



UNIVERSITY OF
LEICESTER

Archaeological Services

**An Archaeological Evaluation on Land
East of Broughton Way, Broughton
Astley, Leicestershire.**

NGR: SP 53117 93108

Tim Higgins



ULAS Report No 2016-160

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**An Archaeological Excavation on Land
East of Broughton Way, Broughton Astley,
Leicestershire**

NGR: SP 53117 93108

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An Archaeological Excavation at Broughton Way, Broughton Astley, Leicestershire.

Tim Higgins

Summary

An archaeological excavation was carried out by ULAS, University of Leicester Archaeological Services on behalf of Jelson Ltd, on land east of Broughton Way, Broughton Astley, Leicestershire, between September and November 2015. Excavations revealed a single Early Bronze Age pit which contained 31 sherds of beaker pottery and worked flints. The works identified middle to late Iron Age settlement, comprising small rectilinear enclosure, which started as open enclosure but later fully enclosed. The main enclosure sub divided with internal enclosures. The excavations identified at least one roundhouse and two animal stockades all located within the enclosure. Other internal features included large storage pits, of which two contained significant pottery assemblages and quern stones. The site was later transverse by remnant furrows of medieval ridge and furrow cultivation.

The site archive will be held by Leicestershire Museums Service, under accession number X.A162.2013.

1. Introduction

This report presents the results of an archaeological excavation undertaken across a small ditched enclosure likely representing a farmstead of Late Iron Age on land at land east of Broughton Way, Broughton Astley, Leicestershire (centred on NGR SP 53117 93108; Fig. 1). The archaeological work was undertaken in response to plans for mixed use development which included 310 residential units, a food store and petrol station by Jelson Ltd.

The initial potential of the site had been highlighted by previous geophysical survey (Smalley 2012) and subsequent archaeological evaluation (Kipling 2013) which had identified a small Iron Age settlement in the eastern area.

The trial trenching had confirmed the presence of Iron Age occupation which included enclosure ditches and internal small ditches. Limited sample excavation of features revealed in the trenches yielded artefactual evidence of habitation that comprised pottery sherds. Planning permission was granted for the new residential development and the Leicestershire County Council Senior Planning Archaeologist, as archaeological advisor to the planning authority, requested that an open area excavation be undertaken in order to record any archaeological remains of significance. This work was carried out by University of Leicester Archaeological Services (ULAS) in September and November 2015.

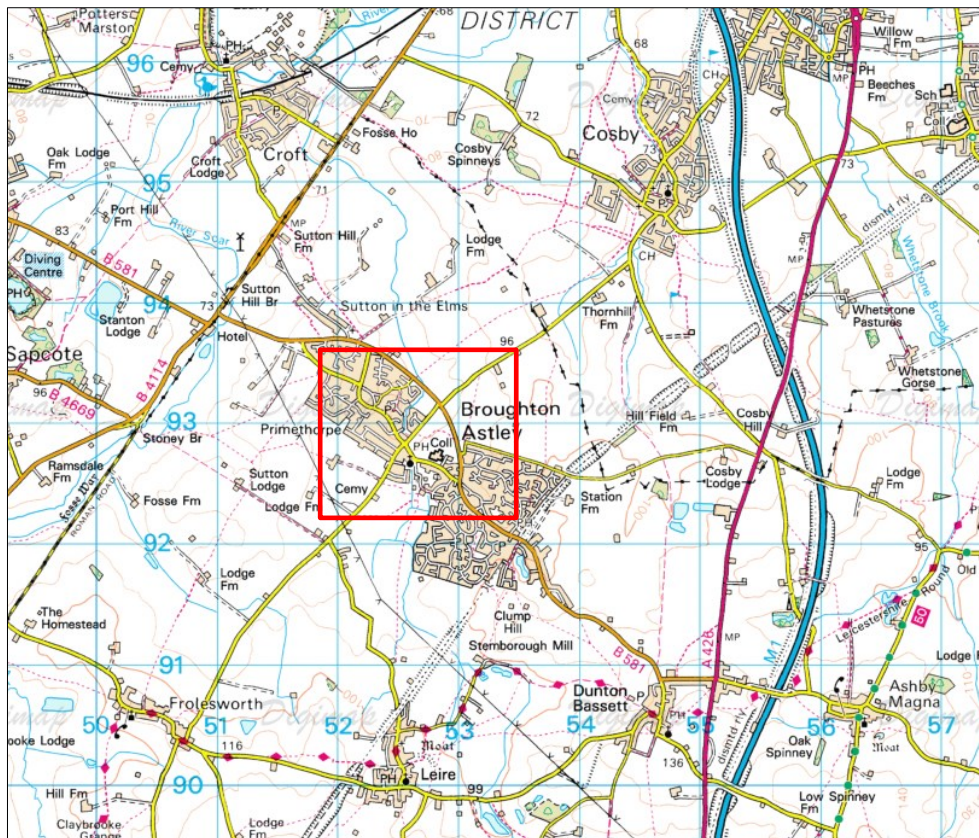


Figure 1 Site Location Plan within the UK and county of Leicestershire

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2. Site Description, Topography and Geology

The proposed development comprises two areas located on the east and west sides of the B581 Broughton Way at the northern edge of the village of Broughton Astley (SP 53117 93108) (Figs 1 and 2). The eastern site consists of three fields and covers 18.2 ha; a public footpath runs through the westernmost field leading east and then turning to the north. This field rises in its centre but appears to be largely flat. It was within this field that a geophysical survey had identified a few discrete and linear anomalies. These were subsequently confirmed during the evaluation as a small ditched enclosure likely to be representing a farmstead of Late Iron Age date covering an area approximately 1ha in size.

The Geological Survey of England & Wales, Sheet 169 (Coventry) shows that the geology of the sites would comprise alluvium and river terrace deposits, overlying Till, with the alluvium and river terrace deposits concentrated on the western side of the assessment area. The land falls from around 92m OD in the eastern part of the site to around 79m OD at the western edge.



Figure 2 Site Location within Broughton Astley

3. Historical and Archaeological Background

Two desk based assessments were undertaken for the areas (Hunt 2011a and b). The Historic Environment Record (HER) for the area shows that there were no known archaeological sites in the assessment area itself. However, there are a few archaeological sites in the vicinity of the assessment area and these are summarised below. There are three known prehistoric sites in the area. Burials of Late Neolithic-Early Bronze Age period (3000-1500 B.C) were located to the west of Clump Hill, 1.5km south of the excavation area. The two burials, one disturbed were found during groundworks in 1926 (MLE1318). The intact burial contained a flint dagger dated to the Late Neolithic- Early Bronze Age (c. 3000-1500 BC). A middle to late Iron Age settlement has been excavated 1km to south on land at Crowfoot Way, Broughton Astley (Clarke 2014). A pit alignment of possible late prehistoric date has been recorded on land at Thomas Estley Community College, Broughton Astley located 500m to the west of the excavation (Baker 2014;2016). A Roman coin was found in a field south-west of Hall Farm, around 1.5km south of the assessment area (MLE7818). Roman pottery has been found at a site close to Sutton Chapel, 1km north-west of the site (MLE7820). Anglo-Saxon pottery was

also found at the site mentioned above (**MLE7820**), while further medieval remains lie nearby (**MLE1310**), suggesting an area of settlement. The excavation lies around 500m to the north-east of the medieval settlement core of Broughton Astley (**MLE9437**) and around 300m east of the settlement core of Primethorpe (**MLE9445**). The village would have appeared to have initially shrunk in size, possibly during the medieval or post-medieval periods. This has left areas containing the remains of earthworks. One group of these lies 200m south-west of the assessment area (**MLE1306**). The site of a medieval and post-medieval mill lies around 700m to the south-west of the site (**MLE1304**; **MLE1305**). Sherds of medieval pottery have been found around 450m south-west of the assessment area at 65, Old Mill Road (**MLE9447**) and the site lies around 400m north-east of the medieval church of St Mary (**MLE10982**). Around 300m to the south-west of the development area lies the White Horse Inn, which is said to incorporate substantial remains of a medieval manor house. To the west of the Inn cobbled floors and 17th century and later coins have been found; a documentary reference in 1301 refers to 'herbage, garden, dovehouse and vivaries' (**MLE1317**). A group of post-medieval earthworks are located around 700m south of the site (**MLE1301**). There are two post-medieval buildings in the general vicinity. The late 18th century field barn and byre at Broughton Lane lies over 1km south-west of the site (**MLE11004**) and the 18th century Baptist Chapel at Sutton-in-the-Elms lies over 1km to the north-west (**MLE11016**). The remains of a post-medieval hall, later known as Arkwright Cottages were situated around 800m south of the site. They were demolished in 1991 (**MLE1319**). The site of a post-medieval windmill lies around 300m to the north-east of the site (**MLE1303**). A small post-medieval coin was found at the White Horse Inn (see above) in 1881 (**MLE7343**). The remains of post-medieval garden feature have been found in Rectory Gardens, 600m to the south-west of the site (**MLE1320**).

The geophysical survey identified a few possible discrete and linear anomalies of possible archaeological origin (Smalley 2012a; 2012b). Of note to the centre of the eastern area was an enclosure likely to be of Iron Age or Roman date (Fig.3).

A subsequent archaeological trial trench evaluation was undertaken in October 2013 comprising 71 30m by 1.8m trenches that were excavated across the development area. While these were generally negative trenches that had targeted the potential small ditch enclosure identified in the previous geophysical survey were positive (Fig.3). The enclosure was thought to be typical in terms of its form and location of small enclosed sub-rectangular farmsteads of this date encountered in the East Midlands, situated on south-facing slopes and close to water (Clay 2001, 6; Willis 2006). Whilst the trenches revealed limited survival of internal features or structures, there were however indications of more than one phase of structural development (Kipling 2013).

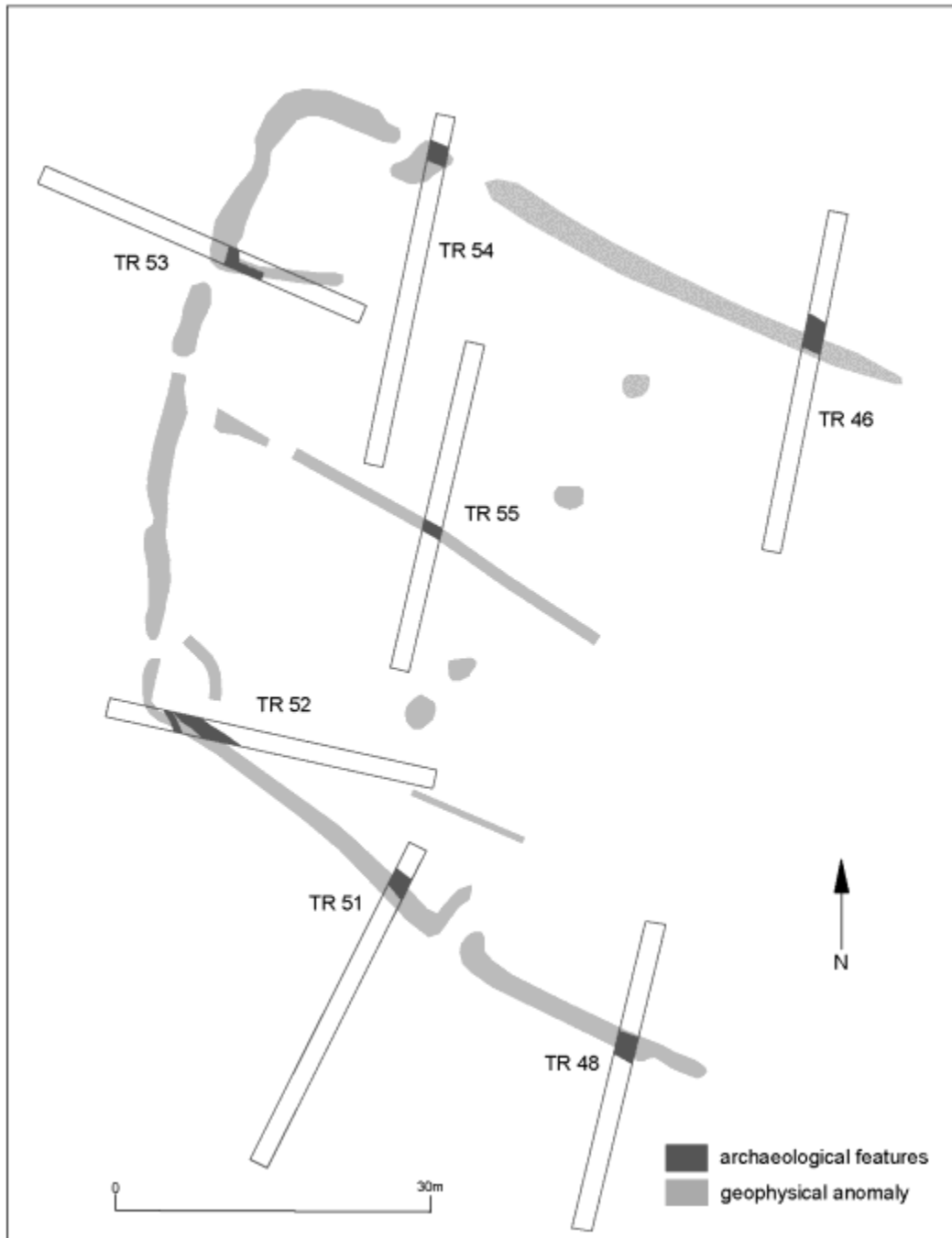


Figure 3 Site with trench locations in relation to geophysical survey results

4. Aims and Objectives

The specific objectives of the project, as stated in the Design Specification for archaeological work at land east of Broughton Way, Broughton Astley, Leicestershire (SK 53117 93108) (Clay 2015, hereinafter Specification), were to record a sufficient amount of the archaeological remains within the development area to establish their extent, date range, quality, character and form. It was also to assess the significance of these heritage assets within their local and regional context (Cooper ed. 2006).

5. Methodology

The site was stripped targeting the Middle to Late Iron farmstead covering an area approximately 1ha in size (Fig.3). Topsoil/modern overburden was removed in level spits, under continuous archaeological control and supervision, down to the uppermost archaeological deposits by hymax 360 using a toothless ditching bucket.

Following the machine stripping the exposed area was planned using a Topcon Hiper Pro GPS+ RTK System attached to a Topcon FC-100 controller. The data was processed using Topcon Tools GPS+ Software and the final plans completed with the aid of TurboCad v.15 design software.

Guidelines concerning the excavation of archaeological features on the site were provided in the 'Specification'. The enclosure ditches were sampled following a strategy where sections for excavation included potential entrance terminals. Various sections were excavated at mid points along each side of the ditches. Further areas of the ditches were also excavated where rich deposits of soil or finds were identified. Within the enclosure discrete pits and post-holes and additional gullies or ditches were generally half sectioned.

All excavated sections were hand-planned, photographed and the sections drawn to scale (either 1:10 or 1:20 as appropriate) and subsequently tied in to the Ordnance Survey grid system. All written records were entered onto pro-forma ULAS context record sheets and regularly updated site indices were maintained. All work followed the Chartered Institute for Archaeologists (CIfA) *Standard and Guidance for Archaeological Field Excavation*.

6. Excavation Results

Table 1: Summary of the chronology and land use activity

Date	Period	Activity
2200-1900 BC	Early Bronze Age	A single pit found within the enclosure
3rd century BC to the mid-1st century	Middle Late Iron Age	Small enclosure that was enlarged. Contained several smaller internal enclosures post holes and pits
1066 - 2015	Medieval - Modern	Cultivation

Note: Archaeological contexts as a cut are indicated by square brackets e.g. [74], while those that are fills or layers are indicated by round brackets e.g. (61). There was not a great variation within the fills of the features that were relatively homogenous mid-dark greyish/yellowish brown silty clay deposits. Only notable deposits are described more fully within the excavation results.

6.1 Pre Iron Age

Pit Feature [252], (251), (250), (258)

The earliest activity within the excavation area was indicated by the presence of a single Mesolithic worked flint dated to c. 9500 – 4500 BC. Some 49 worked flints were recovered from the excavation, however, a large proportion (66%) were from middle to late Iron Age features and are therefore likely to be residual or were un-stratified.

Within the north-east corner of the enclosure lay a single pit [252] dating to the Early Bronze Age (c. 2200 – 1900 BC) (Fig. 4). The pit contained 23 sherds of Early Bronze Age pottery and 17 (34%) worked flints.

Pit [252] was large oval feature with steep irregular sloping sides and rounded base that measured 2.9m long, 1.9m wide by 0.60m deep. It is thought that this feature may have been a possible quarry or storage pit. Primary fill (250) consisted of a dark grey silty sand mixed with frequent charcoal flecks and small fire cracked pebbles. The deposit also contained a sherd of Bronze Age pottery and 11 worked flints (included a thumbnail scraper, a pressure-flaked scraper and the plano-convex knife (see L. Cooper Section 8 below), along with animal teeth (see Browning Section 11 below). A secondary fill (251) comprised mixed brown grey silt-sand with abundant charcoal flecks and small fire cracked pebbles suggesting that the deposit was possible raked out hearth material. This deposit had also contained further finds included seven sherds of Bronze Age pottery and worked flint. A third fill that comprised brown grey silt-sand mixed with some fire cracked pebbles and charcoal flecks overlay (251). Within this deposit 23 sherds of Bronze Age pottery along with two sherds Iron Age were recovered. The presence of two Iron Age sherds in this upper fill of the pit are thought to be intrusive.

There were 31 sherds of Beaker pottery recovered from a single pit [252] (see Purslow and Cooper Section 7 below for full discussion on form and type). The decoration identified on the Beaker sherds could be compared to material from Willington, Derbyshire (Marsden and Woodward 2009) and Asfordby (Cooper 2012). Overall in terms of decoration this assemblage compares closely with that from Asfordby and therefore it is likely that dating falls to the period 2200-1900 cal BC (Needham 2005, 195). The worked flint found within the pit included a thumbnail scraper, a pressure-flaked scraper and the plano-convex knife (see L. Cooper, Section 8 below). Overall the remaining worked flint assemblage was a rather crude flake débitage that suggested a later prehistoric date. A sample from fill (258) contained a small fragment of hazelnut shell and a very poorly preserved fragment of cereal grain which could not be identified to species (see Small, Section 12 below).



Figure 4 Location of Early Bronze Age pit within enclosure

6.2 Iron Age Settlement

Phase 1 Open Enclosure

Sections North Ditch, [253], [255], [376], [378], [380], [404], [406] (Sections Aa, Ba, Ca)
West Ditch, [233], [239], [300], [302], [352], [382], [386], [388] (Sections Da, Ea, Fa)
East Ditch [136], [142], [149], [151], [156], [169], [171], [223], [225], [458] (Sections Ga, Ha, Ia, Ja and Ka)

Internal Annexe 1 (Sub enclosure) Ditches [187], [351]
(Group A) Post holes [146], [153], [175] [182]
(Group B) Pits [117], [119] and [123]

The plan and sections excavated across the northern and western ditches of the enclosure suggest that the northern 'L' shaped enclosure was likely to be the primary phase with an open southern and eastern approach (Fig. 5). Various sections across these ditches suggest recuts. Which probably indicate when these ditches are redefined and when the enclosure was extended or modified. The north-eastern ditch appears to have been added as it stratigraphically cuts a northern ditch that had already silted up. This created a rectangle enclosure measuring c. 61m x 46m (c. 0.25m ha) with an open southern approach.

The primary ditch cut for the western ([233], [302]) and northern ditches ([255], [376], [386] and [404]) were all broadly 'U' shaped cuts (Figs 5, 6 and 7; Plates 1 and 2). All the cuts had moderately sloping sides and irregular flat bases and generally measured between 1.80m and 3.60m wide. They all contained a similar primary fill to that of the northern ditch that comprised pale yellowish brown silt-sand-clay mixed with occasional small pebbles. The cuts [136], [169], [171], [225], [151], [156] for the eastern ditch were broadly irregular 'V' shaped with steep sides that tapered to a point (Figs 7 and 9). The fills comprised grey silty-sandy-clays that were mixed with large rounded pebbles and occasional charcoal flecks. Finds from the enclosure ditch were scarce but three Iron Age pottery sherds were recovered from (137) [136] located in the north-east corner of the enclosure and (155) [156] on the east side. Within (240) [239] on the west side seven pottery sherds were recovered along with a worked stone (SF07) which was identified as a bun shaped rubbing stone (See Thomas, Section 9 below).

All the ditches were silted up before being re-cut with broadly 'U' shaped cuts [239], [253], [300], [380], [388] and [406]. These re-cuts and clearances may have occurred during the periods when the enclosure was remodelled.

