Nº 99

Tomentella ochraceo-olivacea Litsch.

Figures 1–12

 $Tomentella\ ochraceo-olivacea\ Litsch.\ 1933\ [5:62]\ (PRM!)$

= Tomentella fatrensis Svrček 1958 [6:77] (PRM!)

Basidiome effused, adherent, tufted, somewhat tomentose to membranaceous, up to 0.1 (0.2) mm thick.

Hymenophore at first pruinose, porulose, finely discontinuous and sometimes slightly granulose or shallowly colliculose, then more continuous and smoother but never polished, slightly subceraceous, pale yellowish, pale ochraceous to mustard yellow when dry, about 2.5Y~8-6/4-6.

Subhymenium thickening, concolorous with the fertile area.

Subiculum scanty or poorly developed, up to 30 (50) μ m thick, tomentose, slightly paler to concolorous with the fertile area.

Margin abrupt or thinning out, pruinose, araneose, sometimes fibrillose, rarely fimbriate, concolorous to whitish.

Rhizomorphs infrequent in subiculum and at the margin (in some specimens may be very difficult to find), more common in cracks of the substratum or on the reverse side of the bark (if any), up to 0.2 mm thick, loose to compact, yellowish.

Hyphal system monomitic; most hyphae with fibulate primary septa. Subhymenial hyphae almost regular, fibulate, (2.5) 3–5 μ m, rarely with intercalary swellings up to 8 μ m (remains of collapsed basidia), thinwalled, hyaline to subhyaline.

Subicular hyphae regular, fibulate or rarely with some simple septa, (2) 3–5 μ m, with thin or slightly thickening wall, smooth, hyaline to very pale yellow.

Rhizomorphs simple or poorly differentiated, built up by regular generative hyphae, with frequent fibulate septa and spaced to close up secondary septa, (2) 3–5 μ m wide, branching at some distance from septa, anastomosis rather frequent, short and simple, with thin to thickening

walls, sometimes also with localized thickenings, subhyaline; well developed rhizomorphs with slightly wider hyphae in the core reaching 8 (10) μ m in diam., with spaced clamps and sometimes with some simple septa, with relatively thin walls, subhyaline to pale yellowish.

Cystidia absent; in some collections rare broadly clavate or pyriform cells may be enclosed in subhymenium or hymenium, about $20 \times 14 \mu m$.

Basidia normally suburniform, often with a short narrowed stem, sometimes more or less clavate, sinuous, (35) 40–70 (80)×(8) 9–11 (12) μ m (top), 6–11 μ m (lower half), with a fibulate basal septum; 4 sterigmata up to 6 (8) μ m long.

Basidiospores mostly with irregular outline to lobed, in lateral view more or less irregularly ellipsoid with a flattening adaxial side; in frontal view subovoid to three-lobed; in polar view, globose to three-lobed, (6) 6.5-8 (8.5)×(4.5) 5-6 (6.5)×(5.5) 6-7 (7.5) μ m, $Q^1 = 1.2-1.4$ (1.5), $Q^2 = 1.1-1.3$ (1.4), echinulate, yellowish, slightly darker than other elements; aculei up to 1.5 (2) μ m long.

Chemical reactions: IKI-; CB: hyaline to subhyaline hyphae and young basidiospores more or less distinctly cyanophilous; KOH: hymenophore slightly darkening, context and subiculum often distinctly darkening but no appreciable reaction visible in squash mounts.

Incrustation: none.

Comments

The holotype of *Tomentella ochraceo-olivacea* (A. Pilát, Iter orientale 1931, n° 273, ad lignum putridum *Abietis bornmülleriana* Matt. [...]) was split between herbaria: W 21891, PRM 704215, and possibly Uppsala fide Christiansen [1].

- The part in Wien (W 21891) contains a fungus growing on severely burnt wood that doesn't fit the original description neither macro nor microscopically. Evidently some kind of filing error has happened and this collection can no more be considered as part of the type. This specimen is *Tomentella griseoumbrina* Litsch., as already stated by Kõljalg [2].
- The specimen in Prague (PRM 704215) has all the features depicted in the original diagnosis; the herbarium label is annotated by hand 'Tomentella ochraceo-olivacea sp. n.', 'det. Litschauer', 'specimen originale!', and is here considered a correctly stored part of the holotype.

Tomentella ochraceo-olivacea is an infrequent species mainly found in mixed forests with some coniferous trees. I have seen collections from Austria (Carinthia, Tyrol), France (Aveyron, Doubs, Hautes-Alpes, Haute-Savoie, Isère), Italy (Trentino-Alto Adige), Slovakia, Switzerland (Jura, Thurgau, Ticino), Turkey, growing on soil, litter, bark and decorticated wood of coniferous and deciduous trees.

