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METHOD STATEMENT & SAFETY PLAN
FOR AN ARCHAEOLOGICAL EXCAVATION

Prepared by Guy Hopkinson
November 1999

OSA

ON SITE ARCHAEOLOGY

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METHOD STATEMENT

1.0 Site Location, Geology & Topography

- 1.1 The site lies close to the village of West Lilling in the County of North Yorkshire. It is located to the north of Lilling Low Lane, at National Grid Reference SE 640 644.
- 1.2 The evaluation site was located on a discrete area of sand and gravel surrounded by warp and lacustrine clay, which overlies Bunter and Keuper Sandstone.
- 1.3 The site is situated at the foot of the Howardian Hills, which rise to the north, and some 200 metres from the River Foss, to the south and west. The area is currently arable land.

2.0 Archaeological Description & Summary of Previous Work

- 2.1 The site lies in an area of known archaeological significance. An RCHME sketch plot of the area indicates the presence of a rectilinear enclosure spanning the junction of Lilling Low Lane and the minor road between Sheriff Hutton and Strensall (NGR SE 6345 6480). The same plot also records a Roman road running north – south, to the south of the current investigation (approx. NGR SE 6375 6415). Further to the south is Lilling Green Romano-British farmstead with associated fields and trackways (Swan, Jones & Grady: 1993).
- 2.2 Aerial photographs of the area studied as part of the BP pipeline project have also revealed a number of cropmarks in the immediate vicinity.
- 2.3 A fluxgate gradiometer survey of the area has been undertaken as part of the BP pipeline works. This encompassed an area measuring 260 metres by 40 metres, and revealed a number of anomalies, mainly concentrated at the western end of the survey area, which included ditch and pit type anomalies.
- 2.4 An evaluation of the site was undertaken during January and February of 1999. This provided evidence of a medieval rigg and furrow cultivation system, which overlay a number of Roman/Romano-British features, which were interpreted as a ‘villa’ and associated field system. The results from each of the five trenches excavated during the evaluation program are summarised below.
 - 2.4a Trench 1 revealed only a single furrow.
 - 2.4b The earliest features in Trench 2 consisted of a series of ditches. At the northwest end of the trench was a north – south aligned ditch. Towards the centre of the trench was a second ditch, aligned approximately east – west, and thought to be related. The fills of these ditches were waterlogged and contained organic material. The ditches were sealed by a 0.30m thick deposit containing Romano-British pottery. An intersection between two further ditches, aligned northeast – southwest and east – west, was also apparent further along the trench. A 0.5m wide slot through the intersection revealed a waterlogged fill similar to the other two ditches. Part of a cobble spread, possibly a surface, truncated by a furrow was situated at the northwestern end of the trench.

- 2.4c Two east – west aligned ditches were found in Trench 3, one situated at the southeastern end and the other towards the northwestern end of the trench. Located between them was a third ditch aligned approximately north – south. A cobble spread, truncated by a furrow, was situated at the southeastern end of the trench.
- 2.4d Two ditches, one aligned approximately north – south and the other east – west, were located in Trench 4. The ditches were thought to be related. Romano-British pottery was recovered from the fill of the east – west ditch. A row of three postholes, aligned east – west, were situated at the southeastern end of the trench and may be associated with the ditches. The ditches and one of the postholes were sealed by the remains of a relic soil horizon containing Romano-British pottery and a small dump of painted plaster fragments. Towards the centre of the trench was a stone structure set within a cut. This was only partially revealed during the evaluation, and little can therefore be suggested as to its origin or function. Cut into the relic soil horizon were two wall foundations aligned approximately northeast – southwest. The foundations bounded a cobble surface packed with clay which incorporated an earlier east – west aligned wall foundation. A pit containing a quantity of charcoal and burnt clay was sealed by the earlier wall foundation. The foundations were overlain by a spread of demolition debris containing lumps of *opus signinum* and tile.
- 2.4e The trench contained two ditches, one aligned north – south and the other northeast – southwest, and a ditch terminal. A cobble spread partially overlay the north – south ditch. A curvilinear slot and a narrow gully were situated at the southeast end of the trench.
- 2.5 Subsequent to the results of the evaluation the geophysical survey was extended to the northwest in a 40 metre wide corridor along the pipeline route, and also to the northeast and southwest of the original survey area. The northwest extension measured 40m by 200m, the northeast extension 120m by 120m, and the southwest extension 120m by 40m. This showed ‘...a continuation of [the excavated] features and would appear to have mapped the core of the settlement. A number of linear trends orientated north – south through the data indicate the remains of ridge and furrow cultivation... [and] a broad linear anomaly that is likely to be natural in origin’ (Harvey, L, 1999).

