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LINDSEY ARCHAEOLOGICAL SERVICES

Bicker, land off Drury Lane and Friest Lane

Archaeological Watching Brief [Plot 10]

NGR: TF 223 372
Site Code: BDF 97
LCNCC Museum Accn. No. 240.97
Planning Application No. BO4/0222/96

prepared for L.E. Henton and Son

Lincolnshire County Council
Archaeology Section

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Summary

A watching brief during the excavation of foundation trenches for the first new dwelling on this development identified a seventeenth century rubbish deposit, apparently a pot kiln waster dump within a former drainage ditch perpendicular to Drury Lane. Large pieces of 16-18th century green-glazed pancheons similar to Toynton-Bolingbroke and Bourne type wares were retrieved. This material may be associated with Drury House which local tradition claims was sited slightly north of the development. No pot kiln has been previously recognised in this location.

Introduction

Lindsey Archaeological Services (LAS) was commissioned by L.E. Henton and Son in September 1997 to conduct a watching brief during the mechanical excavation of house footings on a 0.35ha. plot between Drury Lane and Friest Lane, Bicker (Fig. 1). The monitored development (Plot 10) was construction of the first of ten proposed houses and associated garages (Fig. 2).

The watching brief was required to satisfy a condition of Boston Borough Council's full planning permission for residential development. This required an archaeological watching brief for which a brief was prepared by the Boston Community Archaeologist (dated 6th August 1996). A project specification prepared by LAS in September 1997 was approved.

The Development Site

The development site lies on the corner of Drury Lane and Friest Lane, towards the southern end of Bicker (Pl. 1). The present report describes the watching brief on the foundations for a large bungalow (Plot 10) and the associated double garage on the north side of the site; between five and eight further dwellings will be built at a later date.

Archaeological Background

The local soils are reclaimed alluvial silts developed on former roddons. Salterns are found on previously tidally marginal land and medieval examples are known to have flanked Bicker Haven. These sites produce large volumes of briquetage (fired clay vessels and supports) associated with evaporation of brine.

No prehistoric remains have been reported from Bicker but Romano-British finds are known.

Method

The watching brief was conducted by the author on 25th September and 4th November 1997. The house foundation trenches were excavated with a JCB to widths of 0.75m and 0.5m. The base of the trenches was dug to a depth of about 1.1m, except where moist fills of pit 11 were encountered; here the trench was widened to provide a better foundation. The trenches were not excavated to undisturbed ground as this might have proved a poorer foundation than higher deposits. As a result, the depth of some archaeological features was not established. The garage footings were 0.7m wide and 0.8m deep.

Context numbers were assigned to features and their fills for recording purposes; these are used in this report and are listed in Appendix 1. The photographic record of the groundworks and archaeological features observed during excavation of the house footings was found to be defective.

Further plots on this development are to be built at a later date.

The Watching Brief

The bungalow, Plot 10 (Fig. 3)

The topsoil across the plot, 1, was a brown silty loam layer 0.4m thick. Part of this layer had been removed during preparation of the building plot, although the full depth survived on the northern edge.

Layer 4, a 0.15m thick light brown silt deposit which may have been a subsoil, sealed the upper fill of Pit 11 and may have been introduced to level a depression after the pit fills had settled.

Pit 11 was a large oval feature with steeply sloping sides. Only part of its profile was revealed, and it extended an unknown distance further east towards Drury Lane. Its length west-east was greater than 8m and its width north-south was about 4.3m. A depth of 1.1m was recorded at the front of the house foundation.

The pit had been backfilled with various lenses of ashy material containing large sherds of glazed pottery. These were darker brown silts at the top with lighter brown deposits closer to the base; the coloration was affected by burnt and ashy material.

The uppermost surviving fill was 3, a 0.3m thick layer of brown silt with ash and coal lumps which produced twelfth to eighteenth century pottery sherds and fifteenth/sixteenth century brick fragments (Apps. 2-5). It was separated by a particularly ashy deposit 9 (seventeenth/eighteenth century sherds) from fill 2, which was a 0.15m thick brown silt layer with ash lenses, fired clay fragments, fifteenth/sixteenth century brick fragments and infrequent coal lumps. The pottery from 2 was apparently seventeenth/eighteenth century apart from waster sherds of the sixteenth/seventeenth centuries. This overlay fills 10 (containing fired clay fragments), 8 (with fifteenth/sixteenth century brick fragments in light brown silty clay) and 12.

The earliest exposed fill of this pit was assigned separate numbers **12** and **13**. It was a light grey silt which formed a thin deposit against the sides of the pit - presumably a primary silting deposit caused by weathering immediately after the feature was first excavated. There is a possibility that **13** represents fill of ditch **17** below the rubbish pit.

A finds reference number **7** was allocated to pottery sherds retrieved from soil in the machine bucket which could not be allocated exclusively to either **2** or **3**. An iron buckle frame was found in this material (since discarded).

Three ashy deposits, **14**, **15** and **18**, seemed to have been cut by pit **11** although they were similar in composition to its fills. They extended virtually horizontally on the western side of the large pit. These were initially interpreted as a domestic rubbish deposit tipped into ditch **17** shortly before excavation of pit **11**, but are now thought to represent waste removed from a kiln stokehole.

Ditch **17** was partly exposed at the western end of the house plot. Its profile was not visible because of later features **11** and **19** which had removed part of it. It was recorded as an east-west linear feature over 3m wide and extending west of the foundations. Its depth was not determined although it was deeper than 1.1m. To the east it had been cut by pit **11**; its extent in that direction is not known. This feature produced later material than the pit but these finds were probably within a levelling deposit.

The ditch is thought to have acted as the southern boundary of Vine House or its predecessor and to have served a drainage function (Pl. 2).

An east-west aligned ditch **19** crossed the plot at the southern edge of Ditch **17**. It was 0.75m deep and about 1m wide. The sides dropped steeply to a narrow rounded base. It was filled by **5**, a dark brown loam, which produced two sherds of late seventeenth/eighteenth century pottery, fifteenth/sixteenth century brick fragments and roof tile. This ditch was interpreted as a boundary drainage ditch to the south of Vine House. Although it replaced Ditch **17**, this ditch would have been a much less effective barrier or drain than its precursor on the same alignment. It is likely that there was an extended period when this boundary was not marked by a noticeable ditch; and this is apparently reflected in the cartographic evidence which shows no ditch on a parish map of 1839 (LAO Smith 9/1/8) but a ditch is shown on the 1906 OS map (Figs. 4 and 5). This would seem to date **19** to the late nineteenth century.

Across the remainder of the foundation trenches, no further archaeological features were seen. Close to the SW corner flecks of red material seen in the brown silt may have been fired clay from local burning, possibly introduced by ploughing or animal disturbance although no sign of such agency was noticed. The presence of an earlier buried archaeological feature below this silt layer could not be dismissed.

