伊勢湾菅島から発見されたグナチア属（甲殻類等脚目）の一新種

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Gnathia sugashimaensis, a New Gnathiid Isopod from Sugashima, Ise Bay, Central Japan*

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伊勢湾菅島から発見されたグナチア属（甲殻類等脚目）の一新種

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伊勢湾湾口部に位置する三重県鳥羽市菅島から発見されたオスのグナチア科等脚目を新種 *Gnathia sugashimaensis*（和名：イセウミクワガタ）として記載した。本種はシャム湾から知られている *Gnathia pilosipes* MONOD 1926 に最も類似するが (1) 大顎とくに内側の突起の形態，(2) 頭部後縁にへこみが無いこと，(3) 胸部体節に著しい切れこみが無いこと，(4) 腹部の基板が顕著でないこと，および (5) 尾節板が長いことなどによって区別される。

なお，本種の完模式標本は富山市科学文化センター（Cr-164）で保管される。また同時に採集された 2 個の若令個体も本種に属する可能性が高いと考えられるのでその記載をも併せて行なった。

Hitherto, the taxonomy on the Japanese gnathiid fauna has been much ignored. Recently, Miss Mine Mori, student of Nagoya University, found three specimens of gnathiid isopods from the intertidal zone of Sugashima, Ise Bay. These specimens were sent to me for identification through the courtesy of Mr. Teruaki Nishikawa of the University. At closer examinations, it proved to represent a new species of the genus *Gnathia*. The specimens, preserved in alcohol, was dissected and examined in glycerol. All the figures were drawn by using camera lucida.

Before going further, I wish to express my sincere gratitude to Dr. Saburo Nishimura of the Kyoto University for reading the manuscript, to Mr. Teruaki Nishikawa and Miss Mine Mori of the Nagoya University for their generosity in providing me with the interesting specimens, and to Dr. Toshiyuki Yamaguchi of the Tokyo University for his kindness to supply me with a copy of Monod's paper which was indispensable for the present study.

Gnathia sugashimaensis, sp. nov.,

(Japanese name: Ise-umikuwagata)

(Figures 1-2)

Material examined: 1♂ (holotype, 5.1 mm in body length including mandible, but excluding both antennae), from the intertidal zone, Senjôjiki, Sugashima Island, Toba City, Mie Prefecture, Central Japan, coll. Mine Mori, Mar. 3, 1980. Holotype specimen is deposited at

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the Toyama Science Museum (Cr-164). Unfortunately no female specimen has been found, but two juvenile specimens were collected at the same time, and they are seemingly young forms of the present new species, judged from the fact that these specimens were all collected together from the same habitat.

Habitat: The specimens were found on the surface of an ascidian, *Pyura sacciformis* (VON DRASCHE).

Description: Body oblong, 4.0 times as long as wide. Body color pale green when it was alive, but it is pale yellow in alcohol. Cephalon large, about 0.8 time as long as wide, with a concavity at rostral part and a pair of small projections at the baymouth of the concavity. The mandible large and each inner border with three shallow cancavities, but outer border without tooth. The eyes mediocre in size, composed of about 50 ocelli. First three peraeonal somites equal in length and fourth and fifth somites each twice as long as respective anterior somites. Pleonal somites narrow. Ploetelson oblong and lanceolate in shape.

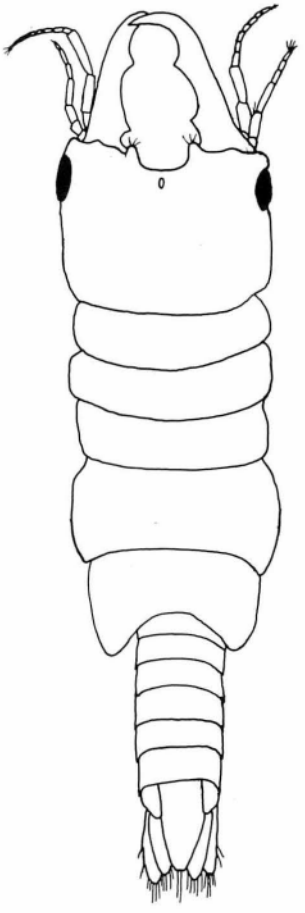

Fig. 1. Dorsal view of holotype of *Gnathia sugashimaensis*, n. sp.

