

**Fissidens ceylonensis** Dozy & Molk., *Ann. Sci. Nat., Bot.*, sér. 3, 2: 304 (1844)

T: Ceylon, [Sri Lanka], *Koenig*; holo: L n.v., *fide* Z.Iwatsuki & M.A.H.Mohamed, *J. Hattori Bot. Lab.* 62: 395 (1987).

*Fissidens subhumilis* Catches., *Mosses of South Australia* 80 (1980). T: George Ck, 10 miles [c. 16 km] S of Adelaide River, N.T. *M.Lazarides & L.Adams* 256; holo: CANB.

Illustrations: D.G.Catcheside, *op. cit.* 79, fig. 19, as *F. subhumilis*; Z.-H.Li, *Acta Bot. Fennica* 129: 28, fig. 12i–u (1985); Z.Iwatsuki & M.A.H.Mohamed, *op. cit.* 346, fig. 2; A.Eddy, A.Eddy, *Handb. Malesian Mosses* 1: 82, fig. 75 (1988).

Autoicous. Shoots c. 10 mm tall and 1.5 mm wide, green to reddish brown, lacking axillary hyaline nodules. Leaves multijugate, mostly uniform, oblong-lingulate, to 1 mm long and 0.3 mm wide, widest below; apex obtuse to acute. Costa percurrent to short-excurrent, in cross-section with 2 lateral stereid bands and 3 superficial guide cells between vaginant laminae. Vaginant laminae 2/3–3/4 the leaf length,  $\pm$ closed; limbidium of narrow thick-walled cells, usually reaching the apex, often intramarginal by 1 or 2 rows of laminal cells proximally; in sterile shoots marginal distally, usually intramarginal proximally, occasionally absent or intermittent. Dorsal lamina tapered or broad at the base, sometimes ceasing above. Margin papillose. Laminal cells quadrate to hexagonal, 5–10  $\mu$ m wide, convex; papillae mostly peripheral.

Perigonia 0.2–0.6 mm long,  $\pm$ pigmented, usually axillary, occasionally terminal on a short basal shoot. Perichaetia terminal on a stem or lateral branch; vaginant laminae broader at the base, joining above mid-leaf, open. Calyptra to 0.5 mm long, smooth. Setae 2–3 mm long, smooth. Capsules oblong, c. 1 mm long; operculum c. 0.45 mm long. Peristome teeth 40–45  $\mu$ m wide at the base. Spores 10–16  $\mu$ m diam.

Common in northern W.A. and N.T. and in far-north-eastern Qld; grows on lateritic or sandy soil (occasionally on termite mounds) in gallery monsoonal forest or woodland at low elevations. Also in Greece, the Seychelles, Sri Lanka, India, SE Asia, Malesia, the Philippines, China, Fiji, Samoa and the Society Islands.

N.T.: Twin Falls, Jim Jim Falls area, Kakadu Natl Park, *J.Russell-Smith* 1222 (DNA, MEL); Nourlangie, Kakadu Natl Park, *I.G.Stone* 23380 (MEL). Qld: on creek bank S of Claudie R., Iron Ra., *M.Thorsborne* (*I.G.Stone* 17611) (MEL); Oakey Creek Rd, Cooktown, *I.G.Stone* 25455 (MEL).

*Fissidens ceylonensis* exhibits considerable variation in the size of plants and, as a result, it has often been confused with *F. intromarginatulus* E.B.Bartram (*q.v.*). However, they differ in leaf shape and costal features, and in habitat preferences, *F. ceylonensis* growing in much drier situations.