

The tentacles are small, broad at the base, and pointed towards the end; they are placed in three rows, as they probably alternate in the first and second row, whilst the third row contains double the number. Their longitudinal muscles are ectodermal and only slightly pleated.

The œsophagus and the two œsophageal grooves are of a deep brown-violet colour even in the spirit material; this is caused by fine pigment granules deposited in the ectodermal epithelium.

There are altogether four cycles of septa. Only the septa of the first order are perfect, all the others are imperfect, but, on the other hand, the latter only bear (male) reproductive organs, whilst the former are sterile.

The muscles of the septa are very strong, as Jourdan already observed in *Phellia elongata*; in the first three cycles especially the longitudinal muscles form mushroom-shaped projections in the middle of each septum, which show the delicate, dendritic figures of a repeatedly folded muscular lamella in transverse section. The transverse muscular layer is also thickly pleated, so that it is doubly remarkable that I could find no trace of a parietobasilar muscle even in sections.

All the septa seem to bear acontia; these are extremely fine, and lie coiled in the lowest section of the gastric space. I was able to make them out distinctly in transverse section, but, on the other hand, I could not find any openings in the wall.

The directive septa were fused by the free margins, nearly their entire length below the œsophagus (Pl. VIII. fig. 2). I only examined one pair of them, as I wished to destroy the single specimen taken by the Challenger as little as possible. The longitudinal muscles of one septum pass continuously into the longitudinal muscles of the other, whilst a mesenteric filament is wanting at the point of junction. The filament is confined to the short space lying between the lower margin of the œsophagus and the beginning of the fusion, where it is coiled in numerous curves. I shall leave it an open question whether it be correct to speak of a fusion of the free margins, as I have done for the sake of simplicity, or whether the union of the two septa does not rather represent a more primitive condition. I wish, however, to draw attention to one fact which seems to favour the latter view, and which I have formerly noticed repeatedly, viz., that in the young Actiniæ we frequently find the newly-formed septa of a pair connected together in the same manner as in the principal septa of *Phellia* and the secondary septa of *Tealia bunodiformis*, figured by me in Plate VIII. From this it would appear that separation takes place later on, as at a later period all the septa have free margins set with mesenteric filaments.

#### *Bunodes*, Gosse.

Sagartidæ (?) with numerous papillæ on the wall, which are placed in regular longitudinal rows, corresponding to the intraseptal spaces.