

T H A M E S V A L L E Y

ARCHAEOLOGICAL

S E R V I C E S

**New drainage and pond, Cardington Sheds,
Cardington, Bedfordshire**

Archaeological Recording Action

by James McNicoll-Norbury

Site Code: SCS15/268

(TL 0840 4640)

New Drainage and pond, Cardington Sheds, Cardington, Bedfordshire

**An Archaeological Recording Action
For Fosbern Manufacturing Ltd**

by James McNicoll-Norbury
Thames Valley Archaeological Services Ltd

Site Code CSC 15/268

September 2016

Summary

Site name: New drainage and pond, Cardington Sheds, Cardington, Bedfordshire

Grid reference: TL 0840 4640

Site activity: Recording Action

Date and duration of project: 23rd November 2015 – 21st December 2015

Project manager: Steve Ford

Site supervisor: James McNicoll-Norbury

Site code: CSC 15/268

Area of site: 0.35ha

Summary of results: The excavation of the site confirmed the presence of a previously identified Iron Age enclosure ditch as well as additional linear features and pits from the Iron Age. An earlier neolithic leaf-shaped arrowhead was also recovered.

Location and reference of archive: The archive is presently held at Thames Valley Archaeological Services, Reading and will be deposited at Bedford Museum in due course.

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Report edited/checked by: Steve Ford✓ 12.09.16 Steve Preston✓ 12.09.16

New Drainage and pond, Cardington Sheds, Cardington, Bedfordshire An Archaeological Recording Action Report

by James McNicoll-Norbury

Report 15/268

Introduction

This report documents the results of an archaeological excavation carried out at Cardington Airship Hangers, Cardington, Bedfordshire (TL 0840 4640) (Fig. 1). The work was commissioned by Dr Isabel Lisboa of Archaeologica Ltd, 7 Fosters Lane, Bradwell, Milton Keynes, MK 13 9HD on behalf Fosbern Manufacturing Ltd, 89 Upper Leeson Street, Dublin % 48-50 Reginald Street, Luton, Bedfordshire, LU2 7QZ.

Planning permission (11/00660/MAF) has been gained from Bedford Borough Council for new housing and associated drainage and infrastructure (a car park, foul drainage to Shed 1 through Phase 2 of the Bellway development to the north, and surface water drainage and a balancing pond). The permission is subject to a Condition (4) relating to archaeology, requiring a programme of archaeological mitigation strategy specific to each of the identified zones of work. For the areas covered in this report, (a pond and drainage trench), the mitigation was provided by means of area excavation in the pond and a watching brief along the drain.

This is in accordance with the Department for Communities and Local Government's *National Planning Policy Framework* (NPPF 2012) and the Borough Council's policies on archaeology. The field investigation was carried out to a specification (Lisboa 2014) approved by Ms Vanessa Clarke, Senior Archaeological Officer for Bedford Borough Council. The fieldwork was undertaken by James McNicoll-Norbury and assisted by Will Attard, Jesse Coxey, Luis Estevez, Joan Garibo, Ellen McManus and Thomas Stewart between 23rd November and 21st December 2015 and the site code is CSC 15/268.

The archive is presently held at Thames Valley Archaeological Services, Reading and will be deposited at Bedford Museum in due course.

Location, topography and geology

The site is situated to the west of the village of Cardington and to the south-east of the village of Shortstown in the vicinity of Cardington Airship Hangers which occupy the north-eastern part of the site (Fig. 2). The site is comprised of relatively flat grassland between 26–30m above Ordnance Datum and the underlying geology is mapped as Valley Gravel, with the drain route possibly moving onto Gault towards the west (BGS nd): the gravel was observed on site.

Archaeological background

The archaeological potential of the site has been assessed from a number of previous programmes of archaeological investigation in the form of a desk based assessment (Lisboa 2010), an archaeological evaluation (Gregson *et al.* 2011) and a geophysical survey (Walford 2012). In summary the site lies in an area which has been previously identified as having a number of Iron Age settlement sites. To the north, at RAF Cardington remains of Late Iron age and Roman peripheral occupation was identified in trial trenching (Lambert 2008). Further to the north, on the gravel ridge overlooking the Elstow Brook and the Ouse, a later Iron Age rectangular enclosure defined a cremation cemetery with cremations within or just outside on the gravel ridge overlooking the river valley. One of these was set within a small ring ditch and associated with chain mail indicating a high status burial. To the east of the site, cropmarks suggest late Iron Age and Roman settlement (HER 584), consisting of enclosures running E-W, parallel to a watercourse. To the west, at Medbury Farm (Carlyle 2005) a small Middle Iron Age farmstead was identified through aerial photography and trenching. This farm was later the site of a Roman farmstead suggesting an occupation for the area over 600 years.

A geophysical survey (Walford 2012) carried out in the vicinity of the proposed pond location revealed the presence of a probable ring ditch surrounded by a paddock set within a large sub-circular enclosure along with additional linear features and probable pits. The location of the pond itself crosses the southernmost extent of these features, but the course of the drainage trench runs through an area thought to have low archaeological potential based on previous trial trenching in its vicinity.

Objectives and methodology

The project's research objectives as outlined in the WSI (Lisboa 2014) were:

'Chronology: Investigation will seek to establish a framework for the occupation of the area. What is the dating of the settlement?

'Occupation: character and its development. Investigations will seek to establish the ground plan and sequence of land use to enable the identification of spatial and chronological variation including type of occupation agricultural practices etc. the relationship between the evaluation results and the excavation and how it can be used to predict archaeological remains in similar geological settings.

'Documentation and analysis of Iron Age enclosure and settlement. Investigation of character and its development with the documentation of a ground plan and sequence of land use

‘Comparison between the character and date of the probable Early Iron Age settlement and other settlements in the surrounds

‘What is the economy of the settlement, ie, the nature of its agricultural production and consumption?

‘Methodological development: can sampling strategies be developed to better target areas of high archaeological potential?

The WSI also specified the excavation methodology, which can be summarized as follows:

Topsoil and subsoil were to be removed mechanically down to the first significant archaeological horizon or the natural geology whichever is higher, in successive level spits, with a wide toothless ditching bucket, under archaeological supervision. Spoil was to be monitored for finds.

For the pond area, a ‘strip, map and record’ strategy was adopted. Areas containing archaeological features were to be planned and excavated by hand to an agreed sampling fraction dependent on the feature’s type and significance. A programme of bulk soil sampling was to be undertaken for environmental remains and to enhance small finds recovery, should suitable deposits be present. Provision was made for a programme of radiocarbon dating, should suitable deposits be present.

For the route of the drain, a continuous watching brief was applied.

The aim of the watching brief was to record hitherto unknown archaeological deposits exposed during stripping. Archaeological features were to be hand cleaned and significant archaeological features which fulfil the objectives noted above were to be excavated by hand in a manner sufficient to obtain dating evidence and information concerning character and chronological relationships.

Results

Topsoil and subsoil stripping using a 360° machine fitted with a ditching bucket was carried out under archaeological supervision. A typical depth of 0.54m of overburden was stripped from the site to expose the archaeologically relevant horizon which consisted of gravels with clay patches.

The drainage trench was first stripped of topsoil only, along its entire length (Fig. 2) with a width of 10m and the trench itself was then dug through the remaining subsoil up to 0.30m deep and into natural geology which comprised of gravels, clays and sands. No archaeological deposits were identified during this phase of monitoring work.

