

***Elaphoidella plesai* n. sp., from ground waters of Austria (Copepoda Harpacticoida : Canthocamptidae)**

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Keywords : Copepoda, Harpacticoida, *Elaphoidella*, ground waters, Austria.

Elaphoidella plesai n. sp. is described from material collected from cave waters of Austria. According to Apostolov (1985) the new species fits the *gracilis* group of *Elaphoidella* s. str., being close to *Elaphoidella stammeri* Chappuis, 1936.

It differs from the nominate species, as well as from other congeners in the same group, by the distinctive morphology and setation of caudal rami, and by the unusual armature of leg 5.

***Elaphoidella plesai* n. sp. des eaux souterraines d'Autriche (Crustacea Copepoda : Canthocamptidae)**

Mots-clés : Copepoda, Harpacticoida, *Elaphoidella*, eaux souterraines, Autriche.

On décrit *Elaphoidella plesai* n. sp. des eaux souterraines d'une grotte d'Autriche. Selon Apostolov (1985), cette nouvelle espèce appartient au groupe *gracilis* où elle est proche d'*Elaphoidella stammeri* Chappuis, 1936. Toutefois elle diffère de toutes les autres espèces du groupe *gracilis* par la morphologie des rames caudales et par l'ornementation particulière de la P5.

Harpacticoid copepods collected from cave waters in Austria were kindly sent to us for identification by Dr. Corneliu Plesa of the Speleological Institute of Cluj (Romania).

The material includes a new species of the genus *Elaphoidella* Chappuis, 1929 *sensu* Apostolov (1985) which is herein described as *Elaphoidella plesai* n. sp.

The discovery of this species brings the total number of *Elaphoidella* from Austria to 3, the others being *Elaphoidella gracilis* (Sars, 1863) and *Elaphoidella proserpina* Chappuis, 1934.

Family Canthocamptidae Sars, 1906 ; Monard, 1928 ; Lang, 1948

Genus *Elaphoidella* Chappuis, 1929 *sensu* Apostolov (1985)

***Elaphoidella plesai* n. sp.**

Matériel examiné : holotype (♀) et 1 paratype (♀), dissection et monté sur slides en polyvinyle

lactophenol, de la « Lurgrotte », Styrie (Autriche), st. P.1439,41 ; 27.11.1991 ; coll. C. Plesa.

Type material deposited in the senior author's collections at the « Dipartimento di Scienze Ambientali », University of L'Aquila, Italy.

DESCRIPTION

Body subcylindrical. Length, excluding caudal setae, 580 μm (holotype), 579 μm (paratype). Genital somite broader than long ; genital field as in Fig. 7. Two urosomites posterior to genital segment dorsally smooth, each with one row of small spines on ventral and lateral margins. Anal somite with some scattered spinules on dorsal side, and two spines near posteroventral margin above each caudal ramus ; anal operculum slightly convex and armed with numerous short spinules.

Caudal ramus subrettangular, about twice longer than broad ; dorsal seta inserted on a well developed dorsal ridge, and about as long as ramus ; two lateral setae of about the same length ; three terminal setae, the median the longest ; remaining armature as in Figs. 5 and 7.

