

<u>Short Communication</u>

Notes on the Occurrence of Super Giant Isopod, *Bathynomus lowryi* (Isopoda: Cirolanidae) from Andamans (India)

J. Praveenraj¹, K. Saravanan^{1*}, Arunjyoti Baruah¹, I. Jagadis², R. Soundararajan¹, S. Dam Roy¹, R. Kiruba Sankar¹ and Benny Varghese¹

¹ICAR - Central Island Agricultural Research Institute, Port Blair - 744105 ²Tuticorin Research Centre of ICAR-CMFRI, South Beach Road, Tuticorin - 628001 *Corresponding author e-mail: sarocife@gmail.com

The genus *Bathynomus* Milne Edwards 1879, comprise scavenging deep sea isopods which are well known because of their gigantism and have distribution in the Indo-West Pacific and Western Atlantic Ocean (Lowry and Dempsey, 2006). This interesting genus had attracted the attention of the biologists since its description (Soong and Mok, 1994). Bruce (1986) revised the genus and described two species from Australian waters and further gave notes on nine known living species. According to Lowry and Dempsey (2006), Bathynomus genus is divided into two groups, namely the giants and super giants. The giants mature in a size range from 80 to 140 mm and the super giants mature in a size range from 170 mm to 500 mm. Bruce and Bussarawit (2004) described B. lowrvi from the Andaman Sea and it was the first report of the giant isopod from Andaman Sea. While going through the museum collections of ICAR-CIARI, a giant isopod specimen was encountered and which was found to be unidentified. Further enquiry revealed that the isopod was collected by Cruise no. 46 of FORV Sagar Sampada expedition during April to May, 1988 covering South to North Andaman. The specimen was examined and identified to be Bathynomus lowryi, Bruce and Bussarawit, 2004. The specimen had damage in the pleotelson due to which five of its spines were broken; however the broken marks of the remnant spines were clearly visible. The specimen belonging to the group super giants measured 370 mm in length and weighed 510 grams (Fig. 1 and 2). The major character which distinguishes it from all other species of *Bathynomus* is the nine upwardly curved pleotelsonic spines in the posterior margin of the pleotelson (Fig. 3) (Bruce and Bussarawit, 2004). The only known other species with upwardly curved pleotelsonic spine is the Bathynomus kensleyi, Lowry and Dempsey, 2006 described from the Coral Sea.

B. lowryi can be readily distinguished from *B. kensleyi* by possessing a conspicuous dorsal carina in the pleotelson (vs. inconspicuous dorsal carina); clypeus with truncated apex (vs. rounded apex); broader pleotelson (vs. longer) and the distal margin of exopod is straight (vs. convex). The present encounter from Andaman Islands is a new report to these islands, where the studies on the isopods are negligible (=see Praveenraj et al. 2016). Further studies have to be made on its gut content and molecular phylogeny, which will supplement the knowledge on this poorly studied group.



Fig. 1 Dorsal view of Bathynomus lowryi



Fig. 2 Ventral view of Bathynomus lowryi

Praveenraj et al.



Fig. 3 Showing upward facing pleotelsonic spines

Acknowledgements

This work was carried out under the National Surveillance Programme for Aquatic Animal Diseases (NSPAAD), coordinated by ICAR-National Bureau of Fish Genetic Resources (NBFGR), Lucknow. The authors are thankful to the Indian Council of Agricultural Research (ICAR) and National Fisheries Development Board (NFDB), Govt. of India, for the support to carry out this work.

References

Bruce, N. (1986) Cirolanidae (Crustacea: Isopoda) of Australia. *Records of the Australian Museum Supplement* 6: 1-219.



- Bruce, N. L. & S. Bussarawit (2004) *Bathynomus lowryi* n. sp. (Crustacea: Isopoda: Cirolanidae), the first record of the "giant" marine isopod genus from Thailand waters. *Phuket Marine Biological Centre Research Bulletin* 65 (1): 1-8.
- Lowry, J. K. & K. Dempsey (2006) The giant deep-sea scavenger genus *Bathynomus* (Crustacea, Isopoda, Cirolanidae) in the Indo-West Pacific, *in* Richer de Forges B. & Justine J. L. (eds), Tropical Deep-Sea Benthos, Volume 24. *Mémoires du Muséum national d'Histoire naturelle* 193: 163-192. Paris ISBN: 2-85653-585-2.
- Praveenraj, J., K. Saravanan, P. Puneeth Kumar, S. Ravichandran, Arunjyoti Baruah, S. Monalisha Devi, R. Kiruba Sankar & S. Dam Roy (2016) First record on the occurrence of *Ryukyua circularis* (Pillai, 1954), a parasitic cymothoid (Crustacean: Isopoda) infesting the clupeid fish *Amblygaster sirm* (Walbaum) from Andaman Islands, India. *Journal of Parasitic Diseases*. DOI 10.1007/s12639-016-0823-0.
- Soong, K. & H. K. Mok (1994) Size and maturity stage observations of the deep-sea isopod *Bathynomus doederleini*, Ortmann, 1894 (Flabellifera: Cirolanidae) in eastern Taiwan. *Journal of Crustacean Biology* 14