

Land Adjacent to No 37
St Johns Avenue, Woodditton
Newmarket
Cambridgeshire



**Archaeological
Evaluation Report**



May 2016

Client: Flagship Group

OA East Report No: 1920

OASIS No: oxfordar3-250300

NGR: TL 6467 6248

**Land Adjacent to No 37 St Johns Avenue, Woodditton, Newmarket,
Cambridgeshire**

Archaeological Evaluation

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Summary

Between the 20th April and 22nd of April 2016, OA East conducted an archaeological evaluation at land adjacent to No 37 St Johns Avenue, Woodditton, Newmarket. Four evaluation trenches were excavated, three of which contained curvilinear ditches and pits. All of these features cut into the subsoil and contained artefacts dating from the late 19th century at the very earliest. With no known structures or field boundaries at the site, these features may represent possible practice (slit) trenches dating from the beginning of the First World War.

1 INTRODUCTION

1.1 Location and scope of work

- 1.1.1 An archaeological evaluation was conducted by Oxford Archaeology East (OA East) at land adjacent to No 37 St.Johns Avenue, Woodditton, Newmarket, Cambridgeshire (TL 6467 6248, Fig.1).The evaluation was carried out in advance of the construction of 21 dwellings (a mixture of bungalows and 1-4 bedroom houses) with associated external works and parking.
- 1.1.2 This archaeological evaluation was undertaken in accordance with a Brief issued by Gemma Stewart of Cambridgeshire County Council (CCC; Planning Application 14/01264/FUM (15/00011/REFAPP)), supplemented by a Specification prepared by OA East.
- 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 *National Planning Policy Framework* (Department for Communities and Local Government March 2012). The results will enable decisions to be made by CCC, on behalf of the Local Planning Authority, with regard to the treatment of any archaeological remains found.
- 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 site is located in Woodditton on the southern edge of Newmarket in Woodditton, Cambridgeshire, to the east St. John's Avenue. It is bounded to the west by the rear garden of houses fronting King's Drive, while allotments lie to the south and east. The site extends for approximately 0.63ha and slopes gently from the south-west (c.48m OD) to the north-east at.(45m OD).
- 1.2.2 The bedrock geology of the site is chalk of the Holywell Nodular Chalk Formation and New Pit Chalk Formation (undifferentiated), formed approximately 89 to 100 million years ago in the Cretaceous period. The superficial geology of the site comprises sand and gravels of the River Terrace Deposits formed up to 3 million years ago in the Quaternary Period (<http://mapapps.bgs.ac.uk/geologyofbritain/home.html>).

1.3 Archaeological and historical background

- 1.3.1 Although there are no previously recorded archaeological features or finds on or within the immediate vicinity of the site, the plot is located to the south of the historic core of Newmarket. To the north is evidence for prehistoric and Roman occupation in addition to the Bury Hill ring ditch, located c. 3km the north (Suffolk HER: MUN 004). This is likely to be of Early Bronze Age origin, and measures c. 30m in diameter. South of the site at Derisley Wood, Woodditton, there was evidence of ditches and a pit of Late Bronze Age to Middle Iron Age Date (MCB17520).

- 1.3.2 Despite the site being located well away from the river valleys of the Kennett to the east, and a tributary of the River Snail that runs through Newmarket to the west, limited archaeological investigations in the area have demonstrated the presence of prehistoric activity in the vicinity. Of significance are the results of a small-scale programme of evaluation and excavation on land to the north-west of the site (Suffolk HER: MUN 023, Archaeological Solutions reports 2102 and 2163). The investigation revealed four features including three pits (one a possible oven) and a gully aligned north-east to south-west. Stuck flint and stratified Late Neolithic/Early Bronze Age pottery were recovered from the pits and surrounding soils, although it was uncertain whether the material from the features was residual. The gully was interpreted as post-medieval, but did not follow the alignment of any existing boundaries. To the east at Cheveley, a Romano-British burial with narrow mouthed pot and jar with pierced colander base was uncovered (CHER 07468). There was evidence of Saxon occupation to the south (MCB17372, MCB13942).
- 1.3.3 The Ordnance Survey six-inch and 25-inch historic map series from 1885-1961 (not illustrated) shows the site located within a large open field in the late 19th and early 20th century. This field became allotments sometime after 1903, with the 1926 25-inch map of the area showing the field divided into a series of eight north-west to south-east aligned allotment plots with tracks inbetween. The six-inch map series between 1945 and 1953 (Fig.6) depicted a C-shaped structure within the footprint of the development area, in the south-east corner of the plot. The structure is possibly a shed or stable.

1.4 Acknowledgements

- 1.4.1 OA East would like to thank The Flagship Group who funded the work. The site was managed by Aileen Connor and surveyed by Gareth Rees. The fieldwork was carried out by Steve Graham and Nick Cox. The brief was written by Gemma Stewart of CCC HET who also monitored the work. Thanks are also extended to the various specialists who contributed to the report, the illustrator and the editor.

2 AIMS AND METHODOLOGY

2.1 Aims

- 2.1.1 The objective of this evaluation was to determine as far as reasonably possible the presence/absence, location, nature, extent, date, quality, condition and significance of any surviving archaeological deposits within the development area.

2.2 Methodology

- 2.2.1 Three trenches measuring 40m long by 1.5m wide and one trench measuring 35m long by 1.5m wide were excavated, providing a sample of approximately 5% of the proposed development area.
- 2.2.2 Machine excavation was carried out under constant archaeological supervision with a wheeled JCB-type excavator using a toothless ditching bucket.
- 2.2.3 The site survey was carried out using a Leica GS08 with Smartnet live data feed.
- 2.2.4 Spoil, exposed surfaces and features were scanned visually and 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 The depth, nature and potential artefact content of the plough soil, lower soil horizons, colluvial or other masking deposits were investigated and recorded across the site. Buried soils were tested pitted, and other soil bucket sampled at the trench ends (90 litres sampled per trench).
- 2.2.6 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.
- 2.2.7 Forty litres of bulk soil samples were taken for environmental flotation processing from the primary fills of ditches **3** and **12**.
- 2.2.8 Site conditions were good, being dry throughout with a combination of sunny and overcast spells.

3 RESULTS

3.1 Introduction

3.1.1 Four trenches were excavated (Fig.2). Trench 1 contained two pits and three ditches and Trench 2 contained three ditches. Trench 3 contained a single ditch that was a continuation of one of the ditches noted in trench 2. Trench 4 contained two potential postholes.. With the exception of the postholes in Trench 4, the features all cut through the subsoil (a light reddish brown silt sand) and were sealed by a brown silt loam topsoil. The trenches are described below in numerical order, supplemented by further trench/context information in Appendix A and finds and environmental reports in Appendices B and C.

