Nonionina boueana, var. armata, nov. (Pl. CXV. fig. 9, a.b.).

This is an interesting modification, closely resembling *Nonionina bóueana*, both as to contour and segmentation; but the portion of the peripheral edge extending from the inner margin of the final segment, about one-fourth round the shell, is armed with short truncated spines.

It is a local variety, somewhat abundant amongst the littoral sand of the east coast of Madagascar, and has not, so far as I know, been observed elsewhere.

Nonionina scapha, Fichtel and Moll, sp. (Pl. CIX. figs. 14, 15; and 16?).

Nautilus scapha, Fichtel and Moll, 1803, Test. Micr., p. 105, pl. xix. figs. d.-f. Nonionina sloani, d'Orbigny, 1839, Foram. Cuba, p. 68, pl. vi. fig. 18.

- " scapha, Parker and Jones, 1860, Ann. and Mag. Nat. Hist., ser. 3, vol. v. p. 102, No. 4.
- ,, boueana, Reuss, 1863, Bull. Acad. Roy. Belg., ser. 2, vol. xv. p. 156, pl. iii. figs. 47, 48.
- ,, scapha, Brady, 1865, Nat. Hist. Trans. Northd. and Durham, vol. i. p. 106, pl. xii. fig. 10, a.b.

Polystomella crispa, var. (Nonionina) scapha, Parker and Jones, 1865, Phil. Trans., vol. clv. p. 404, pl. xiv. figs. 37, 38, pl. xvii. figs. 55, 56.

The test of *Nonionina scapha* is of elongate oval contour, and more or less compressed, the peculiar form being due to the rapid increase in size of the later segments. This increase is not merely in the length of the chambers, but also in their thickness. The peripheral edge of the later portion of the test is obtuse or rounded, and the exposed septal face of the final segment varies from broadly oval to more or less cordate.

A thick variety of this species, with extremely broad, cordate, septal face, has been described by Dawson under the name *Nonionina labradorica* (Canad. Nat., 1860, vol. v. p. 192, woodcut, fig. 4).

Nonionina scapha is a very widely diffused Foraminifer. It is abundant in the Arctic Seas, reaching to the furthest points yet explored, namely, to lat. 83° 19′ N. in the western, and about lat. 80° N. in the eastern hemisphere. It is common on the western shores of Europe, and has been taken at twelve points in the North Atlantic, at various depths down to 1360 fathoms. It is equally common amongst the islands on the west coast of Patagonia, and occurs in other parts of the South Pacific down to 1375 fathoms. It is less frequent in the North Pacific (three Stations, 7 to 345 fathoms), and comparatively rare in the South Atlantic, the Mediterranean, and the Red Sea. I am not aware that it has been met with either in the Indian or the Southern Ocean.

Fossil specimens have been obtained from the Miocene of Calabria (Seguenza), and of the Vienna Basin (d'Orbigny); from the Pliocene of various parts of Italy, and of the