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#### PIETRO VOTO

### NOVELTIES IN THE FAMILY PSATHYRELLACEAE. PART II

While working out a worldwide key to Genera and species of Family *Psathyrellaceae* (including *Coprinus, Montagnea* and *Podaxis*, three coprinoid Genera belonging to *Agaricaceae*), a number of taxa were noticed that presented an improper status. Some species, though duly described, had been published in a period when the generic names *Coprinus* and *Psathyrella* were used in a large sense, and therefore they had to be recombined following the modern systematics; this operation was mostly carried out in Part I of this paper (Voro, 2019). An invalid species needed be correctly published. Some peculiar, adequately described collections were judged to be misidentified to different existing taxa and, because they are recognized as autonomous species instead, they are given a formal description in order to draw attention to them and to stimulate their recognition with more descriptions. REDHEAD *ET AL*. (2001) for the coprinoid taxa and ÖRSTADIUS *ET AL*. (2015) for the psathyrelloid taxa were followed for assigning the generic name to the proposed novelties.

The key is published online in open access in the website of the Associazione Micologica ed Ecologica Romana - A.M.E.R. at the page: www.ameronlus.it/chiavi\_micologia.php. The key to the species of the Genus *Psathyrella* is in a file on its own in the same web page and is currently limited to the European taxa only.

### TAXONOMIC NOVELTIES

#### New combinations

Coprinopsis macrocarpa (Atri, A. Kaur & M. Kaur) P. Voto, comb. nov. [MB 833876]

Basionym: Coprinopsis radiata var. macrocarpa Atri, A. Kaur & M. Kaur, Mycosphere 5 (1): 15. 2014.

Lacrymaria boninensis (S. Ito & S. Imai) P. Voto, comb. nov. [MB 833877]

Basionym: *Hypholoma boninense* S. Ito & S. Imai, Transactions of the Sapporo Natural History Society 16: 52. 1940.

#### New taxa for invalid or misidentified descriptions

*Coprinellus alvesii* P. Voto, sp. nov. [MB 833878]

Typus: Brazil, Pernambuco, Recife, Campus de la UFPE, before the Biblioteca del Centro de Saúde, M. H. Alves, 19.IX.1994, URM 75797.

= Coprinus subimpatiens M. Lange & A.H. Sm. sensu ALVES ET AL. (1996: 38).

The name is a dedication to the collector.

*Pileus 8-20 mm broad, ellipsoid to conical, plicate, pale to dark grey, at the disc yellowish, farinaceous, margin crenulate. Lamellae adnexed to adnate, with 1 kind of lamellulae, edge white. Stipe 20-45 × 1-1.5 mm, white, glabrous, hollow. Carpophore not deliquescing. Spore print black.* 

Spores 9.8-14 × 5.7-7.5 × 5.6-7  $\mu$ m, on average 12.5 × 6.7 × 5.8  $\mu$ m, ellipsoid, reddish brown in water, dark grey in KOH, smooth, germ pore slightly eccentric. Basidia 4-spored, tetramorphic, hyaline, 16.8-28.0 × 8.4-11.2  $\mu$ m. Pleurocystidia absent. Cheilocystidia 58.8-117.6 × 16.8-22.4  $\mu$ m, hyaline, utriform, thin-walled. Pileipellis an epithelium of globose, hyaline, 28-37.5  $\mu$ m broad cells. Pileocystidia 84-112.0 × 11.2-13  $\mu$ m, cylindraceous, hyaline. Sclerocystidia absent. Clamp connections present.

Habitat on sawdust.

# Notes

This Brazilian collection lacks sclerocystidia, caulocystidia and globose cheilocystidia. The authors use the term '*lageniformes*' for both basidia and cheilocystidia shape, specifying '*con cuello muy largo*' for the latter.

# Coprinellus neodilectus P. Voto

Distribution: Finland, France, Germany, Luxembourg, Norway, Poland, Scotland, Spain, Turkey.

### Notes

*C. neodilectus* was published, in Part I, to give a valid status to the species so far known in Europe as *Coprinus dilectus* Fr. sensu Josserand; the material selected for typus is the polish collection described by GIERCZYK *ET AL.* (2014). The original description by FRIES (1838: 250) is too brief to consent an unambiguous interpretation and, however, it is at least in one point very different: the habitat of burned place (*'Locis adustis umbrosis in fagetis'*) is evidently completely different than a wet one. The basionym used by REDHEAD *ET AL.* (2001) for *Coprinellus dilectus* is *Coprinus dilectus* Fr., therefore their taxon is attached to Fries's description; thus a new name was needed to separate the species growing on wet wood.

