ePublishing

ΕΘΝΙΚΟ ΚΕΝΤΡΟ ΤΕΚΜΗΡΙΩΣΗΣ
EKT NATIONAL DOCUMENTATION CENTRE

Mediterranean Marine Science

Vol 10, No 1 (2009)

First record of the red shrimp, Aristeus antennatus (Risso, 1816) (Decapoda: Aristeidae) from the Aegean Sea coast of Turkey

T. OZCAN, E. IRMAK, A.S. ATES, T. KATAGAN

doi: 10.12681/mms.125

To cite this article:

OZCAN, T., IRMAK, E., ATES, A., & KATAGAN, T. (2009). First record of the red shrimp, Aristeus antennatus (Risso, 1816) (Decapoda: Aristeidae) from the Aegean Sea coast of Turkey. *Mediterranean Marine Science*, *10*(1), 121-124. https://doi.org/10.12681/mms.125

https://epublishing.ekt.gr | **e-Publisher:** EKT | **Downloaded at:** 09/09/2026 16:11:26

Mediterranean Marine Science
Volume 10/1, 2009, 121-124

First record of the red shrimp, *Aristeus antennatus* (Risso, 1816) (Decapoda: Aristeidae) from the Aegean Sea coast of Turkey

T. ÖZCAN[1], E. IRMAK[2], A. S. ATEŞ[2] and T. KATAĞAN[3]

[1] Department of Hydrobiology, Fisheries Faculty, Mustafa Kemal University, TR-31200 Iskenderun, Hatay, Turkey
[2] Department of Hydrobiology, Fisheries Faculty, Çanakkale Onsekiz Mart University, TR-17100 Çanakkale, Turkey.
[3] Department of Marine Biology, Fisheries Faculty, Ege University, TR-35100 Bornova-Izmir, Turkey

e-mail: tozcan@mku.edu.tr; tahozcan@yahoo.com

Abstract

A female specimen of the deep-water red shrimp, Aristeus antennatus (Risso, 1816) was caught at depths of between 550 m and 670 m during 2005 by trawling off the Marmaris coast. A. antennatus is a species known to inhabit only the Levantine Sea coast of Turkey. This paper is on the first record of the species along the southern Aegean Sea coast of Turkey

Keywords: *Aristeus antennatus;* Red shrimp Aristeidae; Southeastern Aegean Sea; Turkey.

The species of the family Aristeidae, of which at least two, *Aristeus antennatus* (Risso, 1816) and *Aristeomorpha foliacea* (Risso, 1827) (D'UDEKEM D'ACOZ, 1999), are present in the Mediterranean, mostly inhabit deep waters. *A. antennatus* seems to be less common in the eastern Mediterranean, in relation to *Aristaeomorpha foliacea,* due to its different oceanographic demands (POLITOU *et al.,* 2004). The red shrimp, *A. antennatus* occurs on the upper and middle slopes of the western Mediterranean and adjacent areas (CARBONELL *et al.,* 1999). It is distributed in the Mediterranean Sea (excluding the north-central Adriatic Sea and the Black Sea), the Atlantic from the Iberian Peninsula to Angola, and the Indian Ocean (SARDÀ *et al.,* 2003). This species has been reported in the Greek part of the Ionian Sea and the Aegean Sea (KOUKOURAS & KATTOULAS, 1974; THESSALOU-LEGAKI, 1994), Israel coast (GALIL, 2004), the southern Cyprus coast (LEWINSHON & HOLTHUIS, 1986), and the Mediterranean shores of Turkey (KOCATAŞ & KATAĞAN, 2003; KOCATAŞ *et al.,* 2008).

According THESSALOU-LEGAKI (1994), neither red shrimp (*A. antennatus* and *Aristaeomorpha foliacea*) occurred off the Turkish Aegean Sea coast of the Eastern Mediterranean.

An adult female specimen of *A. antennatus* was captured off the Marmaris coast, the Aegean Sea coast of Turkey (36036'76''N- 28019'48''E) (Fig. 1) on 10th April 2005, at a depth of 550-670 m. A commercial trawler, the 'Isa Reis', equipped with a trawl net of 22 mm codend mesh size, was used. The specimen was identified based on the work by ZARIQUIEY ÁLVAREZ (1968) and FALCIAI & MINERVINI (1996). The specimen was deposited at the Fisheries Faculty of the Mustafa Kemal University, Turkey (in the collection of Dr. T. Özcan) (Fig. 2).

A. antennatus stock has a commercial importance on the Levantine Sea coast of Turkey (KOCATAŞ & KATAĞAN, 2003). This species is commonly caught on muddy and sandy bottoms and its bathymetric distribution extends from 80 m to more than 3300 m throughout the whole Mediterranean basin (SARDA *et al.,* 2004). KAPIRIS *et al.* (2000) stated that this species could be an important fishing resource in the Greek Ionian Sea in future, as a result of their studies of the biology and ecology of the species. This is the first report of this species from the Turkish Aegean Sea; it has not been recorded previously (KOCATAŞ & KATAĞAN, 2003; KOCATAŞ *et al.,* 2008). It is most probable that *A. antennatus* has been present in other parts of the Turkish Aegean Sea coast, but it has been unreported or overlooked previously.

