CORRECTIONS TO THE LIST OF COLLEMBOLA SPECIES RECORDED FROM TOOHEY FOREST, QUEENSLAND

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The names of seven of the species listed by D. Rodgers (1997, Memoirs of the Museum of Victoria 56: 287-293) are corrected.

Introduction

Recently Rodgers (1997) published data on the collembolan fauna of a eucalypt woodland site, Toohey Forest, in southeastern Queensland. We now make some corrections to the species names and generic assignments listed in his paper in order to increase its value and to avoid possible future biogeographical errors. In particular, one of the genera recorded in the paper does not occur on mainland Australia, and another three do not occur in southeastern Queensland nor in forested habitats. Consequently it is important to correct these anomalous records in the literature. The list of corrections is given below.

Hypogastruridae

Mesogastrura sp.

Specimens recorded as Mesogastrura sp. are now identified as Xenylla thibaudi thibaudi Massoud, 1965. This species has been recorded from rainforest and grassy forested sites in southeast Queensland (Gama and Greenslade, 1981). A single record of an introduced species of Mesogastrura, M. lybica (Caroli, 1914), is currently the only known occurrence of this genus in Australia. It was found in the Jenolan Caves, New South Wales (P. Greenslade, unpublished record).

Neanuridae

Cephalachorutes sp.

Cephalachorutes sp. (not Cephalochorutes as in Rodgers, 1997), is a new genus record for Australia. This genus was recently described from Thailand (Bedos and Deharveng, 1991) and several undescribed species are known from eucalypt forest leaf litter in southern Australia (P. Greenslade, unpublished data).

Isotomidae

Isotomiella prussianae Deharveng and Oliveira, 1990 (not Olivera as in Rodgers, 1997). Parentheses around the authors’ names as in Rodgers (1997) are not required.

Entomobryidae

Homidia sp.

Specimens recorded as Homidia sp. are now identified as belonging to the genus Entomobrya. Species of Entomobrya are known to be common in southeastern Queensland. Presently the genus Homidia is known to occur only in South-East Asia, Hawaii and possibly also North America. Homidia cingula Börner, 1906 which was described from Java, has been found on Christmas I., Indian Ocean (P. Greenslade, unpublished record) but has never been recorded from the Australian mainland.

Willowsia sp.

Specimens recorded as Willowsia sp. are now identified as Acanthocyrtus lineatus Womersley, 1934. Until now this species was only known from the type collection labelled as from “decaying leaves, Brisbane” (Womersley, 1934). Two syntypes exist in the South Australian Museum collection (Greenslade, 1994). This species was the only one of 25 listed by Rodgers which showed a statistically significant association with a single plant species, Themeda triandra. Acanthocyrtus species are generally associated with woody plants and fallen timber in the warmer parts of Australia. Acanthocyrtus lineatus has appendages and a body that are unusually elongated for the genus.
Sminthuridae

Jeannenotia sp.

The eight specimens recorded as Jeannenotia sp. can not now be located. Only one species in the genus, J. stachi (Jeannenot, 1955), is known in this genus in Australia (Greenslade, 1994). It was probably introduced from Europe and is restricted to crop-lands and improved pastures (Ireson, 1993). It is likely that the misidentified specimens belonged to one of the following genera, Sphaeridia, Sminthurinus or Sminthurides, because these genera have a superficial similarity to Jeannenotia and would be expected to occur in Toohey Forest.

Sminthurus sp.

Specimens recorded as Sminthurus sp. are now identified as belonging to the genus Sminthurinus. Only one species of Sminthurus, S. viridis (Linnaeus, 1758), is currently known from Australia. It is restricted to southern, nonarid regions being found on crop-plants and on exotic grasses in improved pastures and elsewhere (Ireson, 1993). The genus Sminthurinus is represented by numerous native and some introduced species in the more humid regions of Australia.

Toohey Forest, which was the subject of Rodgers’ original paper, is a remnant patch of woodland isolated in an urban environment. It has never been cultivated and weed invasion is minimal. For these reasons it has already been identified as of high conservation significance through its listing as part of the National Estate. An extensive survey of its collembofan fauna will be carried out in the future in order to document its composition more completely and to detect rare and potentially endangered species.

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References


