

II.

EXCAVATIONS MADE ON THE ESTATE OF MEIKLEOUR, PERTHSHIRE,
IN MAY 1903. BY THE HON. JOHN ABERCROMBY, *Secretary*.

(1.) *Excavation of the Black Hill Tumulus*.—At the east end of the parish of Caputh, Perthshire, on the property of Meikleour, there rises a small isolated hill, marked on the Ordnance Survey (Sheet lxiii., south-east) as Black Hill (Tumulus). The height is not given on the map, but I estimate it at between 30 and 40 feet. Its length is about 150 yards, and a spur to the south-east is about 50 yards long. The minister who wrote the account of the parish in the Old Statistical Account considered it artificial. This idea has been adopted by others, and is still not quite extinct. About thirty years ago the hill was planted with firs, which makes a complete exploration of its summit somewhat difficult. The top of the hill is rounded, and among the thickly planted trees and huge whin-bushes at the northern, tongue-like end of it, stands a small circular earthwork, not noted on the Ordnance Map.

With the kind permission of the Marquis of Lansdowne, the proprietor of Meikleour, I was able to make some excavations from the 4th to the 9th of May, both days inclusive.

Owing to the above-mentioned obstacles, I was never able while on the ground to find the exact centre of the work. Though on the plan I have drawn the crest of the ramparts as truly circular with a diameter of 41 feet, the base of the rampart is oval. On the ground, the best measurements I could get were 41 feet by 38 feet, so perhaps the perimeter of the crest of the rampart is also slightly oval. But the oval form of the base can be explained otherwise. The earthwork is constructed on sloping ground, so that the height of the rampart at the south end is only $2\frac{1}{2}$ feet, while at the north end it stands $8\frac{1}{2}$ feet above the berm, as near as I could estimate without levelling instruments. On this account its base is 9 feet or 10 feet wider than the base

at the south end. The north-eastern portion of the rampart is composed wholly of yellow sand, and this may have been thrown up at the extreme edge of the hill to give a little more room for the earthwork. The ditch only exists at the south end, where it separates the earthwork from the rest of the hill-top; then it gradually passes into a flat berm from 8 feet to 12 feet wide.

The rampart is best preserved on the north and south portions of the circumference; to the east and west it is nearly levelled and much burrowed into by rabbits.

The plan (fig. 1) shows the excavations that were made. They started from the point *a* at the south end, and had to take a devious direction to avoid trees. The rampart consisted of dark mould resting on hard gravel. About 7 feet from *a*, while sifting the earth previously thrown out, a small circular flint scraper, much chipped at the edges, and used perhaps as a strike-light, was discovered; about 15 feet from *a*, a small piece of iron and then a bit of bluish glass; at 17 feet from *a*, at a depth of $2\frac{1}{2}$ feet, a small piece of thin transparent glass with a slight angular off-set, like part of a cup; about 21 feet from *a*, a dozen small pieces of charcoal at a depth of about $1\frac{1}{2}$ feet.

At 24 feet from *a*, two or three thin flat slabs of freestone were discovered a few inches above the gravel floor. At first they suggested the cap-stone of a cist, or a drain or stone work of some kind. A short cut, 7 feet long, was therefore made to the eastward, but without finding any more stones, though one or two bits of burnt bone and of charcoal were picked up. As fifty-three small pieces of burnt bone were obtained by sifting the contents of the trench from *a* to the tree, and later on three or four more flat stones and some largish round stones—locally known as “land bools”—were found in the ditch, just south of *a*, it is not impossible that the builders of the earthwork had destroyed a cist, containing a burnt interment, in the course of their operations. These flat stones do not belong to the gravel, and must have been brought from a distance. Possibly the flint scraper belonged to this interment. Continuing the search for signs of a stone structure, a narrow trench,

afterwards enlarged, was made westwards, just south of the tree. At a depth of 20 inches a squarish freestone, 5 inches by $4\frac{3}{4}$ inches, was picked up. It has the appearance of being a mould, for on one face is a countersunk hole $1\frac{3}{8}$ inches in diameter and $\frac{1}{2}$ inch deep. The bottom surface of the hole is plain, and the whole workmanship is rude and inferior. In this small cutting two minute pieces of burnt bone were also brought to light.