# Coprinellus subcurtus P. Voto, sp. nov. [MB 833879]

Typus: USA. Hawaii, Hawai'i, Hilo, Prince Kuhio Mall, 29.X.1994, DEH 630, GenBank AY461834. Other collections. USA. Hawaii: DEH 1083, DEH 2064, DEH 2128A, DEH 2223.

= Coprinellus curtus (Kalchbr.) Vilgalys, Hopple & Jac. Johnson sensu Keirle et Al. (2004: 110).

The name refers to the resemblance with Coprinellus curtus.

Pileus 1-3 mm broad, 1-2 mm high in primordia, 8-22 mm broad, 4-5 mm high at maturity, ovoid when young becoming convex to hemispherical or campanulate, finally eventually applanate with uplifted margin, strongly plicate, brown to light brown with gray running along ridges, becoming gray to brownish gray or remaining light brown at maturity, veil covering primordia with foxy red to dark reddish brown, amorphous, sugar-like granules persisting throughout development especially near disc; not deliquescing; context 0.1 mm thick, concolorous with surface. Lamellae medium close with 2-3 series of lamellulae, narrowly adnexed to almost free, 1-2 mm broad, white becoming gray or black in age. Stipe  $8-27 \times 0.5-1.75$  mm at maturity, equal to tapering upwards, glabrous, white. Annulus and volva absent. Odour not distinctive.

Spores (7.2-)8-10(-10.5) × (4.8-)5.6-6.8(-7.6)  $\mu$ m, mostly 8.7-9.7 × 5.5-6.4  $\mu$ m, on average 9.1 ± 0.4 × 6.0 ± 0.4  $\mu$ m, Q = 1.2-1.8, mostly 1.4-1.6, on average 1.5 ± 0.1, ellipsoid to ovoid in face view, narrowly ellipsoid or phaseoliform in side view, apiculus often not visible, with a distinct central to slightly eccentric, small to somewhat broad germ pore, not truncate, smooth, chestnut brown to black. Basidia 15-22 × 5-10  $\mu$ m, clavate, 4-spored. Pseudoparaphyses 15-20 × 8-10  $\mu$ m, clavate. Cheilocystidia 30 × 7-8  $\mu$ m near the base, extremely rare, lageniform. Pleurocystidia not observed. Pileipellis an epithelium of globose, hyaline, thin-walled, 16-30  $\mu$ m broad cells arising vertically as a cystoderm layer. Pileocystidia 76-88 × 11-18  $\mu$ m at bulbous base, neck 4-5.5  $\mu$ m broad, apex 8.5-13  $\mu$ m broad and capitate to subcapitate, hyaline, thin-walled, Universal veil made of clusters of golden brown, thick-walled, broadly clavate to pyriform or sphaeropedunculate, 12-20  $\mu$ m broad cells. Clamp connections absent.

Habitat on woodchip piles or rarely scattered in mud associated with axis deer dung under coastal kiawe [Prosopis pallida (Humb. & Bonpl. ex Willd.) Kunth], caespitose.

### Notes

These Hawaiian collections are different than the true European *Coprinellus curtus* as the habitat is lignicolous, not coprophilous, and the spores are distinctly smaller. Two sequences in GenBank, KP724994 from South Korea and AB266447 from Japan, have both a 99.35 % ITS identity and should be checked to possibly demonstrate the presence of this taxon in east Asia too.

# Coprinopsis arachnoidea P. Voto, sp. nov. [MB 833880]

Typus: USA, Washington State, Seattle, March 1950, F. Van De Bogart, WTU FVDB 2161. = *Coprinus arachnoideus* Bogart, Mycotaxon 4 (1): 238. 1976 (nom. inval., art. 36.1).

The name recalls the epithet invalidly used by Bogart.

