2. Plesiastræa indurata, Verrill.

Plesiastraa indurata, Verrill, Proc. Essex Inst., vol. v., part 3, p. 35, pl. ii. fig. 7.

A single fine specimen is referable to this species. It is close to *Plesiastræa* coronata, but differs in its larger and deeper cells and its more numerous septa. Towards the outer part of the corallum the cells are very obliquely placed, as in *Plesiastræa coronata*.

Locality.—Kandavu, Fiji.

Genus 23. Phymastræa, Milne-Edwards and Haime.

Phymastræa, Milne-Edwards and Haime, Cor., ii. p. 499. ,, Duncan, Rev. Madrep., p. 106.

Phymastræa aspera, n. sp. (Pl. IV. figs. 1–1b).

Corallum massive, heavy, irregularly convex. Calicles rather large, very unequal and deep, polygonal, circular, oval or elongated, greatest width from about 9 to 11 mm., many calicles less, about 4 to 5 mm. deep; furrows between the calicles well marked, very narrow, with deep spaces between the connecting portions occupied by small tubes —apparently worm tubes—which preserve the intercalicinal spaces and keep them open during the growth of the colony; costæ unequal, denticulate, those of opposite cups often coalescing. Septa not perforated, of five cycles, the last being very rudimentary, the fourth being small; those of the three first cycles are subequal, large, and rather thick, much exsert, and roughly, unequally, and bluntly toothed; the innermost teeth are very distinct, large, long, and paliform, not divided, surrounding a distinct deep and narrow depression, at the bottom of which is a small, subtrabeculate or papillose columella which is almost absent in a transverse section. Texture of the corallum very dense and hard.

This species is represented by a single specimen. At the outer part, the cups become rather shallow and approach very closely to the form of those of *Phymastrwa* valenciennesi. It is, however, distinguished from *Phymastrwa valenciennesi* by its convex mode of growth, by its more distinct and prominent calicles which are also quite deep, by the much greater development of the septa, which are more exsert, numerous, and closely placed, not perforated, with non-bifurcated and large paliform teeth, and by the slight development of columella. From *Phymastrwa profundior* it is distinguished by the large size and irregular growth of the calicles, and by the numerous septal orders, the septa being quite close, exsert and thickened, furnished with a very distinct, large, paliform lobe.

Locality.—Banda.