The brown silt layer sealed a dark brown much clayier silt at a depth of about 0.7m below the present ground surface. Only small exposures of this layer were seen in the foundation trenches.

The double garage

Trenches were excavated to a total depth of 0.8m for the external walls (Pl. 3). The trench cut through topsoil 1 and an underlying mixed zone of topsoil with light brown silt 26 (Pl. 4). In the NW corner, flecks of burnt silt were present in the mixed subsoil zone. Two small post-holes (0.14m diameter) were seen in the trench base at either side of the garage, cutting 0.05m below the base. 22, to the south, contained soil very similar to modern topsoil and was interpreted as a modern feature. 24, in the northern trench, contained black burnt soil which may have derived from a disturbed archaeological feature nearby. Both post-holes are thought to have been part of a recent fenceline.

Below the disturbed subsoil was a layer of brown silt 27. This was at least 0.36m thick. At the trench base in the NW corner several small lumps of light-brown clay were present within the silt and this deposit may not have been much deeper.

A land drain 21 crossed the NE corner of the footings. The dark fill of this drain trench incorporated black soil similar to the fill of 24. It is probable that the deeper land drain had cut through deeper archaeological deposits which were not revealed in the trenches.

A small fragment of mid-seventeenth century clay tobacco pipe stem (since discarded) and a single post-medieval pottery sherd were found in topsoil 30 from these trenches.

Conclusion

The incidence of late medieval and post-medieval archaeological features on the northern edge of this development probably reflects former occupation of the adjacent plot, now the site of a bungalow. There is cartographic evidence for a substantial building called Vine House on that site and there is a local tradition of an earlier similarly situated dwelling called Drury House (LAO Smith 9/1/8; OS 1906).

The only located reference to Drury House describes it as built by John Drury during the Commonwealth period, but demolished (Hunt 1968, 43). The same article notes that The Olde Red Lion public house incorporates a stone marked 'John Drury, 1665'.

Members of the Drury family are documented in the village from the early 18th century; Thomas Drury is noted in a list of 1715, while a Henry Drury (probably his son) is recorded elsewhere in the same manuscript account book from 1719 to 1722 (LAO Bicker 15/93; /37; /46; /78). The names appear beside figures for Thompson's Dole and suggest that Henry Drury shared some financial obligation for that charity.

Although the pot and brick kiln refuse deposits and boundary ditches cannot be associated with certainty to the Drury family, they indicate the periphery of an early post-medieval occupation site. From indications elsewhere on the monitored plot, the source of the material lay to the north or east of the new foundations. To date, there is no evidence for other features between that site and Friest Lane.

Unless the prehistoric ground level fluctuated in this vicinity, it is unlikely that trenches for the further foundations will penetrate to Romano-British or earlier levels.

Acknowledgements

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LAS would also like to thank the Lincolnshire County Archaeology Section, especially Ian George (former Archaeological Officer) and Jim Bonnor (Archaeological Officer), Mark Bennet (SMR Officer) and Sarah Grundy (Assistant SMR Officer) for their assistance during this watching brief. Information was provided by Hilary Healey.

Fieldwork for this project was conducted by the author and the archive has been prepared by Mick McDaid. Pottery was identified by Jane Young.

Naomi Field offered assistance and comment on this report, which was collated and produced by Jane Frost.

Geoff Tann
Lindsey Archaeological Services
19th June 1998

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- LAO Smith 9/1/8 1839 Plan of the Parish of Bicker. Lincolnshire Archives.
- Hunt, R. 1968 'Bicker... where someone gets lost every week' *Lincolnshire Life*, January 1968, 38-43.
- OS 1905 Ordnance Survey 2nd edn. 1:2,500 map Lincs. Sheet 117/9. Surveyed 1887, revised 1903.
- OS 1906 Ordnance Survey 2nd edn. 1:10,560 map Lincs. Sheet 117 SW. Surveyed 1887, revised 1903; reprinted 1913.

Archive Summary

context sheets: 1-27

field sketch drawings

archaeological finds:

pottery

animal bone

roof tiles

environmental sample residues

specialists' reports and archive lists:

pottery

animal bone

roof tiles

environmental sample residues

metal find

clay tobacco pipe stem

correspondence

developer's site plans (annotated)

photographs: colour prints LAS film nos. 97/81/33-36

Appendix 1

Bicker, Land off Drury Lane and Friest Lane [Plot 10] Context Summary

Context No.	Type	Below	Above	Description
1	layer		4, 5, 31, 23, 25	modern topsoil
2	fill	6, 9	8, 10	fill of pit 11
3	fill	4	9, 6	upper fill of pit 11
4	layer	1	3	levelling deposit over pit 11
5	fill	1	19	fill of ditch 19
6	fill	3, 19	2	fill of pit 11
7	finds ref.			unstratified finds from 2 and 3
8	fill	2	12=13	fill of pit 11
9	fill	3	2	fill of pit 11
10	layer	2	11	fill of 11
11	pit	10, 12=13	14	rubbish pit cut into backfilled ditch
12	fill	2	11	primary fill of 11
13	fill	8	11	fill of pit 11
14	fill	11	15	fill of ditch 17
15	fill	14	18	fill of ditch 17
16	layer	17	20	natural; flood deposit
17	ditch	18	16	large west-east ditch
18	fill	15	17	fill of ditch 17
19	ditch	5	6	small east-west boundary ditch
20	layer	16, 26		natural; flood deposit
21	land drain	31	26	
22	post hole	23	26	filled by 23
23	fill	1	22	fill of 22
24	post hole	25	26	filled by 25
25	fill	1	24	fill of 24
26	layer	21; 22; 24	27	mixed subsoil
27	layer	26		silt; natural flood deposit
28				not used
29				not used
30	finds ref			topsoil, NW of garage
31	fill	1	21	fill of 21

POST-ROMAN POTTERY ARCHIVE: BDF97 HORIZON DATING

Context	Earliest horizon	Latest horizon	Probable horizon	Dating
1	PMH6	PMH9	-	17/18th
2	PMH5	PMH8	-	17/18th but ? waste pot could be 16/17th
3	MH3	PMH8	-	12-18th
5	PMH7	PMH9	-	17/18th
7	PMH6	PMH8	-	17/18th but ? waste pot could be 16/17th
8	MH10	PMH4	-	15/16th
9	PMH7	PMH9	-	17/18th

Notes

Much of this pottery appears to be possible waste material. One vessel has glaze over a break and some vessels appear to be over or underfired. Several of the bowls are warped and the fabric of these vessels seems 'brittle'. Several different types of fabric are represented within the grouping, some of which may represent purely domestic rubbish.

