

ECFW11



EARL'S COURT FARM, WORCESTER

Topographical survey

for Redrow Homes Ltd

June 2011



HEADLAND
ARCHAEOLOGY (UK) Ltd



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HA Job no.: ECFW11

HAS no.: 881

NGR: SO 823 548

Council: Worcestershire

SMR no.: WSM 44958, WCM 101865

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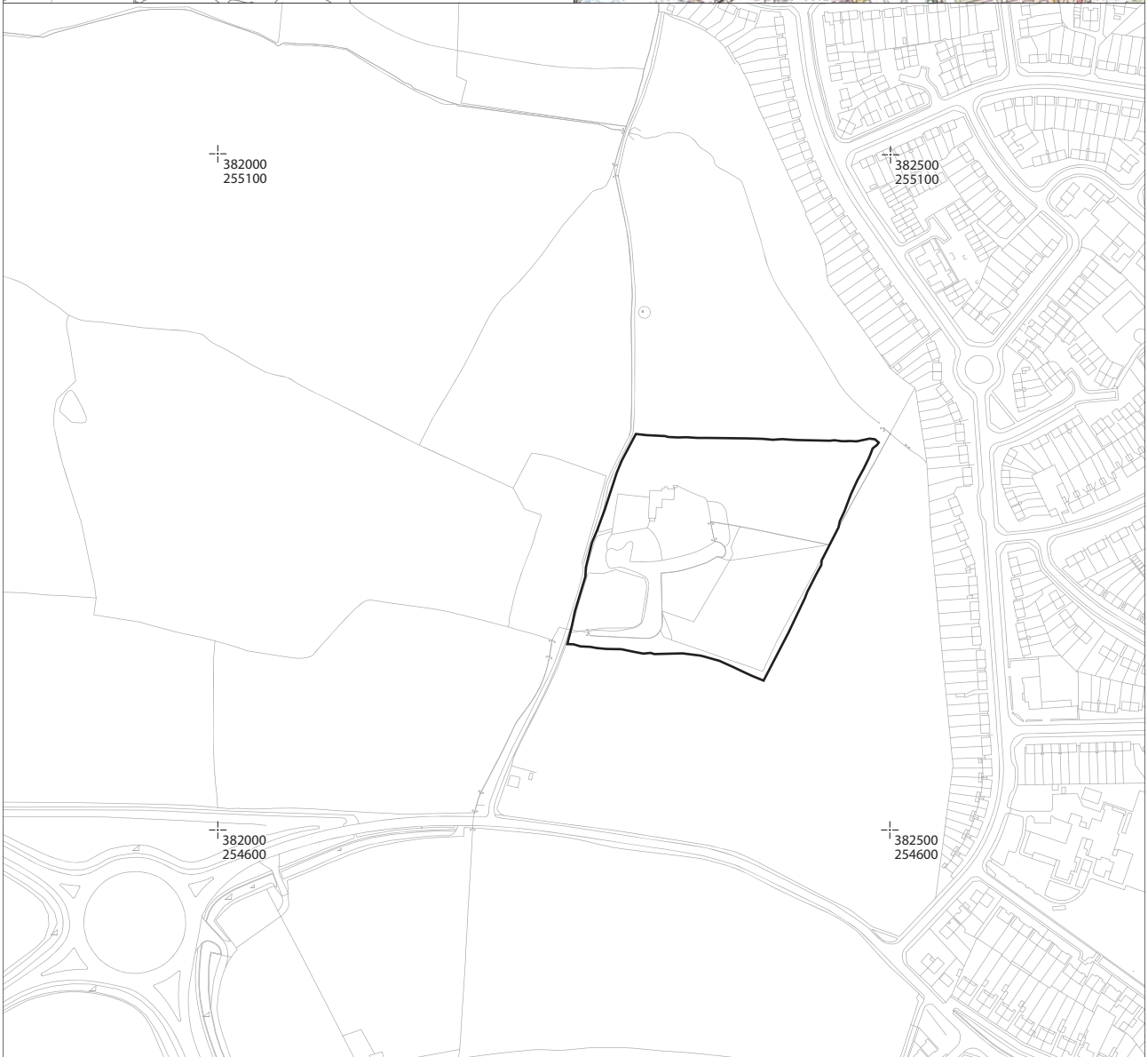
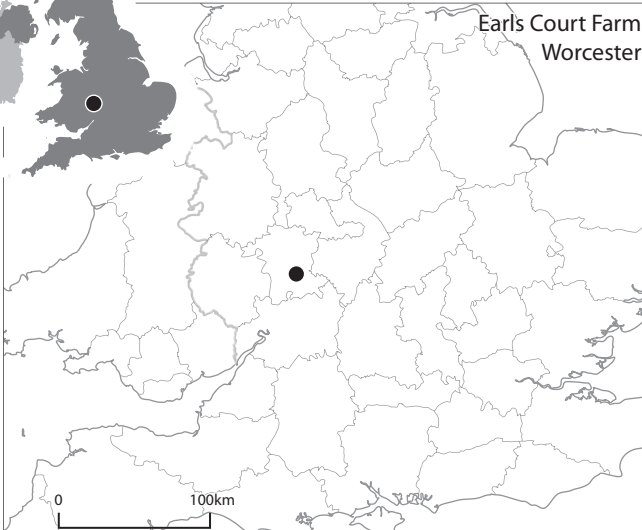
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Scale 1:5,000 @ A4



