

## Revision of *Megascogaster* (Hymenoptera, Braconidae, Cheloninae), with a new species from Sulawesi, Indonesia

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### Abstract

*Megascogaster wallacei* sp. n. is described from Sulawesi, Indonesia. This is the first representative south of the Philippines and is only the second species of this rare genus described since the type species, *M. elongata* Baker, 1926. The presence of *Megascogaster* in Sulawesi, a part of Wallacea, points to a broader distribution of the genus in Southeast Asia. A redescription of *M. elongata* and a description of the new species *M. wallacei* are presented along with a key to separate them.

**Key words:** *Megascogaster wallacei*, *Megascogaster elongata*, egg-larval parasitoid, new species, redescription

### Introduction

The Cheloninae *sensu stricto* is a moderately large subfamily of braconid wasps with more than 1,375 described species in 17 genera world-wide (Yu *et al.*, 2012; Kittel & Austin, 2014). Virtually all members of the subfamily are considered to be solitary koinobiont parasitoids of Lepidoptera (Shaw & Huddleston, 1991; Shaw, 1997; LaSalle, 2003).

Although the Cheloninae are moderately well-studied for the Holarctic region (Shaw, 1983; Huddleston, 1984; van Achterberg, 1990), the faunas of many regions of the world are still poorly studied, e.g. Afrotropical, Australasian, Neotropical, and Oriental. There have been some generic revisions of chelonine wasps for the Australasian region (Kittel & Austin, 2014; Kittel *et al.*, 2014) and the Oriental region (Zettel, 1990a, 1990b, 1990d), as well as other braconid taxa of the Southeast Asian area (Quicke *et al.*, 2012; van Achterberg, 1995, 2004). However, the fauna of Southeast Asia is, regardless of recent revisions, still poorly known. Currently, there are 19 chelonine species known in Indonesia belonging to four cosmopolitan genera *Ascogaster* (two species), *Chelonus* (seven species), *Phanerotoma* (six species), and *Phanerotomella* (four species) (Yu *et al.*, 2012), of which half of the species were described in Zettel's revision of the Phanerotomini (Zettel, 1989, 1990a, 1990b, 1990d).

While sorting the chelonines in material of the Waite Insect and Nematode Collection (WINC) to assess Australian species of chelonine wasps, two specimens of the genus *Megascogaster* from Sulawesi were identified. A third specimen has been found amongst extensive material made available from D. Quicke (BNHM). A redescription of *M. elongata* and a description of the new species *M. wallacei* are presented along with a key to separate them and discussion of relationships and distribution of the genus.

### Material and methods

**Microscopy and images.** Terminology for morphology and wing venation followings van Achterberg (1988) and Karlsson and Ronquist (2012), while sculpturing is based on Eady (1968).

**Male.** Unknown.

**Distribution.** The species is known from the province North Sulawesi (Utara Sulawesi), Indonesia.

**Etymology.** Named after Alfred Russel Wallace and for his concept of 'Wallace's Line'.

**Biology.** Unknown.

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