

foundation and development of vertebrate palæontology as a distinct department of biology, his services to geology proper may be looked upon as almost wholly comprised in the joint essay with Brongniart. Geology indeed had much fascination for him, and he wrote a special treatise on it entitled *A Discourse on the Revolutions of the Surface of the Globe*.¹ In this work he maintains the opinion that the past history of the earth has been marked by the occurrence of many sudden and widespread catastrophes, exceeding in violence anything we can imagine at the present day, whereby the surface of the land has been overwhelmed by the sea, and its inhabitants have been destroyed. Briefly reviewing the usual action of rain and frost, brooks and rivers, the sea and volcanoes, he comes to the conclusion that the former revolutions were so stupendous that "the thread of Nature's operations was broken by them, that her progress was altered, and that none of the agents which she employs

¹ In its first form it was prefixed to the *Recherches sur les Ossements Fossiles* as a Preliminary Discourse on the Theory of the Earth (1821). It was afterwards published separately as the *Discours sur les Révolutions de la surface du Globe* (1826). The work showed no marked advance in geological progress. Yet it went through six editions in the author's lifetime, the latest (6th) corrected and augmented by him appearing in 1830. The versions published in England were edited and copiously annotated by Prof. Jameson of Edinburgh, whose notes to the early editions supply some curious samples of his adherence to Wernerianism. Cuvier was also the author of a Report on the Progress of the Natural Sciences, presented to the Emperor Napoleon in 1808, in which he expressed various vague and indefinite opinions on geological questions. In his earlier years his geological bias was decidedly towards Wernerianism (see the references in his *Éloge* on De Saussure already cited, p. 308).