



Alliance



Policies and pandemics: understanding how global drivers and shocks influence value chain actors in the cassava sector

Jonathan Newby and Cu Thi Le Thuy ++
Agribusiness Research Insight Webinar Series – 2nd July

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ACIAR Cassava Value Chain and Livelihood Program

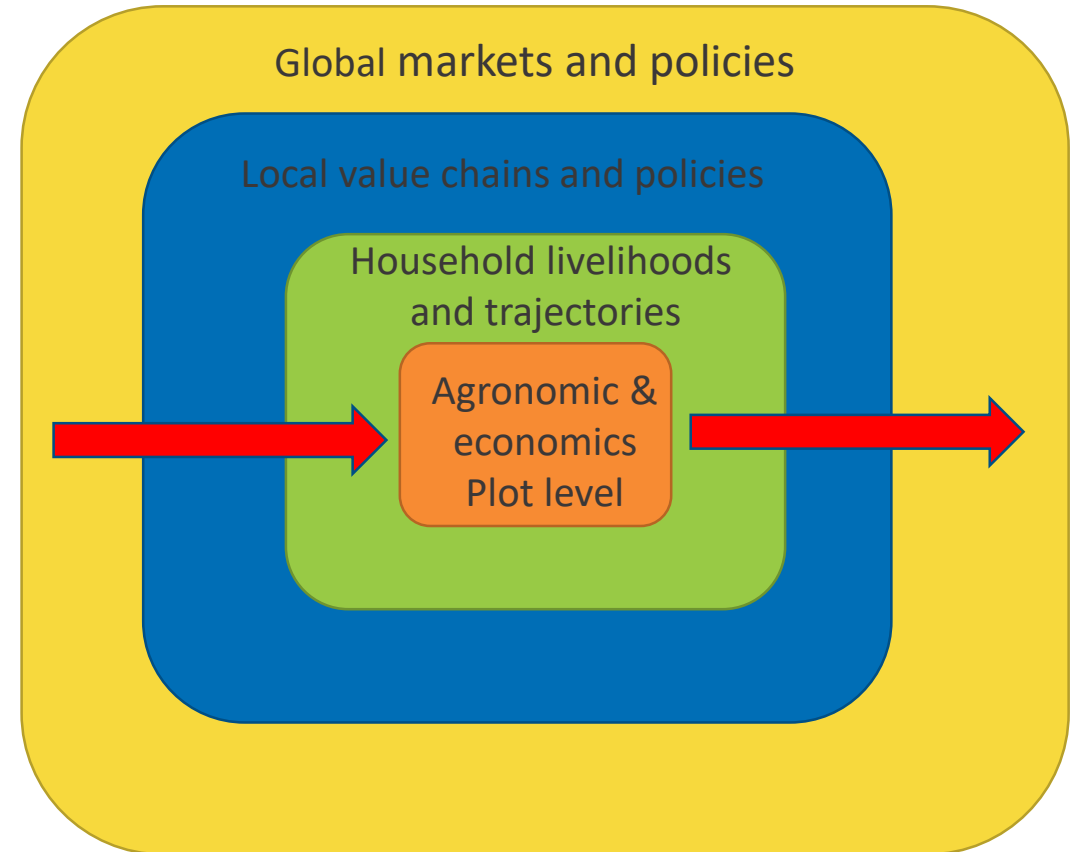
Join the conversation at : <https://www.facebook.com/groups/1462662477369426/>

Project website : <http://cassavavaluechains.net/>



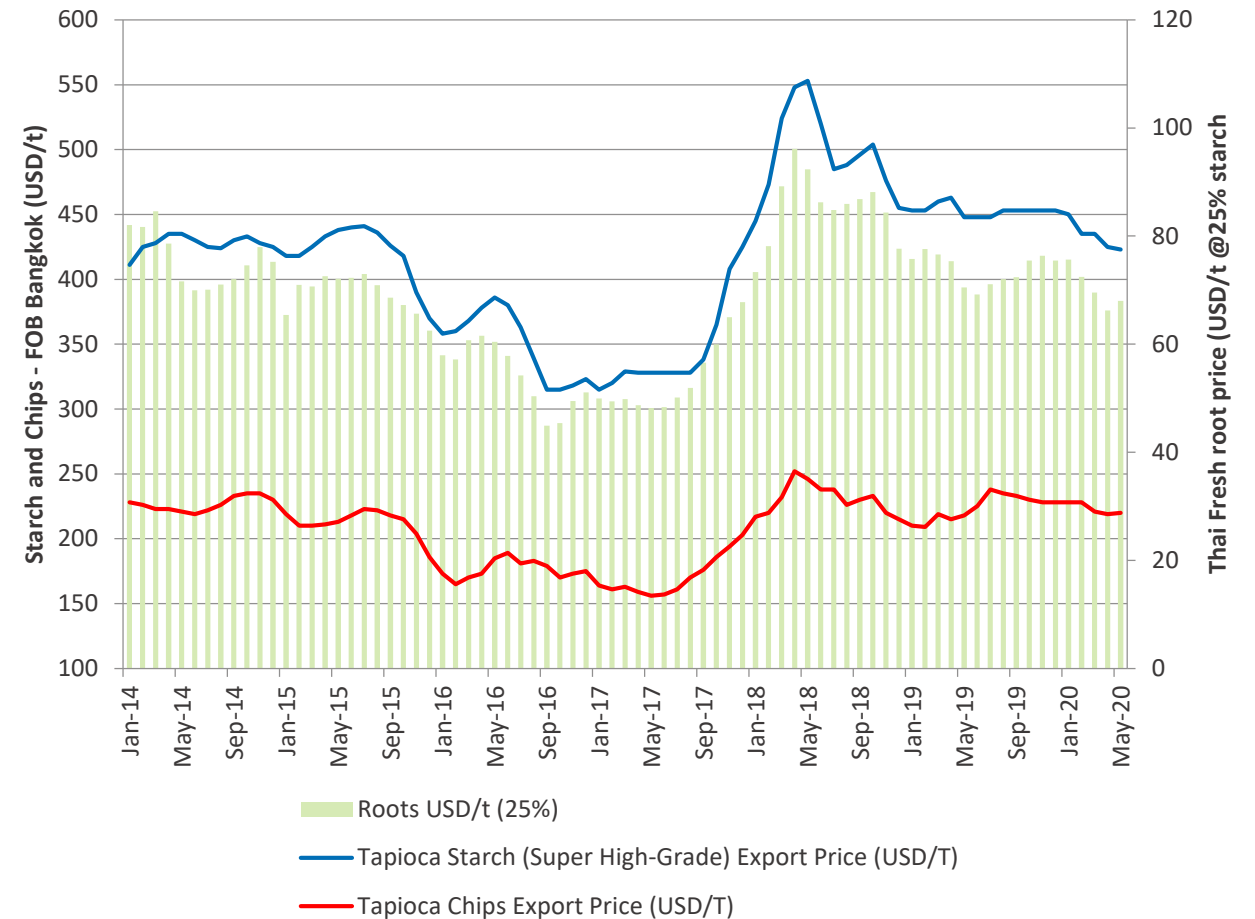
ACIAR CASSAVA VALUE CHAIN AND LIVELIHOOD PROGRAM

1. **Global markets and external policies**
2. Local value chains and domestic policies
3. Household livelihoods and trajectories
4. Field level agronomic and economic results
5. Implications for household livelihoods
6. Implications for local value chain actors



Why?

- Understand the trajectory of the industry
- What are the underlying market drivers?
- What are the risks that will impact prices?
- Understanding builds trust between actors
- What does this mean for farm level economics?
- What does this mean for livelihoods?
- What does this mean for industry competitiveness?
- What does it mean for the incentive for actors to engage in either the adoption or scaling of new technology?



What is cassava used for?

Use the chat to enter some ideas

Most obscure answer wins a prize!

On the demand side – the market outlook for cassava in Asia needs to be considered in the context of substitutes in different applications

1. Global markets where cassava chips compete with other forms of carbohydrate for processing animal feed or ethanol such as **maize, sorghum, wheat, molasses – oil, gas.**
2. Markets where cassava starch competes largely on price with substitutes such as **maize** and **potato** starch, **sugarcane.**
3. Markets where the functional properties of the starch are desired. Consumer preferences, clean label segment, gluten free etc.



CLARIA® Functional Clean Label Starch

CLARIA® Functional Clean-Label Starches empower manufacturers to meet increased consumer demand for cleaner labels enabling formulations with similar functionality to a modified food starch.

TATE & LYLE



INTRODUCTION DOWNLOADS APPLICATION HOW WE APPLY IT

Introduction to CLARIA® Functional Clean-Label Starch

Also known as

Clean-label starch, functional clean label starch, starch

CLARIA® Functional Clean-Label Starches labels simply as starch yet perform similarly to modified starches.

Tate & Lyle's line of CLARIA® Functional Clean-Label Starches empowers manufacturers to meet increased consumer demand for cleaner labels enabling formulations with similar functionality to a modified food starch. Globally, consumers are demanding convenient, great tasting foods that have recognisable ingredients on the label. In fact, one-in-four new products today is launched with "cleaner-label" claims. All CLARIA® Functional Clean-label Starch products are certified as non-GMO.



At Tate & Lyle, our textures range now offers a comprehensive array of Non-GMO offerings for all regions, providing our customers with choices to fit their needs. Our non-GMO ingredients offer the same functionality as their traditional counterparts without compromising on taste or texture, meaning you can offer your consumers everything they're looking for in the foods and beverages they love.



FOOD NON-FOOD



Home > Products & Services > Food and Beverage Solutions > Starches > Tapioca Starch Ingredients

Overview
Sorghum Flour
Wheat & Corn Starches
**Tapioca Starch
Ingredients**

Tapioca Starch Ingredients

Clean delicious taste and texture with a gluten-free, non-GMO starch



Tapioca Starch

Tapioca starches from ADM deliver great taste and texture that's also on trend—and satisfies consumer demand for clean label offerings. Non-GMO and gluten-free, our tapioca starches offer all the functionality to deliver superior texture, plus a clean, neutral flavor profile for the ultimate consumer-pleasing taste in your products, especially in applications where the flavor of a traditional starch is not desirable.



Ingredients > Starches > Functional Native Starch

Clean up labels with functional native starch

Our portfolio of more than 25 NOVATION® clean label starches lets you formulate on-trend, clean label products rich texture and taste, across a broad range of applications

As the pioneer in clean label ingredients, we offer the broadest range of speciality clean label starch solutions and formulation expertise available. Having identified the clean label trend in its infancy and helped turn the trend into way of life for food manufacturers, we know all there is to know about clean label.

As consumers grow ever-more health conscious, clean labels are becoming increasingly important to them. People want to know exactly what's going into their food. That's why you need simple recipes, with ingredients they recognise and trust.

OUR CUSTOMER BENEFIT PLATFORMS

CLEAN & ORGANIC	HEALTH & NUTRITION	CONVENIENCE	FUNCTIONAL SOLUTION	SUSTAINABILITY
DELIVERING SIMPLE & NATURAL INGREDIENT SOLUTIONS WITH BETTER PERFORMANCE AND FRIENDLY LABEL.	DELIVERING ON-TREND SOLUTIONS TO ADDRESS GROWING HEALTH AND NUTRITION TRENDS.	ENCOMPASSING QUICK SOLUTIONS FOR MORE CONVENIENCE.	PROVIDING BETTER INGREDIENTS FOR PRODUCT PERFORMANCE AND IMPROVEMENT, ESPECIALLY IN FIELD PROCESS ABILITY AND COSTING.	CREATING VALUES TO WASTE AND BY-PRODUCTS EMBEDDED WITH CORPORATE SOCIAL RESPONSIBILITY ON THE ENVIRONMENTAL CONSERVATION.

PRODUCTS				
<ul style="list-style-type: none"> ORGANIC TAPIOCA STARCH ORGANIC TAPIOCA SWEETENER ORGANIC RICE STARCH & FLOUR ORGANIC WAXY RICE STARCH & FLOUR WAXY TAPIOCA STARCH CASSAVA FLOUR RICE STARCH & FLOUR SWEET POTATO FLOUR KUBZU STARCH FARRO FLOUR SAIGO STARCH ARROWROOT STARCH 	<ul style="list-style-type: none"> GLUTEN FREE RANGE BAKERY MIX, BATTER, BREADINGS & COATING FIBER LOW GI FLOUR 	<ul style="list-style-type: none"> TAPIOCA PEARL RICE PRE-GEL SNACK 	<ul style="list-style-type: none"> MODIFIED STARCH FOR FOOD & BEVERAGE PRODUCTS PREMIX: STARCH & FLOUR 	<ul style="list-style-type: none"> FERTILIZERS ANIMAL GROWTH PROMOTERS THERMOPLASTIC STARCH FOR BIOPLASTIC

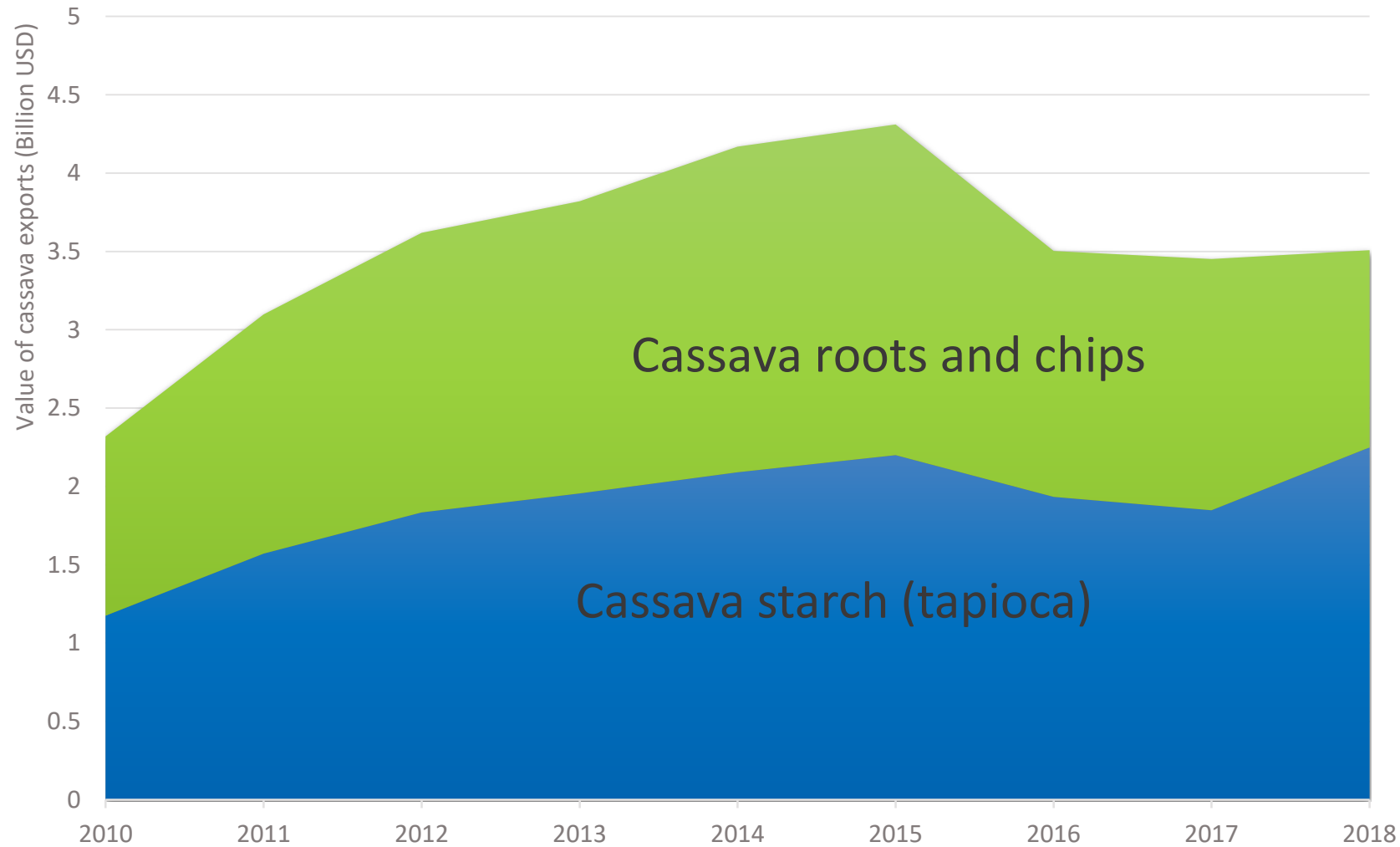


New Product Highlights

Explore our new product highlights with highest performance to catch up food & beverage trends and advance your products to the next level

<p>D-PERSE® CAP – the shortcut to transform oil-based ingredient to powder</p> <p>Read more</p>	<p>Deliver clean label yogurt to health lovers with Natura® Y808</p> <p>Read more</p>	<p>Serving the favorable soup & sauce texture with GENIGEL® M78</p> <p>Read more</p>	<p>KREATION® N-BIND – an excellent binding ability for plant-based meat</p> <p>Read more</p>
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A multi-billion global commodity most people know nothing about..... Farmers, government, researchers, donors

