

A new Scopimerine crab from the Malay Peninsula

By M. W. F. TWEEDIE, M.A.

Genus *Potamocypoda* gen. nov. Genotype *Potamocypoda pugil*
Tweedie *infra*

This genus differs from all other Scopimerinæ except *Pseudogelasimus*¹ in having one of the chelipeds of the male greatly enlarged and modified; it is immediately distinguished from that genus by the condition of the fronto-orbital border, which is shorter than the greatest breadth of the carapace, and from all the members of the sub-family except certain species of *Ilyoplax* by the absence of tympana from the meri of the walking legs. It differs further from all other Scopimerinæ in that the interantennular septum is narrow.

It appears not to be closely related to any previously described genus and, while there is no doubt of its being an Ocypodid, its position within the family is a little difficult to decide.

Kemp, in 1919² stated that the Scopimerinæ may be distinguished from the Macrophthalminæ by the more oblique position and rudimentary character of the antennules and by the greater breadth of the interantennular septum. While the "tympana" on the meri of the legs are highly characteristic of the sub-family, they are absent in some species of *Ilyoplax*, whose Scopimerine affinities are beyond doubt.

In *Potamocypoda* the "tympana" are absent, the interantennular septum is narrow and the appearance of the animal strongly recalls that of *Paracleistostoma* a Macrophthalmine genus. The antennules, however, are minute and obliquely folded and so concealed beneath the front as to be almost invisible without manipulation. Further, the exopodites of the external maxillipeds are wholly concealed, as in typical Scopimerinæ, whereas in all Macrophthalmine genera that I have examined they are visible external to the ischia. Finally, the male abdomen is typically Scopimerine in aspect. The fifth segment is abruptly constricted and all the segments are separate. In *Paracleistostoma* and genera allied to it (though not in *Macrophthalmus*) the basal segments of the abdomen are fused together.

1. Tweedie, Bull. Raffles Mus., 13, 1937, p. 153.

2. Kemp, Records Indian Museum, xvi, p. 308.

A NEW SCOPIMERINE CRAB

On the balance of the characters enumerated above I am inclined to regard this crab as an aberrant member of the sub-family Scopimerinae.

The generic name has been chosen in recognition of the fluviatile habitat of the single known species.

