

# Early Medieval Industry East of the "Sea Bank" Waterlees Road, Wisbech



## Archaeological Excavation Report



November 2014

**Client: Children and Young Peoples  
Services, Cambridgeshire County  
Council**

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## **Early Medieval Industry East of the “Sea Bank”, Waterlees Road, Wisbech**

*Archaeological Evaluation and Excavation*

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## Summary

*In late February 2010, Oxford Archaeology East conducted an archaeological evaluation comprising five trenches in an open area playing field on Waterlees Road, Wisbech. The investigation consisted of five trenches, 200m in total length, within the proposed development area which was to include the construction of a children's adventure playground. Significant remains were encountered which warranted further investigation. This was undertaken almost straight away during March 2010 when two open areas were investigated.*

*The site is bound on the western side by a bank (NHER No. 2187) which continues along the route of Waterlees Road towards the north. Although not precisely dated, the bank is known locally and on maps as "Roman Bank" or "Sea Bank" and was most likely constructed to act as a sea defence in the late Saxon and medieval periods. Further along Waterlees Road the bank survives to a greater height, almost 2m in places, and it is likely that it originally spanned the area now under Waterlees Road.*

*Investigation of the Sea Bank revealed the edge of what may be the original ditch, although its full extent was not reached as the ditch is believed to continue beneath Waterlees Road. Pottery recovered supports a construction date of the mid 11th - late 12th century for the first cut of the ditch. Remnants of the original bank were investigated, comprising several layers of silts thought to have been extracted from the associated ditch as well as possibly imported from elsewhere. The ditch was later backfilled incorporating contemporary 12th-14th century pottery from the immediate area.*

*In a trench running parallel to the road, two pits and a ditch were recorded providing evidence of 11th-12th century activity and at the far eastern end of the site pits and evidence of industrial activity and a possible kiln were recorded, all dating to the 11th to 12th centuries. These two areas of the site were targeted for investigation, revealing two phases of early medieval activity and a later medieval phase concentrated in the excavation area at the eastern side of the site. The archaeology mostly comprised pits which contained evidence of metal-working thought to be taking place either on or close to the edge of the site.*

## 1 INTRODUCTION

### 1.1 Location and scope of work

- 1.1.1 An archaeological excavation was conducted at an open area known locally as “The Spinney” on Waterlees Road in Wisbech (Figure 1). The site is located within the northern bounds of Wisbech, overlaying Tidal Flat deposits. The site lies on the east side of Waterlees Road and was once within the parish of Walsoken within the county boundary of Norfolk. Since the expansion of Wisbech Town within the last hundred years, the area now lies within the suburbs of Wisbech.
- 1.1.2 This archaeological excavation was undertaken in accordance with a Brief issued by Dan McConnell of Cambridgeshire County Council (CCC; Planning Application F/YR09/2015/CCC). A brief for the evaluation (Fletcher 2010b) was submitted and approved by CAPCA, as the evaluation led straight into excavation an additional brief for excavation was not issued.
- 1.1.3 The work was designed to assist in defining the character and extent of any archaeological remains within the proposed redevelopment area, in accordance with the guidelines set out in *Planning and Policy Guidance 16 - Archaeology and Planning* (Department of the Environment 1990).
- 1.1.4 The site archive is currently held by OA East and will be deposited with the appropriate county stores in due course.

### 1.2 Geology and topography

- 1.2.1 The underlying geology is Terrington Beds; younger saltmarsh and tidal creek deposits (silty clay and sandy silt) which overlie Amphill Clay (BGS: Wisbech, Solid and Drift Edition, 1: 50 000 Series, 1995).
- 1.2.2 The main site lay at around 3.2m OD, with the bank at 4.2m OD at its highest point. An earthwork survey was carried out in addition to the required work (Figure 2) which provides a record of the bank prior to the archaeological intervention.

### 1.3 Archaeological and historical background

- 1.3.1 Although now within the town boundary of Wisbech, Cambridgeshire, the site used to lie within the Norfolk parish of Walsoken. Therefore, much of the historical background and archaeological information comes from Norfolk Historic Environment Record ([www.heritage.norfolk.gov.uk](http://www.heritage.norfolk.gov.uk)).
- 1.3.2 The parish of Walsoken is situated in the west of Norfolk on the border with Cambridgeshire. It lies south of West Walton, north of Emneth and west of Marshland St James. The name Walsoken may derive from the Old English meaning ‘the district under particular jurisdiction by the wall’. The parish has a long history and was established by the time of the Norman Conquest. Its population, land ownership and productive resources were detailed in the Domesday Book of 1086. This document revealed that the parish was held by the Benedictine Order based at Ramsey Abbey and possessed a fishery. Today Walsoken is a suburb of Wisbech and much of its historic core is lost under modern housing ([www.heritagegateway.org.uk](http://www.heritagegateway.org.uk)).



### ***The Bank***

- 1.3.3 A search of the Cambridgeshire and Norfolk Historic Environment records has revealed no entries within close proximity of the site (other than the bank itself). In the parishes of Walsoken and East and West Walton (Norfolk), extensive fieldwalking scatters of Roman, Middle Saxon and later date have been recorded on the silt islands and roddens ([www.heritagegateway.org.uk](http://www.heritagegateway.org.uk)).
- 1.3.4 A number of finds dating from the Roman to the post-Medieval period have been recorded as coming from the bank, these include a Roman buckle, coin and a ring, Saxon pottery and medieval pottery and brick ([www.heritage.norfolk.gov.uk](http://www.heritage.norfolk.gov.uk)).
- 1.3.5 The Norfolk Heritage and Environmental record description for the entire bank is as follows;

“A probable Late Saxon and medieval earthen bank built for sea defence and maybe more, is visible as an earthwork and a cropmark on 1946 RAF aerial photographs” ([www.heritage.norfolk.gov.uk](http://www.heritage.norfolk.gov.uk))

“It is presumed that the mapped feature represents the course of the bank, but it may have undergone substantial alteration since its original construction. There are several areas where the feature recorded as NHER 2187 may in fact be pre-dated by an earlier bank feature. The course of the bank that runs along the Clenchwarton/King’s Lynn parish boundary now lies under a road, which may have been partially raised when the road was constructed.”

“The bank enters map square TF62SW at TF 6000 2272, from where it runs due eastwards to the edge of the Great Ouse Lynn Channel (NHER 13532), constructed in the first half of the 19th century. A section has presumably been truncated by the channel. The bank then runs due southwards in a slightly irregular line, and exits the map square at TF 6027 2000. This stretch of bank forms the parish boundary between Clenchwarton and King’s Lynn. There are drains running down each side of the bank although, it is not certain whether these are original ditches or more modern features. There is a length of ditch on the eastern side of the bank running from TF 6014 2171 to TF 6016 2197, which is substantially wider than the drains, and is more likely to be a ditch associated with the bank’s construction. The bank appears to post-date and incorporate saltern mounds NHER 27946 at TF 6013 2155. The course of the bank then turns to the west and enters map square TF 52 SE at TF 6000 2271 (S7). The bank runs approximately south-westwards on an irregular, meandering (almost higgledy-piggledy) course for a length of approximately 3.25 km (S8), before turning to the west at TF 5740 2096. There are intermittent ditches on both the northern and southern sides of this length of the bank, although it is unclear whether they are on the line of original features or simply later drains. The southern section of this stretch operates as the parish boundary between Clenchwarton and Terrington St Clement.”

“The bank is visible as an approximately east to west aligned earthwork in 1946 (S4) running from TF 5740 2096 to TF 5661 2103. This once well preserved stretch has a meandering appearance with two northern protrusions or bulges in the course of the feature, which are the alleged sites of former breaches in the bank (S6). This stretch of the bank is now ploughed flat.”

“There is an approximately 800m break in the discernible line of the bank within the

area of Little London. It is almost certain that the bank was present within this area, or there would be an obvious flood risk to the unprotected area, although no trace of the bank is now visible. It is probable that the line of the bank ran to the north of rather than under the road known as Northgate Way.”

“The probable course of the bank is again visible as a (probably truncated) earthwork for a length of 215m from TF 5581 2111 to 5563 2123, before it appears as a distinctive light coloured cropmark from TF 5549 2126 TF 5519 2137 (S4). This levelled stretch was recorded as an earthwork at the turn of the last century (S5). From this point westwards the bank is again situated beneath a road (New Roman Bank). “

### ***Roman***

- 1.3.6 Archaeological evidence has found that much of the land of Walsoken of pre-Roman occupation was completely submerged beneath the Iron Age silts. As such, very little early prehistoric archaeology has been recorded. It is thought that some dry land existed within the parish in the Bronze Age as several artefacts from that time period were uncovered in the 19th century. There has been a lot more archaeological evidence found to attest to Roman occupation in the parish, including a dispersed hoard of 300 to 400 Roman coins which were found via metal detecting in the 1980s.

### ***Norman***

- 1.3.7 Walsoken was established by the time of the Norman Conquest. The village's population, land ownership and productive resources were detailed in its entry in the Domesday Book of 1085. Walsoken is recorded by the name Walsocam. The parish was held by the Benedictine Order based at Ramsey Abbey before and after 1066. the survey also records the presence of a fishery.

### ***Medieval***

- 1.3.8 The estuary of the River Nene through the town to the Wash has always been prone to flooding, and in response to apparent rising water levels in the 8th - 10th centuries large banks were constructed on either side of the estuary in an attempt to limit the problem. The banks were most likely heavily altered and re-landscaped over the ensuing centuries and it is known that flooding on several occasions devastated Wisbech. It is more than likely that such inundations caused the banks to be altered. The banks finally fell out of use in the later medieval period (16th century onwards) when increased levels of drainage works reduced the threat of flooding to the town and its environs. The town's flood defences became more dependent on better management of the watercourses than on large banks, so the latter lost their purpose. It is known that the Crab Marsh Bank (on the same side as Waterlees Road) was dug into during the 16th century and the material used to raise the level of the Market Place. This type of reuse is perhaps part of the reason why little of the banks remain.
- 1.3.9 Metal detecting has retrieved a number of medieval artefacts. The most interesting of these comprise a dagger quillon (NHER 32615), seal matrix (NHER 19064) and a lead ampulla (NHER 19057). Other less significant finds comprise a belt mount (NHER 29836), buckles (NHER 28269), cauldron fragments (NHER 28268 and 19629), coins (NHER 29026 and 28267) and a brooch (NHER 19047).

### ***Post-Medieval***

- 1.3.10 The post medieval period is more sparsely represented in Walsoken. Austin House (NHER 47122), on the Burrett Gate Road, is the only listed building on record. This house dates to 1841 and has a gault brick facade and a slate roof. However, the interior

has been renewed and is largely 20th century in date. Walsoken did have an operational brick and tile works during the post medieval period. This works was notable for its two 'Newcastle' kilns, the only examples to be recorded in Norfolk. The only other post medieval site to be found was identified by a field-walking survey. Remnants of building rubble from a post medieval building (NHER 19079) were recorded to the northwest of Leigh House, on Station Road.

- 1.3.11 Metal detecting and field-walking have found several post medieval small finds. These comprise everyday objects like a key (NHER 18924), a stud (NHER 18923), a coin weight (NHER 19047) and a finger ring (NHER 18926). Of course numerous pottery sherds (e.g. NHER 18938 and 19047) and a couple of coins (NHER 32615) have also been discovered at various locations in Walsoken.

## **1.4 Acknowledgements**

- 1.4.1 The author would like to thank Jane Leet of the Children's and Young Peoples Services who commissioned and funded the archaeological work on behalf of Cambridgeshire County Council. The project was managed by Richard Mortimer, the site was excavated by the author, assisted by James Fairbairn, David Brown, Louise Bush, Chris Faine and volunteers Andy Wood, Liz Jones and Colleen Seward. The author carried out all on site survey including earthwork survey. Dan McConnell of Cambridgeshire's Historic Environment Team wrote the brief and monitored the investigations.

## 2 AIMS AND METHODOLOGY

### 2.1 Aims

- 2.1.1 The objective of this excavation was to preserve by record the location, nature, extent, date, quality, condition and significance of any surviving archaeological deposits within the development area.

### 2.2 Methodology

- 2.2.1 Machine excavation was carried out under constant archaeological supervision with a tracked 360° excavator excavator using a toothless ditching bucket.
- 2.2.2 Before work could commence the trenches were set out in specific locations as agreed with the client and CAPCA before work commenced. Following completion of the evaluation the location of the excavation areas was determined in discussion with Dan McConnell of CAPCA.
- 2.2.3 The site survey was carried out by the author using a Leica 1200 GPS which was located on the Ordnance Survey grid. This was also used to carry out the earthwork survey and to provide level data for sections and base plans. Drawn plans were incorporated with the survey data to accurately plot the position of the trenches and features.
- 2.2.4 Spoil, exposed surfaces and features were scanned with a metal detector. All metal-detected and hand-collected finds were retained for inspection, other than those which were obviously modern.
- 2.2.5 All archaeological features and deposits were recorded using OA East's *pro-forma* sheets. Trench locations, plans and sections were recorded at appropriate scales and colour and monochrome photographs were taken of all relevant features and deposits.
- 2.2.6 Environmental samples were taken from a representative number of features. In total 44 samples were taken for analysis from the evaluation and excavation phases of the site. The results are presented in Appendix C2.
- 2.2.7 Weather conditions were good, with sunshine and occasional rain. Excavation was hampered by the high water table encountered in all trenches.

## 3 RESULTS

### 3.1 Introduction

3.1.1 The results will be presented in the following sections, by phase. Cut numbers are displayed in bold text, all other context in normal text. The location of all trenches and areas can be seen in Figures 1 and 3 and phase plans in Figures 8 to 10. Selected sections are shown in Figures 6 and 7.

### 3.2 The Excavation Areas

3.2.1 Following the evaluation, further investigation of the “sea bank” was required, and a hand excavated trench was dug through it in order to accurately locate pottery or other dating evidence from the layers which make up the bank and any other associated ditches or other features. This is referred to as “Area A”.

3.2.2 Area B measured approximately 35m by 21m and was located on the eastern side of The Spinney (Figure 1). The location of this area was determined by the features recorded in the eastern end of Trench 4. Four phases of activity were recorded within this area, the results are presented in the following sections.

3.2.3 Area C measured approximately 58m by 35m (at its widest point) and was located close to the Waterlees Road side of The Spinney (Figure 1). Its location was chosen in order to target the features recorded in Trenches 3 and 5 of the evaluation. Four phases of activity were recorded within this area; the results are presented in the following sections.

### 3.3 Phase 1: c. 1050-1150

3.3.1 Activity from this phase is represented by the “Sea Bank” (Area A) and the corner of an enclosure ditch in excavation Area C which is thought to continue into Area B, where a single sherd of early medieval pottery was recovered (Figure 8).

3.3.2 The “Sea Bank” was investigated within a single trench (Area A). The trench was hand excavated and several silty deposits thought to represent flood sequences as well as some back-filling of the original ditch was recorded. The base of the ditch was not reached. A second cut, thought to be a result of landscaping to create Waterlees Road was also recorded on the Spinney side of the ditch. This was sealed by subsoil (52).

- Sea Bank Ditch **68** was not fully revealed in plan and was recorded mostly from the section (Figure 6, Section 7). This is considered to be the remnant of the original cut of the defensive Sea Bank. It was north-south orientated and measured 1.18m wide, continuing beyond the western edge of the trench and 0.80m deep (minimum). It had very steep sloping edges and the base was not reached. It contained five fills. The lowest recorded fill, 66 (equal to 67) was a moderately compacted dark brownish grey clayey silt with occasional charcoal flecks. This deposit contained ten sherds of pottery providing a context date of the mid 11th-end of the 12th century. A soil sample was taken (Sample numbers 16 and 17) which contained charred and water-logged cereal and wheat seeds as well as molluscs, eggshell, mussel shell and burnt bone. The next fill, 65 was a moderately compact, orangey brown sandy silt with a maximum thickness of 0.08m and no obvious finds or inclusions. Fill 64 was a moderately compact, mid brown clayey silt with a maximum thickness of 0.48m. Six sherds of pottery were recovered providing an overall context date of mid 12th to mid 14th century. Upper fill 63 (equal to 60) was a moderately compacted dark grey sandy silt with occasional charcoal flecks with a maximum thickness of 0.13m. Three sherds of pottery were recovered providing a context date of mid 12th-mid 14th century.

- Bank Layer 59 was directly above the in-filled Sea Bank ditch (Figure 6, Section 7). It was thicker on the west side, the side of the original bank, and became thinner towards the east, indicating it may be a part of the original bank which has shifted or been pushed across once the ditch was out of use. It was a moderately compact, mid greyish brown sandy silt with occasional charcoal flecks and a maximum thickness of 0.34m. Six sherds of pottery were recovered providing a context date of mid 11th-end of the 12th century.
- Bank Layer 58 was a mixed yellowish and brown sandy deposit with rare charcoal flecks and a maximum thickness of 0.42m. Like layer 59, it slumped downwards towards the east indicating it may have been part of the bank to the west. Eleven sherds of pottery were recovered with an overall context date of mid 11th-12th century.
- Bank Layer 57 was a moderately compacted, mid yellowish brown sandy silt with a maximum thickness of 0.26m. A single sherd of St Neots Ware dated to the mid 9th-mid 12th century was recovered from this deposit.
- Bank layer 56 was a moderately compact mid grey sandy silt with a maximum thickness of 0.04m, however the full thickness of this layer was not revealed in this trench. Two sherds of pottery were recovered providing a context date of mid 13th-mid 14th century.
- Bank Layer 55 was a loose, greyish brown sandy silt with a maximum thickness of 0.78m. Two sherds of pottery were recovered which date to the mid 9th to mid 12th century.
- Bank Layer 54 was a moderately compact yellowish brown sandy silt with a maximum thickness of 0.22m. A single sherd from a Stamford Ware jar was recovered which dates to the mid 9th-mid 12th century.
- Bank layer 53 was a loose mid reddish brown sandy silt with a maximum thickness of 0.12m. No artefacts or ecofacts were recovered from this deposit.
- Pit / Ditch **51** was investigated in the eastern side of the trench and was recorded cutting through the silty bank deposits. This may have been the ditch located on the eastern side of the bank as noted in the NHER description. As it was only recorded in section, it is impossible to interpret very much more about this ditch. It measured at least 2.95m wide and 0.84m deep with moderately sloping edges and a flat base (Figure 6, Section 7). This ditch contained two fills. Fill 50 was a loose, light greyish brown sandy silt with a maximum thickness of 0.40m. There were no artefacts or ecofacts recovered from this fill. Upper fill 49 was a loose, light reddish brown sandy silt with a maximum thickness of 0.39m. A single sherd of mid 11th-mid 12th century pottery and an iron nail with flat round or oval head (SF 7).

3.3.3 In Area C, a narrow enclosure ditch measured approximately 21m on a north-south orientation before turning at a 90° angle towards the east where it continued for a further 17m before reaching the edge of the excavation area. Although no dating evidence was recovered from any of the slots in this feature or in the environmental samples taken, it was truncated by a ditch (**134**) securely dated to 1150-1350. In Area B, a similar ditch, on roughly the same alignment, measured 17.25m in length, continuing beyond the western limit of the excavation area. It turned at a 90° angle towards the south where it continued for a further 4.5m before terminating. This ditch was truncated by a later ditch (**131/260**) on the same alignment which may represent a re-cut or re-instatement of the ditch. Dating evidence suggests it may date to approximately 1050-1200.#

3.3.4 This ditch was excavated in four 1m slots in Area C (**144, 146, 148** and **150**) which revealed a wide “U”-shaped profile (Figure 7, Sections 25, 27 and 43) with an average width of 0.90m and a depth of 0.28m. This ditch contained one single fill (145, 147, 149 and 151) which was a moderately compacted dark grey brown sandy clay with no

obvious inclusions. At the end of the excavation, the ditch was 100% excavated in this area in order to find dating evidence – none was recovered.

- Ditch slot **144** (equivalent to **146**, **148** and **150**) revealed very steep sloping edges and a rounded base (Figure 6, Section 22 and 23) (Plate 2). It measured at least 0.30m wide and 0.62m deep with one fill. Fill 143 (equivalent to 145, 147 and 149) was a friable, mid grey brown sandy clay with no obvious inclusions. A single sherd of pottery dated 1050-1200 was recovered from this deposit. A soil sample taken from fill 149 (sample number 45) contained an intrusive sherd of plant pot considered to be later than 1800 in date.

3.3.5 The ditch was investigated in two slots in Area B (**123** and **259**) which revealed gently sloping edges and a flat base.