First antenna short and six-segmented; first segment ellipsoidal with a plumose and a simple setae; second segment rectangular with two plumose setae and a simple seta; third segment long with several simple setae at distal part; fourth to sixth segment narrower than the basal three segments, the sixth with three aesthetascs and a simple seta. Second antenna with eleven segments, and about 1.3 times as long as the first; first and second segments square; third and fourth segments oblong; fifth to the last segments narrower than the basal four segments.

Second maxilla long with two claws at the tip. Palp of maxilliped four-segmented; second segment is the biggest; each segment with three to seven plumose setae. Pylopod three-segmented; first segment big with many plumose setae and several simple setae.

Five peraeopods similar in shape; basis rectangular with a serries of fine setae at outer margin; ischium oblong; merus and carpus rectangular; propodus oblong with two larger and about six to nine smaller spines at inner border. No penis is found.

Uropod long; basis triangular; exopod with two plumose setae on outer margin and about

six plumose setae at the tip; endopod longer than the exopod and with seven plumose setae around the margin. Pleotelson with a pair of long setae at the tip and four pairs of small setae along the lateral margin.

Remarks: The present new species is most closely allied to *Gnathia pilosipes* MONOD from Siam Bay, Thailand, but the former is separated from the latter in the following features:

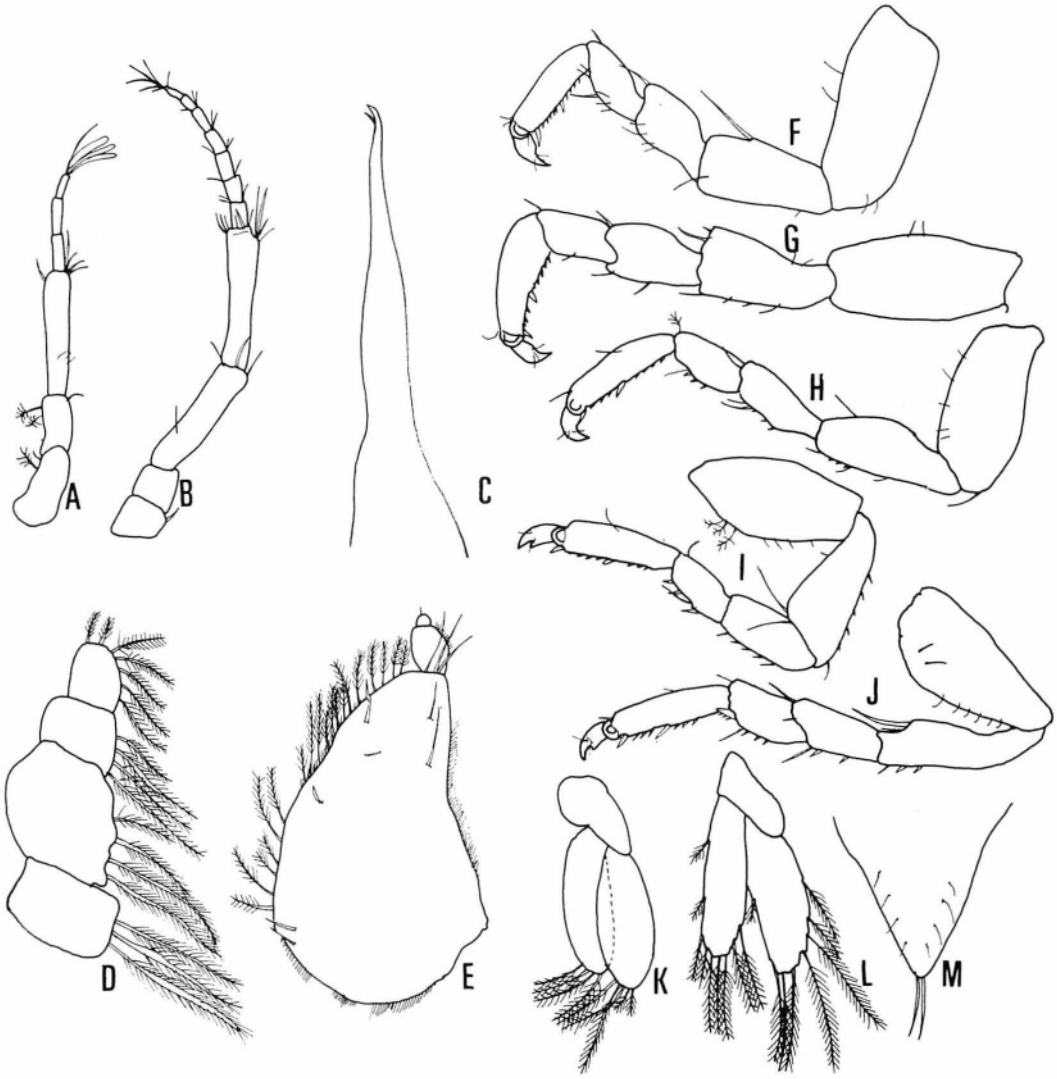

Fig. 2. *Gnathia sugashimaensis*, n. sp.
A. First antenna; B. Second antenna; C. Second maxilla; D. Palp of maxilliped; E. Pyropod; F-J; Peraeopods; K. First pleopod; L. Uropod; M. Telson.

(1) shape of mandible, especially that of inner border; (2) absence of dent on the posterior border of cephalon; (3) absence of remarkable depression of peraeon; (4) less remarkable epimera on peraeonal somites; (5) longer pleotelson; (6) less numerous segmentation of flagellum of first antenna, and (7) absence of dense setae on the outer border of ischium of peraeopods.