In digging the north trench through the north of the rampart it was found that about 5 feet from the centre the gravel ceased, and only yellow sand existed below the upper layers of dark and paler mould, each about 1 foot deep. About 5 feet from the centre, in sifting the material thrown out of the trench, an iron nail was obtained. About $12\frac{1}{2}$ feet from the centre, and a little over 2 feet deep, an iron nail, $2\frac{3}{8}$ inches long, rather longer than the first, was taken out of the sand.

The square hole west of the centre, measuring 11 feet 3 inches by 8 feet 10 inches, was dug down to a depth of 4 feet 2 inches, the last half of it into hard, undisturbed, yellow gravel, mixed with sand, without finding anything.

In extending the cutting south of "tree" (fig. 1), at a distance of 3 feet from it and about 1 foot below the surface, an iron nail was extracted; quite close, but only 18 inches below the surface, a small piece of iron was found. Near this, but at a depth of 2 feet, and lying on the hard gravel, was a lump of charcoal. At 7 feet south of the tree and 15 inches below the surface was another iron nail with a large head and bent tail. In filling in the excavation a fragment of wavy glass was found close to the surface.

At *b* a hole was dug to a depth of 6 feet to see how the sand formed a junction with the gravel in a north-easterly direction. It was ascertained that the gravel sloped away eastwards at a sharp angle at its junction with the sand, where the latter came up to a level with the gravel in the central and southern parts of the area. This seems to show that the north-eastern portion of the earthwork is entirely artificial and covers more ground than the original top of the hill.

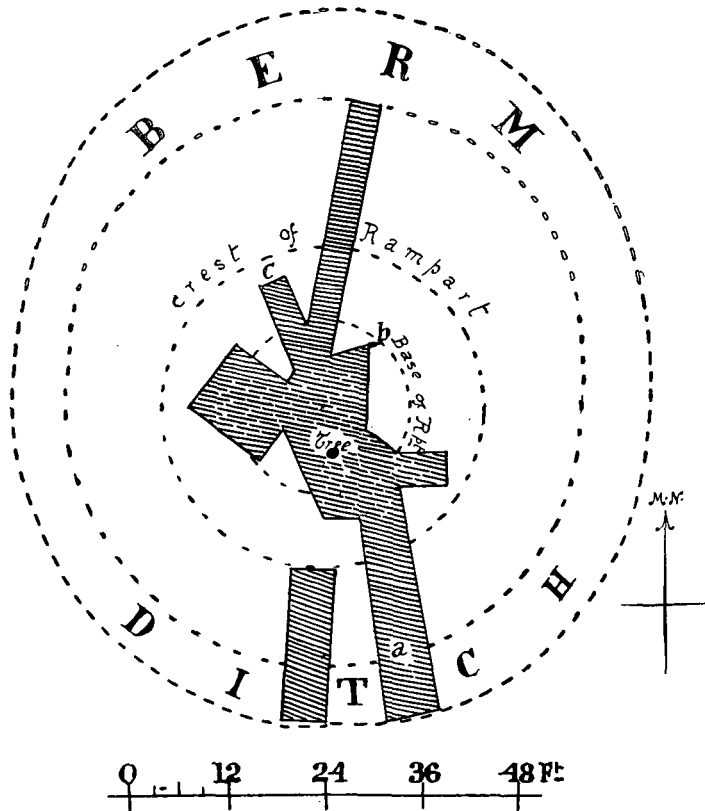
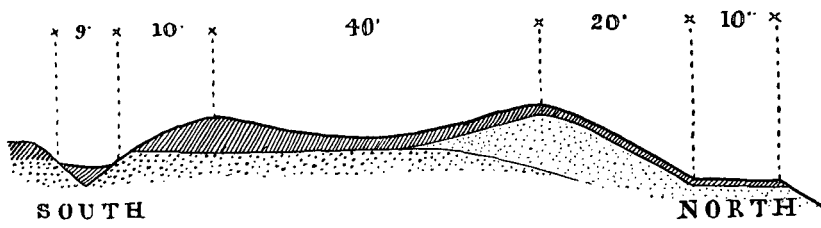


Fig. 1. Plan and Section of the Black Hill Tumulus, Meikleour.

