## THE VOYAGE OF H.M.S. CHALLENGER.

Of a large number of representative genera of Reef-Corals, little or nothing is known of the early stages of the growth either of their simple or of their colonial forms; nor, indeed, does it seem likely that such knowledge will be forthcoming, until some naturalist familiar with the subject has been enabled to collect and study the various types on the reefs.

In the treatment which has been given of the old group of the Rugosa, I have been warned, as indeed I am aware, that I shall probably be subjecting myself to a good deal of criticism; but the conclusions at which I have arrived seem to me unavoidable, when the essential characteristics of the main groups of the recent and fossil corals are compared. Nor would these conclusions be disturbed by the removal of many doubtful genera from the Madreporaria.

The question has been briefly discussed, and was rendered necessary to be discussed by the occurrence of the very remarkable form, *Moseleya latistellata*, the direct and close relationship of which to the most typical of the Cyathophyllidæ is self-evident, while at the same time it is also undeniably Astræid in its characters.

I was inclined at first to place the Cyathophyllidæ, together with *Moseleya*, definitely in the family Astræidæ as a subfamily Moseleyinæ; but it seems more advisable to consider the two families as distinct, *Moseleya* being placed with the Cyathophyllidæ. It is evident, however, that the essential distinctions between the two families are very slight.

Considering the extremely interesting relationships of *Moseleya*, it must be looked upon as one of the most remarkable types of structure brought to light by the Challenger.

## ON THE LITERATURE.

It has not been thought necessary to give in this short work a list of the bibliography of the Reef-Corals, for while numerous works exist in which lists are given of the older works on the subject, full information of the more recent works has been given in the recently published and valuable volume by Professor D'Arcy Thompson, A Bibliography of Protozoa, Sponges, Cœlenterata, and Worms.

Constant reference has necessarily been made for the recent forms to the works of Dana, Milne-Edwards and Haime, Verrill, Pourtalès, Agassiz, Duchassaing and Michelotti, Duncan, Semper, Moseley, Lacaze-Duthiers, Lindström, Brüggemann, Studer, Klunzinger, Ridley, Tenison-Woods, &c., not to mention the older writers; and references to writings of the different authors are given in the systematic portion of the work under the genera and species.

8