

ON AN ERRONEOUS STATEMENT OF THE OCCURRENCE
OF NATURAL HUMAN FOOTPRINTS IN THE PALÆOZOIC
ROCKS.

To the Editor of the GEOLOGIST.

MY DEAR SIR,

In 1822* Mr. Schoolcraft figured and described a block of limestone, bearing two prints of human feet, from the western bank of the Mississippi at St. Louis, and wrote regarding them thus: "These impressions were made at a time when the rock was soft enough to receive them by pressure, and the marks of the feet are natural and genuine." He added, however, that Col. Benton considered them to have been "the result of human labour," and probably belonging to the same period as that when the mounds in the neighbourhood of St. Louis were raised. I may add, from Dr. D. D. Owen's statement, that Messrs. Maclure, Say, Troost, and Lesueur agreed as to the artificial origin of the prints.

The late Dr. Mantell introduced into some editions of his "Wonders of Geology" an account of these footprints; illustrating them with a woodcut,—accepting the hypothesis of their having been naturally produced,—and erroneously terming the rock "sandstone."

In 1842† Dr. David Dale Owen, having obtained possession of this slab of stone, and being desirous of explaining its true character, carefully examined it, and found that it contained fossils of the mountain-limestone age, and that "the impressions in question are not fossils, but an intaglio, of artificial origin." Dr. Owen also freely, and with justice, criticised Dr. Mantell's remarks on the specimen; and he referred to Leonhard's cautious notice of the same slab.

In the sixth edition of the "Wonders," ‡ in 1848, Dr. Mantell intimated that he no longer used these sculptured footprints as evidence of the early existence of man on the earth, since Dr. D. D. Owen had proved them to be artificial.

In a little book entitled "Voices from the Rocks," lately published, I have seen, to my surprise, a woodcut of these footprints, which, copied from the suppressed illustration once used by Dr. Mantell, is unscrupulously brought forward as an established evidence of the geological antiquity of man.

Now, Mr. Editor, what is to be thought of any one, writing on geology at the present day, and pretending to settle a philosophical question by reference to facts, who produces as geological evidence a well-known misconception, which had actually been ignored by the very author from one of the older editions of whose work this second-hand writer, without the least examination or research, borrows it as the basis for his chief argument in support of the untenable hypothesis of the existence of man in the palæozoic period?

For my part, being interested in the scientific reputation of my late friend, Dr. Mantell, and in that of his works, some of which I have had

* American Journal of Science, vol. v., p. 223, &c.

† American Journal of Science, vol. xliii., p. 14, &c.

‡ Vol. ii., p. 90, note.

the pleasure of editing, I beg permission to express in your journal, which, I trust, has the wide circulation it deserves, my sincere regret that any one could be found to exhibit such a carelessness of truth, or ignorance of fact, in a book intended for an intelligent public.

I am, dear Sir, yours, &c.,

Somerset House, April 10, 1858.

T. RUPERT JONES.

NOTES AND QUERIES.

BONE-BEARING GRAVEL OF CROPTHORNE.—NEW FERN FROM THE COAL NEAR BEWDLEY.—PASSAGE-BED BETWEEN SILURIAN AND DEVONIAN ROCKS IN THE ABBERLEY HILLS.

(Extract of a letter from Mr. G. E. ROBERTS to the Editor.)

DEAR SIR,—I have made two or three minor discoveries this month, but not of importance to warrant a paper; however, they are *interesting*, so you may use them as you please as extracts from this letter.

The bone-bearing gravel of Cropthorne (near Evesham), a post-tertiary deposit, is well known for its bones of Pachydermatous and other mammalia. I have discovered a northerly continuation of this at Himbleton (four miles north-east of Worcester). It there forms a terrace-line on the lower Lias, and presents the usual lacustrine indications; shells of *Unio*, *Lymnaea*, and *Cyclas* occurring among the gravel and bones, as in the Defford and Cropthorne beds. I have met with no elephantine remains, however; the bones (vertebræ, tibia, &c.) being restricted to one *Bos* (*B. longifrons*) and a *Cervus*. I first noted this ossiferous gravel in September last, and, meeting Dr. Falconer soon after, brought some of the bones under his notice. The bed is there six feet in thickness, and also contains bones of Saurians (*Ichthyosaurus tenuirostris* and *I. intermedius*) washed out of the Lias shales upon which it rests.

The hollow bones (tibia, &c.) are filled with an infiltration of marl, and are pierced, in some instances, by *Teredines* (?)

I have lately been working at a bed of estuarine shales, belonging to the upper Coal Measures, and exposed on the east bank of the Severn, two miles north of Bewdley. A new fern, of great beauty, from thence, is in the hands of Professor Morris, who intends to describe it. I have, also, from this bed, several fine fronds of *Pecopteris*, attached to the rachis, which fact goes far, I think, to connect these plants in a direct line of ancestry with our living *Pteris* and *Lastræa*; I had rather believe them such than the mere leaves of Silurian trees, as some have thought. The rachis is, in its compressed state, from half to three-quarters of an inch in width, just the dimensions of a recent fern-stalk, grown succulent in a damp situation.

My last excursion was to the north end of the Abberley Hill. Here I can add some, trifling matter to Professor Phillips's admirable monograph ("Palæozoic District of Malvern and Abberley," &c., &c.) I believe the equivalents of the Ludford Fish-bed, of the "Trochus and Beyrichiæ bed," and of the "Railway shales," are to be found there. The characteristic fossils of the first I have met with, but they are distributed through six feet of deposit, instead of being confined within the narrow limits of the "Fish-bed." (Shagreen-scales, a simple plate of *Cephalaspis*, fragments of fish-bone and *Onchus* spines.) Again, in the upper Ludlow Tilestones, well exposed on both sides of the terminal hill, *Trochus hebcites* occurs, and *Beyrichiæ* (two or more species), but I cannot detect the true equivalent of the "Trochus and Beyrichiæ bed."

Orthis lunata is very abundant where the Fish-bed ought to be, and *Orbicula rugata*; so we have the leading fossils, if we are here beyond the confines of that remarkable conclusion of ichthyic life. However, I do not think we are.

The rarest fossil I met with was *Agnostus Maccoyii*, in the Downton Sandstones, on the west side of the hill. I was pleased to find, on the east side, in the same formation, the equivalent of the Downton Vegetable-bed. The fossils are little more