

learns that most important of all lessons—to doubt the evidence of his senses, until confirmed by cautious and patient observation.

6. OBJECT OF THE LECTURES.—With these introductory remarks I proceed to the consideration of the subjects selected for the present discourse. And here I may observe, that, from the magnitude and diversity of the objects embraced by geology, it is scarcely possible to offer, in the space assigned to a course of popular lectures, even an epitome of the wonders which modern researches have brought to light. This consideration therefore must be my apology for the concise manner in which many interesting facts may perhaps be noticed; and I would beg of you to consider that lectures of this kind are intended to excite, rather than to satisfy, a rational curiosity; that they are designed to promote a taste for philosophical pursuits, but cannot supersede the necessity of study and of personal investigation.

7. PHYSICAL STRUCTURE OF THE EARTH.—The globe we inhabit may be described as a planetary orb of a few thousand miles in circumference, and of a spheroidal shape; its figure being such as a body in a fluid state, and made to rotate on its axis, would assume. Its mean density is five times greater than that of water, the interior being double that of the solid superficial crust: the internal part of the earth, if cavernous, must therefore be composed of very dense materials. Its surface is