

Look before you wipe

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In October 2014 Stacey Hill collected mahoe (*Melicactus ramiflorus*) and rangiora (*Brachyglottis repanda*) leaves with what she suspected were foliicolous (leaf-dwelling) lichens from the Zen Gardens, Whitford. The mahoe leaves had orange spots, while the rangiora leaves had white-grey spots on them (Fig. 1).

The sample on the mahoe leaves turned out to be a filamentous alga called *Cephaleuros lagerheimii* (UNITEC 5958) – otherwise known as mahoe leaf spot.

More intriguingly, the spots on the rangiora leaves were harder to identify. Microscopic examination showed the presence of both fungal and algal material, confirming that they were lichens, but it was not possible to key them out to a genus using existing keys. Photographs were sent to Dr Robert Lücking at the Field Museum of Natural History in Chicago, and he was able to identify the material as *Strigula orbicularis* (UNITEC 5957) – a cosmopolitan tropical/subtropical lichen species. The main barrier to identification was that the lichens were in the early stages of lichenization, and were not exhibiting some of the readily identifiable features of the genus (Fig. 2).

In New Zealand *Strigula orbicularis* has been collected from long-lived leaves such as those of tawa (*Beilschmiedia tawa*) and titoki (*Alectryon excelsus*), with other species of *Strigula* collected from those tree species and also taraire (*B. tarairi*) and *Pseudowintera colorata* (Galloway 2007). Rangiora leaves seem an unusual substrate for *Strigula*, as the leaves do not seem to be particularly robust or long-lived.

Acknowledgments

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References

Galloway, D. J. 2007: Flora of New Zealand. Lichens. Revised 2nd edition. Volume 2. Lincoln, Manaaki Whenua Press.



Fig. 1. *Strigula orbicularis* covering the upper surface of the leaf of *Brachyglottis repanda*, from the Zen Gardens, Whitford (UNITEC 5957). Scale Bar 10 mm. Photo: D. J. Blanchon, 9 April 2014.



Fig. 2. Close up of *Strigula orbicularis* on upper surface of leaf of *Brachyglottis repanda* showing incomplete development of cortex. Scale Bar 1 mm. Photo: D. J. Blanchon, 19 October 2013.