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# Yeavering Bell hillfort, Northumberland

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# YEAVERING BELL HILLFORT, NORTHUMBERLAND

Archaeological Investigation Report Series AI/24/1998

NMR No: NT 92 NW 62 NGR: NT 9280 2930 SAM No: Northumberland 157

Surveyed June 1998 Surveyed by T. Pearson, K. Blood, M. Jecock and S. Ainsworth Report by T. Pearson Drawings by T. Pearson

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# **CONTENTS**

LIST OF ILLUSTRATIONS	
INTRODUCTION AND BACKGROUND TO THE SURVEY	1
GEOLOGY, TOPOGRAPHY AND LAND USE	4
HISTORY OF RESEARCH	5
DESCRIPTION	
The Fort bank	8
Quarries	15
Hut sites	17
The Ditched enclosure	20
Miscellaneous features	21
The West Exterior enclosure	23
The East exterior enclosure	24
DISCUSSION	25
METHODOLOGY	33
ACKNOWLEDGEMENTS	34
BIBLIOGRAPHY	35
APPENDIX 1. List of hut platforms recorded during the survey	37
APPENDIX 2. Table of NMR numbers linked to the survey	42

# LIST OF ILLUSTRATIONS

# Figures

Figure 1: The location of the site.	1
Figure 2: Terrain model of Yeavering Bell viewed from various angles.	3
Figure 3: RCHME plan of Yeavering Bell Hillfort surveyed at 1:1000 scale.	inside back cover
Figure 4: Features related to the perimeter of the hillfort and the two exterior enclosures.	9
Figure 5: Features within the hillfort and the two exterior enclosures.	16
Figure 6: The hut platforms.	18
Figure 7: Location of Hope-Taylor's excavation trenches.	22
Figure 8: Plan of the putative phase one enclosure.	26
Figure 9: Plan showing the distribution of hut platforms.	29

# Plates

<i>Plate 1: Part of the fort bank on the north-west.</i>	12
Plate 2: Recent shelter on the inside of the north bank.	13
Plate 3: A section of the exterior wall face on the east side of the fort.	14
Plate 4: Part of the inside of the fort bank on the south-east.	15

## INTRODUCTION AND BACKGROUND TO THE SURVEY

In June 1998 the York Office of the RCHME undertook a 1:1000 scale earthwork survey of Yeavering Bell hillfort in Northumberland (NMR No. NT 92 NW 62). The survey was requested and partly funded by the Northumberland National Park (with grant aid from the E.A.G.G.F.) to help interpret the remains and assist in the management of the monument. The site, which is scheduled (Northumberland 157), is in the ownership of Lord Anthony Hill.

Yeavering Bell hillfort is situated at NT 9280 2930, 6 kms (4 miles) west of the market town of Wooler (Fig. 1) at an altitude of between 336m and 360m (1102 and 1181ft) above OD. The fort is twice as long as it is broad, measuring up to 340m east-west and 170m north-south and its perimeter is defined by a single bank of tumbled stone enclosing an area of 5.6ha (13.8 acres). There are two subsidiary, crescent-shaped, stony banks on the outside of the east and west ends of the hillfort which are much less prominent than the main enclosure bank. The interior of the hillfort contains the visible remains of 125 sub-circular hut platforms along with a variety of quarries and a small, penannular, ditched enclosure.

The hillfort is the largest in Northumberland (Hope-Taylor 1977, 6), but unlike comparably sized sites in south Scotland such as Traprain Law and Eildon Hill North, Yeavering Bell has not been extensively excavated or the subject of detailed survey.

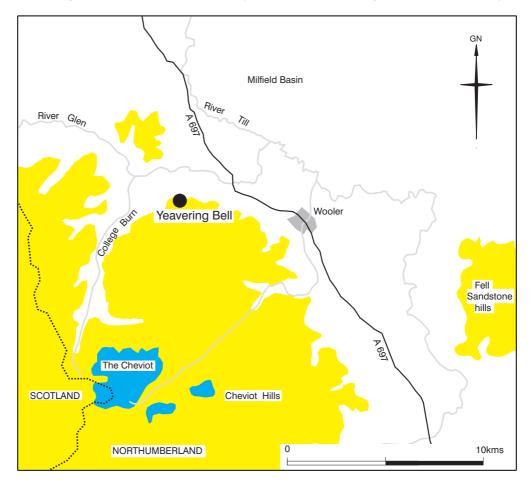
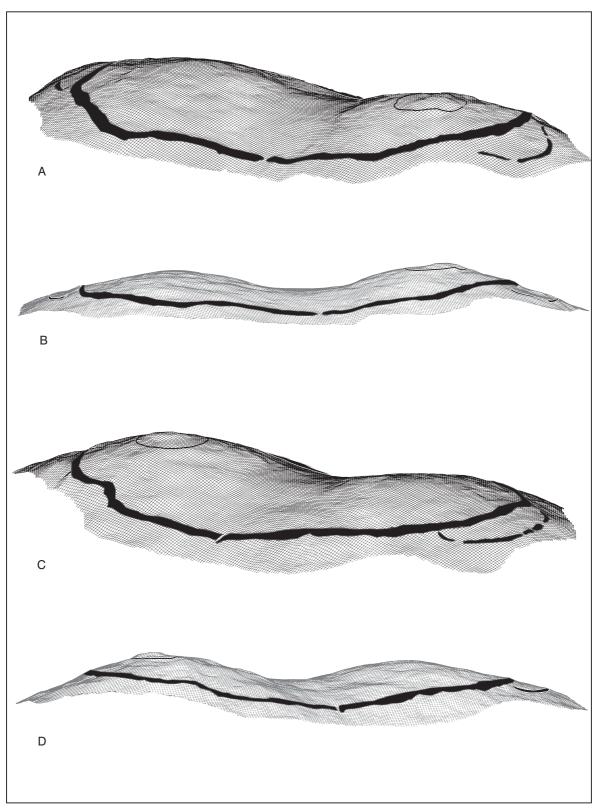


Figure 1. The location of the site George Tate undertook the earliest recorded excavations; these were published in 1862 (Tate 1862, 431 - 438) and in the 1950s, Brian Hope-Taylor dug in the hillfort whilst engaged on major excavations on the site of Yeavering Anglo-Saxon palace at the north foot of the hill at NT 925 306 (NMR No. NT 93 SW 11). The account of these excavations (Hope-Taylor 1977, 6-9) is illustrated by the only large-scale archaeological survey of the monument to be published and which is mainly based on the work of George Jobey (Jobey 1965, 33). However, the plan depicts features such as the tumbled perimeter wall and hut platforms in a schematic fashion, making it likely that a more intensive field survey would give a fresh insight into this major prehistoric monument.



*Figure 2. Terrain model of Yeavering Bell viewed from: (A) the south-east at an elevation of 15 degrees; (B) the south at an elevation of 0 degrees; (C) the north-west at an elevation of 15 degrees; (D) the north at an elevation of 0 degrees* 

## GEOLOGY, TOPOGRAPHY AND LAND USE

The monument occupies an isolated hilltop on the north-east flank of the Cheviot Hills. The hill is formed of andesitic lavas, part of the complex of igneous rocks of probable Devonian age which give rise to the rounded hills of the Cheviot massif (Taylor 1971, 28-9). Apart from a few isolated rock outcrops, the interior of the hillfort is covered by a thin soil supporting a mixture of coarse grass and bilberry whilst the slopes below the fort are strewn with rocks and boulders, apart from on the south where they appear to have been cleared. The hilltop is grazed by sheep and a herd of wild goats.

Yeavering Bell offers contrasting views across the Northumberland landscape. On the south the hillfort looks across a broad, 'U' shaped valley to a solid mass of opposing hillside above which the higher peaks at the centre of the Cheviots are glimpsed. The most distant view in this direction is to The Cheviot itself some 9kms (5.5 miles) to the south. Turning west, the landscape opens out with views along the Cheviot range to the Eildon Hills almost 40kms (25 miles) away and the north side of the hill looks out over the broad valley of the River Glen and far beyond to the Lammermuir Hills 50kms (31 miles) distant. Eastwards the view is over the lowlands of the Millfield Basin to which the coast serves as a distant backdrop, 25kms (15 miles) away.

The hillfort entirely encloses the top of Yeavering Bell (Figs. 2 and 3) which is formed by two opposing peaks of unequal height. The east summit dominates the hilltop, rising 4m higher than its neighbour to the west and 10m above the saddle which separates them. The crest of this saddle and the summit of the two peaks is the only level ground of any note in the hillfort. The north side of the hill falls away steeply for 300m down to the valley of the River Glen as does the west side, descending to the valley of a tributary stream. The east flank of the hill is as steep as on the north and west but the gradient is broken by a shoulder of relatively flat ground 50m below the hilltop. The south side has by far the gentlest descent dropping by less than 100m to the bottom of the 'U' shaped valley separating Yeavering Bell from the interior of the Cheviot massif. The stream in the bottom of this valley is the closest source of fresh water to Yeavering Bell and the slope down to it bears traces of having been cultivated since it is relatively free of surface stone and is crossed by several lynchets.

#### **HISTORY OF RESEARCH**

Antiquarian interest in the area started with Camden in the 16th century who equated Yeavering with the 7th-century Northumbrian royal residence of *Ad Gefrin* mentioned in Bede's *History of the English Church and People*. Bede, whose history was completed in 731, recounts how the missionary Paulinus undertook a mass baptism in the River Glen whilst staying at *Ad Gefrin* around the year 627 (Hope-Taylor 1977, 1).

The proximity of the royal residence to the River Glen implied in Bede's account of the baptisms probably explains why no tradition seems to have built up associating the remains on Yeavering Bell with the palace, the site of which was subsequently identified adjacent to the river at NT 925 306 (Hope-Taylor 1977, 1-5). Instead, the hillfort was viewed by antiquarians as a druid temple based largely on a fanciful idea that the name Bell derived from the name of the god, Baal. An ancient looking stone building at the foot of the hill in the hamlet of Old Yeavering was held to be a surviving part of the 7th-century palace (Hope-Taylor 1977, 14). These theories were roundly dismissed by Tate who published the first detailed archaeological description of the hillfort and its environs in 1862. He observed that the supposed palace building in Old Yeavering was more likely to be medieval than Saxon in date (Tate 1862, 433), a conclusion also reached by Hope-Taylor after excavating in the building in 1955 (Hope-Taylor 1977, 14). Tate also rejected any notion of Yeavering Bell being a druid temple though in mentioning that a cairn with a large stone on the summit was thought to be an altar, Tate draws our attention to a feature of the monument which no longer survives.