Pileus at first long glandiform, then conic, then campanulate; initially 18 mm high, after expansion 30 mm broad, pale creamy white at first, soon becoming pale grey-tan to pale creamy grey-tan, with small shallow plicate striae when mature, covered at first with a thin wispy fibrillose universal veil that soon breaks up into small scattered irregular patches; flesh thin and membranous. Stipe hollow, slender, nearly equal but with a slight swelling at the base and slightly narrowed towards the apex, 40-65 × 2.2-3.6 mm, white, opaque, glabrous except for a few small bits of loosely interwoven fibrillose tomentum scattered around the stipe base; flesh thin and fragile. Lamellae linear, with some lamellulae, 5 mm high, broadly adnate, crowded, white, then soot black. Autolysis complete. Odor and taste not observed.

Spores  $10.6-15 \times (6.2-)6.7-9.1 \ \mu m$ , ellipsoid to ovoid with rounded poles, suprahilar depression mostly present, apiculus small, germ pore strongly eccentric,  $1.3-1.8 \ \mu m$  in diameter, smooth, deep purple-brown in 3% KOH, black en masse. Basidia 4-spored, dimorphic, short to elongate clavate,  $2-35.2 \times 11-15 \ \mu m$ , surrounded by 5-7 pseudoparaphyses. Cheilocystidia (sub)globose, obovoid, ellipsoid to subcylindric,  $40-100 \times 25-40 \ \mu m$ , hyaline, smooth. Pleurocystidia similar,  $77-125 \times 30-60 \ \mu m$ , pedicellate, hyaline, smooth. No other cystidia present. Pileal surface a cutis of more or less radially oriented hyphae, the surface cells two or three times as long in the radial orientation as in any other direction. Universal veil made up of fibrillose, interwoven, chained, hyaline, thin-walled, partly branched or anastomosate,  $40-60 \times 14-25 \ \mu m$ , usually somewhat inflated and constricted at septa hyphae, terminal cells ellipsoid to clavate. Clamp connections sparse, not distinct.

Habitat terrestrial, on prepared soil mixes in a greenhouse, solitary.

### Notes

The above description combines Bogart's diagnosis and the revision by Uljé & Noordeloos (2000).

## Coprinopsis ghanensis P. Voto, sp. nov. [MB 833881]

Typus: Ghana, Tafo, 2.VI.1957, Holden GC163.

= Coprinus fibrillosus Berk. & Broome sensu Pegler (1969: 229).

The name refers to the locus typicus, Ghana.

Pileus ovoid-cylindric to slightly umbonate, margin straight, initially 10-30 mm high, after expansion 10-20 mm broad, pale pinkish buff, then avellaneous at the disc, darkening to grey when mature, plicate-striate almost to the disc, soon deliquescent, covered with numerous, dark brown, more or less cylindrical, fugacious, small veil squamules. Lamellae free to adnexed, thin, arcuate, densely crowded, with numerous lamellulae, pale at first, finally fuscous black, deliquescent. Stipe  $30-50 \times 4-7$  mm, equal to slightly tapering upwards, fragile, fistulose, pale pinkish buff, furfuraceous scaly, without annulus. Context thin, pale.

Spores 5.2-7.5 × 3.3-4.8  $\mu$ m, on average 6.2 × 4.2  $\mu$ m, ellipsoid, germ pore broad and central, translucently pale fuscous in water, smoky grey in KOH, slightly thickwalled, with none to little refractive contents. Basidia 4-spored, dimorphic, short to elongate clavate, 14-25 × 6.5-7.5  $\mu$ m, surrounded by numerous pseudoparaphyses 9.5-14 × 7-12  $\mu$ m. Cheilocystidia not observed. Pleurocystidia few, scattered, 47-85 × 12-33  $\mu$ m, hyaline, clavate to cylindric, apex obtuse, thin-walled, without visible contents. Pileipellis a 30-50  $\mu$ m thick cutis of repent, radially arranged, thin-walled, inflated, 3-25  $\mu$ m broad hyphae. Veil squamules made of loosely arranged tufts of non agglutinated, parallel, unbranched, chained, elongate to cylindric, constricted at septa, 24-120 × 6-21  $\mu$ m hyphae with smooth, slightly thickened, brown wall and colourless contents, terminal elements often fusiform to lanceolate, occasionally mucronate. Clamp connections present anywhere. Habitat on rotting trunk.

