

**A428 CAXTON TO HARDWICK IMPROVEMENT
SCHEME
CAMBRIDGESHIRE**

**ASSESSMENT OF POTENTIAL AND UPDATED
PROJECT DESIGN**

PART 1

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Preface

Every effort has been made in the preparation of this document to provide as complete an assessment as possible, within the terms of the brief and project design. All statements and opinions in this document are offered in good faith. Albion Archaeology cannot accept responsibility for errors of fact or opinion resulting from data supplied by a third party, or for any loss or other consequence arising from decisions or actions made upon the basis of facts or opinions expressed in this document.

Acknowledgements

This assessment has been prepared by Joe Abrams (Project Manager), David Ingham Joanne Archer, Alison Bell, Richard Gregson, (Archaeological Supervisors), Holly Duncan (Artefacts Manager) and Jackie Wells (Artefacts Officer). Contributions were also made by Dr Peter Guest (Numismatist, Cardiff University), Phil Parkes (Conservator, Cardiff University), Rob White (Principal Keeper, Lincolnshire County Council Conservation Department), Sarah Poppy and Philippa Walton (Cambridgeshire HER), John Giorgi (charred plant remains, MoLSS), Alan Pipe (molluscan remains, MoLSS), Kevin Rielly (animal bone, MoLSS) and Jane Corcoran and Craig Halsey (geoarchaeology, MoLSS). The figures have been created by Joan Lightning.

The open area excavation of Sites 5 and 7 were completed by the following teams:

Site 5: David Ingham (Archaeological Supervisor)

Jerry Stone, Adrian Woolmer (Assistant Archaeological Supervisors).

Melanie Bell, Anthony Clifton-Jones, Sian Ellis, Mick Garside, Laura Hill, Jonathan Millward, Kathy Pilkington, Anna Rebisz, Chris Swain, Duncan Walsh (Archaeological Technicians) and Sue Fox (Volunteer)

Site 7: Richard Gregson (Archaeological Supervisor)

Adrian Woolmer (Assistant Archaeological Supervisor)

Melanie Bell, Mick Garside, Jonathan Millward, Kathy Pilkington, Chris Swain, Duncan Walsh (Archaeological Technicians)

The strip, map and sample of sites 1, 2, 3, 4, 8 and 9 were completed by the following teams:

Site 1: Joanne Archer (Archaeological Supervisor)

Melanie Bell (Archaeological Technician)

Site 2: Alison Bell (Archaeological Supervisor)

Jerry Stone (Assistant Archaeological Supervisor)

Melanie Bell, Anthony Clifton-Jones, Sian Ellis, Mick Garside, Laura Hill, Jonathan Millward, Chris Swain, Duncan Walsh, Mark Winter (Archaeological Technicians)

Site 3: Joanne Archer (Archaeological Supervisor)

Jerry Stone (Assistant Archaeological Supervisor)

Anthony Clifton-Jones, Sian Ellis, Laura Hill, Jonathan Millward and Chris Swain (Archaeological Technicians)

Site 4: Joanne Archer (Archaeological Supervisor)

Anthony Clifton-Jones (Archaeological Technician)

Site 8: Richard Gregson (Archaeological Supervisor)

Joanne Archer (Archaeological Supervisor)

Melanie Bell and Jonathan Millward (Archaeological Technicians)



*Site 9: Richard Gregson (Archaeological Supervisor)
Jerry Stone, Adrian Woolmer (Assistant Archaeological Supervisors).
Anthony Clifton-Jones (Archaeological Technician)*

James Pixley (Project Officer) was responsible for co-ordinating the Archaeological Supervisors, ensuring correct use of Personal Protective Equipment (PPE), monitoring and assisting the progress of each team and for organising the safe deployment of plant and staff on all sites.

Joe Abrams (Project Manager) was responsible for the day-to-day management of the project. This included updating the risk assessment and health and safety documentation as conditions changed; leading progress meetings with the consultant and client; and negotiating, agreeing and monitoring deadlines and staffing levels for each site.

Albion Archaeology is grateful to Mike Dawson for awarding the contract for this phase of the works on behalf of Edmund Nuttall Capita – Symonds. Our gratitude is extended to the following Edmund Nuttall Capita - Symonds staff: Jim Moran (Roadworks Agent), Pete Higgs (Roadworks sub-agent) and Graham Crabb (foreman). All three assisted in the successful execution of this project thanks to their co-operative, and supportive, style of working which allowed the rapid, safe deployment of new staff and equipment as these became necessary. Adrian Savory (Project Manager) gave invaluable advice on the Edmund Nuttall approach to risk assessment, which was used to update our risk assessments during the course of the project.

Fieldwork on each site was monitored on a regular basis by Mike Dawson (CgMs), Pete Fasham (Jacobs) and Kasia Gdaniec (CAO, Cambridgeshire County Council).

All Albion Archaeology projects are under the overall management of Drew Shotliff (Operations Manager).

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Structure of the report

After an introduction (Section 1) detailing the planning and archaeological background, Section 2 presents the original research objectives of the project. Section 3 provides a provisional summary of the results. The potential of the data to address the original and new research objectives is discussed in Section 4, and these new research objectives are given in Section 5. Section 6 provides an updated project design, which includes detailed method statements for analysis, publication and archiving. Section 7 is a bibliography.



The appendices (Part 2) contained detailed technical information and discussion of all data-sets.

Key terms

<i>Albion</i>	Albion Archaeology
<i>Consultant</i>	Mike Dawson, CgMs Consulting
<i>Client</i>	Edmund Nuttall Capita – Symonds
<i>Highways Agency Consultant</i>	Pete Fasham, Jacobs
<i>CAO</i>	Kasia Gdaniec, County Archaeology Office, Cambridgeshire County Council
<i>MOLSS</i>	Museum of London Specialist Services
<i>IFA</i>	Institute of Field Archaeologists
<i>Procedures Manual</i>	<i>Procedures Manual Volume 1 Fieldwork</i> , 2 nd Edition, 2001. Albion Archaeology



Non-Technical Summary

This document represents the culmination of five stages of archaeological investigation which have taken place within the road scheme: desk-based study, field artefact collection, geophysical survey, trial trenching and open area excavation/strip, map and sample. The desk-based study took place in 2002 (Oxford Archaeology 2002). Field artefact collection and geophysical survey took place in September and October 2004. Trial trenching took place between June and July 2005. Open area excavation and strip, map and sample of eight selected land parcels was completed between September and December 2005. A ninth land parcel (Site 10) will be subject to strip, map and sample during the autumn of 2006.

These works have identified the following remains:

- *Site 1 (Caxton Gibbet - strip, map and sample). Possible Roman field system and medieval furrows.*
- *Site 2 (Land west of Bourn Airfield - strip, map and sample). – Roman enclosure and droveway with associated pits and postholes and medieval furrows and field systems.*
- *Site 3 (Bourn Airfield - strip, map and sample). An Iron Age enclosure and droveway; Roman field systems and enclosures with associated pits, postholes and a human cremation burial and medieval/post-medieval furrows and field systems.*
- *Site 4 (Land west of Childerley Gate - strip, map and sample). Possible Roman field system and associated posthole structure; medieval furrows; post-medieval moat and associated remains (ditch and gully).*
- *Site 5 – (Land east of Childerley Gate – open area excavation). Roman enclosures and droveways with associated quarrying, pits, graves, and timber structures; medieval/post-medieval furrows and boundary ditches.*
- *Site 7 – (Land south of Scotland Farm – open area excavation). Iron Age enclosures with associated roundhouses, pits and postholes; medieval/ post-medieval furrows, droveways and boundary ditches.*
- *Site 8 (Land north-west of Hardwick - strip, map and sample). Iron Age extraction pits and associated parallel ditches; medieval furrows; post-medieval roadside ditches and various undated postholes.*
- *Site 9 (Land north of Hardwick - strip, map and sample). Undated (prehistoric) colluvial deposit and palaeochannel; medieval furrows and associated colluvial deposit; post-medieval droveway and associated isolated postholes.*
- *Site 10 (Land north-east of Bourn Airfield – Strip, Map and Sample). These works will be undertaken in the autumn of 2006 and the results will be integrated into the programme of analysis carried out on the earlier fieldwork.*

Remains identified beyond mitigation sites included undated boundary ditches, medieval furrows, patches of colluvium and various modern remains associated with the use of Bourn Airfield.

The data recovered from these investigations have the potential to address a number of national and regional research agendas. The methodologies and resources required to complete the project are detailed in this document. The end product will be the publication of the results in the regional journal East Anglian Archaeology and the deposition of the project archive (Accession Number will be assigned upon deposition) with the Cambridgeshire County Stores.



1. INTRODUCTION

1.1 *Project Background*

The project background is fully described in the specification (CgMs 2004). In summary, a route was identified for the A428 Caxton to Hardwick road improvement scheme and an archaeological evaluation followed by a scheme of targeted mitigation works was required to mitigate the impact on buried archaeological remains within the land-take of the scheme.

Following receipt of an invitation to tender from CgMs Consulting (CgMs 2004); Albion Archaeology was commissioned in September 2004 by Edmund Nuttall Capita - Symonds to undertake the archaeological evaluation. Albion's Project Design stipulated a strategy for the implementation of a programme of archaeological works within the road improvement corridor. It outlined a four-staged approach to the evaluation:

- Stage I – Fieldwalking survey (non-intrusive evaluation).
- Stage II – Geophysical survey (non-intrusive evaluation).
- Stage III – Trial trenching (intrusive evaluation)
- Stage IV - Appraisal of the results of the archaeological field evaluation.

Following negotiations between CgMs Consulting, Edmund Nuttall Capita - Symonds and Albion Archaeology the following amendments to this approach were agreed by all parties.

- Stage I – Fieldwalking survey (non-intrusive evaluation).
- Stage II – Geophysical survey (non-intrusive evaluation).
- Stage III - Appraisal of the results of the non-intrusive archaeological field evaluation.
- Stage IV – Trial trenching (intrusive evaluation)
- Stage V - Appraisal of the results of the intrusive archaeological field evaluation.

The results of Stages I, II, III and IV have been fully reported (Albion Archaeology (2005a, 2005b and 2005c). A meeting was held on 29th July 2005. This was attended by Mike Dawson, CgMs, Kasia Gdaniec, County Archaeology Office, Cambridgeshire County Council, Jim Moran, Edmund Nuttall Capita Symonds, Joe Abrams and James Pixley, Albion Archaeology. This meeting was, in effect, Stage V of the evaluation and the initial, relative values of archaeological remains within the proposed road corridor were discussed and reviewed.

Thereafter, a mitigation strategy was formulated and tender documentation circulated. Albion Archaeology was awarded the contract for mitigation works on 26th August 2005. Works commenced immediately on Sites 1, 2, 3, 4, 5, 7, 8 and 9 and were completed successfully in all these areas by December 2005.



It was decided that Site 6 should not be subject to mitigation works due to its low potential to reveal significant new data. Site 10 will be subject to strip, map and sample in autumn 2006 when this land becomes available. The results will be integrated, in due course, into the programme of analysis and publication.

1.2 Site Location

The A428 improvement scheme corridor is approximately 9km long; it stretches from the Caxton Gibbet roundabout in the west, to the A14/Cambridge junction in the east. Dualling as part of the Cambourne development has already taken place along a stretch of the route; the scheme affected land on either side of this stretch of road (Figure 1).

The present A428 follows a broadly east-west orientated clay ridge, extending from St Neots in the west to Cambridge in the east. Most of the land is relatively flat and comprises large, open fields. The valley of Bourn lies to the south, whilst to the north the land drops away to form a series of small ridges and shallow valleys.

The geology of the corridor consists almost exclusively of a thick blanket of Boulder Clay. This overlies the clays and shales of the Kimmeridge Clays and Corallian Beds, which come to the surface in the vicinity of the road improvement scheme, particularly around Knapwell and Caxton (Oxford Archaeology 2002).

The scheme affected a total of twenty-three land parcels. For ease of reference, they have been numbered from west (Field 1) to east (Field 23). The scheme is illustrated in Figures 1 – 5. Figure 1 shows the entire scheme; Figures 2, 3, 4 and 5 illustrate the location of the trial trenches and Sites 1 – 10.

1.3 Archaeological Background

A desk-based assessment (Oxford Archaeology 2002) deals extensively with this subject. As a result, it had already been established, prior to the start of fieldwork, that find spots and monuments spanning the prehistoric to the modern period existed within the immediate vicinity of the road corridor.

The archaeological evaluation (Albion Archaeology 2005a, 2005b and 2005c) consisted of fieldwalking, geophysical survey and trial trenching, undertaken in 2005. As a result, the following Areas of Archaeological Evidence (AAE) were defined:

- *AAE 1 – Caxton Gibbet. Undated field system. One ditch contained Roman pottery sherds.*
- *AAE 2 – Land west of Bourn Airfield. Iron Age enclosure and associated pit.*
- *AAE 3 – Bourn Airfield. Ditches containing Roman pottery sherds.*
- *AAE 4 – Land west of Childerley Gate. Post-medieval moat.*
- *AAE 5 - Land east of Childerley Gate. Roman enclosures, associated pits and ditches.*
- *AAE 6 – Land south-west of Scotland Farm. Flint-bearing colluvium.*



- *AAE 7 – Land south of Scotland Farm. Iron Age enclosures and associated remains.*
- *AAE 8 – Land north-west of Hardwick. Iron Age pit containing burnt deposit.*
- *AAE 9 – Land north of Hardwick. Flint-bearing colluvium.*
- *AAE 10 – Land north-east of Bourn Airfield (within the existing A428). Possible route of Roman road, remains of which may be preserved below the 20th century road.*

Remains identified beyond these AAE included undated boundary ditches, medieval furrows, patches of colluvium and various modern remains associated with the use of Bourn Airfield. In no case was it considered necessary to carry out further mitigation works in these areas. It was decided that their potential to reveal further significant data was very low.

1.4 Nature of Archaeological Investigations

Based on the results of the evaluation it was decided that nine sites should be subject to archaeological mitigation; the AAE described in Section 1.3 were re-classified as the following archaeological sites:

- Site 1 (Caxton Gibbet - strip, map and sample). Possible Roman field system and medieval furrows.
- Site 2 (Land west of Bourn Airfield - strip, map and sample). – Roman enclosure and droeways with associated roundhouse, pits and postholes, and medieval furrows and field systems.
- Site 3 (Bourn Airfield - strip, map and sample). An Iron Age enclosure; Roman field systems, droeway and enclosures with associated pits, postholes and a human cremation burial; and medieval/post-medieval furrows and field systems.
- Site 4 (Land west of Childerley Gate - strip, map and sample). Possible Roman field system and posthole structure; medieval furrows; post-medieval moat and associated remains (ditch and gully).
- Site 5 – (Land east of Childerley Gate - open area excavation). Roman enclosures and droeways with associated quarrying, pits, graves, and timber structures; medieval/post-medieval furrows and boundary ditches.
- Site 7 – (Land south of Scotland Farm - open area excavation). Iron Age enclosures with associated roundhouses, pits and postholes; Roman gully and pit; medieval furrows; post-medieval droeways and boundary ditches.
- Site 8 (Land north-west of Hardwick - strip, map and sample). Iron Age extraction pits and associated parallel ditches; medieval furrows; post-medieval roadside ditches; various undated postholes.
- Site 9 (Land north of Hardwick - strip, map and sample). Undated (prehistoric) colluvial deposit and palaeochannel; medieval furrows and associated colluvial deposit; post-medieval droeway.
- Site 10 (Land north-east of Bourn Airfield - Strip, Map and Sample). These works will be undertaken in the autumn of 2006.



1.5 Purpose of this Report

This report presents an assessment of the results of all stages of the archaeological investigations. An updated project design is included listing all tasks that will be required to analyse, publish and archive the results. The completion of these tasks will fulfil the criteria stipulated in the Project Design (Albion Archaeology 2005).



2. ORIGINAL AIMS AND OBJECTIVES OF THE INVESTIGATION

2.1 Introduction

The overall objective of this archaeological project, outlined in the Project Design (Albion Archaeology 2005b), was to define and record any archaeological deposits within the defined sites, thereby deriving their nature, date, form and function, their spatial and temporal relationships, and thus the nature of changing land use patterns over time.

This was achieved through two investigative techniques:

- open area excavation;
- strip, map and sample.

The results of the evaluation suggested that the road scheme contained evidence for human activity from the late prehistoric (late Bronze Age/early Iron Age) through to the post-medieval period. Within this time span, the Anglo-Saxon period was the only major chronological division not firmly identified during the evaluation. The great majority of the evidence was likely to be for the Iron Age and Romano-British periods, with evidence for settlements, field systems, communications and probably burials. The later periods were likely to be represented by a more limited range of archaeological evidence: field systems and possibly settlement.

To ensure that the investigation of these remains was appropriately targeted, it was necessary to establish both general and more period-specific project objectives linked to national and regional research priorities.

2.2 National, Regional and County Research Frameworks of Relevance to the Investigations

At a national level, English Heritage's criteria for prioritising archaeological 'sites' is evolving. Its funding criteria for rescue projects, as set out in *Exploring our Past* in 1991, were similar to those it uses to define a "site" as being of schedulable quality. These included period, rarity, group value, survival/condition, fragility/vulnerability and potential. More recently, a draft research agenda (English Heritage 1997) builds upon the earlier criteria, with the aim of developing an approach reflecting 'the greater determination to pursue research themes' and 'wider interests (e.g. in landscapes)'. These include goals such as advancing our understanding of England's archaeology, supporting the development of national, regional and local research frameworks and promoting public appreciation and enjoyment of archaeology. Although the research agenda was intended for projects seeking English Heritage resources, i.e. not those undertaken within the framework of developer-funded archaeology, its goals and objectives are relevant to the investigations occasioned by this road scheme.

The archaeological resources of the East Anglian region were assessed in 1997 (Glazebrook 1997) and a regional research agenda and strategy was produced in



2000 (Brown and Glazebrook 2000). Also of relevance to the road scheme investigations are the series of papers on the archaeology of the adjacent Great Ouse Valley (Dawson 2000).

2.3 Period Specific Research Frameworks

2.3.1 Iron Age and Romano-British

National priorities for the Iron Age and Romano-British periods were formalised over ten years ago by English Heritage (1991), Haselgrove (1989), Hingley (1989) and Millet (1990), and, specifically for ceramics, by the Prehistoric Ceramics Research Group (1991) and the Study Group for Roman Pottery (Willis 1997). More recently, two “agendas” of particular relevance to this project have been published: for the Iron Age by Haselgrove *et al* (2001) and for the Roman period by James and Millet (2001).

Bryant (1997) and Going (1997) have presented the evidence for these periods in the region. Although it is accepted that ‘most Iron Age settlements were farmsteads’ (Haselgrove 2001), these site-types are still under-represented in the archaeological record. Regionally, the extent and distribution of known farmsteads is considered ‘to represent only a small fraction of the true number of sites’ (Bryant 2000). This is likely to be because the majority of farmsteads were small, like the previously unknown ones in Site 7, and, therefore, difficult to detect. The investigation of Site 7 has helped to redress this under-representation.

Investigations of Roman rural sites over the last ten years have gone some way to address the imbalance with the number of investigations on high status sites such as villas and towns. However, Going and Plouviez (2000) have stated that the ‘study of other kinds of rural settlement has not progressed as rapidly as might be desired’. Although various landscapes of fields and trackways have been suggested for the Roman period in the East Anglian region, these have ‘rarely (if ever?) been tied into detailed settlement evidence’. They also highlighted the need for more research on the Roman road network. It is clear that Sites 2, 3 and 5 are able to address these identified research objectives, and Site 10 also has the potential to provide relevant information.

In recent years, a number of authors have drawn attention to the fact that, historically, archaeological investigations within the region have tended to be restricted to river valley sites or to where the major rivers enter the Fens. Although cropmarks are known on the clay ridges of south-west Cambridgeshire, few have been examined by archaeological excavation. Symptomatic of this problem is Site 5; it was initially interpreted (on the basis of cropmark evidence) as a possible Bronze Age round barrow, yet is now known to be a Romano-British farmstead. This again highlights the importance of this road scheme, which has allowed the detailed examination of a transect through the clay uplands. Within this landscape transect, there is also a limited opportunity to address the issue of settlement shift between the early/middle Iron Age and the ‘Belgic’ Iron Age/early Romano-British period.



2.4 Original Objectives

2.4.1 Summary of original research objectives

As several of the national and regional research objectives overlap, it is possible to condense them into research objectives 1, 2, 3 and 4, summarised in Table 1.

Objective	Period	Research Aims
1	Late Bronze Age/early Iron Age	<ul style="list-style-type: none"> • Can the temporal and spatial extents of the settlement on Site 8 be identified within the road scheme? • What was the settlement used for? Is there evidence for buildings or other features associated with domestic activity? • Is there evidence for spatial organisation within the settlement? • Can artefactual evidence help to reconstruct the settlement's socio-economic environment? • Is there evidence of the structured deposition of artefacts or ecofacts?
2	Iron Age/Romano-British	<ul style="list-style-type: none"> • What were the various sites used for, and were they isolated or part of larger settlements? • How did the sites develop chronologically, and can any spatial organisation be identified? • Does the structural and artefactual evidence differ between the different settlements? • Can artefactual evidence help to reconstruct the settlements socio-economic environment? Were activities representative of subsistence, or of market-driven production? • What does the artefactual and ecofactual evidence reveal about agricultural practices and food processing? • What evidence survives for the structured deposition of artefacts or ecofacts? • Are there any burials? If so, can anything be learned about burial practices and beliefs? • Can any relationship be identified with the postulated Roman road? • How do the results fit into the pattern of settlement in this area that was identified by the work at Cambourne? • Is there any potential for absolute dating techniques?
3	Saxon and medieval	<ul style="list-style-type: none"> • Can continuity of late Roman settlement into the Saxon period be demonstrated? • How do the medieval remains relate to the wider landscape? • Is there any evidence that the moat was medieval in origin? • Can any light be shed on the agricultural organisation of the landscape?
4	Post-medieval	<ul style="list-style-type: none"> • What is the function of the moat on Site 4, and how does it relate to surrounding field boundaries? • How do the results add to our knowledge of the development of the later agricultural landscape?

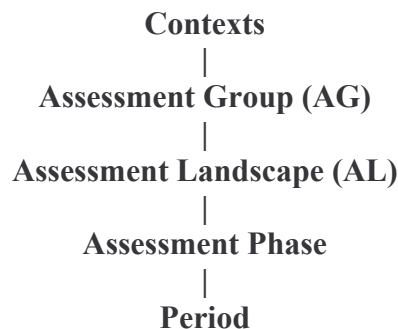
Table 1: Summary of original research objectives



3. SUMMARY OF PROVISIONAL PHASING AND RESULTS

3.1 Methodological approach to assessing contextual data

The contextual data was rapidly assessed in order to establish a coherent spatial and chronological framework. The following structural hierarchy was defined during the assessment and was used to evaluate the analytical potential of the non-contextual data-sets:



The entities above context were defined as follows:

Assessment Group (AG) – a collection of contexts which are contemporary and share a function (e.g. a circle of postholes which make up a roundhouse).

Assessment Landscape (AL) – a collection of AGs which are contemporary (e.g. a cluster of roundhouses, a water pit, a four-poster and an enclosure ditch, which together form a settlement enclosure).

Assessment phase – a collection of ALs which are all contemporary (e.g. a settlement enclosure, a stock enclosure and a cremation cemetery).

Period – Periods are chronological blocks of time (e.g. Iron Age, Roman etc). They are made up of phases; so ten phases of activity can all be Roman, even though they are earlier/later than each other. Standard Albion Archaeology codes were used to identify the periods, e.g. 9 = Iron Age, 10 = Roman, 10.1 = Roman 1st/2nd century *etc.*

The following context totals (by Site) were assigned to Assessment Groups:

Site 1 - 71 contexts
 Site 2 – 439 contexts
 Site 3 - 641 contexts
 Site 4 - 164 contexts
 Site 5 - 946 contexts
 Site 7 - 889 contexts
 Site 8 – 95 contexts
 Site 9 – 54 contexts.

3.2 Summary of provisional phasing and results: Sites 1, 2, 3, 4, 5, 7, 8 and 9

Period	Chronological Period	Site 1	Site 2	Site 3	Site 4	Site 5	Site 7	Site 8	Site 9
0	Unknown	Tree throw holes	Field system, tree throw holes	Tree throw holes	Tree throw holes	None	Gully, pits, posthole, tree throw holes, colluvium, palaeochannel	Isolated postholes, tree throw holes	Colluvium, palaeochannel
1	Pre-Pleistocene	None	None	None	None	None	None	None	None
2	Palaeolithic (500,000BC – 10,000BC)	None	None	None	None	None	None	None	None
3	Mesolithic (10,000BC – 3,200BC)	None	None	None	None	None	None	None	None
4	Late Mesolithic/early Neolithic (transitional)	None	None	None	None	None	None	None	None
5	Neolithic (3,200BC – 2,000BC)	None	None	None	None	None	None	None	None
6	Late Neolithic/early Bronze Age (transitional)	None	None	None	None	None	None	None	None
7	Bronze Age (2,000 – 650BC)	None	None	None	None	None	None	None	None
8	Late Bronze Age/early Iron Age (transitional)	None	None	None	None	None	None	None	None
9	Iron Age	None	Pits	None	None	None	None	None	None
9.1	Early/middle Iron Age (650BC – 350BC)	None	None	Enclosure, posthole, pit	None	None	Four enclosures, three paddocks, two possible roundhouses, three structural features, boundary ditch, pits, drainage gullies	Pits, boundary ditches	None
9.2	Late pre-Belgic Iron Age (350BC – 100BC)	None	None	None	None	None	None	None	None
9.3	Late pre-Roman Iron Age (early Belgic) (100BC – 50BC)	None	None	None	None	None	None	None	None
9.4	Late Iron Age/early Roman (Belgic transitional)	None	None	None	None	None	None	None	None
10	Roman	Field system	None	None	Field systems, posthole structure	Ditches, pits	Gully, pit	None	None
10.1	Roman 1 st /2 nd century	None	Droeway	None	None	None	None	None	None
10.2	Roman 2 nd century	None	Enclosure, droeway, roundhouse, pits, postholes, tree throw holes	Two enclosures, pits, water pit, droeway	None	Enclosure, pits	None	None	None

Period	Chronological Period	Site 1	Site 2	Site 3	Site 4	Site 5	Site 7	Site 8	Site 9
10.3	Roman 2 nd /3 rd century	None	Tree throw holes	None	None	Ladder enclosure, pits, inhumation	None	None	None
10.4	Roman 3 rd /4 th century	None	None	Enclosure, ladder enclosure, cremation, posthole, pits, tree throw holes, coin hoard	None	Two enclosures, redefinition of ladder enclosure, quarry pits, two droveways, two graves, two timber structures, eight possible structures, hearth, pits, gullies, coin hoard, metalling, tree throw holes	None	None	None
10.5	Roman 4 th century	None	None	None	None	None	None	None	None
11	Late Roman/early Saxon (transitional)	None	None	None	None	None	None	None	None
12	Saxon (AD400 – AD850)	None	None	None	None	None	None	None	None
13	Late Saxon/Saxo-Norman (AD850 – AD1150)	None	None	None	None	None	None	None	None
14	Medieval	Furrows	Furrows	Furrows	Furrows	Furrows, boundary ditch	Furrows	Furrows	Furrows, colluvium
15	Late medieval/early post-medieval (transitional)	None	None	Roadside ditch, boundary ditch	None	None	None	None	None
16	Post-medieval (AD1500 – AD1750)	None	Boundary ditch, tree throw holes	Field system, tree throw hole	None	None	None	Ditches, quarry pit.	Droeway, tree throw holes
17	Late post-medieval/modern (AD1750 onwards)	Ploughsoil, subsoil	Land drains, ploughsoil, subsoil	WWII airfield utilities, land drains, ploughsoil, subsoil	Moat, entrance gully, roadside ditch, land drains, ploughsoil, subsoil	Boundary ditch, ploughsoil, subsoil	Field boundaries, two droveways, service trench, land drains, ploughsoil, subsoil	Ploughsoil, subsoil	Ploughsoil, subsoil

Table 2: Summary of provisional phasing Sites 1, 2, 3, 4, 5, 7, 8 and 9



3.3 Provisional Summary of Results – Site 1

The full structural hierarchy and technical detail for Site 1 can be found in Appendix 2.

