DECEMBER 2024 ISSUE #5

AgriGate

A National Agricultural Biosecurity Center Newsletter

NABC
National Agricultural Biosecurity Center

IN THIS ISSUE:

BRINGING NATIONAL SECURITY TO AGRICULTURE PRODUCERS IN THE MIDWEST

Located on the Manhattan campus of Kansas State University, the National Agricultural Biosecurity Center, or NABC, is an integral part of the midwest's expanding animal health corridor. The NABC contributes to and accesses a vast network of interdisciplinary research and resources in the areas of animal and plant diseases, foodborne pathogens, environmental changes, food security, emergency management and One Health.

The mission of the NABC is to facilitate prevention and response strategies that address emerging threats to agricultural economies and the food supply in the U.S. and the world.

TRUMP & TRADE

Why This Matters: The potential impact of Donald Trump's second term on Midwest agriculture is a key concern, given the consequences of his first-term trade policies. During the 2018-2019 trade war, retaliatory tariffs and China's shift to Brazil and Argentina negatively affected U.S. agricultural exports. Economists fear Trump's proposed tariffs on China, Mexico, and other nations could reignite trade conflicts, leading to lower crop prices, reduced exports, and inflation. However, some remain hopeful that Trump's administration could foster new trade deals, potentially benefiting agriculture. Trade agreements like the USMCA will also be crucial in shaping the future of Midwest agriculture, especially regarding dairy and pork exports.

Many of those involved in agriculture are worried about what Donald Trump's second term as President means for the industry. In the 2018 – 2019 trade war with China, U.S. producers felt the effects of retaliatory tariffs and China's shift to buy agricultural commodities from Brazil and Argentina. Some are concerned that Trump's threatened 60% tariff on China, 25% tariffs on all Mexican imports, and 10% levies across the board will have detrimental effects mirroring those of his first term.

Economists are concerned that Trump's threatened tariff plans would push U.S. import duty rates up, increase inflation, and collapse the U.S. – China trade system which could draw retaliation and reorder global supply chains. Some large agricultural organizations like the National Corn Growers

TRUMP & TRADE CONTINUED

Association and the American Soybean Association have conducted studies that forecasts a new trade war with China could pull the U.S. into deeper crop export losses, decrease domestic crop prices, and solidify China's trade shift to Brazil and Argentina.

Even though some are worried about Trump's focus on trade, others in agriculture are hopeful about what it could mean. Kip Tom, the ambassador to the United Nations during Trump's first term, explained that around 50 new trade deals were conducted around the world and thinks that the U.S. will be looking at something similar in the coming years.

Many eyes are also on the USMCA trade agreement. In early 2024, Mexico replaced China as America's top trading partner, however Trump has threatened to impose a 25% tariff on Mexican imports if nothing is done to tighten the border. Mexico's economy minister threatened retaliatory tariffs if that were to happen. Shawna Morris at the National Milk Producers Federation Federation and U.S. Dairy Export Council pointed at issues with Canada and the dairy sector that needs to be addressed. Canada has found work arounds within the USMCA to continue the dairy tariff rate quotas and excessive exports of dairy protein.

Economists note that tariffs on agricultural exports such as beef and pork, which were implemented during the Trump administration, remain in place under the Biden administration. Trade still happens even with tariffs present. U.S. pork exports is one of the sectors that has not been substantially affected by the growing U.S. trade deficit, with record value in 2024 approaching $8.5 billion.

HPAI UPDATE

Why This Matters: The spread of Highly Pathogenic Avian Influenza (HPAI) among dairy herds across multiple states poses significant risks to Midwest agriculture. The virus is spreading rapidly, particularly in California, and could affect dairy operations nationwide. Current testing requirements are seen as inadequate, leaving producers vulnerable to potential outbreaks. A new strain of the virus has also been identified in dairy cattle, raising concerns about its mutation and impact on livestock. While the virus has not yet significantly affected pork supply, the ongoing spread of HPAI underscores the need for more robust surveillance and testing.

962 dairy herds across 16 states have been found to be carrying the Highly Pathogenic Avian Influenza Virus (HPAI). The virus seems to be spreading most rapidly in California where over 200 herds have tested positive since August. Many are pushing for increased surveillance of the virus through bulk testing raw milk and requiring lactating dairy cows travelling across state lines to be tested. The U.S. Animal Health Association stated that the current testing requirements (only lactating dairy cows travelling across state lines) is inadequate and will not help to eradicate the virus. The USDA has developed a voluntary testing program for dairy producers, with fewer than 100 farms participating nationwide. Some dairy farmers have resisted voluntary testing through fear of economic repercussions.

