New Zealand Dairy Industry Responds to Product Contaminant Issue

Report Categories:
Agricultural Situation

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Report Highlights:
Dicyandiamide (DCD), a chemical sprayed on to pastures by some farmers to inhibit nitrate leaching, has been found in trace amounts in some New Zealand dairy product exports. On January 25th, 2013 the Government of NZ announced the two fertilizer companies who sold the product had voluntarily withdrawn it from the market. Despite assurances the contaminant at the levels found, is not a food safety risk, trade to some destinations has been temporarily disrupted. In the long term the issue is unlikely to harm trade of New Zealand dairy products. On Mar 5th, 2013 the Global Dairy Trade auction averaged price gains of 10.4% over all products which suggests that the majority of players in the Oceania market have put the issue behind them.
Government of New Zealand Moves to Re-assure Markets that Milk is Safe After Dicyandiamide (DCD) is Found in Trace Amounts in Some New Zealand Dairy Exports

On January 25, 2013 the Ministry for Primary Industries (MPI) announced that Dicyandiamide (DCD), a compound used to reduce nitrate leaching, would be taken off the market as a first response to very small traces of DCD that were found in some dairy products. New Zealand Prime Minister John Key was quick to downplay concerns about the safety of New Zealand milk that is tainted by Dicyandiamide (DCD). Fonterra initially made the find in products it had manufactured but at least two other processors have since had product that tested positive.

DCD is used to inhibit nitrate leaching into waterways and to reduce nitrous oxide gas emissions from pasture land. Prime Minister Key told media on January 28 that reports by Chinese and U.S. media questioning the safety of New Zealand milk amounted to “misinformation”. The low levels of DCD that were found, were apparently 100 times lower than acceptable European food safety limits. There is clearly much concern within the GNZ and throughout the business community about the reputation of New Zealand dairy products, as the sector remains the driving force behind the country’’s economy. But what may prove to be equally problematic for the Government was the two month delay in releasing the data by the Ministry for Primary Industries.

Background
DCD is a biodegradable compound that has been further developed in New Zealand, for use on pasture land, from similar compounds used in Europe on cropping land. DCD aids in restricting nitrates that leach into groundwater, as well as N2O that is lost to the atmosphere. Only about 1 in every 24 dairy farmers in NZ have been using the chemical since the results are variable and not well proven. The compound has been available for use since 2004.

MPI tested 48 random samples of raw milk for DCD in 2010, and no residues were detected.

Fonterra also instituted testing for DCD in milk and dairy products, partly in response to US FDA work that had been done on DCD testing and safety levels. Initial tests carried out in Sep 2012 showed positive results for DCD in whole milk powder, skim milk powder, and buttermilk powder produced in September. It is thought that most of the positive results were from product emanating from South Island Dairy farms. DCD was not found in the same products made in November. This is consistent with expected outcomes based on the usage pattern of DCD. The levels detected were said to be 100 times lower than the EU acceptable level. Fonterra and MPI are both convinced by the scientific evidence that this is not a food safety issue.

However for reasons that are still rather unclear there was a delay in the release of this information for several months, while MPI and some industry stakeholders met and decided how to handle this information. Possible courses of action include: voluntary ending of DCD sales for the foreseeable future; an information campaign to educate the public on the safety of all dairy products from New Zealand; and an industry strategy for dealing with inevitable disruptions to trade.

Trade Perspective
Although there appears to be no food safety concern, even at the low levels detected international regulators and customers are likely to view DCD residue as a contaminant. As there is no international standard for DCD in food any residue could be considered unacceptable to New Zealand’s trading partners.
From a long term perspective it seems that regular dairy product trade is not likely to be affected. However, there has been some disruption to sales of product manufactured between approximately August 2012 and mid January 2013 when the announcements were made and it was known the fertilizer companies were not selling the compound any longer. Some countries like China and Taiwan are insisting that every batch of product produced during this period be tested. Some product is being stopped at the border and is being subjected to long wait times before decisions are made to accept or reject shipments.

**Subsequent Dairy Product Pricing - Oceania**
The continued strengthening of dairy product prices was underscored at the last Global Dairy Trade Auction (3/5/2013) where the overall pricing index shot up 10.4%. Whole milk powder recorded a huge jump in average pricing of 18%.

![Global Dairy Trade Auction Nominal Results All Products Weighted Index](chart.png)

Source: GDT

The most likely reason for the increase is concern over supply from Oceania. Australian production is coming in less than had been initially forecast and the drought in New Zealand will significantly reduce milk flows from February through May from what had been expected.

The recent concerns about the impact of the DCD contamination of some shipments of powdered milk in the spring seem to have faded. The issue does not seem to be having any effect either on volume demanded or the price.