- Ditch slot **123** revealed very steep sloping edges and a rounded base (Figure 6, Section 22 and 23) (Plate 2). It measured at least 0.30m wide and 0.62m deep with one fill. Fill 126 was a friable, mid grey brown sandy clay with no obvious inclusions. A single sherd of pottery dated 1050-1200 was recovered from this deposit.
- Ditch slot **259** revealed steep sloping edges and a flat base. It measured 0.92m wide and 0.62m deep with a single fill. Fill 258 was a loose, mid-dark brown clayey silt with no obvious inclusions. There were no datable finds recovered from this ditch. An environmental soil sample from this ditch (sample number 45) contained small amounts of charred weeds and seeds and charcoal.

### 3.4 Phase 2a: c. 1150-1350

3.4.1 Features from this phase consisted of parallel ditches recorded in Area C, two of which continue into Area B and a short north-south orientated ditch in Area B which may form the corner of an enclosure with the former ditch. There was also a silty flood layer against the western edge of Area C. Enough pottery was recovered from these features to ascribe a date range of 1150-1350 and while the date-range of the subsequent phase overlaps, there is enough stratigraphic evidence to suggest two close but separate event periods.

#### *Parallel East-West ditches*

3.4.2 Two parallel ditches were recorded on an east to west alignment, both of which were recorded in the two excavation areas. Located approximately 6-7m apart, both ditches continued beyond the east and west limits of excavation Area C and into Area B, spanning a total distance of 99m. The northernmost of the two ditches terminated in Area B. These ditches were orientated towards the ditch on the eastern side of the defensive sea bank and may represent drainage ditches leading water away.

3.4.3 The northern-most ditch was investigated in three slots (**134** in Area C and **131** and **260** in Area B).

- Ditch slot **134** was 2.0m wide and measured 0.63m deep with steep sloping edges and a concave base. It contained two fills. Primary fill 133 was a light bluish brown silty clay with no obvious inclusions. Upper fill 132 was a dark reddish brown sandy clay with occasional small stone inclusions. A single sherd of mid 12th-mid 14th century pottery was recovered from this deposit as well as metalworking slag related to primary iron production in the form of 'blooms' (Appendix A3).
- Ditch slot **131** was 0.95m wide and measured 0.63m deep with steep sloping edges and a concave base. It contained four fills (Figure 6, Sections 22 and 23) (Plate 2). Primary fill

130 was a friable, mid grey sandy clay with occasional charcoal inclusions. This deposit had a maximum thickness of 0.10m and there were no datable finds recovered from this deposit. Above 130 was deposit 129; this was a thin band, measuring approximately 0.06m in thickness which was made up of a soft dark grey coloured charcoal. A sample of this deposit was taken for environmental analysis which was found to be rich in grains as well as containing small amounts of charred weed seeds, charcoal, mussel shell and fishbones (Appendix C2). Three sherds of pottery were also recovered from this deposit, providing a context date of c.1150-1200. Fill 128 was a friable, mid grey coloured sandy clay with occasional charcoal flecks and a maximum thickness of 0.10m. Fourteen sherds of pottery were recovered from this deposit providing a context date of 1150-1250. Fill 127 was a friable, mid orange brown sandy clay with occasional charcoal flecks and a maximum thickness of 0.48m. This deposit was the upper-most recorded fill which was truncated by a re-cut of the ditch (**137**). A single sherd of pottery dated to 1050-1200 was retrieved from this deposit.

- Ditch terminus **260** was 0.90m wide and 0.36m deep with steep sloping edges and a concave base. It contained three fills. There were no datable finds recovered from this ditch. Primary fill 261 was a compacted, light orangey brown, fine clayey sand with occasional inclusions of animal bone and a maximum thickness of 0.12m. Above 261 was 262; a compacted mid-grey, fine sandy, clayey silt with no obvious inclusions and a maximum thickness of 0.12m. The upper-most fill was 263; this was a compacted, light orangey brown fine clay and silty mix with no obvious inclusions and a maximum thickness of 0.12m.

#### 3.4.4 The southern-most ditch was investigated in three slots in Area C (**124, 205** and **02** in evaluation Trench 3) and two slots in Area B (**153** and **272**).

- In Area C this ditch (**124, 205** and **02**) had an average width of 1.38m and an average depth of 0.50m. It had steep sloping edges and a rounded base (Figure 6, Section 28 and 38). All slots contained a single fill (125, 204 and 01); these were all a dark greyish brown coloured sandy silt with occasional shell and charcoal inclusions. Pottery was recovered from all three slots with date ranges of 1050-1200 (fill 125), 1150-1350 (fill 204) and 1150-1200 (fill 01).
- Ditch slot **153** was 0.96m wide and measured 0.40m deep with moderate sloping edges and a narrow, rounded base (Figure 6, Section 28) (Plate 3) and contained a single fill. Fill 152 was a friable, mid grey brown sandy clay with rare charcoal inclusions. A single sherd of pottery was recovered from this fill which was dated 850-1150.

#### 3.4.5 A short length of ditch was recorded against the eastern edge of Area C, continuing beyond the eastern limit and fading out towards the west. This ditch measured 9m in length and was orientated roughly east – west and parallel with the ditches recorded directly to the north. It may represent the western end of a further ditch. Although no dating evidence was retrieved from it, based on alignment and similarity of fill to the east-west ditches directly north, it is considered to be contemporary.

- This ditch was investigated in two slots (**206** (filled by 207) and **242** (filled by 241)). Measuring approximately 1.25m wide and 0.20-0.32m deep, this ditch had steep sloping edges and a flat base (Plate 4). This ditch contained a single fill; a firm light-mid grey sandy clay with no obvious inclusions. No dating evidence was retrieved however a horncore (assigned number 240) was retrieved from fill 241.

#### **North-South ditch, Area B**

#### 3.4.6 A short length of ditch was recorded continuing beyond the northern edge of Area B and terminating towards the south. This ditch terminated at a right angle to the terminus of the northern-most east-west ditch as described above and together may form part of an enclosure. It measured 8m in length and was orientated north-south investigated in



a single slot. Pottery recovered from this ditch was given a date range of the mid 12th-mid 14th century

- This ditch was investigated in a single slot, (109). It measured 1.98m wide and approximately 1.25m wide with steep sloping edges and a concave base (Figure 6, Section 18) (Plate 5). This ditch contained four fills. Primary fill 118 was a firm, mid orange-brown sandy clay with a greenish tinge, thought to be an element of cassy despoist. It measures 0.33m in thickness: no finds were recovered from this deposit. Secondary fill 108 was thin deposit measuring just 0.07m. It was a compact, dark green fill with frequent charcoal lumps and lenses of clay which contained a single sherd of mid 12th-14th century pottery. A single soil sample was taken which included a small quantity of cereals as well as fishscales and fish bones. Fill 117 was a firm, light orangey grey clayey sand with a maximum thickness of 0.54m. It contained occasional lumps of charcoal but no other datable finds. Upper fill 107 was a firm dark grey sandy clay with occasional charcoal lumps and fine pebbles. It measured 0.12m in thickness and a soil sample taken (sample number 34) contained more burnt CBM and small charred seeds.

### ***Silty Deposit, Area C***

3.4.7 A silty deposit, possibly representing a sequence of flood layers was investigated against the eastern edge of Area C. A single, wide slot was excavated and three separate layers were recorded, one of which contained an articulated horse (Plate 6) (Appendix B1). There was no evidence of deliberate burial and therefore it is considered that it was simply “washed” into the site during a flood event.

- Deposit 249 was the primary layer in this flood sequence. It was a soft mid greyish orangey brown silty sand. Due to the rapid ingress of water, the full thickness of this layer was not established. There were no obvious inclusions and no dating evidence was recovered.
- Deposit 188 was a firm silty, dark orangish grey, sandy clay measuring approximately 0.37m thick. Contained within this deposit was a semi articulated horse skeleton (181) (Plate 6). Two sherds of pottery were recovered providing a date range of mid 12th to mid 14th century (Appendix A1).
- Deposit 189 was the upper-most layer in this flood sequence. It was a soft light orangish brown silty sand with a maximum thickness of 0.26m. There were no obvious inclusions.

## **3.5 Phase 2b: c. 1200-1350**

3.5.1 This phase of activity within both excavation areas comprises a number of pits in both excavation areas. Although also early medieval in date, the stratigraphical position of a number of these warrants a sub-period within Phase 2. Not all pits in this area were excavated, however, they were mostly oval or sub-circular in plan. Pottery was retrieved from most of the excavated pits which fit into this phase of activity, however where no dating evidence has been retrieved, the features have been tentatively added by association, stratigraphical position, colour of fill, shape in plan etc. All are fully described below, by excavation area.

### ***Pits***

#### **Area C**

- Pit **155** was oval in plan, measuring 3.62m in length, 1.30m wide and 0.56m deep. It had moderately steep sloping edges and a rounded base. This pit was located at the north-western corner of the site and contained a single fill. Fill 154 was a friable, dark reddish brown sandy clay with no obvious inclusions. There were no datable finds recovered from this pit.
- Pit **201/203** were inter-cutting pits and appear in plan to be part of a group comprising up to five pits in total. There was no clear distinction or clear relationship between the pits in plan from their fills, other than the form of their edges. The group measured at least 3.60m in length and 2.50m at the widest point. The fill was a moderately compacted, mid grey brown silty sand with occasional charcoal flecks and rare fragments of shell. A single sherd of pottery was recovered from the fill on the edge of **201** which was dated as 1150-1350.
- Pit **158** was circular in plan with steep sloping edges and measured 2.42m in diameter. Unfortunately it was not possible to reach the base of the feature due to depth and the water-table, however it was excavated to 1.20m and a total 1.90m using an auger. This pit contained two fills. Fill 157 was the lower fill (full extent not established) and was a soft, mid bluish grey clayey silt with no obvious inclusions, with a recorded thickness of 0.5m. Two sherds of pottery were retrieved from this deposit providing a date range of 1050-1350. Fill 156 was the uppermost fill of this pit. It was a firm, mid brownish grey sandy silt with a maximum thickness of 0.7m and no obvious inclusions. Six sherds of pottery were recovered from this fill providing an overall context date of 1050-1150.
- Pit **251** was rectangular in plan measuring 5.51m in length and 2.70m wide with a maximum depth of 0.76m. It had moderately steep sloping edges and a flat base (Plate 7) (Figure 7, Section 43). This pit truncated the southern-most east-west drainage ditch (**124 et al.**) This pit contained two fills: Primary fill 252 was a mid grey brown silty deposit with no obvious inclusions. The upper fill, 250, was a mid-dark grey sandy deposit which contained seven sherds of pottery, providing an overall context date of 1200-1350.
- Pit **198** was sub-circular in plan, measuring 2.45m in length, 2.0m in width and 0.43m deep. This pit had a steep sloping eastern edge and a moderately gradual western edge and an irregular base (Figure 7, Section 40). This pit contained six fills: Primary fill 209 was a soft, dark yellowish grey, clayey sand with occasional flecks of brick and charcoal. It had a maximum thickness of 0.15m. A single sherd of pottery dated 1150-1350 was retrieved from this deposit. Fill 208 was located against the eastern edge of the pit. It was a friable, mid pinkish grey sandy clay with no obvious inclusions. It had a maximum thickness of 0.40m. Two sherds of pottery were retrieved providing a context date of 1050-1200. Fill 210 was a friable, mid greyish brown sandy clay with no obvious inclusions or dating evidence. It had a maximum thickness of 0.16m. Fill 211 was a soft, dark brownish grey clayey sand with moderate flecks of brick and charcoal and frequent shell. It had a maximum thickness of 0.15m. A single sherd of pottery was retrieved from this deposit dated to 1050-1200. Fill 212 was a friable, mid greyish brown sandy clay with no obvious inclusions or dating evidence. It had a maximum thickness of 0.11m. Fill 213 was the uppermost fill of the pit. It was a friable, mid yellow clayey sand with no obvious inclusions and a maximum thickness of 0.19m. A single sherd of pottery retrieved from this deposit was dated 850-1150.
- Pit **235** was oval-shaped in plan measuring 4.96m long, 2.13m wide and a minimum 0.80m deep. This pit had very steep sloping edges and a concave base and had a re-cut (**230**) (Figure 7, Section 41). This pit truncated the southern-most east-west drainage ditch (**124 et al.**) and contained four fills. Fill 239 was the primary fill of the pit, It was a loose, blackish grey silty sand with occasional fragments of shell. Due to the level of the water-table, it was not possible to reach the base of this pit / bottom of this context. There were no datable artefacts recovered from this deposit. Fill 238 was a loose, light green grey silty clay with no obvious inclusions and a maximum thickness of 0.32m. There were no datable artefacts recovered from this deposit. Fill 237 was a moderately compact, dark grey brown silty clay with no obvious inclusions and a maximum thickness of 0.30m.

A single sherd of pottery was recovered from this deposit which was dated 1050-1200. Fill 236 was the uppermost fill of this pit and was a moderately compact, dark grey brown silty clayey sand with no obvious inclusions and a maximum thickness of 0.40m. Two sherds of pottery retrieved from this fill provide an overall context date range of 1150-1300.

- Pit re-cut **230** was sub-oval in plan measuring 3.10m long, 1.27. wide and 0.41m deep (Figure 7, Section 41). this pit had moderate sloping edges and a rounded base. It contained four fills. Fill 234 was the primary fill of the pit and as it measured the same thickness of 0.04m and spanned the edges and base of the cut, this deposit may represent a lining. It was a loose black/grey silty clay with frequent fragments of shell. No datable finds were retrieved. Fill 233 was a moderately compact, mid grey brown silty clay with no obvious inclusions and a maximum thickness of 0.20m. There were no datable artefacts recovered from this deposit. Fill 232 was a loose black silt with frequent shell fragments and a maximum thickness of 0.20m. There were no datable artefacts recovered from this deposit. Fill 231 was a moderately compact, mid grey brown silty clay with a maximum thickness of 0.20m. There were no datable artefacts recovered from this deposit.
- Pit **04** was sub-circular in plan and was investigated within Trench 3. It measured 1.43m long, 1.13m wide and had a maximum depth of 0.40m. It had moderately steep sloping edges and a concave base and contained a single fill. Fill 03 was a moderately soft, dark grey brown sandy silt with occasional charcoal flecks and a maximum thickness of 0.40m. Eight sherds of pottery were retrieved from this fill, providing an overall context date of 1150-1350.
- Pit **48** was recorded within Trench 3, however, not fully revealed in plan, continuing beyond the western edge of the trench however was not found continuing during the open area strip. This pit was not excavated.
- Pit **229** was rectangular in plan measuring 1.3m in length and 0.56m wide with a maximum depth of 0.29m. It had moderately steep sloping edges and a flat base. This pit contained one fill: Fill 228 was a mid grey brown silty deposit with no obvious inclusions. There were no datable artefacts recovered from this deposit.
- Pit **255** was irregular shaped in plan measuring 5.15m long, 2.21m wide and 0.18m deep. This pit had moderate sloping edges and a flat base. The edge of this pit was truncated the corner of ditch **257/244**. This pit contained one fill: Fill 254 was a light-mid grey brown silty deposit with occasional shell inclusions. This fill also contained five sherds of pottery, providing an overall context date of 1250-1350.
- Pit **248** was sub-oval in plan, measuring at least 0.65m in length (before truncation), 1.67m wide and 0.15m deep. It had moderate sloping edges and a concave base and contained a single fill (Figure 7, Section 42). Fill 247 was a light brown silty sand with occasional small pebble inclusions. There were no datable artefacts recovered from this deposit. This pit was truncated by pit **246**.
- Pit **246** was oval in plan, measuring 2.29m in length and 2.09m wide with a maximum depth of 0.46m. This pit had steep sloping edges and a concave base, containing a single fill (Figure 7, Section 42). Fill 245 was a mid orange grey sandy silt with a small amount of iron pan. This fill also contained a single sherd of pottery, providing a context date of mid 11th to mid 13th century.. This pit was truncated by ditch **244/257**.
- Pit **180** was oval in plan, measuring 1.0m in length and 0.80m wide with a maximum depth of 0.42m. It had steep sloping edges and a concave base.(Figure 7, Section 42). It contained a single fill. Fill 179 was a firm, mid orangey grey sandy clay with occasional small pebble inclusions. Two sherds of pottery were recovered providing a context date of mid 13th-mid 14th century. An iron nail with flat round head (SF 3) measuring 40 mm in length was also recovered from this feature (Appendix A2). This pit was truncated by drainage ditch **244** and was cut into deposit 189.

- Pit **167** was sub-circular in plan measuring 3.24m in length, 2.67m wide and 0.36m deep. It had steep sloping edges and a concave base and contained two fills (165 and 166). Primary fill 166 was a mid reddish brown sandy clay with no obvious inclusions and no datable finds. Upper fill 165 was a dark reddish brown silty clay with occasional animal bone. Four sherds of pottery were retrieved from this fill, providing a context date of 1150-1250. this pit was truncated by posthole **164**.
- Pit **172 / 194** was elongated in plan, measuring approximately 6m in length, 1.4m wide and 0.16m deep (Figure 7, Section 36). This pit had moderate sloping edges and a concave base and contained one fill. Fill 171 / 195 was a compacted mid-grey brown, silty clay with no obvious inclusions. Nine sherds of pottery were retrieved from this pit, providing a context date of mid-late 12th century. This pit was truncated by pit **173**.
- Pit **173** was elongated in plan, measuring approximately 4.95m in length, 1.2m wide and 0.5m deep. This pit had moderate sloping edges and a flat base and contained three fills (Figure 7, Section 36). Primary fill 197 was a compact mid brown-grey silty clay with no obvious inclusions and a maximum thickness of 0.05m. was a compacted mid-grey brown, silty clay with no obvious inclusions. Five sherds of pottery were retrieved from this pit, providing a context date of mid-late 12th century. The secondary fill, 193, was a soft mid-grey brown, silty clay with no obvious inclusions. Fill 192 was a loose dark greyish brown silty sand with occasional small stone inclusions and a maximum thickness of 0.08m. No finds were recovered from this deposit. Upper fill 174 was a soft mid-dark brown silty clay with no obvious inclusions and a maximum thickness of 0.28m. Twenty sherds of pottery were recovered providing a context date of mid 12th-early 13th century. An almost complete jar made up for 17 of these sherds which was excavated close to the machined surface (Plate 9). A sample of this deposit was taken for environmental analysis (sample 40) which revealed a significant quantity of mussel shell and charred grains (Appendix B2).
- Pit **182** was circular in plan, measuring 1.90m in diameter with a maximum depth of 0.65m. This pit had steep sloping edges and a flat base and contained a three fills (Figure 7, Section 35). Primary fill 183 was a mid reddish brown, fine sandy fill with frequent iron panning and no other obvious finds. This fill had a maximum thickness of 0.07m. Fill 184 was a light greyish brown, fine sandy silt with occasional pieces of animal bone, but no datable finds. This deposit had a maximum thickness of 0.35m. Upper-fill 185 was a mid brownish grey, fine sandy clayey silt with a maximum thickness of 0.35m. There were no datable artefacts recovered from this deposit.

## Area B

- Pit **266** was sub-circular in plan, measuring 1.6m long, 0.97m wide and 0.4m deep with almost vertical sloped edges and a flat base. This pit was truncated by pit **264** and it contained a single fill. Fill 267 was a moderately compact dark reddish black silty clay with occasional small stone inclusions. Two sherds of mid 13th-end of 15th century pottery were recovered from this pit.
- Pit **264** was sub-circular in plan, measuring 1.0m long, 0.61m wide and 0.10m deep with gradual sloped edges and a flat base. It contained a single fill. Fill 265 was a moderately loose dark brownish black silty clay with occasional small stone inclusions. No datable finds were recovered from this pit.
- Pit/posthole **141** was circular in plan, measuring 0.35m in diameter and 0.17m deep with steep sloping edges and a concave base. It contained a single fill. Fill 140 was a mid brownish grey sandy clay with occasional charcoal inclusions. A single sherd of mid 12th-mid 13th century pottery was recovered from this fill (Appendix A1).
- Pit **139** was sub-rectangular in plan measuring 1.10m in length, 0.75m wide and 0.18m deep. It had vertical sloping edges and a flat base containing a single fill (Figure 6, Section 22). Fill 138 was a mid grey sandy clay with occasional charcoal inclusions. This

fill contained two sherds of mid 12th-mid 14th century pottery (Appendix A1) as well as cattle and eel bones (Appendix B1).