In the trench that terminates at *c* the mould was only 10 inches deep, and overlay the apparently undisturbed gravel. There was no sand in this direction.

In the cutting west of *a*, across the ditch to the crest of the rampart, nothing was found but a few bits of charcoal, and in the ditch, at a depth of 8 inches, several pieces of an old tobacco-pipe.

In the ditch south of *a* the end of a bronze pin, $1\frac{1}{2}$ inches long, was found in riddling. It may be part of a fibula. At a depth of 2 inches, but further west, a minute fragment of transparent glass was found. At a depth of 3 feet was a little charcoal and fossilised resin. Just below this several largish, flat quarry stones and water-worn stones were encountered, but they seem to have been thrown in without any special intention. They may have formed part of the cist that seems to have been disturbed somewhere in the cutting to the north and south of *a*.

A trial pit 4 feet deep, made on the top of the hill, 21 feet from the south edge of the ditch, showed that its formation was just the same as at the centre of the earthwork. At the top there were 14 inches of soil, and then hard gravel mixed with sand.

The general date of this earthwork is afforded by the iron nails. It belongs to the Iron Age, and the time can be still further narrowed by the presence of the fragment of bluish glass. This closely resembles similar glass in the Museum from Roman camps and sites, and is itself most probably Roman. The portion of the bronze pin might also be assigned to the same time as the glass.

The flat space in the interior of the earthwork is very limited, having only an area of about 362 square feet or 19 feet square, and there is no water on the top. What was the object of constructing this diminutive enclosure, which, nevertheless, must have taken a good deal of labour? Certainly from the rampart a good and extended view of the country to the north, east, and west must have been obtainable before the trees were planted. Yet as a mere place of outlook a rampart seems unnecessary, and no site where signal fires had been lit was discovered.

In form the earthwork corresponds with Eugene O'Curry's definition of a *rath*: "The *rath* was a simple circular wall or enclosure of raised earth . . . in which stood the residence of the chief, and sometimes the dwellings of one or more officers or chief men of the tribe or court" (*Manners and Customs of the Ancient Irish*, iii. p. 3). The iron nails seem to point to a wooden structure, though the absence of pottery or of marks of cooking fires militates somewhat against the idea of permanent occupation. Perhaps the cooking was done outside. The absence of water is a matter of less moment, as the Isla flows at a distance of only about 450 yards. In Italy and Sicily I have often seen villages, perched upon the tops of high hills, where all the water has to be carried up daily by the women from wells at the bottom, a stiff climb of half an hour at the very least.

I conclude, therefore, that this small *rath* or earthwork was not intended for a fort to defend a particular point of ground, but rather for the fortified residence, perhaps of a temporary nature, of some small chief.

(2.) *Excavation of an Earthwork called the "Prætorium."*—The following week, from May 11 to May 16, was occupied in exploring a work (fig. 2) named "Prætorium" in the Ordnance Map, but locally known as "The Camp." It lies on the farm of Hall Hole at a distance of 1100 yards east of the Black Hill; it is 180 yards west of the Isla, and if the Cleaven Dike were prolonged its southern ditch would pass nearly 17 yards to the north of the northern angle of the "Prætorium." In the past it has hardly been noticed. It is ignored by the ministers that contributed to the Old and New Statistical Accounts, but Knox in 1831 (*Topography of the Valley of the Tay*) says:—"At the south-east end (of the Cleaven Dike), next the Isla, there is a square redoubt, generally supposed to have been a prætorium, but we rather think it a work constructed to strengthen the flank of the intrenchment. A small fort within (the Black Hill (Tumulus)) was more likely to have been the Prætorium." Chalmers (*Caledonia*, i. 175) considered it a Roman

