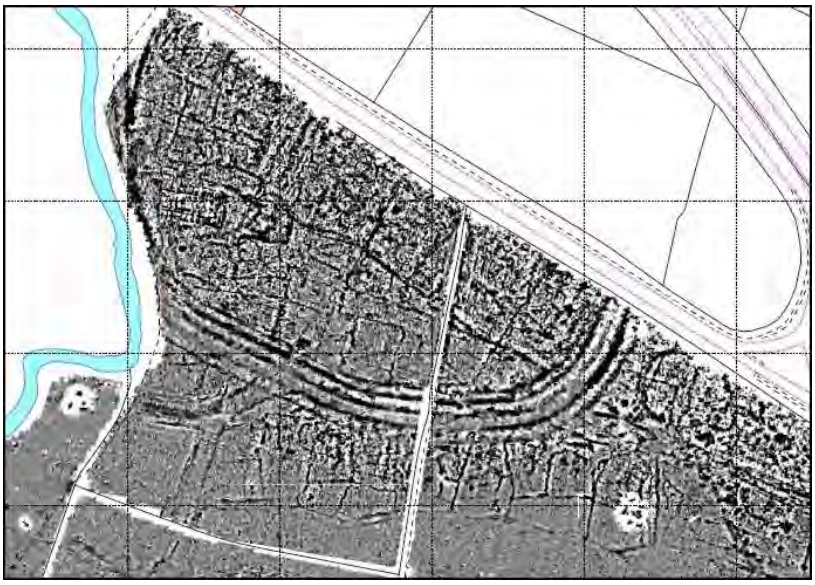

Archaeological geophysical survey at Eaton Leys Farm, Bletchley Milton Keynes February to September 2014

Report No. 14/217

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Quality control and sign off:

Issue No.	Date approved:	Checked by:	Verified by:	Approved by:	Reason for Issue:
1	17/11/2014	Pat Chapman	Mark Holmes	Andy Chapman	Client approval

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OASIS REPORT FORM

PROJECT DETAILS	Oasis no. molanort1-195190	
Project name	Archaeological geophysical survey at Eaton Leys Farm, Bletchley, Milton Keynes, February to September 2014	
Short description	MOLA was commissioned to carry out a magnetometer survey of 109ha of land at Eaton Leys Farm, Bletchley, Milton Keynes, and undertook this work in stages between February and September 2014. The survey mapped much of the southern half of the Roman town of *Magiovinium*, revealing an extensive sprawl of unenclosed settlement remains cut through by later multivallate defences. There was evidence for possible industrial activity in the eastern part of the town and a possible monumental building in the west, close to the River Ouzel. A separate area of Roman settlement was identified approximately 1km south of the town, where two adjacent sets of rectilinear enclosures were present. Less substantial archaeological remains, of unknown date, were detected in the intervening area. Traces of medieval ridge and furrow and post-medieval field boundaries were detected widely across the entire survey area.	
Project type	Geophysical survey	
Site status	Scheduled monument no. 1006943 (*Magiovinium* Roman town)	
Previous work	Desk-based assessment (Phoenix Consulting 1998) Geophysical survey (Bartlett 1999)	
Current land use	Pasture and arable	
Future work	Unknown	
Monument type/ period	Roman town, Roman road, Roman enclosures, medieval to early post-medieval ridge and furrow, undated palaeochannels	
Significant finds	None	
PROJECT LOCATION		
Counties	Buckinghamshire and Milton Keynes	
Site address	Eaton Leys Farm, Bletchley	
Study area	*c* 109ha	
OS Easting & Northing	SU 888 329	
Height OD	*c* 65-80 m AOD	
PROJECT CREATORS		
Organisation	MOLA Northampton	
Project brief originator	CgMs Consulting	
Project design originator	MOLA Northampton	
Director/Supervisor	Ian Fisher	
Project Managers	Mark Holmes and John Walford	
Sponsor or funding body	CgMs Consulting	
PROJECT DATE		
Start date	27 February 2014	
End date	30 September 2014	
ARCHIVES	Location	Content
Physical	N/A	
Paper	MOLA Northampton	Site survey records
Digital		Geophysical survey & GIS data
BIBLIOGRAPHY	Journal/monograph, published or forthcoming, or unpublished client report	
Title	Archaeological geophysical survey at Eaton Leys Farm, Bletchley, Milton Keynes, February to September 2014	
Serial title & volume	MOLA Northampton Reports 14/217	
Author(s)	John Walford	
Page numbers	8	
Date	14 November 2014	

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ARCHAEOLOGICAL GEOPHYSICAL SURVEY AT EATON LEYS FARM, BLETCHLEY, MILTON KEYNES FEBRUARY TO SEPTEMBER 2014

ABSTRACT

MOLA was commissioned to carry out a detailed magnetometer survey on 109ha of land at Eaton Leys Farm, Bletchley, Milton Keynes, and undertook this work in stages between February and September 2014. The survey mapped much of the southern half of the Roman town of Magiovinium*, revealing an extensive sprawl of unenclosed settlement remains cut through by later multivallate defences. There was evidence for possible industrial activity in the eastern part of the town and a possible monumental building in the west, close to the River Ouzel. A separate area of Roman settlement was identified approximately 1km south of the town, where two adjacent sets of rectilinear enclosures were present. Less substantial archaeological remains, of unknown date, were detected in the intervening area. Traces of medieval ridge and furrow and post-medieval field boundaries were detected widely across the entire survey area.*

1 INTRODUCTION

MOLA was commissioned by CgMs Consulting to conduct a detailed magnetometer survey on 109ha of land at Eaton Leys Farm, Bletchley, Milton Keynes (NGR SU 888 329; Fig 1). The survey area straddles the boundary between Buckinghamshire and Milton Keynes Unitary Authority and encompasses the southern part of the Roman town of *Magiovinium* (Scheduled monument no. 1006943). The survey of the scheduled area was carried out under licence from English Heritage (case no. SL00074776), in compliance with the Ancient Monuments Act 1979.

The initial stage of fieldwork was undertaken between 27th February and 10th March 2014 and covered *c* 34ha of pasture fields in the south-west of the survey area. The remaining 75ha, including the site of *Magovinium*, was under crop at that time and did not become available for survey until after the harvest, in September 2014. This report presents the combined results from both phases of work, and supersedes the Phase 1 report (Walford 2014).

2 TOPOGRAPHY AND GEOLOGY

The survey area comprises a compact block of land located immediately east of Bletchley (including land in the historic townships of Water Eaton and Fenny Stratford). The northern boundary of the area is defined by Watling Street, the eastern one by the A4146 Little Brickhill Bypass, and the southern and western ones by the River Ouzel. Eaton Leys Farm itself stands just inside the survey area, midway along its western edge (Fig 1).

