

been entertained on this subject, and so little understood are they, that they need to be defined and explained. And if the distribution of animals and plants on the globe come within the province of geology, then this science has a very important point of connection with the history of the deluge, as will appear in the sequel. And finally, the history of opinions on this subject is full of instruction to those who undertake to reason on the connection between science and religion. Obviously, then, my first object should be to give a brief history of the views that have been entertained respecting the deluge of Noah, so far as they have been supposed to have any connection with geology.

It is well known that in the written and unwritten traditions of almost every nation and tribe under heaven, the story of a general deluge has been prominent; and probably, in all these cases, some attempt has been made to explain the manner in which the waters were brought over the land. But most of these reasonings, especially in ancient times, are too absurd to deserve even to be recited. Indeed, it is not till the beginning of the sixteenth century, that we find any discussions on the subject worthy of notice. At that time, some excavations at Verona, in Italy, brought to light many fossil shells, and awakened a question as to their origin. Some maintained that they were only *simulacra*, or resemblances to animals, but never had a real existence. They were supposed to have been produced by a certain "*materia pinguis*," or "fatty matter," existing in the earth. Others maintained that they were deposited by the deluge of Noah. Such, indeed was the general opinion; but Fracastoro and a few others maintained that they were once real animals, and could not have been brought into their present condition by the last deluge. For more than three hundred years have these questions been more or less discussed; and though decided many years ago by all geologists, not a few intelligent men still maintain that petrified shells are mere abortive resemblances of real beings, or that they were deposited by the deluge.

The advocates of the diluvial origin of petrifications soon found themselves hard pressed with the question, how these relics could be scattered through strata many thousand feet thick, by one transient flood. They, therefore, came to the conclusion, in the words of Woodward, a distinguished cosmo-