

## A New *Troglohyphantes* from Bulgarian Caves (Araneae, Linyphiidae)

by

Ch. DELTSHEV\*

Drensky (1931) reported 5 species of the genus *Troglohyphantes* inhabiting Bulgarian caves. Kratochvil and Miller (1938) and Deltshev (1972) established that two of these species belong to the genus *Centromerus* and the rest to *Leptophantes*. From research in the cave "Suchata" near the town of Velingrad, 1♂ and 4♀ *Troglohyphantes* were found. This provided an opportunity for a more profound study which resulted in the establishment of a new species, which I call *Troglohyphantes drenskii* in honour of the well known Bulgarian arachnologist Dr. P. Drensky.

### *Troglohyphantes drenskii* n.sp.

#### Description of male

Total length - 2.47 mm. Cephalothorax, length - 1.09 mm, wide 1.01 mm, pale yellow with head areal slightly elevated.

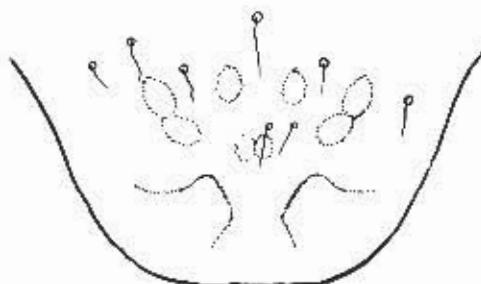


Fig. 1. *Troglohyphantes drenskii* n.sp. Eyes (♂ from in front)

Eyes (fig. 1) very small almost reduced, without any black strip. Clypeus, height - 0.24 mm, concave.

Chelicerae, length - 0.54, wide - 0.40 mm, armed with 3 teeth on outer row and 3 denticles on inner row.

Sternum, length - 0.67 mm, wide 0.67 mm.

Abdomen, length - 1.46 mm, grey.

\* Zoological Institute, Bulg. Acad. of Sci., Boul. Rusky 1, Sofia.

Legs, yellowish, long and thin. Femora I with 1 dorsal and 1 prolateral spine on apical half. Femora II-IV with 1 dorsal spine. Tibiae I-II with 1 prolateral, 1 retrolateral and 1 dorsal spine on apical half, and 1 dorsal spine in the middle. Tibiac III-IV only with 2 dorsal spines. Metatarsi I-III with 1 dorsal spine.

Measurements (in mm) of legs:

Leg	Fe	Pt	Ti	Mt	Ta	Total
I	1.74	0.36	1.83	1.64	1.04	6.61
II	1.50	0.36	1.64	1.55	1.00	6.05
III	1.34	0.32	1.37	1.28	0.82	5.16
IV	1.74	0.36	1.83	1.64	1.00	6.57

