Dasychone nigro-maculata, (Baird) (Pl. LIII. fig. 5; Pl. XXXIA. figs. 4-6; Pl. XXXIXA. fig. 6).

Sabella nigro-maculata, Baird, Journ. Linn. Soc. Lond., viii. p. 159, pl. v. figs. 5, 6.

Habitat.—Found between tide-marks, St. Thomas, West Indies, March 23, 1873.

The body measures about 37 mm. in length, and the branchiæ extend to another 11 mm. The diameter at the widest part is 6 mm.

The body is somewhat rounded dorsally and flattened ventrally, and rather abruptly tapered toward the tail, on which the anus is distinctly dorsal in position. The ventral median line passes forward to the front of the abdominal region, cutting the second scute obliquely to the right of the middle line, and the right corner off the first scute, in its passage to the groove between the thoracic and abdominal regions to turn upward on the dorsal surface. It forms a pale groove on the latter surface, at first directed obliquely forward and inward, and is lost anteriorly in the median cephalic groove. A faint dorsal line exists all along the body, an indication probably of the raphe, but it forms no distinct groove.

The cephalic collar has its dorsal edges wide apart, and no accessory dorsal lamellæ exist as in the previous species. It continues without break to the ventral furrow, and terminates in a large auricular process on each side of the fissure.

The body and collar are blotched and speckled with dark brownish or purplish-brown spots. A well-marked brown spot occurs between the setigerous process and the uncinigerous row, both in the thoracic and abdominal regions; and there is also a less distinct speck at the inner termination of the hook-rows in the latter region. The darker pigment in the thoracic region, however, may obscure the speck.

The somewhat short branchiæ number on each side from forty-two to forty-three. In the preparations their colour is brownish, mottled here and there with pale patches. Externally a series of rather short appendages occur in pairs (Pl. XXXIXA. fig. 6), the first appearing in the sulcus at the base between the radioles, which are numerous and slender. The pinnæ become shorter toward the tip, but none of the branchiæ are so perfect as to show whether any bare filament does or does not exist at the extremity. All that can be said is that such is probable. The radioles present a segmented appearance, a depression with an encircling line occurring at regular intervals, a little beyond each pair of external processes. The segments are comparatively short. A little beyond the distal edge of the segment-junction are a pair of lateral (ocular) pigment-spots. The axial tissue of the radioles is fairly developed, so that they are firm.

The thoracic region consists of eight segments. The dorsal bristles (Pl. XXXIA. fig. 4) are somewhat similar to those of the previous species, but the tips are decidedly more spinulose both along the edges of the wings and on the dorsum (or opposite side). The