
A New species of *Asterolibertia* from Kerala, India

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Asterolibertia hydnocarpi, a new fungus of the family Asterinaceae is collected on the leaves of *Hydnocarpus macrocarpa* (Bedd.) Warb. is described and illustrated in detail.

Key words : *Asterolibertia hydnocarpi*, Asterinaceae, Kerala

INTRODUCTION

During the survey of the pathogenic microfungi in the Neyyar Wildlife Sanctuary in the Thiruvananthapuram district of Kerala State authors came across the plant, *Hydnocarpus macrocarpa* (Bedd.) Warb. (Flacourtiaceae) which was found infected with the black spots. Microscopic examination of the fungus revealed that it is a hitherto undescribed species of the genus *Asterolibertia* and hence the report.

Asterolibertia hydnocarpi sp. nov.

Coloniae epiphyllae, densae, ectophytiae, ad 5 mm diam., raro confluentes. Hyphae rectae vel subrectae, remote ramosae, laxe reticulatae, cellulae 38-45.5 X 11-13.5 μ m. Hyphopodia intercalaria, dispersa vel remote posita, globosa vel ovala, 14-16 X 11-13.5 μ m. Thyrothecia dispersa vel raro connata, orbicularia, ad 264 μ m diam., stellato dehiscentes ad centro, crenata ad margine; asci globosi, rotundi, bitunicati, octospori, ad 67 μ m diam., ascospores brunneae, conglobatae, 1-septatae, constrictae, cellula superiora breviora et cellula inferiora magniora, 49-51.5 X 26-32.5 μ m, paries glabrus (Fig. 1).

Colonies epiphyllous, dense, ectophytic, up to 5 mm in diameter, rarely confluent. Hyphae straight to substraight, distantly branched, loosely reticulate, cells 38-45.5 X 11-13.5 μ m. Hyphopodia intercalary, scattered to distantly placed, globose to oval, 14-16 X 11-13.5 μ m. Thyrothecia scattered to rarely connate, orbicular, up to 264 μ m in diameter, stellately dehiscent at the centre, margin crenate; asci globose, rounded, bitunicate, octosporous, up to 67 μ m in diam., ascospores brown, conglobate, 1-septate, constricted at the septum upper cell smaller and lower cell larger, 49-51.5 X 26-32.5 μ m, wall smooth. (Fig. 1).

Holotype - On living leaves of *Hydnocarpus macrocarpa* (Bedd.) Warb. (Flacourtiaceae), Kombe, Meenmutty, Neyyar Wildlife Sanctuary, Thiruvananthapuram, Kerala, India, March 11, 1996, V. B. Hosagoudar HCIO.

Ectophytic mycelium with intercalary hyphopodia and rounded thyrothecia are the characteristics of the genus *Asterolibertia*. This genus is recorded on the members of Anacardiaceae, Bromeliaceae, Burseraceae, Dipterocarpaceae, Leguminosae, Lauraceae, Malphiaceae.

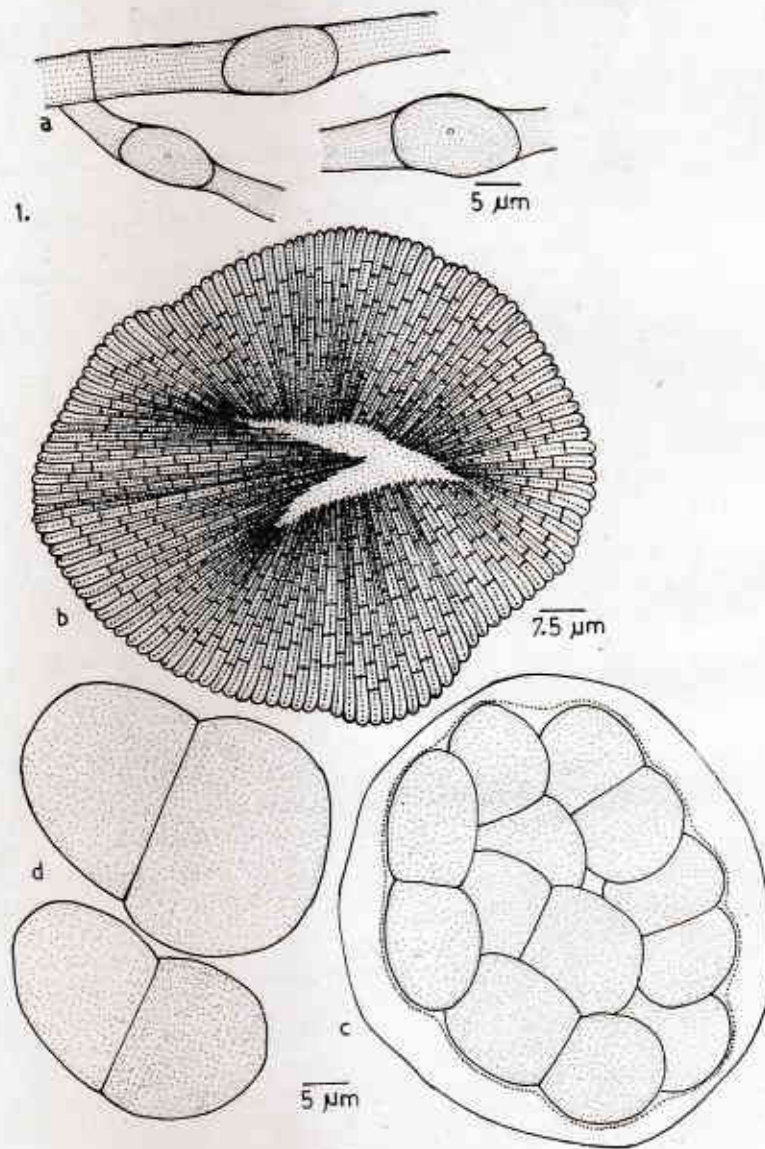


Fig : 1. *Asterolibertia hydnocarpi* sp. nov. (a) mycelium; (b) thyrothecium; (c) ascus; (d) ascospores.

Melastomataceae, Polygalaceae, Rosaceae and Rubiaceae (Stevens and Ryan, 1939; Doidge, 1942; Hansford, 1949, 1954 and Mueller and Arx, 1962). These are obligate pathogens and their host range is very narrow. Hence, the present species warrants its placement under an undescribed species of the genus *Asterolibertia* since there is no report of the genus on the members of the family Flacourtiaceae.

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