One size does not fit all! Complex issues in managing the weed flora of the Torres Strait Islands

Barbara M. Waterhouse
Northern Australia Quarantine Strategy (NAQS), Department of Agriculture and Water Resources,
Box 96 AAC, Cairns International Airport, Queensland 4870, Australia
(barbara.waterhouse@agriculture.gov.au)

Summary The Torres Strait Islands lie on the biogeographic interface between the Australasian and Papuasian floristic regions. The native flora comprises a subset of that found in adjacent northern Australia and New Guinea.

Geomorphologically diverse, the islands were part of a land bridge connecting present day Australia and New Guinea for lengthy intervals throughout much of the Quaternary period. Consequently, the origin of some weedy taxa found there is unclear, and some species now considered introduced on the Australian mainland may in fact be indigenous to the islands.

In recent decades, biosecurity intervention has substantially reduced human-mediated introduction of live plant material southwards from Papua New Guinea into the islands. However, lack of biosecurity controls on northwards-moving cargo almost certainly contributes to the accidental introduction of new taxa. Consequently, naturalised species represent an ever-increasing proportion of the Torres Strait flora, and weeds not previously recorded from the islands are frequently encountered during annual NAQS plant health surveys.

If recognised early enough, recently arrived weeds should be eradicable with relatively little cost or effort. Some localised successes are documented. Decision-making over management and control of other longer established taxa can be more complex and requires respectful consultation with traditional owners. Factors that must be considered include whether the plants have traditional uses as food or medicine or for ceremonial purposes. Localised control of species known to be alternative hosts for newly arrived plant pests or pathogens should also be considered.

Keywords Torres Strait Islands, land bridge, weedy taxa, biosecurity, NAQS, traditional uses, alternative hosts.