0 250m

Illus 1
Site location

TOPOGRAPHICAL SURVEY OF THE MOATED SITES AT EARL'S COURT FARM, WORCESTER

Topographical Survey

Headland Archaeology (UK) Ltd conducted an earthwork survey on land within the Scheduled Monument (Ref. no.: SAM31957) associated with Earls Court Farm, Worcester. The topographic survey identified a number of channels fed from the moated areas that formed small enclosed parcels of land on the eastern flanks of the site whilst noting that a latter development or expansion of the site had occurred on the western side of the site, outside the area defined by the Scheduled Monument.

1. INTRODUCTION

Headland Archaeology (UK) was commissioned by Redrow Homes Ltd to undertake a program of topographic survey of the Scheduled Monument (SM) known as Earl's Court Farm. The results of this survey are intended to inform an application for Scheduled Monument consent to excavate trial trenches prior to a planning application to construct a foul water service across the north-eastern portion of the scheduled area; and as part of the works associated with meeting the requirements of the Earl's Court Farm Scheduled Monument Management Plan (CgMs 2007).

2. SITE DESCRIPTION

The Earl's Court Farm Scheduled Monument site (hereafter referred to as 'the Scheduled Monument') is located on the western edge of Worcester City, by Dines Green, and although abutting the City boundary it is located (SO 823 548) within the Malvern Hills district of Worcestershire County (Illus 1).

The Scheduled Monument is bounded to the north, east and south by the Earl's Court Farm planning application boundary (Illus 1) (hereafter referred to as 'the development site' and to the west by a farm track, which separates the Scheduled Monument from the open fields of Crown East to the west. Currently the area of the Scheduled Monument is covered by extremely dense and impenetrable undergrowth that obscures the majority of the moated areas.

3. BACKGROUND

The Scheduled Monument was designated on 3rd April 2000. The known archaeological remains comprise two conjoined moated islands with a series of associated channels which form a series of enclosures to the east of the moated sites (Sites 1 & 2). These enclosures might have contained ancillary buildings relating to Earl's Court Farm.

The system of earthworks is believed to date to the 16th century; being created from a collection of smallholdings.

As part of the works associated with planning applications (Ref. no.: Outline Application P07K0562; and Reserved Matters P10K0351) for the adjacent development site a number of previous archaeological investigations and documentary studies have been completed. These comprise:

- an archaeological desk-based assessment (John Samuels Archaeological Consultants 2002),
- a geophysical survey (GSB Prospection 2005),
- a trial trench evaluation (Foundations Archaeology 2006),
- a summary report including the archaeological mitigation strategy for Earl's Court Farm (John Samuels Archaeological Consultants 2006),
- Management Plan for Earls Court Farm Scheduled Monument Worcester (CgMs 2007).



Illus 2

General view of Site 2, showing cut channel [04], facing west

2

In 2010, the development site was subject to archaeological mitigation in the form of a ‘strip, map and sample’ excavation exercise in the northern and southern portions of the site. Excavations within the northern part of the development site revealed the presence of post-medieval drainage features of low significance, as well as some residual prehistoric flint. Excavations within the southern portion of the development site, adjacent to Bromyard Road, uncovered the buried remains of a medieval farmstead dating to the AD 11–12th centuries. The date of the farmstead is rare within Worcestershire, as only two other examples of such farmsteads are known to exist in the county.