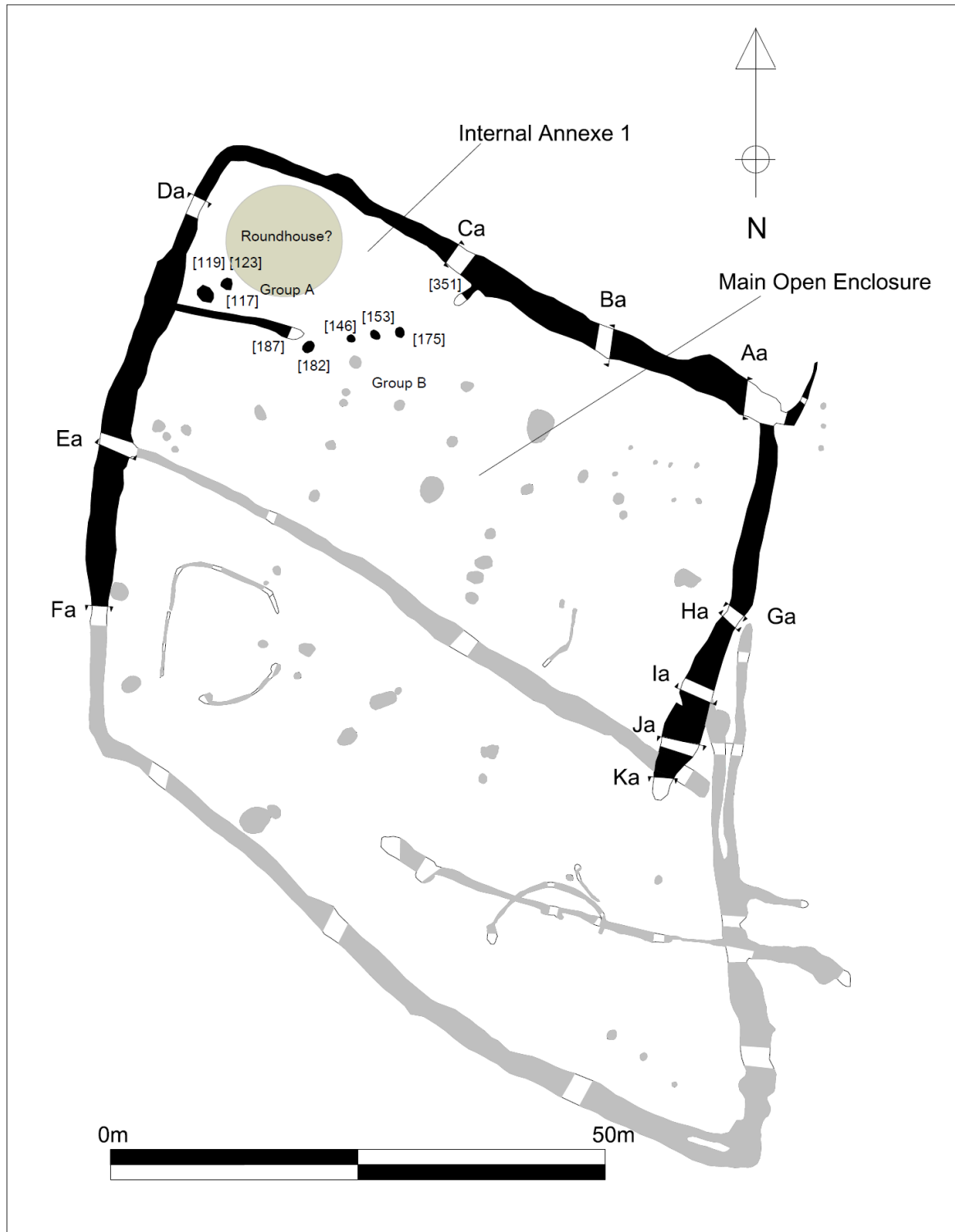


Figure 5 Enclosure Phase 1



Plate 1 Northern Enclosure Ditch [404] (section Ca)

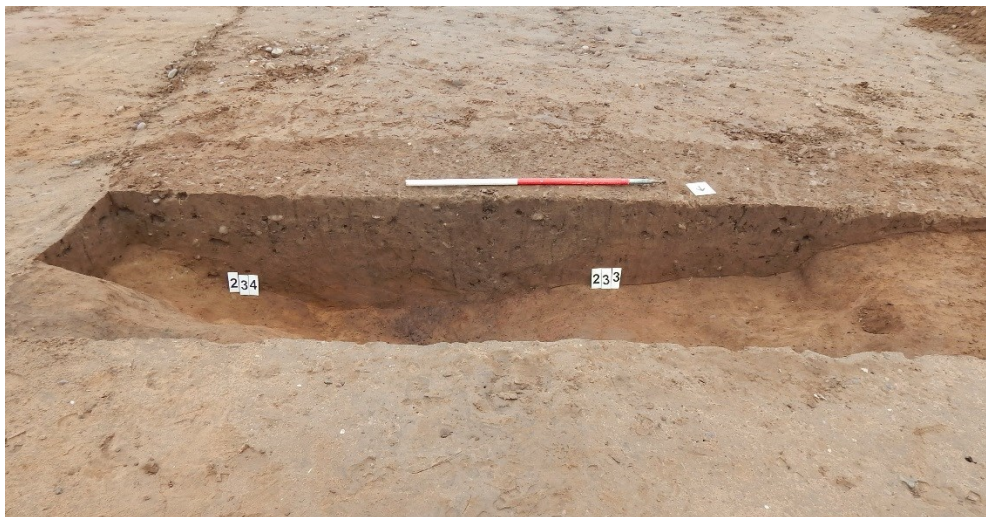


Plate 2 Western enclosure ditch [233] (section Ea)

Internal Annexe 1 (Sub-Enclosure)

An internal rectangular annexe or sub-enclosure of 330sq m was located in the north-west area within of the main enclosure (Fig. 5). The southern ditch [187] was 13m in length. In the south-east corner of the enclosure a complex sequence of features were recorded. This part of the site had been heavily truncated so what remained were the very base of surviving associated features and the ditches. The remnants of the ditch profile showed steep near vertical irregular sides and bases. The ditch measured 1.20m wide and 0.29m deep. It contained a single fill of mottled mid brown grey orange sandy-silt mixed with occasional small rounded pebbles and sparse charcoal fragments. The deposit contained two Iron Age pottery sherds and three fragments of slag, which may have been residues from smelting activity on the site (see Addison, Section 10 below).

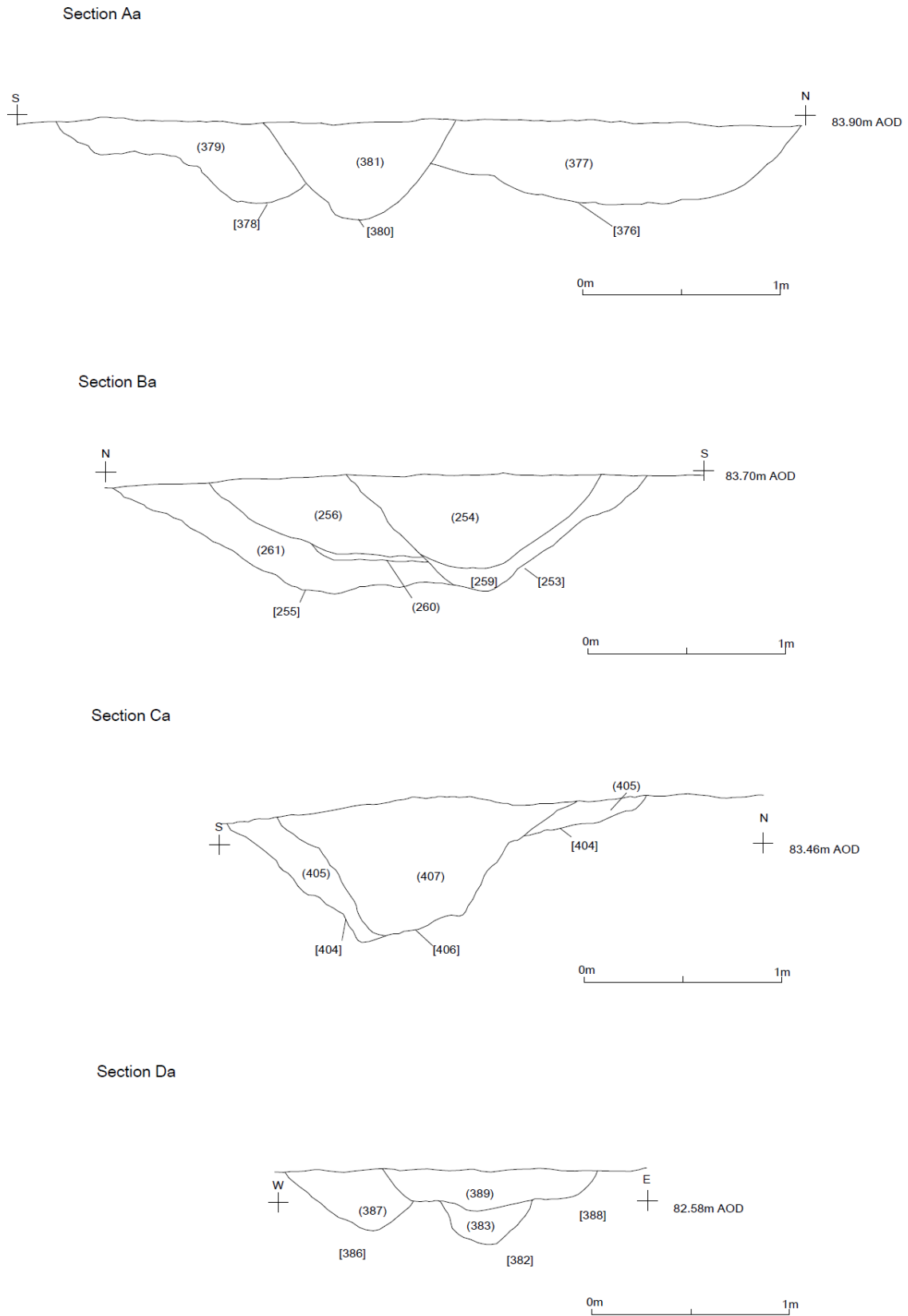
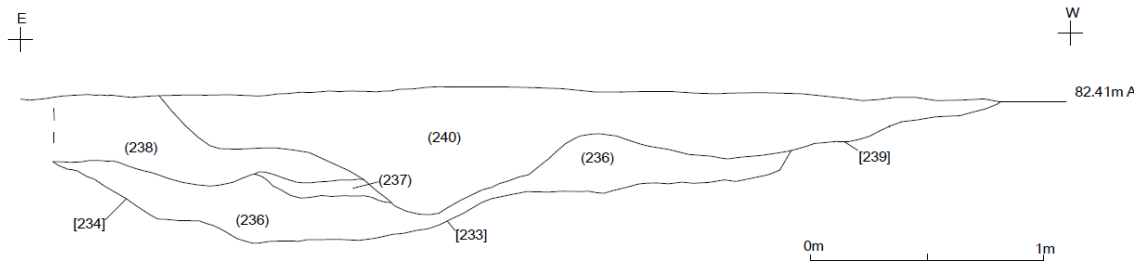
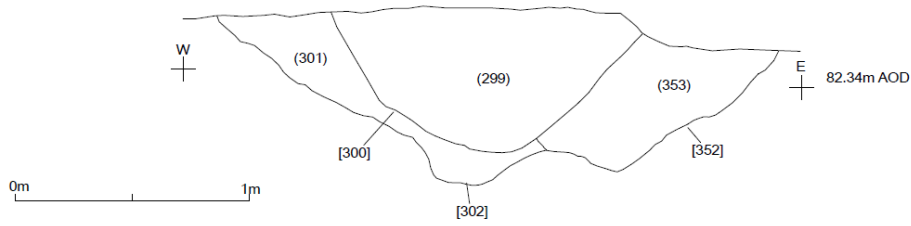


Figure 6 Enclosure ditch sections Aa to Da

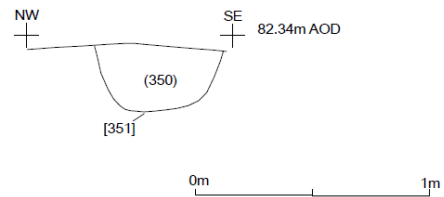
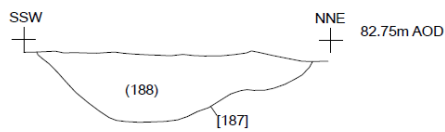
Section Ea



Section Fa



Internal Annexe 1 Ditch Sections



Internal Annexe 1 Post holes (Group B)

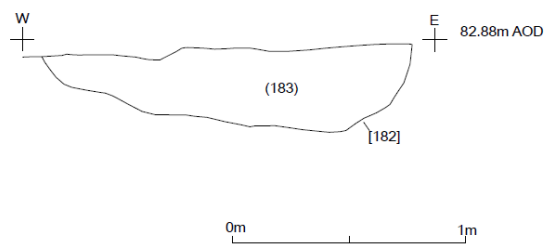
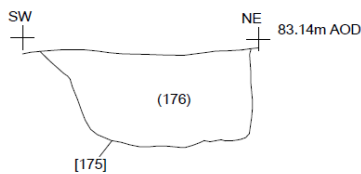
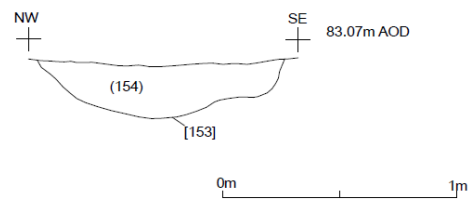


Figure 7 Enclosure ditch western sections and Annexe 1 Sub Enclosure sections

A series of pits and post-holes (Group B) along the eastern edge at the corner of the enclosure may represent a fence-line ([146], [153], [175], [182]) (Fig. 5 and 7). A short 3m length of ditch or spur was found in the north-east corner running into the main enclosure [351]; the terminus had a rounded butt end with steep concave sides and base and measured 0.55m wide and 0.27m deep. The fills of the post-holes generally contained mid-grey sandy-silts mixed with occasional fire cracked pebbles and charcoal flecks. Post-hole [175] also contained five sherds of Iron Age pottery from fill (176). Environmental samples from (176) contained a low density of remains, including two indeterminate cereal grains, two spelt wheat (*Triticum spelta*) glume bases and an abraded fragment of glume base which could not be identified to species. A small number of 'weed' seeds were identified that included goosefoot (*Chenopodium* spp.) which is typical of arable and disturbed lands, a large grass (*Poaceae*) and two vetch (*Vicia* spp.) seeds (see Small, Section 12 below).

Post-pit [182] (183) had also contained five sherds of pottery and a single cattle tooth. A break between the spur ditch and the fence posts of 6 metres may represent an entrance way into the north-east corner. A small group of pits (Group A [117], [119] and [123]) were located within the south-west corner of the enclosure with [123] containing pottery sherds of Iron Age date (Figs 5). These pits are restricted to the immediate area around the edge of the internal annexe and appear to be avoiding the centrally-enclosed space. No structural evidence was found within this area and the enclosure may have been for animals. The location of the pits in close proximity to the western ditch would suggest there was no internal bank for the main enclosure.

Phase 2 Extension to the Enclosure

Sections Southern Ditch [292], [294], [347] (Sections La Ma)
Sections Internal Ditch [134] [308] [310] [164] (Sections Na Oa Pa)

Northern Half Features

Group C Pits [127], [189], [199], [203] [206]
Group D Fence lines [113], [115], [129] [140] [144]
Group E pits [123] [125] [159] [277] [287], [288]
Group F Post holes [210], [232], [210], [266] [269]
Group G [451], [455], [457]
Group I Post Holes [286], [390] [397] [424], [428], [430] [432], [437] [448] Pits [138] and [286]
Group J Gully [420], [422]

Southern Half Features

Stockade structure 1 [215], [219], [221], [227], [230], [241], [246], [248], [257], [271], [273]
Group H Pits [165], [177], [173], [180], [184], [356] [362]
Group K Storage Pits [100], [131] [306] [312], [318], [367] [444]

Phase 2 of the Enclosure was re-planned and extended to the south to form a larger rectangular area measuring c. 61m x 67m (c. 0.36m ha; Fig 8). The original ditch appears to have become largely in-filled before being redefined by a slightly less substantial ditch with a more rounded 'V' shape profile ([352], [378], [253], [406] and [386]). This cut generally had steep sloping sides and a rounded base and on average was 1.5m wide and 0.65 deep. The south-western extension had a very similar rounded 'V' shaped profile ([320] and [329]).

At this stage the newly extended rectangular enclosure appears to have been sub divided with a central west to east ditch [134], [164], [308] and [310] which effectively created northern and southern enclosed spaces (Fig 8). This ditch had a steep 'V' shaped cut that silted up before being recut with a shallow 'U' shaped cut (Plate 4). Finds from this ditch were scarce with a single sherd from (135) [134] and five sherds of Iron Age pottery from (311) [310]. However the terminus fill (161) [164] appears to have been used as an area to tip refuse and produced many finds including 8% (52 sherds) of all Iron Age pottery and some fragments of animal bone that included cattle and horse.

The central ditch measured up to 2.00m wide and 0.40m deep and stratigraphically cut across the eastern ditch [171], [225], [151], [156] which had silted up (Fig 9). This would perhaps suggest that parts of the north-east corner of the enclosure may have reverted back to an open entrance during this period. During this phase the south-east corner of the enclosure was thought to have remained open. Like the first phase, finds from the ditch were scarce, comprising a few sherds of pottery and animal bone from the western side.

Activity in the northern half of Enclosure

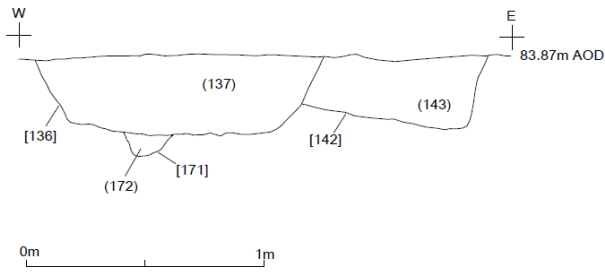
Within the northern enclosed space were a number of pits, post-holes, and linear features which may indicate evidence for the structures such as roundhouses and fence lines (Fig 8). There were three distinct groups of features (Group C, Group D, Group E, Group F, Group I and Group J).

The arrangement of and position of pits in Group C and post-holes in Group D suggest another enclosed space. Group C consisted of small group of storage or refuse pits and post-holes [127], [189], [199] and [203] located within the south-west corner of the northern enclosed space. These shallow pits were generally sub oval with moderately sloping sides and flat irregular bases, measuring between 1.10m to 2.25m long, 0.70 to 1.40m wide and 0.12m to 0.25m deep. The pits generally contained dark grey sandy-silt mixed with abundant charcoal flecks and large fire cracked pebbles. Eleven Iron Age pottery sherds were recovered from pit [127], (128) and eight from [205], (203). A sample from (205) contained a moderate density of 61 items. Twenty-seven grains were identified including nine barley (*Hordeum vulgare*) grains (probably hulled) and two glume wheat grains (probably spelt). Eighteen fragments of chaff were present: 14 spelt wheat glume bases and four indeterminate glume bases. A few 'weed' seeds were also identified comprising 12 large grass seeds and four goosefoots.

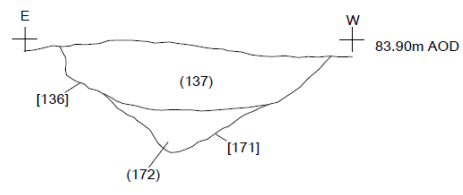


Figure 8 Phase 2 Enclosure extension

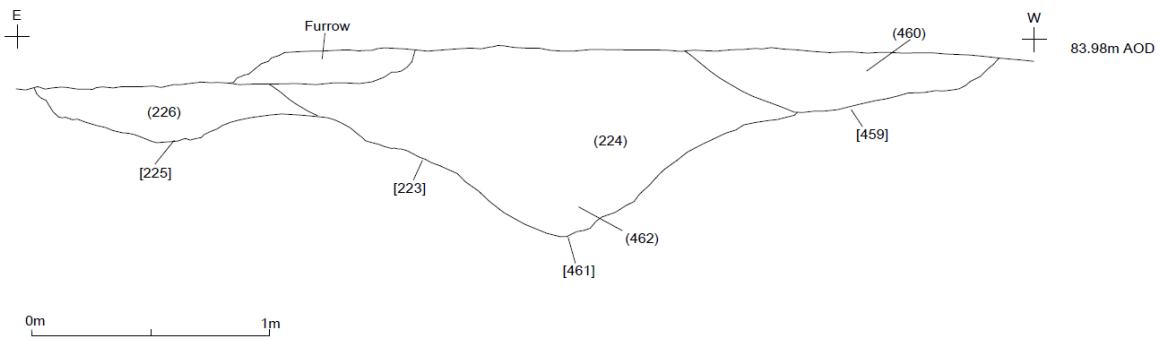
Section Ga



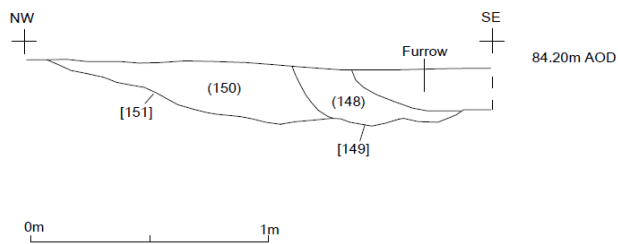
Section Ha



Section Ia



Section Ja



Section Ka

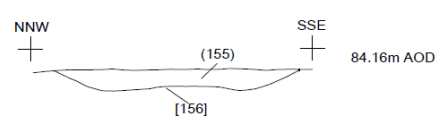


Figure 9 Enclosure ditch eastern sections Ga to Ka



Plate 3 South enclosure ditch section [347]



Plate 4 Internal Ditch [308] Section

Group D consisted of six post-holes [113], [115], [129] [140], [144] and [295] that were aligned north to south and situated *c.* 6.5m to the east of the Group C post-holes. Three of the post-holes ([113], [115] and [129]) were all of a similar size, being irregular oval cuts up to 0.90m in diameter. At the southern end were two larger sub-oval post-holes [140] and [144], *c.* 1.60m in diameter. A small pit or post-hole was located one metre to the east of pit [140]. This had shallow concave sides and a flat base and measured 0.84m long, 0.46m wide 0.20m deep. Generally the fills comprised a dark brown grey silt-sand mixed with a large quantity of fire cracked pebbles and occasional charcoal flecks.

Iron Age pottery sherds were found in (130) [129], (141) [140] and (145) [144]. A worn saddle quern stone (SF2) appeared to have been re-used as post packing material within (145). A sample (100) from (141) post-pit [140], contained six items including an indeterminate cereal grain, a spelt wheat glume base, three large grass seeds and an indeterminate seed. Another sample (110) from (296) [295] contained 59 items, including 21 poorly preserved cereal grains seven identifiable as glume wheat and three as barley. Nineteen fragments of chaff were present comprising ten spelt wheat glume bases and nine indeterminate glume bases. Goosefoot, large and small grass seeds, and knotgrass were also present.

