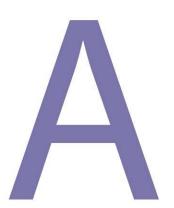
LAND TO THE REAR OF HIGH STELL MIDDLETON ST GEORGE COUNTY DURHAM





EVALUATION REPORT



AUGUST 2018

Land to the rear of High Stell, Middleton St George, County Durham

Site Code: MSG18

Commissioning Client:

Carlton & Co Consulting

Aycliffe Industrial Park 23 Welbury Way Newton Aycliffe DL5 6ZE

Tel: 0845 805 7442



Contractor:

Pre-Construct Archaeology Limited
Durham Office
Unit N19a Tursdale Business Park
Durham
DH6 5PG

Tel: 0191 377 1111



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DOCUMENT VERIFICATION

ARCHAEOLOGICAL INVESTIGATIONS AT MIDDLETON ST GEORGE, COUNTY DURHAM

EVALUATION REPORT

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Task	Name	Date
Text prepared by:	Scott Vance	July 2018
Text checked by:	Jennifer Proctor	July 2018
Graphics prepared by:	Anna Tonelli	July 2018
Graphics checked by:	Hayley Baxter	July 2018
Manager sign-off:	Jennifer Proctor	1 August 2018

Revision No.	Date	Checked by	Approved by

Pre-Construct Archaeology Limited

Durham Office

Unit N19a Tursdale Business Park

Durham

DH6 5PG

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1. NON-TECHNICAL SUMMARY

- 1.1 Pre-Construct Archaeology was commissioned by Carlton & Co Consulting to undertake an archaeological evaluation prior to a housing development on land to the rear of High Stell, Middleton St George, County Durham at National Grid Reference NZ 3409 1363. The site comprised *c.* 8.5 hectares of agricultural (arable) land, currently comprising a single field.
- 1.2 A desk-based assessment (Brigantia 2015) concluded that there was moderate potential for remains of prehistoric and Roman date and low potential for remains of medieval date.
- 1.3 Further archaeological investigation was required, as part of the planning process, to inform the Local Planning Authority, Durham County Council Archaeology Section and the Client, of the character, date, extent and degree of survival of archaeological remains at the site. The aim was to provide results which would inform a decision about the requirement for further archaeological mitigation measures. A Written Scheme of Investigation was prepared by PCA and approved by DCCAS prior to the work commencing at the site (PCA 2018).
- 1.4 A geophysical (magnetometer) survey of the proposed development site was undertaken in June 2018 to evaluate the presence of sub-surface archaeological remains (AD Archaeology 2018). The survey identified magnetic anomalies suggestive of a former field system of ridge and furrow cultivation of probable post-medieval date across the site. The geophysical survey also identified a number of other magnetic anomalies, the shape and form of some of which could be suggestive of an archaeological origin.
- 1.5 The subsequent trial trenching evaluation, consisting of a 4% sample of the development area, was undertaken in July 2018 and comprised 37 50m trenches sited to investigate geophysical anomalies and areas where no anomalies were detected in order to identify the archaeological potential of the entire site. Any archaeological features present would be impacted upon by the proposed development of the site. It was the aim of this scheme of work to identify and record any archaeological remains which may be present in order to mitigate potential impacts to the heritage resource.
- 1.6 Three phases of activity were encountered within the trial trenches investigated at the site:Phase 1: Superficial Geology; Phase 2: Post-medieval field system and deposits and Phase3: Modern activity.
- 1.7 No features or deposits of archaeological significance were observed during the evaluation. All geophysical anomalies related to either variations in geology sub-strata, numerous field drains crossing the site or modern intrusions such as geotechnical trial pits and demolition material from a post-medieval structure.
- 1.8 No further archaeological mitigation is required at the site prior to development.

2. INTRODUCTION

2.1 Project Background

- 2.1.1 This report details the results of an archaeological evaluation undertaken on arable land to the rear of High Stell, Middleton St George, County Durham in July 2018 (Figure 1 & 2). The archaeological investigation was commissioned by Carlton & Co Consulting and was undertaken by Pre-Construct Archaeology Limited (PCA). The work was carried out ahead of the construction of a residential development at the site comprising approximately 200 dwellings.
- 2.1.2 The archaeological evaluation comprised trial trenching in order to identify the potential for archaeological remains within the area. A desk-based assessment of the site concluded that there was moderate potential for remains of prehistoric and Roman date and low potential for remains of medieval date (Brigantia 2015). A geophysical survey of the site identified a few anomalies of possible archaeological origin (Figure 3; AD Archaeology 2018). Thirty-seven trenches were mechanically excavated during the evaluation; 34 trenches measuring 50m in length (Trenches 1 & 5-37) and three trenches measuring 26m (Trenches 2, 3 & 4), which had to be reduced in length from 50m due to the presence of a public right of way
- 2.1.3 The Online Access to the Index of Archaeological Investigation (OASIS) reference number of the project is preconst1-322658.

2.2 Site Location and Description

- 2.2.1 The proposed site is located on the western edge of Middleton St George, a short distance to the north of the east-west railway line which runs between Darlington and Stockton.
- 2.2.2 The site covers an area of *c.* 8.5 hectares of agricultural (arable) land, currently comprising a single field, bounded to the north by three reservoirs of Victorian date, and to the south and west by arable fields. On the east it is bounded by a modern housing estate, overlooked by the rear gardens of High Stell, The Greenway, and Grendon Gardens.

2.3 Geology and Topography

- 2.3.1 The bedrock geology of the area comprises Sherwood Sandstone Group formed approximately 229 to 271 million years ago in the Triassic and Permian Periods when the local environment was previously dominated by rivers (*British Geological Survey* website).
- 2.3.2 The superficial geology within the development boundary comprises Devensian-Diamicton till formed up to two million years ago in the Quaternary Period. These deposits were formed in cold periods with Ice Age glaciers scouring the landscape and depositing moraines of till with outwash sand and gravel deposits from seasonal and post-glacial meltwaters (*ibid*.).

2.3.3 Recent archaeological investigations of sites situated on ploughed arable land on the boulder clays of the regions have highlighted the potential for archaeological features to remain undetected by geophysical survey or be visible as cropmarks.

2.4 Planning Background

- 2.4.1 The archaeological investigation was required, as part of the planning process, to inform the Local Planning Authority (LPA), Durham County Council Archaeology Section (DCCAS), and the Client, of the character, date, extent and degree of survival of archaeological remains at the site. The aim was to provide results which should inform a decision regarding further archaeological mitigation measures prior to development.
- 2.4.2 The requirement to undertake the archaeological investigation is in line with planning policy at a national level, at the time of the fieldwork set out in National Planning Policy Framework (NPPF) (Department for Communities and Local Government 2012). The NPPF came into effect in 2012, replacing Planning Policy Statement 5: 'Planning for the Historic Environment' (PPS5) (DCLG 2010), to provide updated guidance for LPAs, property owners, developers and others on the conservation and investigation of the historic environment. Heritage assets those parts of the historic environment that have significance because of their historic, archaeological, architectural or artistic interest remain a key concept of the NPPF, retained from PPS5. Despite the deletion of PPS5, the PPS4: Planning for the Historic Environment Practice Guide (English Heritage DCMS and DCLG (revised) 2012), remains a valid, UK Government-endorsed, document. A revised version of the NPPF was published on 26 July 2018, as the current project was undertaken before this date, and the new document does not contain any changes relevant to this project, the 2012 document is referred to below.
- 2.4.3 Chapter 12 of the NPPF 'Conserving the historic environment' describes in paragraph 126, how LPAs should '... set out in their Local Plan a positive strategy for the conservation and enjoyment of the historic environment' and details, in paragraph 128, that 'in determining application, LPAs should require an applicant to describe the significance of any heritage assets affected, including any contribution made by their setting. The level of detail should be proportionate to the assets importance and no more than is sufficient to understand the potential impact of the proposal on their significance. As a minimum, the relevant [Historic Environment Record] HER should have been consulted and the heritage assets assessed using appropriate expertise where necessary. Where a site on which development is proposed includes or has the potential to include heritage assets assessed using appropriate expertise where necessary. Where a site on which development is proposed includes or has the potential to include heritage assets with archaeological interest, LPAs should require developers to submit an appropriate desk-based assessment and where necessary [the results of] a field evaluation'.