In not being swayed by "imaginative antiquaries" as he termed them, Tate put the study of the monument on a modern footing. His published description, using both field evidence and the results of a limited amount of digging, contains many relevant observations. He estimated the perimeter wall, which he dug into in three places, was originally between 10 and 12 feet thick and 7 to 8 feet high and constructed without bonding from stones gathered from the surface of the hill. He found evidence that the inner and outer faces had been constructed on a batter making the wall narrower towards the top. He identified four gates through the wall, one on each side of the fort, and found that the one on the south was the widest at 12 feet, leading him to conclude that this was the principal entrance. He excavated here, finding what he thought was a guard chamber on the west side of the gate.

Tate noted the existence of hut platforms in the interior of the fort cut into the hillside and he excavated several of them, either by trenching across them or clearing them entirely. He estimated most of the huts to have been between 24 and 30 feet in diameter and finds included the upper stone of a quern, sherds of pottery and a round jasper ball. However, Tate's account says little about the construction of the huts.

Also on the interior of the fort, Tate investigated the ditch and bank which encircles the east summit of the hill. In excavating across the ditch Tate found it to be rock-cut and about five feet deep increasing in width from two feet at the bottom to five feet at the top. The bank on the outside of the ditch was one foot high. He noted an entrance on the east side but dismissed earlier accounts of a paved way leading up to this gap as the mistaken interpretation of natural rock outcrops. Within this ditch, Tate's attention was drawn to a small oval enclosure measuring 13 feet from north to south by 10 feet from east to west occupying the summit of the hill. He cleared a 15 inch depth of small stones and earth from the interior to reveal that the enclosure was excavated out of the bedrock and was strewn with charred wood.

The plan published along with Tate's paper (at a scale of eight chains to one inch) depicts the main features of the hillfort and shows 14 hut platforms picking out the three whose excavation is described in the report. Four years prior to the publication of Tate's paper MacLauchlan made a plan of the site at the same scale (MacLauchlan 1858). Like Tate, he depicts the main features of the monument and additionally shows a wide track leading up to the south entrance. He puts the word "Beacon" next to the top of the east summit, but this could be his own interpretation of the cairn which Tate later excavated on the hilltop or he may have confused the naturally red colour of the rock which outcrops here as evidence of a beacon fire.

Following the publication of Tate's paper, no further excavations are recorded at Yeavering Bell until 1958 when Hope-Taylor dug on the hilltop, five years after starting to dig the site of the 7th-century royal complex at the north foot of the hill. Undoubtedly his main interest in digging on Yeavering Bell lay not with the hillfort but with finding traces of activity contemporary with the palace site. This is evident from the only published account of the excavations which appears in the report on the palace site (Hope-Taylor 1977, 6-9) from which we learn only that two late Roman coins and three sherds of Samian ware were found in the interior of three of the excavated huts. Hope-Taylor draws several important conclusions about Yeavering Bell without explaining the evidence. He maintains that the hillfort "was built at the end of the first millenium BC and that its heyday came to an end in or by the first century after Christ," and that the enclosure around the east summit predated the hillfort.

There is no published plan indicating where Hope-Taylor excavated but from aerial photographs taken of the hilltop during the excavation campaign (St Joseph 1958) he seems to have dug mainly around the north side of the east summit, and at the putative north gate. However, these photographs do not give the complete picture. They show nothing of the dig near the south gate, a view of which Hope-Taylor published in the palace report, and it is possible that other trenches escaped being photographed from the air.

The plan of the hillfort which illustrates Hope-Taylor's excavation account is at a scale of about 1:2000 and is labelled as being mainly after Jobey, presumably referring to the plan published by Jobey in 1965. This plan is at a scale of about 1:3000 and accompanies a short description of the hillfort (Jobey 1965, 31-5; 43-4). Although mainly concerned with the hut platforms, Jobey does put forward the suggestion that the subsidiary enclosures, which he called annexes, at the east and west ends of the hillfort may have been for corralling stock (Jobey 1965, 43-4).

Jobey puts the total of huts visible inside the hillfort at around 130 (the plan shows 125) and observes that most consist of circular or oval platforms scooped and levelled from the hillside. He noticed that some bore the traces of ring-groove construction whilst a few with low ring-mounds he thought denoted more substantially built huts.

Five of the ring-groove huts stand out on the accompanying plan but Jobey does not distinguish the ring-mound sites separately from the rest of the platforms. Four hut sites are shown at a larger scale to demonstrate the typology and these are individually numbered suggesting Jobey prepared a catalogue of all the platforms; this catalogue, if it ever existed, can no longer be traced.

The following year Jobey published a further short description of Yeavering Bell identifying the ditch around the east summit as a palisade trench, stating that it appeared to be earlier than some of the hut platforms (Jobey 1966, 97-8). This identification has been accepted uncritically by subsequent authors, such as Higham, who cite Yeavering Bell as an example of the so called "Hownam Succession" of the Tyne-Forth region where a palisaded site of around 500bc pre-dates the construction of a hillfort (Higham 1986, 120). However a field description of the fort compiled as part of the RCHME Yeavering Estate survey of 1986 pointed out that the enclosure ditch cuts across several hut platforms indicating it actually post-dates, rather than pre-dates, the occupation of the hillfort (NMR 1986). This revision has tempted speculation, as yet unsupported by any evidence, that the enclosure may be associated with the 7th-century palace site (Welfare 1992, 639).

#### DESCRIPTION

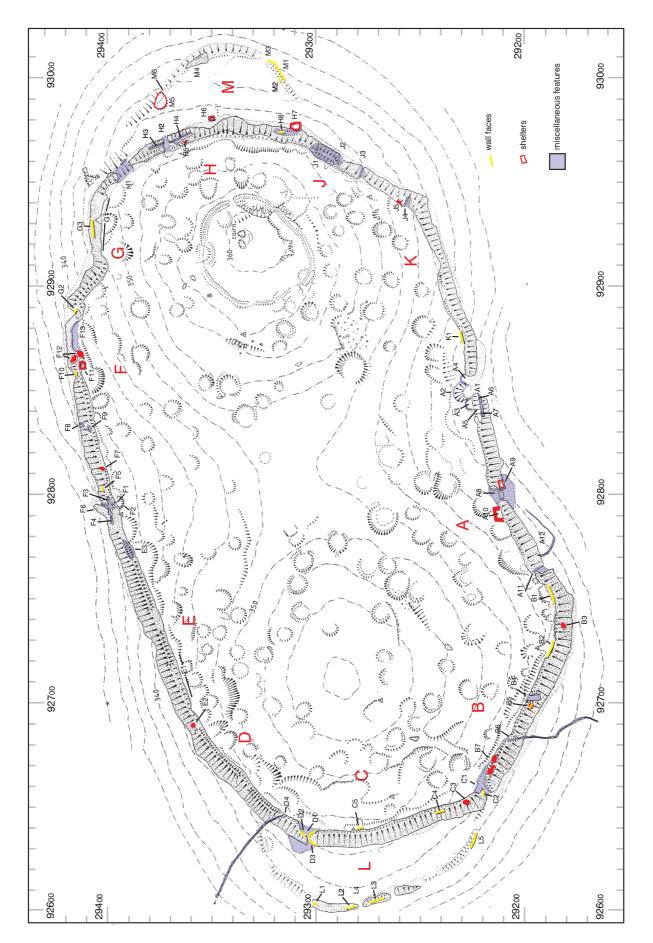
#### THE FORT BANK (Fig. 4)

The hillfort enclosure is defined by a substantial stone bank; the tumbled remains of the probable former wall structure indicated by Tate's excavations. There is no evidence of an external ditch. However, on the inside, an intermittent quarry ditch is evident and this is presumably the main source of stone for the wall. The fort bank is mostly between 8 and 9m wide and composed of native rocks ranging in size from pebbles to large boulders up to 1.0m across. Because of the sloping ground which the bank traverses, it is generally about 2-2.5m high when viewed from the outside and around 0.5m high on the inside. It stretches for a distance of just over 900m around the hilltop but does not hug the natural contours as closely as some have reported (NMR No. NT 92 NW 62; Authority 6 - E Geary, 1955) since there is a difference in altitude of 16m between the lowest and highest parts of the circuit. The lowest points are at the south and north entrances which are both at 336m above OD and the highest is on the east side of the east summit where the bank is at 352m above OD. There is no difference in height between the lowest points on the north and south circuits, but because the gradient on the south side of the hill is much less than on the north, the enclosure appears to tip towards the south when viewed from a distance (Fig. 2).

The wall has collapsed so completely that there are few indications surviving of the original wall structure. At several points towards the middle of the bank are short stretches of poorly coursed, drystone walling which might be the outside face of the wall. Also, mainly on the west and north sides of the hillfort, the proportion of small stones in the make-up of the bank increases markedly within 3.0m of the inside edge. This could represent the rubble core of the wall as distinct from tumbled material represented mainly by large stones and boulders towards the outside of the bank.

The bank is pierced by several gaps, most of which are probably quite recent although up to four have been claimed as original entrances (Tate 1862, 435-6). Other features associated with the bank clearly post-date the collapse of the fort wall and consist of a variety of small shelters and stretches of secondary walling. To assist in the detailed description of the enclosure bank and associated features, it has been divided into ten sections (A-H, J-K) and individual features within each section are numbered in sequence (eg A4, H7) and illustrated on Fig 4.

At A1 is the south entrance into the enclosure. It is 4m wide and stone free, suggesting it is contemporary with the fort wall and not a later entrance pushed through the collapsed bank. The earthfast boulders at the west side of the gap could be significant and represent one side of the original entrance passageway and the 0.6m deep hollow (A2) in the hillslope immediately to the rear could have been eroded by the passage of traffic. Flanking the west side of the entrance on the inside of the bank is a semi-circular, turf-covered bank 0.2m high (A3) in which several small stones are visible. This may be the guard chamber excavated by Tate in the 19th century (Tate 1862, 436) and it is mirrored by a semi-circular bulge on the opposite side of the entrance (A4) defined by a light scatter of stone rubble.



