

**A NEW SPECIES OF *ALOX* TAN & NG, 1995
(DECAPODA: BRACHYURA: LEUCOSIIDAE)
FROM BALICASAG ISLAND, THE PHILIPPINES**

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ABSTRACT. – A new species of leucosiid crab of the genus *Alox* Tan & Ng, 1995, is described from the Philippines. *Alox tormos*, new species, is distinguished from its 11 congeners by the distinct sculpture of the dorsal surface of carapace and the distally flaring, petaloid tip of the male first pleopod.

KEY WORDS. – Crustacea, Decapoda, Brachyura, Leucosiidae, *Alox*, new species, Philippines.

INTRODUCTION

The leucosiid crab fauna of the Philippines has been extensively studied, including material collected by the Albatross Expedition (1907–1910) (Tan, 1996), and three expeditions conducted under the aegis of the Muséum national d’Histoire naturelle, Paris (1976, 1980, 1985) (Chen, 1989; Galil, 2001a, b, 2003a, b, 2005, 2006). In recent years, the Philippines National Museum, Philippines Bureau of Fisheries, Muséum national d’Histoire naturelle in Paris, University of San Carlos, National Taiwan Ocean University, and the Raffles Museum of the National University of Singapore, have conducted a series of expeditions to the Philippines. These collections have already resulted in a number of reports on the leucosiid fauna by Galil & Takeda (2004), Komatsu et al. (2004, 2005) and Galil & Ng (2007, 2009).

The genus *Alox* Tan & Ng, 1995, was established for species formerly included in *Oreophorus* Rüppell, 1830, where the carapace bears mushroom-shaped flattened granules and antennular fossae fully sealed when the basal segment of the antennule is retracted. Of the 11 *Alox* species described (Tan & Ng, 1995; Naruse & Ng, 2006; Galil & Ng, 2007; Ng et al., 2008), only four have been found in the Philippines thus far: *A. rugosum* (Stimpson, 1858) (see Tan, 1996), *A. ornatum* (Ihle, 1918) (see Chen 1989; Tan & Ng, 1995), *A.*

bothros Galil & Ng, 2007, and *A. chaunos* Galil & Ng, 2007 (see Galil & Ng, 2007).

Examination of shallow water material collected by hand off Balicasag Island, Phillipines, disclosed a single specimen that is described herein as a new species. The specimen is deposited in the Crustacean Collection of the National Museum of the Philippines (NMCR). The terms used follow Tan & Ng (1995), with the measurements (in millimeters) provided of the carapace length and width, respectively.

TAXONOMY

***Alox* Tan & Ng, 1995**

***Alox tormos*, new species**

(Figs. 1–3)

Material examined. – Holotype, male (4.2 × 5.6 mm) (NMCR), station B5, 9°35.402’N 123°44.315’E, 4 m depth, soft and hard corals, in drop-off area with caves, Balicasag Island, Biking, Panglao, off Bohol, central Philippines, coll. 2 Jun.2004.

Description of holotype male. – Carapace subpentagonal, carapace width about 1.3 times length. Dorsal surface of carapace prominently sculpted, irregularly surfaced with

flattened granules, pitted, resembling coral rubble. Front narrow, produced, somewhat upcurved, divided into 2 swollen closely-granulate lobes, separated by deep furrow. Anterior margin almost vertical. Antennule well developed, basal antennular segment operculiform, rugose, entirely sealing subtriangular antennular fossa. Antennae folded in orbital hiatus without gap. Orbits small, rounded, visible in dorsal

view; when retracted, ocular peduncle nearly seals orbit; outer orbital margin bisutured. External maxillipeds concealing trapezoid buccal opening, closely set with granules; endognathal meri visible in anterior view. Anterolateral margin sinuous, indistinctly rimmed, with pit-like indentation medially. Subhepatic margin with rounded facet medially, visible in dorsal view. Lateral margins of carapace expanded. Posterolateral margin with granulate tubercle submedially. Posterior carapace margin produced, visible in dorsal view, bilobate. Postfrontal median longitudinal ridge narrow, distinct, separated laterally by deep grooves. Granule-lined furrow meandering from postfrontal ridge to distal posterolateral margin. Branchial regions raised, irregularly pitted, a pair of granule-rimmed cavities submedially on anterior margin. Cardiac region surfaced with flattened granules. Intestinal region raised, well demarcated, distinctly pitted. Chelipeds subequal, robust, closely and evenly granulate; chela almond-shaped, upper and lower margins carinate; fingers as long as palm; propodal finger very high



Fig. 1. *Alox tormos*, new species. Holotype male (4.2 × 5.6 mm) (NMCR), colour in life.