Site 1 contained the remains of two phases of field systems (Figure 6). They were on contrasting alignments, and have provisionally been dated to the Roman and medieval periods.

The earlier of the two was AL101. It clearly preceded medieval furrows AL102, though the artefactual and stratigraphic evidence for its being Roman are slightly circumstantial. Pre-medieval remains elsewhere along the road scheme have all been either Roman or early Iron Age in date, and a field system of this type is more likely to be Roman.

The paucity of artefactual material suggests that neither field system was especially close to an area of occupation.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	100	AL100	AG100.01	Tree throw holes/root action	2
10 – Roman	101	AL101	AG101.01	Ditches	37
14 – Medieval	102	AL102	AG102.01	Furrows	26
17 – Late post-medieval/modern	103	AL103	AG103.01	Ploughsoil	3
			AG103.02	Subsoil	3
			Layers	Natural stratum (undisturbed geological deposits)	3
			Total		74

Table 3: Site 1 - Group descriptions (ordered by Period) with count of assigned contexts

3.4 Provisional Summary of Results – Site 2

The full structural hierarchy and technical detail for Site 2 can be found in Appendix 3.

Four main periods of activity were identified on this site (Figure 7). The earliest remains were two isolated Iron Age pits AL202. Some boundary ditches AL201 were recorded nearby, but these were undated.

The most significant remains on this site date to the early or middle Roman period, occupying the eastern end of the site. Droeway AL204 is the earliest part of this complex. This was later reinstated in a more easterly position (AL205) along the edge of an enclosure. This later version of the droeway appeared to turn north-east beyond the southern edge of the site.

The enclosure had an entrance on its eastern side, allowing access from the droeway. The entrance was augmented by two internal ditches, which perhaps assisted with stock control. A large posthole AL207 in the entrance from the droeway suggests that the opening was controlled with a gate.

A roundhouse AL205 within the enclosure also had an entrance on its eastern side. Its drip gully truncated a number of tree throws AL203, suggesting that trees may have been cleared in advance of its construction.

Two clusters of pits AL207 were identified within the enclosure. They were probably storage pits. Three near the entrance were reused for dumping rubbish.

A cluster of tree throw holes AL209 was identified near the entrance to the enclosure. The location of these trees, growing in the top of the backfilled enclosure ditches, suggests the settlement had fallen into disuse. It is likely that this period of abandonment dates to the middle Roman period. Interestingly, settlement in the mid-late Roman period was recorded elsewhere on the road scheme (Sites 3 and 5) confirming that settlement abandonment during this period was localised.

There is no evidence of further human activity on the site until the establishment of medieval ridge and furrow cultivation AL210. After this, the land appears to have become part of a large post-medieval field system AL211, linked in with Site 3 (AL310).



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	200	AL200	AG200.01	Tree throw holes/root action	7
		AL201	AG201.01	Unphased ditch	6
			AG201.02	Unphased ditches	29
9 – Iron Age	201	AL202	AG202.01	Pits	6
	10.2 – Roman 2 nd century	AL203	AG203.01	Tree throw holes/root action	11
AL205		AG205.01	Roundhouse drip gully	18	
		AG205.02	Enclosure ditch	43	
		AG205.04	Droeway	28	
		AG205.05	Droeway	12	
		AG205.07	Pit	9	
		AG205.08	Entrance ditches	26	
		AG207.01	Pits	9	
		AG207.05	Pit	5	
AG207.06		Pits	8		
207		AG207.07	Pit	8	
		AG207.09	Posthole	2	
		AG207.10	Posthole	9	
10.3 – Roman 2 nd /3 rd century	207	AL204	AG204.01	Droeway	23
	203	AL209	AG209.01	Tree throw holes/root action	24
14 – Medieval	204	AL210	AG210.01	Furrows	2
			AG210.02	Furrows	100
			AG210.03	Furrows	14
16 – Post-medieval	205	AL211	AG211.01	Ditch	8
			AG211.02	Tree throw hole	4
17 – Late post-medieval/modern	206	AL212	AG212.01	Land drains	12
		AL213	AG213.01	Ploughsoil	8
			AG213.02	Subsoil	8
				Layers	8
				Total	447

Table 4: Site 2 - Group descriptions (ordered by Period) with count of assigned contexts

3.5 Provisional Summary of Results – Site 3

The full structural hierarchy and technical detail for Site 3 can be found in Appendix 4.

Site 3 contained seven main periods of activity, ranging from the early Iron Age to the 20th century (Figures 8, 14 and 15).

The earliest period (Phase 301) comprised an early Iron Age enclosure at the western end of the site. The shape of the enclosure suggests that it was used for corralling livestock.

This was followed by two periods of Roman activity (Phases 302 and 304). The earlier period has similarities with the remains uncovered on Site 2, whilst the later one is comparable to what was found on Site 5.

Phase 302 has provisionally been dated to the 2nd century. Droeway AL307 was located at the eastern end of the site. This bore evidence of reinstatement, suggesting longevity of use. In the western half of the site were two enclosures AL302 and AL305, of which the former was subdivided. They are both likely to have been used for livestock. A water pit AL303 was located at the southern edge of AL302.

Phase 304 dates to the 3rd/4th centuries, and is also likely to represent the remains of agricultural activity rather than occupation. At least one enclosure AL314 was identified at the western end of the site, whilst a ladder system AL306 was revealed further east.

The ladder system perhaps represents a series of enclosures at the rear of house plots, which were lined along the putative Roman road to the north of the site. The artefact assemblage recovered from the northern half of the ladder was also greater, suggesting nearby occupation.

The original ladder system was only half its final size; the eastern side was a later addition, and there is further evidence that the ladder system was subsequently remodelled and subdivided. A human cremation burial AG306.04 was revealed in the corner of one of the land parcels, and a small hoard of mid-4th century coins AG306.01 was recovered from one of the ditches.

Medieval use of the land saw the establishment of ridge and furrow agriculture AL308. This was followed by the creation of two roadside ditches AL309 and AL312. These roadside ditches were not contemporary with each other, and probably represent a lateral migration of the post-medieval road. It seems likely that the subsequent field system AL310 was only created once the route of the current road had been established.

The site was developed further in the 20th century when it became part of Bourn Airfield during World War II.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	300	AL300	AG300.01	Tree throw holes/root action	18
	301	AL301	AG301.01 AG301.02 AG301.03	Enclosure Pit Posthole	34 5 2
10.2 – Roman 2 nd century	302	AL302	AG302.01	Enclosure	8
			AG302.02	Redefinition of enclosure	14
			AG302.03	Pits	4
			AG302.04	Subdivision of enclosure	12
			AG303.01	Water-pit	5
			AG305.01	Enclosure	14
			AG307.01 AG307.02	Droveaway Droveaway	26 12
10.4 – Roman 3 rd /4 th century	304	AL304 AL306	AG304.01	Tree throw holes	7
			AG306.01	Initial layout of ladder system	32
			AG306.02	First changes to ladder system	38
			AG306.03	Final changes to ladder system	76
			AG306.04	Cremation	6
			AG306.05	Pit	2
			AG306.06	Pit	3
			AG306.07	Posthole	3
			AG314.01	Enclosure	29
			AG308.01	Furrows	52
15 – Late medieval/early post-medieval	306	AL309	AG309.01	Roadside ditch	23
			AG312.01	Boundary ditch	32
16 – Post-medieval	307	AL310	AG310.01	Boundary ditches	10
			AG310.02	Tree throw hole	2
17 – Late post-medieval/modern	308	AL311	AG311.01	Airfield utilities	20
			AG311.02	Land drains	132
			AG313.01 AG313.02	Ploughsoil Subsoil	9 10
				Natural stratum (undisturbed geological deposits)	13
				Layers	
				Total	653

Table 5: Site 3 - Group descriptions (ordered by Period) with count of assigned contexts

3.6 Provisional Summary of Results – Site 4

The full structural hierarchy and technical detail for Site 4 can be found in Appendix 5.

Site 4 contained remains belonging to three main periods of activity, comprising field systems, a posthole structure, and a moat (Figure 9).

Field system AL401 has provisionally been dated to the Roman period, even though it contained no artefactual material. It was earlier than the medieval furrows AL403, and pre-medieval field systems elsewhere along the road scheme have tended to be Roman. Posthole structure AL402 is likely to have been broadly contemporary with AL401.

The moat AL404 was previously known from a mixture of cartographic and archaeological sources, and has been dated to the post-medieval period. It respected a roadside ditch next to the line of the modern road, and was larger and more rectangular than most medieval moats.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	400	AL400	AG400.01	Tree throw holes/root action	11
	401	AL401	AG401.01	Ditches	41
10 – Roman		AL402	AG402.01	Postholes	26
		AL403	AG403.01	Furrows	14
14 – Medieval	403	AL404	AG404.01	Moat	41
			AG404.02	Gully at entrance to moat	6
			AG404.03	Roadside ditch	13
			AG405.01	Land drains	6
			AG406.01	Ploughsoil	3
			AG406.02	Subsoil	3
			Layers	Natural stratum (undisturbed geological deposits)	3
			Total		167

Table 6: Site 4 - Group descriptions (ordered by Period) with count of assigned contexts

3.7 **Provisional Summary of Results – Site 5**

The full structural hierarchy and technical detail for Site 5 can be found in Appendix 6. See also Figures 10, 16-19.

With the exception of medieval field systems AL513 and a post-medieval/modern boundary ditch AL514, all the remains on Site 5 have been dated to the Roman period. They represent a ladder settlement, which was broadly contemporary with AL306 on Site 3.

Several phases of activity have been identified within the ladder settlement. These phases are defined by physical changes and additions to the layout of the settlement over time. Different activity types are also present within them. However, the dominant theme is one of continuity. The changes built on and integrated the original design. We should view the ladder as one settlement which changed over time, rather than as a series of discrete settlements on the same piece of land.

The earliest remains comprised a pair of heavily truncated ditches and some associated pits near the eastern end of the site (AL501, Figure 16). They represent the remains of a rectilinear enclosure, which was probably used for agricultural purposes.

The ladder system appears to have been established in the middle Roman period (Phase 502, Figure 17). Although subsequent reworking of the enclosures has partially obscured its initial layout, it originally seems to have consisted of a linear, quite regular series of enclosures AL504. A trackway along its entire length provided access on the north-western side, with a possible further trackway AL502 to the south-east. Circumstantial evidence suggests that the passage of people and animals along the north-western trackway eroded a hollow.

It seems likely that the ladder formed a link between two larger enclosures or field systems at either end. AL503, at the south-western end of the ladder, was defined by a substantial enclosure ditch, though it is unclear whether the ditches near the northern edge of the site represent a separate field system or a continuation of the ladder.

Phase 503 saw the addition of two enclosures AL505 and AL506 and two droveways leading to a watering hole AL507 on the eastern side of the ladder (Figure 18). These new additions were on a different alignment, but still seem largely to have respected the layout of the ladder system.

A large quarry pit AG505.02 was excavated at the edge of AL505. It was cut into a chalky geological deposit, which could have been used as fertiliser to lower the acidity of the soil, making it more suitable for agriculture.

Phase 504 (Figure 19) saw the creation of two new enclosures AL508 at the north-eastern end of the ladder system AL504. These appear to have been short-lived in their initial form.

The ladder system and enclosure AL506 were then substantially reworked, creating a series of larger enclosures which were arranged in a less regular pattern than that of the ladder's original layout. Although some of the earlier ditches had to be reinstated, it seems likely that others were still sufficiently substantial earthworks just to be retained.

Phase 504 can be dated to the late Roman period, and represents the final phase in which the settlement was used. A dark deposit of earth containing a large artefact assemblage AL511 was recorded in the top of the quarrying hollow, and probably represents the remains of a rubbish layer that once covered the whole site, marking its abandonment as a settlement.

Numerous indicators of settlement activity were identified within the site. Even though the ladder system AL502 is likely to have been used initially for agriculture, the presence of a large dump of pottery AG504.10 and a grave AG503.02 at its south-western end suggests settlement activity nearby.

The subsequent reworking of the ladder system was contemporary with occupation within the site itself. The heavily truncated remains of a probable timber building AG505.03 were revealed in AL505, which was perhaps associated with the quarry AG505.02. A large cesspit was dug into the backfilled quarry, providing further evidence of human occupation.

A later building AG510.08 was located not far to the north, with another two cesspits relatively nearby. In addition to these two buildings, a number of linear features AL509 were identified across the site, which have been interpreted as possibly being associated with further structures. One of these was adjacent to the heavily truncated remains of a hearth or oven AG509.05.

The wood used to construct these buildings was probably obtained from trees on either side of the settlement (AL500). The pattern of tree throw holes across the site suggests that the ladder system was initially situated in a clearing within woodland. The landscape would subsequently have become more open as the trees were felled.

Two other graves AG510.12 were also discovered. They were situated in the corner of enclosure AL508 (as was AG503.02) suggesting that the choice of such locations was deliberate. The two graves were of a young woman and an infant, suggesting that they were mother and child.

There is evidence for structured deposition within the site, notably a large hoard of late 3rd century copper alloy coins AG510.11. As well as this and the pottery dump, a pewter plate and a plough coulter were also recovered.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
10 – Roman	500	AL500	AG500.01	Tree throw holes/root action	26
	505	AL512	AG512.01	Ditches	35
			AG512.02	Pits	14
			AG512.03	Pits	14
			AG512.04	Pit	4
			AG512.05	Possible posthole structure	4
10.2 – Roman 2 nd century	501	AL501	AG501.01	Enclosure ditches	16
			AG501.02	Pit cluster	8
			AG501.03	Pit	2
10.3 – Roman 2 nd /3 rd century	502	AL502	AG502.01	Enclosure ditches	13
			AG502.02	Enclosure ditch	8
			AG502.03	Pit	2
		AL503	AG503.01	Enclosure ditch	20
			AG503.02	Grave	3
			AG503.03	Pit	3
		AL504	AG504.01	Enclosure ditches	14
			AG504.02	Reinstatement of enclosure ditches	18
			AG504.03	Enclosure ditches	22
			AG504.04	Enclosure ditch	10
			AG504.05	Enclosure ditch	8
AG504.06	AG504.06	Enclosure ditch	8		
	AG504.07	Enclosure ditch	7		
	AG504.08	Enclosure ditches	18		
AG504.09	AG504.09	Boundary ditches	28		
	AG504.10	Pottery dump	7		
	AG504.11	Pits	11		
	10.4 – Roman 3 rd /4 th century	503	AL505	AG505.01	Enclosure ditches
AG505.02				Quarry	29
AG505.03				Timber structure	26
AG505.04				Gully	6
AG505.05				Pits	5
AG505.06				Pits	10



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
			AG505.07	Metalling	3
			AG505.08	Posthole	2
		AL506	AG506.01	Enclosure ditch	10
			AG506.02	Enclosure ditch	29
			AG506.03	Pits	5
			AG506.04	Metalling	3
		AL507	AG507.01	Droeway	12
			AG507.02	Boundary ditch	5
			AG507.03	Water pit	5
			AG507.04	Metalling	1
			AG507.05	Droeway	18
			AG507.06	Pits	12
			AG507.07	Blocking ditch	8
			AG507.08	Droeway ditch	10
			AG507.09	Droeway ditches	17
	504	AL508	AG508.01	Enclosure ditch	14
			AG508.02	Segmented enclosure ditch	16
			AG508.03	Reinstatement of enclosure ditch	14
			AG508.04	Enclosure ditch	13
		AL509	AG509.01	Gullies	14
			AG509.02	Possible structural features	10
			AG509.03	Possible structural feature	6
			AG509.04	Possible structural features	20
			AG509.05	Hearth	3
			AG509.06	Pits	4
			AG509.07	Possible beam slot and associated feature	8
		AL510	AG510.01	Enclosure ditch	33
			AG510.02	Enclosure ditch	33
			AG510.03	Enclosure ditches	16
			AG510.04	Enclosure ditch	7
			AG510.05	Segmented enclosure ditch	25
			AG510.06	Cesspits	26



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
			AG510.07	Cesspit	6
			AG510.08	Timber structure	32
			AG510.09	Pits	8
			AG510.10	Pit	2
			AG510.11	Coin hoard	4
			AG510.12	Graves	6
			AG510.13	Pit	2
		AL511	AG511.01	Water pits	5
			AG511.02	Rubbish layer	5
14 – Medieval	506	AL513	AG513.01	Furrows	16
			AG513.02	Furrows	4
			AG513.03	Boundary ditch	6
17 – Late post-medieval/modern	507	AL514	AG514.01	Boundary ditch	10
		AL515	AG515.01	Ploughsoil	8
			AG515.02	Subsoil	8
			Layers	Natural stratum (undisturbed geological deposits)	9
			Total		955

Table 7: Site 5 - Group descriptions (ordered by Period) with count of assigned contexts

3.8 **Provisional Summary of Results – Site 7**

The full structural hierarchy and technical detail for Site 7 can be found in Appendix 7. See also Figures 11 and 20.

Five main periods of activity were identified on Site 7 (Figure 11). The most significant of these dates to the early/middle Iron Age, though evidence of earlier human activity is suggested by the presence of colluvium AL703 at the base of the slope.

The colluvium was truncated by a palaeochannel AL704, which was on roughly the same course as the modern stream. The palaeochannel predated the Iron Age enclosures in Phase 704, but was still an active watercourse during this period.

Evidence for the initial phase of Iron Age activity within the site is confined to boundary ditch AL705, which was parallel to the south-eastern edge of the palaeochannel. This probably defined an area along the bank of the stream where alluvial silts had made the ground fertile for farming.

The subsequent Iron Age settlement remains (Phase 704, Figure 20) were also largely restricted to this *c.*20m wide strip of land next to the stream. Three farmsteads were identified (AL706 – AL708), each comprising a domestic enclosure and a paddock. They were all arranged next to the stream, with the exception of AL708's paddock. AL708 (Figure 20) appears to have experienced more problems with inundation from the palaeochannel than the other farmsteads, and marshy ground conditions would explain both the uphill location of the paddock, and the need to keep changing the position of its entrance.

The enclosures in all three farmsteads are likely to have been used for occupation, with animals kept in the paddocks and perhaps brought into the enclosures for extra protection. The size and profile of the enclosure ditches suggest that they had a defensive or display function.

Two of the three farmsteads contained the remains of roundhouses. The one in AL706 was large, and probably had a domestic function, whereas the one in AL707 was smaller, and was perhaps used for industrial purposes. Structural remains were also recorded in AL708, including two more possible roundhouses, but these are more likely to have been animal pens or windbreaks.

During analysis consideration will be given to the possibility that these enclosures represent a single farmstead. Artefact and ecofact distributions will be studied in order to try to elucidate whether different enclosures were used for different activities.

A number of storage and rubbish pits were recorded in the enclosures and paddocks, including a possible 'beehive' pit in AL708. It is likely that other features were destroyed by subsequent plough truncation: the backfill of some of

the pits contained material that appeared to have come from a hearth, yet none was found.

A fourth enclosure was located to the west of the stream. Only one pit was revealed in association with it, and the enclosure's function remains unclear. It is not even certain whether it was related to the other enclosures, though the similarity in size of its ditch suggests it was.

Geoarchaeological investigation (Appendix 21, Section 21.3) suggested that land on the western side of the paleochannel flooded more regularly. This provides a practical explanation for the concentration of remains on the eastern bank (Figure 11) presumably placed here to avoid the worst of the seasonal flooding.

There is little evidence of human activity after Phase 704 until the establishment of ridge and furrow cultivation. A Roman pit and gully AL717 were identified, but these occurred near the northern edge of the site, and are more likely to have related to activity beyond the limits of the excavation.

Two post-medieval droveways were established, one AL719 parallel to the stream, the other AL721 perpendicular to it. AL719 was still in use as a droveway in the mid-20th century.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts	
0 – Unknown	700	AL700	AG700.01	Tree throw holes	10	
			AG700.02	Root action/animal burrows	8	
			AG701.01	Pits	9	
	701	AL702	AG702.01	Gully	6	
			AG702.02	Posthole	2	
			AG703.01	Colluvium	2	
			AG704.01	Palaeochannel	18	
	9.1 – Early/middle Iron Age	702	AL704	AG704.02	Tributary palaeochannel	2
				AG705.01	Boundary ditch	18
		704	AL706	AG706.01	Domestic enclosure	135
AG706.02				Pits	8	
AG706.03				Roundhouse	29	
AG706.04				Pit	2	
AG706.05				Possible roundhouse	6	
AG706.06				Drainage gully	14	
AG706.07				Paddock ditch	15	
AG706.08				Pits	9	
AG706.09	Pit			2		
AG707.01	Entrance gullies			18		
AG707.02	Pit near entrance gullies			2		
AG707.03	Domestic enclosure			63		
AG707.04	Pits			4		
AG707.05	Stakeholes and posthole			6		
AG707.06	Pit			2		
AG707.07	Paddock ditch			12		
AG707.08	Roundhouse			16		
AG707.09	Pits			4		
AG707.10	Pits	7				
AL708		AG708.01	Domestic enclosure and paddock	30		
		AG708.02	Possible roundhouse	11		
		AG708.03	Postholes	9		
		AG708.04	Beam slot	2		
		AG708.05	Pit cluster	19		
		AG708.06	Possible beehive pit	3		
		AG708.07	Drainage gullies	26		
		AG708.08	Pits	10		



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
			AG708.09	Pit	3
			AG708.10	Pit	5
			AG708.11	Structural features	17
			AG708.12	Structural feature	11
			AG708.13	Posthole	2
			AG708.14	Possible roundhouse	9
		AL710	AG710.01	Enclosure ditch	8
			AG710.02	Enclosure ditch extension	8
			AG710.03	Pit	2
		AL714	AG714.01	Southern re-cut of enclosure ditch	10
		AL715	AG715.01	First northern re-cut of enclosure ditch	14
			AG715.02	Second northern re-cut of enclosure ditch	19
			AG715.03	Re-cut of northern terminus	7
		AL716	AG716.01	Re-cut of paddock ditch	13
			AG716.02	Pit	2
10 – Roman	705	AL717	AG717.01	Gully	4
			AG717.02	Pit	2
14 – Medieval	706	AL718	AG718.01	Furrows	75
			AG718.02	Furrows	44
17 – Late post-medieval/modern	707	AL719	AG719.01	Boundary ditches and fence line	28
			AG719.02	Drove/ditches	18
			AG719.04	Land drains	6
			AG719.05	Service trench	6
		AL720	AG720.01	Ploughsoil	7
			AG720.02	Subsoil	7
		AL721	AG721.01	Drove/ditches	23
			Layers	Natural stratum (undisturbed geological deposits)	9
			Total		898

Table 8: Site 7 - Group descriptions (ordered by Period) with count of assigned contexts

3.9 Provisional Summary of Results – Site 8

The full structural hierarchy and technical detail for Site 8 can be found in Appendix 8. See also Figure 12.

The main activity within Site 8 comprised fifteen early/middle Iron Age pits (Figure 12), thirteen of which were clustered between two parallel ditches AL802. They were all dug into a chalky geological outcrop AL807. The ditches were probably used to define the area of pitting.

These features are likely to have been contemporary with the nearby Phase 704 farmsteads on Site 7 (Figure 11). The Iron Age farmers might have used the alkaline, chalky material as a fertiliser to reduce the acidity of the soil. A large, post-medieval quarry pit AL805 at the northern edge of the site was probably used for the same purpose.

The only evidence for human activity on this site after the Iron Age consists of medieval ridge and furrow cultivation AL803 and a post-medieval/modern roadside ditch at the western edge of the site, parallel to the modern road.



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	800	AL800	AG800.01	Postholes	4
			AG801.01	Tree throw holes/root action	2
8 – Late Bronze Age/ early Iron Age	801	AL802	AG802.01	Pits	47
			AG802.02	Ditches	10
14 – Medieval	802	AL803	AG803.01	Furrows	6
			AG804.01	Ditches	12
16 – Post-medieval	803	AL804	AG805.01	Quarry pit	4
			AG806.01	Heavy clay	2
0 – Unknown	804	AL805	AG807.01	Chalk	2
			AG808.01	Ploughsoil	3
17 – Late post- medieval/modern	805	AL808	AG808.02	Subsoil	3
			Total		

Table 9: Site 8 - Group descriptions (ordered by Period) with count of assigned contexts

3.10 Provisional Summary of Results – Site 9

The full structural hierarchy and technical detail for Site 9 can be found in Appendix 9. See also Figure 13.

Much of this site was covered by a layer of colluvium AL900, which had formed at the base of the slope. There was also a palaeochannel AL901 at the base of this slope, on roughly the same course as the modern stream. Neither of these features was dated, but they are likely to have been broadly contemporary with colluvium AL703 and palaeochannel AL704 on Site 7.

The site was placed under ridge and furrow cultivation during the medieval period AL902, and a post-medieval/modern driveway was subsequently created along the edge of the stream. This again mirrors Site 7 (AL719).