The survey area lies between the 70m and 80m contours on a gentle and irregular west-facing slope. Its geology consists of Oxford Clay, overlain in places by terrace gravels, alluvium and head (BGS 2014). The head deposits are likely incorporate material derived from the Lower Greensand ridge which rises above the survey area to the east.

3 ARCHAEOLOGICAL BACKGROUND

The remains of the Roman town of *Magiovinium* (Scheduled monument no. 1006943) partially underlie the far northern end of the survey area, straddling the line of Watling Street (Fig 1). Previous archaeological investigations on this site (Neal 1987, Hunn *et al* 1997, Bartlett 1999) have shown that it dates from the 1st to the 4th centuries AD and comprises a defended core with suburbs extending along the road to the south-east. A possible Roman fort, identified from cropmarks, also lies to the south-east and has been suggested to be the original focus from which the settlement developed (Woodfield 1977).

In the far south of the survey area, cropmarks indicate the presence of a small sub-rectangular enclosure which may be of Iron Age or Roman date (Phoenix Consulting 1999, fig 2). No other prehistoric or Roman sites are known from within the survey area, but a scatter of worked flints, pottery and other chance finds have been recorded from locations all along the line of the Ouzel Valley to the west (Phoenix Consulting 1998). Notable amongst these finds are the concentration of Iron Age material from Saffron Gardens (MK HER MMK1166) and the half-dozen Palaeolithic handaxes which have been recovered from various exposures of the river terrace gravels (Millard 1965).

Whilst no Saxon remains are known within the survey area, two sites of this date have been recorded to the west, on the opposite side of the River Ouzel. One site, at Saffron Gardens, comprised a cluster of apparently late Saxon pits and ditches investigated under salvage conditions (MK HER MMK1987). The other, further south at Stoke Road, produced evidence for 8th to 9th century settlement (Hancock 2006). Medieval settlement seems to have followed a similar pattern, with the main settlement foci lying to the west of the river, around Water Eaton and the former site of Bletchley manor house (Phoenix Consulting 1998). Within the survey area the only known medieval remains are the ridge and furrow earthworks which lie in the field immediately east of Eaton Leys Farm. The original date of the farm itself is unknown, although it was clearly extant by 1813, when it was depicted on the Ordnance Survey surveyor's draft.

4 METHODOLOGY

The magnetometer survey was conducted with Bartington Grad 601-2, twin sensor array, vertical component fluxgate gradiometers (Bartington and Chapman 2003). These are standard instruments for archaeological survey and can resolve magnetic variations as slight as 0.1 nanoTesla (nT).

An independent network of 30m grid squares was established within each of the fields to be surveyed. The grids were set out with a tape measure and optical square and were tied in to the Ordnance Survey National Grid by means of survey grade GPS (Leica 1200 and Leica Viva systems). The gradiometers were carried at a brisk but steady pace through each grid square, collecting data along 1m spaced traverse lines. Measurements were automatically triggered every 0.25m along the traverses, giving a total of 3600 measurements per square. All fieldwork methods complied with the guidelines issued by English Heritage and by the Institute for Archaeologists (EH 2008; IfA 2011).

The survey data was largely processed using Geoplot 3.00v software. Most of the striping was removed using the 'Zero Mean Traverse' function but some areas had to be de-striped separately, using a spreadsheet based routine, in order to preserve linear anomalies lying parallel to the traverse direction. Destaggering of the data was performed where necessary.

The processed data is presented in this report in the form of greyscale plots which have been have been scaled, rotated and resampled (georectified) for display against the Ordnance Survey base mapping. An overview of the data is presented in Figure 2, and more detailed plots in Figures 3, 5 and 7. Due to its complexity, the data from the Roman town is also presented at a large scale and wide greyscale range in Figure 9. Interpretive overlays of the data are presented in Figures 4, 6 and 8, and plots of the unprocessed survey data are presented in Figures 10-12.

5 SURVEY RESULTS

5.1 Archaeological features

Magiovinium (Fields 1, 2 & 4, Figs 3, 4 & 9)

The survey has detected an extensive pattern of predominantly positive magnetic anomalies relating to the Roman town of *Magiovinium*. These cover an area of *c* 11ha across Fields 1 and 2 and the northern part of Field 4. They are densely clustered and intermingled, attesting to the intensity of occupation and the multiple phases of redevelopment which the town underwent during its life.

The most conspicuous anomalies represent up to five concentric ditches forming the southern half of the Roman defences. These disrupt and truncate many of the surrounding anomalies, implying that the defences were a relatively late addition to the town plan and enclosed only the core of what was originally a sprawling roadside settlement. This interpretation fits with the most recently published discussion of *Magiovinium*, which postulates a late 2nd to early 3rd century phase of defensive works and suburban contraction (Hunn *et al* 1997, 60).

The bulk of the magnetic anomalies from the town are positive linear ones which represent a palimpsest of property boundaries and other ditches. Their overall arrangement suggests that the surveyed half of the town had a broadly Y-shaped layout, with one strip of occupation running from south-east to north-west alongside Watling Street and a separate strip lying on a more southerly alignment along a possible back-street (see below). Settlement may have been marginally less intense in the intervening triangle of land, although this area still contains a number of features including one particularly distinct rectangular enclosure with rounded corners.

The putative southern street is not directly apparent in the data, as its presumed line is obscured by the southern defences. However, it can be inferred with reasonable confidence based on the orientation of the surrounding features. In particular, it would form the most direct link between one probable roadway that approaches the town from the east and another which emerges from the southern edge of the town defences then splits into southerly and westerly forks. It would also provide a plausible frontage for the well-defined row of enclosures on the southern edge of the town

The southernmost part of the town, in the north of Field 4, appears to be a semi-detached suburb extending along the road that leads to the south. It has not produced a particularly clear set of magnetic anomalies, probably due to the diminishing influence of the 'habitation effect' (Gaffney and Gater 2003), but the overall impression is of a set of conjoined, loosely rectilinear, enclosures concentrated mostly to the west of the road. Associated with these there is a cluster of moderately strong positive anomalies which may indicate industrial features or large rubbish pits.

Moderately strong circular or amorphous positive anomalies also occur across the main part of the town, and are especially concentrated in the extramural zone to the south-east of the defences. Some could represent pits but, considering their strength, it is likely that others represent furnaces, hearths and other industrial features similar to those encountered in excavations to the north and east (Neal 1987, 11-15).

