Suborder II. PNEUMONOPHORA.

Respiratory-trees present. Radial ambulacral vessels present or not.

Family, MOLPADIDÆ.

Genus Ankyroderma, Danielssen and Koren, 1879 and 1882.

Ankyroderma danielsseni, n. sp. (Pl. II. fig. 6).

Body fusiform, anteriorly truncated, posteriorly diminishing into a narrow caudal Tentacles fifteen (?), retracted, very short, each with a pair of minute processes near the rounded end. Anal processes or teeth absent. Calcareous ring almost resembling that in Trochostoma violaceum. Polian vesicle single. Madreporic canal single, terminating within a tubercle, attached to the body-wall in the medio-dorsal line. Fifteen long slender tentacular vesicles. The longitudinal muscular bands double, and without retractors. Respiratory-trees two, the left considerably longer than the right one, and anteriorly reaching the gullet and calcareous ring and attached to them. fascicles of the reproductive organs very thin, and consisting of a few elongate slightly branched sacs. Integument thin and rough, with several kinds of deposits—numerous smaller and larger, rounded or oval bodies of a reddish-brown colour, aggregated into closely lying groups; numerous long fusiform straight or slightly curved rods with the centre slightly enlarged and perforated, but without any central process; smaller, more scattered, irregular perforated plates with two or more shorter arms, and with a long central process directed straight outwards from the body; and spoon-like rods, with one end enlarged and perforated, collected into groups of six to seven in each, and overlapping one another with the enlarged ends, each group presenting thus the aspect of a star. From the centre of these stars, which are very scattered, a long central anchor-shaped rod rises, directed straight outwards and supported by a round perforated disk-like base. Length of the individual about 75 mm. Colour in alcohol greyish-violet with numerous reddish-brown spots; the foremost and hindmost portions of the body whitish-grey.

Habitat.—Station 310, January 10, 1876; lat. 51° 27′ 30″ S., long. 74° 3′ W.; depth, 400 fathoms; bottom temperature, 46.5; blue mud; a single individual.

This species, doubtless very nearly related to the three previously known forms of the same genus, viz., Ankyroderma jeffreysii and Ankyroderma affine, Danielssen and Koren, and Ankyroderma roretzii, v. Marenzeller, differs from them particularly in the possession of the numerous very long smooth fusiform bodies as well as in the shape of the central anchor-rod of the star-like deposits, which is supported by a disk-like perforated base.