

PLEISTOCENE MAMMALS IN BUCKS.

Although the geological map of the county shows a patch of valley-gravel to the S.W. of Aylesbury, I do not know of any definite record of the remains of Pleistocene Mammalia having been found in this district prior to the early part of the present year.

In February, 1914, one of the workmen at Mr. Locke's brickfield, which adjoins the road between Aylesbury and Hartwell, brought me the right lower canine tooth of a cave-bear, which he had found that day.

From what he told me I think it certain that the greater part of the jaw was found, but as it was rather broken all except this tooth was thrown into a pit of water with the waste earth which the workmen were removing, to expose the clay of which the bricks are made.

The men described the tooth as coming from the gravel between the clay and upper earth.

The clay which is worked here is the well-known Hartwell Clay, and is overlain by about five feet of Pleistocene deposits. These are composed largely of local Portlandian material containing casts of typical Portlandian fossils, and phosphatic nodules which have been derived from the basement bed of the Upper Portland limestone.

The deposit is a light-coloured calcareous sand which contains an extraordinary variety of pebbles—pieces of limestone, flint, etc.—and in places is cemented into a conglomerate. Here and there towards the base of the Pleistocene deposits are shallow bands of gravel, and in these the mammalian bones are found.

I asked the men to save me even the smallest fragments of bone or tooth, and visited the spot myself, almost daily, for several weeks. During this time I obtained further specimens, some of which I found *in situ* myself.

On examination these specimens proved to consist of fragments of bone or tooth from the following animals:—

- Mammoth (*Elephas primigenius*).
- Woolly Rhinoceros (*Rhinoceros antiquitatis*).
- Hippopotamus (*Hippopotamus amphibius*).
- Urus (*Bos primigenius*).
- ? Bison (*Bison bonasus*).
- Cave-bear (*Ursus spelæus*).
- Spotted Hyæna (*Hyæna crocuta*).

All the bones are much broken, and therefore difficult to identify with certainty, and although no doubt water-borne to their present position, they cannot have travelled far, as the fractures show no signs of wear, and in two cases where more than one piece of the same bone have been found the edges fit perfectly. Mr. A. H. Cocks has suggested to me that the way in which one or two of the bones are broken suggests that it was done by man for the purpose of extracting the marrow.

If this is the case it is important that a close watch should be kept here when further digging takes place. The discovery of even very fragmentary remains of man in conjunction with the remains of these mammals would be of very great interest.

I may say that the men have promised to let me know when next they start digging on this site.

The surface soil is only removed from a sufficient area each year to expose enough clay for the year's work.

E. H.