length. The Ascidiozooids are inclined at various angles to the surface of the colony, and they are not arranged in regular systems.

The Test is hard and cartilaginous, and is quite opaque. It is of a dull whitish colour, with a slight tinge of grey internally. The matrix of the test is structureless or very slightly fibrillated in some places. It contains numerous test cells of various shapes, and a few bladder cells.

The Mantle is moderately strong. The chief muscle bands run longitudinally.

The Branchial Sac is of small size, and is very narrow. The stigmata are small and inconspicuous.

The Alimentary Canal is relatively small, and forms a narrow loop.

The Post-Abdomen is large; it extends for a considerable distance behind the intestinal loop.

Locality.—Station 162, April 2, 1874; lat. 39° 10′ 30″ S., long. 146° 37′ 0″ W.; depth, 38 fathoms; bottom, sand and shells.

Two large colonies of this species were obtained in Bass' Strait from a depth of 38 to 40 fathoms.[1] They are elongated dirty-white masses with rounded ends, and having no external marks of importance (Pl. XXVI. fig. 11). Both specimens are attached by their lower ends to the insides of Lamellibranch shells.[2] The area of attachment is of moderate size, 2 to 3 cm. across. From the base the colony increases somewhat in size as it is traced upwards, and it becomes slightly flattened. Above the middle it tapers irregularly to the blunted apex.

The dimensions of the second colony are:—length 5·5 cm., breadth near the middle 4·5 cm., thickness near the middle 2 cm. In this specimen the thickness decreases regularly from the base of attachment to the apex. The lower end is partially incrusted with shell fragments, Polyzoa, and other foreign bodies.

The surface is marked in some places with deep grooves and depressions (Pl. XXVI. fig. 11), which may be partly the result of irregular contraction, otherwise it is fairly smooth, but it is not glistening. The colour is dull white on the projecting parts, becoming of a greyish cream-colour in the depressions. No common cloacal apertures and no systems of Ascidiozooids are visible on any part of the colony.

The Ascidiozooids are very narrow, but of considerable length. On cutting open the colony their filiform bodies may be seen penetrating the test in all directions. They are of an opaque dirty-white colour, sometimes with a yellowish tinge, and are very numerous. They probably help in giving the colony its whiteness and opacity, since the test around them is slightly grey in hue, and is not so opaque as the surface of the colony.

The test is very solid and tough, and the outer layer is rather stronger than

[1] That is the depth at the Station, but the parchment label in the bottle is marked 85 fathoms.

[2] A species of *Pectunculus* (?).