Glossary of Fabric Codes

Bl	Blackware: mid 16th - modern
Slip	slipwares: early 17th/20th centuries
Bou	Bourne Fabric D: mid 15th - mid 17th centuries
TB	Toynton All Saints/ Bolingbroke type wares: mid 15th/mid 18th centuries (possibly from kilns beside this site)
Misc	undated wares

Glossary of Dating Codes

MH 3	early medieval; mid-late 12th - early 13th century
MH 10	late medieval; mid-late 15th century
PMH 4	post-medieval; early 17th - mid 17th century
PMH 5	post-medieval; mid-late 17th century
PMH 6	post-medieval; mid-late 17th century
PMH 7	post-medieval; late 17th- early 18th century
PMH 8	late post-medieval; early 18th - mid 18th century
PMH 9	late post-medieval; mid-late 18th century

POST-ROMAN POTTERY ARCHIVE: BDF97 WARE TYPES BY CONTEXT

Context	Ware	Sherds	Form	Comments
1	BL	1	BOWL	RIM;L17/18TH
2	BL	1	DISH;OVAL?	SPOTS GLZE ONLY; VITR PURPLE FABRIC;17TH?
2	BL	1	?	UNGLZE;VITR PURPLE FABRIC;17TH?
2	SLIP	1	?	SOFT PALE PINK/BUFF FABRIC;YELLOW GLZE; SPALLED INT;?GLZE ON BREAK;TRACES OF RED SLIP
2	BOU	1	JAR	TRIANGULAR RIM;HARD FIRED
2	BOU	2	BOWL	BASE;UNDERFIRED INT GLZE; HARD FIRED BODY
2	BOU	2	BOWL	RIM & BS
2	BOU	3	JUG/JAR	BS
2	BOU	1	JUG/JAR	BS
2	BOU	1	JUG	HANDLE
2	TB	1	JAR	RIM;SPL GREEN GLZE;SOOT OVER BREAK
2	TB	1	BOWL	BASE;? SECOND/WASTER;AMBER GLZE
2	TB	3	BOWL	RIM TO BASE;? SECOND/WASTER;GREEN GLZE; WARPED;PART SPALLED INT; STACKING/WASTE SCAR INT
2	TB	4	BOWL	RIM TO BASE;? SECOND/WASTER;GREEN GLZE; WARPED;PART SPALLED INT
2	TB	1	BOWL	BS;AMBER GLZE;PART SPALLED INT; FINE FABRIC AS BOU?
2	TB	1	BOWL	BS;AMBER GLZE
2	TB	3	BOWL	BASE;AMBER/GREEN GLZE;SV CONTEXT 7
2	TB	1	BOWL	RIM;AMBER GLZE;UNDERFIRED
2	TB	1	BOWL	BS;GREEN GLZE;HARD FIRED
2	TB	1	JUG/JAR	BS
2	TB	1	?	SPALLED FRAG
3	MISC	1	JUG/JAR	? DATE;UNGLZD OXID
3	MISC	1	JUG	? DATE;EXT SPL GLZE;SPALLED;EMED/PMED
5	BL	2	BOWL	L17/18TH
5	BL	1	?	L17/18TH
7	BL	1	BOWL?	BASE;17/18TH
7	BL	1	?	FRAG;17TH
7	BL	1	BOWL?	BS;?WARPED;17/18TH
7	BL	1	BOWL	RIM;17/18TH
7	BOU	2	BOWL	BASE & BS
7	BOU	1	BOWL	RIM
7	BOU	1	BOWL	BS
7	BOU	1	BOWL	RIM;BURNT/OVERFIRED
7	BOU	1	BOWL	BASE;GLZE OVER BREAK;HARD FIRED;WARPED?
7	TB	1	?	SPALLED FRAG;AMBER GLZE
7	TB	1	BOWL	RIM;AMBER GLZE
7	TB	1	BOWL?	NO INT GLZE;BS
7	TB	2	BOWL	RIM;SPL GREEN GLZE
7	TB	1	BOWL	BASE;GREEN GLZE
7	TB	1	BOWL	BASE;AMBER/GREEN GLZE;SV CONTEXT 2

7	TB	1	BOWL	BS;THICKENED ? OVERFIRED;GREEN GLZE
7	TB	1	BOWL	BS;GREEN GLZE
7	TB	1	JUG/JAR	BS;SPL GLZE;INT DEP
7	TB	5	JUG/JAR	BASE & BS;ONLY SPOTS GLZE; HIGH FIRED;ODD LIGHT GREY INT SURF
7	TB	1	CISTERN	ROUND BUNG;AS HEALEY 3A; WITH 9 SICK IMPRESS DOTS; SPL GREEN GLZE OVER WHITE SLIP
8	TB	1	BOWL	RIM;15/16TH?
8	TB	1	JUG/CISTERN	BS;15/16TH?
9	BL	1	?	L17/18TH
9	BL	1	BOWL	L17/18TH

BICKER, DRURY LANE/FRIEST LANE: BDF97

240.97

Registered Finds

Context	Finds No	Material	Object	Comments
7	1	IRON	-	D SHAP BUCK?
30	2	CERA	-	PMED;M17-18;DIS

Bulk Materials

Context	Type	Count	Comments
2	FIRE	1	7GMS
2	MSTO	1	BURNT LST
5	MSTO	1	BURNT SST
7	COAL	1	30GMS BURNT
10	FIRE	1	20GMS FRIABLE (DISINT)

TILE ARCHIVE: BDF97 TILE TYPES BY CONTEXT

Context	Form	Frag	Weight	Subform	Comments
2	BRK	1	290	-	CORNER STRAW + MOULD IMPR VITR;LMED;15-16C
2	BRK	1	460	-	CORNER STRAW IMPR VITR;LMED;15-16C
2	BRK	1	365	-	CORNER STRAW IMPR VITR;LMED;15-16C
2	BRK	5	660	-	VITR;LMED;15-16C
3	BRK	3	215	-	VITR;LMED;15-16C
5	BRK	1	15	-	VITR;LMED;15-16C
7	BRK	1	215	-	CORNER MORTAR + MOULD IMPR VITR;LMED;15-16C
7	BRK	1	140	-	CORNER VITR;LMED;15-16C
7	BRK	2	205	-	VITR;LMED;15-16C
7	NIB	2	315	7	SAME TILE MORTAR VITR;PROB LMED
8	BRK	1	1495	-	CORNERX2 MORTAR MOULD IMPR VITR;LMED-PMED;15-17C?
8	BRK	1	185	-	CORNER VITR;LMED;15-16C

Bicker - BDF97**Environmental Archaeology Assessment**

Two soil samples from a pit or ditch, cut 11, and a collection of animal bones were submitted for assessment from a post-medieval (17th century) site at Bicker.