Period	Phase	Assessment Landscape	Assessment Group	Description	No. Contexts
0 – Unknown	900	AL900	AG900.01	First layer of colluvium	1
		AL901	AG901.01	Palaeochannel	8
14 – Medieval	901	AL902	AG902.01	Furrows	16
		AL903	AG903.01	Second layer of colluvium	1
16 – Post-medieval	902	AL904	AG904.01	Ditches	16
			AG904.02	Root action	8
17 – Late post-medieval/modern	903	AL906	AG906.01	Ploughsoil	2
			AG906.01	Subsoil	2
			Layers	Natural stratum (undisturbed geological deposits)	2
			Total		56

Table 10: Site 9 - Group descriptions (ordered by Period) with count of assigned contexts



3.11 Site 10

Site 10 lies beneath the existing A428, immediately north-east of Bourn Airfield (Figure 4). Fieldwork (strip, map and sample) is scheduled to take place during autumn 2006. Once complete, the preliminary results, full structural hierarchy and technical detail will be appended to this document.

The focus of the works on Site 10 is to search for the putative remains of a Roman road (Margery's road 231, Chris Evans pers. comm.), likely to have been flanked by deep ditches.

A decision as to whether to integrate and publish the results of the work will be made on the basis of the type of remains recorded within it. It remains possible that no archaeological remains will be present.



4. ANALYTICAL POTENTIAL OF THE DATA – ALL SITES

4.1 Introduction

In this section the analytical potential of each dataset is reviewed. This information is summarised in Tables 12 (original research objectives) and 13 (revised research objectives).

The datasets recovered during the investigations have been divided into three main classes: contextual, artefactual and ecofactual.

- **Contextual** data relate to the identification of individual events such as the digging of a ditch, its primary infilling etc. These have been recorded as context records during trial and open area excavation. All contexts have a detailed record sheet; many have a plan and section drawing, along with photographs. The contextual dataset is discussed in detail in Appendices 1 - 9.
- **Artefactual** data comprise human-made objects recovered during trial and open area excavation. These have been divided for ease of discussion into pottery, ceramic building material and other artefacts (including registered artefacts and bulk finds, such as industrial residues). The artefactual dataset is discussed in detail in Appendices 10 – 17.
- **Ecofactual** data comprise natural materials found within excavated deposits. These are able to yield information on the nature of past human activity and its environmental setting. They include animal bones, and information obtained from environmental samples (for example charred plant remains). The ecofactual dataset is discussed in detail in Appendices 18 - 22.

The methodological approach taken with each dataset is discussed in the appendices, along with quantification, provenance (spatially and chronologically) and also condition. All these factors are important in deciding the potential of the material for analysis.

4.2 Contextual

4.2.1 Baseline information affecting the contextual data

The road corridor lies on relatively high ground to the west of Cambridge. This land is part of a broadly east-west orientated clay ridge which extends from St Neots in the west to Cambridge in the east.

Most of the land is relatively flat, the exceptions being Sites 7 and 9, which lie on sloping land adjacent to the Callow brook. The valley of Bourn lies to the south, whilst to the north the land drops away to form a series of small ridges and shallow valleys.



4.2.2 Processes affecting the survival of archaeological remains within the road corridor

The soils of Cambridgeshire have been heavily exploited by arable agriculture, and land within the road corridor is no exception. The widespread truncation of archaeological remains by modern ploughing has been documented on a regional and national level, as a result of the *Management of Archaeological Sites in Arable Landscapes Project* sponsored by the Ministry of Agriculture Fisheries and Food (DEFRA/OAU 2002). Part of this project sampled several sites within Cambridgeshire (Abrams 2001).

This and other studies (English Heritage 2003) have established that gradual attrition caused by shallow ploughing, and dramatic destruction caused by deep ploughing, is responsible for the loss of more archaeological remains than the modern construction and aggregate industries. Both of the latter industries regularly employ archaeologists to investigate and record remains prior to destruction. Modern ploughing has been the most important process to have had a negative impact on the type and quality of remains within the corridor.

However, the damage goes back further than this. Remnants of ridge and furrow field systems (themselves largely ploughed out) were encountered along the entire length of the road scheme. Their presence confirms that repeated ploughing during the medieval period has caused the truncation of remains, albeit in thin strips, to a greater depth than modern ploughing.

The medieval cultivation had the compensation of preserving remains in strips beneath the ridges between each furrow. Even so, it has destroyed earlier deposits and, in some cases, lifted artefacts and ecofacts out of context, depositing them as residual material either in the topsoil or in later features.

The excavation of post-medieval and modern field boundaries, and the extensive use of ceramic land-drains, has caused the destruction of deposits and the mixing of artefacts. However, in these cases the damage is localised, and the initially confusing picture of early artefactual material within later features has been addressed through careful assessment of the contextual data.

Modern truncation caused by construction works is relatively scarce. Only during the investigations within Bourn Airfield was this process recorded as having had an adverse affect. Complete destruction had been caused by utility runs and concrete strip footings in parts of the Airfield, although even here damage was localised (Figures 8, 14 and 15).

It is worth noting that modern truncation caused by construction work will be a particular problem during works on the land north-east of Bourn Airfield (Site 10). This land lies beneath the existing A428, so deposits may have been significantly truncated during its creation.



Perhaps it is fortunate that the focus of the work on Site 10 is to search for the putative remains of a Roman road, likely to have been flanked by deep ditches. Such ditches are the most likely features to survive in such circumstances.

4.2.3 Survival and condition of remains encountered

Most of the significant remains identified within the road corridor date to the Roman period. A smaller proportion dates to the Iron Age. In both cases, the remains tend to belong to a single period, and comprise rural farmsteads, field systems and associated droveways.

The components of these landscapes which have survived best consist of relatively deeply cut negative features such as ditches, pits, quarry pits and, to a lesser extent, inhumations (Table 11).

Clearly, this landscape was never deeply stratified. However, it would have possessed significantly more components (hearths, floor layers, wheel ruts, and banks to accompany the deep ditches) than those recorded during the recent works.

Site	Number of significant deep features present (e.g. ditches, pits)	Number of significant shallow features present (e.g. hearths, postholes, layers (floor surfaces))	Number of significant positive features (e.g. banks, walls)
Site 1	5 ditches	None	None
Site 2	12 ditches 12 pits 1 posthole	1 posthole	None
Site 3	23 ditches 6 pits	1 posthole 1 cremation	None
Site 4	12 ditches 1 moat	6 postholes	None
Site 5	67 ditches 50 pits 1 quarry 3 inhumations	4 postholes 6 beam slots 1 hearth 3 areas of metalling	None
Site 7	20 ditches 30 pits	8 postholes 4 structural slots	1 bank
Site 8	2 ditches 15 pits	None	None
Site 9	None	None	None

Table 11: Types of features present

Only one positive feature (a bank deposit AL710) was identified within the corridor. Significantly, this was located at the base of a slope on land south of Scotland Farm (Site 7), and was protected to a certain extent by relatively deep alluvial deposits from the adjacent stream and colluvial deposits from ploughing further up the slope.



The general absence of postholes is primarily due to later truncation. As a result of this, there was no opportunity to study spatial arrangements of postholes within roundhouses and other structures. Instead, structural remains comprise beam slots and curved gullies (AL505, AL509 and AL510, Site 5 and AL205, Site 2) for the Roman period, and curved gullies (AL706-708, Site 7) for the early/middle Iron Age.

The distribution of certain artefact types (iron nails, ceramic building material, pottery and coins) has also assisted in confirming where settlement activity must have been focused.

Again, the general absence of hearths (AG509.05, Site 5 may have been the truncated base of one) has significantly reduced the potential for retrieving charred plant remains from a feature within which they were created. Instead, the majority of charred plant remains have been recovered from ditches and pits within which they arrived by accident rather than design.

The lack of hearths and kilns also precluded the use of archaeomagnetic dating.

4.2.4 Specific strengths of the contextual data

The most significant strength of the contextual dataset is that it includes recognised feature types, with well stratified, thoroughly sampled deposits located in largely uncontaminated, single period sites.

The combination of largely single period sites and deep deposits containing artefacts and ecofacts has led to the recovery of some extraordinary material (*e.g.* coin hoard AG510.11, Site 5). A variety of artefactual and ecofactual material has also been assessed and is described below.

This suggests the analysis stage of the project will significantly augment knowledge of settlement patterns in this region, particularly during the early/middle Iron Age and Roman periods.

Site-specific examples of fortuitous preservation include:

Site 2 – molluscs, metalwork

Site 3 – molluscs, cremation, coins, metalwork, flint tools

Site 5 – molluscs, three inhumations, waterlogged deposits, coins, metalwork, sawn timber

Site 7 – molluscs

Even the sites of lesser importance (Sites 1, 4, 8 and 9) all generally contained significant remains from only one period. The only exception to this was Site 3, which revealed activity dating to the early/middle Iron Age, Roman,



medieval and post-medieval/modern periods. Even here, the contextual data is well understood, and rigorous assessment has led to the recognition of residual material. It is our conviction that the correct phasing of this multi-period site has not been significantly affected by the variety of remains it contained.

4.3 Pottery

4.3.1 Late Bronze Age/early Iron Age

A small, residual assemblage of late Bronze Age/early Iron Age pottery was recovered from Site 8. The material has low potential to augment existing knowledge of the regional types and distribution of pottery of this date.

4.3.2 Early/middle Iron Age

The assemblage from Sites 7 and 8 comprises a limited range of fabric types and forms, which can be usefully compared with other contemporary sites in the region, and will help to place the sites in a local and regional context. Study of functional evidence may indicate the nature of settlement activity undertaken. Any spatial variation noted may indicate chronological, functional, and to some extent economic developments/differences between various farmsteads and enclosures.

The pottery has medium potential to help promote the development of a more standardised Iron Age type series for Cambridgeshire, and assist in the clarification and/or refinement of the dating for Iron Age types. Bryant (2000, 14) has drawn attention to the lack of published examples of Iron Age pottery assemblages within the region which have been subject to full quantification and analysis, noting that the absence of quantified assemblages severely limits the degree to which intra- and inter-site comparisons can be made. Lack of suitable material has also hindered the dating of earlier Iron Age assemblages (*ibid*, 2000, 15), and, to date, little or no petrological analysis has been undertaken.

An Iron Age assemblage comprising approximately 16.6kg was recovered predominantly from Sites 7 and 8. The sherds are tempered with a range of sand, organic and calcareous inclusions, which compare well with assemblages recovered from recently excavated sites within the Cambourne Development Area (Wessex Archaeology 2003). Though only a small assemblage, full analysis of this material, including a selective programme of thin-section analysis, would be a useful starting point for further research.

4.3.3 Roman

Excavation of Sites 2, 3 and 5 recovered a sizeable Roman assemblage, including a wide range of fabric types and forms, which can be usefully compared with contemporary sites in the region. Study of functional evidence may indicate the nature of settlement and activity undertaken across each site. Any spatial variation noted may indicate chronological or functional differences either between each site, or specifically within areas of one site. The presence or absence of particular pottery types may be an indicator of status and socio-economic development, and will help to place the sites in a



local and regional context with regard to trade networks and means of exchange.

The pottery assemblage has low potential to examine the transition from the Iron Age into the Roman period. Analysis of the Site 2 assemblage may assist in clarifying how the site developed in the early Roman period.

The assemblage has low potential to address the question of structured deposition. A single deposit of 1,194 coarse ware sherds, representing sizeable proportions of approximately 78 vessels and weighing approximately 19kg, was recovered from Site 5. All the vessels were broken in antiquity, although it is unclear whether they constitute a dump or a deliberate placement of material.

The pottery also has low potential to help refine the Cambridgeshire type series. A sizeable Roman assemblage comprising approximately 79kg was recovered, predominantly from Site 5. The range of Roman fabrics and forms is relatively standard for the period and region, and is comparable with assemblages recovered from recently excavated sites in the vicinity of Cambridge (*c.f.* Hull and Pullinger 2000), and within the Cambourne Development Area (Wessex Archaeology 2003). Although the assemblage is unlikely to yield any new information, full analysis of this material would provide a useful addition to existing knowledge of the range and distribution Roman ceramics in the region, and may be used to further the development of a more standardised Roman type series for Cambridgeshire.

4.4 Ceramic Building Material

The small assemblage of Roman brick and tile (*c.* 9kg), deriving almost entirely from Site 5, has low potential to assist in dating features, and to some degree, determining the nature, form and status of activity. The presence of brick and tile is interesting, given that no evidence for substantial structures was encountered during excavation. Assuming that brick and tile is unlikely to have travelled far from its original point of use, it can be inferred that the material derived from a sizeable building located in the vicinity, beyond the limit of excavation.

Fired clay fragments weighing approximately 5kg were recovered from all sites, the majority associated with Sites 5 and 7. As all the material is redeposited and cannot be directly associated with the use of the features from which it was recovered, it has little potential for significant analysis.

4.5 Coins

Taken together, the coins from the project are an important source of archaeological evidence that certainly warrant further analysis. The assemblage is significant because:

- An unusually high proportion of the coins were recovered from stratified contexts;



- It includes two certain hoards and probably a third dispersed hoard. To find so many hoards on Romano-British rural settlements during controlled excavation is highly unusual (if not unique) and their study will have a great deal to say about the use and loss of coins on these sites, as well as the deposition of the hoards themselves.
- The Childerley Gate hoard is the first coin hoard from Cambridgeshire that has been excavated and recorded using modern archaeological techniques, and is one of the largest late 3rd century AD coin hoards recorded in the county. It is also the first hoard of this date from Cambridgeshire for which an itemised catalogue will be prepared (Appendix 13).
- The analysis of this hoard, which is thought to consist entirely of barbarous radiates, and their association with iron objects suggested to be weights, will augment our knowledge of late 3rd century irregular coin production in East Anglia (Marsden 2003).

4.6 Other Artefacts

4.6.1 Early/Middle Iron Age

Spatial analysis of the fuel ash slag, triangular loom weight and two perforated chalk weights or whorls recovered from Site 7 might, in combination with analysis of the other datasets, identify which parts of the site were used for domestic activity. They initially suggest a focus of such activity within the southern farmstead AL706.

A concentration of saddle quern fragments from Site 7 could suggest an agricultural economy, though the environmental evidence suggests that grain was imported. Up to three stone types were noted amongst the quern fragments, and identification of their petrology may identify their source and whether or not the stone was imported.

Little material was recovered from Site 8, yet the recovery of a saddle quern and a possible whetstone suggests some domestic activity in the vicinity. The single iron nail shank is the only iron artefact recovered from this period.

4.6.2 Roman

The Roman assemblage has moderate potential to contribute to analysis of the types and functions of the remains on Sites 2, 3 and 5. It may also offer information on the economy of these sites, and the people living or working on them.

Structures are hinted at by the assemblage of nails (Sites 2, 3 and 5) and building fasteners and fittings (Site 5). The glass vessel fragment and the pewter plate (Site 5) reinforce the domestic nature of some of the enclosures, and these, along with the fragments of Mayen lava (Sites 3 and 5) and items of jewellery (Site 5), attest to the fact that the inhabitants had access to, and the means to purchase, traded goods.

The possible plough coulter (Site 5) is evidence of an arable economy, and the fragments of iron slag (Sites 2 and 5) suggest that occasional repairs to iron



tools may have been carried out. The small spearhead and ‘bell-shaped’ stud (Site 5) are more frequently found on military sites than rural ones, and perhaps suggest a military connection.

The assemblage also has potential for analysing patterns of structured deposition. As well as the two coin hoards (Sites 3 and 5), a plough coulter and a pewter plate were recovered from Site 5. Similar deposits were recovered nearby at Cambourne (Wessex Archaeology 2003, 24-25).

Further analysis of these structured deposits will reveal how they compare with similar deposits from comparable sites within the wider area. Comparison with other sites also has the potential to reveal why they were deposited. It appears initially that they were placed in locations that could easily be located again, perhaps indicating that their deposition was associated with the disturbances in Britain in the late 3rd or early 4th century.

A single piece of worked, structural timber was recovered (Site 5). This has low potential to contribute to our understanding of this site. The remains of at least two broadly contemporary timber structures were recorded nearby (AG505.02 and AG510.08, Site 5). Analysis of the wood will provide information on species of tree used for construction within the site.

4.7 Animal Bone

A number of factors affect the potential value of an animal bone assemblage, primarily the state of the bones, quantity, dating and recovery. The first of these is a major issue here, with a very large proportion of the assemblages exhibiting a moderate to poor level of preservation.

In contrast, the degree of fragmentation is low. However, this does not take into account the fact that relatively few skeletal parts were 25% complete or greater, with a very small proportion of whole limb bones. In addition, there was often a major decrease in bone count following attempts at refitting, there was a notably high representation of loose teeth and, with a few exceptions, the quantity of limb bones with articular ends is generally rather small. This all adds up to a series of assemblages which have clearly suffered moderate to severe levels of fragmentation, this probably occurring in antiquity (following deposition) as well as during the excavation process.

The generally moderate to poor levels of preservation are likely to have created a bias in terms of species representation as well as in the relative abundance of certain age groups. This could explain the wealth of cattle bones throughout these deposits and the relative dearth of pig and domestic birds. However, the numerous well preserved assemblages will provide more accurate data on the species and age composition.

The state of the bone will have an affect on butchery studies. While some butchered examples were seen, the surface damage has obscured much of this evidence, severely limiting the value of any butchery studies.



The quantity of bones recovered, taking refitting and the number of identifiable fragments into account, is clearly greatest within the early/middle Iron Age assemblages from Site 7 and the Roman collections from Sites 3 and 5, particularly from the late Roman period. These also provided the greatest quantities of age and size data. In contrast, the bone assemblages from the later periods are clearly too small to warrant any further work.

The number of animal bones needs to be substantial in order to provide meaningful conclusions concerning animal usage. The late Roman Site 5 data would be most suitable for such a detailed analysis.

Hand recovery was augmented by sampling at each of the sites. This was responsible for the recovery of both small rodent and amphibian bones. However, due to the noted poor state of a large number of assemblages, a high proportion of the sieved collections provided very few or no identifiable fragments. Thus, apart from a few exceptions, the sieving strategy did not provide any additional evidence.

Analysis of the animal bone assemblage will provide significant information concerning both the diet and the husbandry regimes practised by the Iron Age occupants of Sites 3 and 7, and subsequently the Roman occupants of Sites 3 and 5.

Analysis of the animal bone assemblage will enable the study of species differences between and within certain sites. Pigs are rather poorly represented, which could be related to survival biases, yet there are several well preserved deposits without pig bones. The dearth of domestic birds and the absence of fish bones, similarly, cannot be blamed solely on the relative state of the bones. A large quantity of amphibian bones was produced from one deposit on Site 5, yet this produced no evidence of birds or fish. The survival of the former would surely suggest the possibility of survival of the latter two species groups.

4.8 Human Bone

The small size of the assemblage and its relatively poor state of preservation limits the research potential of the remains. However, the human skeletal remains from Sites 3 and 5 appear to represent individuals deriving from a rurally-based population, of which very few have been reported relative to those deriving from Roman urban populations.

The data includes three inhumation burials, which are incomplete due to the effectiveness of plough truncation, and a small number of disarticulated bones in non-funerary contexts. The latter probably derive from the known burials but may represent burials which have otherwise been completely destroyed.

Analysis of the cremated remains from Site 3 will provide further insight into ritual funerary practices. The weight and colour of the burnt bone have a bearing on aspects of cremation burial practice, including pyre technology and temperature, deposition, and taphonomy. The relatively large fragments of



cremated bone have the potential to determine if the person was adult or immature, and may permit assignation of sex. Identification of the fragments to body area will perhaps establish whether the cremation burial represents a complete individual or whether specific elements only are present, indicating the influence of possible selective processes.

4.9 Charred/waterlogged plant remains

The majority of the charred plant remains consist of cereal grains and chaff, mainly from hulled wheat and including spelt and possibly emmer. Most of this material represents virtually clean grain. There are very few charred weed seeds except for several rich assemblages from Site 5. There is considerable variability in the quantity and quality of the charred remains assemblages, which determine the potential of the material to investigate aspects of crop husbandry and processing, and the character of human activities taking place.

Most of the charred plant remains from the early/middle Iron Age were from Site 7 (with a little material also from Sites 3 and 8, and of an unrefined Iron Age date on Site 2). There were fairly large numbers of grains in some samples, yet virtually no chaff or weed seeds. This means that the economic data is likely to be mainly limited to the range of cereals grown and used at the site, rather than more detailed information on crop husbandry. Spatial plotting of the charred remains, however, may provide some indication of the areas of activity associated with the final cleaning and possibly cooking of the cereals.

The Roman period samples from Sites 2, 3 and 5 produced the richest and most diverse charred plant assemblages from the project, in particular from the late Roman period. There is potential for more detailed investigation of crop husbandry and processing activities at Site 5 based on the rich weed seed assemblages, though the charred remains from Sites 2 and 3 can only provide more basic data on crop husbandry.

Spatial plotting of the charred material may provide some indication of the possible uses/functions of different areas associated with crop-processing and food preparation. However, it is difficult to use charred plant assemblages to establish whether a settlement is a cereal producer or simply a consumer settlement. The rich waterlogged plant assemblages from Site 5 may also enable the reconstruction of the local environment during this period.

Fragmented charcoal was present in virtually all the samples, with potentially identifiable fragments from sixteen Iron Age and eleven Roman deposits. The amount of charcoal was very small in relation to the size of the samples, and may not be directly related to the use of the sampled feature, having been blown in from elsewhere on the site. However, identification of the charcoal may provide an indication of the range of woods being used as fuel, and therefore information on woodland resources and how they may have changed over time between the early Iron Age and the late Roman period.

Only Site 4 produced plant remains from post-Roman contexts, consisting mainly of a rich waterlogged assemblage with a potential to provide data on the character of the local environment. However, this sample came from a



deposit that may be very recent in date, and further analysis is unlikely to add to our knowledge of the local environment.

On a more general level, comparison between assemblages from different periods is limited because of the disparity in the amount of charred plant remains from each period. Only general comparisons are possible, such as the use of different crop types over time, and initial indications suggest that this does not vary significantly between periods or sites. However, the charred remains' interpretative value may achieve greater importance when combined with analysis of the other ecofacts and artefacts from the different sites.

4.10 Geoarchaeological Survey and Pollen

The auger survey has enabled the characteristics and formation processes of the channel fills on Site 7 to be examined and interpreted, and has raised questions regarding the prehistoric management of the channel course. However, the palaeoenvironmental potential of the deposits was fairly low, as organic preservation within the alluvium was poor. Oxidising conditions have removed virtually all trace of any plant macrofossils, and no identifiable molluscan remains were observed.

The deposits therefore hold little potential for assessing the on-site environmental conditions or for radiocarbon dating. However, pollen was preserved within the deposits, albeit in a degraded state. There is enough pollen, with a sufficient level of diversity, to warrant further analysis. The Research Framework for the Eastern Counties has identified the need for palaeoecological studies of dated alluvial sequences adjacent to settlement sites (Bryant 2000, 14). At least a partial reconstruction of the environment in which the Iron Age farmers lived will be possible.

4.11 Molluscan remains

The samples of marine/estuarine mollusc shells recovered from Sites 2, 3 and 5 are too small to justify detailed post-assessment study of size/age representation. Although the boring sponge *Cliona sp.* was occasionally present, the complete lack of encrusting flora or fauna also prevents any interpretation of the local ecology of the source area from which they were fished.

A substantial assemblage of terrestrial and freshwater snails, estimated at 2298 shells, was recovered, primarily from deposits dated to the early/middle Iron Age and the early, middle and late Roman periods. This is a useful assemblage with definite potential for further study, and will allow considerable interpretation of local environmental conditions.

There are seven unidentified taxa of terrestrial snails, together with the common and widespread genera *Vallonia* and *Cochlicopa*, and four unidentified taxa within the generally less abundant and diverse freshwater assemblage.

The dataset has moderate potential to indicate local environmental conditions, particularly in terms of drainage, vegetation and water quality. More limited



study of column samples from Site 2 (1 column) and Site 7 (2 columns) will allow comparison of the enclosure ditches, and will allow interpretation of local habitats in terms of drainage and vegetation.



	Objective	Relevant Site/s and why	Contextual	Pottery	Ceramic building material	Coins	Non-ceramic artefacts	Animal bone	Human bone	Charred plant remains	Pollen	Molluscs
Late Bronze Age/early Iron Age												
1	Is there evidence of settlement activity within the vicinity?	Residual pottery from pits (Site 8).	-	Low	-	-	-	-	-	-	-	-
Early/middle Iron Age												
1	What settlements can be identified?	Series of farmsteads (Site 7). Enclosure (Site 3).	High	Medium	-	-	Low	Medium	-	Medium	-	-
2	How were livestock being managed?	Farmsteads and faunal assemblage (Site 7).	Medium	-	-	-	-	Medium	-	-	-	-
3	Can we reconstruct the settlements' economic and environmental context?	Palaeochannel, molluscan and ecofactual evidence, esp. pollen (Site 7).	Medium	Medium	-	-	-	Medium	-	Medium	Medium	Medium
Roman												
1	What evidence is there of settlement activity?	Enclosures (Sites 2, 3 and 5). Buildings (Sites 2 and 5). Burial (Sites 3 and 5)	High	Medium	Low	Medium	Low	Medium	Low	Medium	-	-
2	What were the function and status of the settlements?	Enclosures (Sites 2, 3 and 5). Buildings (Sites 2 and 5). Animal bones and plant remains (Site 2, 3 and 5).	Medium	Medium	Low	Medium	Medium	Medium	-	Medium	-	-
3	What can we learn about the local currency and patterns of trade and exchange?	Large coin hoard and pewter plate (Site 5). Small coin hoard (Site 3).	Low	Medium	-	High	Medium	-	-	-	-	-
4	What can we learn about Roman burial practices?	Three inhumations (Site 5). One cremation (Site 3).	Medium	-	-	-	-	-	Low	-	-	-
5	Can we reconstruct the settlements' environmental context?	Clearance of trees, plough coulter, waterlogged deposits and pollen (Site 5). Molluscan and plant assemblages (Sites 2, 3 and 5).	Medium	-	-	-	Low	Low	-	Medium	Low	Medium
6	How is the transition from the Iron Age to the Roman period represented?	Enclosures (Sites 3 and 5). Pottery (Sites 2 and 5).	Low	Low	-	-	-	-	-	-	-	-
7	What happened to the landscape in the Saxon period?	Curated pottery (Sites 3 and 5)? Coins (Site 5)	-	Low	-	Low	-	-	-	-	-	-
Medieval												
1	How do the field systems compare with Oosthuizen's work?	Ditches and furrows throughout the road scheme.	Medium	-	-	-	-	-	-	-	-	-
Post-medieval and modern												
1	How was the land being used?	Ditches within Sites 2, 3, 4, 5 and 8. Moat within Site 4. Droveaways within Site 7.	Medium	Low	-	-	-	-	-	-	-	-

Table 12: Potential of recovered datasets to address the relevant original research objectives

Relevance of dataset	Definition
High	Dataset is able to contribute direct, significant and rare/unusual data which can expand our knowledge in this area.
Medium	Dataset can contribute direct data. This data will be relatively standard for this chronological period and region.
Low	Dataset has a relatively low potential to augment our knowledge of this subject. It may help to add to a database of 'less significant evidence' which, when combined, is useful in recognising patterns e.g. pottery assemblages, settlement types.
-	Dataset has no potential to provide any useful information on this subject.



