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Keep Zebra chip out of Australia

Potato growers across Australia have been urged to protect the local industry from a major pest which has established itself across the Tasman.

New Zealand potato producers have been coming to terms with the disease Zebra chip.

The disease is seen as dark streaks, flecks or spots in tubers and is having a substantial impact on the country's processing and fresh market industry.



Potatoes go dark brown when they are cooked, causing major problems for the French Fry and fresh potato market.

The disease appears to be caused by a complex of organisms: a bacterium (*Liberibacter*), a *Phytoplasma* and the tomato/potato psyllid.

For Dr Kevin Clayton-Greene, the chairman of the AUSVEG technical advisory group which assists the Potato Industry Advisory Council, the identification of Zebra chip so close to Australia is a major concern.

“The Australian industry must remain vigilant given the proximity of the disease to our shores.

“We can't afford to let this pest into the country as the control and management costs would be extremely high.

For more information on Farm Biosecurity visit www.farmbiosecurity.com.au



Liberibacter was recently confirmed as the cause of Zebra chip, with a phytoplasma also associated with development of the disease. The tomato/potato psyllid (*Bactericera cockerelli*) is recognised as the vector.



The psyllid was first identified on tomato and potato plants in 2006 around the Auckland and Waikato regions of New Zealand and has since spread quickly around much of the country, with some crops severely affected. Adults look like tiny cicadas, 2 - 3 mm long.

The psyllid on its own seems to be a serious pest of potatoes and tomatoes, as well as capsicum and other solanaceous crops, and is very difficult to control.

Liberibacter causes zebra chip in potato tubers as well as plant yellowing and will lead to plant death within two to three weeks of infection.

The Phytoplasma is a bacteria-like organism, which appears to be involved in the complex but its role is uncertain

“We ask Australian producers to maintain the highest level of farm biosecurity to stop the pest entering the potato and tomato industries in this country.

“It’s also important the public don’t bring in plant material from New Zealand which may carry the host psyllids,” Dr Clayton-Greene said.

One psyllid feeding for one hour on a solanaceous plant or weed species can transmit the disease.

According to Rod Turner, General Manager Programs for Plant Health Australia, if it became established in Australia, we’d have difficulty eradicating it unless it’s detected very early.

“The psyllids are hard to control and are strong fliers”.

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“It’s important producers keep a close eye on their crops and report anything that looks like tiny cicadas immediately to the emergency plant pest hotline, on 1800 084 881” Mr Turner said.

“We’d rather have some false reports than let this major pest and associated diseases get a foothold in our country” .

“While the pest is close to our shores, we can keep it out if everyone works closely together to protect Australia from invaders like the psyllids,” Rod Turner says.

Potatoes New Zealand has established a website to help the industry understand the pest and its spread. www.potatoesnz.co.nz/psyllid.html

For more information on biosecurity and a range of tools to help you secure your farm and secure your future, visit www.farmbiosecurity.com.au. If you spot anything unusual in your potatoes or tomatoes call the Emergency Plant Pest Hotline on 1800 084 881.

Photographs:

- 1) Potatoes infected with Zebra chip (source – University of Texas at Tyler).
- 2) Potato psyllid (source - University of California).