Materials towards a revision of the genus *Pseudoliparis* (Orchidaceae, Malaxidinae), 1

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One new combination at the section level and nine combinations at the species level are proposed in the genus *Pseudoliparis* (Orchidaceae, Malaxidinae).

Keywords: Malaxidinae, nomenclature, Orchidaceae, *Pseudoliparis*, taxonomy

In the course of a taxonomic revision of the genus *Pseudoliparis* (Orchidaceae, Malaxidinae) I studied herbarium specimens and spirit collections kept at AMES, B, C, BM, HBG, K, L, US, and W. Among the collections from Asia I found nine species, which clearly belong in *Pseudoliparis* but have previously not been placed in it. The necessary new combinations are proposed here.

*Pseudoliparis atrobrachiata* (Ridl.) Marg., *comb. nova*


*Pseudoliparis bataanensis* (Ames) Marg., *comb. nova*


*Pseudoliparis heliophoba* (J.J. Sm.) Marg., *comb. nova*


*Pseudoliparis inexspectata* (J.J. Sm.) Marg., *comb. nova*


*Pseudoliparis moluccana* (J.J. Sm.) Marg., *comb. nova*


*Pseudoliparis multiflora* (Ames & C. Schweinf.) Marg., *comb. nova*

**Pseudoliparis uncata** (Ames) Marg., *comb. nova*


**Pseudoliparis wapeana** (J.J. Sm.) Marg., *comb. nova*


**Pseudoliparis zippeli** (J.J. Sm.) Marg., *comb. nova*


The genus *Pseudoliparis* was recently reinstated by Szlachetko and Margófska (1999). The species previously placed into it can be found in that paper and those by Margófska and Szlachetko (2000, 2001). *Pseudoliparis* currently contains 39 species distributed in SE Asia.

**Key to Pseudoliparis and closely related Asiatic genera of subtribe Malaxidinae**

1. Plants saprophytic or semisaprophytic ....... *Risleya*
   2. Column of gynostemium massive, at most slightly longer than staminodes; anther relatively small, distinctly broader than long, its locules opening apically or ventrally ................................................................. *Malaxis*
   2. Column of gynostemium slender, at least twice as long as staminodes; anther large, at most slightly broader than long, its locules opening always ventrally .......... 3
   3. Lip simple, lateral lobes not auricled ................. 4
   3. Lip 3-lobed, lateral lobes auricled ..................... 5
   4. Lip lingulate to ovate, its apical margins always entire ..... *Glossochilopsis*
   5. Apical margins of lip always entire, lip flat (without basal cavity), ornamented at central portion only by parallel lamellae or obscurely convex; gynostemium elongate, sometimes with appendages along dorsal part of column; staminodes large, ribbon-, horn-, or wing-like, folding back from anther ................. *Pseudoliparis*
   6. Central cavity of lip relatively small, surrounded by a prominent ring-like callus, positioned along two external nerves, cavity usually with a roof above ........... *Crepidium*
   6. Central cavity of lip large, embracing most of middle part of lip, surrounded only by convexity of two, external nerves, without roof above .................. *Dienia*

Based on the original description and examination of type collections of species of *Pseudoliparis*, representatives of this genus are characterised by (1) delicate, more or less subequal tepals, (2) unlobed or only obscurely 3-lobed lip, always with entire margins, auriculate, flat (without basal cavity), ornamented at central portion by parallel calli, lamellae or only obscure convexity, (3) elongate, dorsiventrally flattened, slightly arched gynostemium, (4) erect, linear to ovate anther, firmly fused with the column apex, with a basally thickened connective, (5) four narrowly to broadly clavate pollinia, with tiny, apical calli-dicles, (6) distinct, ribbon-, horn-, or wing-like staminodes, often with minutely papillose surface, usually dark-coloured and distinctly folded back from the anther, (7) erect, narrowly triangular to triangular rostellum, acute to apiculate at apex and adnate apically to the anther apex, and (8) small, ovate, deeply concave stigma.

According to the original description, the genus is also easily distinguished by horn-like appendages or distinct convexity along the dorsal part of column (Fig. 1B). However, some species are characterized by a slightly different form of this portion of gynostemium. This feature seems to be characteristic of section *Oistochilus* Schlecht. (= genus *Microstylis*). Schlechter (1914) affirmed the absence of a horn or tubercular excrescence on the dorsal part of column (Fig. 1A). Kores (1989) transferred section *Oistochilus* to *Malaxis*. Based on only such features as a small, flat, entire, auriculate lip and a simple column of gynostemium he included *Malaxis latisegmenta* C. Schweinf. and *M. platychila* (Rehb. f.) Kuntze in this section. At present the former is recognized as *Crepidium latisegmentum* (C. Schweinf.) Clem. & Jones and the latter is probably just its cleistogamous form. Both these species are easily distinguished by a distinctly developed central lip cavity surrounded by a prominent ring-like callus, and the shape of gynostemium, typical of the genus *Cre-
Pseudoliparis gregorii Marg. & Szlach.
Pseudoliparis heliophoba (J.J. Sm.) Marg.
Pseudoliparis incurva (J.J. Sm.) Szlach. & Marg.
Pseudoliparis inexpectata (J.J. Sm.) Marg.
Pseudoliparis laevis (Schlecht.) Szlach. & Marg.
Pseudoliparis latipetala (J.J. Sm.) Marg. & Szlach.
Pseudoliparis maboroensis (Schlecht.) Szlach. & Marg.
Pseudoliparis macrotis (Kraenzl.) Szlach. & Marg.
Pseudoliparis magnicallosa Marg. & Szlach.
Pseudoliparis microhybos (Schlecht.) Szlach. & Marg.
Pseudoliparis multiflora (Ames & C. Schweinf.) Marg.
Pseudoliparis orbigularis Marg. & Szlach.
Pseudoliparis ramosii (Ames) Marg. & Szlach.
Pseudoliparis rhinoceros (J.J. Sm.) Szlach. & Marg.
Pseudoliparis schumanniana (Schlecht.) Szlach. & Marg.
Pseudoliparis seleniglossa (Schlecht.) Szlach. & Marg.
Pseudoliparis selenophylla (Schlecht.) Szlach. & Marg.
Pseudoliparis toricellensis (Schlecht.) Szlach. & Marg.
Pseudoliparis tubulasa (J.J. Sm.) Szlach. & Marg.
Pseudoliparis umbonata (Schlecht.) Szlach. & Marg.
Pseudoliparis uncata (Ames) Marg.
Pseudoliparis undulata (Schlecht.) Szlach. & Marg.
Pseudoliparis section Oistochilus
(Schlecht.) Marg., comb. nova


Pseudoliparis atrobrachiata (Ridl.) Marg.
Pseudoliparis graminifolia (Schlecht.) Szlach. & Marg.
Pseudoliparis moluccana (J.J. Sm.) Marg.
Pseudoliparis raciborskii Szlach. & Marg.
Pseudoliparis wapeana (J.J. Sm.) Marg.
Pseudoliparis van-royenii Szlach. & Marg.
Pseudoliparis zippeli (J.J. Sm.) Marg.

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References