3.2 Trench 1

- 3.2.1 This trench (Fig.3 Plate 1) was parallel to the western edge of the development area (along St Johns Avenue)., with a north-east to south-west orientation. The trench was 40m long with a width of 1.50m. Natural undisturbed geology was reached at between 0.60m and 0.80m below the top of the trench.
- 3.2.2 The natural soil was overlain by a 0.50m thick light reddish brown silt sand (2) subsoil. The subsoil contained modern brick and tile fragments and was truncated by all the features within the trench, the earliest of which were two pits (4 and 8).
- 3.2.3 Pit 8 (Fig. 4, Section 1) which measured 2.70m in diameter and 0.90m deep, was sub-circular in plan and contained 2 fills. The pit was steep sided with a U shaped profile. The primary fill (18) comprised a light yellow clay sand, 0.30m thick and an upper fill (30) of dark reddish brown silt sand, 0.54m thick. The pit was truncated at either end by a curvilinear ditch (7).
- 3.2.4 Ditch 7 (Fig. 4, Section 1) emerged from the north-western side of the trench, truncated pit 8 and continued beyond the north-western side of the trench 3.5m further along the trench to the north-east (at the south-west end of the trench, the ditch is seen at an oblique angle and so seems far wider then where it returns under the side of the trench to the north-east-see section 1). The ditch was steep sided with a U shaped profile, it was 1.28m wide and 0.92m deep and contained two fills. The primary fill (29) was a dark reddish brown clayey sand 0.13m thick. Above this was a dark reddish brown silty sand (17) 0.88m thick. Both fills contained fragments of modern machine made tile and brick (not retained).
- 3.2.5 Pit 4 (Fig. 5, Section 4) was a sub-circular pit with a steep sided U shape profile and a width of 1.00m and a depth of 0.60m, its single fill was a light reddish sand (21) containing no finds.
- 3.2.6 Cutting pit 4 was a curvilinear ditch (5/6) This ditch (Plate 5) was revealed from the north-western side of the trench curving round and continuing beyond the south-eastern side of the trench 6.5m further to the north-east. The ditch was excavated in two slots (5/6), it measured 1.30m deep and 1.40m wide with near vertical sides. The ditch contained three fills, the earliest of which (20/25) was a light yellowish brown clay sand that was 0.20m thick. Above this was a 0.22m thick dark greyish brown silt sand (27/28) and the final upper fill was a light reddish brown clayey sand (19/24) that was 0.20m thick containing modern machine made CBM fragments. The ditch had in both slots a U shaped profile with a flat base.

- 3.2.7 Located at the north-eastern end of the trench was a curvilinear or L-shaped ditch (**3**) that was 0.60m wide and 0.60m deep (Fig. 5, Section 5). The ditch extended from the north-western side of the trench for 1.50m towards the south-east before turning and returning under the north-western trench side. The ditch contained three fills. The primary fill (23) was a 0.18m thick dark brownish yellow sandy clay. The ditch was steep sided with a U shaped profile.
- 3.2.8 Above this was a dark reddish yellow clayey sand (26) that was 0.18m thick. The upper and final fill was a light grey brown silt sand (22) that was 0.22m thick containing modern machine made CBM.
- 3.2.9 All of the features in the trench were overlain by the topsoil (1) a brown silt loam containing modern brick and tile fragments which was on average 0.28m thick.
- 3.3 Trench 2**
- 3.3.1 This trench (Plate 2) ran broadly parallel to the southern edge of the development area on a north-west to south east orientation. The trench was 40m in length, 1.50m in width and the natural undisturbed geology was reached at between 0.58m and 0.86m below the top of the trench.
- 3.3.2 The natural sand and chalk was overlain by the subsoil (2) which ranged from 0.26m to 0.58m in depth. The subsoil was truncated by all features within the trench.
- 3.3.3 Midway along the trench was ditch **9** (Fig. 5, Section 7, Plate 6). This ditch was revealed crossing the trench in a c. north to south orientation. The ditch was 1.05m wide and 0.88m deep. It contained five fills, the earliest of which (31) was a 0.16m thick dark reddish brown silt sand containing shell. Above this was a 0.20m thick dark grey brown silt sand (32). Above this was a light yellowish brown silt sand (33) containing CBM fragments and an iron object, possibly the tang of a knife. Above this was a dark grey brown silt sand (34) 0.16m thick. The fifth and final fill was a mid reddish brown silt sand (35) that was 0.31m thick. The ditch was steep sided with a U shaped profile and flat base.
- 3.3.4 Seven metres along the trench to the south-east was another ditch (**10** Fig. 5, Section 9). This curvilinear ditch was aligned in a c. east to west orientation and was 0.82m wide and 0.68m deep, with steep sides. It contained three fills, the earliest of which was a dark reddish brown silt sand (36) that was 0.08m deep. Above this was a mid reddish brown silt sand (37) that was 0.28m thick and contained modern CBM. The third and final fill (38) was a mid brownish red silt sand that was 0.32m thick. The ditch was steep sided with a U shaped profile and flat base.
- 3.3.5 Located at the south-eastern end of the trench was ditch **11**. This vertical sided ditch was 0.77m wide and 0.94m deep. It had a U shaped profile with a flat base. The ditch was exposed across the trench in a north-east to south-west orientation. It contained three fills, none of which produced finds, the earliest of which (39) was a dark reddish brown silt sand that was 0.16m thick. This was overlain by a mid reddish brown silt sand (40) which was 0.42m thick. The third and final fill was a dark reddish grey silt sand (41) that was 0.41m thick. This ditch was also identified running across Trench 3 (**12**).
- 3.3.6 All of the features were overlain by the topsoil (1) containing modern brick and tile fragments (not retained) with an average thickness of 0.27m.

3.4 Trench 3

- 3.4.1 This trench (Plate 3) ran broadly parallel to the northern side of the proposed development area in a north-west to south-east orientation. The trench was 40m long and 1.5m wide. The natural undisturbed geology was reached at between 0.50m and 0.75m below the top of the trench.
- 3.4.2 The natural soils of sand and chalk were overlain by the subsoil (2) containing fragments of modern brick and tile throughout with a depth ranging from 0.22m to 0.48m. The subsoil was truncated by a single feature in the trench: ditch **12**.
- 3.4.3 Located midway along the trench, a ditch **12** ran on a roughly north to south orientation (Fig. 5, Section 18). Its depth was 1.02m whilst its width was 0.92m. The ditch had a U shaped profile and a flat base. The ditch which was almost vertically sided, was a continuation of the ditch located in Trench 2 (**11**). The ditch contained three fills, the primary fill (42) was a dark reddish brown silt sand (0.20m thick) containing a fragment of clay pipe. Above this was a 0.52m thick mid reddish brown silt sand (43) containing modern CBM fragments and the third and final fill (44) was a dark reddish grey silt sand that was 0.35m thick.
- 3.4.4 The ditch and subsoil was overlain by the topsoil (1) containing modern brick and tile fragments (not retained) with an average thickness of 0.27m.