The arrangement of Group C and D features suggests enclosed spaces within the northern half of the enclosure (Figure 8). Group E features may delineate potential enclosed space perhaps a fence line indicated by post-holes [123], [125], [159], [277], [287] and [288]. Post-holes [159] [277] and [287] may also represent a fence *c.* 15m in length with [159] oval with steep or vertical irregular sides and base, measuring 1.08m long, 0.84m wide and 0.20m deep while [277] and [287] were both truncated circular features with shallow concave sides and flat bases. measuring 0.85m to 1.22m in diameter and between 0.09m deep. Both contained light brown sandy clay mixed with rounded pebbles. To south was truncated pit [288] a shallow circular feature with shallow concave sides and flat base, measuring 0.98m long, 0.56m wide and 0.11m deep with a mid brown silty-clay fill (290) mixed with rounded pebbles, which contained one sherd of pottery. To north of the fence line was a double post-setting [123] [125], both sub-oval with steep sides and concave bases. [123] was the larger of the two and measured between 1.10m long, 1.00m wide and 0.25m deep while [125] measured 0.40m long, 0.30m wide and 0.06m deep. Both contained brown sandy-silt mixed with occasional charcoal flecks. The fills of post-holes (124) and (126) comprised brown sandy-silt mixed with pebbles (some fire cracked), occasional charcoal flecks and red clay. Three sherds of Iron Age pottery were found within (124).



Plate 5 Large post-hole [232] part of Group E



Plate 6 Large post-hole [210] part of Group E

To the east of Group E features was another linear group of post-holes: Group F [210], [232], [210], [266] [269] which along with Group D features located to the west may have formed part of fence structure that help define a central enclosed space (Fig 10).

A large (1.40m diameter, 0.41m deep) round pit [210] was located at the southern end of this structure, having steep concave sides and an irregular base. At the base of the pit were large rounded stones (209), along with fragments rotary and saddle querns (SF4, SF5 and SF6), (Plate 6). The pit was filled with a grey brown silty-sand mixed with occasion charcoal flecks and a substantial amount of pottery (56 sherds) (208), (211) (212), (213) and (214). The large

quantity of finds may indicate that the pit was used as a refuse dump or for post packing or alternatively may represent a deliberately structured deposit.

Circular pit [269] with shallow concave sides and rounded base was located one metre to the north. A shallow post-hole feature that was circular shape and had shallow concave sides and rounded base. Measuring 0.96m long, 0.42m wide and 0.16m deep it had a different fill of mid-brown sandy-clay mixed with fire cracked pebbles. Directly adjacent to [269] was a similar pit [266] which measured 1.5m long, 0.54m wide and 0.28m deep. This feature contained a lower fill (268) consisting of a reddish brown and yellowish grey clay mixed with angular stones and large rounded pebbles below a mid brown sandy-clay mixed with fire cracked pebbles (267). Both deposits contained a few Iron Age pottery sherds and fragments of animal bone were found with in fill (267).

An oval pit [232] was located two metres to the north of [266] and measured 1.50m long, 0.80m wide and 0.43m deep with concave sides and rounded base (Plate 5). At the base was a deposit (245) of mid-grey brown silt that was sealed by red orange clay (244), a possible dump of daub material. Overlying this was a large quantity of large pebbles (245), the majority being fire cracked.

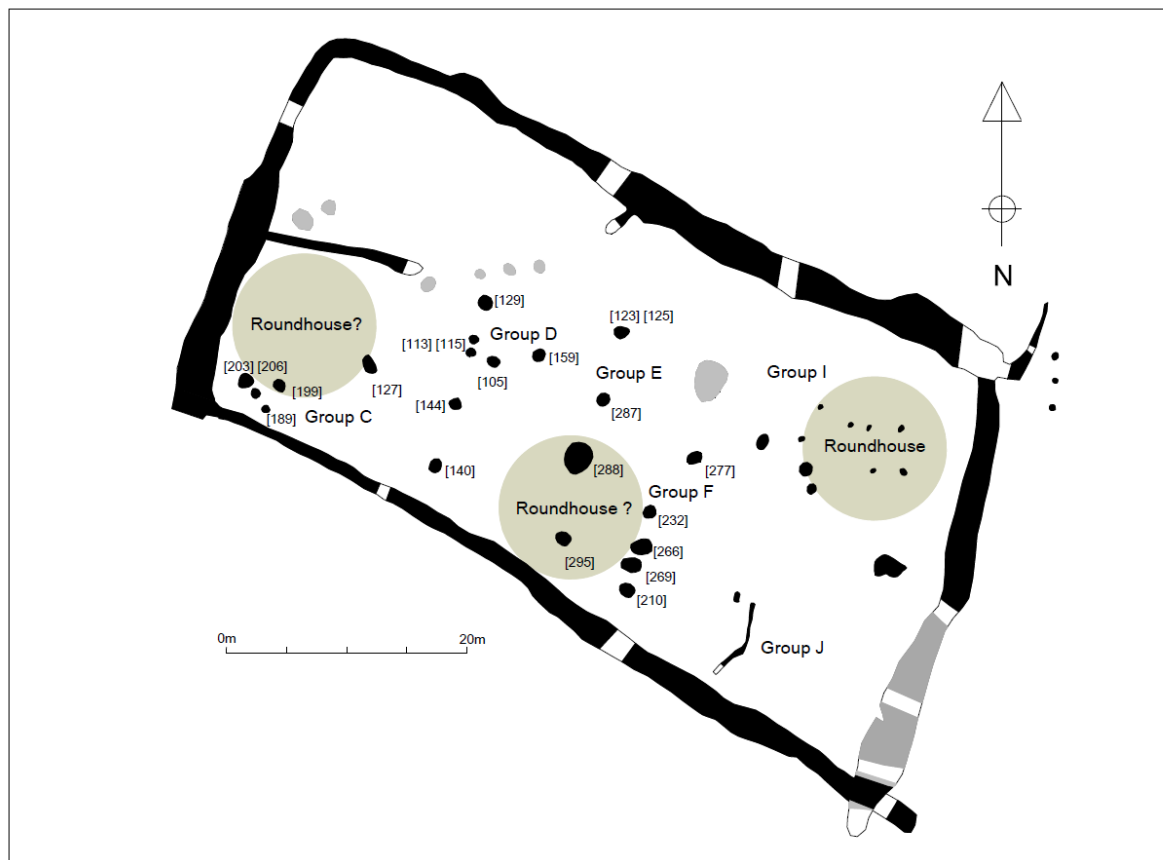


Figure 10 Features within the northern half of enclosure

Roundhouse

Group I comprised nine post-holes and two pits [139] and [286] located in the north-east corner of the enclosure may be interpreted as the truncated remains of a roundhouse and associated refuse pits (Figs 11 and 12). Four of the post-holes [390], [397], [424] and [442] were arranged

in an arc and may have formed a western wall to the structure. Post-hole [390] was located at the southern end of the arc and comprised a large sub-circular feature that measured 1.00m long, 0.90m wide and 0.25m deep. The feature had fairly steep sloping sides and rounded base. At base of the feature was abundant deposit of large pebbles and stones (391) and was probably used as packing material for a post. Overlying this was a secondary fill (392) comprising a brown orange sandy-silt.

Directly to the north was a second large post-hole [442] that measured 0.90m in diameter and 0.15m deep. The sub-circular feature had shallow concave sides and a flat base and contained a single mid grey sandy-clay fill mixed with small pebbles (443). A third sub-circular post-hole [397] was spaced 2m from [442] on the same arc and measured 0.55m long, 0.50m wide and 0.30m deep. The primary fill (398) contained a comparatively large quantity of mid-Iron Age pottery (121 sherds) which equated to 18% of all pottery recovered. The pottery appeared to heat effected and underlay a deposit of fire cracked pebbles. This was sealed by (399) that consisted of dark grey clay mixed with abundant flecks of charcoal.

Post-hole [424] appears to continue the projected alignment for this roundhouse. This feature appears to be the truncated remnant of a post hole that measured 0.60m long, 0.50m wide and 0.22m deep. Overlying the base of the post-hole was a deposit large pebbles and stones (425) sealed by an orange red clay (426) and dark grey clay mixed with charcoal (427).

The remaining five post-holes [428], [430], [432], [437] and [448] were located within the projected roundhouse area. These were all generally smaller and may represent internal structures. Post-holes [430] and [448] were the two largest, measuring 0.60m diameter. [430] was sub-oval in shape with concave sides and flat base and was 0.33m deep. It had single fill (431) that comprised dark grey sandy-clay mixed with a few pebbles. [448] was slightly different it was again was sub-circular shape with steep sloping sides but the base was more rounded. It contained two fills: [449] a deposit of large cobbles found at the base overlain by greyish clay-silt (450). The other three post-holes [428], [432], [437] were generally all similar sub-circular features with moderately sloping sides and rounded bases measuring between 0.40m and 0.50m in diameter and 0.20m to 0.30m deep. They contained large rounded cobbles and fire cracked pebbles, mixed with grey clay-silt. No charred plant remains were present within the post-hole samples.

Two pits [138] and [286] were located close to the edge of the projected roundhouse. [286] was located *c.* 3m to the west of the roundhouse and comprised a sub-circular pit that had moderately sloping concave sides and concave base. The feature measured 1.16m long, 0.85m wide and 0.17m deep and contained a relatively sterile red brown silty sand fill (285) mixed with occasional pebbles. Pit [139] located 2.5m to the south was an irregular shallow cut with concave side and uneven base. The pit measured 2.45m long, 1.76m wide and 0.20m deep and contained an orange mottled grey brown silty-sand (138) with fire cracked pebbles and two sherds of Iron Age pottery.

Group J features were located in the south-east corner of the northern enclosed space comprising a curvilinear gully [420] and pit, [422] (Fig.11). A short curvilinear feature [420] *c.* 7m long had irregular sloping sides and flat base and measured 0.48m wide and 0.08m deep. Towards the northern end a sub-rectangular pit [422] with steep irregular sides and base measuring to 0.76m long, 0.29m wide and 0.23m deep was located. Both features contained mixed dark brownish grey silty-sand mixed with few rounded pebbles and charcoal flecks. Three pottery sherds were recovered from pit fill (423).

Group G consisted of three post-holes [451], [455], [457] outside the enclosure and parallel to ditch [380] forming a run-off from the northern enclosure ditch. Post-holes [451] and [457] were the most clearly defined with vertical sides and a flat base while [455] was less well defined. Each post-hole was filled with a similar deposit of mid greyish brown silty-sand mixed with infrequent pebbles. The post-holes measured between 0.50m and 0.68m in diameter and up to 0.68m deep and may have represented a fence structure associated with entrance.

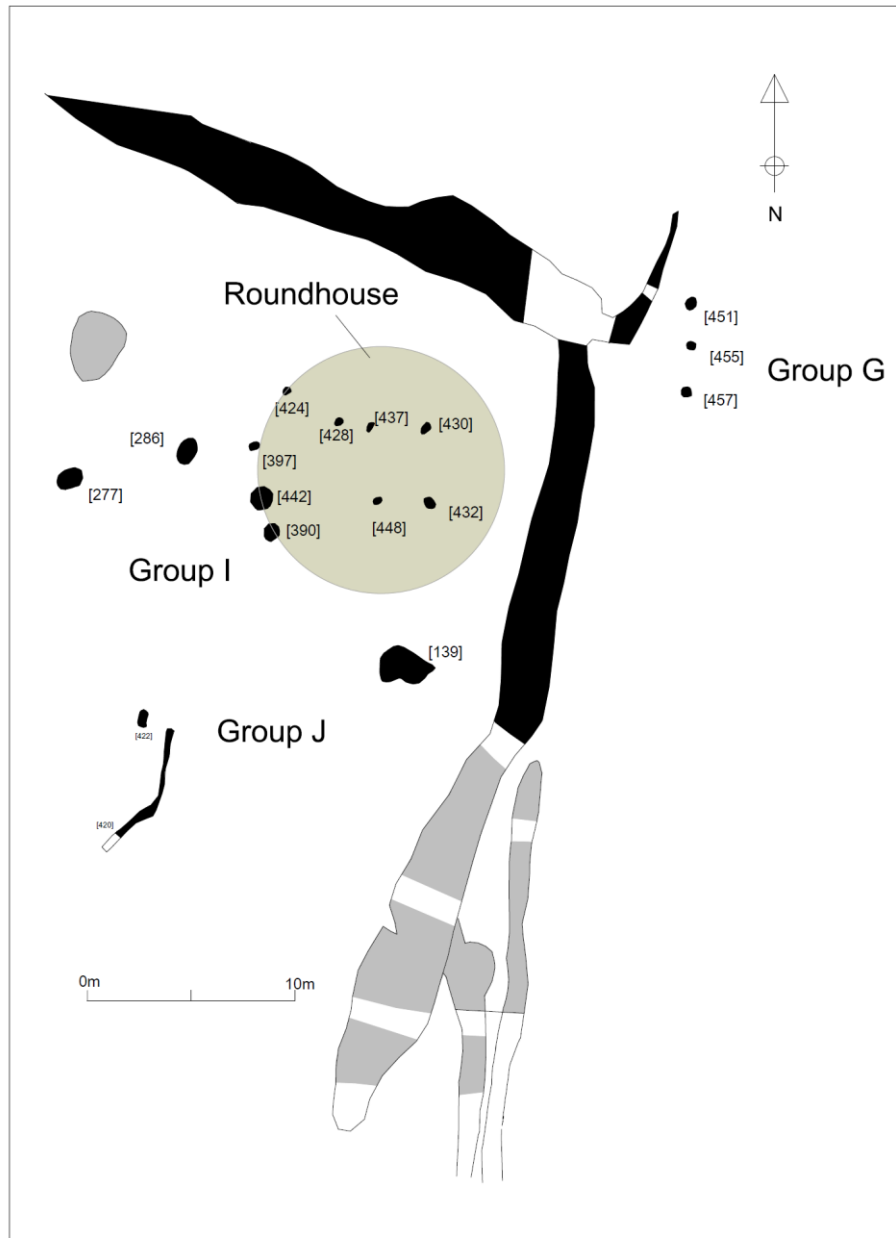


Figure 11 Phase 2 Group I Roundhouse with Group G and J features

Roundhouse Group I Features

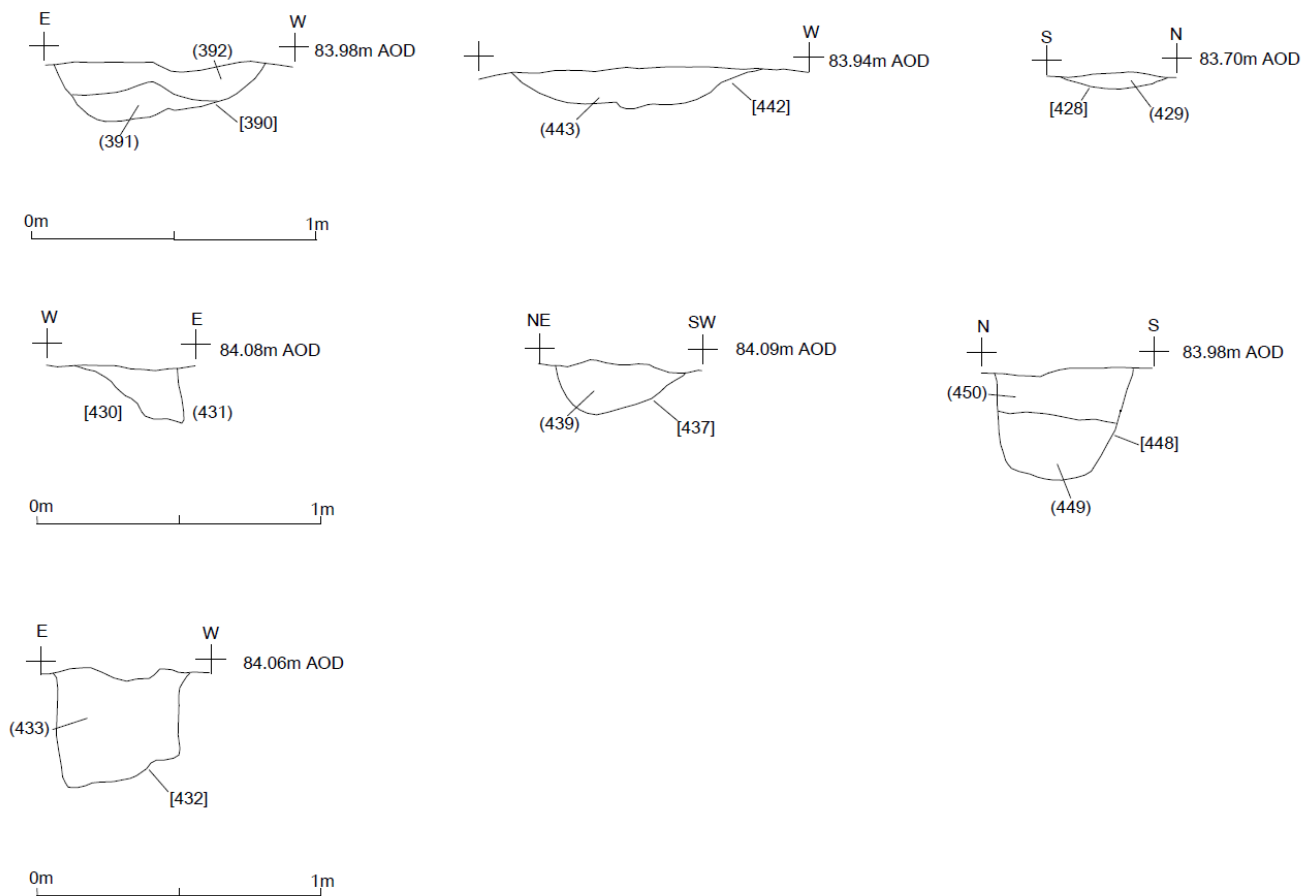


Figure 12 Sections Roundhouse Group I

Activity in southern half of the enclosure

Stockade Structure 1

Within the south-west corner of Enclosure was a small ‘D’ shaped structure formed by two curvilinear features that enclosed an area of 125sq m (Fig 13). The curvilinear features appear to have large post settings located within their butt ends. The gaps between two the curvilinear gullies probably represent entrance ways with an east-facing entrance measuring 5m wide and south-western entrance 4m wide.

The north-western feature ([215], [219], [221] and [227]) measured *c.* 23m in length, with moderately sloping irregular sides and concave base. The feature measured 0.30m wide and 0.12m deep and contained dark brown orange sandy-clay fills (216), (222), (229) and (231) mixed with small pebbles and large rounded pebbles. The southern terminus appeared to

include a post setting that had irregular sides and a flat base c. one metre long, 0.35m wide and 0.20m deep.

The south-eastern curvilinear feature [241], [246], [257], [271], [273] measured c. 9m long, 0.30m wide and 0.10m deep and had moderately sloping 'V' sides and rounded base. At either end were two large sub-rectangular post-hole features [248] and [271] with vertical straight sides and flat base and measuring c. 1.60m long, 0.70m wide and 0.50m deep. Within the base of both curvilinear features evidence of numerous small stake holes were observed suggesting wattle panels or stakes. Typically the fills within both curvilinear features comprised grey clay sand mixed with occasional charcoal flecks and frequent large fire cracked pebbles or cobbles. Sixty-one sherds of Iron Age pottery were recovered from (274) and three from (275). There were very few charred plant remains present from samples taken although three barley grains from sample 109, (274) and goosefoot seeds from samples 108 (276) were identified.

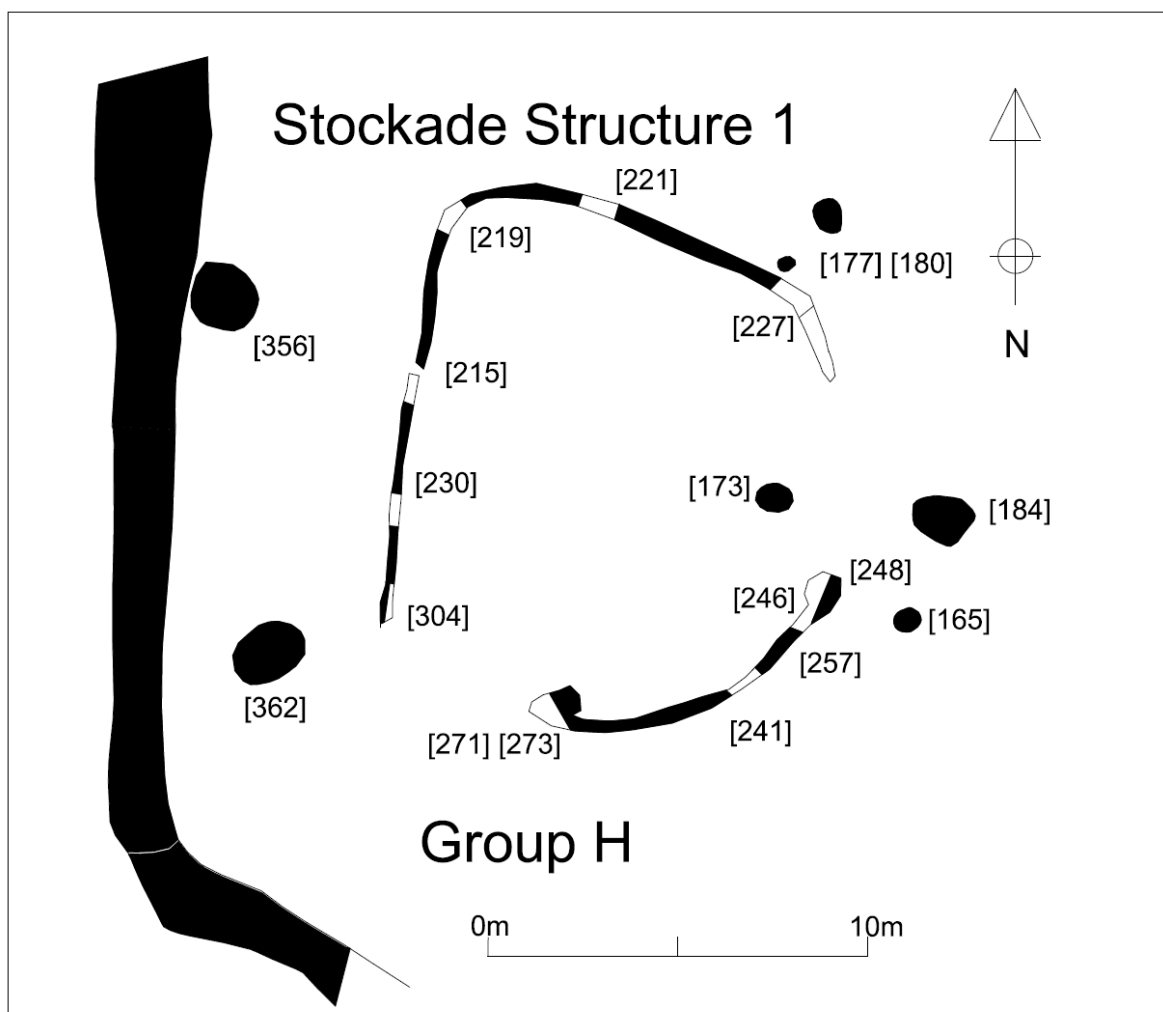


Figure 13 Phase 2 Stockade Structure 1

Outside the enclosure five pits [165], [177], [180], [184], [356], [362] were identified while one single internal post-hole [173] was also located (Figure 13). The pits typically measured 1.8m long, 0.8m wide and 0.35m deep and were generally sub-oval with vertical straight sides and flat bases. They contained dark grey sand mixed reddish brown clay lenses and charcoal

flecks. Pit [184] (186) had also contained large number of fire cracked pebbles and 16 Iron Age pottery sherds thought to be from one vessel. A sample (105) from (186) contained very few charred plant remains although a glume base and a large grass seed and goosefoot seeds were recovered. Sub-circular pit [165] was a smaller feature with moderately sloping sides and an irregular base measuring 0.75m in diameter and 0.18m deep contained a brown orange sand fill (166) mixed with clay and pebbles.

