investment in rural areas compared to urban and peri-urban areas, the private sector has not responded effectively to the needs of farmers, rural entrepreneurs and rural communities. The World Bank has indicated that over the last fifteen years there has been a general underinvestment in infrastructure in many developing countries and in particular in the rural areas, by both the public and private sectors.

The challenge of ensuring greater access to infrastructure also requires that the public sector collaborates with the private sector in a way that encourages investment and effective ways of constructing, managing and maintaining infrastructural works. However, governments have faced the problem of an absence of technical guidance, planning, management skills and financing mechanisms to adequately promote and scale up infrastructure development in rural areas.

In some situations governments have pulled back entirely from infrastructure development in rural areas, whilst in others 'innovative' forms of public-private cooperation have evolved, albeit with varying degrees of success. These involve both formal and informal partnerships between donors, government (central and local), the private sector (formal and informal) and local communities.

An approach now being followed is to bundle together interlocking productive agricultural infrastructure, including roads, markets, collection points and storage, in a way that improves the commercial attractiveness and "bankability" of projects. 'Bundling' enables a public-private partnership project to reach a size that renders it of interest to both equity investors and commercial lenders and offers multiple sources of revenue that helps mitigate volatility in demand risk and (in some cases) generates tax revenues that can be recycled to support construction and maintenance.

### Agro-processing:

Agro-processing facilities are often viewed as essentially business-to-business private operations. Situations where farmers are able to raise their own capital to finance new or expanded agro-processing infrastructure are limited to all but the most commercial of farms. This constraint is compounded where the proposed facility depends on a single commodity, which is grown by small-scale farmers and which carries high levels of production risk. The public sector can contribute to private sector investment by providing land through concessions and capital grants. The expectation under such arrangements is that farmers and/or private interests assume the main commercial risks.

In India, food processing training centres are seen to be the key to the rapid growth of agrifood processing and value adding industries. With a view to extending the spread of food processing units in remote areas closer to the raw material sources there is a need to develop entrepreneurship in such areas for production, packaging, and marketing of processed food products.

Government has provided assistance for setting up 335 Food Processing Training Centres, in the form of grant aid. More than 18,000 trainees are estimated to have received training in these centres. Many of the trainees have set up processing units in the small-scale sector.

Another area of PPC in the agro-processing sector is the use of biotechnologies to utilise waste and residues for energy production. Some selected agro-industrial plants and also farms are able to generate energy for their internal use and also supply the public grid.

### Dairy waste to renewable energy in Oregon

A new initiative from Energy Trust of Oregon could enable the state's 320 dairy farms to become generators of renewable power for local utilities. Dairy farms that install anaerobic digesters can receive cash incentives to turn manure into biogas and generate green electricity.

The Dairy Power Initiative is sponsored by Energy Trust and managed cooperatively by Oregon Dairy Farmers Association (ODFA) and Oregon State University's (OSU) Animal Sciences Department. ODFA and OSU representatives are working directly with dairy farmers to help them understand and design successful projects. Energy Trust of Oregon, Inc., is a nonprofit organization dedicated to changing how people use energy by promoting energy efficiency and clean renewable energy.

### Market information:

Because of the fragmentation of local and regional markets and insufficient access to information and other support services, rural entrepreneurs often have only limited access to local, regional, national and international markets. They need opportunities to compete in a wider range of markets and such access can be improved by providing them with market information. With regard to information for farmers the question often posed is who should be responsible for the provision of market information; the private or public sector? Efforts have been made to bring the private sector into public market information services through, for example, sponsorship of radio

broadcasts or bulletins. Although it seems possible for private businesses to take over national market information services (MIS), it is not too clear how this could be financed and how small farmers would be able to meet the commercial cost. The difficulty is to provide a system that would directly benefit the target information users and be economically viable and self-sustaining. The division of responsibility between the private and public sectors needs to be weighed carefully and factored into expectations of future information services.

## BUILDING BLOCKS OF PUBLIC-PRIVATE COLLABORATION

Planning the role for public-private cooperation in the construction, operation or maintenance of infrastructure for agro-industry development needs to consider the likelihood that these arrangements will deliver improved outcomes, which should be aligned with a government's intended growth strategy for the agricultural sector. To this end, it is argued that better use should be made of value chain analysis that identifies major constraints and opportunities, whilst assessing the combined affect of bundles of investments with respect to different locations, technologies, scale, sequencing, co-ordination, etc. – and identifying the best fit for the private sector in financing, construction, operation and/or maintenance.