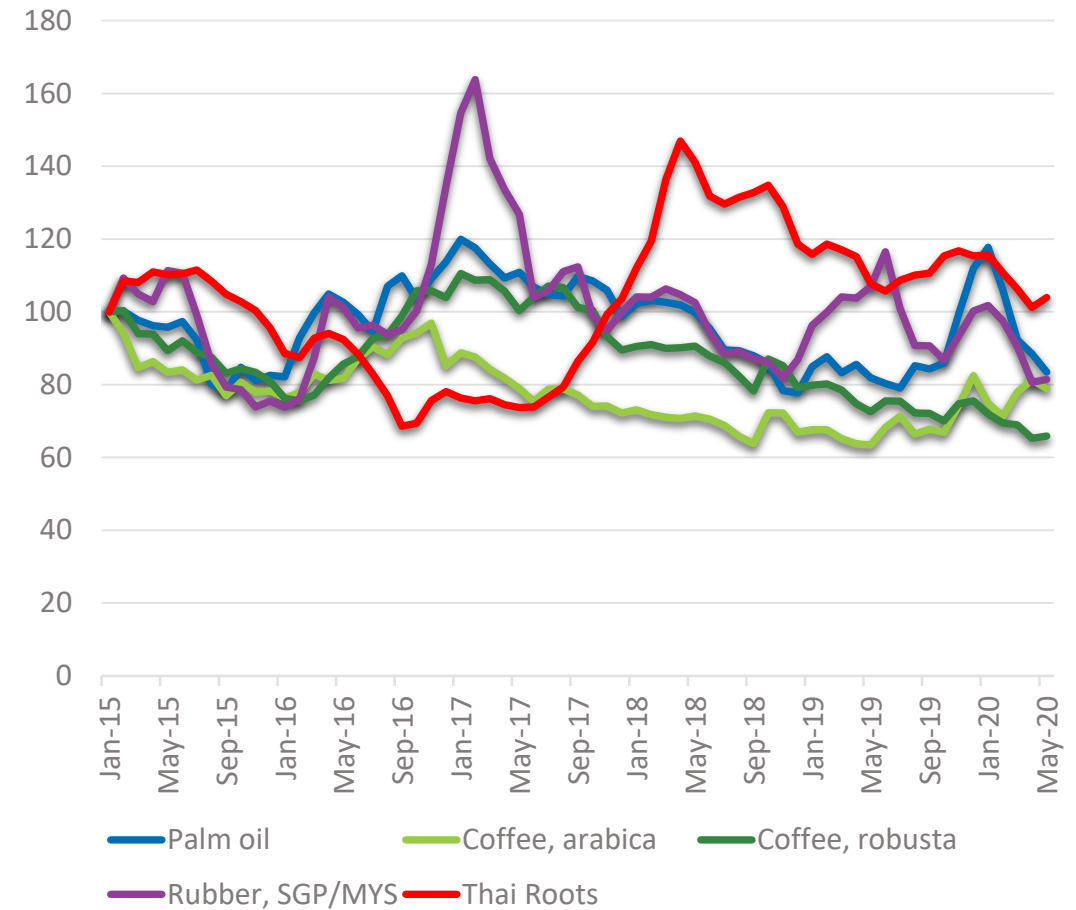
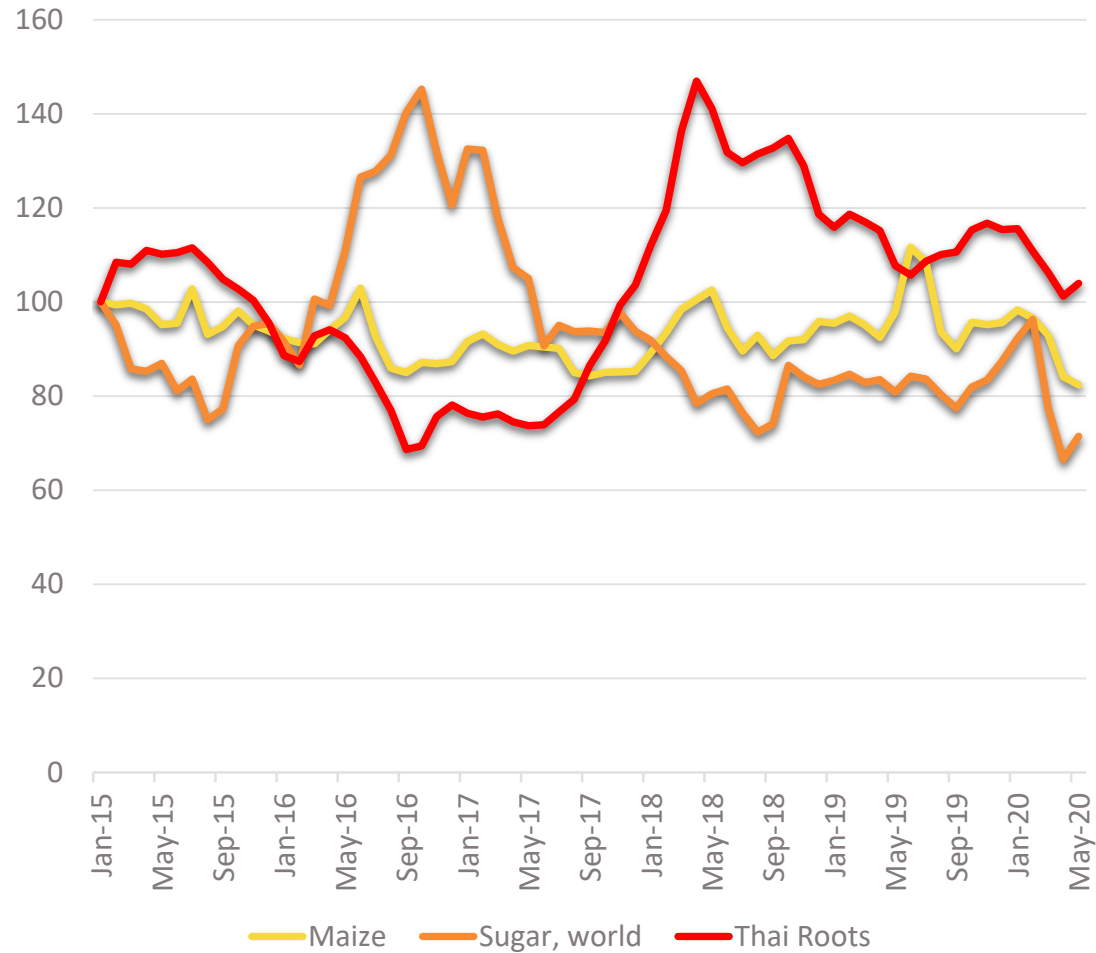


And on the supply side – the relative competitiveness against other land use in the context of different trends and shocks

- Own price and relative prices to other commodities that can be produced in agro-ecological zones
 - Influenced by a range of policies
- Changes in costs of production
 - Changing labour costs and ease of mechanization
- Long term climate trends
- Short term Floods and droughts
- Changes in land suitability and land degradation (both ways)
- **Impact of pest and disease**



Index of Thai cassava roots against global commodities that compete for smallholder land, labour and capital



Vietnamese sugar: "Unsuccessful" in 2019, worried about 2020

13:59 | 02/12/2019

[Like](#) [Share](#) Sign Up to see what your friends like.



VCN - Ending the 2018-2019 crop year, Vietnam's sugar industry is about to enter a new crop with significant anxiety. This is due to the increasing competition pressure when tariff quotas on imported sugar from ASEAN are officially removed from 2020.

- ▶ [An Giang: Smugglers still use former tricks](#)
- ▶ [Sugar industry: some die, others thrive](#)
- ▶ [Sugarcane sector needs new ideas](#)



Laos sees more revenue from coffee

Asia News Network | Publication date 22 June 2020 | 21:26 ICT



Coffee plantations in Champasak province currently cover 50,250ha, 19,716ha in Saravan province, 10,131ha in Sekong province and 2,216ha in Attapeu province. **VIENTIANE TIMES**

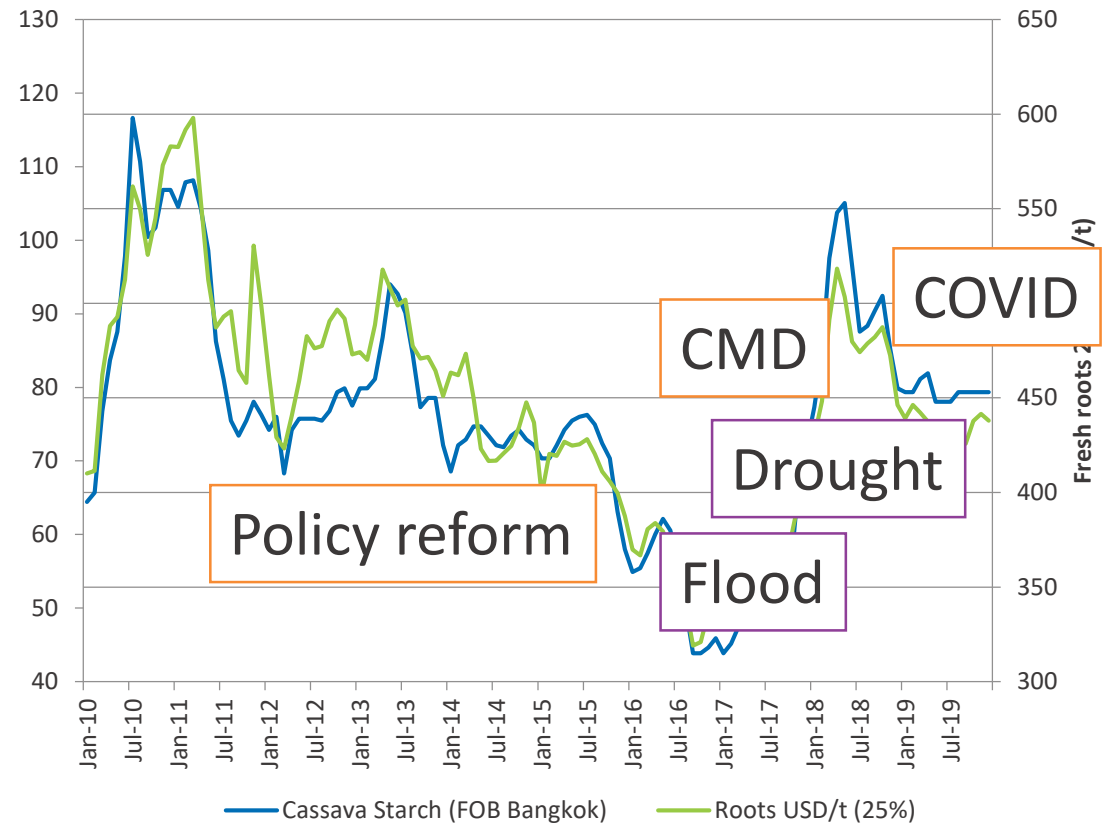
The number of coffee plantations under the Lao Coffee Association (LCA) has decreased by around five to 10 per cent in the first five months of this year as growers shifted to cassava for better incomes.

With the price of Lao coffee falling and facing challenges posed by coffee larva, and types of *Polyphagozera coffeae* and *Acalolepta cervina* in recent years, some farmers have shifted from coffee to grow other commercial crops, LCA studies found.

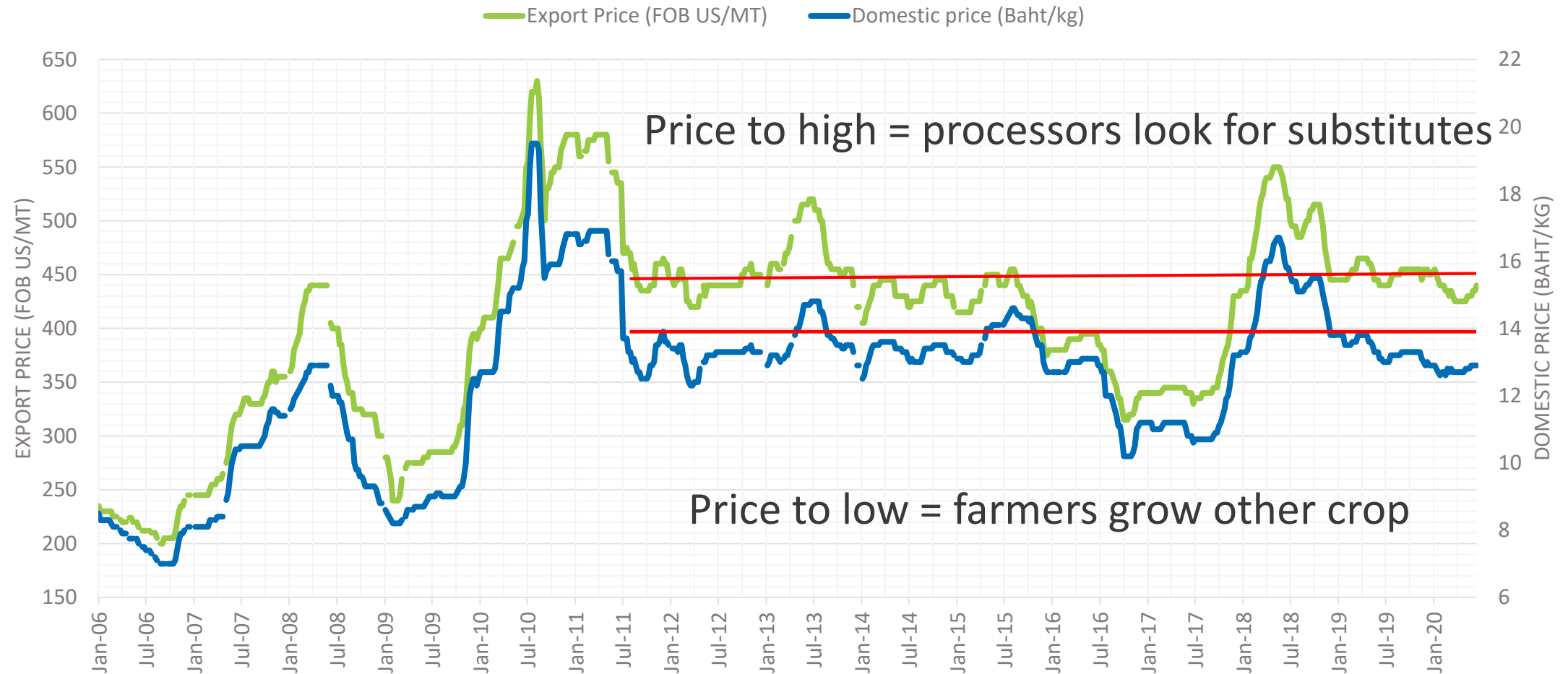
But the value of coffee exported by Laos increased as the price of local coffee beans was better this year, said LCA main coordinator Sivilay Xayasaeng.

During the first five months of last year, Laos exported almost 12,000 tonnes of coffee worth around \$24.9 million, and the figure increased this year to almost 20,000 tonnes worth \$37 million. This year's exports included the Arabica, Robusta, Exelsa and Roasted varieties.

It has been a wild ride for the cassava sector during life of the project!



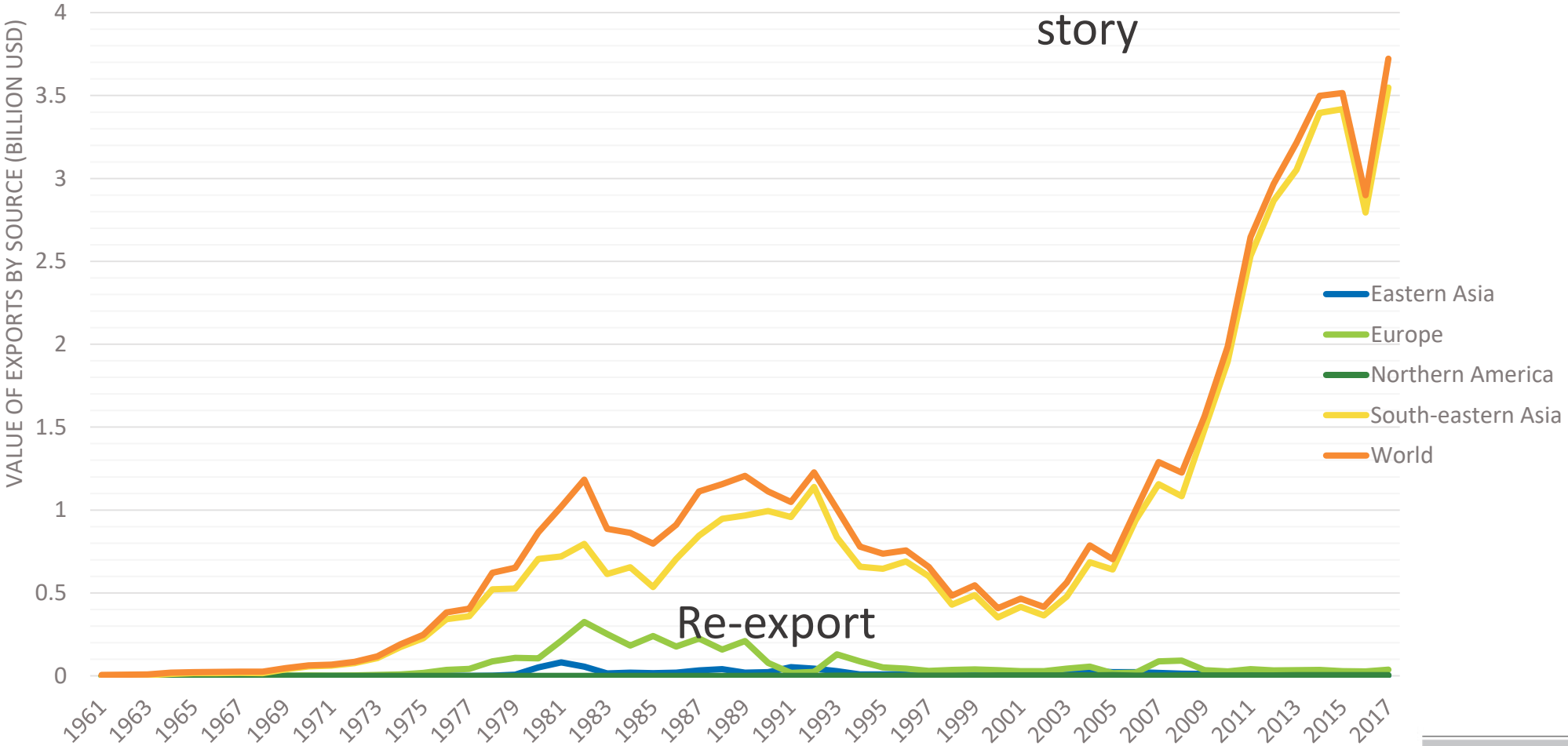
Starch processors would like to stay in the train tracks



