

in height. Its coralites, unlike those of the Liassic species, are very tall, extending in some specimens from the base to the upper surface. Its calices, however, are considerably smaller, and of more equal size, averaging about two lines across. Their walls, which are thick and well-defined, stand up abruptly, with mural erectness, over the central depression, which varies from a line to a line and a-half in depth. They are divided by from twenty to twenty-four septa, of which, however, more than the one-half are rudimentary, leaving but from four to eight of their number to meet in the centre of the visceral cavity. In the thickness of its walls and the character of its septa, this Helmsdale *Isastrea* greatly resembles the *Isastrea oblonga* of the superior Oolite, — a species which has been found hitherto only at Tilsbury, Wiltshire. It also resembles, however, though in a less degree, *Isastrea Richardsoni*, — a coral of the Lower Oolite; but it is possibly a new species. I have found in the same beds, though much more rarely, what seemed to be a different species of *Isastrea*, though closely allied to the one described. The corallum, massive like that of the other, is always greatly smaller. The calices, however, are considerably larger, and rather thinner in the walls, which do not stand up so abruptly over the central hollows; the septa vary from about twenty to twenty-four in number; and, where they meet in the centre, they rise in many of the calices into a protuberant knob, like the termination of a true columella, which, however, like all the other species of the extinct genus *Isastrea*, it wants. A *Thamnastrea* is also found in the same beds, but always hitherto in a state of bad keeping. Unlike any of the Oolitic *Thamnastrea* figured by Messrs. Milne-Edwards and Haime, the corallum forms a mere incrustation on rocks and stones of older deposits than the Oolite, and is in some specimens less than half a line in thickness; the calices are small and shallow, and rather thickly set. The circular elevation,