It is easy determined by the yellowish basidiome and yellowish rhizomorphs (when present), narrow hyphae, suburniform basidia and small lobed basidiospores, as a rule 6.5–8 μ m long with 1–1.5 (2) μ m long spines.

The species that comes closer is T. mairei Bourdot [= T. fragilis (Bourd. & Galzin) M.J. Larsen] that can be separated by the larger spores, 8–10 $(10.5)\times(6)$ 6.5–8×7–9 μ m, the hymenial layer becoming crustose, and the thicker and tomentose subiculum.

Tomentella fatrensis, described from a single collection, was said in the original diagnosis to be 'tota albida'. We shall suppose that this was the colour at collecting time; in herbarium has turned yellowish and is in the range of a young specimen of *ochraceo-olivacea* when rather few basidiospores are deposited on the hymenophore. I find no other valuable characters to keep them separate.

Here my description of the holotype of T. fatrensis (PRM 901009):

Basidiome [fig. 5] effused, adherent, araneose, discontinuous to membranaceous, compact and continuous. Hymenophore smooth, 'tota albida' teste Svrček [6], pale beige yellowish (10YR 8–7/4) in herbarium. Subiculum araneose, poorly developed, concolorous with the fertile surface. Margin indistinct, fertile throughout. Rhizomorphs absent.

Subhymenial hyphae regular, fibulate, 3–5 (7) µm, thin-walled, hyaline. Subicular hyphae regular, fibulate, (2) 2.5–5 µm, sometimes branching from clamps, thin-walled, hyaline or subhyaline. Basidia somewhat suburniform, 35–45 (50) µm long, 8–10 (11) µm at apex, 7–10 µm in the lower middle, clamped at the basal septum; sterigmata 4–7 µm long, 1.5–2 µm wide at the base. Basidiospores [fig. 12] with sinuose outline, lobed, 6–7.5×(4.5) 5–5.5 (6)×(5.5) 6–6.5 (6.8) µm, Q¹ = 1.2–1.4, Q² = 1–1.2, pale yellowish to yellowish, with thickening to thick wall; aculei 0.8–1.5 (2) µm long, single, tapering.

Specimens examined

AUSTRIA — **Kärnten** – Dallach am Wörthersee, on wood of a lying branch of a coniferous tree, leg. V. Litschauer, 20.VII.1934 (W 7445 p.p.) — **Tirol** – Innsbruck, bei der Norer'schen Ziegele, on soil, leg. V. Litschauer, 7.X.1926 (W 21894) – Innsbruck, Klosterberg-Götzen, on litter, leg. V. Litschauer, 7.VIII.1926 (W 21890)

FRANCE — Aveyron – Vignoles, on litter, leg. A. Galzin, 17.XI.1909 (PC: Bourdot 6879bis) — Doubs – Mouthe, source du Doubs, on wood of a decayed branch of a coniferous tree, leg. R. Hentic, 26.VIII.1999 (em-7277, R. Hentic 9927) — Hautes-Alpes – Risoul, on bark of *Larix decidua*, leg. J. Boidin, 15.VII.1979 (LY 9452, em-8389) — Haute-Savoie – Samoëns, Le Chalet Roux, on decayed wood of a deciduous tree, leg. J. Boidin, 26.IX.1959 (LY 3229, em-8387) — Isère – St. Agnan, La Miraillone, on wood of a lying, decayed branch of a coniferous tree, leg. E. Martini, 9.IX.2014 (em-12317)

ITALY — **Trentino-Alto Adige** – Piné, Laghestel, on bark of a lying, decayed branch of a deciduous tree, leg. E. Martini, 19.IX.1997 (em-6175)

SLOVAKIA – Velká Fatra, Dedosova dolina, on wood of a decayed trunk of *Abies alba*, leg. M. Svrcek, 2.VII.1953, holotype of *Tomentella fatrensis* Svrček (PRM 901009)