The stripping of the pond area revealed a moderate amount of archaeological deposits from the Iron Age including six linear features and twenty-seven pits (Figs 3- 5) which were then excavated by hand. A summary

of all excavated features forms Appendix 1. All of the pottery mentioned below is early to middle Iron Age in date.

Ditches

The main focus of the site comprised Ditch 200 (Pl. 1) which corresponds with the southern portion of a large enclosure ditch identified in earlier geophysical work carried out on the site. The survey showed it to be roughly oval, 89m by 68m at its greatest extent, with an apparent entrance facing east. Several smaller linear features and large pit- or pond-like discrete features occupied its interior. One of the linear features in the south-east corner appeared to form a sub-enclosure. The length of ditch exposed in the pond formed the south side of the overall enclosure, and measured 60m in length and was up to 3.5m wide, with a maximum depth of 1.30m as revealed in the six excavated slots (27, 28 (Pl. 1), 29, 36, 39 and 40) which further revealed that up to three deposits filled the ditch fairly uniformly across the length of the feature, the earliest deposit comprising of light grey sandy clay with gravel inclusions, overlain by compact brown grey silty clay with gravel and chalk inclusions with a upper most deposit of grey brown silty clay. The ditch was seen to truncate Ditches 201 and 202 in plan but due to ditches 201 and 202 not continuing on past ditch 200 it would seem they are likely contemporary, Ditch 200 was also truncated by Gully 203 and 204, the relationship between ditch 200 and ditch 205 and ditch 206 was obscured by the presence of modern drainage in the area. Iron Age Pottery, animal bone and a flint arrowhead were recovered from across the ditch.

A radiocarbon date was obtained on oak charcoal from the lower fill of slot 28 (164) (Appendix 6). This returned an unexpected early date of 1985-1744 Cal BC (UBA32518) which is considerably earlier than anticipated from the associated pottery chronology and is considered as residual.

Ditch 201/202 measured 4.8m in length and was 2.3m wide in plan with a depth of 0.48m as revealed in the single slot (30/31) (Pl. 2) excavated which also revealed that the ditch was comprised of an earlier ditch, 30, from which 28 sherds of pottery were recovered from its base deposit of grey sandy clay (89) which was overlaid by dark brown grey sandy clay (88); and also a later gully, 31, the fill of which contained large amounts of charcoal (90) however from which no finds were recovered. The ditch was also seen to be clearly truncated by gully 200 just to the south. The earlier geophysical survey reveals that this ditch forms part of a smaller enclosure in the south-eastern corner of the larger enclosure.

Gully 203 (Pl. 3) measured 46.2m in length and 0.6m wide with a depth up to 0.20m, five slots were excavated (1, 18, 19, 34 and 42) from which 3 sherds of pottery were recovered from a uniform deposit of grey brown silty clay across the gully. The gully was revealed to truncate ditch 200 in cut 32/33.

Gully 204 measured 38.3m in length, up to 0.60m wide and up to 0.20m deep and is likely to be the continuation of gully 203. Three slots were excavated (35, 46 and 111) with a relationship being established with ditch 200 in slot 40/41. No finds were recovered. The geophysical survey shows 204 extending another 60m eastwards, but showed no sign of 203 either within or beyond the excavation area.

Ditch 205/6 measured 30.8m in length and was up to 1.9m wide and was revealed to be up to 0.50m deep. Four slots were excavated which revealed that ditch 206 comprised the earlier cut (3, 7, 25 and 48) from which five sherds of pottery were recovered from deposit (79) of cut 25. This ditch was cut by pit 48 and also ditch 205 which (2, 6 and 24) from which 32 sherds of pottery were recovered in total. The relationship between this ditch and ditch 200 could not be established due to the presence of a modern drain running through the two.

Gully 207 measured 30.1m in length and was between 0.60 and 1.1m in width, four slots were excavated (5, 9, 21 and 22) which revealed the linear to have a depth of up to 0.20m and from which 6 sherds of pottery were recovered. The gully was also revealed to be cut by gully 208 immediately to the north.

Gully 208 measured 28.2m in length and was up to 0.6m wide with a depth of up to 0.20m and ran roughly parallel to gully 207, three slots were excavated (4, 8 and 23) from which six sherds of pottery were recovered.

Pits

Nineteen possible pits were identified and excavated, with only a small portion containing any dating evidence however it is likely that the remaining pits are of a similar age given their similar deposits.

Dated Pits

Pit 37 and 38 measured 2.4m in width and had a depth of 0.78m and comprised an earlier cut [38] which was filled with a grey brown silty clay (99) from which a sherd of pottery was recovered. and was overlaid by dark grey silty clay (150), this was in turn truncated by pit [37] which itself measured 2.15m in width and was filled with a dark brown grey silty clay (98) from which a sherd of pottery was recovered.

Pit 47 measured 0.6m wide, was 0.25m deep and filled with a dark silty sand (163) from which pottery was recovered.

Pit 107 measured 0.8m wide, was 0.20m deep and filled with a dark grey brown silty sand (173) from which pottery was recovered.

Undated Pits

No finds were recovered from any of the pits listed below, except 4 fragments of large animal bone from pit 110. Pit 10 measured 0.54m wide, was 0.24m deep and filled with a dark grey brown silty sand (64).

Pit 11, 12 were two pits found adjacent to one another, the earlier cut [12] measured 0.39m wide, was 0.11m deep and filled with a dark grey brown silty sand (66) which was cut by pit [11] which measured 0.40m wide and was 0.17m deep and filled light brown grey silty sand (65).

Pit 13 measured 0.35m wide, was 0.19m deep and filled with a light grey brown silty sand (67).

Pit 14 measured 0.80m wide, was 0.33m deep and filled with a light grey brown silty sand (68).

Cuts 15-17 comprise the remains of a treebole measuring 0.89m wide and 0.25m deep.

Pit 43 measured 0.57m wide, was 0.30m deep and filled with a dark grey brown silty sand (159).

Pit 44 measured 0.37m wide, was 0.15m deep and filled with a dark grey brown silty sand (160).

Pit 45 measured 0.44m wide, was 0.12m deep and filled with a light grey brown silty sand (161).

Pit 48 measured 0.60m wide, was 0.50m deep and filled with a dark grey brown silty sand (176). The pit cut ditch 206.

Pit 100 measured 0.90m wide, was 0.24m deep and filled with a dark grey brown silty sand (166).

Pit 101 measured 0.7m wide, was 0.35m deep and filled with a dark grey brown silty sand (167).

Pit 104 measured 1.10m wide, was 0.30m deep and filled with a grey brown silty sand (170).

Pit 105 measured 0.69m wide, was 0.24m deep and filled with a dark grey brown silty sand (171).

Pit 106 measured 0.70m wide, was 0.41m deep and filled with a dark grey brown silty sand (172).

Pit 110 (Pl. 4) measured 1.90m wide, was 0.74m deep and filled with a light grey brown silty sand (178), below which lay a deposit of brown silty clay (179) from which animal bone was recovered and which in turn overlay a deposit of light grey brown silty clay (180).

