

**APEC FOOD SAFETY COOPERATION FORUM
PARTNERSHIP TRAINING INSTITUTE NETWORK**
Maximum Residue Limit (MRL) Harmonization

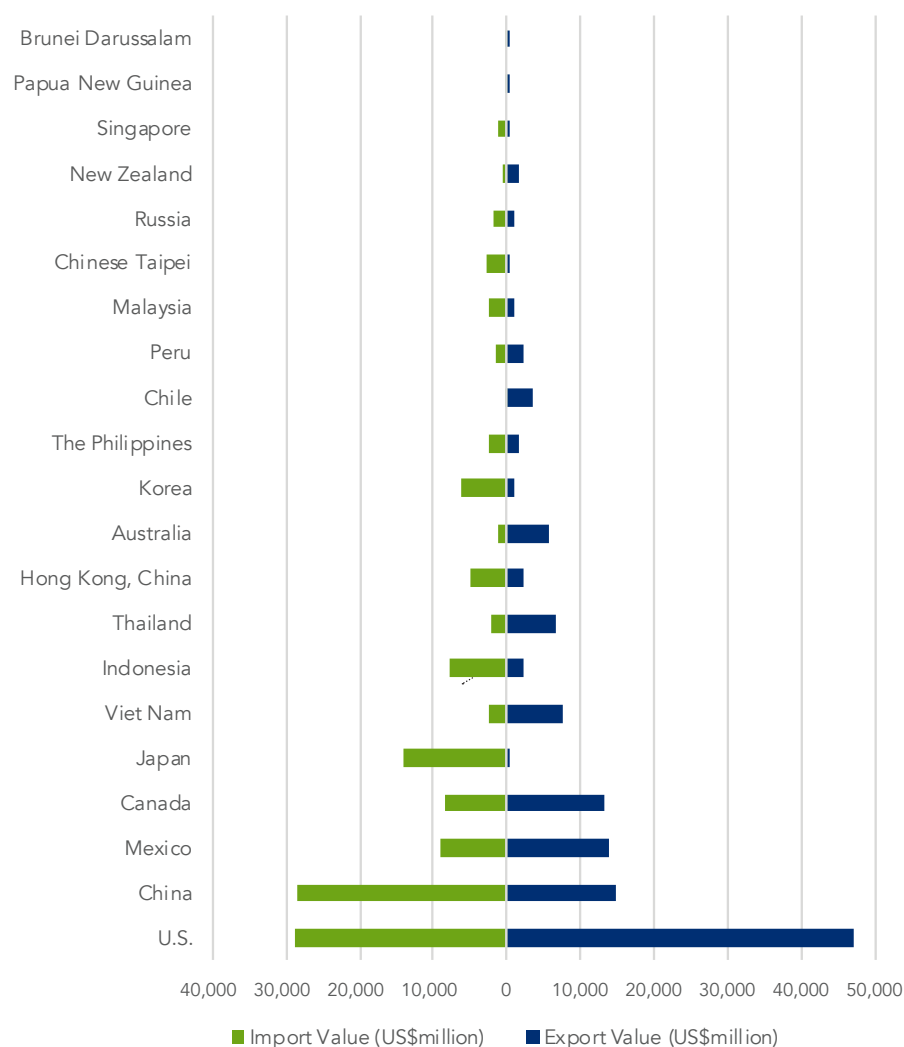
A TRADE FACILITATIVE APPROACH TO PESTICIDE MRL COMPLIANCE

While 72% of analyzed MRLs were found to be harmonized with Codex, strict enforcement of MRLs that are disharmonized without public health justification has the potential to hinder trade within the APEC region.*

Pesticide MRLs are limits set by regulatory authorities to ensure that pesticide use does not cause unnecessary harm to the environment or human health. When agricultural products are imported, border officials test some shipments to ensure that products being imported do not exceed their domestic MRL. When economies have different MRLs, or when economies don't have an MRL at all, it can pose a barrier to trade that increases food insecurity, makes food more expensive, and hurts the economy of both the importing and exporting country.

The United States Department of Agriculture (USDA) recently commissioned a study. We assessed MRL harmonization and the associated economic impact of disharmonized or missing MRLs in the region for 35 commodities.*

Intra-APEC Imports and Exports of Select Commodities, 2017*



* The analysis referenced above includes the following 35 commodities: cherry, celery, oat grain, peach, rice, soybean, corn grain, wheat grain, sorghum grain, almond, apple, lettuce, strawberry, orange, grape, field pea, tomato, onion, potato, carrot, ginseng, walnut, raspberry, cranberry, peanut, tea leaf, cane sugar, cocoa bean, banana, avocado, canola/ rapeseed, kiwifruit, macadamia nut, dragon fruit, quinoa

Although for many commodities there is a high degree of MRL harmonization in the region, there are still many instances in which trade can be unnecessarily disrupted because of missing or disharmonized MRLs. These barriers can cause MRL exceedances, which can cause safe food to be destroyed at the border.

AN MRL EXCEEDANCE DOES NOT INDICATE THAT FOOD IS UNSAFE FOR HUMAN CONSUMPTION

Here are some further findings from our study.