4. OBJECTIVES

In accordance with the Earl’s Court Farm Scheduled Monument Management Plan, this topographic survey aims primarily to inform the partial de-silting of the main earthworks within the moated enclosures associated within the Scheduled Monument, thus meeting the objectives of Phase 1 of the management plan which entails completion of an archaeological earthworks survey to ‘*inform scoping ground works to partially clear the moats, and ... contribute to preparation of the interpretation panel/ information board*’ (p9, Earl’s Court Farm Scheduled Monument Management Plan, CgMs 2007).

In addition to this, it is intended this topographic survey will assist in targeting trial trenches along the potential route of a foul water service in order to assess the potential impact of installing this service upon the Scheduled Monument.

5. METHOD

The earthworks that make up the Scheduled Monument were subject to a fully interpretive large-scale topographic survey. The survey was conducted using a Leica TCR1105R and a Trimble RTK GPS. The data collected was then used to produce an accurate three-dimensional survey of the monument. Due to the density and inaccessible nature of the vegetation within the moated areas, a large portion of Site 2 proved impossible to survey completely.

Temporary control stations were established across the site from which the surveying was undertaken and the site was tied in to the Ordnance Survey National Grid and with heights based on OS data;

The survey conformed to Level 3 (English Heritage 2007) and comprises a two-dimensional phased plan of the site; a three dimensional topographic model in AutoCAD and a photographic record of the earthworks.



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Key

- site boundary
- channel
- water
- area encompassing modern earth works
- vegetation
- machine damage



Illus 3
Site plan

6. RESULTS

The results are divided up into features identified during the topographic survey and located on Illus 2.

Table 1

Table showing identified features during the topographic survey

Feature no.	Photo no.	Description	Demensions
01	ECFW10-2027-28	Large rectangular in plan moated area. The structure is devoid of any indication of internal features that may indicated that it contained any solid structures, although the large amount of ground cover may obscure any evidence of these. The rectangular area is still surrounded by water and silt filled ditches on three sides, the western side now being partially filled in. It appears that water to feed the moated areas is supplied from the south-western corner of the site. This would have once exited through a series of channels on the eastern side of the site. The channels have silted up and would now only allow the passage of water under extreme conditions, although the water may now flow in culverted channels not visible on the surface.	43 x 43m
02	ECFW10-2036	Within Site 1 a small area has been excavated, which are possibly the remains of an evaluation trench or an indication that the monument has attracted the attention of un-wanted investigations by metal detctorists. The excavation appears to have taken place within the last three or four years.	3 x 1.5m
03	ECFW10-2043	Semi accessible area within the dense cover of vegetation now obscuring Site 2. The site comprises of the remains of a circular moated area attached to Site 1 on its southern extremity through a shared moat. Although the moated area now only contains water on the south and western sides, it is possible to suggest that the moat ran completely round the site but was previously filled perhaps to extend the area associated with the relatively modern farm buildings that once occupied the site.	approximately 55 x 53m
04	ECFW10-2043	Within the moat associated with Site 2 at the north-eastern corner is a large channel cut through the bank forming an out flow for the water within the moat. This channel is now redundant due to silting and the limited amount of water flowing into the moat, yet may still flow in extreme weather conditions.	approximately 10m in width
05	ECFW10-2037	Small pond, now boggy marsh, due to silting up. Evidence for a small spur remains within this area, that implies that the moat once ran round Site 2 and formed a complete circle.	approximately 30m x 15m
06	ECFW10-2017	Small tapering channel, feeding into [10]. The position of this feature suggests that it may have been fed from a secondary source of water.	approximately 30m x 4m
07	ECFW10-2017	Dense area of vegetation obscuring a channel cut into the moat of Site 1, the extent of the vegetation may indicate that the channel once formed a pond area similar to Feature [09].	approximately 36m x 20m
07A	ECFW10-2018	Semi rectangular parcel of land bounded by the channels [07], [08] and [10] and the eastern extremities of the moats of Sites 1 and 2. No visible upstanding features.	approximately 50 x 49m
08	ECFW10-2012	Small linear channel cut into the bank of the eastern moat of Site 2, the channel no longer flows with water at the surface.	approximately 20m x 2m
08A	ECFW10-2019	Small rectangle of land formed enclosed by the channels [08], [09] and [10] and the eastern edge of the Site 2. No visible upstanding features.	approximately 30 x 20m
09	ECFW10-2012	Feeding from the moat of Site 2, Feature [09] appears to form a pond-like area that once fed into Feature [10].	approximately 36 x 10m
10	ECFW10-2005-2007	Main channel running approximately north-east to south-west, across the site, fed by [07], [08], [09], [11] and [12], the channel no longer contains water above the surface. At its north-eastern end the channel connects with a small brook flowing northwest- southeast.	approximately 200 x 4m
11	ECFW10-2008-2010	A small linear channel running north-west to south-east and connected to Feature [12] at the north-west end. The channel flows into Feature [10].	approximately 80m x 2m
12	ECFW10-2008-2010	A small linear channel running parallel to 11 and connected to Feature 11 at the north-west end. The channel flows into Feature [10]. The pair of channels ([11], [12]) form a small raised area of ground . On the southern edge of Feature [12], an open hole is visible, approximately 0.5m in depth (Illus 2). Within the open hole ground water can be seen to be flowing in an eastern direction towards Feature [10] in a slightly different alignment to Feature [12]. This suggests that culverted drainage has been inserted into the site.	approximately 80m x 2m
13	-	Raised area within the site boundary	approximately 12m
14	-	Large area outside of the Scheduled Monument defined by the remains of a raised earthen bank and forming a rectangular enclosed site once associated with Sites 1 and 2. The association has now been broken by a modern track-way running north-south along the western edge of the Scheduled Monument. The bounded land contains the remains of brick floors and concrete footings. This area may have been constructed following the infilling of the moat of Site 2 allowing the expansion of the farm complex.	approximately 120 x 40m