- 2.4.4 The archaeological investigation was carried out as a condition (Condition 15) of planning application 15/00976/OUT for residential development of up to 200 dwellings including highway improvements, public open space, landscaping and associated works. Condition 15 states that:
 - No Development shall take place until an archaeological mitigation strategy has been submitted to, and approved in writing, by the local planning authority. The strategy shall include details of the following:
 - (vii) Measures to ensure the preservation in situ, or the preservation by record, of archaeological features of identified importance;
 - (viii) Methodologies for the recording and recovery of archaeological remains including artefacts and ecofacts;
 - (ix) Post-fieldwork methodologies for assessment and analyses;
 - (x) Report content and arrangements for dissemination, and publication proposals;
 - (xi) Archive preparation and deposition with recognised repositories;
 - (xii) A timetable of works in relation to the proposed development, including sufficient notification and allowance of time to ensure that the site work is undertaken and completed in accordance with the strategy;
 - (xiii) Monitoring arrangements, including the notification in writing to the County Durham Archaeologist of the commencement of archaeological works and the opportunity to monitor such works;
 - (xiv) A list of all staff involved in the implementation of the strategy, including sub-contractors and specialists, their responsibilities and qualifications

REASON – To comply with Policy CS14 (E) (12) of Borough of Darlington Core Strategy Document (2011) as the site may potentially contain features of local archaeological importance and para. 135 and 141 of the NPPF.

2.4.5 DCCAS has responsibility for archaeological development control in relation to the historic environment. No specification for the archaeological work was produced by the LPA, however a Written Scheme of Investigation (WSI) was submitted and approved by DCCAS prior to work commencing (PCA 2018).

2.5 Archaeological and Historical Background

2.5.1 No heritage assets are listed within the boundaries of the proposed development site. Pollen evidence from Neasham Fen, c. 3.5km south-west of the site, demonstrated woodland clearance occurring at the beginning of the Neolithic period and again, episodically, during both the 2nd and 1st millennia BC. The general picture provided by such

palaeoenvironmental evidence is of large tracts of land being cleared for cereal cultivation, suggesting permanent human settlement in the area by the Middle to Late Bronze Age. Aerial photographs have suggested evidence for possible prehistoric activity in the form of cropmarks north and west of the study site. These include evidence of possible Iron Age (or Romano-British) settlements at Morton Farm *c*. 1.5km to the west (HER 318), Morton Palms Farm *c*. 1.8km to the north-west (HER 632, 635, 645), High Stodhoe *c*. 1.3km to the west (HER 636), High Field Farm *c*. 1.6km to the north-west (HER 642), and at Fighting Cocks *c*. 1.2km to the north-west (HER 637). Cropmarks, possibly representing the remains of ditches, paddocks and corrals of the same periods, have also been observed within the wider vicinity of the site (HER 633, 634, 638, 639, 640, 641, 644 & 646). These include cropmarks in the field to the immediate west of the proposed development site (HER 649).

- 2.5.2 The site is bounded to the east by the route of the postulated course of a Roman Road known as Cade's Road. The existence of a Roman road linking York and Newcastle east of Dere Street had long been accepted as a general concept when John Cade of Durham suggested its course in more detail in 1785. His conjectured route crossed the Tees at Stockburn and ran via Sadberge and Great Stainton through Bradbury, Mainsforth, Old Durham, Chester-le-Street and Gateshead to Shields and Tynemouth. During the 19th century, a section of this road south of Sadberge was noted as being very perfect, although the route has not yet been substantiated by modern excavation.
- 2.5.3 Contemporary writers, such as Hutchinson, disagreed with his evidence, and other courses were suggested, mostly with a Tees crossing at Middleton St. George. The route as shown on Ordnance Survey maps is the course suggested by O. G. S Crawford.
- 2.5.4 An additional potential route is identified by R. Walton that covers the 35km from Great Stainton to Chester-le-Street and was based on his personal fieldwork during the summers of 1984 and 1985. The route was identified from earthworks and traces exposed in excavation, however the nature of the remains is recorded as unknown on the Keys to the Past entry. Walton makes claim for the presence of cobbles in excavation at various places although all are unattributed. There is no explanation as to the nature and extent of the excavation or even the identity of the excavator/observer.
- 2.5.5 Two Roman pottery lamps were recovered in 1875 (HER 205) *c*. 6 ft. below the surface during excavations at The Friary, Middleton St. George. They are 3rd-4th century type and one was stamped Anniser, the mark of a potter of this period. The database of the Portable Antiquities Scheme lists twelve late-Roman coins (4th century, mostly House of Constantine) from the parish of Middleton St George. The location given is NZ 36 11, which is some 2.5 kilometres to the south-east of the proposed development site, around Tees Valley Airport.
- 2.5.6 The name Middleton has Anglo-Saxon origins. The earliest written reference to Middleton, in 1166, calls it Middiltun meaning the middle settlement, village or farm in Old English (Watts

- 2002). St. George's Church the south-east of the site, is thought likely to be of early medieval origin as it contains a carved stone Anglo-Saxon sundial or mass dial.
- 2.5.7 The remains of a bridge known as Pountey's Bridge were visible in 1834 at Middleton One Row to the south-west of the proposed development. This may have been a Roman, early medieval or later structure. Pountey's Bridge was an important early crossing of the Tees. It is not mentioned by the Tudor antiquary and traveller John Leland, and so had presumably fallen or been demolished by the 1540s, though some remains survived to be recorded by Surtees in 1817: it was located south-west of Middleton St George.
- 2.5.8 By 1166, Middleton had been divided into Over Middleton (Middleton One Row) and Nether Middleton (Middleton St. George) (VCH 1968). The estate of Middleton One Row was owned by the Surtees family from the 12th to the 16th century. The manorial estate of Middleton St. George contained the parish church serving both estates. The estate was owned by Godfrey Baard in 1166. The existing village of Middleton St. George, within which the study site is located, is not geographically related to the medieval manorial estate of the same name.
- 2.5.9 The Baard family held the estate of Middleton St. George until the 14th century when sometime before 1378, the estate was inherited by William Walworth. By 1416, the manor belonged to John Killinghall. It continued in the ownership of the Killinghall family until 1569. Settlement within the parish of Middleton St. George in the medieval period were centred on Middleton One Row and Middleton Low Hall. Any other settlements within the parish in the medieval period are likely to have been centred on location now occupied by farms.
- 2.5.10 Although there is no mapping of the area from the medieval period, there is little to suggest that the site was anything other than open agricultural land in the medieval period.
- 2.5.11 The opening of Dinsdale Spa in 1797, south of the site, transformed Middleton One Row from an agricultural settlement to a resort. The construction of a new bath house in 1824 increased the number of visitors, with a writer in 1828 noting that three quarters of the village had recently been rebuilt, and many new houses added (Walker 1828). These developments did not affect the study site, which remained open agricultural land. The opening of the Stockton and Darlington Railway in 1825 provided Middleton with a railway link from Fighting Cocks. The novelty of this mode of transport boosted interest in Middleton as a resort in the mid-19th century.
- 2.5.12 Successive editions of the Ordnance Survey show virtually no change affecting the proposed development site since the mid-19th century; the Second Edition of 1898 shows the site occupies a large rectangular field within the pattern created by the Enclosure movement of the late 18th and early 19th centuries and unchanged since, at the latest, 1856. The site is bisected north-south by a footpath, and another crosses the south-west corner of the site. On the northern boundary stand the Fighting Cocks Reservoirs, belonging to the Stockton & Middlesbrough Corporation's Water Works; the three large reservoirs do

not appear on the First Edition of 1856, at which time the area consisted of two small rectangular fields with the single small, square reservoir to the east. Fighting Cocks is the name given to the small settlement north-east of the site, deriving its name from a public house. The course of the Roman road is shown along the site's eastern boundary (it is marked as Site of Roman road, indicating that there were no visible remains when it was surveyed). The Second, Third and Fourth OS editions (circa 1894-1950) show a small, squarish feature in the north-western quadrant of the site; it was probably associated with the reservoirs and has left no trace.

