# West Indian Species of Dark-spored Thelephoraceae

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The dark-spored Thelephoraceae occur in surprisingly small numbers in the West Indies. The most extensive studies concerned with or including West Indian species list only about nineteen taxa. Of these only five: Coniophora olivascens (Berk. & Curt.) Massee, Thelephora dentosa Berk & Curt., T. magnispora Burt, T. terrestris Fr., and Tomentella aurantia Pat. are considered as valid members of the dark-spored groups. One specimen, reported as Thelephora cornucopioides, is doubtful. A new record, of Tomentella spongiosa (Schw.) Bourd. & Galz., brings the total number of West Indian dark-spored species to six.

## Coniophora

The only reports of *Coniophora* from the West Indies which I have been able to locate are those of Burt. (4). He lists three taxa: *C. byssoidea* (Pers. ex Fr.) Karst., *C. flava* Burt, and *C. olivascens* (Berk. & Curt.) Massee. Two of these, *C. byssoidea* and *C. flava*, are *Peniophora sensu lato* (9) and will be discussed in a later report.

Coniophora olivascens (Berk. & Curt.) Massee, Linn. Soc. Bot. Jour. 25: 138, 1889.

Basidiocarp effused, on bamboo, olive-colored, occurring in Tomentella- like patches; margin indeterminate. Hyphae ca. 4  $\mu$  in diam., some inflating up to 9  $\mu$  in diam, clamped, walls thin and pigmented, some organized into anastomosing strands; other hyaline hyphae arising within the context and protruding into and beyond the hymenium; basidia utriform, often twisted toward their bases, 20—22  $\mu$  long, ca. 4  $\mu$  in diam at apex, ca. 7—8  $\mu$  in diam at base, some clavate, four-sterigmate with each sterigma ca. 3  $\mu$  long; spores 5—7  $\times$  3.5—5  $\mu$  (average of ten = 5.9  $\times$  4.1  $\mu$ ), golden brown with a thickened smooth episporium and a small inconspicuous apiculus.

West Indian specimens examined: Cuba: Earle and Murrill 334 (NY).

Other specimens examined: Massachusetts:  $Sprague\ 1098$  (Isotype in FH).

### Thelephora

Eight taxa of *Thelephora* have been reported by Burt (2), Duss (5) and Patouillard. Five of these are treated either as doubtful

or as synonyms of taxa in other genera. Thelephora pusiola Pat. (5) and T. tentaculata Pat. (5) are synonymous with Stereopsis hiscens (Berk. & Rav.) Reid (8), and T. dissecta Lév. (5) is Cotylidia hartmanni (Mont.) Welden.

Thelephora dentosa Berk. & Curt. emend Burt, Ann. Missouri Bot. Gard. 1: 224, 1914.

Thelephora perplexa Burt, Ann. Missouri Bot. Gard. 1: 223, 1914 (teste E. J. H. Corner).

Basidiocarp encrusting leaves, twigs, sometimes rhizomorphic, often with a fertile area on the lower surface of the debris, with a dissected margin projecting beyond the debris or with a long or short, stipe-like portion bearing many irregular branches at its apex, pinkish buff or honey colored except for fuscous fertile areas, spongy to brittle. In a section of a distal branch or segment the basidiocarp is composed of a central contex of parallel hyphae and a peripherally disposed hymenophore; hymenophore of loosely interwoven hyphae that form the hymenial elements; hyphae 3—6 u in diam, some inflated up to 10 u in diam, clamped, branching, thin-to slightly thick-walled, walls hyaline to pale golden yellow; basidioles  $18-46 \times 8-13$  u, clavate, subtended by a clamp; basidia similar to basidioles but slightly longer, foursterigmate with each thick, tapering sterigma ca. 6 u long; spores 6-10  $\mu$  in diam, each with a blunt apiculus ca. 1-2  $\mu$  long and a thickened, yellow-brown episporium bearing numerous spines each less than 1 u long.

West Indian specimens examined: Cuba: Britton and Wilson 413 (NY); C. Wright, s. n. (FH): Jamaica: NO 5279-80 (conf. E. J. H. Corner).

Thelephora magnispora Burt, Ann. Missouri Bot. Gard. 1:211,1914.

Basidiocarp on soil, solitary or gregarious, stipitate to subsessile, irregularly infundibuliform, flabelliform, or spathulate, multiplicate in some giving a cabbage leaf effect; upper pileus surface irregularly radiate and roughened because of fused hyphal threads with  $\pm$  erect, free ends. Hyphae 4—5  $\mu$  in diam, some inflating up to 10  $\mu$  in diam, thin-walled, branching, clamped; contextual granules bluish green in KOH; basidia 50—70  $\times$  10—11  $\mu$ , guttulate, with four thick sterigmata each ca. 9—11  $\mu$  long; spores 11—12  $\times$  9—11  $\mu$  (average of ten = 11.7  $\times$  9.8  $\mu$ ), yellow-brown, with a thickened episporium which bears many straight, hoked, or bifurcate spines, with blunt apiculi ca. 2  $\mu$  long.

West Indian specimens examined: W. A. and E. L. Murrill 295, TYPE (NY).

