



## Revision of the genus *Crepis* Jullien (Bryozoa: Cheilostomata) with description of a new genus and family and notes on Chlidoiidae

OSCAR REVERTER-GIL<sup>1</sup>, JAVIER SOUTO<sup>2</sup> & EUGENIO FERNÁNDEZ-PULPEIRO<sup>3</sup>

Departamento de Zooloxía e Antropoloxía Física, Facultade de Bioloxía, Universidade de Santiago de Compostela, 15782 Santiago de Compostela, Spain. E-mail: <sup>1</sup>oscar.reverter@usc.es; <sup>2</sup>javier.souto@usc.es; <sup>3</sup>eugenio.fernandez.pulpeiro@usc.es

### Abstract

The genus *Crepis* is redescribed from original material held in different institutions and transferred to the family Calloporidae. *Crepis longipes*, the type species, is redescribed and stabilized by typification. The description of *Crepis verticillata* is amplified. Three new species are described, all of them previously identified as *C. longipes*: *Crepis harmelini* n. sp. from the Strait of Gibraltar, *Crepis sidneyi* n. sp. from the Indo-Pacific region, and *Crepis sinensis* n. sp. from the South China Sea. A new genus, *Mourellina* n. gen., is erected for *Crepis decussata*, which is split into two species: *Mourellina decussata* n. comb. and *Mourellina gonzaloi* n. sp. This genus is placed in its own family, Mourellinidae n. fam., of uncertain affinities. The diagnosis of the family Chlidoiidae, which up to now included the genera *Chlidonia* and *Crepis*, is modified by excluding the latter genus.

**Key words:** Calloporidae, new family, new genus, new species, NE Atlantic, Indo-Pacific, Australia, China

### Introduction

*Crepis* is a little-known bryozoan genus scarcely reported in the literature. It was established by Jullien (1882) for the sole included species *Crepis longipes*, described from material collected by the *Travailleur* northwest of the Iberian Peninsula. Although there is a genus of plants named *Crepis* L., the two are not synonymous, being treated under separate nomenclatural codes (ICZN 1999: art. 52.7).

Although Jullien's description (1882) was reasonably complete for the time, the diagnostic characters of the genus were broad enough to include specimens of varied characters. In the past, it used to be considered that many bryozoan species were cosmopolitan or of wide distribution. Thus, for instance, *C. longipes* was reported by Harmer (1926) and by Silén (1941) in shallow waters of the Indo-Pacific region. The species was not found again in its original area until reported by d'Hondt (1973a, 1974) and by Harmelin & d'Hondt (1992) from the Strait of Gibraltar. Only two other species were ascribed to the genus *Crepis*, both from the Indo-Pacific region: *Crepis verticillata* Harmer, 1926 and *Crepis decussata* Harmer, 1926. Both species, which do not seem to have been found again, show some very different characters from the ones present in the type species, specially *C. decussata*. Harmer (1926) accordingly modified the generic diagnosis to include it.

In recent years, the study of bryozoan material through SEM and gene sequencing has shown that some species considered to have a wide geographic distribution have been misidentified or/and belong to different cryptic species with more restricted distributions. In order to effect more precise species discrimination, therefore, it is necessary to determine the precise characters of the type species of genera based on the conserved material (see Winston 2007 and references therein). During the past few years, we have studied material from the Jullien Collection of Iberian and other species registered in the Muséum National d'Histoire Naturelle, Paris. This work led to revision and redescription of a number of species (Reverter-Gil & Fernández-Pulpeiro 1999, 2005; Souto *et al.* 2011). In the present paper, we revise the original material, published and unpublished, of the species ascribed to the genus *Crepis*. We have determined that specimens identified as *C. longipes* actually correspond to four different species, three of them new to science. *Crepis verticillata* exhibits a distinctive morphology that, however, does not preclude