# Notes

The original diagnosis of *Coprinus fibrillosus* is very concise and an accurate systematic positioning is not possible apart from the deduction, based on the veil, that it belongs to *Coprinopsis [Coprinopsis fibrillosa* (Berk. & Broome) Redhead, Vilgalys & Moncalvo], although without any possibility of distinction between "*Lanatuli*" and "*Alachuani*". However the pileus in Pegler's collection has '*fugacious squamules*', which is clearly different than the innate covering as described for the Ceylonese material ('*squamis innatis fibrillosis*'), moreover it was collected on rotting trunk, not on the ground.

# Coprinopsis hawaiana P. Voto, sp. nov. [MB 833882]

Typus: USA, Hawaii, Manuka National Area Reserve, 27.I.2002, MRK 42. Other collections. Same location, 16.V.2002, DEH 2284.

= Coprinopsis extinctoria (Fr.) Redhead, Vilgalys & Moncalvo sensu KEIRLE ET AL. (2004: 61).

### The name refers to the locus typicus.

Pileus 13-15 mm broad, 9-13 mm high at maturity, conical then convex, splitting at margin, brownish near center to translucent near margins, with whitish veil breaking up into segments, rapidly deliquescing. Lamellae close, adnexed, 2 mm broad, becoming black in age. Stipe at maturity  $22-31 \times 2-3$  mm, tapering upwards, white. Annulus and volva absent. Odor not distinctive.

Spores 8-10.5 × 4.8-7.2  $\mu$ m, on average 9-9.1 × 5-5.7  $\mu$ m, Q 1.4-2, on average 1.7, ellipsoid in all views to somewhat phaseoliform in side view, smooth, dark chestnut brown to nearly black, apiculus visible, germ pore central and truncate. Pileipellis a cutis of elongated, repent hyphae. Veil of interwoven, regularly branched, diverticulate hyphae, 5-40 × 3-5  $\mu$ m, sometimes restricted at septa, about 75% thin-walled and hyaline, about 25% thick-walled and incrusted with golden brown pigmentation, walls appearing finely granular. Clamp connections rare.

Habitat on fallen logs and branches of Olopua tree (Nestegis sandwicensis (A.Gray) O. Deg., I. Deg. & L.A.S. Johnson) in dry Ohi'a lehua (Metrosideros polymorpha Gaudich.) forest, solitary.

### Notes

In describing these two collections by the name of *Coprinopsis extinctoria*, KEIRLE *ET AL*. (2004) referred to ORTON and WATLING (1979:39, [as *Coprinus extinctorius*]) for reference literature and description. However the European taxon has smooth veil hyphae, which assigns it to "*Lanatuli*", and it is considered by modern mycologists a later synonym of *Coprinopsis mitraespora* (Bohus) L. Nagy, Vágvölgyi and Papp. The Hawaiian material has branched to diverticulate veil hyphae and consequently it belongs to "*Alachuani*". KEIRLE *ET AL*. (2004) report they could study only mature specimens and could not observe any cystidia, basidia and pseudoparaphyses.

# Coprinopsis indicifoetidella P. Voto, sp. nov. [MB 833883]

Typus: India, Punjab, Moga, Jallalabad, 217 m a.s.l., 28.VI.2011, Amandeep Kaur, PUN 4818. = *Coprinopsis foetidella* (P.D. Orton) Atri, A. Kaur & M. Kaur sensu Амандеер *et al.* (2014: 17).

The name refers to the locus typicus, India, and to the resemblance with Coprinopsis foetidella.

Pileus up to 14 mm broad and 22 mm high, subglobose to oblong, white when young, brownish gray at maturity, with brown apex, entirely covered with abundant, removable, floccose and powdery veil; margin irregular, splitting, striated; cuticle fully peeling, flesh thin, white, becoming black when handled. Lamellae free, unequal, 3-sized, crowded, narrow, -2 mm high, deliquescent, white at start, finally black. Spore print black. Stipe central, up to 53 × 3.5 mm, tapering upwards, hollow, white, unchanging, floccose-fibrillose, fibrils loosely appressed and removable. Taste not distinctive; odour disagreeable.

Spores 8.6-12.9 × (5.0-)7.2-9.3  $\mu$ m, Q 1.3, ellipsoidal, thick-walled, smooth, reddish brown, germ pore central. Basidia 4-spored, dimorphic, ellipsoid to clavate, 12-30.6 × 8.5-12  $\mu$ m, surrounded by pseudoparaphyses. Gill edges heteromerous. Cheilocystidia 42.5-76.5 × 20.4-35.7  $\mu$ m, clavate to balloon

shaped, thin-walled, weakly granular to hyaline. Pleurocystidia 56-95 × 24-43  $\mu$ m, inflated clavate, thinwalled, weakly granular to hyaline. Pileipellis a cutis of hyphoid elements. Veil of 35.7-49.3 × 29-46  $\mu$ m, appressed, subglobose to globose, thin-walled, warty cells, warts nipple shaped and not dissolving in dilute HCl solution. Clamp connections absent throughout.

