

led me to adopt Schlüter's view, as de Loriol¹ had previously done. For I not unfrequently met with calyces in which basals might appear externally at some of the angles, but not at others; while in other fossil types no basals were visible at all. In both cases, however, the basals were present as more or less prismatic rods extending outwards from the centre of the under surface of the radial pentagon somewhat as in the *Pentacrinus decorus* represented in Pl. XXXIV. fig. 8. But they were not always long enough to reach the edge of the radial pentagon and appear externally between it and the centro-dorsal; so that one side of a calyx would be that of an *Antedon* and the other that of a *Solanocrinus*. Under these circumstances it would seem that Schlüter was undoubtedly right in uniting *Solanocrinus* with *Antedon*. But in a Manual of Palæontology recently published by Hoernes,² Zittel's classification is still adopted, and *Solanocrinus* is placed as a subgenus of *Antedon*, differing from it in the presence of basals on the exterior of the calyx; while it is also described as represented by a living species and not by fossil ones only. This apparently refers to the doubtful genus *Comaster*, Agassiz, which is only known from the description given of it by Goldfuss.³ Whatever be the nature of *Comaster*, however, the supposed difference between *Solanocrinus* and *Antedon* cannot any longer be regarded as of generic value.

NOTE C.

(Page 68.)

ON THE EXCENTRIC POSITION OF THE MOUTH IN *Actinometra*.

The genus *Actinometra* comprises quite two-fifths, if not more, of all the species of living Crinoids. The character by which it is most readily distinguished at first sight is the excentric position of the mouth, as was pointed out in 1877⁴ and again in 1879;⁵ while its generic position is recognised by Claus in the last edition of his Grundzüge der Zoologie with the character "Mund excentrisch" (Pl. LV. figs. 1, 2; Pl. LVI. figs. 7, 8; Pl. LXI. fig. 2; see also fig. 3 on p. 92).

In spite of these facts, however, Hoernes stated in his Palæontology (p. 131) that in recent Crinoids the mouth is always (*stets*) in the centre of the disk, which is very far from being the case, as explained above. This error was avoided by Zittel, whom Hoernes usually follows very closely; though the generic position of *Actinometra* was not fully recognised by the former author, who placed it along with *Solanocrinus* and *Promachocrinus* as a subgenus of *Antedon*. But all subsequent writers, Hoernes excepted, have recognised that *Antedon* and *Actinometra* are totally distinct generic types.

¹ Swiss Crinoids, p. 254.² Elemente der Palæontologie, p. 149.³ Petrefacta Germaniæ, vol. i. p. 202; see also *Journ. Linn. Soc. Lond. (Zool.)*, vol. xiii. p. 454, 1877.⁴ *Journ. Linn. Soc. Lond. (Zool.)*, vol. xiii. p. 441, 1877.⁵ The Genus *Actinometra*, *Trans. Linn. Soc. Lond. (Zool.)*, ser. 2, vol. ii. p. 18.