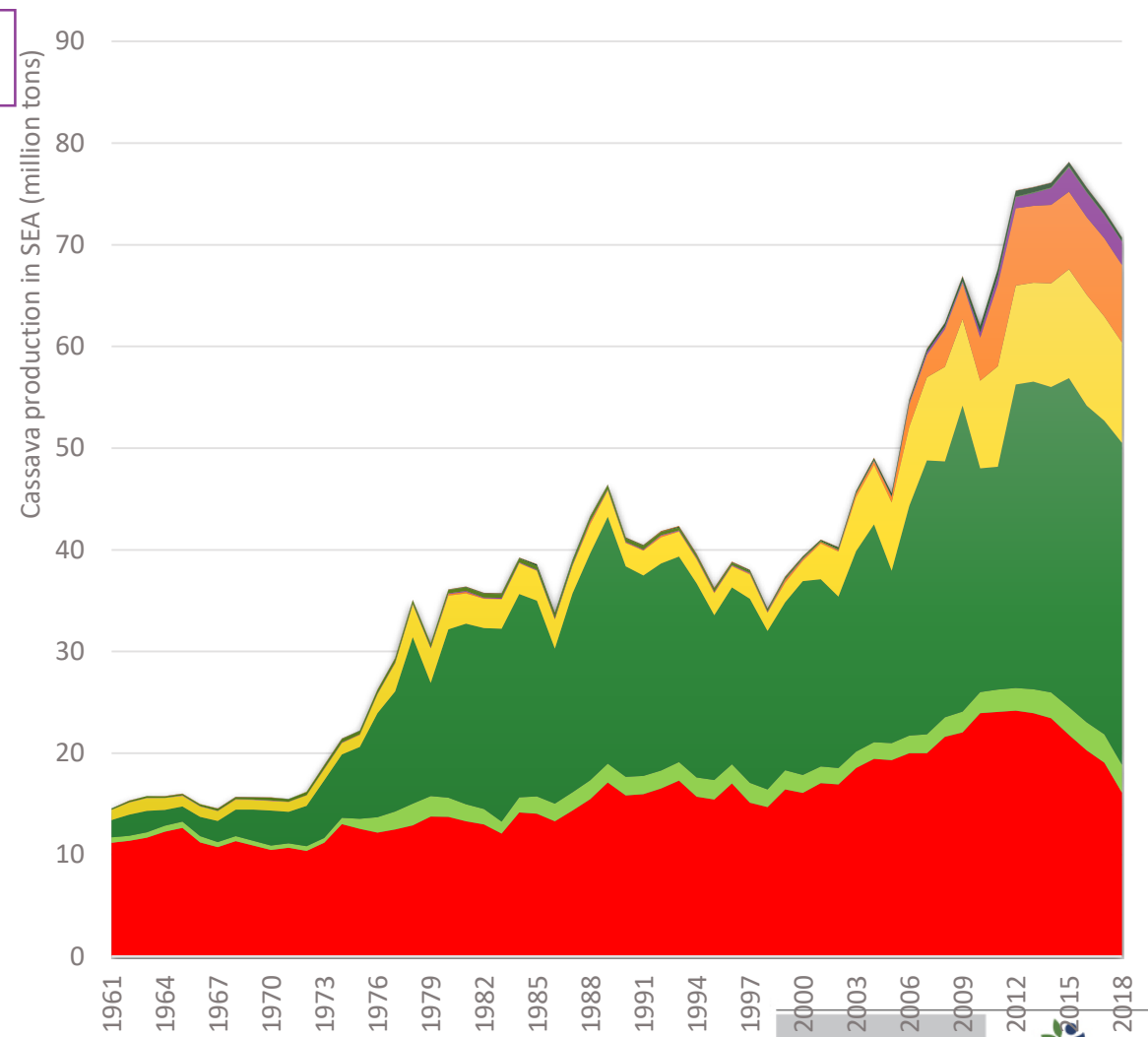
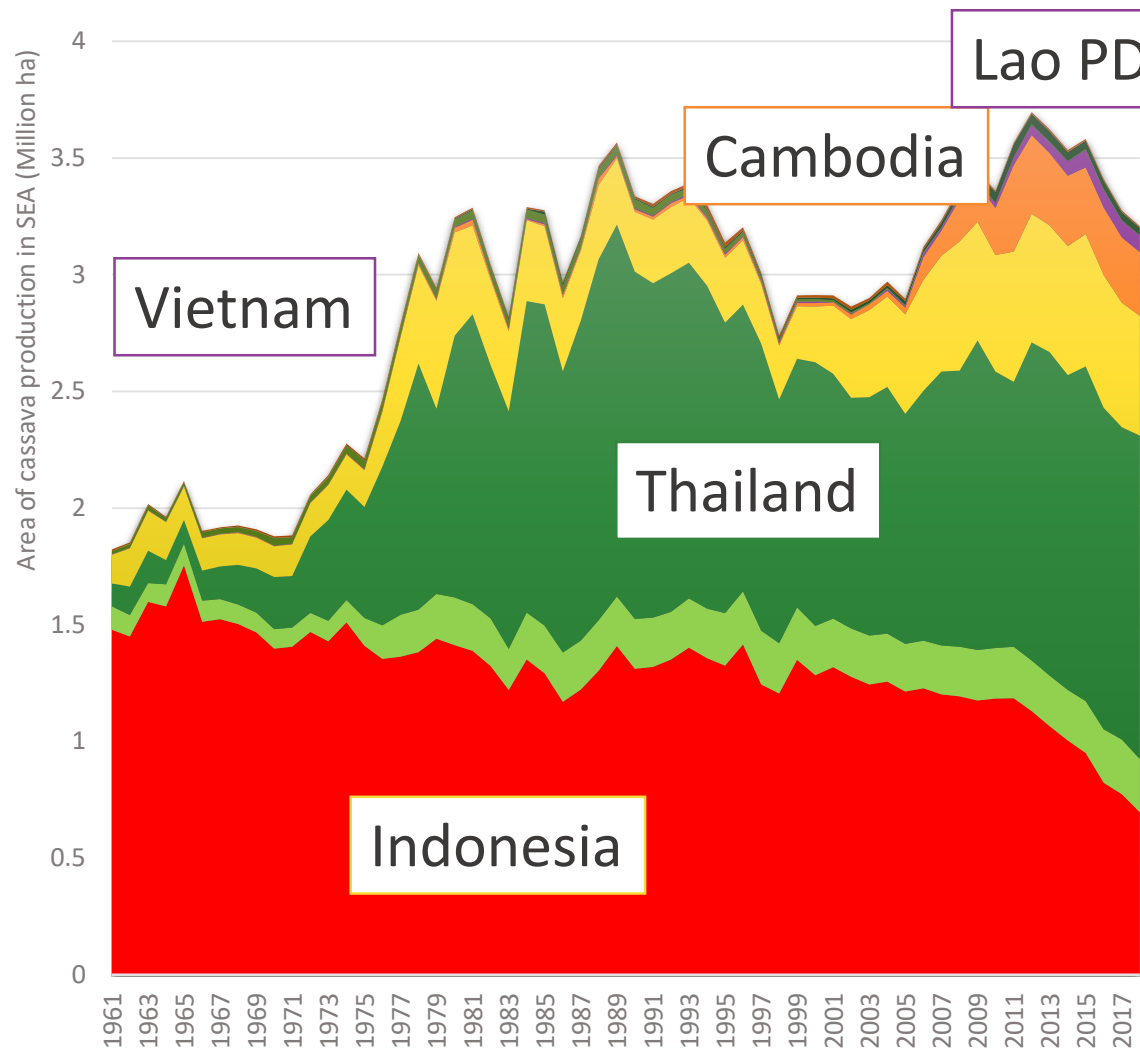
Where is cassava grown?

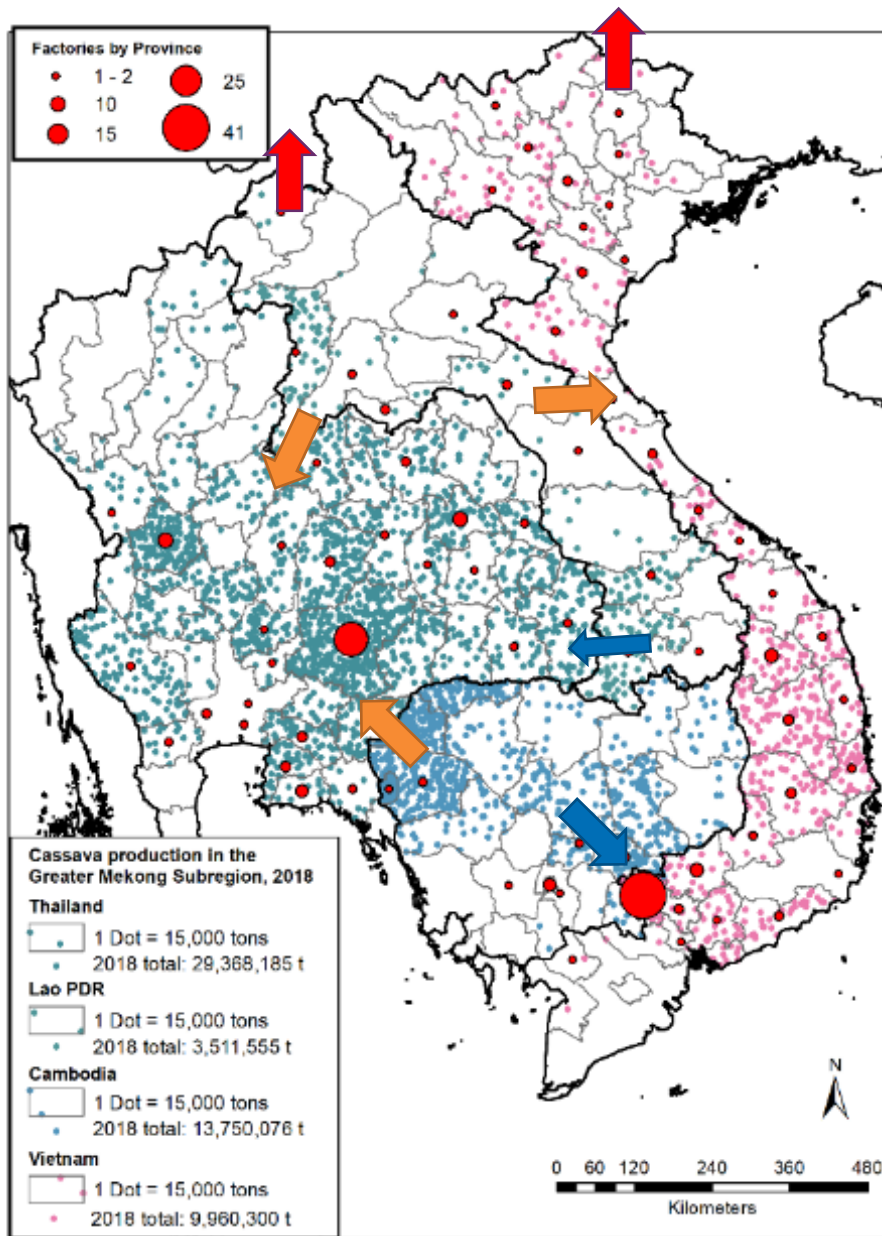
A Southeast Asian supply story, with implication for Africa

While making up only around 13% of global cassava area & 25% of production, the global trade in cassava remains a Southeast Asian story



Asia's cassava revolution has been a market driven one.... influenced by domestic and international policies

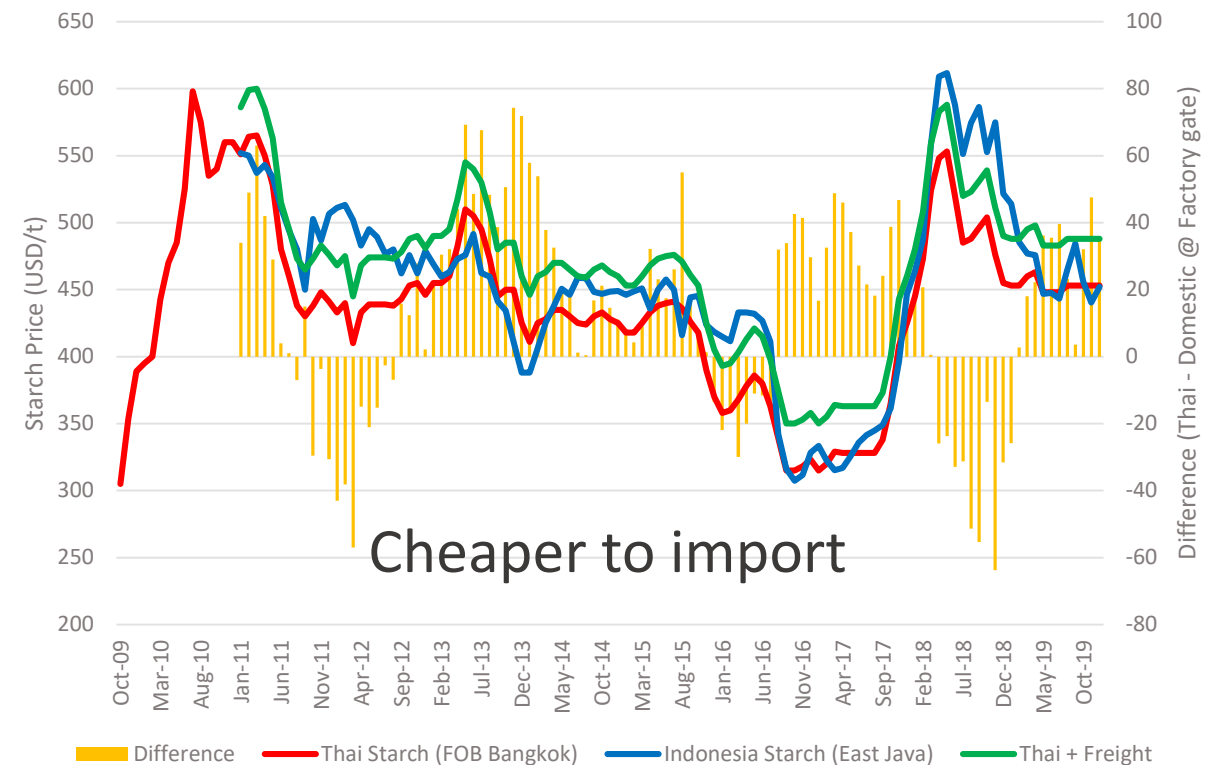




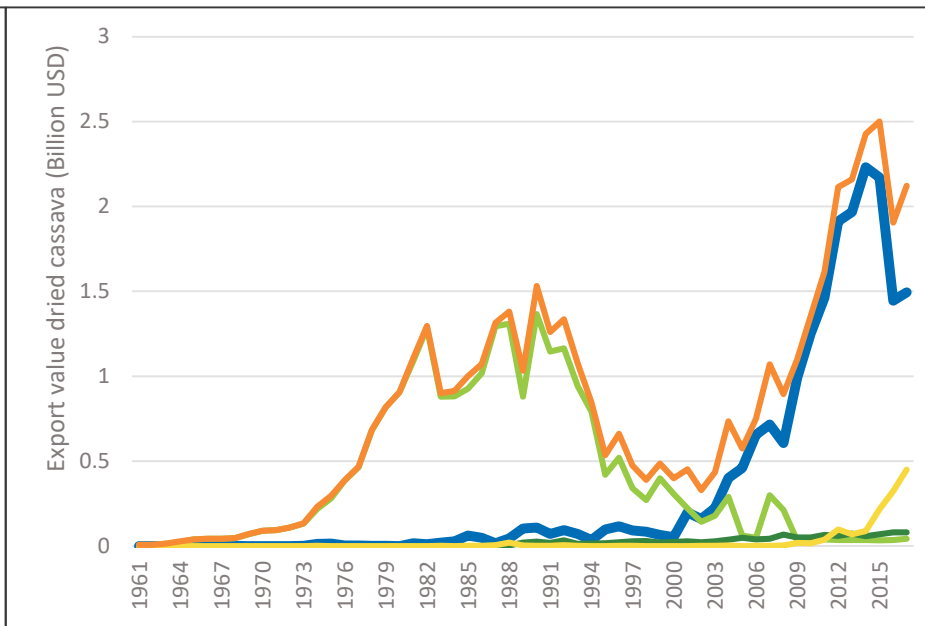
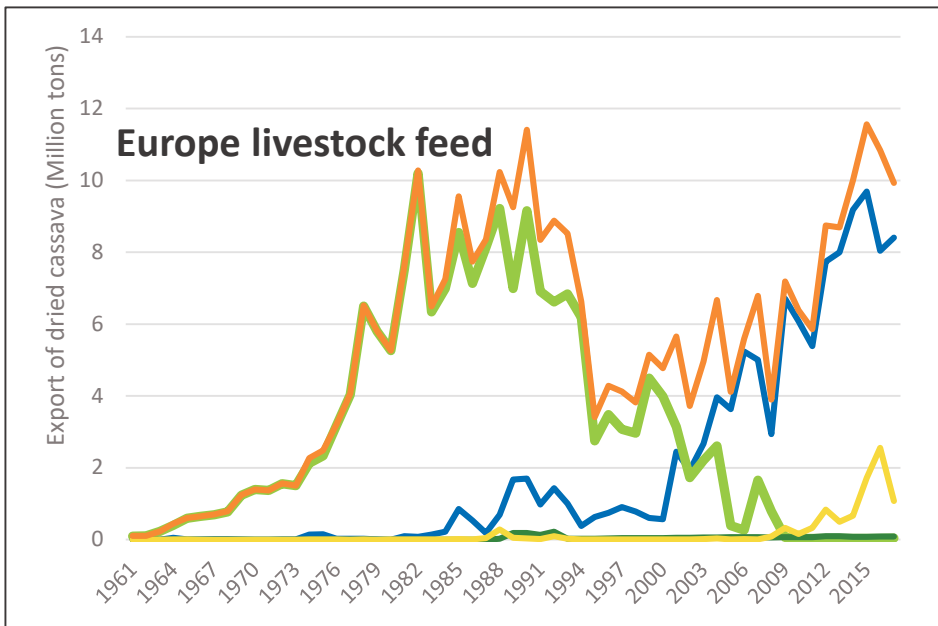
- Grown throughout the region, and still an important famine crop
- Commercial production clustered around processing hubs
- Cross border movement of :
 - products (roots, chips)
 - stem cuttings
 - capital
 - technology
 - labour.
- Millions of USD of raw products following across borders and into the global market