Thelephora terrestris Fr., Syst. Myc. 1: 431, 1821.

Basidiocarp on soil, sessile and dimidiate, effuso-reflexed or tapering to a stipe-like base, purplish brown, coriaceous-soft, brittle with age, separate or caespitose and fused; pileus single or several pileoli fused laterally and imbricately; upper pileus surface striate, spiculose because of  $\pm$  erect free ends of hyphal ridges; hymenial surface smooth or papillose, undulate, frequently showing lines of fusion. Hyphae 4–5  $\mu$  in diam, some inflating up to 11  $\mu$  in diam, walls hyaline or fuscous, clamped, walls thin or slightly thickened; basidia ca. 25  $\times$  8–8.5  $\mu$  with four sterigmata each ca. 5–6  $\mu$  long; spores 6–10  $\times$  6–8  $\mu$  (average of ten - 8.2  $\times$  6.9  $\mu$ ), angular, with a thickened minutely echinulate or warted episporium, golden brown.

West Indian specimens examined: Jamaica: W. A. and E. L. Murrill  $451\ (NY)$ .

#### Species Incertae

Thelephora cornucopiodes Fr., Acta Roy. Soc. Sci. Uppsala III. 1: 107, 1851.

Basidiocarp on soil, up to 3 cm tall  $\times$  2 cm wide, infundibuliform, sometimes split into ca. 3 lobes, hard, brittle, blackish, may be fused with others by the buff-colored obtuse margin; upper pileus surface with estate-striate; hymenial surface smooth, with many embedded mineral particles. Hyphae with thin or slightly thickened walls, branching, without clamps; context hyphae with deeply pigmented walls; hymenial and subhymenial hyphae hyaline or lightly pigmented; hymenian containing many oil-like droplets; basidia not seen; basidioles long cylindrical-clavate with tapering narrow bases; spores  $9{-}11\times 6{-}7~\mu$  (average of ten  $=9.8\times 6.8~\mu$ ), guttulate, contents often withdrawn irregularly from hyaline or lightly pigmented spore wall, some actually  $\pm$  angular.

West Indian specimens examined: Jamaica: F. S. Earle 238 (NY).

Burt (2) states that this species closely resembles Craterellus cornucopioides L. ex Pers. Certainly the morphology of the basidioles enhances this similarity. In any case, the Earle specimen is not a Thelephora as that genus is presently understood. It may well represent a slightly smaller-spored, poorly dried Craterellus cornucopioides Pers.

#### Tomentella

Previously (1, 3, 5, 7) only eight species of Tomentella have been reported from the West Indies. Of these eight, seven are presently considered to belong in other genera or are synonymus with species of other genera: Hypochnus fumosus Fr. and H. filamentosus Burt are Corticium sulphureum (Fr.) Fr. (9), H. isabellinus Fr. is Pellicularia isabellina (Fr.) Rogers (9, but for another interpretation see 10), H. thelephoroides (Ell. and Ev.) Burt is Vararia pallescens (Schw.) Rogers & Jackson (9), H. peniophoroides Burt is Varia peniophoroides (Burt) Rogers & Jacks. (9), and H. rubocinctum Ehrenb. in Nees is Chiodecton

rubocinctum (Ehrenb. in Nees) Nyl., a lichen (6). There remains only the single taxon *Tomentella aurantia* Pat. To this very much shortened list I am able to add only a single taxon, *T. spongiosa* (Schw.) Bourd. & Galz.

Tomentella aurantia Pat., Bull. Soc. Myc. France 24: 3. 1908.

Basidiocarp on fallen wood, effused, in  $\pm$  scattered but contiguous and conected patches, thin, membranous, with inconspicuous hyphal strands running throughout the subiculum, rusty orange; margin indeterminate. Hyphae 3—4 (—5)  $\mu$  in diam, thin-walled, branching, walls orange-brown, clamped but also sometimes simple-septate between clamps; basidia not observed; spores 6—7  $\times$  5—7  $\mu$  exclusive of ornamentation (average of ten = 6,3  $\times$  5,9  $\mu$ ), with a thickened episporium bearing scattered blunt spines, orange-brown.

West Indian specimens examined: Guadeloupe: D u s s 12, TYPE in Pat. Herb.  $764~(\mathrm{FH})$ .

Tomentella spongiosa (Schw.) Bourd. & Glaz., Bull. Myc. Soc. France No: 153. 1924.

Basidiocarp on fallen wood, effused, reddish brown, greenish when treated with 10% KOH, soft, thin, granular; margin indeterminate. Hyphae 4—5  $\mu$  in diam, branching, clamped, walls thin or slightly thickened and hyaline to brown; basidia 42  $\times$  10  $\mu$ , cylindrical-clavate with four thick divergent sterigmata; spores 8—10  $\mu$  in diam exclusive of ornamentation, with a thickened episporium bearing numerous spines 1—2  $\mu$  long, with a prominent apiculus 2—3  $\mu$  long, 0—1 guttulate.

West Indian specimens examined: Jamaica: NO 3066.

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Artikel/Article: West Indian Species of Dark-spored Thelephoraceae. 269-273