"Like all the deep-sea Comatulæ, it is of very small size. As in *Eudiocrinus* there are five undivided arms, but they are unfortunately broken off quite short. The radials which bear them are not, however, in contact either with the centro-dorsal or with one another, for they rest on a ring of five basal plates, which alternate with them in position (fig. 124A, *b*). There is only one other genus of recent Comatulæ (*Atelecrinus*) in which this is the case; but there is no Neocrinoid, either recent or fossil, in which the radials do not meet one another laterally, and form a closed ring. In *Thaumatocrinus*, however, every two radials are separated by an interradial plate, which rests on a basal (fig. 124A, B, *i*). This is a character which is limited to certain Palæozoic Crinoids belonging to the family Rhodocrinidæ. One of these interradials in *Thaumatocrinus*, that on the anal side, bears a short and tapering jointed appendage, which looks somewhat like an undeveloped arm (fig. 124A, B, *aa*); and it is only in some of the Palæocrinoids, *e.g.*, *Reteocrinus*, *Taxocrinus*, and *Onychocrinus*, which reach back to the Lower Silurian period, that any similar structure is to be found.

"Besides reproducing these singular characters of long extinct Palæocrinoids, *Thaumatocrinus* presents another structural feature, which is peculiar to itself among Comatulæ, although appearing in the stalked *Rhizocrinus* and *Hyocrinus*, viz., the existence of a pyramid of oral plates protecting the mouth (fig. 124B, *o*).

"The combination of these various characters in an abyssal Crinoid, which is not stalked, however, but belongs to the specialised *Comatula*-type, is a point of very considerable interest; and, in my opinion, *Thaumatocrinus* is by far the most remarkable of all the Crinoids obtained by any of the recent deep-sea exploring expeditions."

The Myzostomida.—"On some specimens of *Hyocrinus* and *Bathycrinus* which were dredged at Stations 146 and 147 from depths of 1375 and 1600 fathoms, Dr v. Willemoes Suhm discovered a remarkable species of Myzostomida (fig. 126E) which constitutes an entirely new group of these Crinoid parasites.

"These specimens and the other Myzostomida collected during the voyage,[1] together with material subsequently transmitted to him by Dr. P. H. Carpenter, have enabled Professor v. Graff to throw a new light upon the structure and mode of life of these animals.

"The accompanying diagram (fig. 125) displays the structure of the Myzostomida in so far as it was known before the publication of Professor v. Graff's Report. The typical *Myzostoma* is a disk-shaped, bilaterally symmetrical, unsegmented animal of from 0·5 mm. to 1 cm. in diameter; it possesses five pairs of unsegmented parapodia, and four pairs of suckers both situated upon the ventral surface; upon the margin of the body

[1] *At Stations 146, 147, 170, 174, 186, 187, 190, 192, and 214.*