Strong linkages between countries outside mainland SEA with traders and processors seeking out a better margin on large volumes

- Indonesia is second largest importer of cassava starch despite being one of the largest global producers
- Different market segments with strong direct consumption
- Transport and logistics



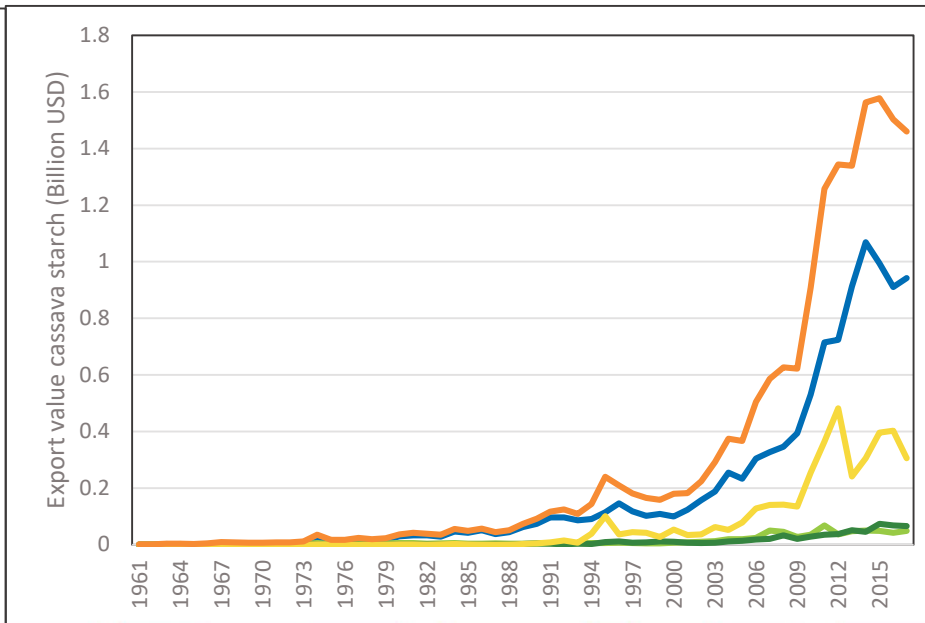
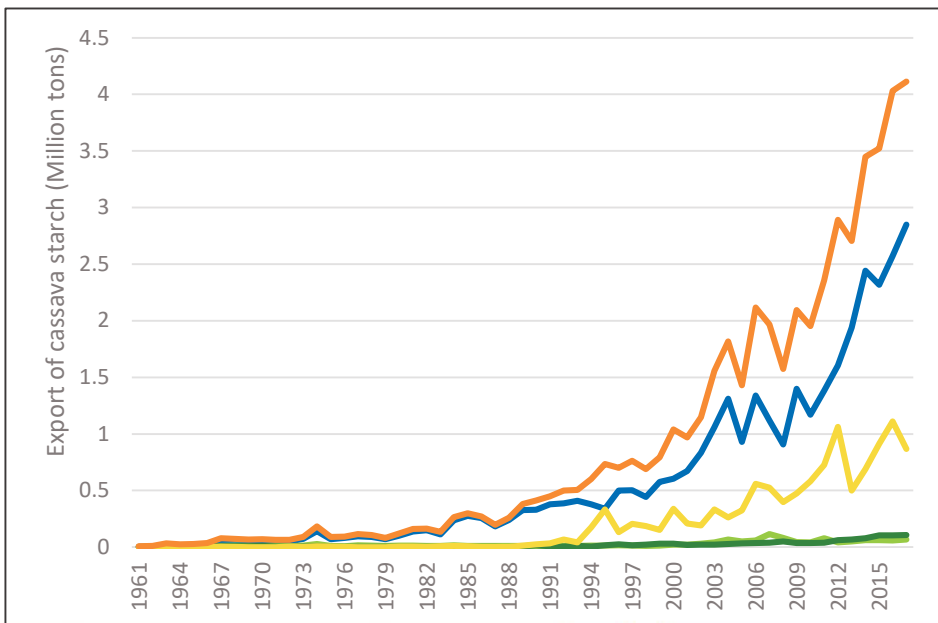
Policies



The Common Agricultural Policy (CAP) and Cassava

Protection of domestic grain market in Europe created an opportunity for Asian cassava chips

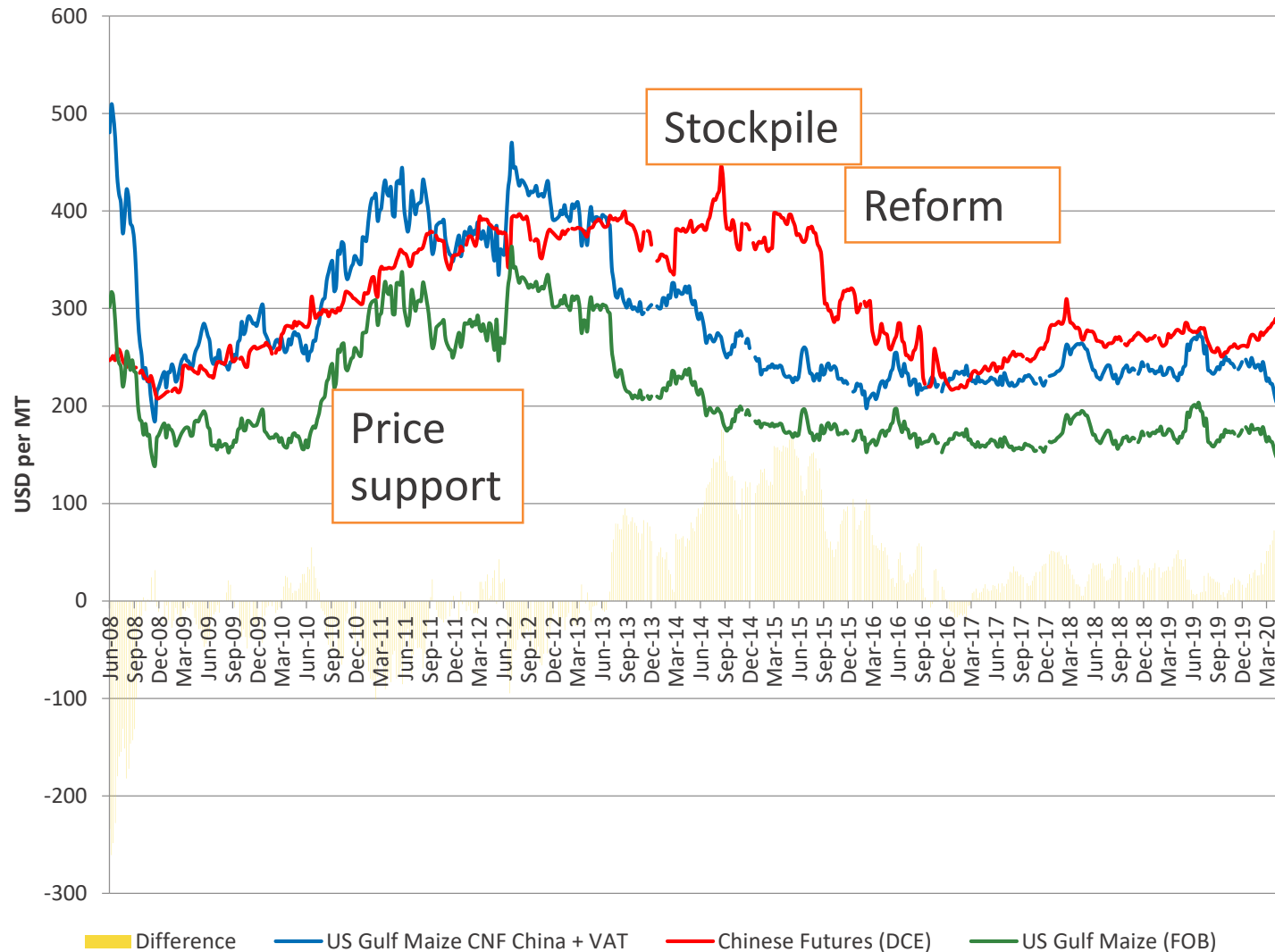
Reorientation of export market from Europe to Asia



Geopolitics played its part.

- Eastern Asia
- Europe
- Northern America
- South-eastern Asia
- World

Chinese maize self-sufficiency

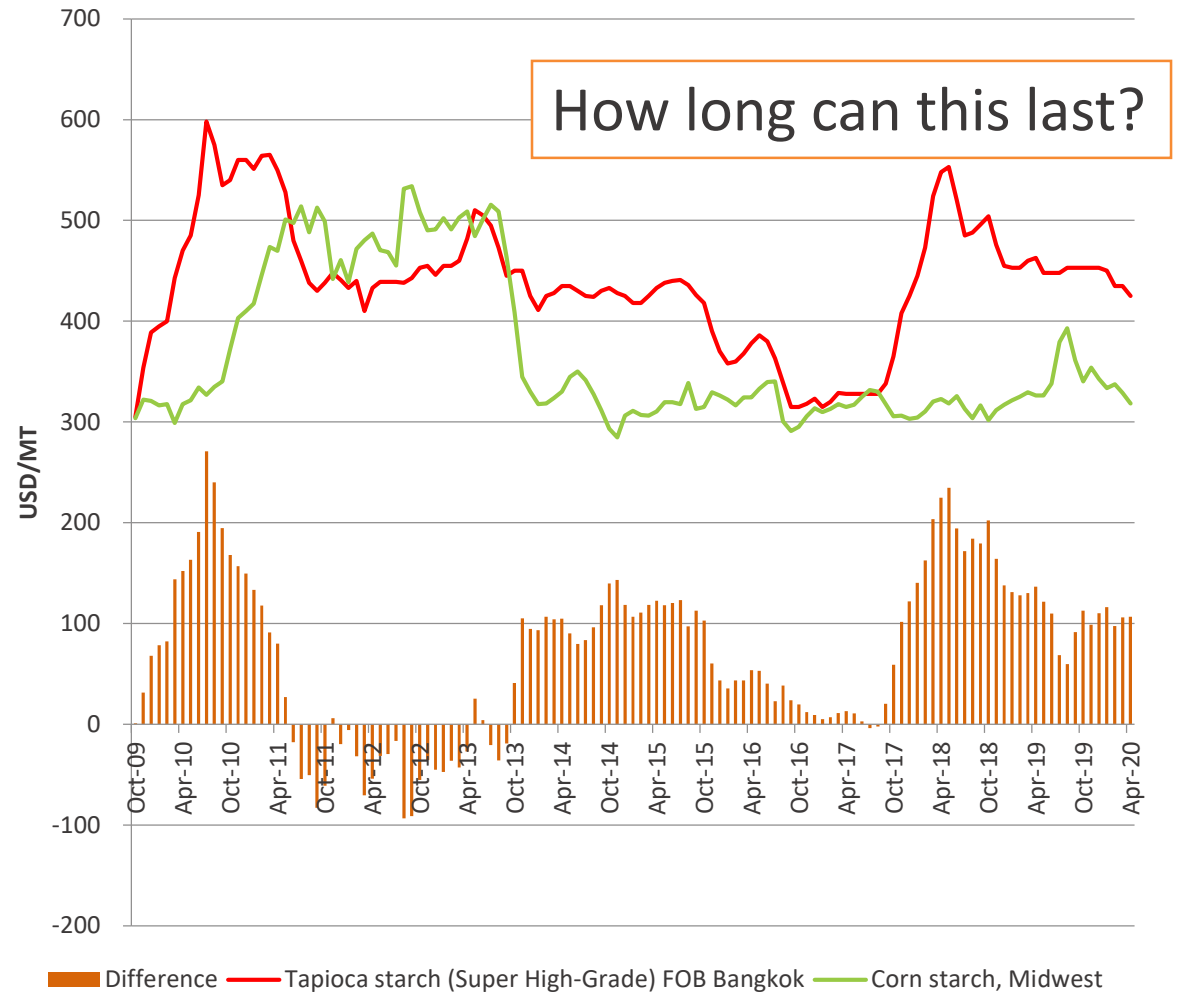
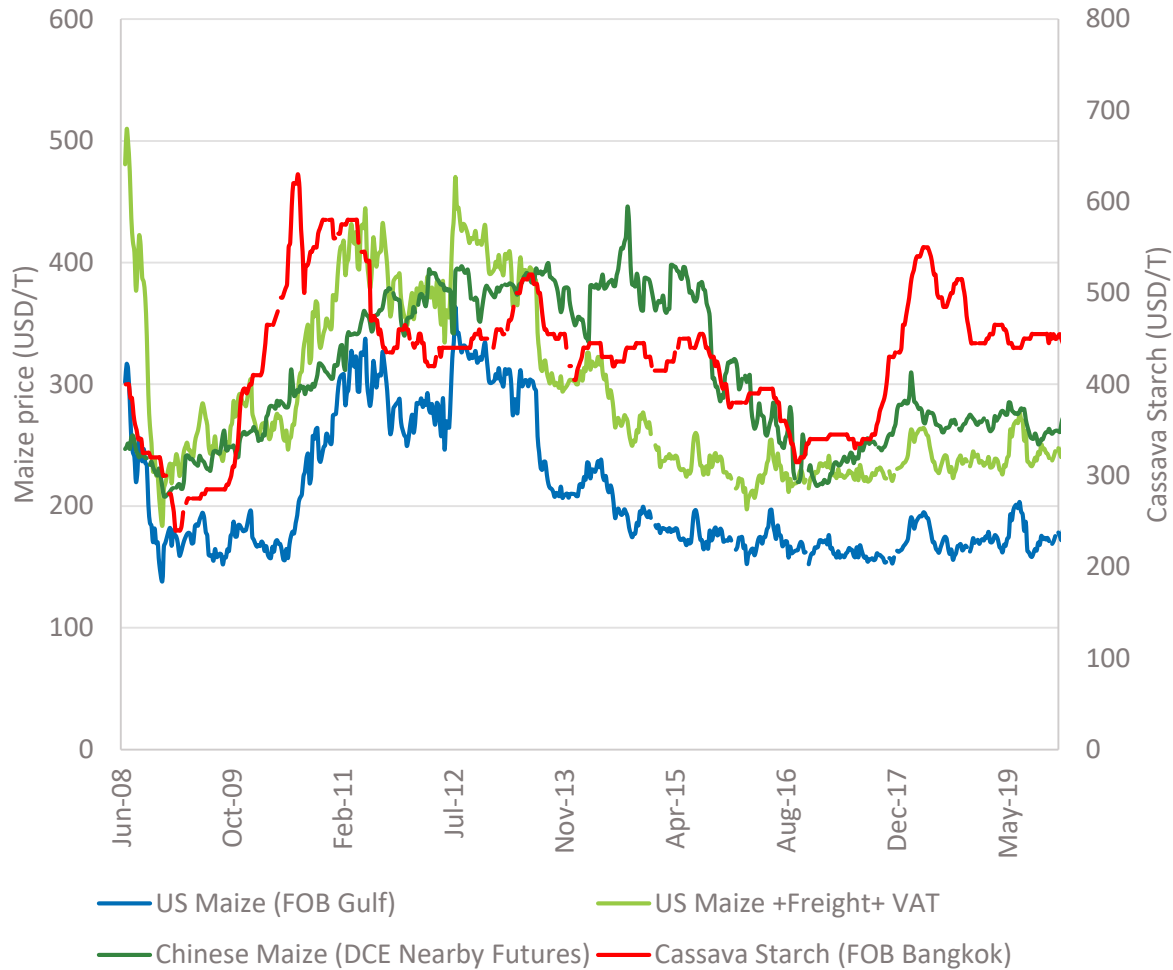


28 March 2016 the Chinese government announced an end to the floor price for maize.

The result was a significant fall in maize prices, with the nearby futures falling by around RMB 300/kg (from RMB 2000).

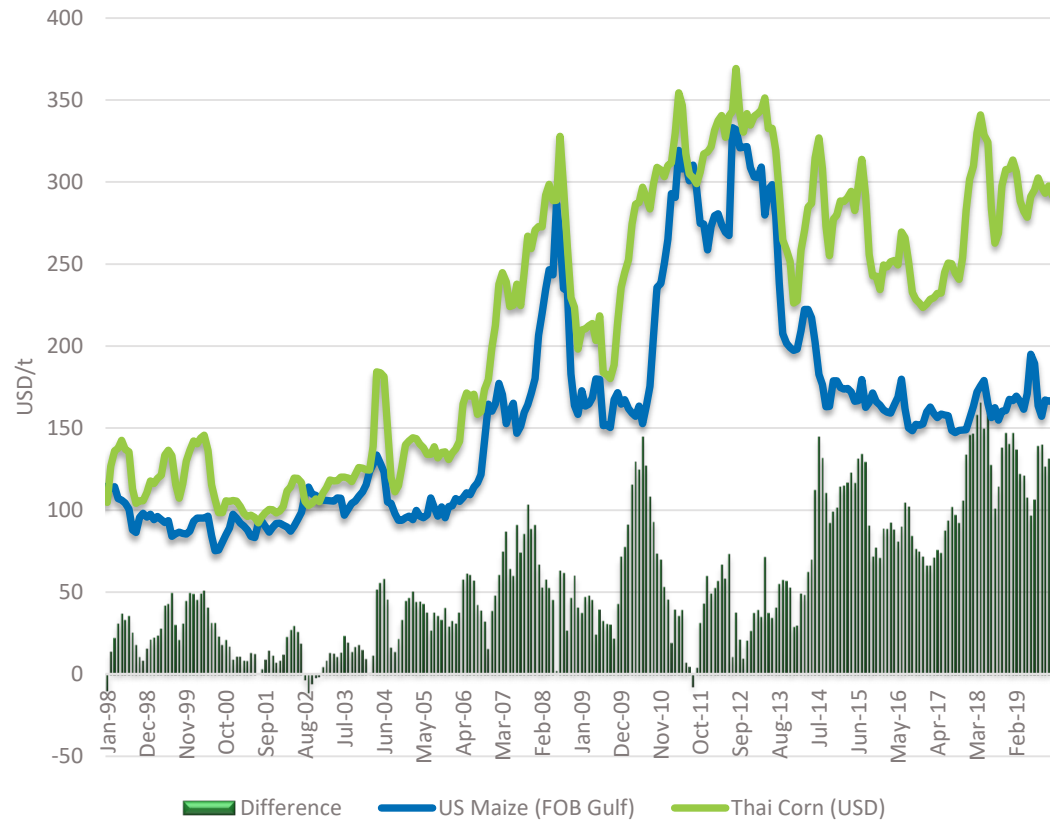
Dalian Futures for a September delivery fell below RMB 1600/kg.