3.5 Trench 4

- 3.5.1 This trench (Plate 4) ran broadly parallel to the eastern edge of the development area in a north-east to south-west orientation. The trench measured 35m long and was 1.50m wide and the natural undisturbed geology was reached at between 0.70m and 0.80m below the top of the trench.
- 3.5.2 Exposed along the length of trench were amorphous features identified as being peri-glacial in origin. There were two possible exceptions: postholes **13** (Fig. 5, Section 14) and **15** (Fig. 5, Section 15). The symmetrical shape in plan and profile of these two features implies that they may be archaeological, however the fills in both features was indistinguishable from those in the identified peri-glacial hollows, neither produced any sign of human activity.
- 3.5.3 Posthole **13** was a circular feature that was 0.40m wide and 0.40m deep with a U shaped profile and steep sides. Its single fill (14) was a dark reddish sand, 0.40m thick, containing no finds or evidence of a post-pipe or packing.
- 3.5.4 Posthole **15** was a circular hollow measuring 0.40m wide and 0.22m deep with a U shaped profile and steep sides.. Its single fill (16) was a dark red sand, 0.22m thick, containing no finds or evidence of a post pipe or packing.
- 3.5.5 Both of these features were overlain by the subsoil (2) with an average thickness of 0.50m containing modern brick and tile fragments throughout (not retained). This in turn was overlain by the topsoil (1) with an average thickness of 0.30m.

3.6 Finds Summary

- 3.6.1 A total of 0.096 kg of undiagnostic but modern CBM was recovered from the fills of the ditches (Trench 1, Ditch 6 and 3, Trench 2, Ditch 9 and 10, Trench 3, Ditch 12).
- 3.6.2 An iron rod with plastic was retrieved from the fill of **6** and a possible tang of a small iron knife from ditch **9**.
- 3.6.3 Other finds comprised of a clay pipe stem was retrieved from ditch **12** and a small fragmented ceramic ring which was recovered from the fill of ditch **9**.

3.7 Environmental Summary

- 3.7.1 A single piece of Oyster shell was retrieved from ditch **9**.
- 3.7.2 Bulk samples taken from the fills of two of the ditches (**3** and **12**) were devoid of any preserved plant remains other than occasional small fragments of coal/clinker and occasional fragments of burnt bone.

4 DISCUSSION AND CONCLUSIONS

- 4.1.1 Although there is evidence for prehistoric, Roman, Anglo-Saxon and medieval activity within the wider area, there was no such evidence within the proposed development site. All of the features (with the exception of the two small circular features) clearly cut into the subsoil and the finds (with the exception of the clay pipe stem, which had a date range from 1700 onwards) are probably 20th century in date..
- 4.1.2 Although it is possible that the two small circular features recorded in Trench 4 (**13** and **15**) and sealed over by the subsoil were postholes, no datable finds were recovered from within their fills. Neither produced any evidence of either a post pipe or packing material and they were located within a trench with numerous peri-glacial features, which whilst amorphous in shape and uneven in profile were filled with exactly the same type of clean dark reddish sand as the possible postholes. As such there remains a strong possibility that these two features were also peri-glacial hollows.
- 4.1.3 As noted on the Ordnance Survey maps from 1885-1961, the area of the proposed development has been recorded throughout the late 19th and 20th centuries as open fields. Only a small C shaped temporary structure was evident on the maps between 1945 and 1953, the only other activity being the allotments established at the site in the early 20th century. The ditches identified during the evaluation were deep and steep sided but did not appear to conform to any structural plan nor follow any known field boundary. The environmental samples obtained from ditches **3** and **12** contained no plant remains only traces of clinker and coal with a small amount of burnt bone, consistent with the possibility of the ditches being quickly backfilled. As these ditches were clearly modern, but were too deep and substantial to be associated with the allotment activities at the site, they must represent a brief period of modern activity not associated with any known structures.
- 4.1.4 At St John's Avenue, these ditches cut into pits that did not contain any datable material, however they also cut into the subsoil indicating that the pits are also recent in date. The most probable explanation for their function is that they were agricultural in origin, however it is worth noting that on the 6" OS map from 1903, a chalk pit was located 295m to the south-east of the site and it is possible that these pits are evidence of modern small scale quarrying.
- 4.1.5 A possible explanation for the ditches at the St John's Avenue site is that they may be training (slit) trenches of the type excavated by the British Army at the outset of the First World War. Increasingly archaeological evidence from throughout the United Kingdom indicates that these features were constructed by the army to provide their troops with training in the construction of elaborate trenches and mock-ups of the German lines e.g. www.shorehamfort.co.uk/about/the-great-war-training-trench. Of the examples that have been surveyed to date, the characteristics of these trenches include a plan of both straight and 'zig zag' lines similar to those found within the evaluation trenches at the current site.
- 4.1.6 A series of profile measurements carried out at the ditches at Marlow Common, Buckinghamshire (<http://www.chilternsaonb.org/uploads/files/AboutTheChilterns/Commons/Trench>) confirmed that these trenches tended to be steep sided and often flat based, on average around 1m to 2m deep and between 1m to 2m wide.

- 4.1.7 At Redmires, Sheffield, a section of unfilled trench (12.5m long, 1.3m deep), was located beneath the summit of Quarry Hill (Ullathorne 2006). Overall, the morphology of this trench was uniform, with steep sides dropping to a depth of 1.3m to a narrow trench floor. Spoil from cutting the trench appeared to be deposited midway along the section on the eastern side of the feature. The trenches on the site appeared to have been backfilled by army personnel during or shortly after the trenches were cut.
- 4.1.8 At Clipstone in Nottinghamshire, traces of an army camp have been found comprising a network of trenches with a variation of straight, curved, right angled and 'zig-zag' plans (<http://sherwoodforestvisitor.com/2012/10/18/sherwood-pines-clipstone-heath-forest-war-time-role>).
- 4.1.9 The interpretation of the ditches at the St John's Avenue site as First World War training trenches is tentative as no artefacts were recovered to directly link them to military activity. However there was a Territorial Army training camp set up in 1914 at Plantation (Warren) Hill approximately 1.39 km to the north-east of the site, with a possible second army camp (<http://www.newmarketlhs.org.uk/greatwarcentenary.htm>) based at "The Gallops" to the north-west of the town approximately 3.31km from St John's Avenue.
- 4.1.10 Further away from the site, aerial photography assessment identified two lines of trenches at Redlodge, Forest Heath, Freckenham Suffolk (TL 6941 7060) which were 9.45 km to the north-east of the site. These trench lines, joined by smaller trenches, are thought to be military practice trenches. Their appearance in the 1946 aerial photographs suggest they may date from the First World War or relate to immediate post War training. The trenches appear to have been constructed as a series of adjacent pits (Palmer 2006).
- 4.1.11 The linear features recorded within the evaluation trenches at the St John's Avenue site would be consistent with the recorded plan and profile of those ditches identified as being First World War training trenches. The ditches seem to represent a brief phase of activity that could relate to the First World War. These ditches could have been opened for training purposes and backfilled by the army fairly rapidly. Alternately the ditches may have remained open until the end of the war, and then backfilled. Their brief period of use would not feature on any maps and so would have quickly faded from local memory. Following this brief phase of use, the site was returned to agriculture and subsequently the allotments were established by 1926.