Habitat on buffalo dung, gregarious.

### Notes

In the Indian material spores are distinctly broader than in the true European taxon *C. foetidella*, consequently their quotient is distinctly lower (1.3 versus 1.5-1.7), and the pileus turns to brown tints when mature.

# Parasola grgurinoviciae P. Voto, sp. nov. [MB 833884]

Typus: Australia, South Australia, Mt. Lofty, 29.IV.1922, AD 4011. Other collections. Australia, South Australia, Adelaide, Burnside, 12.V.1923, AD 4017; Australia, South Australia, Mt. Compass, Cleland Gully, 26.IV.1930, AD 4005. *= Coprinus plicatilis* (Curtis) Fr. sensu Grgurinovic (1997: 474).

The name is a dedication to Cheryl A. Grgurinovic.

Pileus up to 22 mm broad, at first nearly cylindric to conico-cylindric, then convex, finally plane with revolute margin and nearly flattened or a little depressed disc, sulcate to the disc, matt, centre of disc near Sayal brown, periphery of disc pallid brown, sulcate part near drab, non-deliquescent. Lamellae adnate to a more or less definite collarium, moderately close to moderately distant, narrow, concolorous with pileus, edge white turning black. Stipe up to 63 mm long, slender, shining, sometimes slightly striate, hollow, whitish turning slightly brownish.

Spores 14-17.6 × 9.6-13  $\mu$ m, on average 16.0 × 10.9  $\mu$ m, Q 1.5, triangular or subrhomboid in face view, elliptical to amygdaliform in side view, fuscous brown to hazel in 5% KOH, germ pore eccentric. Basidia 4-spored, dimorphic, larger ones clavate with a somewhat pedicellate base, 37.6-51.2 × 11.4-18.4  $\mu$ m, on average 44.8 × 15.8  $\mu$ m, sterigmata up to 7.2  $\mu$ m long, smaller ones obpyriform, 27.2-35.6 × 14.8-16.2  $\mu$ m, on average 29.9 × 15.4  $\mu$ m, sterigmata up to 4  $\mu$ m long. Cheilocystidia and pleurocystidia not seen. Pileipellis an epithelium of clavate cells. Veil absent. Clamp connections present.

Habitat gregarious on the ground, among grass or on bare soil, in April and May.

### Notes

Absence of pleurocystidia and much greater dimension of spores markedly separate this Australian material from *P. plicatilis* (Curtis) Redhead, Vilgalys & Hopple (2001). Even considering pleurocystidia were accidentally unnoticed, the above description would be more suggestive of the recent *P. glabra* Hussain, Afshan, Ahmad & Khalid, from Pakistan, than of *P. plicatilis*.

## Parasola hawaiana P. Voto, sp. nov. [MB 833885]

Typus: USA, Hawaii, Waipio Valley, 5.I.1997, DEH 1403. Other collections. USA, Hawaii, MacKenzie Park, 31.VIII.2002, DEH 2307. *= Parasola megasperma* (P.D. Orton) Redhead, Vilgalys & Hopple sensu Keirle *et al.* (2004: 116).

The name refers to the locus typicus.

Pileus 5-7 mm broad, 5-9 mm high in primordia, 20-27 mm broad, 2-7 mm high at maturity, ovoid then convex to broadly convex or plano-convex, umbilicate, strongly plicate to disc, reddish brown to dark brown at start, discolouring to brownish gray on margin, not deliquescing. Lamellae subdistant, with lamellulae, 1-3 mm high, free, white becoming black. Stipe 9-16  $\times$  2 mm in primordia, 40-80  $\times$  2-3 mm at maturity, equal, cylindrical, glabrous, white to golden-tan near apex, subbulbous. Annulus and volva absent. Odour not distinctive.