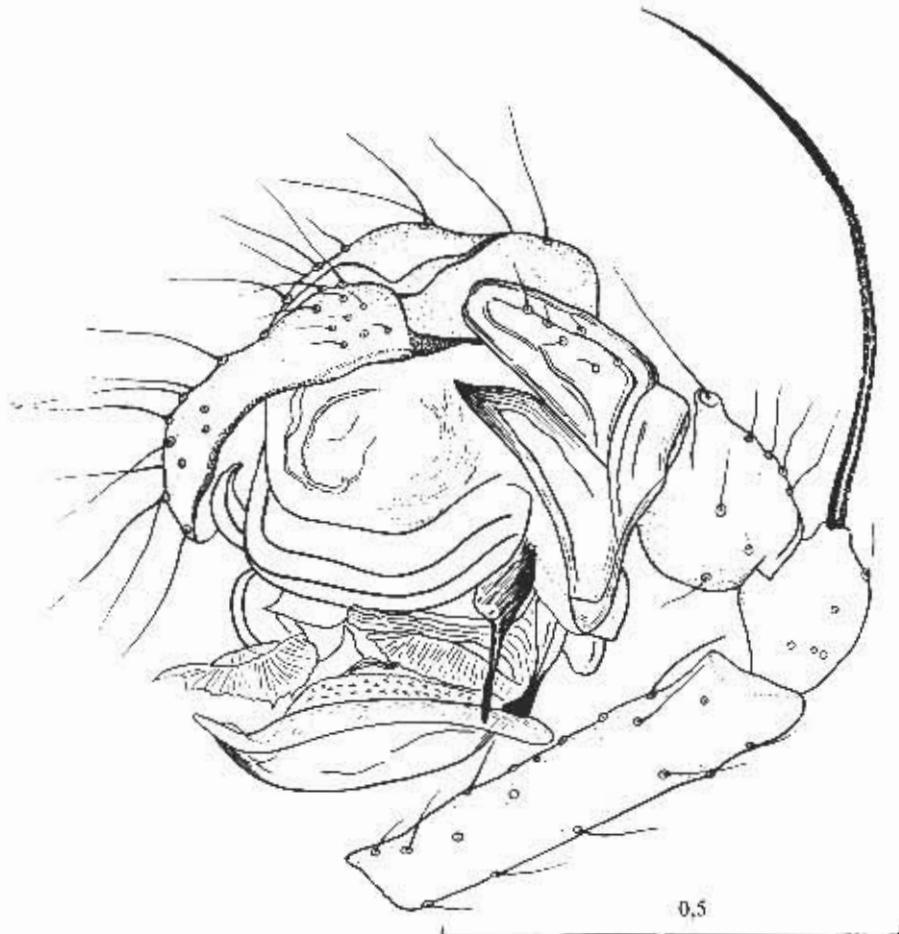


Fig. 2. *Troglohyphantes drenskii* n.sp. Left ♂ palp, external view.

