

water. This island, to which the name of Sabrina was given, disappeared like Sciacca.

In 1783, a new island rose in the sea near Reykiavich, in connection with the Icelandic volcanic system: it was 1 mile in circumference, but soon disappeared like so many of these already mentioned.

The ejections from the summits and sides of volcanos go to enlarge the mean diameter of the globe, whether they be heaped on the land or laid on the bed of the sea. The amount of this augmentation of diameter has never been estimated (we believe), nor would the estimate, perhaps, be worth the slight trouble of the calculation, were it not useful to moderate the false impressions which a contemplation of the violence of ignivomous mountains occasions. If we suppose the volcanic lines and groups known on the globe to be collected in one line, it would not equal a great circle of the sphere. If we take as the breadth of this volcanic band a surface of 10 miles, we shall much exceed the average. To assume that half the mass of active or extinct volcanic mountains above the sea is the product of sub-aerial or submarine eruptions is an ample allowance. Finally, if the figure of the mixed volcanic and rocky mass be taken as a series of cones, 2 miles in height, which is far above the truth, the mean volume of igneous products resulting from the calculation is

$$\frac{24000 \times 10 \times 2}{3 \times 2} \text{ miles} = 80,000 \text{ cubic miles; which,}$$

if spread over all the globe equally, would augment its diameter about $2\frac{1}{4}$ feet. Now, as all the conditions have been taken in a sense the most favourable for the magnitude of the result, we see how feeble, after all, is the change of the general conditions of the globe, produced by the agents of violence put in action during volcanic excitement.

The cavities left within the globe, by the ejection of this mass of matter, are probably so circumstanced by the overarching of their roofs, that they may resist for a long time the tendency of the superincumbent weights