

## SECTOR ASSESSMENT (SUMMARY): INDUSTRY AND TRADE<sup>1</sup>

1. This sector assessment summarizes the sanitary and phytosanitary (SPS) context and major issues, challenges, and their implications for developing agriculture, food, and forestry (AFF) trade and managing human, plant, and animal health in the Lao People’s Democratic Republic (Lao PDR), including government strategies, lessons learned, and design considerations. The performance of SPS systems contributes to sector outcomes in relation to (i) agriculture and natural resources (the source of AFF products, as both exports and imports); (ii) trade and industry (especially for a wide range of processed food products, and in tourism enterprises); and (iii) health (particularly in relation to the consequences of food safety management deficiencies).

### A. Sector performance, problems and opportunities

2. The Lao PDR economy averages annual economic growth of 7% per annum, driven primarily by increases in electricity and mining production. Total exports have increased 135% from 2010 to 2015 to \$3.81 billion, with nonagricultural exports such as electricity and copper accounting for most of the increase. Poverty reduction has been slow, partly because of the nature of the economic development in resource-based industries such as electricity and mining.

3. Agriculture accounts for over 70% of the country’s workforce, making the Lao PDR one of the most agrarian economies in East Asia. Agriculture-based products account for about 36% of total exports, 22% of which is rough and sawn wood. According to a recent report, productivity in the sector was low in 2014.<sup>2</sup> The average agricultural value added per hectare (in 2005 United States dollar prices) was \$578, compared with \$994 in Thailand and \$1,380 in Viet Nam. Given the extent of subsistence agriculture practiced in the country, improvements in productivity and production standards could have a significant impact on livelihoods.

4. Key agriculture-based exports included rough and sawn wood (\$845 million), rubber (\$108 million), coffee (\$87.7 million), corn (\$54.1 million), and cassava (\$44.1 million) in 2015.<sup>3</sup> While these products have experienced increased export volumes from 2010, apart from wood products, they remain a very small proportion of total exports. Nonetheless, newer plant crop exports such as rice and cassava, which have been a focus of the current project, have increased. Recent changes in export performance for key crops from 2012 to 2015 are shown in Table 1.

**Table 1: Changes in the Export Value of Lao People’s Democratic Republic Agricultural Product, 2012–2015**

Item	2012 (\$ million)	2015 (\$ million)	Change (%)
Rough and sawn wood	265.0	845.0	218
Rubber	63.8	108.0	69
Coffee	80.1	87.7	9
Corn	32.4	54.1	67
Cassava	10.3	44.1	328
Rice	13.1	29.1	122
Raw sugar	30.1	27.3	(9)
Cabbages	13.8	12.6	(9)

( ) = negative.

<sup>1</sup> The economic implications of systems’ performance, the rationale for supporting sanitary and phytosanitary (SPS) capacity building, and the financial and economic costs and benefits associated with this are in the Economic Analysis (accessible from the list of linked documents in Appendix 2).

<sup>2</sup> World Bank. 2016. *Lao People’s Democratic Republic: Lao Economic Monitor, FY15-16. Challenges in promoting more inclusive growth and shared prosperity*. Report No: AUS17628. Vientiane.

<sup>3</sup> MIT. Lao PDR exports. See [http://atlas.media.mit.edu/en/visualize/tree\\_map/hs92/export/lao/all/show/2015/](http://atlas.media.mit.edu/en/visualize/tree_map/hs92/export/lao/all/show/2015/).

5. **Sanitary and phytosanitary issues.** Several serious pests and diseases (locusts, foot-and-mouth disease, and classic swine fever) affect the agricultural production of the Lao PDR. Apart from the direct production consequences, the existence of these diseases in the Lao PDR has reputational and market access consequences internationally.

6. As a landlocked country with porous borders with its neighbors, the Lao PDR also faces major challenges in managing the risks from informal trade such as illegal animal movements across its borders. The illegal movement of cattle (e.g., across the Lao PDR borders) can carry animal transboundary diseases like foot-and-mouth disease and undermine the Lao PDR's efforts to manage these diseases domestically.