Feature no.	Photo no.	Description	Dimensions
15	ECFW10-2028	Western section of the moat of Site 1 now silted up but still visible as a slight depression within the undergrowth. The connection with Feature [05] has been lost as a result of the infilling of the moat, although this may also indicate the entrance to Site 1.	approximately 45 x 12m
16	-	Small length of single width of red brick wall possibly associated with the modern buildings that once formed Earls Court Farm.	-
17	ECFW10-2023	Intersection of the moats defining Sites 1 and 2	-
18	ECFW10-2020-21	Area of damage caused by wheeled machinery running within the fenced of area of the Scheduled Monument.	approximately 170 x 3.5m
19	ECFW10-2048, 2011	Large area running east to west having suffered from tracked vehicle damage. The damage has caused the definition of Feature [10] to be broken through with flattening and destruction of the banks that once defined the channel.	approximately 120 x 10m
20	n/a	Location of the possible source of the water feed to Sites 1 and 2, via a small culverted brook.	-
21	ECFW10-2002	Hidden beneath dense areas of vegetation it is possible to trace the outline of the moat that once encompassed Site 2, although the majority of the moat on the northern and western side has since been filled in to create a flattened building platform. This maybe associated with the expansion of the farm complex into area 14.	-

The moat profile was measured where accessible by sounding with the survey pole. This process suggests the silts within the moat have a depth of at least two metres.

which the moated enclosures were inserted. There is no evidence visible that could help determine the question either way.

7. DISCUSSION

6 7.1 Phasing

Based on the topographic survey, the development of the Scheduled Monument appears to have occurred in four phases:

Phase 1 the earliest, comprises Site 2, the partially infilled circular moated enclosure.

Phase 2 comprises Site 1, the rectangular moated enclosure.