3.0 The Excavation Programme

- 3.1 An archaeological evaluation of the proposed development area was undertaken by *On-Site Archaeology* during January and February of 1999, the results of which are reported on in OSA report NO: 99EV02 and have been summarised in this document (paragraphs 2.4a – 2.4e).
- 3.2 It is clear from the evaluation trenches that substantial archaeological deposits are likely to exist within the proposed pipeline route. Section 5 below sets out a detailed methodology for the excavation of these remains.

4.0 Research Objectives

- 4.1 The evaluation of this site provided significant information regarding the medieval and Romano-British activity in this area. Following assessment of the environmental samples, the Environmental Archaeology Unit at the University of York (EAU) stated that *'the recovery of bioarchaeological remains is very rare from a site of this type in the northern part of the Vale of York'* and that *'if further excavation is undertaken an extensive sampling programme should be implemented and provision made for the subsequent analysis and publication of the material'*. The excavation of the site allows an opportunity to expand on the information gained from the evaluation, and to address the following questions:
- 4.1a what was the character and extent of pre-Roman occupation of this area?
 - 4.1b what was the character and extent of Romano-British occupation of this area?
 - 4.1c what was the character and extent of post-Roman, pre-medieval activity?
 - 4.1d what was the character and extent of the medieval exploitation of the site?
 - 4.1e what is the nature, degree and value of environmental preservation on the site?

5.0 Excavation Methodology

- 5.1 The on-site examination will consist of the following work:
- 5.1a The excavation area will comprise a two metre wide corridor based along the pipe centre line, which will be surveyed by the pipe contractors (Murphys). This will extend immediately from the east of Howl Beck to a point approximately 30m to the east of evaluation Trench 2 (or where archaeological features are no longer apparent). This area will incorporate evaluation Trenches 5 and 2, which were positioned on the pipe centre line¹. See Figure 1 at back of this document.
 - 5.1b Prior to the topsoil strip a metal detector survey of the excavation area shall be conducted, as will the machine removed topsoil/overburden. All metal detected finds shall be recovered according to the Code of Practice laid down by the 1996 Treasure Act.
 - 5.1c Within the area under consideration deposits will initially be removed by JCB under archaeological supervision down to the first archaeological horizon. The evaluation exercise indicated that archaeological deposits may be present 0.30m beneath the current ground surface. Archaeological deposits or features present will be hand cleaned to determine their exact nature and extent. Thereafter excavation will be entirely by hand unless it can be shown that the material present does not require detailed examination.

¹

During the pipe laying process the construction spread through this area would then involve no further soil stripping, except where it can be shown that further archaeological deposits are likely to exist under the running track. A temporary running track, using 'bog mats' placed directly onto the topsoil would be used for the passage of construction traffic through this archaeological area.