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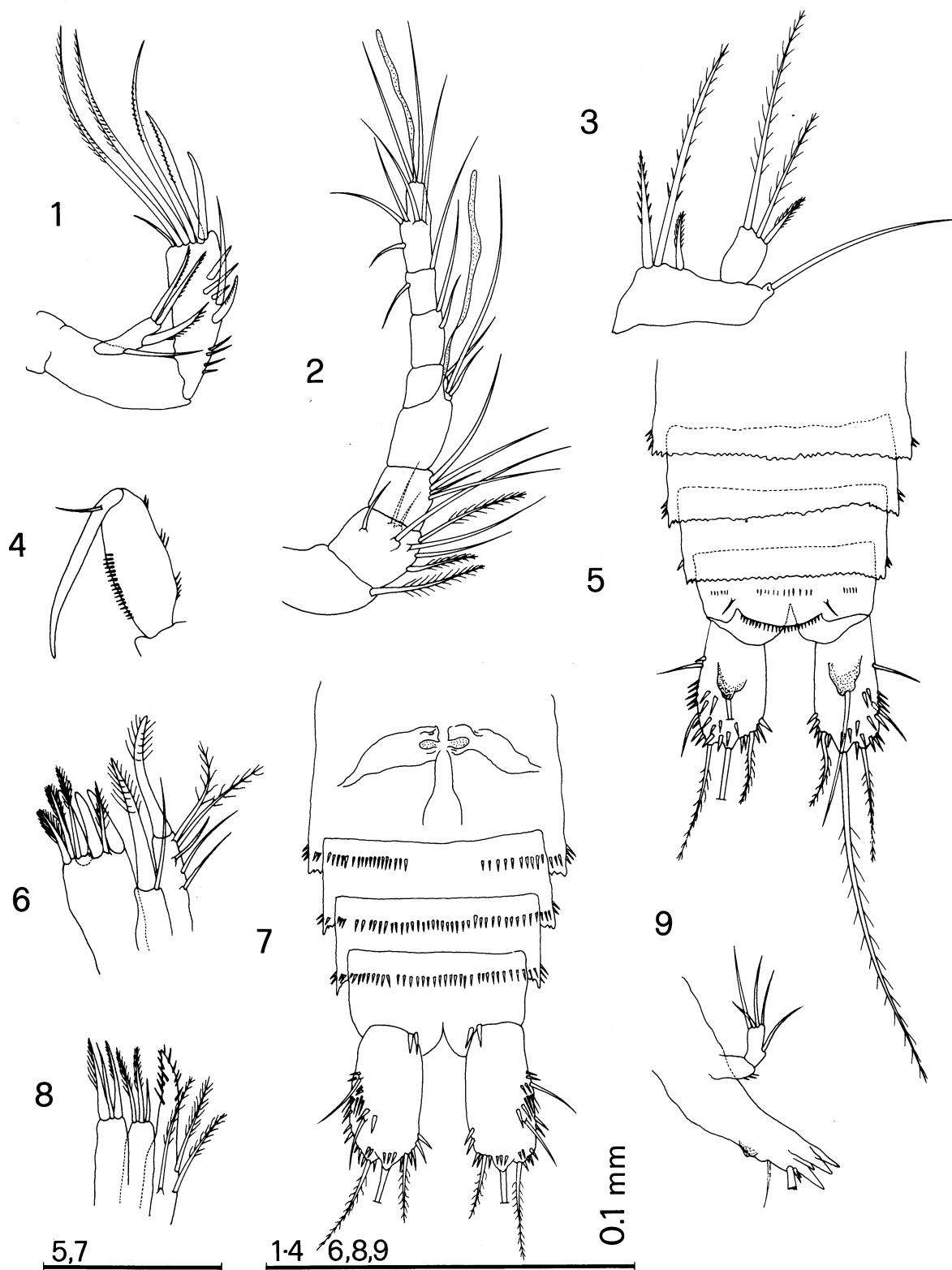


Fig. 1-9. *Elaphoidella plesai* n. sp. 1-6, 8-9 (holotype) ; 7 (paratype). 1. Antenna ; 2. Antennule ; 3. P5 ; 4. Maxilliped ; 5. Abdomen and caudal rami (dorsal view) ; 6. Maxillula ; 7. Abdomen and caudal rami (ventral view) ; 8. Maxilla ; 9. Mandible.

Fig. 1-9. *Elaphoidella plesai* n.sp. 1-6, 8-9 (holotype) ; 7 (paratype). 1. Antenne ; 2. Antennule ; 3. P5 ; 4. Maxillipède ; 5. Segments abdominaux et branches furcales (vue dorsale) ; 6. Maxille ; 7. Segments abdominaux et branches furcales (vue ventrale) ; 8. Maxilla ; 9. Mandibule.