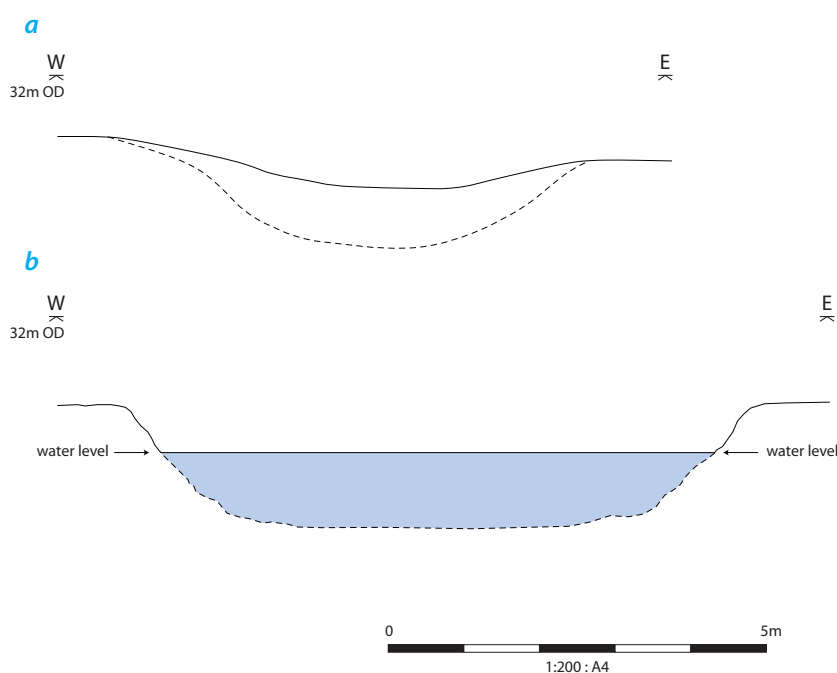
Phase 3 comprises the eastern earthworks, which appear to have been cut through the moats enclosing Sites 1 & 2 and may have been in part constructed to drain the moats around the moated enclosures.

Phase 4 the final phase, comprises the infilling of part of Site 2 and the expansion to the west of the site with modern brick and concrete buildings.

These phases are based on non-intrusive inspection only. An alternative phasing could view the majority of the eastern earthworks as remnants of an early field system into

7.2 Condition of Scheduled Monument

Currently the area comprising of the two moated sites is covered with dense brambles and mature trees (including two redwoods). The growth of the trees within these areas of the Scheduled Monument; and particularly around the banks of the moated sites could ultimately limit the amount of reinstatement work that could be undertaken.



Illus 4

Section profiles across moats with estimated base levels



Illus 5

General view, showing Bank heights, and restricted access into Site 2

Previous passage of vehicles within the site of the Scheduled Monument has already caused damage to channels in the historic landscape associated with the monument

7.3 Assessment of significance

Although the topographical survey of the Scheduled Monument was limited by the impenetrable vegetation covering the majority of the moated sites, it has become clear that a large portion of the historic landscape associated with Earl's Court Farm still remains on the eastern flank within the scheduled area. The remains on the western flank lie outside of the Scheduled Monument but appear to be recent in date. This area has suffered from erosion in the past due to vehicle traffic.

As a Scheduled Monument, the site is of national significance. Part of this significance is derived from the

preservation of the ancillary earthworks east of the main enclosure within the scheduled area. The precise date and nature of these earthworks and their relationship to the moated site is not understood but based on their form and the direction of flow in the ditches, they may have been constructed to drain the moats after they fell out of use.

7.4 Potential for further information

Moated sites are widely regarded as one of the characteristic field monuments of the medieval period. Although considered to have been widely researched, these monuments generally only receive topographic surveys and study as part of regional distributions (Watt 2011: 196). Hence, excavation on moated sites is very limited and tends to concentrate on the main platforms, restricting comparative studies of such sites.

The possibility of limited de-silting of the moats would provide an opportunity to recover some information potentially relating to, the daily waste products associated with the complex, assuming that these were disposed of in the moats.

The archaeological research framework for the West Midlands (Watt 2011) identifies the following research issues for moated enclosures:

- lack of existing research in Worcestershire,
- need to investigate the 'hinterlands' of enclosure sites, outside of the main moated area,

7



Illus 6

View looking north along Feature [10]



Illus 7

View of moated area around Site 1, showing levels and cut channel in foreground

8

- need to identify specific site types such as granges, seigniorial and homesteads within a group of superficially similar monuments.

The proposed trial trenches to be excavated, prior to the consideration of a foul water main across the north eastern corner of the Scheduled Monument, will contribute to the regional body of research concerning moated enclosures; and may provide understanding of the relationship of the ancillary earthworks to the main site, and its relationship to the surrounding landscape.

The proposed partial de-silting of the moat arms may provide information on the nature of settlement at the site and its status. The moats are clearly waterlogged and therefore have the potential to preserve organic artefacts and environmental evidence such as plant macrofossils and pollen that could prove useful information about the use and history of the site, and also the wider environment surrounding it.