- 5.1d All features will be excavated to their full extent within the 2 metre wide excavation area. Pits and postholes will be half sectioned, their sections recorded, and then the remainder of the fill excavated.
- 5.2 Archaeological recording will comprise:
- 5.2a The trench location and section profiles will be recorded;
- 5.2b Archaeological deposits will be recorded (surveyed, drawn, described and photographed) following standard On-Site Archaeology procedures;
- 5.2c all records will be indexed, ordered, quantified, and checked for consistency;
- 5.2d all artefacts and ecofacts recovered and retained from the excavation will be packed and stored in the appropriate materials and conditions to ensure that minimal deterioration takes place and that all their associated records are complete;
- 5.2e all archaeological contexts will be sampled in accordance with a sampling strategy which will be agreed in advance with the EAU, University of York. In addition to hand collected animal bone from all contexts, contexts selected in consultation with the EAU will be sieved to retrieve more meaningful collections of faunal remains;
- 5.3 The details and processes outlined in 5.1 - 5.2 will produce the following output as an archive report:
- 5.3a plan of site showing the position of trench;
- 5.3b portfolio of drawn sections, trench plans, and, where appropriate, drawings of artefacts;
- 5.3c an interpretation of the structural sequence;
- 5.3d an interpretation of the archaeological and research potential of the remainder of the site.
- 5.3e In addition the report will contain the following elements:
- non-technical summary
 - introductory statements
 - aims and objectives
 - method statement
 - objective summary of results
 - interpretation and conclusions
 - supporting illustrations and interpretative drawings
 - supporting data
 - references
- 5.3f The archive will be curated following the guidance provided in the 'Standards in Museum Care of Archaeological Collections', Museums and Galleries Commission, 1992.
- The site archive (paper, drawn, photo, digital and material) will be checked and cross-referenced before completion of the field work The archive will include:

- survey reports
 - site notebook / diaries
 - original photographic records
 - site drawings
 - original context records
 - artefacts cleaned where appropriate and packed
 - ecofacts and other sample residues
 - original finds records
 - original sample records
 - original skeleton records
 - original specialist reports
 - index or database and printout
 - a summary of the nature / quality of the various classes of data collected.
- 5.4 Allowance will be made for the preparation and publication of a synopsis of the narrative report, material archive and research potential of the site in a form such as is used in *The Yorkshire Archaeological Journal*.
- 5.5 *On-Site Archaeology* will demonstrate by providing CV's that the staff appointed to direct, supervise, and work on this project have relevant experience of working both on complex sites and the complex archives which they produce.
- 5.6 The results of the project will be published in an appropriate archaeological journal or monograph. The suitable level of publication will be dependent on the significance of the project results, but as a minimum the basic requirements of Appendix 7.1 of *Management of Archaeological Projects* (English Heritage 1991) will be met.
- 5.6a The publication report will contain the following information:
- the research objectives as expressed in the project design;
 - circumstances and organisation of the work and the date at which it was undertaken;
 - identity of the individual/organisation by whom the work was undertaken;
 - summary account of the results of the project;
 - summary of the contents of the project archive, where it is housed and how it may be consulted.
- 5.6b The report on the fieldwork will additionally give:
- the national grid reference
 - the parish

5.6c Report-writing criteria

When writing up the results of this project, consideration will be given to the following:

- the report will appropriately reflect the importance of the results of the project and deal adequately with the site's social, political, and historical context;
- the interpretation of the site will be justified by the evidence presented. Ambiguities in the data base will be discussed, and where more than one interpretation is possible the alternatives will be presented;
- the report will present information about what was found in a well balanced logical, accessible and structured way. It will be immediately intelligible to and usable by those who know nothing about the site;
- the extent to which the objectives of the project have been fulfilled will be discussed, including a critical assessment of the methodologies employed;
- the report will be written clearly and concisely, and will make appropriate, consistent, and economical use of other methods of data presentation, e.g. tables, plans, or photographs;
- specialist reports and their supporting data will be carefully chosen and given their proper value. Specialist contributors will be involved in or informed of editorial decisions affecting the presentation of their work in print;
- all the constituent parts (text, figures, photos, and specialist reports) will cross-refer adequately. Readers will be able to find their way around the report without difficulty;
- attention will be drawn to areas of future study potential which it has not been possible to explore fully within the limits of the agreed project design.

5.6d Production criteria

Consideration will be given in producing figures and typescript to any notes for authors supplied by the appropriate publishing body. As part of the process of producing the report draft consideration will be given to the following:

- word-processing will be competently done and output checked by the contributor responsible for the original work;
- good quality clear prints of half tones and colour negatives for colour plates will be selected at an early stage in the preparation of the report draft and will be available to the editor with the rest of the report draft;
- the presentation of line drawings and tables will be discussed and agreed at an early stage in report preparation, and the art work will be available to the editor at the same time as the report draft;
- figure, table, and photograph captions will be drafted at an early stage;
- the bibliography will be complete, checked, integrate all contributors' bibliographic contributions, observe BSI, and use conventions compatible with the house style of the publishing body;