At the western end of the town, close to the River Ouzel, the survey has detected a rectilinear pattern of moderately intense positive and negative linear anomalies. These were previously identified in Bartlett's survey, and were plausibly interpreted as representing parts of a substantial brick building (Bartlett 1999, 3). It would appear from the present data that the building measures around 40m long by 20m wide and has a principle axis oriented approximately east-west. Its plan cannot be determined in precise detail, but the general appearance suggests a large central hall or courtyard surrounded by ranges of smaller rooms on at least three sides.

In the south of the defended area, there is a negative penannular anomaly with a diameter of *c* 8m.This could represent the footings of a circular stone building. Surrounding it are some fragmentary negative anomalies which provide tenuous evidence for a surrounding square enclosure. These features are comparable to small Roman shrines such as those investigated at Irchester Roman town (Meadows 2012, 27).

The survey has detected only one other possible building, represented by a rectangular anomaly, *c* 8m x 10m across, in the eastern extramural zone. It is obvious that more buildings than this will have been present in the town, but many will have been timber structures, the remains of which do not present good targets for geophysical survey (*eg* 'Building 60', Neal 1987, 18-22).

The southern enclosure complex (Fields 11 & 14, Figs 7-8)

The survey has detected two adjacent, and apparently related, archaeological sites at the southern ends of Fields 11 and 14. Each is denoted by a rectilinear arrangement of positive linear anomalies representing enclosure ditches with internal partitions. The regularity of the two layouts, and their near identical alignments, suggests that both sites are likely to be Roman in date.

The site in Field 11 is L-shaped and bounded on its southern and western edges by a bend in the floodplain of the River Ouzel. A pair of linear ditches pass north to south along its central axis, perhaps indicating the line of a trackway. To the east of this there is a very regular group of ditches defining small rectangular and square plots of land, and to the west there is a more loosely defined block of larger rectangular plots. A few of the detected features do not conform to this general arrangement, and may derive from earlier or later phases of activity on the site.

The ditches in Field 14 have produced a generally weak and indistinct set of anomalies which give only a broad impression of the site's layout. At its core there is a rectangular enclosure, approximately 90m x 100m with various internal divisions and hints of intersecting features of either earlier or later date. To its north and south there are short disjointed linear anomalies which suggest the presence of radiating boundary ditches or parts of further enclosures, and to its south-west there is a small dipolar anomaly, with a maximum intensity of *c* 90nT, which may represent a kiln, a corn-dryer or some other burnt structure. To its west, where cropmarks suggest that a further enclosure should occur (Phoenix Consulting 1999, fig 2) nothing has been detected except for an undiagnostic patch of weak magnetic noise.

Other possible archaeology (Figs 5 & 6)

At the southern end of Field 3, the survey has detected an irregular linear anomaly, trending east-west, which probably represents a ditch. To its north, two short and indistinct linear anomalies possibly represent parts of another ditch, and to its south there is an area of weak magnetic disturbance which, according to the survey team, coincides with a light surface scatter of brick, plaster and other building debris of possible Roman date. It is not clear whether the disturbance can be attributed to this debris alone, or whether it is related to the similar-looking geological anomalies that are present further east.

The data from Field 6 contains an angled linear anomaly which defines a sub-rectangular circuit approximately 10m x 15m in size. This perhaps represents a small ditched enclosure of indeterminate date. Immediately south of it there is a small positive anomaly which may represent a pit, and little to the east there is a very weak negative linear anomaly which possibly represents a former plough headland or other boundary feature.

Two closely spaced negative linear anomalies occur in the western end of Field 7, in the same location where a double linear cropmark has previously been recorded (Phoenix Consulting 1999, fig 2). These anomalies have parallel north-easterly headings, and align with a less distinct pair of linear anomalies in Field 4. Given their regularity, and their orientation perpendicular to Watling Street, it is arguable that they indicate part of the line of a Roman road. However, confidence in this interpretation is weakened by the fact that they align poorly with the layout of *Magiovinium* and with the position of the probable Roman enclosures to the south.

In Field 8 a broken band of intense magnetic noise has been detected along the line of a ditch which survives as a shallow earthwork. This noise does not represent the ditch itself, but accumulations of (presumably modern) magnetic debris within its upper fill. To the south-west, in Field 9, a weak and alternating field drain anomaly marks a plausible continuation of the ditch line, perhaps indicating where a drain was laid into the ditch at some time before the earthwork was levelled.

In the north-western corner of Field 9 there is a weakly positive, right-angled linear anomaly which may represent part of a large ditched enclosure of indeterminate date. To its south-west there is a shorter linear anomaly which may represent another section of ditch. Other isolated linear anomalies, suggestive of ditches, have been detected in Fields 5, 10 and 12 but do not merit individual description.

5.2 Ridge and furrow

In Field 8, the survey has detected a pattern of weak linear and curvilinear anomalies which correspond to the surviving ridge and furrow earthworks (Figs 5 & 6). Parts of two furlongs are present, one with east-west aligned furrows butting up against the other in which the furrows are aligned from south-west to north-east. Two anomalies run perpendicularly across the northern end of the latter furrows, perhaps representing a headland.

Although similar ridge and furrow is likely have extended across much of the rest of the survey area, only very fragmentary traces are apparent in the survey data. The furrow anomalies are exceptionally weak and in many places they cannot be discerned at all. This could be because the furrows have been heavily truncated by modern ploughing, but the more likely explanation is that the local soil does not support the development of well-defined magnetic contrasts, except in areas of former occupation where the natural magnetic susceptibility has been enhanced by anthropogenic inputs.

5.3 Former field boundaries

A few anomalies in the southern half of the survey area correlate with former field boundaries depicted on the 19th to 20th-century historic mapping (Figs 7 & 8). Some are weakly positive linear anomalies, indicative of ditches, but others amount to no more than a linear scatter of small dipoles indicating where scrap metal and other magnetic debris accumulated along the edge of the former field. In some cases a known boundary has produced no discernible anomaly, perhaps because it was marked by relatively ephemeral fence or hedgeline rather than a ditch.

5.4 Modern features

Pipelines

The survey has detected parts of three modern pipelines, each represented by an intense linear anomaly of alternating polarity. One runs along the northern edge of Fields 8 and 9 and a second cuts across the southern end of Field 10 (Figs 6 & 8). The third, which is smaller than the others, runs southwards through the north-western corner of Field 8.

A row of large ferrous dipoles, spaced at approximately 110m intervals, extends northwards through Fields 10, 7, 5 and 2 (Fig 2). There were no obvious surface features which might have caused such anomalies, and the most plausible interpretation would be that they represent a set of metal collars or other fittings on a non-ferrous pipe or other buried service.

Field drains

The survey has detected a number of weak linear anomalies of alternating polarity. These are diagnostic of field drains. The majority occur in the northern end of Field 3, but a few are present elsewhere (Figs 3 & 4).