At the west side of the entrance, the northern section of bank has been partially removed down to ground level, (A5) and to the south stones have been cleared away and piled on the south side to make a linear hollow 10m long and 1m wide following the line of the bank (A6). The looseness of the stones piled on the south side of the hollow suggest it is relatively recent in date but unless it was made by an archaeologist searching for a wall face next to the entrance, this feature remains unexplained. Similar features occur at the north entrance (F3 and F4), which is known to have been excavated, and elsewhere at H3, H4 and H8 (see below).

Between A and B the bank is about 0.4m high internally and 2.2m high externally. At A8 it has been almost removed down to ground level, possibly to provide stone for two adjacent, and therefore relatively recent, structures. That on the outside of the bank (A9) has very tumbled walls mostly built with large stones above 0.2m in size. The second (A10) is built against the inside of the bank and is defined by a turf-covered ridge 0.3m high and between 1.1m and 2.0m wide forming three sides of a rectangular structure. This was excavated by Hope-Taylor (Hope-Taylor 1977, Plate 11).

A further gap in the enclosure bank (A11) may have been to provide material for a drystone wall (A12) which defines a small, roughly triangular, plot of land 10m north-south by 30m east-west, against the outside of the fort. The western section of this drystone wall is partially tumbled and stands 0.5m high but after it turns to the east it is only represented by a line of earthfast stones, the rest of it having either tumbled down slope or been robbed away. There is no evidence of it being occupied or cultivated and it could well be a relatively recent stock-enclosure.

The bank in section B is around 2.8m high on the outside and between 0.5m and 0.9m on the inside. At B1 and B2 are two sections of rough walling on the inside edge of the bank standing to a height of 0.9m. Neither wall looks sufficiently robust to have stood for any length of time and therefore they are more likely to be recent windbreaks than parts of the original inner face of the wall. A small circular shelter has been cleared in the centre of the bank (B3) to a depth of 0.9m. The north side has partially collapsed.

The rear of the bank has been cleared down to ground level at B4 and the stones piled up mainly to the east and south. This could mark the site of an archaeological investigation of the fort defences at a point where part of the outer facing is visible in an adjacent shelter (B5). This shelter is 1.2m deep and sited at the crest of the enclosure bank. At its base are three long narrow stones laid edge to edge which could be headers at the base of the outside face of the fort wall. If this is the case it is possible to estimate the thickness of the wall at this point at about 3.1m.

At B6 the bank is overriden by a stone boundary wall which climbs up the south side of the hill from a complex of ruined buildings at the foot of the slope at NT 9269 2904, thought to have been most recently used as a sheepfold (NMR No. NT 92 NW 65). The partially-collapsed boundary wall is around 0.9m high and fades out after surmounting the crest of the hillfort enclosure bank. At this point a slight hollow on the east side of the wall probably indicates where stones have been taken from the bank to build the wall as might a series of 1.0m deep hollows to the west (B7). In section C the bank is about 2.3m high on the outside and 0.6m on the inside and is separated from the previous section by a 2m wide gap at C1 which is probably not an original entrance. The large number of earth-fast stones visible in this gap probably represent a combination of tumble and wall footings left after the rest of the stones had been cleared away to make this passageway. Stones seem to have been piled up on either side of the gap to a height of 0.6m and they have also been cleared for a distance of up to 8m on the inside of the bank. The clearance of stones on the north side of the passageway has revealed a line of three boulders up to 0.7m high at ground level (C2) which look like *in-situ* wall foundations except that they are angled at about 45 degrees to the assumed line of the fort wall to the north. As will be discussed below, this feature could be evidence of an earlier phase of hillfort construction.

At C3 is a hollow in the crest of the bank 0.8m deep, 10m to the north of which is a well-preserved section of the outside face of the wall (C4). It is 1.2m high and very poorly coursed consisting mainly of large boulders with an infilling of smaller stones. The face appears to lean inwards slightly recalling Tate's description (Tate 1862, 435) that the fort wall was built with sloping sides. Three massive boulders on the inside of the bank at C5 could mark the interior line of the fort wall.

The most upstanding part of the enclosure bank is to be found in section D where it attains a maximum height of 1.2m on the inside and 2.6m on the outside. At D1 there is a 1m wide gap in the bank which widens out on the inside to around 10m. It is unlikely to be an original entrance. Instead, the quantity of earthfast stones in the gap suggests the bank has been removed to ground level to make the passageway whilst the apron of displaced stones which stretches 5.0m downslope is further evidence that the bank has been disturbed at this point. Some of the cleared stones have been heaped up to make crude walls up to 0.7m high flanking the sides of the gap (D2 and D3). That on the south side goes right around to the outside of the bank indicating it post-dates the build-up of tumble caused by the collapse of the fort wall. A partially collapsed stone boundary wall ascends the north side of the hill and overrides the bank at D4 where it gradually fades out. It starts from an area of enclosures towards the foot of the hill at NT 9252 2978 which are probably the remains of a Romano-British or later farmstead (NMR No. NT 92 NW 59).

There are fewer large stones visible in the make-up of the bank in section E, and the stones also appear more rounded than elsewhere on the circuit (Plate 1). The reasons for these differences are not obvious but could be because the stones were gathered from the hillside where they had been subject to weathering and hence appear more rounded than freshly quarried material. On the inside the bank is up to 1.0m high but viewed from the outside the bank is as little as 1.4m high at E1, mainly because it partly occupies a shelf in the side of the hill. As it moves onto more sloping ground its exterior height increases to a maximum of 3.0m. At E2 there is a circular hollow in the crest of the bank 1.0m deep which is probably a relatively recent shelter, whilst at E3 stones have been loosely piled up on the inside of the bank to a height of 1.1m, perhaps to serve as a windbreak.

In section F large stones re-appear in the make-up of the bank which attains a maximum height on the inside of 0.8m and 2.2m on the outside. There is an entrance into the enclosure at F1 which is a maximum of 2.4m wide, becoming narrower towards the exterior. The west side of the entrance is defined by several large earthfast



Plate 1. Part of the fort bank on the north-west, (section E) looking east

> boulders, which, together with the sparsity of stones in the gap, suggests this might be an original entrance. Further weight is added to this suggestion by the 1.3m deep hollow in the slope of the hill on the inside (F2) which could have been eroded by the passage of traffic through the gate. On the other hand, Hope-Taylor's published photograph of the excavation here shows a line of stones running across the inside of the entrance which could indicate that the fort wall was originally continuous at this point (Hope-Taylor 1977, Plate 12).

> Hope Taylor's excavation might account for some of the disturbance to the bank visible at this point. On either side of the entrance the bank has been cleared to ground level making two linear hollows parallel with the line of the enclosure. That on the east is 4.0m long (F3) and on the west 8.0m (F4) and although their purpose is obscure, they could have resulted from stone being cleared in the search for an exterior wall face, especially as a short stretch of wall face 0.5m high (F5) is visible immediately to the east of F3. Stone cleared from the site of the excavation could have been piled downslope explaining why the bank extends as a loose pile of stones for 5.0m down the hillside below the west side of the entrance (F6).

At F7 is a circular hollow 0.4m deep which is probably a relatively recent shelter whilst at F8 the outside of the bank has been removed forming a rectangular trench with sides 0.5m high (F8). This is close to one of the points where Hope-Taylor was excavating in 1958 and therefore it could be the remnant of one of his trenches. This is especially likely because an adjacent stretch of neat walling 0.8m high built on the inside of the bank (F9) is probably the section of fort wall re-built by Hope-Taylor (Welfare 1992, 638-9). A stretch of exterior wall face survives at F10 to a maximum height of 0.8m high and the use of long narrow stones as headers are evident in its construction. Nearby is a sub-rectangular structure built against the inside of the bank (F11) defined by a collapsed, double-thickness wall standing to a maximum height of 0.9m (Plate 2). Several hollows, 1.0m deep, (F12) adjacent to this shelter probably indicate where stone was taken for its construction demonstrating that it is relatively



Plate 2. Recent shelter (F11) on the inside of the north bank

recent. The entrance to this structure was on the south-west whilst a large boulder about 0.8m high and 1.0m long in the north-east corner is probably a surviving part of the inside face of the fort wall. Bilberry growth at F13 obscures part of the enclosure bank.

The steepest part of the circuit occurs in section G where the bank turns sharply to the south-east and rises 6m up the side of the hill in a distance of a little over 20m. The reason for this sharp change in alignment was probably to exclude the steep hillside at this point from the fort. The bank is 0.8m high on the inside and 2.2m on the outside as it climbs the slope but on the summit it is virtually flat. Here the quantity of stone in the bank is far less than anywhere else around the circuit (G1) and is composed mainly of pebble-size fragments and small stones up to 0.2m long evidence, perhaps indicating that the hillfort bank has been extensively quarried at this point. At G2, before the bank climbs the slope, a poorly coursed stretch of outer wall face is evident standing to a height of 0.9m high and a second face (G3) survives at the top of the slope where the bank is almost flat. This is formed by an intermittent line of boulders 0.5m high.

Larger stones, including boulder-size pieces, appear once again in the make-up of the bank in section H. The inside of the bank is a maximum of 0.5m high and on the outside gains added prominence because of the steep slope across which it runs, attaining a maximum height of 3.5m. At H1 the bank virtually disappears due to a combination of vegetation encroachment and quarrying downslope. Stones have evidently fallen off the bank into the quarry and others may have been taken as part of the quarrying operations.

A gap through the bank at H2 is between 2.0 and 2.5m wide and stones have been piled up on either side presumably to make the entrance wider. This possibly occurred in 1958 when Hope-Taylor was digging nearby, as the fresh tyre tracks visible on aerial photographs taken at that time (such as St Joseph 1958, XG40) indicate tracked

vehicles belonging to the excavation used this opening. As both Tate (1862, Plate 15) and MacLauchlan (1858) show this gap in the enclosure bank it must pre-date Hope-Taylor's excavations and it is possibly contemporary with the ditched enclosure on the east summit as it is astride the direct route up the hillside to the entrance into the enclosure. However, there is nothing which marks it out as an original entrance into the hillfort. On either side are two narrow, linear hollows aligned parallel to the line of the bank; that on the north extends for 7.0m (H3) and the one on the south for 10.0m (H4). The stones cleared to create these depressions have been piled loosely along the sides. Where similar features exist at the other entrances, it has been suggested they represent archaeological explorations to define the outside face of the fort wall.