7. Agricultural production practices are still basic, given the lack of education and resources in rural areas. This results in food safety and plant and animal health considerations being given inadequate attention on farms, particularly at processing facilities for higher risk SPS products. Inadequate, illegal, or excessive use of pesticides and veterinary drugs are common problems. This is less of a concern for heavily processed or non-food products like rubber, but food safety is essential to securing and maintaining formal market access for new food/plant products like fresh mangoes. New products such as herbs have faced restrictions in markets like the European Union given the lack of attention to food safety or plant and animal health.

8. Under World Trade Organization SPS rules, countries can impose conditions on agricultural and food product imports to manage risks to food safety, and plant and animal health. As trade barriers are reducing across the Greater Mekong Subregion (GMS), particularly under the Association of South Asian Nations (ASEAN) Free Trade Area initiative, some countries are increasing their SPS requirements and creating nontariff trade barriers. Significant informal trade in agriculture appears to occur across borders in the region, including between the Lao PDR and its neighbors. Such trade is unlikely to secure prices that formal trade could secure and creates its own SPS risks. Further, the Lao PDR's trading partners in the region are adopting stringent SPS standards, requiring inspections for accurate data about plant and animal health and food safety, which are difficult for the Lao PDR to deliver without assistance.

9. The core SPS problem in the Lao PDR is poor implementation of SPS policies and practices by industry across the production chain and in the government agencies responsible for SPS. This is primarily due to weak capacities in guidance, implementation, monitoring, and surveillance; an inadequate supply of SPS specialists; and poor harmonization and coordination with international standards and standards of GMS neighbors. A wide range of financial (lack of operational budgets), planning (no annual surveillance programs), physical (lack of testing capacity), institutional (poor awareness), human resource (low skills levels), and knowledge conditions contribute to this situation.

10. **Implications.** The current SPS situation in the Lao PDR is that (i) plant and animal pests and diseases can seriously affect the productivity and incomes of farmers;<sup>4</sup> (ii) a number of endemic livestock diseases<sup>5</sup> impede formal trade, and reduce the income of farmers and producers;<sup>6</sup> (iii) incidences of food-borne and waterborne diseases in the Lao PDR are higher

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<sup>4</sup> With increased reliance on higher value crops and new varieties, and given the existence of larger-scale operations for exports, the risk is that trade will be disrupted by an increasing incidence of outbreaks. Forest plant health is not mainstreamed in the SPS compliance process—another significant source of risk.

<sup>5</sup> Highly pathogenic avian influenza, foot-and-mouth disease, classical swine fever, and Newcastle disease.

<sup>6</sup> Several zoonotic diseases are also inherent risks for human health.

than in other countries of Southeast Asia; and (iv) inadequate SPS capacities inhibit formal, higher value agricultural trade and result in high costs of doing business.

11. Health hazards are also costly to people and the economy. Inadequate health controls lead to high risks for investors, particularly with disease outbreaks. Consumer health can be seriously impacted by adulterated, spoiled, contaminated, and substandard food products. Economic and financial costs occur in the form of lost incomes attributable to illness and payment for medical treatment. Data on the costs of inadequate food safety controls are difficult to collect because of underreporting of food safety related illnesses and loss of income. The disability-adjusted life year (DALY) rate<sup>7</sup> (2004) presents alarming figures for the Lao PDR (Table 2), second only to Cambodia for years lost because of ill health, disability, or early death.

**Table 2: Food Safety in the Lao People’s Democratic Republic and Other Countries in the Region, 2004**

Item	Cambodia	PRC	Lao PDR	Myanmar	Thailand	Viet Nam	Japan	US
DALY/100,000	2,843	277	1,442	1,553	449	315	28	33

DALY = disability-adjusted life year, Lao PDR = Lao People’s Democratic Republic, PRC = People’s Republic of China, US = United States.

Source: World Health Organization. 2004. *The Global Burden of Disease: 2004 Update*. Geneva.

## **B. Government’s Sector Strategy**

12. The government recognizes the importance of improving agriculture, and is implementing a series of initiatives including the Strategy for Agricultural Development, 2011–2020 and the agriculture master and investment plans underpinning it.<sup>8</sup> The strategy recognizes the importance of farmer education and extension services, strengthening value/production chains, and improved market access. The Lao PDR is well placed to take advantage of its underlying comparative advantage in many agricultural and forestry products, including wood products, rubber, staple crops, niche and/or organic products, and bovine livestock, but only if it can develop a better SPS system. Strengthening the supply chains of crop products (initially corn, followed by rice) for growing regional markets (especially the PRC) is a government priority. Despite these policies and projects that have helped improve capacities, gaps remain in the Lao PDR’s SPS systems.

