

TETRAPHIDOPSIS

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Tetraphidopsis Broth. & Dixon, *J. Linn. Soc., Bot.* 40: 451 (1912); from *Tetraphis* and the Greek suffix *-opsis* (resembles), in reference to its supposed similarity to *Tetraphis*

Type: *T. pusilla* (Hook.f. & Wilson) Dixon.

Dioicous. Plants forming small erect tufts. Stems simple to sparingly branched, arising from a dense cluster of rhizoids; paraphyllia lacking. Leaves patent, widely spaced, narrowly ovate-lanceolate, concave; margin curved backwards when wet, slightly decurrent; apex long-acuminate; margin entire; costa short and single. Laminar cells elongate-rhombic, thick-walled, not pitted; basal cells quadrate to rectangular, thick-walled. Gemmae forming globose clusters at the stem and branch apices, clavate.

Calyptra not seen. Capsules exserted, erect, cylindrical, deeply furrowed; operculum short-rostrate, oblique. Peristome: exostome teeth with basal parts strongly curved outwards and upper parts strongly curved inwards when dry, triangular, lacking conspicuous transparent zones along the median line on outer face, horizontally striate and papillose below, coarsely papillose above; endostome with a low basal membrane; processes narrow, papillose; cilia absent. Spores globose to oval, papillose.

This monotypic genus occurs in Australia and New Zealand. It is characterised by conspicuous clusters of gemmae at the tips of stems and branches.

Tetraphidopsis pusilla (Hook.f. & Wilson) Dixon, *J. Bot.* 51: 245 (1913)

Meteorium pusillum Hook.f. & Wilson, in J.D.Hooker, *Fl. Nov.-Zel.* 2: 101 (1854). T: Wairarapa Valley, North Island, New Zealand, *W.Colenso*; not found.

Illustrations: G.A.M.Scott & I.G.Stone, *The Mosses of Southern Australia* 363, pl. 70 (1976); W.R.Buck, D.H.Vitt & W.M.Malcolm, *Key to the Genera of Australian Mosses* 18 (2002).

Plants pale green, in sparse tufts of 2–4 stems, 5–30 mm tall. Leaves 1.0–1.4 mm long, 0.2–0.3 mm wide, slightly concave at the base; apex slightly twisted; costa to one-third the length of the leaf. Laminar cells 33–48 × 7.5–10 µm; alar cells orange.

Perichaetia in leaf axils; perichaetial leaves sheathing, reaching half the height of the seta. Seta to c. 3 mm long, slightly twisted, orange-brown. Spores 20–30 µm diam.

Epiphytic on branches and twigs in wet-sclerophyll forest in Vic. Also in New Zealand.

Vic.: Erskine Falls, Lorne, *I.G.Stone 10578* (MEL); Grey R., Otway Ra., *I.G.Stone 11466* (MEL); Maits Rest, Otways Ra., *I.G.Stone 9688* (MEL); Tarra Valley, *I.G.Stone 10002* (MEL); Old Steel Bridge, track along Thomson R. from Walhalla road, Baw Baw Natl Park, *J.Milne & N.Klazenga BB1, BB2, BB3* (MEL).

No sporogones were present among the Australian collection^s.

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