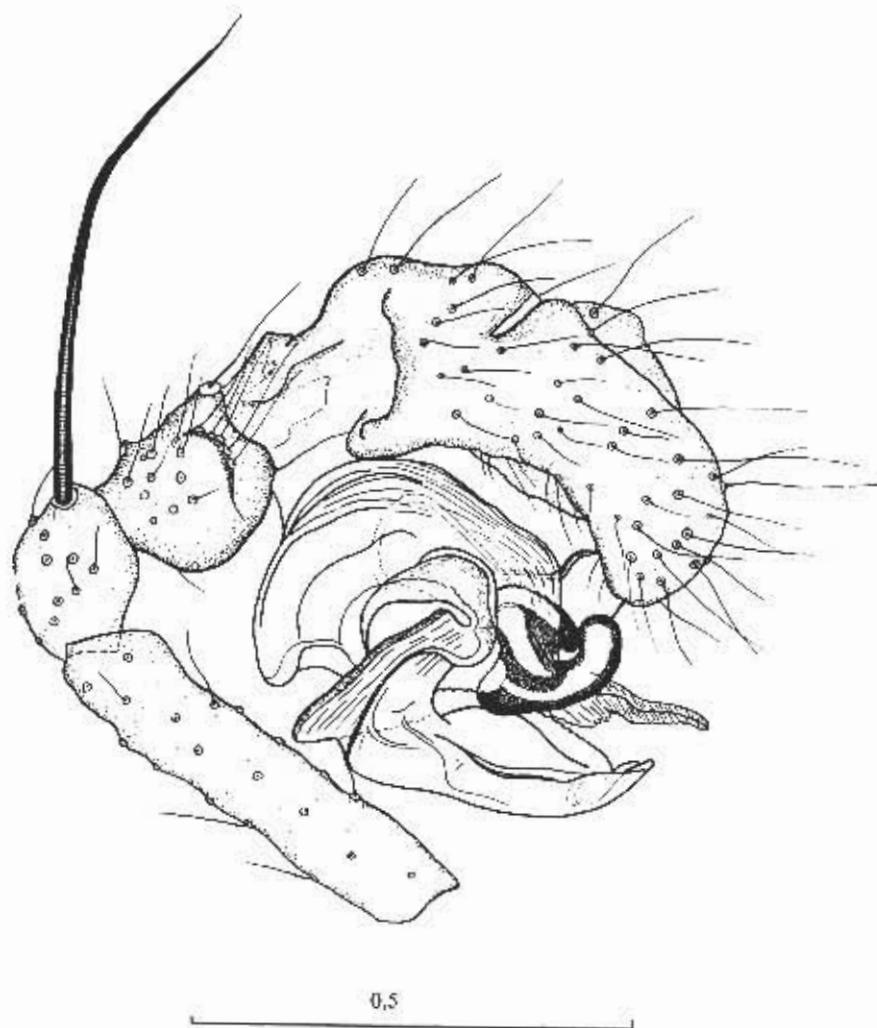


Fig. 3. *Troglohyphantes drenskii* n.sp. Left ♂ palp, internal view.

Palpus fig. 2, 3, 4. Tibia spherical. Cymbium very similar to that of *T. salax*, with characteristic transverse groove on the dorsal side. Paracimbium forked. Lamella characteristically smaller than embolus and the great part covered by other parts of bulbis. Embolus (fig. 5) large and semicircular, cut on the top, like *T. salax*.

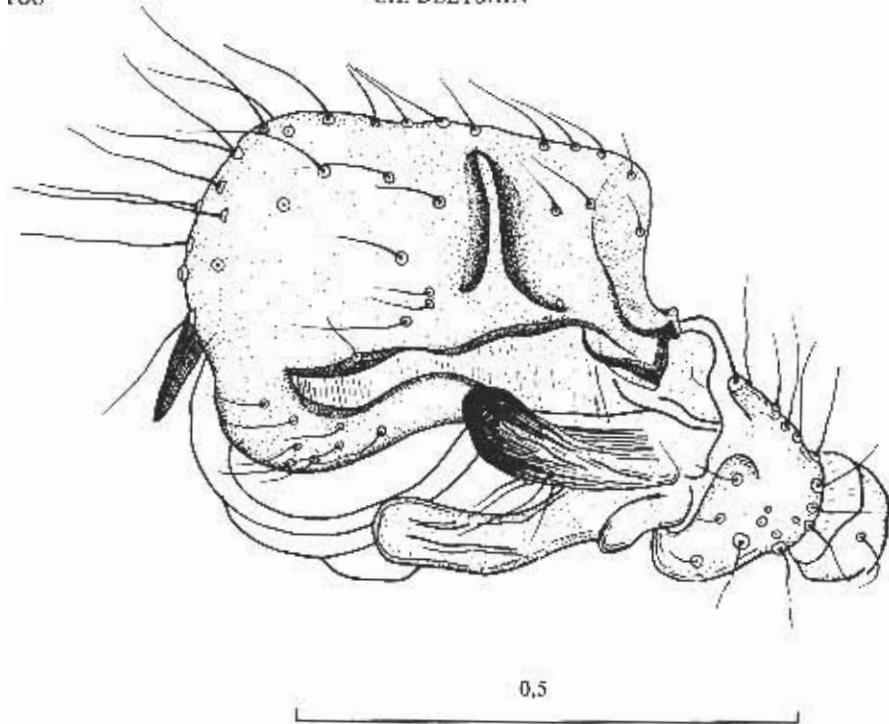


Fig. 4. *Troglohyphantes drenskii* n.sp. Left ♂ palp, dorsal view.

