

Thynnus thunnina (C. V.), young (Pl. II. fig. D).

Dr. Lütken¹ has figured two very young Scombroid fishes which he considers to be the young of *Orcynus germo*. A similar specimen 17 mm. long was obtained in the surface-net on the passage from the Admiralty Islands to Japan; it is, however, sufficiently different to prove its specific distinctness from the specimens figured by Dr. Lütken. All three specimens have a more or less extended black patch on the spinous dorsal, a feature which is commonly preserved in adult specimens of the genus *Cybium*, but which is much more rare in mature examples of *Thynnus*. I have seen it in the type specimen of *Thynnus affinis* of Cantor, from Penang, which is in fact specifically identical with *Thynnus thunnina*. Although I provisionally identify our young example with this latter species, I consider it quite possible that all these young specimens may belong to *Cybium*. Perhaps the young of two genera so closely allied as *Thynnus* and *Cybium* are not readily distinguishable.

Our young specimen is uniformly silvery, with the exception of the black patch which covers the first part of the first dorsal fin. Its body and tail are covered with minute scales which become visible when the surface of the specimen is allowed to dry. The head is large, at least one-third as long as the entire fish, the caudal fin included. Eye large, about two-sevenths of the length of the head; jaws armed with the strong teeth which are characteristic of the genus. Angle of the præoperculum armed with two stronger spines which are followed by smaller ones along the lower margin. The anterior part of the spinous dorsal fin is lower than in the fishes figured by Lütken, the posterior portion very low and continuous with the soft dorsal fin; there are altogether seventeen spines of which one would belong to the soft portion. All the rays of the soft dorsal fin, nineteen in number, are connected by membrane, but the seven or eight last are already sufficiently differentiated to show that they would have been modified into finlets. The anal fin is very similar to the second dorsal, consisting of twenty-three rays, of which the two or three anterior would have been converted into spines; the other anterior rays are very closely set, whilst the eight last are further apart and evidently finlets. The pectoral and ventral fins do not show any peculiarity. Caudal fin excised, the middle rays being quite free and not covered with scaleless skin as in the adult *Thynnus*. The trunk of the tail is very thin and depressed, provided on each side with the characteristic pair of keels, which prevents me from referring this specimen to the genus *Cybium*.

¹ *Vidensk. Selsk. Skriv.*, xii, 1890, pl. iii. figs. 1, 2.