

fied rocks, holding remains of aquatic animals or water-drifted portions of land plants, were formed in water: this applies to the far greater number of the strata. But it is equally clear, that those strata which alternate with these, and do not yield organic remains, but are of the same general characters, and were, by marks of structure and aggregation, evidently produced in the same way, are also of watery origin. All the really stratified rocks, then, are the product of water; but the unstratified rocks are generally the fruit of the action of heat.

We must, therefore, here divide the subjects for consideration in the structure of the globe according to the aqueous or igneous agency concerned, and shall commence with the history of the deposits from water.

The most general view to which we are thus conducted, gives to all the stratified rocks an aqueous, and to the unstratified an igneous, origin: the former were deposited from above, in calm or agitated water, along the shores, in the depths of the sea, or in lakes; the latter were raised from below, by the excitement of internal heat. Subterranean movements affected the stratified rocks, and elevated them from their level position into mountain chains and ranges of hills, and the same influence, or an action consequent upon it, raised the fluid or solid unstratified rocks along the axes, or at the centres, of the elevatory movements. Thus, it is a certain and general truth, that in the composition of the crust of the globe, in the arrangement of rocks in their present position, in the production of the physical features of our planet, both internal heat and the agency of external water have had their share; and by studying, carefully, the effects now produced, though apparently on a smaller scale, by the same natural agencies, under varied circumstances, we may hope to arrive at correct general inferences as to the manner in which even the grandest and most surprising of the old revolutions of nature were occasioned.