Postholes

A group of five postholes on the eastern side of the site are possibly the remains of a fence line or possible paddock given the similar sizes. The postholes [102, 103, 108, 109 and 112] were between 0.5 and 0.55m wide and up to 0.21m deep, no datable evidence was recovered from the excavated slots, however small amounts of animal bone were recovered from [112]

Finds

Pottery by Malcolm Lyne

The various features yielded 188 sherds (2123g) of pottery from 25 contexts: a further two sherds came from the sieving of environmental samples (Appendix 2). All of the sherds are Early to Middle Iron Age in date and belong to Cunliffe's Ivinghoe/Sandy cultural grouping and its successors (Cunliffe 1991, 68-9; figs. A:5 and A:24). The bulk of the sherds (116) are in shelly fabrics IA2 and IA3 (the fabrics are described in Appendix 3) and include fragments from at least five shouldered-jars. The fabric contains large amounts of fossil shell and is derived from local Jurassic clays of a naturally fossiliferous nature and very similar to those used by the later Late Iron Age and Roman potters at Harrold (Brown 1994) only a short distance to the north-west.

The earlier Iron Age pottery of Bedfordshire is not well understood and this is a useful addition to our knowledge.

Industrial Residue by Steven Crabb

A total of 332g of slag was recovered, all from deposit 87 within ditch 200 (29). All of the material recovered is light grey to white in colour, highly vesicular and with a glassy composition. These attributes all indicate that the material recovered is fuel ash slag. This type of industrial debris is the result of a high temperature fire which has caused the reaction between the ashy remains of the fuel and the material surrounding the fire. Therefore it is only possible to attribute this material to any high temperature pyrotechnological process.

Struck Flint by Steve Ford

A single worked flint was recovered from ditch slot 28 (84). It is a leaf shaped arrowhead of earlier Neolithic date. It was intact, 43mm long, 20mm wide and 3mm thick. It is lozenged shaped with straight edges but with a markedly longer pointed end. It was well made by pressure flaking across the whole of both surfaces. It is mostly patinated white but two or three removals were patinated a light bluish white as if it had been reflaked rather than a product of its burial environment.

As it is an arrowhead and is the only early prehistoric find from the site, it was probably lost during a hunting expedition. However, its presence in a Middle Iron Age context may be a result of it having been collected as a curio in later times.

Human Bone by Ceri Falys

A single piece of human bone was recovered from deposit (80) within ditch 27. The bone is well preserved, although the cortical bone demonstrates moderate etching of the surface by root activity and large areas of erosion are present around the proximal end of the fragment. The piece of bone is identified as the proximal third of a right femur of an adult individual (the head of the femur has fused to the neck). The maximum diameter of the femoral head measures 43.2mm, which suggests a sex of possibly female, based on Stewart's (1979) criteria. No pathological alterations are observed, and no further information can be retrieved from this femoral fragment.

Animal Bone by Lizzi Lewins

A small assemblage of animal bone (443 pieces), weighing a total of 5279g, was recovered during the course of the recording action. The bone was in fair condition, although fragmented with some surface abrasion and erosion observed. The bone was classified according to size (large mammal - horse/cattle; medium mammal - sheep/goat, pig, deer; small mammal - dog/cat) and where possible by species. A full inventory of the bone can be found in Appendix 4.

The assemblage produced remains for a small range of domesticates including cattle, horse, pig and sheep/goats (MNI 2 cattle, 2 sheep/goats, 1 horse). A number of the remains classified by size were tentatively identified as pig and deer although this is unconfirmed. A number of butchery marks in the form of cutmarks, slicing and chopping as well as a small amount of burnt bone was noted suggesting some processing of animal carcasses within the bounds of the site. Tentative evidence for gnawing may suggest that the bones were accessible to scavenging animals (dogs) before final deposition occurred. Overall the assemblage is likely to represent domestic consumption. Apart from the butchery marks, burning and tentative evidence for gnawing no further taphonomic processes were observed.

Environmental Analysis by Rosalind McKenna

Bulk soil samples from fifteen contexts were wet-sieved using standard procedures (methodological and other details in archive). Charred plant macrofossils were absent. Charcoal fragments were present in all of the samples, but preservation was poor. Identifiable remains were present in just five of the samples (Appendix 5). All the identified charcoal was oak. It is possible that this was the preferred fuel wood obtained from a local environment containing a broader choice of species.

Radiocarbon dating

One samples of oak charcoal was submitted to the Chrono radiocarbon dating laboratory at the Queen's University of Belfast. The result was calibrated using Calib rev 7.0 with data from INTCAL 13 (Reimer *et al.* 2013) and are detailed in Appendix 9. All results are quoted at 2-sigma (95.4% probability).

Conclusion

The fieldwork described above has revealed further evidence of an Iron Age enclosure which had been previously identified during a geophysical survey of the site. Most importantly it has provided a chronology, albeit a broad one, based on Early to Middle Iron Age pottery. However, the chronology is not as close as desired with the apparent continuation of Early Iron Age fabrics into a period when Middle Iron Age forms and fabrics were also in use. Unfortunately, a radiocarbon date on charcoal from the basal fill of the ditch returned an early Bronze Age date and is clearly residual in this context. Although the date does not assist with the chronology of the enclosure, it does point to some form of activity here in the earlier Bronze Age that is not represented by cut features nor artefacts.

Other than instances of recutting the same ditch line, it is difficult to ascertain whether the site was very long-lived or represents shorter episodes of use. Perhaps gullies 207 and 208 pre-date the enclosure (ditch 200), and gully 203/204 (probably a single feature) certainly must have been dug when it was out of use, but it is unclear if the mixing of pottery in the main ditch indicates a very long life for that feature. Recut ditches 201/202 and 205/206 are probably at least partly contemporary with main ditch 200, which might suggest it had a reasonably long life. Insufficient of the interior of the enclosure was within the area affected by the works to allow much understanding of the nature of the settlement but the ditch itself contained sufficient finds to indicate that it was certainly occupied.

The more minor linear features were not identified in the geophysical survey. A number of pits were identified, and although only a small number of these were dated it is likely that the rest are of a similar period. Only the largest of these pits [110] seems to have appeared as an anomaly identified by the geophysical survey.

No further archaeological deposits were identified during the laying of the pipe trench to the south and west of the pond which would suggest the activity associated with the enclosure is either localized or extends to the north only.

Animal bone survived, mostly in the larger features, with most coming from ditch 200, but very little of this could be identified, and the apparent bias towards larger mammals (cattle and horse) is probably largely due to the greater robusticity of these larger bones, and a tendency for larger bones to be deposited in ditches on the settlement edge rather than pits in the interior has also frequently been noted. Other than noting the presence of all the usual domesticates, with some evidence of butchery, the bone adds little to our understanding of the Iron Age economy. The absence of charred plant remains must also be treated with caution, as the settlement periphery might not be expected to be the place of disposal of minor grain processing or kitchen waste, but if taken at face value could suggest a specialized site concentrating on animal rearing rather than mixed agriculture. However, the evidence is very meagre.

The discovery of a single human bone in the enclosure ditch is fairly commonplace on Iron Age sites, where formal inhumation is rare but excarnation may have been the normative rite, bones only incidentally finding their way into below-ground features.

The chronology of the Iron Age in Bedfordshire is as yet somewhat ill-defined. The early Iron Age might begin as early as the late 9th century BC (ie before the traditional start of the Iron Age in 750 BC) (Collard et al. 2006), and the Middle probably in the later 5th, but it is not until the later 1st century BC (Late Iron Age, often referred to as 'Belgic') that chronology can be much more refined than those broad periods (Dawson 2007). Without radiocarbon dating (as opportunities for archaeomagnetic dating for this period are likely to be rare), progress on this topic is likely to be slow.

