

A post-medieval brick kiln at East Bergholt, Suffolk: excavation south of Heath Road, August-September 2021



by Howard Brooks

with contributions by Dr Matthew Loughton and Laura Pooley
figures by Emma Holloway, with Ben Holloway, Robin Mathieson and Laura Pooley

fieldwork by Ben Holloway with Ziya Eksen, Nicholas Pryke, Alec Wade,
Adam Wightman and Oliver Windridge

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Colchester Archaeological Trust
Roman Circus House, Roman Circus Walk,
Colchester, Essex, CO2 7GZ

tel.: 01206 501785
email: hb@catuk.org

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Contents

1	Summary	1
2	Introduction	1
3	Archaeological and landscape background	2
4	Aim	4
5	Methodology	4
6	Results	6
7	Finds	12
8	Discussion	15
9	Acknowledgements	16
10	References	17
11	Abbreviations and glossary	17
12	Contents of archive	18
13	Archive deposition	18
Appendix 1	Context list	20
Appendices 2, 3	Pottery and CBM	21
WSI		
OASIS summary sheet		

List of photographs and tables

Cover: vertical view of kiln

Photograph 1	Ground level view of kiln and rake-out pit	1
Photograph 2	Elevated view (NW) of kiln and rake-out pit	5
Photograph 3	Elevated view W of kiln structure	6
Photograph 4	Site level view NW of west ends of flues	7
Photograph 5	View E across centre of kiln	7
Photograph 6	Rake-out pit	8
Photograph 7	Frogged bricks in outer walls	8
Photograph 8	Wire diagram of estimated kiln floor level	9
Photograph 9	The Wormingford brick kiln	10
Photograph 10	Charcoal/ash layer at bottom of flue	10
Table 1	Main types of ceramics and pottery	12
Table 2	Quantities of pottery and CBM from specific features and contexts	12
Table 3	Post-Roman pottery fabrics	12
Table 4	Building material by period and type	12
Table 5	Quantities of CBM from specific features and contexts	13
Table 6	Approximate dates for individual features	14

List of Figures

Figures 11 and 12 are in the text report, all others after p22

Fig 1	Site location	
Fig 2	HER data and listed buildings in relation to the development site (marked red)	
Fig 3	2017 evaluation results (CAT Report 1164) with geophysical anomalies marked in blue (numbers as Britannia Archaeology Ltd Report Number 1145).	
Fig 4	Excavation results	
Fig 5	Plan and profile of kiln F10	
Fig 6	Feature sections excluding kiln F10	
Fig 7	Selected bricks from kiln F10	
Fig 8	Selected bricks from kiln F10	
Fig 9	Small finds	
Fig 10	Baked clay kiln furniture	
Fig 11	Brick length (mm) against brick breadth (mm)	13
Fig 12	Ordnance Survey 1887.	15

1 Summary

Excavation of the area around a burnt brick structure revealed by a 2017 evaluation revealed a heavily robbed, three-flued brick kiln surviving only as footings, and fronted by a large rake-out pit. The absence of the kiln site on both the 1838 Tithe map and the 1st Edition OS sheet of 1887 gives a date range within which it must have been built and operated. There were two brick types in the kiln - unfrogged early 19th-century types and frogged examples of the mid 19th-century. Together with the map evidence, this suggests a kiln originally constructed circa 1840, repaired in frogged brick circa 1850-60, and abandoned and infilled before the 1876-1884 survey for the Ordnance Survey map published in 1887.



Photograph 1: Ground level view NW of kiln F10, with rake-out pit foreground (Site Photograph ref: 98)

2 Introduction (Fig 1)

This is the report on the archaeological excavation carried out by Colchester Archaeological Trust (CAT) on land east of The Constable Country Medical Centre, Heath Road, East Bergholt, Suffolk from 16th August to 2nd September 2021. The work was commissioned by Stephen Williams of Hills Building Group in advance of a mixed use development including dwellings, a school, neighbourhood hub, public open space and associated infrastructure and landscaping.

The Local Planning Authority (Babergh District Council, planning refs. B/16/01092/OUT and DC/20/04663) was advised by Suffolk County Council Archaeology Service (SCCAS) that this site lies in an area of high archaeological importance, and that, in order to establish the archaeological implications of this application, the applicant should be required to commission a scheme of archaeological investigation in accordance with the *National Planning Policy Framework* (MHCLG 2019).

This scheme initially consisted of an archaeological desk-based assessment, geophysical survey and evaluation, all of which took place in 2016-7. Based on the results of this work, the current recommendation was made by SCCAS for an area excavation around trench T58 of the 2017 evaluation to allow the brick kiln to be fully excavated and recorded.

All archaeological work was carried out in accordance with a *Brief for Archaeological Excavation* detailing the required archaeological work written by Gemma Stewart (SCCAS 2020), and a

Written Scheme of Investigation (WSI) prepared by CAT in response to the brief and agreed with SCCAS (CAT 2021).

In addition to the brief and WSI, all fieldwork and reporting was done in accordance with *Management of Research Projects in the Historic Environment (MoRPHE)* (Historic England 2016), and with *Standards for field archaeology in the East of England (EAA 14 and 24)*. This report mirrors standards and practices contained in the Institute for Archaeologists' *Standard and guidance for archaeological field evaluation* (ClfA 2014a) and *Standard and guidance for the collection, documentation, conservation and research of archaeological materials* (ClfA 2014b), as well as the *SCCAS Requirements for an Archaeological Excavation* (SCCAS 2021).

A summary report will be prepared for the *Proceedings of the Suffolk Institute of Archaeology and History*. It will be submitted to SCCAS by the end of the calendar year.

3 Archaeological and landscape background (Fig 2)

The following archaeological background draws on information from the Suffolk Historic Environment Record (archaeology.her@suffolk.gov.uk), SCC invoice number 9509233.

Geology

The Geology of Britain viewer (1:50,000 scale¹) shows the bedrock geology of the site as Thames Group (clay, silty), and the surface geology (which concerns us most) as Lowestoft Formation (sand and gravel). This was previously known as 'Lowestoft Boulder Clay', which, it can be argued, is a better description of the clay subsoil here.

Historic landscape

Land to the east of the Constable Country Medical Centre, Heath Road, East Bergholt is in an area defined as *plateau farmlands* in the Suffolk Landscape Character Assessment². Within the Suffolk Historic Landscape Characterisation Map³ it is defined as landscape sub-type 10.3, built up area (village – substantial group of houses associated with a parish church). The landscape immediately around the development site is characterised as sub-type 1.1 (pre-18th-century enclosure – random fields); sub-type 1.4 (pre-18th century enclosure – irregular co-axial fields); sub-type 3.1 (post-1950 agricultural landscape (boundary loss from random fields); sub-type 5.1 (meadow or managed wetland – meadow); and sub-type 6.2 (horticulture – nurseries with glass houses).

Archaeology⁴ (Fig 2)

A list of all archaeological sites and finds within a 1km search area (radius) of the proposed development site (PDS) can be found below and on Fig 2. Distances listed below have been measured from the centre of the PDS to the centre of the heritage asset.

Prehistoric: A Neolithic greenstone axe, three flint cores and a Bronze Age urn were found to the NE (EBG 063, EBG 068, EBG 71 - 500m NE).

Roman: Roman finds include a domed-lead spindlewhorl (EBG 005, 903m NNW), a small scatter of Roman pottery (EBG 036, 1096m NW) and a fragment of lava quern (EBG 065, NE). A possible Roman road also runs from East Bergholt to Woolverstone (EBG113).

Late Saxon: The historic settlement core of East Bergholt dates from the Late Saxon period (EBG 044, 580-1271m E/SE).

Medieval/post-medieval: Medieval/post-medieval features (three ditches and two undated postholes) and finds were identified during a geophysical survey (ESF23261), a metal-detecting survey (ESF23262) and trial-trenching evaluation (ESF23263) on land northwest of Moores Lane (EBG 048, 920m NW). A small scatter of late medieval/post-medieval tile was also found

¹ British Geological Survey – <http://mapapps.bgs.ac.uk/geologyofbritain/home.html?>

² <http://www.suffolklandscape.org.uk/>

³ The Suffolk Historic Landscape Characterisation Map, version 3, 2008, Suffolk County Council

⁴ This is based on records held at the Suffolk County Historic Environment Record (SCHER).

during monitoring at Foxhall fields (EBG036, 1096m NW), along with a stone vessel to the NE (EBG 067). A hoard of 11 14th-century silver pennies was also found within the search radius (EBG 073).

Post-medieval: Bergholt Heath is plotted on Hodkinson's map of 1783 (EBG 111, E). Old Hall Park (EBG 045), located 1230m SW, is shown on early OS maps as a large area to the southeast of Old Hall (EBG 023) with numerous trees. Farmsteads located on the 1st edition OS map include Woodgates Farm (EBG 083, 990m NNW), Rookery Farm (EBG 085, 497m NNE), unnamed (EBG 087, 350m W), Elm Farm (EBG 090, 710m ESE), Richardson's Farm (EBG 091, 840 WSW), Mill Farm (EBG 101, 350m SSE) and Willow Farm (EBG 102, 695m SE).

Modern: Two 19th century threshing barns are located at High Trees Farm (EBG 040, 680m NW).

Undated: An undated cropmark complex of 'ice-wedges and linear marks forming former ?field system on different alignments to present system' is located 970m SE (EBG 013). An undated and disarticulated human skull was also recovered during road widening opposite the Carriers Arms (EBG 008, 670m WNW).

Metal-detected finds: There are 49 confidential findspots within the search area, although none were located within, or in particularly close proximity to the PDS. The finds date from the Neolithic to post-medieval periods. The Neolithic flints, mostly from the same location, include flint blades, scrapers and flakes. A few fragments of copper-alloy working waste have been assigned a possible Bronze Age date and there was a large rim sherd of an Iron Age carinated bowl. All further evidence from these findspots is medieval and post-medieval in origin, largely comprising metalwork such as coins, buttons, harness straps and mounts, and finger rings.

Listed buildings⁵ (Fig 3)

There are 41 designated listed buildings within the search area of Grade II and II* status dating from the 15th-19th centuries. None of these are in particularly close proximity to the PDS (the nearest being c 350m to the southeast) or will be affected by the proposed development in anyway.

Desk-based assessment

A desk-based assessment for the PDS was produced by Colchester Archaeological Trust in June 2016 (CAT Report 966). It summarised:

Within the broader search area, the Suffolk Historic Environment Record (SHER) lists eight monuments. These include the find-spots of a Roman spindle whorl and human skull of unknown date, a post-medieval timber framed pigeon loft and two 19th-century threshing barns.

One area of cropmarks is located to near the edge of the search area, to the southeast of the PDS. These appear to be largely glacial, though possibly also include marks relating to a former field system. Two areas of East Bergholt are identified by the HER as being areas of historic activity – one is the historic settlement core of the village and the other is the area of parkland known as 'Old Hall Park'.

There has been one archaeological evaluation, near the edge of the search area, to the north-west of the PDS. Medieval and post-medieval finds and features were identified here during metal detecting and trial trenching.

As well as these listed monuments, 41 listed buildings and 49 confidential findspots are located within the search area. None of these are in close proximity to the PDS and any activity they indicate is unlikely to be affected by future development.

⁵ This is based on records held at the Suffolk County Historic Environment Record (SCHER).

Geophysical survey (EBG 056)

A detailed magnetometer survey was carried out over the PDS in October 2016 by Britannia Archaeology Ltd (Report Number 1145). It summarised:

The geophysical survey identified several anomalies that could be archaeological in origin. The features present within the survey are identified as low amplitude positive anomalies, which could be infilled ditch type features (1000 – 1002 and 1004), with anomalies 1001 and 1002 possibly representing an enclosure. A series of low amplitude anomalies (1003) on the northern boundary of the site have been identified as ploughing activity of an unknown date. A discrete high amplitude anomaly (1006) was identified of unknown origin, it is possible that the source of the anomaly is archaeological in origin.

Archaeological evaluation (EBG 060; CAT Report 1164)

An archaeological evaluation was carried out on the PDS in August 2017 by CAT. Sixty-one evaluation trenches sampled the whole area with a small number positioned to target the geophysical anomalies identified in 2016 survey. The evaluation uncovered fifteen post-medieval/modern features (six ditches, three pits/ditches, three land drains, two pits and one kiln) and thirteen undated features (five silt patches/natural features, four ditches, two pits, one pit/posthole and one ditch/silt patch).

A ditch intercepted as F5 (in T31) and F24 (in T9) is convincingly positioned to have been the southern boundary of a field named 'Megs Well', which is plot 310 on the 1838 East Bergholt tithe map.

The most significant among the evaluation features was F10, a burnt brick structure tentatively identified as a brick kiln. No kiln is shown on the Tithe Map, but the location of the brick structure (in evaluation T58) coincides with plot 309 to the south - 'Further Megs'.

There are a number of place names within a 1km radius which are indicative of local brick or tile manufacture. These include a fields named 'Brickman's Downs' and 'Claypit Close', and 'Kiln Cottage'.

4 Aim

The aim of the excavation was to fully excavate and record the brick kiln identified by the 2017 evaluation, and to determine if any associated archaeological remains survived around it. This work would take place within and contribute to the goals of the Regional Research Frameworks, including the regional review by Medlycott (2011) and the recently revised period specific frameworks (accessible via <https://researchframeworks.org/eoe/>).

5 Methodology

An area measuring 1,885 square metres was positioned over trench T58 of the 2017 evaluation. It was stripped by mechanical excavator under archaeological supervision through topsoil (L1: c 300mm thick, and subsoil (L2: c 200mm thick) onto natural ground (L3). Natural here is officially described as Lowestoft Formation (sands and gravels). This slightly underplays the clayey nature of the ground here. Stripped ground level (i.e. site level) varied from 38.99m aOD to 40.16m aOD around the kiln.

All features aside from the brick kiln were excavated by hand. Once the full extent of the brick kiln had been exposed, approximately a quarter of it was excavated by hand. Following this, and after consultation with Matt Baker, Archaeological Officer for SCCAS, it was agreed that the remaining backfill within the kiln could be excavated by machine under archaeological supervision. Once cleared, the kiln was cleaned by hand and recorded.