4.2 Significance

- 4.2.1 If the ditches identified at the site are First World War training trenches, then they form part of a recently recognised aspect of this period of recent history. Because of the ephemeral nature of training trench structures, they remain poorly represented in the overall archaeological and historical record. As such the evaluation at St John's Avenue has added to the record of 1914-18 related activities within the Newmarket area.

4.3 Recommendations

- 4.3.1 Recommendations for any future work based upon this report will be made by the County Archaeology Office.

APPENDIX A. TRENCH DESCRIPTIONS AND CONTEXT INVENTORY

Trench 1							
General description					Orientation		NE-SW
Trench has a sand natural with peri-glacial features overlaid by a subsoil of silt sand (2). This is cut into by three ditches and two pits, which are sealed over by a topsoil (1)					Avg. depth (m)		0.80
					Width (m)		1.50
					Length (m)		40
Contexts							
context no	type	Width (m)	Depth (m)	comment	finds	date	
1	Layer	-	0.30	Topsoil	-	Modern	
2	Layer	-	0.40	Subsoil	-	Modern	
3	Cut	0.60	0.60	Ditch	-	Modern	
4	Cut	1.00	0.60	Pit	-	Modern	
5	Cut	1.40	1.30	Ditch	-	Modern	
6	Cut	0.80	0.80	Ditch	-	Modern	
7	Cut	1.28	0.92	Ditch	-	Modern	
8	Cut	2.70	0.90	Pit	-	Modern	
17	Fill	-	0.88	Fill of 7	-	Modern	
18	Fill	-	0.30	Fill of 8	-	Modern	
19	Fill	-	0.40	Fill of 6	Fe,Coke, Brick	Modern	
20	Fill	-	0.20	Fill of 6	-	Modern	
21	Fill	-	0.90	Fill of 4	-	Modern	
22	Fill	-	0.28	Fill of 3	Brick, Tile Fragment	Modern	
23	Fill	-	0.18	Fill of 3	-	Modern	
24	Fill	-	0.82	Fill of 5	Modern Glass	Modern	
25	Fill	-	0.30	Fill of 5	-	Modern	
26	Fill	-	0.18	Fill of 3		Modern	
27	Fill	-	0.22	Fill of 5	Fe, Coke, Brick	Modern	
28	Fill	-	0.22	Fill of 6	-	Modern	
29	Fill	-	0.13	Fill of 7	-	Modern	
30	Fill	-	0.54	Fill of 8	-	Modern	

Trench 2							
General description					Orientation		NW-SE
Trench has a sandy chalk natural soil overlaid by a reddish brown sand subsoil (2). This is cut into by three ditches which are sealed over by a topsoil (1)					Avg. depth (m)		0.56
					Width (m)		1.50
					Length (m)		40
Contexts							
context no	type	Width (m)	Depth (m)	comment	finds	date	
1	Layer	-	0.28	Topsoil	-	Modern	
2	Layer	-	0.49	Subsoil	-	Modern	
9	Cut	1.05	0.88	Ditch	-	Modern	
10	Cut	0.82-	0.68	Ditch	-	Modern	
11	Cut	0.77	0.94	Ditch	-	Modern	
31	Fill	-	0.16	Fill of 9	Shell	Modern	
32	Fill	-	0.20	Fill of 9	-	Modern	
33	Fill	-	0.18	Fill of 9	-	Modern	
34	Fill	-	0.16	Fill of 9	-	Modern	
35	Fill	-	0.31	Fill of 9	-	Modern	
36	Fill	-	0.08	Fill of 10	-	Modern	
37	Fill	-	0.28	Fill of 10	-	Modern	
38	Fill		0.32	Fill of 10		Modern	
39	Fill		0.16	Fill of 11		Modern	
40	Fill		0.42	Fill of 11		Modern	
41	Fill		0.41	Fill of 11		Modern	

Trench 3							
General description					Orientation		NW-SE
Trench has a sandy chalk natural soil overlaid by a reddish brown sand subsoil (2). This is cut into by a single ditch 12 which is sealed over by a topsoil (1).					Avg. depth (m)		0.60
					Width (m)		1.50
					Length (m)		40
Contexts							
context no	type	Width (m)	Depth (m)	comment	finds	date	
1	Layer	-	0.25	Topsoil	-	Modern	
2	Layer	-	0.42	Subsoil	-	Modern	
12	Cut	0.92	1.02	Ditch	-	Modern	
42	Fill		0.20	Fill of 12	-	Modern	
43	Fill	-	0.52	Fill of 12	-	Modern	
44	Fill	-	0.35	Fill of 12	-	Modern	

Trench 4						
General description					Orientation	NE-SW
Trench has a sandy chalk natural overlaid by a reddish brown sand subsoil (2). throughout the trench are peri-glacial features, 2 of which have the potential to be postholes (13 and 15). Everything is sealed over by a topsoil (1).					Avg. depth (m)	0.70
					Width (m)	1.50
					Length (m)	35
Contexts						
context no	type	Width (m)	Depth (m)	comment	finds	date
1	Layer	-	0.20	Topsoil	-	Modern
2	Layer	-	0.60	Subsoil	-	Modern
13	Cut	0.40	0.40	Posthole?	-	?
14	Fill	-	0.40	Fill of 13	-	?
15	Cut	0.40	0.22	Posthole ?	-	?
16	Fill	-	0.22	Fill of 15	-	?

APPENDIX B. FINDS REPORTS

B.1 Miscellaneous Finds

By Steve Graham and Carole Fletcher

CBM

- B.1.1 A small amount (0.096 kg) of ceramic building material (CBM) was recovered from the fills of the ditches (see Table 1 below). The CBM material was all machine made and must therefore date to the late 19th or even 20th century. The examples are largely undiagnostic being (with the exception from context 37) small and heavily abraded, other than noting that the CBM from contexts 19 and 22 are fragments of brick, whilst the CBM from fills 33 (?), 37 and 43 are probably derived from roof tiles. Other than confirming that the fills of the ditches were modern, no further information could be extrapolated from the CBM.

Trench	Context	Cut	Type	Count	Weight (Kg)
1	19	6	Brick	1	0.042
1	22	3	Brick	2	0.007
2	33	9	Tile (?)	2	0.004
2	37	10	Tile	1	0.031
3	43	12	Tile	2	0.012

Table 1: CBM recovered from site

Iron Objects

- B.1.2 Two Iron objects were recovered from two separate features in Trenches 1 and 2. A single piece of clearly modern iron with a plastic end in the form of a rod 0.30m long was retrieved from the fill of ditch 6 (context 19), whilst its function is not immediately apparent, its form suggests it was used possibly to reinforce the sides of the ditch.
- B.1.3 A small fragment of iron measuring 0.06m long, possibly the tang of a knife was recovered from the fill of ditch 9 (context 33), although not enough of the fragment had survived to provide any dating information.

