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***Cancer (Mantis) digitalis* Herbst, 1793, an objective synonym of *Oratosquillina quinquedentata* (Brooks, 1886): neotype designation and reversal of precedence (Crustacea: Stomatopoda: Squillidae)**

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Johann Friedrich Wilhelm Herbst (1793) proposed two species-group names for stomatopod crustaceans from the East Indies (= Indonesia): *Cancer (Mantis) arenarius* (pp. 96–98, pl. 33, fig. 2) and *Cancer (Mantis) digitalis* (pp. 92–96, pl. 33, fig. 1) (Fig. 1A). *Cancer (Mantis) arenarius* Herbst, 1793, is a preoccupied objective synonym of what is now known as *Lysiosquillina maculata* (Fabricius, 1793) (see Low & Ng 2012: 47, 48).

Holthuis (1991: 19) identified *Cancer (Mantis) digitalis* Herbst, 1793, with *Lysiosquilla scabricauda* (Lamarck, 1818), whereas Bigelow (1894: 536, 537) and Kemp (1913: 61) tentatively placed *Cancer (Mantis) digitalis* Herbst, 1793, in the synonymy of *Miyakella nepa* (Latreille in Latreille, Le Peletier, Serville & Guérin, 1828) (see Ah Yong & Low 2013: 99 for a discussion of the nomenclature and taxonomy of this species). None of these authors considered *Cancer (Mantis) digitalis* Herbst, 1793, as a valid name.

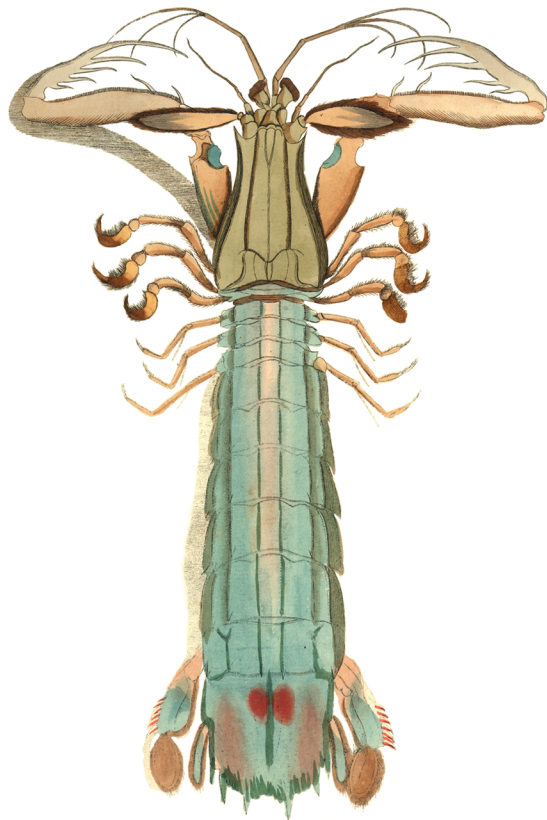
Based on the original account and figure of *Cancer (Mantis) digitalis*, Herbst (1793) was dealing neither with *Lysiosquilla scabricauda* nor *Miyakea nepa*. Although stylised, Herbst's figure of *Cancer (Mantis) digitalis* most closely resembles *Oratosquillina quinquedentata* (Brooks, 1886) [type locality: Arafura Sea] (Fig. 1B), especially in having five teeth on the dactylus of the raptorial claw, an acute inferodistal angle on the merus of the raptorial claw and bilobed lateral processes of thoracic somites 5–7, clearly depicted in the type figure. Moreover, *Oratosquillina quinquedentata* occurs in Indonesian waters (Ahyong 2001; Ahyong & Chan 2008), so it is highly likely that Herbst (1793) was dealing with Brooks' (1886) species. The type of *Cancer (Mantis) digitalis* is no longer extant (Low & Ng unpubl.). Therefore, to objectively fix the synonymy of the two species, the holotype of *Oratosquillina quinquedentata* in the Natural History Museum, London (NHM 94.10.16.6, male, TL 140 mm, Arafura Sea, *Challenger* stn. 188) is herein designated as the simultaneous neotype of *Cancer (Mantis) digitalis*.

The Principle of Priority (Article 23 of the *International Code of Zoological Nomenclature*, hereafter the Code, ICZN 1999) would require the older name to be used (i.e., *Cancer (Mantis) digitalis* Herbst, 1793). In this case, the direct application of the Principle of Priority is unfortunately not in the interests of nomenclatural stability because the younger name, *Oratosquillina quinquedentata* (Brooks, 1886), is in current and widespread usage (see references in Appendix 1).

The Principle of Priority, however, is mediated by Article 23.9.1 of the Code that requires a reversal of precedence of a junior synonym when the senior synonym has not been used as a valid name after 1899 (Article 23.9.1.1) and the junior synonym “has been used for a particular taxon, as its presumed valid name, in at least 25 works, published by at least 10 authors in the immediately preceding 50 years and encompassing a span of not less than 10 years” (Article 23.9.1.2).

Since 1899, the name *Cancer (Mantis) digitalis* Herbst, 1793, has been mentioned twice (Holthuis 1991: 19; Kemp 1913: 61), but in neither case as a valid name, thereby fulfilling Article 23.9.1.1 of the Code. In the past 45 years (since 1968), at least 31 publications by 28 different authors (see Appendix 1) have used *quinquedentata* as a valid species name (under the genera *Squilla* Fabricius, 1793, *Oratosquilla* Manning, 1968, and *Oratosquillina* Manning, 1995), thereby fulfilling Article 23.9.1.2.

As both requirements of Article 23.9.1 of the Code are met, *Oratosquillina quinquedentata* (Brooks, 1886), takes precedence over the objective synonym *Cancer (Mantis) digitalis* Herbst, 1793, in accordance with Article 23.9.2. *Oratosquillina quinquedentata* (Brooks, 1886), becomes a *nomen protectum*, and *Cancer (Mantis) digitalis* Herbst, 1793, a *nomen oblitum*.



A



B

FIGURE 1. A, *Cancer (Mantis) digitalis* Herbst, 1793, holotype, East Indies, reproduced from Herbst, 1793, pl. 33, fig. 1. B, *Oratosquillina quinquedentata* (Brooks, 1886), female, total length 155 mm, northeast of Shelburne Bay, Queensland, Australia, colour faded in preservative (Australian Museum, P56920).

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APPENDIX 1. List of 31 publications since 1968 treating *Squilla quinquedentata* Brooks, 1886, as a valid species (in the genera *Squilla*, *Oratosquilla* and *Oratosquillina*).

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