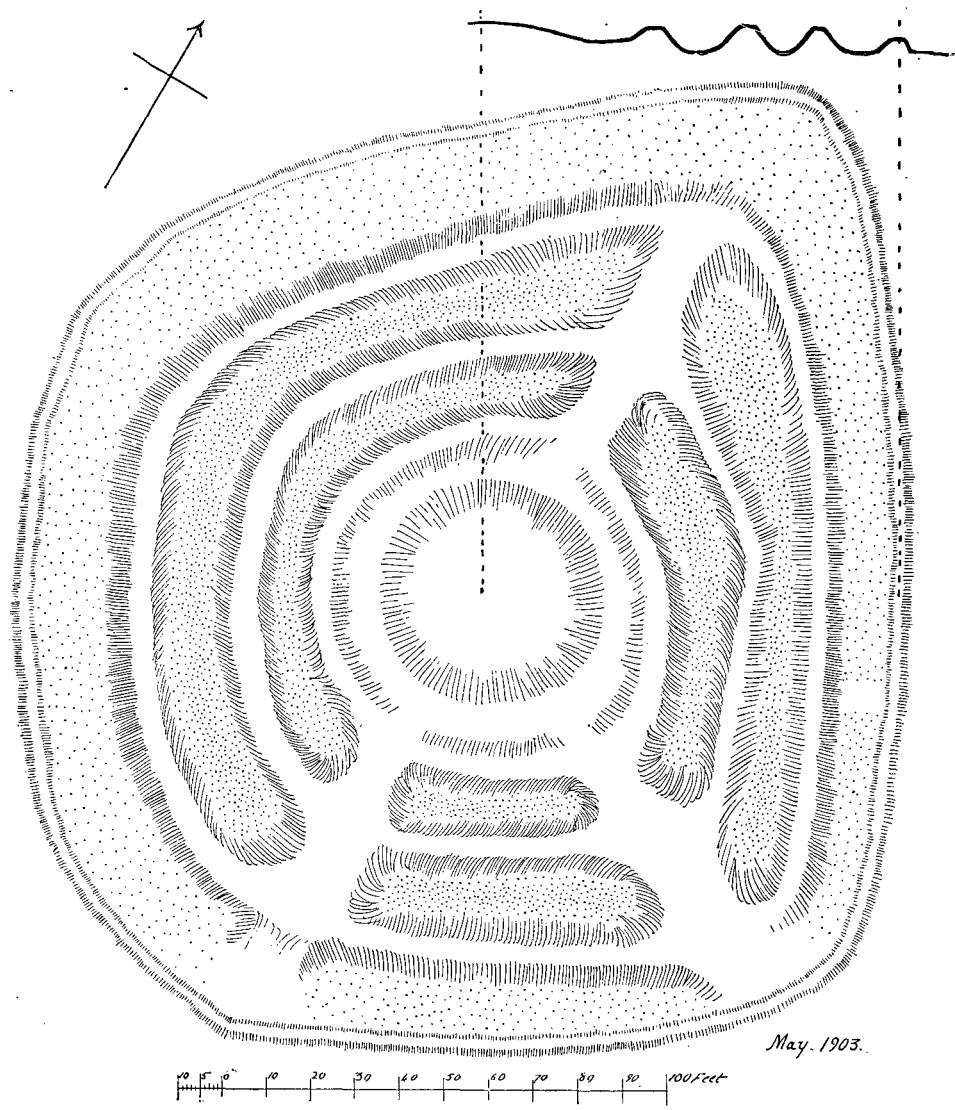


Fig. 2. Plan of the Earthwork called the Prætorium.

work, and so did Dr Skene (*Celtic Scotland*, i. 53), who speaks of it as a small Roman fort, and compares it with one of the camps at Ardoch.

The area on which the "camp" stands is now fenced in with an iron railing, and is dotted with about sixty well-grown Scotch firs, as well as with a few stumps of others that have fallen. In form the external rampart is roughly quadrilateral and quadrangular with rounded angles, and with the most acute angle directed to the north. Three of the faces are fairly straight, but the one to the south-west bulges outwards to a considerable extent. The next rampart has a similar trace, but the third is roughly pentagonal, while the inner one approximates to a circular form. At the centre there is a low circular mound, 48 feet in diameter and $2\frac{1}{2}$ feet high, which has the appearance of being sepulchral.

There are three well-marked roads from 10 feet to 12 feet wide leading to the centre of the work from the north, the south, and the south-east. There seemed to me to be slight indications that there was once an approach from the north-west, but Mr Ross will not admit this.

