



圖四十二. A. 粗鉗刺鎧蝦 *Munida thoe* Macpherson, 1994; B. 粗鉗刺鎧蝦 *Munida thoe* Macpherson, 1994 (carapace without purplish nor yellowish color); C. 安達曼仿刺鎧蝦 *Munidopsis andamanica* MacGilchrist, 1905; D. 柱臂仿刺鎧蝦 *Munidopsis cylindrophthalma* (Alcock, 1894); E. 寬掌仿刺鎧蝦 *Munidopsis latimana* Miyake and Baba, 1966; F. 近緣擬刺鎧蝦 *Paramunida proxima* (Henderson, 1885); G. 粗糙擬刺鎧蝦 *Paramunida scabra* (Henderson, 1885)。

標本：宜蘭縣大溪漁市場，5 Aug 1982, 1 ♂, 8.3mm (NTOU 1982-8-5); 9 Jan 1989, 2 ♀♀, 8.8mm, 8.8mm, 1 ovig. ♀, 7.2mm (NTOU 1989-1-9); 13 Jan 1995, 1 ♂, 9.3mm (NTOU 1995-1-13)。南方澳漁市場，20 Jun 1991, 1 ovig. ♀, 10.6mm (NTOU 1991-6-20); 20 Aug 1991, 1 ♂, 10.6mm (NTOU 1991-8-20); 9 Nov 1995, 4 ♂♂, 9.6mm–12.1mm, 3 ♀♀, 8.0mm–11.9mm (NTOU 1995-11-9)。屏東縣東港漁市場，19 Jan 1989, 4 ♂♂, 9.0mm–10.1mm, 3 ovig. ♀♀, 8.7mm–10.3mm (NTOU 1989-1-19); 3 Mar 1991, 1 ♂, 8.6mm, 1 ♀, 5.2mm, 2 ovig. ♀♀, 7.9mm, 8.3mm (NTOU 1991-3-3); 26 Jan 1994, 1 ♂, 9.3mm (NTOU 1994-1-16); 日期不詳, 1 ♂, 12.3mm, 1 ovig. ♀, 11.5mm (NTOU ND-08)。

形態描述：頭胸甲上覆蓋著小刺及細剛毛，成對前胃刺，及2或3枚明顯的後胃刺，心區中間及心區與兩側鰓區的邊界上具3縱列發達的刺。額角相當尖銳及堅實，眼上刺長度約為額角的一半。第一觸角基節末端刺退化成微弱的突起，第二觸角柄第二節末中刺約達第二觸角柄末端，且沒有達到第一節內側突起的一半，第三節長度稍大於寬度，且寬度約為第二節寬度的0.8倍。第三顎足長節具1枚腹刺，背面則無刺。鉗足及步足表面具鱗狀刻紋，內側及背部邊緣具細剛毛。步足掌節長度約為寬度的8.5至10倍，指節相當粗壯。

體色：體表呈橘色至橘紅色。眼睛褐色。鉗足掌部、腕節及長節末端為橘紅色。鉗足及步足並具模糊之橘紅色寬環斑。第五腹節至尾扇末緣大致為白色。

分布：西太平洋；印尼 (Kei Island、婆羅州北方)、菲律賓、臺灣、中國東海及日本。棲息水深為70~1,630公尺，且多於150~300公尺的砂泥底質處。

附註：粗糙擬刺鎧蝦在臺灣南部與東北部漁市場的深海拖網的下雜魚堆中經常可以發現，但如同其他鎧甲蝦一樣，都只是當成水產飼料的原料。

引用文獻

- Adams, A. and A. White. 1848. Crustacea. In, Adams, A., The Zoology of the voyage of H. M. S. Samarang; Under the Command of Captain Sir Edward Belcher, C. B., F. R. A. S., F. G. S., During the Years 1843–1846. London. viii + 66pp., 13 pls.
- Alcock, A. 1894. Natural history notes from H. M. Indian Marine Survey Steamer "Investigator," commander R. F. Hoskyn, R. N., commanding.-Series II, No. 1. On the