Ferrous objects

Dipolar magnetic anomalies of various sizes are widely scattered across the survey area. A few, marked as TP on the interpretation plots, can be attributed to telegraph poles, and two very large examples in Field 8 relate to a pair of cattle troughs. The remainder will represent a variety of ferrous objects; mostly buried pieces of agricultural scrap metal. Particularly large examples in Fields 3 and 12 may represent more substantial objects.

A tight cluster of moderately large dipolar anomalies is apparent in the data from Field 2. Typically, such a cluster would represent a deposit of modern scrap metal in the backfill of a pond or quarry pit and, although the location of these anomalies does not match with the former pond depicted in this field on the first edition Ordnance Survey map, it does coincide with dark feature visible on a 1945 aerial photograph (Google Earth).

Miscellaneous features

In Field 6, the survey has detected a 30m long linear anomaly with positive and negative elements. It seemingly corresponds with a modern farm track which crosses the field on a similar alignment. Forty metres to its north-west there is an area of weak magnetic disturbance, approximately 15m across, which resembles the anomalies which typically result from the scorching of ground by bonfires.

An area of blank data in the north-eastern corner of Field 8 indicates an area that, at the time of the survey, was obstructed by a muck heap. To its west, an area of magnetic

noise has been detected, indicating a residual scatter of ferrous and ceramic debris on the site of a former muck heap. Other irregular areas of magnetic noise in this field, and in the two small fields to either side of Eaton Leys farmhouse, indicate further scatters of near-surface debris. However, the more tightly defined area of noise at the western edge of Field 8 probably represents a backfilled pond or pit rather than a surface scatter.

5.5 Geology

The western edge of the survey area, alongside the River Ouzel, is dominated by a narrow band of irregular and amorphous positive anomalies set against a very smooth magnetic background. Such data is characteristic of alluvial soils. Few of the anomalies can be tied in to specific features, but it is possible that the broad positive linear anomaly midway up the edge of Field 11 represents a cut-off and infilled segment of river channel (Figs 7 & 8).

Two broad but weak and ill-defined positive linear anomalies run on parallel north to south headings through Field 11, delimiting a 40m wide band. Their cause is unknown, but one plausible suggestion would be that they represent the edges of a large, pre-Holocene palaeochannel cutting through the river terrace gravels.

A broad band of magnetically disturbed data aligned east - west covers much of Field 7 and parts of the adjacent fields to the north. The disturbance consists of densely clustered small positive anomalies, with a central group of larger and more amorphous anomalies. A narrower band of similarly disturbed data passes through the southern end of Field 2 and continues westwards into Field 4. Both bands coincide with natural lines of drainage, and are likely to indicate areas where the natural sediments have been gleyed or otherwise modified by fluctuating groundwater flows.

A large area across Fields 9 and 10 exhibits an amorphous cellular pattern of weakly negative magnetic anomalies. This is most probably related to patterns of weathering or periglacial disturbance of the natural clay geology. A smaller area of irregular magnetic anomalies in Field 12 is also likely to have a geological cause, but cannot be more specifically interpreted.

6 CONCLUSION

The magnetometer survey has mapped the distribution of archaeological remains within the southern half of the Roman town of *Magiovinium*, and has identified a previously unrecorded set of probable Roman enclosures approximately 1km south of the town. Various other features including a possible Roman road, medieval ridge and furrow, undated ditches and palaeochannels have been detected in locations across the survey area.

The survey results confirm that *Magiovinium* was an extensive roadside settlement and suggest that the multivallate defences were a late addition which truncated the earlier town plan. They also highlight a number of features of particular note, including a monumental building, a possible circular shrine, and a concentration of probable industrial remains in the eastern extramural zone.

Despite the success of the survey in identifying the above features, there are indications that other archaeological features may remain undetected. A rectangular enclosure suspected from cropmarks (Phoenix Consulting 1999, fig 2) has produced no discernible magnetic signature, and the ridge and furrow has produced very weak anomalies which do not extend as widely as might be expected. The settlement remains in Fields 4 and

14 have also produced weak and partially disjointed magnetic anomalies. These observations suggest that the local soils and geology may not be entirely favourable for magnetic survey, and that some archaeological features may not have developed the clear magnetic contrasts which would be necessary if they were to be detected.

BIBLIOGRAPHY

Bartington, G, and Chapman, C, 2003 *A high-stability fluxgate magnetic gradiometer for shallow geophysical survey applications, Archaeological Prospection*, **11**, 19-34

Bartlett, A, 1999 *Eaton Leys, Fenny Stratford, Buckinghamshire & Milton Keynes, Report on archaeogeophysical survey, 1999*, Bartlett-Clark Consultancy

BGS 2014 *Geoindex* www.bgs.ac.uk/geoindex.htm, British Geological Survey, accessed February 2014

EH 2008 *Geophysical Survey in Archaeological Field Evaluation*, English Heritage

Gaffney, C, and Gater, J, 2003 *Revealing the Buried Past: Geophysics for Archaeologists*, Tempus Publishing

Hancock, A, 2006 *Archaeological excavation: Land adjacent to Stoke Road, Water Eaton, Bletchley, Milton Keynes*, Archaeological Services and Consultancy, report **ASC: 742/WES/02**

Hunn, A, Lawson, J, and Parkhouse, J, 1997 Investigations at magiovinium 1990-91: The Little Brickhil and Fenny Stratford by-passes, *Records of Buckinghamshire*, **37**, 3 - 66

IfA 2011 *The Use of Geophysical Techniques in Archaeological Evaluations, 2nd Edition*, Institute for Archaeologists Technical Paper

Meadows, I, 2012 *Targeted archaeological excavations at Chester Farm, Irchester, Northamptonshire, September 2011*, Northamptonshire Archaeology report, **12/75**

Millard, L, 1965 Some Palæoliths from the Bletchley district, *Records of Buckinghamshire*, **17**, 336-42

Neal, D S, 1987 Excavations at Magiovinium, Buckinghamshire, 1978-80, *Records of Buckinghamshire*, **29**, 1-124

Phoenix Consulting 1998 *Archaeological desk-based assessment: Eaton Leys, Buckinghamshire & Milton Keynes*, Phoenix Consulting report **P/220/a**

Woodfield, C, 1977 A Roman military site at Magiovinium?, *Records of Buckinghamshire*, **20**, 385-98