- Pit **137** was oval in plan, measuring 0.72m wide and 0.33m deep. It had moderately steep sloping, rounded edges and a rounded base (Figure 6, Section 22). It contained two fills. Primary fill 136 was a friable, mid orange grey sandy clay with occasional charcoal flecks and frequent fragments of fired clay. It had a maximum thickness of 0.32m and contained 13 sherds of pottery with a date range of 1150-1350 (Appendix A1) as well as metalworking slag related to primary iron production in the form of 'blooms' (Appendix A3) and amphibian vertebra (Appendix B1). Upper fill 135 was a friable, mid grey sandy clay with rare charcoal inclusions and a maximum thickness of 0.09m. There were no datable artefacts retrieved from this deposit.
- Pit **170 / 06** was oval in plan, measuring 0.80m in length, 0.60m wide and 0.30m deep. It had steep sloping edges and a sloping, flat base. It contained a single fill. Fill 169 / 05 was a loose mid brown silt with no obvious inclusions. Fill 05 contained a single sherd of mid 15th-mid 17th century and fill 169 contained a single sherd of mid 11th-end of the 12th century which is considered to be residual.
- Pit **104** was part of an inter-cutting group of pits on the eastern side of Area B. It was circular in plan, measuring 2.05m in diameter and 0.64m deep with steep sloping edges and a gently concave base (Figure 6, Section 18) (Plate 8). It contained two fills. Primary fill 119 was a firm dark greenish brown clayey sand with occasional small pebble stone inclusions. Upper fill 103 was a firm, dark greyish brown sandy clay with occasional pebble stone inclusions. This fill also contained two sherds of mid 11th-mid 14th century pottery (Appendix A1) and two iron nails (SF10 and SF11) (Appendix A2)
- Pit **121** was part of an inter-cutting group of pits on the eastern side of Area B. It was oval in plan, measuring 1.5m in length, 1.3m wide and 0.21m deep with moderate sloping edges and a flat base (Figure 6, Section 18). It contained a single fill. Fill 120 was a firm dark brown sandy clay with occasional small pebble stone inclusions. This fill also contained a single sherd of mid 13th-mid 14th century pottery (Appendix A1).
- Pit **116** was part of an inter-cutting group of pits on the eastern side of Area B. It was oval in plan, measuring 2.40m in length, 2.25m wide and 0.08m deep with gently sloping edges and a concave base (Figure 6, Section 18). It contained a single fill. Fill 115 was a firm dark brown sandy clay with occasional shell inclusions. This fill also contained 6 sherds of mid 13th-mid 14th century pottery (Appendix A1).
- Pit **87** was part of an inter-cutting group of pits on the eastern side of Area B. It was oval in plan, continuing beyond the eastern edge of the excavation area (Plate 10). It measured 6.5m in length and at least 3.8m wide with a depth of 0.75m. It had shallow sloping edges and a concave base. This pit contained two fills. Primary fill 88 was a loose dark reddish brown silty sand with no obvious inclusions. This fill had a maximum thickness of 0.10m and was recorded only on the eastern edge of the pit. Four sherds of mid 13th-mid 14th century pottery were recovered from this fill (Appendix A1). Upper fill 89 was a dark greenish brown silty clay with a maximum thickness of 0.75m. This fill contained 9 sherds of pottery dated to the 16th century.
- Pit **84** was part of an inter-cutting group of pits on the eastern side of Area B. It was not fully revealed in plan, continuing beyond the eastern edge of the excavation area. It appeared to be sub-rectangular in plan, measuring 2.0m in length, 0.75m wide and 0.20m deep with almost vertical edges and a flat base (Figure 6, Section 11). This pit contained a single fill. Fill 83 was a mid orangish grey sandy clay with occasional charcoal inclusions. This pit was dated by association. It was cut into the top of **82** (equal to **87**).
- Pit **221** was circular in plan with a diameter of 2.50m and a maximum depth of 0.16m. It had gradual sloping edges and a flat base, containing a single fill. Fill 220 was a mid greyish brown sandy clay with no obvious inclusions. Five sherds of mid 14th to late 15th

century pottery were recovered from the fill of this pit (Appendix A1). This pit was truncated by pit **227**.

- Pit **227** was sub-circular in plan, measuring 1.75m in length, 1.5m wide and 0.86m deep with near-vertical sloping edges and a concave base (Figure 6, Section 45). This pit contained three fills. Primary fill 226 was very soft and wet due to the position of the water-table at that time, it was a dark grey-brown sandy clay with frequent charcoal and grain. It had a maximum thickness of 0.14m and contained two sherds of mid 12th-mid 14th century pottery. A sample of this deposit was taken for environmental analysis (sample 43) which revealed a significant quantity of mussel shell, grains and cereals (Appendix B2). Fill 270 was a mid greenish grey clayey sand with a maximum depth of 0.16m. Upper fill 225 was a friable mid yellowish grey sandy clay measuring a maximum 0.62m in thickness. Fourteen sherds of pottery were retrieved from this deposit providing a context date of mid 12th-mid 14th century. This pit was truncated by pit **219**.
- Pit **219** was circular in plan, measuring 0.50m in diameter with steep sloping edges and a concave base (Figure 6, Section 45). This pit contained two fills. Primary fill 269 was a mid brownish yellow sandy clay with no obvious inclusions. No finds were retrieved from this fill which had a maximum thickness of 0.14m. Upper fill 218 was a friable dark grey sandy clay with a maximum thickness of 0.06m. No datable finds were recovered from this deposit.

### 3.6 Phase 3: c. 1400-1650

- 3.6.1 This phase of activity was recorded within both excavation areas can be characterised by a number of pits, two ditches and a well in excavation Area B and a drainage ditch leading into a large silty pond area in Area C.

#### Area C

##### ***Drainage ditch***

- 3.6.2 A short length of ditch was recorded against the western edge of excavation Area C, continuing beyond the western limit, turning 90 degrees towards the south where it continued for 5.5m before terminating to the south. Although no dating evidence was retrieved from this ditch, its stratigraphic relationship with dated pits places it later than Phase 2b. It has therefore been tentatively placed in the same phase as the pond or flood layer 95/168 located to the immediate south with which it may be associated.
- This ditch was investigated in two slots (**257** (filled by 256) and **244** (filled by 243)). Measuring approximately 2.10m wide and 0.16m deep, this shallow ditch had gentle sloping edges and a concave base (Figure 7, Section 42). This ditch contained a single fill (243 equal to 256); a dark orangey grey sandy clay with occasional charcoal flecks. There were no datable artefacts recovered from this deposit.

##### ***Pond***

- 3.6.3 Located in the south-western corner of Area C was a large pond-like feature measuring approximately 20m by 9m and 1.0m deep, continuing beyond the edges of the south-west corner of the area (Figures 3, 5 and 10). This feature was investigated in a single machine excavated slot (**95**) in which five deposits were recorded. The samples from layers within pond 95 are somewhat confusing in that the upper layers contain the most waterlogged plant remains and the lowest layer 93 (Sample 23) contains more charred remains including charred grain and pulses, perhaps indicating a single depositional event of burnt refuse (Appendix B2).

- Pond **95** measured at least 20m by 9m and was 1m deep. It was not fully revealed in plan, continuing beyond the edge of the excavation area. It had moderately gradual sloping edges, the base was not fully revealed (Figure 7, Section 9) (Plate 13). The pond contained five deposits. Primary fill 94 was a light greyish brown silty clay with occasional small stones and charcoal inclusions. It had a maximum thickness of 0.20m and did not contain any dating evidence. Secondary fill 93 was a thin band of dark blackish grey silt with frequent charcoal inclusions and a maximum thickness of 0.08m. This deposit contained nine sherds of 16th century pottery (Appendix A1) as well as a pierced truncated conical spindlewhorl (SF 08) (Plate 14) and a plain thin lead disc, probably the plain back-plate of an alnage seal (SF 09) (Appendix A2). Fill 92 was a light greyish brown silty clay with occasional charcoal inclusions. It had a maximum thickness of 0.20m and did not contain any dating evidence. Fill 91, like 93, was a thin band of dark blackish grey silt with frequent charcoal inclusions and a maximum thickness of 0.10m. This deposit did not contain any dating evidence. Upper fill 90 was a light greyish brown silty clay with occasional small stones and charcoal inclusions. It had a maximum thickness of 0.40m and did not contain any dating evidence.

## Area B

### ***Pits***

3.6.4 The majority of evidence from this period comes from excavation Area B, where there were a number of pits and a well (Figures 3, 5 and 10). One pit, within a small group in the north-eastern corner of Area B contained evidence of an industrial fire from which several metal small finds were recovered. Interestingly the majority of the pits in this area were sub-rectangular in plan.

- Pit **78** was not fully revealed in plan, continuing beyond the northern limit of excavation Area B, measuring 1.32m in length, 0.58m wide and 0.69m deep. It had gently sloping edges and a flat base. This pit contained two fills. Primary fill 74 was a loose dark grey silt with a maximum thickness of 0.55m. This deposit contained 17 sherds of mid-late 15th century pottery, an iron pintle fragment (SF 14) and three nails (SF12 and 13) (Appendix A2). Upper fill 73 was a loose, light yellowish brown sandy silt with a maximum thickness of 0.14m. This fill did not contain any dating evidence.
- Pit **72** was rectangular in plan, measuring 1.55m in length, 0.90m wide and 0.23m deep with steep sloping edges and a flat base. This pit contained a single fill. Fill 71 was a dark brownish grey sandy clay with occasional charcoal inclusions. This fill contained two sherds of mid 16th-17th century pottery.
- Pit **86** was circular in plan, measuring 0.87m in diameter and 0.16m deep with steep sloping edges and a flat base (Plate 12). This pit contained a single fill. Fill 85 was a loose dark grey silt with occasional small burnt stone inclusions. This fill contained two iron round-section fibre-processing shank fragments (SF15a and SF16), a thin iron needle or pin shank fragment (SF15b), three iron strip fragments, one with rounded terminal (SF19, 20 and 21), a thin iron sheet fragment (SF 17) and five iron nails (SF 18 and SF 15c) (Appendix A2).
- Pit **106** was square in plan, measuring 0.78m wide and with a maximum depth of 0.15m. It had moderate sloping edges and an uneven base, containing a single fill. Fill 105 was a loose, light yellowish brown silty clay with occasional shell inclusions. This pit was dated by association.
- Pit **122 / 08** was sub-circular in plan measuring 2.22m in length, 1.60m wide and 0.70m deep with steep sloping edges and a flat base (Plate 11). This pit also truncated pit **170 / 06** and contained a single fill. Fill 114 / 07 was a loose mid brown clayey silt with occasional small stone inclusions. This fill also contained a single sherd of mid 14th to late 15th century pottery.

- Pit **176** was rectangular in plan, measuring 1.60m by 0.98m with a depth of 0.58m. It had steep sloping edges and a flat base. This pit contained a single fill. Fill 175 was a loose mid brown clayey silt with no obvious inclusions. Finds retrieved comprised two sherds of mid-late 15th century pottery and an iron nail (SF 6).
- Pit **224** was sub rectangular in plan, measuring 2.20m long, 1.4m wide and 0.92m deep with steep sloping edges and a flat base (Figure 6, Section 45). This pit contained three fills. Primary fill 223 was a mid orange grey sandy clay with a maximum depth of 0.36m and no obvious inclusions. Four sherds of mid 12th-14th century pottery were recovered from this fill. Fill 268 was a mid greyish yellow sandy clay with a maximum depth of 0.22m. Upper fill 222 was a mid brown sandy clay with a maximum thickness of 0.34m. This fill contained 14 sherds of 15th century pottery.
- Pit **217** was sub-rectangular in plan, measuring 2.25m in length and 1.50m wide with a depth of 0.44m. It had steep sloping edges and a flat base (Figure 6, Section 45) and contained a single fill. Fill 216 was a mid grey sandy clay with occasional small stone and charcoal inclusions. Two sherds of mid 13th to late 15th century pottery was retrieved from this fill.
- Pit **178/143** was circular in plan with a diameter of 0.35m and a depth of 0.25m. It had steeply sloping edges and a tapered/pointed base. This posthole contained a single fill. Fill 177/142 was a loose, dark greyish brown clayey silt with no obvious inclusions. Six sherds of pottery were recovered providing a context date of mid 13th century and the small piece of fuel ash slag with a slightly glassy compacted cinder was also recovered.

### **Well**

3.6.5 A large pit with vertical edges located in Area B was interpreted as a well. Due to the significant depth, the full profile or measurement of depth of the well could not be gained, however an auger reached over 3m.

- Well **162** was an irregular shape in plan, measuring approximately 2.50m in diameter and was excavated to a depth of 1.2m, with vertical edges (Figure 6, Section 30). Three fills were excavated from this well. The lowest excavated fill, 161, was a moderately loose, yellow, reddish brown silty sand with occasional small stone inclusions and a maximum thickness of 1.0m. Six sherds of 13th to mid 14th century pottery were recovered from this fill as well as a fragment of tile (SF 2). Fill 160 was a moderately compacted reddish grey sandy, silty clay with occasional stone inclusions and a maximum thickness of 0.70m. No dating evidence was retrieved from this fill. Upper fill 159 was a compacted mid to dark brown sandy, silty clay with a maximum thickness of 1.20m. Finds from this deposit included seven sherds of mid-late 15th century pottery.

### **Area B ditches**

3.6.1 Two ditches were recorded in Area B, one north-south orientated ditch in the north east corner of the excavation area, the other was a curvilinear, shallow, truncated or segmented ditch on a north-west to south-east orientation (Figures 3, 4 and 10).

- Ditch **77** was linear in plan, measuring at least 6m in length, continuing beyond the north and east limits of the excavation area (Figures 3, 4 and 10). It Measured 1.0m wide and 0.75m deep with steep sloping edges and a flat base. This ditch had a single fill which was sampled and found to consist mainly of compacted and heated ash (Appendix A3). Fill 76 was a brownish grey, sandy clay with occasional charcoal flecks. Thirteen sherds of mid-to-late 15th century pottery were recovered from this fill.
- The curvilinear ditch in Area B was investigated in two slots. Ditch **112 / 215** was on average 0.45m wide and 0.12m deep with gently rounded edges leading into a concave base. This ditch contained a single fill. Fill 111 / 214 was a moderately compacted mid



brown sandy silt with very small stone inclusions. Fill 111 contained two sherds of 13th to mid 14th century pottery.

### **3.7 Undated**

- 3.7.1 All features were assigned to a phase based on dating evidence, association or stratigraphic relationship, there were no features which have not been assigned to a dated phase:

### **3.8 Finds Summary**

- 3.8.1 The investigations at Waterlees Road produced a moderate post-Roman pottery assemblage of 431 sherds, weighing 6.076kg (Appendix A1). This total includes material from the evaluation and unstratified material. The stratified assemblage is mainly medieval, with a significant number of mid 11th to late 12th century early medieval sherds, which alongside a small number of late Saxon-early medieval sherds suggest a long period of activity on or close to the area of excavation.
- 3.8.2 13.3 Kg of faunal material was recovered from the excavation (Appendix B1) from a variety of feature types dating from the Saxon to Late Medieval periods. Two-hundred and nine fragments of bone were recovered, with 119 identifiable to species (56.9% of the total sample).
- 3.8.3 The metalwork assemblage was small and contained only lead and iron objects, the former quite well-preserved, the latter very corroded (Appendix A2). A number of items relate to textile manufacture, a craft often represented in Saxo-Norman and later medieval urban assemblages. There is no evidence for weaving, but a small fragment of a thin iron shank may come from a needle. Most of the objects are typical of the Late Saxon and Norman periods. The remaining objects are all structural ironwork including nails, but three strap fragments may be from a door, shutter or large wooden chest.
- 3.8.4 The metalworking slags recovered are all related to primary iron production in the form of 'blooms' (Appendix A3). Hammerscale is indicative of the smithing process and has been recovered in both its forms as flake hammerscale which is produced when iron is forged and as spheroidal hammerscale which results from the primary smithing of iron bloom and also during the welding process.

### **3.9 Environmental Summary**

- 3.9.1 A total of 45 samples were taken from features within the excavated areas of the site (Appendix B2). Features sampled include pits and ditches dating primarily from the early medieval period c1050 AD up to the 19th century. Samples were also taken from across the 'Roman Bank' sea defence.
- 3.9.2 The plant assemblage from the site is dominated by cereal grains, pulses and other dietary remains of fragments of animal bone and mussel shells and are probably derived from the deposition of small quantities of burnt domestic refuse.

## 4 DISCUSSION AND CONCLUSIONS

### Phase 1: 1050-1150

- 4.1.1 This period was the earliest recorded activity on the site and witnessed the construction of the defensive “Sea Bank” and an enclosure to its eastern 'dryland' side which was recorded in both excavation areas (Figure 8).
- 4.1.2 Investigation of the Sea Bank revealed the edge of the original ditch, although its full extent was not reached as the ditch is believed to continue beneath Waterlees Road. Pottery recovered supports a date of the mid 11th-end of the 12th century for the original cut of the ditch. The feature has been investigated before in an archaeological watching brief and excavation at Tilney All Saints (Leah 1993 and Penn 1995). These investigations however did not yield any datable finds other than a brick for which thermoluminescence dating results are still to be made available.
- 4.1.3 At Waterlees Road remnants of the original bank were investigated, comprising several layers of silts thought to have been extracted from the associated ditch as well as possibly imported from elsewhere. Soil samples investigated from the fill of the ditch indicate initial sequences of natural silting with a small amount of waterlogged cereals, snails, egg shell and mussel. The ditch was later backfilled incorporating contemporary 12th-14th century pottery from the immediate area. The environmental soil samples from the various layers within the sea defence bank contain plant remains that are consistent with disturbed deposits. These included charred grains that are abraded due to redeposition and fish bones, scales, mussel shells and ostracods that could have derived from imported silts. This evidence may indicate that the bank has been reduced as part of building works for the construction of the housing estate around Waterlees Road, for the road itself and as part of levelling for The Spinney playing field.
- 4.1.4 The soil sample from the ditch contained plant remains that have been preserved by water-logging and are comprised of rushes and wet-land plants that would have been growing along the bank-side. The presence of charred plant remains and animal bones indicate the disposal of domestic refuse into this ditch.
- 4.1.5 The ditch recorded from the trench section, located on the eastern side of the main ditch is considered to be a ditch associated with the bank or perhaps a drain. There are drains running down each side of the bank according to the the NHER description of the Sea Bank, although, it is not certain whether these are original ditches or more modern features.
- 4.1.6 Although the small enclosure ditch investigated in Area C may not be a continuation of that recorded in Area B, it is likely that they are part of a contemporary enclosure system. The distinct lack of finds from either ditch as well as little in the way of environmental evidence would indicate there was little or no settlement within proximity to the site at this time. The ditch recorded in Area C appeared to respect the alignment of the Sea Bank and therefore may have been in use at the time of its construction or shortly after, following its orientation. The Sea Bank was constructed to protect the land on this, the east side of the bank.

### Phase 2a: 1150-1350

- 4.1.7 Although the Phase 2a and 2b date ranges overlap, there is enough stratigraphic evidence to suggest two close but separate event periods. The nature of the

archaeology recorded as well as finds and environmental evidence also indicates different activities in each sub-phase.

- 4.1.8 The predominant archaeology from this phase consisted of parallel ditches recorded in Area C, two of which continue into Area B and a short north-south orientated ditch in Area B which may form the corner of an enclosure with the northern-most ditch (Figure 9). Another suggestion is that these ditches were created to aid drainage away from the Sea Bank, leading towards the eastern half of Area B which was noted as being lower-lying land. A small quantity of metalwork slag which was recovered from eastern end of the northern-most ditch in Area C may indicate nearby iron production and the close proximity to a flood layer, also recorded at the eastern extent of the site, may have been used as part of the cooling process in the iron production.
- 4.1.9 A silty layer recorded against the eastern edge of Area C was interpreted as the result of a flood. It contained the remains of a horse, thought to have been washed into the area. A flood episode capable of carrying horse remains would have been fairly substantial. This flood event may have been the occurrence which separates activity within Phase 2.

### **Phase 2b: 1200-1350**

- 4.1.10 Activity within both excavation areas from this period was characterised by a number of oval or sub-circular pits and finds recovered indicate industrial activities occurring either on or within close proximity to the site (Figure 9).
- 4.1.11 Just one pit in Area C contained any metalwork finds, this was an iron nail with flat, round head, however Area B contained far more evidence of metalwork production. A small pit, part of a pit cluster, contained metal-working slags which included elements of burnt clay which indicates they may have been resting on or formed a smelt base during the heating process. Not far from this pit, another two nails were recovered from another group of inter-cutting pits by the eastern edge of the site. The presence of these metal finds along with slag from the metal-working process would lead to the suggestion that production was occurring close by and the continuation of features towards the east, beyond the limit of the investigation Area B would be a likely location for more evidence of this. Hammerscale, indicative of the iron smithing process have been recovered from samples from this site. The levels of hammerscale are very small and do not suggest that smithing or smelting has taken place within this investigation area, but very likely it was taking place close by.
- 4.1.12 Evidence from the environmental soil sampling of two pits also indicates the presence of remains of domestic cooking refuse. From one pit charred grains, mussel shell and fish bones were retrieved and from another eel bones, horn cores and several grains were recovered. This second pit, part of a cluster also containing metalworking slag, has been interpreted as a possible holding pen for eels (Appendix C2).
- 4.1.13 Although a small assemblage of animal bone was recovered from the excavation, it was predominantly retrieved from pits from this phase and within Area B (Appendix C1). The assemblage most likely represents a mixed economy, with animals kept to adulthood for breeding, meat and secondary products. Cattle were also present on the site as whole carcasses if not live animals. Evidence also indicates that sheep and pigs were butchered on or near the site.

