

specimen, proved to be full of spermospores. To a more detailed description of these latter I shall return later, and will now merely call attention to this peculiarity of the skeletal fibres of my *Verongia hirsuta*, that they almost all proved to be covered with small plates of polygonal outline as represented on Pl. X. fig. 3; I have been unable to make out their origin. Occasionally, and particularly on young fibres, I found no such plates, but small drops of yellow substance at a comparatively great distance from one another. I can but state, and this with the greatest certainty, that these plates are not modified spongoblasts. I regard them as the last product of the spongoblasts, ready to lose their spongoblastic properties in order to become common stellated cells.

Colour.—Pale rose-brownish, skeletal fibres dark brown.

Habitat.—Off Bermudas, June 1873; reefs.

Verongia tenuissima, Hyatt (Pl. X. figs. 4–7).

Verongia tenuissima, Hyatt, Revision, &c., vol. i. p. 403.

Hyatt's work upon the Keratosa is so very poor in explanatory illustrations that although the short diagnosis he gives to his *Verongia tenuissima* is entirely applicable to the form I am going to describe, I do not feel quite certain whether both these forms are identical, but if not, at any rate they are very closely allied to one another, and to be probably distinguished merely as different varieties of the same species.

The form is represented by a single specimen. It is of fistular shape, the central cavity being funnel-like, with a circular upper extension of 22 mm., and the walls 20 mm. thick in the basal and middle parts of the body, growing rather thinner towards its upper end. The inner surface, in contrast to that of *Verongia hirsuta*, is smooth but undulating, while the outer surface is hilly; the surface both of hillocks and depressions being shagreen-like, and studded with projecting points of the skeletal fibres. These latter—in thorough harmony with Hyatt's statement on the point—are far thinner and more elastic than those of *Verongia fistularis*, yet at least one and a half times as thick as the fibres of *Aplysina aërophoba*; their average diameter is 0.2 mm., and the meshes formed by them recall vividly in size and shape those of *Aplysina*. The internal organisation, both anatomical and histological, agrees so closely with that of *Aplysina aërophoba* that having illustrated it by a small drawing (Pl. X. fig. 7), I can refer the reader to F. E. Schulze's paper on the Aplysinidæ. I must add, however, that I was not able to discern the bundles of fibrils which he describes¹ and represents on pl. xxii. fig. 14. of his paper. But I was fortunate enough to discover the male generative product, the spermospores; and this both in *Verongia hirsuta* and *Verongia tenuissima*, in this latter form together with ova, scantily scattered in the peripheral parts of the body, while the spermospores have been found everywhere and in abundance. I call them

¹ *Zeitschr. f. wiss. Zool.*, Bd. xxx. p. 397.