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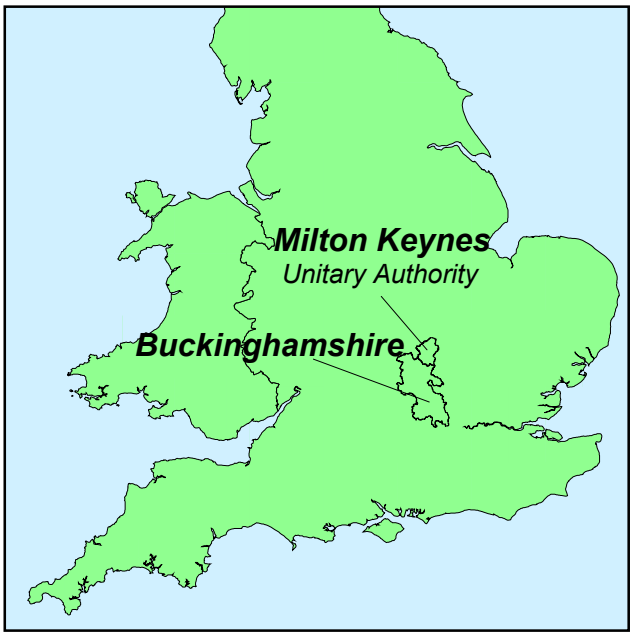
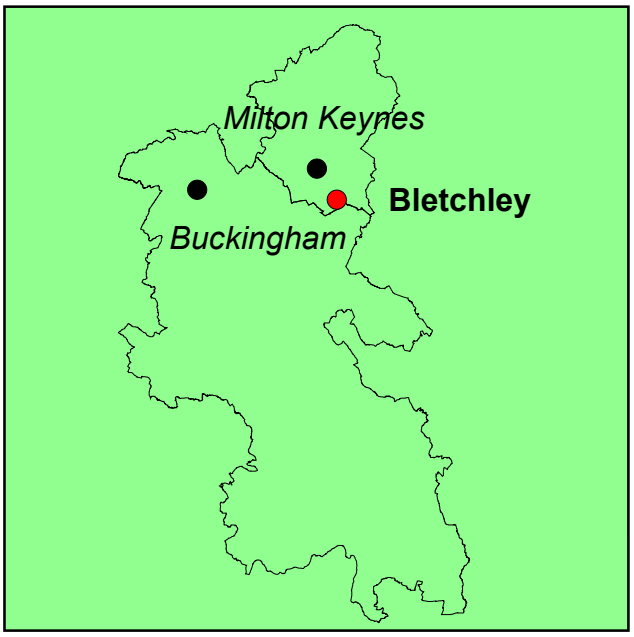
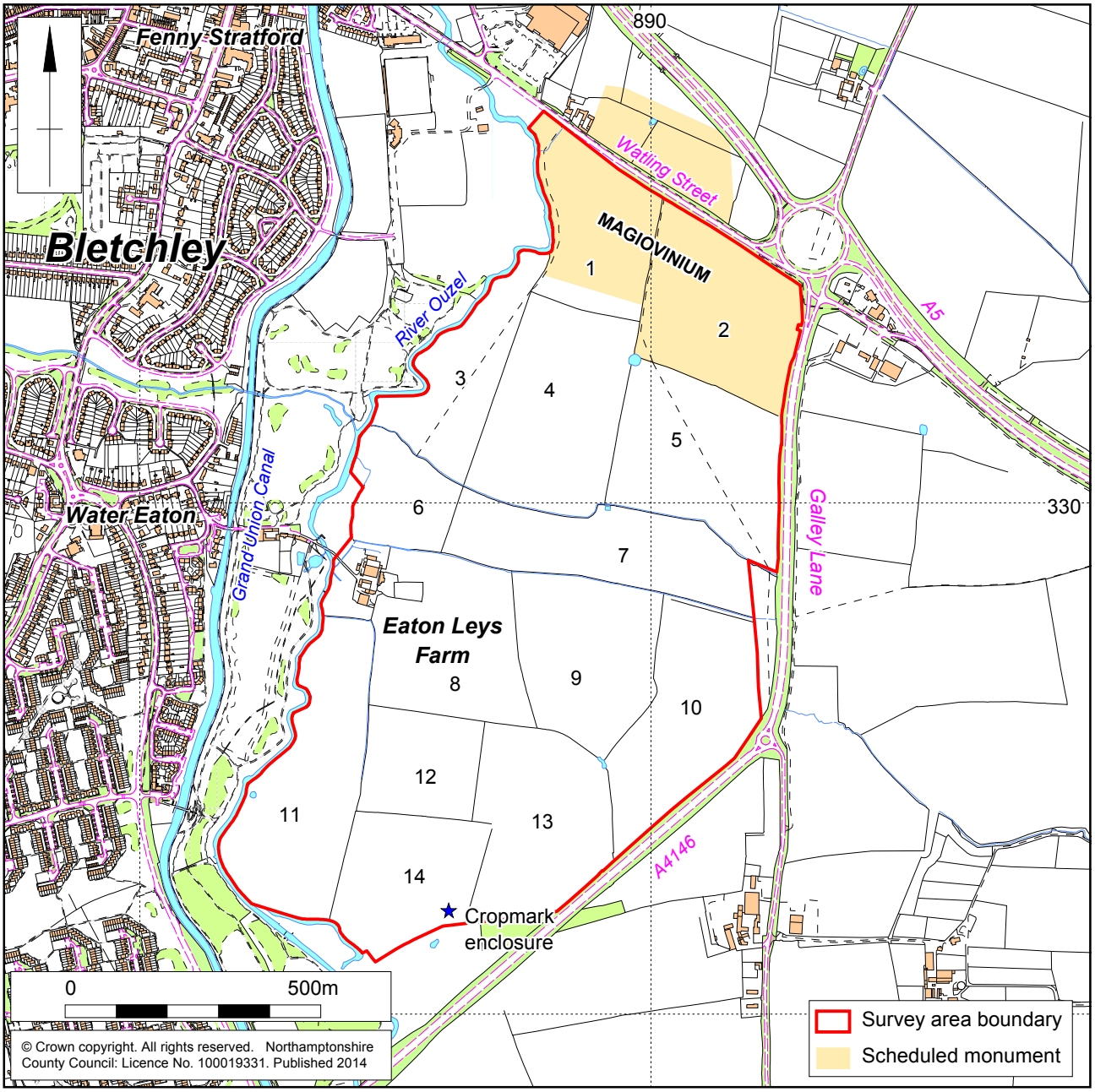
17 November 2014