Other Objects

- B.1.4 A small ceramic ring in four pieces was recovered from the fill of ditch 9 (context 33). Its external diameter is 0.22m wide, its internal diameter is 0.16m wide, it is 0.02m wide and 0.03m high. It is thin walled with no decoration. Whilst there is no obvious indication of its function, possible interpretations include a washer, spacer or a component such as might be used in a capacitor in an early radio.
- B.1.5 A single oyster shell was retrieved from the fill of ditch 9 (context 31)

- B.1.6 A single fragment of clay pipe stem was recovered from the fill of ditch **12** (context 42). Not enough had survived to make any dating possible beyond noting that it could have been produced any time between 1700-1900.

APPENDIX C. ENVIRONMENTAL REPORTS

C.1 Environmental samples

By Rachel Fosberry

Introduction

- C.1.1 Two bulk samples were taken during the evaluation in order to assess the quality of preservation of plant remains and their potential to provide useful data as part of further archaeological investigations. The samples were taken from deep, linear features **3** and **12**.

Methodology

- C.1.2 The total volume (up to 15 litres) of the sample was processed by water flotation (using a modified Siraff three-tank system) for the recovery of charred plant remains, dating evidence and any other artefactual evidence that might be present. The floating component (flot) was collected in a 0.3mm nylon mesh and the residue was washed through 10mm, 5mm, 2mm and a 0.5mm sieves. Both flot and residue were allowed to air dry. A magnet was dragged through each residue fraction prior to sorting for artefacts. The dried flot was subsequently sorted using a binocular microscope at magnifications up to x 60.

Results

- C.1.3 Sample 1, fill 22 of feature **3** and Sample 2, fill 43 of feature **12** are both devoid of any preserved plant remains other than occasional small fragments of coal/clinker. Occasional fragments of burnt bone were retrieved from Sample 2.

APPENDIX D. BIBLIOGRAPHY

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APPENDIX E. OASIS REPORT FORM

All fields are required unless they are not applicable.

Project Details

OASIS Number	oxfordar3-250300		
Project Name	Land adjacent to 37 St.johns Avenue, Woodditton, Newmarket		
Project Dates (fieldwork)	Start	20-04-2016	Finish 22-04-2016
Previous Work (by OA East)	No	Future Work	Unknown

Project Reference Codes

Site Code	WODSJA16	Planning App. No.	14/01264/FUM
HER No.	ECB4711	Related HER/OASIS No.	n-a

Type of Project/Techniques Used

Prompt	Direction from Local Planning Authority - Direction 4
Development Type	Urban Residential

Please select all techniques used:

<input type="checkbox"/> Aerial Photography - interpretation	<input type="checkbox"/> Grab-Sampling	<input type="checkbox"/> Remote Operated Vehicle Survey
<input type="checkbox"/> Aerial Photography - new	<input type="checkbox"/> Gravity-Core	<input type="checkbox"/> Sample Trenches
<input type="checkbox"/> Annotated Sketch	<input type="checkbox"/> Laser Scanning	<input type="checkbox"/> Survey/Recording Of Fabric/Structure
<input type="checkbox"/> Augering	<input checked="" type="checkbox"/> Measured Survey	<input checked="" type="checkbox"/> Targeted Trenches
<input type="checkbox"/> Dendrochronological Survey	<input checked="" type="checkbox"/> Metal Detectors	<input type="checkbox"/> Test Pits
<input type="checkbox"/> Documentary Search	<input type="checkbox"/> Phosphate Survey	<input type="checkbox"/> Topographic Survey
<input checked="" type="checkbox"/> Environmental Sampling	<input type="checkbox"/> Photogrammetric Survey	<input type="checkbox"/> Vibro-core
<input type="checkbox"/> Fieldwalking	<input checked="" type="checkbox"/> Photographic Survey	<input type="checkbox"/> Visual Inspection (Initial Site Visit)
<input type="checkbox"/> Geophysical Survey	<input type="checkbox"/> Rectified Photography	

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
Ditches	Modern 1901 to Present	CBM	Modern 1901 to Present
Pits	Modern 1901 to Present	Clay Pipe	Modern 1901 to Present
	Select period...	Fe Objects	Modern 1901 to Present

Project Location

County	Cambridgeshire	Site Address (including postcode if possible)
District	East Cambridgeshire	Land Adjacent to 37 St.Johns Avenue, Woodditton, Newmarket CB8 8DE
Parish	Woodditton	
HER	Cambridgeshire	
Study Area	4289.935 m2	National Grid Reference TL 6467 6248

Project Originators

Organisation	OA EAST
Project Brief Originator	Gemma Stewart
Project Design Originator	Matt Brudenell
Project Manager	Aileen Connor
Supervisor	Steve Graham

Project Archives

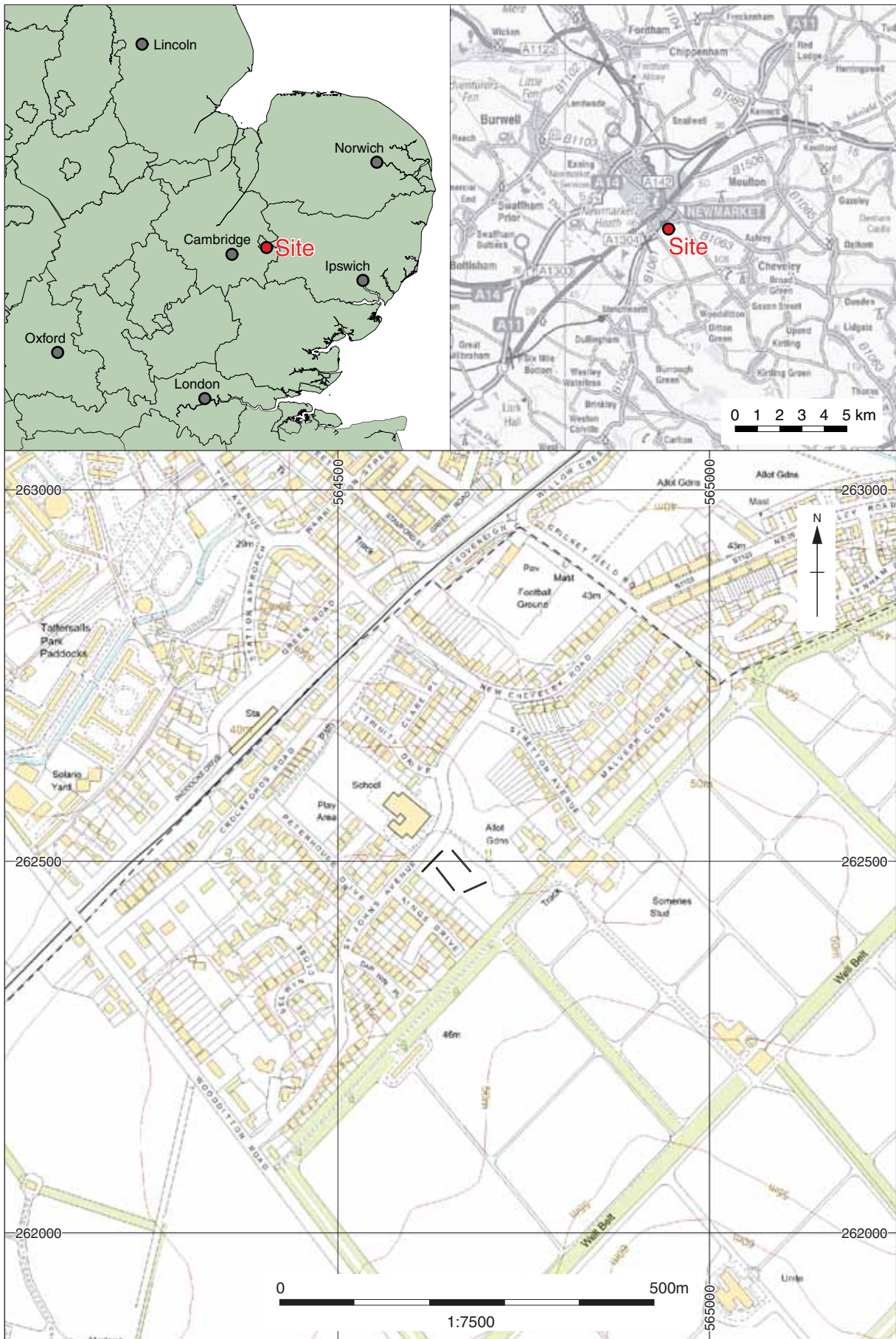
Physical Archive	Digital Archive	Paper Archive
CCC Stores	OA East	CCC Stores
WODSJA16	WODSJA16	WODSJA16