The excavation was sufficient to provide evidence for the period, depth and nature of all archaeological deposits. For linear features 1m wide sections were excavated across their width to a total of 10% of the overall length. Discrete features, such as pits, were 50% excavated. The brick kiln was 100% excavated.

CAT uses a multi-context recording system assigning feature (F) and layer numbers (L) to distinct archaeological contexts, with separate finds numbers allocated to material recovered from these contexts. Individual records of excavated features and layers were entered on pro-forma record sheets with registers compiled of finds, small finds and soil samples.

The excavation area and all features were surveyed by GPS with sections drawn by hand at 1:10 or 1:20. The brick kiln was recorded by photogrammetry⁶. All features were digitally photographed with a scale and north arrow.

A metal-detector was used to scan the area before and during excavation, and to scan the spoil heaps. Detailed methodology is given in the WSI (CAT 2021).



Photograph 2: Elevated view of kiln and rake-out pit. View NW (from photogrammetry model).

⁶ (the photogrammetry model can be found at <https://sketchfab.com/3d-models/brick-kiln-bh8ef62eee872d4c7eb789ed6e9cc61244>).

6 Results (Figs 3-6, Photographs 1-8, 10)

Kiln F10

The heavily robbed kiln F10 was the principal discovery. Aligned NW-SE, it consisted of a kiln structure 7m long and 5m wide fronted by a rake-out pit 6m long and x 3.5m wide (internally). Site level (after stripping of 0.5m of ploughsoil and subsoil) was between 38.99m aOD (south-western corner of kiln) and 40.16m aOD (north-east corner). The kiln bottom was 2m below site level.

Walls and flues

The kiln structure consisted of four walls flanking three flues, and a thinner back (north) wall. The flues were each 0.5m wide⁷. The three flue floors were the only surviving *in situ* elements of the kiln. They consisted of four stretcher rows of frogless bricks which were of a darker colour than those in the adjacent walls. Also, a distinct gap could be seen between the flue floors and the flue walls. At face value, this may imply a repair phase. Or it may simply be an indication of a greater degree of fire damage. The flue floors were generally flat, and at 38.25 m aOD (approximately 2m below cleared site level).



Photograph 3: Elevated view west of the kiln structure (from photogrammetry model).

The outer two walls were slightly wider (1.0-1.2m) and the two inner walls flanking the flues were slightly narrower (0.65m - 0.75m). The rear (north) wall did not survive well. It was a single course thick on its upper levels, but stepped out by half a brick width on its seven lowest courses. This arrangement presumably helped the flow of hot air through the kiln. As visible at the ends of the flues, the flue walls were laid with alternating rows of headers and stretchers.

⁷ slippage of the eastern side of the structure gives the appearance that the easternmost flue was slightly narrower



Photograph 4: Site level view north-west of the flue ends. The 1-m ranging rod is set against a vertical burnt surface from which the north wall has been robbed. Note the bulge in the lower brickwork of the eastern flue (later repaired) and that the top two courses of the western walls are set back slightly (evidence of several periods of construction?). Also, vitrified material (caused by the heat of the fire) adheres to the upper part of the flue walls, particularly the east flue. Note also the repair indicated by a single frogged brick at the end of the eastern flue (from photogrammetry model).



Photograph 5: view east across the centre of kiln showing clay cores of flue walls (from photogrammetry model).

The heavy robbing of the centre of the kiln (Photograph 5, above) showed that the flue walls were not solid brick, but had clay cores (burnt orange). The same is possibly true of the eastern wall. This allows the speculation that the kiln construction involved the digging of trenches along the proposed lines of the flues, then lining and capping everything with brickwork.

Rake-out pit (Photograph 6)

This name is based on the assumption that the charcoal burning patches visible on the base of the pit were caused by hot ashes being raked out into it after firing. However, it would be sensible to assume that fuel was stacked here before firing and fed into the kiln from here during firing. Unlike the kiln, which was flat, the floor of the pit sloped gently along its axis (from south to north), losing approximately 15cm of height (from 38.05m down to 37.94m aOD). This slight slope may have assisted in feeding fuel into the kiln. The pit was originally surrounded by a

double stretcher wall, now badly robbed out. It is unclear how the pit was accessed, unless by a staircase whose remains are a stack of bricks midway along the eastern wall.



Photograph 6: rake-out pit. Note ash and coal flecks pressed into clay base of pit. Is the brick stack centre right the remains of an access stair down into the pit? (Photograph ref: 98)

Brick dating of kiln structure

Photograph 7 (below) shows that the outer walls contain a high proportion of frogged bricks, whereas the inner walls (admittedly more heavily robbed) contain only frogless bricks. This can be read as evidence that the kiln was originally built with frogless bricks *circa* 1810-1830, and was later substantially rebuilt with frogged bricks *circa* 1850.⁸



Photograph 7: Note the frogged bricks in the (rebuilt?) outer walls, and the frogless bricks in the central walls (original structure?). (From photogrammetry model).

⁸ This would be the conventional date of the bricks, if there were no other evidence. However, the map evidence shows that the kiln was not built before 1838.

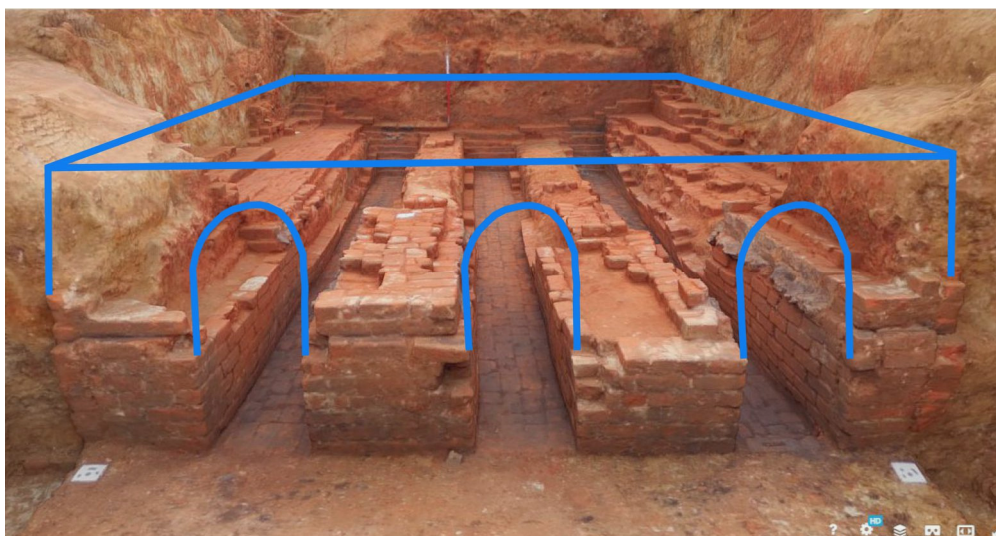
Other kiln sites

A detailed discussion of local post-medieval kilns is beyond the scope of this report. However, a few general comments are appropriate. How does the East Bergholt kiln compare with other post-medieval kilns? East Bergholt is very heavily robbed, and the lack of stokehole arches and a kiln floor makes comparison difficult. However, two kilns share some characteristics - Trimley St Martin (20km east), and Wormingford (Essex, 15km west). As far as can be established, the available evidence for the Trimley kiln⁹ consists of a newspaper article with a photograph and a paragraph of text, and a high quality survey¹⁰. It is regrettable that the plan is not scaleable, so size comparison is difficult. Nor is there any dating evidence for the Trimley kiln, which has two flues in contrast to three at East Bergholt. The Wormingford kiln was last fired in period 1707-1720, and its excavators conclude that it was wood fired.

Estimate of layout and size of original structure

The example of other Suffolk kilns, such as Trimley and Layham^{11, 12} and Wormingford¹³ shows that standard layout of what is termed a 'Suffolk Kiln' is essentially a rectangular brick box set into the ground or into a natural slope, with two or three firing pits, tunnels or flues usually topped by brick arches, above which was a brick floor. Above that will have been a superstructure, but evidence for these rarely survives. Having said that, fragments of both peg tile and pan tile at East Bergholt hints at least partially tiled roof above the kiln and/or the rake-out pit.

The East Bergholt kiln had been robbed out to the extent that nothing survived of the kiln floor, or of the arches which must originally have topped the tunnels/flues (as in the examples above). Is it possible to make an estimation of the original structure? No superstructure survived, so we cannot comment on that. As for the level of the kiln floor, we can make the following assessment. Two elements come into play here: the thickness of the bricks and the number of surviving courses, and the estimated position of the arches. First, the brickwork. As described in Matthew Loughton's report (Section 7, below), the median thickness of bricks found here is 66mm. The highest surviving brickwork was in the north-western and north-eastern corners, where twenty and twenty-one courses survived respectively. At 66mm per brick, 21 courses would equate to 1.4m (4ft 7 inches) above the level of the flue floors. This may have been the level of the brick floor, and the wire diagram (Photograph 8 below) is a reasonable reconstruction based on that estimate. For comparison with other kilns, the Layham stoke hole arches were 1.55m high, but were only 1.2m high at Wormingford¹⁴.



Photograph 8: wire diagram estimate of kiln floor level at approximately 1.4m (4'6") above flue floor.

⁹ A search of SHER (14/02/22) failed to find any mention of this.

¹⁰ by the East Anglian Museum of Rural life

¹¹ We are grateful to the East Bergholt Society. Their website contains an article on the East Bergholt kiln, with useful references and historical research, and links to kilns at Layham and elsewhere, referred to here.

¹² A search of SHER (14/02/22) failed to find any mention of this.

¹³ White and Marriot 2013

¹⁴ See 11.

Second, the arches. Clearly, the height of the arches has a bearing on the level of the brick floor above, but the problem here at East Bergholt kiln is that there is no indication in the surviving brickwork of where the arch springs began. Having said that, the presence of vitrified material clinging to the upper part of the flues (see Photographs 4, 5) implies that the flue walls must have been vertical up to that point, and that the arches must have begun above brick course 10, or above (ie, at 0.66m or more above the flue floors). Given that, the outline of the arches on Photograph 8 seem quite reasonable¹⁵.



Photograph 9: the Wormingford brick kiln (White and Marriot 2013)

Other aspects of the kiln

The lower infill of the kiln contained a high proportion of broken bricks. This is probably because during the robbing out of the structure, damaged or broken bricks were discarded into the kiln, whereas the whole ones were removed from site. The fired clay small finds (Fig 10) are probably lumps of clay forced into gaps in the kiln structure, subsequently fired red.



Photograph 10: charcoal/ash layer at bottom of flue (Site Photograph ref: 28).

¹⁵ If the estimate is wrong, it can only (arguably) be by one or two courses, giving a kiln floor height above the flue floors of approximately 1.28m (4 feet 2 inches - quite close to the Wormingford dimensions), otherwise the arch springs would have been visible in the surviving brickwork.

A layer of debris was seen in the flue bottoms (Photograph 10). The upper bricky part of this deposit probably consists of debris from the kiln robbing, whereas the lower part of the deposit, a mixture of ash, charcoal, clinker and clay bits, may be the waste product from the last firings of the kiln.

One important point is the fuel used at East Bergholt. Coal flecks were among the debris trampled into the clay base of the rake-out pit, so there is probably no doubt that East Bergholt was a coal-fired kiln. Whether three flues rather than two (as at Trimley and Wormingford) is more efficient for coal may be hinted at here.

Non-kiln features

There were thirteen non-kiln features, as follows.

Roman or medieval

Shallow pit F29 was dated by a single greyware sherd which may be either Roman (Colchester fabric GX) or medieval sandy greyware (Fabric 20). Given the lack of any other Roman material, medieval seems a more likely date. Given the dating of all the other features revealed by this excavation, this medieval sherd (if that is what it is) is likely to be residual.

Post-medieval

The most interesting feature apart from the kiln was trench F39. This was sectioned in two places, and measured 1.36 - 1.40m across, and 1.36m deep. Perhaps its most striking characteristic is its vertical or near vertical sides. It would be easy to suggest that it was a drain or boundary ditch connected to the kiln, but its profile and steep sides argue against that. In fact, it quite closely matches WW1 trenches found at Colchester Garrison. It is suggested here that F39 was dug by the military, probably as a practice trench (as at Colchester Garrison), at some time around the First World War. Reasons for the choice of this location are difficult to guess. It may simply be that the infilled kiln site was visible as a depression in the field, and was selected as a likely location for at reason only.

Undated

The majority of the features contained no finds, and so are undated. They ranged in width from 0.46m (F35) to 1.84m (F41), but were generally 0.5m wide. They were all quite shallow, with only F34 and F36 having depths over 0.35m. Their function is unclear. The features along the western site edge were in a rather straggly line, but are not convincing as a fence.

7 Finds

7.1 Ceramic and Pottery finds (Figs 7, 8, 11)

by Dr Matthew Loughton

The excavation uncovered 62 sherds of pottery and ceramic building material (henceforth CBM) with a weight of 61.7kg (Table 1). The bulk of this material consists of CBM and brick.

Ceramic material	No.	Weight (g)	MSW (g)
Pottery	4	43	11
CBM	58	61,695	1,064
All	62	61,738	996

Table 1 Details of the main types of ceramics and pottery

This material came from three features: the kiln F10, pit F29 and linear F39 (Table 2). The majority of the assemblage by sherd weight came from the kiln F10 (Table 2).

Context	Description	No.	Weight (g)	MSW (g)
F10	Kiln	35	56,591	1,617
F29	Pit	1	3	3
F39	Ditch	26	5,144	198
Total		62	61,738	996

Table 2 Quantities of pottery and CBM from specific features and contexts

Post-Roman pottery

Pottery was uncommon, with only four sherds with a weight of 43g and consisted of three sherds (40g) of Yellow ware (fabric 48E), dating to the 19th/20th century, from kiln F10 and one small sherd (3g) of either Roman greyware pottery (fabric GX) or Medieval sandy greywares (fabric F20) dating to c 1150-1375/1400, which came from pit F29.

Fabric code	Fabric description	Fabric date range guide
GX/F20	Roman or Medieval sandy greyware	Roman/c 1150-1375/1400
F48E	Yellow ware	19th/20th century

Table 3 Post-Roman pottery fabrics recorded.

Ceramic building material (CBM)

The 58 sherds of post-Roman CBM with a weight of 61,695g came from kiln F10 and ditch F39. Bricks, including frogged and un-frogged examples, account for the majority of this material alongside occasional pieces of peg-tile, pan-tile and ridge tile (Table 4).