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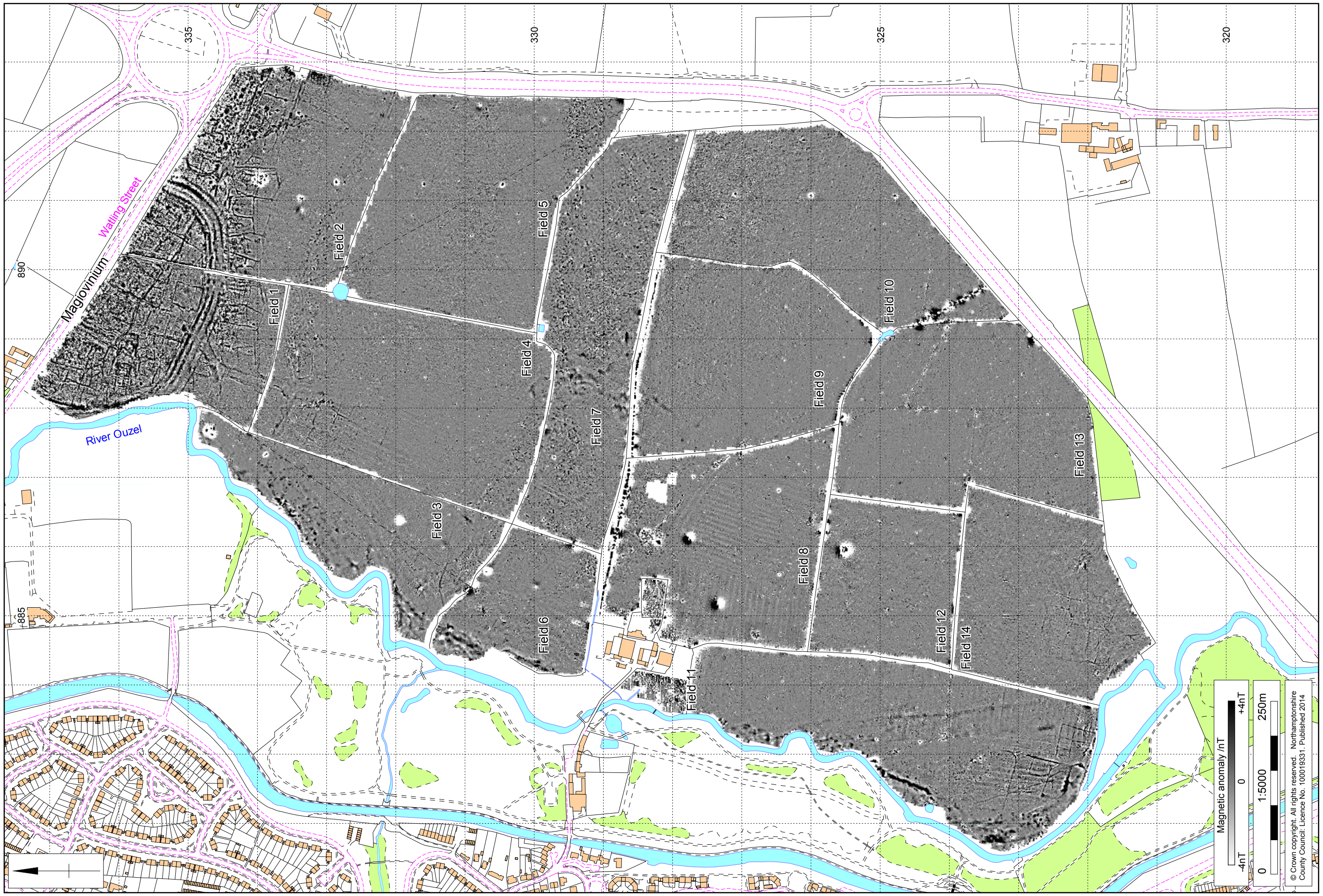
Site location Fig 1



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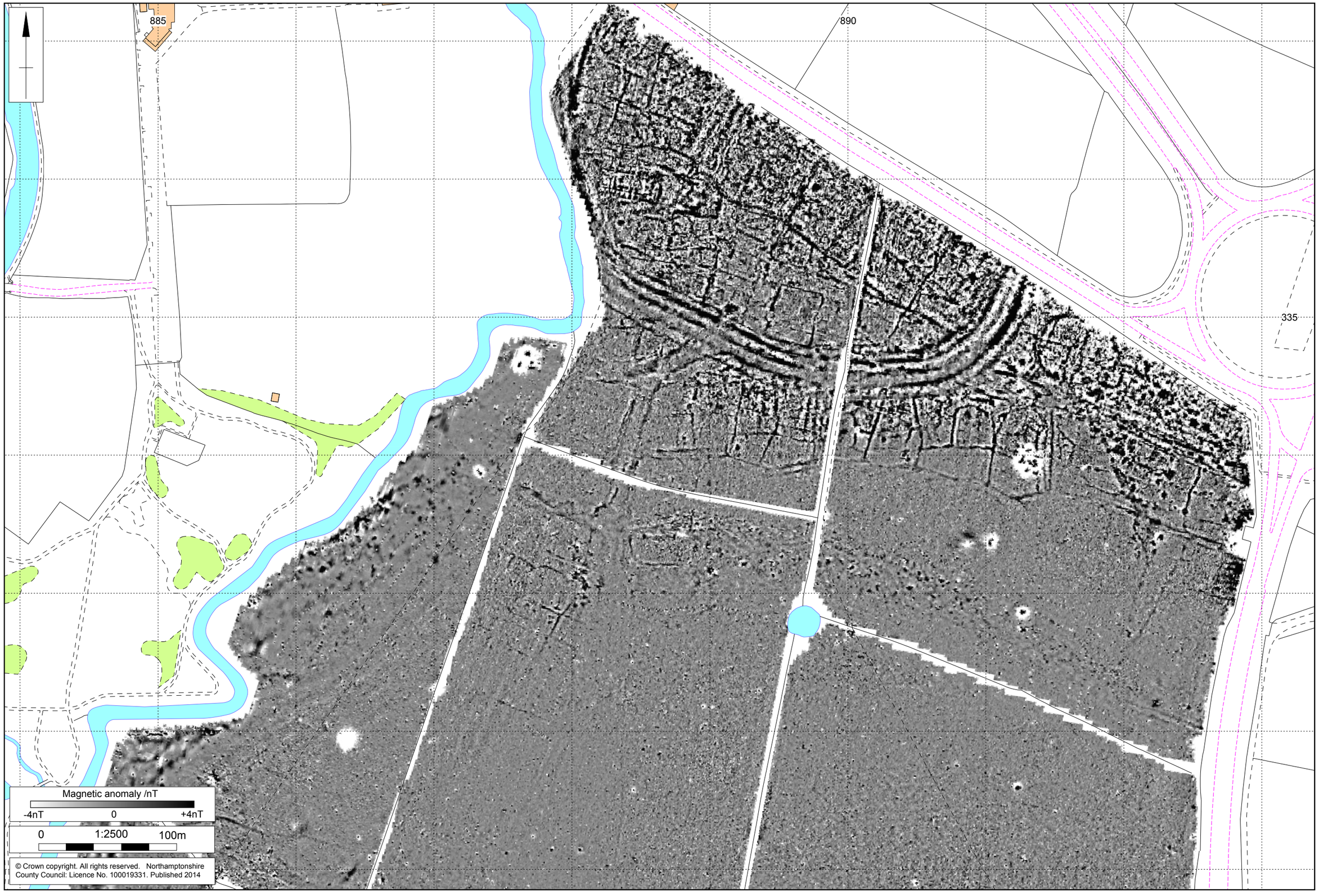
Magnetometer survey results Fig 2