Chinese maize, US corn starch and Thai cassava starch

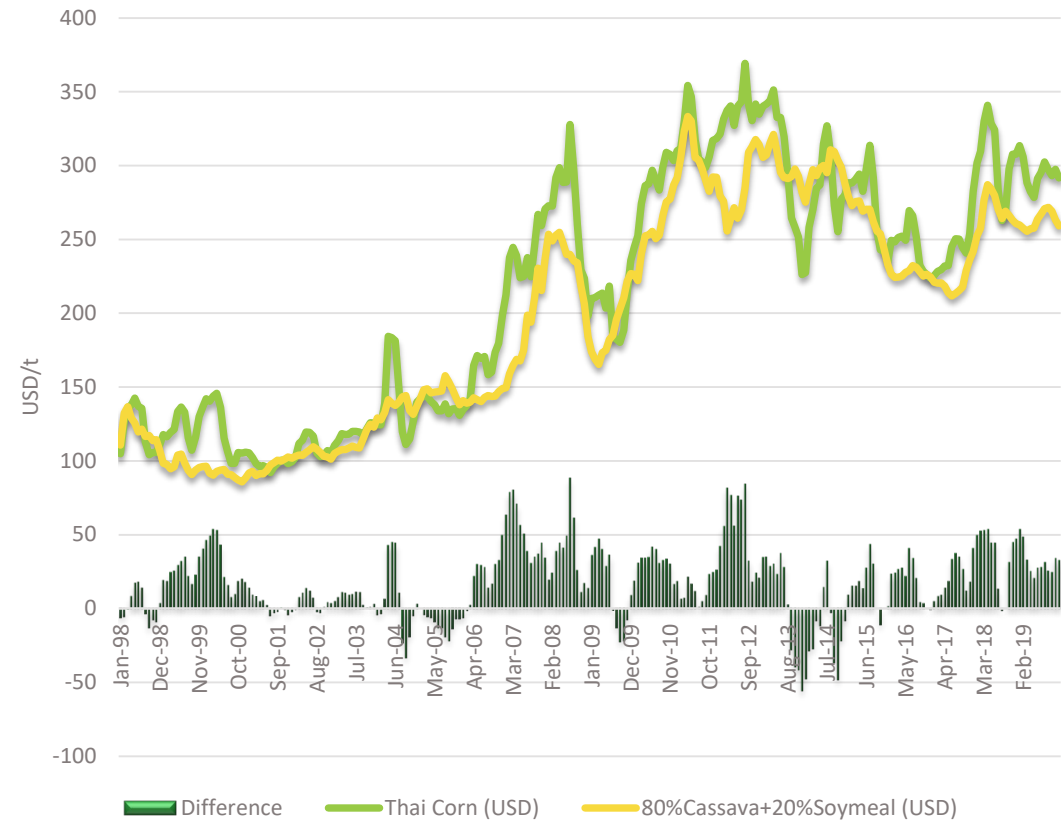


Maize price in Thailand impact on cassava price

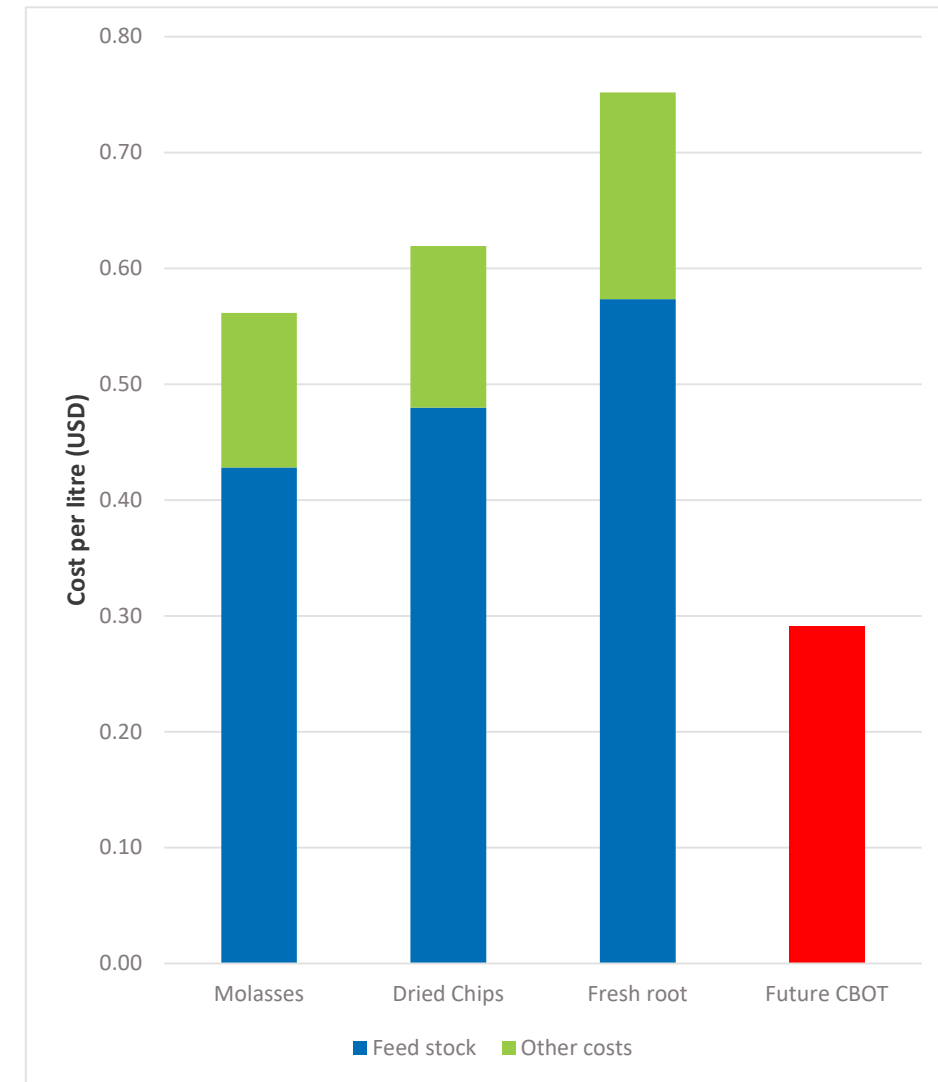
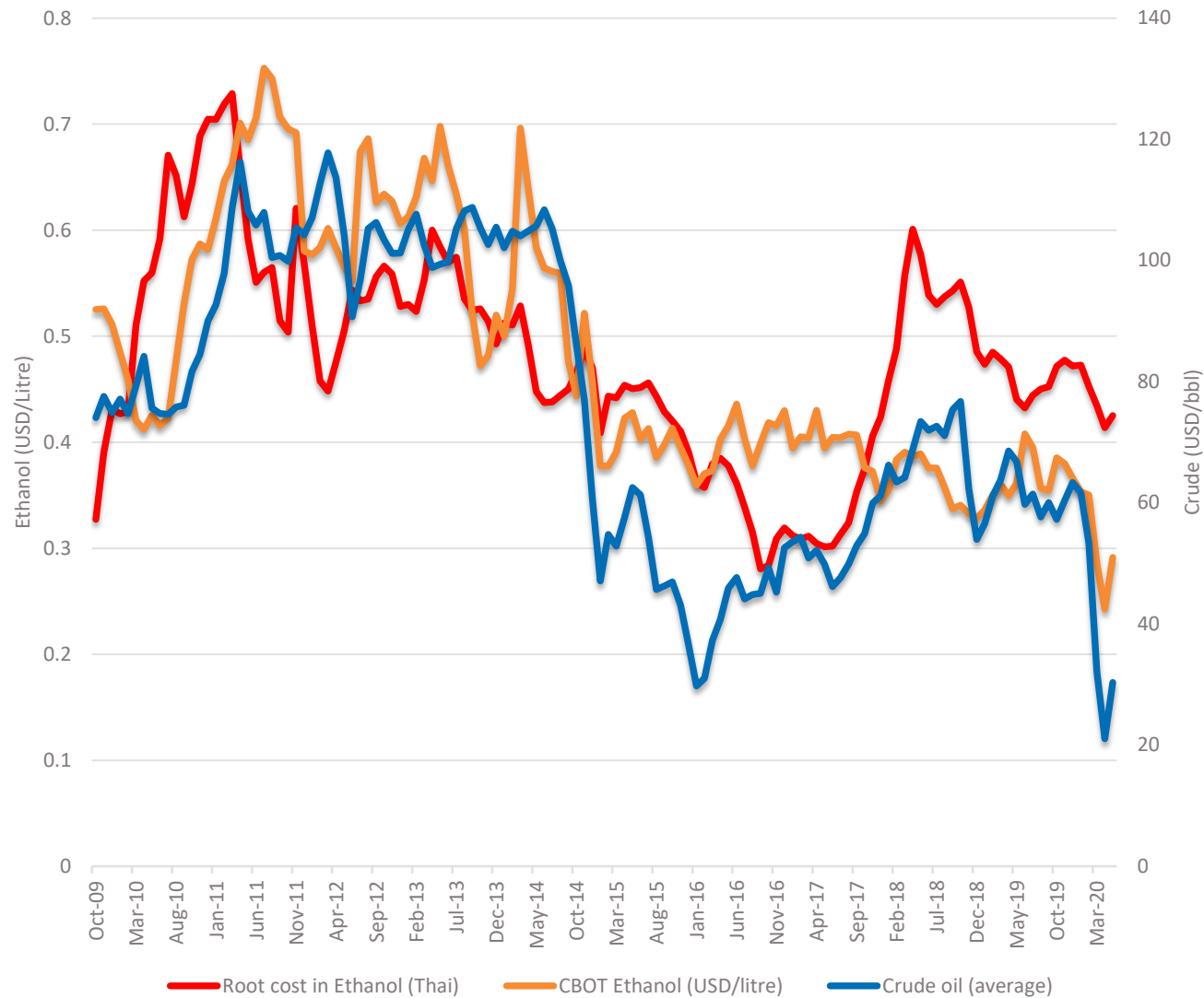
Maize price support 8.5THB/kg for 2019-2020 crop
Tariffs and quotas



Cassava price guarantee is set at 2.50 baht per kg, limited to 100 ton per family.



Biofuel mandates, Ethanol prices and cassava



Energy Ministry keen to maintain subsidies for biofuels

PUBLISHED : 30 JAN 2020 AT 04:01

NEWSPAPER SECTION: BUSINESS

WRITER: YUTHANA PRAIWAN



A pickup gets refuelled with biodiesel B20 at a Bangchak petrol station. (Photo by Varuth Hirunyatheb)

- Impact on demand for cassava
- Impact the price of cassava roots
- Impact on competitiveness of other cassava sectors
 - starch, livestock feed
- Those secondary processors look for alternative cheaper feedstock if possible
 - Eg. Sweetener manufacturers

Non-price trade barriers

- Quarantine concerns on raw material and inputs (stems)
- Quality standards
- Restricting the export of raw products to encourage domestic value adding
- Other geopolitical concerns between trading partners

Việt Nam's agricultural products facing barriers to enter Chinese market

Update: June, 07/2019 - 10:42



Two officials from the Ministry of Agriculture and Rural Development check the quality of cassava in the southern province of Tây Ninh. — VNA/VNS Photo Thanh Tân

HÀ NỘI — Many of Việt Nam's agricultural products — especially rice, vegetables and cassava — have faced barriers preventing their export to China, according to the Ministry of Agriculture and Rural Development.

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Bioversity
International

CIAT
International Center for Tropical Agriculture
Since 1982. Science for sustainable change.



The outlook is impacted by a wide range of policies aimed at supporting domestic farmers, self-sufficiency, promote development, achieve other policy objectives

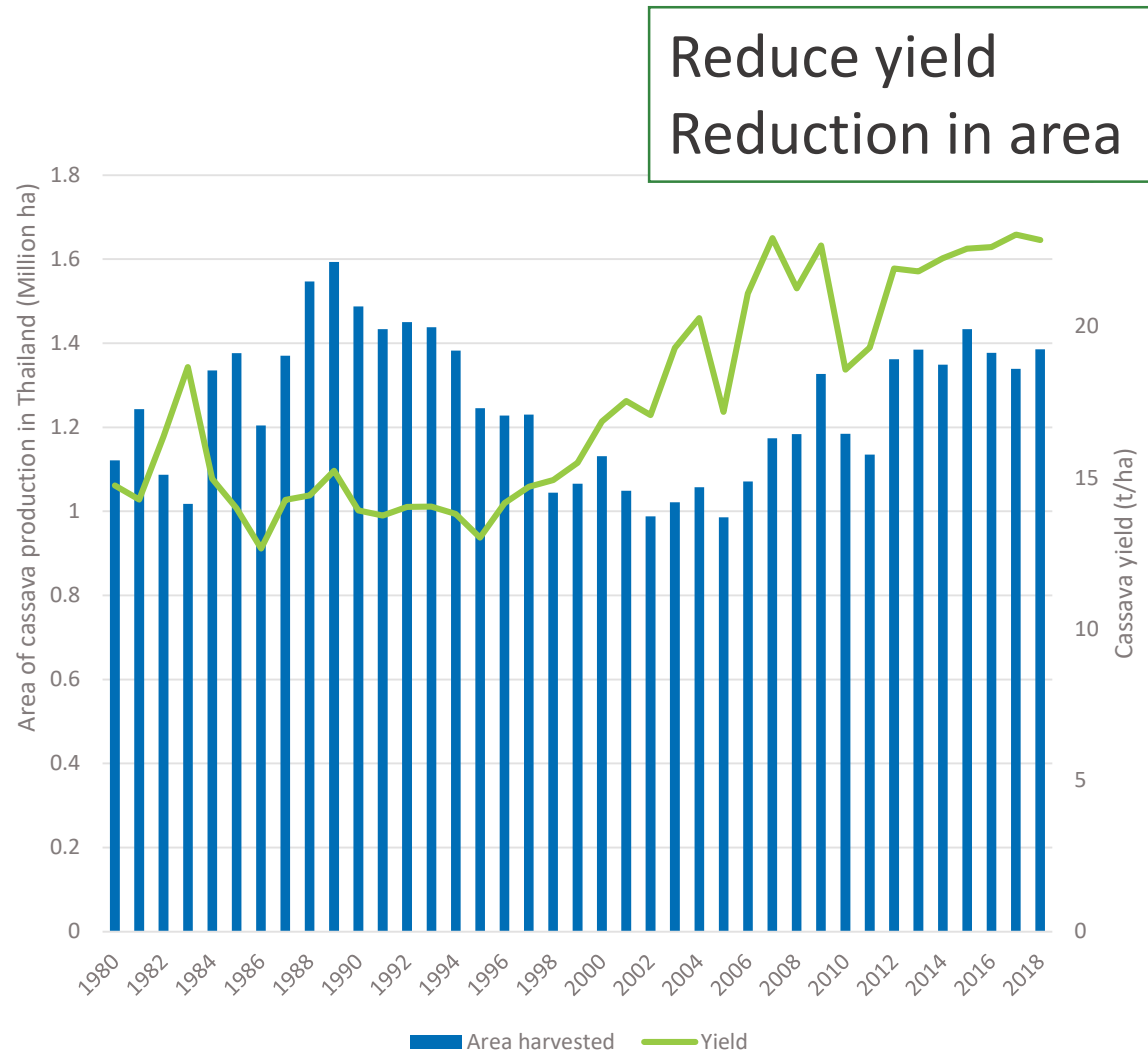
Not only for the commodity of concern (cassava)

Not only in the region of production or consumption (Asia)