Soil samples collected:

site	cont.	sample volume	feature
BDF97	8	1 15	a lower fill of cut 11
BDF97	2	2 12	an upper fill of cut 11

The samples

Sample volume and weight was measured prior to processing. The samples were washed in a 'Siraf' tank using a flotation sieve with a 0.5mm mesh and an internal wet-sieve of 1mm mesh for the residue. Both residue and float were dried and the dried residue refloated to improve the efficiency of the flot. The dry volume of the flot was measured, and the weight of the residue recorded.

The residue was sorted by eye, and environmental and archaeological finds picked out, noted on the assessment sheet and bagged independently. A magnet was run through each residue in order to recover magnetised material such as hammerscale and prill. The residue was then discarded. The float of each sample was studied under a low power binocular microscope. The presence of environmental finds (ie snails, charcoal, carbonised seeds, bones etc) was noted and their abundance and species diversity recorded on the assessment sheet. The float was then bagged. The float and finds from the sorted residue constitute the material archive of the samples.

The assessment sheets are attached and the results summarised below.

Results

Sample 1, context 8

This sample derives from the secondary fill of cut 11. The fill largely comprised silts with various natural and archaeological inclusions. The residue included two small fragments of fired earth, a little cinder and coal, and a possible fragment of corroded iron.

Environmental finds were abundant. A small amount of animal bone in good condition was recovered and included the femur head of an ox, a few indeterminate mammal bone fragments, some burnt, a mandible of the common shrew, and fragments of vole, amphibian and fish. A number of eggshell fragments, presumably chicken, were also recovered, as were fragments of mussel and cockle shell. The flot included carbonised fragments of pulse (pea or bean), cereal grains and a small amount of very fragmented charcoal. The most abundant environmental remains were naturally deposited and would suggest that the cut is in fact a ditch (rather than a pit). Numerous freshwater and semi-aquatic snails are present including *Bythnia tentaculata*, *Hydrobia ventrosa*, *Hydrobia ulvae* (?), *Lymnaea peregra*, *Lymnaea stagnalis* (?), *Potamopyrgus jenkinsi* (?) and Succinidae. These include species found in brackish water or estuarine conditions, but the presence of *L. peregra* suggests fairly permanent water. The

most common snails are the Succinidae typical of wet habitats such as river banks, fens, reed and sedge beds. The presence of many *Daphnia ephippia* (the water flea), numerous ostracods (freshwater crustaceans) and oospores of *Chara* sp (freshwater algae - stoneworts) is a further indication of an aquatic environment. This fauna and flora suggests a ditch environment and would not be expected at the base of a waterlogged pit. The only terrestrial snail that occurs in any number in the assemblage is *Vallonia pulchella* a species which lives 'at the roots of grass in moist fields and meadows' (Ellis 1969).

Sample 2, context 2

This sample derives from the upper fill of cut 11. The residue after washing is dominated by cinder fragments, both large (up to 2-3cm across) and small fragmented cinder. Coal is common in the sample. A few small fragments of fired earth, with impressions of plant material, occur and some probable iron corrosion flakes.

The archaeological remains are more abundant in these upper fills. A few fragments of animal bone include a pig vertebra, some rib fragments and burnt bone. A mandible of the common vole, fragments of amphibian and fragments of the foot of a probable juvenile rabbit are present, along with vertebrae of eel and herring, the latter burnt. In this fill the latter two finds probably derive from food debris. Bird eggshell is very common and includes quite large pieces of shell. The edible marine shells are represented by tiny fragments of cockle and mussel, and a fragment of tellin is present. The carbonised remains are the most abundant. A large part of the flots is cinder, although some charcoal is present. The finer fraction of the flots is dominated by charred straw and other non-woody plant stems. Charred grain is abundant and a little cereal chaff is also present. Other species identified from the flots include bean, probable pea, grasses, walnut, grape and numerous other seeds which have not been identified. The remains of pulses are common and at least two types of bean occur. A few waterlogged seeds of elder were present.

All this material appears to derive from domestic fires, largely fuelled by coal but also with a little wood and quite considerable amounts of straw. The latter may have been used either as a firelighting fuel or possibly in baking ovens since it burns hotly and rapidly.

Shells of ostracods and Succinidae are still present in the fill, although in much reduced numbers, as are a few shells of the terrestrial snail *Vallonia pulchella*.

The animal bones

Twenty five bones, mainly from the upper fill of cut 11, were collected during the evaluation. These include bones of cattle, horse, sheep, dog and cat (see Archive catalogue). Little can be said about such a small group but the five sheep mandibles indicate slaughter of these animals at two different ages. Three of the mandibles derive from old animals, fully adult, probably at the end of their useful life. These individuals may have been breeding ewes or animals maintained for their fleeces. The other two individuals were killed before the eruption of their third molar, at perhaps the end of their second summer or in their second winter, up to about two years of age. This is an age appropriate for the slaughter of animals being kept for the meat market and indicates both meat and wool economies within the sheep flocks.

Summary

There are indications in the natural fauna and flora in context 8 that the cut is that of a ditch with standing or flowing, probably brackish, water rather than a pit. The early fills suggest a wet meadow grassland habitat around the ditch with some input of debris from nearby occupation. By the time context 2 is being deposited the feature no longer has an aquatic character, although the Succinidae present suggest that the area is still damp. The input of occupation debris is much greater and the ditch appears to have become the primary disposal point for ash and waste from a coal fired hearth. This waste includes large quantities of charred cereal grains, much straw debris, some chaff and numerous other charred seeds. Many of the cereals are small and misshapen and this may indicate waste from crop processing being used as a fuel, but to categorise this botanical assemblage accurately it would need to be studied in greater detail.

Food items include cattle, sheep, pig, eel and herring bones, cockle and mussel shells, grain, beans (of at least two types), probable pea, grape and walnut. Further identification of the charred plant remains may reveal other food plants.

Acknowledgments

I should like to thank Alison Foster who processed and sorted the soil samples.