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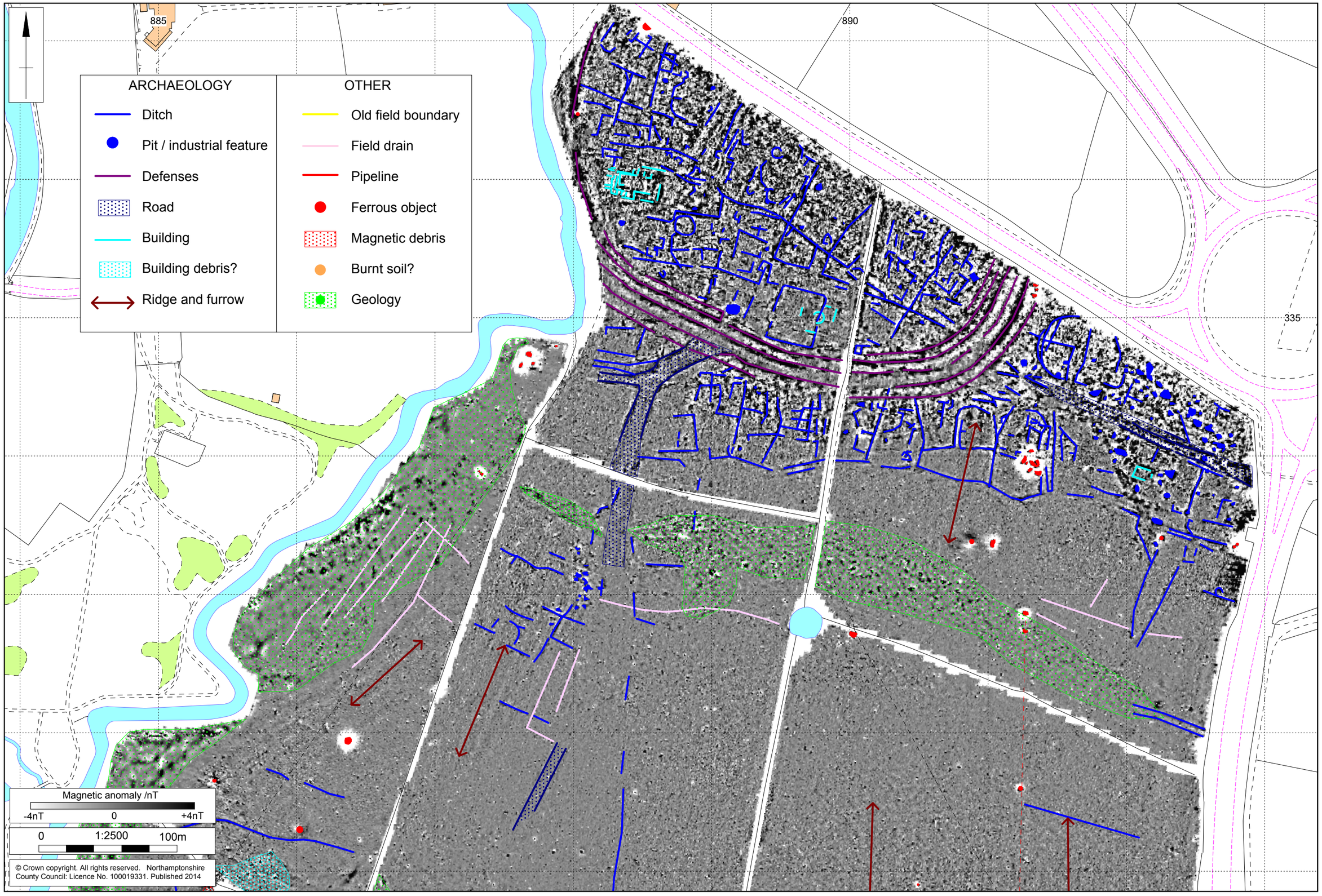
Magnetometer survey results (north) Fig 3



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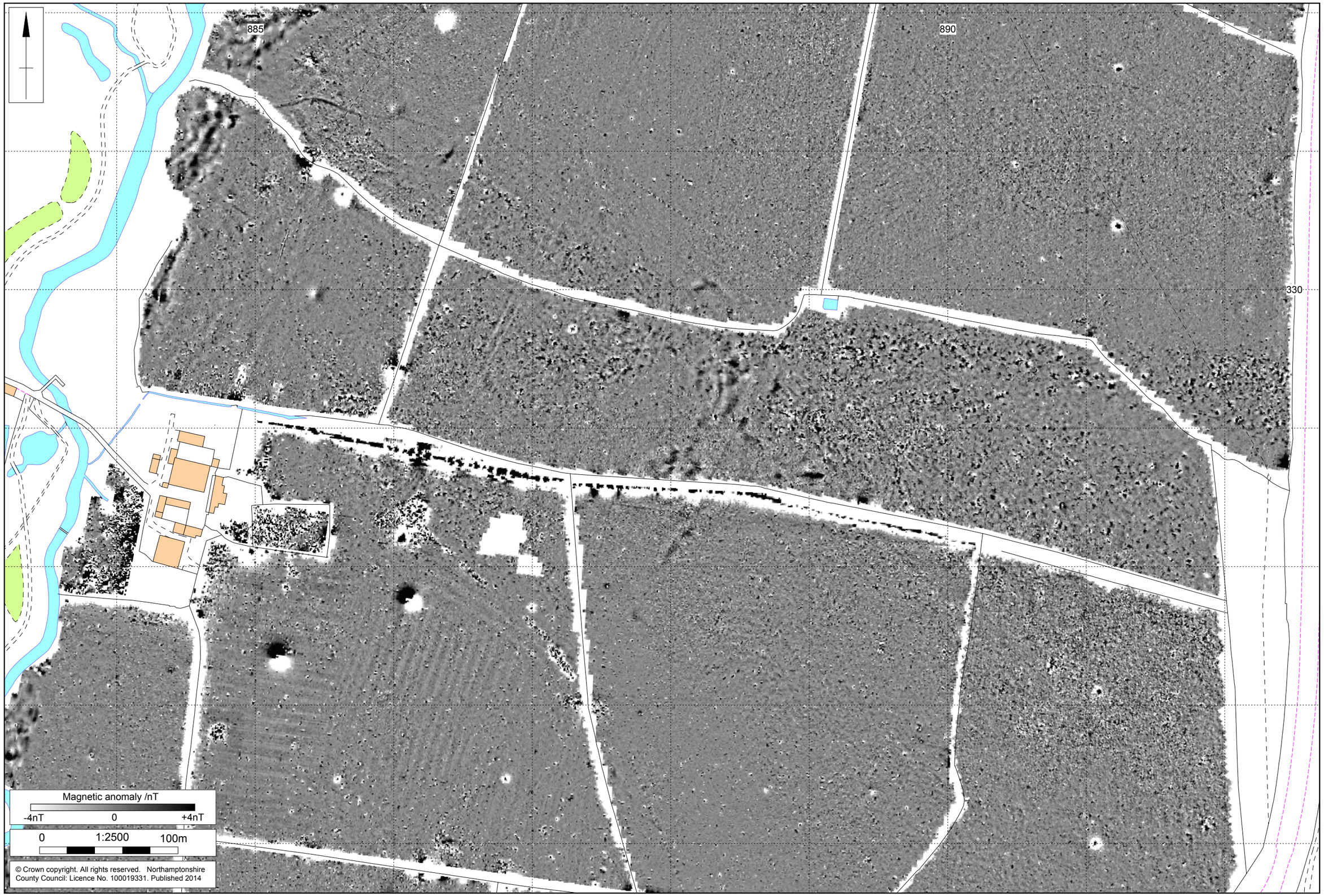
Magnetometer survey interpretation (north) Fig 4



