with the Spongia palmata referred to by Johnston; the latter seems to be a Homæodictya.

Locality.—Station 186, September 8, 1874; lat. 10° 30′ S., long. 142° 18′ E.; Torres Strait; depth, 8 fathoms; bottom, coral mud.

Habitat.—Indian and European Seas (Lamarck); seas of New Holland ("var. β ") (Lamarck); Torres Strait (Challenger)

Chalina pergamentacea, Ridley (Pl. V. fig. 2).

1881. Cladochalina armigera, var. pergamentacea, Ridley, Proc. Zool. Soc. Lond., January, 1881, p. 112, pl. x. fig. 4.

1884. Cladochalina pergamentacea, Ridley, Zool. Coll. H.M.S. "Alert," Brit. Mus., p. 398.

Represented in the collection by a single small, compressedly lobate specimen (Pl. V. fig. 2) bearing a row of circular oscula of various sizes all round the margin. The specimen is characterised by a very glabrous surface (very likely the surface of the type would have been glabrous had it not been dried). The fibre is not so stout as in the type, and the spicules are very much more abundant, and in the larger fibres arranged polyserially. As the external form of this sponge is very characteristic, and has never yet been figured, we give an illustration of it.

Locality.—Station 162, April 2, 1874; lat. 39° 10′ 30″ S., long. 146° 37′ 0″ E.; Bass Strait; bottom, sand and shells. One specimen.

Habitat.—Off the east coast of Brazil (Ridley, "Alert"); Torres Strait (Ridley, "Alert"); Bass Strait (Challenger).

Chalina rectangularis, Ridley and Dendy (Pl. V. fig. 3; Pl. XLVI. fig. 6).

1886. Chalina rectangularis, Ridley and Dendy, Ann. and Mag. Nat. Hist., ser. 5, vol. xviii. p. 331.

Sponge (Pl. V. fig. 3) sessile, encrusting, thin; throwing up here and there low, mound-like prominences, each of which normally bears a single osculum at the summit. The single specimen covers half a valve of a *Pecten*-shell; the crust is only slightly over 2 mm. in average thickness, except where the mound-like projections are situated; these rise to a height of about 4 mm. above the general surface. *Colour* in spirit pale yellow. *Texture* rather compact, but compressible and elastic; tough and fibrous. *Surface* subglabrous, microscopically granulated. *Dermal membrane* thin and transparent; firmly adherent to the underlying tissues. *Oscula* rather small; at the summits of projections. *Pores*, abundant, small, rounded openings through the dermal membrane; averaging only about 0.04 to 0.05 mm. in diameter, but varying rather in this respect.

Skeleton.—(a) Dermal; a very definite, polygonally-meshed reticulation of spiculo-

¹ British Sponges, p. 92.

² See below under the subgenus Homocodictya.