Spores (13.6–)15.2-17.2(-18.6) × (9.6-)11.2-14.4 (-15.2)  $\mu m$ , on average 16.1-16.3 × 12.2-13.8  $\mu m$ , Q 0.9-1.5, on average 1.2-1.3, submitriform to angular-subglobose or nearly globose in face view, elliptical to slightly amygdaliform in side view, smooth, dark chocolate or chestnut brown to nearly black, apiculus not visible, germ pore central. Basidia 20-30 × 5-14  $\mu m$ , clavate to narrowly clavate, surrounded by pseudoparaphyses. Cheilocystidia 30-40 × 5-20  $\mu m$ , ellipsoid to narrowly ellipsoid, pedicellate, thin-walled, hyaline. Pleurocystidia 30-70 × 5-25  $\mu m$ , similar to cheilocystidia. Pileipellis a hymeniderm. Universal veil absent. Clamp connections not observed.

Habitat in sand and duff under coastal ironwood tree (Casuarina equisetifolia L.).

# Notes

This material differs from the European taxon in its spores being bidimensional, distinctly more rounded with a much lower quotient and a central germ pore, absence of clamp connections, and the habitat strictly connected to coastal trees on sandy soil.

# Parasola lilatinctoides P. Voto, sp. nov. [MB 833886]

Typus: Pakistan, Khyber Pakhtunkhwa Province, Malakand, Qaldara, 430 m a.s.l., 11.VIII.2014, S. Hussain, LAH-SHP-8, GenBank KY461722, KY461725, KY461731.

Other collections. Pakistan: LAH SHP-31, LAH SHP-12, SWAT SHP-35; India: CAL 1668, CAL 1671.

= P. lilatincta (Bender & Uljé) Redhead, Vilgalys & Hopple sensu HUSSAIN ET AL. (2018: 57).

The name refers to the morphological likeness with *P. lilatincta*.

Pileus at start 2-5.5 mm broad, 3.5–12 mm high, finally 20-30 mm broad and broadly convex to applanate, smooth, deeply plicate, glabrous, yellow-brown to greyish red brown; disc slightly depressed, orange. Lamellae free but attached to a pseudocollarium, distant to sub crowded (L < 30), with lamellulae, black at maturity, edge paler, deliquescing. Stipe 40-112 × 1-4 mm, equal to slightly tapering upwards, smooth, white, fragile, base slightly enlarged. Annulus absent. Odour and taste not distinctive.

Spores (11-)12-16(-16.5) × (10-)12-14 × (6-)8-11(-13.5)  $\mu$ m, on average 14-2-14.5 × 12.5 × 9.0-9.9  $\mu$ m, Q in face view 1.07-1.25, in the face view rounded triangular to subglobose or pentagonal, sometimes subpapillate, in side view elliptical to oval or amygdaliform, wall up to 2  $\mu$ m thick, dark brown in KOH, with 2-2.5  $\mu$ m broad eccentric germ pore. Basidia 4-spored, cylindrical to clavate, 17-22 × 6-9  $\mu$ m, hyaline, thin-walled, surrounded by 5-8 pseudoparaphyses. Gill edge sterile. Cheilocystidia 25-62 × 21-50  $\mu$ m, sub globose to subutriform. Pleurocystidia 34-83 × 11-47  $\mu$ m, cylindrical to utriform, hyaline, thin-walled. Pileipellis a hymeniderm of clavate, rounded at apex, yellow at the base, 23-55 × 9-15  $\mu$ m cells. Sclerocystidia absent. Yellowish refringent granules present in cheilocystidia at least. Clamp connections present in most of the tissues.

Habitat under herbaceous plants (typus), on road trails, on decaying elephant dung; scattered.

# Notes

HUSSAIN *ET AL.* (2018: 57) and GANGA & MANIMOHAN (2018: 267) describe some peculiar collections, respectively from Pakistan and India, that they both identify as *P. lilatincta*, a species originating from the Netherlands. By the general set of characters, I reckon they have found one and the same taxon but, on the contrary, there are elements of difference against the European species. Spores are larger on average, gills are attached to a pseudocollarium and are less frequent, the habitat is herbicolous to coprophilous, not connected to wood. *P. plicatilis* (Curtis) Redhead, Vilgalys & Hopple shares the angular spore shape but the dimension is smaller, (9.5-)9.8-14.5 × 7-10.5(-11.2) × (5.6-)6.5-8.1(-8.4) μm, and the habitat is not on dung but on lawns and other grassy places.