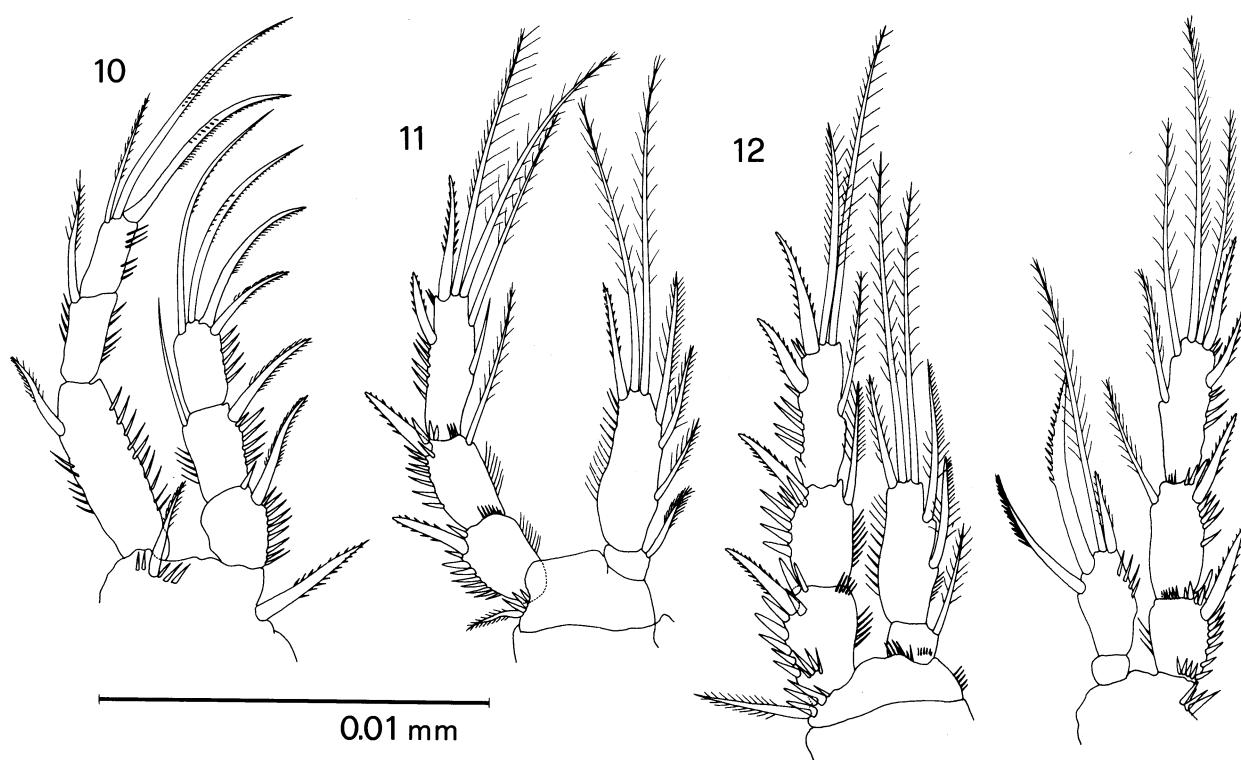


Fig. 10-13. *Elaphoidella plesai* n. sp. (holotype). 10. P1 ; 11. P3 ; 12. P2 ; 13. P4.

Fig. 10-13. *Elaphoidella plesai* n. sp. (holotype). 10. P1 ; 11. P3 ; 12. P2 ; 13. P4.

Antennule of 8 articles ; article 4 with long esthetasc overreaching the end of antennule, article 8 with shorter and slender esthetasc ; remaining setation as in Fig. 2. Antenna biarticulate ; exopodite uniarticulate, with four setae ; remaining setation as in Fig. 1. Mandible with biarticulate palp bearing four apical and one subapical setae. Maxillula and maxilla as in Figs. 6, 8. Maxilliped prehensile ; basis without seta ; endopodite with comb of spinules on anterior and posterior surface.

Legs 1-4 with triarticulate exopodite ; endopodite of leg 1, triarticulate ; endopodite of legs 2-4, biarticulate. Formula of major armature as follows :

	exp.			enp.		
	1	2	3	1	2	3
leg 1	0.1	1.1	0.2.2	1.0	1.0	1.1.1
leg 2	0.1	1.1	1.2.2	-	1.0	2.2.1
leg 3	0.1	1.1	2.2.2	-	1.0	3.2.1
leg 4	0.1	1.1	2.2.2	-	0.0	2.2.0

Couplers of all legs without ornament. Spines and setae morphology as in Figs. 10-13.

Leg 5, medial expansion of basoendopodite reaching less 1/2 length of exopodite ; basoendopodite with 3 setae, the outer very short, the mediane the longest, innermost about 1/2 length of the medial one ; exopodite with 3 setae, outermost the shortest.

No variation was observed between holotype and paratype.

Male unknown.

AFFINITIES

On account of setation of the endopodite of legs 2-4, and the morphology and number of setae of leg 5, *Elaphoidella plesai* n. sp. belongs to the III species groups of *Elaphoidella* by Lang (1948), as well as it fits the *gracilis* group of species as defined by Apostolov (1985).

The new species most closely resembles *Elaphoidella stammeri* as described by Chappuis (1936) and, successively by Petkovski (1983) in the identical number and relative length of the setae of legs 2-3, in the setation of the exopodite of leg 4 and in the number of setae on both the exopodite and basoendopodite of leg 5.

It differs from the nominate species and from congeners in the same group by the highly distinctive morphology and setation of the caudal rami, as well as by the unusual relative length of the setae on the exopodite of leg 5. From *E. stammeri*, *E. plesai* n. sp. differs also by the anal operculum with marginal comb (versus anal operculum with fine cilia), the absence of inner seta on the first article of the leg 4 endopodite and the number of spines at posteroventral margin of the anal somite (2 in *plesai*, 4-5 in *stammeri*).

Etymology : specific epithet after the friend and colleague, Dr. Corneliu Plesa who collected the new species.

References

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