

On the sponge body Bocage made no observations; he simply notes that the covering of polypes extends without interruption to the pointed extremity of the fibrous cord, where they become somewhat diminished in size. At a later period he<sup>1</sup> supplied some further data as to the locality of his *Hyalonema lusitanicum*—near the mouth of the Tagus—and also confirmed his previous report from the examination of some new material.

The account given by Barboza du Bocage seemed to Gray to be well calculated to support the opinion which he still firmly maintained, that the long fibrous bundle was the skeletal axis of the polype covering. He utilised it in a renewed defence of his views,<sup>2</sup> admitting, however, that he had been so far mistaken in his examination of the individual polypes, since these possessed not eight feathered, but twenty simple tentacles.

Soon after this Bowerbank elaborated<sup>3</sup> his theory in regard to the nature of *Hyalonema*. He now maintained that not only the long tuft of glass-spicules and the cylindrical or conical basal mass, but also the uneven irregular rind surrounding the fibrous tuft, were all parts of the sponge.

A memoir by Max Schultze<sup>4</sup> is noteworthy as containing the proposal to unite the two genera *Euplectella*, Owen, and *Hyalonema*, Gray, into a special group of siliceous sponges with the title "Lophospongiæ."

An accurate description of the sponge named by him *Hyalonema mirabile* was now given by Bowerbank.<sup>5</sup> The cylindrical elevations on the rind of the siliceous tuft, which had been described by most observers as polypes, were recognised as the oscula of the sponge. The form described by Barboza du Bocage Bowerbank<sup>6</sup> looked upon as not specifically distinct from his *Hyalonema mirabile*.

In his comprehensive sponge system published in 1867,<sup>7</sup> Gray designated the large cylindrical body, which he regarded as the whole sponge, in which the long siliceous filaments were embedded, by a new generic name "*Carteria*," assigned to this genus a place in his family of the "Esperiadæ," in the order of the Acanthospongia, and gave to it the following diagnosis:—"Sponge massive, irregularly reticulated, shallow, formed of abundant agglutinated filiform needle-like spicules, with four- and six-rayed stellate, cruciform and birotulate spicules." As the only known genus he mentioned *Carteria japonica* (= *Hyalonema mirabile*, Bowerbank, *Spongia octancyra*, Brandt, and *Spongia spinicrux*, Brandt).

In two communications published in 1867,<sup>8</sup> Ehrenberg maintained his opinion that the entire body was artificially compounded by the Japanese, but communicated in the second paper a letter from Barboza du Bocage, in which the latter declared

<sup>1</sup> *Proc. Zool. Soc. Lond.*, p. 662, 1865.

<sup>2</sup> *Ann. and Mag. Nat. Hist.*, ser. 3, vol. xviii. p. 287, 1866.

<sup>3</sup> *Ann. and Mag. Nat. Hist.*, ser. 3, vol. xviii. p. 397.

<sup>4</sup> *Archiv f. mikrosk. Anat.*, 1867, p. 206; *Ann. and Mag. Nat. Hist.*, ser. 3, vol. xix. p. 163.

<sup>5</sup> *Proc. Zool. Soc. Lond.*, p. 18, 1867.

<sup>6</sup> *Proc. Zool. Soc. Lond.*, p. 902, 1867.

<sup>7</sup> *Proc. Zool. Soc. Lond.*, p. 492.

<sup>8</sup> *Monatsber. d. k. preuss. Akad. d. Wiss. Berlin*, pp. 298, 843.