### **Phase 3: 1400-1600**

- 4.1.14 This phase is characterised by a number of pits, two ditches, and a well in excavation Area B and a cluster of pits and a drainage ditch leading into a large silty pond in Area C (Figure 10).
- 4.1.15 This phase also provided further evidence of metalwork and domestic waste and yielded far more metal finds, however, like the previous phase, there was still no direct evidence for metal-working or occupation on the site. The “pond” at the southern edge of Area C contained the only two lead finds from the whole excavation; a disc, possibly from the back of a seal as well as a spindlewhorl; the remaining metal finds from this phase came from pits in Area B, all of which were iron fragments, predominantly nails.
- 4.1.16 Although there was no direct evidence of textile production on the site, three objects associated with such activity, including two from the pond in Area C were recovered. Two fibre-processing shank fragments probably come from wool-combs (from the pond in Area C and a pit in Area B) and spinning is represented by a lead spindlewhorl (also from the pond). A small fragment of a thin iron shank possibly from a needle also came from a pit in Area B. All of these objects are more typical of the Late Saxon and Norman periods, with similar items found in contemporary contexts at York, Lincolnshire, Worcester and Winchester. A lead alnage seal, a form of cloth-seal used to mark bales of cloth that were of marketable quality, was also recovered from the pond.
- 4.1.17 A cluster of pits in the north-eastern corner of Area B contained 14 iron finds and the continuation of features is expected northwards as a pit and ditch extend beyond the limit of this area. It is highly likely that a continuation of archaeological features and perhaps even evidence of metal-working would be found here. Although most of these iron objects in Area B are nails, three strap fragments may be from a door, shutter or large wooden chest and part of a pintle or hinge-pivot s probably from a shutter, window or gate, together these may represent disposal of items from a nearby building..

## **4.2 Significance**

- 4.2.1 The excavations at Waterlees Road have achieved their objective of identifying, investigating and recording the presence, location, nature, extent, date, quality, condition and significance of surviving archaeological deposits within the development area.
- 4.2.2 The investigations have identified potential nearby settlement and industrial activity from the early and late medieval periods and added to our knowledge of the extent of remains from this period surviving within this area. This information will assist the local planning authorities to make decisions regarding further work in the area as part of the planning process.
- 4.2.3 The work allowed for excavation of the Sea Bank and successfully retrieved dating from it which has not been so well achieved in investigations in other locations. This should enhance the Historic Environment Record and the report made available to the HER in both Cambridgeshire and Norfolk.

## APPENDIX A. FINDS REPORTS

### A.1 Pottery

*By Carole Fletcher*

#### **Introduction**

- A.1.1 The investigations at Waterlees Road, Wisbech, Cambridgeshire, produced a moderate post-Roman pottery assemblage of 431 sherds, weighing 6.076kg. This total includes material from the evaluation, unstratified material and un-phased contexts. In addition a single sherd (0.003kg) from a Roman sandy oxidised ware flagon was recovered as a residual element in an otherwise medieval context. The Roman sherd, unstratified material and pottery recovered from un-phased contexts have been excluded from the analysis of the assemblage within this report, however these are recorded in the pottery catalogue.
- A.1.2 For the purpose of this report the total phased and stratified assemblage is 298 sherds, weighing 4.309kg
- A.1.3 The stratified assemblage is mainly medieval, with a significant number of mid 11th to late 12th century early medieval sherds, which alongside a small number of late Saxon-early medieval sherds suggest a long period of activity on or close to the area of excavation. A number of late medieval and post medieval sherds were also recovered. The condition of the overall assemblage is moderately abraded and the average sherd weight is small to moderate at approximately 14g.

#### **Methodology**

- A.1.4 The Medieval Pottery Research Group (MPRG) *A guide to the classification of medieval ceramic forms* (MPRG, 1998) and *Minimum Standards for the Processing, Recording, Analysis and Publication of Post-Roman Ceramics* (MPRG, 2001) act as a standard.
- A.1.5 Recording was carried out using OA East's in-house system based on that previously used at the Museum of London. Fabric classification has been carried out for all previously described medieval and post-medieval types. All sherds have been counted, classified and weighed on a context-by-context basis.
- A.1.6 The pottery and archive are curated by Oxford Archaeology East until formal deposition.

#### **Sampling Bias**

- A.1.7 The excavation was carried out by hand and selection made through standard sampling strategies on a feature by feature basis. There are not expected to be any inherent biases. Where bulk samples have been processed for environmental remains, there has also been some recovery of pottery. These small quantities of sherds are abraded, not closely datable and have not been considered in this report.

#### **The Assemblage**

- A.1.8 Ceramic fabrics, abbreviations and a summary catalogue by fabric, sherd count and weight for the phased and stratified assemblage are given in Table A1.

Fabric Name	Fabric Code	No. Sherds	Weight (kg)
Bourne B Ware	BOUB	5	0.451
Bourne D Ware	BOND	13	0.462
Cistercian Type Ware	CSTN	2	0.053
Developed St Neots Type Ware	DNEOT	1	0.006
Developed Stamford Ware	DEST	5	0.031
Early Medieval Essex Micaceous Sandy Ware	EMEMS	4	0.060
Early Medieval Type Ware	EMW	97	0.920
Early Medieval Type Ware/Unglazed Grimston-Blackborough End Type Ware	EMW/UGBB	2	0.021
Grimston Type Ware	GRIM	25	0.333
Huntingdonshire Early Medieval Ware	HUNEMW	11	0.033
Huntingdonshire Fen Sandy Ware	HUNFSW	5	0.050
Ipswich Ware	IPSW	1	0.008
Late Medieval Ely Ware	LMEL	4	0.041
Late Medieval Grimston Type Ware	LGRIM	8	0.515
Late Medieval and Transitional Ware	LMT	3	0.038
Lyveden A Type Shelly Ware	LYVA	10	0.093
Lyveden-Stanion Glazed Ware	LYST	1	0.030
Medieval Ely Ware	MEL	23	0.386
Medieval Essex Micaceous Sandy Ware	MEMS	1	0.011
Modern Redwares	MODR	1	0.002
Post-medieval Redware	PMR	1	0.005
Shelly Ware	SHW	3	0.015
Sible Hedingham Ware	HEDI	1	0.015
Southeast Fenland Medieval Calcareous Buff Ware	SEFEN	8	0.177
St Neots Type Ware	NEOT	3	0.005
Stamford Ware	STAM	14	0.110
Thetford Ware	THET	1	0.003
Unglazed Grimston-Blackborough End Type Ware	UGBB	35	0.420
Unprovenanced Glazed wares	UPG	1	0.004
Unprovenanced wares	UNK	9	0.047
<b>Total</b>		<b>298</b>	<b>4.309</b>

Table A1. Fabric abbreviations and summary by fabric, sherd count and weight

### Pottery by period

- A.1.9 A rim sherd from an Ipswich Ware jar, represents the Middle Saxon finds from the site, indicating some Middle Saxon activity in the vicinity of the excavation.
- A.1.10 Late Saxon-early medieval wares represent approximately 3% (by weight) of the total assemblage. Only 18 sherds of Late Saxon-early medieval material, weighing 0.118kg, were recovered. Of these sherds 14 are Stamford Ware from Lincolnshire, including a large sooted sherd from a glazed pitcher or jug. Three small, abraded, undiagnostic body sherds of St Neots Ware and a single sherd from a Thetford Ware vessel were also recovered. The majority of these sherds were recovered in association with early medieval fabrics or medieval fabrics. It is likely that the Stamford, St Neots and Thetford wares are post conquest and date from the mid 11th century.

- A.1.11 Early medieval fabrics form 23% of the assemblage by weight. The majority of these sherds appear to be Norfolk Early Medieval ware, 112 sherds (1.009kg). Where a form can be assigned these are all jar sherds and many are sooted, indicating use in food preparation. Also present are a small number of sherds of Huntingdonshire Early Medieval Ware including sooted jar sherds and four sherds of Early Medieval Essex Micaceous Sandy Ware
- A.1.12 Medieval fabrics form the bulk of the pottery recovered, comprising 130 sherds (2.057kg), approximately 44% of the total assemblage by weight. The largest group of sherds are Unglazed Grimston-Blackborough End type wares, mid 12th-14th century vessels mainly jars, the fabric of which lacks the softer sandy feel of the early medieval fabrics. Medieval Ely Ware and Grimston Ware are present in very similar numbers. The Ely Ware vessels are predominantly glazed jugs with a single unglazed jug sherd also recorded, while the Grimston vessels include jugs and bowls.
- A.1.13 Other fabrics present include from Lincolnshire, Bourne B, Developed Stamford, and a single sherd from a glazed Lyveden-Stanion jug. Medieval glazed wares form 20% of the total assemblage by weight and 47% of the medieval assemblage. Also present are small numbers of Northamptonshire Lyveden A Type Shelly Ware, Huntingdonshire Fen Sandy Ware and Southeast Fenland Medieval Calcareous Buff Ware, described recently by Dr Paul Spoerry (Spoerry forthcoming). The production source for this fabric is currently unknown. A single sherd of Developed St Neots was also noted.
- A.1.14 In contrast, only 18 sherds of late medieval pottery were positively identified, which are dominated by the presence of eight sherds from a single late medieval Grimston Ware jug from pit 77. Also present are four sherds of late medieval Ely Ware and a sherd from a jug, comprising the rim and neck with an attached strap handle. The handle is slightly sandy to the touch and appears to be Bourne B, however the neck and rim contain less quartz and are smooth to the touch, similar to post-medieval Bourne D. This hybrid vessel, which stylistically is medieval, must sit in the later period of Bourne B production, in the early part of the 15th century.
- A.1.15 Seventeen sherds of post-medieval pottery were identified during the excavations, forming approximately 11% of the assemblage by weight. The majority of the sherds are Bourne D, and include rim sherds from two jugs or cisterns alongside an unabraded sherd from a 16th century Cistercian Type Ware drinking vessel. A single sherd from a plant pot was also recovered.

### ***Assemblage***

- A.1.16 The site was divided into three main phases. The phase assemblages are relatively small and only Phase 2b, and possibly Phase 3, are suitable for limited statistical analysis.

	<b>No. Sherds</b>	<b>Weight (kg)</b>	<b>% of assemblage by weight kg</b>
<b>Phase 1</b>	2	0.023	0.5
<b>Phase 2a</b>	45	0.369	8.6
<b>Phase 2b</b>	169	2.170	50.4
<b>Phase 3</b>	82	1.747	40.5

Table A2: Pottery assemblage by stratigraphic phase

- A.1.17 The levels of residuality are difficult to address as Phase 2a and 2b are of similar date and there is some overlap with the end of the early medieval period, as a result of which

residuality varies from 4% to 42%, dependent upon the inclusion or exclusion of early medieval fabrics. Phase 3, also having a broad date range from the 15th to the mid 17th century, encompasses both medieval, later medieval and post-medieval pottery, therefore only the late Saxon-early medieval pottery, early medieval pottery and some medieval fabrics could be considered residual. In Phase 3 these equate to only 8% of the phase assemblage which is relatively low.

- **Phase 1**

A.1.18 Phase 1 produced little pottery. A section through ditch **123** in Area B produced a single sherd from sooted Early Medieval ware jar, and sections through the enclosure ditch in Area C produced an intrusive sherd from a plant pot.

- **Phase 2 a**

A.1.19 Phase 2a Area B features consisted of parallel ditches, northern ditch **131/260** and southern **153/272** on an east-west alignment, while in Area C another two parallel ditches were recorded, the northern **134** and southern **124/205** (recorded in the evaluation as **02**). These ditches in Areas A and B were all on the same east-west alignments, appear to be the same features, and will be discussed as such.

A.1.20 The northernmost ditch in Area B Ditch produced pottery from **131** and **134** but not from **260**. Ditch **131** produced a mix of jar sherds of 10th to mid 14th century from three contexts. Context 129, the lowest fill from which pottery was recovered, produced three sherds of mid 12th-mid 14th century Unglazed Grimston-Blackborough End Type Ware. Context 128 produced 13 sherds including Early Medieval ware jar rims, an unabraded sherd from a Developed Stamford ware jug, a glazed Ely Ware jug sherd and sherds of Unglazed Grimston-Blackborough End Type Ware. A single sherd of Huntingdon Fen Sandy Ware was recovered from context 127.

A.1.21 By comparison Ditch **134** in Area C produced only two pieces of pottery, both Ely ware sherds, one a glazed jug sherd the other an abraded, undiagnostic, unglazed body sherd.

A.1.22 The southernmost of the parallel ditches in Area B produced pottery from only from **153**, a single sherd from a Stamford Ware bowl. The section through the southernmost ditch in Area C dug during the evaluation and recorded as **02**, produced the earliest post-Roman pottery recovered from the site, a single rim sherd from a smooth Ipswich Ware jar. It was recovered as a residual element alongside six sherds from Early Medieval Ware jars, and an abraded sherd of Ely Ware was recovered from a sample.

A.1.23 From **124** a single sherd from an Early Medieval Ware jar was recovered and pottery in **205** included three sooted Early Medieval Ware jar sherds and seven (0.077kg) moderately abraded sherds of Mid 12th-mid 14th century Lyveden A Type Shelly Ware.

A.1.24 The overall date for both ditches is mid 12th-mid 14th century, however the features are cut by a number of pits that contain pottery of a similar date. It seems likely that the ditches were still open in the mid 12th century and in-filled by the 13th century, after which the pits in Areas B and C were created.

- **Phase 2b**

A.1.25 Phase 2b features are present in both Areas B and C, and although the excavator has discussed these in separate sections the division between the areas has not been adhered to wholly in this report due to the similar nature of the features and their pottery. Some comparison of the assemblages between the areas has been



undertaken, however the relatively small size of the Phase 2a assemblages makes a direct comparison of uncertain value. Not all features have been discussed.

- A.1.26 In Area B a group of inter-cutting pits **87**, **104**, **116**, **121**, produced a small group of sherds dating the features mainly to the 13th-mid 14th century. From this group pit **87**, which appears from the plan to be a large feature, produced three sherds from the neck and rim of a Medieval Ely Ware jug and a single sherd from a Grimston jug. Pit **116** produced the largest group of sherds including a large fragment of a strap handle from a Grimston Ware jug alongside residual sherds from a Stamford Ware jug.
- A.1.27 Two pits **137**, **139** were located close to and truncated ditch **131**. Pit **137** produced eight Medieval Ely Ware jug sherds alongside a residual Early Medieval Ware sherd. Pit **39** and nearby post hole 141 produced single sherds of mid 12th-mid 14th century Unglazed Grimston-Blackborough End Type Ware.
- A.1.28 Pits **221** produced sherds of Early Medieval Ware, medieval Grimston Ware and an intrusive sherd of Late Medieval Ware. Pit **227** produced an assemblage of 16 sherds, a mixture of abraded residual Stamford, Early Medieval Ware sherds and a sherd of Early Medieval Essex Micaceous Sandy Ware. In addition two small Medieval Ely Ware sherds and a rim from a Southeast Fenland Medieval Calcareous Buff Ware jar were recovered.
- A.1.29 A further sherd of Southeast Fenland Medieval Calcareous Buff Ware was recovered from pit **253**.
- A.1.30 There are fewer inter-cutting pits in Area C and where those in Area B are mostly circular or sub-circular, those of Area C are described by the excavator as oval or sub-rectangular in plan.
- A.1.31 Pit **158** is an isolated pit that produced small abraded sherds of Stamford ware, St Neots ware and Early Medieval ware from upper fill 156. The lower fill 157 produced an externally sooted Huntingdon Fen Sandy Ware bowl rim dating to the mid 12th-mid 14th century.
- A.1.32 Pit **198** produced five sherds from four contexts, mainly Early Medieval and Stamford wares, however the primary fill, context 209, produced a sherd of mid 12th-mid 14th century Shelly Ware. It was unclear if the sherd was Developed St Neots or Lyveden A Type Shelly Ware so the general term Shelly Ware is used to describe the sherd.
- A.1.33 From pit **235**, which truncates ditch **124**, a single sherd of Early Medieval Ware was recovered from the uppermost fill. Pit **251** also truncates ditch **124**, and produced medieval sherds from the upper fill, which include the only Lyveden-Stanion Glazed Ware jug sherd recovered from the excavation. Also present were two small sherds of Huntingdon Fen Sandy Ware, a small sherd of Southeast Fenland Medieval Calcareous Buff Ware and two residual sherds of Early Medieval Ware.
- A.1.34 Pit **255** produced five sherds of pottery including a small residual Early Medieval Ware sherd, two large unabraded sherds from a decorated Grimston Ware jug and a strap handle from a Medieval Ely Ware jug. The context dates to the mid 13th-mid 14th century.
- A.1.35 The Assemblage from Phase 2, both Areas B and C is similar and the subdivision does not demonstrate any major differences beyond the greater number of sherds recovered from Area C and a correspondingly larger number of vessels, with one exception where there is a disproportionately smaller number of jug sherds recovered from Area B. This can be seen in Figure 1. The overall variety of vessels present is similar to that observed on rural medieval sites in Cambridgeshire with the dominant form being

medieval jars, and here the numbers are also bolstered by the residual Early Medieval ware sherds. The number of jugs present include a number of residual sherds including sherds of Stamford Ware and a small number of intrusive sherds. The largest number and greatest weight is provided by 16 sherds from Ely Ware jugs, followed by Grimston Ware vessels.

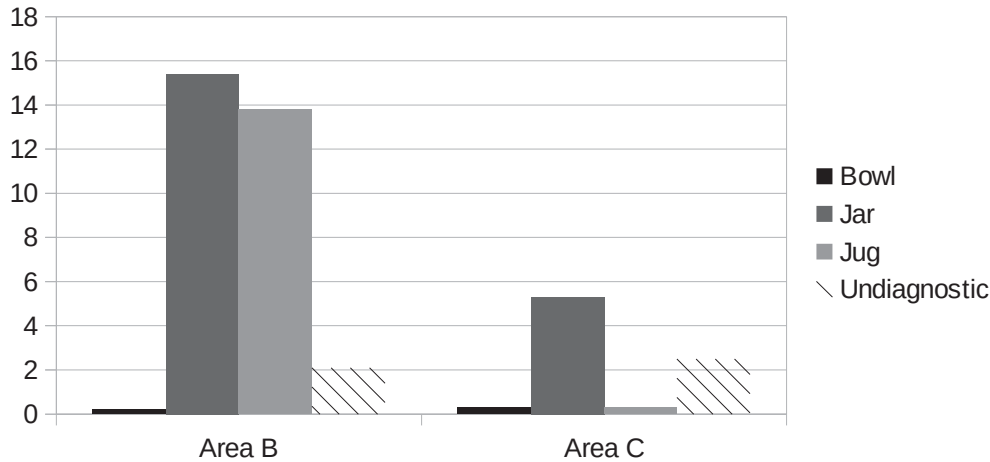


Figure A1 Phase 2 comparison of vessel form between Areas B and C as a percentage of the whole assemblage by weight

A.1.36 The provenance of the assemblage for Phase 2 is strongly skewed towards Norfolk, (with 35% of the total stratified assemblage by weight) which is the source of the majority of the Early Medieval Ware, medieval Unglazed Grimston-Blackborough End Type Ware and the glazed Grimston jugs. Local production from Cambridgeshire provides almost 15% of the total stratified assemblage (by weight), the most important fabric being the glazed and unglazed medieval Ely Ware vessels followed by a small number of Southeast Fenland Medieval Calcareous Buff Ware vessels, Huntingdonshire Fen Sandy Ware and Huntingdonshire Early Medieval Ware. The remainder of the assemblage is made up of small numbers of sherds from counties including Lincolnshire, Essex and Northamptonshire.