- errors are the responsibility of the authors and will so far as possible be identified and rectified before the editorial processes begin;
- text supplied to the editors will incorporate all revision necessary as a consequence of internal and external refereeing. It will be established with the publishing body at an early stage in the production processes what their refereeing requirements are. If these differ from those of the sponsors, any incompatibility will be resolved at an early stage;
- the format and presentation of the material will be agreed with the editors at an early stage;
- in-house editing by the project team will only be done after consultation with the publishing body and will take due consideration of the style and format of the published report;
- indexing will be carried out by a professional trained in that field.

5.7 *On-Site Archaeology* will backfill the trench with excavated material. Prior to doing so a non-degradable marker tape shall be laid along the length of the trench in order to facilitate the re-excavation of the same alignment when the pipe trench is cut.

6.0 Personnel

All work will be under the overall supervision of Mr. N Pearson MIFA (Member of the Institute of Field Archaeologists). Other project staff will/may include:

Project Officer Guy Hopkinson

Excavation Team Susan Diamond
 Anthony Dickson
 Chris Fenton-Thomas
 Marie-Claire Ferguson
 Guy Hopkinson

Finds Assistant Faye Palmer

Palaeo-environmental advisor Environmental Archaeology Unit, York University

Finds Analysis Dr Alan Vince
 Barbara Precious
 Jane Cowgill
 Sandra Garside-Neville

Conservation Sonia O'Connor, Bradford University
 Conservation Services, Lincolnshire County Council

7.0 Bibliography

- Cox, P.W. & Cottrell, T.L. 1998. *BP Chemicals Limited – Teesside to Saltend Ethylene Pipeline: preliminary Archaeological Assessment of Archaeology and Culture Heritage*. A.C. Archaeology Report No. 5297/1/0
- Harvey, L. 1999. *Teesside to Saltend Ethylene Pipeline. BP Site 169*. GSB Prospection Report No. 99/53.
- Hopkinson, G. & Tyler, D. 1999. *BPTSEP 169: West Lilling. An Archaeological Evaluation*. OSA Report No. 99EV02.
- MAP II. 1991. *Management of Archaeological Projects*. English Heritage
- Ovenden-Wilson, S. 1998. *Teesside to Saltend Ethylene Pipeline. BP Site 169*. GSB Prospection Report No. 98/125.
- Swan, V.G., Jones, B.E.A. & Grady, D. 1993. Bolesford, North Riding of Yorkshire: a Lost Wapentake Centre and its Landscape. *Landscape History* 15. RCHME.

APPENDIX 1 ~ AREA EXCAVATION

Fieldwork

- 1.1 Prior to any area excavation, appropriate survey (e.g. geophysical, earthwork, contour) or sampling strategy (e.g. for topsoil artefact densities, metal detecting, phosphate analysis) will be undertaken before the site strip. All metal detected finds shall be recovered according to the Code of Practice laid down by the 1996 Treasure Act.
- 1.2 The site will be mechanically stripped of topsoil and other overburden. An appropriate machine will always be used. This will normally be a JCB 3CX Sitemaster (or similar) fitted with a 1.80 metre wide toothless bucket. In other cases a, or for work with restricted access or working room a mini-excavator such as a Kubota KH 90 will be used. No plant will be allowed to cross stripped areas.
- 1.3 All machining will be undertaken under the direct control of experienced archaeologists.
- 1.4 All undifferentiated topsoil or overburden will be removed down to the first significant archaeological horizon in level spits.
- 1.5 Depending on the aims of the project, the excavated spoil may be monitored in order to recover artefacts. Where their findspots are plotted this will usually be on a 2m grid.
- 1.6 The surface exposed by the stripping will be cleaned using appropriate hand tools.
- 1.7 Should the site grid not have already been established it will be done at the cleaning stage. The grid will normally be based on a 10m spacing and related to the National Grid. A temporary benchmark related to Ordnance Datum will be founded.
- 1.8 After the cleaning and planning of the excavation area the excavation strategy will be finalised. This will take into account the project aims (which may need modifying at this stage) and the type, quality and quantity of remains revealed. The strategy will normally seek to maintain at least the following levels:
 - all structures and all zones of specialised activity (e.g. funerary, ceremonial, industrial, agricultural processing) will be fully excavated and all relationships recorded
 - ditches and gullies will be fully excavated and have all relationships defined, investigated and recorded.
 - sufficient artefact assemblages will be recovered (where possible) to assist in dating the stratigraphic sequence and for obtaining ample ceramic groups for comparison with other sites.
 - all pits, post and stake holes will be half-sectioned, drawn and then fully excavated.
 - all layers will have their limits defined and will be drawn and recorded according to the principles of single context recording. Thereafter they will be fully excavated.
- 1.9 A palaeoenvironmental research strategy has been designed in advance of the project by the Environmental Archaeology Unit at the University of York (see appendix 6 below). This strategy may be varied depending on the results of the excavation and the nature of the

