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The mangrove pebble crab *Philyra malefactrix* at Kranji

Subjects: Mangrove pebble crab, *Philyra malefactrix* (Crustacea: Brachyura: Leucosiidae).

Subjects identified by: Peter K. L. Ng & Lee Bee Yan.

Location, date and time: Singapore Island, Kranji, Kranji Nature Trail and Kranji Dam; 14 November 2011 & 21 November 2013; late afternoon.

Habitat: Upper intertidal zone along fringe of mangrove forest, muddy substrates.

Observers: Lee Bee Yan (Kranji Nature Trail), Tan Siong Kiat & Martyn E. Y. Low (Kranji Dam).

Observation: Two records are herein featured. Both were collected and deposited in the Zoological Reference Collection of the Raffles Museum of Biodiversity Research at the National University of Singapore (ZRC).

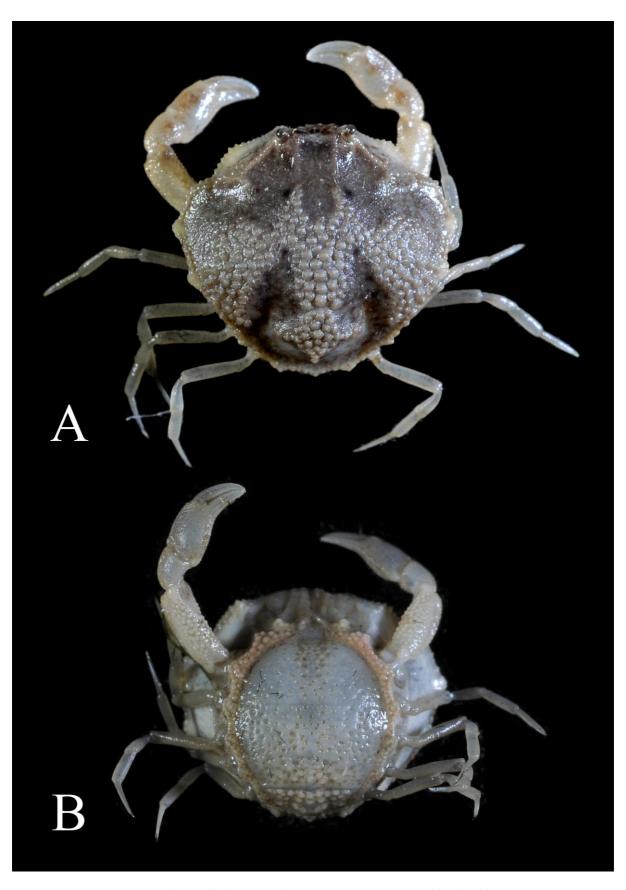
- 1. A female of 8.00 mm carapace width by 7.10 mm carapace length (illustrated here) was collected at the upper intertidal zone along the Kranji Nature Trail in the late afternoon of 14 November 2011 by Lee Bee Yan. The specimen is registered at the Raffles Museum as ZRC 2012.0242.
- 2. A male of 8.00 mm carapace width by 7.25 mm carapace length (not illustrated) was obtained from the upper intertidal zone along the fringe of mangrove forest at Kranji Dam, by Tan Siong Kiat and Martyn E. Y. Low in the late afternoon of 21 November 2013.

Remarks: *Philyra malefactrix* (formerly as *Ebalia malefactrix* or *Nursia malefactrix*) was first recorded from Singapore by Ow Yang (1963) from Pulau Senang. It has subsequently been recorded from East Coast, Kallang, Lim Chu Kang and Sungei Buloh (see: Tan & Ng, 1993, 1994; Chou et al., 1994; Rahayu & Ng, 2003; Wang & Ng, 2011). Specimens from Singapore agree well with the lectotype of this species selected and figured by Rahayu & Ng (2003). The present records are the first of this species from the Kranji area. The attached photograph is, to our knowledge, the first to be published of a Singapore specimen.

References:

- Chou L. M., P. K. L. Ng & K. K. P. Lim, 1994. Animalia. In: Wee, Y. C. & P. K. L. Ng (eds.). *A First Look at Biodiversity in Singapore*. National Council on the Environment, Singapore. pp. 70–106.
- Ow Yang, C. K., 1963. Studies on the Systematics and Distribution of Marine Brachyura in Malaya with Special Reference to the Families Portunidae and Majidae. Unpublished thesis. Department of Zoology, University of Singapore. 268 pp., 40 pls.
- Rahayu, D. L. & P. K. L. Ng, 2003. On two species of mangrove Leucosiidae from Irian Jaya, Indonesia, with notes on *Philyra malefactrix* (Kemp, 1915) (Decapoda: Brachyura). *Crustacean Research*. 32: 1–12.
- Tan, C. G. S. & P. K. L. Ng, 1993. *Praosia punctata*, a new genus and species of mangrove leucosiid crab (Decapoda, Brachyura) from Singapore. *Crustaceana*. 64(1): 40–47.
- Tan, C. G. S. & P. K. L. Ng, 1994. An annotated checklist of mangrove brachyuran crabs from Malaysia and Singapore. In: Sasekumar, A., N. Marshall & D. J. Macintosh (eds.). Ecology and Conservation of Southeast Asian Marine and Freshwater Environments including Wetlands. *Hydrobiologia*. 285: 75–84.
- Wang, L. K. & P. K. L. Ng, 2011. Pebble crabs. Family Leucosiidae. In: Ng, P. K. L., R. T. Corlett & H. T. W. Tan (eds.). *Singapore Biodiversity. An Encyclopedia of the Natural Environment and Sustainable Development*. Editions Didier Millet, Singapore. pp. 408–409.

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Dorsal (A) and ventral (B) views of *Philyra malefactrix* (ZRC 2012.0242) female of 8.0×7.1 mm carapace dimensions. Photographs by Lee Bee Yan