- results of deep-sea Dredging during the season 1890-1891 (continued). Annals and Magazine of Natural History, series 6, 13: 321-334.
- Alcock, A. 1901. A Descriptive Catalogue of the Indian Deep-Sea Crustacea Decapoda, Macrura and Anomala in Indian Museum. Being a Revised Account of the Deep-Sea Species Collected by the Royal Indian Marine Survey Ship Investigator. Calcutta. 286 + iv pp., 3 pls.
- Alcock, A. and A. R. S. Anderson. 1895. Illustrations of the Zoology of the Royal Indian Marine Survey Steamer "Investigator", Crustacea, part 3, Calcutta. pls. 9-15.
- Allen, G. R. and R. Steene. 1994. Indo-Pacific Coral Reef Field Guide. Tropical Reef Research. Singapore, vi + 378 pp., many plates.
- Baba, K. 1969a. Four new genera with their representative and six new species of the Galatheidae in the collection of the Zoological Laboratory, Kyushu University, with redefinition of the genus *Galathea*. OHMU, Occasional Papers of the Zoological Laboratory, Faculty of Agriculture, Kyushu University, 2(1): 1-32.
- Baba, K. 1969b. Chirostylids and galatheids from dredgings and trawlings operated in the East China Sea by the Japanese Fisheries Reserch Vessel "Kaiyo Maru" in 1967. OHMU, Occasional Papers of the Zoological Laboratory, Faculty of Agriculture, Kyushu University, 2(3): 41-57.
- Baba, K. 1973. Remarkable species of the Chirostylidae (Crustacea, Anomura) of Japanese waters. Memoirs of the Faculty of Education, Kumamoto University, section 1 (Natural Science), 22: 117-124, pls. 4.
- Baba, K. 1977. Biological results of the Snellius Expedition XXVIII. The galatheid Crustacea of the Snellius Expedition. Zoologische Mededelingen Uitgegeven door het Rijksmuseum van Natuurlijke Historie te Leiden, 50(15): 243-259.
- Baba, K. 1979a. First record of Chirostylid and Galatheid crustaceans (Decapoda, Anomura) from New Caledonia. Bulletin du Museum national d'Histoire naturelle, Paris, series 4, section A, 1(2): 521-529.
- Baba, K. 1979b. Expeditions Rumphius II (1975). Crustaces parasites, commensaux, etc. (Th. Monodet et R. Serene, ed.). VII. Galatheid crustaceans (Decapoda, Anomura). Bulletin du Museum national d'Histoire naturelle, Paris, series 4, section A, 1(3): 643-657.
- Baba, K. 1982. Galatheids and pagurids of the Palau Islands (Crustacea: Anomura). Proceedings of the Japanese Society of Systematic Zoology, 23: 56-70.
- Baba, K. 1986a. Reptantia. In: Baba, K., K. I. Hayashi, and M. Toriyama. Decapod

- Crustaceans from continental shelf and slope around Japan. Japan Fisheries Resource Conservation Association ed., Tokyo, 336pp., 23 figs, 176 photos.
- Baba, K. 1986b. Two new species of anomuran Crustacea (Decapoda: Anomura) from north-west Australia. The Beagle, Occasional Paper of the Northern Territory Museum of Arts and Sciences, 3(1): 1-5.
- Baba, K. 1988. Chirostylid and Galatheid Crustacean (Decapoda: Anomura) of the "Albatross" Philippine Expedition, 1907-1910. Researches on Crustacea, Special Number 2, v + 203 pp.
- Baba, K. 1990. Chirostylid and Galatheid Crustaceans of Madagascar (Decapod, Anomura). Bulletin du Museum national d'Histoire naturelle, Paris, series 4, section A, 11(4): 921-975.
- Baba, K. and S. C. Oh. 1990. Galathea coralliophilus, a new decapod crustacean (Anomura: Galatheidae) from Singapore, Gulf of Thailand, and West Irian. Proceedings of the Biological Society of Washington, 103(2): 358-363.
- Baba, K. and H. P. Yu. 1987. Munida albiapicula, A new species of Anomura Crustacean (Decapoda: Galatheidae) from Taiwan. Bulletin Institute of Zoology, 26(4): 331-335.
- Balss, H. 1913. Ostasiatische Decapoden I. Die Galatheiden und Paguriden. In, Dolflein, F., Beitrage zur Naturgeschichte Ostasiens. Abhandlungen der mathematisch-physische Klasse der K. Bayerischen Akademie der Wissenschaften, Munchen, (supplement) 2(9): 1-85, pls. 1, 2.
- Benedict, J. E. 1902. Descriptions of a new genus and forty-six new species of crustaceans of the Family Galatheidae, with a list of the known marine species. Proceedings of the United States National Museum, 26: 243-334.
- Dana, J. D. 1852. Crustacea, Part 1. In United States Exploring Expedition, During the Years 1838, 1840, 1841, 1842, Under the Command of Charles Wilkes, U.S.N., Philadelphia, 13: viii + 685 pp.
- Dana, J. D. 1855. Crustacea, Atlas. In United States Exploring Expedition, During the Years 1838, 1840, 1841, 1842, Under the Command of Charles Wilkes, U.S.N., Philadelphia, 14: 24 pp., 96 pls.
- Gordon, I. 1930. On the species of the galatheid genus, Eumunida (Crustacea, Decapoda). Proceedings of the General Meetings for Scientific Business of the Zoological Society of London, 1929: 741-753.
- Henderson, J. R. 1885. Diagnoses of the new species of Galatheidae collected during the