A semi-circle of stones piled up 1.0m high on the crest of the bank (H5) looks like the remnant of a relatively recent shelter; two other shelters, better preserved than H5 and therefore arguably more recent, stand on the outside of the enclosure (H6 and H7). At H6 a shelter has been constructed with double-thickness stone walls and with an entrance at the south-east corner. The north wall, which is partially dug into the natural slope, is the tallest, standing to a maximum height of 1.5m. The second shelter (H7) uses smaller stones than the first and is more tumbled though the north wall is again the tallest standing to a height of 1.0m. There

Plate 3. A section of the exterior wall face (H9) on the east side of the fort

is no obvious sign of an entrance with this shelter. Nearby, stones have been cleared along the centre of the bank (H8), revealing a 0.7m high wall face composed mainly of large basal stones up to 0.8m in length (H9). The result of clearing around this wall face has left a linear hollow similar to those noted earlier at some of the openings through the bank (Plate 3). Like them, it probably indicates the site of an archaeological investigation.

In section J, the outside of the rampart is around 2m high and the inside 0.5m, though it rises to 0.8m at J1 which is the most upstanding stretch of bank on the south half of the circuit. The large boulders upwards of 0.5m across on the inside of this portion of bank have probably been displaced a short distance from the inner edge of the fort wall (Plate 4). At J2 and J3 vegetation growth obscures part of the bank but at J4, stones have been cleared to the sides and downslope to open up a cutting part way through the bank down to ground level. This could have been done to facilitate access into the interior or it is possible it is a further archaeological investigation into the construction of the bank. Nearby, on the inside of the bank, is a relatively recent, semi-circular shelter with tumbled walls up to 0.8m high (J5).

The bank is spread quite low in section K - attaining a maximum height on the inside of only 0.3m and 2.0m on the outside - and as it approaches the south entrance the exterior of the bank only survives at ground level. The bank may have been reduced by relatively recent stone-robbing. There is a stretch of wall 0.8m high along the inside of the bank at K1 which looks recent. It is probably a windbreak.

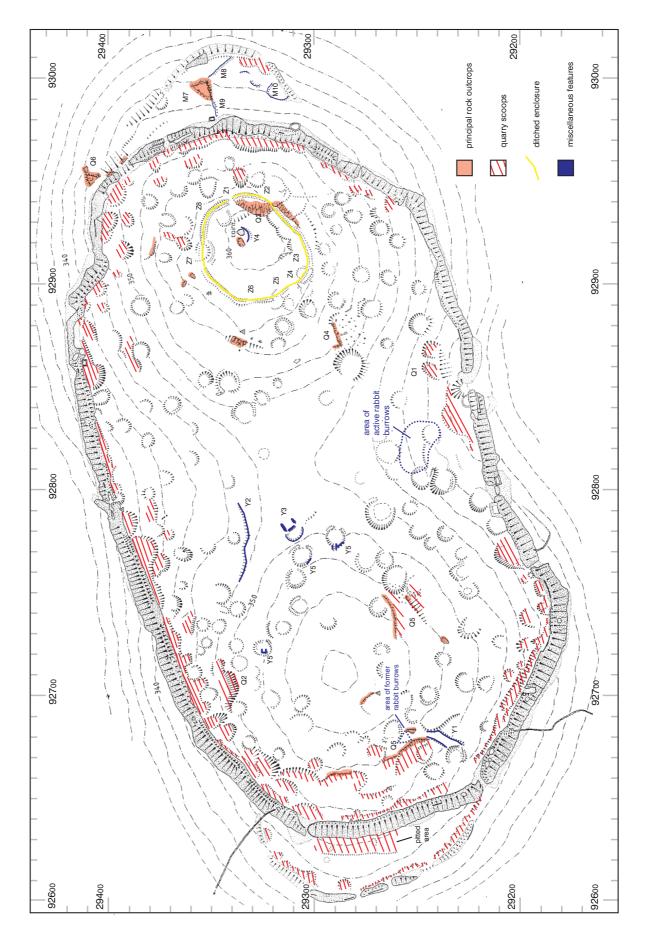


Plate 4. Part of the inside of the fort bank on the south-east (J1)

QUARRIES (Fig. 5)

On the immediate upslope side of the hillfort bank is an intermittent and irregular quarry ditch, achieving a maximum 30m width. It is evident around the majority of the circuit of the hillfort bank apart from a 60m section to the east of the southern entrance. The quarry ditch comprises a mixture of semi-circular scoops into the hillside and linear depressions running parallel with the line of the fort bank for which it must have provided the majority of the stone.

In places, notably the north and south sides of the west summit and on the east side of the east summit, this quarrying has carved a level shelf out of the rising ground at the rear of the bank. Other quarry scoops are evident further inside the enclosure and are



mostly between 0.3 and 1.0m deep, the most prominent being a pair of 2.0m deep cuts into the hillside just inside the south entrance (Q1) and a steep linear scarp 2.5m high on the north side of the west summit (Q2). All are likely to be associated with the construction of the fort. As will be described below, similar remains of quarry scoops and hollows were noted in the enclosure at the west end of the hillfort; less so in the enclosure at the east end.

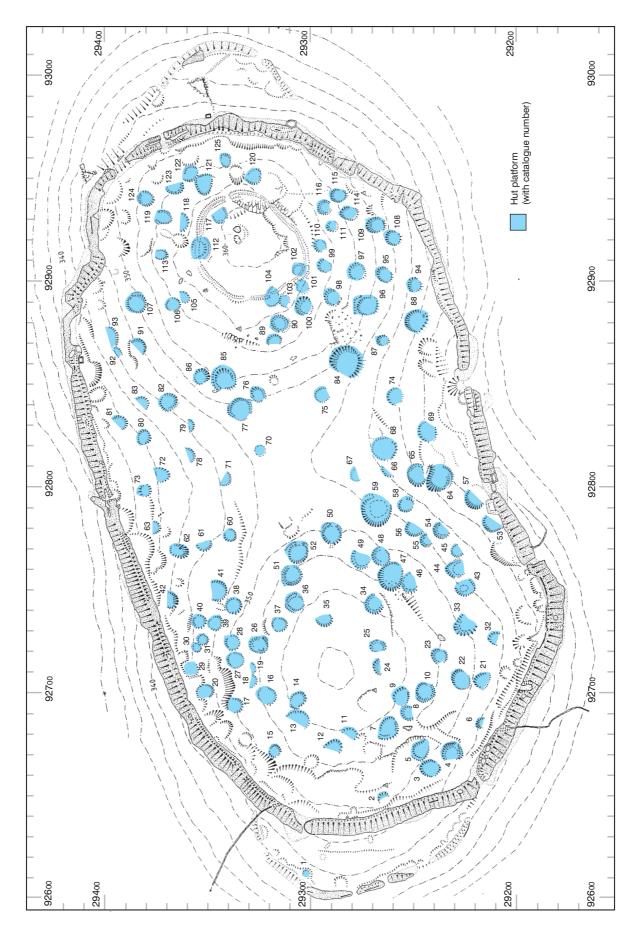
Several of the rock outcrops on the flanks of the east and west summits have demonstrably been exploited for stone prior to the occupation of the hillfort. It is most likely these outcrops, and the others where there is no direct evidence of quarrying, provided material for the construction of the fort wall. The outcrop on the south side of the east summit looks like the face of a quarry which has cut deeply into the natural slope of the hill (Q3) and there is a spread of small stones and boulders on the south-west side of the same summit which could be quarry waste from the working of an adjacent rock outcrop (Q4). Similar rock outcrops on the south and west sides of the west summit (Q5) have also probably been quarried judging by the way they are cut into the hillside. Where a stratigraphical relationship was observed between quarried outcrops and the sites of huts, the quarrying pre-dates the hut indicating the outcrops in the interior of the hillfort were exploited to provide stone for the hillfort. For example, hut platform no. 84 cuts into the quarry waste described above and on the south and west sides of the west summit hut nos. 1, 5 and 46 impinge upon quarried outcrops.

There is no evidence that any quarrying took place on the inside of the fort after its abandonment, although on the outside, immediately below the north-east side of the fort, there is evidence of quarrying which post-dates the hillfort (Q6). It is defined by a broad scoop into the hillside associated with several rock exposures and possible quarry debris. The fort bank virtually disappears at this point, either because it has been robbed or because the stones have slipped downslope and become mixed with the quarry debris. Also absent at this point is the continuation of the curving stony bank which defines the enclosure outside the east end of the hillfort; it too has probably been destroyed by this quarrying.

Linked to this more recent quarrying may be the fact that quantities of stone seem to have been removed from the hillfort bank to the north of Q6, as was described above. The result is that at G1 the bank is levelled flat for 30m and has almost no stones above 0.2m in length. Indeed it was also noted above that the fort bank is also quite low on the east side of the south entrance (K) suggesting stones have also been taken from this part of the circuit. Further evidence of quarrying associated with the construction of the two subsidiary enclosures at the east and west ends of the hillfort as well as the fort wall will be described below, along with evidence that the enclosure banks themselves have been robbed.

#### HUT SITES (Fig. 6)

A total of 125 hut sites were identified on the hilltop, all but one lying inside the main hillfort enclosure. This is likely to be a minimum figure as further examples without surface traces probably survive below ground, especially where level terrain obviated the need for any form of manufactured platform. It is also likely that there are more



huts among the quarry scoops around the inside of the fort than can be detected from surface evidence. The hut sites range in altitude from 339m (nos. 73 and 81) to 359.5m above OD (no. 117) and are mainly spread around the south and east sides of the hill. No trace was found of any huts occupying the crest of the two summits or on the top of the intervening saddle, apart from hut no. 70.

The majority of the hut sites are defined by a crescent-shaped scarp cut into the hillside. These range in height between 0.2m (nos. 25, 32, 36 and 75) and 1.9m (no. 84) although the majority (117 examples) are a metre or less high. The curving scarp marks the upslope side of the hut platform, whilst the downslope scarp survives less commonly and is defined by a banked-up apron of spoil, typically between 0.3m and 0.5m high.

