BOOK REVIEWS

visited the United States from 1795 to 1798. He travelled widely, collected many geological specimens and took an active part in the nascent scientific life of that time. His book is a systematic geographical treatise, describing topography, geology, soils, vegetation, climate, the incidence of diseases, and Indian languages and customs.

As a geologist Volney was remarkably free from prejudice. His observations were mainly lithological, but he noted the dip and superimposition of strata and collected specimens, identified by Lamarck, from fossiliferous beds. He was aware that their fauna differed from that of the present, and attributed them to the more extensive seas of a remote period. Conversely he knew that basalt was the product of volcanic activity, although we may not agree with him that Lake Ontario is the crater of an extinct volcano! He describes the colour, texture, and mineral composition of the rocks he encountered, and gives a clear account of the origin of river terraces and of the extension of the Mississippi delta.

Volney was also a pioneer in soil science. He describes the varying colour, texture, depth, and fertility of soils, and correlates variations in natural vegetation with these differences. He notes the effect of soil erosion, and observed horizonation in soils and its effect on the rooting of trees.

This would be a useful addition to a collection of books concerned with the history of geological science. C. P. BURNHAM

ROBSON (D. A.). The Science of Geology in colour. London (Blandford Press), 1968. 272 pp., 295 figs., including 132 in colour. Price 45s.

Although at a cursory glance this book appears to be yet another semi-popular account in response to the growing interest in geology by the general reader, a more detailed perusal reveals it to be a comprehensive geology text prolifically illustrated both with clear diagrams and coloured photographs. The latter do much to emphasize the grandeur of geology as well as the finer details of minerals and rocks as they appear in hand-specimen. In general the book is well produced but it is unfortunate that the figures and their captions abound with errors, such as the minerals oliving (fig. 35) and silliminite (fig. 65), the omission of the bars over the face indices in several of the crystal drawings, and the classification of igneous rocks on the basis of the relative amount of cole-alkali feldspars (fig. 63). The praiseworthy reproduction of coloured photographs of thin sections of igneous rocks in polarized light is marred by the crossed polaroids photograph of the granite being labelled gabbro and vice versa. It is unfortunate that in a book by a Durham graduate, the name of the river that passes through Durham is given as Weir (fig. 185), though one admires the nice touch of the choice of illustration for the book-jacket. These criticisms apart, this is an attractive and useful book: the use of colour in the block diagrams illustrating faults and folds and in sketch maps is very successful and the author is to be congratulated on including a double-page geological map of the British Isles in full colour. R. A. H. The realistic price should make it a best-seller.