5. RESEARCH OBJECTIVES FOR ANALYSIS – ALL SITES

5.1 Introduction

The research objectives for analysis include thirteen of the original objectives and eight new objectives (Tables 12 and 13). This section should be read in conjunction with these tables, which list the relevant sites and datasets for each objective.

5.2 Research Seminar

A research seminar was held on 28th March 2006 to discuss the results of fieldwork on this scheme in relation to recent developments in archaeological knowledge in this part of Cambridgeshire. The main points to emerge from this seminar were as follows.

Evidence for hoarding (pewter plate, iron plough coulter and two or three coin hoards) during the late Roman period suggests that economic and/or political instability affected this area, which may ultimately have led to the abandonment of late Roman settlement sites. A similar pattern is visible within contemporary remains at Cambourne (Kasia Gdaniec *pers. comm.*).

Cattle and sheep/goat remains dating to the Iron Age and Roman periods include those of neonate and young animals, confirming that these species were being bred locally. This evidence complements that of the enclosures and droveways on several sites along the road scheme. In addition, charred / waterlogged cereal remains suggest that crop cultivation may not have been the basis of the economy. These sources, plus the presence of clean grain (very few weed seeds), seem to point towards a livestock-based economy during these periods.

Parts of Margery's Roman Road 231 have been discovered at Love's Farm to the west (Mark Hinman *pers. comm.*) and Trinity Hall and New Hall, Cambridge to the east (Chris Evans *pers. comm.*). Traces of the effects of this highway on contemporary landscape boundaries within the road scheme were sought. However, the recorded land boundaries followed a predominantly NW-SE and NE-SW alignment, apparently dictated by an earlier, prehistoric landscape. This pattern will add to an established landscape model which Susan Oosthuizen has been developing for this region of Cambridgeshire (Oosthuizen 2006).

5.3 Late Bronze Age/early Iron Age

5.3.1 Is there evidence of settlement activity within the vicinity? (Bryant 2000, p.14.II)

A concentration of activity was noted on Site 8, which has provisionally been dated to the early/middle Iron Age. However, a small assemblage of residual late Bronze Age/early Iron Age pottery was recovered. Further analysis of this pottery will help to provide a more definite date for these features, and it will



also consider whether the pottery is indicative of late Bronze Age settlement activity nearby.

5.4 Early/middle Iron Age

5.4.1 What settlements can be identified? (Bryant 2000, p.14.II and III)

Research will focus on determining the lifespan of the farmsteads on Site 7, and whether the contextual assessment that they were all contemporary is correct. Analysis of the artefactual and ecofactual evidence will help to determine the level of occupation, and perhaps whether they were occupied on a permanent or merely seasonal basis.

Pottery from the enclosure on Site 3 will be considered in assessing whether the enclosure was solely for agricultural use, or whether there are any indications of nearby settlement.

5.4.2 How were livestock being managed? (Bryant 2000, p.14.II)

The age data from the faunal assemblage could provide evidence regarding local breeding, plus the priority given to the production of meat, as opposed to secondary products. The greater proportion of cattle may be related to the local terrain. Work done on Iron Age animal bone assemblages from sites in the Thames valley (Wilson *et al.* 1978, p.136 and Grant 1984, p.109) strongly suggests a link between cattle quantities and the availability of water, and therefore of suitable pasture.

Consideration will be given to the paddocks identified on Site 7, and whether the enclosures were used for humans or animals. Site 7 also contained a number of possible windbreaks or animal pens, and comparable features from other sites will be sought to help determine how they might have been used.

5.4.3 Can we reconstruct the settlements' economic and environmental context? (Bryant 2000, p.14.II)

The charred plant assemblages from Sites 2, 3 and 7 can provide basic data on crop husbandry and diet. The analysis will consider whether grain was being produced on site or imported from elsewhere.

The identification of charcoal fragments can provide information on woodland resources and their exploitation during this period, and further analysis of the pollen from the palaeochannel on Site 7 will help to assess whether the area was wooded or primarily open.

Full identification and quantification of the molluscan assemblages will allow interpretation in terms of soil chemistry, drainage and vegetation, with much more limited comment on water quality.

5.4.4 Were discrete areas defined for different types of land use? (Bryant 2000, p.17.IV)

The contextual data suggest that the farmsteads on Site 7 comprised domestic enclosures with paddocks attached. The ceramic and non-ceramic assemblages



will help to determine if the separation was this simplistic. Spatial analysis of artefacts such as pottery, fuel ash slag, the loom weight and the chalk weight or whorls from Site 7 may reveal which areas were used for domestic activity.

The faunal assemblage revealed no obvious variations between different areas of Site 7, but a more detailed analysis may reveal such variations, and may be informative concerning the status of the various farmsteads.

5.4.5 Was there a defensive element to the Site 7 enclosures? (Haselgrove et al. (eds) 2001, p.9)

The size of the enclosure ditches on Site 7, coupled with the banks that would have accompanied them, superficially suggest a defensive element. The analysis will focus on whether this is likely, or whether they had a more symbolic function. Is it feasible to suggest that they had a dual function of providing defence from flooding?

The spatial distribution of artefactual and ecofactual remains will be studied in order to discuss and assign the activity types which took place within these enclosures.

5.4.6 Can the pottery help to develop the Cambridgeshire type series? (Bryant 2000, p.16.IV)

The research seminar highlighted the fact that the Cambridgeshire ceramic type series is currently poorly understood. There is a strong possibility that conservative pottery production meant that vessel types were retained for longer than currently believed, meaning that sites may be later than first thought. The assemblage from this project will provide more material for comparison.

Petrology on East Anglian fabrics has met with limited success in the past, due to the unchanging nature of the clay matrix over large areas. However, for the fabrics with shell or other diagnostic inclusions, thin section analysis is often helpful in assigning a source. Work will focus on the shell-tempered Iron Age fabrics from Site 7 and suitable Roman fabrics from Sites 2, 3 and 5. This will build on previous thin section analysis undertaken in the area by Alan Vince and David Williams.

5.5 Roman

5.5.1 What evidence is there of settlement activity? (Going and Plouviez 2000, p.19.II)

Indirect evidence for buildings is provided by the assemblage of nails (Sites 2, 3 and 5) and building fasteners, fittings, structural timber and ceramic tiles (Site 5). The size of the pottery and animal bone assemblages is indicative of settlement. The number of non-hoard coins recovered is also relatively high, and the presence of burials on Sites 3 and 5 confirm nearby settlement.



Further analysis of these assemblages will help to determine whether the settlement activity took place on Sites 2, 3 and 5, or was merely located nearby.

5.5.2 What were the function and status of the settlements? (Taylor 2002, p.10)

There is a problem concerning the possible overrepresentation of cattle within the animal bone assemblage, yet a number of well preserved deposits could perhaps provide a test of the actual proportion of cattle represented. The presence of foetal animals offers clear evidence for local stock breeding. The overall age study will suggest which products were the most important at these sites, suggesting then whether, for example, cattle were mainly used for traction (pointing to the importance of crop production) and sheep for wool.

The charred plant remains from Sites 2, 3 and 5 may provide information on the use/function of individual sampled features, while spatial plotting of these remains may establish the possible uses/functions of different areas of the sites associated with crop-processing and food preparation. The charred remains as a whole, however, cannot be used on their own to establish the function/status of the actual settlements, i.e. whether cereal is being produced or simply consumed.

Further investigation is required into the possibility that Site 5 had a military association. The small spearhead and 'bell-shaped' stud that were recovered from it are more common on military sites than on rural ones, and comparison with other sites may reveal whether the site perhaps belonged to military veterans.

The number of coins recovered from non-hoard contexts on Site 5 is relatively high for a rural site. Consideration of the other artefact assemblages may indicate whether the site had any market-related function.

5.5.3 What can we learn about the local currency and patterns of trade and exchange? (Taylor 2001, p.55-56)

The coin hoards and stray coins from Sites 3 and 5 will assist in a reconstruction of the settlements' economy and trading links. Valuable items such as the plough coulter and pewter plate are perhaps evidence of investment in portable wealth rather than in buildings.

5.5.4 What can we learn about Roman burial practices? (Going and Plouviez 2000, p.19.II)

Very few human remains dating to the Romano-British period have been recovered from rural sites. The human bone will add to our knowledge of Romano-British burial and cremation practices and their local distribution.

5.5.5 Can we reconstruct the settlements' environmental context? (Going and Plouviez 2000, p.21.IV)

There is likely to have been a link between tree clearance and agriculture; this is particularly likely on Site 5. The animal bone assemblage might reveal



whether the cattle following the tree clearance phase were dominated by older individuals, which were more suitable for ploughing.

Full identification and quantification of the molluscan assemblages will allow interpretation in terms of soil chemistry, drainage and vegetation, with much more limited comment on water quality.

A reconstruction of the nature of the local environment during the Roman period can be undertaken using the rich waterlogged plant assemblages from Site 5. The identification of charcoal fragments can also provide complementary information on woodland resources and their exploitation during this period. Analysis of the waterlogged deposits from the quarry pit on Site 5 will include an appropriate level of work on surviving pollen.

The charred plant remains may provide economic data and information on crop husbandry with detailed information from a few rich weed assemblages from Site 5.

5.5.6 How is the transition from the Iron Age to the Roman period represented? (English Heritage 1997, p.44)

Recent studies have tended to identify continuity of Iron Age settlements into the Roman period. This conspicuously seems not to have been the case on any of the sites in this project.

The pottery assemblage, particularly from Site 2, will be examined for evidence that any of the Roman enclosures had their origins in the late Iron Age. A small amount of late Iron Age pottery and a few registered artefacts dated to the 1st century AD were recovered from Site 5, and the possibility that these are an indication of earlier activity will be considered.

5.5.7 What happened to the landscape in the Saxon period? (Going and Plouviez 2000, p.22.IV)

No features were identified which were obviously Saxon in date. However, the latest coin recovered from the project was dated to AD402, and the possibility of curated pottery will be considered. Further contextual analysis may reveal whether AL511 on Site 5 represents a period of post-Roman use.

5.5.8 Can any developing trends in agricultural practices be detected? (Going and Plouviez 2000, p.21.IV)

There is good evidence for an increase in the size of particular domestic stock by the early Roman period (Maltby 1981, p.185), suggesting either an improvement in husbandry practises and/or the introduction of larger stock. A large proportion of cattle in the early Roman period can be related to Romanising influences (King 1984, p.190). The few measurements available from the Iron Age and Roman animals within the recovered assemblage will be analysed to see if any evidence for this change can be detected.



Comparison of the plough coulter from Site 5 with ones from other sites, including Cambourne, will hopefully reveal its significance, and whether it marked a change in the agricultural use of the land.

5.5.9 What was the diet of the people who lived here? (Going and Plouviez 2000, p.21.IV)

The presence of young calves could be indicative of high status meats. Consideration will be given to whether the remainder of the animal bone assemblage came from animals that were used for food or for ploughing, wool etc.

The charred plant assemblage may be able to provide basic data about the level of grain consumption.

A relatively high number of pottery vessels with holes in their bases were recovered. It has been suggested that such vessels were used for manufacturing cheese; comparison with assemblages from other sites may be able to confirm or deny this explanation.

5.5.10 Are the enclosures and ladder settlements comparable with other examples known regionally? (Taylor 2002, p.26)

Comparisons with animal bone and charred plant assemblages from contemporary sites in this general area will be necessary.

The ladder settlements will be compared with other examples from this region and beyond. This will reveal whether their usage for a mixture of agriculture and settlement on Sites 3 and 5 is usual. It may also reveal what related remains might be expected beyond the northern and southern limits of excavation on these two sites.

5.5.11 What significance do the structured deposits have? (Going and Plouviez 2000, p.19.II)

Further analysis and comparison with other sites is needed for the two coin hoards (Site 3 and 5) and the pewter plate and plough coulter (Site 5). Was their deposition related to the disturbances in the late 3rd /early 4th century? Comparison with similar deposits found at Cambourne will be particularly important.

5.5.12 Can the pottery help to refine the Cambridgeshire type series? (Brown and Glazebrook 2000, p.65)

The Cambridgeshire type series for the Roman period is relatively well understood, but the sizeable assemblage from this project will provide further material for comparison, and will assist in charting the geographical range of certain pottery types.



5.6 Medieval

5.6.1 How do the field systems compare with Oosthuizen's work? (Oosthuizen 2006)

Oosthuizen has identified patterns of contemporary field boundaries in the Bourn Valley that, in some cases, have their origins in the late prehistoric period. The patterns of alignment and the reasons behind them will be considered in light of her research, perhaps proving able to provide a more reliable date for the field systems encountered on Site 1, in the vicinity of Site 4, in trial trenches elsewhere within the road scheme.

5.7 Post-medieval and modern

5.7.1 How was the land being used? (Courtney 2002, p.17)

The post-medieval remains will be analysed to determine whether they represent a continuation of medieval systems of land use, or follow new alignments. A study of historical map evidence will provide useful comparative data.

The moat on Site 4 will be compared with similar garden features on sites within the region.



	Objective	Relevant Site/s and why	Contextual	Pottery	Ceramic building material	Coins	Non-ceramic artefacts	Animal bone	Human Bone	Plant remains	Pollen	Molluscs
Late Bronze Age/early Iron Age												
1	Is there evidence of settlement activity within the vicinity?	Residual pottery from pits (Site 8).	-	Low	-	-	-	-	-	-	-	-
Early/middle Iron Age												
1	What settlements can be identified?	Series of farmsteads (Site 7). Enclosure (Site 3).	Medium	Medium	-	-	Low	Medium	-	Medium	-	-
2	How were livestock being managed?	Farmsteads and faunal assemblage (Site 7).	Medium	-	-	-	-	Medium	-	-	-	-
3	Can we reconstruct the settlements' economic and environmental context?	Palaeochannel, molluscan and ecofactual evidence, esp. pollen (Site 7).	Medium	Medium	-	-	-	Medium	-	Medium	Medium	Medium
4	Were discrete areas defined for different types of land use?	Pits, roundhouses, other structures and faunal assemblage (Site 7).	Medium	Medium	-	-	-	Medium	-	Medium	-	-
5	Was there a defensive element to the Site 7 enclosures?	Large early/middle Iron Age enclosure ditches (Site 7).	Medium	-	-	-	-	-	-	Low	-	-
6	Can the pottery help to refine the Cambridgeshire type series?	Early/middle Iron Age pottery (Site 7; also Sites 3 and 8). This section analysis may be used on both the Roman and Iron Age assemblages.	-	Medium	-	-	-	-	-	-	-	-
Roman												
1	What evidence is there of settlement activity?	Enclosures (Sites 2, 3 and 5). Buildings (Sites 2 and 5). (Burials Sites 3 and 5)	Medium	Medium	Low	Medium	Low	Medium	-	Medium	-	-
2	What were the function and status of the settlements?	Enclosures (Sites 2, 3 and 5). Buildings (Sites 2 and 5). Animal bones and plant remains (Site 2, 3 and 5).	Medium	Medium	Low	Medium	Medium	Medium	Low	Medium	-	-
3	What can we learn about the local currency and patterns of trade and exchange?	Large coin hoard and pewter plate (Site 5). Small coin hoard (Site 3).	Low	Medium	-	High	Medium	-	-	-	-	-
4	What can we learn about Roman burial practices?	Three inhumations (Site 5). One cremation (Site 3).	Medium	-	-	-	-	-	Low	-	-	-
5	Can we reconstruct the settlements' environmental context?	Clearance of trees, plough coulter, waterlogged deposits and pollen (Site 5). Molluscan and plant assemblages (Sites 2, 3 and 5).	Medium	-	-	-	Low	Low	-	Medium	Low	Medium
6	How is the transition from the Iron Age to the Roman period represented?	Enclosures (Sites 3 and 5). Pottery (Sites 2 and 5).	Low	Low	-	-	-	-	-	-	-	-
7	What happened to the landscape in the Saxon period?	Curated pottery (Sites 3 and 5)? Coins (Site 5)	Low	Low	-	Low	-	-	-	-	-	-
8	Can any developing trends in agricultural practices be detected?	Fields systems (Site 5, also Site 3). Plough coulter and animal bone assemblage (Site 5).	Medium	-	-	-	Medium	Medium	-	Low	Low	Low
9	What was the diet of the people who lived here?	Animal bone / CPR (mainly Sites 3, 5 and 7).	Medium	-	-	Low	Low	Low	-	Low	-	-
10	Are the enclosures and ladder settlements comparable with other examples known regionally?	Site 5, also Sites 2 and 3.	Medium	-	-	-	-	-	-	-	-	-
11	What significance do the structured deposits have?	Pottery dump, pewter plate, plough coulter and coin hoard (Site 5).	Low	Low	-	Medium	Low	Low	-	-	-	-
12	Can the pottery help to refine the Cambridgeshire type series?	Pottery assemblage (Site 5).	-	Low	-	-	-	-	-	-	-	-
Medieval												
1	How do the field systems compare with Oosthuizen's work?	Ditches and furrows throughout the road scheme.	Medium	-	-	-	-	-	-	-	-	-
Post-medieval and modern												
1	How was the land being used?	Ditches (Sites 2, 3, 4, 5 and 8). Moat (Site 4). Drove ways (Site 7).	Medium	Low	-	-	-	-	-	-	-	-

Table 13: Research objectives for analysis and potential of datasets

Relevance of dataset	Definition
High	Dataset is able to contribute direct, significant and rare/unusual data which can expand our knowledge in this area.
Medium	Dataset can contribute direct data. This data will be relatively standard for this chronological period and region.
Low	Dataset has a relatively low potential to augment our knowledge of this subject. It may help to add to a database of 'less significant evidence' which, when combined, is useful in recognising patterns e.g. pottery assemblages, settlement types.
-	Dataset has no potential to provide any useful information on this subject.



6. UPDATED PROJECT DESIGN

6.1 Introduction

This section provides a task list for the analysis, publication and archiving programme.

Table 27 provides a summary of all tasks. Table 28 describes the project team and lists their initials and Table 29 is a Gantt chart detailing the proposed timescales for completion of each key stage in the project.

6.2 Analysis of Contextual Data

6.2.1 Liaison meetings

Ongoing discussion will take place between the principal members of the project team throughout the analysis and publication stages. These will involve discussion over the nature of the work required, commissioning of the work and addressing any queries that come up during the course of the project.

6.2.2 Analysis of HER and historical maps

The Historic Environment Record will be examined to provide background information on known Iron Age, Roman and medieval archaeological sites in the vicinity. All available historic maps will be examined in an attempt to correlate archaeological features located within the investigation area to features on the maps.

6.2.3 Computerisation of archive

The quantity of the datasets means it would benefit from computerisation. Albion operates a fully integrated computer-based system of structural analysis using databases (through Access) and a mini GIS (Gsys) for interrogation. Basic contextual information has been entered into a database table and has been successfully utilised within this report.

The digitised all features drawing produced for the assessment will require checking and correcting to ensure it is linked correctly with the contextual database. Once this is complete, the drawings are fully interrogatable and manipulable by any database table.

Once achieved, it will be possible to rapidly interrogate data sets within the Gsys programme. For example, it would be possible to plot the distribution of specific find types, or all features which are considered to be contemporary etc. This type of interrogation will greatly enhance the analysis of data and is, therefore, likely to assist in the interpretation of the archaeological remains. It also enables basic publication figures to be produced rapidly.

Any relevant historical maps will be geo-referenced and digitised to permit examination with the all features drawing.

6.2.4 Sub-group and group analysis

Each context will be assigned to a single sub-group, consisting of one or more (usually several) contexts that are closely related both stratigraphically and interpretatively. The sub-group to which each is assigned will be determined by analysis of the primary contextual information, specifically context sheets and section drawings that were produced on site.

The fills of features will be assigned to separate sub-groups from their cuts. The only exceptions to this are for deposits interpreted as packing or lining, and for primary fills that formed only a short time after the feature was constructed. For deep features that may have filled up over a long period of time, more than one sub-group will be used in order to separate their lower and upper fills.

Cuts/deposits will be classified as:



- ◆ Construction (post-packing and default code for all cuts)
- ◆ Naturally derived infilling
- ◆ Deliberate infilling

The sub-group allocation for each context will be entered into the contextual database table. A sub-group text will then be written directly into the sub-group database table so that it can be easily accessed. It will contain a factual, descriptive section as well as an interpretative section, setting out the rationale behind the definition of the sub-group. It is not envisaged that sub-group plans will be produced, but this information will be available via the relational database tables.

Any sub-groups which have limited or no further analytical value (e.g. features/deposits of geological origin) will not be subject to any further analysis. Each remaining sub-group will be assigned to a single group representing a higher level of interpretation. It is likely that most groups will comprise multiple sub-groups that are all similar both stratigraphically and interpretatively.

When assigning sub-groups to groups, the artefactual and ecofactual assemblage recovered from each sub-group will be considered. This will identify any that contained significant assemblages which may need to be referred to in detail in the descriptive section of the publication text. Such sub-groups will be separated out at group level. For example, the sub-groups for four ditches that formed an enclosure and had sterile fills might all be assigned to G4, yet if one contained a large amount of pottery, then this would be assigned to G5 and the sub-groups for the other three to G4.

The assessment of the Caxton-Hardwick data suggests that the construction and primary fill sub-groups will be assigned to the following group types:

- ◆ Enclosure
- ◆ Pit cluster
- ◆ Structure
- ◆ Droveaway
- ◆ Burials
- ◆ Single feature
- ◆ Isolated features, including pits and postholes
- ◆ Tree throw holes
- ◆ Furrows
- ◆ Boundary/roadside ditches

Sub-groups containing non-primary fills will be assigned to separate groups, in order to reflect the likelihood that these may be considerably later in date than the construction/primary fill groups, and would therefore need to be analysed separately. However, to ensure that their spatial location is easily identifiable, they will be issued a group number comprising a decimal point of the 'containing' group. For example, the non-primary fills of enclosure G7 would be assigned to G7.1.

The group allocation for each sub-group will be entered into the sub-group database table. A group text will then be written directly into the group database table, so that it can be easily accessed. It will contain a descriptive section as well as an interpretative section. It will form the basis for any detail required in the descriptive section of the publication text. It is not envisaged that group plans will be routinely produced, but this information will be available via the relational database tables.

1.1.1 Landscape and phase analysis

Any groups which have limited or no further analytical value (e.g. features/deposits of unknown date) will not be subject to any further analysis. Each remaining group will be assigned to a higher level of interpretation known as a landscape. The assessment of the



Caxton-Hardwick data suggests that the construction and primary fill groups will be assigned to the following landscape types:

- ◆ Farmstead
- ◆ Enclosure system
- ◆ Field system
- ◆ Enclosure with settlement activity
- ◆ Drove way
- ◆ Boundary markers
- ◆ Tree throws

Landscapes will be composed of groups that are stratigraphically similar, and which combine to form a coherent unit of contemporary land use. Groups containing non-primary fills will usually be assigned to either the same landscape as their cuts, or to a landscape that truncates them, whichever is chronologically and interpretatively more closely related. However, if groups containing only non-primary fills are assigned their own landscape, they will be issued a landscape number comprising a decimal point of the 'containing' landscape, to ensure that their spatial location is easily identifiable. For example, the non-primary fills of L4 might be assigned to L4.1.

The landscape allocation for each group will be entered into the group database table. A landscape text will then be written directly into the landscape database table so that it can be easily accessed. It will contain a descriptive section as well as an interpretative section. A plan will be produced for each landscape, with the location of all relevant groups marked.

Each landscape will be assigned to a higher level of interpretation known as a phase, which may contain one or more landscapes. Each phase will be composed of landscapes that are broadly contemporary, and will represent the sum total of archaeological remains at a given stage in the site's development. Each phase will, in turn, be assigned to a chronological period. The period titles and numerical codes for these are described in Section 3.1, Table 2.

The phase allocation for each landscape will be entered into the landscape database table. A phase text will be written directly into the phasing database table so that it can be easily accessed. It will contain a descriptive section as well as an interpretative section, and will form the basis for the site narrative section of the publication text. A plan will be produced for each phase, with the location of all relevant landscapes marked.

The completion of the landscape and phase analysis represents a key stage in the analytical programme, and is the precursor to the production of publication text and illustrations.

◆KEY STAGE 1

6.2.5 Phasing/publication liaison

Once the provisional phasing is determined, it will be examined in light of the pottery assemblage. When the phasing has been checked, the various specialists will be informed. Each will receive a report known as *Final Phasing Information for Specialist*. This will include the phasing hierarchy, format of their publication text (with a guide number of words), and other information that they may require.

◆KEY STAGE 2

Task	Staff	Days
Liaison, meetings and technical correspondence	PM PO/AS Illust	10
Analysis of HER and historical maps	AS CT	10 5



Task	Staff	Days
Computerisation	PO/AS	10
Sub-group and group analysis	PO/AS	40
Landscape and phase analysis	PO/AS	25
Assistance with analysis	PM	10
◆ KEY STAGE 1		
Phasing/publication liaison	PO/AS/ PM	10
◆ KEY STAGE 2		

Table 14: Summary of structural analysis tasks

6.3 Analysis of Pottery

6.3.1 Quantification and recording

The pottery will be laid out in context order. It will be quantified by minimum vessel and sherd count, and weight. Fabrics have been provisionally identified according to the Bedfordshire Ceramic Types Series. For analysis, a type series more compatible with previously excavated ceramic assemblages in Cambridgeshire will be used. All attributes such as decoration, evidence of function (sooting, wear marks etc.), and manufacturing techniques (firing characteristics etc.) will be recorded. All quantified data will be entered onto the relevant table within the site database.

6.3.2 Production of technical text

A detailed description will be produced of the pottery recovered, including fabric and form definitions. Selection of pottery vessels for publication-standard illustration will be made at this juncture. The criteria for the selection of illustrated pottery vessels will be as follows:

- all fabrics and forms previously unknown in the county and therefore unpublished
- better examples of those types already published
- vessels from specific features or groups of features
- vessels associated with specific structures
- vessels of intrinsic interest

◆KEY STAGE 1

6.3.3 Phasing/publication Liaison

See structural analysis section.

6.3.4 Publication text

A specialist text will be produced, summarising the pottery assemblage within appropriate chronological periods by fabric type, forms, decoration and attribute. The text will refer to comparative assemblages (published or unpublished). In addition, and where appropriate, the pottery assemblage from individual elements of the structural hierarchy i.e. landscapes and groups will be discussed.

6.3.5 Illustration

Illustration of the pottery selected for inclusion in the technical text will be carried out by the Illustrator, in consultation with the artefact analyst.