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APPENDIX 1: Feature Details

<i>Group</i>	<i>Cut</i>	<i>Fill(s)</i>	<i>Type</i>	<i>Date</i>	<i>Dating Evidence</i>
		50	Topsoil		
		51	Subsoil		
203	1	52, 53	Gully	Iron Age	Association
205	2	54	Ditch	Iron Age	Pottery
206	3	56	Ditch	Iron Age	Association
208	4	58	Gully	Iron Age	Association
207	5	59	Gully	Iron Age	Association
205	6	60	Ditch	Iron Age	Pottery
206	7	61	Ditch	Iron Age	Association
208	8	62	Gully	Iron Age	Pottery
207	9	63	Gully	Iron Age	Pottery
	10	64	Pit	Undated	None
	11	65	Pit	Undated	None
	12	66	Pit	Undated	None
	13	67	Pit	Undated	None
	14	68	Pit	Undated	None
	15	69	Pit	Undated	None
	16	70	Pit	Undated	None
	17	71	Pit	Undated	None
203	18	72	Gully	Iron Age	Association
203	19	73	Gully	Iron Age	Association
207	20	74	Gully	Iron Age	Association
207	21	75	Gully	Iron Age	Association
207	22	76	Gully	Iron Age	Pottery
208	23	77	Gully	Iron Age	Pottery
205	24	78	Ditch	Iron Age	Pottery
206	25	79	Ditch	Iron Age	Pottery
200	26	81	Disturbance	Modern?	None
200	27	80, 82	Ditch	Iron Age	Pottery
200	28	83, 84, 164, 165	Ditch	Iron Age	Pottery
200	29	85, 86, 87	Ditch	Iron Age	Pottery
201	30	88, 89	Ditch	Iron Age	Pottery
202	31	90	Gully	Iron Age	Association
200	32	91	Ditch	Iron Age	Association
203	33	92	Gully	Iron Age	Pottery
203	34	93	Gully	Iron Age	Pottery
204	35	94	Gully	Undated	None
200	36	95, 96, 97	Ditch	Iron Age	Pottery
	37	98, 99	Pit	Iron Age	Pottery
	38	150	Pit	Undated	None
200	39	151, 152, 153	Ditch	Iron Age	Pottery
200	40	154, 155, 156	Ditch	Iron Age	Pottery
204	41	157	Gully	Undated	None
203	42	158	Gully	Iron Age	Pottery
	43	159	Pit	Undated	None
	44	160	Pit	Undated	None
	45	161	Pit	Undated	None
204	46	162	Gully	Undated	None
	47	163	Pit	Iron Age	Pottery
	48	176	Pit	Undated	None
206	49	177	Ditch	Iron Age	Pottery
	100	166	Pit	Undated	None
	101	167	Pit	Undated	None
	102	168	Pit	Undated	None
	103	169	Pit	Undated	None
	104	170	Pit	Undated	None
	105	171	Pit	Undated	None
	106	172	Pit	Undated	None
	107	173	Pit	Iron Age	Pottery
	108	174	Pit	Undated	None
	109	175	Pit	Undated	None
	110	178, 179, 180	Pit	Undated	None
204	111	181	Gully	Undated	None
	112	182	Pit	Undated	None

APPENDIX 2: Pottery Catalogue

From excavated contexts

<i>Group</i>	<i>Cut</i>	<i>Deposit</i>	<i>Fabric</i>	<i>Form</i>	<i>Date-range</i>	<i>No sherds</i>	<i>Wt (g)</i>	<i>Comments</i>
205	2	54	IA6		c.500-100BC?	1	1	Polished
205	6	60	IA7	Jar base	c.500-100BC?	27	124	Jar base
208	8	62	IA6		c.500-100BC?	2	1	Fresh flakes
207	9	63	IA8	Jar	c.500-100BC?	3	12	Fresh 1 pot
207	22	76	IA2	Shouldered jar	c.700-500+BC	1	8	Fresh
			IA6			2	4	Fresh
208	23	77	IA2	Everted rim jar	c.700-500+BC	4	18	Fresh 1 pot.
205	24	78	IA2	Jars	c.700-100BC	7	49	Fresh and abraded.
206	25	79	IA2	Shouldered jar	c.700-500+BC	5	21	Fresh 1 jar.
200	26	80	IA2	Jar	c.700-500+BC	6	103	Fresh.
200	27	82	IA2	Jar	c.700-500+BC	27	379	Fresh.
200	28	84	IA2	Jars	c.700-500+BC	23	277	Fresh
			IA5	Jar	Middle Iron Age	1	20	Fresh
			IA7	Jar	Middle Iron Age	1	10	Fresh
200	29	85	IA2	Jar	c.700-500+BC	2	57	Abraded.
200	29	87	IA2	Jar	c.700-500+BC	10	46	Abraded
			IA7	Jar	Middle Iron Age	5	16	Fresh
201	30	89	IA3	Jar	c.700-500+BC	3	119	SI abraded
			IA7	Jars	Middle Iron Age	22	74	Fresh
			<i>Fired clay</i>			2	12	
203	33	92	IA2	Jar	c.700-500+BC	1	23	Abraded
			IA4	Jar	?Middle Iron Age	2	6	SI abraded
203	34	93	IA3	Jars	c.700-500BC	2	13	Abraded. Residual?
200	36	95	IA4		c.700-100BC	2	9	Fresh.
200	36	96	IA2	Store jar etc	c.700-500+BC	3	172	Fresh and abraded
	37	99	IA2		Uncertain	1	1	Abraded.
200	39	151	IA1	Shouldered jar	c.700-500+BC	1	39	Fresh
			IA3		c.700-500+BC	1	5	Abraded
200	39	152	IA3	Jar	c.700-500+BC	2	20	SI abraded.
200	40	155	IA3	Shouldered jar	c.700-500+BC	10	41	Fresh
			IA5	Shouldered jar with finger-impressed rim	c.500-200BC	2	25	Fresh joining
			IA9	Urn base	c.700-500+BC	1	197	Abraded
	47	163	IA2	Shouldered jar with finger jabbed rim	c.700-200BC	2	28	Fresh 1 pot.
206	49	177	IA3	Jar	c.500-200BC	1	12	Polished
	107	173	IA2	Storage jar	c.700-500+BC	4	192	Fresh
			IA4	Jar	c.500-200BC	1	2	Fresh. Polished
						188	2123	

From environmental samples

<i>Cut</i>	<i>Deposit</i>	<i>Sample</i>	<i>Fabric</i>	<i>Form</i>	<i>Date-range</i>	<i>No sherds</i>	<i>Wt (g)</i>	<i>Comments</i>
37	98	2	IAX	Jar	Iron Age	1	15	Fresh.
42	158	7	IAX	Closed	Iron Age	1	4	Pit.