SWITZERLAND — Jura – Welschenrohr, on wood of a lying, decayed branch of Pinus sylvestris, leg. E. Martini, 29.IX.1993 (em-3631) — Thurgau – Ermatingen, Wolfsberg, on wood of a lying, strongly decayed branch of a deciduous tree, leg. E. Martini, 4.X.2006 (em-9061) — **Ticino** – **Ghirone**, on bark of a lying, decayed branch of a coniferous tree, leg. E. Zenone, 5.IV.2002 (em-7945) - Gordevio, Saleggio, on bark of a lying, decayed branch of a deciduous tree, leg. E. Martini, 28.IX.1984 (em-552) ibid., on wood of a lying, decayed trunk of Pinus sylvestris, leg. E. Zenone, 2.XI.1996 (em-5995) - ibid., 12.VI.1998 (em-6599) - ibid., 26.VI.2000 (em-7864) - ibid., 7.VI.2002(em-8296) - ibid., 14.X.2005 (em-8709) - Loco, Campo, on wood of a lying, rather hard trunk of Juniperus communis, leg. E. Zenone, 28.VII.1993 (em-3645) - Lodano, Saligin, on wood of a lying, hard branch of Pinus sylvestris, leg. E. Zenone, 23.XII.1998 (em-6924) - Malvaglia, Bolla, on wood of a lying, decayed trunk of a coniferous tree, leg. E. Zenone, 4.XI.1993 (em-3709) - Meride, Bolle, on bark of a lying, decayed branch of Clematis vitalba, leg. E. Martini, 13.X.2007 (em-10178) - Mezzovico, Valle Petascio, on decayed wood of a deciduous tree, leg. E. Zenone, 26.X.1996 (em-5996) -Moleno, Boscone, on wood of a coniferous tree, leg. E. Zenone, 26.II.1997 (em-6054) -Monte, Craol, on lying, decayed wood of a deciduous tree, leg. F. Delmenico, 6.X.2005 (em-9654.1) - Ponto Valentino, Brusada, on wood of a lying, strongly decayed trunk of Picea abies, leg. E. Zenone, 17.IX.1998 (em-6730) - Prato, Sgrüssa, on wood of a lying, strongly decayed trunk of *Pinus sylvestris*, leg. E. Martini, 6.VI.1993 (em-3479) - ibid., on wood of a lying, decayed trunk of Picea abies, leg. E. Martini, 6.VI.1993 (em-3489) - Sabbione, Splüieti (Valle Bavona), on bark of a branch of *Picea abies*, leg. E. Zenone, 5.VI.1998 (em-6581) – San Carlo, Campo (Valle Bavona), on wood of *Larix* decidua, leg. E. Martini, 30.V.1997 (em-6084) - St. Antonino, Copera, on wood of a coniferous tree, leg. E. Zenone, 12.XII.1996 (em-6014)

TURKEY – Ilgaz-Dagh, on wood of *Abies bornmulleriana*, leg. A. Pilat, lectotype of *Tomentella ochraceo-olivacea* Litsch. (PRM 704215, A.Pilat. Iter Orientale 1931, no. 273)

References

- CHRISTIANSEN, M.P. (1960). 'Danish resupinate fungi, part II. Homobasidiomycetes'. Dansk Botanisk Arkiv, 19 (2): 60–388
- [2] KÕLJALG, U. (1996). 'Tomentella (Basidiomycota) and related genera in Temperate Eurasia'. Synopsis Fungorum, 9: 1–213
- [3] LARSEN, M.J. (1968). Tomentelloid fungi of North America. Syracuse. 157 p.
- [4] LARSEN, M.J. (1974). 'A contribution to the taxonomy of the genus Tomentella'. Mycologia Memoirs, 4: 1–145
- [5] LITSCHAUER, V. (1933). 'Addimenta ad floram Asiae Minoris Hymenomycetum, Phylacteriaceae'. Bulletin de la Société Mycologique de France, 49: 52-75
- [6] SVRČEK, M. (1958). 'Contribution to the taxonomy of the resupinate Thelephoraceous fungi'. Česká Mykologie, 12 (2): 66-77. URL: http://www.czechmycology.org/czechmycology-content.php
- [7] SVRČEK, M. (1960). 'Tomentelloideae Čechoslovakiae. Genera resupinata familia Thelephoraceae'. Sydowia, 14: 170-245. URL: http://www.cybertruffle.org.uk/cyberliber/ 59633/index.htm



Fig. 1: Dried basidiome. Image width = 35 mm [em-3489]



Fig. 2: Dried basidiome. Image width = 30 mm [em-552]



Fig. 3: Detail of the hymenophore (dried basidiome). Image width = 9 mm [em-3631]



Fig. 4: Detail of the hymenophore (dried basidiome). Image width = 9 mm [em-3631]



Fig. 5: Dried basidiome growing near the margin of $Tomentella\ fibrosa,$ holotype of $Tomentella\ fatrensis$ Svrček [PRM 901009]



Fig. 6: Rhizomorphs at the margin (dried basidiome). Image width = 9 mm [em-9061]