Ways need to be developed to attract private investment in agro-industry development. In this respect public subsidies and other incentives may be required to ensure commercial viability and attract the private sector into high-risk agro-industry initiatives. Agro-industrial developments that are dependent on agricultural production to recover capital and operational costs can improve their 'bankability' if provided with public support. Without financial incentives, projects subject to the type of risk that are typical of agro-industries may not be in a position to service the resulting credit terms, and under such circumstances would fail to command a competitive return for investors. Such financial incentives can be supported from public investment budgets, from profits of urban-based concession agreements, or can be provided by donors. Capital and consumption-based financial incentives, along with credit risk and demand risk guarantees, can be designed to ensure that a project augments its financial viability.

Another important building block is the regulatory framework. Whereas most government-funded infrastructure is considered as a *public good*, its focus on agricultural industrialization invariably targets a discrete sub-section of the population: producers, traders and processors. Introducing private finance could restrict the range of beneficiaries, with the service accessible only to that portion of the agricultural value chain able to pay user fees or tariffs sufficient to service the debt of the private party. The argument posited here is the need for the private sector to operate within a suitable regulatory environment that counters exclusionary pressures and protects the wider public interest. This could be achieved through performance-based contracts carrying a universal, or near universal, service obligation.

Finally, farmer groups, local organizations of farmers and entrepreneurs and higher-level or apex associations are building blocks for access to financial and non-financial services as well as the formation of linkages between rural entrepreneurs and other agribusiness entities. The promotion of producer associations, chambers of agriculture and clusters can be an effective and efficient way to leverage support to develop high-opportunity sub-sectors. Successful organizations have potential to become self-supporting, whilst providing economies of scale to their members and reduced transaction costs for service delivery. In addition, they enhance the negotiating position of small producers within competitive value chains.

In Ghana and Uganda commercially funded radio programs provide market updates and advice on business issues raised by the audience (SMEs, farmers, fishermen). Media research companies and commercial advertisers sponsor the programs which are aired in vernacular languages.

TradeNet, based in Ghana, was set up by a public-private partnership and serves as a trading platform for 400 markets across West Africa. Sellers and buyers get in contact via internet and short message service (SMS) alerts.

### Finance:

Lack of access to financing is widely believed to be the greatest initial constraint to business formation and expansion for all but the largest agribusiness firms. Good financial services are lacking for agriculture and agribusiness and these must largely be provided by private institutions. However, the public sector should put in place the supportive infrastructure and environment for the private sector to function.

Equity finance and venture capital can be used to capitalise agribusiness companies in developing countries. Although there is a renewed interest in using these modalities for the financing of agribusiness within and outside the agricultural sector, there are a number of factors that limit the ability of equity funds to invest their available resources. These include entrepreneurs' lack of familiarity and comfort with venture capital, inadequate record keeping practices, the unavailability of exit mechanisms, and government rules relating to client size, business sector, or owner nationality.

Due to lack of funds or insufficient capacity to handle large numbers of smallholder accounts, financial institutions often participate within tripartite arrangements (bank, farmer, agribusiness venture). There is some potential to further support such arrangements. Key to success is then the design of a strategic partnership that distributes risks and costs in a fair proportion amongst the partners and creates a system of checks and balances that does not result in excessive transaction costs.

In Kenya, mobile phone banking has shifted the barrier that prevented un-banked, rural people from accessing financial services. The connectivity of retail financial institutions with mobile phone services seems to be a cost-effective way of conducting financial transactions, such as taking out loans and transferring cash. This commercial mobile platform has been developed by the Vodafone Company in partnership with a Kenyan phone operator, and initially supported by a one-off grant by DFID. To catalyse the financial sector, public support is required to provide an effective regulation for this new market segment of m-banking and m-payments.

[www.dfid.gov.uk/news/files/mobile\\_e-banking.asp](http://www.dfid.gov.uk/news/files/mobile_e-banking.asp)

## CONCLUSIONS AND RECOMMENDATIONS

Despite potential problems and complexities, public-private partnerships that are carefully planned can help to generate additional income in rural areas by establishing the enabling framework for SME development and linking businesses to national and international markets. In this way, PPCs have the potential to accelerate the process of agro-industrialization. It has been shown that various forms of public-private partnerships are valuable instruments for leveraging the resources of both the public and the private sectors and of enhancing their capacities and capabilities; a way for national and local governments to achieve their development goals. The task for the public sector is to take these lessons into account and consider how best to attract private parties to help bridge the infrastructure and support service deficit in agro-industry supply chains. In this way public investment budgets and regulatory reforms can be directed towards optimising the role of the private sector. Towards this end, donors and multilateral organizations also have a role by raising awareness and promoting PPCs as a workable mechanism for agro-industrial development.

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### Useful Web sites

The World Bank:  
[www.worldbank.org](http://www.worldbank.org)

Overseas Development Institute:  
<http://www.odi.org.uk/iedg/index.html>

German Technical Cooperation Agency:  
[www.gtz.org](http://www.gtz.org)

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