

Declotila, a new genus of Orgilinae (Hymenoptera: Braconidae) without occipital carina from the Australian region

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Key words: Braconidae; Orgilinae; *Declotila*; Australian.

Declotila gen. nov. (Braconidae: Orgilinae; type species: *D. albomarginata* spec. nov.) from Victoria (Australia) is described and fully illustrated.

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Introduction

The junior author discovered in the Australian National Insect Collection, Canberra a large aberrant specimen of the subfamily Orgilinae Ashmead, 1900, among similarly coloured specimens of the subfamily Braconinae. It is aberrant by its size (about 13 mm), the dark wing membrane, the propodeum not differentiated from the metapleuron, the absence of the metapleural flange and the occipital carina, the largely absent notauli, the presence of a pair of diverging grooves on the second tergite and the basally sclerotized vein 2A of fore wing. The biology is unknown; related genera are endoparasites of larvae of Microlepidoptera (van Achterberg, 1987; Shaw & Huddleston, 1991), but considering its size its host will be a larger lepidopterous species. The colour pattern is typical for southern Australian Braconidae and Ichneumonidae, and outside Australia only known from Malagasy (van Achterberg, 1979; Quicke et al., in press).

For the terminology used in this paper, see van Achterberg, 1988: 5-11.

Descriptions

Declotila gen. nov.

Type-species: *Declotila albomarginata* spec. nov.

Etymology: anagram of the generic name *Clotildea*, to which the new genus is related. Gender: feminine.

Diagnosis.— Antenna of ♀ slender and many segmented (fig. 11); scapus robust and apically truncate (fig. 2); pedicellus somewhat petiolate (fig. 2); clypeus normal, truncate ventrally (fig. 5); occipital carina completely absent; surroundings of stemmaticum normal, not depressed (fig. 4); malar suture absent; length of mesosoma about 1.6 times its height; prepectal carina absent, except for a short anterior part (fig. 12); precoxal sulcus absent; pleural sulcus smooth; metapleuron not projecting forwards ventro-laterally (fig. 12); metapleural flange absent (fig. 12); mesoscutum smooth and glabrous; notauli absent on disk and shallowly impressed anteriorly (fig. 12); scutellar sulcus small and smooth (fig. 6); lateral carina of mesoscutum absent;

propodeum convex, smooth and without carinae; veins 1-SR and r-m of fore wing absent (fig. 1); vein r of fore wing comparatively long and oblique (fig. 1); vein 1-M of fore wing straight; vein cu-a of fore wing vertical and interstitial (fig. 1); vein 2-M of fore wing sclerotized basally; parastigma connected to vein SC+R and with minute costal cell (fig. 1); vein SR1+3-SR of fore wing straight; wing membrane dark brown; outer side of hind tibia with several robust, peg-like bristles (fig. 9); length of first metasomal tergite about 1.5 times its apical width, and without dorsal carinae (fig. 8); second tergite smooth and with pair of diverging, rather shallow depressions (fig. 8); third tergite smooth and without depressions; only base of second tergite with sharp lateral crease; third and following tergites completely sclerotized; ovipositor straight and robust, without notch or nodus subapically (fig. 14); length of ovipositor sheath about twice length of fore wing.

