

ON A NEW SPECIES OF *LOPADORHYNCHUS* (PELAGIC POLYCHAETA) FROM THE INDIAN OCEAN

ABSTRACT

The study on the systematics and ecology of the pelagic polychaetes from the IIOE collections is in progress. A new species belonging to the genus *Lopadorhynchus* is recorded and described. This new species is found to be fairly common in the Indian Ocean.

During the study on the systematics and zoogeography of pelagic polychaetes from the International Collections, a new species of *Lopadorhynchus* was found in the Indian Ocean. The new species has been named as *Lopadorhynchus indica* (sp. nov.).

Altogether 323 specimens of the species have been collected from 94 stations in the Indian Ocean. Holotype is from station 41 of "Pioneer" (cruise OPR 442) in 05°42'S and 97°46'E and this measures a length of 2.1 mm for 13 segments and a width of 0.9mm including parapodia and bristles.

Prostomium semicircular anteriorly carrying two pairs of antennae; anterior pair slightly longer; posterior pair closely applied to mouth; two pairs of tentacular cirri of equal length; third pair of tentacular cirri knob-like, arising from base of second pair (Fig. 1.); eyes wanting; first two pairs of parapodia modified, shorter and with lanceolate cirri and 4 to 6 simple acicular chaetae; posterior segments with long parapodia, directed obliquely downwards; posterior parapodia bear lanceolate ventral cirri; dorsal

cirri, more ovate; parapodial lobe pointed, with long lamella (Fig. 2); presence of one to three simple acicular chaetae embedded among the fan of compound chaetae in 3rd to 6th parapodia is the distinguishing character of this new species; rest of the parapodia possess only compound capillary chaetae, the pointed shafts of which extend well beyond the outer edge of parapodial lamella.

It is clear from the original figures and description of *Lopadorhynchus henseni* that it is devoid of simple chaetae in the mid-body region, (Reibisch, 1895) This species is similar in every morphological character to the present new species except for the presence of simple chaetae in the mid body region. The number of simple chaetae in the present specimen varies from one to three and they occur invariably in the third pair of parapodia and sometimes in the 4th, 5th and 6th too. The variation in number of simple chaetae appears to be without taxonomic importance but the presence or absence of these bristles does have. It is pointed out by Tebble (1960) that the simple chaetae may disappear with

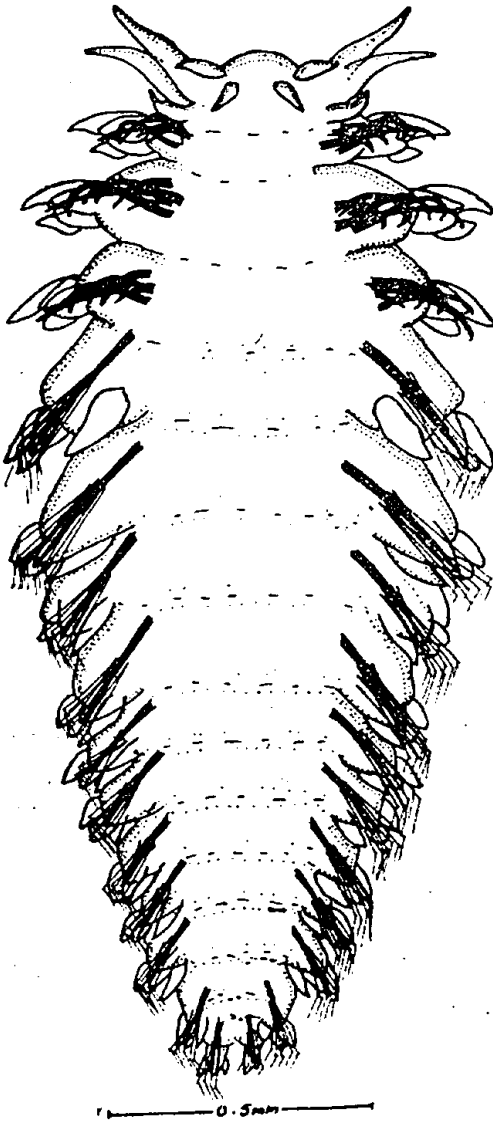


Fig. 1 *Lopadorhynchus indica* - ventral view

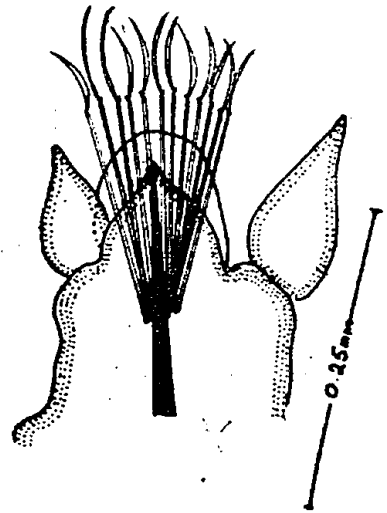


Fig. 2 *Lopadorhynchus indica* - 4th parapodium

age and approaching sexual maturity. However, in the present case most of the specimens are sexually mature and still possess simple chaetae.

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