

again; which seems to me not unlikely, from facts observed in other families of fishes.

At the time I left Paris, experiments made at Jamaica by Dr. Brodbelt, on the air contained in the natatory bladder of the sword-fish, had led some naturalists to think, that within the tropics, in sea-fish, that organ must be filled with pure oxygen gas. Full of this idea, I was surprised at finding in the air-bladder of the flying-fish only 0·04 of oxygen to 0·94 of azote and 0·02 of carbonic acid. The proportion of this last gas, measured by the absorption of lime-water in graduated tubes, appeared more uniform than that of the oxygen, of which some individuals yielded almost double the quantity. From the curious phenomena observed by MM. Biot, Configliachi, and Delaroche, we might suppose, that the sword-fish dissected by Dr. Brodbelt had inhabited the lower strata of the ocean, where some fish* have as much as 0·92 of oxygen in the air-bladder.

On the 3rd and 4th of July, we crossed that part of the Atlantic where the charts indicate the bank of the Maal-stroom; and towards night we altered our course to avoid the danger, the existence of which is, however, as doubtful as that of the isles Fonseca and St. Anne. It would have been perhaps as prudent to have continued our course. The old charts are filled with rocks, some of which really exist, though most of them are merely the offspring of those optical illusions which are more frequent at sea than in inland places. As we approached the supposed Maal-stroom, we observed no other motion in the waters than the effect of a current which bore to the north-west, and which hindered us from diminishing our latitude as much as we wished. The force of this current augments as we approach the new continent; it is modified by the configuration of the coasts of Brazil and Guiana, and not by the waters of the Orinoco and the Amazon, as some have supposed.

From the time we entered the torrid zone, we were never weary of admiring, at night, the beauty of the southern sky, which, as we advanced to the south, opened new constellations to our view. We feel an indescribable sensation when, on approaching the equator, and particularly on passing from

* *Trigla cucullus*.