Archive Contents/Media

	Physical Contents	Digital Contents	Paper Contents
Animal Bones	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Ceramics	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Environmental	<input type="checkbox"/>	<input 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 type="checkbox"/>	<input type="checkbox"/>
Leather	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Metal	<input type="checkbox"/>	<input 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 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 type="checkbox"/> Drawing
<input type="checkbox"/> Moving Image	<input checked="" type="checkbox"/> Manuscript
<input type="checkbox"/> Spreadsheets	<input checked="" type="checkbox"/> Map
<input 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 type="checkbox"/> Research/Notes
	<input type="checkbox"/> Photos
	<input checked="" type="checkbox"/> Plans
	<input checked="" type="checkbox"/> Report
	<input checked="" type="checkbox"/> Sections
	<input type="checkbox"/> Survey

Notes:



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Figure 1: Site location showing archaeological trenches (black)

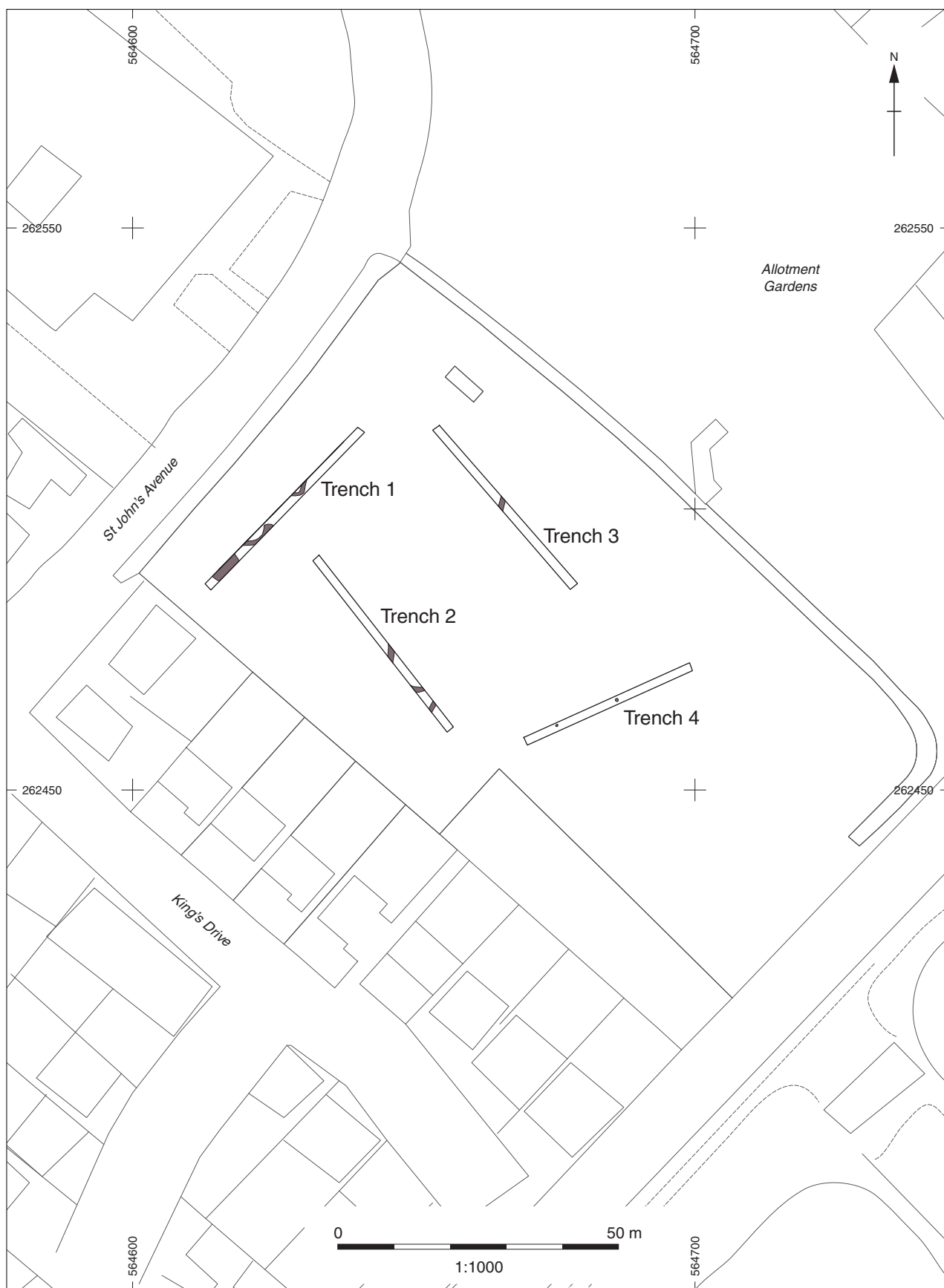


Figure 2: Trench location plan

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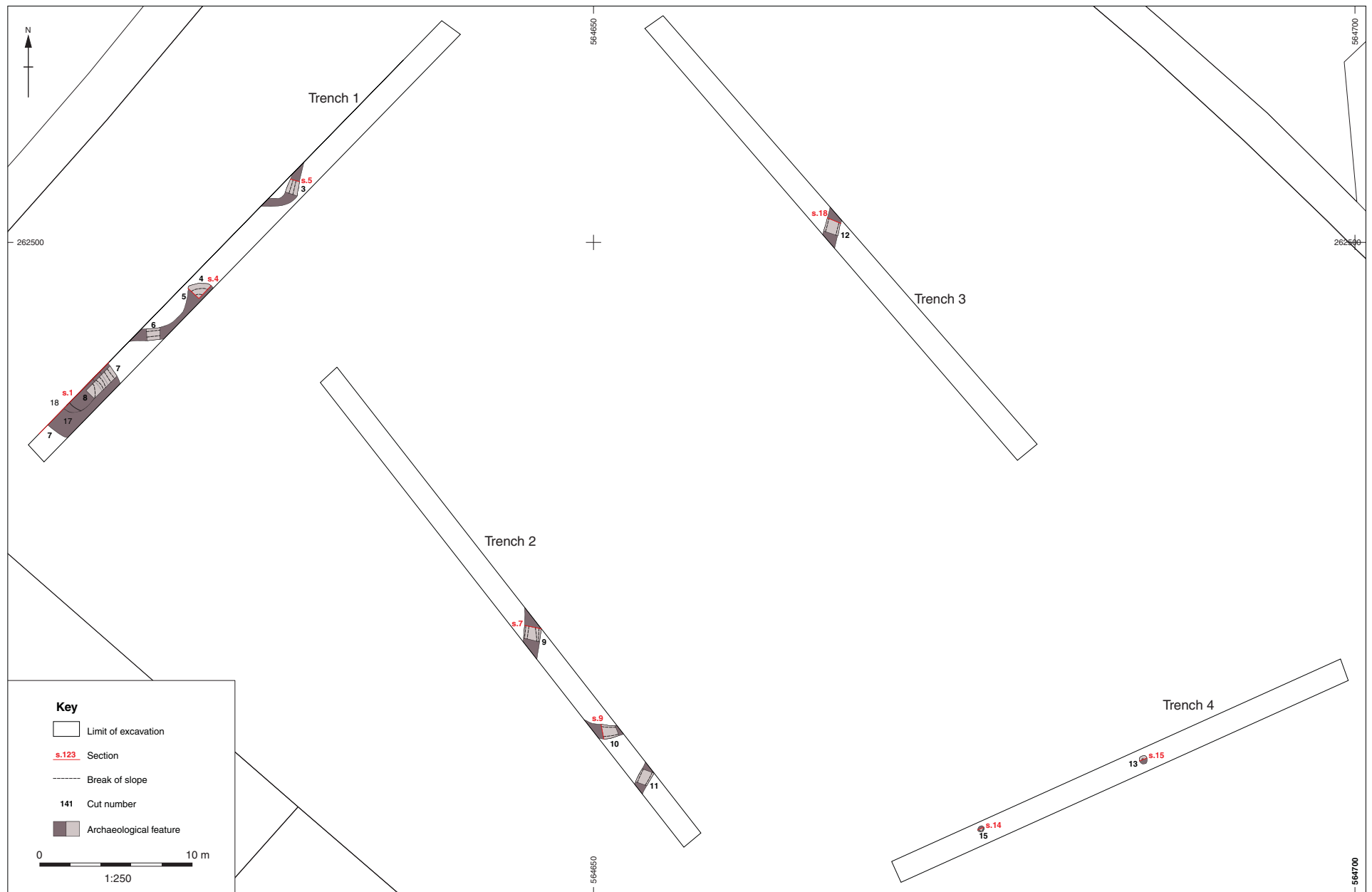


Figure 3: Plan of evaluation trenches.