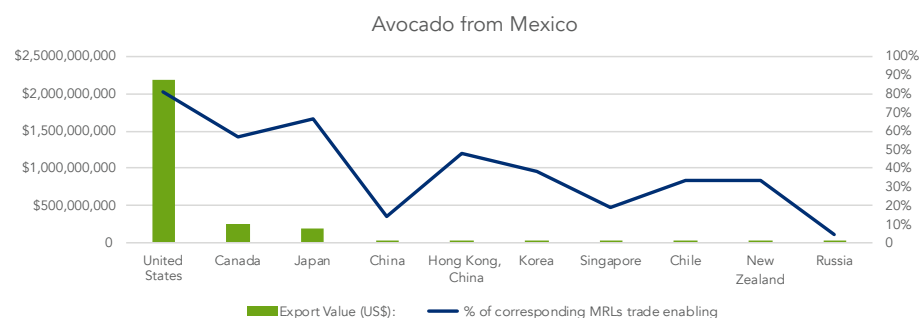


"MRLs are an important issue for trade and trade development. When governments talk about trade, they discuss pests but not MRLs."

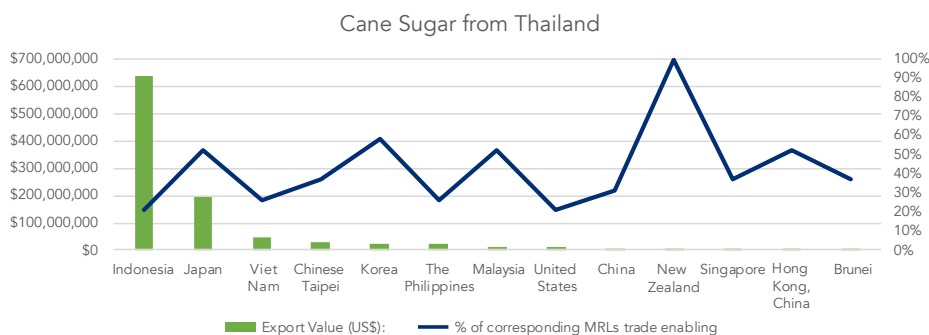
- President, Dragonberry Produce

"When an MRL violation occurs, both the growers and the processors who rely on the input commodity have to manage the financial cost and also have to work to protect their reputations and relationships."

- Grower Association



For certain commodities and markets, there is a high degree of correlation between the percent of MRLs harmonized and high value exports.



For other commodities and markets, there is not a strong relationship between high value exports and MRL harmonization. This impedes regional trade and access to safe, affordable food.

** The study relied on publicly-available MRL violation data from the following economies: Australia; Hong Kong, China; Japan; and Chinese Taipei*





"When pesticide MRLs are missing in key export markets, it costs everyone in the value chain - including customers. Costs to ensure compliance and prevent trade disruption may not be visible to customers, but these costs are real and significant."

-Canola Council of Canada

CASE STUDY

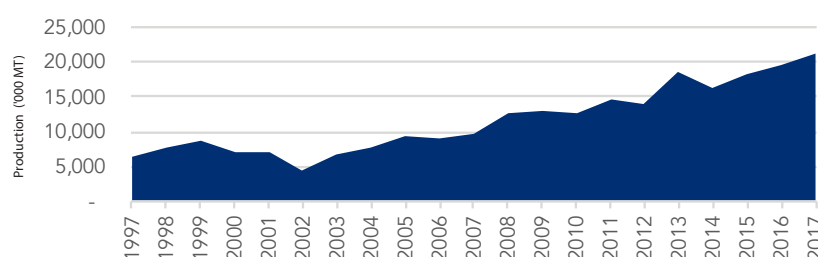
In 2015, the Canadian government approved the use of a new, safe herbicide for canola. This new tool prevents significant yield losses by combatting an invasive weed. However, an MRL had not yet been set for this chemical in several of Canada's most important export markets.

Growers therefore could not use the herbicide, resulting in yield losses that the Canola Council of Canada estimates to be about \$390 million USD over four years.

Several years later, other economies and Codex established MRLs for the new chemical and trade resumed.

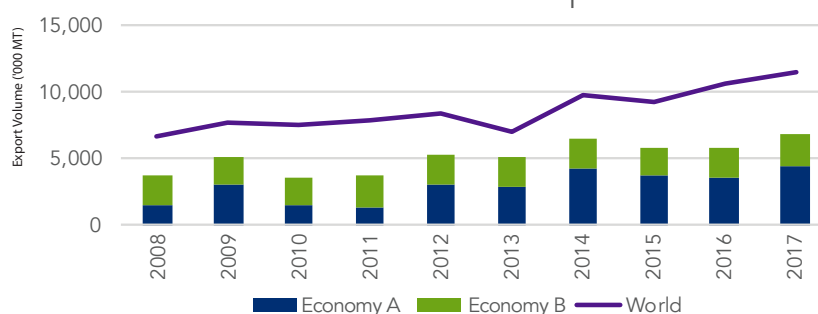
Our work in APEC on MRL Harmonization aims to develop creative solutions for these complex challenges as they arise, so that we can overcome these barriers to regional trade.

Canadian Canola Production



While Canadian canola production increased from 2015-2016...

Canadian Canola Seed Export



...and exports increased to the world overall, exports of canola seed fell to two of Canada's major importers in 2015 and 2016 as a result of missing or disharmonized MRLs.

CREDITS:

This brochure was created by the USDA's Foreign Agricultural Service, Nathan Associates, and Bryant Christie, Inc with support from Julie Cerenzia, Ann Stevenson, Kim Berry, Taunya Atwood, Trevor Newton, Lori Tortora, Julie Chao, Jason Sandahl, and Anna Gore.