series in the more central parts of the colony are found to be united. A careful examination shews, however, that this union is altogether a secondary process, arising not with the original development of the series, but later on, when, by their increase in size, their adjoining edges have been brought into contact at many points and have then coalesced, as it were, for want of space. This process of union can be directly traced in large specimens; and, in these, ample confirmation will be found in the presence of the larger or smaller openings of variable shape which have been left in many places where complete union has not yet taken place between neighbouring series. Towards the central parts of these large specimens, where the union due to this secondary process is most complete, the resulting ridges have all the superficial characters of the normally developed ridges of Symphyllia, with the exception that their course is often interrupted by the occurrence of the variable-sized apertures, which in some cases will be found to be extremely small or even on the point of being obliterated. The peripheral portions of all such colonies, moreover, shew clearly the normal Mussa growth.

The characters which separate *Isophyllia*, are discussed under that genus.

Two species of Symphyllia are in the collection.

1. Symphyllia sinuosa (Quoy and Gaimard).

Mxandrina sinuosa, Quoy and Gaimard, Voy. de l'Astrol., Zooph., p. 227, pl. xviii. figs. 4, 5. Symphyllia sinuosa, Milne-Edwards and Haime, Ann. d. Sci. Nat., ser. 3, vol. x., pl. viii. fig. 7.

Two small fragments were collected which seem referable to this species. The corallum is rather light and cellular, and the ridges are narrower and less rounded than is common in the species.

Locality.—Samboangan, Philippines.

2. Symphyllia acuta, n. sp. (Pl. II. figs. 5-5b).

Corallum with the upper surface more or less flattened; costæ on the lower surface narrow and thin, denticulate. Walls simple throughout, leaving no furrow above, never much thickened, being about 2.5 to 3 mm. wide in a transverse section of the corallum. Calicinal series very irregular, often nearly straight, generally sinuous; two or more centres often placed in the breadth of the same valley, but always opposite the point of development of new ridges where the valleys are very wide. Width of the valleys from 15 to 20 mm., depth from 10 to 15 mm. The ridges are very uniformly angular, broad below, and becoming quite narrow and acute above, never broad and rounded. Septa narrow, rather thin, numerous, and closely placed, from 12 to 15 per centimetre, generally alternately large and small, with unequally small and sharp teeth which are somewhat thicker and longer at the upper part, but never become large and stout. Columella

(ZOOL. CHALL. EXP.—PART XLVI.—1886.)