3. PROJECT AIMS AND RESEARCH OBJECTIVES

3.1 Project Aims

3.1.1 The project aims to fulfil the requirements of the local planning authority by undertaking an appropriately specified scheme of archaeological work. The primary aim of the scheme of works was to determine the absence/presence of archaeological features on site. The work aimed to attempt to define the presence, character, date and extent of any structures or archaeological deposits within the boundaries of the proposed development site. The results are to be used to inform decisions regarding further mitigation measures that may be required at the site prior to the proposed development.

3.2 Research Objectives

- 3.2.1 The project was undertaken with reference to the research framework set out in *Shared Visions: The North-East Regional Research Framework for the Historic Environment* (NERRF) (Petts and Gerrard 2006), which highlights the importance of research as a vital element of development-led archaeological work. By setting out key research priorities for all periods of the past, NERRF allows archaeological projects to be related to wider regional and national priorities for the study of archaeology and the historic environment.
- 3.2.2 The NERRF Research Strategy for the Bronze Age and Iron Age has identified five Key Research Themes which address a range of archaeological topics. As the site is situated within a landscape that was evidently relatively densely settled during the later Iron Age, the work has the potential to provide a contribution to all off these Key Research Themes:
 - 11. Chronology
 - 12. Changing landscapes
 - 13. Settlement function
 - 14. Social organisation and identity
 - 15. Material culture
- 3.2.3 The work also had the potential to contribute to NEERF Research Strategies for the Roman period, particularly R.1 *Landscape Survey: the route of Cade's Road from the Tees to Durham.*
- 3.2.4 An appropriate level of reporting on the work is required, including, if necessary, full analysis and publication of any notable archaeological findings upon completion of the evaluation. Thus, the results of the work constitute the preservation by record of any archaeological remains encountered and subsequently removed during the course of works.

4. ARCHAEOLOGICAL METHODOLOGY

4.1 Fieldwork

- 4.1.1 The fieldwork was undertaken in compliance with the codes and practice of the Chartered Institute for Archaeologists and the relevant ClfA standard and guidance document (ClfA 2014 a & b). PCA is a ClFA 'Registered Organisation'. All fieldwork and post-excavation was carried out in accordance with the Yorkshire, the Humber & The North East: Regional Statement of Good Practice (SYAS 2011) and was in compliance with the *Standards for all Archaeological Work in County Durham and Darlington* document issued by Durham County Council Archaeology Section in March 2017.
- 4.1.2 The project was managed in line with principles set out in Historic England's 'Management of Research Projects in the Historic Environment' (MoRPHE) published in 2006.
- 4.1.3 All archaeological staff involved in the project were suitably qualified and experienced for their project roles. The project was overseen for PCA by the Regional Manager of the Durham Office, Jennifer Proctor.
- 4.1.4 All relevant Health and Safety legislation, regulations and codes of practice were respected. PCA's Health and Safety (H&S) Policy is the starting point for managing H&S at all locations where PCA carries out its operations.
- 4.1.5 As detailed in the WSI the evaluation comprised a 4% sample of the proposed development with 37 trenches located across the site (Figure 2 & 3). The proposed mitigation is in line with the requirements for archaeological mitigation detailed in *Standards for All Archaeological Work in County Durham and Darlington* (DCCAS 2017).
- 4.1.6 The trenches were targeted over anomalies observed in the geophysical survey and apparent blank areas of archaeology to maximise the potential of the site and to provide the most productive archaeological information and address the research Aims and Objectives.
- 4.1.7 The trial trenching evaluation was carried out between the 2nd July 2018 to 13th July 2018 over ten days and consisted of thirty seven 50m long x 1.8m wide trenches. Trenches 2, 3 and 4 were shortened to approximately 26m to avoid a Public Right of Way.
- 4.1.8 The 37 trenches were set-out using a Leica Viva Smart Rover Global Navigation Satellite System (GNSS), with pre-programmed co-ordinate data determined by an office-based CAD operative. During the evaluation the existing ground surface of topsoil was removed by a 13-tonne 360° tracked excavator using a toothless ditching bucket under archaeological supervision. Mechanical excavation ceased at the direction of the supervising archaeologist.
- 4.1.9 In all trenches, undifferentiated topsoil and any modern/post-medieval deposits were removed by mechanical excavator in spits of no more than 100m, moving along the length of the trench. Successive spits were removed until the first significant archaeological horizon or natural sub-stratum was reached, whichever was first.

- 4.1.10 The investigation of archaeological levels was by hand, with cleaning, examination and recording both in plan and in section, where appropriate. Investigations within the trenches followed the normal principles of stratigraphic excavation and were conducted in accordance with the methodology set out in the field manual of PCA (PCA 2009) and the Museum of London Site Manual (Museum of London 1994).
- 4.1.11 Deposits and cut features were individually recorded on the *pro-forma* 'Trench Recording Sheet' and 'Context Recording Sheet'. All site records were marked with the unique-number MSG18 (site code). All archaeological features were excavated by hand tools and recorded in plan at 1:20 or in section at 1:10 using standard 'single context recording' methods. The height of all principal strata and features was calculated in metres above Ordnance Datum (m AOD) and indicated on appropriate plans and sections.
- 4.1.12 A detailed photographic record of the evaluation was prepared using SLR cameras (35mm film black and white prints for archive purposes) and by digital photography. All detailed photographs included a legible graduated metric scale. The photographic record illustrated both in detail and general context archaeological exposures and specific features in all trenches.

4.2 Post-excavation

- 4.2.1 The stratigraphic data for the project comprises written and photographic records. A total of 150 archaeological contexts were defined in the 37 trenches (Appendix 2). Post-excavation work involved checking and collating site records, grouping contexts and phasing the stratigraphic data. A written summary of the archaeological sequence was then compiled, as described in Section 5.
- 4.2.2 During the evaluation, no artefactual material was retained as post-medieval and modern finds were only noted from the topsoil or the post-medieval plough furrows.
- 4.2.3 The complete Site Archive, in this case comprising only the written, drawn and photographic records (including all material generated electronically during post-excavation) will be packaged for long term curation. In preparing the Site Archive for deposition, all relevant standards and guidelines documents referenced in the Archaeological Archives Forum guidelines document (Brown 2007) will be adhered to, in particular a well-established United Kingdom Institute for Conservation (UKIC) document (Walker, UKIC 1990) and the most recent CIfA publication relating to arching (CIfA 2014c).
- 4.2.4 At the time of writing the Site Archive was housed at the Durham Office of PCA, Unit 19a Tursdale Business Park, Durham, DH6 5PG. When complete, the site Archive will be deposited at the relevant museum under the site code MSG18.

5. RESULTS: THE ARCHAEOLOGICAL SEQUENCE

During the archaeological investigation, separate stratigraphic entities were assigned unique and individual context numbers, which are indicated in the following text as, for example [123]. The context numbers have been assigned per trench therefore contexts from Trench 1 are in the 100s and contexts from Trench 2 in the 200s etc. The archaeological sequence is described by placing stratigraphic sequences within broad phases, assigned on a site-wide basis in this case. An attempt has been made to add interpretation to the data and correlate these phases with recognised historical and geological periods. The figures can be found in Appendix 1 with the context index and stratigraphic matrix located in Appendix 2 and 3 respectively. A selection of plates can be found within Appendix 4.