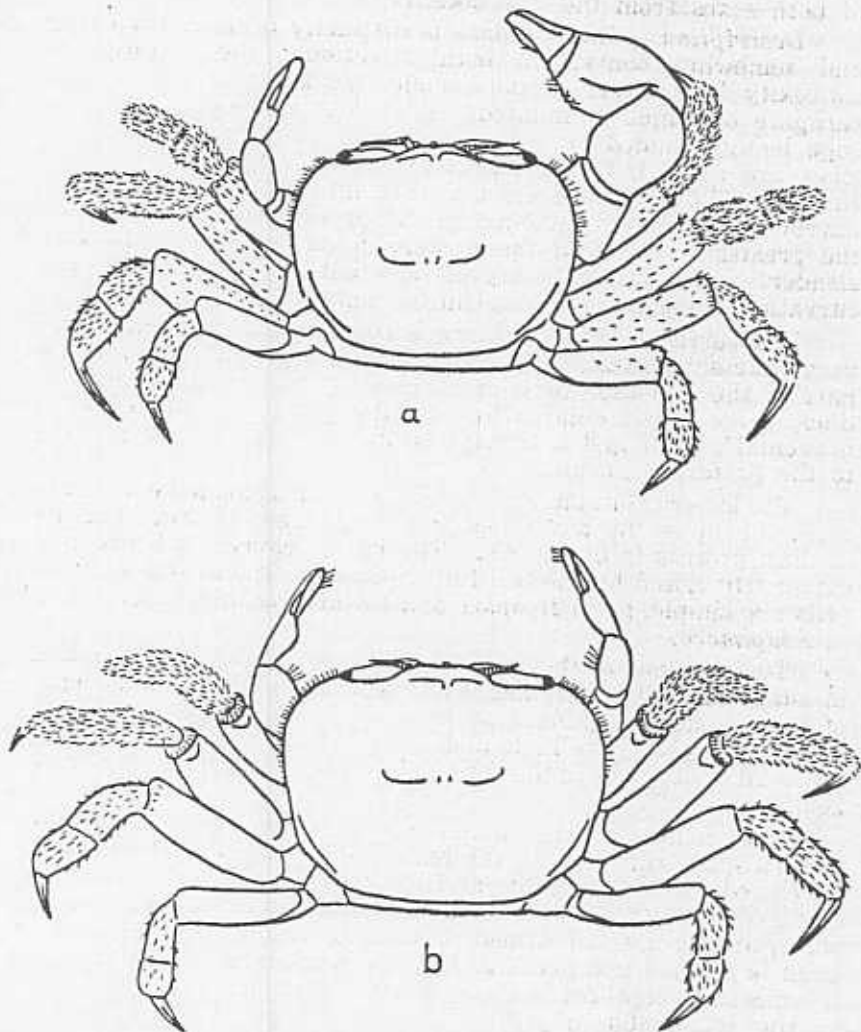


Fig. 1. *Potamocypoda pugil* sp.n.
a, male, b, female.

Potamocypoda pugil sp.n.

Types.—An adult male and female from the Sungai Kayu, a freshwater stream tributary to the River Sedili in swamp forest in eastern Johore¹.

Material.—A good series of adult and sub-adult specimens of both sexes from the type locality.

Description.—The carapace is distinctly broader than long and somewhat convex in both directions; the longitudinal convexity is stronger in the female, the anterior part of the carapace of which is inflated. The front is deflexed, its free edge being rounded or very bluntly angular; the post-frontal lobes are small but well marked and separated by a narrow furrow. The orbits are short so that, although the front is not narrow, the fronto-orbital margin is considerably shorter than the greatest breadth of the carapace; the eyes are small and slender. The lateral margins are entire and arched, the curvature being more marked in the female than the male.

The surface of the carapace is smooth, finely punctate and very sparsely tomentose on the branchial regions. The median part of the cervical groove is marked by two confluent curved lines, there is an oblique line on the posterior part of each branchial region and a transverse line runs close and parallel to the posterior margin.

The lower orbital margin is smooth and separated externally from the upper by a wide gap; the epistome is short and its median process is dentiform. The buccal cavern is broad and completely closed by the third maxillipeds. The second maxillipeds are simple, as in *Ilyoplax* and *Dotillopsis*, not expanded as in *Scopimera*.

The abdomen of the male (fig. 2, c) is typically Scopimerine in shape and all its segments are separate and distinct. That of the female is expanded so as to cover the sternal segments almost entirely. The male abdominal pleopod (fig. 2, d) is not recurved on itself as in the superficially similar Macrophthalmine genera.

The chelipeds in the female are small and slender and the fingers spoon-shaped. In the male the right or left cheliped is developed as in the female and the other greatly enlarged and modified (fig. 2, a, b). The merus and carpus are merely enlarged and are not armed or ornamented in any way. The palm is inflated and about as high as long and its outer surface is smooth except for some scattered granules near the base of the immovable finger. There is a curved crest on the proximal part of the upper surface and on the inner surface