Fig. 7: Rhizomorphs (dried basidiome). Image width = 9 mm [em-7277, R. Hentic 9927]

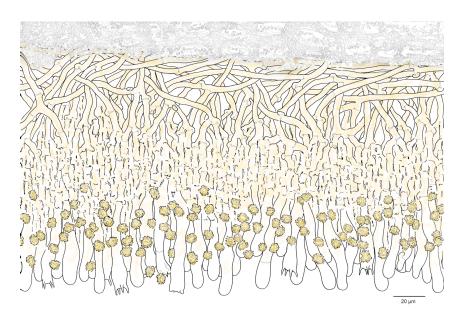


Fig. 8: Vertical section through the basidiome. Bar = 20 mm [em-552]

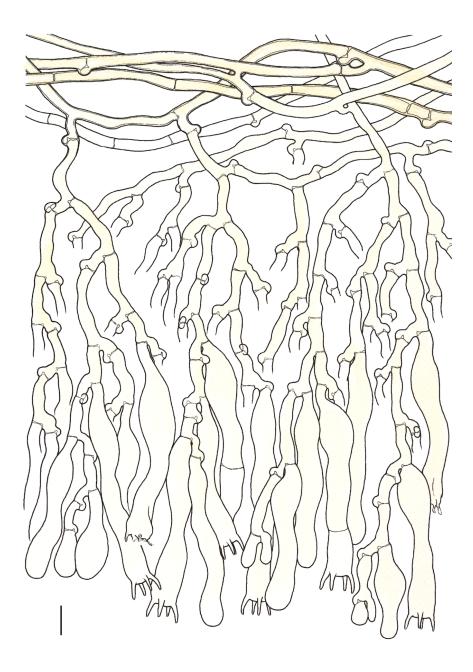


Fig. 9: Basidia, subhymenial and subicular hyphae. Bar = 10 μm [em-5996]

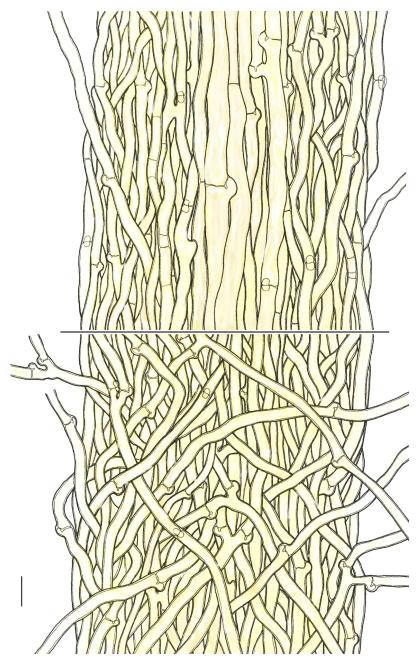


Fig. 10: Rhizomorphs: section (above), surface (below). Bar = 10 μm [em-7277, R. Hentic 9927]

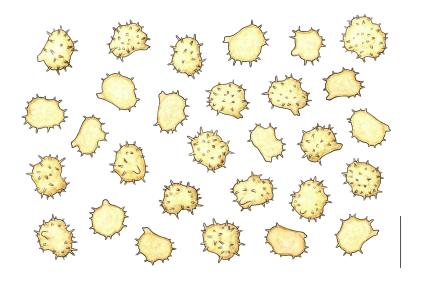


Fig. 11: Basidiospores, holotype of *Tomentella ochraceo-olivacea* Litsch. Bar = 10 μm [PRM 704215, A.Pilat. Iter Orientale 1931, no. 273]

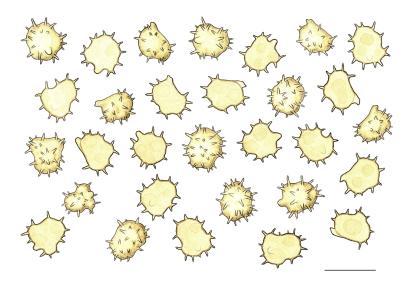


Fig. 12: Basidiospores, holotype of Tomentella fatrensis Svrček. Bar = 10 μm [PRM 901009]



Excerpts from Crusts & Jells

Descriptions and reports of resupinate Aphyllophorales and Heterobasidiomycetes

Authored and published by

ELIA MARTINI Via ai Ciòss 21 CH-6676 Bignasco Switzerland

Email: emart@aphyllo.net http://www.aphyllo.net



Issue № 99:

Tomentella ochraceo-olivacea Litsch.

Released on: 1^{st} June, 2016

© E. Martini

This work is licensed under a Creative Commons Attribution 4.0 International License (CC BY 4.0)

