denial: none materially weaken the arguments in favour of sub-aërial denudation.

That I do not take up the matter in detail is owing, not to inability to defend my position, but to a wish to steer clear of controversy.

W. Whitaker.

P.S.—(1.) Please insert the following corrections of the second part of my paper which appeared in your November number.[1] Page 485, fig. 1, the *c* should have been at the top of the cut. Page 489, fig. 2. The woodcut does not quite agree with the description. The *broken* lines, above what should have been a firm line on the right and a broken one on the left, but which is continuous and somewhat shaky throughout, ought to have been *dotted*.

(2.) In a notice of my "list of Wells and Borings" (p. 510) the reviewer has mistaken the thickness of the surface-deposits, gravel, etc., given therein, for the depth of the wells. Instead of fifty feet being the greatest depth, some of the wells go down eight times that amount.

I take this opportunity of asking all who have notes of wells and borings in the London district, to favour me with a copy of them, such information being very useful to the Geological Survey.—W.W.

RESEARCHES IN BRITISH MINERALOGY.

Sir,—Your last number (which my absence in Spain has prevented me receiving before now) contains a letter from Mr. T. Davies, dated from the British Museum, in which, after referring to some remarks contained in a late paper of mine (Researches in British Mineralogy, Phil. Mag. Nov. 1867), he states that true Silver-fahlerz, or Polytelite, is "found in quantity in this country and mined for the silver it contains."

Being at present occupied in the preparation of a work on British Mineralogy, this information was very acceptable and at once induced me to visit the British Museum, in the full expectation of finding so valuable and interesting a British mineral species displayed in case No. 11; unfortunately I could not perceive any such specimen labelled as Silver-fahlerz, or Polytelite, nor any notice of its occurrence in the official guide to the collection.

In hopes, therefore, of eliciting further information I send you these remarks:—

Tetrahedrite in general contains more or less silver, but can only be termed Silver-fahlerz, Weissgiltegerz, or Polytelite, when it contains a notably large amount of that metal, say a minimum of over 5 per cent., for some specimens contain even more than 30 per cent. silver. The external appearance and physical character of this species, do not differ so considerably as to enable the argentiferous or non-argentiferous varieties of Tetrahedrite to be with certainty distinguished from one another. Although the former is generally found to be more brittle, lighter in colour and streak, and to possess a higher specific gravity, chemical examination can alone decide con-

[1] Unintentionally omitted from the December Number.—Edit.

clusively as to whether a grey copper ore is entitled to the name of Polytelite, or not.

The Foxdale mineral described and analysed by me is a true Polytelite; it contains nearly 14 per cent. of silver (or about 4500 ounces to the ton), and agrees in all its physical characters with the most characteristic specimens of this mineral.

Quite prepared to admit that Polytelite may exist in quantity in the Silver Vein Mine near Lostwithiel, Cornwall, I must, however, confess that some of Mr. Davies' remarks rather tend to raise a doubt in my mind as to this being in reality the case.

Mr. Davies states he knows of "no accurate analysis having been made of this ore," but informs us that "the last sample sold contained 36½ ounces to the ton," and that some years back "the average yield of silver was 68½ ounces to the ton;" and lastly, as something remarkable, states that in one instance it was "214 ounces!"—Expressed in percentages these figures would merely be about 0·11–0·21 and 0·64 per cent. silver—amounts which, mineralogically considered, may be regarded as but traces of silver, not at all conclusive of the presence of Polytelite in the ore.

Metallurgists would not regard such ores as silver ores, but only as argentiferous copper ores; and many of the argentiferous copper ores imported from South America contain far more silver than even the richest of these, yet frequently do not contain a trace of Polytelite.

When, however, Mr. Davies adds that this "silver vein was formerly worked for the rich deposits of silver it contained, I suppose in the state of sulphide"—does he not at once awaken a suspicion that the silver percentage of these ores may, in reality, be due to other sources than to the presence of Polytelite in quantity.

When next in Cornwall, I shall be delighted to avail myself of any opportunity of visiting this mine; and could I procure an authentic specimen of the mineral in question, should have much pleasure in analysing it. Previous experience has, however, taught me how little confidence can be placed in the genuineness of specimens purchased of Cornish minerals, and I have no doubt but that Mr. Davies' experience will have led him to the same conclusion. Accurate mineral analyses requires such an amount of time, skill, and expense, that before undertaking them it should be ascertained with the greatest care whether the mineral in question is an authentic specimen, or not

DAVID FORBES.

11, YORK PLACE, PORTMAN SQUARE, W.,
December 23rd, 1867.

BRITISH FOSSIL CYCADS.—Mr. W. Carruthers being engaged in investigating the structure of these fossils, would be obliged for information respecting specimens from any British locality which would enable him better to prosecute his enquiries. He reserves the examination of the foliage to a future period, confining himself for the present to the stems and fruits. Communications may be addressed to him at the British Museum.