The need for innovation in aquatic weed management

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Summary Land Information New Zealand (LINZ) administers approximately 8% of New Zealand, including the beds of many of its iconic lakes. Aquatic weeds have plagued a number of these lakes and waterways for over 60 years, with many control programmes having never achieved any level of enduring control. Successful aquatic weed management requires new, effective tools and innovative ways of utilising existing tools.

With a limited choice of effective herbicides, and high costs associated with mechanical control methods, LINZ continues to explore new ways of managing aquatic weeds in a variety of challenging environments, from high public use lakes to those experiencing high sediment inflows. Hornwort (*Ceratophyllum demersum* L.) continues to be one of New Zealand's worst aquatic pests, reaching the peak of its biomass in the height of summer, choking waterways which impact on recreational users, aesthetic values, hydro-generation and biodiversity.

With hornwort not present in the South Island, *Lagarosiphon major* thrives in the cooler, low-nutrient waters, with similar impacts to that of hornwort. With ever decreasing public tolerance to the use of herbicides to control and limit the spread of aquatic weeds, alternative control options are sought to manage these weeds more effectively, more efficiently and for longer.

Keywords Aquatic weeds, lagarosiphon, hornwort.