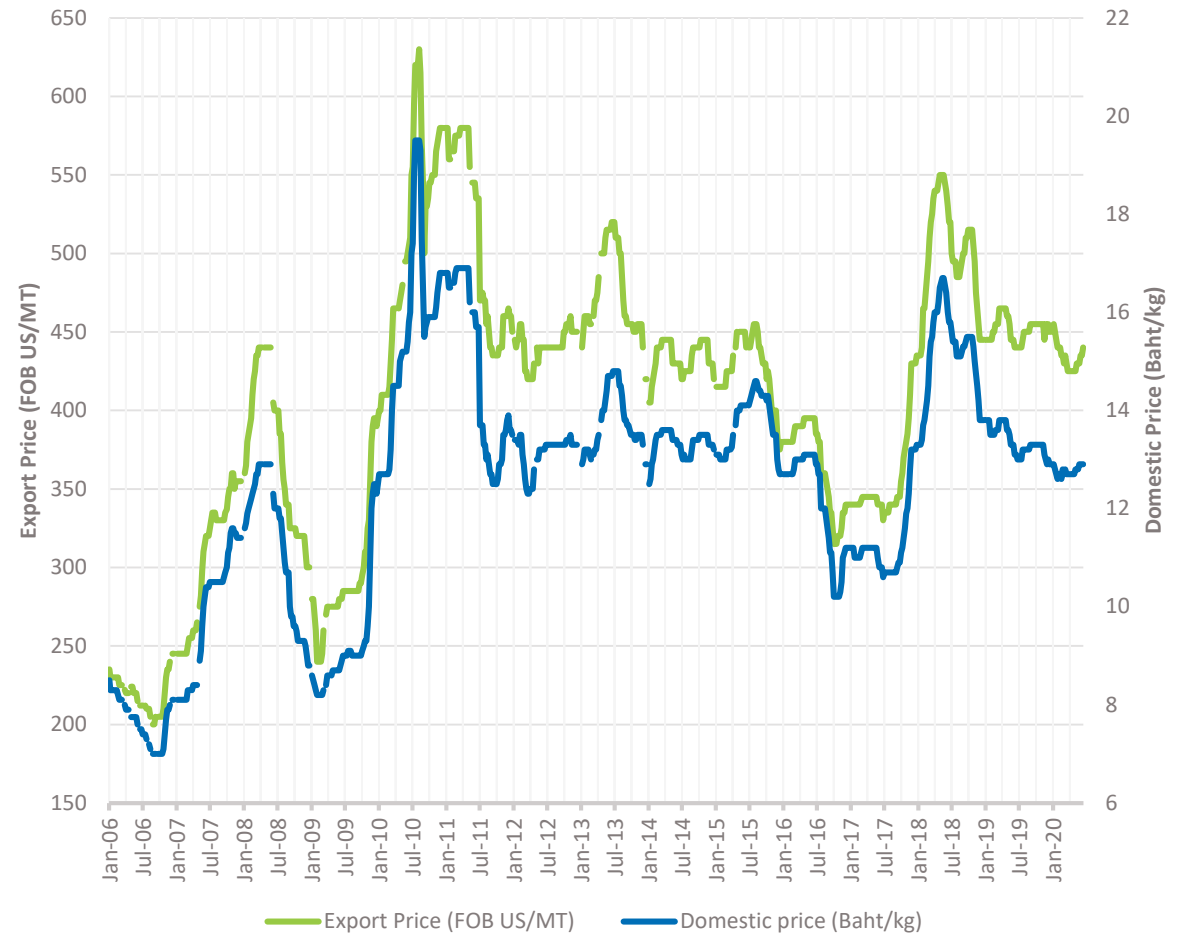
Pandemics



Historical: Cassava Mealybug



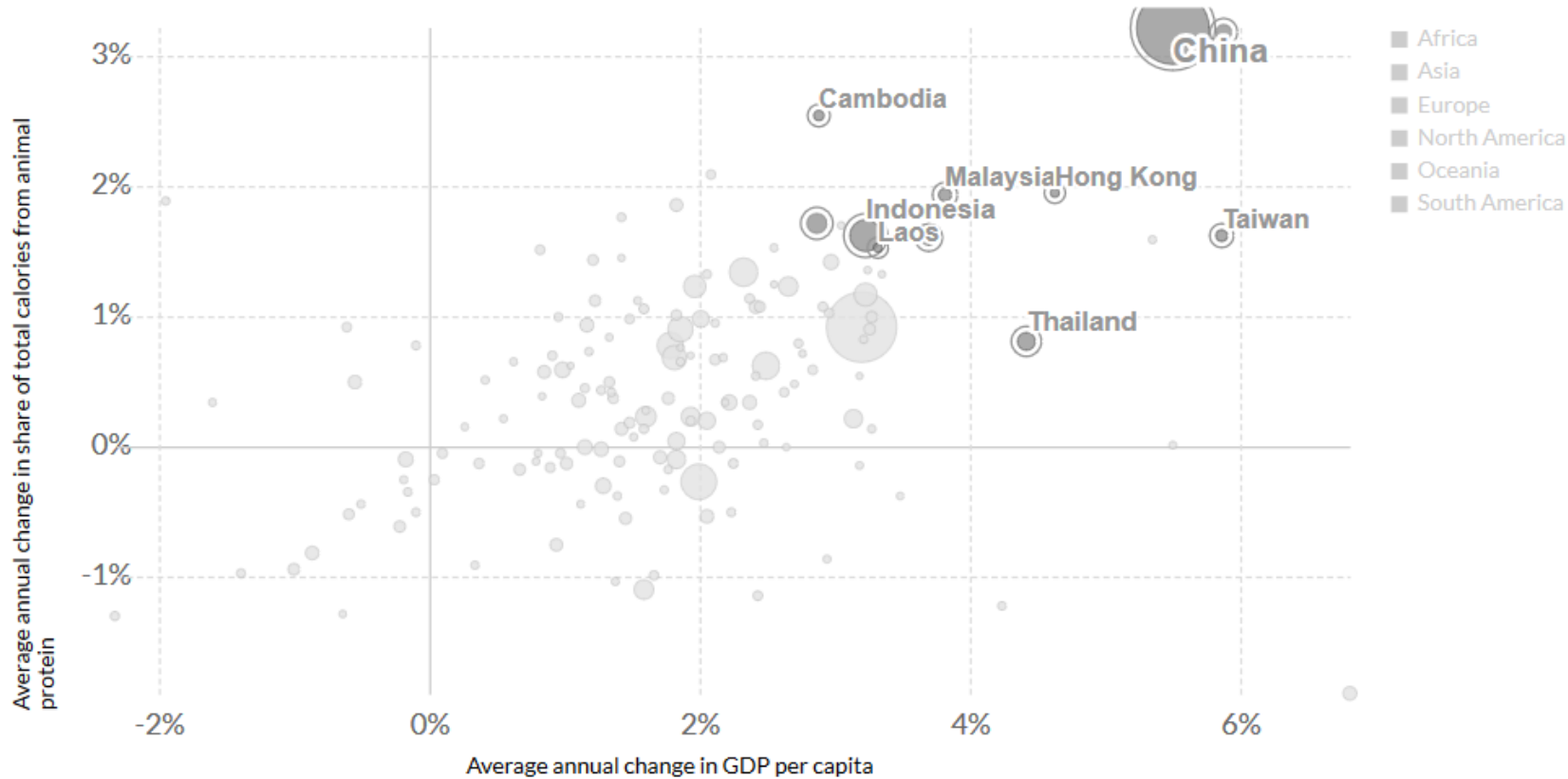
Price spike



Thinking of the livestock feed sector.....

Share of calories from animal protein vs. GDP per capita, 1961 to 2013

Share of calories in the average diet sourced from animal protein (which includes meat, seafood, eggs and dairy products), measured as the percentage of daily caloric intake, versus gross domestic product (GDP) per capita, measured in 2011 international-\$.
Our World in Data



In our Asian story

- Incomes rising
- Consuming more animal protein
- Increase in feed demand

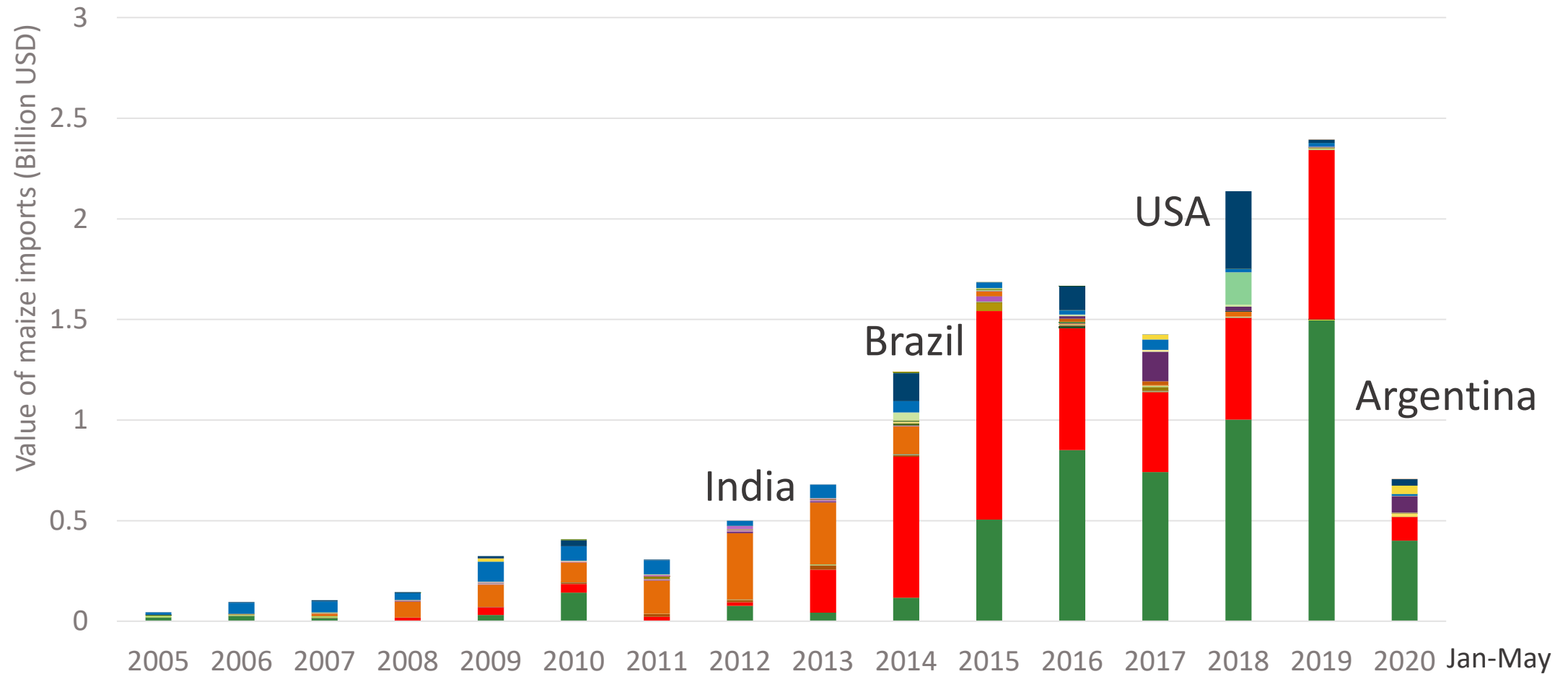
Source: World Bank - WDI; UN FAO

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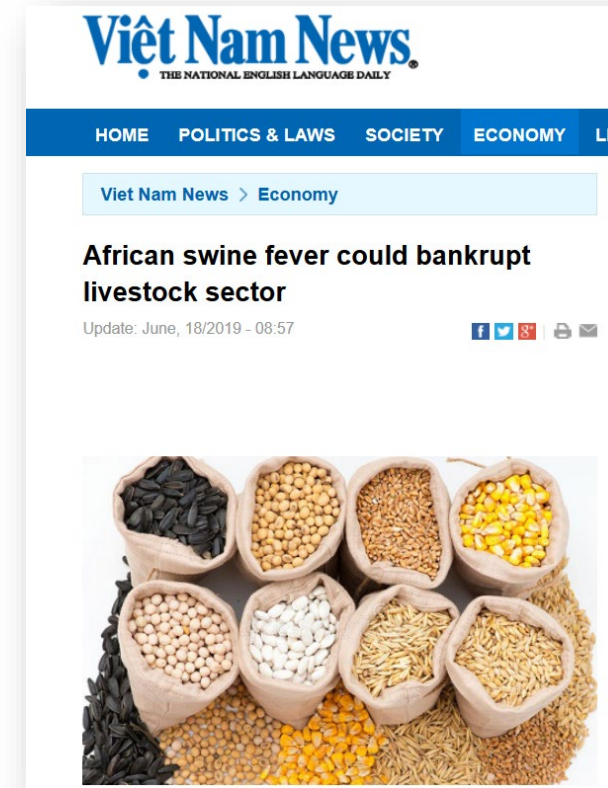
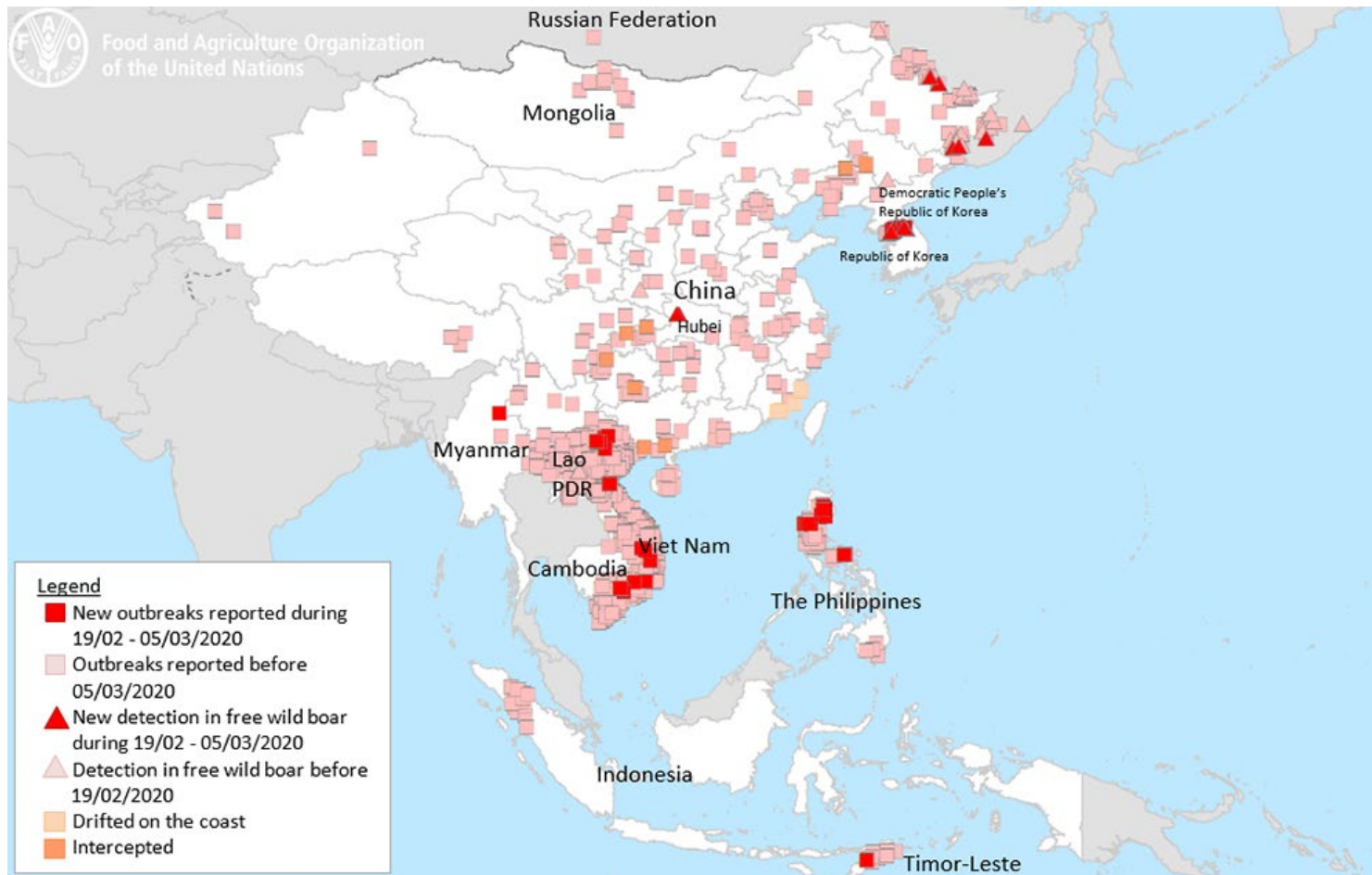


Vietnam maize import bill continues to grow



African Swine Fever

- Impact on feed demand for swine
- Substitution to other sources of protein occurring



Fall Army Worm (FAW)

- Impact supply of maize in the region and rising prices?
- Farmers looking for alternatives to maize? Cassava is a likely substitute in many areas.

Fall armyworm attacks Việt Nam's agriculture

Source: VNS • Posted: 23 Jul 2019 • Originally published: 23 Jul 2019 • Origin: [View original](#)

HÀ NỘI — The fall armyworm has hit Việt Nam and caused serious damage to maize crops in recent months, after leading to the loss of billions of dollars in sub-Saharan countries and Asian countries.

Đồng Nai Province's Đĩnh Quán District reported the first case of fall armyworm in early March on a small maize field of 1.5ha.

Within three weeks, the affected area increased to 276ha, spanning over several other districts of Xuân Lộc, Cẩm Mỹ, Trảng Bom, Thống Nhất and Tân Phú.

The insect has also invaded northern and central localities like Nghệ An, Thanh Hoá, Phú Thọ and Thái Nguyên.

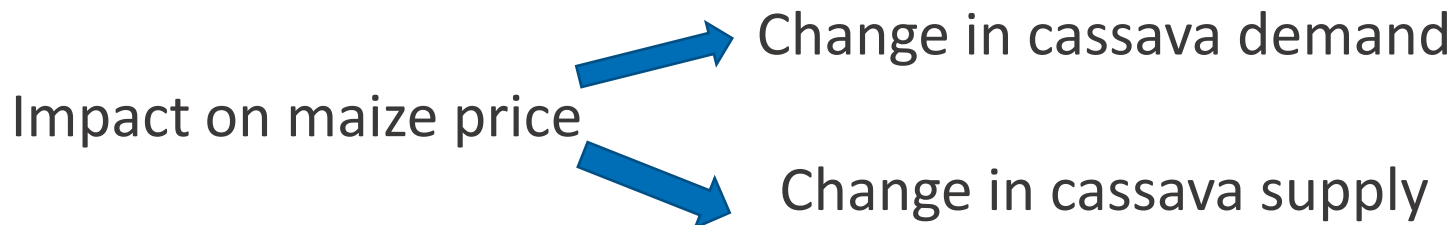
Like an army, each mature worm can eat a corn bud in a few days then keep munching the whole plant. It can pretend to be dead when touched and change body colour based on living environment.

Last week, the Ministry of Agriculture and Rural Development held a meeting with representatives from southern coastal and Central Highlands provinces on fighting the armyworm outbreak.