The diameters of the platforms projected either from the curvature of the scarp cut into the hillside or in combination with the embanked front apron, range from 3m (no. 111) to three examples at over 10m (nos. 59, 68 and 84), both of which overlook the south entrance. The majority (115 examples) are between 4m and 8m in diameter. Of the total of 125 hut platforms, 77 possess one or more structural features, in the form of a ring-groove (34 examples), a perimeter bank (23 examples), or signs of an entrance (61 examples). Most of the remaining platforms are no less likely to have been occupied, except that there is no visible evidence to betray the fact. However, it is also possible that some of the more minor platforms are quarry scoops that have been misinterpreted.

The ring-grooves are found mostly on the south side of the hill and are defined by a curving line of darker grass or by a very slight indentation, both about 0.2m wide. A groove 0.1m wide and 0.1m deep in hut platform 51 was the deepest observed. They are a common feature of Bronze Age and Iron Ages sites in the Cheviots and are thought to indicate the perimeter wall of a circular timber hut. Four examples describe complete circles (nos. 43, 59, 70 and 92) giving a range of hut sizes from 4.1m (no. 43) to 8.7m (no. 59). Of the other platforms with only partial ring-grooves, most of their diameters fall within this range, clustering between 4m and 6m. Platform no. 112 has the largest ring-groove with a projected diameter of 11.6m. However this site stands out as different from the other hut circles because the groove is on the outside of the platform, rather than contained within it, and is nearly 1.0m wide and 0.2m deep. This may be an example of the ring ditch form of construction, the only one noted on the hilltop, or alternatively the remnant of an archaeological exploration.

At the 23 platforms where some form of bank is visible, it is typically around 0.3m high, whilst the most prominent attains a height of 0.5m (no. 77). Most of the banks occur on the perimeter of the platform at the interface between the front apron of spoil and the back scarp and they probably represent nothing more than the make-up of the front apron extending for a short distance up slope. In eight other examples, the bank is more continuous and could indicate the presence of the ring-bank or ring-mound type of hut construction (nos. 10, 36, 50, 51, 52, 64, 85 and 90).

Possible entrances were seen most clearly in the eight examples of ring-bank construction discussed above where rounded terminals either marked the end of the bank or flanked a gap through it. Less certain are the 52 other examples where an area of level ground up to 1m wide between the front apron of spoil and the back scarp is

the only indication of an access route onto the platform. There is no reason why the orientation of these access routes should always match the direction of the huts occupying the platforms, although it is notable that the overwhelming majority (52 out of 60) point towards the east, north-east or south-east, which are the directions most commonly found with prehistoric huts. The orientation of the remaining platforms is explained by the north or west facing slopes they occupy, apart from platform 36 where three breaks in the bank are evident facing due north, south and east.

There is little evidence of stratigraphical relationships between hut platforms. No evidence was observed of any platforms intercutting apart from the back scarp of platform no. 103 on the east summit which appears to cut into the edge of platform no. 104 on the upslope side. Another indication of a difference in date between platforms is that the entrance to platform no. 121, also on the east summit, faces directly onto the rear of the platform to the north-east (no. 122).

Stratigraphical relationships exist between hut platforms and other features inside the hillfort, notably with areas of possible quarrying and with the ditched enclosure on the east summit. Hut platforms occur in areas of possible quarrying on the south and west flank of the west summit (nos. 1, 5 and 46) indicating they are later, and the same is true of platform no. 84 on the east summit. Here the back scarp is cut into possible quarry waste represented by a spread of stones and boulders down the hillside. Finally on the south-west side of the west summit, platform no. 4 occupies the centre of a possible hollow way which may be connected with traffic to and from the quarries on this hillside. On the east summit the hut platforms nos. 102, 104 and 112 pre-date the ditch which encloses the top of the hill, since the ditch is clearly to be seen cutting across all three platforms. The relationships of the huts to this enclosure will be described in more detail below.

#### THE DITCHED ENCLOSURE (Fig. 5)

Around the eastern summit of the hill is a penannular enclosure measuring 50m east-west and 50m north-south with a single entrance at the east. It encloses an area of 1.9ha (4.6 acres) and is defined by a narrow ditch generally about 1.0.m wide and 0.3m deep though in places it only survives as a darker line in the vegetation. On the outside is a less prominent bank which attains a maximum width of 1.0m and height of 0.4m although it totally disappears in places. The perimeter of the enclosure is 155m in length and over this distance the altitude of the ditch varies by 1.5m from the lowest point of 358m on the south to 359.5m above OD on the south-east. By maintaining this level course the ditch does not make best tactical use of the ground as on the south-east it loses the advantage of height by traversing the foot of a quarry face.

The line of the ditch is more regular on the east side than on the west where it tends to curve and change direction quite abruptly, perhaps because of obstructions caused by buried boulders or intractable bedrock. There is a causewayed entrance 3.0m wide on the east side of the enclosure at Z1; the rounded terminals of the ditch and bank on either side of it indicate it is probably original. However, it is possible that the appearance of this entrance owes something to Hope-Taylor who is shown digging here on the aerial photographs taken in 1958 (St Joseph 1958, XG 35-47). Proceeding

south-west from the entrance, at Z2 the ditch is only traceable as a darker stain in the grass and the bank reduces in height from 0.3 to 0.1m, which could be explained by the fact that the perimeter crosses the floor of an earlier quarry at this point. It may have proved too much effort to dig the ditch to any great depth through the quarry floor, hence limiting the amount of upcast available to build up the bank.

Emerging from the west side of the quarry, the ditch and bank become more prominent, with a depth of 0.5m from the top of the bank to the bottom of the ditch. At Z3 the ditch crosses hut platform no. 102 and the bank acquires added prominence from overriding the build up at the front of the platform. It also slightly buries the back scarp at the rear of no. 101, but to the north the bank has been cut away by what could be an excavation trench (Z4). The ditch, 0.2m deep, crosses the site of a second hut (no. 104) at Z5 but the bank is totally absent.

Around the north-west side of the enclosure both the bank and ditch are prominent features, with a maximum depth of 0.5m from the top of the bank to the bottom of the ditch. However, at Z6 the ditch disappears raising the possibility of a second entrance at this point, although against this is the fact that the bank continues, although somewhat truncated. The bank disappears and the ditch is reduced to a dark vegetation stain immediately to the west of hut platform no. 112. The course of the ditch can be quite clearly made out crossing this hut platform at Z7, as can a low ridge to the north which may be the denuded base of the bank. However, from this point back to the entrance the ditch and bank are both well-preserved, reaching a maximum total depth of 0.4m. At Z8 the inside of the ditch is some 0.3m higher than the outside due to the natural rise in ground level.

#### MISCELLANEOUS FEATURES (Fig. 5)

Apart from the hut sites and the quarrying, the only other features inside the enclosure which might be contemporary with the occupation of the hillfort are the remains of the possible trackway on the west side of the west summit (Y1) and a lynchet on the north side of the saddle (Y2). The trackway is defined by two broadly parallel scarps 5m apart and up to 0.4m high which run for a distance of 10m up the west slope of the hill towards a quarried area. It is conceivable that this is a hollow way created by traffic to and from the quarries on this side of the hill and, as was mentioned above, it must be earlier in date than hut platform no. 4 which occupies the south end of the feature.

The lynchet on the north side of the saddle comprises a discontinuous ridge up to 1m high and 40m long running along the line of the natural contour. There is no evidence that it is contemporary with the occupation of the hillfort. To the south of the possible lynchet, on the level crest of the saddle, is a slight stony bank 0.3m high marking out three sides of a sub-rectangular structure (Y3). Possibly a small shelter, it measures 6m by at least 5m and on the west side is a curving scarp 0.6m high defining an adjacent level area which could mark a rear yard or animal pen partially cut into the rising ground to the west. It's size, shape and method of construction sets it apart from the other hut platforms on the hilltop and is therefore likely to be later than them. It may be the second of the two rectangular drystone structures excavated by Hope-Taylor in 1958 (Hope Taylor 1977, 6). It is known the other was the rectangular feature (A10) 60m west of the south entrance (Hope-Taylor 1977, Plate 11).

Just inside the south entrance and spreading up the south side of the saddle, there is an area of active rabbit burrows measuring up to 30m long and 20m wide. The ground appears quite badly disturbed judging by the degraded outline of the worst affected platform (no. 69). A further area of dormant rabbit activity, 10m x 5m, was noted on the west side of the west summit. It impinges on the west side of platform no. 7.

The 2m-high, modern stone cairn on the east summit is a focal point for hikers and is probably regularly added to by them. It partially obscures a 0.4m high curving ridge on the south side of the east summit (Y4). This feature may be the mutilated remains of the "...enclosure which was filled with small stones and earth" excavated by Tate in the 19th century (Tate 1862, 436) and which was possibly a burial cairn.

The possible traces of excavation trenches were found in hut platforms nos. 26, 50 and 52 on the north-east facing slope of the west summit (Y5), which is an area known to have attracted the attentions of Tate in the 19th century (Tate 1862, plate 15). Platform no. 50 contains the clearest evidence of having been dug into since part of the scarp at the rear of the platform looks unusually straight and freshly cut as if it formed the edge of an excavation trench. A possible continuation of this trench is marked by a 0.3m deep rectilinear depression which cuts across the same back scarp. A less prominent

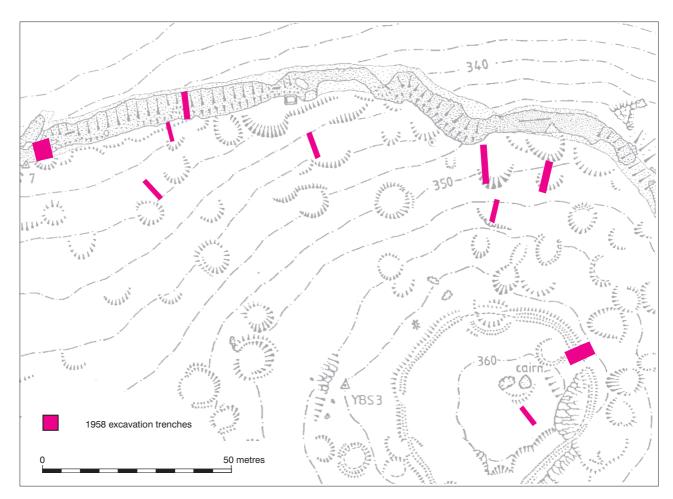


Figure 7. Location of Hope-Taylor's excavation trenches based on aerial photographic evidence (St Joseph 1958, XG46)

straight section of scarp is evident at the rear of platform no. 52, again possibly representing the edge of an excavation trench. The site of a third excavation is suggested by a shallow rectilinear depression evident in the base of platform no. 26.

