The millipede family Diplomaragnidae Attems 1907 in the Korean Peninsula, with the descriptions of a new genus and new species (Diplopoda, Chordeumatida)

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Abstract

The diplopod family Diplomaragnidae Attems 1907 appears to be represented in the Korean Peninsula by five genera and ten species. One genus and three species are described here as new to science: Koreagna gen. n., with the type species Koreagna obtecta sp. n., Tokyosoma bellum sp. n., and Tokyosoma phialiferum sp. n. Keys and taxonomic and distributional notes are given for all species of diplomaragnids currently known from Korea.

Key words: Millipedes, Chordeumatida, Diplomaragnidae, Korea, new taxa, description, taxonomy, key

Introduction

The family Diplomaragnidae contains 11 genera and 62 species distributed in Mongolia, Japan, Korea, Taiwan, and the Asian part of Russia. Shear (1990) established the synonymy of the families Ancestreumatidae, Syntelopodeumatidae, Tokyosomatidae and Sakhalineumatidae with Diplomaragnidae, and of the genera Ancestreuma Golovatch 1977, Syntelopodeuma Verhoeff 1914, Tokyosoma Verhoeff 1932, Niponiothauma Verhoeff 1942, Pterygostegia Miyosi 1958, Altajosoma Gulička 1972, Sakhalineuma Golovatch 1976 with Diplomaragna Attems 1907. In a subsequent review of the Diplomaragnidae (Mikhaljova 2000), five of these genera were revalidated albeit with new compositions, and five new genera described. Early lists of the Diplopoda of Korea contained one genus and one species of Diplomaragnidae (Takakuwa & Takashima 1944; Paik 1958; Lim 1988). Descriptions of additional species have appeared later (Shear 1990; Mikhaljova et al. 2000; Mikhaljova & Korsós 2003). Several papers refer to faunistic records of some species or unidentified specimens of Diplomaragnidae in different localities in the Korean Peninsula (Murakami & Paik 1968; Kim & Lim 1995, 1995a; Golovatch 1980; Lim et al. 1992; Mikhaljova & Kim 1993; Mikhaljova & Lim 2000). The latest review of the millipede fauna of Korea (Lim 2001) already refers to four genera and five species of diplomaragnids. In addition, the regional reviews by Takakuwa (1954) and Mikhaljova (2004) include data on the distribution ranges of some Korean species of Diplomaragnidae. At present, five genera and ten species (including the new genus and new species described below) have been recorded from the Korean Peninsula. However, the taxonomic status of some them requires confirmation.

The present paper provides the descriptions of a new genus and new species as well as a review of the Diplomaragnanidae genera and species occurring in the Korean Peninsula.

Materials treated here have been deposited in the collections of the Chonbuk National University (ChNU), Jeonju, Republic of Korea, the Zoological Museum of the State University of Moscow (ZMUM), Moscow,