CBM code	CBM type	No.	Weight (g)	MSW (g)
<i>Post-Roman</i>				
PT	Peg-tile	5	526	105
PANT	Pan-tile	1	198	198
RIDGE	Ridge tile	1	625	625
BR	Brick	20	5,073	254
	Frogged	14	23,069	1,648
	Un-frogged	13	29,382	2,260
	Single cant?	2	2,547	1,274
<i>Undated</i>				
Baked clay		2	275	138
Total		58	61,695	1,064

Table 4 Building material by period and type

Context	Description	No.	Weight (g)	MSW (g)
F10	Kiln	56	56,551	1,010
F39	Ditch	26	5,144	198
Total		58	61,695	1,064

Table 5 Quantities of CBM from specific features and contexts

Bricks

Most of the bricks are in a distinctive orange-coloured fabric which contains a very fine powdery cindery-like substance, perhaps coal dust and ash which was deliberately added to brick clays from the late 18th century onwards in the London area (Ryan 1999, 15). Both unfrogged and frogged bricks are found in this fabric and examples came from kiln F10 and ditch F39. Of the 12 complete bricks in this fabric the median dimensions are 230mm x 110mm x 66mm with a median weight of 2,543g. Brick lengths range from 220mm to 240mm, breadths from 105-118mm and thickness from 65-72mm. As can be seen from Fig 11 there is strong positive correlation between brick length and brick breadth. The weights of complete bricks show a slightly greater range of values from a low of 2,330g to a maximum of 3,117g. The slight variation in the dimensions of complete bricks suggests that they were not machine made and predate c 1850.

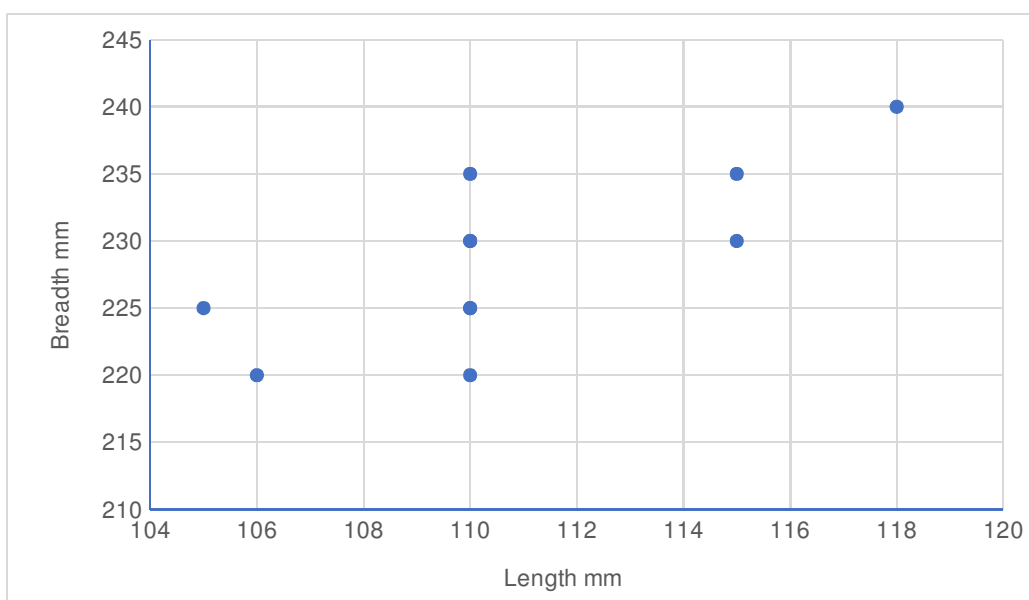


Fig 11 Brick length (mm) against brick breadth (mm)

In Ryan's Essex brick typology these bricks conform to her Soft Reds category which she dates to the 19th and 20th centuries (1996, 95-96). All have sharp arises and occasional creased margins while many of the bricks from kiln F10 show signs of heat and burning including the discolouration of some edges, the cracking of surfaces, and glassy and clinker like deposits. The use of a frog dates from the early 19th century onwards (Ryan 1999, 15) and the frog dimensions range from 120-105mm long (median 110mm). All the frogs are narrow (widths ranging from 25mm to 35mm with a median of 30mm), and shallow, suggesting that these are early frogged bricks. By the 1870s frogs were often stamped with the name of the brick maker (Ryan 1999, 15) and their absence here provides a TAQ of c 1870. The presence of frogged bricks indicates a TQP in the early 19th century and a TAQ of c 1850/1870 for the construction of the kiln.

There were four slightly different bricks on account of their fabric or overall size which came from kiln F10. Firstly, there was one thinner un-frogged brown coloured brick with dimensions of 230mm x 115mm x 50mm (Fig 8.6) which could date to the late 17th to early 18th century (Ryan 1996, 95). Secondly there was one complete brick with dimensions of 230mm x 115mm x 65mm with a narrow frog (100mm x 25mm) in a yellow, marbled fabric with red and orange nodules (Fig 8.5). There was another un-frogged brick with dimensions of 230mm x 112mm x 70mm in another slightly similar marbled fabric (orange-coloured with various yellow/white and red/orange

nodules). Both of these bricks could be examples of Suffolk white and Suffolk white-type bricks which, according to Ryan's Essex brick typology, date from the late 18th to the 19th century (1996, 95). Finally, there was an incomplete brick (? x ? x 66mm) in a brown-coloured fabric with frequent pale coloured nodules (Fig 8.8).

Single cant bricks?

There were also two possible single cant bricks from kiln F10. Both of these cant bricks are found in the same orange 'cindery' fabric as the frogged and un-frogged bricks suggesting that they were manufactured on site as well.

Other CBM

Finally, sherds of peg-tile, pan-tile, and ridge tile were recovered from kiln F10 while a piece of peg-tile was also recovered from ditch F39.

Conclusion

Table 6 summarizes the dating evidence for the features which contained dateable pottery and ceramics. The brick kiln would appear to date to the period c AD 1810/20-1850/70 which is in accord with the documentary evidence amassed for the brick kiln.

Context	Description	Post-Roman pottery	CBM	Date Approx.
F10	Kiln	F48E	BR UN-FROGGED, BR FROGGED, CANT BR?, PANT, PT, RIDGE	19th century
F29	Pit	GX/F20	-	
F39	Ditch	-	BR UN-FROGGED, BR FROGGED, PT	19th century

Table 6 Approximate dates for the individual features

7.2 Small and miscellaneous finds (Figs 9, 10)

by Laura Pooley

The backfill of kiln F10 produced two iron objects (SF1 and SF2) and two fragments of ceramic kiln furniture (SF3 and SF4) along with a copper-alloy ring (SF5), fragment of glass and pieces of coal/clinker (Table 7). The first iron object was a complete chisel and the second an incomplete and unidentified object with two forked arms. Initially it was thought that perhaps this could be part of a pair of calipers or dividers, but X-ray failed to show any evidence of a hinge or pivot on the plate making this identification unlikely. Ceramic kiln furniture would have been used inside the kiln to support the bricks and to create more space for firing.

The only other miscellaneous item from the site is a fragment (51.8g) of metal-working debris which came from F39 sx1 (finds no. 77).

Finds nos.	Description
78	Fig 9.1 Iron chisel (SF1): Complete, square-section tapering shank (slightly bent), flat round head (22.3mm diameter), 89.1mm long, 67.9g. Glass: Fragment of olive green bottle glass, 8.5g, post-medieval/modern. Coke/clinker: Thirty fragments, 123.9g.
79	Fig 9.2 Ring (SF5): Copper-alloy ring, c 33mm diameter, with round cross-section (3mm diameter), 3.7g.
80	Fig 9.3 Iron object (SF2): Corroded oval iron plate (47mm by 33mm and 14mm thick) with two straight but forked, rectangular-sectioned arms, both tapering and broken, 105.7mm long, 214.9g.
81	Fig 10.4 Baked clay (SF3): Fragment of ceramic kiln furniture with a semi-circular band on one side and small right-angled strip on the other, 63.0mm by 52.1mm and 38.3mm thick, 66.8g.
82	Fig 10.5 Baked clay (SF4): Fragment of ceramic kiln furniture. Flat on one side, other side

Finds nos.	Description
	divided into three cells by thin walls of clay, 60.9mm by 59.2mm and 41.2mm thick, 88.1g.

Table 7 Finds from F10

8 Discussion

The site in its local context

There was no local knowledge of this kiln, nor does it appear on any maps. It is not shown on the 1838 Tithe Map¹⁶, or on the 1st edition OS coverage of 1887 (surveyed 1876-84). Its discovery was therefore a surprise. The maps give a useful date range within which the kiln was built, operated, and demolished.

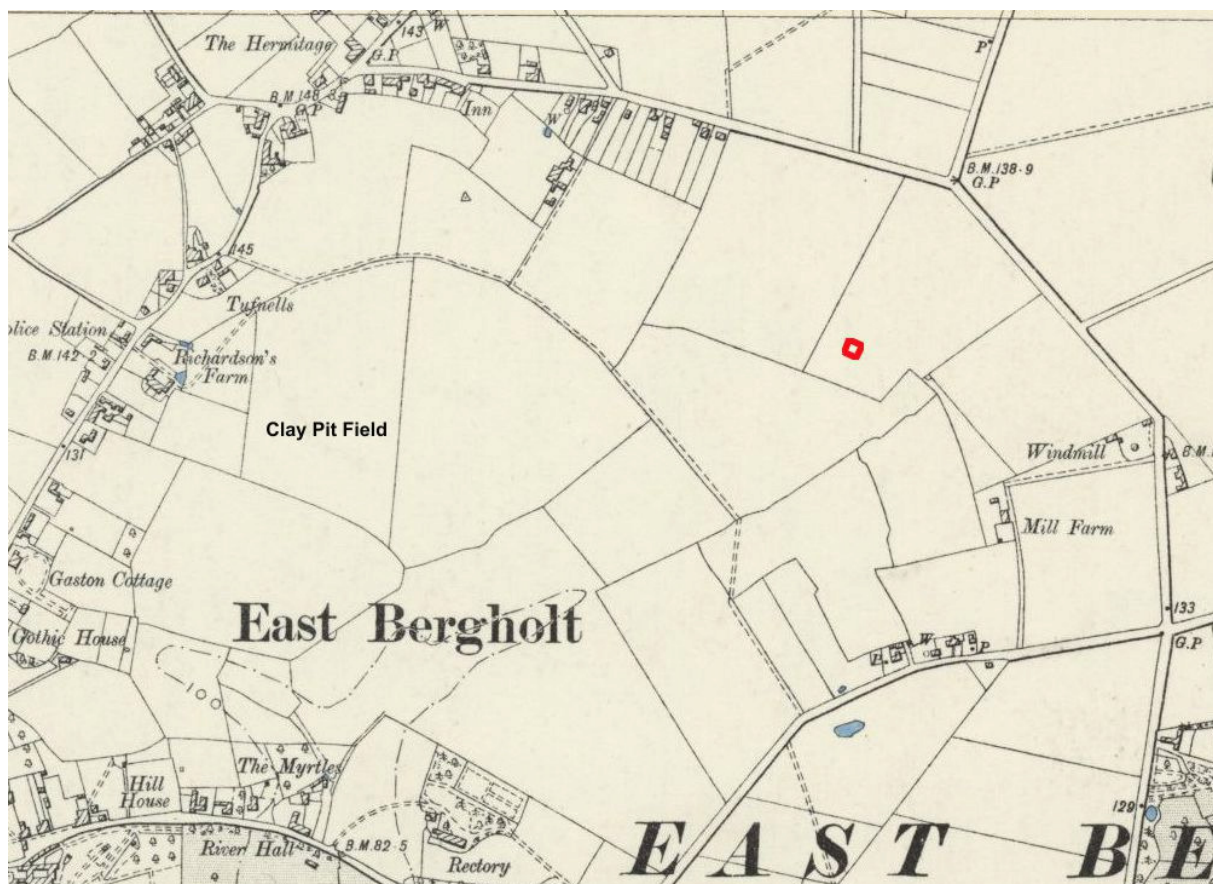


Figure 12: Ordnance Survey 1887¹⁷. The kiln had been robbed and infilled by this date, and consequently is not shown on this map (its site is highlighted in red, for reference). Also shown is Clay Pit Field, which is on the Brasier Map of 1731¹⁸.

The general impression given by map evidence in general and field names in particular is that there were many kiln sites in and around Bergholt. For instance, the Brasier map of 1731 shows a *Clay Pit Field*, approximately 650m SSE of the Heath Road Kiln, and the Tithe Map of 1838 shows a *Kiln Field*, *Kiln Field and Building*, and *Kiln Pightle* on Woodgates Road, some 1.2km NNE. There is no reason to suppose that these industrial sites were connected. It seems more logical to assume that they were in operation at different dates and for different construction projects. For example, *Clay Pit Field* is 650m away from the Heath Road kiln, and to move clay from there to our kiln would involve a journey only partially along tracks and for significant distances over open fields - surely

¹⁶ There is some variation in written sources about the date of the Tithe Map. Suffolk Record Office gives it as 1838.

¹⁷ For all maps in this report, © Crown copyright. All rights reserved. Licence number 100039294

¹⁸ Information from East Bergholt Society website

too difficult. It can be argued that the clay for firing bricks at Heath Road was taken from a much closer source (though, admittedly unknown at present). Of course, the clay extracted from the holes dug prior to construction of the kiln will have amounted to approximately 13m long x 5m wide x 2m deep, or 130 cubic metres of clay. This would not have been wasted, but may have been burnt in a surface brick clamp to make bricks for the early phase of the kiln¹⁹ (in addition, this would have been a good test of the viability of the local clay, and of the kiln site itself).

The kiln structure

The only surviving *in situ* element of the kiln was the brick floors of the three flues. Everything else has been robbed out. The level of the kiln floor is unknown, but has been estimated at 1.4m (4ft 6 inches) above the floors of the flues. Coal flecks indicate that coal was used to fire this kiln (coal was readily available at this time).

