bear at their base, and at a considerable distance from the margin, a denticule which serves to distinguish the present Diatom from other species. The apices of the non-denticulated compartments are rounded, so that a central hyaline hexagonal area results, which is circumscribed by straight and concave sides. The margin of the valve is convex.

The specific name has been given in honour of Mr Shrubsole, who is well known for his researches on the fossil Diatoms of the Lower Eocene of the London basin.

## Asteromphalus, Ehrenb.1

This genus essentially consists, like that of Asterolampra, Ehrenb.,<sup>2</sup> of an areolated granulated disc, which bears a hyaline star and umbilical lines of division. It differs, however, from the latter in the single important circumstance that one of the radial areas is so much narrower than the others as to be almost obliterated. The umbilical lines and the form of the granulated segments constitute the principal distinctive characteristics between the specific types. The genus, which was established by Ehrenberg, has been defined as follows:—"Frustules simple, disciform; disc as in Asterolampra, but with two of the punctated compartments approximate, and the interposed ray narrower than the others." <sup>8</sup>

Marine Diatoms belonging to this group are by no means rare, but the transparency of the valves is such that they are often not perceived in Canada Balsam preparations. Although the genus Asteromphalus is richer in species than that of Asterolampra, the following new forms belonging to the former have been observed in the Challenger collections:—

## Asteromphalus ovatus, n. sp. (Plate V. fig. 7.)

Elliptico-rotundatum; segmentis rotundato-complanatis; lineis umbilicalibus rectis vel non angulariter curvatis, ab area pyriformi dimanantibus; areis radialibus marginem non attingentibus. In mari Antarctico.

This very small oval Diatom, which in the figure is magnified 1000 diameters, is distinguished by the circumstance that the umbilical lines do not separate from one another, as in the others, at a central point, but originate from the circumference of the area of the obliterated radius. This characteristic has been found, it is true, in other allied forms, among which Brébisson constituted the genus *Spatangidium*; but this genus has not

- <sup>1</sup> Monatsber. d. k. Akad. d. Wiss. Berlin, 1844, p. 198.
- <sup>2</sup> See definition in Monatsber. d. k. Akad. d. Wiss. Berlin, 1844, p. 73.
- <sup>8</sup> Pritchard, op. cit., p. 836.

<sup>&</sup>lt;sup>4</sup> e.g., Spatangidium flabellatum, Spatangidium peltatum, Spatangidium arachne, Spatangidium heptactis, in Bull. Soc. Linn. de Normand., vol. iii.; Spatangidium ralfsianum, Norm., Greville on Diatomacese observed in Californian Guano, Micr. Journ., vol. vii. p. 161.