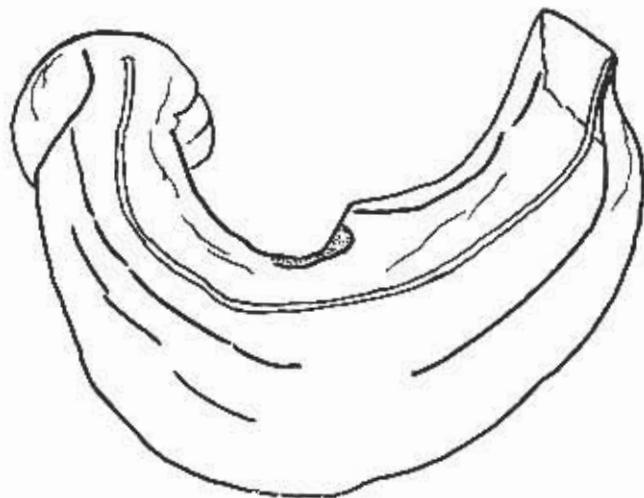


Fig. 5. *Troglohyphantes drenskii* n.sp. Embolus.

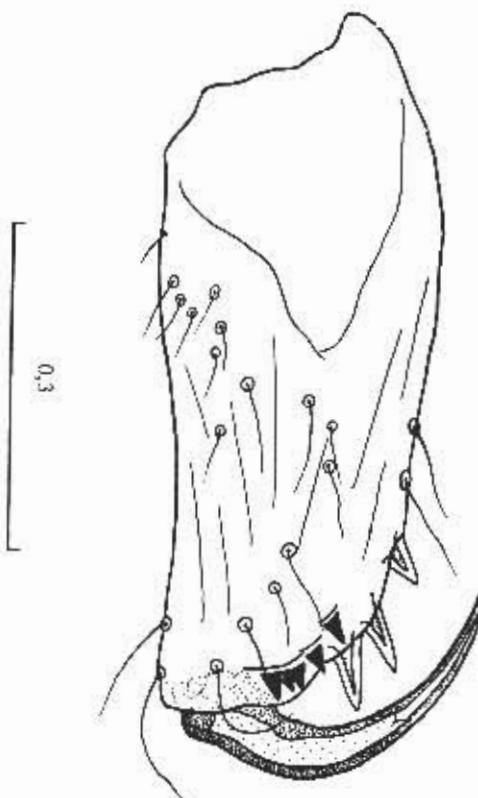


Fig. 6. *Troglohyphantes drenskii* n.sp. Left ♀ chelicera, posterior view.

#### Description of female

Total length — 2.93 mm. Cephalothorax, length — 1.28 mm, wide 1.09 mm, pale-yellow.

Eyes, very small without any black strip, anterior medians almost reduced. Clypeus, height — 0.24 mm, concave.

Chelicerae (fig. 6), length — 0.64 mm, wide — 0.27 mm with 3 well developed teeth on outer row. Inner row with 5 denticles.

Sternum, length — 0.67 mm, wide — 0.67 mm.

Abdomen, length — 1.64 mm.

Legs: Femora I with 1 dorsal and 1 prolateral spine on apical half. Femora I—IV with 1 dorsal spine. Tibiae I-II with 1 prolateral, 1 retrolateral and 1 dorsal spine on apical half and 1 dorsal spine in the middle. Tibiae II-IV only with 2 dorsal spines. Metatarsi I-III with 1 dorsal spine.

Measurements (in mm) of legs:

Leg	Fe	Pt	Ti	Mt	Ta	Total
I	1.83	0.40	1.92	1.55	1.09	6.79
II	1.74	0.36	1.83	1.55	1.00	6.48
III	1.46	0.36	1.37	1.37	0.82	5.38
IV	1.92	0.36	1.92	1.74	1.00	6.94

Palpus: Fe – 0.54 mm, Pt – 0.18 mm Tb – 0.27 mm, Tr – 0.64 mm. Epigyne (fig. 7,8). Lamina basalis elevated above outer range of the body, heart-shaped, very rounded. Very similar to *T. salax*, *T. orpheus* and *T. pademontanus*.

## DISCUSSION

*Troglhyphantes drenskii* n. sp. belongs to the group of *T. orpheus* and is related to *T. salax* and *T. pademontanus*.

Material and locality:

"Suchata pestera" cave near the town Velingrad (district of Pazardžik), 1♂ holotype, 4 ♀♀ paratypes, 6.IV.1972, 4 ♀♀ paratypes, 3.VI.1963. The type-material is preserved in collections of the Zoological Institute—BAN, Sofia.