Stockade Structure 2

Within the south-east corner of the Enclosure was a single curvilinear feature [370] that may have formed a semi-circular enclosure or stockade enclosing c. 43 sq m. A large post-hole was observed on its western end suggesting a possible timber structure or stockade (Fig 14 and 15).

The curvilinear feature [370], [414] was c. 17m in length, with shallow concave sides and a rounded base which measured 0.47m wide and 0.10m deep. The western terminus of the feature appeared to contain a sub rectangular post-hole with steep shallow irregular sloping sides. The base was irregular and had several stake-holes in the base. Overall the feature measured 2m long, 0.90m wide and 0.20m deep. The post-hole and stake-holes suggest the feature is structural rather a gully. Primary deposit of charcoal found at the base of this foundation (372) comprised grey clay and charcoal and Sample 114 from (372) contained a moderate density of remains (73 items). Twenty cereal grains were present but poor preservation only enabled six species to be identified: four barley and two glume wheat. Ten pieces of chaff were present: five spelt glume bases, four indeterminate glume bases and a barley rachis internode. A number of weed seeds were present, the most abundant beings large grass seeds while Vetch, small grass seeds, and knot grass (*Polygonum spp.*) were also present. Weeds of arable and disturbed lands included goosefoot and dock (*Rumex spp.*). Heath grass (*Danthonia decumbens*), a grassland species, was also identified. Overlying (372) was (371) a dark brown grey clay-sand mixed with small mid rounded stones and 27 sherds of Iron Age pottery. An additional seven pottery sherds were recovered from the eastern extent of the feature (415).

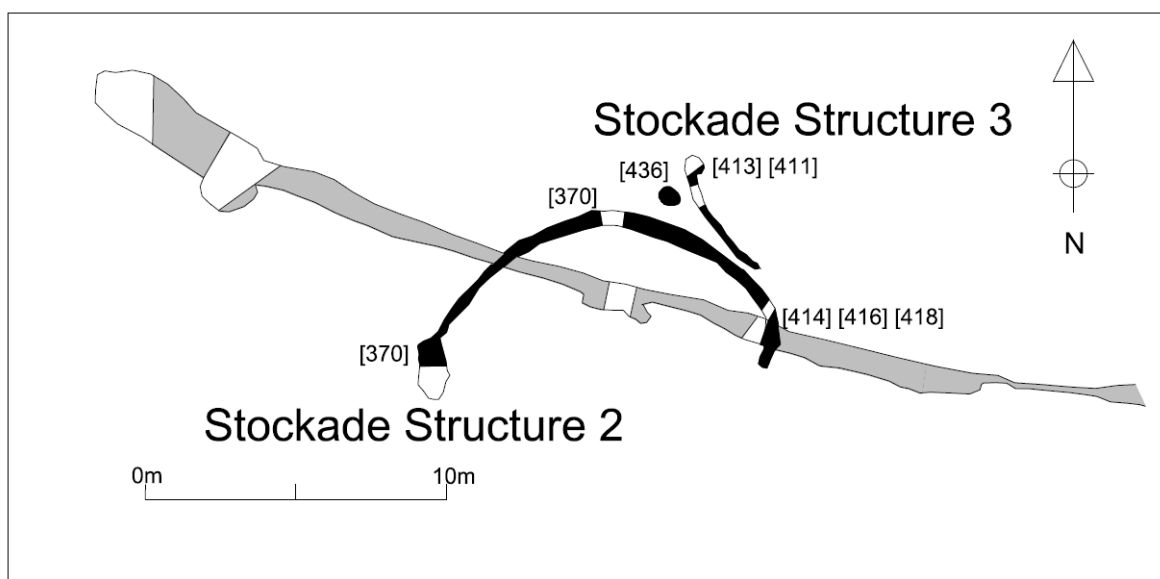


Figure 14 Phase 2 Stockade Structure 2 and 3

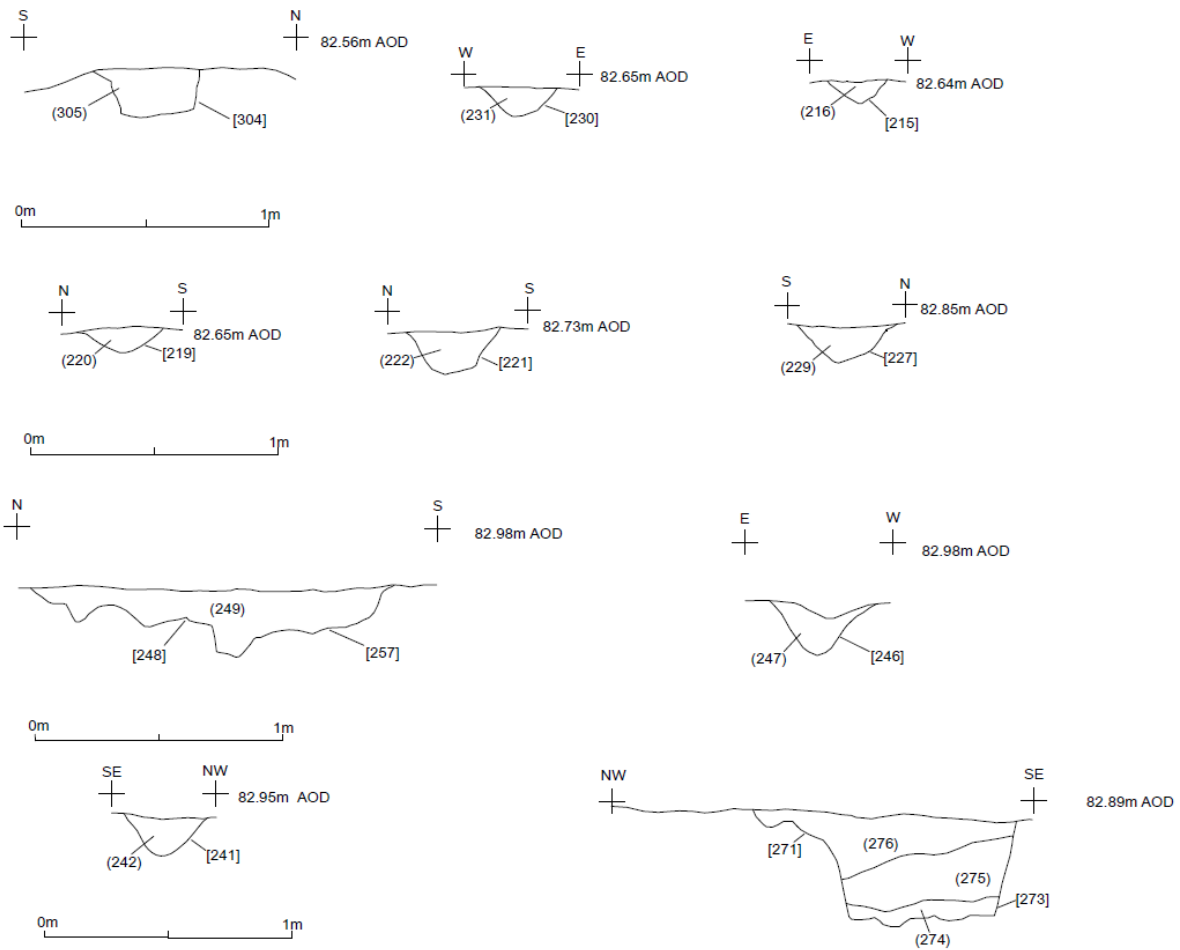
Stockade Structure 3

Adjacent on the north-east side of Stockade 2 were the remnants of a third potential stockade enclosure that consisted of much shorter curvilinear feature ([409], [413] and [411]). Located c. 7m to the east was post-setting [441] and directly to the west another post-hole [436] (Fig. 14).

The short curvilinear feature [409] measured 4.5m in length, 0.20m wide and 0.11m deep. It had a 'V' shaped profile with rounded base and contained mixed grey sandy-clay mixed with frequent fire cracked pebbles, charcoal flecks and one pottery sherd (408). The northern terminus appeared to be a double inter-cutting post-setting [411] and [413]. Both post-holes were circular with steep concave sides and round bases and measured up to 0.40m in diameter and 0.18m deep. They both contained mid grey sandy-clay fills (410) mixed with frequent pebbles. A single pottery sherd was also recovered from (412).

On the west side of the structure was another sub-circular post-hole [436] with steep concave sides and a rounded base, which measured 0.60m long, 0.40m wide and 0.29m deep. The fill consisted of a mixed pink grey silty-sand mixed with a few large pebbles that may have been packing for a post. Part of the packing material had also included large fragment of a saddle quern stone (SF 26). On the east side of the structure was another post hole [441] With shallow concave sides and rounded base measuring 0.30m in diameter 0.06m deep and containing a mixed grey silty-clay fill (440), with frequent charcoal flecks.

Stockade Structure 1



Stockade Structure 2

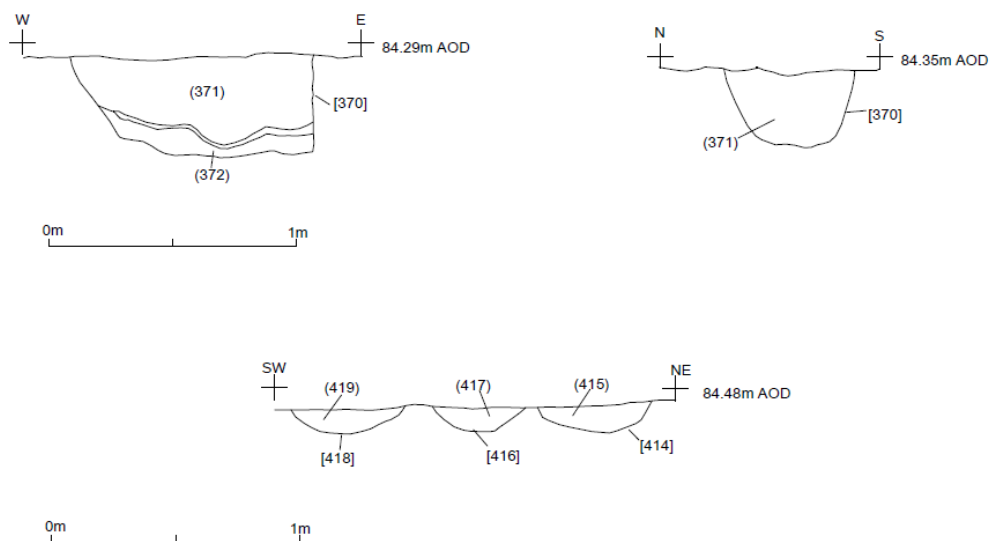


Figure 15 Stockade Structures 1 and 2 sections

Further activity within the southern half of the enclosure

The remaining area within the southern enclosure between the stockade structures appears to have been used primarily for large pits (Group K), perhaps for refuse disposal or storage. The seven pits, can be broadly grouped into three distinct types, two being large and wide with steep irregular sides ([312], [367]) (Plate 7) while two others were large but generally much more regular with sharper near vertical sides ([100], [306]). The remaining three were smaller and appear to be placed next to the larger pits [113], [318] and [444].



Plate 7 Pit [312] Part of Group K

Five of the pits appear to be arranged on a north to south alignment located *c.* 8m to the east of Stockade Enclosure 2 (Fig 16).

At the southern end of this alignment was pit [312] which measured 3.40m long, 3.22m wide and 1.06m deep. The sub-circular pit had very steep near vertical sides that were slightly irregular and base was irregular and slightly undulating (Fig 17). The pit contained primary silt fills (312) and (313) of sterile dark brown yellow clay perhaps erosion or collapse deposits from the sides of the pit suggest it was probably open to weathering before being backfilled. Overlying these was a secondary deposit (315), (316) of compacted mid grey brown fine silt-sand, mixed with occasional medium size pebble and charcoal flecks. The upper deposits were of mid grey brown sandy-silt-clay mixed with frequent small to medium sized well rounded pebbles and large sub rounded cobbles and frequent small charcoal flecks (317).

Cutting pit [312] on the north-east side was a smaller oval pit [318] with shallow sloping sides and a 'U' shaped base measuring 1.6m long, 1.14m wide, and 0.36m deep. The fill of this pit (319) consisted dark brown grey sandy-silt mixed with occasional small rounded pebbles and dense patches of charcoal fragments. Three sherds of Iron Age pottery were recovered from this fill.

Approximately 10m to the north-east another large pit [367] with steep sloping sides and irregular base was located. The pit measured 3.16m long, 2.58m wide and 0.80m deep. The base of the pit appeared to have rudimentary steps cut into the natural sand at the south-west end. The primary fill (368) consisted of light grey brown silt-sand mixed with sparse small rounded pebbles and small charcoal flecks. Below a secondary fill (369) that comprised mid grey brown silty-sand mixed with occasional small to medium size rounded pebbles and large rounded cobbles. The fill contained 13 pottery sherds and cattle bone.



Plate 8 Pit [100] [152] part of Group K

An elongated oval shaped pit was found c. 3m to the north-east which comprised two inter cutting pits [100] and [152] (Fig 17; Plate 8). The earliest [100] was sub-circular with straight vertical sides and a slightly irregular base which measured 1.5m long, 1.4m wide and 0.65m deep. A later re-cut [152] appears to have been undertaken in order to expand the size of the pit, again being sub-circular with vertical sides and flat base. The re-cut measured 1.30m long, 1.20m wide and 0.85m deep.

The primary fill (158) of the pit consisted of orange red sand mixed with charcoal flecks suggesting that the pit was possibly initially abandoned and allowed to silt up naturally. The secondary fill (101), (102), (104), (108), (110), (112) and (157) comprised dark grey sand mixed with frequent charcoal flecks. The upper deposit contained numerous fire cracked

pebbles within the centre of the pit. This was sealed by a dark grey-brown silty-sand; containing over 25 sherds of Middle to Late Iron Age pottery and saddle quern stone (SF01) found stacked amongst the fire cracked pebbles.

Two samples from **(101)** and **(157)** contained a low density of remains. Four grains were present in **(157)**, but poor preservation meant three could not be identified beyond cereal, it was however possible to identify the other grain as glume wheat. Glume bases were also present to identify the presence of spelt wheat. Both samples contained 'weed' seeds including goosefoot and large grass.

A small sub-oval pit **[131]** with moderately sloping sides and rounded base was found on the north-east side of pit **[100]**. The pit, measuring 0.76m long, 0.58m wide and 0.26m deep, contained an orange brown sand primary fill **(132)** mixed with occasional charcoal flecks and pebbles. Overlying this was a yellow clay secondary fill **(133)** mixed with small pea grit gravel.



Plate 9 Pit [306] part of Group K

Located *c.*23m to the east of the Stockade Structure were pits **[306]** and **[444]** (Fig 16 Plate 9). Sub-oval pit **[306]** measured 1.80m long, 1.24m wide and 0.78m with slightly concave vertical sides and a rounded base. The fill comprised mid grey sandy-clay that contain large angular and sub-angular stones and fire effected or fire cracked pebbles that appeared to have been placed within the pit. Mixed within the fill were several finds which included 97 pottery sherds, two quern stones (SF22 Hunsbury type Beehive rotary quern, SF25 a large complete saddle quern see Thomas section 9 below) and slag material.

The placing of the quern stones of pottery (which represent 15% of all pottery found within enclosure) may suggest this is structured deposition within the pit similar that in to pit [100].

Two samples from (319) and (307) contained a low density of remains, although Glume bases were present, and it was possible to identify the presence of spelt wheat. Both samples contained 'weed' seeds including goosefoot and large grass.

Located to the south was much smaller pit [444] that measured 1.60m long, 1.05m wide and 0.21m deep. The pit was sub-rectangular with steep vertical sides and a flat undulating base. The fill comprised mid brownish grey silty-sand mixed with infrequent small pebbles.