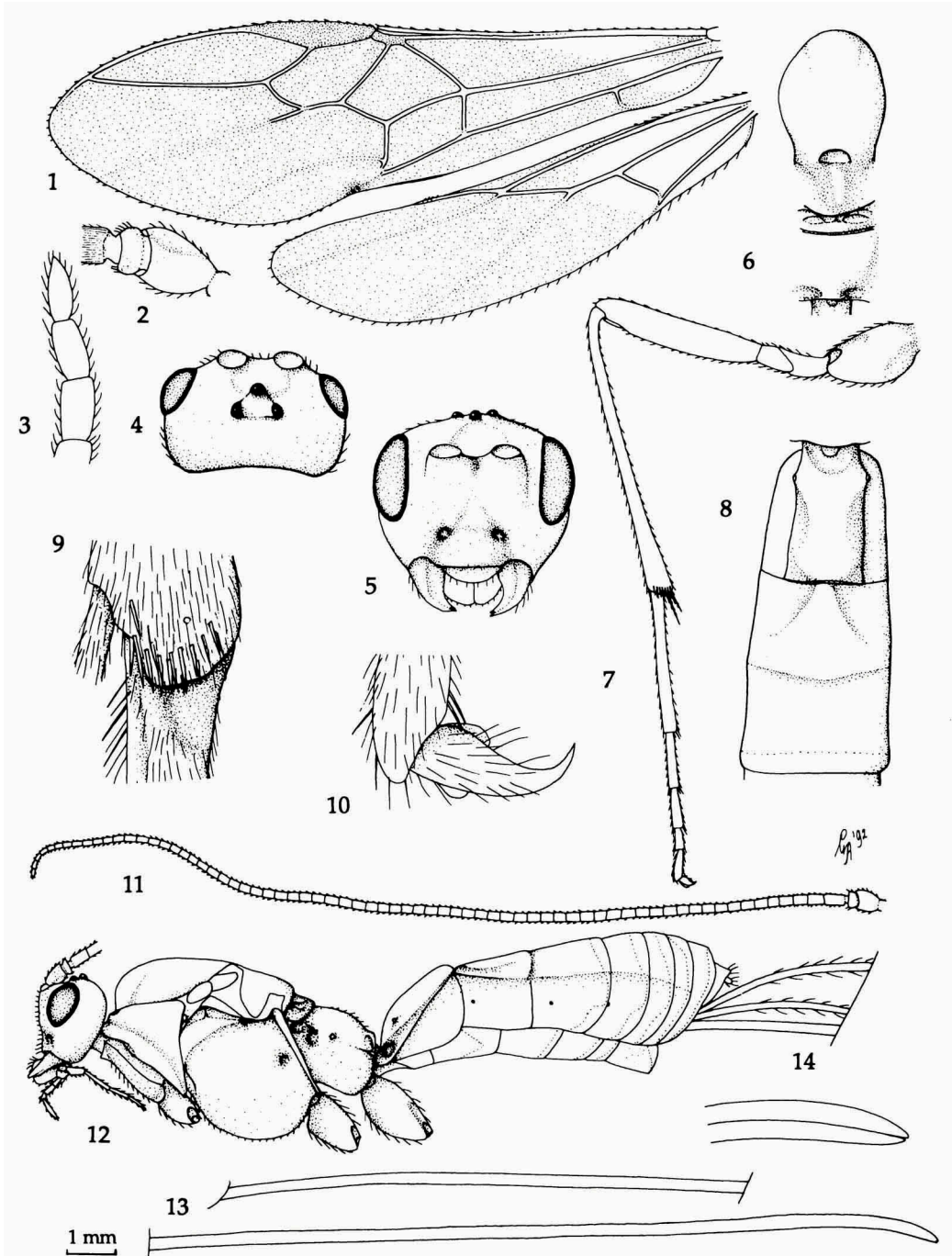
Biology.— Unknown.

Distribution.— Australian: one species (S. Australia).

Note.— Runs to the subfamily Orgilinae in the key to the subfamilies by van Achterberg (1990) though it has the prepectal carina largely and the occipital carina completely absent and the scutellar sulcus has no median carina. In the key to the genera of the Orgilinae by van Achterberg (1987) it runs to the Afrotropical genus *Clotildea* Szépliget, 1914. Its size, the colour of the wing membrane, the smooth scutellar sulcus, the long and robust ovipositor, the smooth pleural sulcus, the presence of a minute costal cell of fore wing, the depression of the second tergite, the absence of the metapleural flange and the metapleuron not differentiated from the propodeum indicate a close relationship with *Clotildea*.

In the key to the genera by van Achterberg (1987: 8) the new genus can be inserted as follows:

