



## Article

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### The genus *Cryptonura* Cassagnau, 1979 (Collembola: Neanuridae: Neanurinae) in Iran

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#### Abstract

The first two non-European *Cryptonura*, *C. persica* **sp. nov.** and *C. maxima* **sp. nov.** from Iran are described and illustrated. Within the genus both new species are well defined, *C. persica* **sp. nov.** is easily distinguished by only two chaetae Di on Th.II–III and ogival labrum, *C. maxima* **sp. nov.** is recognizable due to numerous chaetae in group L on abdomen IV. Analysis of their morphological features indicate rather close relationship between them. New taxa are also similar to *C. jubilaria* Smolis, 2002 from Poland, nevertheless, they differ in many substantial characters e.g. colour of body, shape of dorsal tubercles, chaetotaxy of labrum and antennae. Differences between them and other species of the genus are presented in an updated key to *Cryptonura* and discussion.

**Key words:** *Cryptonura persica* **sp. nov.**, *C. maxima* **sp. nov.**, taxonomy, springtails

#### Introduction

The subfamily Neanurinae is composed of large or medium-sized species characterized by strongly developed cuticular tubercles on the dorsal surface of the body. At present, the subfamily is one of the most speciose taxonomic groups among springtails and includes close to 740 described species and 100 genera (Bellinger *et al.* 2012).

In 1989, Cassagnau incorporated all known genera into six newly established tribes: Lobellini, Neanurini, Paleonurini, Paranurini, Sensillanurini and Morulodini. All of them, except the last one, have been recorded from the Western Palaearctic. Nevertheless, the tribe Neanurini constitutes a dominant group of Neanurinae in the area. The other above-mentioned tribes contain no substantial numbers of species and are represented only by single native species (Paranurini, Sensillanurini), single non indigenous (introduced) species (Lobellini), or a few genera and a relatively small number of species (Paleonurini). It should be mentioned, however, that the present picture of the systematic composition of Neanurinae fauna in the region under discussion can be not quite reliable as there are many poorly explored or unexplored areas in this respect, especially in the Southern and Eastern parts of the region.

Last year, the second author collected a few specimens of Neanurinae in Northern Iran and sent the material to Poland for identification. Analysis of these materials revealed two new species, which can be classified to the genus *Cryptonura* Cassagnau, 1979.

*Cryptonura* was established by Cassagnau (1979) as one of four subgenera within the genus *Neanura* MacGillivray, 1893. Later Deharveng (1982) elevated it to the genus rank. Among Neanurini, members of *Cryptonura* can be easily distinguished by the following set of characters: 2+2 eyes, head with a non-cross arrangement of chaetae Di and De, head with tubercles Di and De separate and abdomen V with tubercles Di separate (Smolis 2011). Up to now the genus has been represented by five species, all known and restricted in their distribution to Europe (Deharveng 1982, Smolis 2002). The aim of this work is to describe the two new species from Iran and to provide an updated key to all members of the genus *Cryptonura*.