Browne calls attention to my omission to mention this band, he must have overlooked the circumstance that he has forgotten to notice the far more important Calcarian which intervenes between the Oxfordian and the Cornbrash, and which is one of the best known and most widely spread subdivisions of the Jurassic system.

March 14th, 1885. W. T. BLANFORD.

GEOLOGICAL AGE OF THE ROCKY MOUNTAINS.

SIR,—A recent conversation with Dr. Hicks induces me to send you the following record of the results of a short ramble in the Rocky Mountains, which I trust you may deem of sufficient importance to insert in your MAGAZINE.

On a much-to-be-remembered morning on the 11th of last September, Professor Selwyn and Dr. G. M. Dawson of the Canadian Geological Survey, with several other brothers of the hammer, left the cars of the Canadian Pacific Railway at Stephen, for a walk down the track into British Columbia. Passing the picturesque little lake on the summit of the Kicking Horse Pass, between 5000 and 6000 feet above sea-level, the rocks on the right hand of the track were carefully examined for any indication of their age. They consisted for the most part of a series of almost vertical calcareous and quartzite beds, followed by greenish slates and were varied in colour, blue, white and green predominating. Though supposed to be altered Devonian, yet we failed to obtain any fossil evidence to determine this point. After however crossing the high trestle-bridge spanning the torrent which gives its name to the pass, we were more fortunate, and found sufficient evidence whereby the age of these beds could be clearly defined. Remaining behind the rest of the party, my attention was attracted to a greenish micaceous slab of rock dipping at a high angle to the east, bearing on its face those fucoidal markings, or worm-tracks (?), so abundant in the Ilfracombe beds in North Devon, and on detaching some of these, I soon saw other and more important black patches, the organic nature of which there could not be any doubt about. These at first sight were considered to be the shields of Trilobites. Proceeding onwards about 62 yards on the same side, a dense blue calcareous band was found almost vertical about six inches thick divided from another of the same kind about seven inches thick by a parting of greenish shale; both these were full of organisms. On showing them to Prof. Boyd Dawkins and others, they were at once pronounced to be Primordial.

Since my return home, Dr. Hicks has examined my specimens, and states that they represent a Menevian fauna, and that the micaceous rock contains lime and is detrital, with the tail of a *Paradoxides* on its surface, whilst the dense blue calcareous bands have abundant fragments of *Paradoxides*, *Conocoryphe* and other allied forms. This fact is of value, as it proves that a Primordial zone exists north of the 49th parallel of latitude, and somewhere between the 116th and 117th parallels of longitude, a fact which has been, I believe, hitherto denied or at least unproved. H. H. WINWOOD.

BATH, *April* 17, 1885.