## **C. Lessons from Trade Facilitation, Agriculture and Natural Resources Investments, and Sanitary and Phytosanitary Development**

13. Trade facilitation remains challenging in the GMS. Experience shows the need to formulate well-targeted and sequenced projects to ensure that bilateral and regional commitments focused on cooperation and harmonization are implemented. Experience in the agriculture and natural resources sector suggests the need to focus on measures that promote trade in agricultural products in a subregional context. The Lao PDR has plans to address SPS issues, but inadequate capacity at country levels act as barriers to effective regional SPS cooperation.

14. International SPS experience highlights the need for prevention at the production level and controls throughout the AFF supply chain—rather than emphasizing end-of-pipe controls, which are costly and ineffective. Involvement of the private sector and civil society in SPS capacity

<sup>7</sup> DALY indicates the number of healthy life years lost per 100,000 because of mortality and morbidity caused by diseases and debilitating factors. The DALY estimates are only for years lost because of diarrheal disease.

<sup>8</sup> Government of Lao PDR. 2010. *Lao PDR Strategy for Agricultural Development 2011-2020*. Vientiane.

building is necessary to target and address technical issues and challenges, and for long-term sustainability.

15. To address these shortcomings, assistance for SPS capacity building needs to be delivered over a longer duration to provide recipient countries with the time to develop national risk-based regulation, guidance, surveillance, and control programs gradually and systematically. In addition, long and porous national borders, and similarities in agro-ecological conditions and food systems, make the GMS countries highly interdependent. Because of the risks of spillovers, individual and national solutions to transboundary agricultural health and food safety hazards are difficult to achieve (and expensive to implement effectively) without strong cooperation from GMS neighbors. This reinforces the importance of regional cooperation.

#### **D. ADB Sector Experience and Assistance Program**

16. The Asian Development Bank (ADB) is providing other assistance to the agriculture sector through support for small and medium-sized enterprises' access to finance, as well as the registration of geographical indicators for products including key agricultural exports in the Lao PDR. Regional technical assistance for enhancing the capacity for SPS arrangements to facilitate trade in the GMS is also providing capacity building for regional efforts of mutual recognition and harmonization of SPS standards within ASEAN. To complement regional SPS requirements, country-level interventions for SPS capacity building are needed.

17. Through close coordination with the governments and stakeholders, including development partners active in SPS assistance, the project for additional financing has been formulated to build on and extend the initiatives under the current project to strengthen surveillance and inspection systems and upgrade SPS human resources through the provision of a mixture of technical support, training, equipment, and laboratory hardware.

18. The economic rationale for the project rests largely on the public good nature of the goods and services to be provided. Without public intervention, SPS capacities are unlikely to be adequately enhanced (continuing to impact negatively on opportunities for trade expansion and economic growth). This extends to the subregion, given the impact of the Lao PDR's abilities to manage SPS on its neighbors.

19. A continuing feature of the design of this project is to focus responsibility for the components dealing with plant health, animal health, food safety, and academic education on individual institutions in the Lao PDR. The major design parameters are as follows: (i) recognition that plant, animal, and food safety surveillance systems start from a low informational and human capacity base; (ii) simple and cost-effective approaches should be employed where possible, e.g., rapid test kits and shared laboratory facilities; and (iii) an emphasis on strengthened university programs as opposed to research. The project has been designed to complement ongoing and planned interventions, e.g., the World Bank's trade development facility in the Lao PDR supported by a multi-donor trust fund; and initiatives supported by the Food and Agriculture Organization of the United Nations, the United Nations Industrial Development Organization, and bilateral development partners. Coordination with the GMS Working Group on Agriculture has been maintained, as has regional cooperation through ASEAN working groups such as the ASEAN Food Safety Network.

**Problem Tree for Lao People's Democratic Republic: Trade Facilitation: Improved Sanitary and Phytosanitary Handling in Greater Mekong Subregion Trade Project**

