brown marked with dark yellow patches which indicate the Ascidiozooids. The surface is uneven but smooth.

The length is 2 cm., the greatest breadth is 1.3 cm., and the thickness is about 7 mm. *The Ascidiozooids* are large. They are elongated opaque dull yellow bodies, about 1.5 cm. in extreme length and 1.5 mm. in greatest breadth. They are not divided externally into regions, and are so opaque that nothing of their anatomy can be made out from the exterior.

The Test is cartilaginous and firm, but not tough. It is rather opaque and of a dull greyish-brown colour. The homogeneous matrix is crowded with numerous small cells mostly of rounded forms. No large bladder cells are present.

The Mantle is moderately thick and very opaque. The muscle bands run chiefly in a longitudinal direction and are numerous and of considerable size.

The Branchial Sac is very thick and opaque. The transverse vessels and the fine longitudinal vessels are very wide, the result being that the stigmata are greatly reduced; they are in the form of small rounded or ovate apertures placed far apart.

Localities.—(a) Royal Sound, Kerguelen Island, 28 fathoms (two colonies). (b) Kerguelen Island, 10 to 100 fathoms (one colony). (c) Kerguelen Island, 10 to 60 fathoms (one large colony). (d) Zebu, Philippine Islands, the reefs (one colony).

The colour of this species is a characteristic, which serves to distinguish it at a glance from any other Compound Ascidian I have examined. It is a dark greyish-brown or smoke colour, with rounded or elongated dull yellow patches here and there. The specimen from the reefs at Zebu, Philippine Islands, is rather darker, and has the yellow patches less apparent than in the specimens from Kerguelen Island. This difference is due merely to a slightly greater development of pigment in the test, which is thus rendered more opaque. The specimen labelled "Kerguelen, 10 to 100 fathoms," is decidedly greyer than the others, and shows less of a brown tint. The large colony from Kerguelen, 10 to 60 fathoms, has the upper part of a dark smoky-brown colour, while the basal part becomes gradually lighter till it is of a dull grey.

In shape the colony is an ovate or elongated mass attached by the narrower end either directly or by means of a short thick stolon. In the larger colony from Royal Sound, Kerguelen,<sup>1</sup> there are three more or less ovate masses connected by prolongations of their lower ends forming a stolon (Pl. XXVI. fig. 8). This stolon is not so brown as the upper part of the colony. The specimen from Kerguelen, 10 to 100 fathoms, consists of three masses joined together by their lower ends without the intervention of any distinct stolon. The remaining specimen from Royal Sound, Kerguelen, and the one from Zebu, are each formed of a single mass attached by the lower end. The Zebu specimen has a rather more elongated form than any of the others. The large colony

<sup>&</sup>lt;sup>1</sup> There is a small colony of Amaroucium variabile attached to one of the masses of this specimen.