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# PRELIMINARY DESCRIPTIONS OF FOUR NEW SPECIES OF DORIPPID CRABS FROM THE INDO-WEST PACIFIC REGION (CRUSTACEA: DECAPODA: BRACHYURA)

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Abstract.—The following species are diagnosed: Dorippe irrorata, from the Andaman sea; Dorippoides nudipes, from the western Indian Ocean; Nobilum arachnoides, from the Inland Sea of Japan; and Paradorippe cathayana, from China.

Since our review of the west African brachyuran crabs was published (Manning and Holthuis 1981), we have been working on a revision of the crabs of the subfamily Dorippinae, family Dorippidae, from the Indo-West Pacific region. The two Atlantic representatives of this subfamily were revised by us in 1981. Publication of our revision of the Dorippinae has been delayed much longer than anticipated, and several colleagues have inquired about the status of our new species, some of which have been labelled as new in museum collections (British Museum (Natural History), London; Muséum National d'Histoire Naturelle, Paris; Zoological Museum, Copenhagen; and our institutions as well) for several years. We take this opportunity to make available the names of these new taxa.

The diagnoses given below will differentiate the new species from others in their respective genera, defined in Manning and Holthuis (1981:30, 31). The following abbreviations are used: BM(NH), British Museum, Natural History, London; RMNH, Rijksmuseum van Natuurlijke Historie, Leiden; USNM, National Museum of Natural History, Smithsonian Institution, Washington; cb and cl, carapace breadth and carapace length, respectively, in mm.

### Dorippe irrorata, new species Fig. 1a, b

Holotype. – Andaman Sea, south of Mergui Archipelago; 09°54'N, 97°42'E; 73 m; International Indian Ocean Expedition, Anton Bruun (Cruise I, Sta AB-21; 24 Mar 1963: 1 male, cl 21.5, cb 22.0 (USNM 172495).

Diagnosis. – Carapace broader than long, with distinct tubercles dorsally and with distinct lateral branchial tooth. Anterolateral margin of carapace, between bases of exorbital teeth and cervical groove, smooth. Inner dorsal margin of exorbital tooth smooth. Lower orbital margin with teeth and denticles mesially. Carpus of cheliped with granules, palm of chela with granules over most of surface. Teeth on second and third somites of male abdomen very low, distinctly granular.

*Remarks.*—This species differs from the three species of *Dorippe* now recognized as follows: It can be distinguished from *Dorippe frascone* (Herbst, 1785) in having the carpus of the chelipeds granular and in having granules on the teeth of the male abdomen. It differs from *D. sinica* Chen, 1980, in having tubercles or denticles on the anterolateral margin of the carapace, behind

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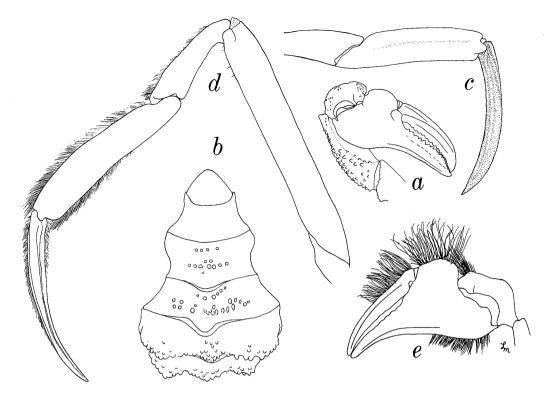


Fig. 1. a, b, *Dorippe irrorata*, male holotype, Andaman Sea: a, Cheliped; b, Abdomen; c, *Dorippoides nudipes*, female paratype, Harkiko Bay, Ethiopia, Red Sea, propodus and dactylus of third pereopod; d, *Nobilum arachnoides*, male holotype, Inland Sea of Japan, third pereopod; e, *Paradorippe cathayana*, male holotype, Jimei, Fujian Province, China, cheliped.

the anterolateral spine, and differs from D. tenuipes Chen, 1980 [=D. miersi Serène, 1981] in having shorter walking legs, with the merus of the second pereopods only five rather than six times as long as high in males.

*Etymology.*—The specific name is from the Latin, "irroratus," covered with granules.

### Dorippoides nudipes, new species Fig. 1c

Holotype. – Massawa, Ethiopia, Red Sea; Israel South Red Sea Expedition no. E62/ 4115; trawled: 1 male, cl 17 mm, cb 19 mm (RMNH no. D.35530).

*Diagnosis.*—Carapace broader than long, lacking both dorsal tubercles and distinct lateral branchial tooth. Surface distinctly granular laterally on branchial region. Exorbital teeth overreaching frontal teeth. Dactyli of second and third pereopods broad throughout their lengths, broadest in distal fourth.

*Remarks.*—Differs from the only other species in the genus, *Dorippoides facchino* (Herbst, 1785), in having the carapace more granular and in having the dactylus of the second and third pereopods broadest in distal fourth rather than at midlength.

*Etymology.*—The name is from the Latin, "nudus," naked, and "pes," foot.

### Nobilum arachnoides, new species Fig. 1d

Holotype. – Japan, Inland Sea, near Kobe; 34°38'N, 135°01'E; dredged in 8–50 fms (15–

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92 m); sand; *Challenger* Sta 233A; 19 May 1875: 1 male, cl 15.8, cb 16.7 (BM(NH) 84.44).

Diagnosis. – Carapace wider than long, surface lacking erect tubercles, grooves well defined. Exorbital teeth falling short of front. Posterior margin of orbit lacking erect spine on outer side of orbital fissure. Gastric region lacking erect prominences. Merus of second and third pereopods about 7 times longer than high.

Remarks.—This species agrees with Nobilum japonicum (von Siebold, 1824) and differs from N. histrio (Nobili, 1903) in lacking a tooth on the exorbital margin and five prominences on the gastric region. It differs from both of these species in length and slenderness of the second and third pereopods.

*Etymology.*—The name is from the Greek, "arachnes," spider, and "-oides," like.

#### Paradorippe cathayana, new species Fig. 1e

Holotype. – China, Jimei, Fujian Province; S. F. Light, coll.; 24 Jun 1923: 1 male, cl 16.8, cb 18.2 (USNM 57762).

*Diagnosis.*—Carapace wider than long, surface lacking erect tubercles or prominences, appearing smooth, grooves well defined. Orbital fissure narrow, closed. Carpus of chelipid smooth. Propodus of third leg less than 3 times longer than high.

*Remarks.* — This species differs from *Paradorippe australiensis* (Miers, 1884) in smoothness of carapace and in having the carpus of the cheliped smooth, not granular, and it can be distinguished from *P. polita* (Alcock and Anderson, 1894) in having the orbital fissure closed and the propodus of the third pereopod less than three times longer than high.

*Etymology.*—The name is derived from Cathay, the name used for China in the Middle Ages.

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#### Literature Cited

Manning, R. B., and L. B. Holthuis. 1981. West African Brachyuran crabs.—Smithsonian Contributions to Zoology 306:i–xii, 1–379.

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