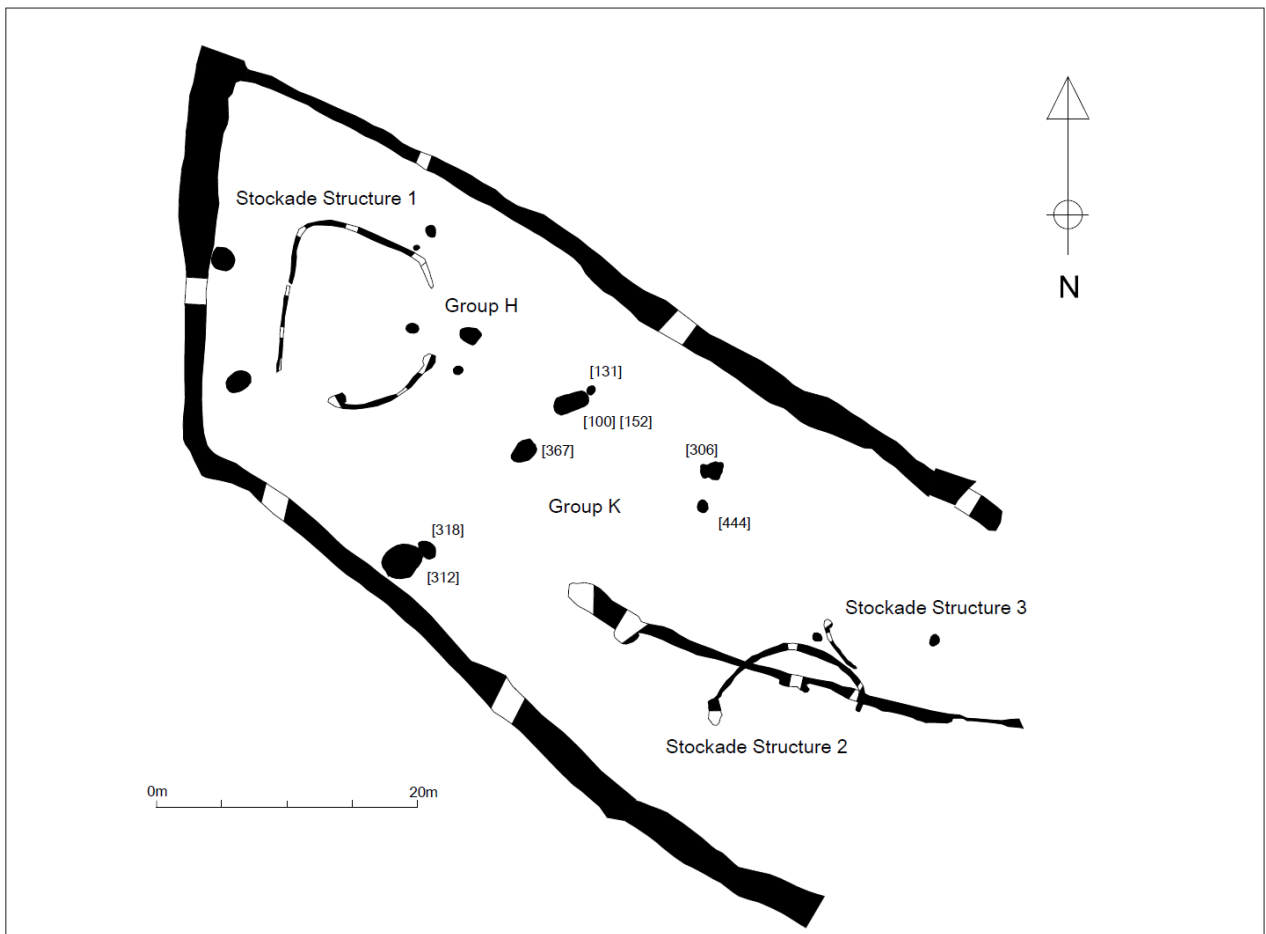


Figure 16 Location of storage pits Group K

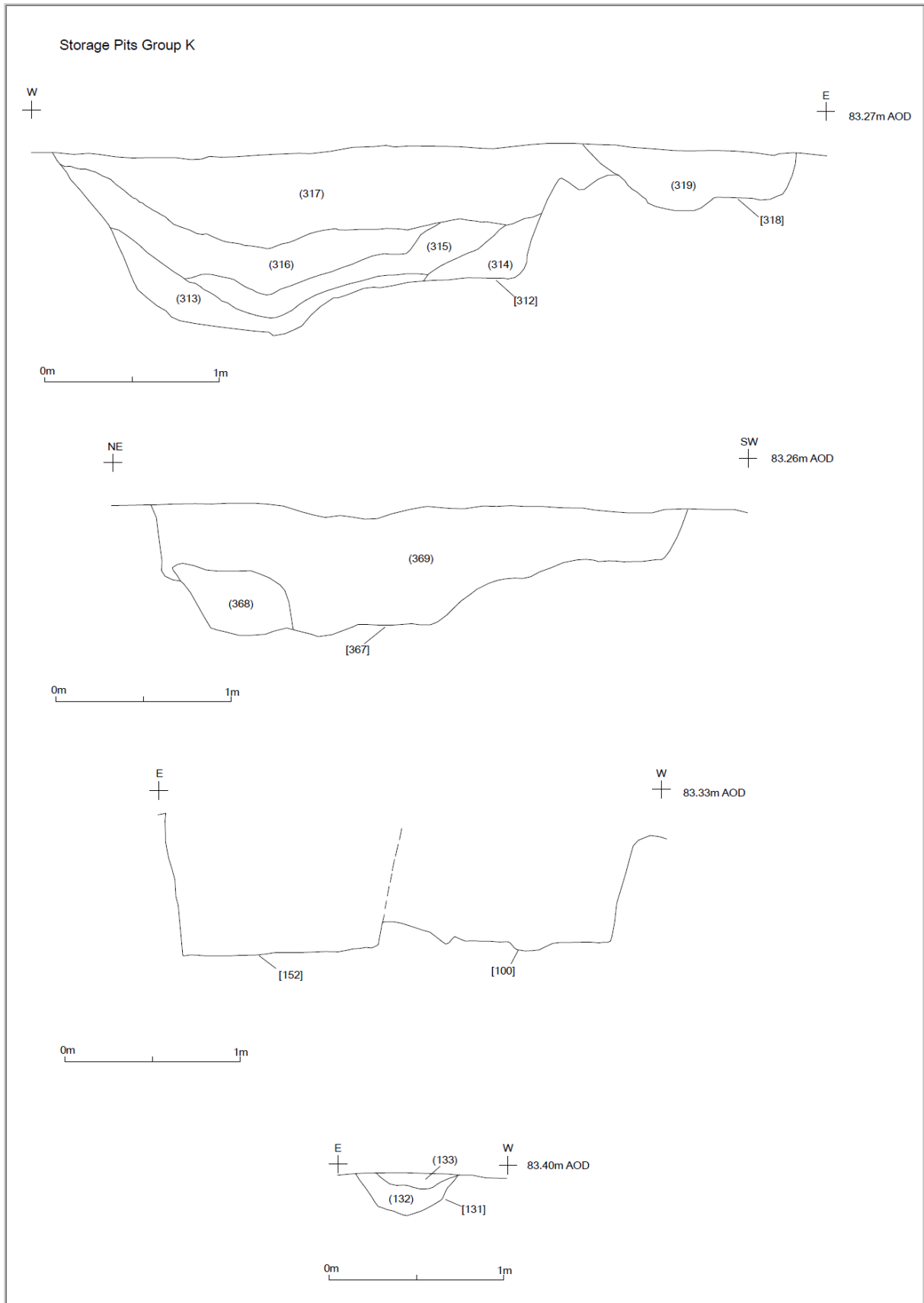


Figure 17 Sections through pits Group K

Phase 3 Enclosure

South East extension [167], [169], [194], [198], [263], [265], [280], [282], [284], [320], [323], [327], [328] [329], [330], [338], [341], [344] Sections (Qa, Ra, Sa Ta, Va and Wa)

Stockade Structure 2 Curvilinear Slot [370] [418]

Stockade Structure 3 Curvilinear Slot [413 [411] Post Holes [441], [436]

Internal Annexe 2 Ditches [331], [333], [358], [360], [373], [375] [393] [403] [263] [265] [344] [344] [346] Sections (Xa, Ya, Za, Ab, Bb)

Group L Pits/Post Holes [384], [395], [446]

South East extension

The general plan shape and sections excavated across the enclosure ditches in the south-east corner, suggest this was likely to be third phase in which the south-eastern approach is fully enclosed (Figure 19). Various sections across these ditches suggesting at least two phases where these ditches become largely in filled before being redefined. The ditch and recuts ([167], [169], [194], [198], [263], [265], [280], [282], [284], [320], [323], [327], [328], [329], [330], [338] [341], [344]) were typically 'U' shaped in profile with steep sides and rounded bases (Figure 20). The various ditch cuts and re-cuts typically measured up to 1.50m wide and 1.20m deep. Overall the south-eastern extension appeared to have changed the enclosure from a more symmetrical rectangular plan towards a more irregular trapezoidal plan. The ditch fills were generally pale reddish brown silt-sand and clay mixed with occasional small rounded pebble and charcoal flecks. Finds were generally scarce within the various ditch fills. Some cattle bone was present within ditch fills (195) [198] and (264) [265] while twenty Iron Age pottery sherds were recovered from (281) [282] with a scatter of pottery sherds from fill (340) of spur feature [341] and (343) of re-cut [344].

It is thought that periods of when these ditches are redefined also coincide when the enclosure was re-planned. The north-eastern ditch appears to be added as it stratigraphically cuts a northern ditch that has already been allowed to silt up. This north-eastern segment of ditch appears to have been added at a later date forming a rectangular enclosure measuring c. 61m x 46m (c. 0.25m ha).

The primary ditch cut for the western ditch ([233], [302]) and northern ditch ([255], [376], [386] and [404]) were broadly 'V' shaped cuts. All the cuts had moderate sloping sides and irregular flat base and generally measured between 1.8m and 3.6m wide. They all contained a primary fill of the northern ditch that comprised pale yellowish brown silt-sand-clay mixed with occasional small pebbles. The cuts [136], [169], [171], [225], [151], [156] for the eastern ditch were broadly irregular 'V' shaped cuts with steep sides that tapered to a point. The fills comprised grey silty-sandy-clays that were mixed with large rounded pebbles and occasional charcoal flecks. Finds from the enclosure ditch were scarce but three Iron Age pottery sherds were recovered from (137) [136] and (155) [156].



Figure 18 Phase 3 Enclosure

Internal Annexe 2 Sub enclosure

As part of the Phase 3 south-eastern extension to the enclosure a second rectangular sub-enclosure measuring 580sq m appears to have been inserted in the south east corner of enclosure and may have formed a large animal pen (Fig 19). The northern ditch ([331], [333], [360], [375], [393], [416], and [418]) was 37m in length (Fig 21). In the south-east corner of the enclosure a scatter of features were recorded. The western terminus had two clear phases [331] and [333]. The fills typically comprised mid grey sandy-clay mixed with sub-angular and sub-rounded stones and five sherds of Iron Age pottery were found in (332) and another 18 sherds were recovered from (335). Two pits or post-holes were found on the southern edge of the enclosure may represent a fence-line, [358] and [373]. The gap between the northern ditch terminus [331] and [333] and southern main enclosure ditch measured 7.5m and may represent an entrance way in the western side. A short row of post-holes or pits [385], [395] and [446] running west to east were found in the south side of the enclosure. The fill (384) of

pit [385] contained two sherds of pottery and they either represent refuse pits or perhaps post pits for a fence line. The Internal Annexe 2 or animal pen appears to be stratigraphically later than Stockade Structure 2 as it cuts that feature, which by this time has already been dismantled and backfilled.

A short ditch or spur *c.* 1.1m in length was located running outwards from the south-east corner of the main enclosure. The feature clearly displayed two re-cuts [344] and [346] and had a rounded butt end with steep concave sides and concave base and measured 0.65m wide and 0.50m deep. Directly to the north a second smaller external spur feature [353] was recorded running eastward from the main enclosure located 4m to the north of the first spur and measured *c.* 6m long. Both spur ditches could represent run off ditches or possible entrance way into the main enclosure. The first spur ditch appears to be also running on the same alignment as northern ditch of Sub-enclosure 2 and could be perhaps a continuation of that feature. It is thought that both spur features could have represented an elaborate entrance way into Internal Annexe 2 on the east side.



Plate 10 South-east enclosure ditch cuts [263] (west) and [265] (east) looking south

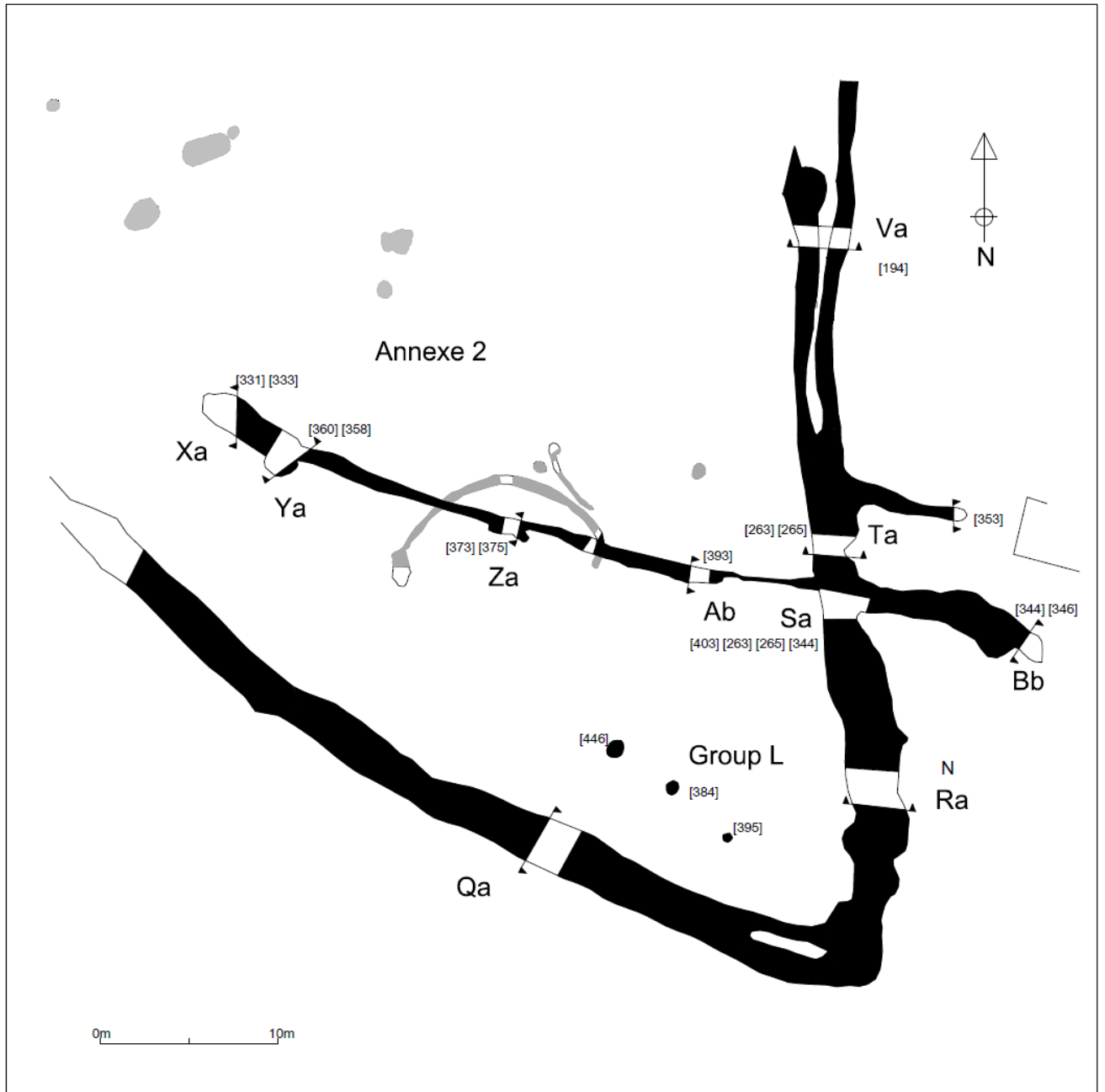


Figure 19 Phase 3 Annexe 2 sub enclosure and Group L features

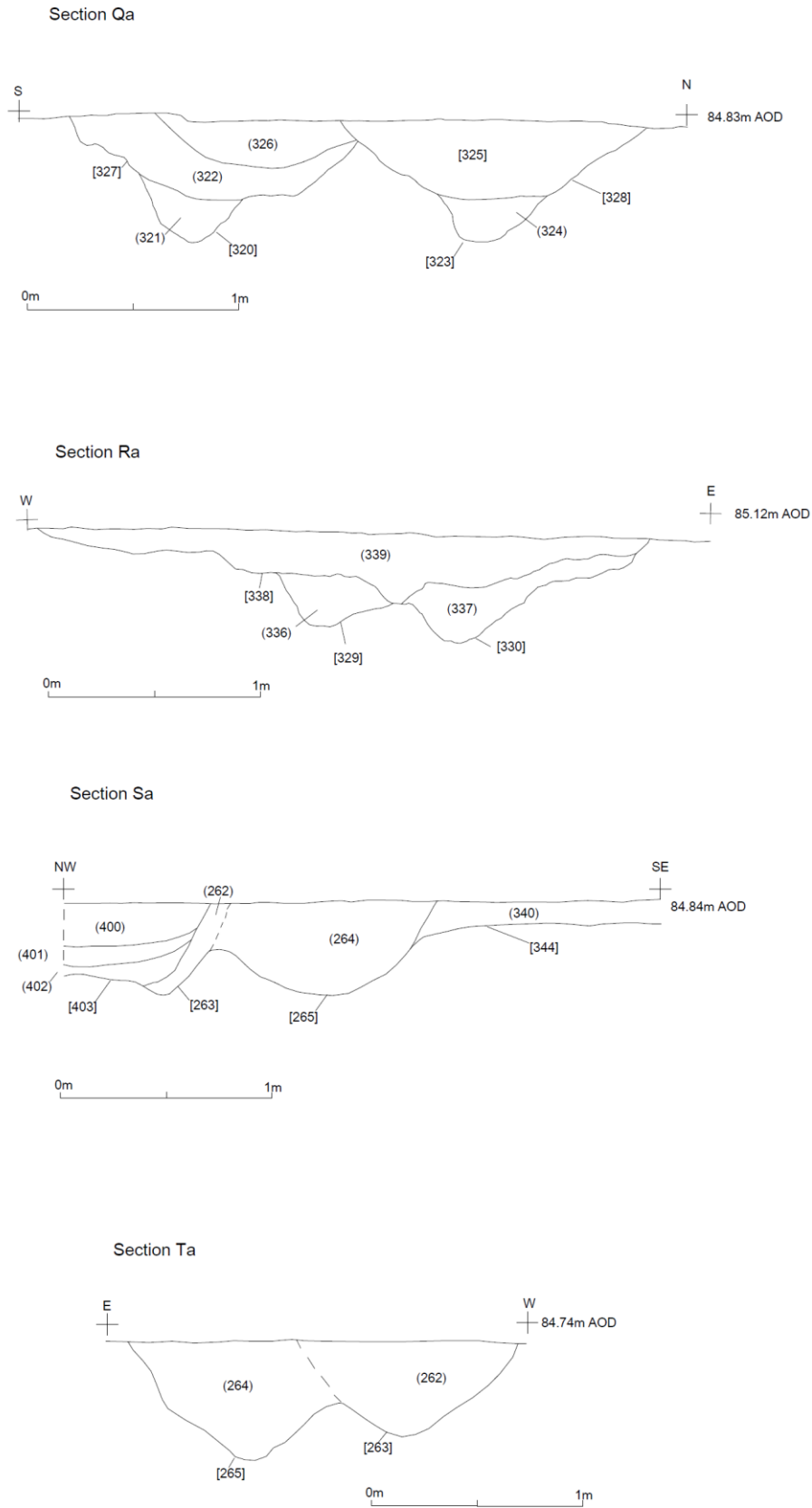


Figure 20 Enclosure sections Qa to Ta

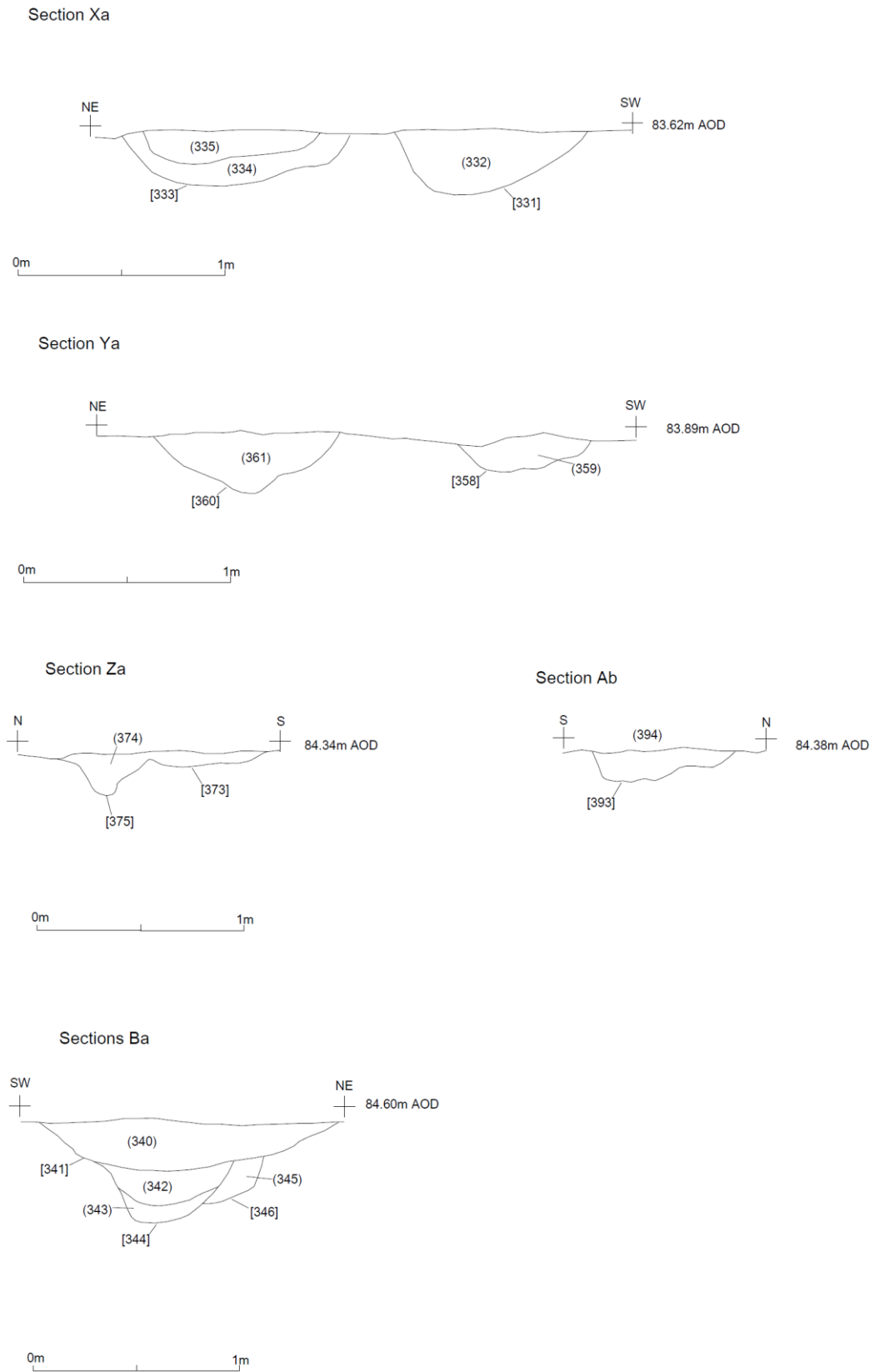


Figure 21 Sections Annexe 2 sub enclosure

6.3 Medieval cultivation

Remnant furrows from the medieval ridge and furrow cultivation system were present in all three excavation areas, aligned north-west to south-east. The furrows were spaced 7m to 8m apart and were one to two metres wide, although they were highly truncated by subsequent agricultural activity.

7. The Prehistoric Beaker and Iron Age Pottery *Nicholas J Cooper*

Introduction

The assemblage comprises 671 sherds of prehistoric pottery, weighing 9.8kg, the majority of which (640 sherds) is mid-late Iron Age in date, with a small group of 31 Early Bronze Age Beaker sherds from a single pit.

Methodology

The assemblage has been analysed by fabric and form according to the Leicestershire Prehistoric Fabric Series (Marsden 2011 with amendments, see Table 1 below) and, for the Iron Age material, using the form typology developed by Sheila Elsdon in her analysis of the East Midlands scored ware from Grove Farm Enderby (Elsdon 1992a, fig 1; Elsdon 1992b). Quantification of the assemblage was by sherd count and weight (g). Average sherd weights (ASW) have also been calculated to provide information regarding the condition of the assemblage. Vessel forms were assigned when diagnostic features occurred. The entire record is held in archive on a Microsoft Excel workbook, from which the summary data are derived (Table 2).

Table 1: Summary of Leicestershire Prehistoric pottery fabric series (Marsden 2011 with additions).