Evidence for repairs

There are a number of reasons to suspect that the kiln has undergone at least one episode of repair or rebuild. These have been discussed in the text above, but can be listed as follows: two types of brick in the structure (earlier unfrogged and later frogged); the bulge in the lower brickwork of the eastern flue; the correction of this by an obviously later repair with frogged bricks; the offsetting of the upper two courses of the western two walls; the frog brick repair in the eastern flue floor; the colour difference between the flue floors and the adjacent flue walls.

Date of use

It has already been pointed out that map evidence brackets the life of the kiln as *circa* 1840 to 1850/70. How does this compare with the brick dates? Of the two types of bricks, the frogged bricks date to 1850-70. This is exactly in line with the map evidence. The earlier bricks predate the earliest date for the kiln. How is this explained? Three possibilities suggest themselves. First, the bricks are actually early 19th century in date, the kiln was constructed *circa* 1810/20, and the map evidence is wrong (or misleading). Second, the bricks were deliberately fired frogless, and are actually *circa* 1840. Third, as was the case at Wormingford, there is a distinct possibility that the bricks were old, and were scrounged from somewhere else to construct the early phase of the kiln.

The kiln with reference to SHER sites and Research Frameworks

It is appropriate to offer some comment on the kiln in this context. The most obvious conclusion is that, apart from local place names indicating clay extraction and kiln activity in the general area, no previous discovery, as listed on SHER or other sources, hinted at the existence of this kiln. With regard to regional research frameworks (<https://researchframeworks.org/eoe/research-agenda/post-medieval/>), the post-medieval research agenda includes this heading:

P-Med 07: How can we increase our understanding of post-medieval bricks and brickwork in the region?

More information:

Regionally based studies of bricks and brickwork, like the work of Ryan (1996) for Essex, would assist the analysis of historic structures.

This is a reasonable statement in many ways. A valuable addition would be a survey of Suffolk brick making sites, to parallel the work of the late Pat Ryan in Essex.

9 Acknowledgements

CAT is grateful to Stephen Williams and the Hills Building Group for commissioning and funding the project. The project was managed by C Lister and A Wightman, fieldwork was carried out by B Holloway with Z Eksen, N Pryke, A Wade, A Wightman and O Windridge. Figures are by B Holloway, R Mathieson, L Pooley and E Holloway. The project was monitored by Matt Baker for Suffolk County Council Archaeological Services.

¹⁹ This writer was involved in the excavation of a brick clamp at Beeleigh Abbey in Essex. MAHG, 2007

10 References

Note: all CAT reports, except for DBAs, are available online in .pdf format at <http://cat.essex.ac.uk>

- | | | |
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11 Abbreviations and glossary

CAT	Colchester Archaeological Trust
ClfA	Chartered Institute for Archaeologists
context	specific location of finds on an archaeological site
feature (F)	an identifiable thing like a pit, a wall, a drain, can contain 'contexts'
layer (L)	distinct or distinguishable deposit (layer) of material
medieval	period from AD 1066 to c AD 1500
modern	period from c AD 1800 to the present
natural	geological deposit undisturbed by human activity
NGR	National Grid Reference
OASIS	Online Access to the Index of Archaeological Investigations, http://oasis.ac.uk/pages/wiki/Main
post-medieval	from c AD 1500 to c 1800
prehistoric	pre-Roman
Roman	the period from circa AD 43 to AD 410
SCC	Suffolk County Council
SCCAS	Suffolk County Council Archaeological Services
SCHER	Suffolk County Historic Environment Record
Section	(abbreviation sx or Sx) vertical slice through feature/s or layer/s
WSI	written scheme of investigation

12 Contents of archive

Finds: to be determined, CAT is currently in consultation with SCCAS regarding selection and retention of brick samples

Paper and digital record

One A4 document wallet containing:

The report (CAT Report 1769)

SCCAS evaluation brief

Original site record (trench record sheet, sections)

Site digital photographic log

Digital record

The report (CAT Report 1769)

SCCAS evaluation brief, CAT written scheme of investigation

Site digital photographs, thumbnails and log

Graphic files

Site data

Survey data

13 Archive deposition

The paper archive and finds are currently held by CAT at Roman Circus House, Roman Circus Walk, Colchester, Essex, but will be permanently deposited with SCCAS under Parish Number EBG 060. The archive will be deposited in line with SCCAS guidance (SCCAS 2019).

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Distribution list:

Stephen Williams, Hills Building Group
Matt Baker, SCCAS
Suffolk County Historic Environment Record



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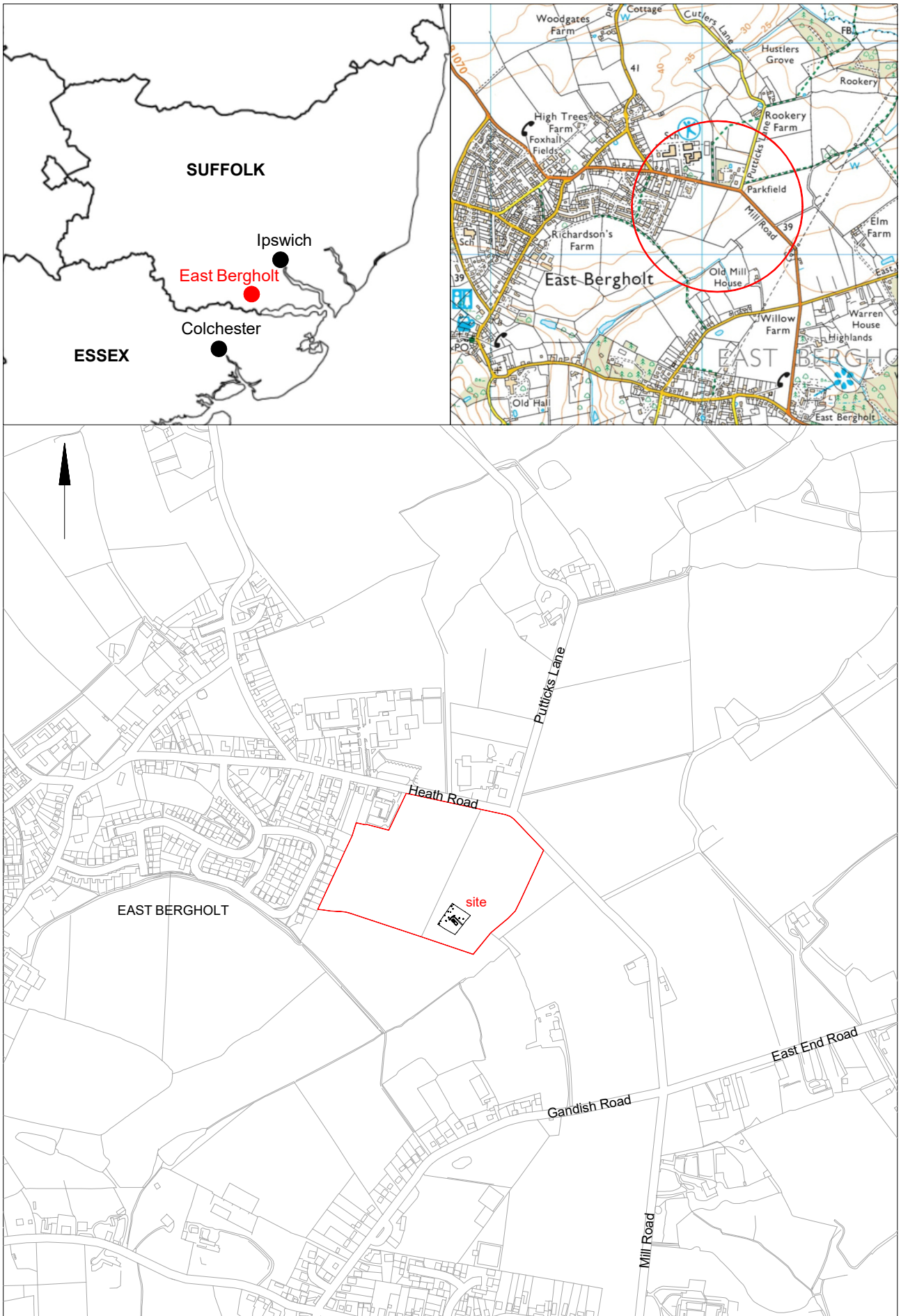
Roman Circus House,
Roman Circus Walk,
Colchester,
Essex, CO2 7GZ
tel.: 01206 501785
email: hb@catuk.org

checked by: Philip Crummy
date:

Appendix 1 Context list

Note: Features nos F1-F28 were assigned during the archaeological evaluation (CAT Report 1164).

Context	Find no.	Feature type	Description	Date
L1	-	Topsoil	Loose, dry, dark brown silty-loam with occasional chalk and CBM flecks and occasional stone	Modern
L2	-	Natural	Natural sandy-clay	Post-glacial
L3	-	Subsoil	Firm, moist, medium grey/brown silty-clay	Undated
F10	4, 5	Brick kiln	<i>Number assigned during evaluation</i>	Post-medieval
F29	1	Pit	Firm moist medium grey/brown silty-clay	Roman or medieval
F30	-	Pit/natural feature/ tree-throw	Firm moist medium grey/brown silt	Undated
F31	-	Pit/natural feature/ tree-throw	Soft, moist, mid grey/brown sandy-clay	Undated
F32	-	Pit/tree-throw	Firm moist medium grey/brown silty-clay with charcoal flecks	Undated
F33	-	Pit	Soft firm moist medium grey/brown silty-clay with daub flecks	Undated
F34	-	Pit	Firm moist light grey/brown silty-clay with charcoal flecks	Undated
F35	-	Natural feature/ tree-throw	Firm moist light grey/brown silty-clay	Undated
F36	-	Pit	Firm, moist, light grey/brown silt with rare charcoal flecks	Undated
F37	-	Pit/natural feature/ tree-throw	Firm moist light/medium grey/brown sandy-silt	Undated
F38	-	Pit/natural feature/ tree-throw	Soft moist grey/brown sandy silt	Undated
F39	2, 3	Steep-sided trench	Firm moist medium grey/brown sandy-silty loam with inclusions of brick, tile, charcoal and fired clay/daub.	WW1?
F40	-	Pit/natural feature/ tree-throw	Soft moist medium grey/brown sandy-silt	Undated
F41	-	Pit/natural feature/ tree-throw	Soft moist medium grey/brown sandy-silt	Undated



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Fig 1 Site location.

0 500 m



Fig 2 HER data (yellow) and listed buildings (blue) in relation to the development site (marked red).

Imagery ©2017 Google, Getmapping plc, Infoterra Ltd & Bluesky, Map data ©2017 Google.
 HER data ©2021 Suffolk County Council Historic Environment Record



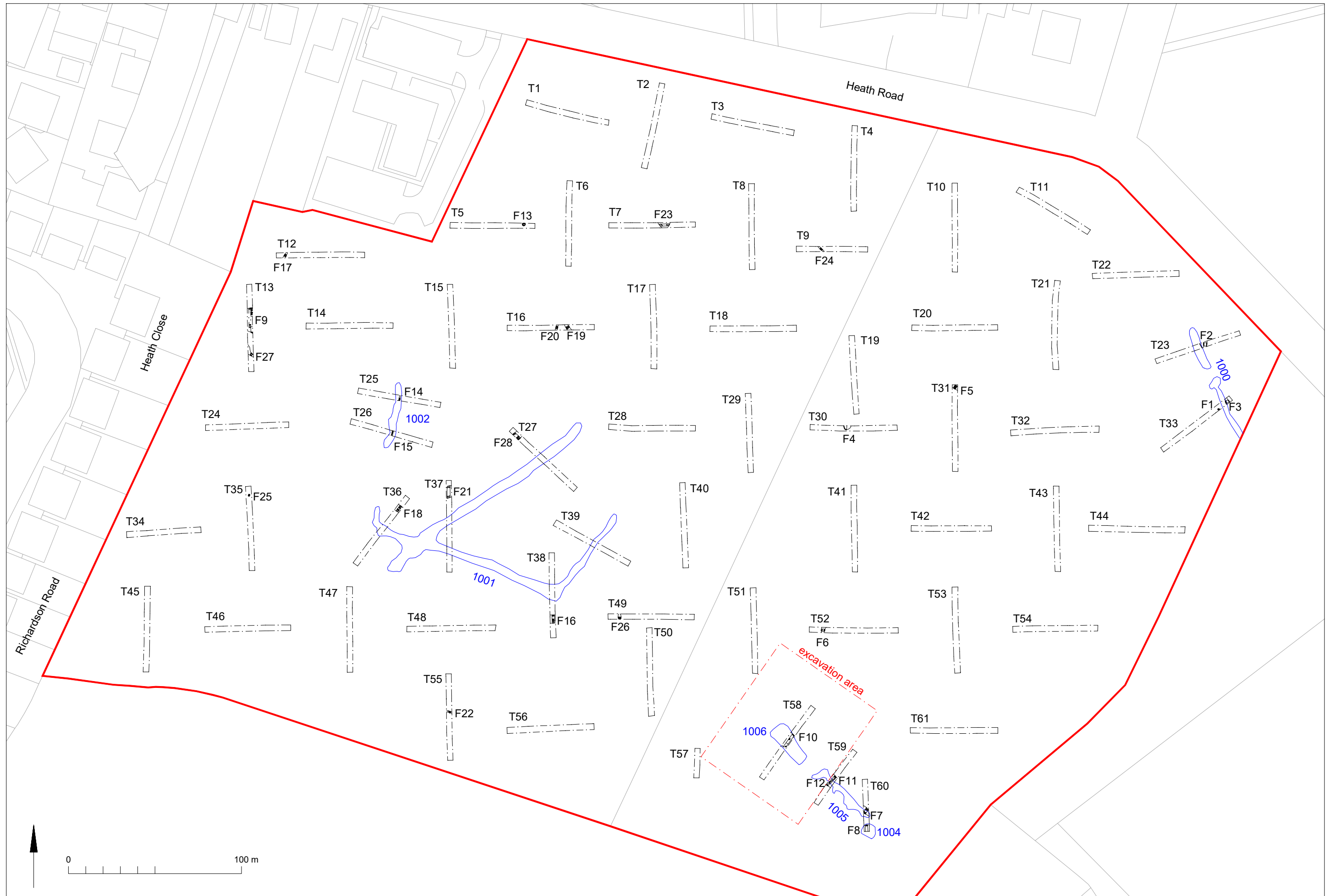


Fig 3 2017 evaluation results (CAT Report 1164) with geophysical anomalies marked in blue (numbers as Britannia Archaeology Ltd Report Number 1145).

