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Article



A new species of the genus *Parastylodactylus* Figueira, 1971 (Crustacea: Decapoda: Caridea: Stylodactylidae) from off Kollam, southwest coast of India

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Abstract

A new species of the caridean genus *Parastylodactylus* Figueira, 1971 (Stylodactylidae), *P. sulcatus*, is described and illustrated on the basis of three male specimens from the Southern Arabian Sea, off the southwest coast of India, at a depth of 350 m. Morphologically, the new species appears closest to *P. bimaxillaris* (Bate, 1888) widely distributed in the Indo-West Pacific, but the much longer rostrum, the absence of a supraorbital tooth on the carapace, the deep hepatic groove on the carapace and the relatively longer and more slender third pereopod distinguish the new species from *P. bimaxillaris*. It is the first representative of the genus from Indian waters. An updated key to the species of *Parastylodactylus* is presented.

Key words: Crustacea, Decapoda, Caridea, Stylodactylidae, Parastylodactylus, new species, Arabian Sea, India

Introduction

The stylodactylid shrimp genus *Parastylodactylus* was established by Figueira (1971) to accommodate *Stylodactylus bimaxillaris* Bate, 1888. The genus is characterized by the absence of a palp on the mandible and the presence of arthrobranchs above the bases of the first to fourth pereopods in both males and females. The following seven species, all recorded from the sublittoral to the upper bathyal zone in the Indo-West Pacific region, are currently included in the genus: *P. bimaxillaris* (Bate, 1888), *P. hayashii* (Komai, 1997), *P. longidactylus* Cleva, 1990, *P. moluccensis* Cleva, 1997, *P. richeri* Cleva, 1990, *P. semblatae* Cleva, 1990, and *P. tranterae* Cleva, 1990 (Cleva 1990, 1997; Komai 2011). In addition, Hayashi (2007) indicated the existence of one undescribed species, previously referred to *P. semblatae* (cf. Hayashi 1991), from Japanese waters.

Three specimens of a stylodactylid shrimp were obtained by the second author from the by-catch of a deepwater shrimp trawler, operated off Kollam, southwest coast of India. On close examination, it was revealed that these specimens represent an undescribed species of *Parastylodactylus*, appearing closest to *P. bimaxillaris*. In this contribution, we thus describe a new species, *P. sulcatus*, on the basis of these three specimens.

The holotype and one paratype are deposited in the Natural History Museum and Institute, Chiba, Japan (CBM). One paratype is deposited in the Marine Biodiversity Referral Museum at the Central Marine Fisheries Research Institute (CMFRI), Cochin, India. Postorbital carapace length (cl) is used as the standard measurement indicating the size of the specimens. For comparison, the following material was examined.

Parastylodactylus bimaxillaris: 1 male (cl 5.1 mm), 1 female (cl 4.7 mm), off Tong Kong, southwestern Taiwan, depth unknown, 5 August 1996, commercial trawler, coll. T. Komai, CBM-ZC 2863; 4 ovigerous females (cl 5.3–6.6 mm), Dashi Fishing ground, off northeastern Taiwan, 300–400 m, 4 December 1997, commercial trawler, CBM-ZC 3878.