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Magnetometer survey results (centre) Fig 5

885

890

330

For interpretation key, see Fig 4

Magnetic anomaly /nT

-4nT 0 +4nT

0 1:2500 100m

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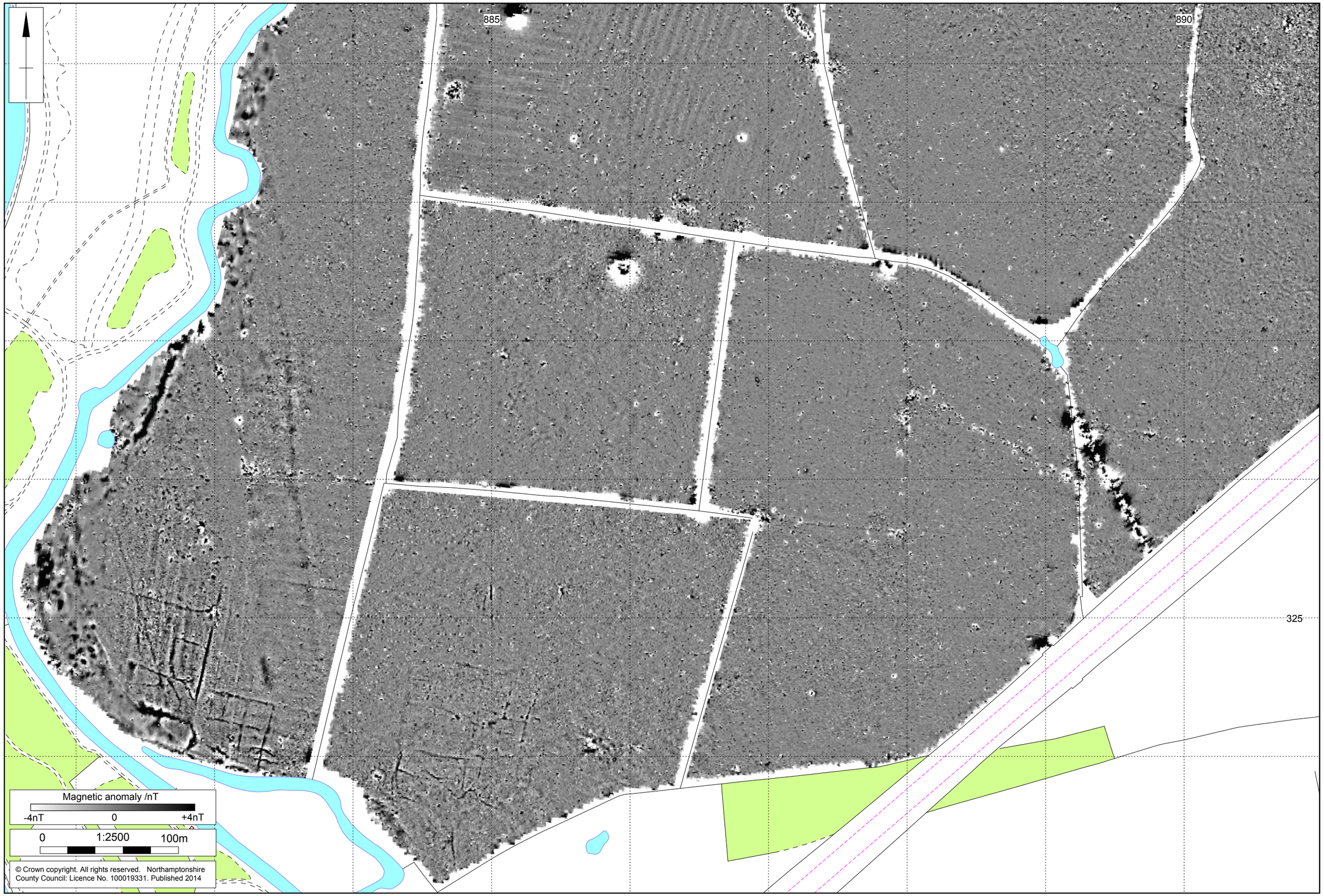
Magnetometer survey interpretation (centre) Fig 6



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Magnetometer survey results (south) Fig 7

885

890

325

For interpretation key, see Fig 4

Magnetic anomaly /nT

-4nT 0 +4nT

0 1:2500 100m

Scale 1:2500 (A3)

Magnetometer survey interpretation (south) Fig 8

Scale 1:2500 (A3)

Magnetometer survey results (detailed view of Magiovinium) Fig 9

Scale 1:2500 (A3)

Unprocessed magnetometer data (north) Fig 10

Scale 1:2500 (A3)

Unprocessed magnetometer data (centre) Fig 11

Scale 1:2500 (A3)

Unprocessed magnetometer data (south) Fig 12

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