DESCRIPTION OF THE PROTONYMPH OF THE SPECIES *Trachyuropoda cristiceps* CANESTRINI, 1884 AND *Trachyuropoda myrmecophila* WISNIEWSKI & HIRSCHMANN, 1992 (ACARINA: ANACTINOTRICHIDA: UROPODINA)

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Abstract. The paper contains the description of the protonymphs of the species Trachyuropoda cristiceps and Trachyuropoda myrmecophila, collected from ant hills.

Key words: myrmecophil mites, uropodids, protonimph description.

Rezumat. Descrierea protonimfei speciilor *Trachyuropoda Cristiceps* CANESTRINI, 1884 şi *Trachyuropoda Myrmecophila* WISNIEWSKI & HIRSCHMANN, 1992 (Acarina: Anactinotrichida: Uropodina). Lucrarea prezintă descrierea protonimfelor speciilor Trachyuropoda cristiceps şi Trachyuropoda myrmecophila, colectate din muşuroaie de furnici.

Cuvinte cheie: acarieni mirmecofili, uropodide, descrierea protonimfelor.

INTRODUCTION

Uropodids are a group of terrestrial mites being spread in varied types of habitats: leaf litter, lawns and pastures, tree trunks in decomposition, birds nests, anthills, etc.

The species *Trachyuropoda cristiceps* and *Trachyuropoda myrmecophila* are only myrmecophil species, the former being European species widely spread. The latter species was described by WISNIEWSKI and HIRSCHMANN in Poland (WISNIEWSKI & HIRSCHMANN, 1992) and was found afterwards in Slovakia (MASAN, 2001) and Hungary (KONTSCHAN, 2002) being an European species with limited distribution in the Central and South-Eastern Europe, and being for the first time recorded in Romania.

The literature contains the descriptions of the adults and of the deutonymphs of these species, namely for *Tracyuropoda myrmecophila* and its larva, but the protonimphs for both species were never described. This paper completed the descriptions of these species, with protonymps descriptions.

MATERIAL AND METHOD

The studied material comes from soil samples collected from anthills on two pastures in Hinţeşti and Ştefăneşti, two villages in the hilly area in Argeş, above three and fifteen kilometers away from the town of Piteşti, respectively.

The studied material:

Trachyuropoda myrmecophila

5.XI. 2005, Hinţeşti, 3 protonymphs;

Trachyuropoda cristiceps

5.XI. 2005, Hinţeşti, 2 protonymphs; 7.XI. 2005, Ştefăneşti, 16 protonymphs.

RESULTS AND DISCUSSION

The description of the protonymph for the species Trachyuropoda cristiceps (Figure 1).

Dorsal: It has an oval body , light red in colour , the length of the idiosoma is 660 μm, the width is 500 μm, and it has two shields (podosomal and pygidial) that are genus characteristics. The podosomal shield is longer in the front and concave in the posterior part, it has a cleary carved ant pentagonal pattern, with 13 pairs of dorsal hairs shaped like anchors and placed on the small inserrating platforms. The pygidial shield has two pairs of serrated hairs with the same pentagonal pattern.

Ventral: The sternal shield with three pairs of setae, shaped like anchors, and with the design of the cuticle pantagonal. The anal opening is surrounded by a chitin ring.

Peritrema: It is on the peritremal shield and is slightly sinuous, having only one long anterior branch.

Gnathosoma: The hypostome with C_1 hair simple, needle-like, C_2 has a bi-forked tip, C_3 is long and serrated, C_4 is shorter than C_3, strongly serrated, with simple corniculi shaped like teeth and sharp towards the tip. The hypostome has hypostomali denticles (approximately four rows) in between the C_4 hairs. The chelicerae have a nodus at the bottom of the fixed digit, the mobile digit has only one denticle, and the fixed digit has a cavity matching that tooth. The lacinae are much longer than the corniculi and they are filiform. The tritosternum has the bottom articul made up of two segments, the limb with median branch bi-forked and serrated, while the two lateral branches are serrated and longer than the median one.