Fabric	Description
Sandy	
Q1 Quartz sand	Common to abundant sub-rounded to rounded quartz sand (0.25–1mm)
Quartz	
Q4 Sandy fabric with quartz	Q1 with rare to sparse sub-angular to sub-rounded quartz (probable pebble source, 0.5–5mm, occasionally larger, up to 10mm)
Q5 Quartz	Rare to moderate sub-angular quartz (0.5–4mm) and rare to sparse sub-rounded to rounded quartz sand (0.25–1mm). Similar to R1, but with quartz rather than granite
Q6 Sandstone	Q1 with moderate sub rectangular sandstone <5mm
Granitic rock	
R1 Granodiorite	Rare to moderate sub-angular granodiorite (0.5–4mm) and rare to sparse sub-rounded to rounded quartz sand (0.25–1mm). Inclusions include plates of biotite (yellow) mica.
R1 Syenite	As above but with syenite from Croft (SW Leics. sites).
R2 Granite with sand	R1 with sand as Q1

Shell-tempered	
S1 Shell	Moderate to very common shell or plate-like voids (1–5mm)
S2 Sandy fabric with shell	As S1, but common to very common sub-rounded to rounded quartz sand (0.25–1mm)
Grog	
G1 with shell & sand	Similar to S2 with common sub-angular grog (0.5-2mm)
G2 Grog with sand	Similar to Q1 with common sub-angular grog (0.5-2mm)
Mudstone	
M1 Ferruginous Mudstone	Common rounded to sub-rounded red mudstone pellets (0.5-2mm) with sparse-moderate rounded quartz sand (0.25-1mm). Mudstone naturally occurring in the clay?
M2 Mudstone	Common angular mudstone fragments 0.5-5mm.

The Beaker pottery

Description

An assemblage of 31 sherds of Beaker pottery, weighing 228g, was recovered from a single pit [252] and fragments from three vessels are represented.

Vessel 1 is a geometric Beaker with parts of the base, body and a flat rim surviving from fills (250), (251) and (258) (12 sherds, 115g). It was manufactured in a fine quartz sand fabric (Q1) and has a base diameter of 80mm, a rim diameter of 100mm, and a body thickness of up to 7mm. The design comprises horizontal rows of toothed-comb lines on the lower body and immediately below the rim, and a zone of right-angled lattice, again executed using a toothed comb.

Vessel 2 is a rusticated Beaker with fragments of a flat rim and body recovered solely from fill (258) (17 sherds, 100g), manufactured in a grog-tempered fabric (G2). The decoration comprises approximate rows of finger and thumbnail ‘pinches’ of varying depth. The vessel has a rim diameter of 110mm, a girth of 170mm and a body thickness of up to 10mm.

Vessel 3 survives as a single flat rim and a body sherd from fill (258) (2 sherds, 13g), manufactured in a granitic rock-tempered fabric (R1). There is no decoration on the surviving sherds and rim has a diameter of 140mm.

Discussion

There are a growing number of occurrences of Beaker sherds in non-funerary pit contexts in Leicestershire, most notably at Loughborough Road, Asfordby, near Melton Mowbray, which also contained both rusticated and geometric Beakers, supported by a radiocarbon determination of 2280-2030 cal BC (Cooper 2012, 9, fig 11: 12). Both groups would therefore appear to fall within the tradition of long-necked Beakers with zoned decoration dated to the period 2200-1900 cal BC (Needham 2005, 195). In terms of the opening materials used in the preparation of the clay fabrics, the use of quartz sand inclusions in Vessel 1 compares to the geometric Beakers from Asfordby, whilst the use of grog in Vessel 2, compares to that used in the rusticated Beakers from Asfordby. The use of granitic inclusions in Vessel 3, identifiable as granodiorite from the occurrence of biotite mica, has not so far been recognised amongst the

small number of Beaker assemblages from the county, and is therefore significant in indicating local production.

The Mid-Late Iron Age pottery

Condition

The assemblage of 640 sherds (9586g) has an average sherd weight of 15g (Table 2). Overall this would suggest relatively good levels of preservation, although the figures vary between 6g and 27g across fabrics, depending on the levels of preservation of particular vessels. For example, much of the pottery recovered in Fabric R2 comes from a single well-preserved vessel from [397] (398) (124 sherds/3290g).

Form and decoration

The forms represented belong to the East Midlands scored ware tradition spanning the 3rd century BC to the mid-1st century AD (Elsdon 1992b, fig 1 below), with the occurrence of scored sherds at about 15%, compared to 35% from Manor Farm, and 45% from Elms Farm, Humberstone (Marsden 2011, 63-65). The proportion of scoring is believed to increase overtime, and indeed the Middle Iron Age site at Beaumont Leys (independently dated radiometrically) had only 7% (Marsden 2011, 63-65), but on small assemblages it is probably not a very reliable indicator. The style of scoring varies from light twig brushing, single finely scratched grooves to deeper and wider lines. These variants of style are used both alone and in combination, with some vessels having deliberate regular patterns and combing, a feature recognised as being late Iron Age (Elsdon 1992a, 84). A good proportion of vessels are plain, including that from (398) mentioned above, and some surfaces are smoothed or lightly burnished. Decoration to the rims is confined to finger tipping to the lip; however, most cases are likely to be from manufacture rather than necessarily decorative and there are no examples of fingernail slashes along the top of the rim which appear to be an early feature in the assemblage from Enderby (Elsdon 1992b, Type 2).



Figure 22 Distribution of Iron Age pottery sherds

8. The Lithics *Lynden Cooper*

Sixty worked flints were recovered in the excavation. The raw material was local till-derived, greyish brown flint with the exception of a plano-convex knife made from Wolds flint (mottled grey). A microlith fragment (obliquely truncated point) is of likely Early Mesolithic date. Context 250 produced a thumbnail scraper, a pressure-flaked scraper and the plano-convex knife. Context 243 produced a thumbnail scraper of fancy-type. The remainder is flake débitage, some rather crude, suggesting a later prehistoric date.

Table 2 The Lithics

Number	Context	Small Find Number	Lithic Type
1	102	-	2yr flake x2
2	102	-	flake frag
3	120		2ry flake
4	120		flake frag
5	130		Microlith - OTP
6	130		shatter
7	135		2ry flake
8	138		2ry flake x 2
9	145		2ry flake
10	186		2ry flake x 2
11	195		3ry flake
12	238		2ry flake
13	238		shatter
14	240		2ry flake x3
15	251		flake frag
16	251		core
17	258		2ry flake x2
18	258		core
19	258		Flake frag
20	262		2ry flake
21	264		2ry flake
22	279		flake frag
23	316		core
24	316		core
25	317		2ry blade
26	317		2ry flake x4
27	354		2ry flake
28	361		2yr flake
29	369		2ry flake
30	369		core
31	370		Flake frag
32	396		2ry flake
33	412		3ry flake
34	419		2ry flake
35	243	SF9	thumb nail scraper, fancy
36	250	SF11	core
37	250	SF12+	thumb nail scraper, non-fancy
38	250	SF13	Scraper, pressure flaked
39	250	SF15	3ry flake
40	250	SF16	2ry flake

41	250	SF17	2ry flake
42	250	SF18	2ry flake
43	250	SF19	2ry flake
44	250	SF20	3ry flake
45	250	SF21	2ry flake
46	251	SF10	core
47	307	SF22	1ry flake, calcined
48	U/S		2ry flake
49	U/S		denticulate?

9. The Worked Stone *John Thomas*

Ten examples of worked stone were recovered during the excavation, seven of which were quernstones and one a possible rubbing stone. Of the remaining two, SF 3 proved to be a conveniently shaped natural stone and is thought not to have been used, while SF 4 displays some quernstone characteristics but is too small and fragmentary to be certain. The assemblage consists predominantly of saddle querns and one rubber, but there are also two examples of rotary querns including a complete and particularly fine example of an upper stone (SF 22) from a Hunsbury-type beehive quern (Ingle 1994). In contrast the other fragment of rotary quern (SF 5) is only a broken fragment, but also probably from an upper stone. Both rotary querns are made from Millstone Grit and are likely to have been imported to the site, either as rough-outs or finished products, from sources in the Peak District, where known quarries and production centres existed.

The saddle querns are more of a mixed bag, with locally available sandstone cobbles or blocks being the preferred choice owing their tough character and durability. One example on a metamorphic stone, possibly a form of marble, is unusual and may have been chosen for its different appearance, although it is also a very conveniently shaped stone for the purpose. All of the saddle querns are made from glacial erratic stones that would have been available for collection and use from the local tills. These querns are generally irregular with little or no deliberate shaping, although SF 25 stands out as having been deliberately pecked to produce a more regular shaped item. The effort spent on doing this might suggest it was a more prized quern than some of the others, alternatively it may have been an import to the site. The saddle quern on made of volcanic agglomerate (SF 26) is interesting in this respect, as it appears to have been deliberately shaped to a very regular form and is made on a distinctive stone type. This too is a potentially imported piece from a source near to Nuneaton and shares characteristics with other similar saddle querns from Iron Age sites in Leicestershire (Hearne 2011, Thomas 2011). A single example of a rubbing stone was recovered as part of the saddle quern group.

The predominance of saddle querns is interesting and potentially points to an earlier or middle Iron Age date for activities on the site however this type of grinding stone can have a long currency. Excavations at the early-middle Iron Age site at Beaumont Leys produced only saddle querns, but sites which go on into the later Iron Age are associated with mixed assemblages of saddle and rotary querns, showing the development of technology and gradual adoption of new forms (Thomas 2011). In this respect it is interesting that Pit [306] contained a saddle and a rotary quern, suggesting contemporary use. Also interesting is that this feature contained the only *complete* examples of each type of quern, which may have been significant

at the time of deposition. It has generally been recognized that querns were often used as offerings or placed as special deposits (Buckley 1991, Willis 2006, 125) and this example seems unusual compared to the rest of the group. A similar deposit of mixed quern types from a pit was highlighted as a deliberate deposit during excavations at Wanlip (Marsden 1998, 63).



Figure 23 Distribution of worked stone

Table 3: Catalogue of worked stone

Context	SF	Description	Stone	Context description	Phasing
(101) [100]	1	<i>Saddle quern</i> made on an irregular block of pale greyish brown sandstone. Unshaped but has a very worn & smooth upper surface with a slightly convex profile. Measurements: 280 x 160 x 45mm.	Quartzitic sandstone	Fill of storage Pit	IA
(145) [144]	2	Very worn <i>Saddle quern</i> made on a roughly rectangular block of sandstone. The working surface is very smooth and worn with a pronounced concave profile. The underside is unworked. Measurements: 265 x 165 x 75mm.	Quartzitic sandstone	Fill of possible quarry pit	IA
(188) [187]	3	Natural cobble.	Hard sandstone	Fill of ditch	IA
(209) [210]	4	Irregularly shaped fragment of sandstone with two very smooth flat surfaces. A bit fragmentary but possibly a quern fragment.	Quartzitic sandstone	Fill of post hole/pit	IA
(209) [210]	5	Wedge shaped <i>Rotary quern</i> fragment with a concave working surface (probably part of an upper stone). Smooth and worn working surface. Outer edges are curved and roughly dressed. Made on greyish Millstone Grit. Measurements: 200 x 20-145 x 60mm.	Fine Millstone Grit	Fill of post hole/pit	IA
(209) [210]	6	Complete <i>Saddle quern</i> made on a roughly rectangular & unshaped block of buff-coloured ?marble. Upper surface is worn smooth and slightly concave. Measurements: 260 x 140 x 85mm.	Metamorphic stone (poss. a type of marble?)	Fill of post hole/pit	IA
(240) [239]	7	Bun-shaped <i>rubbing stone</i> made on smooth ?Millstone Grit cobble. Measurements: 165mm long x 65mm diameter.	?Millstone Grit	Fill of enclosure ditch	IA
(307) [306]	22	Almost complete upper stone from a Hunsbury type Beehive <i>rotary quern</i> (slight damage to hopper and lower edge). Hopper is deep and	Millstone Grit	Fill of large pit	IA

		conical (175mm deep) and has a carved raised rim (160mm diameter). Working surface is very smooth and worn & had two concentric worn grooves around the spindle hole – possibly from contact with an iron ‘sleeve’ between the upper & lower stones. There are two opposing handle holes although not at the same height. Measurements: 180 (top) x 270 (base) x 185mm tall.			
(307) [306]	25	Large complete <i>saddle quern</i> made on a chunky block of light brown sandstone. Upper surface is worn smooth & slightly concave. Sides and base are shaped and dressed by pecking. Measurements: 340 x 200 x 110mm thick.	Fine grained sandstone	Fill of large pit	IA
(434) [436]	26	Large fragment of <i>saddle quern</i> made of hard grey volcanic agglomerate. The quern has a very regular shape and may have been deliberately worked to these dimensions. Smooth and concave working surface. Measurements: 220 x 165 x 45mm.	Charnwood Agglomerate	Post hole	IA

10. The Industrial Residues *Heidi Addison*

Introduction

The excavation produced a total of 120g of industrial material from three stratified contexts: (188), (307), (419) and one unstratified context. The assemblage was subject to visual identification as detailed in Table 4 below. The material was counted and weighed by context. The assemblage is summarised by material in Table 5.

Results

Table 4: Quantified record of material by context

Context	Fragments	Weight (g)	Description
(188)	3	30	2 fragments Fe fayalite-lenticular form-dense-heavy-dark grey-angular fracture and magnetic. Some vitrified hearth/furnace lining on base. Possibly smelting residue. 1 Fe fayalite- amorphous with vitrified lining
(307) /23\	1	51	Hearth/ furnace lining -amorphous sandy clay Largely reduced- slight area of oxidisation.
(419)	1	3	Charcoal fragment Unidentifiable.
U/S	4	36	Hearth lining- joining fragments-sandy reduced core with outer oxidised clay-vitrified- slight glazing
Total		120	

Table 5: Quantified list by material

Description	Weight
Fe fayalite slag	30g
Ceramic hearth/furnace lining	87g
Charcoal	3g

Overview and Discussion

The excavation produced 120g of industrial residues from the four contexts listed above. The iron fayalite slag from (188) is indicative of iron working and possibly from iron smelting, given its form, density and colour. However, the attribution to iron smelting activity is tentative. The remainder of the assemblage included an amorphous fragment of fired sandy clay (307)/23, and four unstratified fragments of hearth lining, both evidence for high temperature activity, but not necessarily related to metal working. In addition a fragment of charcoal was present in (419) unidentifiable to species.



Figure 24 Distribution of Industrial material

11. Animal Bone *Jennifer Browning*

Introduction

This report presents analysis of the faunal remains which were hand-recovered during excavations at Broughton Astley. No bones from bulk environmental samples were included, however given the poor state of preservation of the hand-recovered bones it is unlikely that any

have survived. The archaeology dated to the Iron Age. Nine ditch, pit and post-hole contexts produced a total of 76 animal bone fragments.

Methodology

Specimens were identified with reference to comparative modern and ancient skeletal material held at the School of Archaeology and Ancient History, University of Leicester. A pro forma spreadsheet was used for recording data on preservation, taxa, bone element, state of epiphyseal fusion and completeness to elicit information on species proportions, skeletal representation, age and taphonomy. Where possible, the anatomical parts present for each skeletal element were recorded using the 'zones' defined by Serjeantson (1996), with additional zones ascribed to mandibles based on Dobney and Reilly (1988). Surface preservation was assessed after Harland *et al* (2003). The occurrence of burning, gnawing and pathologies was noted and described. Butchery was recorded using simple coding and description. Joining fragments were re-assembled and the resulting specimen counted as a single fragment, although a record of the original number of fragments was retained.

Provenance and Dating

The bones were recovered primarily from ditches, post-holes and pits of Iron Age date deposited over a long period of time and are unlikely to represent a tightly-dated group.

Preservation and Taphonomy

The assemblage was very fragmented; there were no entire bones, or epiphyses and much of the identified assemblage consisted of tooth enamel. The bones exhibited both old and modern breakage, and noting the presence of joining fragments reduced the total from 76 to 51 specimens. Surface condition was assessed following Harland *et al* (2003), and found to be predominantly stage 4, defined as poor: surface flaky or powdery over 50% of specimen. (Table 6)

The poor condition of the bones inhibited the identifications of modifications such as butchery, gnawing and pathologies. Gnawing was not observed in the assemblage. Burning was recorded on three bones in the assemblage from two different features; contexts (161) and (369)

The proportion of identifiable fragments was average for a site of this period and location (31%; n=52). However, the sample size is too small to permit reliable analysis and most of the diagnostic elements were teeth. No butchery marks were visible and there were no obviously gnawed bones

Taxa and Carcass Representation

Cattle, sheep/goat and horse were represented in the assemblage (Table 6). No more than one individual was represented for each taxa. No birds, fish or small mammal bones were identified. Full analysis of carcass representation was not carried out due to the small sample size; however the range of elements recovered is listed in table???. Teeth were better represented than post-cranial bones, almost certainly reflecting better durability.

Age Structure, Measurements and Pathology

Analysis of age at death is normally carried out using tooth eruption and wear as a guide, supplemented by the state of epiphyseal fusion of post-cranial bones. The small sample size here is unfortunately insufficient for analysis. It should be noted that since juvenile bones are more susceptible to destruction than those of adults, they are likely to be under-represented in the assemblage. It was not possible to record any tooth wear stages and there were no epiphyses.

There were no pathological bones.

Discussion

An assemblage of animal bones was recovered during an archaeological excavation at Broughton Astley. The assemblage was very small, however cattle, sheep/goat, and horse were represented; animals which would be expected at a settlement of this type and period. No remains from wild mammals, small mammals, birds or fish were recovered from the site, which is unsurprising given the poor preservation of the assemblage. Unfortunately the assemblage can shed little light on life at the settlement.



Figure 25 Distribution of animal bone

Table 6: Quantified record of material by context

Feature	Context	Pres.	No:	Taxon	Element	No Frags	Notes
ditch	161 [164]	3	10	cattle	tooth	10	enamel fragments, min 2 tth
	161	2	1	horse	tooth	1	lower cheektooth (either p3,4, m1, m2)
	161	4	1	indeterminate	shaft fragments	1	calcined
	161	4	1	large mml	shaft fragments	1	charred
terminus	183 [182]	3	1	cattle	molar	1	approximately half of barely worn upper molar
Ditch	195 [198]	3	1	cattle	molar	2	Half of lower 1st/2nd molar and enamel fragment
	195	4	1	cattle	mandible	2	
	195	4	20	large mml	shaft fragments	20	
Quarry pit	250	4	10	indeterminate	tooth	10	indeterminate ungulate tooth enamel.
	264	4	1	cattle	molar	4	Lower 1st/2nd molar in wear.
Post hole	267	4	1	large mml	shaft fragments	1	
	309	4	1	cattle	tooth	18	fragments of molar
	369	4	1	indeterminate	shaft fragments	1	Small calcined fragment
ditch	374 [375]	4	1	sheep/goat	tooth	4	fragments of molar, probably sheep.

12. Charred Plant Remains *Rachel Small*

Introduction

This report studies the charred plant remains recovered from 18 samples taken during the excavation. One sample was from a Bronze Age pit, another from a post setting dating to the first phase of the Iron Age enclosure, and the remainder dated to the second phase of the enclosure and came from features associated with a possible roundhouse, stockade enclosures, fence lines and pit clusters. Studies of charred plant remains, which may include cereal grains, chaff, and weed seeds, provide important evidence for past food production, consumption, agricultural practices and environment.

Method

Samples were processed in a York tank using a 0.5mm mesh with flotation into a 0.3mm mesh sieve. The flotation fractions (flots) were transferred into plastic boxes and left to air dry; the flots were sorted for plant remains and other finds using a x10-40 stereo microscope. The residues were also air dried and the fractions over 4mm sorted in their entirety. The fractions less than 4mm were re-floated and sorted under the microscope to ensure all plant remains were recovered. Plant remains were identified by comparison to modern reference material available at ULAS and names follow [Stace \(1991\)](#). Plant remains were counted: each whole grain and grain fragments which included the embryo were counted as one; for chaff, each glume base and rachis internode was counted as one; and for seeds and nut shells each fragment was counted as one. [Van der Veen's \(2007\)](#) ratios, which compare the proportions of remains, were calculated when over 25 items were present.

Results

Thirteen of the samples contained charred plant remains (72%), the densities were low to moderate (Tables 7 and 8). The samples were characterised by small quantities of wheat and barley grains, chaff, and weed seeds typical of arable and disturbed grounds. Sample 107 (**258**) also contained a fragment of hazelnut shell (*Corylus avellana*). The preservation of the charred plants remains was poor as moderate densities of grains were puffed and distorted from burning at high temperatures and some of the chaff fragments showed signs of abrasion. There was evidence of bioturbation within the contexts as modern roots, snail shells and earth worm egg shell capsules were present. Sample 103 (**176**) also contained a large number (circa 25) of ivy-leaved speedwell (*Veronica hederifolia*) seeds which were thought to be modern.

Bronze Age

Sample 107 was the third fill (**258**) from a quarry/storage pit [**252**] which was located in the northern half of the enclosure. Only two charred plant remains were present in this sample (equivalent to 0.2 items per litre), a small fragment of hazelnut shell and a very poorly preserved fragment of cereal grain which could not be identified to species.

Table 7: Counts of charred plant remains present in samples 100 – 109.

Sample	100	101	102	103	105	106	107	108	109	
Context	101	141	157	176	186	205	258	276	274	
Cut	100	140	152	175	184	203	252	273	273	
Feature description	Pit	Pit	Pit	Post hole	Post hole	Pit/ post hole	Pit	Butt end of stockade enclosure	Butt end of stockade enclosure	
Grain										
<i>Triticum</i> sp.			1			2				Glume wheat
<i>Hordeum vulgare</i>						9			3	Barley
Cereal indet.		1	3	2		16	1			Indeterminate cereal
Chaff										
<i>Triticum spelta</i> glume base		1	1	2		14				Spelt wheat glume base
<i>Triticum</i> sp. glume base			1	1	1	4				Wheat glume base
<i>Hordeum vulgare</i> rachis										Barley rachis
Other										
<i>Corylus avellana</i>							1			Hazelnut shell
Seeds										
<i>Chenopodium</i> sp.			1	5	3	4		1		Goosefoot
<i>Danthonia decumbens</i>										Heath grass

<i>Polygonum</i> sp. (2 sided)										2 sided Knotgrass
Poaceae (large)		3		1	1	12				Large grass
Poaceae (small)										Small grass
<i>Rumex</i> sp.										Dock
<i>Vicia</i> sp.				2						Vetch
Indet. Seed	1	1	1							Indeterminate seed
TOTAL	1	6	8	13	5	61	2	1	3	
Sample volume (L)	10	10	10	8	10	10	10	9	10	
Flot volume (ml)	3	30	65	50	20	50	30	4	40	
Items per litre	0.1	0.6	0.8	1.63	0.5	6.1	0.2	0.11	0.3	

Table 8: Counts of charred plant remains in sample 110 – 118.