Bibliography

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APPENDIX 1

ARCHIVE CATALOGUE OF ANIMAL BONE FROM

BICKER - BDF97

LCCM

D. James Rackham
The Environmental Archaeology Consultancy

Key to codes used in the cataloguing of animal bones

SPECIES		BONE		SIDE	FUSION
BOS	cattle	SKL	skull	W - whole	Records the fused/unfused condition of the epiphyses
CSZ	cattle size	TEMP	temporal	L - left side	P - proximal; D - distal; E - acetabulum;
SUS	pig	FRNT	frontal	R - right side	N - unfused; F - fused; C - cranial; A - posterior
OVCA	sheep or goat	PET	petrous	F - fragment	
OVI	sheep	PAR	parietal	TOOTH WEAR - Codes are those used in Grant, A. 1982 <i>The use of tooth wear as a guide to the age of domestic animals</i> , in B.Wilson, C.Grigson and S.Payne (eds) <i>Ageing and sexing animal bones from Archaeological sites</i> , 91-108.	
SSZ	sheep size	OCIP	occipital	Teeth are labelled as follows in the tooth wear column:	
EQU	horse	ZYG	zygomatic	h 1dpm4/dupm4	f 1dpm2/dupm2
CER	red deer	MAN	mandible	H 1pm4/upm4	g 1dpm3/dupm3
CAN	dog	MAX	maxilla	I 1m1/um1	
MAN	human	ATL	atlas	J 1m2/um2	
UNI	unknown	AXI	axis	K 1m3/um3	
CHIK	chicken	CEV	cervical vertebra	ZONES - zones record the part of the bone present. The key to each zone on each bone is on page 2	
GOOS	goose, dom	TRV	thoracic vertebra	MEASUREMENTS - Any measurements are those listed in A.Von den Driesch (1976) <i>A Guide to the Measurement of Animal Bones from Archaeological Sites</i> , Peabody Museum Bulletin 1, Peabody Museum, Harvard, USA	
LEP	hare	LMV	lumbar vertebra		
UNB	indet bird	SAC	sacrum		
MALL	duck, dom.	CDV	caudal vertebra		
GULL	gull sp.	SCP	scapula		
FISH	fish	HUM	humerus		
UNIB	bird indet	RAD	radius		
UNIF	fish indet	MTC	metacarpus		
GSZE	goose size	MC1-4	metacarpus 1-4		
BEAV	beaver	INN	innominate		
CORV	crow or rook	ILM	ilium		
BUZZ	buzzard	PUB	pubis		
		ISH	ischium		
		FEM	femur		
		TIB	tibia		
		AST	astragalus		
		CAL	calcaneum		
		MTT	metatarsus		
		MT1-4	metatarsus 1-4		
		PH1	1st phalanx		
		PH2	2nd phalanx		
		PH3	3rd phalanx		
		LM1-LM3	Lower molar 1 - molar 3		
		UM1-UM3	upper molar 1 - molar 3		
		LPM1-LPM4	lower premolar 1-4		
		UPM1-UPM4	upper premolar 1-4		
		DLPM1-4	deciduous lower premolar 1-4		
		DUPM1-4	deciduous upper premolar 1-4		
		MNT	mandibular tooth		
		MXT	maxillary tooth		
		LBF	long bone		
		UNI	unidentified		
		STN	sternum		
		INC	incisor		
		TTH	indet. tooth		
		CMP	carpo-metacarpus		

ZONES - codes used to define zones on each bone

SKULL -	1. paraoccipital process 2. occipal condyle 3. intercornual protuberance 4. external acoustic meatus 5. frontal sinus 6. ectorbitale 7. entorbitale 8. temporal articular facet 9. facial tuber 0. infraorbital foramen	METACARPUS -	1. medial facet of proximal artciulation, MC3 2. lateral facet of proximal articulation, MC4 3. medial distal condyle, MC3 4. lateral distal condyle, MC4 5. anterior distal groove and foramen 6. medial or lateral distal condyle
MANDIBLE	1. Symphyseal surface 2. diastema 3. lateral diastemal foramen 4. coronoid process 5. condylar process 6. angle 7. anterior dorsal ascending ramus posterior M3 8. mandibular foramen	FIRST PHALANX	1. proximal epiphysis 2. distal articular facet
VERTEBRA	1. spine 2. anterior epiphysis 3. posterior epiphysis 4. centrum 5. neural arch	INNOMINATE	1. tuber coxae 2. tuber sacrale + scar 3. body of illium with dorso-medial foramen 4. iliopubic eminence 5. acetabular fossa 6. symphyseal branch of pubis 7. body of ischium 8. ischial tuberosity 9. depression for medial tendon of rectus femoris
SCAPULA	1. supraglenoid tubercle 2. glenoid cavity 3. origin of the distal spine 4. tuber of spine 5. posterior of neck with foramen 6. cranial angle of blade 7. caudal angle of blade	FEMUR	1. head 2. trochanter major 3. trochanter minor 4. supracondyloid fossa 5. distal medial condyle 6. lateral distal condyle 7. distal trochlea 8. trochanter tertius
HUMERUS	1. head 2. greater tubercle 3. lesser tubercle 4. intertuberal groove 5. deltoid tuberosity 6. dorsal angle of olecranon fossa 7. capitulum 8. trochlea	TIBIA	1. proximal medial condyle 2. proximal lateral condyle 3. intercondylar eminence 4. proximal posterior nutrient foramen 5. medial malleolus 6. lateral aspect of distal articulation 7. distal pre-epiphyseal portion of the diaphysis
RADIUS	1. medial half of proximal epiphysis 2. lateral half of proximal epiphysis 3. posterior proximal ulna scar and foramen 4. medial half of distal epiphysis 5. lateral half of distal epiphysis 6. distal shaft immediately above distal epiphysis	CALCANEUM	1. calcaneal tuber 2. sustentaculum tali 3. processus anterior
ULNA	1. olecranon tuberosity 2. trochlear notch- semilunaris 3. lateral coronoid process 4. distal epiphysis	METATARSUS	1. medial facet of proximal artciulation, MT3. 2. lateral facet of proximal articulation, MT4 3. medial distal condyle, MT3 4. lateral distal condyle, MT4 5. anterior distal groove and foramen 6. medial or lateral distal condyle

