



Synopsis of Australian agathidine wasps (Hymenoptera: Braconidae: Agathidinae)

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Abstract

Agathidinae is a large subfamily of braconid wasps that are koinobiont endoparasitoids of lepidopteran larvae. Although the group is relatively well studied in the northern hemisphere, the Australian fauna is poorly known, with only 36 species recorded from the continent. This study presents a synopsis of the genera and species that occur in Australia, including a key to genera, information on their distribution and apparent species richness, and a list of species according to the latest generic concepts. Ten genera occur in Australia: *Amputostypos* Sharkey, *Baeognatha* Kokujev, *Biroia* Szépligeti, *Braunsia* Kriechbaumer, *Coccygidium* Saussure, *Cremnops* Foerster, *Disophrys* Foerster, *Euagathis* Szépligeti, *Lytopylus* Foerster and *Therophilus* Wesmael, with *Lytopylus* known only from a single introduced species. *Baeognatha* **stat. rev.** is taken out of synonymy with *Therophilus* and two genera are synonymised: *Platyagathis* Turner with *Disophrys* (**syn. nov.**) and *Camptothlipsis* with *Baeognatha* (**syn. nov.**). The genera *Agathis* Latreille and *Bassus* Fabricius are excluded from the Australian fauna, as the species described under these genera are here transferred to *Therophilus*, and no other species of either genus have been discovered from the continent. Further, the genera *Baeognatha* and *Coccygidium* are recorded from Australia for the first time, although not represented by any described species.

The following new combinations are proposed: *Amputostypos dilutum* (Turner), **comb. nov.** (from *Hypsostypos*), *A. exornatum* (Turner), **comb. nov.** (from *Hypsostypos*), *Disophrys leaena* (Turner), **comb. nov.** (from *Platyagathis*), *Lytopylus rufipes* (Nees von Esenbeck) **comb. nov.** (from *Bassus*), *Therophilus antipodus* (Ashmead) **comb. nov.** (from *Orgiloneura*), *T. festinatus* (Turner), **comb. nov.** (from *Bassus*), *T. latibalteatus* (Cameron) **comb. nov.** (from *Agathis*), *T. leucogaster* (Holmgren) **comb. nov.** (from *Agathis*), *T. malignus* (Turner) **comb. nov.** (from *Bassus*), *T. martialis* (Turner) **comb. nov.** (from *Agathis*), *T. meridionalis* (Turner) **comb. nov.** (from *Bassus*), *T. minimus* (Turner) **comb. nov.** (from *Bassus*), *T. minor* (Szépligeti) **comb. nov.** (from *Bassus*), *T. pedunculatus* (Szépligeti) **comb. nov.** (from *Bassus*), *T. ruficeps* (Szépligeti) **comb. nov.** (from *Bassus*), *T. rufithorax* (Turner) **comb. nov.** (from *Agathis*), *T. rufobrunneus* (Turner) **comb. nov.** (from *Agathis*), *T. rugosus* (Turner) **comb. nov.** (from *Bassus*), *T. tricolor* (Szépligeti) **comb. nov.** (from *Bassus*), and *T. xanthopsis* (Turner) **comb. nov.** (from *Agathis*). In addition, *Bassus tenuissimus* (Turner) is synonymised with *T. ruficeps* (Szépligeti) **syn. nov.**, and *Agathis dimidiata* (Brullé) is designated a **nomen dubium**.

Key words: Agathidinae, *Agathis*, *Amputostypos*, *Baeognatha*, *Bassus*, *Biroia*, *Braunsia*, *Camptothlipsis*, *Coccygidium*, *Cremnops*, *Disophrys*, *Euagathis*, *Hypsostypos*, *Orgiloneura*, *Platyagathis*, *Therophilus*, mimicry

Introduction

The braconid subfamily Agathidinae is a relatively speciose group of koinobiont endoparasitoids of lepidopteran larvae, with over 1,200 described species in 50 genera worldwide (Sharkey 1997, Yu *et al.* 2005, Sharkey *et al.* 2006). Most agathidines are solitary parasitoids, commonly of larvae that feed within concealed habitats such as silken galleries, although members of some genera (e.g., *Disophrys* Foerster and *Coccygidium* Saussure) are known to parasitise exposed larvae (Shaw and Huddleston 1991, Sharkey 1992, Sarmiento and Sharkey 2004). The subfamily is well defined and easily recognised by several wing venation characters including the presence of a fore wing fold between the prestigma and the medial vein, a narrow