A second strain of the virus has been found in cows in Nevada. This strain (D1.1 genotype) is different from all the other reported bovine cases which contained the B3.13 genotype. The second strain has been seen in wild birds and poultry this past fall, however. The USDA identified this strain in dairy cattle through the bulk testing of milk. Experts point back to the inadequate testing and USDA

HPAI UPDATE

requirements as to why the virus is modifying itself and infecting cattle and humans. There are concerns that new strains of the virus could exacerbate epidemics in birds and wildlife, as the animals are not immune to these new strains.

A pig on a small, backyard farm in Oregon has also tested positive for the virus. The USDA says this does not pose a risk to the national pork supply and that the risk of the public contracting the virus remains low. The pig was not intended for the commercial food supply and has been culled so the USDA can conduct further testing. The USDA says the pig became infected through migrating waterfowl, not humans or cattle.

NATIONAL TOPSOIL DECREASING

Why This Matters: Topsoil loss is a critical issue for Midwest agriculture producers, as the region relies heavily on fertile soil for crops like corn and soybeans. With topsoil eroding at rates faster than it can regenerate, farmers face reduced crop yields, lower productivity, and increased costs for fertilizers and soil management. The Midwest's flat, expansive terrain makes it especially vulnerable to erosion from wind and water. If the loss of topsoil continues, farmers may struggle to maintain sustainable operations, threatening both their livelihoods and regional food security.

The nation's topsoil is rapidly decreasing, and this loss is becoming a significant concern for agricultural sustainability. Topsoil is essential for crop growth, as it contains the nutrients and microorganisms necessary for healthy plants. However, due to a combination of human activities and natural forces, the U.S. is losing its topsoil at an alarming rate.

According to the U.S. Department of Agriculture (USDA), soil erosion is a primary cause of topsoil loss. Erosion occurs when wind and water carry away the nutrient-rich upper layer of soil, leaving behind barren land that is less capable of supporting crops. The Natural Resources Conservation Service estimates that the U.S. loses approximately 2.5 billion tons of topsoil annually. This loss not only reduces the land's productivity but also contributes to pollution as eroded soil is washed into rivers and streams. Intensive farming practices, including monocropping, the overuse of chemical fertilizers, and poor irrigation management, exacerbate the problem. These practices degrade the soil structure, making it more prone to erosion and reducing its ability to retain water. A report from the National Academy of Sciences warns that nearly half of U.S. farmland is losing soil faster than it can naturally regenerate, threatening food security and long-term agricultural viability.

Efforts to combat topsoil loss include promoting sustainable farming practices such as crop rotation, conservation tillage, and the use of cover crops to reduce erosion. According to the USDA's Soil Health Division, implementing these practices can improve soil structure, increase organic matter, and restore soil fertility. If current trends continue, the U.S. risks facing serious agricultural challenges in the coming decades. Addressing topsoil loss requires both policy changes and a shift toward more sustainable farming methods to ensure that future generations can continue to grow the food we rely on.

BRAZIL FINING PACKERS

Why This Matters: Brazil's fines on meatpacking companies for buying cattle from deforested land could indirectly impact Midwest agriculture. As global meat suppliers face pressure for sustainable practices, they may impose stricter requirements on their suppliers, including U.S. producers. This could affect beef exports, particularly to markets in Europe and Asia, where sustainability is increasingly prioritized.

BRAZIL FINING PACKERS

Brazil has recently taken a significant step in addressing deforestation and illegal land practices by fining meatpacking companies for purchasing cattle raised on deforested land. This move comes in response to growing concerns over the environmental impact of cattle production in the Amazon, which does contribute heavily to the deforestation of the area.

The Brazilian government has levied fines on several packers for violating regulations that prohibit the purchase of cattle from farms that engage in illegal deforestation. The country's vast cattle industry is a major driver of deforestation, with large areas of rainforest cleared for grazing. According to data from the Brazilian Ministry of Environment, illegal deforestation in the Amazon surged in recent years, with much of it linked to cattle ranching.

To combat this, Brazil has implemented a policy known as the "Cattle Agreement," which requires packers to ensure that cattle they purchase are not linked to illegal deforestation. Under the agreement, companies must track the origin of cattle to ensure they are not sourced from farms that violate environmental laws. Those that fail to comply face hefty fines.

The fines are seen as a vital step in curbing deforestation and encouraging sustainable agricultural practices. Meatpacking companies like JBS and Marfrig, major players in Brazil's meat industry, have faced increasing pressure from environmental groups and international buyers to ensure their supply chains are deforestation-free. With global demand for beef remaining strong, these fines send a clear message that environmental responsibility is becoming an essential component of agricultural business in Brazil.

While these measures mark progress, experts argue that enforcement needs to be stronger and more widespread to effectively protect the Amazon and other critical ecosystems. The situation highlights the tension between economic growth and environmental sustainability in one of the world's largest agricultural producers.