Sample	110	111	112	113	114	115	116	117	118	
Context	296	316	317	319	372	307	398	427	429	
Cut	295	312	312	318	370	306	397	424	428	
Feature description	Pit	Pit	Pit	Pit	Terminus of curvilinear gully	Pit	Pit	Post pad	Post hole	
Grain										
<i>Triticum</i> sp.	7				2					Glume wheat
<i>Hordeum vulgare</i>	3				4					Barley
Cereal indet.	11				14					Indeterminate cereal
Chaff										
<i>Triticum spelta</i> glume base	10				5	3				Spelt wheat glume base
<i>Triticum</i> sp. glume base	9				4	6				Wheat glume base
<i>Hordeum vulgare</i> rachis					1					Barley rachis
Other										
<i>Corylus avellana</i>										Hazelnut shell
Seeds										
<i>Chenopodium</i> sp.	4			3	5					Goosefoot

<i>Danthonia decumbens</i>					1					Heath grass
<i>Polygonum</i> sp. (2 sided)	5				7					2 sided Knotgrass
Poaceae (large)	9			1	26	4				Large grass
Poaceae (small)	1				1					Small grass
<i>Rumex</i> sp.					1					Dock
<i>Vicia</i> sp.					1					Vetch
Indet. Seed					1	1				Indeterminate seed
TOTAL	59	0	0	4	73	14	0	0	0	
Sample volume (L)	9	10	10	10	8	10	10	5	2	
Flot volume (ml)	50	2	5	65	50	10	40	3	15	
Items per litre	6.56	0	0	0.4	9.13	1.4	0	0	0	

Enclosure, Phase 1

Sample 103 was a packing fill (**176**) from a possible post setting [**175**] that formed part of a series of pits and post-holes which may represent a fence line. This sample contained a low density of remains, 13 items which is equivalent to 1.63 items per litre. The remains included two indeterminate cereal grains, two spelt wheat (*Triticum spelta*) glume bases and an abraded fragment of glume base which could not be identified to species. A small number of ‘weed’ seeds were identified and included goosefoot (*Chenopodium spp.*) which is typical of arable and disturbed lands, a large grass seed (*Poaceae*) and two vetch (*Vicia spp.*) seeds.

Enclosure, Phase 2

The remaining sixteen samples dated to this phase of the enclosure and will be discussed by feature type – the roundhouse, pit clusters, fence lines and stockade enclosures.

Roundhouse

Three samples were taken from the truncated remains of a roundhouse and associated refuse pits in the north-eastern corner of the enclosure (group I). Sample 116 was a primary fill (**398**) of a pit feature [**397**] which contained a large quantity of heat affected Iron Age pottery with a layer of fire cracked pebbles placed on top. It is thought to have been a ‘structured’ deposit, a final ‘symbolic’ activity carried out when the roundhouse was ‘closed’ that would have signalled the end of the building’s life. Sample 117 was the disuse fill (**427**) from a large post pad [**424**] and sample 118 was the disuse fill (**429**) from a post hole [**428**]. No charred plant remains were found in any of these samples.

Pit clusters

Six samples were taken from the fills of storage/disposal pits which formed part of group K in the southern half of the enclosure. Sample 115 was a fill (**307**) from pit [**306**] which contained a beehive and saddle quern and like fill (**398**) from pit [**397**] it was thought to have been a ‘structured’ deposit.

Charred plant remains were not present in samples 111 and 112 which were secondary and tertiary fills ((**316**) and (**317**) respectively) from pit [**312**]. The remaining four samples (100, 102, 113 and 115) contained a low density of remains ranging from 0.1 to 1.4 items per litre. Four grains was present in sample 102 (**157**), poor preservation meant three could not be identified beyond cereal, it was however possible to identify the other grain as glume wheat. Glume bases were present in samples 102 and 115 (**307**), and it was possible to identify the presence of spelt wheat. All four samples contained ‘weed’ seeds including goosefoot and large grass. The composition of sample 115 was not significantly different from the other the pit fills which contained charred plant remains.

Sample 106 was a fill (**205**) from a pit/post hole feature [**203**] which formed part of group C, a small group of storage/refuse pits and post holes in in the south-west corner of the northern enclosed space. This sample was of a moderate density, 61 items which equates to 6.1 items per litre. Twenty seven grains were identified; it was possible to identify nine barley (*Hordeum vulgare*) grains (probably hulled) and two glume wheat grains (probably spelt). Eighteen fragments of chaff were present: fourteen spelt wheat glume bases and four indeterminate

glume bases. A few 'weed' seeds were also identified, twelve large grass seeds and four goosefoots.

Stockade structures

Three samples were taken from stockade structure 1 which was a small 'D' shaped structure formed from two curvilinear gullies in the south-western corner of the enclosure. Sample 108 and 109 were fills ((276) and (274)) from the butt end [273] and sample 105 was a fill (186) from a post hole [184]. There were very few charred plant remains present (0.11 to 0.5 items per litre). Remains identified included three barley grains from sample 109, a glume base and a large grass seed from sample 105 and goosefoot seeds from samples 105 and 108

Sample 114 was taken from the primary fill (372) of a curvilinear gully terminus [370] which may have formed part of another stockade enclosure within the south-eastern corner. This differed to stockade structure 1 as it was formed from only one gully not two. This sample had a moderate density of remains, 73 items in total which equates to 9.13 items per litre. Twenty cereal grains were present which were very poorly preserved and therefore it was only possible to identify six to species - four barley and two glume wheat. Ten pieces of chaff were present; five spelt glume bases, four indeterminate glume bases and a barley rachis internode. Again the latter was poorly preserved and therefore it was not possible to conclude whether it was of two or six row variety. A number of weed seeds were present, most abundant was large grass seeds. Vetch, small grass seeds, and knot grass (*Polygonum* spp.) were also present. Weeds of arable and disturbed lands included goosefoot and dock (*Rumex* spp.). Heath grass (*Danthonia decumbens*), a grassland species, was also identified.

Fence lines

Sample 101 was a fill (141) from a pit [140] that formed part of group D features which were mostly post holes aligned north to south and thought to be internal fence structures in the northern half of the enclosure. This sample contained a low density of remains, six items in total which equates to 0.6 items per litre. An indeterminate cereal grain was present, a spelt wheat glume base, three large grass seeds and an indeterminate seed.

Sample 110 was a fill (296) from a shallow truncated pit [295] which also part of group D features. This sample was of a moderate density and contained 59 items which equates to 6.56 items per litre. In total, twenty one poorly preserved cereal grains were present and it was possible to identify seven as glume wheat and three as barley. Nineteen fragments of chaff were present: ten spelt wheat glume bases and nine indeterminate glume bases. Goosefoot, large and small grass seeds, and knotgrass were present. It was possible to calculate Van der Veen's (2007) ratio of glume bases to grains for *Triticum* spp. In the cereal grain the ratio is 1 (two glume bases to one grain) and for this sample it was higher than one (Table 6) indicating slightly more glume bases than grains. This is typical of a residue from fine sieving.

*Table 9: calculation of the ratio *Triticum* spp. Glume bases/grains for sample 110. Indeterminate grains were divided according to the proportion of identified grains in the sample and included in the ratio.*

Sample 110 (296)[295]	
No. of identified grains	10
Proportion that are glume wheat	0.7
Estimated no. of indet. grains that are glume wheat	8
Total <i>Triticum</i> sp. grains (real and estimated)	15
Total <i>Triticum</i> sp. glume bases	19
Glume bases/grains	1.27

Discussion

The samples under study had low to moderate densities of charred plant remains. This may be due to high burning temperatures destroying some of the remains. High burning temperatures were indicated by the presence of puffed and distorted grains in the samples. It could also possibly be due to a poor post-depositional environment and this was suggested by many of the glume bases showing signs of abrasion. These factors also caused problems when trying to identify to species level and limits the conclusions that can be drawn.

Glume wheat grains and chaff which could be identified to species were spelt wheat and this suggests that it may have been the dominant wheat crop. The barley grains appeared to be hulled, but it was not possible to determine whether two or six row was present. Due to the small numbers of remains it was not possible to conclude whether spelt wheat or barley was of greater dietary importance. In the Bronze Age sample there was evidence for the collection and consumption of wild resources in the form of hazelnut shell, which is generally considered a snack food. Its absence in later dating samples may suggest that cultivation of cereal crops became of greater importance to the community than the collection of wild resources. However, this is purely speculation due to the small sample size. ‘Weed’ seeds were also present in the samples, species typical of arable disturbed lands were identified and the presence of heath grass suggests grassland was also in the vicinity.

The composition of the samples is typical of residues from small scale day to day processing of grain, which may have been used on a hearth acting as good tinder, and grain that was accidentally spilled during the cooking process. The presence of a fine sieving residue in sample 110 was confirmed by the calculation of Van der Veen’s (2007) ratio of glume bases to grains. This suggests that processing of cereal grains was being undertaken at the site and this is supported by the presence of querns. It is probable that the crops were grown in nearby fields. Samples with low densities of charred plant remains probably represent wind-blown refuse whereas those with higher densities may represent formal deposition of crop processing waste.

There is no apparent temporal difference, other than that mentioned for hazelnut, in the composition of the samples; however this conclusion is limited by the small number of samples taken from the earlier periods (one from the Bronze Age and one from phase 1 of the enclosure) and no samples from the later phase of the enclosure. There is also no apparent spatial differences, between the northern and southern halves and quadrants of the enclosure.

There are differences between feature types. Samples from the roundhouse (group I) contained no plant remains. It is possible that this area was not associated with processing/consumption of cereal grains or it was kept very clean as it was an indoor living space. There were also no plant remains in pit [312] suggesting it was not used for formal deposition or did not collect wind blown material, perhaps because it was closed. The samples which had more numerous remains and were classed as moderate density (samples 106, 110 and 114) were from different areas of the enclosure and feature types. Sample 106 (205) was from a pit/post hole feature in the northern half of the enclosure, sample 110 (296) was from a truncated pit which formed part of a fence line structure near the centre, and 114 (372) was from a gully which formed part of a stockade enclosure in the south-eastern corner.

Two structured deposits were noticed during excavation, a layer (398) within pit [397] which was associated with the truncated remains of the roundhouse (group I) and fill (307) from pit [306] which formed part of pit cluster K. It is thought these represented symbolic activity and for the roundhouse this would have been associated with its closure. No charred plant remains were found in the roundhouse and the few that were present in (307) were not atypical from other sample compositions. This may suggest that plant remains did not play significance in these 'symbolic' activities. However, we cannot fully understand the role of uncharred plant remains and vegetative plant parts which would not have survived at the site.

The remains found and the conclusions drawn are similar to those from Manor Farm, Humberstone, Leicester (Monckton and Hill 2011). This was also an Iron Age enclosure site which exhibited multiple phases of development and had evidence for pre-Iron Age activity. Plant remains were found at this site in small numbers, and all of the samples were classed as low density, the highest number of remains found was 1.6 items per litre from pit [175]. The majority of samples from Broughton Astley were also classed as low density, however the highest number of remains found, 9.13 items per litre from sample 114 (372), a terminus of a curvilinear gully, is much higher than that from Humberstone. Monckton suggests that Iron Age settlements carried out mixed farming, but it is likely that the settlement at Humberstone had a greater focus on pastoral activities. There may have been a greater focus on arable activities at Broughton Astley. The composition of the samples from Humberstone was very similar to Broughton Astley, it too was suggested that the plant remains represented small scale waste from crop processing and food spillages. Like Broughton Astley, there were no evident changes over time. However, roundhouses did produce plant remains, but this is most likely due to a larger sample size.

Conclusion

Samples from the site contained low to moderate densities of charred plant remains. Spelt wheat and barley grain and chaff was present, along with weeds typical of arable and disturbed lands. This is indicative of residues from processing the grain and food spillage. This is similar to other Iron Age enclosure sites in the county such as Humberstone, Leicester. This adds to the regional data set, aiding understanding of agriculture, diet and land use in the prehistoric period.



Figure 26 Distribution charred cereal remains

13. Discussion

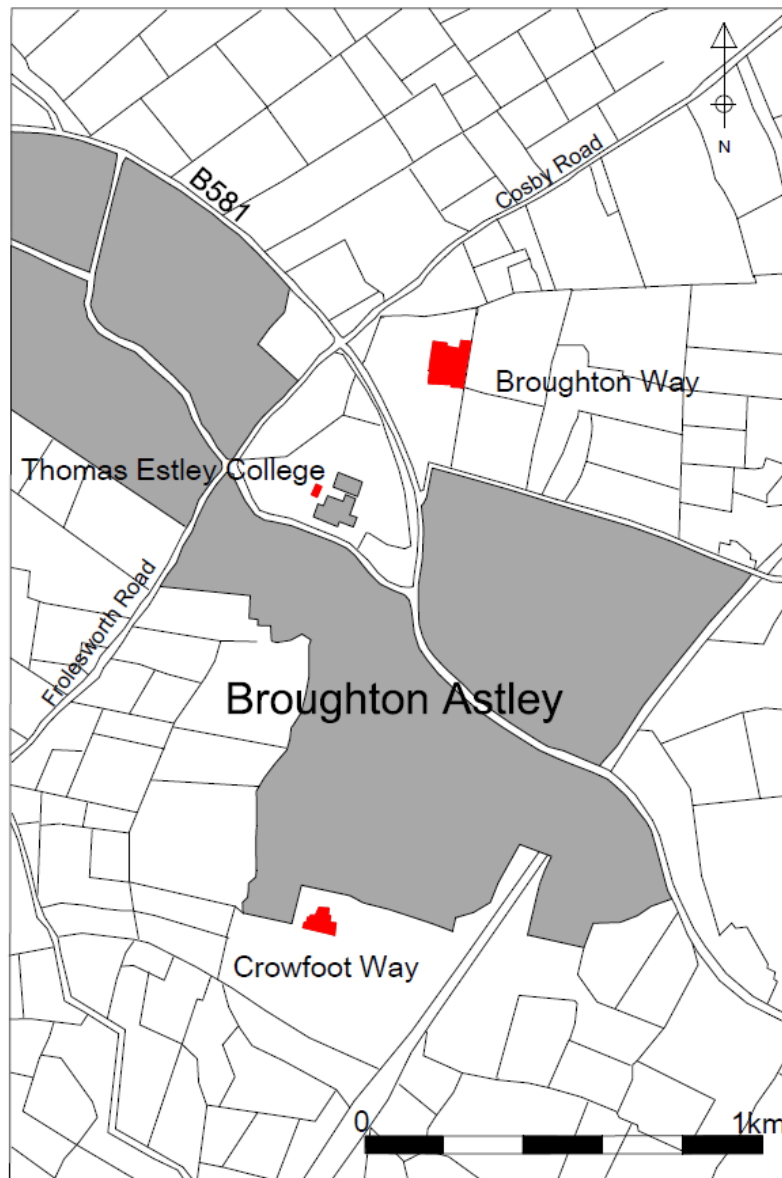


Figure 27 Location of Iron Age sites around Broughton Astley

The discovery of the Iron Age enclosed settlement at Broughton Way Broughton Astley, has added to our growing understanding of small Iron Age settlements in the region. Often only parts of the enclosure settlements are investigated, whereas the example here was subject to controlled and detailed full excavation. The finds recovered, and environmental sampling results, have significantly helped with our understanding of the life of the people living in Broughton Astley in the 3rd to 2nd centuries BC.

Mesolithic to early Bronze Age

The earliest activity within the excavation area was indicated by the presence of a single Mesolithic worked flint dated to *c.* 9500 – 4500 BC. A significant early find on the site was

an Early Bronze Age pit (c. 2000 – 1500 BC) within the north-east corner of the Iron Age enclosure. The pit contained 23 sherds of Early Bronze Age Beaker pottery and 17 (34%) worked flints. In addition a large proportion (66%) of Neolithic flints were residual finds from Middle Iron Age features. Pits from this period are known from a number of sites in the County and may be the last vestiges of settlement evidence most of which has been eroded by ploughing. Beaker sherds in non-funerary pit contexts have been identified in Leicestershire, for example at Loughborough Road, Asfordby, near Melton Mowbray, which also contained both rusticated and geometric Beakers, supported by a radiocarbon determination of 2280-2030 cal BC (Cooper 2012, 9, fig 11: 12). Both groups would therefore appear to fall within the tradition of long-necked Beakers with zoned decoration dated to the period 2200-1900 cal BC (Needham 2005, 195).

Site Development and morphology

Analysis of the pottery suggests a late middle Iron Age date 3rd to 2nd century BC with three phases but near contemporary, plan would suggest that the site was not in use for many generations.

Sub-enclosures

The main enclosure was internally sub-divided into smaller areas. This comprised an east to west ditch dividing the main enclosure in half, and two small sub enclosures inserted into the north-west and south-east corners (Internal Annexe 1 and 2). Sub-enclosures are a common feature of Iron Age enclosure settlements, although the interpretation of their function is varied from animal pens, metalworking areas, granary, ritual area, or even a look-out-tower/entrance gatehouse (Speed 2009, 161). This is mainly due to a lack of corroborative evidence, and the possibility that the function of these sub-enclosures may have altered over time (Knight 2007, 203).

Internal Annexe 1 was a small sub-enclosure which appeared to be delineated using a combination of small ditches and fence lines. The enclosure was placed neatly into the north-west corner of the and possibly is part of the initial 'L' shape enclosure. The function of enclosure is uncertain and could have been an animal pen although a small group of storage or refuge pits (Group A) were found in south-west corner. The pits appear to respect a central open space which may have housed a building although no trace of a structure was found. A light scatter finds found associated with this sub-enclosure included pottery, fragments of slag and samples produced some cereal grains. This could suggest activities within this space that could include small scale metal working and food processing. This perhaps indicates domestic space - close to a building or roundhouse and generally within the enclosure.

Northern and southern enclosure

As the main enclosure was expanded to the south it was also subdivided into two by a centrally placed east to west ditch. This sub-divided the now rectangular structure into northern and southern enclosed spaces with open entrances probably maintained on the east side. The occupancy of both half of the enclosure appear to differ in character. The northern enclosure appears to be sub-divided with fence lines to create enclosed spaces with a scatter of storage or refuse pits (Groups C, D, E and F). Generally there was a scatter of pottery sherds found

within these features along with some cereal grains from the samples. This would suggest that domestic activity and food preparation was taking place within or near the features. The enclosed space and pit Groups C and D located in the south-west corner of the northern enclosure may be of significance. The location of the Group C pits in south-west corner of this enclosed space appears to mirror the arrangement of pits found within Internal Annexe 1. These pits are restricted to the immediate area around the edge of the internal annexe and again avoided the centrally-enclosed space.

Towards the north-east corner Group I features may be interpreted as a roundhouse that comprised of post settings and associated storage or refuse pits.

The roundhouse was the most common building form in Iron Age Britain from the Middle Bronze Age through to the Late Iron Age (Parker-Pearson 1994, 47). They are often represented by arcs of post-holes or curving wall slots and sometimes have enclosing eaves drip gullies. The single probable roundhouse of Group I was represented by an arc of post-holes. Another potential roundhouse may be represented by the substantial post-holes found in Group F which may have formed east facing entrance into a building. As has been highlighted above there was also potential for perhaps buildings or roundhouses in Annexe 1 and the enclosed space associated with features of Groups C and D, but no structural elements or surrounding gullies were present. This may not be surprising as the very light sand substratum would have been very susceptible to erosion of the site from ploughing which may have removed possible structural remains. It is also possible that alternative building methods were employed such as stacked turf or cob walling (Thomas 2011, 153, Williams and Zeepvat 1994, 51), or that the structural timbers were not substantial enough to penetrate the subsoil (Knight 1984, 143). These techniques would not be archaeologically visible, unlike the often deeply cut gullies that surrounded the roundhouses (Thomas 2011, 153).

Various environmental samples were taken from some of post-holes but no charred plant remains were found within the samples and pottery was scarce. The exception was one of the post-holes contained a comparatively very large quantity of mid-Iron Age pottery comprising 121 sherds which equated to 18% of all pottery recovered. The pottery appeared to be sealed by a deposit of fire cracked pebbles and it is thought this is further evidence of possible deliberate deposition of artefacts, or a structured deposition (Hill 1995, 95). The stacking of large quantity of material in one place could be seen as just casual domestic refuse or this action perhaps indicates the final symbolic activity signalling the closure at the end of buildings life.

Southern enclosure

The southern half of the enclosure appear to have been utilised in different ways when compared to the northern half. The area appears to be divided in areas containing large storage pits (Group K) or animal pen structures or stockades (Stockades 1, 2 and 3). Both activities all appear to respect one another and appear to have been broadly contemporaneity.

The centre of southern half of the enclosure may have been designated for storage as it contained seven large and small pits (Group K). The larger pits were generally regular shapes with fairly flat bases and vertical sides and the soil samples taken from their back fill had a few cereal grains. One of the larger pits [306] contained a Hunsbury type Beehive rotary quern, and a large complete saddle quern. In addition this pit had also contained 97 sherds of pottery which represented 15% of all pottery found within enclosure and some slag material. Based on finds recovered from this area, it appears that this zone of the enclosure was used for various

activities. This perhaps included food preparation, small scale metal working and storage. The final backfilling could be viewed as simply as refuse disposal but pit [306] did contain two quern stones which could be interpreted as deliberate deposition of artefacts, as structured deposition within the enclosure.

Both the south-west and south-east corners were occupied with what appeared to be stockade structures (Stockades 1, 2 and 3). The curvilinear wall or fence slot structures were thought to be pens that may have housed or corralled possibly small livestock. Equally these structures could have housed domestic activities as a good percentage of pottery sherds and a saddle quern were all recovered from these structures. Environmental samples had also produced a scatter of cereal grains which also suggests food processing activities within the vicinity.