5.1 Phase 1: Geological substratum

- 5.1.1 Phase 1 represents the natural geological material exposed within all 37 trenches which generally comprised hard mid reddish brown sandy clay with occasional inclusions of iron stone and fragments of sub-rounded sandstone (Plate 1).
- 5.1.2 The maximum and minimum height of the upper interfaces of geological substratum was 51.15m AOD in Trench 15 and 46.19m AOD in Trench 1 respectively, both at the southwestern extent of the site.
- 5.1.3 The depth at which the superficial geology was encountered below existing ground level varied across the site and was dependent on the thickness of the topsoil and the extant of the plough furrows, however, within all trenches the geological substratum was observed between 0.25m and 0.45m below ground level.
- 5.1.4 Geophysical anomalies 1, 2, 4 and 5 were all of geological origin.

5.2 Phase 2: Post-Medieval

- 5.2.1 Phase 2 represents post-medieval activity at the site in the form of plough furrows noted within all trenches except Trench 21 & 22 (the furrows within Trench 34 & 35 were recorded in section) and a gravel spread within Trench 34.
- 5.2.2 Two groups of plough furrows were noted across the site running either roughly east-west (Figure 3, 4 & 5) or north-south (Figure 3 & 5). The earliest field system comprised the north-south plough furrows within Trench 9 and 18 as east-west furrow [1803] within Trench 18 truncated the north-south furrow [1805] (Figure 5). The wavelength of the north-south furrows was only observed within Trench 9 at c. 2.25m apart due to the scale of truncation from later agricultural regimes at the site.
- 5.2.3 The north-south furrows [903] and [1805] were filled by a single uniform mid brown grey sandy clay [902] and [1804] respectively. Post-medieval pottery was noted within furrow fill [1804]. Figure 5 Section 2 illustrates a sample section across furrow [1805] from Trench 18 (Plate 2).

- 5.2.4 The later group of furrows (Figure 3 & 4: Section 4) were aligned east-west and had a gradual break of slope at the top and bottom with a concave base. The furrows were spaced on average between 2.5m to 5.37m apart with a width of approximately 1.02m to 2.38m being observed (details provided in the table below). The wider wavelengths noted in some of the trenches is not a true representation of the width between some of the furrows as modern agricultural practices have truncated the majority of the furrows (modern plough scars were observed in all trenches approximately 0.50m apart). The furrows were filled by a single uniform mid greyish brown sandy clay (Plate 3). A sample section across two furrows within Trench 2 is depicted in Figure 4: Section 4.
- 5.2.5 Sherds of post-medieval pottery and fragments of clay tobacco pipe stem were noted within the plough furrow fill.

Trench	Context	Furrow Fill	Number of	Average	Average	Distance
TTCTTCTT			Furrows	Width	Depth	Apart
1	[103]	[102]	1	0.53m	40mm	n/a
2	[203]	[202]	4	1m	0.17m	5.17m
3	[303]	[302]	2	0.60m	90mm	22.36m
4	[403]	[402]	5	0.60m	0.22m	2.5m to 4.15m
5	[503]	[502]	4	0.60m	0.10m	4.24m
6	[603]	[602]	8	1.30m	80mm	2.81m to 4.64m
7	[703]	[702]	8	0.90m	40mm	1.65m to 5.97m
8	[803]	[802]	7	0.80m	0.20m	1.74m to 4.8m
9	n/a	n/a	n/a	n/a	n/a	n/a
10	[1003]	[1002]	4	1.46m	40mm	2.48m to 5.02m
11	[1103]	[1102]	1	0.54m to LOE	0.10m	n/a
12	[1203]	[1202]	1	1m to LOE	70mm	n/a
13	[1303]	[1302]	3	0.80m	0.10m	3.40m to 9.54m
14	[1403]	[1402]	3	1.40m	0.12m	4.29m
15	[1503]	[1502]	2	0.80m	60mm	1.16m
16	[1603]	[1602]	5	0.62m	0.18m	2.81m to 9.60m
17	[1706]	[1705]	5	0.58m	0.06m	2.82m
18	[1803]	[1802]	5	1.32m	70mm	3.88m
19	[1903]	[1902]	9	1.81m	0.12m	2.98m to 6.06m
20	[2003]	[2002]	4	0.82m	0.16m	3.81m
21	n/a	n/a	n/a	n/a	n/a	n/a
22	n/a	n/a	n/a	n/a	n/a	n/a
23	[2303]	[2302]	3	1m	0.15m	7.82m to 24.08m
24	[2403]	[2402]	6	1m	20mm	2.92m to 7.5m
25	[2503]	[2502]	8	1.3m	20mm	3.5m to 8.5m
26	[2603]	[2602]	6	1.10m	70mm	1.6m to 3.3m

27	[2703]	[2702]	6	1m	0.15m	2.48m to 5.22m
28	[2803]	[2802]	2	1.16m	0.10m	8.44m
29	[2903]	[2902]	1	0.84m	0.12m	n/a
30	[3003]	[3002]	5	1.02m	0.11m	4.28m
31	[3103]	[3102]	2	0.70m	67mm	8.6m
32	[3203]	[3202]	5	0.90m	45mm	2.4m to 6.05m
33	[3303]	[3302]	1	0.80m	35mm	n/a
34	[3403]	[3402]	2	1.20	0.20m	5.30m
35	[3503]	[3502]	4	0.82m	0.11m	4.62m
36	[3603]	[3602]	1	1.72m	40mm	n/a
37	[3703]	[3702]	1	0.90m	0.20m	n/a

East-west plough furrow dimensions across the site (no east-west furrows within Trench 9,

21 & 22 and furrows within Trench 34 & 35 only within section)

- 5.2.6 A gravel spread [3404] was noted at the northern end of Trench 34 for approximately 3.8m north-south and 0.20m thick (Plate 4). Numerous sherds of post-medieval pottery were observed within the deposit as well as the occasional shard of glass. The deposit is likely the result of late post-medieval waste dumping.
- 5.2.7 Numerous ceramic field drains were also noted across the site which corresponded to unnumbered geophysical responses such as the linear in Trench 16.

5.3 Phase 3: Modern

- 5.3.1 Phase 3 represents the turf and topsoil that formed the existing ground surface across the site, as well as 20th-century demolition deposits.
- 5.3.2 Within the centre of Trench 17 was demolition cut [1704] which extended for a distance of 10.24m north-south across the width of the trench and was 0.76m deep (Plate 5). The demolition cut was filled with dark brownish grey silty clay [1702] c. 0.58m thick and firm dark greyish brown silty clay [1703] c. 0.18m thick. Both fills contained frequent fragments of ceramic building material and the occasional sherd of post-medieval pottery. The demolition material presumably derived from a structure that is shown on the Ordnance Survey of 1897 up until the 1930s when it was removed from the site. This feature corresponds to geophysical anomaly 3.
- 5.3.3 A modern test pit from an earlier phase of geotechnical works was also observed within Trench 34 (Figure 3).
- 5.3.4 The topsoil across the site comprised friable dark brownish grey silty to sandy clay and was present across all 37 trenches. The maximum and minimum recorded thickness was 0.45m in Trench 32 and 0.25m in Trench 8 with the maximum and minimum height of the ground surface noted as 51.52m AOD in Trench 15 and 46.46m AOD in Trench 1.