APPENDIX 3: Pottery Fabrics

Fabrics

- IA 1. Handmade black fabric with sparse <5.00 mm. irregular white limestone and finer <0.50 mm. ironstone and brown ferrous inclusions
- IA 2. Handmade brown black fabric with profuse <2.00 mm. fossil shell and limestone. Some ooliths and brown ferrous inclusions.
- IA 3. Handmade black fabric with profuse <2.00 mm. shell filler.
- IA 4. Smooth handmade black fabric with sparse <0.50 mm. white quartz-sand and shell
- IA 5. Handmade lumpy black fabric with <0.20 mm. quartz-sand inclusions, fired brown.
- IA 6. Handmade black fabric with sparse <0.50 mm. multi-coloured quartz-sand and grog filler.
- IA 7. Silty black handmade fabric with sparse <0.50 mm. limestone and ?grog filler, fired patchy orange/black.
- IA 8. Handmade black fabric with profuse <0.50 mm. multi-coloured quartz-sand and occasional larger alluvial flint inclusion.
- IA 9. Handmade black fabric with profuse <1.00 mm. crushed rock, occasional limestone and fine quartz-sand filler.

Appendix 4: Animal Bone Inventory

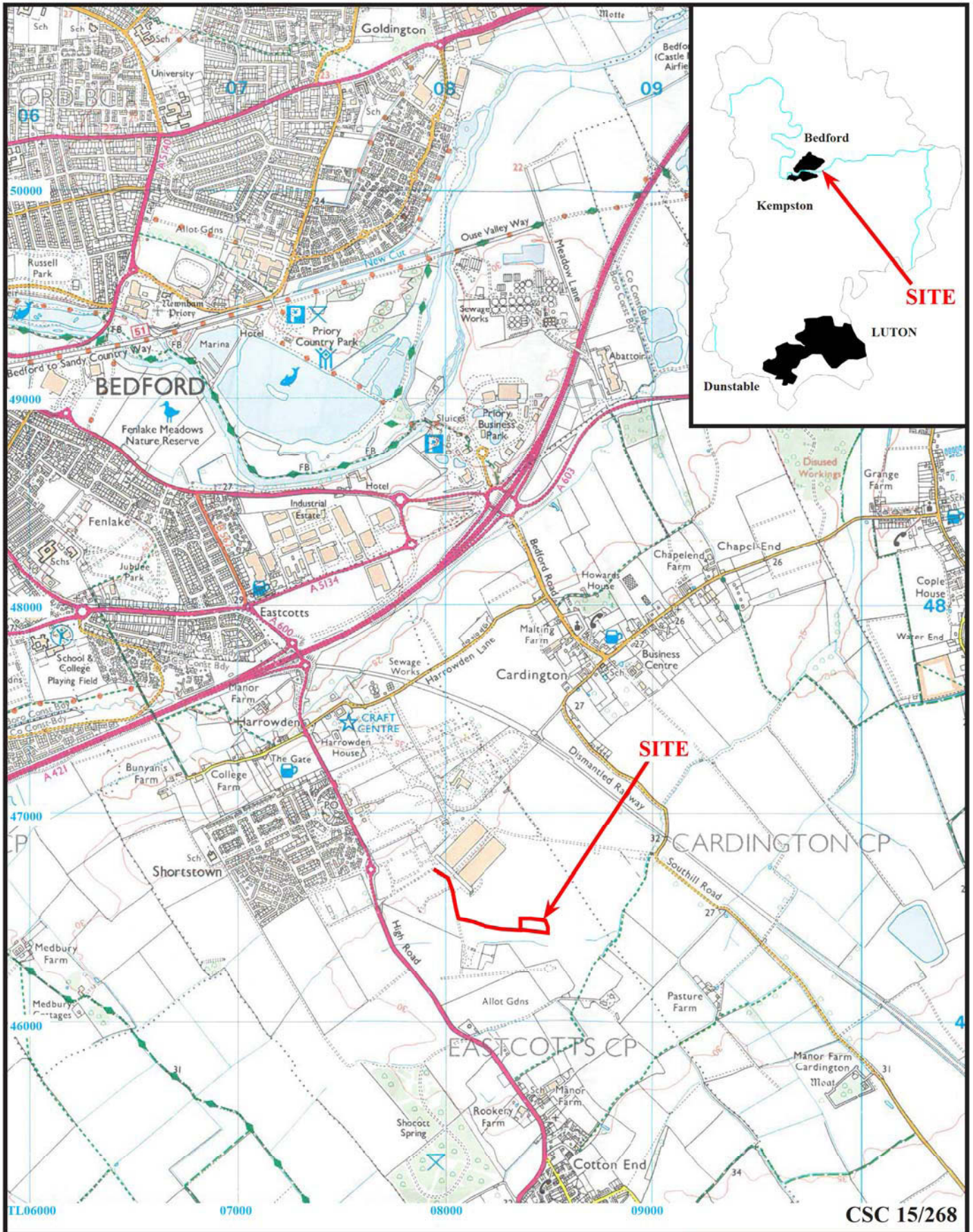
<i>Cut</i>	<i>Deposit</i>	<i>Sample</i>	<i>Type</i>	<i>No. of Frags</i>	<i>Wt (g)</i>	<i>Horse</i>	<i>Cattle</i>	<i>Sheep/ Goat</i>	<i>Large</i>	<i>Medium</i>	<i>Small</i>	<i>Small/ Medium</i>
1	53	-	Ditch	3	6			2				
6	60	-	Ditch	29	196		1		10			
26	81	-	Ditch	12	392		1	2	4	4		
-	80	-	Spread	24	384		2		4	9		
27	82	-	Ditch	91	834		5	1	15	10	1	
28	84	-	Ditch	16	128	1		2		6		
28	164	9	Ditch	3	16				1			
29	85	-	Ditch	2	16					2		
29	87	-	Ditch	57	624		1	1	9	10		
30	89	-	Ditch	21	808	2		7	7	2		1
33	92	-	Gully	11	44					1		
36	95	-	Ditch	2	88				2			
36	96	-	Ditch	4	74				2			
36	97	-	Ditch	3	30					3		
37	98	-	Pit	4	144				2			
37	98	2	Pit	7	62							
38	99	-	Pit	33	230				12	2		
39	151	-	Ditch	40	278				5	7		
39	152	-	Ditch	16	66			3	1	3		
39	153	-	Ditch	2	12							
39	153	6	Ditch	1	2							
40	155	-	Ditch	45	648	1	10		3	2		
40	156	-	Ditch	1	14			1				
42	158	7	Gully	1	1						1	
48	176	-	Pit	1	12				1			
49	177	-	Gully	5	36		2					
101	167	-	Pit	2	36		1					
110	179	-	Pit	4	50				3			
112	182	-	Pit	3	48		2			1		
Total				443	5279							

APPENDIX 5: Charcoal

	<i>Sample</i>	5	9	10	13	14
	<i>Feature</i>	27	28	101	108	109
	<i>Context</i>	82	164	167	174	175
	<i>Feature Type</i>	Ditch	Ditch	Pit	Pit	Pit
	<i>No. frags</i>	1	2	25+	50+	4
	<i>Max. size (mm)</i>	34	9	20	11	15
Latin	Vernacular					
<i>Quercus</i>	Oak	1	2	16	18	1
Indeterminate	Indeterminate			9	32	3