• **Phase 3**

- A.1.37 Activity in this phase occurred in both Areas B and C with a smaller number of features than Phase 2. A limited number of features from each area produced pottery therefore the features have been discussed only with reference to the area rather than by area. The features with larger assemblages have been discussed.
- A.1.38 A well, **162**, in Area B produced 13 sherds, weighing 0.155kg, of pottery from two contexts. The majority of the sherds are medieval and include a sherd from a Sible Hedingham Ware jug, a Grimston glazed jug sherd and small sherds of Southeast Fenland Medieval Calcareous Buff Ware. Also present is a large rim sherd from a Bourne D vessel, either a jug or a pitcher, and two late medieval or early post-medieval sherds tentatively identified as Late Medieval and Transitional Ware (Jennings 1981, p61-62, thus overall dating for the fill of the feature is mid 15th century to mid 17th century.
- A.1.39 Pit **77** produced 13 sherds of pottery including eight sherds from a Late Medieval Grimston Ware jug and a rim, neck and attached handle from a hybrid Bourne B-Bourne D jug. The handle is slightly sandy to the touch and appears to be Bourne B, however the neck and rim contain less quartz and are smooth to the touch, similar to post-

medieval Bourne D. This hybrid vessel, which stylistically is medieval, must sit in the later period of Bourne B production sometime in the 15th century. Also present were small sherds of true Bourne D. The suggested date for this pit assemblage is from mid 15th to the end of the 15th century

- A.1.40 From pit **78** the pottery recovered includes eight sherds from medieval Grimston vessels alongside two Late Medieval Ely Ware sherds and four sherds of post-medieval Bourne D ware. The feature has a similar date to pit **77**.
- A.1.41 A feature identified as a pond, **95**, produced the largest group of sherds by weight, 0.572kg consisting of nine sherds. The pottery present includes two large glazed sherds from Bourne B jugs, two large sherds from Bourne D jugs or pitchers and sherds from two drinking vessels. Body sherds were also recovered, one with a handle scar the other with a strap handle, from two 16th century Cistercian type mugs or possibly a tygs. An early to mid 16th century date is suggested for the context.
- A.1.42 Finally pit **224** produced 18 rather small sherds and the assemblage is very mixed. The earliest material is two sherds from a Stamford Ware jug followed by five abraded sherds from a Huntingdonshire Early Medieval Ware jar and a sherd from a Developed Stamford Ware jug. Also present are sherds of medieval Unglazed Grimston-Blackborough End Type Ware, and Grimston and Southeast Fenland Medieval Calcareous Buff Ware. Single sherds of Late Medieval Ely Ware and Late Medieval and Transitional Ware suggest that many of the sherds are residual and the contexts date to the mid to late 15th century.
- A.1.43 The assemblage from Phase 3 does show differences from Phase 2 beyond the greater number of sherds recovered, and a correspondingly larger number of vessels. The vessel distribution between the phases is illustrated in Figure A2. Jugs are the dominant form in Phase 3, with very few bowls or jars, and with those present often only as a residual element. A small number of drinking vessels are also present. The use of non-ceramic vessels for cooking becomes more common in the late medieval and post medieval period and fewer vessels in the assemblage are sooted.

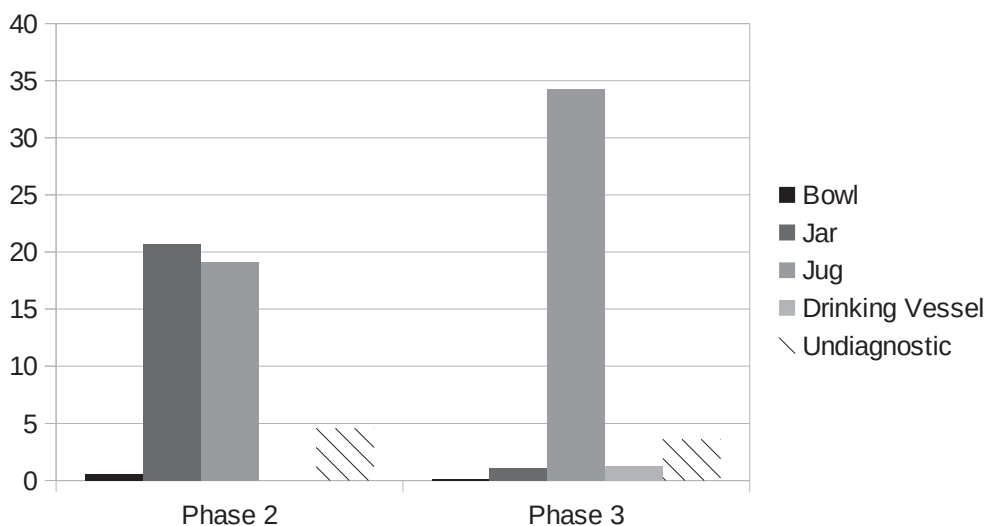


Figure A2 Comparison of vessel form between Phase 2 and 3 as a percentage of the whole assemblage by weight

- A.1.44 The overall variety of vessels present is similar to that observed on rural late medieval-early post-medieval sites in Cambridgeshire. The provenance of the assemblage for Phase 3 is divided between Lincolnshire, with almost 20% of the total assemblage (by

weight), and Norfolk with 16% of the total assemblage (by weight), both including a number of residual sherds. Cambridgeshire fabrics make up only 2% of the assemblage in this phase. The remainder of the assemblage is made up of small numbers of sherds from other counties including Essex.

### **Conclusion**

- A.1.45 The presence of Middle Saxon Ipswich Ware, recovered from a ditch fill, suggests some Middle Saxon activity in the vicinity of the site. The presence of Late Saxon-early medieval and medieval material, although somewhat disturbed by later activity, indicates domestic occupation from the mid 11th century onwards close to the area of excavation.
- A.1.46 Norfolk fabrics in the form of Early Medieval Ware and the later medieval Unglazed Grimston-Blackborough End Type Ware were providing the majority of the day-to-day jar requirements of the domestic assemblage for both cooking and possibly storage. Alongside these, Grimston Ware glazed jugs and a slightly greater number of local medieval Ely Ware glazed and unglazed vessels are used for serving liquids. A small number of other manufactures are also present, including Bourne products from Lincolnshire. This mix of vessels and fabrics is also in evidence in Wisbech itself, where the excavation at Wisbech Castle (Fletcher, 2010a) produced a broad assemblage from medieval to modern, including large numbers of Norfolk vessels and a slightly larger number of Ely ware vessels than Grimston.
- A.1.47 Phase 3 reflects a change in the supply of pottery. Norfolk still dominates, however Lincolnshire fabrics become more important than the local fabrics from the Fenland and Ely. It is unclear what caused this realignment of supply.
- A.1.48 The whole assemblage is broadly domestic in character, and produced a similar although smaller range of fabrics and vessels to those seen in the occupational assemblages from the Wisbech Castle excavations. This assemblage appears to represent mainly rubbish deposition relating to occupation close to the area of excavation.

### **Addendum: Area A pottery summary.**

- A.1.49 The material recovered from Area A was not discussed in the report as the contexts were unphased by the excavator. A summary of the pottery recovered is included here to provide a more complete picture of the overall assemblage from the excavation. The material, if included in the main report, would have had only a small effect on the overall percentages of material by period or phase.
- A.1.50 A total of 51 sherds weighing 0.309kg was recovered from Area A, the section through "The Sea Bank". The majority of the pottery recovered was late Saxon-early medieval or early medieval, with only six sherds of medieval pottery being recovered, two from contexts above ditch **68** and three from within ditch **68**.
- A.1.51 The layers above and around the ditch produced the following: from context 54 a small abraded sherd from a Stamford ware jar, From context 56, two sherds from a medieval Grimston jug and from context 57 a small sherd of St Neots Ware. Context 58 produced the largest number of sherds (11 sherds, 0.041kg), which comprise four small and abraded sherds from a sooted Early Medieval Ware jar, moderately abraded sherds of St Neots Ware and Stamford Ware jars, alongside a sherd of Thetford Ware
- A.1.52 Context 59 produced six sherds, including a rim sherd from an Early Medieval Ware jar, a glazed sherd and sooted sherd from Stamford Ware jug or pitcher and two sherds of

Thetford Ware. Context 60 also produced six sherds, four (including a base sherd) from Early Medieval Ware jars and two sooted and abraded sherds of St Neots.

- A.1.53 Three contexts in ditch **68** produced pottery, of which the suggested upper fill 63, produced two jar sherds of mid 12th-14th century Unglazed Grimston-Blackborough End Type Ware and a similarly dated sherd of Developed St Neots Ware.
- A.1.54 From context 64 six sherds of pottery were recovered, including a moderately abraded medieval Shelly Ware base sherd. It was unclear if the sherd was Developed St Neots or Lyveden A Type Shelly Ware so the general term Shelly Ware is used to describe the sherd. The context also produced a small Stamford Ware sherd and four abraded sherds of Early Medieval Ware.
- A.1.55 Context 66 produced mainly late Saxon-early medieval and early medieval pottery and with the second largest number of sherds was the largest context by weight (10 sherds, 0.095kg). The pottery was mostly moderately abraded and the three sherds of Thetford Ware recovered were relatively unabraded. The other pottery present includes a small sherd from a Stamford Ware jar and a single sooted sherd from an Early Medieval Ware jar. Five small unprovenanced sherds were also recovered that are not closely datable, however they are unglazed and unlikely to be no later than c.1350 and more probably earlier.
- A.1.56 Overall it would appear that the ditch may have been in-filled in the medieval period with fill 66 perhaps representing natural silting, incorporating some pottery thrown into the ditch while it was still open.

### **Pottery Catalogue**

<b>Fabric Name</b>	<b>Fabric Code</b>
Colne Late Medieval Ware	CONLM
Dutch Redware	DUTR
English Stoneware	ENGS
Nottinghamshire or Derbyshire Stoneware	NOTTS
Pearl Ware	PEARL
Post Medieval Black Glazed Ware	PMBL
Refined White Earthen Wares	RFWE
Staffordshire Mottled Ware	STMO
Staffordshire Slipware	STSL
Yellow Ware	YELL

Table A3: Fabric abbreviations not used in the main report that appear in the catalogue:

<b>Context</b>	<b>Fabric</b>	<b>Basic Form</b>	<b>Sherd Count</b>	<b>Sherd Weight</b>	<b>Date range</b>
1	EMW	Jar	6	0.029	Mid 12th-mid 14th century
	IPSW	Jar	1	0.008	
	MEL		1	0.006	
3	EMW		1	0.003	Mid 12th-mid 14th century
	LYVA		1	0.003	

Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
	UGBB	Jar	5	0.176	
	UNK		1	0.013	
5	BOND	Jug	1	0.011	Mid 15th-mid 17th century
9	EMEMS		2	0.007	Mid 12th-early 13th century
	EMW		3	0.022	
	EMW	Jar	12	0.148	
	HUNFSW		1	0.017	
	UGBB	Jar	13	0.122	
10	EMW		3	0.008	Mid 11th-end of the 12th century
	NEOT		2	0.001	
	STAM		1	0.003	
21	EMW		2	0.002	Mid 11th-end of the 12th century
23	STAM	Jar	1	0.007	Mid 9th-mid 12th century
26	SHW		1	0.001	Mid 12th-mid 14th century
	UPG	Jug	1	0.006	
30	BONDT		1	0.001	Mid 12th-mid 14th or mid 15th-mid 17th century
	HUNFSW		1	0.002	
	UGBB		2	0.003	
33	EMW	Jar	1	0.01	Mid 11th-mid 12th century
	NEOT		1	0.001	
41	EMW	Jar	1	0.009	Mid 11th-mid 12th century
49	EMW		1	0.009	Mid 11th-mid 12th century
52	STAM	Jug	2	0.003	Mid 9th-mid 12th century
54	STAM	Jar	1	0.002	Mid 9th-mid 12th century
55	NEOT	Jar	1	0.001	Mid 9th-mid 12th century
	STAM	Jar	1	0.003	
56	GRIM	Jug	2	0.015	Mid 13th-mid 14th century
57	NEOT		1	0.001	Mid 9th-mid 12th century
58	EMW	Jar	4	0.006	Mid 11th-end of the 12th century
	NEOT		3	0.006	
	NEOT	Jar	1	0.004	
	STAM	Jar	2	0.009	
	THET		1	0.016	
59	EMW	Jar	2	0.017	Mid 11th-end of the 12th century
	STAM	Jug	2	0.01	
	THET		2	0.01	
60	EMW	Jar	4	0.045	Mid 11th-end of the 12th century
	NEOT	Jar	2	0.008	
63	DNEOT	Jar	1	0.006	Mid 12th-mid 14th century
	UGBB*	Jar	2	0.013	
64	EMW		4	0.01	Mid 12th-mid 14th century
	SHW		1	0.017	
	STAM	Jug	1	0.003	
66	EMW	Jar	1	0.022	Mid 11th-end of the 12th century

Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
	STAM	Jar	1	0.001	
	UNK	Jar	5	0.038	
	THET	Jar	3	0.034	
71	PMR		1	0.005	16th-mid 17th century
	UNK		1	0.002	
74	BOND		4	0.051	Mid 15th-end of 15th century
	EMW		1	0.002	
	GRIM		8	0.081	
	LMEL		2	0.024	
	UNK		2	0.019	
76	BOND		2	0.015	Mid 15th-end of 15th century
	BOUB-BOND (hybrid)		1	0.162	
	LGRIM		8	0.515	
	MEL		1	0.005	
	UGBB		1	0.003	
88	GRIM	Jug	1	0.007	13th-mid 14th century
	MEL	Jug	3	0.094	
93	BOUB	Jug	4	0.289	16th century
	BOND	Jug	3	0.23	
	CSTN	Drinking Vessel	2	0.053	
103	EMW	Jar	1	0.003	Mid 11th-mid 14th century
	UNK		1	0.002	
108	DNEOT	Jar	1	0.006	Mid 12th-mid 14th century
110	BOND	Jug	1	0.04	Mid 15th-mid 17th century
111	EMW	Jar	1	0.009	13th-mid 14th century
	GRIM		1	0.003	
113	STAM	Jug	1	0.007	Mid 9th-mid 12th century
114	UPG	Bowl	1	0.004	Mid 14th-end of 15th century
115	GRIM	Jug	2	0.092	Mid 13th-mid 14th century
	STAM	Jug	2	0.022	
	UGBB	Jar	2	0.007	
120	GRIM	Jug	1	0.02	Mid 13th-mid 14th century
125	EMW	Jar	0	0.009	Mid 11th-end of the 12th century
126	EMW	Jar	1	0.021	Mid 11th-end of the 12th century
127	HUNEMW	Jar	1	0.006	Mid 11th-end of the 12th century
128	DEST	Jug	1	0.015	Mid 12th-mid 13th century
	EMW		1	0.003	
	EMW	Jar	6	0.019	
	LYVA		1	0.001	
	MEL	Jug	1	0.017	
	THET		1	0.003	
	UGBB	Jar	2	0.022	
129	UGBB	Jar	3	0.025	Mid 12th-mid 14th century
132	MEL		1	0.006	

Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
	MEL	Jug	1	0.032	
136	EMW	Jar	5	0.026	Mid 12th-mid 14th century
	MEL	Jug	8	0.154	
138	UGBB	Jar	2	0.022	Mid 12th-mid 14th century
140	UGBB	Jar	1	0.002	Mid 12th-mid 13th century
142	DEST	Jug	1	0.003	c. mid 13th century
	EMW	Jar	1	0.005	
	GRIM	Bowl	1	0.013	
	GRIM	Jug	1	0.008	
	MEL		2	0.016	
149	MODR	Plant pot	1	0.002	19th century
152	STAM	bowl	1	0.004	Mid 9th-mid 12th century
156	EMW		2	0.005	Mid 11th-mid 12th century
	NEOT		3	0.005	
	STAM	Jar	1	0.003	
157	EMW		1	0.003	Mid 12th-mid 14th century
	HUNFSW	Bowl	1	0.014	
159	BOND	Jug	1	0.07	Mid 15th-end of 15th century
	EMW		2	0.004	
	GRIM		1	0.01	
	LMT		1	0.013	
	LMT	Jug	1	0.016	
	STAM	Jug	1	0.005	
161	GRIM	Jug	2	0.009	13th-mid 14th century
	HEDI	Jug	1	0.015	
	SEFEN		1	0.009	
	SEFEN	Jar	1	0.002	
	UNK		1	0.002	
163	DEST	Jug	1	0.007	Mid 12th-mid 13th century
	EMW		1	0.002	
	MEL		1	0.001	
165	DEST	Jug	1	0.003	Mid 12th-mid 13th century
	EMW	Jar	1	0.005	
	UGBB		2	0.014	
169	HUNEMW		1	0.002	Mid 11th-end of the 12th century
171	EMW		1	0.024	Mid-late 12th century
	EMW	Jar	5	0.024	
	LYVA	Jar	1	0.012	
	STAM	Jug	1	0.047	
	UGBB	Jar	1	0.008	
174	EMEMS	jug	1	0.035	Mid 12th-early 13th century
	EMW	Jar	17	0.446	
	HUNFSW		1	0.015	
	SEFEN	Jug	1	0.07	



Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
175	BOND		1	0.009	c. mid-late 15th century
	UNK		1	0.003	
179	GRIM	Jug	1	0.002	Mid 13th-mid 14th century
	STAM	Jug	1	0.007	
181	EMW	Jar	0	0.009	Mid 11th to end of 12th century
186	EMW		1	0.002	Mid 11th-end of the 12th century
188	EMW		1	0.002	Mid 12th-mid 14th century
	EMW/UGBB	Jar	1	0.015	
197	EMW		1	0.004	c. mid to late 12th century
	EMW	Jar	1	0.017	
	HUNEMW	Jar	2	0.009	
	SEFEN		1	0.01	
200	MEL	Jug	1	0.027	Mid 12th-mid 14th century
204	EMW	Jar	3	0.011	Mid 12th-mid 14th century
	LYVA	Jar	7	0.077	
	UNK	Jar	1	0.004	
208	EMW		2	0.004	Mid 11th-end of the 12th century
209	SHW		1	0.01	Mid 12th-mid 14th century
211	EMW		1	0.003	Mid 11th-end of the 12th century
213	STAM		1	0.004	Mid 9th-mid 12th century
216	EMW		1	0.001	Mid 13th-end of 15th century
	GRIM		1	0.005	
220	EMW		3	0.007	Mid 14th-end of 15th century
	GRIM	Bowl	1	0.006	
	LMEL	Jug	1	0.006	
222	DEST	Jug	1	0.003	15th century
	2 GRIM		1	0.002	
	HUNEMW	Jar	5	0.013	
	LMEL		1	0.011	
	LMT	Jug	1	0.009	
	SEFEN		1	0.008	
	STAM	Jug	2	0.005	
	UGBB		1	0.005	
	UGBB	Jar	1	0.009	
223	EMW	Jar	1	0.002	Mid 12th-mid 14th century
	MEMS	Jar	1	0.011	
	SHW		1	0.002	
	UNK		1	0.002	
225	EMW		6	0.014	Mid 12th-mid 14th century
	2 MEL		1	0.003	
	MEL	Jug	1	0.007	
	SEFEN	Jar	1	0.026	
	SHW		1	0.003	
	STAM		2	0.005	

Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
	STAM	Jug	1	0.001	
	UGBB	Jar	1	0.005	
226	EMEMS		1	0.018	Mid 12th-mid 14th century
	EMW		1	0.004	
237	EMW	Jar	1	0.011	Mid 11th-end of the 12th century
245	EMW/UGBB	Jar	1	0.006	Mid 11th-mid 13th century
250	EMW		1	0.009	13th-mid 14th century
	EMW	Jar	1	0.003	
	HUNFSW	Jar	2	0.004	
	LYST	Jug	1	0.03	
	SEFEN		1	0.002	
252	HUNEMW		2	0.003	Mid 11th-end of the 12th century
	SEFEN	Jar	1	0.05	
254	EMW	Jar	2	0.01	Mid 13th-mid 14th century
	GRIM	Jug	2	0.062	
	MEL	Jug	1	0.018	
266	EMW		1	0.004	Mid 13th-end of 15th century
	GRIM	Jug	1	0.013	
99999	BOND		9	0.201	Mixed unstratified Medieval to 19th century
	BOND	Jug	5	0.426	
	CONLM/LMEL	Bowl	1	0.064	
	DUTR	Bowl	1	0.043	
	EMEMS		2	0.035	
	ENGS		1	0.013	
	GRIM	Jug	2	0.012	
	GRIM	Jug	5	0.03	
	GRIM/BOUB		1	0.12	
	GRIMT	Jug	1	0.079	
	MEL	Bowl	1	0.028	
	MEMS	Jar	1	0.073	
	MODR	plant pot	2	0.011	
	NOTTS	Jar	1	0.007	
	PEARL	Bowl	1	0.007	
	PMBL	Bowl	1	0.009	
	PMBL/MODR		1	0.029	
	PMBL/MODR	Bowl	2	0.014	
	PMR		2	0.009	
	PMR	Bowl	2	0.027	
	PMR	Jar	2	0.016	
	RFWE		3	0.019	
	RFWE	Bowl	2	0.019	
	STAM	Jug	2	0.005	
	STMO	Drinking Vessel	1	0.029	
	STSL	Bowl	2	0.013	

Context	Fabric	Basic Form	Sherd Count	Sherd Weight	Date range
	STSL	Drinking Vessel	1	0.002	
	UGBB		2	0.009	
	UGBB	Jar	1	0.01	
	UNK		2	0.004	
	YELL	Bowl	3	0.031	

Table A4: Catalogue for phased and unphased pottery

## A.2 The Metalwork

*By Nina Crummy*

### **Introduction**

- A.2.1 The assemblage is small and contains only lead and iron objects, the former quite well-preserved, the latter very corroded.
- A.2.2 A number of items relate to textile manufacture, a craft often represented in Saxo-Norman and later medieval urban assemblages. Two fibre-processing shank fragments probably come from wool-combs rather than flax heckles, as the wet fenland soils are not suitable for flax-growing (SF 9, SF 16), and spinning is represented by a lead spindlewhorl (Plate 14). There is no evidence for weaving, but a small fragment of a thin iron shank may come from a needle (SF 15b). All of these objects are typical of the Late Saxon and Norman periods, with similar items found in contemporary contexts at York, the Manor of Goltho in Lincolnshire, Worcester and Winchester (Walton Rogers 1997, 1727-31, 1743; Ottaway & Rogers 2002, 2979; Goodall 1987, 178; Crummy 2004, 407; Biddle 1990, 213, 225; Rees *et al.* 2008, 247-8). The lead spindlewhorl may be later medieval as it comes from the same context as a disc that is probably part of a lead alnage seal of that date (SF 9), a form of cloth-seal used to mark bales of cloth that were of marketable quality.
- A.2.3 Apart from a small fragment of iron sheet (SF 17), the remaining objects are all structural ironwork. Most are nails, but three strap fragments may be from a door, shutter or large wooden chest (SFs 19-21), and part of a pintle or hinge-pivot (SF 14) is probably from a shutter, window or gate (Egan 1998, 43).