- "Challenger" Expedition. Annals Magazine natural History, series 5, 16: 407–421.
- Henderson, J. R. 1888. Report on the Anomura Collected by H. M. S. Challenger During the Years 1873–76. Report on the Scientific Results of the Voyage of H. M. S. Challenger During the Years 1873–76, Zoology, 27: vi + 221 pp., 21 pls.
- Lewinsohn, C. 1969. Die Anomuren Roten Meeres (Crustacea Decapoda: Paguridea, Galatheidea, Hippidea). Zoologische Verhandelingen Uitgegeven door het Rijksmuseum van Natuurlijke Historie te Leiden, 104: 213 pp., 2 pls.
- MacGilchrist, A. C. 1905. Natural history notes from the R. I. M. S. "Investigator," Capt. T. H. Heming, R. N. (retired), commanding. -Series III, No. 6. An account of the new and some of the rarer decapod Crustacea obtained during the surveying seasons 1901–1904. Annals and Magazine of Natural History, series 7, 15: 233–268.
- Macpherson, E. 1994. Crustacea Decapoda: Studies on the genus Munida Leach, 1820 (Galatheidae) in New Caledonian and adjacent waters, with descriptions of 56 new species. In: A. CROSNIER (ed.), Resultats des Campagnes MUSORSTOM, Volume 10. Memoires du Museum National d'Historire naturelle, Paris, Zoologie, 161: 421–569.
- Macpherson, E. 1996. Crustacea Decapoda: Species of genera Munida Leach, 1820 and Paramunida Baba, 1988 (Galatheidae) from the seas around the Wallis and Futuna Islands. In: A. CROSNIER (ed.), Resultats des Campagnes MUSORSTOM, Volume 15. Memoires du Museum National d'Historire naturelle, Paris, Zoologie, 168: 387–421.
- Macpherson, E. and K. Baba. 1993. Crustacea Decapoda: Munida japonica Stimpson, 1858, and related species (Galatheidae). In: A. CROSNIER (ed.), Resultats des Campagnes MUSORSTOM, Volume 10. Memoires du Museum National d'Historire naturelle, Paris, Zoologie, 156: 381–420.
- Miyake, S. 1953. On three new species Galathea from the western Pacific. Journal of the Faculty of Agriculture, Kyushu University, 10(2): 199–208.
- Miyake, S. 1982. Japanese Crustacean Decapods and Stomatopods in Color. Vol.1. Macrura, Anomura and Stomatopoda. Osaka. vii + 261 pp., 56pls.
- Miyake, S. and K. Baba. 1966a. Descriptions of galatheids from the coral reefs of the Ryukyu Islands. Journal of the Faculty of Agriculture, Kyushu University, 14(1): 57–79.
- Miyake, S. and K. Baba. 1966b. Two new species of the family Galatheidae from the Tosa Bay, Japan. Journal of the Faculty of Agriculture, Kyushu University, 14(1): 81–88.
- Miyake, S. and K. Baba. 1967a. Descriptions of new species of galatheida from the western