◆KEY STAGE 2

Task	Staff	Days
Pottery quantification and recording	SP/AL	12
Pottery technical report (1) (Without phasing/integrated text)	SP/AL	10
Pottery publication/high level report (2)	SP/AL	10
Thin section analysis	EXT PM	n/a 3
Obtaining clay samples for thin section analysis	AS	1
◆ KEY STAGE 1		
Add phasing/integrated text to pottery technical report (1)	SP/AL	5
Pottery publication/high level report (2) and review of results from other data-sets	SP/AL	5
Pottery Illustration	Illust SP/AL	10 3
◆ KEY STAGE 2		

Table 15: Summary of ceramic analysis tasks

6.4 Analysis of Ceramic Building Material

6.4.1 Quantification and recording

Ceramic building material (CBM) will be laid out in context order, and will be quantified by fragment count and weight. Any complete or measurable dimensions of CBM fragments will be noted. All quantified data will be entered onto the relevant table within the site database.

6.4.2 Production of technical text

A detailed description will be produced of the CBM recovered, including fabric and form definitions. Selection of CBM fragments for publication-standard illustration will be made at this juncture.

◆KEY STAGE 1

6.4.3 Phasing/publication Liaison

See structural analysis section.

6.4.4 Publication text

A specialist text will be produced, summarising the CBM assemblage by type/forms.

◆KEY STAGE 2

Task	Staff	Days
CBM quantification and recording	AO	2
CBM technical report (1)	AO	1
◆ KEY STAGE 1		
Phasing/publication liaison: CBM	PO/AS	1



Task	Staff	Days
CBM publication/high level report (2)	AO	1
◆ KEY STAGE 2		

Table 16: Summary of CBM analysis tasks

6.5 Analysis of Coins

6.5.1 Childerley Gate Coin Hoard

To achieve the archaeological and numismatic objectives, only 20% of the coins will be mechanically cleaned and identified. This will be a statistically representative sample of the hoard, and is a practical solution to the problem of cleaning and identifying thousands of late-3rd century, copper alloy, barbarous radiates. The sample will be as representative of the hoard as possible, and the coins selected will be drawn proportionally from the four excavated spits (including the coins examined in the assessment).

◆ KEY STAGE 1

The final publication report on the hoard (to be mounted on the internet-based journal *Coin Hoards of Roman Britain*) will consist of the following elements:

- a full list of the 20% sample, using the standard works of reference for identifications;
- a discussion of the hoard from the local archaeological and numismatic perspective;
- a comparison of this assemblage with similar late-3rd century hoards;
- an analysis of the distribution of these hoards and a discussion of the nature of copying and the role of barbarous radiates.

◆ KEY STAGE 2

6.5.2 Bourn Airfield Coin Hoard

The coins will be cleaned based on the recommendations given in Appendix 14. Not all of every coin will require cleaning, and the project numismatist and conservator will liaise closely to ensure that the cleaning is completed as effectively and efficiently as possible.

◆ KEY STAGE 1

The final coin report (to be mounted on the internet-based journal *Coin Hoards of Roman Britain*) will consist of the following elements:

- a full list of coins using standard works of reference for identifications;
- brief summaries of the coins;
- discussion of the Bourn Airfield hoard in relation to the Childerley Gate hoard and other dispersed coins from Sites 3 and 5. This discussion will cover their dating, reasons for deposition and comparison with other contemporary Romano-British hoards.

◆ KEY STAGE 2

6.5.3 Non-Hoard Coins

The non-hoard coins will be cleaned based on the recommendations given in Appendix 15. Not all of every coin will require cleaning, and the project numismatist and conservator will liaise closely to ensure that the cleaning is completed as effectively and efficiently as possible.

◆ KEY STAGE 1

The final coin report will consist of the following elements:



- a full list of coins using standard works of reference for identifications;
- brief summaries of the coins from Site 3;
- detailed discussion of the coins from Site 5;
- comparison of the Site 5 non-hoard coins with other excavated assemblages from Romano-British sites in the region.

◆KEY STAGE 2

6.5.4 All Coins

Task	Staff	Days
Coin quantification and recording	PG	30
Selected cleaning of Childerley Gate Hoard, Bourn Airfield Hoard and all non-hoard coins	PP	39
Identification of cleaned coins and preparation of catalogue and publication report	PG	13
◆KEY STAGE 1		
Phasing/publication liaison: coins	PM	1
Coins publication/high level report (2)	PG	1
◆KEY STAGE 2		

Table 17: Timescale for post-excavation conservation, numismatic identification and analysis

6.6 Analysis of Other Artefacts

6.6.1 Investigative Conservation

The conservation assessment of the material submitted for x-ray and stabilisation (Appendix 17) indicates that the potential to clarify the form and structure of the possible plough coulter (RA50076) and the socketed object (RA50067) is good. This work will be carried out by the Conservation Department of Lincolnshire County Council.

6.6.2 Narrow Term identification

Each object will be assigned a narrow term, and, where applicable, a date range. This information will be established by an examination of each object, noting:

- form
- method of manufacture
- material and source
- presence of diagnostic features
- condition
- selected parallels from comparable sites
- comparison with ceramic data from the site

Full catalogue descriptions will be entered on to the project database.

The worked stone will be submitted to a petrologist for identification of stone type and source. The remainder of the other artefacts assemblage will be analysed in-house.

◆KEY STAGE 1

6.6.3 Phasing/publication liaison

See structural analysis section.



6.6.4 Publication text

Following phasing confirmation, the artefact assemblage will be discussed by site within chronological periods, with reference to the spatial framework (Landscapes and Groups) of the site. Discussions will include reference to published parallels, object function with reference to activities (e.g. crafts, agriculture), economic status and deposition patterns. Objects for illustration in phase groups will be selected at this juncture. Integration of external specialist report(s) will also be undertaken.

6.6.5 Illustration

Illustration of the material selected for inclusion in the publication will be carried out by the Illustrator in consultation with the artefact analyst. This task will include mock-ups and paste-ups for the final publication.

◆KEY STAGE 2

Task	Staff	Days
Other artefacts narrow term identification	AM	20
Other artefacts – petrology	EXT	1
Other artefacts – investigative conservation	AM	n/a
◆ KEY STAGE 1		
Phasing/publication liaison: other artefacts	PO/AS	1
Other artefacts publication/high level report (2)	AM	2
Other artefacts illustration	ILL AM	10 3
◆ KEY STAGE 2		

Table 18: Summary of Other Artefacts analysis tasks

6.7 Analysis of Animal Bone

6.7.1 Quantification and recording

Further analysis will concentrate on the Iron Age assemblages from Sites 7 and 8, and the Roman assemblages from Sites 3 and 5. These will be fully recorded, taking account of quantity (refitting when possible), species, skeletal part, side, fragmentation (referring to the proportion of the skeletal part represented), age (mandibles and epiphysis fusion) and size (measurements of all whole limb bones and of the later fusing articular ends). This will be recorded onto an Access database, created by MoLSS.

6.7.2 Production of technical text

A detailed description will be produced of the animal bone recovered.

◆KEY STAGE 1

6.7.3 Phasing/publication Liaison

See structural analysis section.

6.7.4 Publication text

The publication text will only be prepared on receipt of the final phasing structure. It will discuss the species present within each phase, along with other significant aspects such as mortality rates, metrical data, butchery etc. If significant assemblages of animal bone are recovered from individual landscapes or groups, they will be discussed individually.



◆KEY STAGE 2

Task	Staff	Days
Animal bone quantification and recording	KR	8
Animal bone technical report (1)	KR	4
◆KEY STAGE 1		
Phasing/publication liaison: animal bone	PM	1
Animal bone publication/high level report (2)	KR	2
◆KEY STAGE 2		

Table 19: Summary of animal bone analysis tasks

6.8 Analysis of Human Bone

6.8.1 Quantification and recording

The human remains will be fully recorded to recognised standards, in order to establish accurate age and sex estimates and record skeletal and dental pathology. Bone from non-funerary contexts will be examined to try to determine whether it derives from the identified burials or from graves that have otherwise been destroyed. Closer examination of the cremated remains may help to assign a stronger indication of sex and a closer estimation of age-at-death. Any pathology will be recorded.

6.8.2 Production of technical text

A detailed description will be produced of the human bone recovered.

◆KEY STAGE 1

6.8.3 Phasing/publication Liaison

See structural analysis section.

6.8.4 Publication text

The publication text will only be prepared on receipt of the final phasing structure. It will discuss both the funerary and non-funerary deposits.

◆KEY STAGE 2

Task	Staff	Days
Human bone quantification and recording and technical report (1)	RM	3
◆KEY STAGE 1		
Phasing/publication liaison: human bone	PO/AS	1
Human bone publication/high level report (2)	RM	1
◆KEY STAGE 2		

Table 20: Summary of human bone analysis tasks



6.9 Analysis of Charred/Waterlogged Plant Remains

6.9.1 Quantification and recording

The plant remains will be identified using a binocular microscope, the seed reference collection housed in the Environmental Section, MoLSS and seed reference manuals (Berggren 1981; Beijerinck 1947).

The charred plant remains (seeds, fruits and chaff fragments) will be extracted and quantified in absolute numbers, with the exception of small cereal fragments (less than 2mm), charcoal, stem fragments and indeterminate plant items. The quantity of these remains will be estimated using the following codes: + = 1-10; ++ = 11-100; +++ = 101-250; ++++ = 250+ items. The rich cereal remains from the Roman sample <2007> (Site 2) will be only partially sorted (using a riffle-box), though the remaining fraction will be scanned for additional species.

The rich waterlogged assemblages from Site 5 will be scanned, and approximate abundance of different species recorded using the rating system above. Only unusual or not readily identifiable remains will be extracted. The results will be entered onto an Oracle database system, and species lists generated by site.

Further soil will be processed from the four samples from Site 5 that produced rich charred weed seed assemblages, and from the six samples from Site 5 that contained rich waterlogged plant assemblages.

The charred plant remains may be stored dry, although 'waterlogged' remains require storage in suitable air-tight sealed containers together with industrial methylated spirits (IMS), with the contents being checked from time to time to ensure that the material is not drying out.

6.9.2 Production of technical text

A detailed description will be produced of the charred/waterlogged plant remains recovered.

◆KEY STAGE 1

6.9.3 Phasing/publication Liaison

See structural analysis section.

6.9.4 Publication text

The publication text will be prepared on receipt of the final phasing structure. It will detail the analysis of selected samples and incorporate the results of the assessment. Ethnographic work on traditional crop-processing practices (Hillman 1981, 1984) will be used in the interpretation of the charred plant assemblages. Consideration will also be given to previous archaeobotanical work carried out in this area and the region as a whole from the Bronze Age to late Roman period.

◆KEY STAGE 2

Task	Staff	Days
Charred/waterlogged plant remains quantification and recording	JG	18
Charred/waterlogged plant remains technical report (1)	JG	8
◆ KEY STAGE 1		
Phasing/publication liaison: charred/waterlogged plant remains	PM	3



Task	Staff	Days
Charred/waterlogged plant remains publication/high level report (2)	JG	6
◆ KEY STAGE 2		

Table 21: Summary of charred/waterlogged plant remains analysis tasks

6.10 Analysis of Molluscan Remains

6.10.1 Quantification and recording

Selected terrestrial and freshwater mollusc assemblages will be identified to species-level, following Cameron and Redfern 1976; and Macan 1977. They will then be quantified as numbers of individual shells for each taxon within each sample group. Nomenclature and ecological interpretation will follow Kerney 1999.

6.10.2 Production of technical text

A detailed description will be produced of the molluscan remains recovered.

◆ KEY STAGE 1

6.10.3 Phasing/publication Liaison

See structural analysis section.

6.10.4 Publication text

The publication text will be prepared on receipt of the final phasing structure. It will detail the analysis of selected samples and incorporate the results of the assessment.

◆ KEY STAGE 2

Task	Staff	Days
Molluscan remains quantification and recording	AP	8
Molluscan remains technical report (1)	AP	4
◆ KEY STAGE 1		
Phasing/publication liaison: molluscan remains	PO/AS/	1
Molluscan publication/high level report (2)	AP	2
◆ KEY STAGE 2		

Table 22: Summary of molluscan remains analysis tasks

6.11 Analysis of Pollen Remains

6.11.1 Quantification and recording

Sub-samples of 2ml volume will be taken from samples collected from the Site 5 quarry pit, and will be prepared using standard procedures for the extraction of sub-fossil pollen and spores (Moore and Webb 1978 and Moore *et al.* 1991). On Site 7 the pollen slides already prepared for the assessment will be used.

Identification will be carried out using an Olympus biological research microscope fitted with Leitz optics and phase contrast. Pollen counts of 400 grains per level will be made, if possible,



plus all extant marsh/aquatic taxa and spores of ferns. Absolute pollen frequencies will be calculated using added exotics to known volumes of sample (Stockmarr 1971). Taxonomy will in general follow that of Moore and Webb (1978), modified according to Bennett *et al.* (1994) for pollen types and Stace (1997) for plant descriptions:

- Sum = % total dry land pollen (tdlp)
- Marsh/aquatic = % tdlp+sum of marsh/aquatics
- Spores = % tdlp+sum of spores
- Misc. = % tdlp+sum of misc. taxa.

6.11.2 Production of technical text

A detailed description will be produced of the pollen remains recovered.

◆KEY STAGE 1

6.11.3 Phasing/publication Liaison

See structural analysis section.

6.11.4 Publication text

The publication text will only be prepared on receipt of the final phasing structure.

◆KEY STAGE 2

Task	Staff	Days
Pollen remains quantification and recording	RS	3
Pollen remains technical report (1)	RS	1
◆ KEY STAGE 1		
Phasing/publication liaison: pollen remains	PM	1
Pollen publication/high level report (2)	RS	1
◆ KEY STAGE 2		

Table 23: Summary of pollen analysis tasks

6.12 Analysis of Waterlogged/Worked Wood

6.12.1 Quantification and recording

Species identification of the single item of worked wood will serve to confirm the suggested oak identification. The wood will be examined for method of manufacture (e.g. cleft, sawn), tool marks, and any other diagnostic traits which will help to refine its date within the Roman period.

6.12.2 Production of technical text

A detailed description will be produced of the waterlogged/worked wood recovered.

◆KEY STAGE 1

6.12.3 Phasing/publication Liaison

See structural analysis section.



6.12.4 Publication text

The identification and catalogue description of the worked wood will be incorporated into the 'Other Artefacts' publication discussion.

◆KEY STAGE 2

Task	Staff	Days
Waterlogged/worked wood quantification, recording and technical report (1)	EXT	2
◆KEY STAGE 1		
Phasing/publication liaison: waterlogged/worked wood	PO/AS	1
Waterlogged/worked wood publication/high level report (2)	EXT	1
◆KEY STAGE 2		

Table 24: Summary of waterlogged/worked wood analysis tasks

6.13 Analysis of Charcoal

6.13.1 Quantification and recording

The samples will be identified, and their apparent dimensions and growth rates will be recorded.

6.13.2 Production of technical text

A detailed description will be produced of the charcoal recovered.

◆KEY STAGE 1

6.13.3 Phasing/publication Liaison

See structural analysis section.

6.13.4 Publication text

The publication text will only be prepared on receipt of the final phasing structure.

◆KEY STAGE 2

Task	Staff	Days
Charcoal quantification and recording	RG	3
Charcoal technical report (1)	RG	1
◆KEY STAGE 1		
Phasing/publication liaison: charcoal	PM	1
Charcoal publication/high level report (2)	RG	1
◆KEY STAGE 2		

Table 25: Summary of charcoal analysis tasks



6.14 Overall Publication, Archiving and Project Management

◆KEY STAGE 2

6.14.1 Structural illustration

The digitised plan and section data will be interrogated via the relational database tables to produce mock-up publication illustrations. Plans will be produced to show all features in each phase and landscape, with relevant groups easily identifiable.

6.14.2 Integration of all specialist publication/high level reports to create site narrative report

The site narrative will form the basis of the descriptive section of the publication text. It will be organised by phase, landscape, and, where appropriate, group. Publication text from all specialists/data-sets will be edited and fully integrated. The intention is to create a readable document which addresses ideas rather than provides a series of separate reports on separate data-sets.

6.14.3 Editing publication text including specialist reports

The entire publication will be read and edited to ensure a consistency in approach.

6.14.4 Production of synthesis

A synthetic text will be produced discussing the key elements of the site, probably within the major chronological periods. This will address the updated research objectives.

6.14.5 Amendments and queries in consultation with specialists during article preparation

During the production of the synthesis it is likely that a number of questions will arise that the various specialists will need to address.

◆KEY STAGE 3

6.14.6 Refereeing process

The draft publication text will be referred internally by Albion Archaeology and by the consultant. This task includes time for any required discussion with the referees.

◆KEY STAGE 4

6.14.7 Preparation of publication

The draft report will be submitted to the managing editor of *East Anglian Archaeology*. Comments from their academic refereeing process will be incorporated into the draft. The revised report will be resubmitted for copyediting. After any final amendments the report will be submitted for typesetting and the page proofs will be corrected. The final pdf will then be produced and submitted to the printers.

6.14.8 Archiving and accessioning

Upon completion of the report, the written and material archives will be prepared for accessioning to the Cambridgeshire County Stores. The cost of transfer includes transport, liaison and storage charges.

6.14.9 Project management

All project tasks have been identified from Albion's generic task list menu. These have been entered onto the Albion's Time Recording System (TRS) so that expenditure and resources can be tracked throughout the life of the project. The management of the project includes



monitoring the task budgets, programming tasks, checking timetables and liaising with all members of the project team.

Task	Staff	Days
Transportation and liaison	PO/AS	5
◆ KEY STAGE 2		
Structural illustration	ILL	20
Assistance with structural illustration	PO/PM	3
Integration of all specialist publication/high level reports to create site narrative report (2)	PO/PM	50
Assistance with site narrative report (2)	PO/PM/ OM	15
Editing publication text	PM/OM	15
Production of synthesis	PO/PM	10
Amendments and queries in consultation with specialists during article preparation	PO/PM	5
◆ KEY STAGE 3		
Albion's refereeing process	PM	10
Albion's refereeing process	OM	5
◆ KEY STAGE 4		
Submission of draft report to the managing editor of EAA	PM	
Draft circulated. Copyedit queries raised and dealt with	EXT/ PM	10
Typesetting of page layouts	EXT	n/a
Author approves page layouts	PM	5
Final corrections to page proofs	PM	5
Creation of index and printing quotes obtained	EXT	n/a
Typeset index and produce final statement of account	EXT	n/a
Final PDF produced. Submitted to printers.	EXT	n/a
Archive preparation: structural data	AO	1
Archive preparation: finds data	AO	1
Archive transfer: storage costs	AO	n/a
Archive transfer	AO	n/a
Project management: overall	PM	15
Project management: Albion	OM	10
◆ KEY STAGE 5		

Table 26: Overall publication, archiving and management tasks

6.15 Summary of All Tasks

Task	Staff	Days
Liaison, meetings and technical correspondence	PM PO/AS Illust	10
Analysis of HER and historical maps	AS	10



Task	Staff	Days
	CT	5
Computerisation	PO/AS	10
Sub-group and group analysis	PO/AS	40
Landscape and phase analysis	PO/AS	25
Assistance with analysis	PM	10
Transportation and liaison	PO/AS	5
Pottery quantification and recording	SP/AL	12
Pottery technical report (1) (Without phasing/integrated text)	SP/AL	10
Pottery publication/high level report (2)	SP/AL	10
Thin section analysis	SP/AL PM	n/a 3
Obtaining clay samples for thin section analysis	AS	1
CBM quantification and recording	AO	2
CBM technical report (1)	AO	1
Coin quantification and recording	PG	30
Selected cleaning of Childerley Gate Hoard, Bourn Airfield Hoard and all non-hoard coins	PP	39
Identification of cleaned coins and preparation of catalogue and publication report	PG	13
Other artefacts narrow term identification	AM	20
Other artefacts – petrology	AM/ EXT	1
Other artefacts – investigative conservation	AM	n/a
Animal bone quantification and recording	KR	8
Animal bone technical report (1)	KR	4
Human bone quantification and recording and technical report (1)	RM	3
Charred/waterlogged plant remains quantification and recording	EXT	18
Charred/waterlogged plant remains technical report (1)	EXT	8
Molluscan remains quantification and recording	AP	8
Molluscan remains technical report (1)	AP	4
Pollen remains quantification and recording	RS	3
Pollen remains technical report (1)	RS	1
Waterlogged/worked wood quantification, recording and technical report (1)	EXT	2
Charcoal quantification and recording	RG	3
Charcoal technical report (1)	RG	1
◆ KEY		
STAGE 1: completion of analysis		
Phasing/publication liaison: Structural analysis	PO/AS	10
Phasing/publication liaison: pottery	PM	3
Phasing/publication liaison: CBM	PO/AS	1
Phasing/publication liaison: coins	PM	1
Phasing/publication liaison: other artefacts	PO/AS	1
Phasing/publication liaison: animal bone	PM	1
Phasing/publication liaison: human bone	PO/AS	1
Phasing/publication liaison: charred/waterlogged plant remains	PM	3
Phasing/publication liaison: molluscan remains	PO/AS	1
Phasing/publication liaison: pollen remains	PM	1
Phasing/publication liaison: waterlogged/worked wood	PO/AS	1
Phasing/publication liaison: charcoal	PM	1
Add phasing/integrated text to Pottery technical report (1)	SP/AL	5



Task	Staff	Days
Pottery publication/high level report (2) and review of results from other data-sets	SP/AL	5
Pottery illustration	ILL	13
CBM publication/high level report (2)	AO	1
Coins publication/high level report (2)	PG	1
Other artefacts publication/high level report (2)	AM	2
Other artefacts illustration	ILL AM	10 3
Animal bone publication/high level report (2)	KR	2
Human bone publication/high level report (2)	RM	1
Charred/waterlogged plant remains publication/high level report (2)	EXT	6
Molluscan publication/high level report (2)	AP	2
Pollen publication/high level report (2)	RS	1
Waterlogged/worked wood publication/high level report (2)	EXT	1
Charcoal publication/high level report (2)	RG	1
◆ KEY STAGE 2: completion of all specialist text		
Structural illustration	ILL	20
Assistance with structural illustration	PO/PM	3
Integration of all specialist publication/high level reports to create site narrative report (2)	PO/PM	50
Assistance with site narrative in report (2)	PO/PM/ OM	15
Editing publication text	PM/OM	15
Production of synthesis	PO/PM	10
Amendments and queries in consultation with specialists during article preparation	PO/PM	5
◆ KEY STAGE 3: completion of 1st draft		
Albion's refereeing process	PM	10
Albion's refereeing process	PM	5
◆ KEY STAGE 4: Submission to East Anglian Archaeology		
Submission of draft report to the managing editor of EAA	PM	n/a
Draft circulated for academic refereeing	PM	n/a
Author creates revised report	PM	10
Revised report submitted to the managing editor of EAA	PM	n/a
Copyeditor reads report. Copyedit queries raised and dealt with.	PM	5
Typesetting of page layouts	PM	n/a
Author approves page layouts	PM	5
Final corrections to page proofs	PM	5
Creation of index and printing quotes obtained	PM	n/a
Typeset index and produce final statement of account	PM	n/a
Final PDF produced. Submitted to printers.	PM	n/a
Archive preparation: structural data	PM	1
Archive preparation: finds data	PM	1
Archive transfer	PM	n/a
Project management: overall	PM	15
Project management: Albion	OM	10
◆ KEY STAGE 5: end of project		



Table 27: Summary of all tasks

6.16 The Project Team

To ensure a consistency of approach, the same specialists will be used who have been involved in the assessment stage of the project.

Task	Initials	Title/Organisation	Name
Overall management	OM	Operations Manager	Drew Shotliff
Daily management	PM	Project Manager	Joe Abrams
Structural analysis	AS	Archaeological Supervisor	David Ingham
Analysis of HER and historical maps	AS	Archaeological Supervisor	Joanne Archer
Pottery analysis (Iron Age)	SP	NAU	Sarah Percival
Pottery analysis (Roman)	AL	NAU	Alice Lyons
CBM analysis	AO	Finds Officer	Jackie Wells
Coin conservation	PP	Cardiff University	Phil Parkes
Coins	PG	Cardiff University	Peter Guest
Other artefacts conservation	RW	Lincolnshire Archives	Rob White
Other artefacts analysis	AM	Artefacts Manager	Holly Duncan
Other artefacts petrology	EXT		TBC
Charred plant remains	JG	MoLSS	John Giorgi
Waterlogged wood	EXT	MoLSS	TBC
Animal bone	KR	MoLSS	Kevin Rielly
Human bone	RM	MoLSS	Rik Mikulski
Molluscs	AP	MoLSS	Alan Pipe
Geoarchaeology	JC	MoLSS	Jane Corcoran
Geoarchaeology	CH	MoLSS	Craig Halsey
Charcoal	RG	-	Rowena Gale
Pollen	RS	Southampton University	Rob Scaife
Illustration	CM	Illustrator	Cecily Marshal

MoLSS: Museum of London Specialist Services.

NAU: Norfolk Archaeological Unit.

EXT: External to be confirmed

Note. Detailed staff CV's were presented in the Project Design, and are therefore not repeated here.

Table 28: The project team

6.17 Publication Synopsis

The Associate Editor of East Anglian Archaeology, a regionally based journal, has agreed to produce a monograph on the results of the excavation. The suggested format is set out below with indicative word and figure counts.

Overall length, including front papers: approx. 200 pages (including c.80 tables). All text and illustrations will be submitted in electronic format.

- **Chapter 1: Background**

Contents

Summary

Introduction

- Project background
- Topographical context
- Archaeological context
- Investigation methodology



- Layout of report

Approx. 8000 words and 5 pages of figures

- **Chapter 2: Pre-Iron Age evidence from the investigations**

This is not extensive, but does include evidence for undated, possibly prehistoric land boundaries.

Approx. 2000 words and 2 pages of figures

- **Chapter 3: Early-middle Iron Age settlement**

Site 7: extensive settlement complex. This is a significant, previously unknown site, excavated in its entirety.

Site 3 and Site 8: single enclosure and a number of pits and ditches respectively.

- non-ceramic artefacts (Holly Duncan, Albion Archaeology)
- pottery (Sarah Percival, Norfolk Archaeological Unit)
- ceramic building material/fired clay, (Jackie Wells, Albion Archaeology)
- human bone (Rik Mikulski/Bill White, Museum of London)
- animal bone (Kevin Rielly, Museum of London Specialist Services)
- charred plant remains (John Giorgi, Museum of London Specialist Services)
- molluscan remains (Alan Pipe, Museum of London Specialist Services)
- geoarchaeology / pollen (Craig Halsey/Jane Corcoran Museum of London Specialist Services / Rob Scaife, Bournemouth University)

Approx. 40,000 words and 30 pages of figures

- **Chapter 4: Roman settlement**

Site 5: extensive occupation site, extending to the north and south beyond the road corridor. This is a significant, previously unknown site, spanning the mid to late Roman period. It takes the form of a series of repeatedly renewed enclosures in a ladder system.