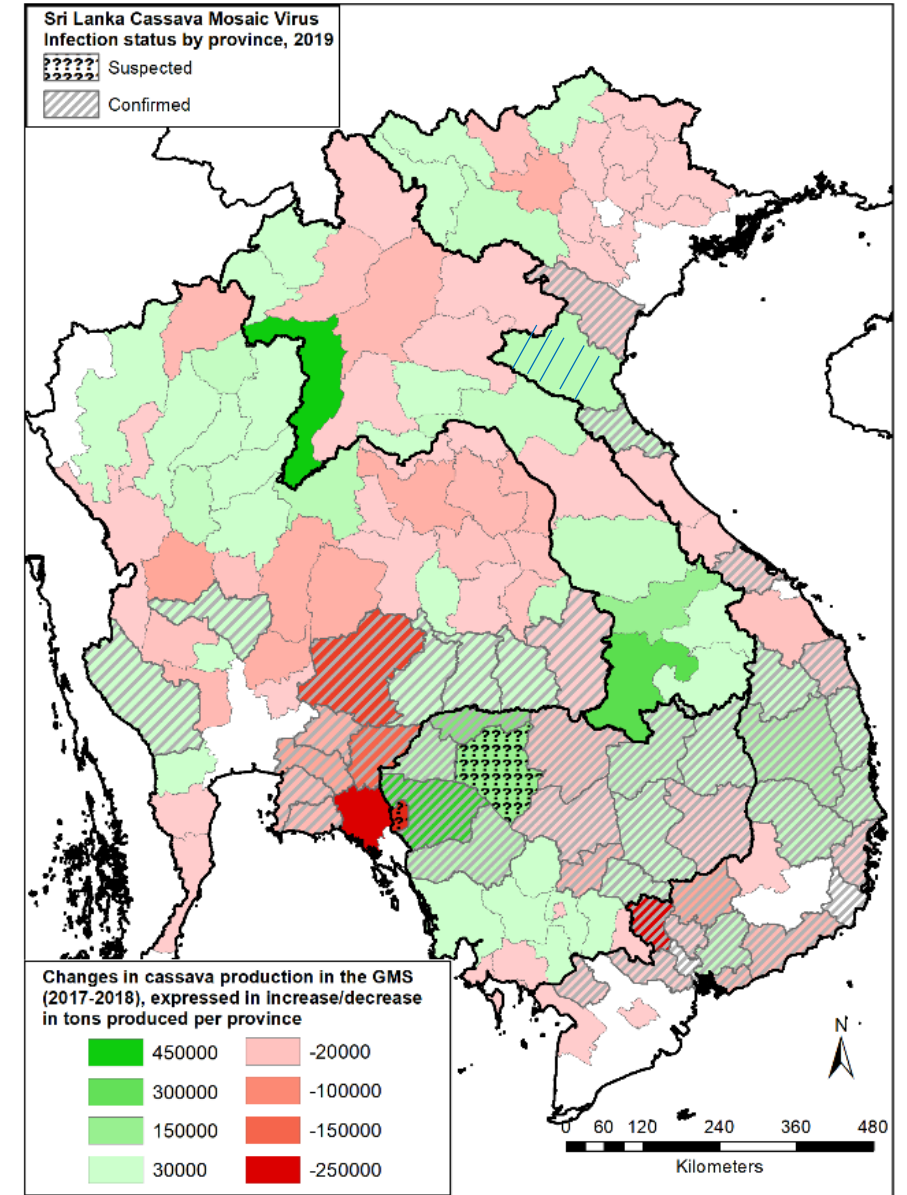
According to the ministry's Department of Plant Protection, by mid-July, 15,000ha of 415,000ha of maize nationwide had been affected.

The southern coastal region and Central Highlands have suffered the most severe damage with more than 7,000ha of maize attacked by the pest.

ASF + FAW = What change in maize balance



Cassava Mosaic Disease





- Yield impact when farmers plant infected stems of susceptible varieties is very high
- Planting clean stems of existing less susceptible varieties can limit losses in the short-term.
- Resistant varieties and being tested and developed at the moment

BUSINESS

Tapioca industry urges action

PUBLISHED : 26 JUN 2020 AT 07:07

NEWSPAPER SECTION: BUSINESS
WRITER: PHUSADEE ARUNIAS



Farmers plant cassava in Nakhon Ratchasima's Phimai district. The cassava mosaic disease has spread across Thailand.
PATTARAPONG CHATPATTARASILL

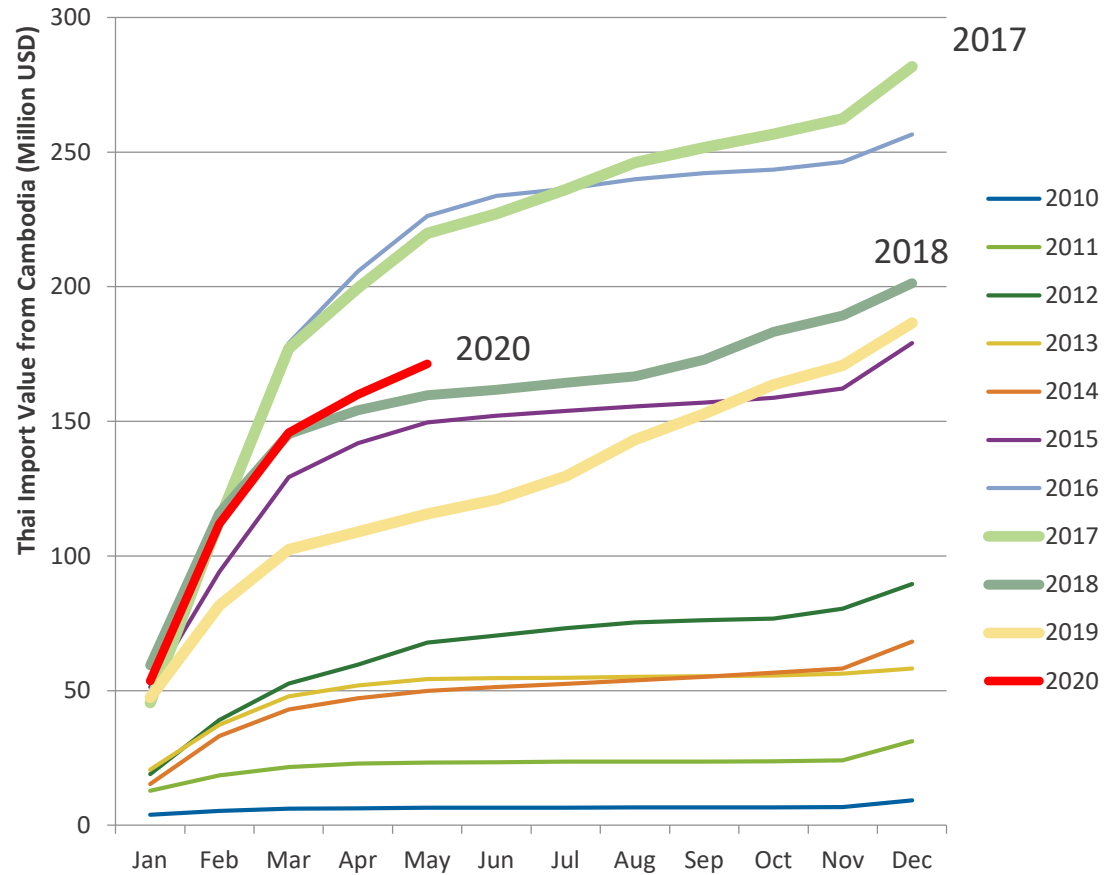
Tapioca business operators have called on the government to speed up tackling the cassava mosaic disease that has ravaged the farmers' produce

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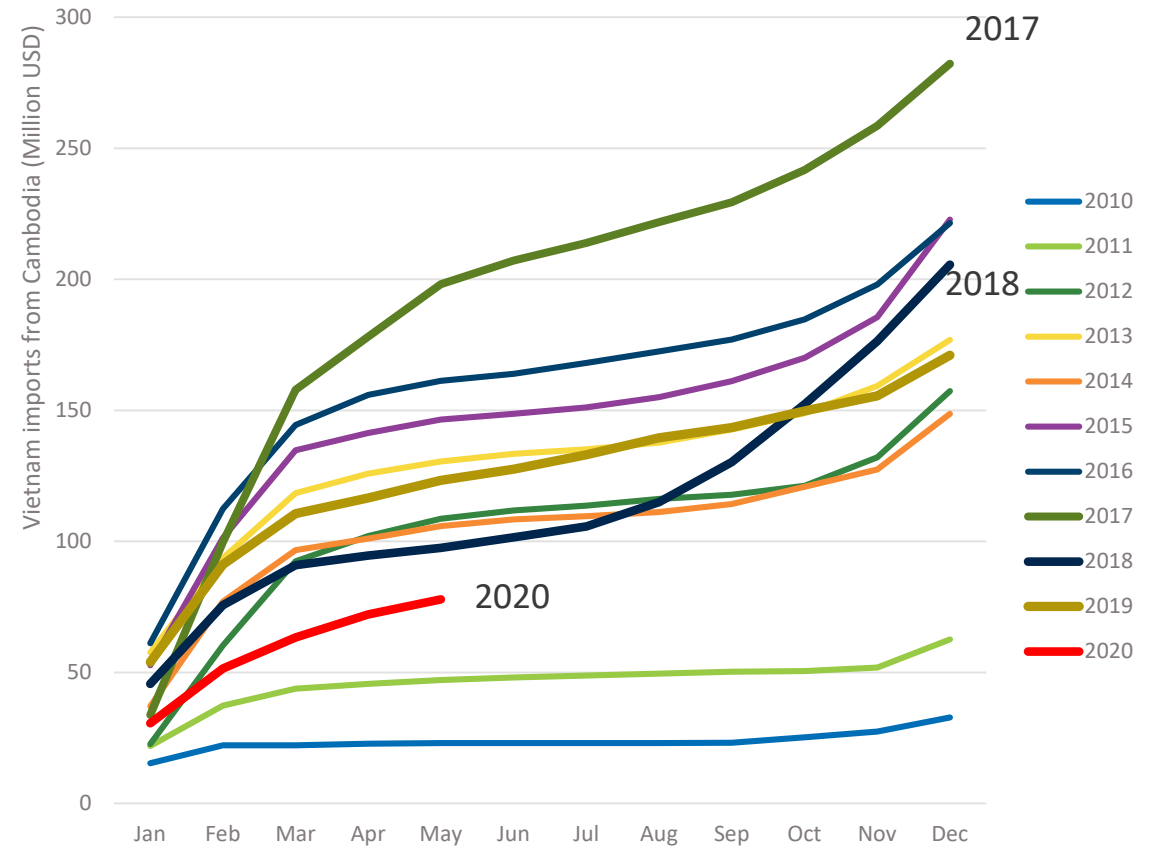