1. The types will be deposited in the British Museum.

A NEW SCOPIMERINE CRAB

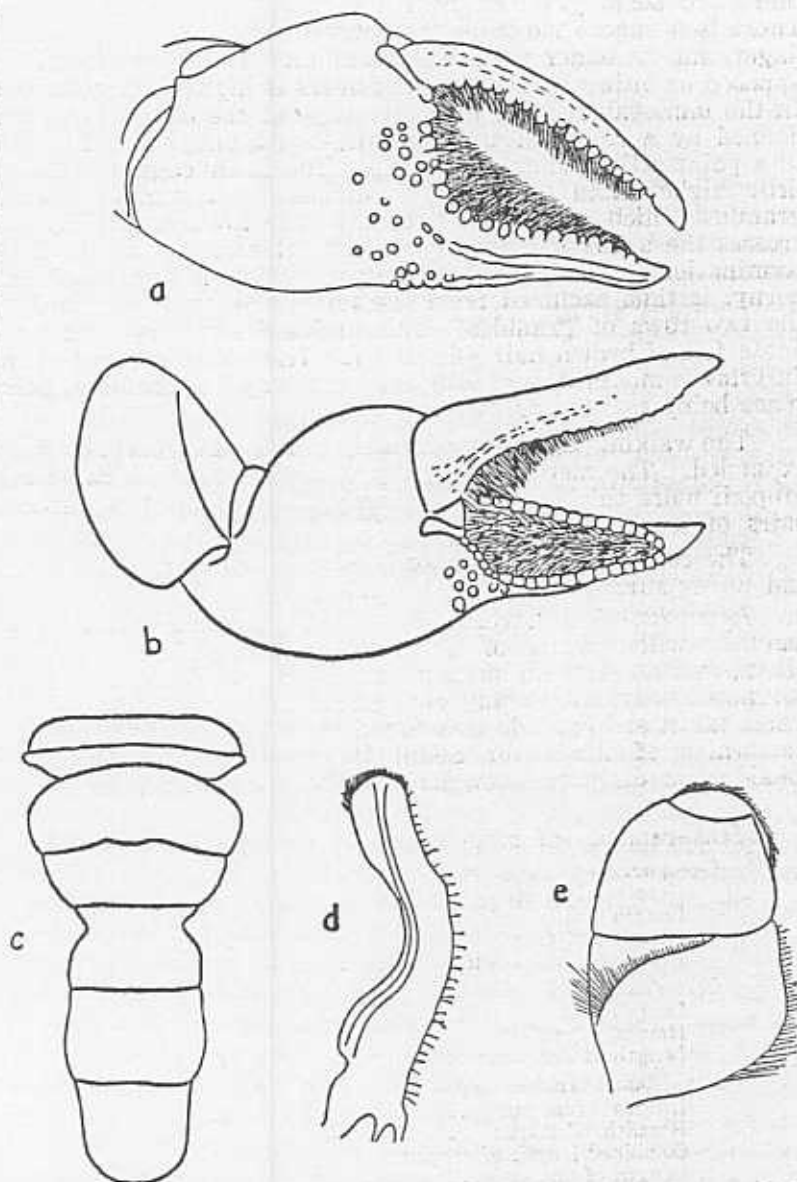


Fig. 2. *Potamocypoda pugil* sp.n. a, external view of enlarged chela of male; b, same from above; c, abdomen of male; d, first male pleopod; e, external maxilliped.

Mus. 14, 1938.

[201]

there are some granules near the articulation of the dactyl. There is a rugose ridge on the outer surface of the immovable finger, and its under surface is granular. The formation of the apposed or biting surface of the fingers is highly characteristic. In the immovable finger the outer edge of the biting surface is defined by a row of rounded granules running from the base to a point a little short of the tip. The inner edge, which is a little higher than the outer, is defined by a similar row of granules which runs from near the base towards the tip and crosses the biting surface to join the external row at its distal termination. The tip of the finger, which is excavated and horny, is thus excluded from the triangular space enclosed by the two rows of granules. This enclosed space is filled by a dense felt of brown hair (fig. 2, *b*). The biting surface of the dactylus is modified in exactly the same way, the enclosed, hairy space being rather narrower.

The walking legs are moderately slender, the meri not being expanded. The meri, are slightly tomentose and the carpi and propodi more thickly so, particularly those of the two anterior pairs of legs.

The colour of the carapace is olive brown and of the limbs and under surface yellowish brown.

Remarks.—The stream in which this crab was found together with species of *Sesarma*, including *S. semigranosa* Miers, and an Alpheid shrimp, is subject to tidal rise and fall but apparently not to any changes in salinity. A sample of water taken at high tide was found to be completely fresh, and the water of the River Sedili is regarded as fresh for a considerable distance below its junction with the stream.

Measurements of male type.—

<i>Carapace.</i> —			
Greatest breadth	..	..	7.8 mm.
Length	..	..	6.5 "
Breadth of front	..	..	2 "
Fronto-orbital breadth	..	..	6 "
<i>Left (enlarged) chela.</i> —			
Length	..	..	6.7 "
Height of palm	..	..	3.6 "
Length of dactylus	..	..	4 "
<i>Penultimate walking leg.</i> —			
Length of merus	..	..	4 "
Breadth of merus	..	..	1.4 "
Combined length of carpus and propodus	..	..	4.2 "
Length of dactylus	..	..	2.2 "
<i>Abdomen.</i> —			
Length	..	..	6.8 "
Breadth at third segment	..	..	3.5 "