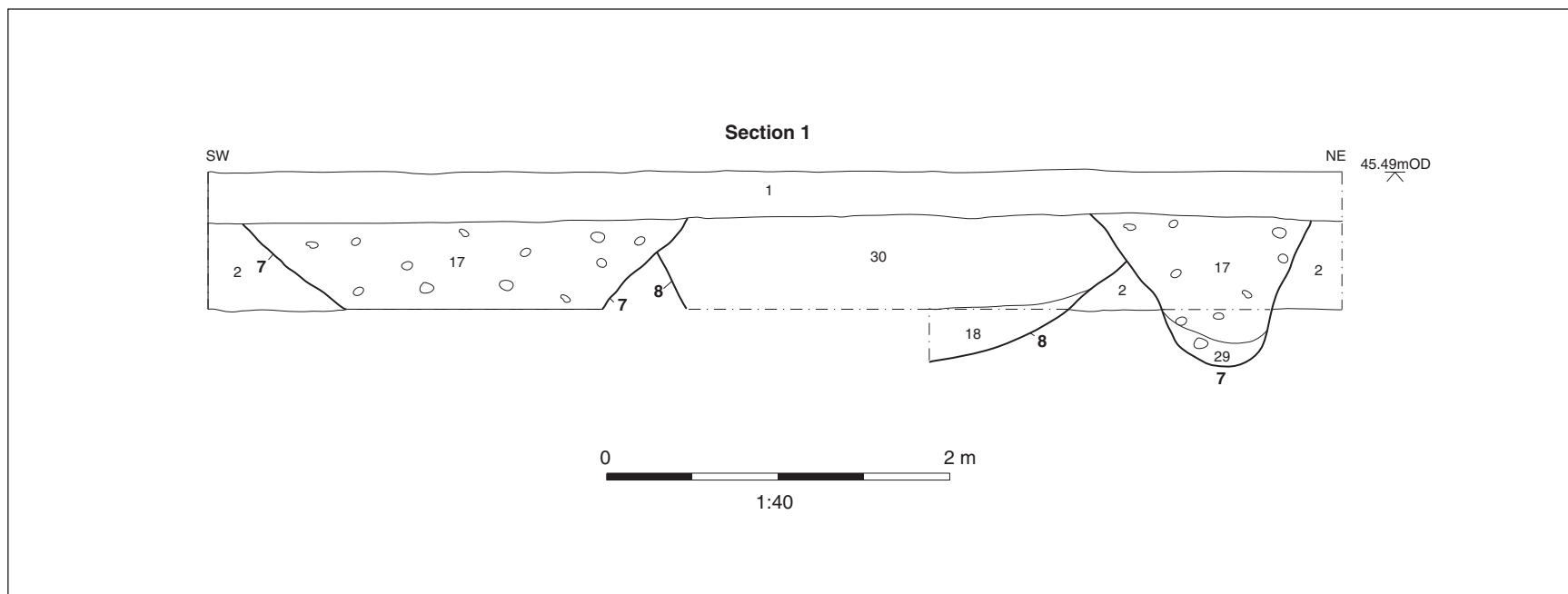


Figure 4: Profile of Trench 1 including pit 8 and ditch 7, from the south-east

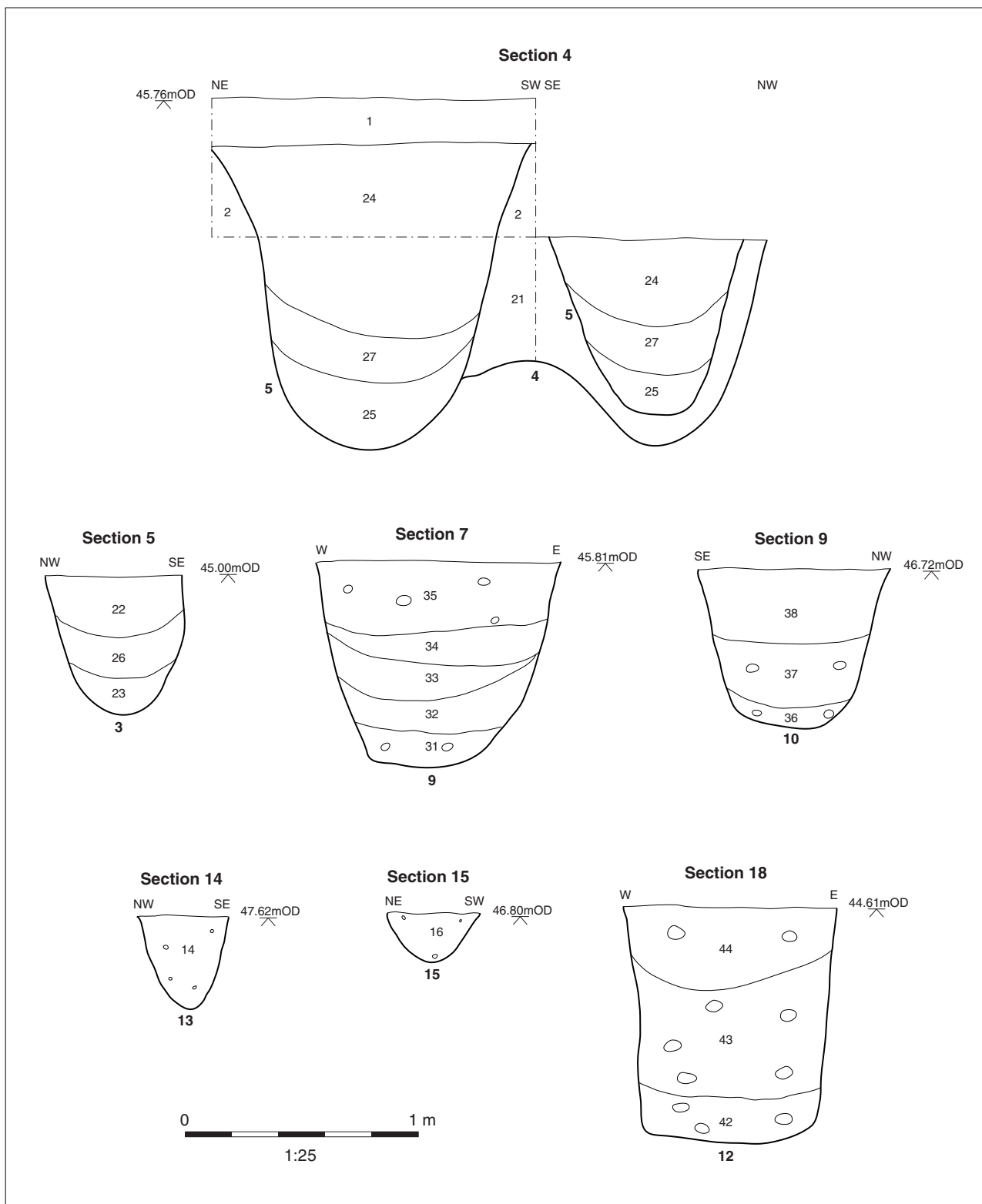


Figure 5: Selected sections

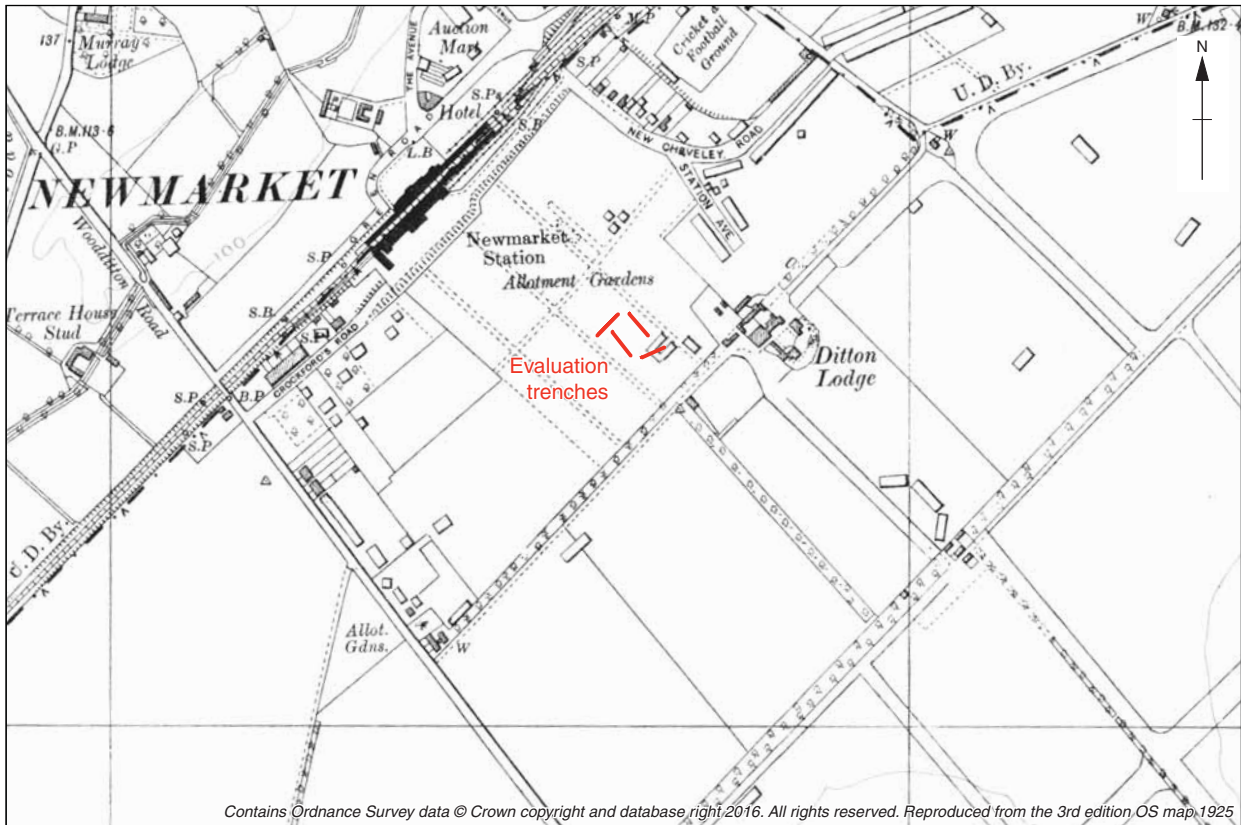


Figure 6: Ordnance Survey map 1925, revised 1938



Plate 1: Trench 1, from the south-west



Plate 2: Trench 2, from the north-west



Plate 3: Trench 3, from the north-west



Plate 4: Trench 4, from the south-west



Plate 5: Ditch 6, from the east



Plate 6: Ditch 9, from the south



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