Value of Thailand and Vietnam imports from Cambodia

2017 to 2019 loss \$95.2m

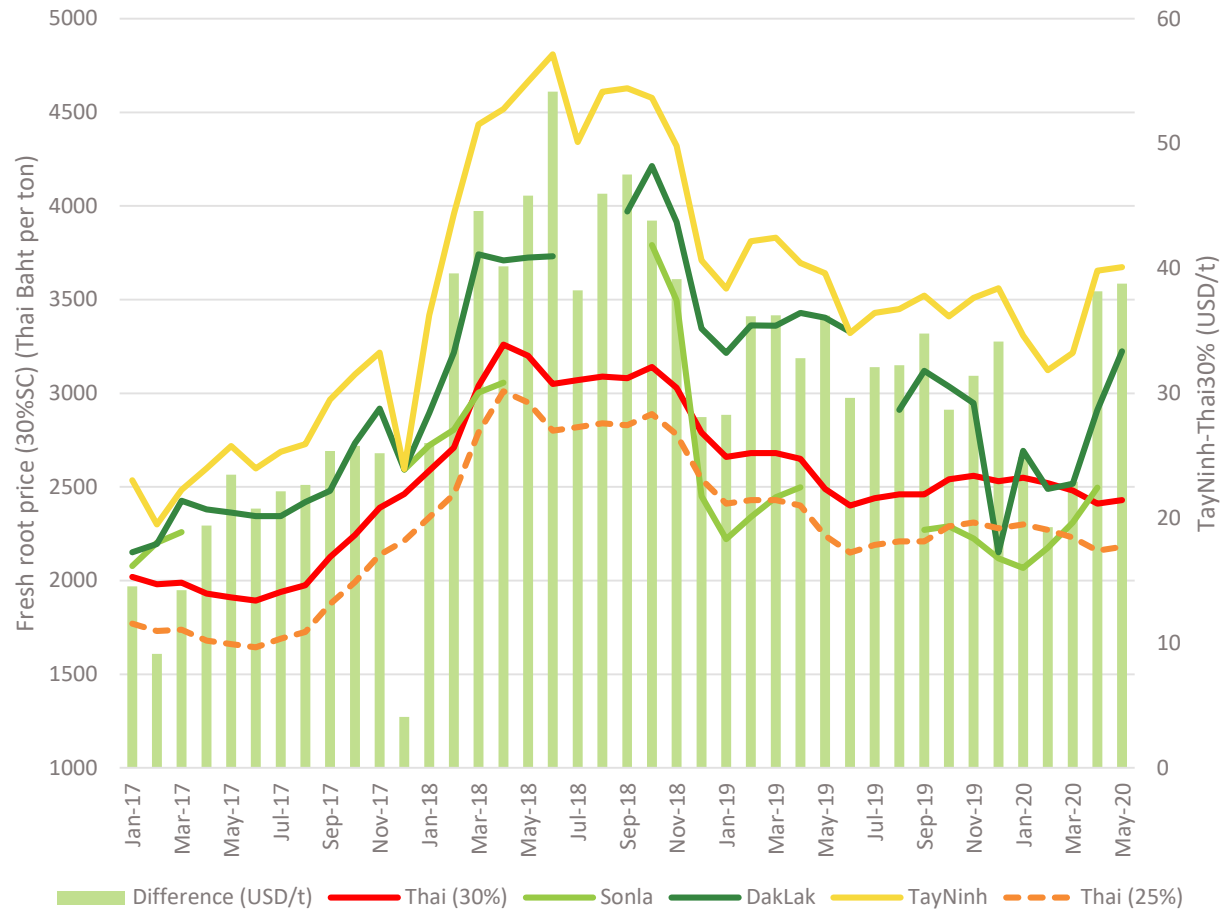


2017 to 2019 loss \$111.2m

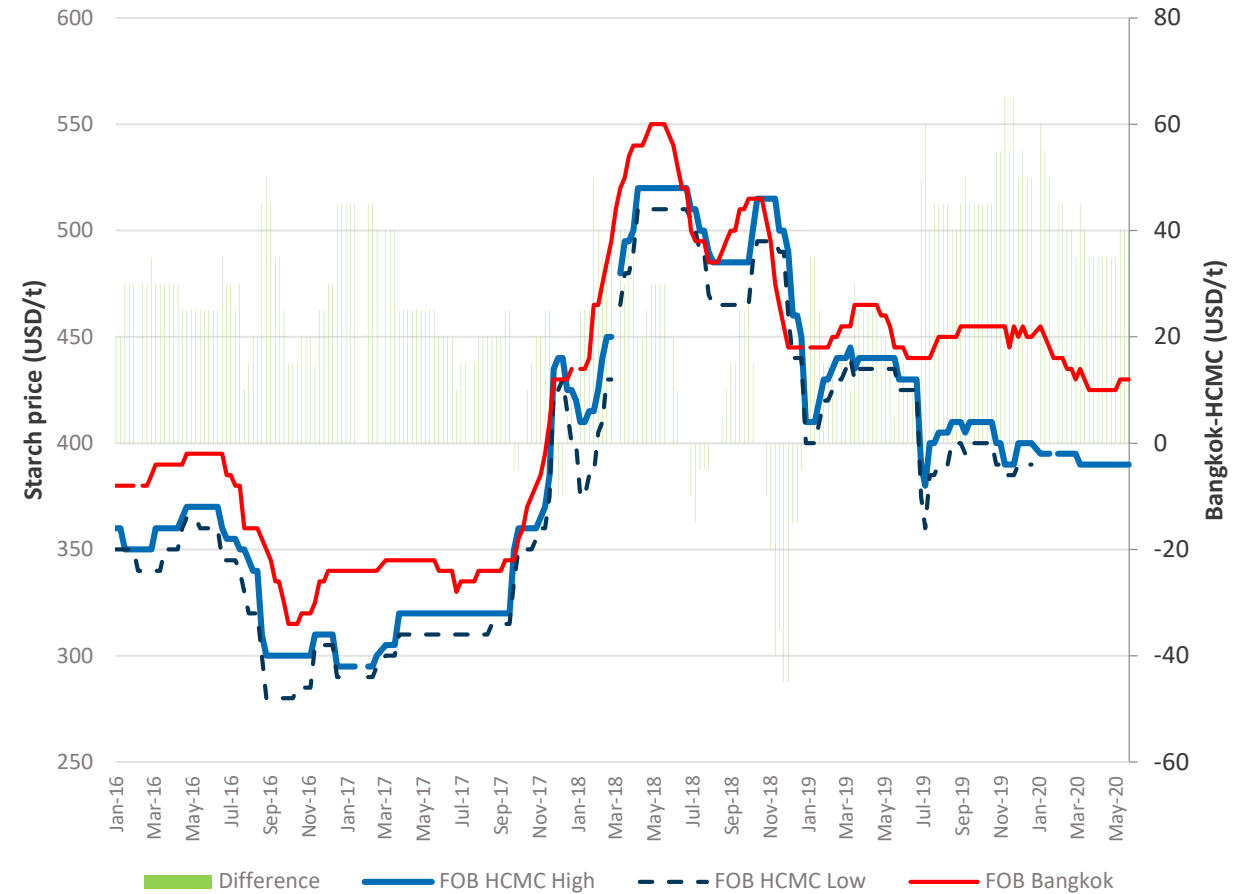


Vietnam relative to Thailand – Excess capacity

\$30 more for Roots

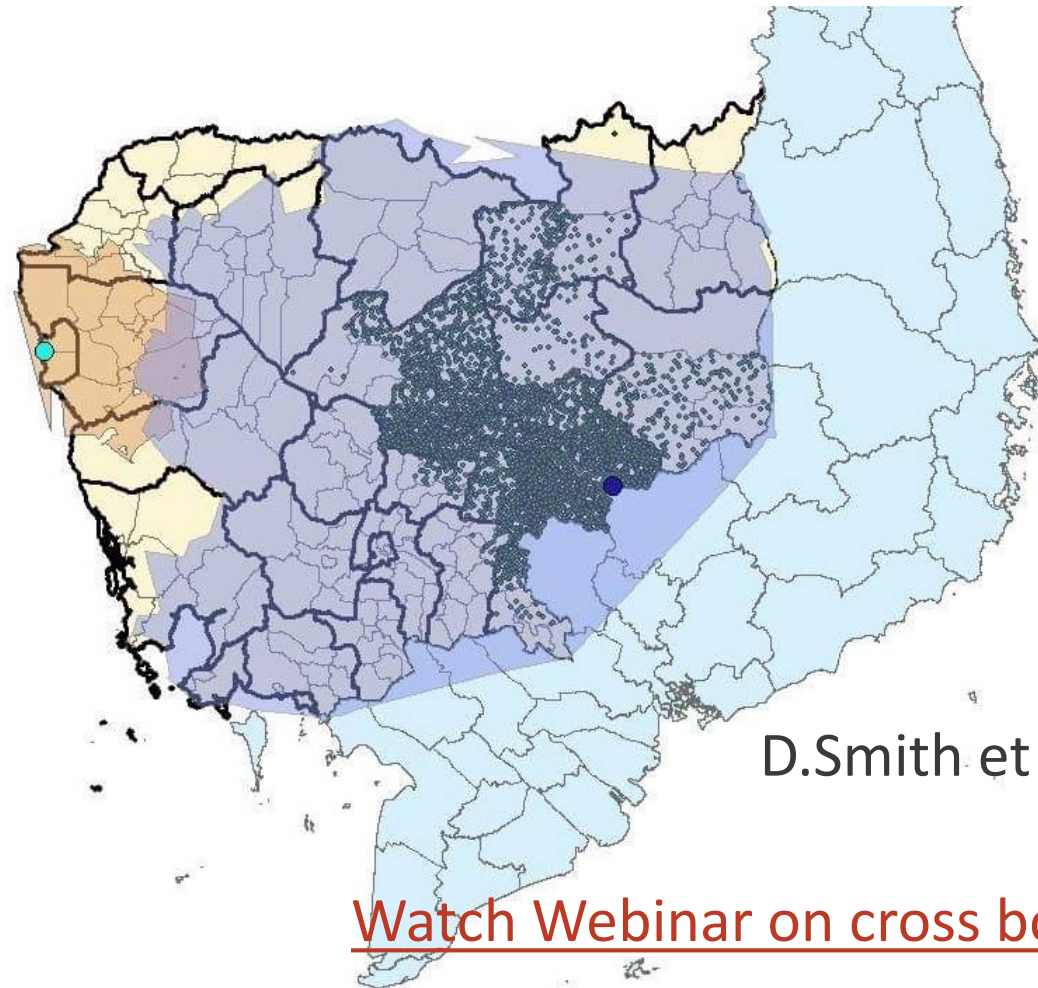


\$40 less for starch



Pushing the extensive margin to the Thai border

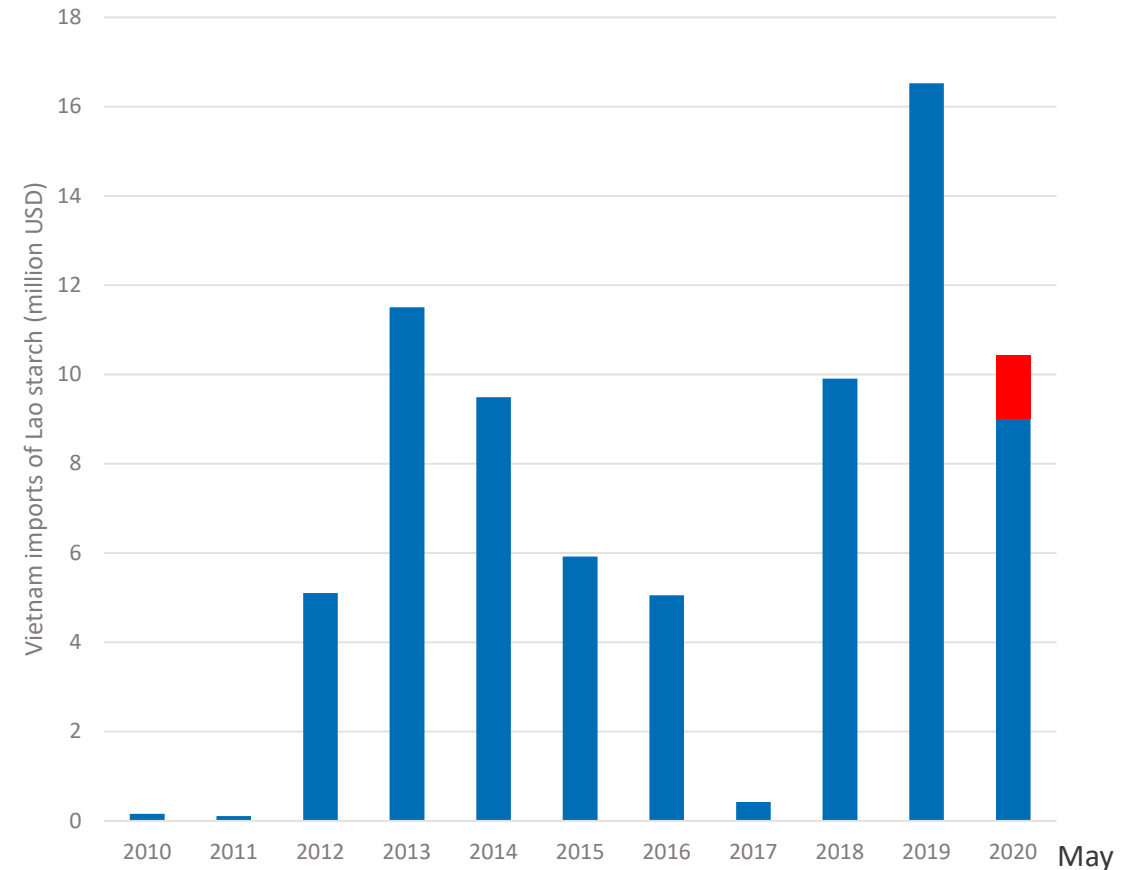
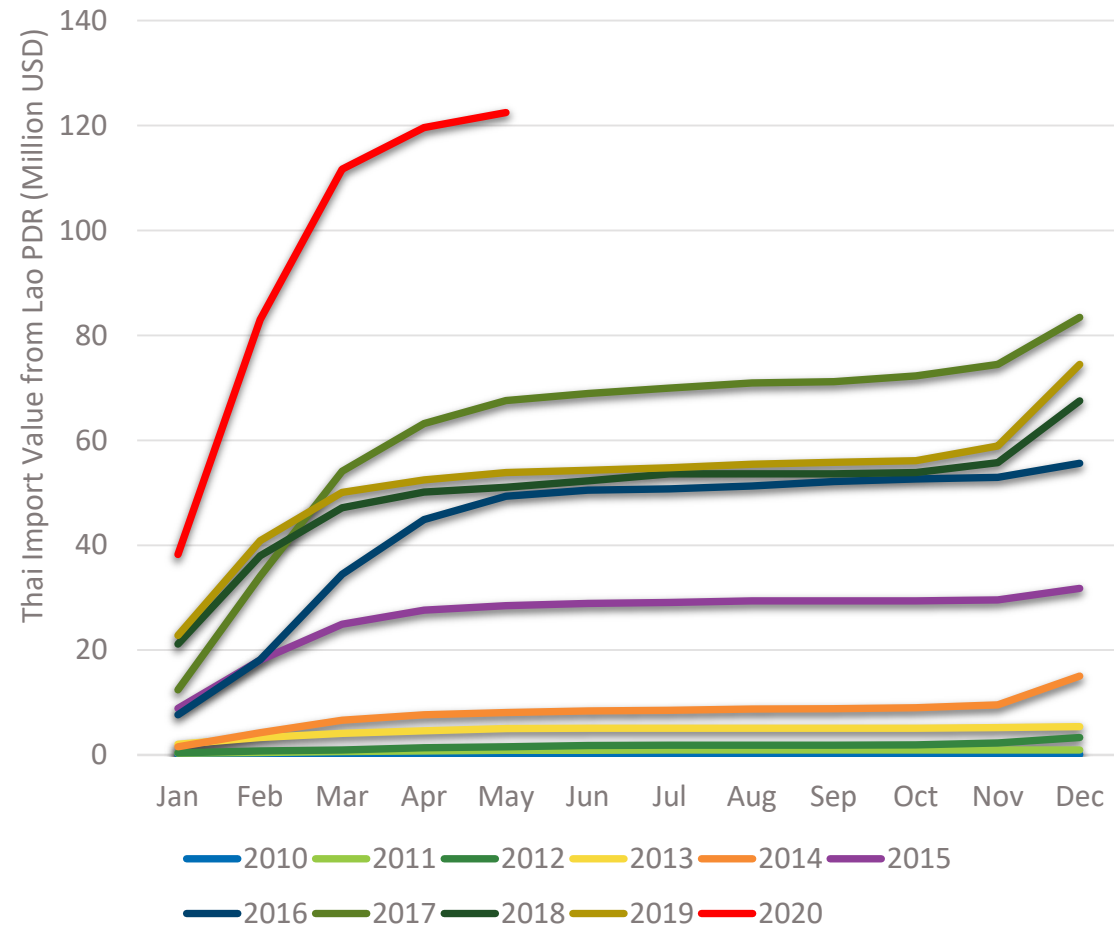
- The Tay Ninh hinterland has extended to the Thai border
- How long can operate in this situation???
 - Not long for small factories with low efficiency
 - New factories in Cambodia
- Importance of co-product livestock feed from residue
 - \$25/t on top of starch



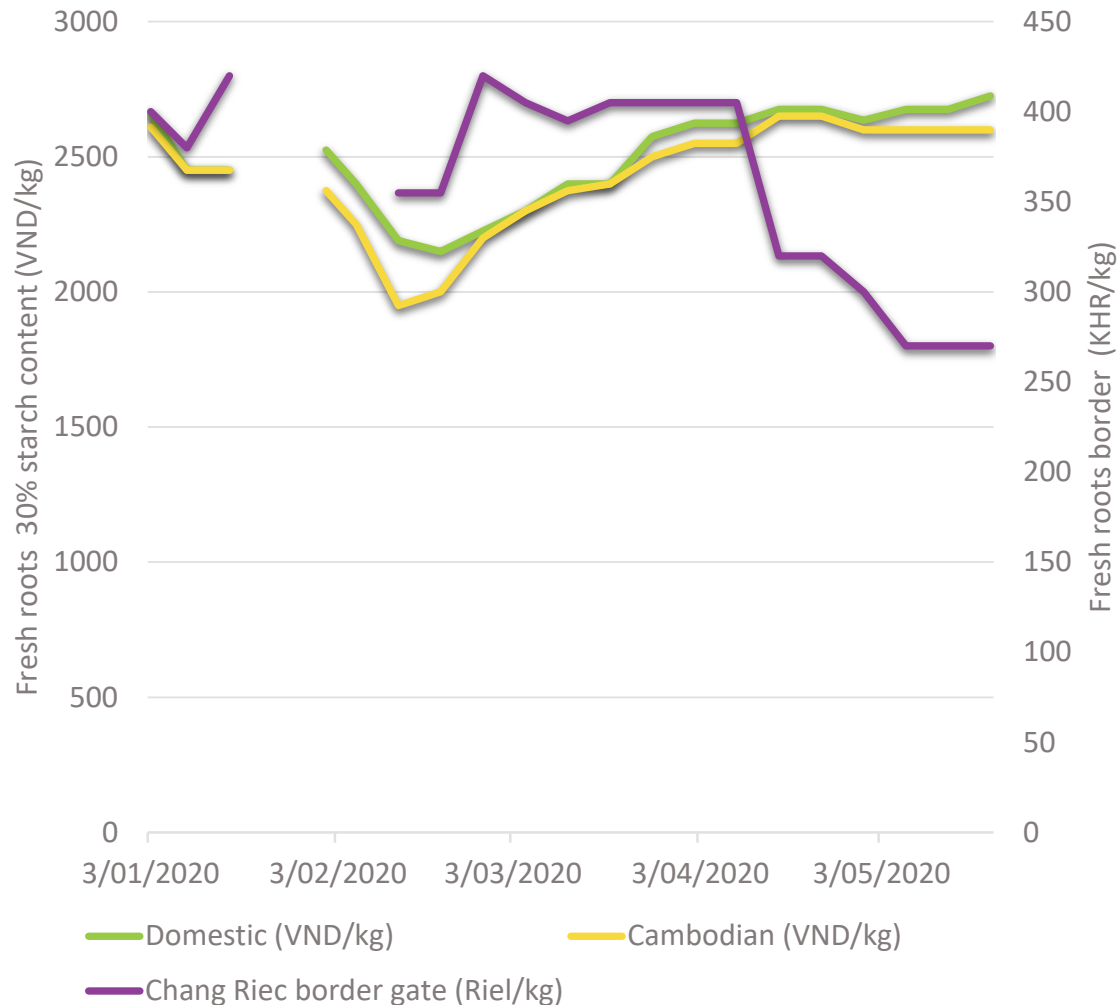
D.Smith et al.

[Watch Webinar on cross border trade](#)

The market looks for new supply – Lao PDR

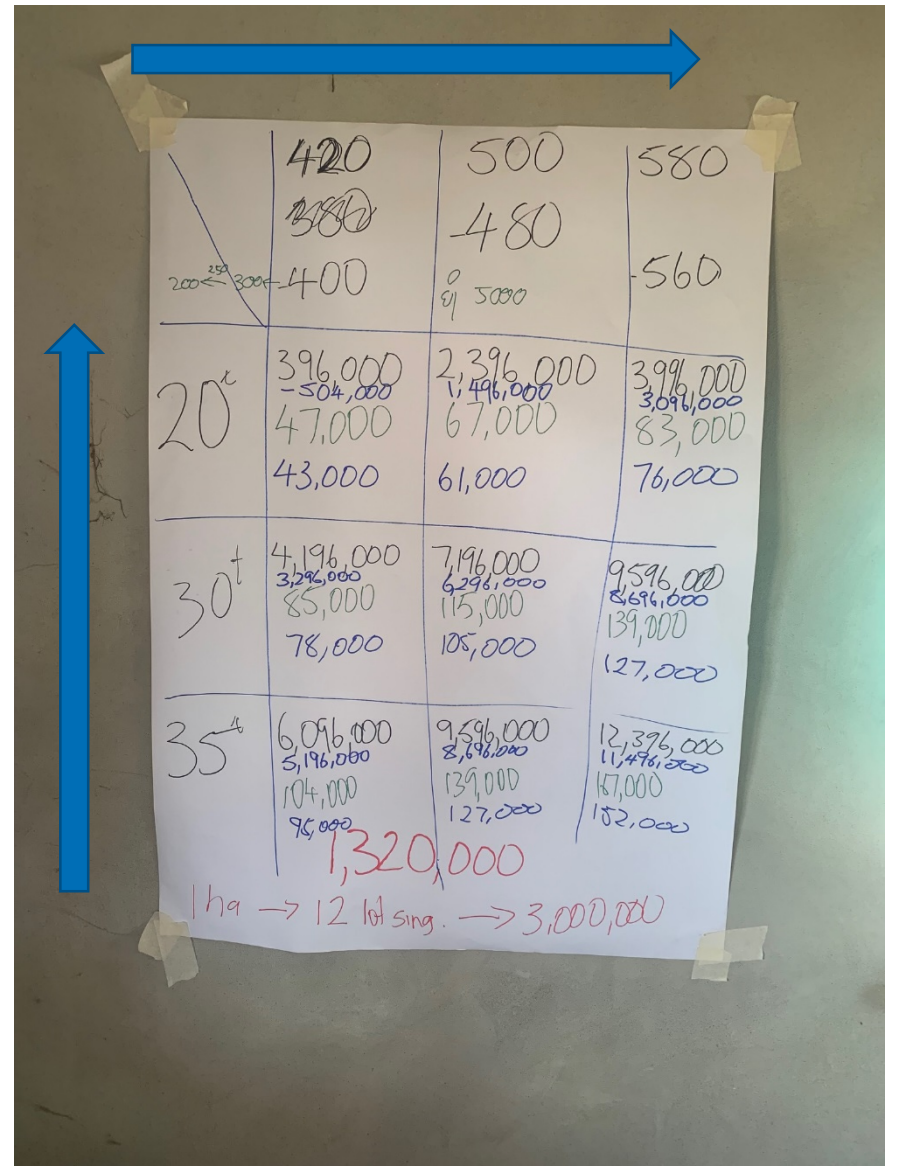


Market implications of COVID-19



- Stockpiling required – reduce processing capacity until border with China opened
- Roots stuck at the border lose quality (starch content) so lower price given to farmers
- Uncertainty gives opportunity for traders
- Lower global demand
- Labour restriction impact planting and harvest
- Remittances and non-farm labour

Connectivity between countries, agricultural markets and sectors means that the prices that farmers receive in a remote upland community could be impacted by a policy or production shock thousands of kilometres away



**Close to real time data on:
production
prices
policies**

**is sorely needed by all actors in the cassava
sector to facilitate investment decisions**



Alliance



Thank you!

<http://cassavavaluechains.net/>

<https://www.facebook.com/groups/1462662477369426/>

<https://cassavadiseasesolutionsasia.net/>

<https://www.facebook.com/groups/2394808117512232>





Australian Government
 Australian Centre for
 International Agricultural Research



RESEARCH
 PROGRAM ON
 Roots, Tubers
 and Bananas

Establishing sustainable solutions to cassava disease in mainland Southeast Asia

<https://cassavadiseasesolutionsasia.net/>

<https://www.facebook.com/groups/2394808117512232/>