Fig. 1: Map showing records of *Aristeus antennatus* (Risso, 1816) in the eastern Mediterranean, including the latest report from the Turkish Aegean Sea coast.

Fig. 2: Lateral view of *Aristeus antennatus* (Risso, 1816) (♀, CL= 53 mm) collected off the Marmaris coast (southern Aegean Sea) (photo by Tahir Özcan).

Acknowledgements

We thank to the crew of the vessel 'Isa Reis' for their help in collecting and sorting the benthic material.

References

CARBONELL, A., CARBONELL, M., DEMESTRE, M., GRAU, A. & MONSERRAT, S., 1999. The red shrimp *Aristeus antennatus* (Risso, 1816) fishery and biology in the Balearic Islands, Western Mediterranean. *Fisheries Research,* 44: 1-13.

FALCIAI, L. & MINERVINI, R., 1996. Guide des homards, crabes, langoustes, crevettes et autres crustacés décapodes d'Europe. 1-287 (Delachaux et Niestlé SA, Lausanne-Paris).

GALIL, B.S., 2004. The limit of the sea: The bathyal fauna of the Levantine sea. *Scientia marina,* 68: 63-72.

KAPIRIS, K., THESSALOU-LEGAKI, M., MORAITOU-APOSTOLOPOULOU, M., PETRAKIS, G. & PAPACONSTANTINOU, C., 2000. Population characteristics and feeding parameters of *Aristaeomorpha foliacea* and *Aristeus antennatus* (Decapoda: Aristeidae) from the Ionian Sea (Eastern Mediterranean). *Crustaceana,* 12: 177–191.

KOCATAŞ, A. & KATAĞAN, T., 2003. The Decapod Crustacean fauna of the Turkish Seas. *Zoology in the Middle East,* 29: 63-74.

KOCATAŞ, A., ÖZCAN, T., ATEŞ, A. S. & KATAĞAN, T., 2008. An updated checklist of Decapod Crustaceans occurring off the Turkish coast. IX

Colloquim Crustacea Decapoda Mediterranea (9CCDM) September 2-6, 2008, Torino- Italy.

KOUKOURAS, A. & KATTOULAS, M., 1974. Benthic fauna of the Evvoia coast and Evvoia Gulf. III. Natantia (Crustacea: Decapoda). *Sci. Ann. Fac. Phys. Mathem. Univ. Thessaloniki,* 14: 369-382.

LEWINSOHN, CH. & HOULTHUIS, L. B., 1986. The Crustacea Decapoda of Cyprus, *Zoologische Verhandelingen* (Leiden), 230(12): 1-64.

POLITOU, C., Y., KAPIRIS, K., MAIORANO, P., CAPEZZUTO, F. & DOKOS, J., 2004. Deep-sea Mediterranean biology: the case of *Aristaeomorpha foliacea* (Risso, 1827) (Crustacea: Decapoda: Aristeidae). *Scientia Marina,* 68 (Suppl. 3): 129-139.

SARDÀ, F., COMPANY, J. B. & MAYNOU, F., 2003. Deep-sea shrimp *Aristeus antennatus* Risso 1816 in the Catalan Sea, a review and perspectives. *Journal of Northwest Atlantic Fishery Science,* 31:127-136.

SARDÀ, F., D'ONGHIA, G., POLITOU, C.-Y., COMPANY, J. B., MAIORANO, P., KAPIRIS, K., 2004. Deep-sea distribution, biological and ecological aspects of Aristeus antennatus (Risso, 1816) in the Western and Central Mediterranean Sea. *Scientia Marina,* 68 (Suppl. 3), 117-127.

THESSALOU-LEGAKI, M., 1994. Distribution of *Aristeus antennatus* and *Aristaeomorpha foliacea* in the Eastern Mediterraneaen Sea. In: Life Cycles and Fisheries of the Deep-water Red Shrimps *Aristaeomorpha foliacea* and *Aristeus antennatus.* Proc. of the International Workshop held in the Instituto di Tecnologia della Pesca e del Pescato, N.T.R. - I.T.P.P.(ed., M. L. Bianchini, S. Ragonese), pp. 61-62.

UDEKEM D'ACOZ, C. D., 1999. Inventaire et distribution des crustacés décapodes de l'Atlantique nord-oriental, de la Méditerranée et des eaux continentales adjacentes au nord de 25°N [Inventory and distribution of Crustacea Decapoda in the Northeastern Atlantic Ocean, the Mediterranean Sea and adjacent continental waters, north of 25°N]. Collection Patrimoines Naturels, 40: i-x + 1-383. Service Patrimoine Naturel, Muséum National d'Histoire Naturelle, Paris.

ZARIQUIEY-ÀLVAREZ, R., 1968. Crustáceos decápodos ibéricos. *Investigación Pesquera,* 32: 1-510.

Submitted: December 2008
Accepted: March 2009
Published on line: June 2009