Description of the specimens considered to be juvenile forms of the new species: Body oblong-ovate, about three times as long as wide. Cephalon mediocre in size and as long as wide, with the front produced in a truncated lobe. The mouth part somewhat protruded conspicuously forward from the cephalon. The eyes are rather large, composed each of 50 oeclli. Second and fourth peraeonal somites short. Fourth peraeonal somite big and oblong. Pleonal somites narrow, epimera not so conspicuous. Uropod long and equally backward as the telson which is also long.

First antenna composed of seven segments; first and second segments short; third segment long with two simple setae at distal corner; fourth segment long with an aesthetasc at the distal end; fifth to seventh segments small, terminal segment with two long aesthetascs and a long simple seta. Second antenna, composed of ten segments, about 1.2 times as long as the first; first to third segments short; fourth and fifth segments long; sixth to last segments small and rectangular.

Apex of mandible with seven teeth. First maxilla three-segmented without tooth. Second maxilla slender with a few of small teeth near the apex. Maxilliped slender; endite with a coupling hook; palp long without tooth.

Five pairs of peraeopods similar in shape; basis oblong; ischium also oblong; merus and carpus rectangular; propodus long with two spines on inner border; dactylus long.

Uropd long; basis triangular; endopod lanceolate-oblong with about ten plumose setae; exopod a little longer than the endopod with several plumose setae. Telson triangular with a pair of simple setae at the tip.

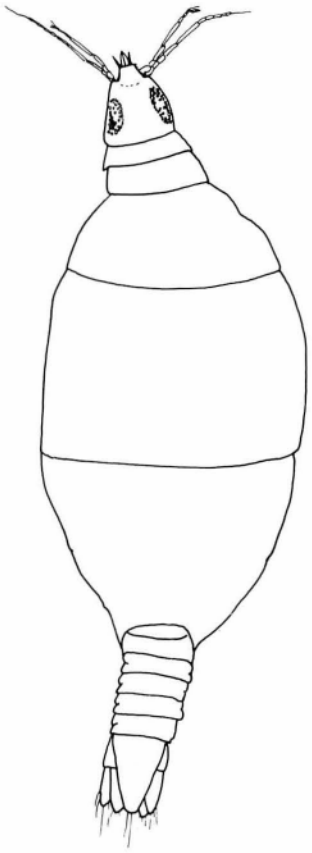

Fig. 3. Dorsal view of the specimens considered to be juvenile form of *Gnathia sugashimaensis*