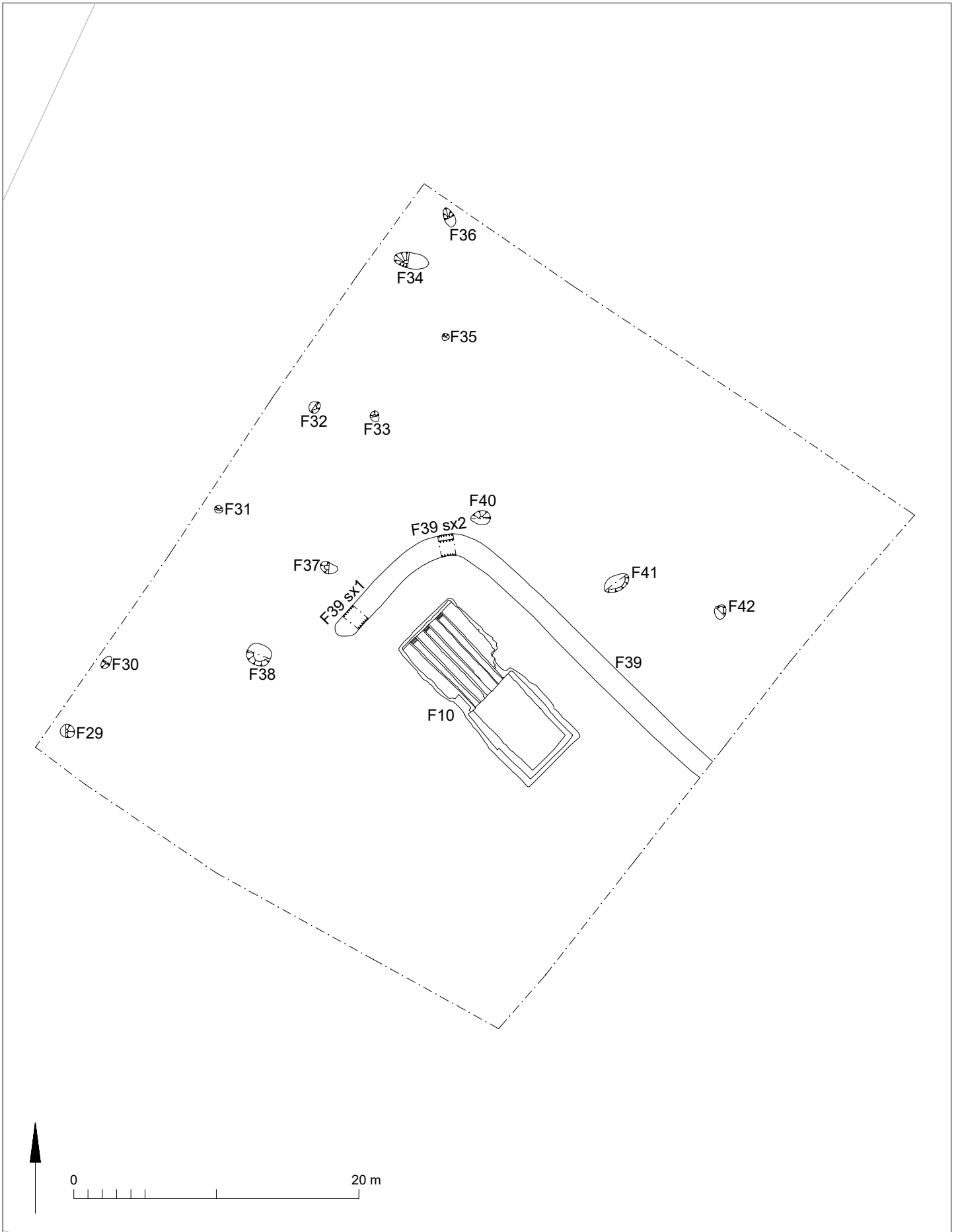


Fig 4 Excavation results.

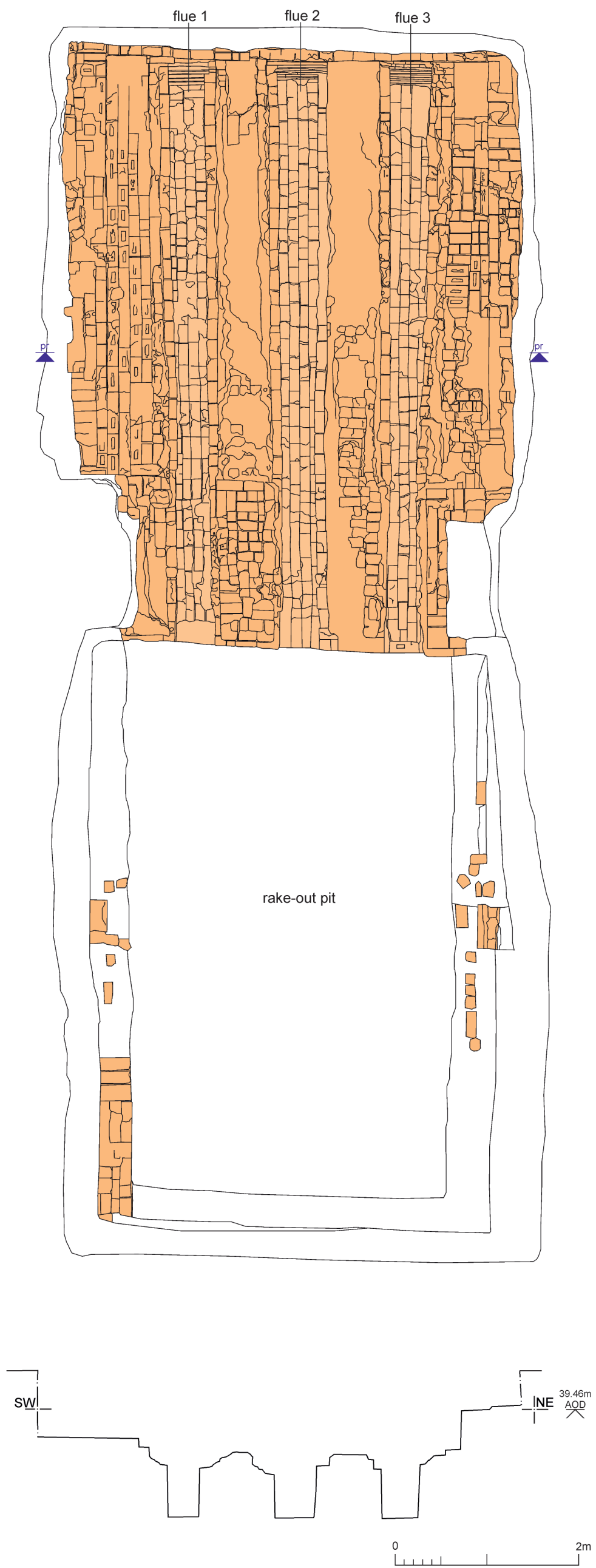


Fig 5 Plan and profile of kiln F10.

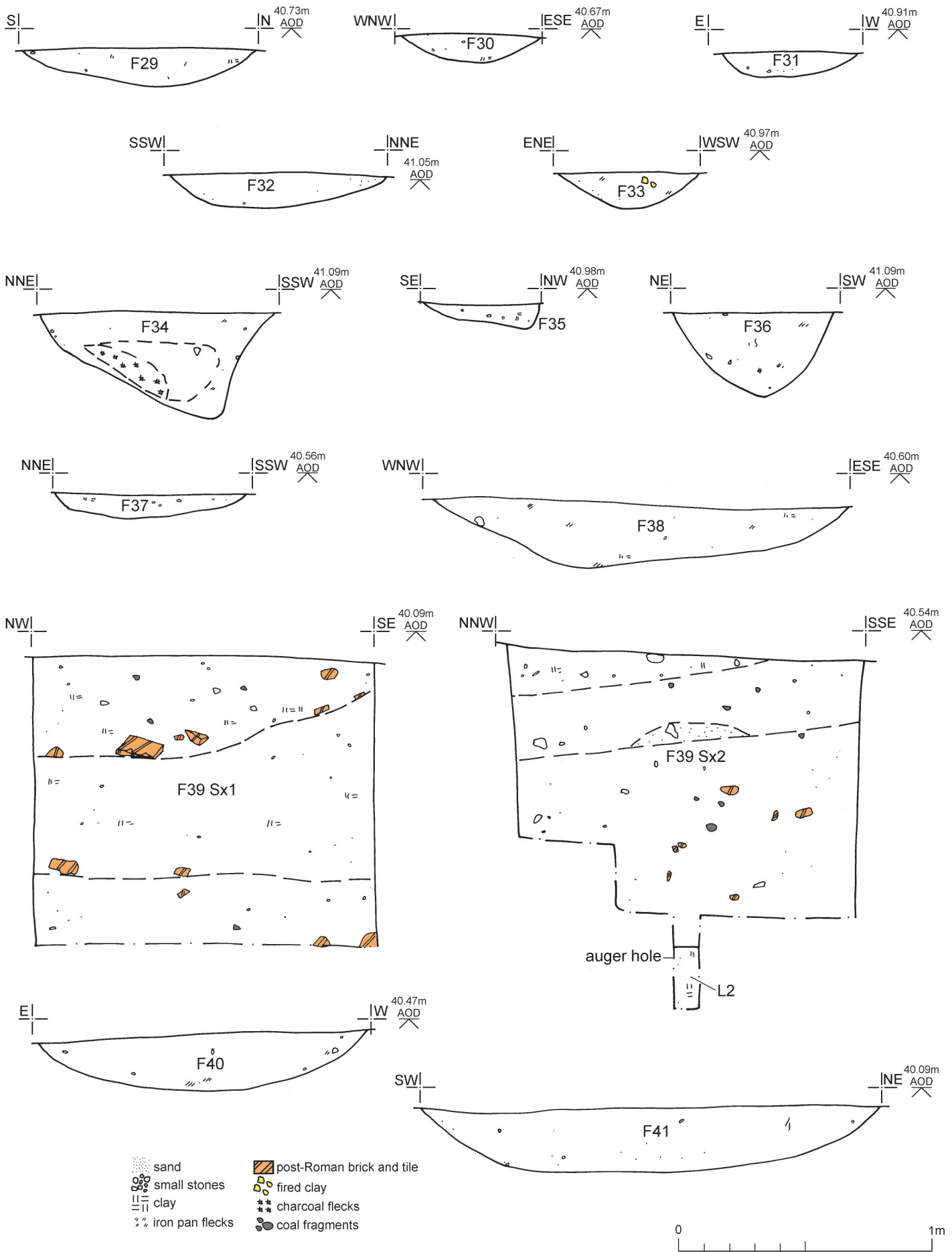


Fig 6 Feature sections excluding kiln (F10).



Fig 7 Selected bricks from kiln F10.



Fig 8 Selected bricks from kiln F10.



Fig 9 Small finds.



Fig 10 Baked clay kiln furniture.

Appendix 2: Pottery list

Cxt	Feature type	Find no.	TR	NR	GR.	MSW	Discard	Flint	Handle	Base	Stamp	Graf Pre-F	Graf Post-F	Wmd	Soot	Pitting	Burnt	Overfired	Kiln second	Residue	Resin Lin.	Gritted	Abraded	Modif.	Mark	Repair hole	Hole	Disc	Disc diam.	Polishing	Fabric Grp	Comments	Date
F10	KILN	78		2	28	14		0	0	1																				F48E		19th/20th century	
F10	KILN	78		1	12	12		0	0	1																				F48E		19th/20th century	
F29	PIT	75		1	3	3																							GX/F20	SANDY GREYWARE	Roman/Medieval		

Appendix 3: CBM list

Cxt	Feature type	Find no.	Section	NR	GR.	MSW	Typology	Sub-type	PH R	PH SQ	2 Phs	Blind	L	BR.	TH.	Frog. L	Frog. Width	Mortar	Burnt	Overfired	Abraded	Modif.	Comments	Date	
F010	KILN	79		1	3064	3064	BR	FROGGED					23 5	11 0	70	12 0	30	X						ORANGE, CINDERY, REG., NARROW FROG, SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2704	2704	BR	FROGGED					23 5	11 5	65	10 0	25							DIFF FABRIC YELLOW, RED/OR NODS, REG., NARROW FROG, SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2782	2782	BR	FROGGED					23 5	11 5	70	5 5	30							ORANGE, REG., SHARP ARRISSES, NARROW FROG	19TH CENTURY
F010	KILN	79		1	3117	3117	BR	FROGGED					23 0	11 5	65	5 5	35							ORANGE, REG., SHARP ARRISSES, NARROW FROG, CREASED	19TH CENTURY
F010	KILN	79		1	2516	2516	BR	UN-FROGGED					23 0	11 0	68			X						ORANGE, CINDERY, REG., BURNT/CRACKED, SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2039	2039	BR	UN-FROGGED					23 5	11 5	50			X						THINNER SLIGHTLY EARLIER BR, ORANGE, REG., SHARP ARRISSES	LATE 17TH-EARLY 18TH CENTURY
F010	KILN	79		1	2638	2638	BR	UN-FROGGED					23 0	11 2	70			X						DIFF FABRIC PALE OR, Y/W NODS & SOME RED/OR NODS, REG., SHARP ARRISSES,	19TH CENTURY
F010	KILN	79		1	485	485	BR	FROGGED					?	?	66	?	?							DIFF FABRIC, PALE BROWN, Y & W NODS	19TH CENTURY
F010	KILN	79		1	1234	1234	BR	UN-FROGGED					?	10 5	60			X	X					ORANGE CINDERY, REG., EDGE BURNT & CRACKED	19TH CENTURY
F010	KILN	79		1	2344	2344	BR	UN-FROGGED					?	10 8	65			X	X					ORANGE, REG., SHARP ARRISSES, CRACKED	19TH CENTURY
F010	KILN	79		1	2330	2330	BR	UN-FROGGED					22 0	10 6	65			X						ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2500	2500	BR	UN-FROGGED					22 5	11 0	67				X					ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2490	2490	BR	UN-FROGGED					22 0	11 0	65									ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2543	2543	BR	UN-FROGGED					22 5	10 5	65			X	X					ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	3057	3057	BR	UN-FROGGED					24 0	11 8	72			X						ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	2614	2614	BR	UN-FROGGED					22 5	11 0	65				X					ORANGE, REG., SHARP ARRISSES, CRACKED	19TH CENTURY
F010	KILN	79		1	2401	2401	BR	UN-FROGGED					23 0	11 0	68			X						ORANGE, REG., SHARP ARRISSES	19TH CENTURY
F010	KILN	79		1	1406	1406	BR	FROGGED					?	12 2	67	?	30		X					ORANGE CINDERY, NARROW FROG, FUSED GLASSY EDGE	19TH CENTURY
F010	KILN	79		1	1479	1479	BR	UN-FROGGED					?	10 5	70				X					ORANGE CINDERY, REG., EDGE BURNT & CRACKED	19TH CENTURY
F010	KILN	79		1	1176	1176	BR	FROGGED					?	?	68	?	30		X					ORANGE CINDERY, REG., SHARP ARRISSES, BURNT UNDERSIDE	19TH CENTURY

