

Do new weeds introduced from outside New Zealand still pose a threat to our farmers?

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Summary Despite New Zealand being considered among world leaders in biosecurity at our international borders, there are concerns that pathways leading to new weed introductions still continue to exist. Our hypothesis is that potential weeds continue to enter New Zealand via a variety of pathways. Several weed incursions during the last ten years are detailed. Many incursion pathways have been identified and will be described in more detail.

Briefly, 2007/08: 31 new to NZ weed species found in imported coco peat, 2009/10: 10 new species found in footwear examined at the airport, 2013/14: 23 new weed species found in soil collected off shipping containers at our ports, 2013: black grass (*Alopecurus myosuroides* Huds.) seed as a contaminant in grass seed, 2015: Noogoora bur (*Xanthium strumarium* L.)

as a contaminant in imported maize for milling, 2016 velvetleaf (*Abutilon theophrasti* Medik.) introduced to circa 260 farms as a contaminant on fodder beet (*Beta vulgaris* L.) seed. Additionally, a number of new to New Zealand potential aquatic weeds have been introduced via illegal aquarium imports.

New species of weeds are continually entering New Zealand by a variety of pathways and while border biosecurity intercepts the majority of these weeds, it is reasonable to expect that there will be unwanted introductions. Without vigilance and early intervention these weeds could be rapidly spread through natural and human assisted pathways. Some practical steps for improving on-farm vigilance and biosecurity as it relates to unwanted weeds will be discussed.

Keywords Biosecurity, incursion, new weeds.