

## A new species of *Corophium* from eastern Australian estuaries (Crustacea: Amphipoda: Corophiidae: Corophiinae: Corophiini)

J.K. LOWRY

Aquatic Zoology, Australian Museum, 6 College Street, Sydney, NSW 2010, Australia  
E-mail: jimlowry@crustacea.net

### Abstract

Lowry & Stoddart (2003) reported seven species of corophiini amphipods from Australian waters. In this paper a new species, *Corophium colo*, is described from estuaries in Queensland, New South Wales and Victoria, the only species in Australian waters with an unfused urosome. *Corophium colo* is currently being used as a bioindicator of pollutants in estuarine waters.

**Key words:** Amphipoda, Corophiidae, *Corophium colo*, new species, taxonomy, Australia

### Introduction

Thomas (1993) discussed the use of amphipods as bioindicators. Because of their sensitivity to toxicants and pollutants they are used as “little canaries” by government agencies in North America and in Europe. In Australia a number of studies have tested a fresh to brackish water species of corophiini amphipod as a potential indicator of toxins in river systems of New South Wales (Surtikanti *et al.* 1998, Hyne & Everett 1998, Hyne 1999, Surtikanti & Hyne 2000, Hyne *et al.* 2002, McCready 2004, McCready *et al.* 2004). The species, referred to in the literature as *Corophium* sp. or as *Corophium* cf. *volutator* (Pallas, 1766), is described here as *Corophium colo* sp. nov.

Based on a phenetic analysis Bousfield & Hoover (1997) divided the large genus *Corophium* Latreille, 1806, into thirteen tightly diagnosed genera. Myers & Lowry (2003) established the tribe Corophiini to accommodate these genera. Lowry & Stoddart (2003) reported seven corophiini species from Australian waters in four of these recently established genera. Only one, the poorly described species *Corophium minor* Thomson, 1946, remained in the genus *Corophium*. The new species described below might be placed in the genus *Chelicorophium* Bousfield & Hoover (1997). However new phylogenetic analyses (Storey & Poore, unpublished) question the generic concepts of Bousfield & Hoover (1997), and so it is conservatively placed in *Corophium*.