Appendix 5

Excavation Matrix for Plot 10

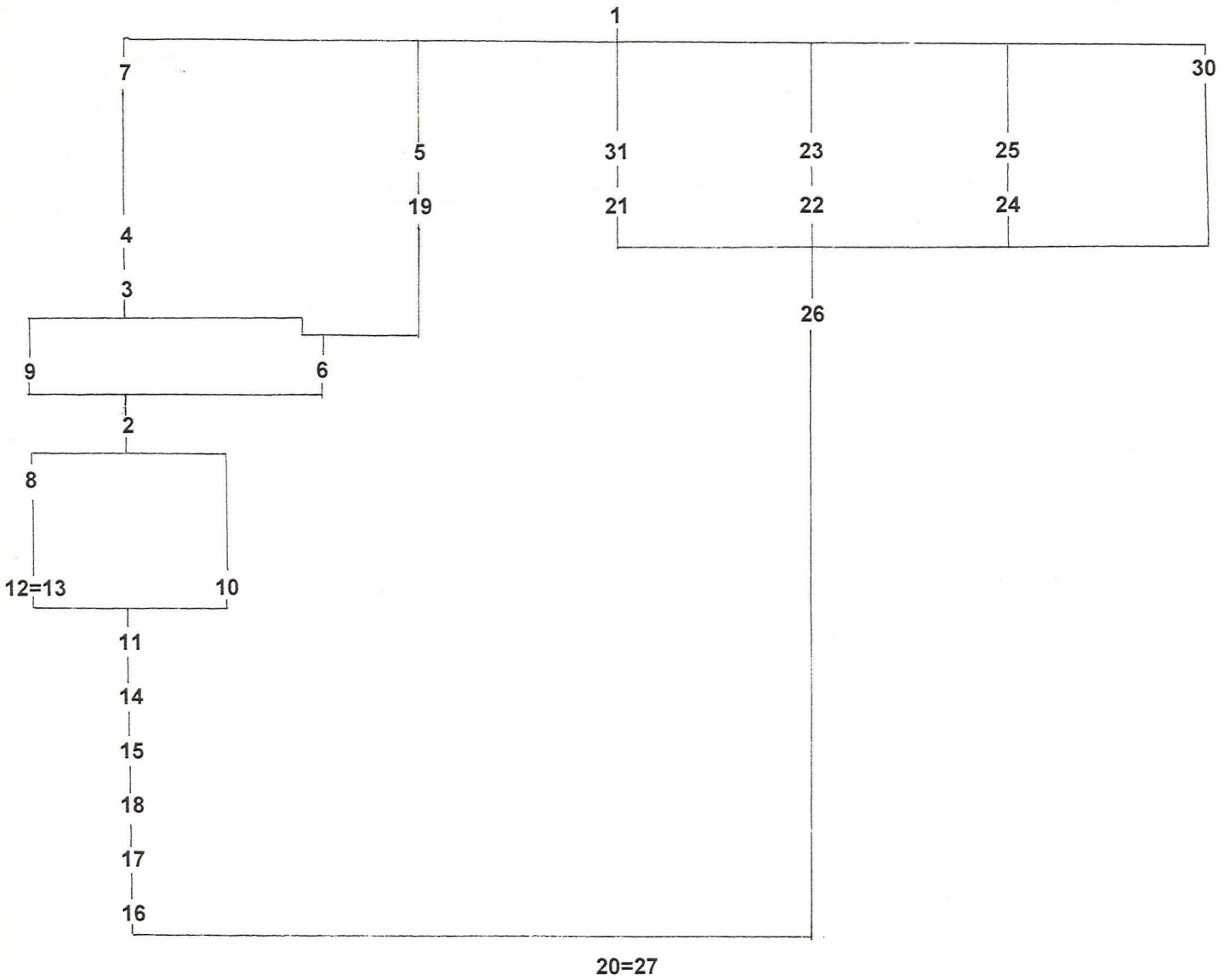


Fig. 1 Location of buried objects on the 1000 sq. meter matrix (200m x 5m) at 77-21. The matrix is divided into 1000 sq. meter cells (20m x 5m) and the positions of the buried objects are indicated by the numbers 1-31.

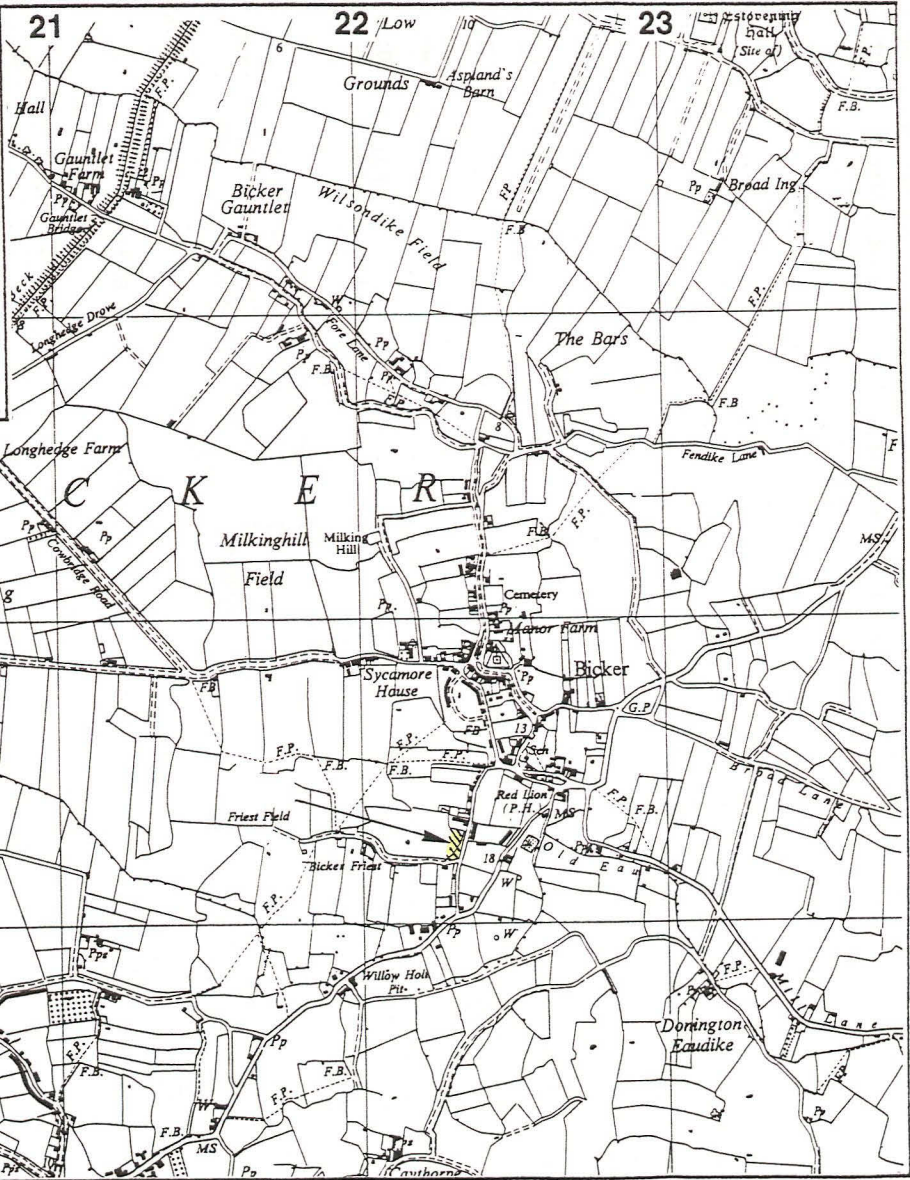
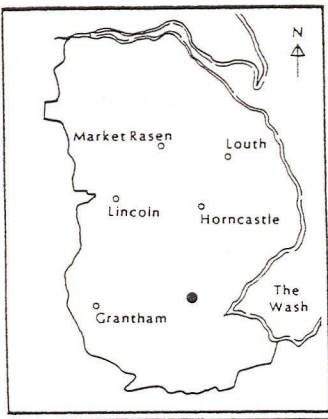
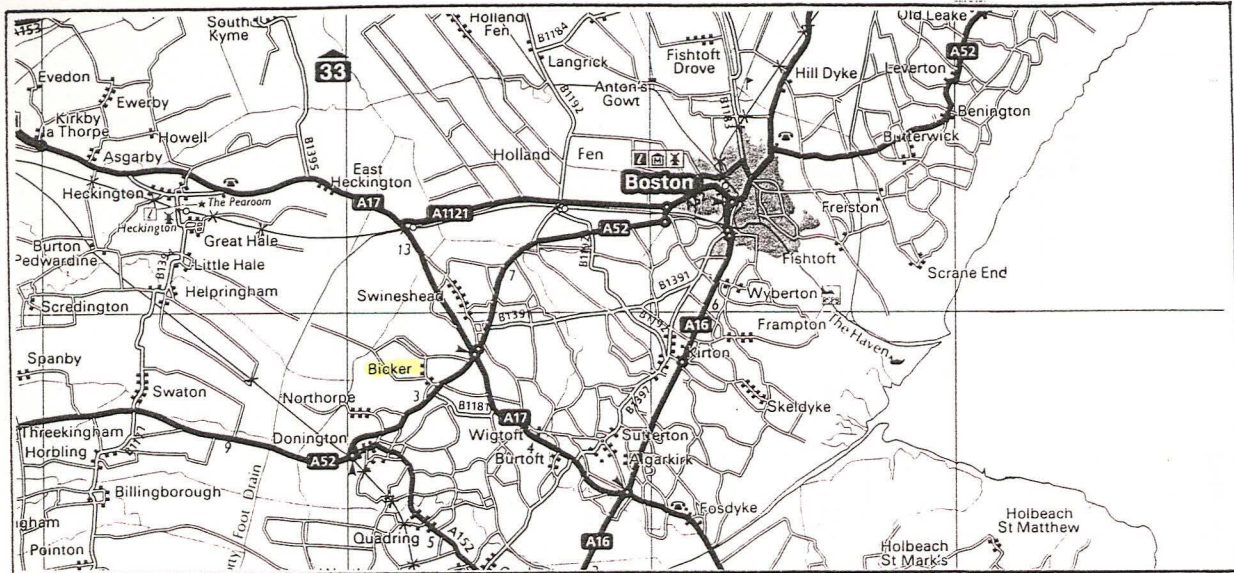