Cxt	Feature type	Find no.	Section	N	GR.	MSW	Typology	Sub-type	PH R	PH SQ	2 PHS	Blind	L.	BR.	TH.	Frog. L	Frog. Width	Mortar	Burnt	Overfired	Abraced	Modif.	Comments	Date		
F010	KILN	79		3	5089	1696	BR	FROGGED					?	110	68	?	30							3 BRICKS (1 FROGGED) MORTARED TOGETHER, ORANGE CINDERY	19TH CENTURY	
F010	KILN	79					BR						230	110	65									ORANGE CINDERY. FROGGED?	19TH CENTURY	
F010	KILN	79		1	1097	1097	BR						?	112	66				X					ORANGE CINDERY, BURNING/FUSSED MARGIN	19TH CENTURY	
F010	KILN	79		1	388	388	BR												X					ORANGE CINDERY, BURNING/FUSSED MARGIN	19TH CENTURY	
F010	KILN	79		1	670	670	BR						?	109	65				X					ORANGE CINDERY, GLASSY FUSED TOP	19TH CENTURY	
F010	KILN	79		1	700	700	BR												X					FUSED GLASSY CLINKER MARGIN	19TH CENTURY	
F010	KILN	79		1	1252	1252	BR	SINGLE CANT?							60				X				?	ORANGE CINDERY, OR MODIFIED BR?	19TH CENTURY	
F010	KILN	79		1	1295	1295	BR	SINGLE CANT?							65								?	ORANGE CINDERY OR MODIFIED BR?	19TH CENTURY	
F010	KILN	79		1	198	198	PANT												X						17TH CENTURY>	
F010	KILN	79		1	318	318	PT												X						MEDIEVAL-POST MEDIEVAL	
F010	KILN	79		1	625	625	RIDGE TILE																		19TH/20TH CENTURY	
F039	LINEAR	76	2	1	31	31	PT		X															14 MM DIAM.	MEDIEVAL-POST MEDIEVAL	
F039	LINEAR	76	2	8	767	96	BR						?	?	67				X						19TH CENTURY	
F039	LINEAR	76	2	2	275	138	BAKED CLAY																		?	
F039	LINEAR	77		3	177	59	PT																		MEDIEVAL-POST MEDIEVAL	
F039	LINEAR	77		3	235	78	BR												X						VBURNT, PURPLE, CRACKED SURF.	19TH CENTURY
F039	LINEAR	77		1	65	65	BR												X						VBURNT, PURPLE, GLASSY SURF.	19TH CENTURY
F039	LINEAR	77		2	1206	603	BR	FROGGED					?	110	70	?	29		X						ORANGE, CINDERY, REG., SHARP ARISSSES, NARROW FROG. CREASED ON SIDE	19TH CENTURY
F039	LINEAR	77		1	806	806	BR	FROGGED					?	?	65	?	?		X						ORANGE, CINDERY, NARROW FROG, BURNT PURPLE TOP & SIDE	19TH CENTURY
F039	LINEAR	77		1	431	431	BR	UN-FROGGED					?	?	65				X						ORANGE, CINDERY, REG. SHARP ARISSSES	19TH CENTURY
F039	LINEAR	77		1	420	420	BR						?	?	70										ORANGE CINDERY	19TH CENTURY
F039	LINEAR	77		1	436	436	BR						?	?	?										ORANGE	19TH CENTURY
F039	LINEAR	77		1	234	234	BR						?	?	70				X						ORANGE, CINDERY	19TH CENTURY
F039	LINEAR	77		1	61	61	BR						?	?	?											19TH CENTURY

Written Scheme of Investigation (WSI) for an archaeological excavation on land east of The Constable Country Medical Centre, Heath Road, East Bergholt

NGR: TM 0804 3518 (centre)

Planning references: B/16/01092/OUT & DC/20/04663

District: Babergh District Council

Parish: East Bergholt

Commissioned by: Stephen Williams

Client: Hills Building Group

Curating museum: Suffolk County Council Archaeological Service

Suffolk parish number: EBG 060

CAT project code: 2020/11a

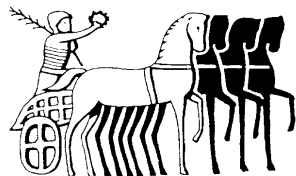
OASIS reference no.: colchest3-428006

Contracts manager: Chris Lister

Excavation manager: Adam Wightman

SCCAS Monitor: Matt Baker

This WSI written: 10.8.2021



COLCHESTER ARCHAEOLOGICAL TRUST,
Roman Circus House,
Roman Circus Walk,
Colchester,
Essex, CO2 7GZ

tel: 01206 501785

email: lp@catuk.org

Site location and description

The development site is located on land to the east of the Constable Country Medical Centre, Heath Road, East Bergholt, Suffolk (Fig 1). Site centre is National Grid Reference TM 0804 3518 and is currently in use as farmland.

Proposed work

Mixed-use development including up to 75 dwellings, a pre-school and a neighbourhood hub, comprising a swimming pool, office space and a local shop, public open space, and associated infrastructure and landscaping.

Archaeological background

The following archaeological background draws on information from the Suffolk Historic Environment Record (archaeology.her@suffolk.gov.uk). This current background was written in 2017 when the archaeological evaluation was commissioned (see below). It will be updated for the excavation report.

Geology

The Geology of Britain viewer (1:50,000 scale¹) shows the bedrock geology of the site as Thames Group (clay, silty), with superficial deposits of Lowestoft Formation (sand and gravel).

Historic landscape

Land to the east of the Constable Country Medical Centre, Heath Road, East Bergholt is in an area defined as *plateau farmlands* in the Suffolk Landscape Character Assessment². Within the Suffolk Historic Landscape Characterisation Map³ it is defined as landscape sub-type 10.3, built up area (village – substantial group of houses associated with a parish church). The landscape immediately around the development site is characterised as sub-type 1.1 (pre-18th-century enclosure – random fields); sub-type 1.4 (pre-18th century enclosure – irregular co-axial fields); sub-type 3.1 (post-1950 agricultural landscape (boundary loss from random fields); sub-type 5.1 (meadow or managed wetland – meadow); and sub-type 6.2 (horticulture – nurseries with glass houses).

There are no Heritage Assets within the proposed development site (PDS), but a list of all archaeological sites and finds within a 1km search area (radius) of the PDS can be found below (and on Fig 3). There are no listed battlefields, registered parks or gardens, or scheduled ancient monuments within the search area.

Archaeology⁴ (Fig 3)

Distances listed below have been measured from the centre of the PDS to the centre of the heritage asset.

Roman: Roman finds include a domed-lead spindlewhorl (EBG 005; 903m NNW).

Late Saxon: The historic settlement core of East Bergholt dates from the Late Saxon period (EBG 044, 580-1271m E/SE).

Medieval/post-medieval: Medieval/post-medieval features (three ditches and two undated postholes) and finds were identified during a geophysical survey (ESF23261), a metal-detecting survey (ESF23262) and trial-trenching evaluation (ESF23263) on land northwest of Moores Lane (EBG 048, 920m NW)

Post-medieval: Old Hall Park (EBG 045), located 1230m SW, is shown on early OS maps as a large area to the southeast of Old Hall (EBG 023) with numerous trees.

¹ British Geological Survey – <http://mapapps.bgs.ac.uk/geologyofbritain/home.html?>

² <http://www.suffolklandscape.org.uk/>

³ The Suffolk Historic Landscape Characterisation Map, version 3, 2008, Suffolk County Council

⁴ This is based on records held at the Suffolk County Historic Environment Record (SCHER).

Modern: Two 19th century threshing barns are located at High Trees Farm (EBG 040, 680m NW).

Undated: An undated cropmark complex of 'ice-wedges and linear marks forming former ?field system on different alignments to present system' is located 970m SE (EBG 013). An undated and disarticulated human skull was also recovered during road widening opposite the Carriers Arms (EBG 008, 670m WNW).

Metal-detected finds: There are 49 confidential findspots within the search area, although none were located within, or in particularly close proximity to the PDS. The finds date from the Neolithic to post-medieval periods. The Neolithic flints, mostly from the same location, include flint blades, scrapers and flakes. A few fragments of copper-alloy working waste have been assigned a possible Bronze Age date and there was a large rim sherd of an Iron Age carinated bowl. All further evidence from these findspots is medieval and post-medieval in origin, largely comprising metalwork such as coins, buttons, harness straps and mounts, and finger rings.

Listed buildings⁵ (Fig 3)

There are 41 designated listed buildings within the search area of Grade II and II* status dating from the 15th-19th centuries. None of these are in particularly close proximity to the PDS (the nearest being c 350m to the southeast) or will be affected by the proposed development in anyway.

Desk-based assessment

A desk-based assessment for the PDS was produced by Colchester Archaeological Trust in June 2016 (CAT Report 966). It summarised:

Within the broader search area, the Suffolk Historic Environment Record (SHER) lists eight monuments. These include the findspots of a Roman spindle whorl and human skull of unknown date, a post-medieval timber framed pigeon loft and two 19th-century threshing barns.

One area of cropmarks is located to near the edge of the search area, to the southeast of the PDS. These appear to be largely glacial, though possibly also include marks relating to a former field system. Two areas of East Bergholt are identified by the HER as being areas of historic activity – one is the historic settlement core of the village and the other is the area of parkland known as 'Old Hall Park'.

There has been one archaeological evaluation, near the edge of the search area, to the north-west of the PDS. Medieval and post-medieval finds and features were identified here during metal detecting and trial trenching.

As well as these listed monuments, 41 listed buildings and 49 confidential findspots are located within the search area. None of these are in close proximity to the PDS and any activity they indicate is unlikely to be affected by future development.

Geophysical survey

A detailed magnetometer survey was carried out over the PDS in October 2016 by Britannia Archaeology Ltd (Report Number 1145). It summarised:

The geophysical survey identified several anomalies that could be archaeological in origin. The features present within the survey are identified as low amplitude positive anomalies, which could be infilled ditch type features (1000 – 1002 and 1004), with anomalies 1001 and 1002 possibly representing an enclosure. A series of low amplitude anomalies (1003) on the northern boundary of the site have been identified as ploughing activity of an unknown date. A discrete high amplitude anomaly (1006) was identified of unknown origin, it is possible that the source of the anomaly is archaeological in origin.

⁵ This is based on records held at the Suffolk County Historic Environment Record (SCHER).

Archaeological evaluation

An archaeological evaluation was carried out on the PDS in August 2017 by Colchester Archaeological Trust (CAT Report 1164). Sixty-one evaluation trenches sampled the whole area with a small number positioned to target the geophysical anomalies identified in 2016 survey. The evaluation uncovered fifteen features of post-medieval/modern date (six ditches, three pits/ditches, three land drains, two pits and one kiln) and thirteen undated features (five silt patches/natural features, four ditches, two pits, one pit/posthole and one ditch/silt patch).

Two of the ditches (F5 and F24) appear to represent the remains of the southern boundary ditch of a field named 'Megs Well', which is detailed in the 1837 title map of East Bergholt. An interesting clustering of features to the southeast of the site, in what would have been the southeastern corner of the field to the south, 'Further Megs', include the remains of the possible kiln, indicating that brick manufacture may have taken place here at some point during the modern period. The proximity of the site to a nearby field named 'Brickman's Downs', and another named 'Claypit Close', as well as to a 'Kiln Cottage', located some 1km north northwest of site, provides further evidence of the existence of this industry within the area during this period. Current archaeological evidence indicates that manufacture on this site was small in scale, and perhaps organised to meet domestic or local demand rather than representing a commercial venture.

Anomaly 1000 of the 2016 geophysical survey was a ditch (uncovered in T23 and T33). A large natural feature was uncovered in the area of anomaly 1001 (T27, T37, T36, T38 and T39). A land drain was uncovered in the area of anomaly 1002, across T25 and T26. Anomalies 1004, 1005 and 1006 included the kiln in the southeastern corner of the site, located across T58, T59 and T60.

Project background

A planning application was initially submitted to Babergh District Council in August 2016 (B/16/01092/OUT) for a mixed-use development including up to 75 dwellings, a pre-school and a neighbourhood hub, comprising a swimming pool, office space and a local shop, public open space, and associated infrastructure and landscaping.

Application DC/20/04663 was submitted in October 2020 for approval of reserved matters following outline approval B/16/01092. Town and Country Planning (Development Management Procedure) (England) Order 2015 – Access, Layout, Scale, Design and Landscaping for mixed-use development including up to 75 dwellings, a pre-school and a neighbourhood hub, comprising a swimming pool, officer space and a local shop, public open space, and associated infrastructure and landscaping as amended by drawings received on 11th November 2016 (omission of school land).

As the site lies within an area highlighted by the Suffolk HER as having a high potential for archaeological deposits, an archaeological condition was recommended by the Suffolk County Council Archaeological Service (SCCAS) in 2016 based on guidance given at the time in the *National Planning Policy Framework* (DCLG 2012). This recommendation was for an archaeological desk-based assessment, geophysical survey and evaluation, all of which took place in 2016-7.

The current recommendation for archaeological excavation of part of the development site is based on the guidance given in the current *National Planning Policy Framework* (MHCLG 2019).

Requirement for work (Fig 2)

The required archaeological work is for an excavation of part of the proposed development site. Full details are given in the Project Brief (*Brief for Archaeological Excavation at Land east of The Constable Country Medical Centre, Heath Road, East Bergholt*) written by SCCAS (2020).