6. CONCLUSIONS AND RECOMMENDATIONS

6.1 Conclusions

- 6.1.1 The archaeological investigations comprised the investigation of 37 trenches on land to the rear of High Stell, Middleton St George, County Durham. Geological deposits, post-medieval furrows and a demolition cut were encountered as well as numerous field drains. This activity has been assigned to three phases of activity:
 - Phase 1: Geological sub-stratum comprising glacial till was encountered in all trenches;
 - Phase 2: Post-medieval furrows within all trenches except Trench 21 and 22 and a gravel deposit within Trench 34;
 - Phase 3: Modern topsoil was recorded across all trenches with its developed turf line forming the existing ground surface within area. The rubble remains of a late 19th-century structure demolished in the 1930s was also encountered within Trench 17.
- 6.1.2 No features of archaeological significance were recorded within any of the evaluation trenches investigated. Geophysical anomalies 1, 2, 4 and 5 were identified as being of geological origin. Furthermore, anomaly 3 proved to be the rubble remains of a demolished 19th-century structure. Geophysical anomaly 6 was not investigated due to access constraints (Public Right of Way crossing the site) but due to the survey results it is thought to be of geological origin as it was located at the base of a slope.

6.2 Recommendations

- 6.2.1 .No further archaeological mitigation is required at the site prior to development.
- 6.2.2 No further work is required on the information recovered during the evaluation, with the Site Archive, including this report, forming the permanent record of the strata encountered.

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7.2 Online Sources

The **British Geological Survey** website: www.bgs.ac.uk. This was consulted for information regarding the geology of the study area.

8. ACKNOWLEDGEMENTS AND CREDITS

Acknowledgements

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PCA Credits

Fieldwork and Report: Scott Vance (Supervisor), Andy Abson, John Kemp and Eva Maria Gonzalez Suárez.

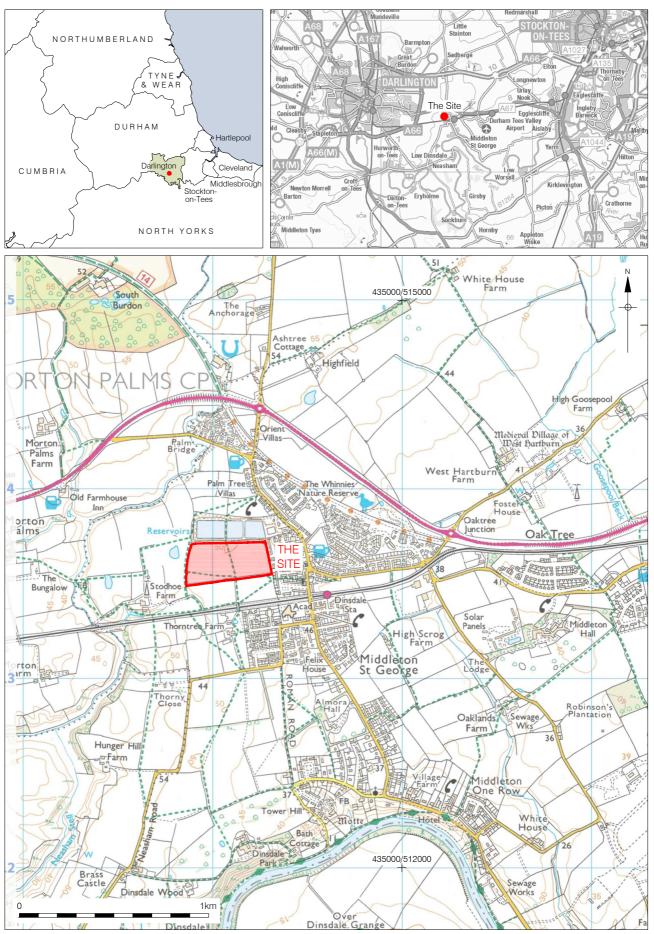
Project Manager: Jennifer Proctor

CAD: Anna Tonelli

PCA Report Number: RN 11100

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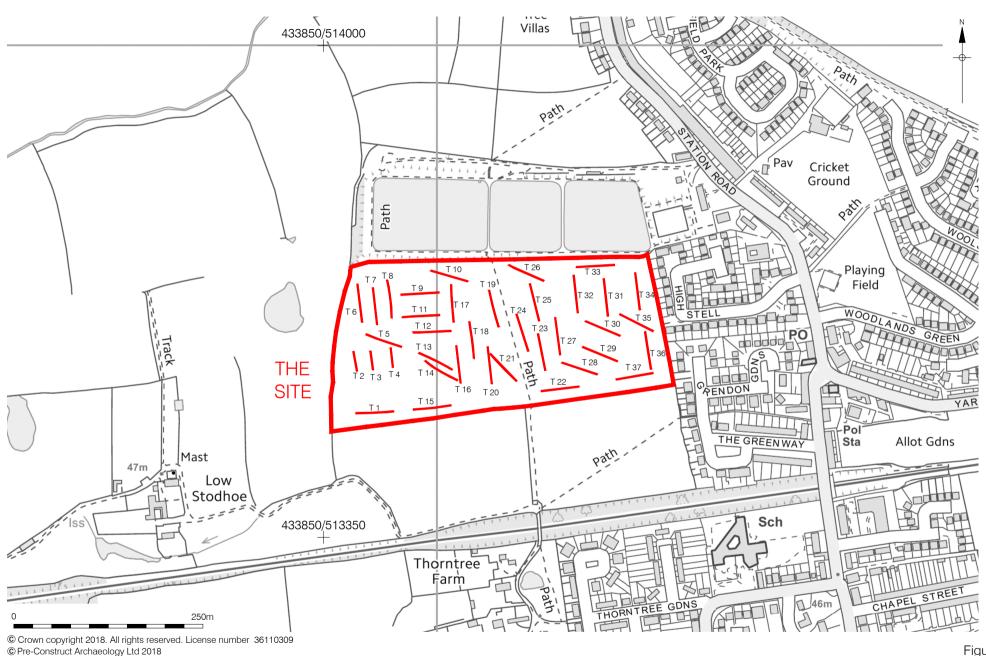
APPENDIX 1: FIGURES



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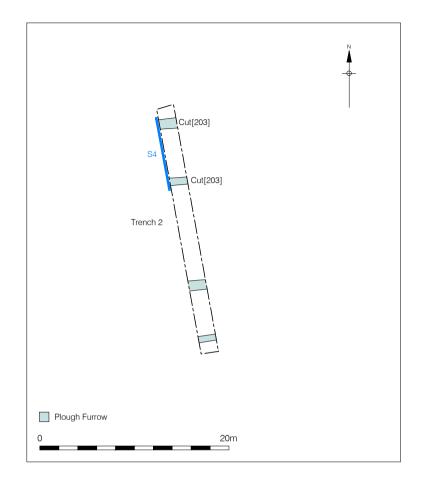
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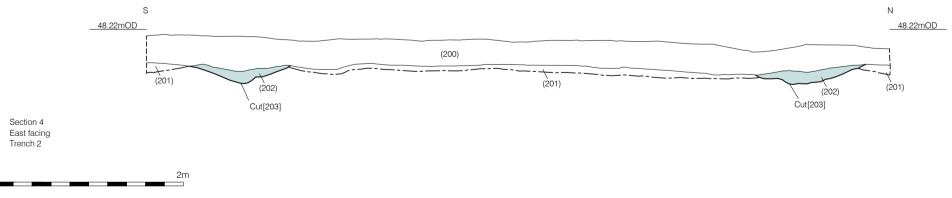
Figure 2 Detailed Site Location 1:5,000 at A4