exposed deposits. For carbonised remains, bulk samples of a minimum of 10 litres (but up to 30 litres for early prehistoric features) will be collected. Bulk samples of 10-30 litres will be taken from waterlogged deposits for analysis of macroscopic plant remains. Columns for pollen analysis will be taken where appropriate. Mollusc samples will be gathered when required. Other bulk samples for small animal bones and other small artefacts may be taken from appropriate deposits depending on the aims of the project.

- 1.10 Any finds of human remains will be covered and protected from public view during the excavation process. The coroner's office will be informed. Excavation, recording and removal will only take place under the relevant Home Office licence and local authority environmental health regulations.
- 1.11 All finds of gold and silver will be moved to a safe place and reported to the coroner's office according to the procedures relating to Treasure Trove. Where removal cannot be effected on the same working day as the discovery, suitable security measures will be taken to protect the artefacts from theft or damage.

Treasure Act 1996

Recording

- 1.12 All on-site recording will be undertaken in accordance with the standards and requirements of the *Archaeological Site Manual* (Museum of London 1994).
- 1.13 A continuous unique numbering system will be employed.
- 1.14 Written descriptions, comprising both factual data and interpretative elements will be recorded on standardised sheets.
- 1.15 Where stratified deposits are encountered a 'Harris' -type matrix will be compiled during the course of the excavation.
- 1.16 The site grid will be accurately tied into the National Grid and located on the 1:2500 or 1:1250 map of the area.
- 1.17 Plans will normally be drawn at a scale of 1:20 will be used. Burials will be drawn at 1:10. Other detailed plans will be drawn at an appropriate scale.
- 1.18 Long sections of trench edges or internal baulks showing layers and any cut features will be drawn at 1:10 or 1:20 depending on amount of detail contained. Sections of features will be drawn at 1:10.
- 1.19 All sections will be accurately related to Ordnance Datum.
- 1.20 Registers of sections and plans will be kept.
- 1.21 A full black and white, and colour (35mm transparency) photographic record will be maintained. This will illustrate the principal features and finds both in detail and in a general context. The photographic record will also include working shots to represent more generally the nature of the fieldwork.
- 1.22 A register of all photographs taken will be kept on standardised forms.

Finds

- 1.23 All identified finds and artefacts will be collected and retained. Certain classes of material i.e. post-medieval pottery and building material may on occasion be discarded after recording if a representative sample is kept. No finds will be discarded without the prior approval of the archaeological representative of the local authority and the receiving museum.
- 1.24 All finds and samples will be treated in a proper manner and to standards agreed in advance with the recipient museum. Finds will be exposed, lifted, cleaned, conserved, marked, bagged and boxed in accordance with the guidelines set out in United Kingdom Institute for Conservation's *Conservation Guidelines No. 2*.
- 1.25 At the beginning of the project (prior to commencement of fieldwork) the landowner and the relevant museum will be contacted regarding the preparation, ownership and deposition of the archive and finds.