Site 2: elements of an early Roman farmstead site.

Site 3: series of enclosure systems, with evidence for several phases of renewal and extension.

- non-ceramic artefacts (Holly Duncan, Albion Archaeology)
- coinage (Pete Guest, Cardiff University)
- pottery (Alice Lyons, Norfolk Archaeological Unit)
- ceramic building material (Jackie Wells, Albion Archaeology)
- human bone (Rik Mikulski/Bill White, Museum of London)
- animal bone (Kevin Rielly, Museum of London Specialist Services)



- charred/waterlogged plant remains (John Giorgi, Museum of London Specialist Services)
- molluscan remains (Alan Pipe, Museum of London Specialist Services)
- timber (Museum of London Specialist Services)

Approx. 60,000 words and 40 pages of figures

- **Chapter 5: Medieval and post-medieval land use**

Traces of furrows were recorded in all parts of the road scheme. A post-medieval, moated garden feature on Site 4 will form a minor component of the publication.

Approx. 3,000 words and 4 pages of figures

- **Chapter 6: Discussion**

This will comprise a summary of results and their integration with relevant regional data, in particular the Iron Age and Roman evidence from Cambourne new town.

Approx. 20,000 words and 10 pages of figures

- **Bibliography**

Approx. 6,000 words

6.18 Archiving

On publication of the final report the archive of materials (subject to the landowner's permission) and accompanying records will be deposited with Cambridgeshire County Stores (Accession Number will be assigned upon deposition).

6.19 Timetable

Following the acceptance of the assessment and updated project design, Albion will proceed rapidly with the analysis and publication of the results. This will ensure project momentum is maintained. Detailed method statements and resource levels are provided above. Table 29 sets out the timetable for completion of the work programme in key stages.



Task	May-06	Jun-06	Jul-06	Aug-06	Sep-06	Oct-06	Nov-06	Dec-06	Jan-07	Feb-07	Mar-07	Apr-07	May-07	Jun-07	Jul-07	Aug-07	Sep-07	Oct-07	Nov-07	Dec-07	
Site 10 fieldwork																					
Site 10 assessment, analysis and integration																					
Analysis of HER and historical maps																					
Computerisation																					
Sub-group and group analysis																					
Landscape and phase analysis																					
Pottery quantification and recording																					
Pottery technical report (1) (Without phasing/integrated text)																					
Pottery thin section analysis																					
CBM quantification, recording and technical report (1)																					
Selected cleaning of Childerley Gate Hoard, Bourn Airfield Hoard and all non-hoard coins																					
Identification of cleaned coins and preparation of catalogue and publication report																					
Other artefacts – investigative conservation																					
Other artefacts narrow term identification and technical report																					
Other artefacts – petrology																					
Animal bone quantification, recording and technical report (1)																					
Human bone quantification, recording and technical report (1)																					
Charred/waterlogged plant remains quantification, recording, technical report (1)																					
Molluscan remains quantification, recording and technical report (1)																					
Pollen remains quantification, recording and technical report (1)																					
Waterlogged/worked wood quantification, recording and technical report (1)																					
Charcoal quantification, recording and technical report (1)																					
Completion of Keystage 1: completion of analysis																					
Phasing/publication liaison: all data sets																					
CBM publication/high level report (2)																					
Coins publication/high level report (2)																					
Other artefacts publication/high level report (2)																					
Other artefacts illustration																					
Animal bone publication/high level report (2)																					
Human bone publication/high level report (2)																					
Charred/waterlogged plant remains publication/high level report (2)																					
Molluscan publication/high level report (2)																					
Pollen publication/high level report (2)																					
Waterlogged/worked wood publication/high level report (2)																					
Charcoal publication/high level report (2)																					
Add phasing/integrated text to Pottery technical report (1)																					
Pottery publication/high level report (2)																					
Pottery illustration																					
Integration of all specialist publication/high level reports report (2)																					



Task	May-06	Jun-06	Jul-06	Aug-06	Sep-06	Oct-06	Nov-06	Dec-06	Jan-07	Feb-07	Mar-07	Apr-07	May-07	Jun-07	Jul-07	Aug-07	Sep-07	Oct-07	Nov-07	Dec-07	
Keystage 2: completion of all specialist text																					
Integrated site narrative																					
Structural illustration																					
Keystage 3: completion of 1st Draft																					
Albion refereeing process																					
Consultant refereeing process																					
Keystage 4: preparation of publication																					
Submission of draft report to the managing editor of EAA																					
Draft circulated for academic refereeing																					
Author creates revised report																					
Revised report submitted to the managing editor of EAA																					
Copyediting. Copyedit queries raised and dealt with.																					
Typesetting of page layouts																					
Author approves page layouts																					
Final corrections to page proofs																					
Creation of index and printing quotes obtained																					
Typeset index and produce final statement of account																					
Final PDF produced. Submitted to printers																					
Archive preparation: structural data																					
Archive preparation: finds data																					
Archive transfer																					
Keystage 5: end of project																					

Table 29: Provisional timetable to complete the project (Gantt Chart)



7. BIBLIOGRAPHY

Abrams, J. 2001, *The effects of agriculture on selected Archaeological Sites within the Cambridgeshire County Farms Estate*. Archaeological Field Unit Document 196.
In: DEFRA/Oxford Archaeological Unit. 2002. *The Management of Archaeological Sites in Arable Landscapes*. Document BD1701

Albion Archaeology 2001, *Procedures Manual Vol 1: Fieldwork*.

Albion Archaeology 2004, *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Non-Intrusive Archaeological Field Evaluation*. 2004:109

Albion Archaeology 2005a, *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Report on the Results of Intrusive Archaeological Field Evaluation*. 2005:44

Albion Archaeology 2005b *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54

Albion Archaeology 2005c, *A428 Caxton to Hardwick Improvement Scheme Site 1: Caxton Gibbet, Pre-Investigation Summary and Method Statement, Version 1.0*.
In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54

Albion Archaeology 2005d, *A428 Caxton to Hardwick Improvement Scheme Site 2: Land west of Bourn Airfield, Pre-Investigation Summary and Method Statement, Version 1.0*. In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54

Albion Archaeology 2005e, *A428 Caxton to Hardwick Improvement Scheme Site 3: Bourn Airfield, Pre-Investigation Summary and Method Statement, Version 1.1*.
In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54

Albion Archaeology 2005f, *A428 Caxton to Hardwick Improvement Scheme Site 4: Land west of Childerley Gate, Pre-Investigation Summary and Method Statement, Version 1.1*. In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54

Albion Archaeology 2005g, *A428 Caxton to Hardwick Improvement Scheme Site 8: Land north-west of Hardwick, Pre-Investigation Summary and Method Statement, Version 1.1*. In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54



- Albion Archaeology 2005h, *A428 Caxton to Hardwick Improvement Scheme Site 9: Land north of Hardwick, Pre-Investigation Summary and Method Statement, Version 1.1*. In: *A428 Caxton to Hardwick Improvement Scheme, Cambridgeshire: Project design for archaeological excavation, recording, analysis and publication*. 2005:54
- Albion Archaeology 2006a, *A428 Caxton to Hardwick Improvements Scheme, Cambridgeshire, Conservation and Numismatic Assessment of the Childerley Gate Coin Hoard*, Report 2006/12
- Albion Archaeology 2006b, *A428 Caxton to Hardwick Improvements Scheme, Cambridgeshire, Conservation and Numismatic Assessment of the Bourn Airfield Coin Hoard*, Report 2006/03
- Bennett, K. D., Whittington, G. and Edwards, K. J. 1994, 'Recent plant nomenclatural changes and pollen morphology in the British Isles'. *Quaternary Newsletter* 73, 1-6
- Berggren, G. 1981, *Atlas of seeds and small fruits of North-west European plant species. Part 3 Saliceaea-Cruciferae*. Stockholm
- Beijerinck, W. 1947, *Zadenatlas der Nederlandsche Flora I-II*. Veenman and Zonen Wageningen.
- Brown, N. and Glazebrook, J. (eds.) 2000, *Research and Archaeology: A framework for the Eastern Counties: Research Agenda and Strategy* (EAA Occ Pap 8)
- Bryant, S. 1997, 'Iron Age' in Glazebrook, J. (ed.)
- Bryant, S. 2000, 'The Iron Age' in Brown, N. and Glazebrook, J. (eds.)
- Cameron, R. A. D. and Redfern, M. 1976, *British land snails*. Linnean Society of London synopses of the British fauna no.6
- Courtney, P. 2002 *East Midlands Archaeological Research Framework: Resource Assessment and Research Agenda for the Post-Medieval Period (1500-1750)*. University of Leicester Archaeological Services, available online at www.le.ac.uk/archaeology
- Cunliffe, B. and Miles, D. (eds), *Aspects of the Iron Age in Central Southern Britain*. University of Oxford: Committee of Archaeology Monograph No.2
- Dawson, M. 2004, *Archaeology in the Bedford Region*; Oxford, BAR 373. 153-266
- DEFRA/Oxford Archaeological Unit. 2002. *The Management of Archaeological Sites in Arable Landscapes*. Document BD1701



- English Heritage 1997, *English Heritage Archaeology Division Research Agenda*, unpublished draft
- English Heritage. 2003. *Ripping up History*. Document 50791
- Gardiner, J. 2003, *Cambourne New Settlement, Cambridgeshire Archaeological Excavations: Interim Statement of Results* (Wessex Archaeology)
- Glazebrook, J. (ed.) 1997, *Research and Archaeology: A framework for the Eastern Counties: Resource Assessment* (EAA Occ. Pap. 3)
- Going, C. and Plouviez, J. 2000, 'Roman', in Brown, N. and Glazebrook, J. (eds.)
- Grant, A. 1984, 'Animal husbandry in Wessex and the Thames valley' in Cunliffe, B. and Miles, D. (eds), 102-120
- Guest, P. and Parkes, P. 2006, *Conservation and numismatic assessment of the Childerley Gate coin hoard*. Albion Archaeology
- Haselgrove, C., Armit, I., Champion, T., Creighton, J., Gwilt, A., Hill, J.D., Hunter, F. and Woodward, A. (eds.) 2001, *Understanding the British Iron Age: An agenda for Action*. Iron Age Research Seminar and Prehistoric Society, Salisbury.
- Hillman, G., 1981, 'Reconstructing crop husbandry practices from charred remains of crops', in Mercer, R. (ed) *Farming practice in British Prehistory*, Edinburgh University Press, 123-162
- Hillman, G., 1984, 'Interpretation of archaeological plant remains: The application of ethnographic models from Turkey', in van Zeist, W. and Casparie, W. A. (eds) *Plants and Ancient Man. Studies in Palaeoethnobotany*. Rotterdam, 1-41.
- Hull, M. R., and Pullinger, J., 2000, 'The Roman Pottery' in Alexander, J., and Pullinger, J., *Roman Cambridge: excavations on Castle Hill 1956-1988*, Proc. Cambridge Antiq. Soc. 88 for 1999, 141-144.
- James, S. and Millett, M. (eds) 2001, *Britons and Romans: advancing an archaeological agenda*. Council for British Archaeology Research Report 125.
- Kenney, S. 2000, *Roman and undated remains along the Bourn-Caldecote Highfields and Bourn-Cambourne water pipelines: Archaeological recording*. Cambridgeshire County Council Archaeological Field Unit. 184
- Kenney, S. 2001, *Middle and Late Iron Age and Roman Settlement at Highfields, Caldecote, Cambridgeshire: Assessment and Post-Excavation Project Design*: Cambridgeshire County Council Archaeological Field Unit. Report PXA30
- Kerney, M. 1999, *Atlas of the land and freshwater molluscs of Britain and Ireland*



- King, A.C. 1984, 'Animal bones and the dietary identity of military and civilian groups in Roman Britain, Germany and Gaul' in Blagg, T.C. and King, A.C. (eds). *Military and civilian in Roman Britain: cultural relationships in a frontier province*, British Archaeological Report 136, Oxford, 187-218.
- Macan, T. T. 1977, *A key to the British fresh- and brackish water gastropods*. Freshwater Biological Association scientific publication no. 13
- Maltby, M. 1981, 'Iron Age, Romano-British and Anglo-Saxon animal husbandry - a review of the faunal evidence' in Jones, M. and Dimbleby, G. (eds), *The environment of man: the Iron Age to the Anglo-Saxon period*, British Archaeological Report 87, Oxford, 155-203.
- Marsden, A. 2003. *Barbarous production sites in Norfolk and Suffolk*. PAS East of England Newsletter, available from <http://www.finds.org.uk/documents/PASeastofenglandnewsletter03-2.pdf>
- Martin, T. S. and Wallace, C. R. (eds.) *A Research Design for the Study of Roman Pottery in the East Midlands & East Anglia*. Study Group for Roman Pottery. Available online at <http://www.sgrp.org/Rfwork/E/Contents.htm>
- Moore, P. D. and Webb, J. A. 1978, *An illustrated guide to pollen analysis*. London: Hodder and Stoughton
- Moore, P. D., Webb, J. A. and Collinson, M. E. 1991, *Pollen analysis*. Second edition. Oxford: Blackwell Scientific
- Oosthuizen, S. et al. 2006, *Landscapes Decoded: The Origins and Development of Cambridgeshire's Medieval Fields*. University of Hertfordshire Press
- Oxford Archaeology, 2002, *A428 Caxton to Hardwick Improvement. Stage 3, Cultural Heritage Assessment*.
- Smith, R. F. 1987, *Roadside settlement in lowland Roman Britain*. Oxford, BAR 157, 22-41, 115.
- Stace, C. 1997, *New Flora of the British Isles*. Cambridge University Press
- Stockmarr, J. 1971, 'Tablets with spores used in absolute pollen analysis'. *Pollen et Spores* 13, 614-621
- Taylor, J. 2001 'Rural society in Roman Britain' in James, S. and Millett, M. (eds) 2001
- Taylor, J. 2002 *East Midlands Archaeological Research Framework: A resource Assessment and Research Agenda for the Roman Period*. University of Leicester Archaeological Services, available online at www.le.ac.uk/archaeology



The Treasure Act 1996, Her Majesty's Stationery Office. Available online at
<http://www.opsi.gov.uk/acts/acts1996/1996024.htm>

Wait, G. 1985, *Ritual and religion in Iron Age Britain*

Wessex Archaeology 2002, *Cambourne New Settlement: Archaeological Evaluation*.
45976.02

Wessex Archaeology 2003 *Cambourne New Settlement, Cambridgeshire* Interim
Statement of Results. Report 45973.

Willis, S. (ed.) 1997, *National Research Framework Document*. Study Group for
Roman Pottery. Available online at
<http://www.sgrp.org/RFwork/Doc/Contents.htm>

Wilson, B., Hamilton, J., Bramwell, B. and Armitage, P. 1978, 'The animal bones' in
Parrington, M. (ed). *The excavation of an Iron Age settlement, Bronze Age ring
ditches and Roman features at Ashville trading estate, Abingdon (Oxfordshire)*,
1974-76, Council for British Archaeology Research Report 28, 110-139

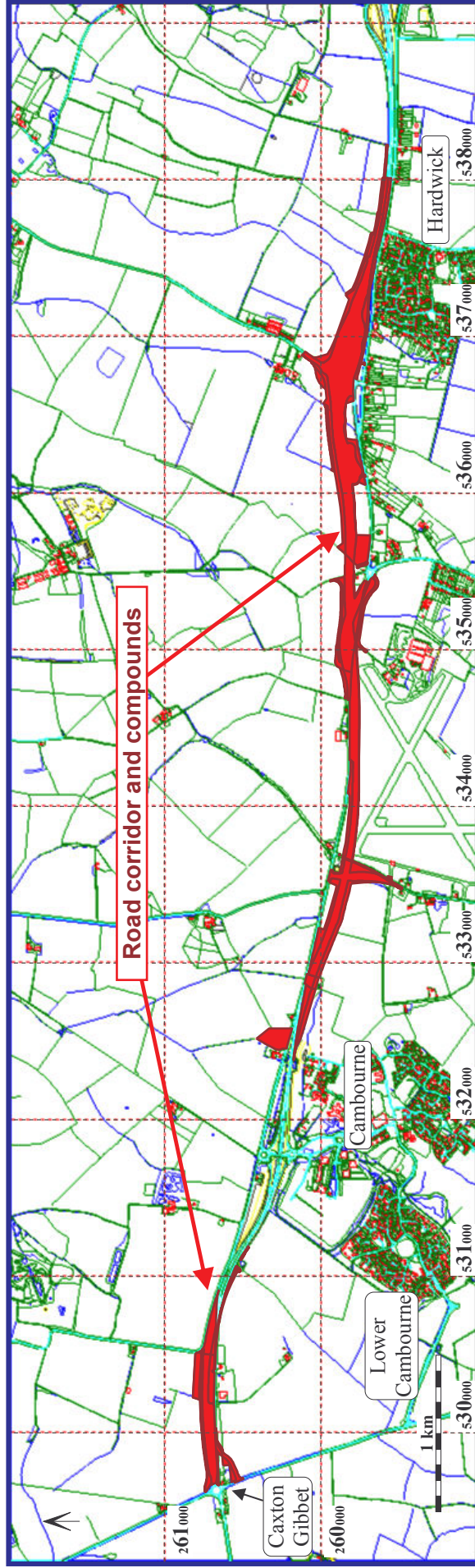
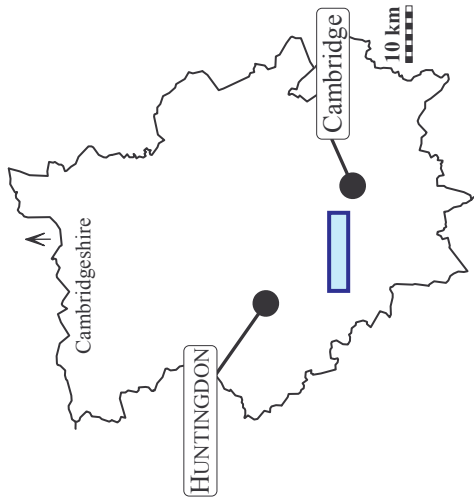


Figure 1: Site location

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Figure 2: Fields 1 and 2: Trial trench and Site locations
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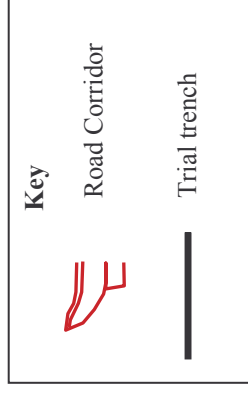
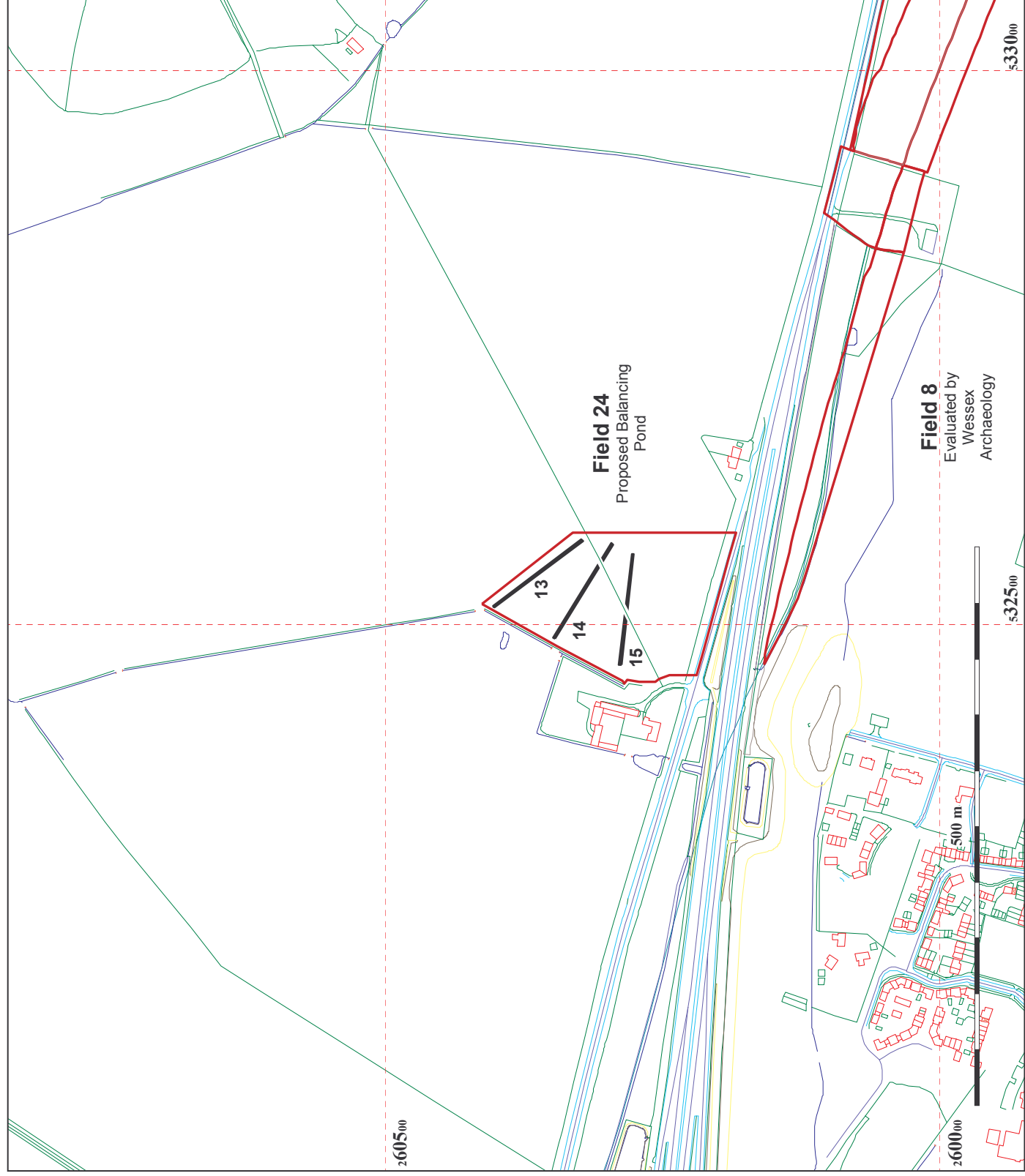
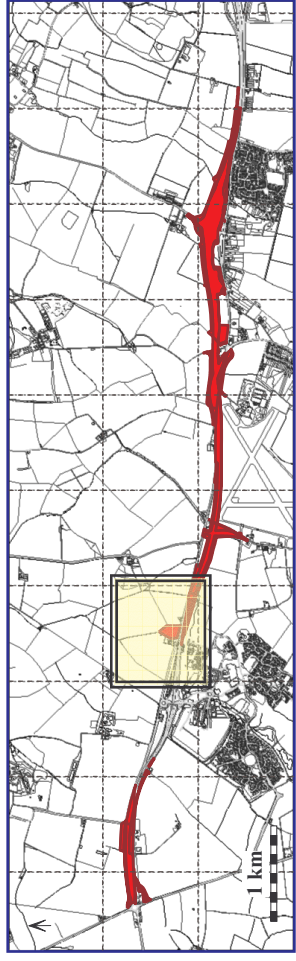


Figure 3: Field 24: Trial trench locations

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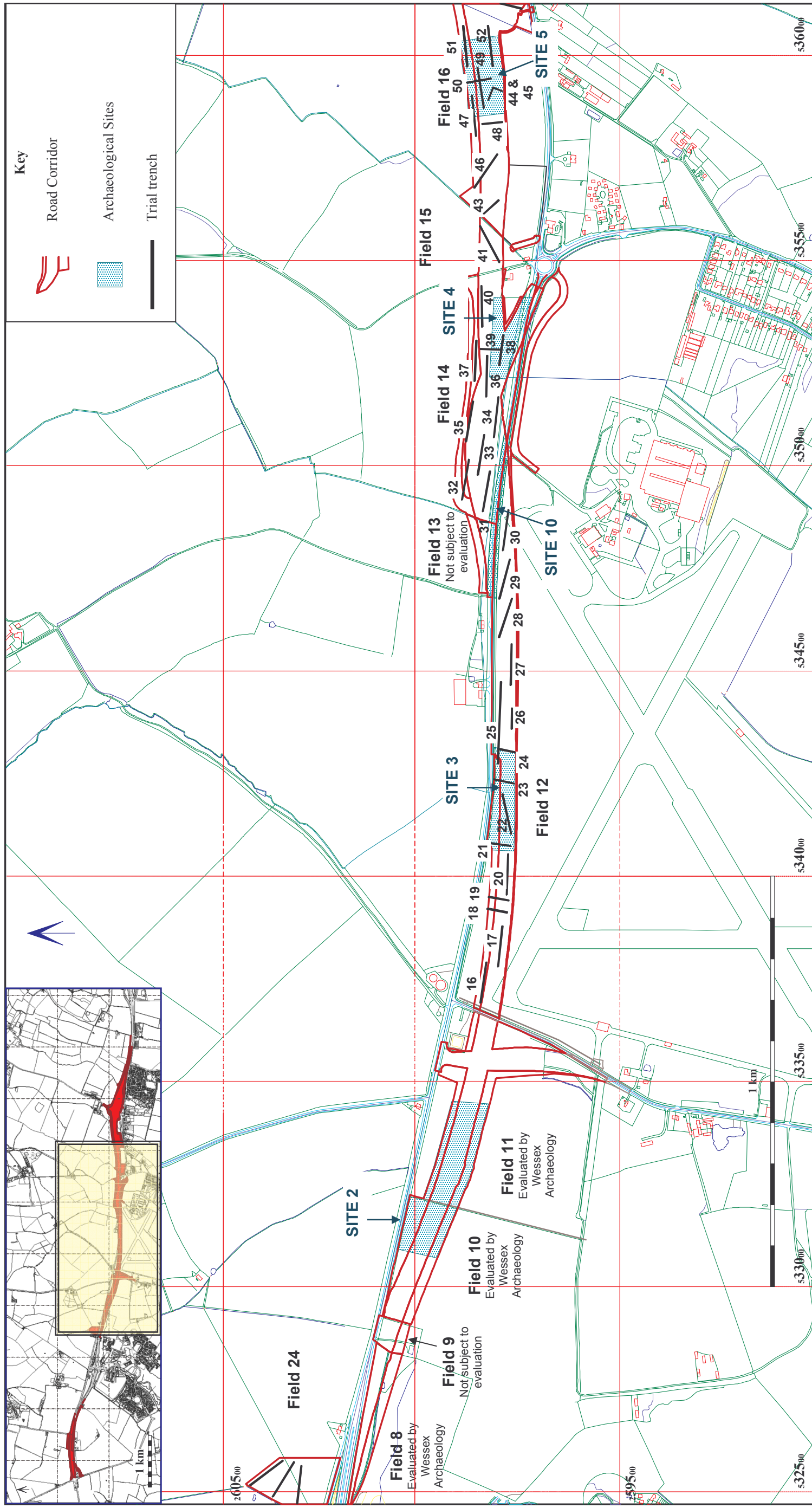