### **Catalogue**

Plate 14, SF 8. (93). Pierced truncated conical spindlewhorl. Maximum diameter 29 mm, height 11 mm. Diameter of spindle hole 10 mm. Weight 42 g.

SF 9. (93). Plain thin lead disc, damaged on one side; probably the plain back-plate of an alnage seal. Diameter 27 mm.

SF 16. (85). Iron round-section fibre-processing shank fragment. Length 75 mm.

SF 15a. (85). Iron round-section fibre-processing shank fragment. Length 27 mm.

SF 15b. (85). Thin iron needle or pin shank fragment. Length 10 mm.

SF 14. (74). Iron pintle fragment, with round-section arm (length 54 mm) and square-section pivot (length 39 mm).

SF 19. (85). Iron strip fragment. Length 33 mm, width 18 mm.

SF 20. (85). Iron strip fragment with rounded terminal; one face is slightly convex, the other is flat. Length 93 mm, width 30 mm.

SF 21. (85). Iron strip fragment with rounded terminal. Length 75 mm, width 30 mm.

SF 17. (85). Thin iron sheet fragment, 18 by 25 mm.

SF 7. (49). Iron nail with flat round or oval head. Length 35 mm.

SF 12. (74). Two iron nails with flat or slightly convex round head. a) Length 53 mm, complete apart from the tip. b) Length 30 mm, incomplete.

SF 13. (74). Iron nail shank fragment. Length 23 mm.

SF 15c. (85). i) Iron nail with flat round or oval head. Length 18 mm, incomplete. ii). Nail shank fragment. Length 16 mm.

SF 18. (85). Four iron nails. i) With rectangular head and clenched shank. Length 60 mm. ii) Shank fragment. Length 50 mm. iii) Shank fragment. Length 52 mm. iv) Shank fragment. Length 45 mm.

SF 10. (103). Iron nail shank fragment. Length 43 mm.

SF 11. (103). Iron nail with flat or slightly convex round head. Length 42 mm, incomplete.

SF 6. (175). Iron nail with flat round head. Length 36 mm, incomplete.

SF 3. (179). Iron nail with flat round head. Length 40 mm.

### A.3 Industrial Residues

By Peter Boardman

#### **Introduction and Methodology**

- A.3.1 A total of 625g of industrial residues were recovered from WISWAR10. Slag was recovered during hand-excavation and bulk samples were taken from each of the deposits within the features for retrieval of additional industrial residues.
- A.3.2 The industrial residues are comprise small to medium sized non-magnetic fragments of metalworking slag, glassy fuel ash slag and magnetic slags and residues including microscopic hammerslag, flake hammerscale and spheroidal hammerslag.
- A.3.3 Magnetic residues was recovered from the samples by running a magnet through the washed residues and examination under a binocular microscope at x8 magnification.

Context No.	Cut no.	Metalworking slag (g)	Fuel Ash slag (g)
9		203	
76	77		21
93	95	55	
132	134	211	
136	137	146	
142 (177)	178		14

#### **Results**

*Table A5. Material from hand excavation*

Sample No.	Context No.	Cut No.	Feature Type	Sample Size (L)	Comments	Spheroid	flake	hammerslag
1	1	2	ditch	30	nr sea bank			#
2	3	4	pit	20	nr sea bank			#
8	23	27	ditch	10	bank silts pushed into ditch - no dating evidence		#	#
9	26		layer	10	layer or fill of bigger ditch - no dating evidence	#		#
11	33		ditch	10	primary fill of ditch - no dating evidence			#
12	34		ditch	10		#	#	#
13	39		ditch	10	low er ditch fill	#		#
16	66	68	ditch	10	charcoal rich fill of big ditch - medieval. Fill 66 equates to 68		#	#
19	85	86	pit	10	charcoal in pit fill		#	#
20		90	pond	5	sample from machine slot through possible pond	#	#	#

*Table A6. Hammerscale recovered from environmental samples*

### ***Discussion***

- A.3.4 The metalworking slags recovered from context nos. 9, 93, 132 and 136 are all related to primary iron production in the form of 'blooms'. The material found from contexts 9 and 136 also show elements of burnt clay which suggests that they may have been resting on or formed a smelt base during the heating process. The material from context 132 is very dense for its size. The voids evident within it are small, suggesting that it has cooled slowly. This could also indicate that it is part of the material formed low down in the smelt.
- A.3.5 Fuel ash slag forms during the reaction between siliceous materials such as clay and sand and alkalis in the ash produced from the furnace fuel. The material from context 76 is consisted mainly of compacted and heated ash and the small piece from context no. 142 is slightly glassy compacted cinder.
- A.3.6 Hammerscale is indicative of the smithing process and has been recovered in both its forms as flake hammerscale which is produced when iron is forged and as spheroidal hammerscale which results from the primary smithing of iron bloom and also during the welding process (Starley, D 1995). Both types have been recovered from samples. The levels of hammerscale are very small and does not suggest that smithing or smelting has taken place on this site. The nature of the slag deposits suggests that production of iron has happened somewhere close to the site, however it could also be suggested that industrial waste has been transported from else where, possibly mixed in with other material.

### ***Statement of Research Potential***

- A.3.7 The amounts of hammerscale and metallic residues are small and could be described background levels on a site where metal working has taken place nearby.

### ***Further Work and Methods Statement***

- A.3.8 No further work is required at this stage.
- A.3.9 If further excavation is planned, detailed sampling should be undertaken as investigation on the nature of the metallurgical activities taking place at this site.

## APPENDIX B. ECOFACTS REPORTS

### B.1 Faunal Remains

*By Chris Faine*

#### **Introduction**

- B.1.1 13.3 Kg of faunal material was recovered from the excavation at Waterlees Road, Wisbech, yielding 119 “countable” bones (see below). All bones were collected by hand apart from those recovered from environmental samples; hence a bias towards smaller fragments is to be expected. Residuality appears not to be an issue and there is no evidence of later contamination of any context. Faunal material was recovered from a variety of feature types dating from the Saxon to Late Medieval periods. Two-hundred and nine fragments of bone were recovered, with 119 identifiable to species (56.9% of the total sample).

#### **Methodology**

- B.1.2 All data was initially recorded using a specially written MS Access database. Bones were recorded using a version of the criteria described in Davis (1992) and Albarella & Davis (1994). Initially all elements were assessed in terms of siding (where appropriate), completeness, tooth wear stages (also where applicable) and epiphyseal fusion. Completeness was assessed in terms of percentage and zones present (after Dobney & Reilly, 1988). Initially the whole identifiable assemblage was quantified in terms of number of individual fragments (NISP) and minimum numbers of individuals MNI (see table 1). The ageing of the population was largely achieved by examining the wear stages of cheek teeth of cattle, sheep/goat and pig (after Grant, 1982). Wear stages were recorded for lower molars of cattle, sheep/goat and pig, both isolated and in mandibles. The states of epiphyseal fusion for all relevant bones were recorded to give a broad age range for the major domesticates (after Getty, 1975). Measurements were largely carried out according to the conventions of von den Driesch (1976). Measurements were either carried out using a 150mm sliding calliper or an osteometric board in the case of larger bones.

#### **The Assemblage**

- B.1.3 Table B1 shows the species distribution for the entire assemblage. The assemblage is dominated by cattle and sheep/goat remains along with smaller numbers of pig and horse. The large number of horse fragments (NISP) can be explained by the presence of a semi articulated skeleton (**181**). The rest of the assemblage is comprised of small fauna including domestic duck, eel and anuran amphibian remains.
- B.1.4 Cattle remains consist of a variety of skeletal elements from adult (i.e. physically mature) animals, with a single mandible being recovered from an animal around 2-3 years old. Only two sexable elements were recovered, consisting of two male horncores from contexts **138** and **240**. Sheep/Goat body part distribution is more limited, consisting of cranial fragments, lower limb elements and portions of the axial skeleton. Two ageable mandibles were recovered from animals around 1-2 years of age at death. Pig remains are limited to mandible and tibia fragments, with a single ageable mandible



being recovered from animal around 7-14 months old. Scattered adult horse remains were recovered from a variety of contexts, with an intact metacarpal being recovered from animal with a withers height of 1.45m (14 hands). The skull and axial skeleton (along with fragmentary long bones) was also recovered from context **181**. Aged using tooth wear to around 7-8 years of age at death, the animal had a withers height of around 1.4m (14 hands). Bird remains are limited to a cranium of medium sized duck and an unidentified digit. Remains of single anuran amphibian were recovered from context **226** along with a single vertebra from **136**. A number of eel vertebrae were recovered from **138**, along with a single small mammal 3<sup>rd</sup> molar.

### Conclusions

B.1.5 Although small, the assemblage most likely represents a mixed economy, with animals kept to adulthood for breeding, meat and secondary products. Cattle were present on the site as whole carcasses if not live animals. Sheep and pigs were butchered on site, with meat bearing elements being transported elsewhere. It is likely that the horse remains represent mounts, as the use of horses for traction occurred later in East Anglia (Late Medieval) than in other parts of Britain (Langdon, 1986). The horse from context 181 does not necessarily indicate deliberate deposition and could instead have been deposited by flooding. Small animal remains are indicative of the local environment.

	<b>NISP</b>	<b>NISP%</b>	<b>MNI</b>	<b>MNI%</b>
Cattle ( <i>Bos</i> )	38	31.9	23	43.3
Sheep/Goat ( <i>Ovis/Capra</i> )	21	17.6	13	24.6
Pig ( <i>Sus scrofa</i> )	6	5	6	11.3
Horse ( <i>Equus caballus</i> )	30	25.2	5	9.4
Domestic Duck ( <i>Anas sp.</i> )	1	0.9	1	1.9
Anuran Amphibian ( <i>Rana/Bufo</i> )	13	10.9	2	3.8
Eel ( <i>Anguilla anguilla</i> )	8	6.7	1	1.9
Unid. Bird	1	0.9	1	1.9
Unid. Small Mammal	1	0.9	1	1.9
<b>Total:</b>	<b>119</b>	<b>100</b>	<b>53</b>	<b>100</b>

Table B1: Species distribution for the assemblage.

## B.2 Environmental Remains

By Rachel Fosberry

### **Introduction and Methodology**

- B.2.1 A total of 45 samples were taken from features within the excavated areas of the site.
- B.2.2 Features sampled include pits and ditches dating primarily from the early medieval period c1050 AD up to the 19th century. Samples were also taken from across the 'Roman Bank' sea defence.
- B.2.3 Ten litres of each sample were processed by tank flotation for the recovery of charred plant remains, dating evidence and any other artefactual evidence that might be present. The flot was collected in a 0.3mm nylon mesh and the residue was washed through a 0.5mm sieve. Both flot and residue were allowed to air dry. The dried residue was passed through 5mm and 2mm sieves and a magnet was dragged through each resulting fraction prior to sorting for artefacts. Any artefacts present were noted and reintegrated with the hand-excavated finds. The flot was examined under a binocular microscope at x16 magnification and the presence of any plant remains or other artefacts are noted on Table B2.

### **Quantification**

- B.2.4 For the purpose of this initial assessment, items such as seeds, cereal grains and small animal bones have been scanned and recorded qualitatively according to the following categories  
# = 1-10, ## = 11-50, ### = 51+ specimens
- B.2.5 Items that cannot be easily quantified such as charcoal, magnetic residues and fragmented bone have been scored for abundance  
+ = rare, ++ = moderate, +++ = abundant

### **Results**

- B.2.6 The results are recorded on Table B2.
- B.2.7 Preservation is predominantly by charring and is generally good. Plant remains preserved by waterlogging in anoxic conditions occur frequently in many of the samples. This is due to the high water table and probably seasonal flooding that would have occurred throughout the history of the site.
- B.2.8 Charred cereal grains are common in the plant assemblage. All four of the main cereal types; barley (*Hordeum* sp.), wheat (*Triticum aestivum/durum*), rye (*Secale cereale*) and oats (*Avena* sp.) are represented. Barley and wheat predominate.
- B.2.9 Charred weed seeds include stinking mayweed (*Anthemis cotula*), brassicas (*Brassica* sp.), cleavers (*Gallium aparine*), corn gromwell (*Lithospermum arvense*), dock (*Rumex* sp.) and clover (*Trifolium* sp). Wetland plants include seeds of spike-rush (*Eleocharis* sp.) and leaf blades of saw-sedge (*Cladium mariscus*).

Sample No.	Context No.	Cut No.	Assessment date range	Area/Trench	Feature type	Comments	Preservation	Ceramics	Charred Legumes	Charred Seeds	Untraced Seeds	Snails from flotation	Small Bones	Charcoal <2mm	Charcoal >2mm	Flot comments	Small animal bones	Large animal bones	Fishbone	Marine molluscs	Pottery	CBM	Slag	Metal	Residue comments		
1	1	2	1150-1350		ditch	close to sea bank	Charred	#	0	0	0	0	0	+++	++	Fishscale, fishbone, wheat and barley	#	0	0	#	0	0	0	0			
2	3	4	1150-1350		pit	close to sea bank	Charred	#	0	0	0	0	0	+++	++	wheat and barley, ostracods	#	0	0	0	0	0	0	0			
3	5	6	1450-1650		pit	close to sea bank	Charred	#	0	0	0	0	0	+++	++	wheat, Brassica sp., fishscale	#	0	0	0	0	0	0	0			
4	10		1050-1200		layer	remnants of defensive bank - no dating evidence	Charred	#	0	0	0	0	0	+	+	Rye	0	0	0	0	0	0	0	0			
5	12				layer	remnants of defensive bank - no dating evidence	Charred	0	0	0	0	0	0	+	+	fishscale	0	0	0	0	0	0	0	0			
6	15				layer	layer over bank - no dating evidence	Charred	0	0	0	0	0	0	+	++	charcoal only	0	0	0	0	0	0	0	0			
7	20	27	850-1150		ditch	primary fill of ditch other side of bank - dating evidence?	Charred	#	0	0	0	##	#	++	++	wheat, small bones, coal, snails	0	0	0	0	0	0	0	0	0		
8	23	27	prob post conquest	1	ditch	bank silt pushed into ditch - no dating evidence	Charred	0	0	0	0	0	0	+	++	Coal, hammerscale	0	0	#	0	0	0	0	0			
9	26		1150-1350	1	layer	layer or fill of bigger ditch - no dating evidence	Charred	#	0	0	0	0	0	++	+	oat	#	0	0	0	0	0	0	0			
10	28				layer	remnants of bank in Tr.1 - natural or imported silt	Charred	0	0	0	0	0	#	++	++	fish bones, mussel shell	0	0	0	0	0	0	0	0	0		
11	33		1050-1150	5	ditch	primary fill of ditch - no dating evidence	Charred	#	0	0	0	0	0	+++	+	wheat and barley, ostracods	#	0	#	0	0	0	0	0	0		
12	34				ditch	layer or fill of bigger ditch - no dating evidence	Charred	#	0	0	0	0	0	+++	+	abraded grains, hammerscale	0	0	0	0	0	0	0	0	0		
13	39				ditch	lower ditch fill	Charred	#	0	0	0	0	#	++	++	abraded grains, hammerscale, small bones	#	0	0	0	0	0	0	0	0		
14	41		1050-1200	5	layer	natural? No dating evidence	Charred	0	0	0	0	###	0	++	++	snails	0	0	#	0	#	0	0	0	0	Some bone burnt.	
15	61				layer	grey silty fill of ditch taken from sondage	Charred and waterlogged	##	0	0	#	0	0	+++	++	w/ = <i>hyocyanus niger</i> , <i>Juncus</i> sp., <i>Daphnia</i> , ostracods	0	#	#	0	#	0	0	0	0	Mussel shell	
16	66	68	1150-1350	A	ditch	charcoal rich fill of big ditch - medieval. Fill 66 equates to 68	Charred	##	0	0	#	0	0	+++	++	spores, un-id seed ( <i>Matricaria?</i> )	#	0	##	0	#	0	0	0	0	eggshell, mussel shell, some bone burnt	
17	67	68	1150-1350	(PROBABLY A)	ditch	charcoal rich fill of big ditch - medieval. Fill 66 equates to 68	Charred and waterlogged	0	0	##	##	0	0	+++	++	<i>Daphnia</i> , ostracods, <i>Eleocharis</i> sp., <i>Lemna</i> sp., <i>Potamogeton</i> sp.	0	0	0	#	0	0	0	0	0		
18	81	82			pit	large pit with charcoal, part of intercutting group. No dating evidence	Charred	0	0	0	0	0	0	+	+		0	0	0	0	0	0	0	0	0	No finds	
19	85	86			pit	charcoal in pit fill	Charred	###	0	0	##	#	#	+++	++	Charred stems, culm nodes, burnt eggshell, <i>Chara oogonia</i> , <i>Urtica</i> sp.	##	0	##	0	0	#	0	#	0	No finds rich, cockles, burnt mussels, eggshell, iron object, coal, charred beans and peas, burnt bone, charcoal	
20	90	95			pond	sample from machine slot through possible pond	Charred and waterlogged	#	0	0	#	##	0	++	0	Poor preservation of charred remains, Ostracods, <i>Sambucus</i> sp., <i>Potamogeton</i> sp.	0	0	0	0	0	0	0	0	0	0	green glass 1cmx1cm, coal
21	91	95			pond	sample from machine slot through possible pond	Charred and waterlogged	#	0	0	0	###	0	+	0	predominantly snails	0	0	0	0	0	0	0	0	0	No finds	
22	92	95			pond	sample from machine slot through possible pond	Charred and waterlogged	#	0	0	#	##	0	++	++	Charred Anthemis cotula, ostracods	0	0	0	#	0	0	0	0	0	0	mussel shell
23	93	95	1500-1600	C	pond	sample from machine slot through possible pond	Charred and waterlogged	##	0	##	##	0	0	+++	+	Charred beans, <i>Polygonum persicaria</i> , <i>cladium leaf</i> , Ostracods	#	0	0	0	0	0	0	0	0	0	charred beans
24	89	87			pit	uppermost pit fill	Charred and waterlogged	#	0	0	##	#	0	++	+	Poor preservation of charred remains, Ostracods and <i>Lemna</i> sp.	0	0	0	0	0	0	0	0	0	0	No finds
						burnt dark fill of ditch, thin build up	waterlogged																				