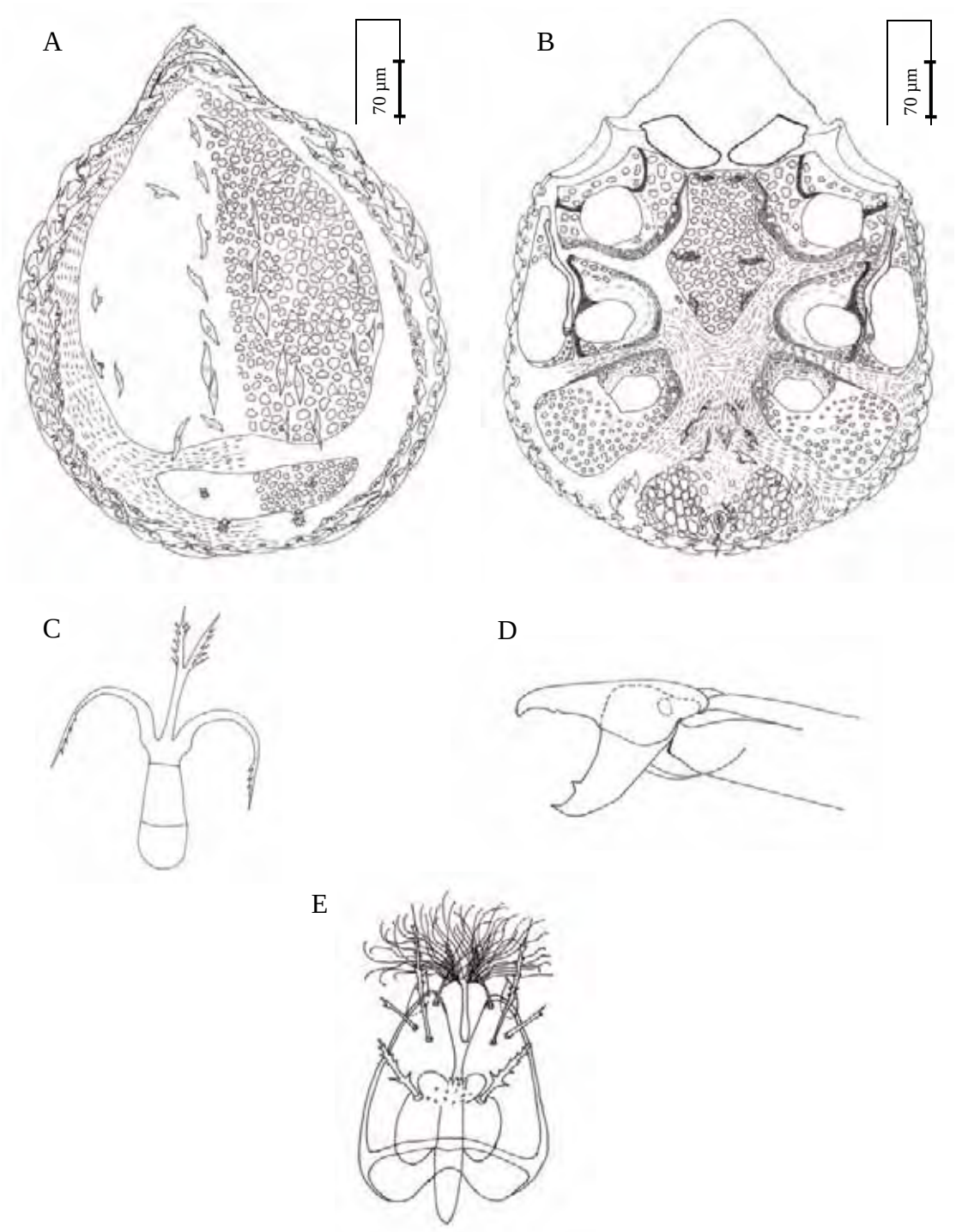

Figure. 1. *Trachyuropoda cristiceps*, A-protonymph dorsal, B- protonymph ventral C- tritosternum, D - chelicerae, E- hypostome.
Figura 1. *Trachyuropoda cristiceps*, A-protonimfă dorsal, B- protonimfă ventral C- tritostern, D -cheliceră, E-hipostom.

The description of the protonymph for the species *Trachyuropoda myrmecophila* (Fig.2)

Dorsal: The body colored in brown, the lenght of the idiosoma is 880 µm, the width is 560 µm. The podosomal shield with pentagonal ornamentation, some areas with well sclerotized cuticle, with dorsal hairs shaped like anchors, associated with large pores (≥ 10). The pygidial shield with the same ornamentation. The lateral hairs place on small inserrating platforms is disposed in three rows.

Ventral: The sternal shield with three pairs of setae, shaped like anchors, and with the design of the cuticle alveolate, with a pair of large pores. The pericoxal and anal shield with alveolat design, more or less pentagonal, strongly chitinised.

Peritrema: is little curved anterior, is situated on the peritremal shield, shield with pentagonal pattern, with strongly chitinised cuticle.

***Gnatosoma*:** The hypostome with C_1 hair simple, needle-like, the hairs C_2, C_3, C_4 serrated, the hair C_3 thiner and twice longer than C_4. The corniculi are simple, teeth-like, and sharp towards the tip. The lacinae pennate, much longer than the corniculi. The chelicerae with fixed digit with pilus dentilis, the fixed digit is little longer than mobile digit. The mobil digit with one single denticle and two cavities matching that denticle and the distal termination of mobile digit, respectively. The tritosternum with the base article pyriform, the limb with median branch bi-forked and serrated, and the two lateral branches are serrated and with one basal thorn.