Specifically, an area 41m by 48m (1,986m²) will be stripped over trench T58 of the 2017 evaluation to expose and excavate the modern brick kiln (see Fig 2). All other archaeological remains exposed within the excavation area will also be excavated.

Provision has been made in the budget to extend all areas should unexpected and significant archaeological remains be shown to continue beyond the initial strip, until a 10m archaeology free buffer zone has been achieved.

Provision has also been made for archaeomagnetic dating should it be considered necessary by SCCAS and CAT.

All work will take place within and contribute to the goals of the Regional Research Frameworks. This includes the regional review by Medlycott (2011) and the recently revised period specific frameworks (accessible via <https://researchframeworks.org/eoe/>).

This document represents a Written Scheme of Investigation (WSI) for the archaeological excavation ONLY; this document alone will NOT result in the discharge of the archaeological condition.

Staffing

The number of field staff for this project is estimated as follows: One supervisor plus three archaeologists for eleven days.

In charge of day-to-day site work: Ben Holloway/Nigel Rayner

General methodology

All work will be carried out by CAT will be in accordance with:

- professional standards of the Chartered Institute for Archaeologists, including its *Code of Conduct* (CIfA 2014a-c)
- Standards for Field Archaeology in the East of England (Gurney 2003)
- Regional research and resource frameworks for the East of England (Medlycott 2011 and <https://researchframeworks.org/eoe/>)
- relevant Health & Safety guidelines and requirements (CAT 2021), including a Risk Assessment which will be carried out before the excavation begins.
- the Project Brief issued by SCCAS (2020)
- The outline specification within *Requirements for an Archaeological Excavation* (SCCAS 2021) to be used alongside the Project Brief.

CAT is covered by Aviva Insurance Ltd, 006288/04/21, which includes Professional Indemnity £2,000,000, Employer's Liability £10,000,000 and Public Liability £5,000,000.

Professional CAT field archaeologists will undertake all specified archaeological work, for which they will be suitably experienced and qualified.

Notification of the supervisor/project manager's name and the start date for the project will be provided to SCCAS ten days before start of work.

Unless it is the responsibility of other site contractors, CAT will study mains service locations and avoid damage to these.

Prior to the commencement of the site a HER parish code will be sought from the HER team. The HER parish code will be used to identify the finds bags and boxes, and the project archive when it is deposited at the curating museum.

At the start of work (immediately before fieldwork commences) an OASIS online record <http://ads.ahds.ac.uk/project/oasis/> will be initiated and key fields completed on Details, Location and Creators forms. At the end of the project all parts of the OASIS online form will be completed for submission to SCCAS. This will include an uploaded .PDF version of the entire report.

Excavation methodology

Where appropriate, modern overburden and any topsoil stripping/levelling will be performed using a mechanical excavator equipped with a toothless ditching bucket under the supervision and to the satisfaction of a professional archaeologist. If no archaeologically significant deposits are exposed, machine excavation will continue until natural subsoil is reached.

Machine assistance may be required for very large/deep features and a contingency will be available within the budget if required, but all features will be hand excavated unless specifically agreed with SCCAS.

Where necessary, areas will be cleaned by hand to ensure the visibility of archaeological deposits. If archaeological features or deposits are uncovered, time will be allowed for these to be excavated, planned and recorded. **All** features will be excavated and recorded unless otherwise agreed with SCCAS. Fast hand-excavation techniques involving (for instance) picks, forks and mattocks will not be used on complex stratigraphy.

There will be sufficient excavation to give clear evidence for the period, depth and nature of any archaeological deposit. For linear features 1m wide sections will be excavated across their width to a total of 10% of the overall length. Discrete features, such as pits, will have 50% of their fills excavated, although certain features may be fully excavated. Complex archaeological structures such as walls, kilns, ovens or burials will be 100% excavated. Any complex/unexpected deposits will be discussed with SCCAS to agree a strategy.

A metal detector will be used to scan the area before and during excavation. This will be carried out by trained CAT staff under the supervision of Excavation Manager Adam Wightman and Project Officer Ben Holloway who have over 10 years experience of metal detecting on archaeological sites. Experienced metal detectorist Geoff Lunn will be available for advice and support throughout the project. Geoff has 5 years experience and has worked with CAT to recover finds from recent excavations at the Mercury Theatre and Essex County Hospital sites in Colchester, and who has also worked with the Colchester Archaeological Group, Suffolk Archaeology, Access Cambridge Archaeology, The Citizen Project (MOLA) and others. If considered necessary, Geoff will be employed by CAT to assist with the metal detecting. All finds will have their location recorded via GPS or with the Total Station. All spoil heaps will also be scanned and finds recovered.

The excavation area and any features will be surveyed by GPS or Total Station, unless the particulars of the features indicate that manual planning techniques should be employed. Representative sections of the excavation area will be drawn and all features will have their sections or profiles recorded. Normal scale for archaeological site plans and sections is 1:20 and 1:10 respectively, unless circumstances indicate that other scales would be more appropriate.

Individual records of excavated contexts, layers, features or deposits will be entered on pro-forma record sheets. Registers will be compiled of finds, small finds and soil samples.

The photographic record will consist of general site shots, and shots of all archaeological features and deposits. A photographic scale (including north arrow) shall be included in the case of detailed photographs. Standard "record" shots of contexts will be taken on a digital camera. A photographic register will accompany the photographic record. This will detail as a minimum feature number, location, and direction of shot.

The excavation area will not be backfilled until it has been signed off by the SCCAS.

Methodology for the investigation of the kiln

Once the full extent of the kiln has been exposed it will be divided into quadrants with the backfill of two opposing quadrants excavated and planned, with the sections drawn, photographed and recorded. The remaining quadrants will then be excavated, which should reveal the full extent of any surviving structural remains which will be fully planned, photographed and recorded. Finally, with the approval of the SCCAS, any surviving structural

remains will be excavated to ascertain the methods of construction and retrieve any dating evidence.

Provision has also been made within the budget for archaeomagnetic dating should it be considered necessary by SCCAS and CAT.

All significant finds and dating evidence from the excavation of the kiln will be retained for post-excavation analysis. Depending on the quantity and quality of the structural remains surviving, a sample of this material will be retained for post-excavation analysis and archiving, this will include all complete or virtually complete bricks.

Site surveying

The excavation area and any features will be surveyed by GPS or Total Station, unless the particulars of the features indicate that manual planning techniques should be employed. Normal scale for archaeological site plans and sections is 1:20 and 1:10 respectively, unless circumstances indicate that other scales would be more appropriate.

The site grid will be tied into the National Grid. Corners of excavation areas will be located by NGR coordinates.

Environmental sampling policy

CAT aims to follow guidance set out in the Historic England guide for Environmental Archaeology (Historic England 2011). The number and range of samples collected will be adequate to determine the potential of the site, with particular focus on palaeoenvironmental remains including both biological remains (e.g. plants, small vertebrates) and small sized artefacts (e.g. smithing debris), and to provide information for sampling strategies on any future excavation. Samples will be collected for potential micromorphical and other pedological sedimentological analysis. Environmental bulk samples will be 40 litres in size (assuming context is large enough).

Sampling strategies will address questions of:

- the range of preservation types (charred, mineral-replaced, waterlogged), and their quality
- concentrations of macro-remains
- and differences in remains from undated and dated features
- variation between different feature types and areas of site

CAT has an arrangement with Val Fryer/Lisa Gray whereby any potentially rich environmental layers or features will be appropriately sampled as a matter of course. Trained CAT staff will process the samples (unless complex or otherwise needing specialist processing) and the flots will be sent to VF/LG for reporting.

Should any complex, or otherwise outstanding deposits be encountered, VF/LG will be asked onto site to advise. Waterlogged 'organic' features will always be sampled. In all cases, the advice of VF/LG and/or the Historic England Regional Advisor in Archaeological Science (East of England) on sampling strategies for complex or waterlogged deposits will be followed, including the taking of monolith samples.

Human remains

CAT follows the policy of leaving human remains *in situ* except in those cases where damage or desecration are to be expected, or in the event that analysis of the remains is shown to be a requirement of satisfactory excavation of the site.

If circumstances indicated it were prudent or necessary to remove remains from the site, the following criteria would be applied; if it is clear from their position, context, depth, or other factors that the remains are ancient, then normal procedure is to apply to the Department of Justice for a licence to remove them. In that case, conditions laid down by the license will be

followed. If it seems that the remains are not ancient, then the coroner, the client, and SCCAS will be informed, and any advice and/or instruction from the coroner will be followed.

Following Historic England guidance (2018) all archaeological human remains excavated will either be analysed and reported by CAT project osteologist Megan Seehra or will be sent to external specialist Julie Curl.

Photographic record

The photographic record will consist of general site shots, and shots of all archaeological features and deposits and follow Historic England guidelines (2015a). A photographic scale (including north arrow) shall be included in the case of detailed photographs. Standard "record" shots of contexts will be taken on a digital camera. A photographic register will accompany the photographic record. This will detail as a minimum feature number, location, and direction of shot.

Basic site record shots will be taken using the site recording tablet at a resolution of 2592 x 1944 (5 megapixels).

Photographs of significant archaeological features and deposits will be taken using a Nikon D3500 DSLR camera with a 24.2 megapixel DX-format sensor.

Post-excavation assessment

If a post-excavation assessment is required by SCCAS, it will be normally be submitted within 2 months of the end of fieldwork, or as quickly as is reasonably practicable and at a time agreed with SCCAS.

Where archaeological results do not warrant a post-excavation assessment, preparation of the normal site report will begin.

Finds

All significant finds will be retained.

All finds, where appropriate, will be washed and marked with site code and context number.

Most of our finds reports are written internally by CAT Staff under the supervision and direction of Philip Crummy (Director) and Laura Pooley (Post-excavation Manager). This includes specialist subjects such as:

- ceramic finds (pottery and ceramic building material): Dr Matthew Loughton
- animal bones: Alec Wade (or Adam Wightman, small groups only)
- small finds, metalwork, coins, etc: Laura Pooley
- non-ceramic bulk finds: Laura Pooley
- flints: Adam Wightman
- environmental processing: Bronagh Quinn
- project osteologist (human remains): Meghan Seehra

or to outside specialists:

- animal and human bone: Julie Curl (Sylvanus)
- environmental assessment and analysis: Val Fryer / Lisa Gray
- radiocarbon dating: SUERC Radiocarbon Dating Laboratory, Glasgow
- conservation/x-ray: Laura Ratcliffe, LR Conservation / Norfolk Museums Service, Conservation and Design Services

Other specialists whose opinion can be sought on large or complex groups include:

- flint: Tom Lawrence
- prehistoric pottery: Stephen Benfield / Nigel Brown / Paul Sealey
- Roman pottery: Stephen Benfield / Paul Sealey / Jo Mills / Gwladys Monteil
- Roman brick/tile: Ian Betts (MOLA)
- Roman glass: Hilary Cool
- small finds: Nina Crummy

other: EH Regional Adviser in Archaeological Science (East of England).

All finds of potential treasure will be removed to a safe place, and reported immediately to the Suffolk FLO (Finds Liaison Office) who will inform the coroner within 14 days, in accordance with the rules of the Treasure Act 1996. The definition of treasure is given in pages 3-5 of the Code of Practice of the above act. This refers primarily to gold or silver objects.

Requirements for conservation and storage of finds will be agreed with SCCAS and carried out as per their guidelines (SCCAS 2019).

Results

Notification will be given to SCCAS when the fieldwork has been completed.

An appropriate archive will be prepared to minimum acceptable standards outlined in *Management of Research Projects in the Historic Environment* (Historic England 2015b).

The draft final report will be submitted within 6 months of the end of fieldwork for approval by SCCAS.

The approved final report will normally be submitted to SCCAS as both a PDF and a hard copy.

The report will contain:

- The aims and methods adopted in the course of the archaeological project
- Location plan of the area in relation to the proposed development.
- Section/s drawings showing depth of deposits from present ground level with Ordnance Datum, vertical and horizontal scale.
- Archaeological methodology and detailed results including a suitable conclusion and discussion and results referring to Regional Research Frameworks (EAA8, EAA14 & EAA24).
- All specialist reports or assessments
- A concise non-technical summary of the project results
- Appendices to include a copy of the completed OASIS summary sheet and the approved WSI

Results will be published, to at least a summary level, in the PSIAH (Proceedings of the Suffolk Institute of Archaeology and History) annual round up should archaeological remains be encountered in the evaluation. An allowance will be made for this in the project costs for the report.

Final reports are also published on the CAT website and on the OASIS website.

Archive deposition

The archive will be deposited with the Suffolk County Council Archaeological Service as per their archive guidelines (SCCAS 2019).

If the client does not agree to transfer ownership to SCCAS they will be required to nominate another suitable repository approved by SCCAS or provide funding for additional recording and analysis of the finds archive (such as, but not limited to, additional photography or illustration of objects). In the rare event that artefacts of significant monetary value are discovered, separate ownership arrangements may be negotiated, provided they are not subject to Treasure Act legislation.

If the finds are to remain with the landowner or an approved third party, a full copy of the archive will be housed with the SCCAS.

The archive will be deposited with the SCCAS within 3 months of the completion of the final publication report, with a summary of the contents of the archive supplied to SCCAS. Prior to deposition CAT's data management plan (based on the official guidelines from the Digital Curation Centre 2013) will ensure the integrity of the digital archive.

Monitoring

SCCAS officers are responsible for monitoring all archaeological work within Suffolk and will need to inspect site works at an appropriate time during the fieldwork and will review the progress of excavation reports and/or archive preparation.

Notification of the start of work will be given to SCCAS ten days in advance of its commencement and a monitoring visit will be booked with SCCAS at this time.

Any variations in this WSI will be agreed with SCCAS prior to them being carried out.

SCCAS will be notified when the fieldwork is complete.

The involvement of SCCAS shall be acknowledged in any report or publication generated by this project.

SCCAS remote monitoring requirements during the Covid-19 pandemic

Currently SCCAS are undertaking monitoring visits.