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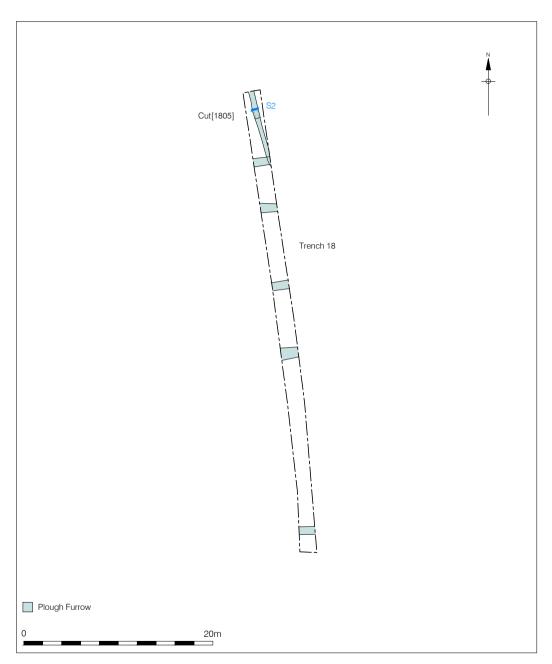
Figure 3
Trench Location Plan on Geophysics
1:1250 at A3



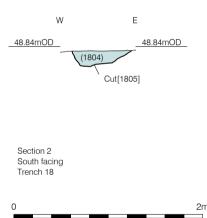


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Figure 4 Plan of Trench 2 and Section 4 Plan 1:400, Section 1:40 at A4



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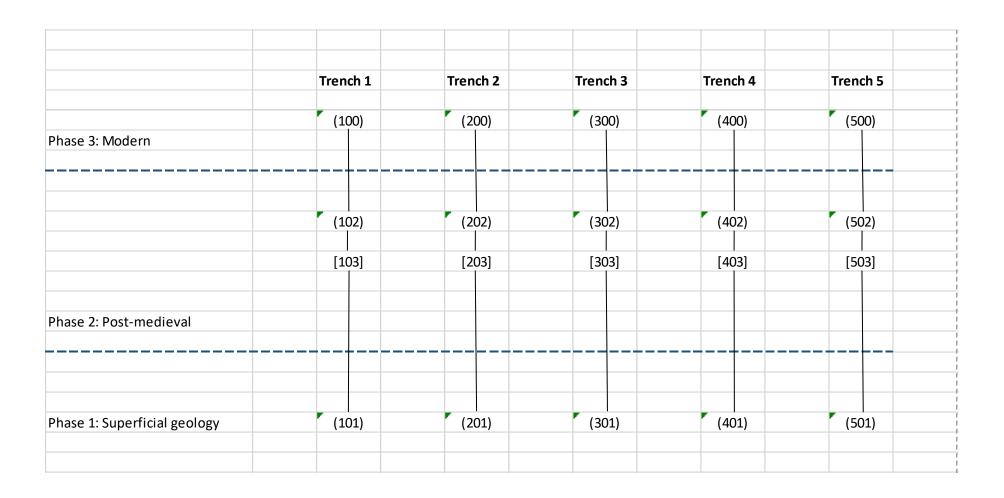
APPENDIX 2: CONTEXT INDEX

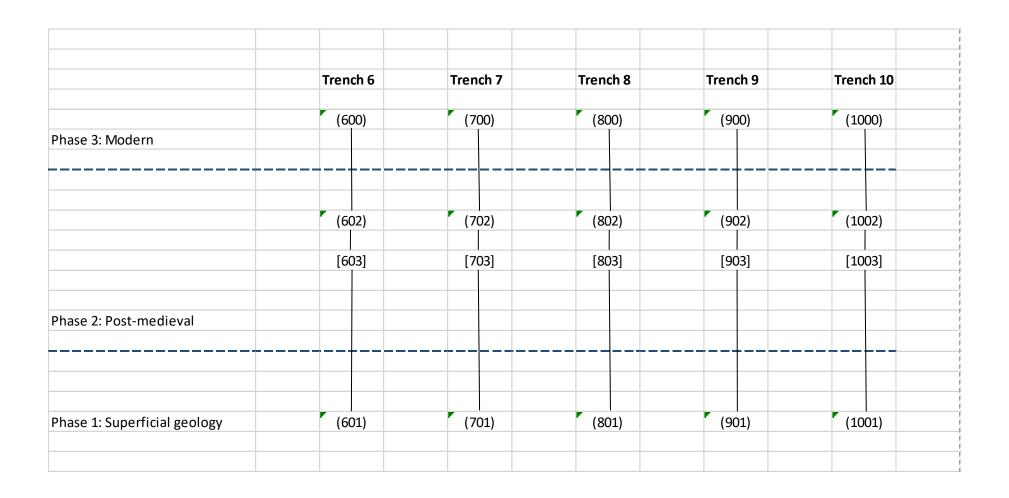
Context	Phase	Type 1	Type 2	Fill of	Interpretation
Trench 1					
100	3	Deposit	Layer		Topsoil
101	1	Deposit	Layer		Superficial geology
102	2	Deposit	Fill	103	Fill of furrow [103]
103	2	Cut	Linear		Furrow
Trench 2					
200	3	Deposit	Layer		Topsoil
201	1	Deposit	Layer		Superficial geology
202	2	Deposit	Fill	203	Fill of furrow [203]
203	2	Cut	Linear		Furrow
Trench 3			•		
300	3	Deposit	Layer		Topsoil
301	1	Deposit	Layer		Superficial geology
302	2	Deposit	Fill	303	Fill of furrow [303]
303	2	Cut	Linear		Furrow
Trench 4					
400	3	Deposit	Layer	T	Topsoil
401	1	Deposit	Layer		Superficial geology
402	2	Deposit	Fill	403	Fill of furrow [403]
403	2	Cut	Linear		Furrow
Trench 5		<u> </u>			
500	3	Deposit	Layer		Topsoil
501	1	Deposit	Layer		Superficial geology
502	2	Deposit	Fill	503	Fill of furrow [503]
503	2	Cut	Linear		Furrow
Trench 6	_		1	_	
600	3	Deposit	Layer		Topsoil
601	1	Deposit	Layer		Superficial geology
602	2	Deposit	Fill	603	Fill of furrow [603]
603	2	Cut	Linear		Furrow
Trench 7	_				
700	3	Deposit	Layer		Topsoil
701	1	Deposit	Layer		Superficial geology
702	2	Deposit	Fill	703	Fill of furrow [703]
703	2	Cut	Linear	100	Furrow
Trench 8		_ Gut			T direct
800	3	Deposit	Layer		Topsoil
801	1	Deposit	Layer		Superficial geology
802	2	Deposit	Fill	803	Fill of furrow [803]
803	2	Cut	Linear	000	Furrow
Trench 9		l Sut	Lincai		1 411011
900	3	Deposit	Layer		Topsoil
900	1	Deposit	Layer		Superficial geology
902	2	Deposit	Fill	903	Fill of furrow [903]
902	2	Cut	Linear	303	Furrow
Trench 10		Cut	Lilleal		I UITOW
TIERCH TO	,				