Figure 4: Fields 12 to 16: Trial trench and Site locations
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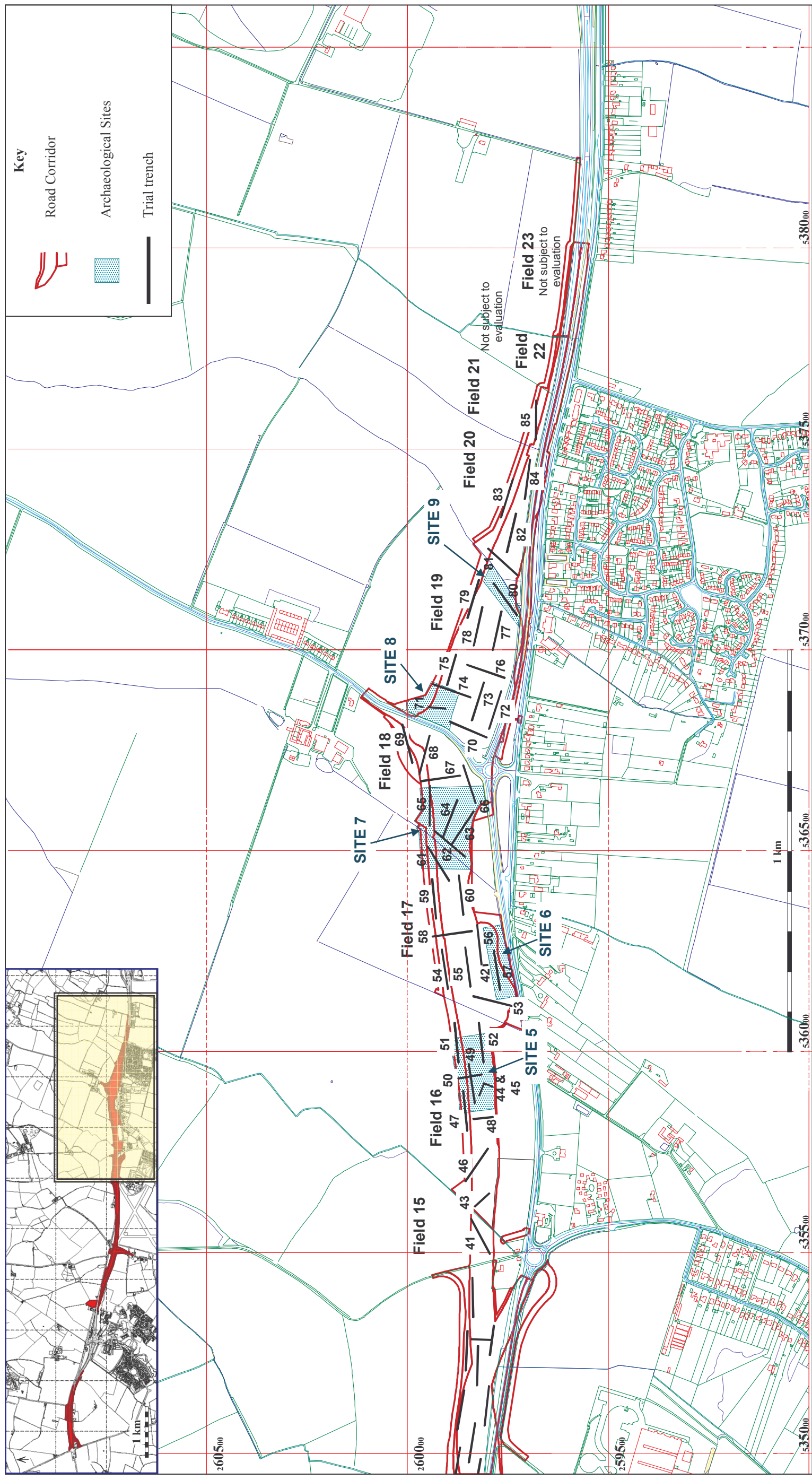


Figure 5: Fields 15 to 21: Trial trench and Site locations
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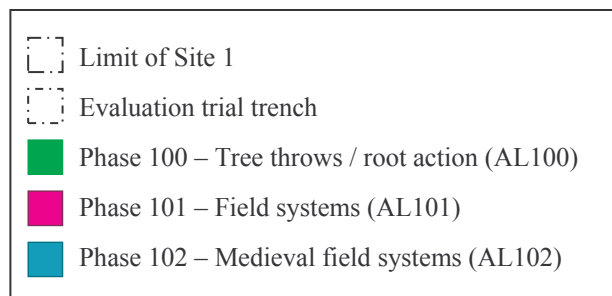
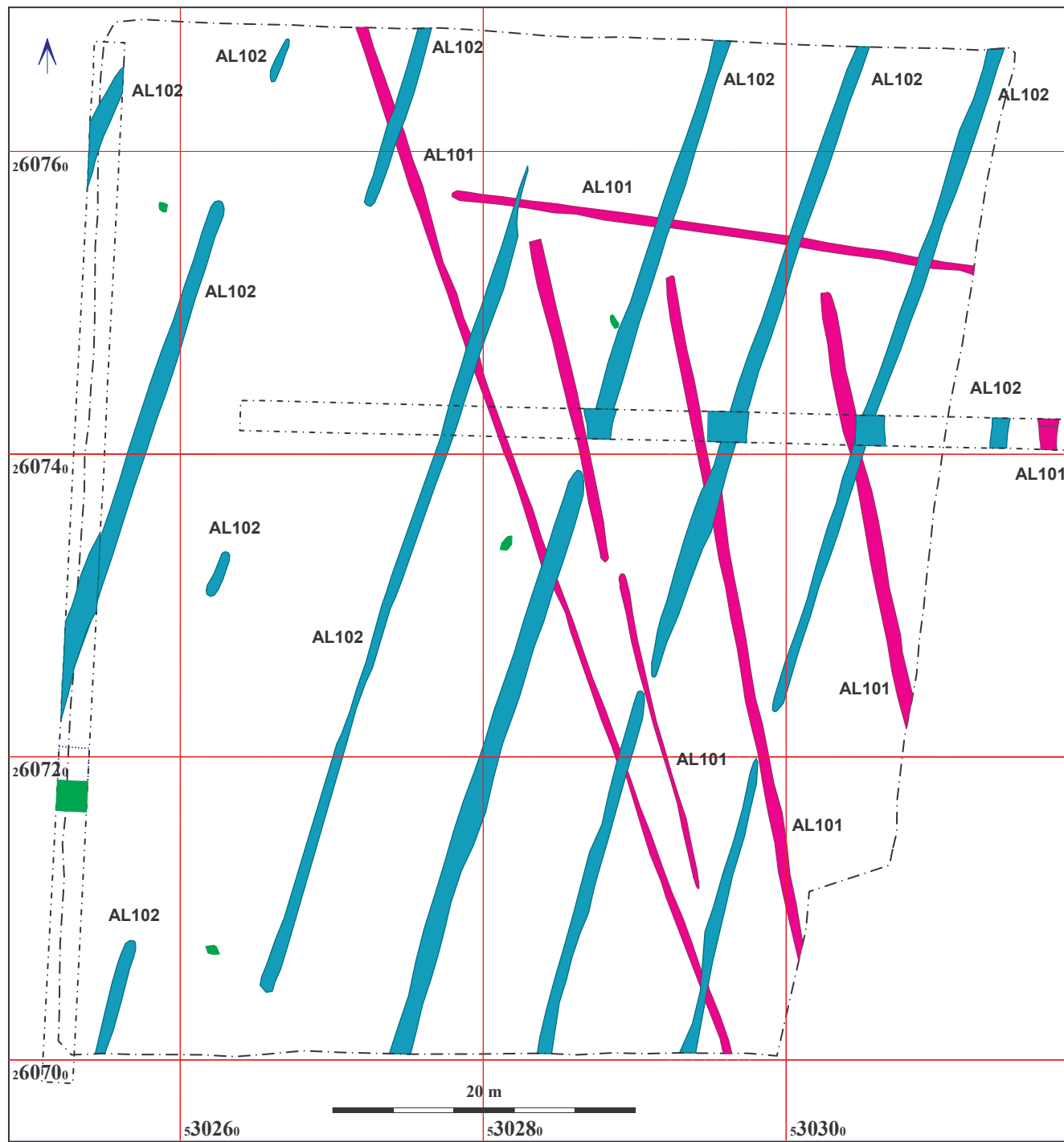
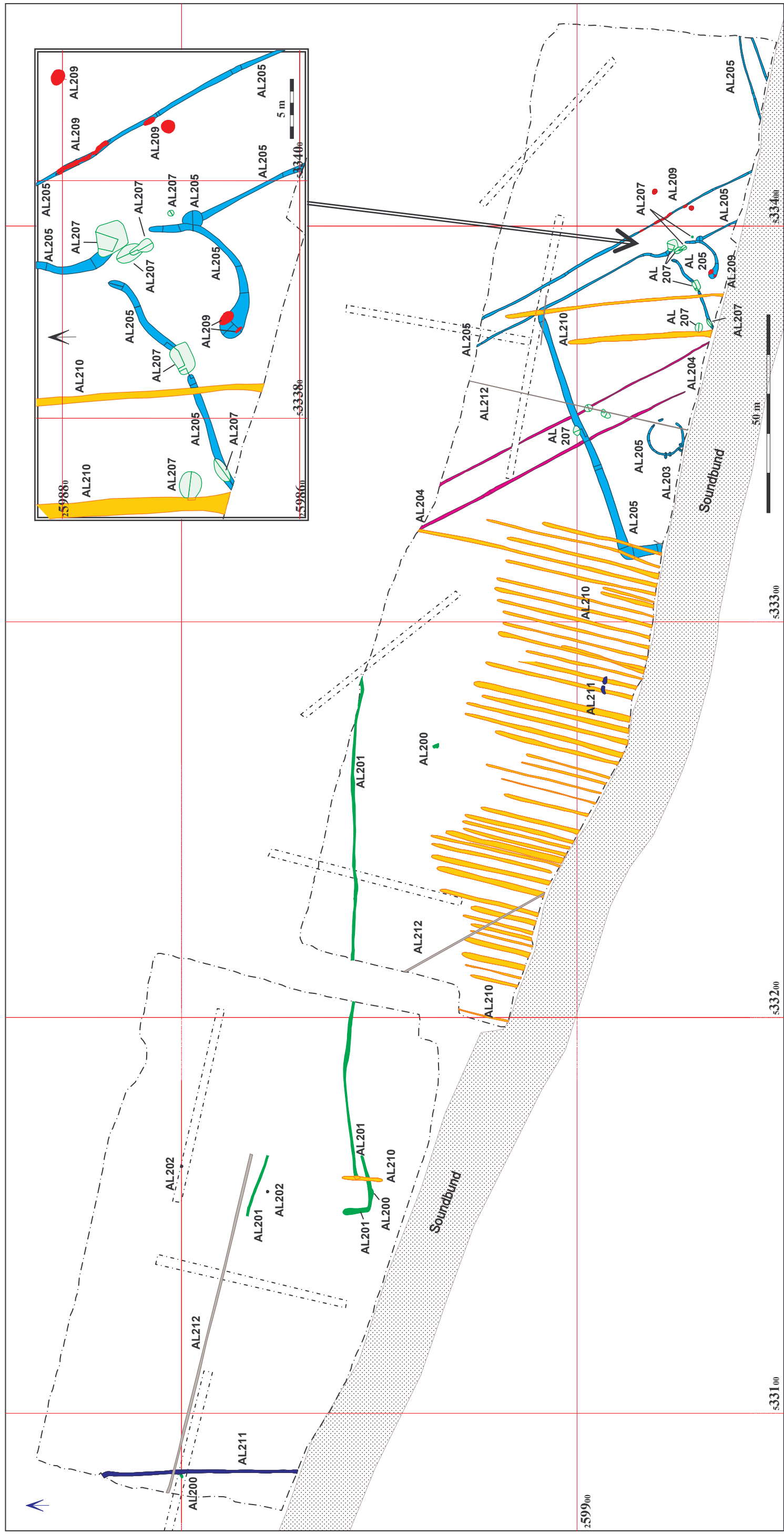


Figure 6: Site 1 – All phase plan



	Limit of Site 2		Phase 202 – Pits and postholes (AL207)
	Evaluation trial trench		Phase 203 – Tree throws / root action (AL209)
	Phase 200 – Tree throws / root action (AL200), undated ditches (AL201)		Phase 204 – Furrows (AL210)
	Phase 201 – Iron Age pits (AL202)		Phase 205 – Ditch and rooting (AL211)
	Phase 202 – Tree throws / root action (AL203), roundhouse drip gully, enclosure, entrance ditches and droveway (AL205)		Phase 206 – Land-drains (AL212)
			Phase 207 – Roman droveway (AL204)

Figure 7: Site 2 – All phase plan

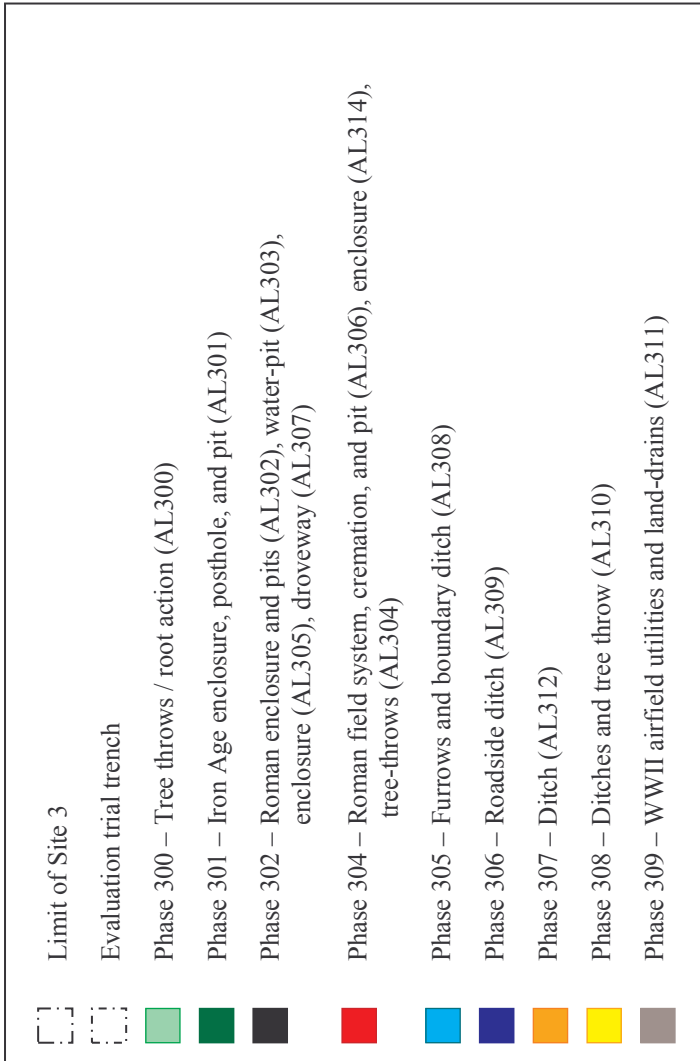
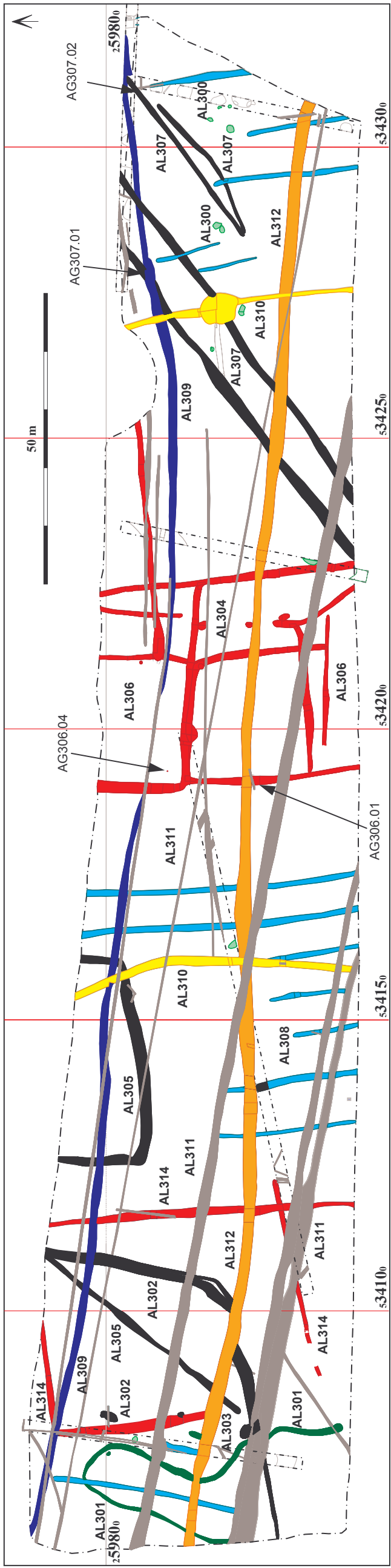


Figure 8: Site 3 – All phase plan



Figure 9: Site 4 - All phase plan

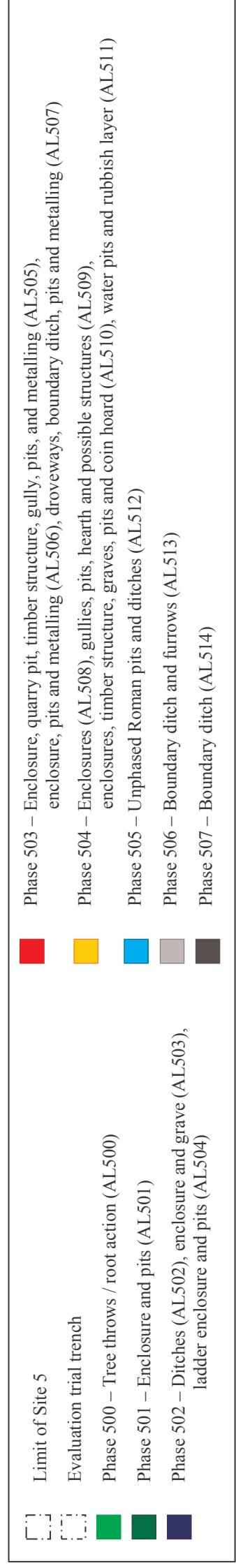


Figure 10: Site 5 – All phase plan

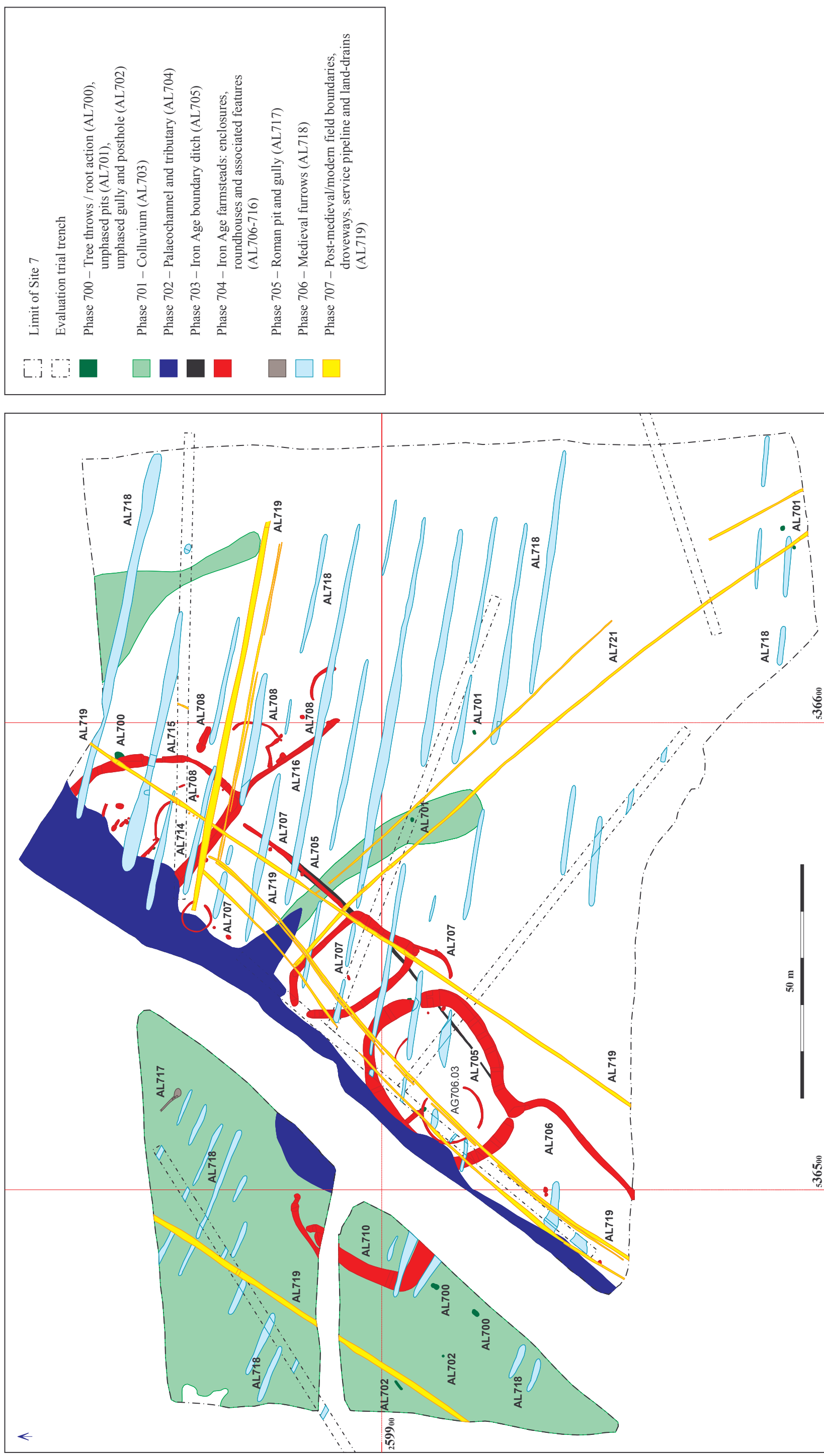


Figure 11: Site 7 – All phase plan

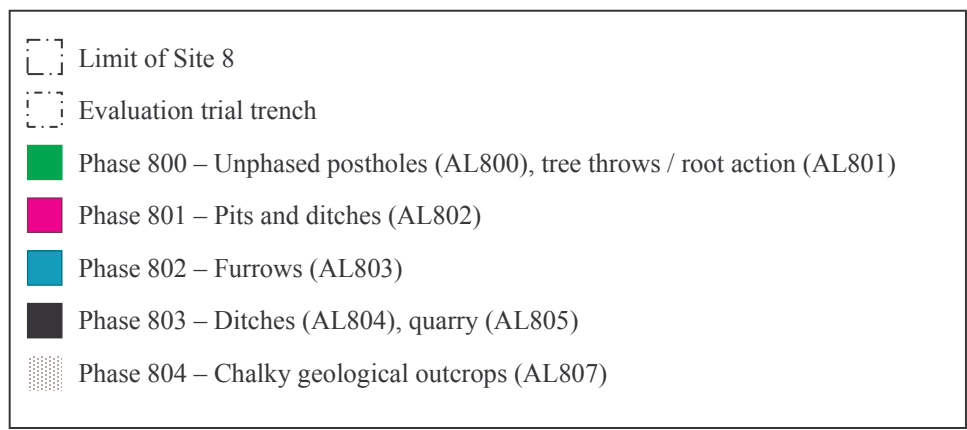
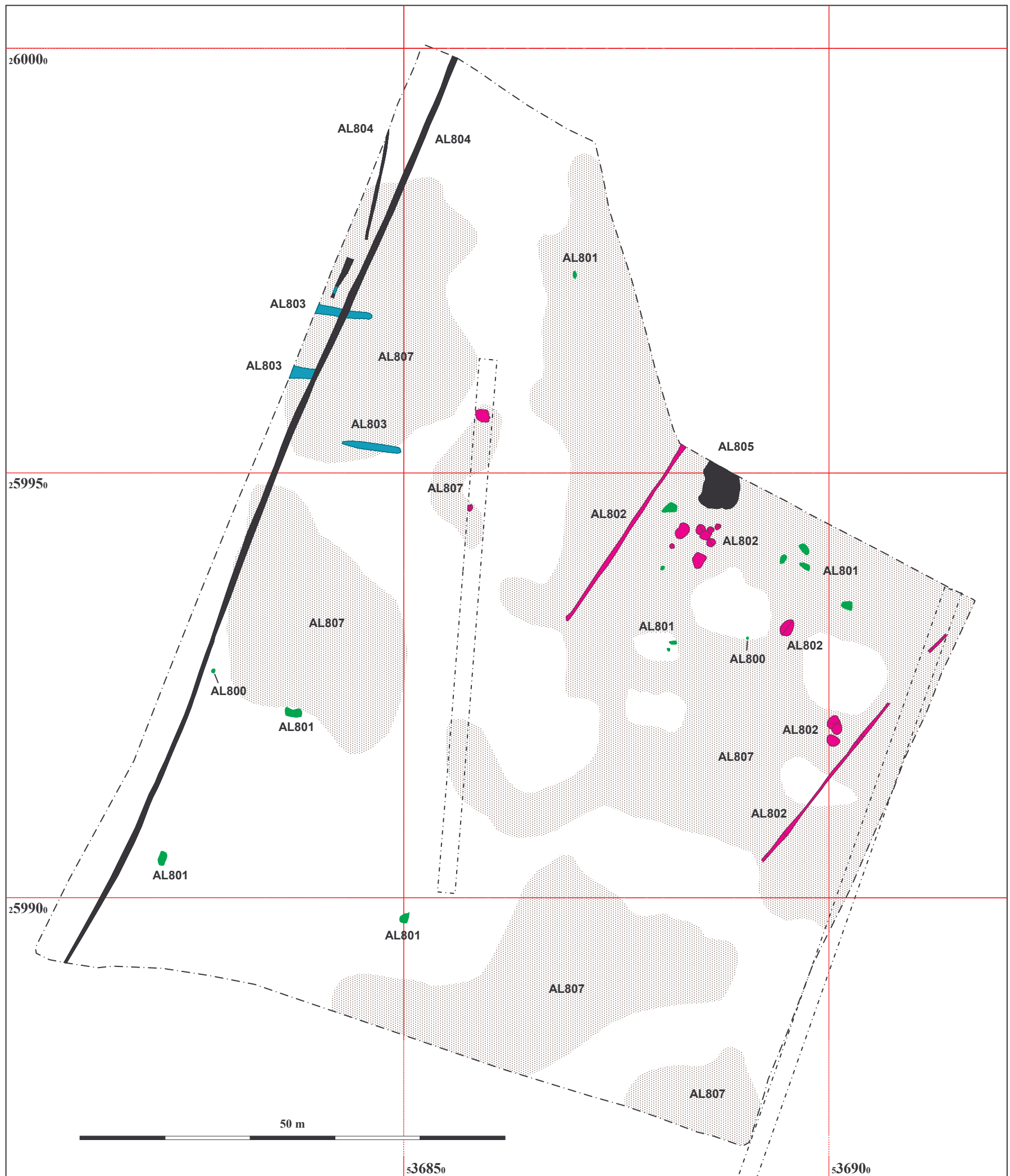