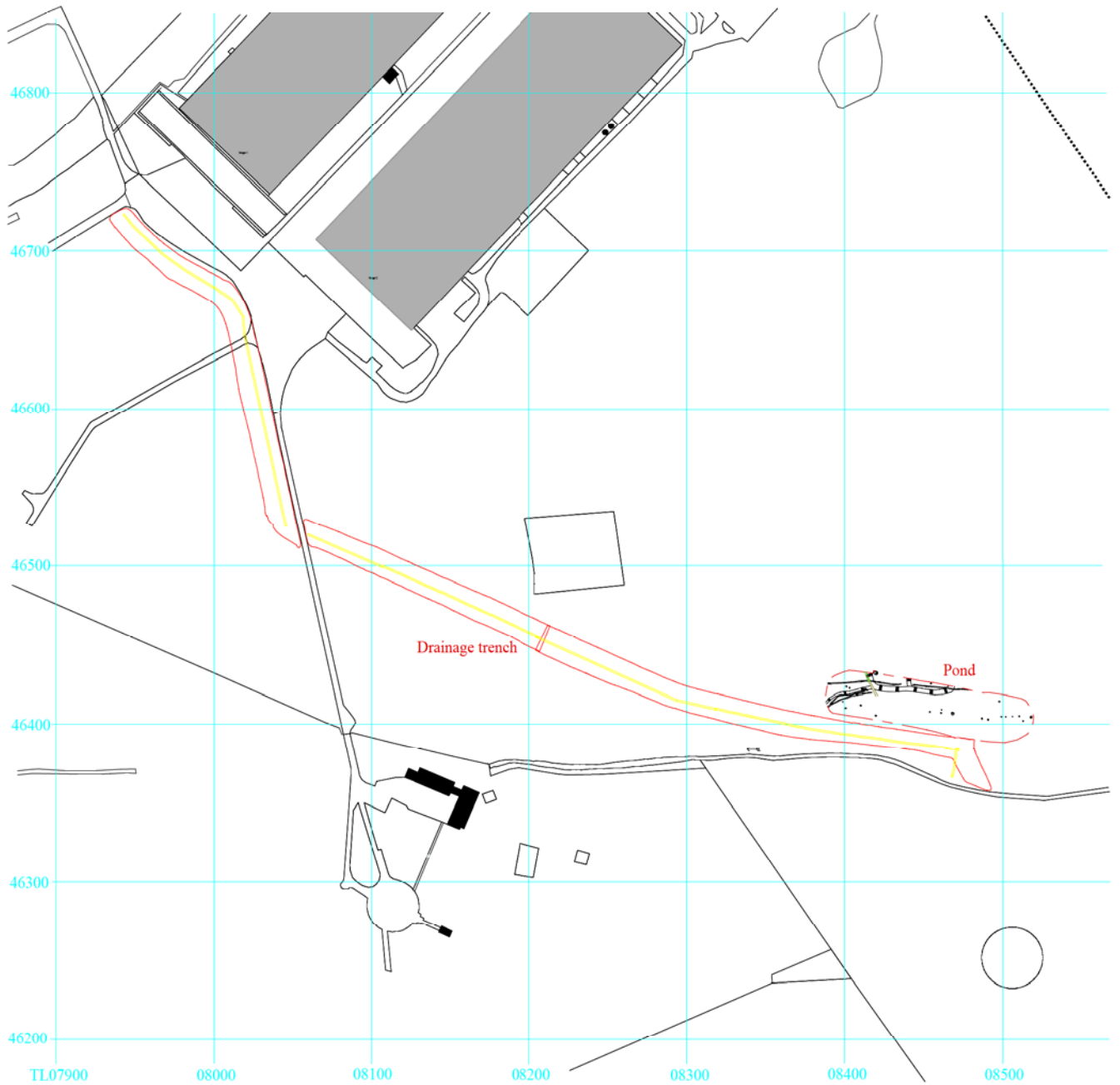
APPENDIX 6: Radiocarbon dating

<i>Lab ID</i>	<i>Feature</i>		<i>Radiocarbon Age (BP)</i>	<i>Calibrated date BC</i>	<i>Area under curve at 2-sigma</i>
UBA32518	Ditch slot 28 (164) sample 9	Oak charcoal	3540 ± 51	2022-1989	4.8%
				1985-1744	95.1%
				1706-1705	0.1%



**Cardington Sheds,
Cardington, Bedfordshire, 2015**
Archaeological Watching Brief and Excavation
 Figure 1. Location of site in relation to Cardington and within Bedfordshire.

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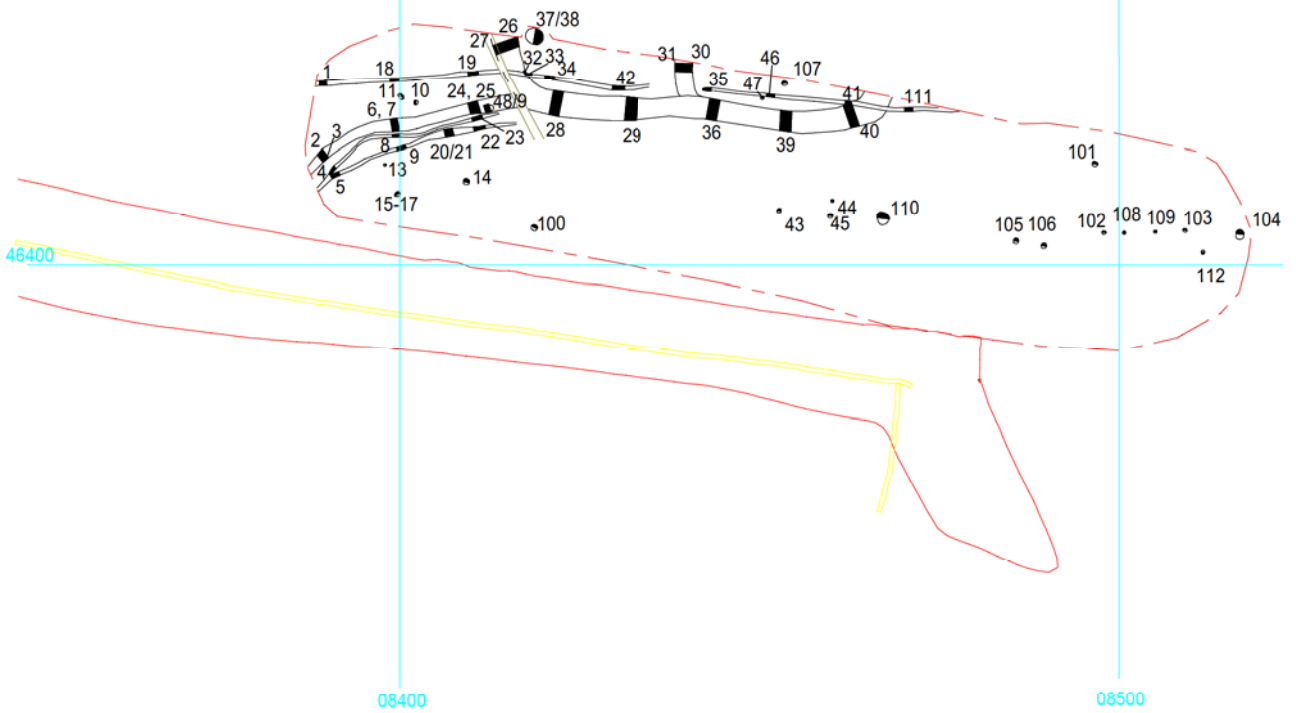
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Figure 2. Location of observed areas.



