

Description of New Subspecies of the Rare Bulgarian Endemic *Macedonica brabeneci* Nordsieck (1977) (Pulmonata: Clausiliidae)

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Abstract: A new subspecies of the rare Bulgarian endemic *M. brabeneci* is described, so the door-snail *M. brabeneci* currently comprises two subspecies: *Macedonica brabeneci brabeneci* Nordsieck (1977) and *Macedonica brabeneci prismatica* subsp. n.

Key words: new subspecies, *Macedonica brabeneci prismatica*, Bulgaria

Introduction

In 1977, Nordsieck described a new species *Macedonica brabeneci* from Smolyan lakes, 1600-1700 m, Western Rhodopes Mountains, Bulgaria. The species seems to be very rare because, despite the efforts, no additional materials have been found after the first record. During the course of two collecting trips in 2005-2006 in Eastern Rhodopes Mountains (Southeastern Bulgaria) a couple of interesting clausilid specimens were found. These were recognized as a new subspecies of the rare Bulgarian endemics *M. brabeneci*.

Material and Methods

The materials were hand-collected by the author in 2005 - 2006 from Eastern Rhodopes Mts, Bulgaria. They are deposited in Senckenberg Museum, Frankfurt am Main (SMF) and author's collection (DED-BG). The morphological examinations were carried out with a stereomicroscope.

Results

Macedonica brabeneci prismatica subsp. n.

Locus typicus: Bulgaria, Eastern Rhodopes

Mts., near vill. Potochnitsa, close to Arda river, small clefts, in the rocks, among bushes and *Geranium*, N 41° 36' 36", E 25° 39' 17", 164 m, leg. I. Dedov; 24. IV. 2005/1 specimen, 16. VI. 2006/1 specimen, 06. VII. 2006/2 specimens.

Type material: Holotype (SMF 338466); Paratypes: same locality, DED-BG No. 1162/1, No. 1388/2.

Differential diagnosis: The new subspecies differs from the nominate subspecies of *Macedonica brabeneci* by smaller size, not so slender (much thicker) shell, wider and oval mouth and relatively longer principal plica.

Description of type series: height of shell is 12.72-13.8 mm; diameter of shell 3.24-3.36 mm; height of aperture 3.48 – 3.84 mm; diameter of aperture 2.4-2.64 mm; number of whorls are 9-9.5.

The shell is spindle-shaped, yellow-greenish coloured, without ribs, with a fine net-like structure (as seen under higher magnification). The aperture is romboid-oval in shape, with whitish weekly turned lip (often not well developed). The basal canal and keel are missing. The sinulus is well developed. Superior lamella not reaching the spiral lamella. Inferior lamella wide-spiral turned. Lunella missing.

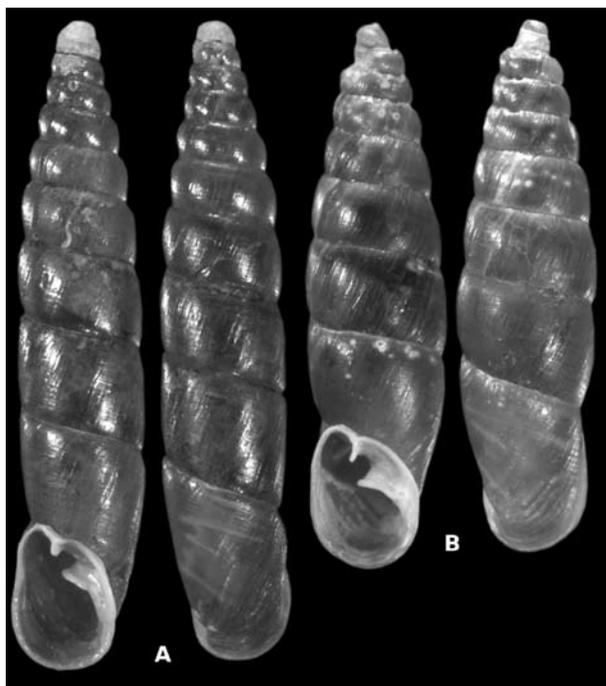


Fig. 1. Subspecies of *M. brabenei*: A. *Macedonica brabenei brabenei* Nordsieck (1977); B. *Macedonica brabenei prismatica* subsp. n.

Principal plica longer and occupies about 1/2 from the last whorl. Upper palatal plica is about 1/3 from the length of the principal plica. Clausilium plate typical for genus.

Etymology: named after its occurring on prismatic rock formations.

Distribution: *M. brabenei prismatica* subsp. n. occurs on open rocky terrains, on low altitude near Arda river (164 m). To date the species is known from its type locality, Bulgaria, Eastern Rhodopes Mts., vill. Potochnitsa.

Ecology: occurs on prismatic rock formations, in the base of the rocks among plants, under stones and in the rock's crevices.

Comments

The new subspecies seems to be extremely rare. It was found only with 4 specimens in a very restricted locality, while the accompanying clausiliid fauna (*Alinda atanasovi* (Urbanski, 1964), *Bulgarica denticulata* (Olivier, 1801)) was present with numerous specimens. Both subspecies of *M. brabenei* seem to support sparse populations and occur on restricted territories in Southeastern Bulgaria.

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References

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