4. Length of fore wing more than 12 mm and its membrane largely dark brown; second metasomal tergite with pair of depressions (fig. 8); metapleuron not differentiated from propodeum (fig. 12); dorsal carinae of first tergite completely absent (fig. 8); scutellar (fig. 6) and pleural (fig. 12) sulci smooth; metapleural flange absent (fig. 12) 5a
- Length of fore wing less than 10 mm and its membrane hyaline; second metasomal tergite without depressions (fig. 105 in van Achterberg, 1987); metapleuron differentiated from propodeum (fig. 94, l.c.); dorsal carinae of first tergite nearly always present basally (fig. 105, l.c.); pleural (fig. 94, l.c.), and nearly always scutellar (fig. 103, l.c.), sulci sculptured; metapleural flange present (fig. 94, l.c.) ...
..... 5
- 5a. Complete occipital and main part of prepectal carinae absent (fig. 12); second metasomal tergite only with a pair of diverging depressions (fig. 8); surroundings of stemmaticum normal, flat (fig. 4); notauli absent on mesoscutal disc (fig. 6); vein 2A of fore wing distinct (fig. 1); scapus truncate apically (fig. 2); Australian ..
..... *Declotila* gen. nov.
- Occipital carina strong up to middle level of eye and complete prepectal carinae present (fig. 38 in van Achterberg, 1987); second metasomal tergite with X-shaped depression (fig. 155, l.c.); stemmaticum situated in a wide depression (fig. 39, l.c.); notauli present on mesoscutal disc (fig. 156, l.c.); vein 2A of fore wing absent (fig. 44, l.c.); scapus strongly oblique apically (fig. 38, l.c.); Afrotropical
..... *Clotildea* Szépliget



Figs. 1-14, *Declotila albomarginata* gen. nov. & spec. nov., ♀, holotype. 1, wings; 2, scapus and pedicellus, outer aspect; 3, apex of antenna; 4, head, dorsal aspect; 5, head, frontal aspect; 6, mesosoma, dorsal aspect; 7, hind leg; 8, first-third metasomal tergites, dorsal aspect; 9, apex of hind tibia, outer aspect; 10, outer hind claw; 11, antenna; 12, habitus, lateral aspect; 13, ovipositor; 14, apex of ovipositor. 1, 7, 11-13: 1 × scale-line; 2, 3: 5 ×; 4, 5: 2 ×; 6, 8: 1.5 ×; 9, 10, 14: 12 ×.

***Declotila albomarginata* spec. nov.**
(figs 1-14)

Material.— Holotype, ♀ (Australian National Insect Collection, Canberra), "Big Desert, Vic. [= Victoria, S Australia], 27.x.1973, D.F. Crosby".

Holotype, ♀, length of body 13.5 mm, and of fore wing 13.3 mm.

Head.— Antennal segments 72, length of third segment 1.5 times fourth segment, length of third, fourth and penultimate antennal segments 2.4, 1.6 and 1.9 times their width, respectively; length of maxillary palp 1.1 times height of head; length of eye in dorsal view 0.8 times temple (fig. 4); temple subparallel posteriorly (fig. 4); POL:diameter of ocellus:OOL = 15:5:20; frons nearly flat, slightly concave (fig. 4); vertex rather flat and with some punctures; antennal sockets without lamella dorso-laterally; face and clypeus sparsely finely punctate; anterior tentorial pits deep and rather large (fig. 5); length of malar space twice basal width of mandible.

Mesosoma.— Length of mesosoma 1.6 times its height; pronope not clearly visible, but present; antescutal depression minute; pronotal sides smooth; pleural sulcus narrow; meso- and metapleuron sparsely punctulate and largely smooth; remaining part of notauli smooth; surface of propodeum smooth.

Wings.— Fore wing: r:3-SR+SR1:2-SR = 13:43:10; m-cu:1-M = 11:13. Hind wing: membrane glabrous basally; cu-a long and somewhat reclivous.

Legs.— Hind coxa smooth; tarsal claws large and simple, regularly widened basally (fig. 10); length of femur, tibia and basitarsus of hind leg 5.0, 13.8 and 11 times their width, respectively; length of hind tibial spurs 0.3 and 0.2 times hind basitarsus.

Metasoma.— Length of first tergite 1.6 times its apical width, its surface smooth (as following tergites), medio-basally deeply concave and medially convex, its spiracles somewhat protruding, and laterope deep and large (fig. 12); length of ovipositor sheath 2.03 times fore wing; hypopygium medium-sized and truncate apically (fig. 12).

Colour.— Black; head (except stemmaticum) orange-brown; palpi brown; first tergite (except apical half largely), second tergite (except medio-posteriorly), third-seventh tergites posteriorly and sternites posteriorly ivory or whitish; pterostigma, wing membrane and veins dark brown, but membrane below pterostigma paler and basally partly subhyaline (fig. 1).

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