

Gerhard Bedlan

Petrakia juniperi sp. nov., a new fungus on *Juniperus* sp.

Petrakia juniperi sp. nov.,
ein neuer Pilz
an *Juniperus* sp.

Abstract

Petrakia juniperi sp. nov., a new species collected on *Juniperus* sp. differs from other species of *Petrakia* in the size of conidia and shape of the appendages.

Key words: *Petrakia juniperi* sp. nov., *Juniperus* sp., symptoms, systematics, new species

Zusammenfassung

Petrakia juniperi sp. nov., eine neue Art an *Juniperus* sp. unterscheidet sich von anderen Arten der Gattung *Petrakia* durch Größe der Konidien sowie Ausbildung der Fortsätze.

Stichwörter: *Petrakia juniperi* sp. nov., *Juniperus* sp., Symptome, Systematik, neue Art

Introduction

Up to now we know four species of the genus *Petrakia*, namely *P. echinata*, *P. deviata*, *P. irregularis*, and *P. paracochinensis*. *P. cochinensis* was transferred to the genus *Ernakulamia* and *P. kambakkamensis* to the genus *Pseudopetrakia*.

Methods

For the determination of the fungus the usual mycological routine methods of light microscopy were adopted. Conidia of the fungus were stained with Wittmann's Blue (WITTMANN, 1970). They have been measured using the programme labSens by Olympus.

Results

The conidia of the new species differ from other species of *Petrakia* in size and form of the appendages. *P. echinata* has 5–10 elongate, hyaline appendages, which are 16–22 µm long and 3–4 µm wide with rounded tips. *P. deviata* has often, but not always, a very small, subhyaline, papillate appendage, which measures 2.5 µm, or an elongated nearly thorn shaped up to 8 µm long and 2.5–3 µm wide appendage.

P. irregularis has 6–30 appendages, which are 20–50 µm long, almost hyaline, continuous or up to 4 septate with mostly a rounded, sometimes conspicuously club-shaped end. The base of the appendages is swollen (VAN DER AA, 1968). *P. paracochinensis* has 3–5 bi-septate appendages which measure 60–62 × 3–4 µm, tapering to a rounded apex (WONG et al., 2002) (Table 1).

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Table 1. Species of the genus *Petrakia* in chronological order according to the original descriptions

Species	Current name	Host
<i>Petrakia echinata</i> (Peglion) Syd. & P. Syd. 1913		On withering or dead leaves of <i>Acer pseudoplatanus</i>
<i>Petrakia deviata</i> Petr. 1937 (WATZL, 1937)		On living leaves of <i>Acer campestre</i> var. <i>leioocarpum</i>
<i>Petrakia cochinchensis</i> Subram. 1957	<i>Ernakulamia cochinchensis</i> (Subram.) Subram. 1996	On dead spathe of <i>Cocos nucifera</i> .
<i>Petrakia kambakkamensis</i> Subram. 1957	<i>Pseudopetrakia kambakkamensis</i> (Subram.) M.B. ELLIS, 1971	On dead wood
<i>Petrakia irregularis</i> van der Aa, 1968		On dead branches of <i>Acer pseudoplatanus</i>
<i>Petrakia paracochinchensis</i> M.K.M. Wong, Goh & K.D. Hyde 2002		On decaying culms of <i>Miscanthus floridulus</i> and <i>Saccharum arundinaceum</i>

Petrakia juniperi BEDLAN sp. nov.

Index Fungorum IF 553181

Colonies darkbrown. The conidia are brown, oval to ellipsoid, muriform septate with up to three short appendages. The conidia are 15.75–21.59 μm long with an average of 18.25 μm and 10.99–13.49 μm wide with an average of 12.1 μm . The appendages arising from cells at both ends of the conidia, mostly two appendages at one end and only one appendage at the other end of the conidia. The appendages are simple, short, hyaline, nar-

rowing above with a blunt rounded tip. They are 2.43–5.53 μm long with an average of 3.91 μm , 3.24–5.02 μm wide at the basis with an average of 3.97 μm and 1.24–2.03 μm wide at the tip with an average of 1.65 μm (Fig. 1).

On dead wood of *Juniperus* sp.

Type: Austria, Vienna. On dead wood of *Juniperus* sp., 12 August 2014, Weikendorf (district of Gänserndorf in Lower Austria) leg. et det. G. BEDLAN (holotype, hb W).

The type specimen has been deposited at the department of Botany, Natural History Museum, Vienna (hb W).

Etymology: The new species found on *Juniperus* sp. is named after the host where it has been found.



Fig. 1. Conidium of *Petrakia juniperi* (stained with Wittmann's Blue).

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