# Parasola plicatilopsis P. Voto, sp. nov. [MB 833887]

Typus: Brazil, Pernambuco, Recife, UFPE Campus, 9.VIII.1994, M. H. Alves, URM 75796. = *Coprinus plicatilis* (Curtis) Fr. sensu ALVES *ET AL*. (1996: 38).

The name refers to the resemblance with Parasola plicatilis.

Pileus 14 mm broad, 35 mm high, subglobose to convex, membranaceous, umbilicate, plicate-striate, grey, at the disc yellowish brown. Lamellae adnexed, white to grey, finally dark, edge white. Stipe  $50-75 \times 2$  mm, pale brown, shining, fleshy, smooth. Spore print black.

Spores 9.8-14 × 8.4-11.2 × 5.6-8.4  $\mu$ m, rhomboidal, in side view ellipsoidal, dark reddish brown in water, smooth, thick-walled, germ pore distinct and central. Basidia 4-spored, hyaline, lageniform, surrounded by 4-6 pseudoparaphyses. Pleurocystidia 94.6-106.4 × 12.6-14  $\mu$ m, utriform. Pileipellis a hymeniderm. Clamp connections present.

Habitat on grass under a Clitoria fairchildiana R.A.Howard tree.

#### Notes

In this material the germ pore is expressly described as central, both in the description and in the key, moreover pleurocystidia are distinctly slenderer than in the true *P. plicatilis*. The authors use the term *'lageniformes'* for both basidia and pleurocystidia shape.

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#### Literature

- ALVES M.H. & DE Q. CAVALCANTI M.A. 1996: Coprinaceae en el Campus de la Universidad Federal de Pernambuco. Boletín Micológico 11(1-2): 33-40.
- AMANDEEP K., ATRI N.S. & MUNRUCHI K. 2014: Taxonomic study on coprophilous species of Coprinopsis (Psathyrellaceae, Agaricales) from Punjab, India. Mycosphere 5(1), 1-25, DOI: 10.5943/mycosphere/5/1/1.
- GANGA K.G.G. & MANIMOHAN P. 2018: A new species and a new record of Parasola from Kerala State, India. Phytotaxa 369(4): 260-268. https://doi.org/10.11646/phytotaxa.369.4.3.
- GIERCZYK B., KUJAWA A. & SZCZEPKOWSKI A. 2014: New to Poland species of the broadly defined genus Coprinus (Basidiomycota, Agaricomycotina). Acta Mycologica 49(2): 159-188. DOI: 10.5586/am.2014.020.
- GRGURINOVIC C.A. 1997: Larger Fungi of South Australia: 1-725.
- HUSSAIN S., AHMAD H., ULLAH S., AFSHAN N., PFISTER D.H., SHER H., ALI H. & KHALID A.N. 2018: The genus Parasola in Pakistan with the description of two new species. MycoKeys 30: 41-60. https://doi.org/10.3897/ mycokeys.30.21430.
- KEIRLE M.R., HEMMES D.E. & DESJARDIN D.E. 2004: Agaricales of the Hawaiian Islands. 8. Agaricaceae: Coprinus and Podaxis; Psathyrellaceae: Coprinopsis, Coprinellus and Parasola. Fungal Diversity 15: 33-124.
- NAGY L.G., VÁGVÖLGYI C. & PAPP T. 2010: Type studies and nomenclatural revisions in Parasola (Psathyrellaceae) and related taxa. Mycotaxon 112: 103-141.
- ÖRSTADIUS L., RYBERG M. & LARSSON E. 2015: Molecular phylogenetics and taxonomy in Psathyrellaceae (Agaricales) with focus on psathyrelloid species: introduction of three new genera and 18 new species. Mycological Progress 14(5).
- PEGLER D.N. 1969: Studies on African Agaricales: II. Kew Bulletin 23(2): 219-249.
- REDHEAD S.A., VILGALYS R., MONCALVO J.-M. ET AL. 2001: Coprinus Pers. and the disposition of Coprinus species sensu lato. Taxon 50: 203-241.
- ULJÉ C.B. & NOORDELOOS M.E. 2000: Type studies in Coprinus subsection Lanatuli. Persoonia 17(3): 339-375.
- VOTO P. 2019: Novelties in the family Psathyrellaceae. Part I. Rivista Micologica Romana, Boll. Amer, 107(2): 94-95.