APPENDIX 2 ~ ARCHIVING, POST-EXCAVATION & PUBLICATION

- 2.1 Following completion of each stage or the full extent of the fieldwork (as appropriate) the site archive will be prepared in the format agreed with the receiving institution. The excavation archive will be security copied and a copy deposited with the NAR before post-excavation analysis begins or as soon after as can be arranged.
- 2.2 On completion of the archive a summary report will be prepared. This will include:
 - an illustrated summary of the results to-date indicating to what extent the project aims were fulfilled.
 - a summary of the quantities and potential for analysis of the information recovered for each category of site, artefacts, dating and palaeoenvironmental data.
 - proposals for analysis and publication
- 2.3 The proposals for analysis and publication will include:
 - a list of the revised project aims arising from the fieldwork and post-excavation assessment.
 - a method statement, which will make clear how the methods advocated are those best suited to ensuring that the data-collection will fulfill the stated aims of the project.
 - a list of all tasks involved in meeting the stated methods to achieve the aims and produce a report and research archive in the stated format.
 - details of the research team and their projected work programmes in relation to the tasks. Allowance will be made for general project-related tasks such as project meetings, management, editorial and revision time.
 - a publication synopsis indicating publisher, report format and content shown by chapters, section and subheadings with the anticipated length of text sections and proposed number of illustrations.
- 2.4 The summary report embracing the analysis and publication proposals will be submitted to the local authority's archaeological representative for approval.
- 2.5 Any significant variation in the project design, including timetables, proposed after the agreement of the proposals must be acceptable to the local authority's archaeological representative.
- 2.6 The results of the project will be published in an appropriate archaeological journal or monograph. The suitable level of publication will be dependent on the significance of the project results, but as a minimum the basic requirements of Appendix 7.1 of Management of Archaeological Projects (English Heritage 1991) will be met.

APPENDIX 3 ~ GENERAL

- 3.1 The requirements of the Brief will be met in full where reasonably practicable (see also para 3.3).
- 3.2 Any significant variations to the proposed methodology will be discussed and agreed with the commissioning agent's archaeological representative in advance of implementation.
- 3.3 The scope of fieldwork detailed in the main part of the Written Scheme of Investigation is aimed at meeting the aims of the project in a cost-effective manner. *On-Site Archaeology* attempts to foresee all possible site-specific problems and make allowances for these. However there may on occasions be unusual circumstances, which have not been included in the programme and costing. These can include:
- unavoidable delays due to extreme bad weather, vandalism etc.
 - trenches requiring shoring or stepping, ground contamination, unknown services, poor ground conditions.
 - extensions to specified trenches or feature excavation sample sizes requested by the local authority's archaeological advisor.
 - complex structures or objects, including those in waterlogged conditions, requiring specialist removal.

Health and Safety

- 3.4 All relevant health and safety legislation, regulations and codes of practice will be respected.
- 3.5 With the introduction of the Construction (Design and Management Regulations) 1994 *On-Site Archaeology* works with Clients, Main Contractors, and Planning Supervisors to create a Health and Safety Plan. Each project will have its own unique plan.

Insurances

- 3.6 *On-Site Archaeology* holds Employers Liability Insurance and Public Liability Insurance. (See Appendix 7 below).
- 3.7 *On-Site Archaeology* will not be liable to indemnify the client against any compensation or damages for or with respect to:
- damage to crops being on the Area or Areas of Work (save in so far as possession has not been given to the Archaeological Contractor)
 - the use or occupation of land (which has been provided by the Client) by the Project or for the purposes of completing the Project (including consequent loss of crops) or interference whether temporary or permanent with any right of way light air or other easement or quasi easement which are the unavoidable result of the Project in accordance with the Agreement

- any other damage which is the unavoidable result of the Project in accordance with the Agreement
- injuries or damage to persons or property resulting from any act or neglect or breach of statutory duty done or committed by the client or his agents servants or their contractors (not being employed by *On-Site Archaeology*) or for or in respect of any claims demands proceedings damages costs charges and expenses in respect thereof or in relation thereto

