uniform distribution. These occur at intervals of 2 to 3 mm ., and are not otherwise remarkable, except as local condensations of the network of beams. Both on the beams of the wide meshed part of the framework, and on the outer surface of the knots, small simple hexacts occur fused together in variable numbers. All the beans of the framework and the small fused hexacts are more or less richly beset with small tubercles.

From what has been said there can be no doubt that the specimens in question belong to the species Fieldingia lagettoides, Sav. Kent, which Saville Kent found on a specimen of Lophohelia at Cezimbra, Portugal, and which he has figured and described. But it is to be regretted that in many parts of the present specimens the remarkable blistered rind, which is of several layers, is insufficiently preserved for accurate examination. From the fragments, howerer, it may be seen that we have to deal with lattice-like lamellæ, which exhibit the crossed tangential rays of numerous pentacts, in which the fifth ray projects inwards. Between these pentact rays, which are remarkable for their distinct axial canals, there extends a more or less well-developed, in part very narrow-meshed, network of connecting beams without central canals, and provided with rounded meshes. This is similar to what is found in the basal plate of many fixed Hexactinellida, and in the regions of contact between these and solid foreign bodies. Since the free outer surface is covered with sand and other extrinsic elements, the supposition is confirmed that we have here to deal with a dermal skeleton altered by an admixture of foreign bodies.

Among isolated spicules several apparently typical forms occur. It is not possible to determine with certainty their normal arrangement or stratification. In addition to various strong uncinates (Pl. XCVII. fig. 9), simple straight smooth diacts frequently occur. These exhibit a central swelling or four cruciately disposed knobs, and their two extremities form a point which arises by a process of pitting (Pl. XCVII fig. 8). In addition to simple smooth and delicate hexacts (Pl. XCVII. fig. 7), oxyhexasters occur, which have several or all of their rays forked. The principal ray usually remains very short (Pl. XCVII. fig. 6), and sometimes, indeed, it is so much abbreviated that the terminal rays appear to rise almost directly from the node of intersection, and in this way a simple star with ten or more rays results (Pl. XCVII. fig. 3). Discohexasters with two or more fine long terminals on each of the short principal rays, and with marginally toothed somewhat convex terminal discs, are tolerably frequent (PI. XCVII. fig. 4).

The scopulæ, which probably belong to the dermal skeleton, exhibit four strong almost parallel teeth, which are beset with barbs, and are slightly knobbed, or terminate without any swelling. The teeth spring from the conically thickened extremity of the rough and pointed shaft. Less frequently the teeth diverge in the manner represented on Pl. XCVII. fig. 5.