8. REFERENCES

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9. APPENDICES

9.1 Appendix 1 – Photographic register

Film 519

Photo no.	Colour Slide	B&W	Digital	Direction facing	Description
1	n/a	–	n/a	NW	General shot
2	n/a	–	2001	SW	Vegetation cover around monument
3	n/a	1	2002	SW	Vegetation cover around monument
4	n/a	2	2003	S	Vegetation cover around monument
5	n/a	3	2004	SW	Vegetation cover around monument
6	n/a	4	2005	S	Earthworks at east of site area
7	n/a	5	2006	S	Earthworks and monument
8	n/a	6	2007	W	Earthworks from the east end of the field
9	n/a	7	2008	NW	Earthworks from the east end of the field
10	n/a	8	2009	W	Earthworks and channels
11	n/a	9	2010	E-NE	Topography from the moated site
12	n/a	10	2011	N	Topography
13	n/a	11	2012	W	Large channel running east-west to the moated Site 2
14	n/a	12	2013	NE	Large channel turning ne away from the moated Site 2
15	n/a	13	2014	W	Large semi enclosed rectangular area in front of Site 1
16	n/a	14	2015	SW	Large semi enclosed rectangular area in front of Site 1
17	n/a	15	2016	W	Large semi enclosed rectangular area in front of Site 1
18	n/a	16	2017	NW	Banked area at edge of 2nd moated site
19	n/a	17	2018	NW	Brambles around moated Site 1
20	n/a	18	2019	N	Looking across site from rectangular area in front of Site 1
21	n/a	19	2020	W	South boundary vehicular track damage
22	n/a	20	2021	E	South boundary vehicular track damage
23	n/a	21	n/a	NE	North East area of site from southern boundary
24	n/a	22	2022	SW	South East edge of moat – filled with water Site 1
25	n/a	23	2023	N	Eastern edge of moat running north, Filled with water, Site 1
26	n/a	24	2024	W	Vegetation cover around East edge of Site 1
27	n/a	25	2025	N	Eastern edge of moat, Water filled, Site 1
28	n/a	26	2026	E	South edge of moat, Site 1
29	n/a	27	2027	NE	Inner area enclosed by moat, Site 1
30	n/a	28	2028	N	Western edge of moat, obscured by brambles, Site 1
31	n/a	29	2029	N	North area of moat, filled with water, Site 1
32	n/a	30	2030	SW	East moat area, water filled, Site 1
33	n/a	31	2031	E	South boundary vehicular track damage
34	n/a	32	2033	E	Moat area at west of Site 1
35	n/a	33	2034	N	Vegetation from within moat enclosed area, Site 1



Photo no.	Colour Slide	B&W	Digital	Direction facing	Description
36	n/a	34	2035	S	Vegetation from within moat enclosed area, Site 1
37	n/a	35	n/a	-	Film ID
38	n/a	36	n/a	-	Film ID

Film 521/493

Photo no.	Colour Slide	B&W	Digital	Direction facing	Description
39	1	1	2036	S	Excavated area within moat enclosed area, Site 1
40	2	2	2037	N	North edge of moat, Site 1
41	3	n/a	n/a	SW	North east edge of moat around Site 2
42	4	n/a	n/a	NW	North edge of moat around Site 2
43	5	n/a	n/a	NE	Moat running east, Site 2
44	6	3	2038	E	Section in east of moat, Site 1
45	7	4	2039	W	Section in west of moat, Site 1
46	8	n/a	n/a	N	East moat in Site 1
47	9	n/a	n/a	W	South moat in Site 1
48	10	n/a	n/a	N	Rectangular area east of moat, Site 1
49	11	n/a	2040	W	Moat running east, Site 1
50	12	5	2041	N	General view to the east from Site 1
51	13	6	2042	E	General view to the east from Site 1
52	14	7	2043	N	Run off from moat in Site 2 towards rectangular area east of Site 1
53	15	8	2044	NE	General view of earthworks
54	16	9	2045	SE	Large channel from moat at Site 2.
55	17	10	2046	NW	Eastern area of moat around Site 2, dry
56	18	11	2047	S	General view east from Site 2
57	19	12	2048	W	Vehicular damage north of Site 2
58	20	13	2049	N	Dense vegetation within area enclosed by moat, Site 2
59	21	14	2050	E	Dense vegetation within area enclosed by moat, Site 2
60	22	15	2051	S	North area within area enclosed by moat, Site 2
61	23	16	2052	W	Western moat area in Site 2
62	24	17	2053	E	Eastern moat area in Site 2, some water
63	25	18	2054	S	Southern moat area in Site 2, some water



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