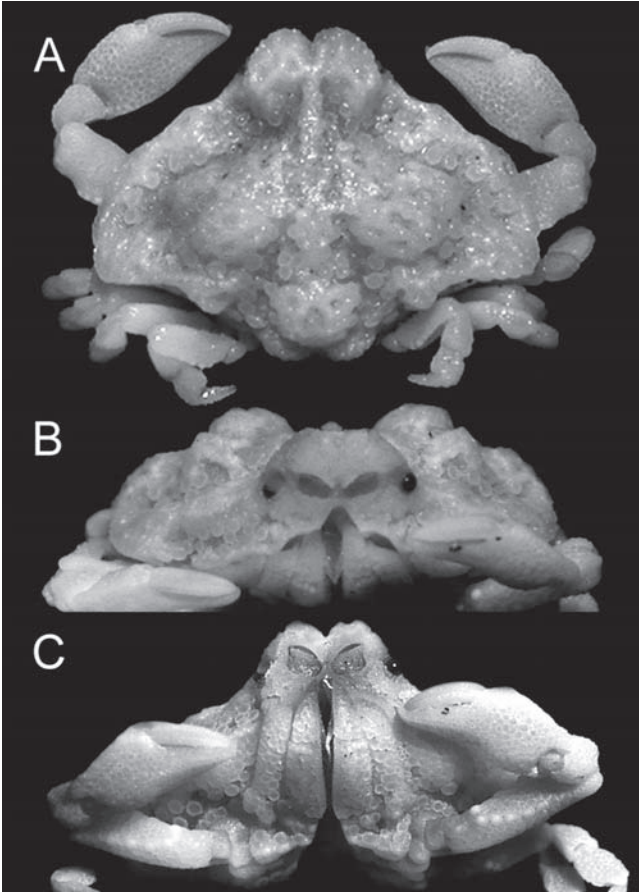


Fig. 2. *Alox tormos*, new species. Holotype male (4.2 × 5.6 mm) (NMCR). A, overall carapace view; B, frontal view; C, face, showing third maxillipeds.



Fig. 3. *Alox tormos*, new species. Holotype male (4.2 × 5.6 mm) (NMCR). A, B, right male first pleopod. Scale bar = 1 mm.

proximally, almost twice height of dactylar finger. Second to fifth pereopods stout, short, closely granulate; dactyli slender, longer than propodi, terminating in incurved claw. Thoracic sternum closely, irregularly granulate, horizontally ridged, ridges interspaced with 3 minutely granulated grooves. Male abdominal sulcus deep, reaching buccal cavity. Abdomen closely covered with flattened granules; first and second male abdominal somites slender, horizontal; third to fifth somites fused, narrowing distally, more than twice as long as sixth somite; sixth somite subtrapezoid, lateral margins distinctly convex; telson lacinate, as long as sixth somite. Shaft of male first pleopod (Fig. 3a, b) stocky, nearly straight, subdistally setose, distally dilate, petaloid, tip pointed. Second male pleopod short, slender, apex scoop-like.

Etymology. – From *tormos*, Greek for hole; alluding to the pitted appearance of the dorsal surface of its carapace. Used as a noun.

Colour. – Carapace light brown on all dorsal surfaces; pereopods and ventral surfaces white (Fig. 1).

Distribution. – Known only from type location in Balicasag Island, Panglao, the Philippines.

Remarks. – In the general appearance of the carapace, mouthparts, chelipeds, ambulatory legs and male abdomen, *Alox tormos*, new species, closely resembles *A. zalion* Tan & Ng, 1995 (type locality Kii Peninsula, Japan). However, *A. tormos* is easily distinguished from the latter in having prominently bilobate frontal and posterior margins (Fig. 1, 2A) (versus weakly so, cf. Tan & Ng, 1995: Pl. 8E, Fig. 13A); a more eroded anterolateral rim (Figs. 1, 2; Tan & Ng, 1995: Pl. 8E, F, Fig. 13A); the distal part of fused abdominal somites 3 to 5 is relatively more slender (cf. Tan & Ng, 1995: Fig. 13J); and the structure of the male first pleopod is distally flaring and petaloid (Fig. 3), rather than bulbous (cf. Tan & Ng, 1995: Fig. 13I).

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