Fig. 1 Location of Bicker (based on the 1955 Ordnance Survey 1:25,000 map Sheet TF 23. © Crown Copyright, reproduced with the permission of the Controller of HMSO. LAS Licence No. AL 50424A).

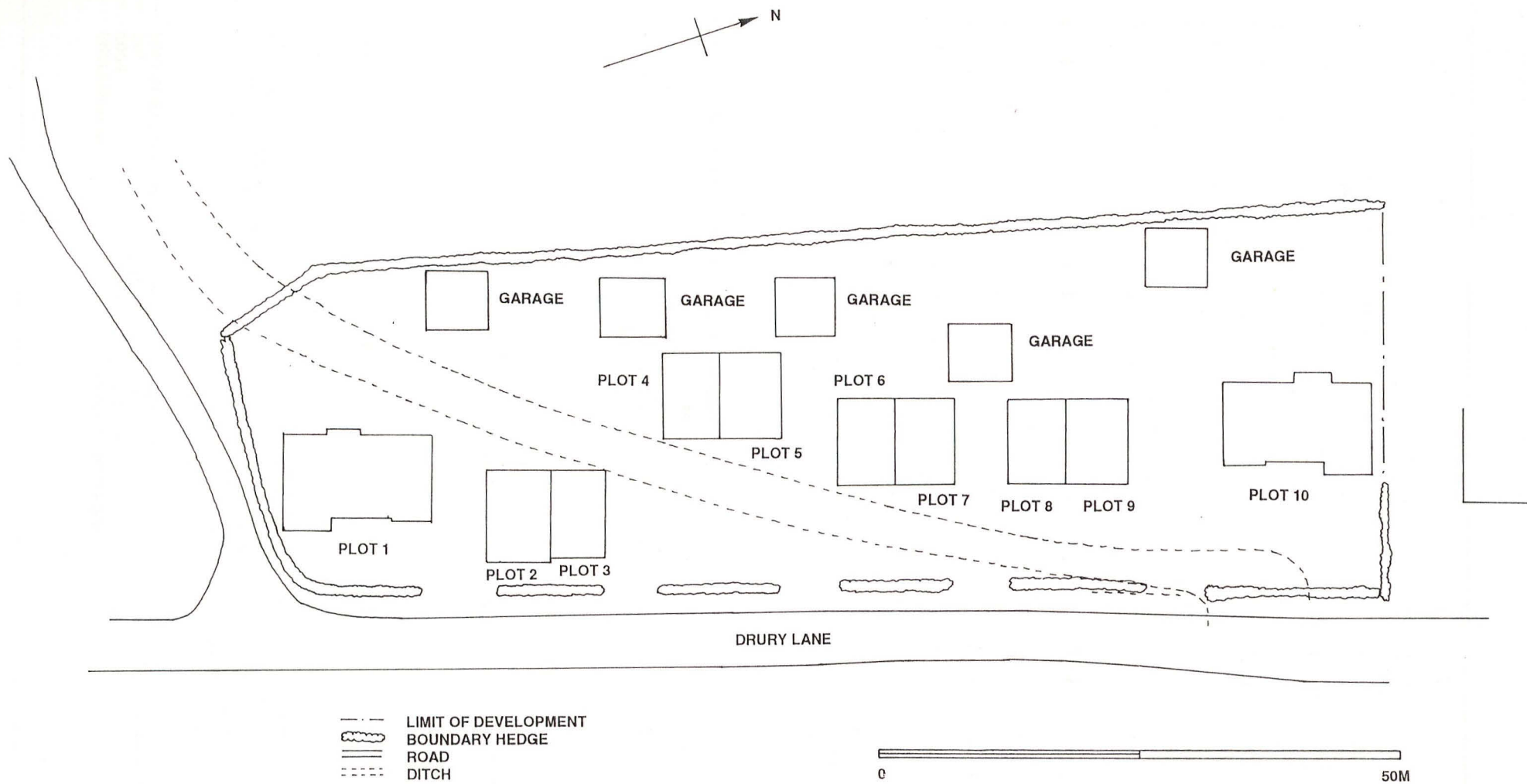
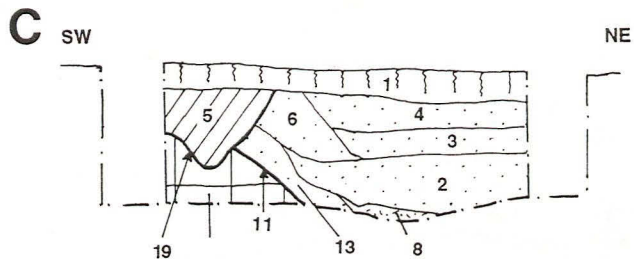
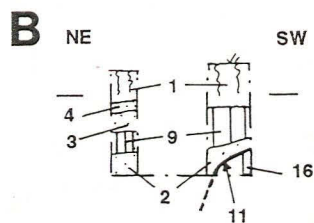
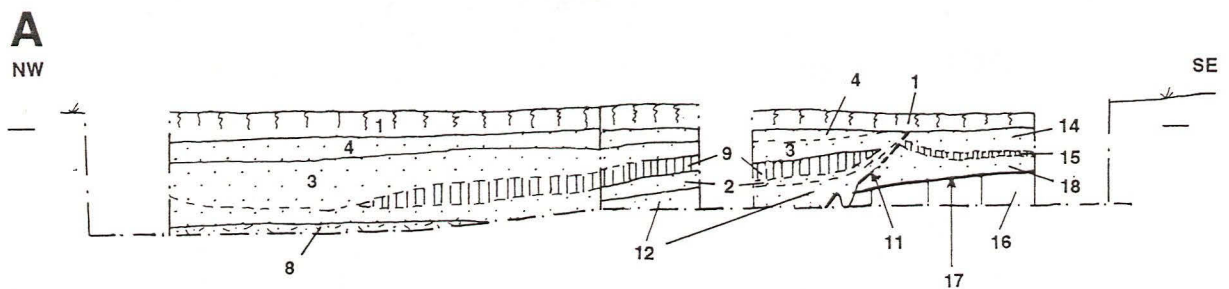
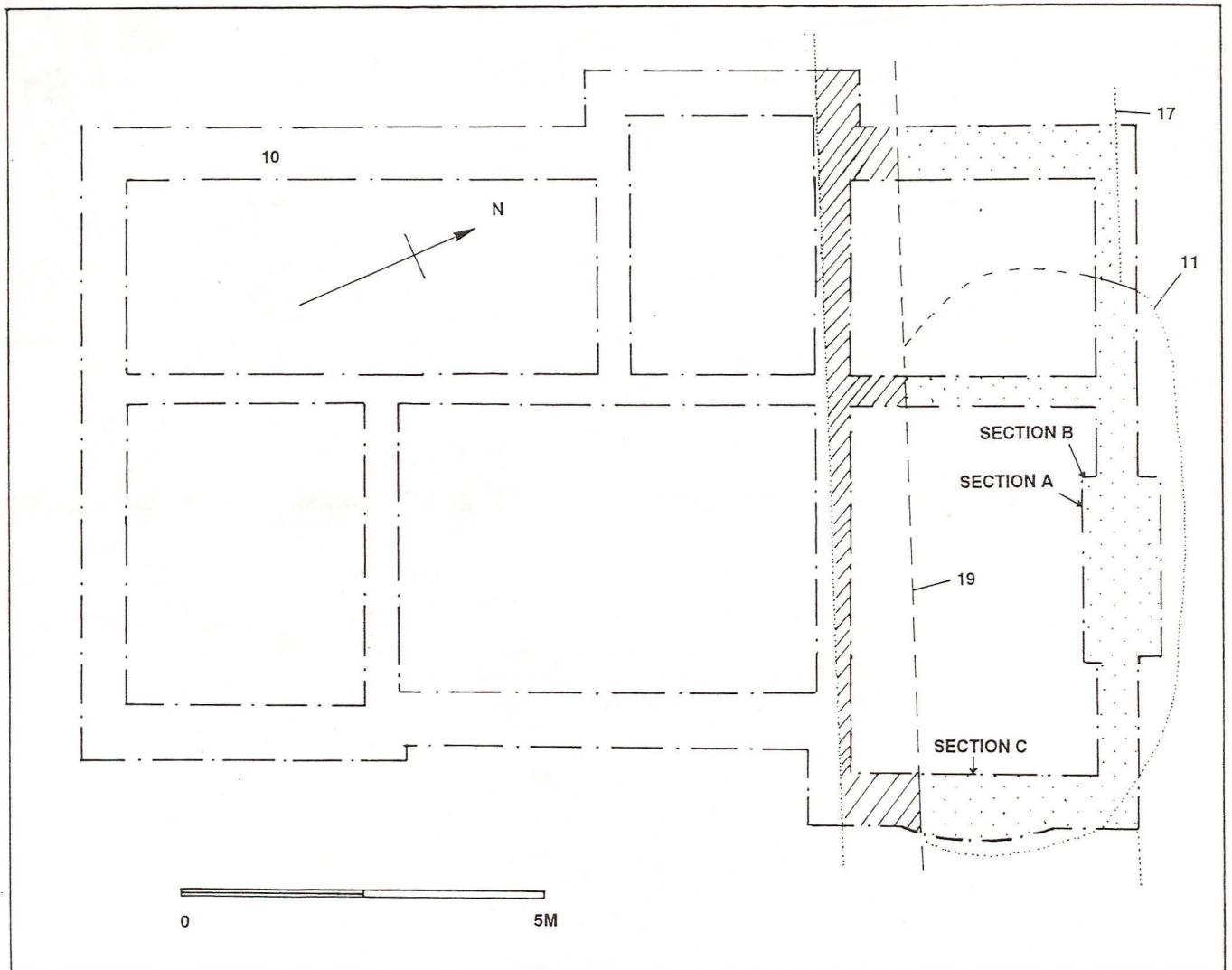


Fig. 2 Position of the monitored development, Plot 10 (McDaid, based on Site Layout plan produced by Clive Wicks Associates, dwg. no. 94 563/01G).



- | | | | | | |
|-----|---------------------|---|---------|-----|------------------|
| --- | LIMIT OF EXCAVATION | ▨ | TOPSOIL | ▧ | SILT CLAY |
| — | CUT | ▩ | SILT | ▨ | ASH |
| — | EDGE | ▧ | LOAM | | NATURAL |
| --- | UNCLEAR EDGE | ▩ | | --- | CONJECTURED EDGE |
- 0 3m

Fig. 3 Plan and sections of archaeological features (McDaid after Tann).



Fig. 4 Extract from a Plan of the Parish of Bicker 1839 (LAO Smith 9/1/8).



Fig. 5 Extract from the 1906 Second Edition Ordnance Survey 1:10,560 map Sheet Lincs. 117SW (revised 1903). Reproduced at enlarged scale.



Pl. 1 Southern part of the development site, at the junction of Drury Lane (left) and Friest Lane (looking SW). The break in the roadside hedge (top right) marks a backfilled ditch which crossed the site until recently.

Pl. 2 Northern wall of the bungalow, Plot 10, during construction. The kiln waster material was found in the foundation trench at the NE corner, and Ditch 17 coincided with the northern wall trench. Looking west.





Pl. 3 Location of the garage to west of Plot 10 (looking NE).

Pl. 4 Flood silts visible in the garage foundation trench (looking SW; trench depth 0.7m).