Figure 12: Site 8 – All phase plan

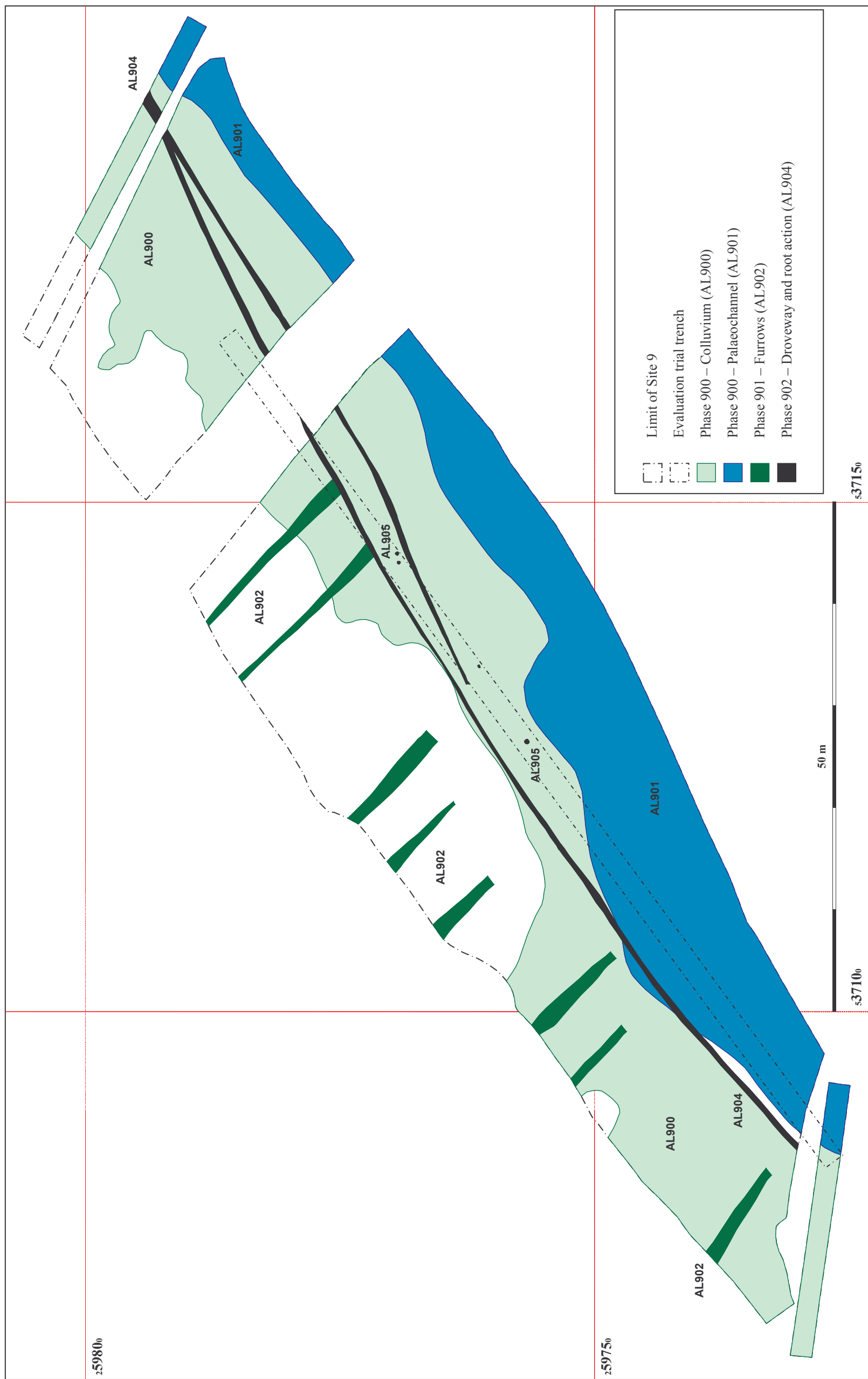


Figure 13: Site 9 – All phase plan

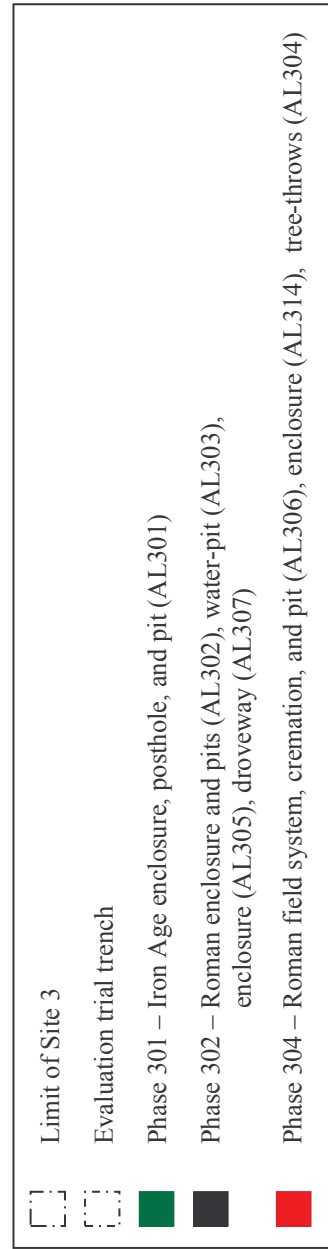
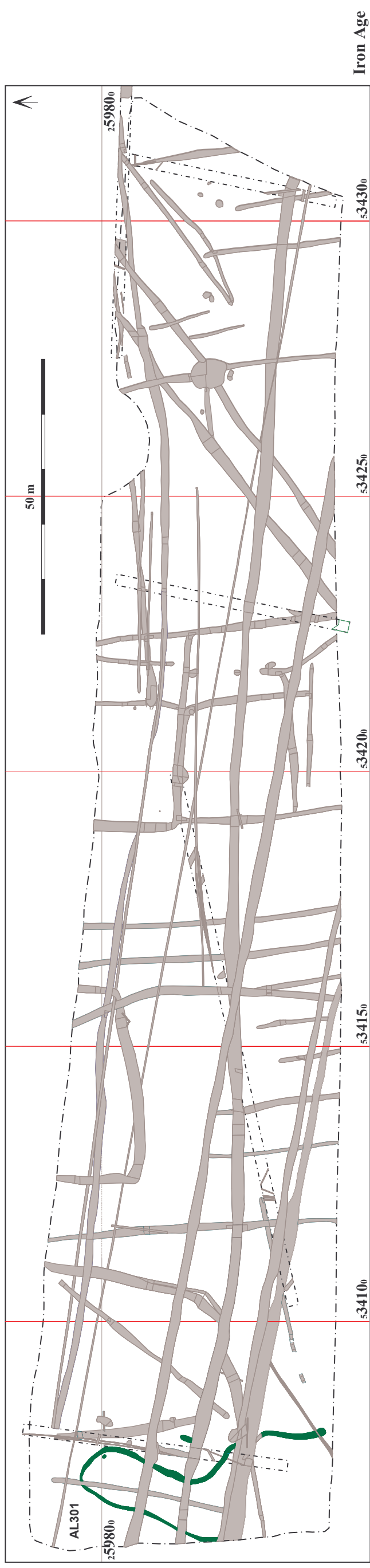


Figure 14: Site 3 – Iron Age and Roman

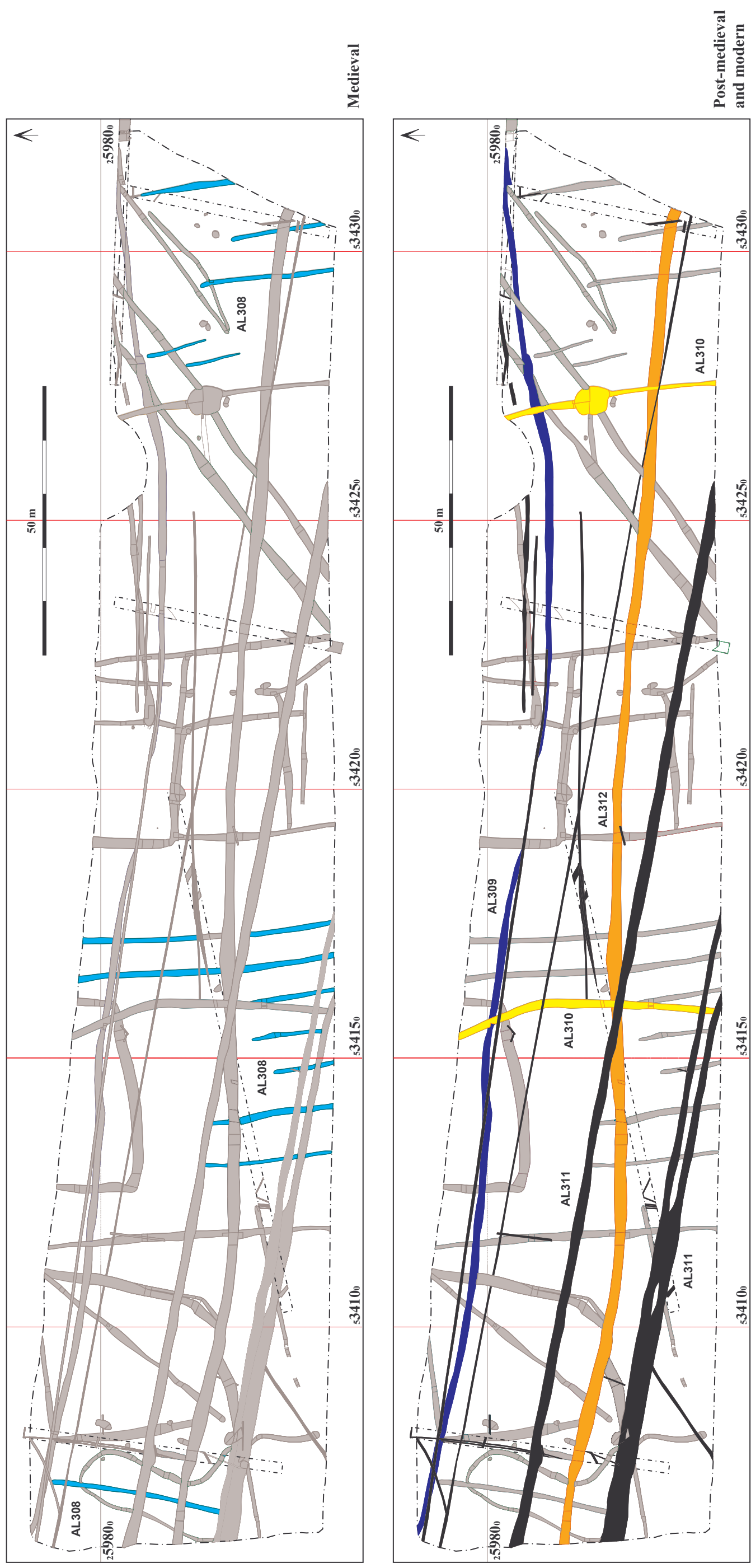
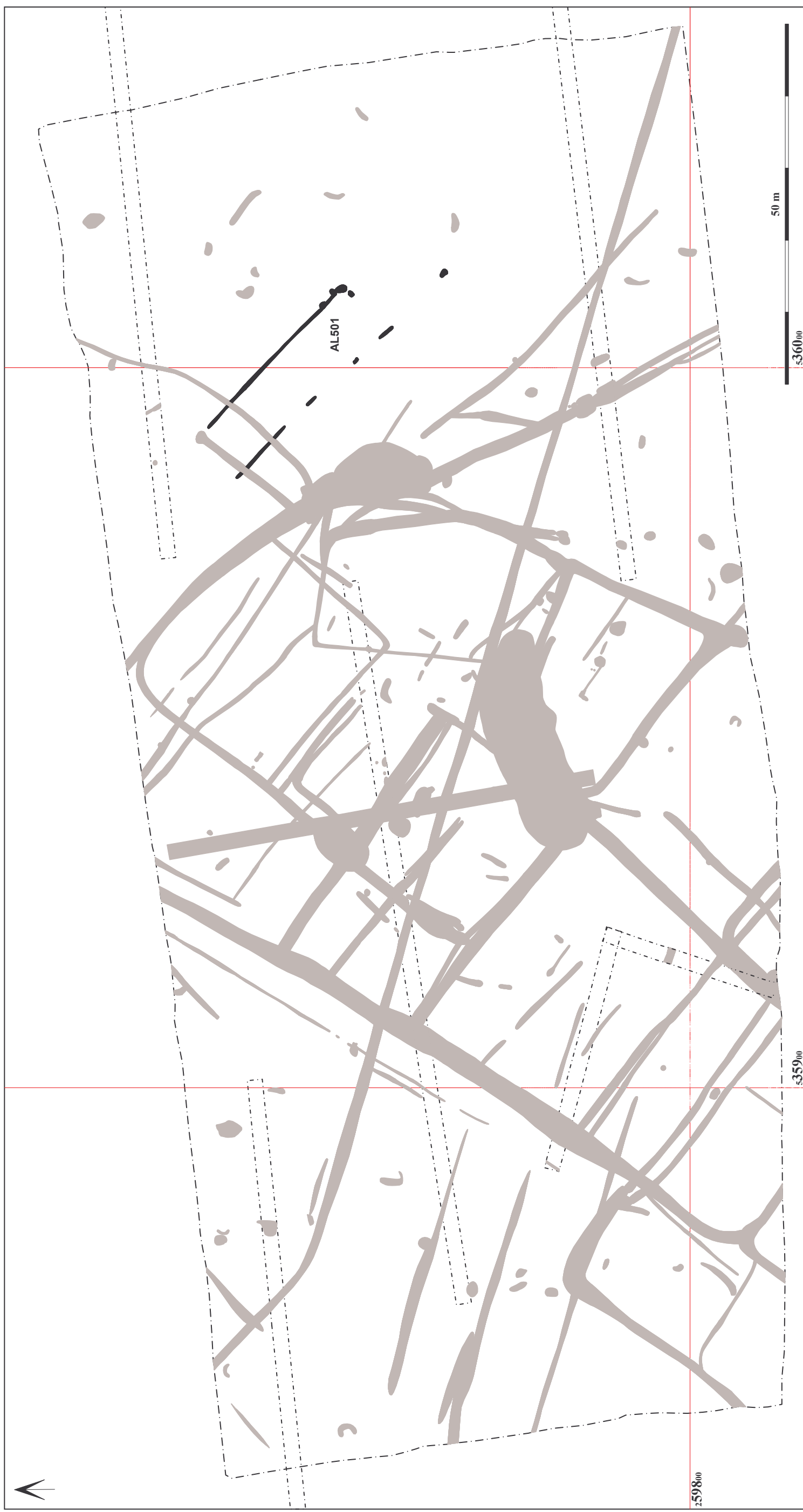


Figure 15: Site 3 – Medieval to modern



	Limit of Site 5
	Evaluation trial trench
	Phase 501 – Enclosure and pits (AL501)

Figure 16: Site 5 – Phase 501

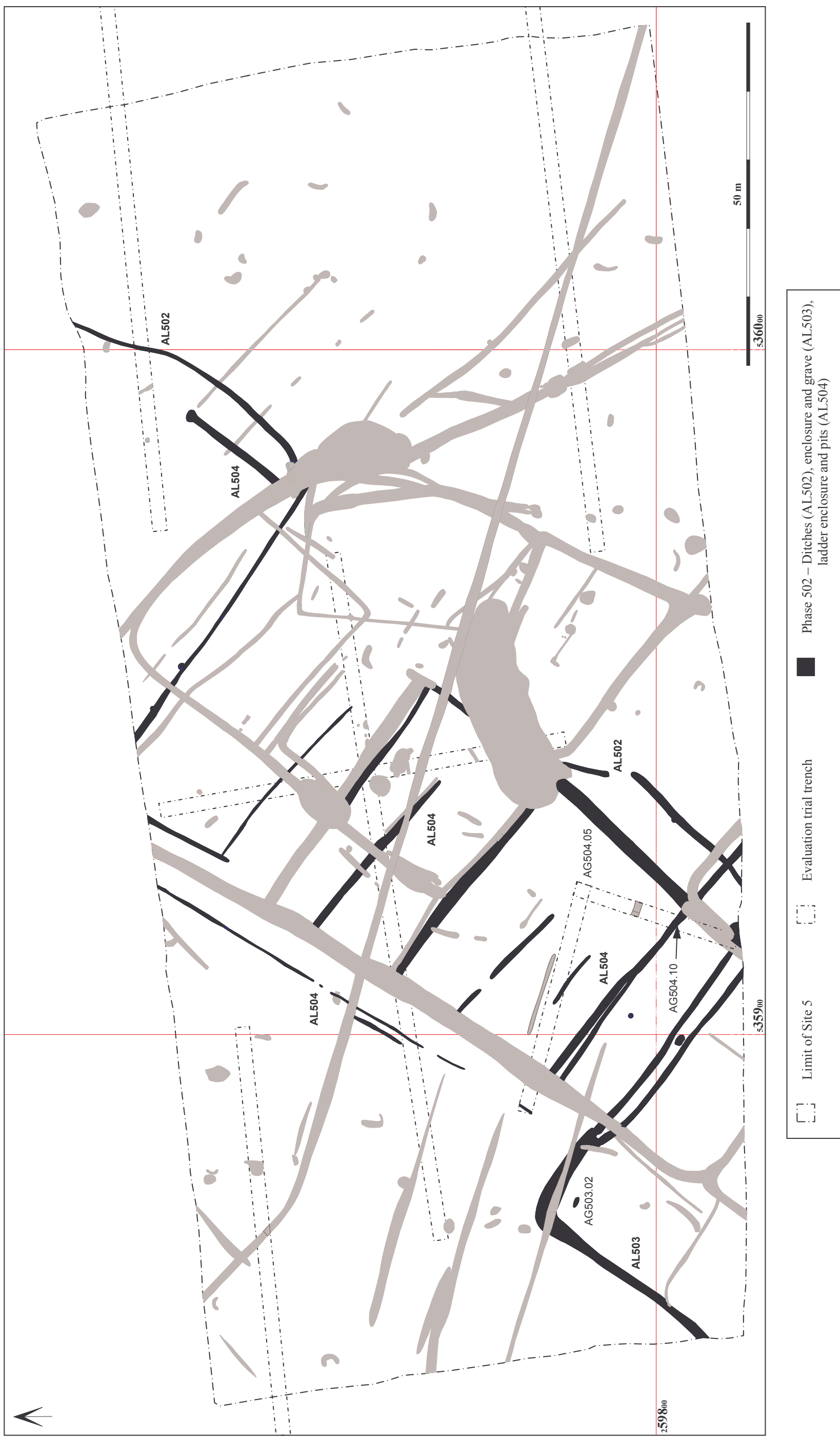


Figure 17: Site 5 – Phase 502

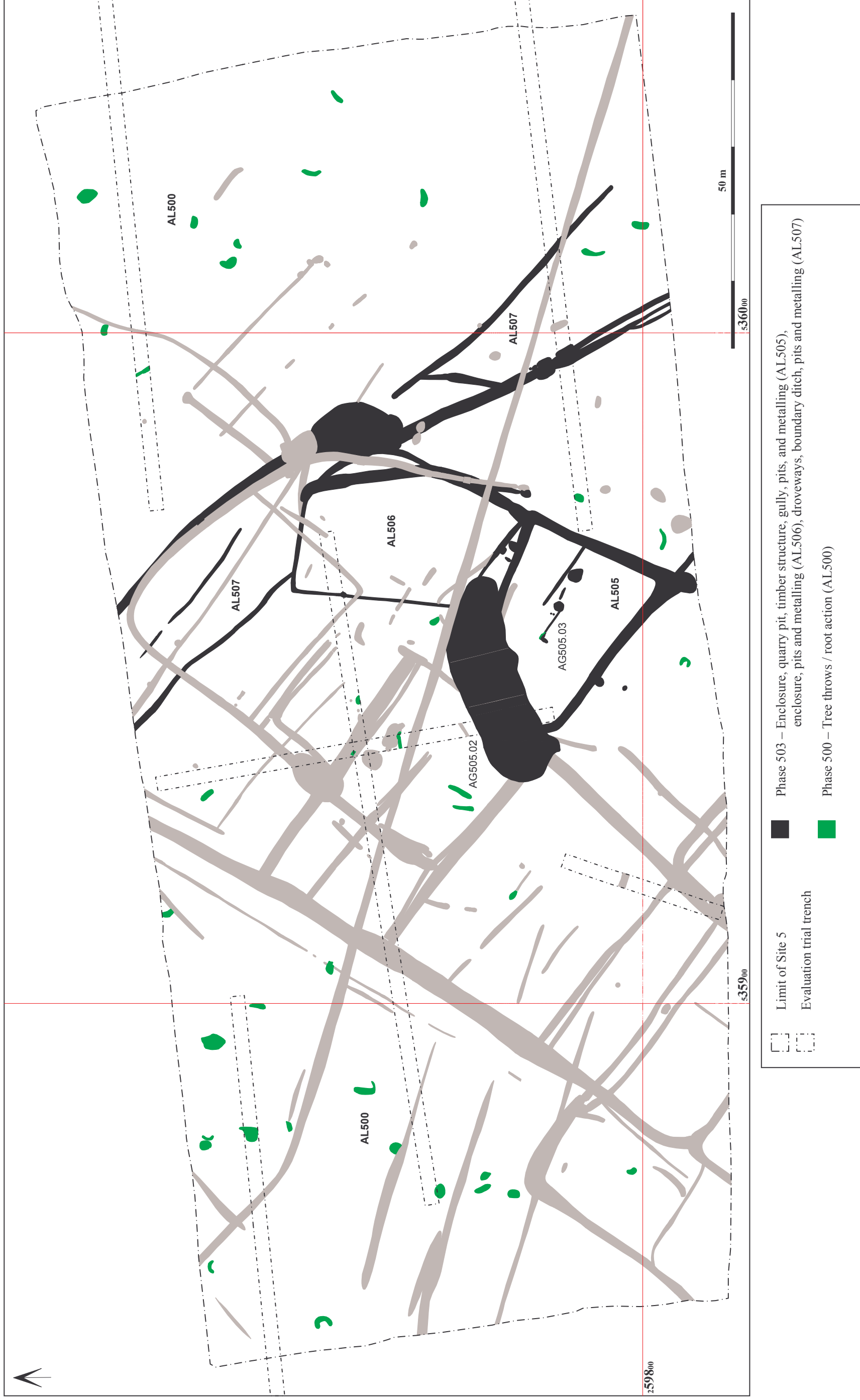
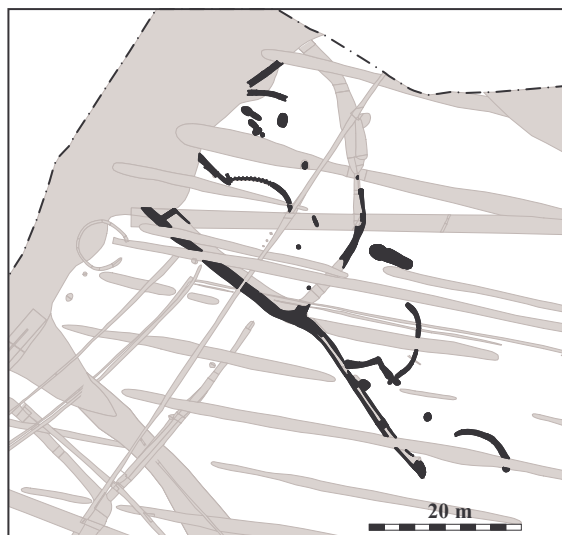


Figure 18: Site 5 – Phases 500 and 503

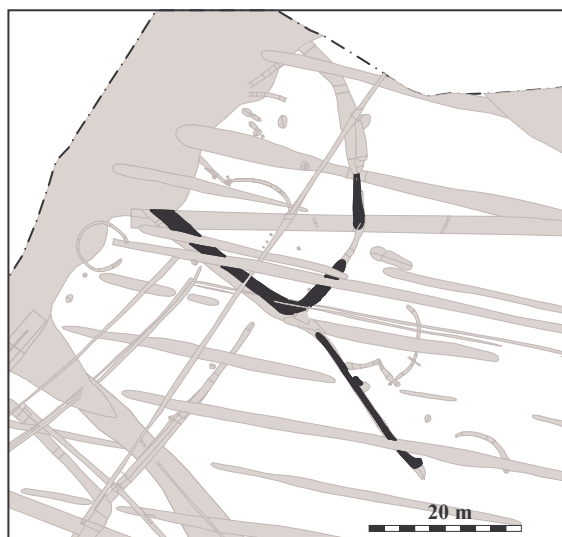


- Limit of Site 5
- Evaluation trial trench
- Phase 504 – Enclosures (AL508), gullies, pits, hearth and possible structures (AL509), enclosures, timber structure, graves, pits and coin hoard (AL510), water pits and rubbish layer (AL511)

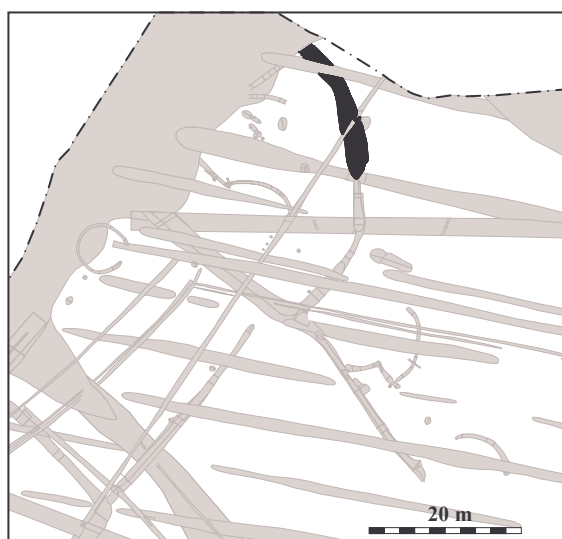
Figure 19: Site 5 – Phase 504



AL 708



AL 714 and 716



AL 715

Figure 20: Site 7 – Phase 704: development of northern enclosure