The enclosure in Phase 3 is finally fully enclosed with a south-eastern extension which appeared to have changed the enclosure from a more symmetrical rectangular plan towards a more irregular trapezoidal shape. Access into the enclosure may have been bridged or other parts of the enclosure ditch may have been allowed to silt-up but not redefined.

Internal Annexe 2 was a second much larger rectangular sub-enclosure which appears to have been inserted in the south-east corner of the enclosure and interpreted to be part of phase 3 south-eastern extension of the enclosure or formed elaborate new entrance into the main enclosure. The space within the sub-enclosure was relatively empty containing only a short line of three post-holes or pits. There was a scatter of pottery sherds found within the features sub-enclosure ditch suggesting some domestic activity. The sub-enclosure appeared to be stratigraphically later than Stockade Structure 2 and thought to have been principally used as livestock pen corral.

Economy

The highest proportion of the pottery recovered was from the southern side of the enclosure including large groups from pits and from the terminus of the internal ditch. This suggests that the main domestic activities such as food processing and grain storage was focused within southern half of the enclosure with other activities taking place in northern half.

Cereal grains of wheat and spelt glumes with wheat chaff are recorded at low volumes and it has been suggested that they are from domestic detritus swept out of the houses, with the wheat chaff used as kindling in domestic fires. Barley grains were also present but due to the small numbers of remains it was not possible to suggest whether spelt wheat or barley was of greater dietary importance. The presence of any archaeological evidence for possible grain storage pits and processing (querns) indicates that arable farming or crop processing was taking place near the site. Weed seeds typical of arable disturbed lands were identified and the presence of heath grass suggests grassland was also in the vicinity.

The animal bone assemblage is sparse but shows a possible pastoral economy based on cattle and sheep/goat and horse was also recorded. The assemblage was few and in poor condition so how the animals were slaughtered, butchery and consumed is unknown. A mixed arable and pastoral economy can be inferred from the finds and environmental evidence typical of other small scale Iron Age farmsteads of the region (Willis 2006).

Deliberate deposition of artefacts

Large quantities pottery appeared to have been deliberately placed within the Group I roundhouse post-hole [397] and sealed under fire cracked pebbles and charcoal. This suggests that this is structured deposition that may represent a final symbolic activity within the roundhouse area, perhaps signalling ‘closure’ at the end of the building’s life.

The action of deliberate deposition of stacked pottery sherds found within the Group I roundhouse may have occurred elsewhere on site within Group K storage pits [100] [152] and [306] located in the southern half of the main enclosure. Pit [306] again had a high volume of 97 pottery sherds within pit along with Hunsbury type beehive rotary quern stone and a large complete saddle quern. Whilst pit [100], [152] had only contained 25 pottery sherds, however it did have saddle quern stone placed amongst a mass of fire cracked pebbles. The content of both pits could be viewed as simple domestic refuse or alternatively could be possibly interpreted as deliberately placed deposits (Hill 1995). These types deposit have been found locally at Hallam Fields, Birstall (Speed 2009) and Wanlip (Beamish 1998).

Examples of this type of ‘special deposit’ are known across (mainly southern) Britain, and into the near-Continent as far as central France (Bradley 2003, 19). The ‘special deposits’ within pits were used to symbolise an important event such as the end of an agricultural cycle, or as a symbol of fertility and rebirth (Barrett 1989).

The examples seen here could indicate perhaps a special practice to symbolise the end of the settlement at Broughton Way. However it is argued that not all finds classified as “structured deposits” could be viewed as ritual in origin, but should never the less be highlighted as deposits that contained exceptional well preserved material (Hill 1995).

The wider context

Leicestershire during the Iron Age

Leicestershire lies within an area of Britain described as part of the territory of the *Corieltavi*. They were probably a largely agricultural group, likely to consist of several small tribes (Score 2011; Speed 2009) covering the area of the modern East Midlands, reaching from the river Nene to the river Trent, though the boundary of the tribal territory should be seen as flexible (Cunliffe and Poole 1991, 176).

Our knowledge of Iron Age Leicestershire has improved significantly over more recent years since the advent of the Department of the Environment Planning Policy Guideline Note 16 (PPG16) in 1990. The county has been able to benefit from developer-funded large-scale excavations of partial and entire Iron Age enclosure farmsteads in advance of redevelopment (Speed 2009).

The Historic Environment Record for Leicestershire and Rutland now has records for around 250 possible occupation areas dating to the first millennium BC. The majority (150) are cropmark sites (Hartley 1989). A small number are identified earthworks which are eight in total. The remaining sites were identified from field-walking surveys such as the Medbourne and Swift Valley surveys (Clay 2002).

Within the hinterland of Leicester are examples of large agglomerated settlements, at Humberstone located in the north-east; Beaumont Leys (Thomas 2011a) located to the north

and more recently being excavated at Enderby in 2016 located to south east (Jarvis forthcoming). More widely, other large settlements within Leicestershire are known at Lockington (Thomas 2013), Normanton le Heath (Thorpe et al 1994) and Ratby Bury (Clay 1985). There are also four known hillforts within the county, Breedon on the Hill and Burrough Hill being the largest.

The most common type of settlement in the Iron Age of Leicestershire is the small farmstead and numerous examples have been examined over the last 30 years including examples from Birstall (Speed 2009), Enderby (Clay 1992; Meek et al 2004; Kipling 2016), Hinckley (Chapman 2004); Huncote (Meek et al 2004); Kirby Muxloe (Cooper 1995); Hamilton North (Beamish and Shore 2005); Crown Hills, Leicester (Chapman 2000) Grimbo Farm, Castle Donington (Derrick 1999), Huncote (Meek et al 2004) and Market Harborough (Clarke 2008). Clay proposes a density of one late Iron Age site per 1.8-2 sq km (Clay 2002, 3) although they may not have been in contemporary use

The Iron Age settlement excavated Broughton Astley Way could be classified as one of the small farmsteads. Within the immediate vicinity of Broughton Astley lie two other known Iron Age settlements at Thomas Estley Community College, Broughton Astley (Baker 2016) and Crowfoot Way, Broughton Astley (Clarke 2014). The closer of the two Iron Age settlements was the Thomas Estley Community College, Broughton Astley located 500m to the west. This was well preserved albeit poorly dated stretch of pit alignment at Thomas Estley Community Collage indicates the existence of boundary demarcation in the vicinity (Baker 2016). These features are often one of the earliest landscape features of the 1st millennium BC and are a fairly ubiquitous feature in the later prehistoric period (Thomas 2008, 144; Willis 2006, 122). Their origin may lie in the late Bronze Age/early Iron Age (Hingley 1989) and they are commonly associated with the development of field systems and track ways and a movement away from a more 'open' landscape to a parcelled and secularized one (Thomas 2011).

Broughton Way site at first appeared to be relatively isolated middle to late Iron Age 3rd to 2nd century BC enclosure but excavations at Thomas Estley Community College now suggest it is now proximal to where a projection of that pit alignment would head. It is not inconceivable that the pit alignment monument was associated with this settlement.

Another mid to late Iron Age farmstead settlement was examined 1km to the south at Crowfoot Way. Analysis of the pottery suggested a late middle Iron Age date, the 2nd century BC and probably continued in to the 1st century BC but no later than 50 BC (Clarke 2014). This would indicate that the site is either a contemporary of Broughton Astley Way farmstead or perhaps a slightly later settlement. The settlement comprised two principle roundhouses, an ancillary structure and small 'D' shaped enclosure bounded to the east by a ditch. An isolated structure that was superseded by a ditch was found on the east side of the boundary ditch.

Disuse

The site appears to have been abandoned no later than the 2nd century BC and did not continue into 1st century BC the late Iron Age period. Why the site was abandoned is unknown, the settlement may have relocated to nearby location outside the development area or changes to the organisation of the landscape and economy may have made the site unsustainable.

No further identified activity occurred at the site until the area became part of the open field systems surrounding the village in the medieval period.

14. Publication

A summary of the work has been published in the local archaeological journal *Transactions of the Leicestershire Archaeological and Historical Society* (Higgins 2016, 301) in due course. The report has been added to the Archaeology Data Service's (ADS) Online Access to the Index of Archaeological Investigations (OASIS) database held by the University of York.

15. Bibliography

Baker, S., 2016 *An Archaeological evaluation, strip, map and sample excavation at Thomas Estley Community College, Broughton Astley, Leicestershire* (SP 5275 9260) ULAS Report 2016-087

Barrett, J., 1989 Food, gender and metal: Questions of Social reproduction. In M.L.S. Sorensen and R. Thomas (eds.), *The Bronze Age- Iron Age Transition in Europe*. Oxford, British Archaeological Reports (International Series 483), pp304-320.

Beamish M., 1998 A Middle Iron Age Site at Wanlip, Leicestershire, *Transactions of the Leicestershire Archaeological and Historical Society* **72**, 1– 91.

Buckley, D., 1991. Querns in ritual contexts. *Quern Study Group Newsletter* **2**, 1-4.

Chapman, P., 2004, „Iron Age Settlement and Romano-British Enclosures at Coventry Road, Hinckley, Leicestershire“. *Transactions of the Leicestershire Archaeological and Historical Society* **78**, 35-82.

Chapman, S. 2000. *An Archaeological Excavation of Iron Age and Romano-British Settlement at Leicester General Hospital, Crown Hills, Evington, Leicester*. University of Leicester Archaeological Services unpublished report 2000-041

CifA 2014a, *Code of Conduct*. The Chartered Institute for Archaeologists, December 2014.

CifA 2014b, *Standard and Guidance for Archaeological Excavation*. The Chartered Institute for Archaeologists, December 2014.

CifA 2014c *Standard and Guidance for the creation, compilation, transfer and deposition of archaeological archives*. The Chartered Institute for Archaeologists, December 2014.

Clarke, J., 2008. *Iron Age Enclosures and Droveaway at Air Field Farm, Market Harborough, Leicestershire*. Northamptonshire Archaeological Report 08/85

Clarke, J., 2014 *Middle to late Iron Age settlement on land at Crowfoot Way, Broughton Astley, Leicestershire* (SP 5297 9165). MOLA Report No 14/89

Clay, P. 1985, „The Late Iron Age Settlement“, in P. Clay and J.E. Mellor *Excavations in Bath Lane, Leicester*. Leicester Museums, Art Galleries and Records Service Archaeological Report 10, Leicester, 29-31.

Clay, P., 1992, „An Iron Age Farmstead at Grove Farm, Enderby, Leicestershire“. *Transactions of the Leicestershire Archaeological and Historical Society* 66, 1-83.

Clay, P., 2002, *The Prehistory of the East Midlands Claylands*. Leicester Archaeology Monograph 9, Leicester

Clay, P., 2015 *Written Scheme of Investigation for Archaeological Work Land East Broughton Way, Broughton Astley, Leicestershire* ULAS Design Specification No. 15-767 (unpublished grey literature)

Cooper, L., 1995, Kirby Muxloe, A46 Leicester Western by-pass. *Transactions of the Leicestershire Archaeological and Historical Society* 68, 162-165.

Cooper, N.J. (ed) 2006. *The Archaeology of the East Midlands: An Archaeological Resource Assessment and Research Agenda*. Leicester Archaeology Monograph 13

Cooper, N.J., 2014 ‘Iron Age Pottery’ in M. Morris ‘An Archaeological Excavation on land at Leaders Farm, Coventry Road, Lutterworth, Leicestershire’ ULAS report 2014-200.

Cooper, N.J., 2012 ‘The Beaker pottery’, 9-20, in W. Jarvis ‘Late Mesolithic and Beaker Assemblages at Loughborough Road, Asfordby’, *TLAHS* 86, 1-35.

Cunliffe, B.W. and Poole, C., 1991, *Danebury: an Iron Age Hillfort in Hampshire Volume 5: The excavations, 1979-88: the Finds*. Council for British Archaeology research report 73.

Derrick, M., 1999, „Castle Donington, Gimbro Farm (SK 440 256)“, *Transactions of the Leicestershire Archaeological and Historical Society* 74, 86.

Dobney, K and Reilly, K. 1988 ‘A method for recording archaeological animal bones: the use of diagnostic zones’ *Circaea* 5, 79-96

Elsdon, S. M., 1992a ‘The Iron Age pottery’, 38-52 in P. Clay, An Iron Age Farmstead at Grove Farm, Enderby, Leicestershire. *Transactions of the Leicestershire Archaeological and Historical Society* 66, 1-82.

Elsdon, S. M., 1992b ‘East Midlands Scored Ware’ *Transactions of the Leicestershire Archaeological and Historical Society* 66: 83-91.

Harland, J. F., Barrett, J. H., Carrott, J., Dobney, K. and Jaques, D. 2003 The York System: an integrated zooarchaeological database for research and teaching. *Internet Archaeology* 13: (http://intarch.ac.uk/journal/issue13/harland_toc.html)

Hartley, R.F., 1989, „Aerial archaeology in Leicestershire“, in Gibson, A. (ed.) *Midlands Prehistory. Some Recent and Current Reseaches Into The Prehistory of Central England*. British Archaeological Reports, British Series 204, 95-105.

Hearne, R., 2011. *Provenance of mid-late Iron Age querns – Charnwood area*. Unpublished Msc Dissertation, University of Leicester Geology Dept.

Higgins, T., 2016 'Broughton Astley, Broughton Way (SP 53312 9310)'. *Transactions of the Leicestershire Archaeological and Historical Society* **90**, 301-302.

Hingley R., 1989, *Rural Settlement in Roman Britain*. London: Seaby.

Hill, J.D., 1995, *Ritual And Rubbish In The Iron Age of Wessex: A Study On The Formation Of A Specific Archaeological Record*. Oxford: Tempus Reparatum. British Archaeological Reports British Series 242.

Hunt, L; 2011a. *An Archaeological Desk-Based Assessment for land to the south-east of Cosby Road, Broughton Astley, Leicestershire (SP 527 929)*. ULAS Report 2011-054

Hunt, L; 2011b. *An Archaeological Desk-Based Assessment for land to the east of Broughton Way, Broughton Astley, Leicestershire (SP 531 930)* ULAS Report 2011-055

Jarvis, W., forthcoming, *Archaeological Excavations at New Lubbethorpe, Leicestershire*

Kipling R., forthcoming, *Archaeological Excavations at Soar Valley Way, Enderby, Leicestershire*

Kipling, R., 2013. *An Archaeological Evaluation on Land East and west of Broughton Way, Broughton Astley, Leicestershire (SP 531 930 & SP 527 931)* ULAS Report No 2013-184

Knight, D., 1984. *Late Bronze Age Settlement in Nene and Great Ouse Basins*. Oxford: British Archaeological Reports British Series 130.

Knight, D., 2007. „From open to enclosed: Iron Age landscapes of the Trent Valley“, in C. Haselgrove, and T. Moore, (eds.) *The Later Iron Age in Britain and Beyond*. Oxford, Oxbow, 190-215.

Knight, D. et al., 2012. *East Midlands Heritage: An updated research agenda and strategy for the Historic Environment of the East Midlands*.

Knight, D., Marsden, P. and Carney, J. 2003. 'Local or non-local? Prehistoric granodiorite-tempered pottery in the East Midlands' in A.M. Gibson (ed.) *Prehistoric Pottery: People, Pattern and Purpose*, BAR international series **1156**, 111-125.

Marsden, P., 1998. 'The Querns', in M. Beamish 1998, 62-3.

Marsden, P., 2011. 'The Prehistoric pottery and briquetage' in J. Thomas, *Two Iron Age Aggregated Settlements in the Environs of Leicester: Excavations at Beaumont Leys and Humberstone*, Leicester Archaeology Monograph 19, 61-80. Leicester: University of Leicester, School of Archaeology and Ancient History.

Meek, J., Shore, M., and Clay, P., 2004, 'Iron Age Enclosures at Enderby and Huncote, Leicestershire'. *Transactions of the Leicestershire Archaeological and Historical Society* **78** 1-34.

Monckton, A. and Hill, A., 2011 'Charred plant remains', in J. Thomas (ed.), *Two Iron Age 'Aggregated' Settlements in the Environs of Leicester: Excavations at Beaumont Leys and*

Humberstone. Leicester Archaeological Monograph 19., pages 124 – 131. Leicester: University of Leicester Archaeological Services

Needham, S. P., 2005 ‘Transforming Beaker culture in north-west Europe: processes of fusion and fission’, *Proceedings of the Prehistoric Society* **71**, 171-217

Ripper, S., and Butler, A. 1999, ‘Warren Farm, Lockington’ *Transactions of the Leicestershire Archaeological and Historical Society* **73**: 101-104.

Score, V., 2012 *Hoards Hounds and Helmets. A conquest period ritual site at Hallaton, Leicestershire*. Leicester Monograph 21.

Serjeantson, D. 1996 ‘The animal bones’ in S. Needham and T. Spence 1996 *Refuse and Disposal at Area 16 East Runnymede*. Vol. II Runnymede Bridge Research Excavations. London: British Museum Press, 194-223

Smalley, R., 2013a, *Geophysical Survey Report- Land south of Cosby Road, Broughton Astley, Leicestershire* Stratascan Report J3021A

Smalley, R., 2013b. *Geophysical Survey Report- Land east of Broughton Way, Broughton Astley, Leicestershire* Stratascan Report J3021B

Speed, G., 2009. *An Excavation of an Iron Age Settlement at Hallam Fields, Birstall, Leicestershire* (SK 58845 10274) ULAS Report No 2009-080.

Speed, G., 2010 ‘The Excavation of an enclosed Iron Age settlement at Hallam Fields, Birstall’ *Transactions of the Leicestershire Archaeological and Historical Society* 84 27-76).

Stace, C., 1991. *New Flora of the British Isles*. Cambridge: Cambridge University Press.

Thomas, J. 2008. ‘An empty hole, or a meaningful whole? Approaches to the study of pit alignments’. In A. Chadwick (ed.) *Recent Approaches to the Archaeology of Land Allotment*. BAR International Series 1875, 144-159.

Thomas, J., 2011. *Two Iron Age ‘Aggregated’ Settlements in the environs of Leicester: Excavations at Beaumont Leys and Humberstone*. Leicester Archaeology Monograph 19, 85-91.

Thomas, J., 2013 ‘Excavations within a developing Iron Age and Roman Agricultural landscape at Warren Farm, Leicestershire’ *Transactions of the Leicestershire Archaeological and Historical Society* **87** 85-136.

Thomas, J. and Roe, F., 2011. ‘The Quernstones’, in J. Thomas 2011, 85-91.

Thorpe, R., Sharman, J., and Clay, P., 1994, ‘An Iron Age and Romano-British enclosure at Normanton Le Heath, Leicestershire’, *Transactions of the Leicestershire Archaeological and Historical Society* **68**, 1-63.

Van der Veen, M., 2007 ‘Formation processes of desiccated and carbonised plant remains - the identification of routine practice’. *Journal of Archaeological Science* 34: 968 - 990.

Vince, A. G., 1984 'The use of petrology in the study of medieval ceramics: case studies from Southern England' In *Medieval Ceramics* **8**, 31-49

Williams, R.J. and Zeepvat, R. J. 1994. *Bancroft. A Late Bronze Age/Iron Age Settlement, Roman Villa and Temple Mausoleum, Excavations and Building Materials, Volume 1*. Aylesbury: Buckingham Archaeological Society Monograph 7.

Willis, S., 2006. Chapter 5: The Later Bronze Age and Iron Age, in N. J. Cooper (ed.) *The Archaeology of the East Midlands*. Leicester Archaeology Monograph 13, 89-136.

16. Acknowledgements

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17. Archive

The site archive will be held by Leicestershire Museums Service, under accession no. XA162 2013.

The archive contains:

- context summary records
- photographic recording sheet
- sample records sheet
- small finds recording sheet
- drawing index sheet
- CD containing digital photographs and report
- survey data
- unbound copy of this report
- thumbnail print of digital photographs

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08/12/2016

Appendix OASIS data entry

PROJECT DETAILS	Oasis No	universi1-269685		
	Project Name	An Archaeological Excavation Broughton Way, Broughton Astley, Leicestershire.		
	Start/end dates of field work	07-09-2015 - 23-11-2015		
	Previous/Future Work	Yes / Not known		
	Project Type	Excavation		
	Site Status	None		
	Current Land Use	Cultivated Land		
	Monument Type/Period	Bronze Age/Iron Age		
	Significant Finds/Period	Flints Mesolithic/Early Bronze Age Pottery Early Bronze Age/Iron Age		
	Development Type	Residential		
	Reason for Investigation	In accordance with National Planning Policy Framework (NPPF) Section 12 Conserving and Enhancing the Historic Environment		
	Position in the Planning Process	Planning Condition		
	Planning Ref.	Planning application No. 13/01142/OUT		
PROJECT LOCATION	Site Address/Postcode	East of Broughton Way, Broughton Astley Leicestershire		
	Study Area	1 ha		
	Site Coordinates	SP 53117 93108		
	Height OD	92m to 79m AOD		
PROJECT CREATORS	Organisation	ULAS		
	Project Brief Originator	Local Planning Authority (LCC)		
	Project Design Originator	ULAS		
	Project Manager	Dr Patrick Clay		
	Project Director/Supervisor	Tim Higgins		
	Sponsor/Funding Body	Jelson Ltd		
PROJECT ARCHIVE		Physical	Digital	Paper
	Recipient	LCC Mus Service	LCC Mus Service	LCC Mus Service
	ID (Acc. No.)	X.A162.2013	X.A162.2013	X.A162 2013
	Contents	Flint, Pottery, Worked Stone	Photos Survey data	Excavation records Field Notes
PROJECT BIBLIOGRAPHY	Type	Grey Literature (unpublished)		
	Title	An Archaeological Excavation Broughton Way, Broughton Astley, Leicestershire.		
	Author	Higgins, T.		
	Other bibliographic details	ULAS Report No 2016-160		
	Date	07/09/2015 to 23/11/2015		
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