The aerial photographic evidence discussed earlier shows that Hope Taylor excavated around the north-east side of the east summit in the middle of July 1958. Apart from disturbance to the outside of the bank noted earlier, which occurs at a point where a trench shows up on several of the photographs (F8), there are no definite surface traces of Hope-Taylor's excavations visible on the inside of the fort. Their approximate position, accurate to within several metres, are shown plotted from the aerial photographs on Fig. 7.

#### THE WEST EXTERIOR ENCLOSURE (Figs. 4 and 5)

The curving enclosure wall outside the west end of the hillfort consists of a low, discontinuous, stony bank 130m in length. It pursues a relatively level path following the 342m above OD contour line around the shoulder of the hill and, together with the fort wall, it bounds an area of about 2.1 ha (5 acres).

At the north end it survives as a bilberry covered bank 0.7m high stopping several metres short of the outside perimeter of the hillfort. At this point it is also overridden by the stone wall (D4) which runs up the north side of the hill. The central section of the bank is mostly free of vegetation, revealing a jumble of stones banked up to a maximum height of 1.2m and spreading to a maximum width of 5m. Three sections of a possible outer face are evident (L1-3), each one constructed of uncoursed boulders and large stones to a height of around 0.7m. Here also is what may be an original entrance through the enclosure bank consisting of a relatively stone free gap 3m wide (L4); the other breaks appear to be more the result of stone robbing or vegetation build-up.

To the south, the bank becomes more overgrown and also very denuded, standing to a height of only 0.6m. A possible wall face (L5) is evident at the south end of the bank, consisting of an interrupted line of large boulders up to 1.1m across. The rocks behind look broken and shattered as if the wall has been quarried away for stone which may also explain the denuded state of the entire bank. At this point the bank disappears, some 10m short of the outside perimeter of the hillfort.

Immediately inside the enclosure is an intermittent quarry ditch (see Fig. 5) similar to that found around the inside of the hillfort. It is 5m-8m wide and comprises several shallow scoops and linear depressions up to 1.0m high. The southernmost quarry scarp abutts the exterior of the hillfort suggesting the enclosure bank itself probably went further in this direction than is evident today. There is a possible ring-groove hut (no. 1) in one of the quarry scoops. It is a poor example and by no means a certain hut site, though it constitutes the only evidence for occupation noted in the enclosure. The remainder of the interior is devoid of features apart from an area of pitting immediately outside the main hillfort bank which is probably caused by quarrying for the fort wall. Indeed, the intensity of the quarrying at this point probably created the level berm 40m long and 10m wide which is contiguous with the west side of the fort.

#### THE EAST EXTERIOR ENCLOSURE (Figs. 4 and 5)

The curving bank which defines the east enclosure is just over 102m long and is mostly overgrown with bilberry and grass. It cuts across the natural slope of the hill, rising by as much as 6.5m from east to west, and, along with the fort wall, bounds an area of 1.8ha (4.4 acres). The southernmost section of the enclosure consists of a grass-covered bank up to 0.6m high which starts 10m from the outside of the hillfort. There is no indication of the bank any closer than this. Preserved in the southernmost section are two parallel lines of boulders that must mark the original inner and outer faces of a wall, some 2.8m wide (M1 and M2). The outer line of boulders changes direction and cuts inwards just before a break in the bank suggesting there was an entrance at this point (M3). From here the remainder of the bank becomes increasingly obscured by vegetation apart from one area where the stones, including several large boulders, are clearly visible banked up to a height of 1.2m (M4).

At the north, the bank is overgrown with bilberries once again and here is a 0.5m high scarp defining the perimeter of a possible shelter built against the inside of the bank (M5); the north-east side of the shelter rides over the bank indicating it is later. It is situated conveniently next to a gap in the enclosure bank (M6), through which passes the most direct route up the hill to the east summit. The gap may have been widened to accommodate the wheeled vehicles which, as has been noted above, Hope-Taylor evidently brought up this route during his 1958 excavation.

North of the shelter, the bank eventually fades out, disappearing about 13m away from the outside of the hillfort. As has already been discussed, the hillside beyond this point appears to have been quarried into, explaining why the line of the enclosure disappears. The robbing of stone from the rest of the enclosure bank probably explains its denuded condition.

Quarry scoops are not as evident on the inside of this enclosure as they are on the inside of the hillfort or within the west enclosure. Perhaps the rock outcrop at the centre of the enclosure (M7) supplied most of the stone needed for the construction of the perimeter wall, thereby obviating the need for any further quarrying. The outcrop straddles a break of slope within the enclosure which has been further defined by a slight bank 0.4m high. This bank runs from the perimeter of the enclosure to the outcrop (M8), continuing from there to the outside of the fort as a line of earthfast boulders (M9). The ground to the south of this line is a metre or so lower than to the north and may have been cultivated because it is comparatively free of surface stones. The shallow semi-circular scarps 0.4m high on the south side of the enclosure bank indicting it is later in date.

#### DISCUSSION

As will be discussed below, the survey has recorded new evidence for the development of the hillfort and for the use of the hilltop after the abandonment of the fort. Traces of activity on the hilltop before the construction of the fort remain elusive although there is Tate's excavation results (published in 1862) which point to the possible existence of a burial cairn on the east summit. If this is what Tate found, the cairn is most likely Bronze Age in date, placing it earlier than the probable Iron Age date of the hillfort. The remains of a slight bank (C2) on the south side of the modern cairn which crowns the summit may be a surviving part of the feature excavated by Tate though it is too fragmentary to be diagnostic.

The survey demonstrated in detail that the ditch encircling the east summit is later than the hillfort, and therefore Jobey's theory that the fort was preceded by a palisaded enclosure is no longer tenable. Nevertheless, new evidence emerged from the survey suggesting that the hillfort enclosure was itself constructed in two phases. In the first phase the fort was longer, with what are now the two exterior enclosures forming the east and west ends. The second phase saw new stretches of wall being constructed on the east and west which shortened the overall length of the fort and left the original east and west ends as the two exterior crescent shaped banks we see today. The evidence for the interpretation of two phases of construction is as follows:

- (a) the fact that the west end of the hillfort buried part of the west enclosure wall was recorded at C2. Here, the rubble core of the hillfort wall clearly overrides a setting of boulders aligned, not with the fort wall, but with the outside of the west enclosure. It is suggested that the boulders are part of the outside edge of the enclosure and their burial below the core of the fort wall indicates the west enclosure must pre-date the hillfort at this point.
- (b) there is evidence the outer enclosure walls have been robbed; the perimeters of both enclosures now only survive as low stony banks mostly covered with vegetation, but from what survives of their foundations it can be deduced that the banks represent the flattened remains of what were once substantial, upstanding walls. They were possibly as much as 2.8m wide, judging by the inner and outer edges of the east enclosure wall visible at M1 and M2. From the little of their superstructure which survives, they appear to have had a rubble core faced on the outside using stone taken from adjacent quarry scoops and rock outcrops. One side of a probable original entrance was noted in the east enclosure (M3).

The two enclosure walls have therefore suffered substantial erosion and although natural weathering and collapse will have played a part, stone robbing must account for most of the observed destruction. An important clue to the circumstances of the robbing is the fact that adjacent parts of the hillfort bank have not suffered the same degree of damage. The most likely explanation of this is that the enclosures were robbed to provide material to construct the hillfort wall. It is difficult to account for the apparent selective robbing of the two enclosures in any other way. It is also noticeable how all surface traces of the enclosure walls are lost near the fort bank. The recent quarry at Q6 has destroyed the north end of the east enclosure bank but elsewhere the loss of the two enclosure banks suggests robbing was more intense towards the fort wall. this further reinforces the link between the destruction of the enclosures and the construction of adjacent parts of the fort defences.

(c) the evidence discussed so far indicates that the curving walls at the east and west ends of the hillfort are earlier than adjacent parts of the fort wall and were robbed for its construction which leaves the question of their possible function to consider. The plan evidence suggests they were originally part of the fort perimeter since they appear to curve to line up with the north and south sides of the hillfort. The alternative possibility are is that both were originally parts of two sub-circular enclosures on opposing sides of the hilltop, which perhaps circled the lower slopes of the east and west summits. However, there are no surface indications that either of the curving walls continued in this manner beyond the line of the hillfort bank. Furthermore, there is no visible difference in the make-up of the fort bank between the re-aligned east and west ends and the pre-existing north and south sides which suggests the entire defensive perimeter was re-built in the second phase.

The field evidence therefore points to there being two episodes of enclosure around the summit of Yeavering Bell, the second phase mirroring the layout of the first except for the re-alignment of the east and west ends (Fig. 8). The purpose of the first phase enclosure is assumed to be defensive, though this need not necessarily have been the case. It may be that moving the east and west ends of the fort higher up the sides of their respective summits in the second phase created a more defendable site which would also tie in with the putative rebuilding of the fort wall.

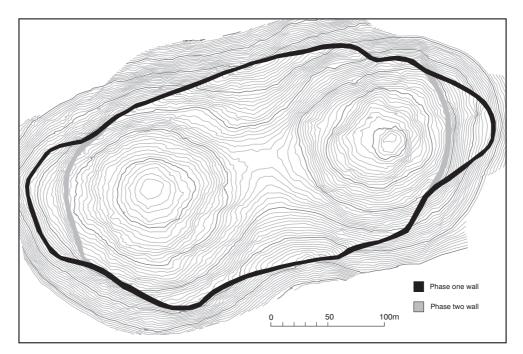


Figure 8. Plan of the putative phase one enclosure The re-built and re-aligned hillfort wall was not a particularly sophisticated structure judging by the evidence noted in the survey. It apparently comprised an outer, poorly coursed, drystone wall with a loose rubble interior. Tate records that the outer face was built with a slight batter (Tate 1862, 435), as is also suggested by the fragment of wall visible at C4. At B5 and F10 it was noted how long, narrow, stones have been used as stretchers to help bind the face to the rubble core and at H9 the face had a setting of large boulders at its base. The distance between the surviving fragments of outer face and the inside edge of the stone rubble suggests the wall was originally some 3.0m to 3.2m wide and from the quantity of stone which has tumbled downslope, the outside of the wall must have stood somewhere between 2.0 and 2.5m high. The slope of the hill meant the inside of the wall would only have needed to be about 1.0 to 1.5m high to level the top making a faced wall unnecessary on the inside. Tate describes a sloping wall face on the inside of the bank but this was not found. Instead a kerb of boulders is all that seems to have been provided along the inside edge of the fort wall (C5).