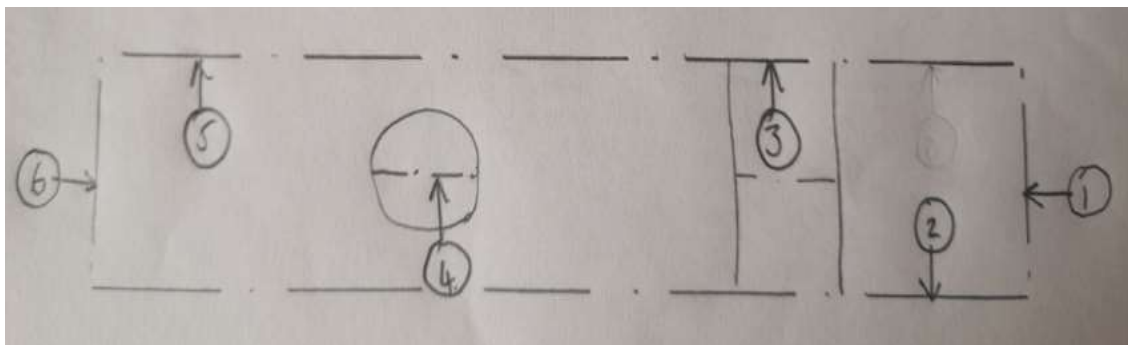
However, if government/local government advice changes due to a spike in cases/localised lockdown, *etc.* SCCAS may have to start remotely monitoring sites again.

In this case, the following remote monitoring requirements have been laid-out by SCCAS:

- All features present in excavation area, including presumed natural and geological features, are to be investigated as per the WSI

In addition, the following must be sent to the SCCAS to enable them to decide if the fieldwork can be signed-off and trenches backfilled.

- GPS trench plans showing what is present in the excavation area – with context numbers included,
- Written text stating what finds were found (if any) in each context, with provisional date,
- Text stating which features environmental samples have been taken from,
- Photographs of 1) the excavation area from different directions; 2) bulk sections; and 3) features (all photographs will be taken at appropriate times of day and not in bad lighting conditions and once trenches, sections, features have been cleaned)
- A diagram showing the direction each photograph was taken from, with photograph number will be included. For example,



Provision will be made in the timetable of works for the SCCAS to review the remote monitoring documents and for any queries to be resolved.

CAT understands that if SCCAS cannot gain sufficient information remotely, they will not be able to sign off fieldwork which may lead to delays in the completion of projects.

Education and outreach

The CAT website (www.thecolchesterarchaeologist.co.uk) is updated regularly with information on current sites. Copies of our reports (grey literature) can be viewed on the website and downloaded for free. Staff regularly give lectures to groups, societies and schools (a fee may apply). CAT also works in partnership with Colchester Archaeological Group (providing a venue for their lectures and library) and the local Young Archaeologists Club.

CAT archaeologists can be booked for lectures and information on fees can be obtained by contacting the office on 01206 501785.

References

Note: all CAT reports, except for DBAs, are available online in PDF format at <http://cat.essex.ac.uk>

- | | | |
|---------------------------------|-------|--|
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| CIfA | 2014b | <i>Standard and guidance for the collection, documentation, conservation and research of archaeological materials.</i> Updated Oct 2020 |
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| SCC | 2012 | <i>The Suffolk Historic Landscape Characterisation Map,</i> version 3 |
| SCCAS | 2019 | <i>Archaeological Archives in Suffolk: Guidelines for Preparation and Deposition</i> |
| SCCAS | 2020 | <i>Brief for a Trenched Archaeological Evaluation at land east of The Constable Country Medical Centre, Heath Road, East Bergholt,</i> by Gemma Stewart |
| SCCAS | 2021 | <i>Requirements for an Archaeological Excavation.</i> Updated Jan 2021 |

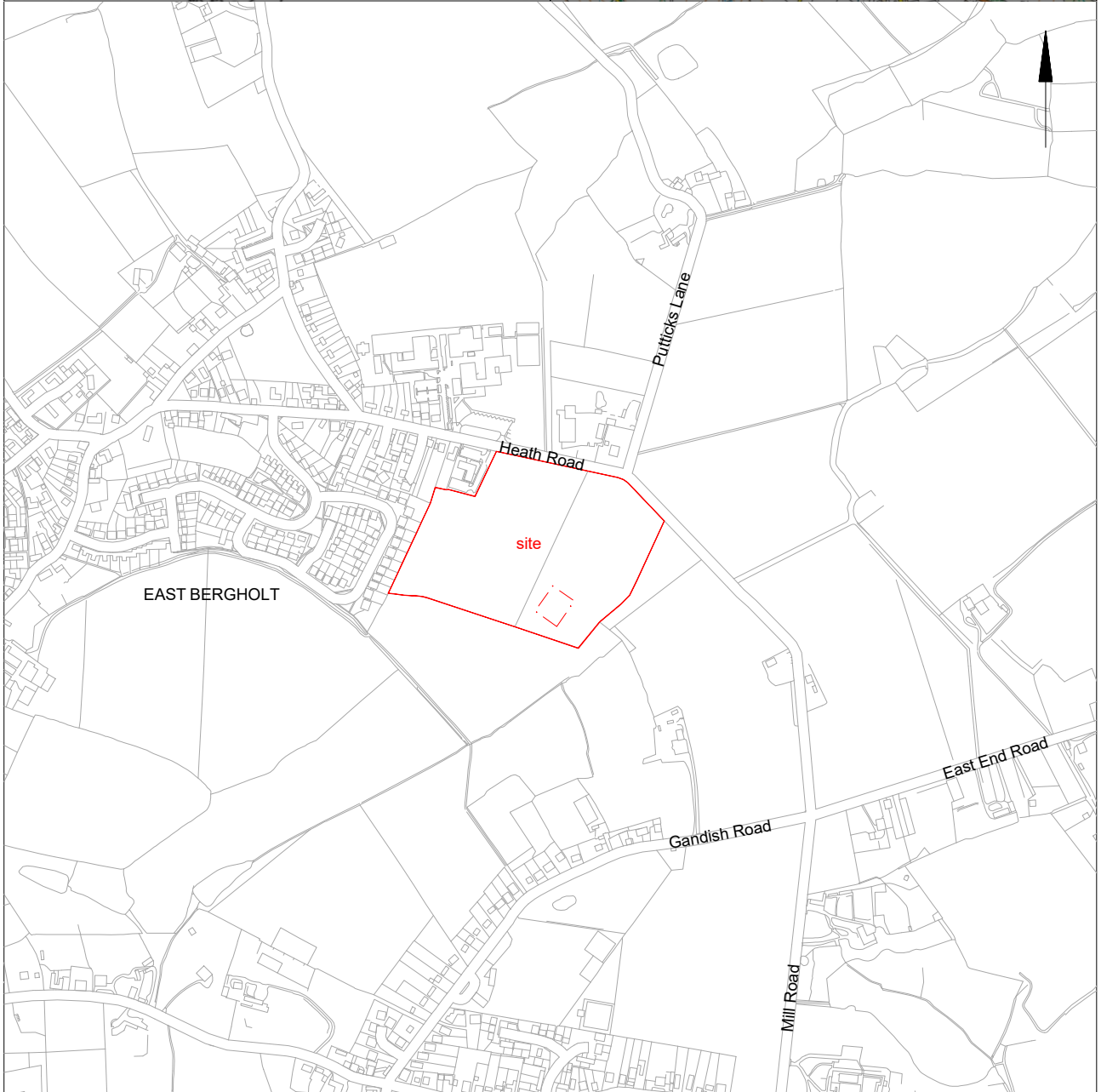
Laura Pooley



Colchester Archaeological Trust,
Roman Circus House,
Roman Circus Walk,
Colchester,
Essex, CO2 7GZ

tel: 01206 501785 opt 4

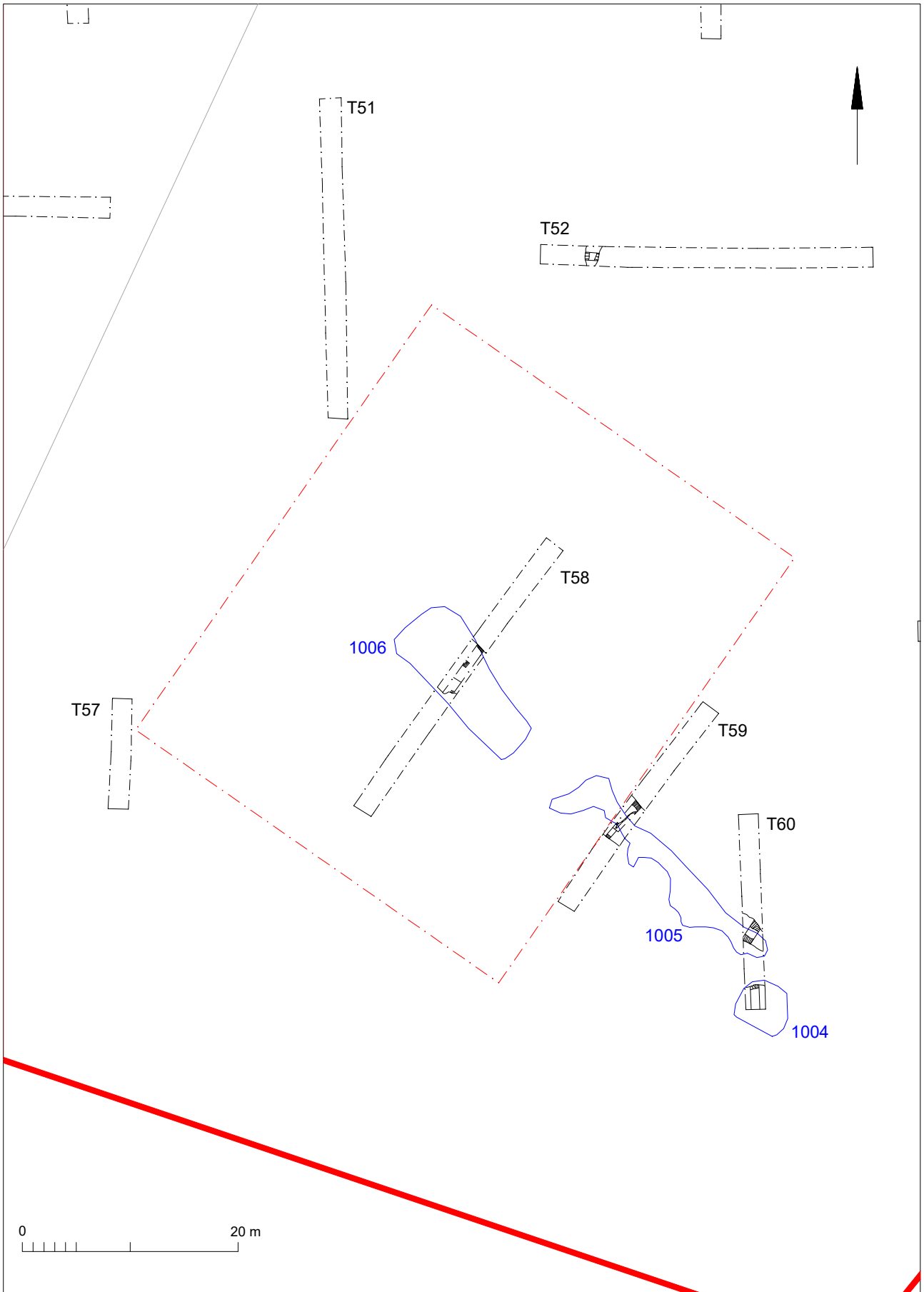
email: lp@catuk.org



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Fig 1 Site location.





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Fig 2 Excavation area in relation to evaluation results and geophysical anomalies (shown blue - numbers as Britannia Archaeology Ltd Report Number 1145).



Fig 3 HER data (green) and listed buildings (blue) in relation to the development site (marked red).

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Summary for colchest3-428006

OASIS ID (UID)	colchest3-428006
Project Name	A post-medieval brick kiln at East Bergholt, Suffolk: excavation south of Heath Road, August-September 2021
Activity type	EXCAVATION
Project Identifier(s)	2020/11a
Planning Id	DC/20/04663, B/16/01092
Reason For Investigation	Planning: Post determination
Organisation Responsible for work	Colchester Archaeological Trust
Project Dates	16-Aug-2021 - 02-Sep-2021
Location	land east of The Constable Country Medical Centre, Heath Road NGR : TM 08040 35180 LL : 51.9761253720879, 1.02764931669 12 Fig : 608040,235180
Administrative Areas	Country : England County : Suffolk District : Babergh Parish : East Bergholt
Project Methodology	<p>The aim of the excavation was to fully excavate and record the brick kiln identified by the 2017 evaluation, and to determine if any associated archaeological remains survived around it.</p> <p>All archaeological work was carried out in accordance with a Brief for Archaeological Excavation detailing the required archaeological work written by Gemma Stewart (SCCAS 2020), and a Written Scheme of Investigation (WSI) prepared by CAT in response to the brief and agreed with SCCAS (CAT 2021).</p> <p>In addition to the brief and WSI, all fieldwork and reporting was done in accordance with Management of Research Projects in the Historic Environment (MoRPHE) (Historic England 2016), and with Standards for field archaeology in the East of England (EAA 14 and 24). This report mirrors standards and practices contained in the Institute for Archaeologists' Standard and guidance for archaeological field evaluation (ClfA 2014a) and Standard and guidance for the collection, documentation, conservation and research of archaeological materials (ClfA 2014b), as well as the SCCAS Requirements for an Archaeological Excavation (SCCAS 2021).</p>

Project Results	Excavation of the area around a burnt brick structure revealed by a 2017 evaluation revealed a heavily robbed, three-flued brick kiln surviving only as footings, and fronted by a large rake-out pit. The absence of the kiln site on both the 1838 Tithe map and the 1st Edition OS sheet of 1887 gives a date range within which it must have been built and operated. There were two brick types in the kiln - unfrogged early 19th-century types and frogged examples of the mid 19th century. Together with the map evidence, this suggests a kiln originally constructed circa 1840, repaired in frogged brick circa 1850-60, and abandoned and infilled before the 1876-1884 survey for the Ordnance Survey map published in 1887.
Keywords	Brick Kiln - POST MEDIEVAL - FISH Thesaurus of Monument Types
HER	Suffolk HER - unRev - STANDARD
HER Identifiers	HER Event No - EBG 060
Archives	Digital Archive - to be deposited with Archaeology Data Service Archive Physical Archive, Documentary Archive - to be deposited with Suffolk Archaeological Service