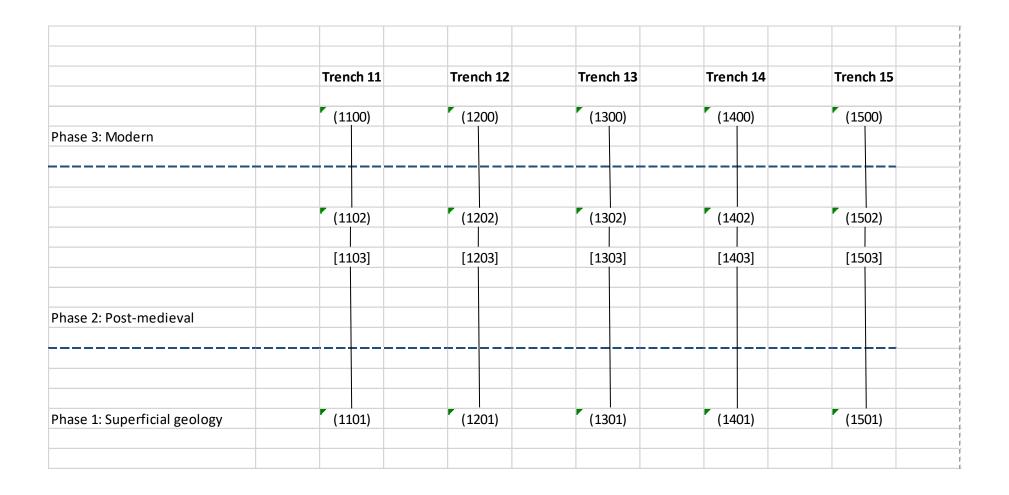
1000	3	Donosit	Lover	1	Tangail
		Deposit	Layer		Topsoil
1001	1	Deposit	Layer	1002	Superficial geology
1002	2	Deposit Cut	Fill	1003	Fill of furrow [1003]
1003		Cut	Linear		Furrow
Trench 11		Donosit	Laver	T	Tanadi
1100	3	Deposit	Layer		Topsoil
1101	1	Deposit	Layer	4400	Superficial geology
1102	2	Deposit	Fill	1103	Fill of furrow [1103]
1103	2	Cut	Linear		Furrow
Trench 12		I 5 '1	Ι.	I	T = "
1200	3	Deposit	Layer		Topsoil
1201	1	Deposit	Layer	1000	Superficial geology
1202	2	Deposit	Fill	1203	Fill of furrow [1203]
1203	2	Cut	Linear		Furrow
Trench 13		T =	1.	T	I —
1300	3	Deposit	Layer		Topsoil
1301	1	Deposit	Layer		Superficial geology
1302	2	Deposit	Fill	1303	Fill of furrow [1303]
1303	2	Cut	Linear		Furrow
Trench 14		1			
1400	3	Deposit	Layer		Topsoil
1401	1	Deposit	Layer		Superficial geology
1402	2	Deposit	Fill	1403	Fill of furrow [1403]
1403	2	Cut	Linear		Furrow
Trench 15		,			
1500	3	Deposit	Layer		Topsoil
1501	1	Deposit	Layer		Superficial geology
1502	2	Deposit	Fill	1503	Fill of furrow [1503]
1503	2	Cut	Linear		Furrow
Trench 16					
1600	3	Deposit	Layer		Topsoil
1601	1	Deposit	Layer		Superficial geology
1602	2	Deposit	Fill	1603	Fill of furrow [1603]
1603	2	Cut	Linear		Furrow
Trench 17					
1700	3	Deposit	Layer		Topsoil
1701	1	Deposit	Layer		Superficial geology
1702	3	Deposit	Fill	1704	Demolition material within [1704]
1703	3	Deposit	Fill	1704	Demolition material within [1704]
1704	3	Cut	Discrete		Demolition cut
1705	2	Deposit	Layer	1706	Fill of furrow [1706]
1706	2	Cut	Linear		Furrow
Trench 18					
1800	3	Deposit	Layer		Topsoil
1801	1	Deposit	Layer		Superficial geology
1802	2	Deposit	Fill	1803	Fill of furrow [1803]
1803	2	Cut	Linear		Furrow
1804	2	Deposit	Fill	1805	Fill of linear gully [1805]
1805	2	Cut	Linear	1200	Furrow/field boundary?
.000		Jul	Linoui	1	1 anominal boundary:

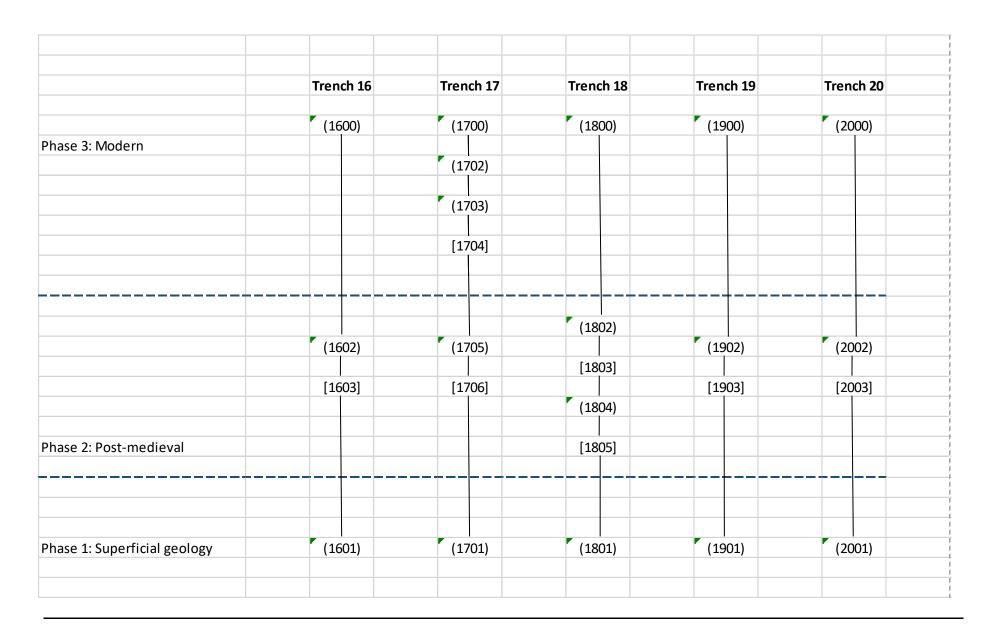
2902	2	Deposit	Fill	2903	Fill of furrow [2903]			
2903	2	Cut	Linear		Furrow			
Trench 30)							
3000	3	Deposit	Layer		Topsoil			
3001	1	Deposit	Layer		Superficial geology			
3002	2	Deposit	Fill	3003	Fill of furrow [3003]			
3003	2	Cut	Linear		Furrow			
Trench 31	Trench 31							
3100	3	Deposit	Layer		Topsoil			
3101	1	Deposit	Layer		Superficial geology			
3102	2	Deposit	Fill	3103	Fill of furrow [3103]			
3103	2	Cut	Linear		Furrow			
Trench 32	2							
3200	3	Deposit	Layer		Topsoil			
3201	1	Deposit	Layer		Superficial geology			
3202	2	Deposit	Fill	3203	Fill of furrow [3203]			
3203	2	Cut	Linear		Furrow			
Trench 33	}							
3300	3	Deposit	Layer		Topsoil			
3301	1	Deposit	Layer		Superficial geology			
3302	2	Deposit	Fill	3303	Fill of furrow [3303]			
3303	2	Cut	Linear		Furrow			
Trench 34								
3400	3	Deposit	Layer		Topsoil			
3401	1	Deposit	Layer		Superficial geology			
3402	2	Deposit	Fill	3303	Fill of furrow [3303]			
3403	2	Cut	Linear		Furrow			
3404	2	Deposit	Layer		Gravel deposit			
Trench 35		1	1					
3500	3	Deposit	Layer		Topsoil			
3501	1	Deposit	Layer		Superficial geology			
3502	2	Deposit	Fill	3503	Fill of furrow [3503]			
3503	2	Cut	Linear		Furrow			
Trench 36		T =	1 -					
3600	3	Deposit	Layer		Topsoil			
3601	1	Deposit	Layer		Superficial geology			
3602	2	Deposit	Fill	3603	Fill of furrow [3603]			
3603	2	Cut	Linear		Furrow			
Trench 37		T	1.		I "			
3700	3	Deposit	Layer		Topsoil			
3701	1	Deposit	Layer	0=00	Superficial geology			
3702	2	Deposit	Fill	3703	Fill of furrow [3703]			
3703	2	Cut	Linear		Furrow			

