



# Thailand's Cassava Industry: Challenges Towards Sustainable Development

### Orachos Napasintuwong et al.

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## Why did we do cassava in Thailand study?

**Regional approach** by identifying mutual challenges/issues from partners (Cambodia, Laos PDR, Thailand)

- identified mutual research interests for 2022
- identified knowledge/skills needed for research in 2022

#### Need assessment process

- Workshop I: open discussion on potential research Value chair
- Follow-up online survey: identify crops/skills needed for supporting value chain study
- Workshop II: discuss and finalize research topic and capacity strengthening activities
- Cassava is 1<sup>st</sup> priority interested commodity by Cambodia and Laos (followed by rice and sugarcane)
- Cassava and cassava product *trade flow, and specific research questions* from each country addressed by using value chain analysis.

















### How did we do it at KU?

- Identified researchers with skills and interest
- Reviewed of literatures
- Provided value chain analysis workshop
- Workplan I: Economic and policy analysis
- 1) Reviewing government policies, and the role of public and private sectors
- 2) Providing overview of cassava production and consumption and the trade
- 3) Estimating the degree of market integration and price transmission in Thailand cassava industry and related markets
- Workplan II: Value chain mapping and upgrading
- 1) Value chain mapping of actors, activities and values of cassava and its products in Thailand
- 2) Assessing potential demand under alternative scenarios
- 3) Proposing approaches for cassava value chain upgrading
- ► Regional knowledge sharing seminar on cassava value chain and cassava policy

















# Findings from Thai cassava study?

- Current long-term National Strategy is moving Thailand towards SDGs and encouraging the Bio-Circular-Green Economy Model by focusing on STI knowledge to create added economic value while balancing between the conservation and use of the natural resources.
- Cassava is one of the key commodities in the transformation of the sustainable food system.
- Ageing farmers, labor shortages, low yields, the impact of climate change on agriculture, emerging disease control, integrated value chain management.
- Supply of cassava does not meet the industry's demand.
- The imports of cassava roots and chips from Cambodia and Laos noticeably since 2007.
- o 95% of the cassava exports from Thailand are basic starch and modified starch.
- Decreased export competitiveness for basic starch.
- Increased export competitiveness in starch residues and modified starch.
- Thailand focuses more on activities in the midstream (i.e., producing modified starch) rather than activities upstream.
- Yet, upstream cassava industries continue to be crucial for the development of other domestic value chains, such as those for feed, livestock, ethanol, amino acids, and bioplastic.

















# Findings from Thai cassava study?

- Cassava price transmission shows dependency on the Chinese market and limited diversification.
- Farmgate prices are influenced by wholesale and export prices of cassava products, but not vice versa.
- Foreign demand for upstream products, standards, and certifications
- Growing competition from other cassava suppliers.
- Not well coordination of cassava stakeholders along the value chain.

















### Implications from Thai cassava study

- Thai government has clear policies and initiatives to support the cassava industries, both to address these issues and to advance the creation of products with higher added value.
- Private sector has also positively reacted to the sustainable development agenda.
- Implementation of strategies needs a clear and supportive action plan to realize the development goals.
- Promote sustainable development using STI following governmental policies.
- Strategies to enhance the market efficiency of the Thai cassava value chain, including product diversification, export market expansion, and empowering farmers through value-added processing.
- Enhancing resource efficiency, adopting circular economy principles, and navigating the complexities of global carbon trade are opportunities for sustainability advancement.
- The integration of sustainable practices across all facets of cassava cultivation, starch production, and waste management is essential to minimizing environmental impacts and securing economic viability.

















### Implications from Thai cassava study

- Cassava associations could play a stronger role in assessing the production and market situations as well as market opportunities and technological capability to set a roadmap for development.
- Some of the difficulties could be reduced by creating market linkages and strengthening the institutions of cassava farmers.
- Consistent commitment and a clear development path is needed.
- Several research programs and capacity building programs are already existed and shared in the region.
- Lack of monitoring and evaluation of Bio-Circular-Green economy for sustainable policies and measures.
- Research on policy options and/or policy impacts and evaluation would guide the development towards sustainable goals.