The widespread evidence of quarrying noted on the inside of the hillfort has not been commented upon in previous published surveys of the hillfort. In the absence of any rock-cut ditch on the outside of the fort, most of the material to construct the wall must have come from these quarries immediately along the inside of the wall, indicative of the 'downward' method of construction noted on other fortified sites in the region (Jobey 1965, 40). The survey encountered evidence of small-scale quarries around virtually the entire length of the wall except for a 60m section on the south-east. Here an adjacent rock outcrop with rock debris on the downhill side (Q4) may have provided the walling material, and other outcrops on the hilltop would have supplemented the supply of stone from the surface diggings.

Little stone seems to have been taken from the outside of the fort to build the wall, as the north, east and west slopes of the hill are still boulder strewn and there are no signs of any exterior quarries contemporary with the hillfort. Presumably the effort involved in bringing stones uphill conspired against exploiting the scree slopes below the fort. A heavily pitted area in the enclosure at the west end of the fort may be the one site where stone was taken from outside the second phase fort to build the wall and here the hillside is not too much of an obstacle to prevent carrying the quarried stone up to the fort wall. The intensity of quarrying at this point has created a berm on the outside of the wall.

Topsoil also seems to have gone into the make-up of the bank. This is evident particularly on the north and west sides of the fort where up to about 15% of the bank is made up of pebble-sized stones. These stones are mostly the sort of frost-shattered rock splinters found in the topsoil on the hill and it is difficult to imagine them being gathered individually by hand. More likely is that the stones were scraped up with topsoil and dumped into the core of the wall.

The survey recorded various breaks in the fort bank although only five of them show signs of having been regularly used for access to the fort interior; two are on the west (C1 and D1) and with one on each of the other three sides (A1; F1 and H2). Of these, the south entrance has the strongest claim to be an original gateway into the fort, since it looks out over land that has apparently been cleared and cultivated and the easiest approach to the hillfort is on this side. The field evidence also suggests the

passageway was lengthened on the inside by semi-circular inturns which, judging from Tate's discoveries in the 19th-century, could have accommodated opposing guard chambers.

The other four entrances are less certainly original and are more likely to be connected with use of the hilltop for transhumance as will be discussed below. The two west entrances look as though they have been cut through the tumbled bank indicating they post-date the collapse of the fort wall. The north gate has a slightly stronger claim to be original on account of the hollow on the inside possibly worn down by traffic passing though into the fort (F2). However, against it is the fact that it faces onto the steepest part of the hill and a kerb of stones is visible across the inside of the gap on Hope-Taylor's published excavation photograph, suggesting the fort wall was originally continuous at this point. The east entrance, like the two on the west, looks to have been cut through the tumble of the fort wall. However, it is just below the only entrance into the ditched enclosure which encircles the east entrance into the hillfort was made to facilitate access up the hill to the ditched enclosure entrance. This route is further defined by a gap in the curving bank on the outside of the fort (M6).

There is little evidence to date either of the suggested phases of hillfort enclosure. Hope-Taylor proposed a late Iron Age date for the establishment of Yeavering Bell hillfort but this has been questioned given the apparent lack of any of the circular stone-walled huts in the so called "Votadinian tradition" now thought to be characteristic of settlements of this period (Hill 1982a, 27), an absence confirmed by the present survey. Instead, the survey has found that the ring-groove type of hut predominates at Yeavering Bell, a form which is considered of little value as a chronological or cultural indicator because of its longevity (Hill 1982b, 187). It has been suggested that defended hilltop settlements in the Tyne-Forth region were created in the 3rd century BC (Burgess 1984, 162) and until more evidence is available, this is probably the best estimate for the date of Yeavering Bell fort.

The survey has confirmed earlier accounts that the interior of the hillfort preserves the remains of around 130 possible hut platforms and it is evident from the field remains that a significant opportunity exists here to study a prehistoric hillfort community. Variations were noted in the density of occupation across the hillfort which might have important social or chronological implications (Fig. 9). For example, almost no hut platforms were recorded on either of the two summits, on the intervening saddle or in either of the two exterior enclosures. In contrast, most of the larger hut platforms and the ring-groove huts seem to cluster around the south and east flanks of the two summits.

The absence of huts from certain parts of the hillfort could be partly due to the fact that they have left no surface traces, but it may also indicate zoning of activities within the hillfort. The saddle was possibly unoccupied because it may have been reserved for penning stock or for cultivation as suggested by the lynchet Y2 on its north side. Equally, there may have been some superstitious or religious barrier to settlement on the two summits of the hill. The existence of only a single hut site in the exterior enclosures suggests the hillfort was not densely occupied when they formed part of the defensive perimeter and were not attractive to settlement once they had been isolated outside the fort. Although reduced by stone robbing, they could have had a

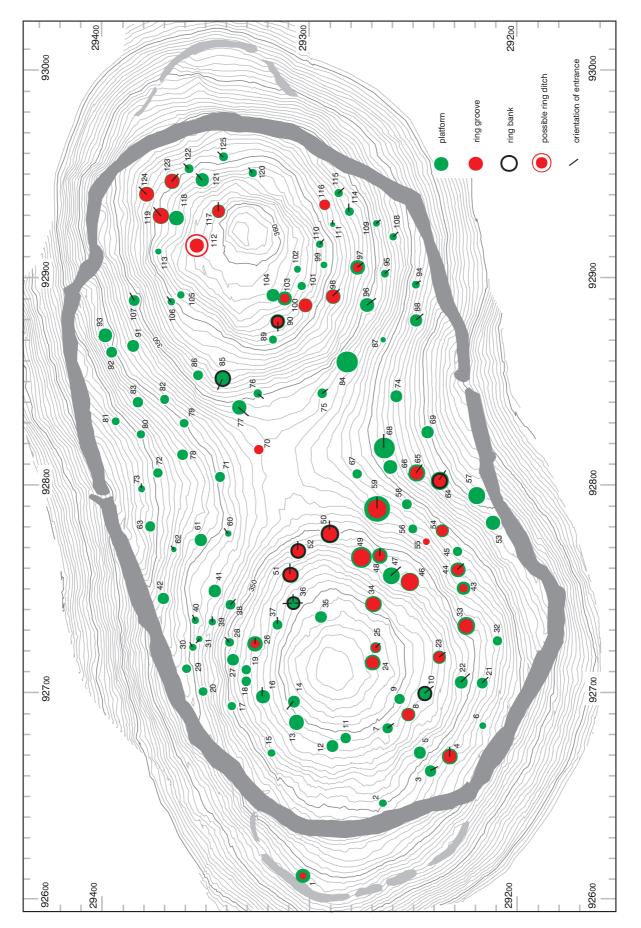


Figure 9. Plan showing the distribution of hut platforms

secondary use as livestock pens as Jobey suggested (1965, 43-4) perhaps with a timber fence along the top of the bank or they may have been cultivated. Evidence came to light in the survey of a low bank (M8) and a line of earthfast stones (M9) defining possible cultivated land on the south side of the east enclosure.

The fact that the larger platforms and the ring-groove huts are found mostly around the south and east sides of the two summits suggests, not surprisingly, that there was a preference to inhabit the more sheltered parts of the hilltop. It may be an indication of higher social status that the larger huts on the south side of the hilltop (nos. 59, 64, 65, 68 and 84) have the best natural shelter. Three of these (nos. 59, 68 and 84) stand out as important because they dominate the south entrance and oversee the cultivated land below the south side of the fort. There may also have been an element of conspicuous display in the way the huts favour the south side of the hill. Stepping up the south side of the fort, they would have engaged the eye of anyone approaching up the valley to the south entrance. In a similar manner hut no. 85, on the north side of the hill, occupies a prominent natural spur, which would have made it stand out when viewed from the valley below. The north of the hillfort is the more exposed side and therefore less attractive to inhabit. Here smaller platforms generally predominate suggesting this side of the fort may have been occupied by low status huts and by ancillary structures such as small livestock pens, workshops or stores.

The survey did not find much evidence of discrete groups of hut platforms which might indicate social groupings, such as an extended family unit or functional groups such as a main house with adjacent workshops and stores. A group of three huts occupying a quarry area on the west side of the west summit (nos. 3-5) and a group of four along the slope on the south side of the same hill (nos. 46-49) are the best examples of such potential groupings.

Little evidence of chronology within the hillfort settlement was noted, such as hut platforms cross-cutting, but eight examples of possible ring-bank huts were identified which is a type claimed to be distinctive of settlements dating to the second millennium BC (Hill 1982a, 22). There is therefore the slim possibility that preserved among the hut sites is evidence of a much earlier settlement. At the other end of the time scale, there is no field evidence to suggest the hillfort community continued into the Roman period. It has already been mentioned that the survey found none of the stone-built circular huts which are characteristic of late Iron-Age and Roman period sites in the Cheviots (Hill 1982a, 27). The excavation evidence points to some activity on the hilltop in the Roman period (Hope-Taylor 1977, 6), but the survey suggests this did not take the form of protracted settlement.

The survey has assembled compelling evidence that the ditched enclosure around the east summit post-dates the occupation of the hillfort. The earlier theory postulated by Jobey (Jobey 1966, 97-8) that the ditch around the east summit is evidence of a pre-hillfort palisaded settlement is not supported by the field evidence. The fact that that the ditch cuts across several hut platforms (nos. 102, 104 and 112) as well as through one of the hillfort quarries on the east side of the summit (Q3) suggests that it post-dates both the construction and occupation of the fort. Also the fact that the enclosure faces east rather than towards the main hillfort entrance on the south side, further divorces it from any connection with the fort settlement.

The dimensions of the ditch exceed the size needed to anchor a timber palisade, especially if Tate correctly observed that the ditch was originally five feet deep. Finally, there is little evidence that the interior of the enclosure was ever occupied, which is strange if it was a palisaded settlement. There is only one hut platform (no. 117) which sits wholly within the ditched area and this may simply be part of the cluster of platforms to the north and east associated with the hillfort.