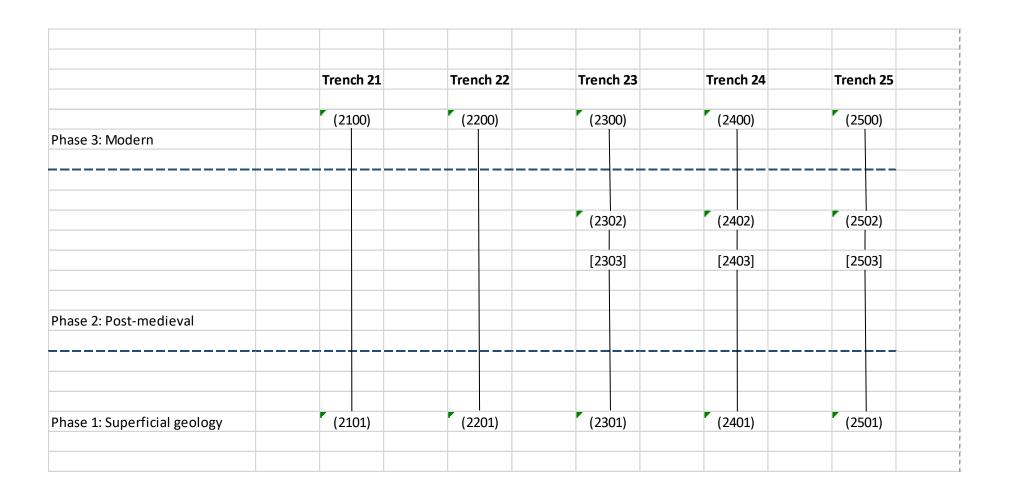
APPENDIX 3: STRATIGRAPHIC MATRIX

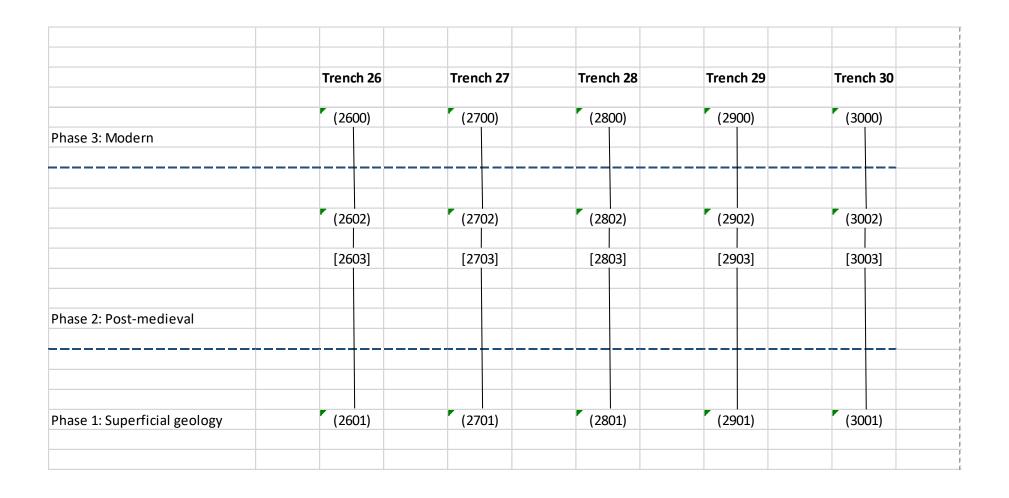


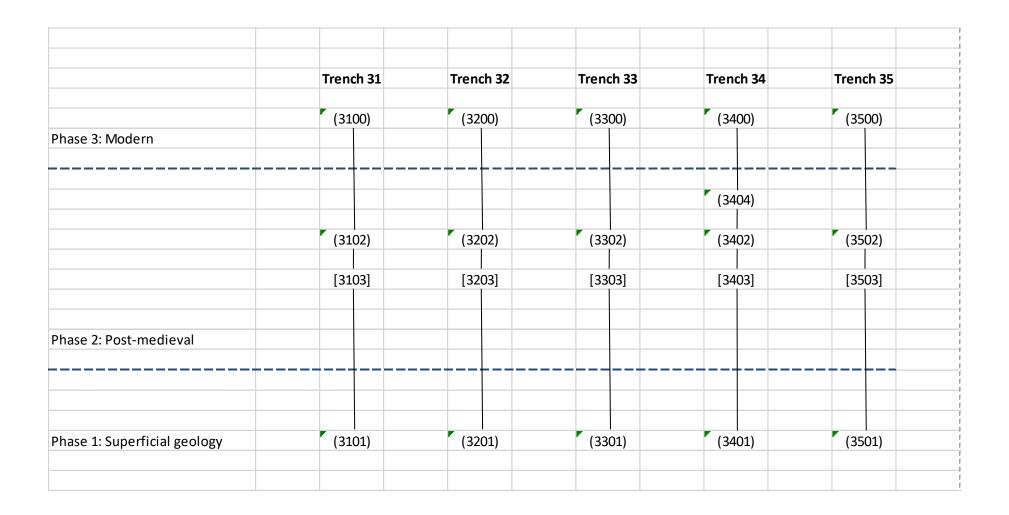


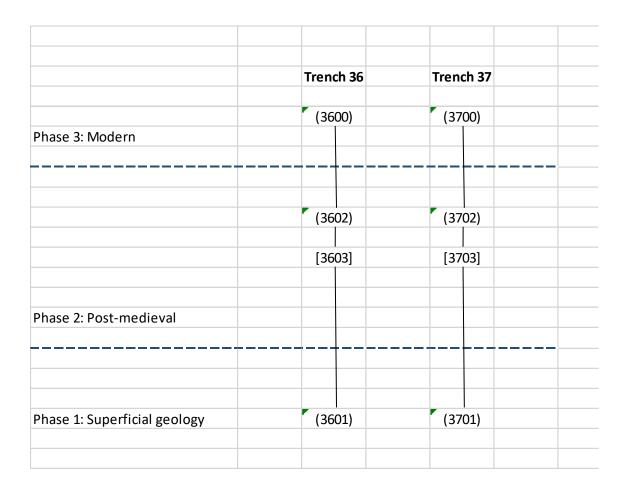












APPENDIX 4: PHOTOGRAPHIC PLATES

Plate 1: Trench 4 overview: view south, 2m scale



Plate 2: North-south plough furrow [1805]: view north, 0.2m scale





Plate 3: East-west plough furrow [203] Trench 3: view north-west, 1m scale

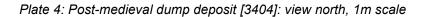




Plate 5: Demolition cut [1704] within Trench 17: view north-west, 2m scale



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PCA CAMBRIDGE

THE GRANARY, RECTORY FARM BREWERY ROAD, PAMPISFORD **CAMBRIDGESHIRE CB22 3EN** t: 01223 845 522

e: cambridge@pre-construct.com

PCA DURHAM

UNIT 19A, TURSDALE BUSINESS PARK **TURSDALE DURHAM DH6 5PG** t: 0191 377 1111

e: durham@pre-construct.com

PCA LONDON

UNIT 54, BROCKLEY CROSS BUSINESS CENTRE 96 ENDWELL ROAD, BROCKLEY **LONDON SE4 2PD** t: 020 7732 3925

e: london@pre-construct.com

PCA NEWARK

OFFICE 8, ROEWOOD COURTYARD WINKBURN, NEWARK **NOTTINGHAMSHIRE NG22 8PG** t: 01636 370410

e: newark@pre-construct.com

PCA NORWICH

QUARRY WORKS, DEREHAM ROAD **HONINGHAM NORWICH NR9 5AP**

T: 01223 845522

e: cambridge@pre-construct.com

PCA WARWICK

UNIT 9. THE MILL. MILL LANE LITTLE SHREWLEY, WARWICK WARWICKSHIRE CV35 7HN t: 01926 485490

e: warwick@pre-construct.com

PCA WINCHESTER

5 RED DEER COURT, ELM ROAD **WINCHESTER** HAMPSHIRE SO22 5LX t: 01962 849 549

e: winchester@pre-construct.com

