

on opposite sides, which may be observed, during the whole summer, along the shores of Massachusetts and Maine, and, further north, to the shores of Greenland.

The Ctenophoræ differ essentially from the Discophoræ. Both their form and organs of locomotion give them a different appearance. The Discophoræ, setting aside the various modifications arising from marked peculiarities of their outline, move like an umbrella, which, by alternately opening and shutting, would make its way under water by means of such movements. It is by the contraction of the body alone, or rather by the agency of the motory cells which form that mass, that motion is produced in these animals. Not so in the Beroid Medusæ, where, besides the action of the motory cells, the whole body, more or less spherical or ovate, compact or split at one end, is kept swimming by the flapping of innumerable small paddles arranged in vertical rows, like the ribs of an orange, upon the outer surface. These rows are generally eight in number, extending from one pole of their spheroid body to the opposite, like the meridians of an artificial globe. But, owing to the inequalities in the motions of their vertical flappers, and their radiated arrangement upon the more or less spherical body, these animals have a somewhat rotatory motion, unless the paddles move on all sides with perfect steadiness and uniformity.

There can be scarcely any thing more beautiful to behold than such a living transparent sphere sailing through the water, coursing one way or another, now slowly revolving upon itself, then assuming a straight course, or retrograding, advancing, or moving sideways, in all directions with equal precision and rapidity; then stopping to pause, and remaining for a time almost immovable, a slight waving of some of its vibrating organs easily counterbalancing the difference of its specific gravity and that of the water in which it lives. So Pleurobrachia may appear at times, and so does it also appear when moving in a state of contraction. But generally, when active, it hangs out a pair of most remarkable appendages, the structure and length and contractility of which are equally surprising, and exceed in wonderful adaptation all I have ever known among animal structures. Two apparently simple, irregular, and unequal threads hang out from opposite sides of the sphere. Presently these appendages may elongate, and equal in length the diameter of the sphere, or surpass it, and increase to two, three, five, ten, and twenty times the diameter of the body, and more and more; so much so that it would seem as if these threads had the power of endless extension and development. But as they lengthen they appear more complicated: from one of their sides other delicate threads shoot out like fringes, forming a row of beards like those of the most elegant ostrich feather, and each of these threads itself elongates till it equals in length the diameter of the whole body, and bends in the most graceful curves. These two long streamers, stretching out in straight or undulating lines, sometimes