Zoology-Nematology

New Data on the Distribution of Nematode *Pseudoaulolaimus Anchilocaudatus* Imamura, 1931 (*Chromadorida: Aulolaimidae*)

Irakli Eliava*, Nana Bagathuria**, Eristo Kvavadze§

* Academy Member, Institute of Zoology Ilia State University, Tbilisi

** Institute of Zoology Ilia State University, Tbilisi

§ Entomology and Biocontrol Research Centre, Ilia State University, Tbilisi

ABSTRACT. A new habitat of *Pseudoaulolaimus anchilocaudatus* on the eastern coast of the Black Sea (Colchis, Georgia) has been established. The revealed males are described on the basis of the original material; the habitat characteristic and JPS coordinates are given. © 2011 Bull. Georg. Natl. Acad. Sci.

Key words: Colchis habitat, Black Sea Coast.

After the first description of *Pseudoaulolaimus anhilocaudatus* Imamura, 1931 from Japan, half a century later Sturhan and Lorenzen [1] gave redescription of this species, reporting it from several cities of Germany and the Netherlands. Later new finds of this species from Hungary and Vietnam were reported [2].

When studying the biodiversity of nematodes of the Kolkheti National Park Black Sea Coast under sea lilies (*Pancratium maritimum* L.) on dunes 4 males of *P. anchilocaudatus* (one with a broken tail) were found in soil samples. One male was found in the same place in the reed bog (Fig. 1).

Nematodes were isolated using Berman's funnel method, fixed in 4% formalin and glycerin preparations were prepared. Measurements and drawings were carried out; JPS coordinates of habitats:

dune: N 42°20.796' and E 041°36.379';

The preparations are stored in the Laboratory of Nematology of the Institute of Zoology of Ilia State University (prep.1 and 2 *Pseudoaulolaimus*).

The measurements, description and original drawings for the Colchis material are given (Fig. 2) below.

Measurements: 3 ♂ L≈0.71-0.8mm; a=21.6-32; b=4.6-6.1; c=7.8-9; spic=19.8-20.9μm; gub≈6.6μm

The body is straight, bent ventrally at the tail end, narrowing towards both extremities. In the area of amphids located closer to lips. The cuticle with well-developed longitudinal 24-26 ribs in the middle of the body. Between them there are furrows in the form of fields with small pores. The thinned part of the tail lacks ribs.

The labial part is not separated from the body contours. Lips are hardly visible. Amphids are round, spiral with irregular internal borders about 4.4 μ m in width (Fig. 2 A). The diameter is slightly lower than $\frac{1}{2}$ of the corresponding body width.

The mouth cavity as elongated tube, is not armed, of $36.3-38.5\mu m$ in length and $2.2\mu m$ in width. The length is 37% of that of the oesophagus (102-140 μm). The oesophagus tissue surrounds only the posterior end of the stoma. The oesophagus cylindrical slightly thickened at the posterior end. Cardium rounded. Hemizonid at the level of 25.5-33% of the oesophagus length. The neural ring is in the middle of the oesophagus.



Fig. 1. Black Sea Coast, habitat of P. anchilocaudatus

Spicules separated, strongly cuticularized, bent ventrally, length 1.2 of the cloacal diameter of the body. Gubernaculums unpaired of flag shape, with a pair of outgrowths directed to the end of the body. Immediately after the cloaca there is a pair of poorly visible sensills. A



Fig. 2. P. anchilocaudatus: A - Anterior region; B -

slight projection of the cuticle (Fig. 1 B) is observed below.

The tail H \approx 98µm. long, 4.2 times bigger than the cloacal diameter, clearly bent ventrally.

The tail end anchor shape, with 6-9 outgrowths 7.7-9.9 µm long spread as fingers.

Conclusion: The comparison of Colchis population of *P. anchilocautatus* with the materials published earlier [1,2] indicates that the males revealed by us are close in main parameters to the Vietnam population, especially in the body size and spicule length. The difference is in the character of the habitats.

Taking into account the given habitats- wet soils; further discovery of *P. anchilocaudatus* in similar habitats in different geographical points can be expected.

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ზოოლოგია - ნემატოლოგია

ახალი მონაცემები ნემატოდის *Pseudoaulolaimus* anchilocaudatus Imamura, 1931 (*Chromadorida: Aulolaimidae*) გავრცელების შესახებ

ი. ელიავა*, ნ. ბაღათურია**, ე. ყვავაძე§

* აკადემიის წევრი, ილიას სახელმწიფო უნფერსიტეტი, ზოოლოგიის ინსტიტუტი, თბილისი

** ილიას სახელმწიფო უნივერსიტეტი, ზოოლოგიის ინსტიტუტი, თბილისი

§ ენტომოლოგიის და ბიოკონტროლის კვლევითი ცენტრი, ილიას სახელმწიფო უნივერსიტეტი, თბილისი

ღაღგენილია Pseudoaulolaimus anchilocaudatus Imamura, 1931 (Chromadorida: Aulolaimidae) გავრცელების ახალი წერტილი — შავის ზღვის აღმოსავლეთ სანაპირო, კოლხეთის ეროვნული პარკი (საქართველო). ნაპოვნია 4 მამრი. მოცემულია ნემატოღის ხელახალი აღწერა, განაზომები ღა ნახატები.

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