The extreme diagonal length between the north and south angle of the outer rampart is about 250 feet, and from the south-east to north-west angle about 225 feet. From centre to centre of opposite faces of the outer rampart measures about 207 feet and 200 feet. Although now there are four ramparts and only three ditches, there may have been originally an outer ditch, as the farmer informed me that the total area covered by the "camp" was once larger than what is now fenced in.

The exploration of the "camp" was begun by cutting a trench A B (fig. 3), 6 feet wide, across the central mound from the south-east. It was carried down to the hard undisturbed gravel, which was found at a depth of 20 inches below the natural surface. The finds were unimportant, and are best shown in the following table:—

Distance from A.	Depth.	Charcoal or Burnt Wood.	Bone.	Pottery.	Glass.	Remarks.
3'	10"	2	...	...	...
6' 3"	18"	...	2	...	...
10'	18"	1	1	1	...	Glazed.
11½'	2'	3	1	...	...
12'	...	2	1	...	...
14½'	2'	1	...	...	...	Several pieces.
16'	9"	...	...	...	1	White, transparent.
16½'	18"	...	1	...	1	"
17', 18½', 20'	1½'-2'	7	...	...	...
21½'	9"	...	...	1	...	Glazed, with yellow, white, and purple stripes.
24'	13"	...	...	...	2	Brown bottle-glass.
25', 26½', 27'	21'	...	...	...	5	Brown bottle-glass.
34'	1'	...	...	...	...	River mussel shell.
35'	18"	...	1	...	...
39'	18"	...	...	1	...	Coloured pottery; car- tridge case.
42'	18"	...	1	...	...	Minute.
45'	10"	...	...	1	...	White, glass-like china.
46'	6"	2	...	...	...
47'	12"	...	...	1	...	White, glazed.

As no indication of an interment had been encountered, the excavation at the centre was enlarged by digging a hole 12 feet by 4 feet to the north and south of it, making a total excavation at the centre of 14 feet by 12 feet. It was carried down through 2 feet of apparently untouched gravel to the undisturbed yellow sand below. A little more charcoal, two more bits of brown bottle-glass, a tin canister, and several fir-cones were disinterred, but there were no signs of an interment. The mound, and indeed the whole area of the "camp," is a regular rabbit-warren, burrowed and tunnelled through and through in every direction. This made it difficult to say for certain whether there ever had been a central interment that had afterwards been removed. If there ever had been one, it had not been enclosed in a cist, as no flat or other largish stones were met with. Some of the charred wood looked fairly recent, and like the glass, the sherds of glazed pottery, and the cartridge case, it might easily have been transported from the surface to the interior of

the mound by the constant passage of the rabbits scuttling into their holes. The mound was remarkably free from stones, and was so interpenetrated by grass roots from top to bottom as to leave the impression

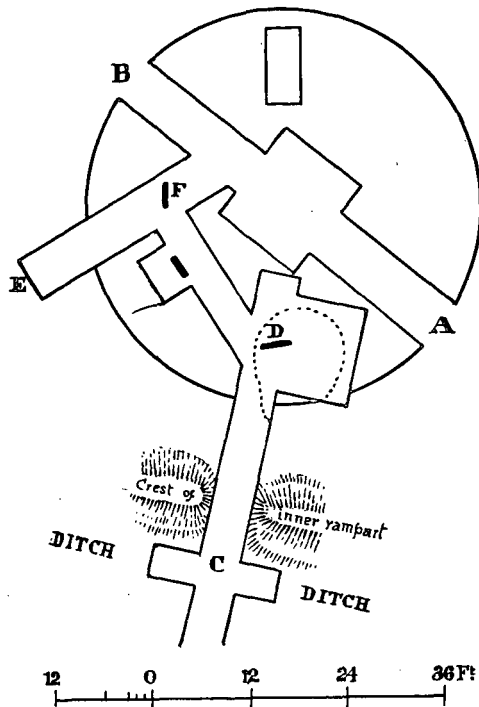


Fig. 3. Plan of the Excavations.

that it had been built of turf sods. The whole of the contents of the excavation A B was riddled with care.

