

*The Mantle* is thin and membranous, and the musculature is extremely feeble; with the exception of a few bands radiating from the apertures, there are almost no muscular fibres.

*The Branchial Sac* is strong, and not folded. The internal longitudinal bars are in the form of broad ribbon-like bands. The transverse vessels are slight and irregular; narrow horizontal membranes are usually present. The infundibula are large, and are usually square or pentagonal at the base. The fine interstigmatic vessels are narrow and much coiled, the spiral having from ten to thirty turns (generally fifteen to twenty). The radiating vessels are slight, a few short intermediate ones are frequently present.

*The Dorsal Lamina* is a plain broad membrane.

*The Tentacles* are branched and delicate; they are numerous, about twelve large and twelve smaller, and three orders of simple and very minute ones alternate regularly.

*The Dorsal Tubercle* is simple, having an elongated oval cavity ending in a quadrangular aperture anteriorly. It is placed in a shallow triangular peritubercular area.

This is the fourth species of *Eugyra* known to science, the three others being *Eugyra glutinans*, Møller (= *Eugyra arenosa*, Alder), *Eugyra pilularis*, Verrill, and *Eugyra globosa*, Hancock. The discovery, so far south as Kerguelen Island, of a member of this genus, which has been hitherto found only in the northern hemisphere, is very interesting.

This species, though having all the characters of *Eugyra* well marked, differs from the three previously known species in many particulars. Perhaps the most notable difference is in the external appearance, as *Eugyra kerguelenensis* has a delicate transparent test with no adhering sand, and has the atrial aperture permanently projecting on a short cylindrical siphon (Pl. VI. figs. 4 and 5). The specimen represented in figure 5 differs considerably from what is probably the normal condition of the species as shown in figure 4. In internal structure, however, they are identical, and undoubtedly belong to the same species. Probably figure 5 is a somewhat abnormal specimen.

The mantle is remarkably thin, and, with the exception of the bands radiating from the apertures, there are almost no muscles, only a few delicate fibres being placed at considerable distances.

The shallow infundibula in the branchial sac (Pl. VI. fig. 8) are large and have a great number of coils in the spiral; up to thirty have been found, but the usual number is between fifteen and twenty (Pl. VI. fig. 8). Besides the delicate radiating vessels which extend from the angles into the centre of the infundibulum, there are usually present some intermediate ones of shorter extent (Pl. VI. fig. 8, *r.v'*).

The tentacles are delicate but very numerous. There are five distinct sizes, the two larger of which are always compound, and the three smaller usually simple (Pl. VI. fig. 6). If we number them from A to E, according to their size, the arrangement will be found to be as follows:—A, E, D, E, C, E, D, E, B, E, D, E, C, E, D, E, A (Pl. VI.