

A NEW SPECIES OF THE GENUS *HEPATHINEMA* (RASHEED,1964, (NEMATODA:RHABDOCONIDAE) FROM FRESH WATER FISH *CHANNA PUNCTATUS*.

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ABSTRACT

A new species of nematode parasites *Hepatinema jadhavae* n.sp. was erected from fresh water fish *Channa punctatus* . It is differ from *H. kherai* (Gupta and Masoodi, 1990), in the number of and arrangement of caudal pillae .It is also differ from *H. dorabi* in the absence of oral teeth.

KEY WORDS: *Channa punctatus*, *Hepatinema jadhavae* n.sp., *Nematode Parasites*.

INTRODUCTION

The genus *Hepatinema* was erected by Rasheed 1964, with *H. karachiensis* as its genotype from *Scomberoides tala* from Karachi. The present specimens differ from *H. kheri* having 12 pairs of caudal papillae instead of 15 pairs, strongly developed caudal alae. Amphids poorly developed. Oesophagus anteriorly thick. Cuticle without any striations.

MATERIALS AND METHODS

The male and female nematodes described in this paper collected from the intestine of freshwater fish *Channa punctatus* obtained from the various dams & river streams etc. The nematodes were fixed in hot 70% alcohol. The worm were later preserved in fresh 70% alcohol to which 10% glycerine was added. The specimen were cleared in Lactophenol. The worms were mounted in glycerine .All drawings were made with the aid of camera lucida and all measurements are expressed in millimeters.

DESCRIPTION

The body is medium size, cylindrical ,covered by small digitiform papillae, tapering posteriorly. Mouth without lips. cephalic papillae not seen properly. Amphids poorly developed. Vestibule elongated lacking teeth. Oesophagus anteriorly thick. Cuticle without any striations.

Male

The body is 11.52 to 12.30 mm long & 0.26 to 0.28 mm wide. Head diameter 0.04mm.Vestibule 0.15mm long Length of oesophagus is about 4.46 mm long, Spicule, dissimilar, unequal non alate with pointed tips. Left spicule is 0.085 mm long right spicule is short,boat shaped 0.04 mm long .Caudal Papillae 22 pairs, 12 pairs precanal and 10 pairs postanal. Caudal alae well developed.Tail ,elongated, curved latterly 0.12mm long .Gubernaculum absent.

Female

The body is 10.85 mm long and 0.41 mm wide. Head diameter 0.07 mm long.Vestibule 0.1 mm long. Anterior muscular oesophagus 0.36 mm long, posterior glandular oesophagus 3.20 mm long.Entire oesophagus is 3.56 mm. Long Valva postequatorial 2.10 mm from posterior end. Tail elongated denated tip 0.257 mm long. Eggs tick oval with polar plugs.

Host : *Channa punctatus* (Ham.)
Habitat : Intestine
Locality : Sailu, (M.S.) India.

DISCUSSION

The genus *Hepatinema* was erected by Rasheed 1964, with *H. karachiensis* as its genotype from *Scomberoides tala* from Karachi. The present specimens differ from *H. kheri* having 12 pairs of caudal papillae instead of 15 pairs, strongly developed caudal alae. Amphids poorly developed. Oesophagus anteriorly thick. Cuticle without any striations. Accordingly the present specimens are considered as a new species, *Hepatinema jadhavae* n.sp. named in honor of Late Prof. Dr. B.V. Jadhav, for his outstanding contributions to Helminthology.

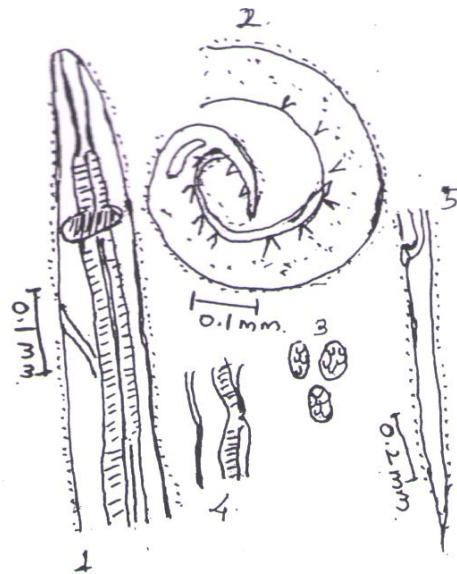


Plate I. Figs.1-5 *Hepatinema jadhave n.sp* 1.Anterior region Male
2.Posterior region Male, lateral view.3.Eggs.4.Valva.5. Female tail lateral view

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