The next operation was to obtain a profile of the entrenchments. A cutting 6 feet wide was made from A (fig. 3), first at an angle of 91° for the distance of 18 feet, and then at an angle of 80° so as to cut the ramparts at right angles. The present height of the three inner

ramparts is from 1 foot 7 inches to 1 foot 11 inches; the outer one is now only 1 foot 2 inches high. The distance from the crest of one rampart to another is 20 feet, except in the case of the outer rampart, which is only 15 feet apart from the third. The ditches seem to have silted up to the extent of about 3 feet, though it was hard to ascertain this fact exactly. Allowing the earth to stand at an angle of 45° , the original height of the ramparts above the natural surface was only 4 feet. These were composed of mould and gravel. Hardly anything was discovered in the course of the excavation. In the ditch nearest the

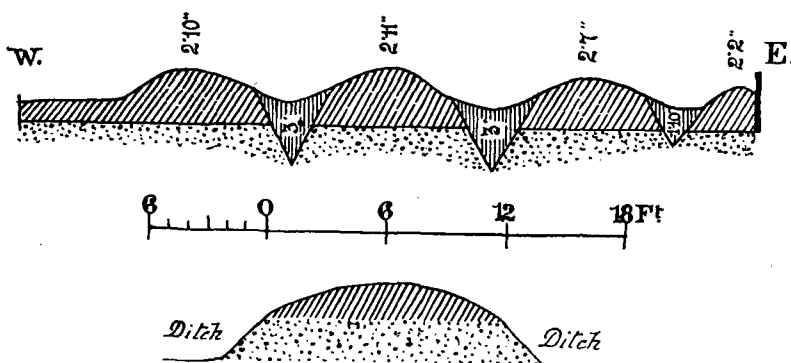


Fig. 4. Section of Ramparts and Section across south road. (The vertical scale given is double the horizontal scale.)

centre, at a depth of 9 inches, was a piece of river-mussel shell, and another piece was found 10 feet from the end of the trench. On the inner side of the second rampart, at a depth of 10 inches, was a bit of glass and another of charcoal. Though the contents of this trench were not riddled, it is not likely that any object of importance was missed.

The next operation was to cut a section $4\frac{1}{2}$ feet wide across the south road where it traverses the ditch between the second and third ramparts, and then to examine the road itself by means of a cutting towards the centre of the mound. The width of the road at its base is 16 feet, and

from 10 feet to 12 feet at the top. Its surface, after removing the turf and overlying mould, was found to consist of gravel mixed with earth. Though a few largish stones were observed, there was no pavement and no signs of tamping. The roadway had been formed by merely interrupting the course of the trenches. The cutting along the south road northwards from the point C (fig. 3) towards the centre of the mound was $4\frac{1}{2}$ feet wide and carried down to the hard gravel. At 18 feet from C, just at the base of the mound, a quantity of rounded, water-worn stones, forming a thin layer, were encountered in the eastern half of the trench, and these continued for a distance of 8 feet. At 27 feet from C a slab of highly fissile sandstone D, measuring 2 feet long by 10 inches wide and 2 inches thick, was seen set up on end athwart the cutting in a north-easterly direction. Four other thin slabs of irregular form, with a greatest length of from 1 foot 7 inches to 10 inches, and $\frac{1}{2}$ -inch thick, were set up on end in prolongation of the first slab. They were slightly embedded in the underlying gravel, and had the appearance of forming one side of a short cist. The excavation was enlarged $8\frac{1}{2}$ feet eastwards and 12 feet 10 inches southwards, to see if there really was a cist, and to trace the extent of the stony layer. This was found to thin out towards the south. Though the excavation was carried down $2\frac{1}{2}$ feet to the hard, undisturbed gravel, nothing was found to indicate that an interment had taken place, and I did not at the time recognise it as such. A cut was then made from the point E (fig. 3) in a north-easterly direction. Pebble stones were found just under the surface, beginning from the base of the mound, and continuing towards the top, but they were thinly spread and less numerous than in the last cutting. At a distance of 15 feet from the centre and 6 feet from the upper end of the cutting, at a depth of 1 foot, a largish freestone F was found standing on end in a position bearing nearly north-north-west and south-south-east. It measured 2 feet 3 inches by 18 inches, by 8 inches thick. At 2 feet south of this stone a handful or two of red, burnt earth and some charcoal were observed. In riddling the soil to the south of the stone about twenty fragments of burnt bones and charcoal, and a small

globule of vitrified matter, with a thorn-like process projecting from it, were brought to light. A large tree-stump stood about a foot south of the stone at the west edge of the cut. When first planted it is possible that the interment had been disturbed, though I am not inclined to think so.

