Pallas, belong to either of these types, and if so to which? Ellis' figure evidently agrees more closely with Cirrhipathes anguina than with Antipathes spiralis, Pourtalès, the chief difference to be noticed being in the shape of the mouth. In Cirrhipathes spiralis (Pallas), the mouth is represented as widely open, and consisting of a cup-like portion with a crenate margin, whereas in Cirrhipathes anguina, Dana, the figure shows the mouth contracted and the oral surface only slightly elevated. As previously stated, a new form (Cirrhipathes propinqua), which I have been enabled to study, agrees fairly well with the figure in Ellis and Solander's work, and in this species the polyps are distributed all around the stem. The other species included in this genus, those described by Gray, and Duchassaing and Michelotti, have been defined from a study of dry specimens, so that no information is available as to the structure of their polyps.

From this general survey of the question, however, it will be seen that Blainville's chief character for his new genus, the simple filiform character of the corallum, has no generic value, as species having widely different types of polyp may agree in this respect. In subdividing the genus it becomes necessary to retain the name Cirrhipathes for that section of it to which the type species, Cirrhipathes spiralis (Pallas), belongs. Unfortunately it is impossible to decide the question with certainty at present. The species in question is not found amongst the material collected during the Challenger Expedition, and none of the specimens of it which I have seen are preserved in spirit. From a study of the British Museum collection I have, however, been able to throw a certain amount of light on the question, which, if not sufficient for absolute accuracy, lends a considerable air of probability to the arrangement here adopted. I find that amongst the spiral species in that collection there are one or two specimens in which the polyps are imperfectly preserved. In these cases the zooids appear as rounded elevations on the coenenchyma, and are distinctly visible all around the stem. specimens, although more slender than that figured by Ellis, appear to agree with the description, and the fact that they came from the Indian Ocean, makes it still more probable that these are really the Cirrhipathes spiralis (Pallas). I have thus been led to include Cirrhipathes propinqua, n. sp., Cirrhipathes anguina, Dana, and Cirrhipathes spiralis (Pallas), in the modified genus Cirrhipathes, and to include Antipathes spiralis, Pourtalès, and one or two other forms in a new genus, for which the name Stichopathes is proposed. Those species of which I have been unable to obtain any information regarding the type, and mode of distribution of the polyps, can only be assigned a proper place when the necessary information is obtained.

Leiopathes.—Gray's definition of this genus (40) is as follows:—"Axis smooth, polished, branched, forked. Bark soft, deciduous, deliquescent, sometimes forming (when dry) smooth transparent masses at the fork of the branchlets." This definition differs in two points from his earlier notes on the type species (28). He omits all reference to the presence of spicules in the coenenchyma, though whether intentionally or by accident