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46500



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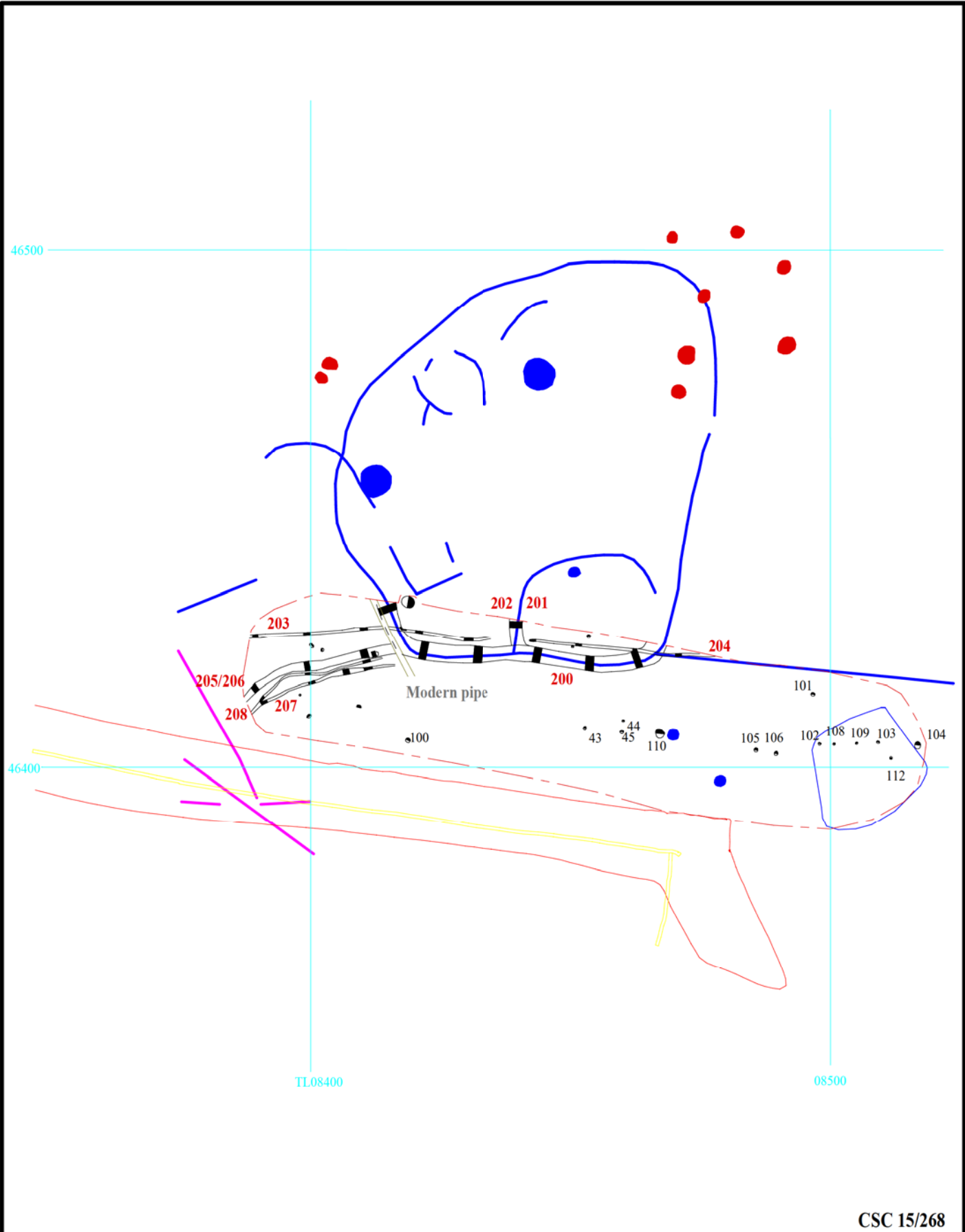


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Figure 3. Pond



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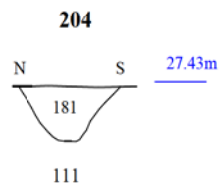
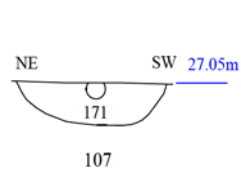
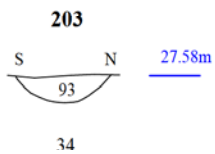
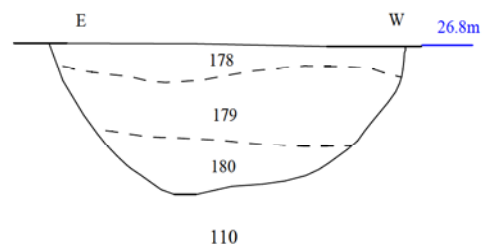
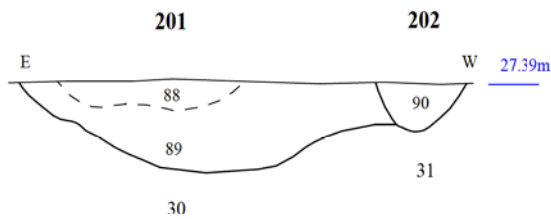
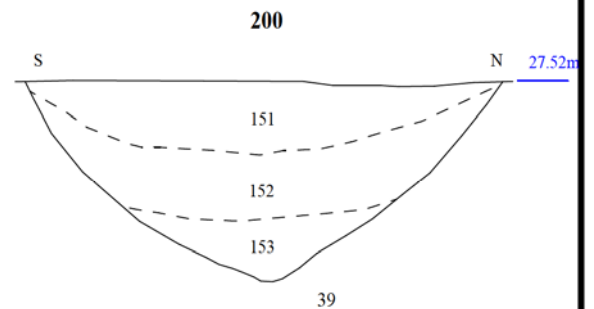
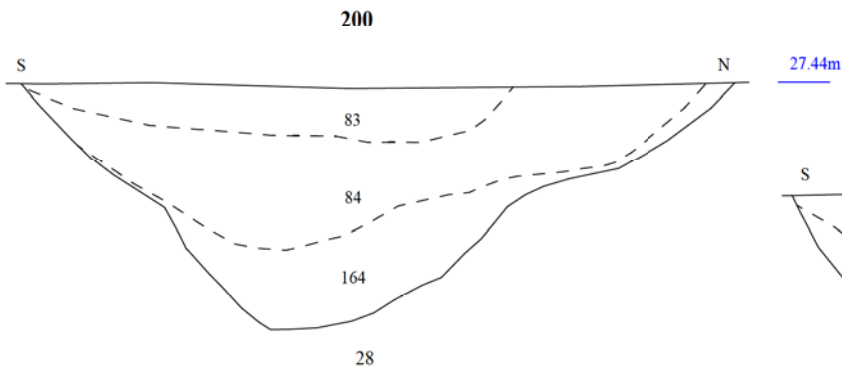
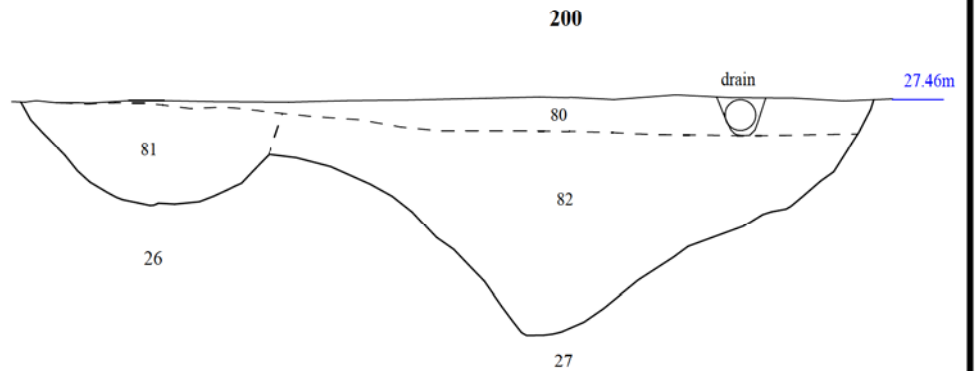
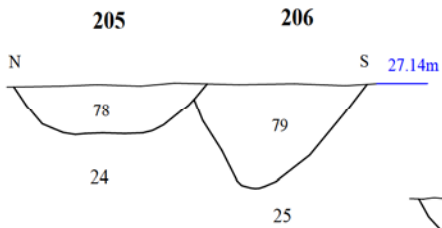
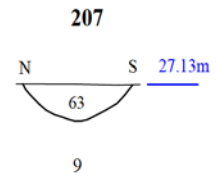
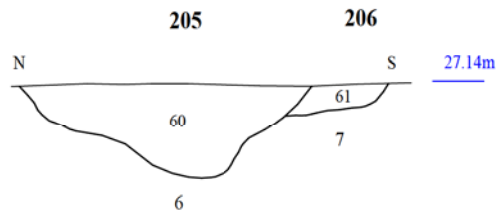
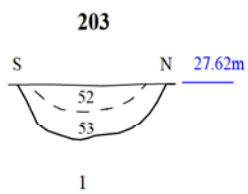
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Figure 4. Pond excavation with geophysical anomalies.