To complete the examination of the mound on the south-west side, a 5-foot trench was cut to connect the last cutting with the one along the south road. At a distance of 16 feet from the centre, the top of a sandstone slab G was found 1 foot below the surface. It measured 2 feet 9 inches by 1 foot 3 inches, and was $1\frac{1}{2}$ inches thick, and stood on end in a position bearing nearly north-west and south-east. A thin layer of water-worn pebbles lay all round the slab. In riddling, six pieces of burnt bone, a bone button (modern), and a small fossil marine shell were picked out.

It is quite evident, I think, that the mound contained three cinerary interments, though the mode of interment presents a novel feature. Cremated burials without any urn or cist are not infrequently met with, but here a single slab or a line of short slabs was set up on end, and the ashes were laid beside it, while the ground round it was strewn with pebbles. It is true that the quantity of bone and charcoal found with these interments was extremely small; in one instance none were observed, but this circumstance may reasonably be attributed to the dispersing agency of rabbits. The pieces of bone and charcoal discovered in the first cutting A B may easily have been brought from these interments though situated several feet apart.

The last excavation was a trial pit on the north-west side of the mound, measuring 8 feet by 4 feet by 3 feet deep. Nothing at all was found. Three or four large Scotch firs to the north and north-east prevented any excavations in these directions.

With regard to the so-called "Prætorium" or "Camp," several questions present themselves. (1) Was it Roman or native? (2) Was it intended for a fortified post? (3) Is the sepulchral mound coeval with the ramparts?

In answer to the first question it may be said that the work is native. The irregularity of the trace and the complete absence of any find of Roman origin leave no doubt on this point.

The second question cannot be answered so positively. The site in some respects is unfavourable for a fortified post. The free space at the centre of the earthwork is small, and the position has the disadvantage of lying in a shallow natural basin, so that to the north, the east, and the west the view is limited to a distance of about a quarter of a mile or less. Towards the south, the eye can range rather farther down the course of the Isla towards its junction with the Tay. On the other hand, it is protected to the north-east, east, south, and south-west by the Isla, which here forms a loop. To the east and north-east the river flows at a distance of from 170 to 190 yards; to the south and south-west at a distance of a little over 400 yards. And as the ground slopes gently from north to south, an enemy advancing from the south would have to attack slightly up-hill. But in the days when fighting was nearly all hand-to-hand, and the effective range of the bow was limited to about 100 yards, the protection afforded by the river is somewhat illusory, especially as it can be crossed in many places when the water is low in summer. The earthwork does not seem to stand in any relation to the Cleaven Dike, the object of which is still an enigma. If this was a defensive work, and extended, as is supposed, from the Isla to the Tay, its front lay to the north. If the existing portion of it were prolonged in the same direction so as to touch the Isla, the Cleaven Dike would pass a few yards to the north of the "Prætorium," which would therefore be in rear of it, and none of its faces would be parallel to that of the Cleaven Dike. It could never, therefore, have been erected as a fort to flank the dike.

The third question, whether the sepulchral mound is coeval with the ramparts, cannot be answered with certainty. A tumulus surrounded by a circular trench, and sometimes by an external rampart or earth-wall, formed by the spoil from the trench, is a recognised type of sepulchral barrow, especially in Wilts. But here there are four earth-walls and

three, perhaps four, ditches which do not conform to the circular shape of the enclosed mound. It is therefore possible, and perhaps probable, that the mound and the interments are later than the ramparts. The interments seem to belong to a late period, and the earthwork surrounding them would therefore be somewhat older, though, broadly speaking, contemporary. In that case, although, from insufficient examination of the whole site, no relics were discovered, it may be that the "Prætorium" was not a fortified post, but merely a fortified dwelling, afterwards turned into a place of burial. In Ireland interments have frequently been discovered in *raths*.