Sample No.	Context No.	Assessment date range	Area/ Trench	Feature Type	Comments	Preservation	Charred	Ceramics	Chaf Legumes	Charred Weeds	Untrapped Seeds	Small Bones	Charcoal <2mm	Charcoal >2mm	Fishscale	Flot comments	Small animal bones	Large animal bones	Fishbone	Marine molluscs	Pottery	CBM	Slag	Metal	Residue comments		
25	108	109	B	ditch	on base and sides burnt, dark fill of ditch. Thin build up on base and sides	Charred	#	0	0	0	0	0	++	++				#	0	0	0	0	0	0	fish bone		
26	132	134 1150-1350	C	ditch	upper fill resting on base fill of possible boundary ditch	Charred		0	0	0	##	0	+	0	Ostracods		0	0	0	0	0	0	0	0			
27	138	139 1050-1200	B	pit	single fill of sub-rectangular pit containing horn core, pottery and rare charcoal	Charred and mineralised	###	0	##			#	+++	++	Burnt snails, numerous insect fragments, mineralised fly puparia, Sambucus sp., Taraxacum sp.		0	0	#			0	0	0	eel bones		
28	136	137 1150-1350 (c.1200)	B	pit	base fill of pit cut into top of ditch 131. Contains frequent fired clay and pottery	Charred	0	0	0	##	0	#	++	+	charred small Poaceae, junco sp., spores, fishbone		#	0	0	0	0	0	0	0			
29	129	131 1150-1350 (c.1150-1200)	B	ditch	burnt layer in ditch, secondary fill containing burnt grain and charcoal. High water table	Charred	##	0	0	##	0	#	+++	+++	Grain rich, Lithospermum arvense		0	#				0	0	0	mussel shell		
30	140	141 1050-1350	B	post hole	single fill of post hole containing pot and occasional charcoal	Charred	##	0	0	#	0	0	++	+	Polygonum persicaria		0	#	0	0	0	0	0	0			
31	114	122 1200-1500	B	pit	Charred	Charred	#	0	0	#	#	#	+++	+++	fishbone, charred Brassica sp.		0	0	#			0	0	0	cockle shell		
32	149	150 1800+	C	ditch	cessy ditch fill red sandy clay fill in lozenge shaped pit - only contains 1 bone sherd. Function unknown	Charred	0	0	0	0	#	0	++	+	w/1 = lemma sp., Junco sp., ostracods		0	0	0	0	0	0	0	0	0	No finds	
33	154	155		pit	Function unknown	Charred	0	0	0	0	0	0	0	0	no cpr small charred seeds, w/1 = Junco sp. Ostracods		0	0	0	0	0	0	0	0	0	No finds	
34	107	109	B	ditch	in terminus of enclosure ditch	Charred	##	0	0	#	0	0	++	++	eggshell, charred Brassica/synopsis sp. Chara oregonia		0	0	0	0	0	##	0	0	0		
35	163	164 1150-1250	C	pit	fill of small pit or possibly posthole	Charred	##	0	0	#	#	0	++	+	sp. Chara oregonia		#	0	#	0	0	0	0	0	0	mussel shell	
36	165	167 1150-1250	C	pit	large pit containing medieval pottery flecks - isolated feature	Charred	##	0	0	0	0	##	++	+	fish bone and fish scale		0	#	0	#	0	0	0	0	0		
37	157	158 1050-1350	C	pit	large, deep pit with pot and charcoal	Charred	0	0	0	0	0	0	++	+	charcoal only		0	0	0	0	0	0	0	0	0	No finds	
38	171	172 c.1150	C	pit	single dark ditch fill contains medieval pottery	Charred	##	0	0	0	0	#	++	+	Charred Anthemis sp., fishbone		#	0	0	0	#	0	0	0	0		
39	188	1150-1350 (c.1150-1200)	C	grave	sample from around horse skeleton 181. May have been dumped or washed in with flood silts	Charred	0	0	0	0	0	#	+	+	no cpr other than sparse charcoal uncharred carex, Taraxacum = modern or w/1?		0	##	0	0	0	0	0	0	0		
40	174	173 1150-1200	B	pit	dark grey upper fill of pit. Lots of pottery and mussel shell	Charred	##	0	0	0	#	0	+	+	occasional grains		0	#	0	##	0	0	0	0	0	mussel shell	
41	204	205 1150-1350	C	ditch	silty ditch fill containing shells	Charred	#	0	0	0	0	0	+	0	Charred Anthemis sp., Lithospermum arvensis, brassica sp., Rumex sp., rachis fragments		0	0	0	0	0	0	0	0	0		
42	211	198 1050-1200	C	pit	very dark fill of large square pit containing brick fragments, pottery and bone	Charred	##	0	0	##	#	#	+++	+	Mainly pure grain with some Silicates, awn, charred gallium sp., slightly ashy		0	0	#	0	0	##	0	0	0	0	
43	226	227 1150-1300	B	pit	black fill of deep pit. Charcoal rich and charred grain noted.	Charred	#	0	0	#	0	0	+++	+++	Ashy, numerous grain, Anthem. cotula, Eleocharis sp.		##	0	0	#	0	0	0	0	0	0	mussel shell
44	232	230		pit	black fill of pit. Lots of charcoal and mussel shells	Charred	##	0	0	##	0	0	+++	+++	Charred Anthemis cotula, Lithospermum sp., Trifolium sp.		#	0	0	#	0	0	0	0	0	mussel shell	
45	258	259				Charred	#	0	0	##	#	0	+++	+++			0	0	0	0	0	0	0	0	0		

- B.2.10 Seeds of plants preserved by waterlogging include elder (*Sambucus* sp.), nettle (*Urtica* sp.), rush (*Juncus* sp.) henbane (*Hyoscyamus niger*)
- B.2.11 Obligate aquatics occur in several of the samples and include duckweed (*Lemna* sp.), pondweed (*Potamogeton* sp.), and charophyte oogonia (*Chara* sp.).
- B.2.12 Charcoal fragments are present in most of the samples in varying quantities.

#### Discussion

- B.2.13 The charred plant assemblages from all phases of deposits from this site are dominated by crop plants in the form of cereal grains and legumes. The poor representation of crop processing waste such as culm nodes and rachis fragments suggests that the crops had been cleaned elsewhere, possibly in an unexcavated area of the site. Wheat grains are common and may have been accidentally spilled and burnt whilst grinding into flour. Barley was used as a whole grain for animal fodder but may have been used for human consumption in soups and stews and was also used for the brewing of beer. No germinated grains were recovered to suggest brewing activities at this site. Oats and rye are less common. Rye did not become an important crop until the Saxon and medieval period (Van der Veen, 1992). Charred peas and beans are an example of other dietary constituents and represent a cultivated crop. The low occurrence of pulses is probably because they are less likely to be burnt accidentally than grain as they do not need to be exposed to heat as cereals do.
- B.2.14 The seed assemblage is restricted to a few weed seeds, probably crop weeds such as cleavers and stinking mayweed along with plants that would have been growing around the site such as nettles, saw sedge and rushes. They provide a clear picture of the local environment of damp grassland and suggest the cultivation of heavy clay soils by the presence of stinking mayweed which is specific to this habitat. Saw sedge was one of the major vegetation types of the Fen and was commonly used as fuel and the rushes could have been used as flooring material. Nettles and the poisonous plant henbane, require nitrogen rich disturbed soils suggesting animal manure and/or middens/dung heaps in the vicinity.
- B.2.15 Ostracods are small bivalve crustaceans that inhabit the bottom of aquatic habitats such as lakes, ponds and streams (freshwater) or marine. The eppiphium (egg cases) of the water-flea (*Daphnia* sp) are indicative of standing water and duckweed and pondweed grow in standing or slow flowing water. The presence of these aquatic organisms is not unexpected as the site would have been subjected to flooding and the water table is high.
- B.2.16 The samples from the various layers within the sea defence bank contain plant remains that are consistent with disturbed deposits. These included charred grains that are abraded due to redeposition and fish bones, scales, mussel shells and ostracods that could have derived from imported silts.
- B.2.17 The early medieval ditch in Trench A contains plant remains that have been preserved by waterlogging and are comprised of rushes and wet-land plants that would have been growing along the bank-side. The presence of charred plant remains and animal bones indicate the disposal of domestic refuse into this ditch.
- B.2.18 The plant assemblage does not show any real distinction between the different phases of the site. Grain-rich features are more common in Area B but show no pattern of spatial distribution.

- B.2.19 The samples from layers within pond 95 are somewhat confusing in that the upper layers contain the most waterlogged plant remains and the lowest layer 93 (Sample 23) contains more charred remains including charred grain and pulses, perhaps indicating a single depositional event of burnt refuse.
- B.2.20 Samples of note include Sample 43, pit fill 219 which forms a cluster with other unsampled pits. Sample 43 contains abundant charred grain, mussel shells and bone elements and appears to be a midden deposit.
- B.2.21 Samples 27 (pit fill 139), 28 (pit fill 137), 29 (ditch fill 131) and 30 (post hole fill 141) come from a cluster of features in Trench 4 in Area B. Sample 29 is grain rich as is, to a slightly lesser extent Sample 27. It is unclear whether these features are contemporary as the pit seems to be cut into the trench but this may have been for a deliberate function. The pit also contained eel bones along with general refuse including horn cores and pottery. It is remotely possible that this pit was a holding pen for eels which would have been achievable had the ditch contained water as seems likely.

### ***Conclusions***

- B.2.22 In summary, the plant assemblage from this site is dominated by cereal grains, pulses and other dietary remains of fragments of animal bone and mussel shells and are probably derived from the deposition of small quantities of burnt domestic refuse.
- B.2.23 Although a number of the assemblages do contain a sufficient density of material for quantification, analysis would probably add little to the data contained within this assessment as much of the material appears to be from secondary contexts. No further work is recommended at this stage.

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#### Websites Consulted

**[www.heritage.norfolk.gov.uk](http://www.heritage.norfolk.gov.uk)**

[www.heritagegateway.org.uk](http://www.heritagegateway.org.uk)



## APPENDIX A. OASIS REPORT FORM

All fields are required unless they are not applicable.

### Project Details

OASIS Number	oxfordar3-78104			
Project Name	Archaeological Investigations at "The Spinney", Waterlees Road, Wisbech			
Project Dates (fieldwork)	Start	22-02-2010	Finish	01-04-2010
Previous Work (by OA East)	No		Future Work	No

### Project Reference Codes

Site Code	WISWAR10	Planning App. No.	F/YR09/2015/CCC
HER No.	ECB 3355	Related HER/OASIS No.	

### Type of Project/Techniques Used

Prompt: Direction from Local Planning Authority - PPG16

### Please select all techniques used:

<input type="checkbox"/> Field Observation (periodic visit)	<input type="checkbox"/> Part Excavation	<input type="checkbox"/> Salvage Record
<input checked="" type="checkbox"/> Full Excavation (100%)	<input type="checkbox"/> Part Survey	<input type="checkbox"/> Systematic Field Walking
<input type="checkbox"/> Full Survey	<input type="checkbox"/> Recorded Observatic	<input type="checkbox"/> Systematic Metal Detector Surve
<input type="checkbox"/> Geophysical Survey	<input type="checkbox"/> Remote Operated Vehicle Survey	<input type="checkbox"/> Test Pit Survey
<input checked="" type="checkbox"/> Open-Area Excavation	<input type="checkbox"/> Salvage Excavation	<input type="checkbox"/> Watching Brief

### Monument Types/Significant Finds Their **Periods**

List feature types using the [NMR Monument Type Thesaurus](#) and significant finds using the [MDA Object type Thesaurus](#) together with their respective periods. If no features/finds were found, please state "none".

Monument	Period	Object	Period
Bank	Medieval 1066 to 1540	Pottery	Medieval 1066 to 1540
Drainage Ditches	Medieval 1066 to 1540	Animal Bone	Medieval 1066 to 1540
Pits	Medieval 1066 to 1540		Select period...

### Project Location

County	Cambridgeshire	Site Address (including postcode if possible)	
District	Fenland	"The Spinney", Waterlees Road, Wisbech Cambs. PE13 3HE	
Parish	Wisbech		
HER	Cambridgeshire		
Study Area	1422sq m	National Grid Reference	TF 4696 1095

### Project Originators

Organisation	OA EAST
Project Brief Originator	Dan McConnell, CAPCA
Project Design Originator	Taleyna Fletcher, Oxford Archaeology East
Project Manager	Richard Mortimer
Supervisor	Taleyna Fletcher

### Project Archives

Physical Archive	Digital Archive	Paper Archive
CCC Stopres, Landbeach	OA East Offices, Bar Hill	CCC Stores, Landbeach
WISWAR10	WISWAR10	WISWAR10

### Archive Contents/Media

	Physical Contents	Digital Contents	Paper Contents
Animal Bones	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Ceramics	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Environmental	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Glass	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Human Bones	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Industrial	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Leather	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Metal	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Stratigraphic		<input type="checkbox"/>	<input type="checkbox"/>
Survey		<input type="checkbox"/>	<input type="checkbox"/>
Textiles	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Wood	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Worked Bone	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Worked Stone/Lithic	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Other	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Digital Media	Paper Media
<input type="checkbox"/> Database	<input type="checkbox"/> Aerial Photos
<input checked="" type="checkbox"/> GIS	<input checked="" type="checkbox"/> Context Sheet
<input type="checkbox"/> Geophysics	<input checked="" type="checkbox"/> Correspondence
<input checked="" type="checkbox"/> Images	<input type="checkbox"/> Diary
<input checked="" type="checkbox"/> Illustrations	<input checked="" type="checkbox"/> Drawing
<input type="checkbox"/> Moving Image	<input type="checkbox"/> Manuscript
<input type="checkbox"/> Spreadsheets	<input type="checkbox"/> Map
<input checked="" type="checkbox"/> Survey	<input type="checkbox"/> Matrices
<input checked="" type="checkbox"/> Text	<input type="checkbox"/> Microfilm
<input type="checkbox"/> Virtual Reality	<input type="checkbox"/> Misc.
	<input checked="" type="checkbox"/> Research/Notes
	<input checked="" type="checkbox"/> Photos
	<input checked="" type="checkbox"/> Plans
	<input checked="" type="checkbox"/> Report
	<input checked="" type="checkbox"/> Sections
	<input checked="" type="checkbox"/> Survey

### Notes:



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Figure 1: Location of excavation trenches (A-C, black) and evaluation trenches (1-5) showing the development area outlined (red) and projected historic sea defense (orange)

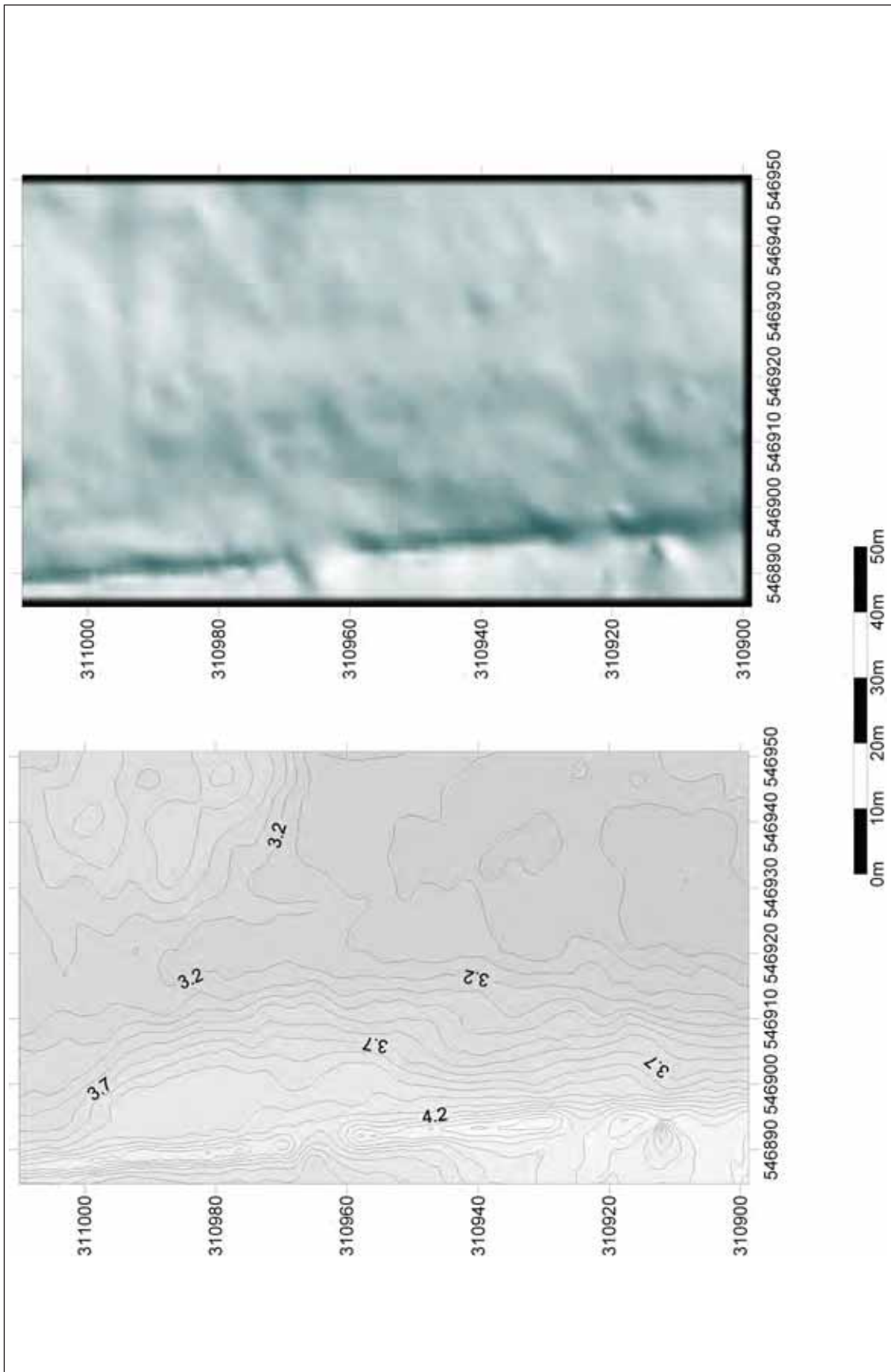


Figure 2: Earthwork survey of the "Sea Bank".

rench 1

rench 2

rench 4

rench

rench

Area B

Area



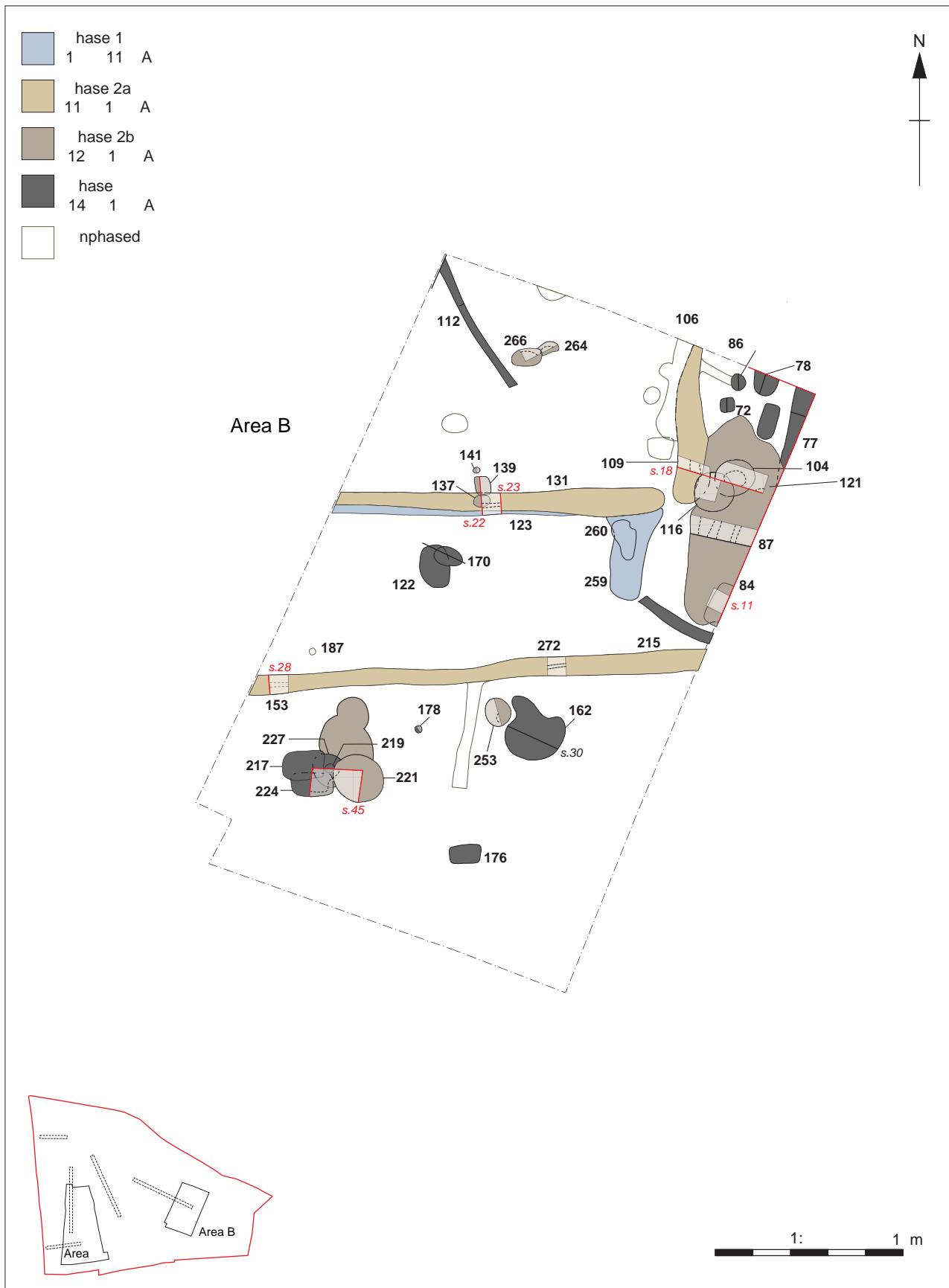


Figure 4: Excavation plan Area B.



