sagittal ones in my Leuconia dura proves the constancy in the presence of the osculum, and thus justifies the establishment of a new species.

Colour.—Yellowish and greyish.

Habitat.—Station 36, April 23, 1873, off Bermudas; depth, 32 fathoms; mud. Station 186, September 8, 1874; lat. 10° 30′ S., long. 142°-18′ E.; Torres Strait, Australia; depth, 8 fathoms; coral sand.

## Pericharax, n. gen.

Leuconidæ with distinct subdermal cavities.

Pericharax carteri, n. sp. (Pl. II. fig. 5; Pl. VII. fig. 8).

The species is represented in the collection by a whole specimen and a fragment of another. The first is shown on Pl. II. fig. 5. It reaches 40 mm. in length, with a maximum diameter of 22 mm., the thickness of the walls being 5 mm., in the second specimen not exceeding 3 mm. The outer surface is smooth, the inner roughened by the apical rays of the gastric quadriradiate spicules. From *Pericharax cucumis* (*Leucandra cucumis*, H.—Kalkschwämme, ii. p. 205) the species can be distinguished by the following characters:—1, the skeleton of the parenchyma and of the subdermal cavities consists not of quadriradiate but of triradiate spicules; 2, the subdermal spicules are not larger than those of the parenchyma, but equal to some of these and smaller as compared with others.

The species itself is to be subdivided into two varieties; the gastric spicules and those of the parenchyma are of the same size and form in both specimens, but in one the skeleton of the subdermal cavities consists of regular triradiate spicules, not differing from the smaller spicules of the parenchyma, in the other of sagittal and irregular triradiate spicules, although of the size of the smaller triradiate spicules of the parenchyma, yet of a different form. The first variety may be named "homoraphis," the second "heteroraphis." In both these varieties the "gastric ostia" are very large, their diameter reaching 0.75 mm. The exhalent canals are also of considerable dimensions, their surface almost in all their length being armed with quadriradiate spicules.

One specimen, var. homoraphis, proved to be sterile, in the other I found ova of an extraordinary size, their diameter being 0.3 mm. on an average.

Skeleton.—The skeleton consists of regular gastric quadriradiate spicules, following the course of the invaginations of the inner cavity; of larger and smaller regular triradiate spicules of the parenchyma, and of dermal triradiate spicules, as well as of those of the subdermal cavities, regular in one variety, sagittal and irregular in the other.

<sup>1</sup> I dedicate this species to Mr. H. J. Carter, F.R.S., as a token of my deep respect for his scientific labours.