## Verrucaria austroalpina P.M.McCarthy

elongate-ellipsoidal to ellipsoidal,  $21-34 \times 7-12.5 \mu m$ .

Lichenologist 27: 107 (1995)

T: track from Charlotte Pass to Blue L., Mount Kosciuszko Natl Park, N.S.W., 18 Jan. 1968, W.A. Weber & D.McVean s.n.; holo: COLO. Illustration: P.M.McCarthy, *loc. cit.* fig. 1.

Thallus epilithic, continuous to rimose, 50–140  $\mu$ m thick, smooth, matt, with a brown-black upper layer, whitish within, and with a brown-black basal layer, not gelatinous when wetted. Algae globose, ellipsoidal, or somewhat angular, 5–12 × 5–7  $\mu$ m. Prothallus not apparent. Perithecia almost completely overgrown by the thallus apart from an 80–120  $\mu$ m wide apical area, 0.4–0.7 mm diam., brown-black; ostiole inconspicuous or in a shallow 40–60  $\mu$ m wide depression. Involucrellum contiguous with the upper half of the exciple, extending to exciple base level and often merging with the basal layer, 60–90  $\mu$ m thick. Exciple 20–30  $\mu$ m thick, hyaline at the base and sides, medium to dark brown near the apex. Centrum 0.15–0.23 mm wide. Periphyses 24–35 × 1–2  $\mu$ m. Asci 88–100 × 21–25  $\mu$ m. Ascospores

This endemic species is known from aquatic siliceous rock at an altitude of 2000 m in alpine N.S.W. and from a slightly lower elevation in eastern Vic.

Vic.: Middle Ck, Langford West Aqueduct, Bogong High Plains, alt. c. 1600 m, H.Mayrhofer 15484, H.Hertel & R.Filson (GZU).

A very distinctive lichen in a comparatively extreme habitat, *V. austroalpina* has a rather thick dark thallus that, surprisingly, is whitish inside. The perithecia have a broad, divergent involucrellum, and they produce large and unusually elongate ascospores.

