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## The unique Brazilian species of *Polylobus* Solier (Coleoptera: Staphylinidae: Aleocharinae) with a checklist of all species of the genus

SIDNEI BORTOLUZZI DA SILVA<sup>1</sup> & EDILSON CARON<sup>2</sup>

Universidade Federal do Paraná, setor Palotina, 85950-000 Palotina-PR, Brazil. E-mail: <sup>1</sup>[sidnei.bs91@gmail.com](mailto:sidnei.bs91@gmail.com), <sup>2</sup>[caron@ufpr.br](mailto:caron@ufpr.br)

### Abstract

*Polylobus stigma* (Erichson, 1839) is the only known species of the genus from Brazil. Here, this species is redescribed based on the type material, including illustrations of diagnostic characters. The species remains in *Polylobus*, but pending further revision of the genus and related genera as *Tricolpochila* Bernhauer, 1908 and *Polylobinus* Bernhauer, 1908. A commented checklist of all species in *Polylobus* is also provided.

**Key words:** Oxypodini; palynophagy; rove beetle; South America; taxonomy

### Introduction

*Polylobus* Solier, 1849 (Aleocharinae, Oxypodini, Oxypodina) is a genus of rove beetles which currently has 77 described species distributed throughout the Neotropical (56 species, including Mexico, Central and South America) and Australian regions (21, including Australia and New Zealand). The genus was described including two species, *P. maculipennis* Solier, 1849 and *P. melanocephalus* Solier, 1849, both collected in Chile. The unique *Polylobus* species recorded from Brazil, *P. stigma*, was placed originally in *Homalota* Mannerheim, 1830, and subsequently in *Atheta* (*Microdota*) Mulsant & Rey, 1873 (Bernhauer & Scheerpeltz 1926), in *Tricolpochila* Bernhauer, 1908 (Pace 1987b), and lately in *Polylobus* (Pace 2000).

Klimaszewski & Sturm (1991) published one of the most relevant papers about *Polylobus*, in which they made an update diagnosis of the genus (based on few species and not including the type species) and commented about hypothesized morphological adaptations to pollen feeding habits. According to published data, the Neotropical *Polylobus* species are found in flowers (Fairmaire & Germain 1861; Fauvel 1866; Klimaszewski & Sturm 1991), while the Australian species were collected from the nests of social insects, tussocks, fallen and rotting leaves (Lea 1910, 1912). Furthermore, most of South American *Polylobus* species (52) are founded in Andean regions of the following countries, Venezuela, Colombia, Ecuador, Peru, Bolivia, Chile and Argentina. The Brazilian species is one of the 5 species of the genus recorded in South American not distributed in the Andean region (3 in Mexico and 1 in Panama).

The goal of the present study is to redescribe *Polylobus stigma* (Erichson, 1839) in detail, using the type material and providing illustrations of the main morphological characters for further revision of the genus. In addition, a commented checklist of all species of *Polylobus*, with synonymic list, type locality, currently known distribution and discussion of nomenclatural history, is also provided.

### Material and methods

The type specimen was received from ZMHB, Museum für Naturkunde der Humboldt-Universität, Berlin, Germany. Labels are organized in sequence from top to bottom, where the data from each label are enclosed within double quotes ( ' ' ), a forward slash (/) separates lines, and information enclosed by square brackets ([ ]) provides added details.

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