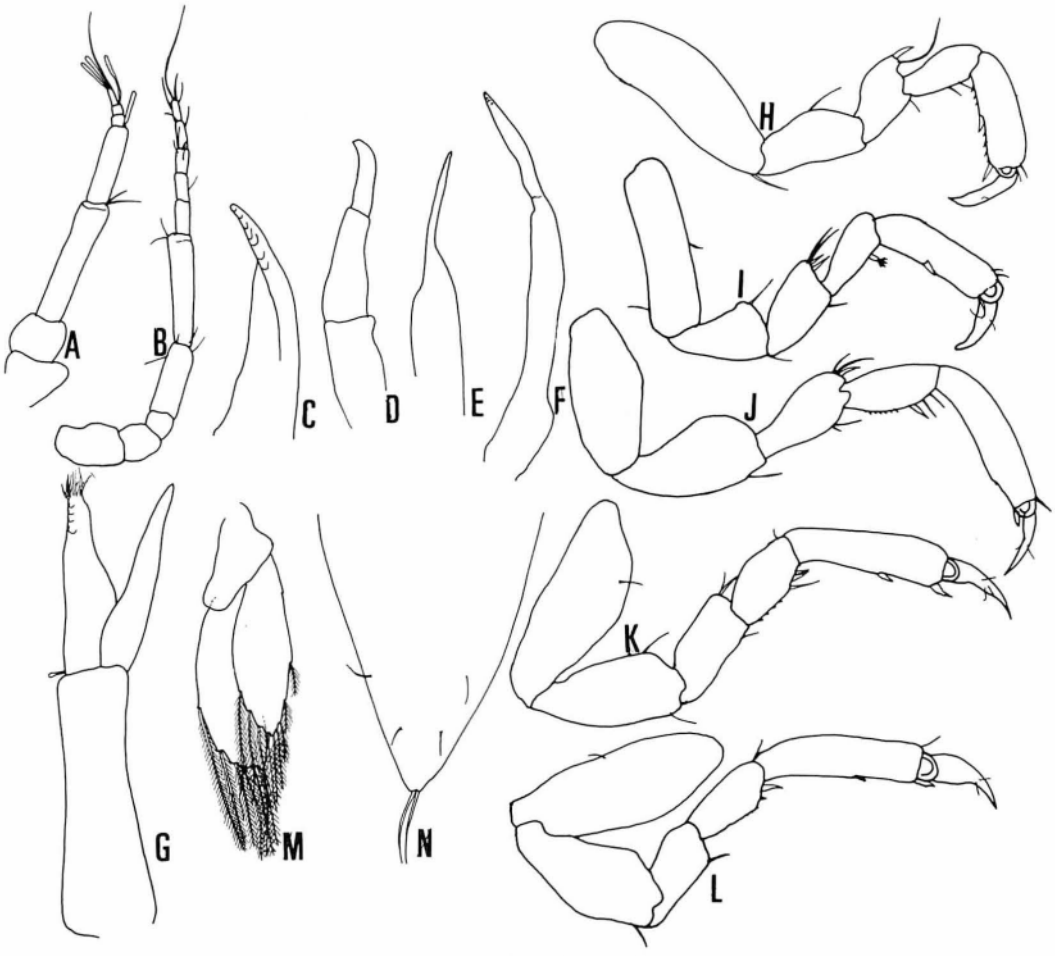

Fig. 4. Specimens considered to be juvenile form of *Gnathia sugashimaensis*.
A. First antenna; B. Second antenna. C. Mandible; D. First maxilla. E-F. Second maxilla; G. Maxilliped; H-L. Peraeopods; M. Uropod; N. Telson.

Remarks: Two specimens were collected from the same place together with the species described newly as *Gnathia sugashimaensis*. These juvenile specimens are also deposited at the Toyama Science Museum (Cr-165 and 166).

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