

reason why we should not regard the animal as conforming to the common plan of the Actiniæ. The result would therefore be that the animal has altogether two cycles or twelve pairs of septa. All the pairs of septa are quite uniform, all reach the stomach, and all bear reproductive organs. In the case before us, the latter are mature testes, closely filled with separate follicles of spermatozoa. As usual the tails of the spermatozoa lie inwards, the heads outwards, the former converge at the same time towards a point in the surface where the follicle projects into the epithelium, and where it probably bursts later on, in order to empty out its contents.

*Antholoba*, Hertwig.

*Metridium*, Milne-Edwards, *pro parte*. Hist. des Corall., tom. i. p. 252.

Paractidæ with innumerable small tentacles, which lie on a swollen thickening of the margin of the disk; margin of the disk lobed as in *Metridium*.

After Oken had erected the genus *Metridium* for the beautiful *Actinia Plumosa* s. *dianthus* (Lehrbuch d. Naturgeschichte, Th. III. Abth. 1, p. 349, 1815), Milne-Edwards included in it all the forms which agreed with the typical representatives in the peculiar arrangement of the tentacles and in the beautiful wave-like form of the lobes which border the oral disk. The probability that animals which resemble each other externally may differ essentially in their internal organisation was quite overlooked.

This is, in fact, the case, as I have proved from my own observation. It is quite correct to place *Metridium dianthus* among the Sagartidæ, since, in it as in them, only the six pairs of principal septa reach the œsophagus, and, according to Gosse (*Actinologia Britannica*, p. 20), are also furnished with acontia. *Metridium dianthus* differs in both these points from an *Actinia*, which was first observed by Dana, and was erroneously added to the genus *Metridium* by Milne-Edwards (*Histoire des Coralliaires*, tom. i. p. 253) and Verrill (*Trans. Connect. Acad.*, vol. i. p. 479). In this *Actinia* the acontia are wanting, and the septa for the most part perfect as in the Paractidæ. Other conditions, such as the presence of a mesodermal sphincter, also show that this *Actinia* is a true Paractid. I therefore propose to form the new genus *Antholoba* for these forms which externally recall *Metridium*, but which, on the other hand, have no acontia, and are furnished with numerous perfect septa as well as with a mesodermal sphincter.

*Antholoba reticulata* (Pl. I. fig. 9; Pl. X. figs. 11, 12; Pl. XIII. fig. 9).

*Actinia reticulata*, Couthouy, in Dana, *Explor. Exped. Zooph.*, p. 144, pl. iv. fig. 31, 1846 (*Synopsis*, p. 10).

*Metridium reticulatum*, Milne-Edwards, *Hist. des Corall.*, tom. i. p. 255, 1857.

*Actinoloba reticulata*, Gosse, *Actinologia Britannica*, p. 24, 1860.

*Metridium reticulatum*, Verrill, *Trans. Connecticut Acad.*, vol. i. p. 479, 1871.

Margin of the disk five-lobed, with several thousand small tentacles, the twelve tentacles of the first and second cycles larger than the others, and placed towards the centre at a