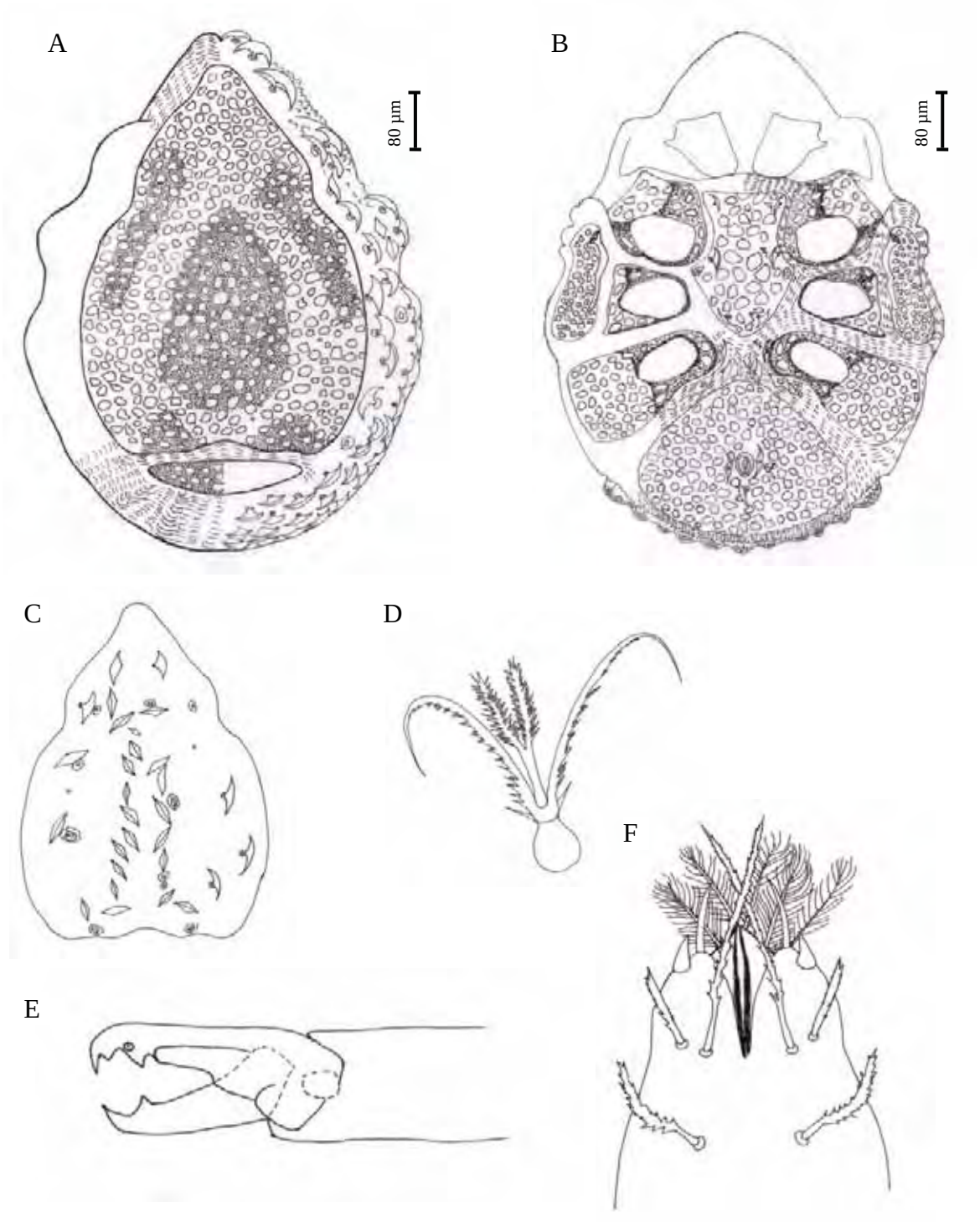

Figure 2. *Trachyuropoda myrmecophila*, A-protonymph dorsal, B-protonymph ventral, C-the setae on the podosomal shield, D-tritosternum, E-chelicerae, F-hypostome.
Figura 2. *Trachyuropoda myrmecophila*, A-protonimfă dorsal, B-protonimfă ventral, C- peri scutul podosomal, D-tritostern, E-cheliceră, F-hipostom.

ACKNOWLEDGEMENTS

We thank to Dr. Marina Huțu (Iași Biologycal Research Institute) for patience to analyse the paper manuscript and for the observations and precious advices.

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