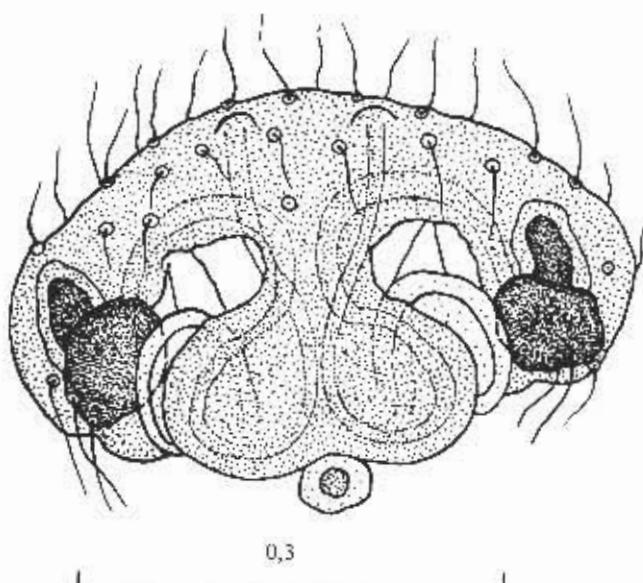


Fig. 7. *Troglhyphantes drenskii* n.sp. Epigyne ventral view.

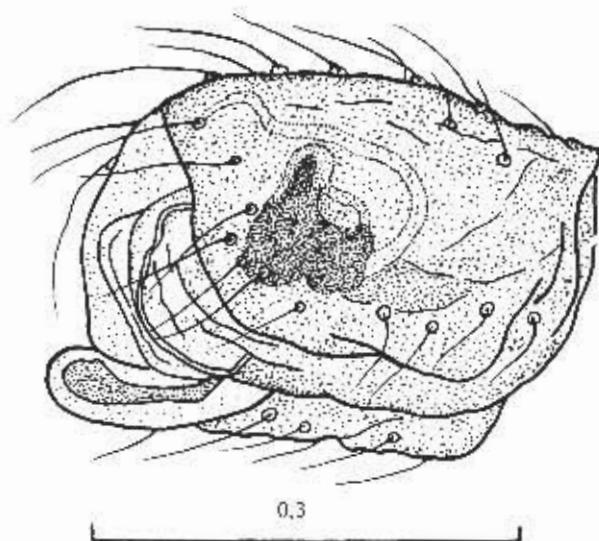


Fig. 8. *Troglohyphantes drenskii* n.sp. Epigyne, lateral view.

## SUMMARY

A new species *Troglohyphantes drenskii* is described, which was collected in the cave "Suchata pechtera" near Velingrad, Bulgaria. *Troglohyphantes drenskii* n.sp. belongs to the group of *T. orpheus* and is related to *T. salax* and *T. pademontanus*.

## RÉSUMÉ

Dans le présent travail est décrite une nouvelle espèce, recueillie dans la grotte "Souchata pechtera" près de la ville Velingrad, Bulgarie, *Troglohyphantes drenskii* n. sp. appartient au groupe *T. orpheus* et ressemble à *T. salax* et *T. pademontanus*.

## LITERATURE

- DELTSHEV, Ch. — 1972 — A contribution to the study of spiders (Araneae) from caves in Bulgaria II. Genus *Leptophantes* in Bulgarian caves. Bull. de l'Institut de Zool. et Musée, t. XXXVI.
- DRENSKY, P. — 1931 — Höhlen-Spinnen aus Bulgarien. Rev. Bulg. Acad. of Sci., XLIX, Sofia.
- KRATOCHVIL, J. MILLER, F. — 1938 — Sur le problème des araignées cavernicoles du genre *Centromerus* de la péninsule balkanique. Bull. Inst. roy. Hist. Natur. Sofia XI.