



The genus *Liljeborgia* in the Mediterranean Sea, with the description of a new species (Crustacea: Amphipoda: Liljeborgiidae)

CÉDRIC D'UDEKEM D'ACOZ

Royal Belgian Institute of Natural Sciences, Rue Vautier 29, B-1000 Brussels, Belgium.

E-mail: Cedric.Dudekem@naturalsciences.be

Abstract

A new amphipod crustacean, *Liljeborgia clytaemnestra* **sp. nov.**, is described based on specimens from Malta and the Bay of Naples. It is quite similar to the sympatric *L. dellavallei* Stebbing, 1906, but it has narrower and more regular-sized spines on the propodus of pereopods 3–4. The longest spine on the dorsolateral border of the peduncle of uropod 1 is not strongly elongate in adult males, as in *L. dellavallei*. The apical spines on the lobes of the telson are much longer than in *L. dellavallei*. *L. clytaemnestra* **sp. nov.** is actually more similar to two northeastern Atlantic species, the British *L. pallida* (Spence Bate, 1857) and the Scandinavian *L. brevicornis* (Bruzelius, 1859) than to the Mediterranean *L. dellavallei*. In *L. clytaemnestra* **sp. nov.**, article 2 of the mandibular palp has setae on distal third, whilst setae are restricted to tip in the two other species. Article 3 of the mandibular palp is also longer in *L. clytaemnestra* **sp. nov.** than in the two Atlantic species. The spines of the outer plate of the maxilliped are longer in *L. clytaemnestra* **sp. nov.** than in the two other species. The most distal spine of the propodus of pereopods 3–4 is reduced in *L. clytaemnestra* **sp. nov.** and *L. brevicornis*, but not in *L. pallida*. The serration of the posterior border of the basis of pereopod 7 is much stronger in *L. clytaemnestra* **sp. nov.** than in the two other species. Finally, in *L. clytaemnestra* **sp. nov.**, the spines of the lobes of the telson are longer than in *L. pallida*. A lectotype is designated for *L. dellavallei*. The presence/absence of a posterodorsal tooth on pleonite 3 in *L. dellavallei* is discussed. The validity of *L. kinahani* (Spence Bate, 1862) is questioned. An identification key is proposed for Mediterranean *Liljeborgia* species.

Key words: Liljeborgiidae, Europe, taxonomy

Introduction

In a recent paper, d'Udekem d'Acoz (2010) reviewed the current state of knowledge on European Liljeborgiidae (Crustacea, Amphipoda), recognising two formally described *Liljeborgia* species in the Mediterranean Sea, *L. dellavallei* Stebbing, 1906 and *L. psaltrica* Krapp-Schickel, 1975. A third taxon of unclear position was also reported upon, as *Liljeborgia* sp. 4, based on a few specimens in mediocre condition from the Bay of Naples. New samples of this form, which is very similar to but distinct from *L. dellavallei*, have recently been made available for study through the kindness of Joseph Borg (University of Malta). This allows a detailed description of this form, which proves to be a new species, *L. clytaemnestra* **sp. nov.**

Material and methods

Complete specimens and appendages were examined in temporary glycerin slides with a DML Leica compound microscope equipped with a drawing tube. Pencil drawings were scanned and afterwards inked with the software ADOBE ILLUSTRATOR 11.0.0 on an A3 drawing table (Wacom Intuos3 12x19), using the method described by Coleman (2003, 2009). Ratios are given to two decimal places, in anticipation of a possible future cladistic study,