Although it is easy to see the ditch and bank as an homogeneous feature, the relationship of parts of the bank to the platforms is more ambiguous. On the west side of the summit it spills downslope over the rear scarps of platforms nos. 101 and 102, suggesting that, like the adjacent ditch, it is later than the huts. In contrast it disappears either side of platforms nos. 104 and 112 suggesting that, unlike the ditch, it is earlier and was destroyed by the construction of the platforms, or that some later activity has removed it.

There are several ways of explaining the evident dichotomy in the date of this bank. Increased erosion might have occurred adjacent to platforms nos. 104 and 112 or perhaps there was insufficient upcast material to make the bank at these points, both of which might give the surface impression of the bank having been destroyed. Alternatively the bank and ditch could be a two-phase construction; the first phase predating the hut platforms and the last post-dating them. In this theory, the bank would be placed in the first phase, explaining its apparent destruction at platforms nos. 104 and 112 and the ditch becomes a second phase recut when the huts are no longer in existence. Spoil from the recut cast on to the bank would account for the observed spillage over platforms nos. 101 and 102. A further possibility is that the lack of bank at platforms nos. 104 and 112 may be the result of an unrecorded archaeological excavation.

The purpose of the ditched enclosure is impossible to determine from the field evidence. As has already been mentioned, the enclosure was approached from the east side of the hill, via a route defined by gaps in the banks of both the hillfort at H2 and the exterior enclosure lower down the slope at M6. The primary purpose of the ditch and bank does not seem to be defence as they are so insubstantial and lose strength by dipping down below the south-east crest of the summit. More likely is that it is a boundary marker, perhaps defining an area of ritual importance on the summit of the hill.

The remaining features recorded in association with the fort are later and mostly connected with the use of the hilltop for sheep grazing and summer pasture. The stone boundary wall which traverses the west side of the hill and overrides part of the fort bank (B6 and D4) probably defined grazing rights to the hilltop and a variety of shelters connected with this activity was also recognised. The survey recorded two sub-rectangular structures defined by low stone banks; one on the crest of the saddle (Y3); the other built against the inside of the bank on the south side of the fort (A10). These are probably the remains of single-roomed shielings designed for occupation throughout the summer months when the hilltops were being grazed and they could potentially date back to the middle-ages. No evidence of any internal features was noted, though a small animal pen might have existed at the back of the building occupying the saddle. A stone-walled animal pen was also noted in close proximity to the other possible shieling on the south side of the fort at A12.

Lower down the scale are much smaller shelters built against the inner or outer edges of the fort bank and which clearly post-date the collapse of the fort wall (A9; F11; H6 and H7). Most have their drystone walls still standing which suggests they can only be a couple of centuries old at the most. Even with roofs of timber and turf they were probably not designed for prolonged occupancy like a shieling and are probably just temporary, overnight shelters. At the bottom of the scale are several windbreaks built against the inside of the fort bank (B1; B2; K1; H5 and J5) and small, man-sized scoops mostly on the crest of the bank (B3; B5; B7; C3; E2; F7 and F12). There is no evidence of their date and probably their only function was to provide brief shelter during storms. The one exception is the short section of walling evidently built by Hope-Taylor in the 1950s on the north side of the hillfort at F9 to illustrate the original appearance of the fort wall.

As well as the quarrying and stone robbing for the construction of the two phases of the fort, the survey also found evidence of later quarrying on the north-east side of the hill and stone robbing affecting sections of the south fort bank at K and east fort bank at G2. The removal of stone from the fort bank appears to have been done on a piecemeal basis since the damage is not extensive and is restricted to the side of the fort which could be most easily reached with a cart. It is the large stones that were mostly taken, probably for stone-walling and it may be a clue to the date of the robbing that 1000 yards of stone wall were reportedly constructed from the cairn near Tom Tallon's crag, 1.5kms (0.8 miles) to the south at NT 932 279 in 1859 (Tate 1862, 446). Robbing of the fort bank might also explain the reason why MacLauchlan's survey of 1858 shows a track leading to the south entrance which is indicative of regular traffic onto the hilltop.

It is less easy to explain why quarrying should have taken place at the north-east corner of the hill at Q6 when there was so much stone rubble readily available on the fort bank. The most likely explanation is that there was some demand for freshly quarried freestone of a size that could not be provided by the material on the fort bank. That the quarrying post-dates the construction of the hillfort is evident from the way much of the fort bank has slipped down into the quarry but there is no indication of its date other than it may have taken place at the same time as the robbing of the fort bank.

The survey found evidence of excavation trenches in three of the huts on the east side of the west summit which approximately coincide with the area where Tate excavated in the middle of the 19th century (Y5). Hope-Taylor's excavation campaign of 1958, as understood from his own published account and from the aerial photographic coverage, has left no recognisable surface traces, apart from the rectangular cut on the exterior of the bank on the north side of the fort (F8). However, other signs of possible archaeological activity were noted at several of the entrances where stones seem to have been cleared away in the search for an exterior wall face (A6; F3; F4; H3 and H4) and where several gaps have been made in the fort bank (A11; B4 and J4).

## **METHODOLOGY**

The archaeological survey of Yeavering Bell hillfort was undertaken using a Leica TC1610 total station theodolite on a closed traverse of eleven stations. Observations from the stations were taken to record hard detail and set out a grid of temporary control points marked by plastic pegs and degradable paint and chalk marks. Fibron tapes were then laid between these control points and archaeological detail was measured off and plotted by hand at 1:1000 scale onto the emerging plan on site using standard graphical techniques of baseline and offset. Where appropriate, further detail was added to the plan in the field using a Wild RK1 self-reducing alidade and staff. The digital survey data was processed using mathshop survey software and the results plotted on a Calcomp pen plotter.

KeyTerra Firma and AutoCad software was used to produce a contour map and terrain model of the hilltop from a grid of 9,000 three-dimensional coordinate points logged using a Leica single frequency Global Positioning System (GPS). The GPS equipment was also used to fix a base station on site within National Grid OS GB36 coordinates determined via a transformation programme based on its position relative to OS trigonometrical pillar NT72/T34 at NT 955 281 and checked by reference to a second trigonometrical pillar NT72/T110 at NT 928 345. This base station was then used to establish a local network of four subsidiary stations across the survey area, of which three, including the base station, were station points used during the theodolite traverse.

The GPS base station and four subsidiary stations were permanently marked by brass rivets in earthfast rocks and boulders. Full details of the survey methodology, including the positions of the survey stations, guides to relocating their positions, and full details of the design and accuracy of the survey are contained in the survey archive deposited in the NMR. The positions of Hope-Taylor's excavation trenches were plotted using a 3D perspective transformation generated in Aerial v5.05 software.

The final report has been processed using Corel Ventura DTP software with illustrations using CorelDraw and AutoCad programmes.

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The survey was researched and written by Trevor Pearson who also prepared the illustrations, apart from Fig. 1, which is by Al Oswald. The 3D perspective transformation used as the basis for Fig. 7 was prepared by Pete Horne of the RCHME York Office. The report was edited by Stewart Ainsworth.

#### **BIBLIOGRAPHY**

Burgess, C., 1984 'The Prehistoric Settlement of Northumberland: A Speculative Survey', in Miket, R. and Burgess, C., (eds.) *Between and Beyond the Walls. Essays on the Prehistory and History of North Britain in Honour of George Jobey*, 126-75 (Edinburgh: John Donald)

Higham, N.J., 1986. The northern counties to AD 1000 (London: Longman)

Hill, P.H., 1982a. Settlement and chronology in Harding, D.W., (ed.) *Later prehistoric* settlement in south-east Scotland, 4-43 (Edinburgh: Department of Archaeology)

Hill, P.H., 1982b. Broxmouth Hill-fort excavations, 1977-78: an interim report in Harding, D.W., (ed.) *Later prehistoric settlement in south-east Scotland*, 141-188 (Edinburgh: Department of Archaeology)

Hope-Taylor, B., 1977. Yeavering: An Anglo-British centre of early Northumbria (London: HMSO)

Jobey, G., 1962. 'An Iron Age homestead at West Brandon', *Archaeologia Aeliana*, 40, 1-34

Jobey, G., 1965. 'Hill forts and settlements in Northumberland', Archaeologia Aeliana, 43, 21-64

Jobey, G., 1966. 'A field survey in Northumberland', in A.L.F. Rivet (ed.) *The Iron Age in northern Britain*, 89-109 (Edinburgh: University Press)

Jobey, G., 1983. 'Excavation of an unenclosed settlement on Standrop Rigg, Northumberland', *Archaeologia Aeliana*, 11, 1-22

MacLauchlan, H.H., 1858. Plan of Yeavering Bell dated July 1858. published in MacLauchlan H.H., 1867. *Additional notes to the memoir on Roman roads and other remains in Northumberland*, 24. Original held in private collection of the Duke of Northumberland (copyright reserved). Photographic copy in NMR: Negative number 105/Y/29a.

NMR 1986 Collections Ref. No. 1031529 RCHME: Yeavering Estate Survey

St Joseph, J.K.S., 1958. Oblique aerial photographs of Yeavering Bell XG 35-47 (16/07/58)

Tate, G., 1862. 'The antiquities of Yeavering Bell' *History of the Berwickshire Naturalists'* Club 4, 431-454

Taylor, B.J. (ed), 1971. British regional geology: Northern England (London: HMSO)

Welfare, H., 1992. 'Yeavering Bell' in *The buildings of England: Northumberland* (second edition), 638-9 (London: Penguin Books)

VERTICAL AERIAL PHOTOGRAPHS CONSULTED IN THE NMR COLLECTION

541/A/437/3205-3206 (28/07/48)

541/A/437/4205-4206 (28/07/48)

540.611/3392-3393 (09/10/51)

58/798/4063-4064 (09/10/51)

OS/74132/368-369 (13/06/74)



+ 930

294+

293+

292+

---- Surface trace of groove or ditch Jumbled wall Stony area (weight indicates density) 🗸 🖌 Wall face 🖌 Modern wall MA Rock outcrop Loose boulders (shown schematically) ightarrow 
ightarrow contours in metres OD at 2.5m intervals

50

100 metres