- Pacific. Journal of the Faculty of Agriculture, Kyushu University, 14(2): 203– 212.
- Miyake, S. and K. Baba. 1967b. Galatheids of the East China Sea (Chirostylidae and Galatheidae, Decapoda, Crustacea). Journal of the Faculty of Agriculture, Kyushu University, 14(2): 225–246.
- Ortmann, A. 1892. Die Decapoden-krebse des Strassburger Museums IV. Die Abtheilungen Galatheidae und Paguridae. Zoologischen Jahrbuchern, Abtheilung fur Systematik, Geographie und Biologie der Tiere, 6: 241–326, pls. 11,12.
- Ortmann, A. 1894. Crustacean. In Semon, R., Zoologische Forschungsreisen in Australien und dem malayischen Archipel. Denkschriften der medizinisch-naturwissenschaftlichen Gesellschaft zu Jena, 8: 3–80, pls. 1–3.
- Paulson, O. 1875. Studies on Crustacea of the Red Sea with Notes Regarding other sea. Part I. Podophthalmata and Edriophthalmata (Cumacea). Studies on Crustacea of the Red Sea with Notes Regarding other Seas, Part I. Kiev. xiv + 1-144 pp., pls. 1-21. [reprinted in 1961, with different pagination, by the Israel Program for Scientific Translations, Jerusalem].
- Potts, F. A. 1915. The fauna associated with the crinoids of a tropical coral reef: with especial reference to its colour variation. Papers from the Department of Marine Biology of the Carnegie Institution of Washington, 8: 73–96, pl. 1.
- Severns, M. 1994. Sulawesi Seas Indonesia's Magnificent Underwater Realm. Periplus Editions. Singapore, 160 pp., many plates.
- Stimpson, W. 1858. Prodromus descriptionis animalium evertebratorum, quae in Expeditione ad Oceanum Pacificum Septentrionalem a Republica Federata missa, Cadwaladaro Riggold et Johanne Rogers Ducibus, observavit et descipsit W. Stimpson. Pars VII. Crustacea Anomura. Proceedings of the Academy of Natural Sciences of Philadelphia, 10: 225–252.
- Tirmizi, N. M. 1975. Selection and description of a lectotype for *Munida proxima* Henderson, 1885 (Decapoda, Galatheidae). Crustaceana, 29(3): 305–307.
- Tirmizi, N. M., and W. Javed. 1976. A new species of *Munida* from the Indian Ocean with a redescription of a syntype of *Munida spinulifera* Miers, 1884 (Decapoda, Galatheidae). Crustaceana, 31(1): 81–89.
- Van Dam, A. J. 1933. Die Decapoden der Siboga-Expedition. VIII. Galatheidea: Chirostylidae. Siboga-Expeditie, 39a, 7: 1–46.
- Van Dam, A. J. 1937. Einige neue Fundorte von Chirostylidae. Zoologischer Anzeiger,

- Leipzig, 120: 99–103.
- Van Dam, A. J. 1939. Ueber einige *Uroptychus*-Arten des Museums zu Kopenhagen. *Bijdragen tot de Dierkunde Uitgegeven door het koninklijk zoologisch genootschap "Natur Artis Magistra"* de Amsterdam, 27: 392–407.
- Van Dam, A. J. 1940. Anomura, gesammelt vom Dampfer "Gier" in der Java-See. *Zoologischer Anzeiger*, Leipzig, 129: 95–104.
- Williams, A. B. 1986. Losters-Identification, World Distribution, and U.S. Trade. *Marine Fisheries Review*, 48(2): 1–36.
- Yanagita, I. 1942. Description of a new species of *Munidopsis* (Anomuran Crustacea) from Enshyunada, Japan. *Bulletin of the Biogeographical Society of Japan*, 12: 93–95.
- Yanagita, I. 1943. Revision of *Munida*, a genus of decapod crustaceans found in Japanese water. *Bulletin of the Biogeographical Society of Japan*, 13: 13–32.

On the Chirostylidae and Galatheidae (Crustacea: Decapoda: Galatheidea) of Taiwan

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ABSTRACT

Eight genera and 34 species of the two anomuran families Chirostylidae and Galatheidae are found in Taiwan. Amongst them, one family, six genera and 30 species are new records of Taiwan. This report provides detailed descriptions, line drawings and color photographs for these 34 species. Keys to the Taiwanese species of these two families are also given.

Key words: Chirostylidae, Galatheidae, Taiwan, new records, Crustacea.

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