

same effect upon the blood in the branchial vessels, as the air does upon that in our lungs.

We know, by experience, how soon an animal that breathes by lungs, if it remains only a few minutes under water, and is cut off from all communication with the atmosphere, is suffocated and dies; and that all aquatic animals that have not gills, or something analogous, as all the water-beetles, the larves of gnats, &c., are obliged, at certain intervals, to seek the surface for respiration: whence we may learn what an admirable contrivance of Divine Wisdom is here presented to us, to enable the infinite host of fishes to breathe as easily in the water as we do in the air.

When we sum up all the diagnostics of the Class we are considering, we can trace, at every step, so that, almost, *he that runs may read*, Infinite Power in the construction, Infinite Wisdom in the contrivance and adaptations, and Infinite Goodness in the end and object of all the various physical laws, and in all the structures and organizations by which they are severally executed, which strike the reflecting mind in this globe of ours. What else could have peopled the waters, and the air, with a set of beings so perfectly and beautifully in contrast with each other, as the fishes and the birds? Sprung originally from the same element, they each move, as it were, in an ocean of their own, and by the aid of similar, though not the same, means. The grosser element it inhabits required a different set of organs to defend, to propel and guide, and to sink and elevate the *fish*, from what were requisite to effect the same purposes for the *bird*, which moves in a rarer and purer medium; yet as both were *fluid* mediums, consisting of the same elements, though differently combined; analogous organs, though differing in substance, structure, and number, were required. For what difference is there between swimming and flying,