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Article



## Check-list of North Korean Orthoptera Based on the Specimens Deposited in the Hungarian Natural History Museum

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## Abstract

Beginning with Hungarian expeditions to Korean peninsula in 1970, many Korean biological specimens have accumulated in the collections of the Hungarian Natural History Museum. The collections have informative value to understand East Asian biota. Here, North Korean Orthopterans are examined and checked; 73 species are listed and collecting data for more than 1,441 individuals is provided. A joint research project was accomplished in the year 2010 between the Hungarian Natural History Museum and the National Institute of Biological Resources. The project produced a total of 123 specimens of 26 North Korean Caeliferan species which are newly placed in the Entomological Collection of the National Institute of Biological Resources. A transpalaearctic long-horned grasshopper *Bicolorana bicolor* (Philippi, 1830) is reported for the first time from North Korean fauna.

Key words: Orthoptera, check-list, North Korea, Korea, Hungary

## Introduction

The Korean Peninsula is located in the center of East Asia. It borders continental China and Russia in the north and the Japanese Archipelago is southwest across the East Sea. Mountains cover seventy percent of the land which becomes more mountainous towards the northeast. Other features include high mountains and plains, many small attached islands, rivers, coasts, and caves ensuring good habitats for insect diversity. However, because of political reasons, it has been divided into South Korea and North Korea since 1945, the end of World War II.

One of the world famous Natural History Museums, the Hungarian Natural History Museum, has conducted 27 collecting trips across the Korean peninsula since 1970, of which fifteen have been to North Korea (NIBR, 2008). Their collections contain 250,000 specimens, including about 500 type materials (Kwon, 1997), which can provide valuable information for understanding East Asian biota in both botany and zoology (Lee *et al.* 1994). Many references and research papers have been published based on the collections. Concerning entomological results, the numbers of publications about the four major insect orders are as follows: Hymenoptera (40), Coleoptera (32), Lepidoptera (13), and Diptera (7). However, the Orthoptera lack recent information (Ronkay, 2002).

From the biogeographical view point, the Korean peninsula belongs to the East Palaearctic nemoral region. With regards to the order Orthoptera, their distributional ranges are show good examples of vicariance biogeography, into the Amurian province of the Manchurian subregion (Sergeev 1992, 1993). It is assumed that North and South Korea have similar compositions, but the North Korean Orthopteran fauna is relatively unknown compared to South Korea (Song, 2010). There are a number of earlier published papers concerning North Korean Orthoptera with the materials deposited in Hungarian Natural History Museum (Gorochov *et al.* 1993; Kim & Kim 2005abc; Kim 2008, 2009; Kostia, 1995, 1996). However, a check-list of North Korean Orthoptera and detailed collecting data is not presented until now.

The first author visited the Hungarian Natural History Museum three times. The first time was August 21~25, 2003 as a student in a Ph. D. course. At that time, the author had a general examination of the North Korean mate-