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Figure 5. Sections.



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Plate 1. Ditch 200, slot 28, looking west, Scales: 2m and 1m.



Plate 2. Ditch 201 (slot 30) and gully slot 31, looking south, Scales: 2m and 0.5m.

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Plates 1 - 2.

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Plate 3. Course of Ditch 203 from slot 34, looking west, Scales: 0.5m and 0.1m.



Plate 4. Pit 110, looking south, Scales: 1m and 0.5m.

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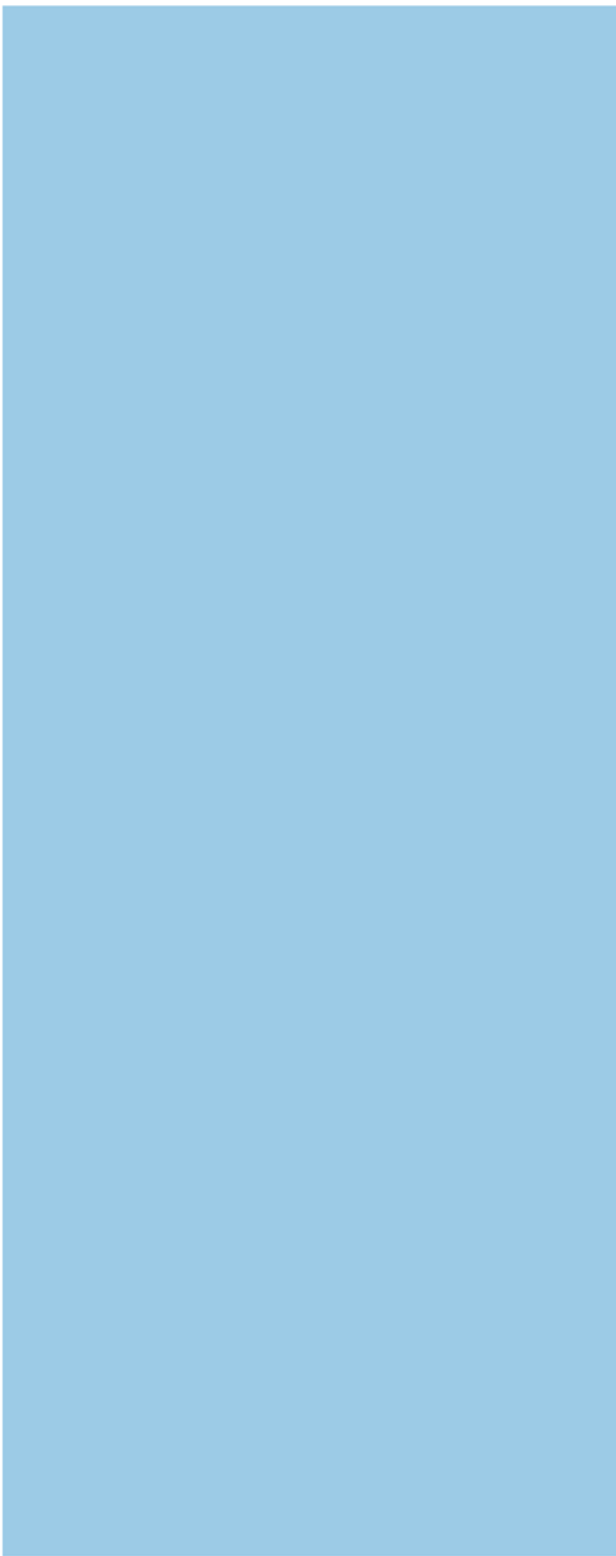
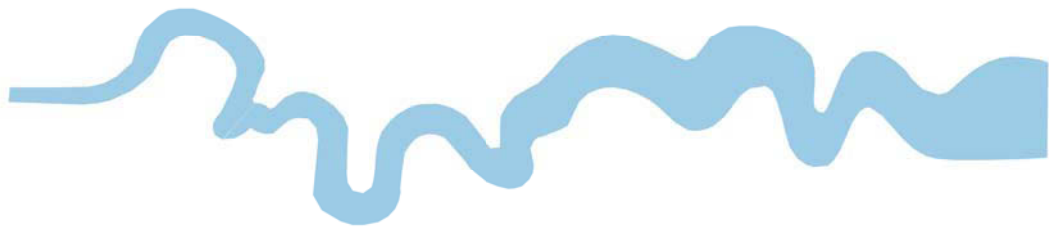
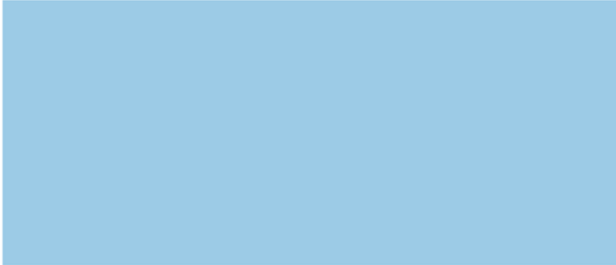
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Plates 3 - 4.

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TIME CHART

	Calendar Years
Modern _____	AD 1901
Victorian _____	AD 1837
Post Medieval _____	AD 1500
Medieval _____	AD 1066
Saxon _____	AD 410
Roman _____	AD 43
Iron Age _____	BC/AD 750 BC
Bronze Age: Late -----	1300 BC
Bronze Age: Middle -----	1700 BC
Bronze Age: Early -----	2100 BC
Neolithic: Late	3300 BC
Neolithic: Early	4300 BC
Mesolithic: Late	6000 BC
Mesolithic: Early	10000 BC
Palaeolithic: Upper	30000 BC
Palaeolithic: Middle	70000 BC
Palaeolithic: Lower	2,000,000 BC





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