

suffered from having been pressed closely one against the other in the same bottle, so that they are flattened, and the relief of the body surface rendered indistinct. The dimensions given above and the following description of the form of the body are therefore merely of hypothetical value; the unfavourable state of preservation also explains why I have omitted to give exact numbers in describing the different parts of the body.

The height of the body in the living animal seems to have been small, its breadth essentially greater in the region of the oral disk than at the base, so that the whole form of the body may be termed "dish-shaped." It is divided into an upper broader and a lower narrower section by a deep circular constriction. Nearly one hundred tentacles, probably of astonishing length, hang down from the margin of the oral disk. In the smallest specimen there was still one tentacle which extended into a thin filament, 8 cm. long. I grant that this measurement may have resulted from the tentacle having been forcibly stretched, but considering that the diameter of the animal itself only amounts to 1.0 cm., we may safely assume that the length of the tentacles exceeds the former several times. This is also perhaps the reason why the tentacles are nearly all torn away. Whether the tentacles of each different order are of equal size or not, can only be determined by examination of other specimens.

The surface of the wall (fig. 1) is marked by about one hundred longitudinal furrows, which lie at equal distances from one another, correspond to the origins of the septa, and pass as radial streaks on to the pedal disk. Besides these longitudinal furrows, horizontal furrows run in the upper fourth close under the corona of tentacles, parallel to the margin of the oral disk; the swellings between the circular furrows are broadest above, whilst they become narrower and flatter below. The swellings and furrows are more pronounced on the endodermal side than on the ectodermal; at the same time we see in longitudinal section (fig. 6), that the internal furrows correspond to the external swellings and *vice versa*, so that the wall is pleated transversely. Its substance is, moreover, partially thickened, and it is on account of these partial thickenings that the swellings project more towards the inside than towards the outside.

The thickening and pleating of the wall are caused by the mesodermal circular muscle, whose bundles of fibrillæ are arranged close under the endoderm in layers, which run parallel to the surface and follow all its pleatings. There are from nine to ten such layers inside the uppermost and broadest swelling (fig. 6, α); they gradually decrease in number, in the middle (fig. 6, β) there are only about four, and later (fig. 6, γ) only two, till finally the circular muscle extends a little way in the now flat part of the wall as a single layer of small bundles which continue to become more sparse (fig. 6, δ). The separate muscular fibrillæ are remarkably thick, whilst the bundles formed by them are small, and as usual compressed in the direction of the longitudinal axis of the animal. The smallest bundles lie immediately below the epithelium, from which they appear to be formed, as shown in figs. 7, α , β .