Figure : Excavation plan Area .

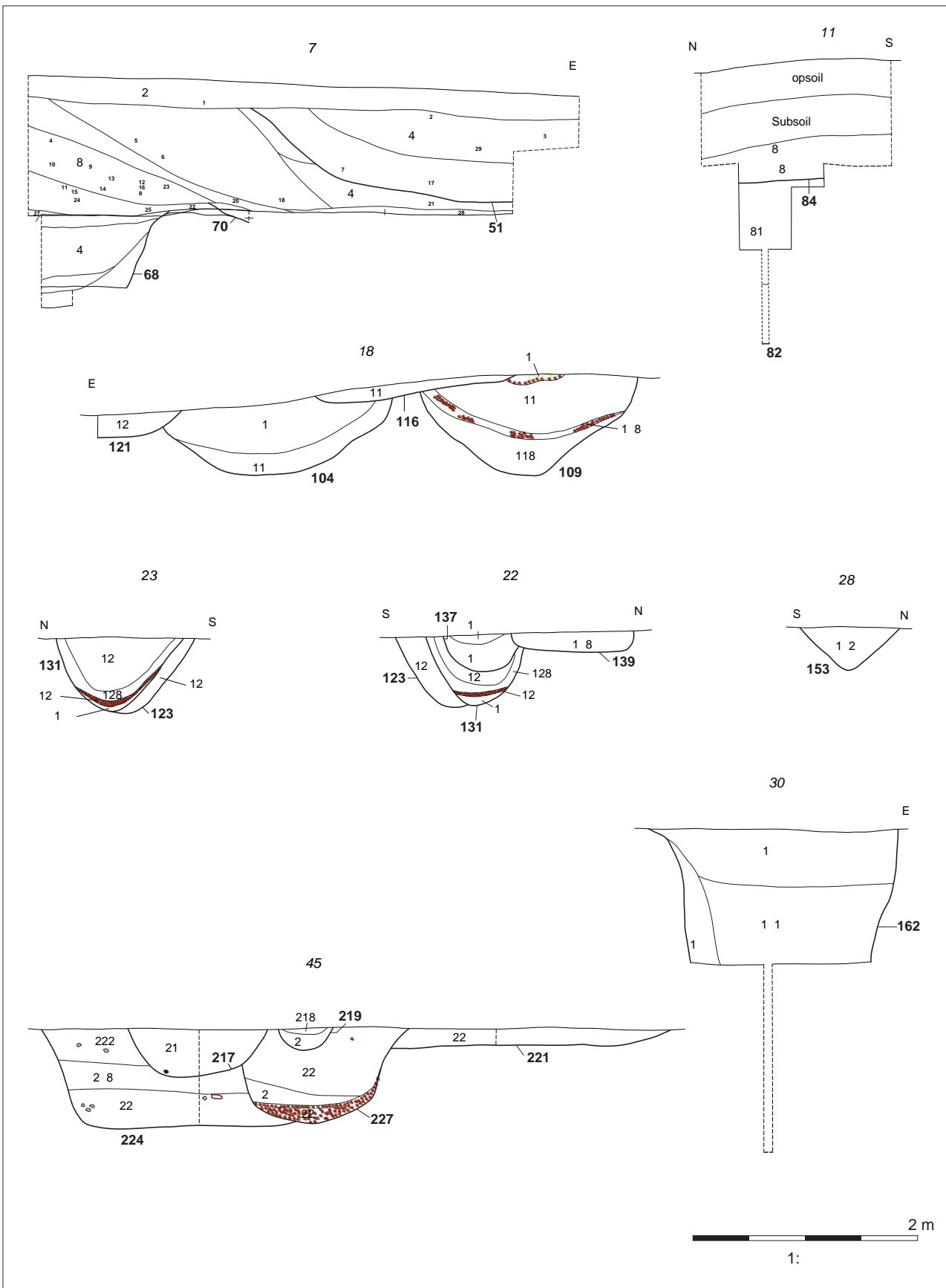


Figure : Sections from Sea Bank Area A and Area B.



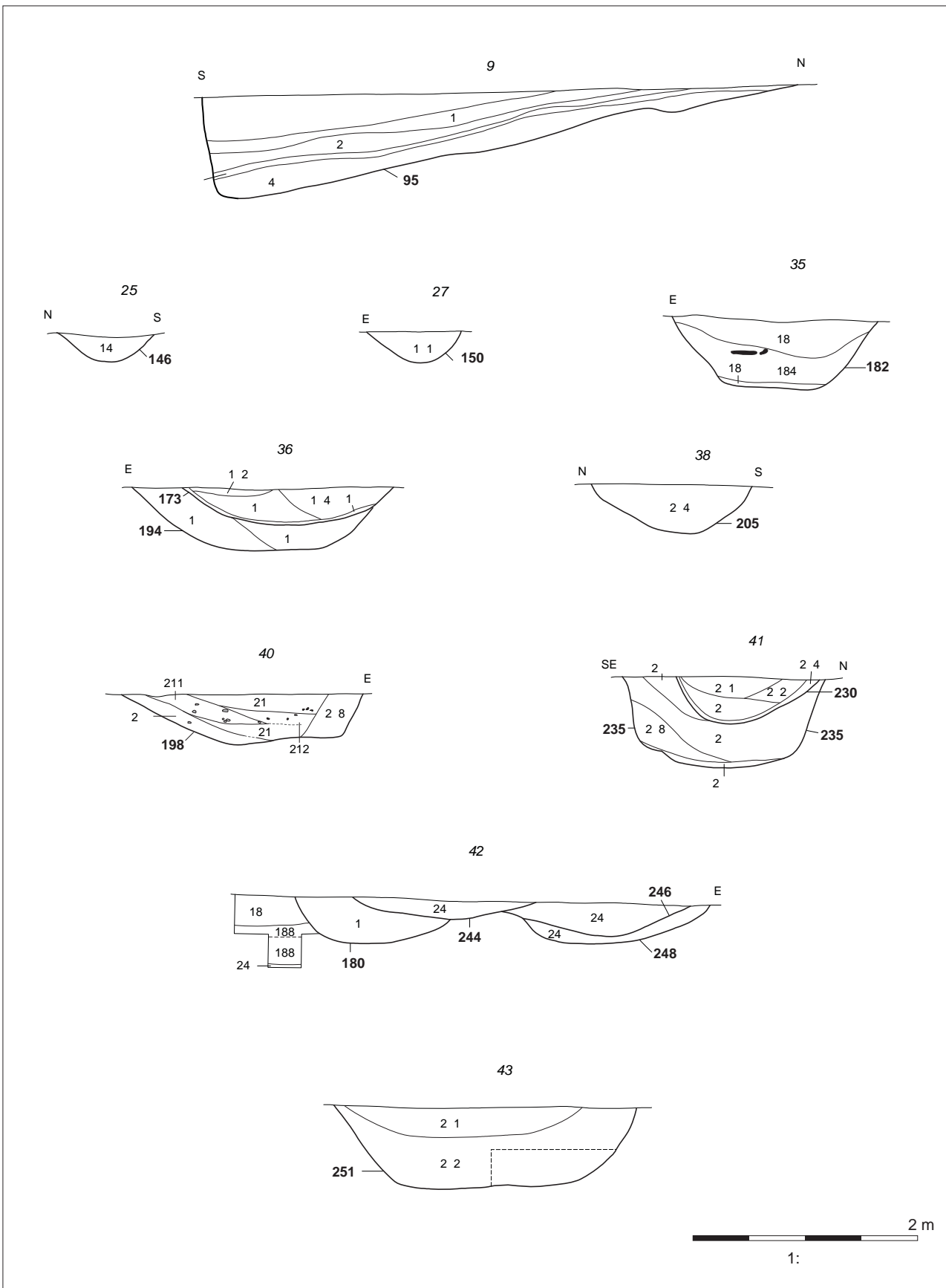
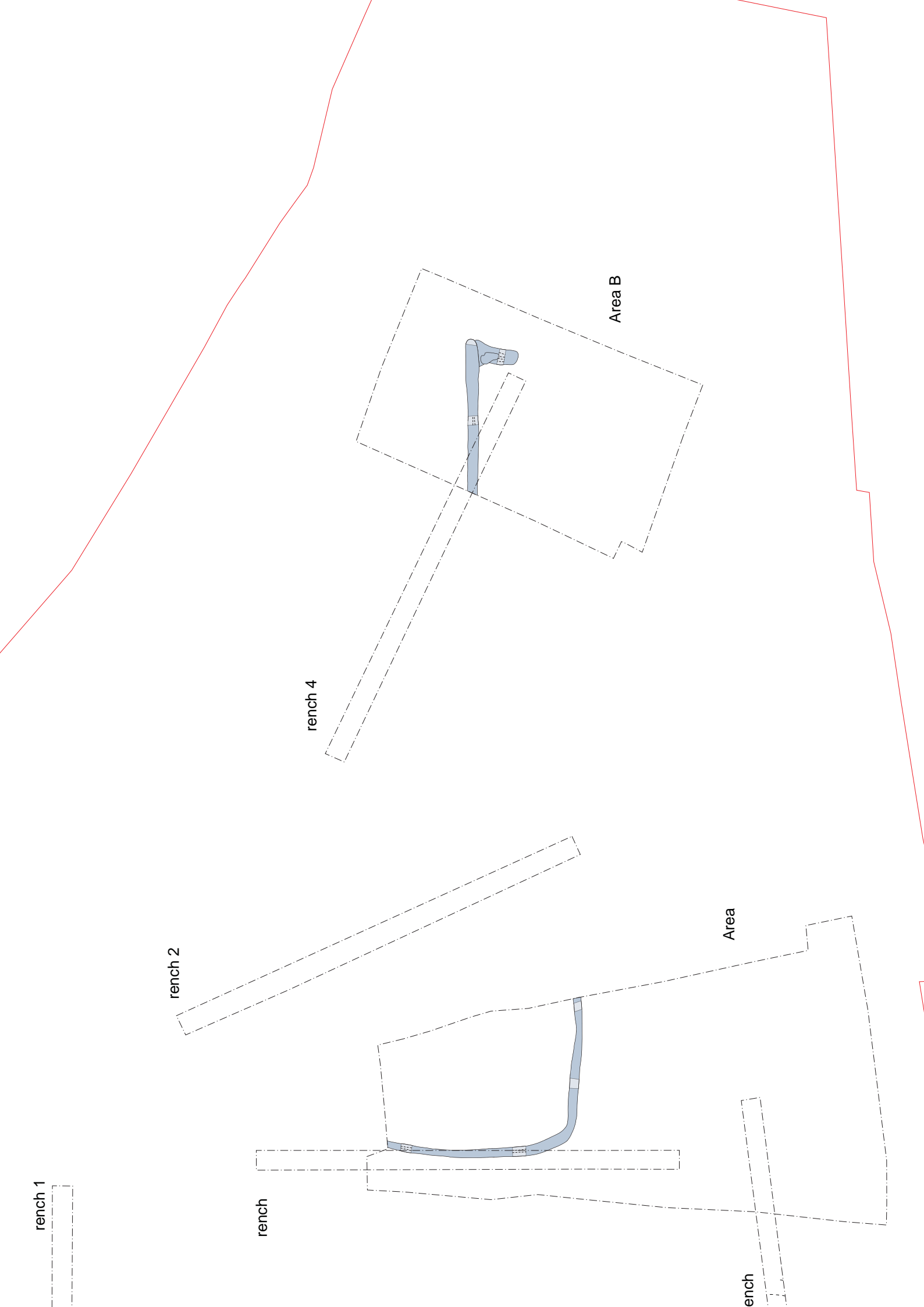


Figure : Sections from Area .



Area B

rench 4

Area

rench 2

rench

rench 1

rench

rench 1

rench 2

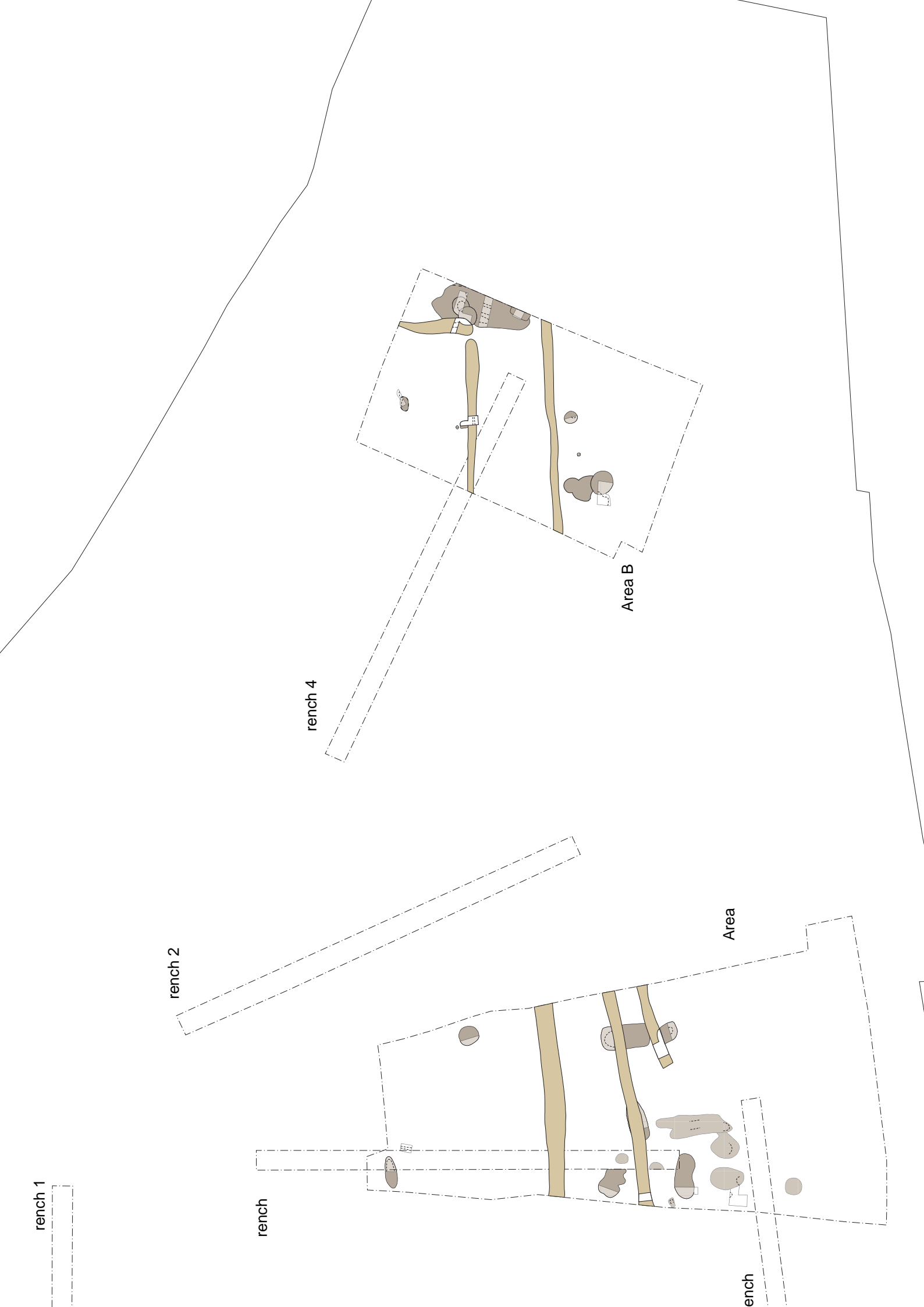
rench

rench 4

Area B

Area

rench



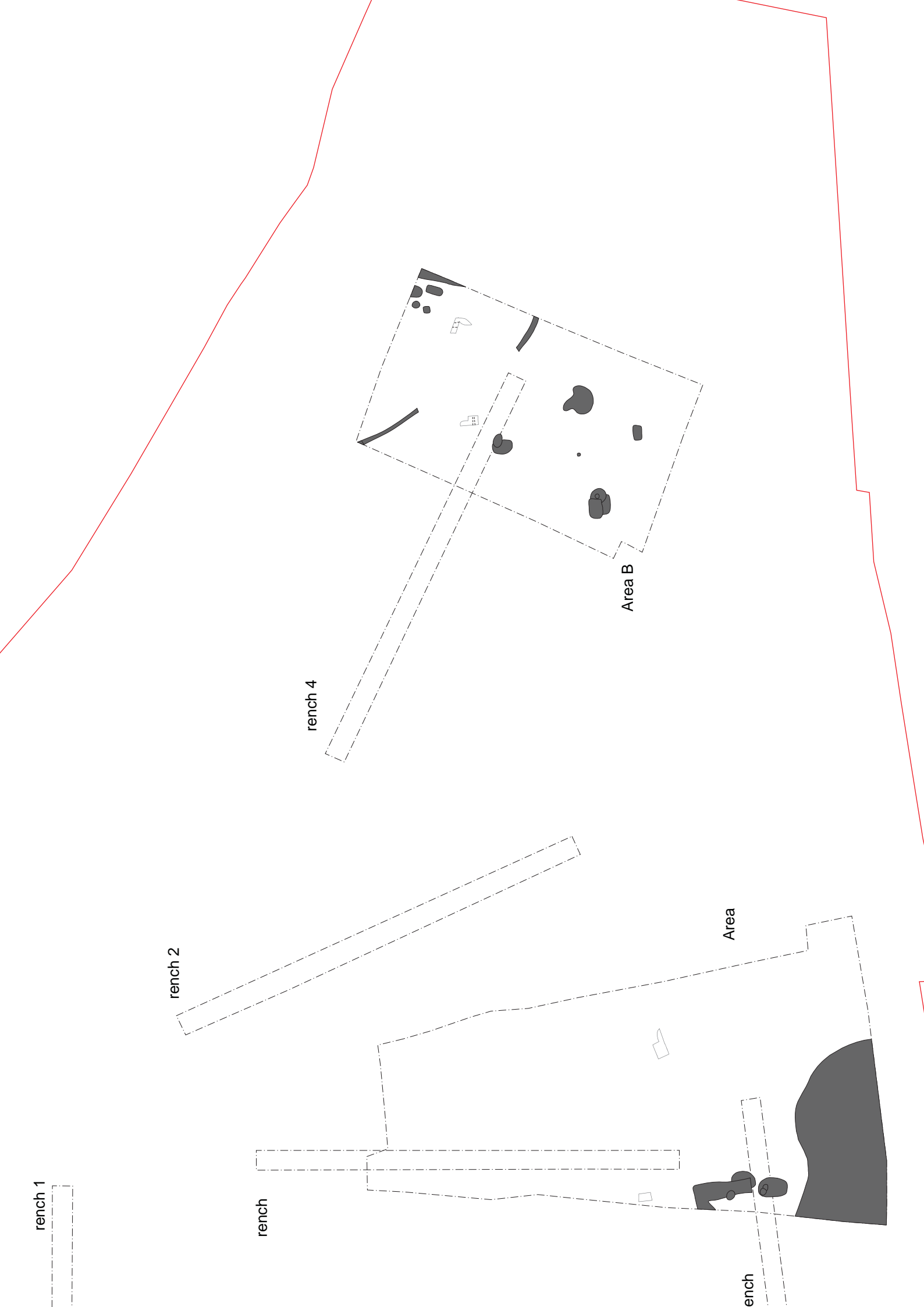




Plate 1: Working Shot



Plate 2: Ditches **123** and **131**



Plate 3: Ditch **153**



Plate 4: Ditch **206**



Plate 5: Ditch 109



Plate 6: Horse skeleton (sk181) in layer 188



Plate 7: Pit 251



Plate 8: Pit 104





Plate 9: Pot in Pit 173



Plate 10: Pit 87



Plate 11: Pit 122



Plate 12: Pit 86



Plate 13: Pond **95**



Plate 14: Lead Spindlewhorl (SF08) from Pond **95**



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