Copyright and Confidentiality

- 3.8 *On-Site Archaeology* will retain full copyright of any commissioned reports, tender documents or other project documents under the Copyright, Designs and Patents Act 1988 with all rights reserved; excepting that it will provide an exclusive licence to the client in all matters directly relating to the project.
- 3.9 *On-Site Archaeology* will assign copyright to the client upon written request but retains the right to be identified as the author of all project documentation and reports as defined in the Copyright, Designs and Patents Act 1988.
- 3.10 *On-Site Archaeology* will advise the Client of any such materials supplied in the course of projects, which are not *On-Site Archaeology*'s copyright.
- 3.11 *On-Site Archaeology* undertakes to respect all requirements for confidentiality about the Client's proposals provided that these are clearly stated. In addition *On-Site Archaeology* further undertakes to keep confidential any conclusions about the likely implications of such proposals for the historic environment. It is expected that Clients respect *On-Site Archaeology*'s and the Institute of Field Archaeologists' general ethical obligations not to suppress significant archaeological data for an unreasonable period.

Standards

- 3.12 *On-Site Archaeology* conforms to the standards of professional conduct outlined in the Institute of Field Archaeologists' Code of Conduct, the IFA Code of Approved Practice for the Regulation of Contractual Arrangements in Field Archaeology, the IFA Standards and Guidance for Desk Based Assessments, Field Evaluations etc., and the British Archaeologists and Developers Liaison Group Code of Practice.
- 3.13 Project Directors normally will be recognised in an appropriate Area of Competence by the Institute of Field Archaeologists.
- 3.14 Where practicable *On-Site Archaeology* will liaise with local archaeological bodies (both professional and amateur) in order that information about particular sites is disseminated both ways (subject to client confidentiality).

APPENDIX 4 ~ SAFETY PLAN, NOVEMBER 1999

1. Definition Of Interested Parties

SITE LOCATION: Lilling Low Lane, West Lilling (BPTSEP 169)

NATIONAL GRID REFERENCE: SE 640 644

CLIENT: BP Chemicals Limited
Building 134/307
Chertsey Road
Sunbury on Thames
Middlesex. TW16 7LN
switchboard (01932) 762000

CONTRACTOR: On-Site Archaeology (OSA)
25A Milton Street
York
YO10 3EP

tel (01904) 411673

fax (01904) 414522

e-mail nick@onsitearchaeology.freeserve.co.uk

OSA PROJECT OFFICER: Guy Hopkinson (who will be site based).

mobile 0467 385766

2. Nature Of The Project

The project will involve the excavation of surviving archaeological materials from within a 2 metre wide corridor following the pipe centre line. Archaeological material will be removed by hand. Non archaeological material will be removed by JCB 3X.

- Where appropriate, secure site fencing and safety signage will be used. These to be provided by OSA.
- Where appropriate, the vertical face of the excavation will be shored. Required materials will be supplied by OSA.
- Excavated spoil will be stored on site, a safe distance from the trench edge.

3. Timing Of The Project

Investigation Start: November 1999.

Investigation Complete: January 2000.

APPENDIX 5 ~ OSA, GENERAL SAFETY POLICY

Introduction

The Health and Safety at Work Act (1974) is designed to promote, stimulate and encourage high standards of health and safety at work. It does this by ensuring safety awareness and an effective safety organisation within all areas of employment according to the particular dangers, risks and needs associated with that employment.

Summary of Policy

It is the policy of *On-Site Archaeology* to comply with the requirements of the Health and Safety at Work Act 1974; the Management of Health and Safety at Work Regulations 1992; the Factories Act 1961; the Offices, Shops and Railway Premises Act 1963; and all Regulations and Codes of Practice made under the Acts which affect *On-Site Archaeology* operations.

On-Site Archaeology undertakes to safeguard, as far as is reasonably practicable, the health, safety and welfare of its staff and of others that may be affected by its work. This applies in particular to providing and maintaining suitable premises, ensuring the safety of all equipment supplied by the Company, providing all reasonable safeguards and precautions against accidents, and promoting and ensuring safe practices on fieldwork sites.

The responsibilities of staff, employees and volunteers in maintaining high standards of care and safety are set out below.

The policy will be reviewed from time to time as our activities develop. Review of the safety performance of *On-Site Archaeology* and the functioning of the Policy is the task of the Director and *On-Site Archaeology* Health and Safety Committee. At yearly intervals or sooner where circumstances require, they will review the contents of this document and indicate how performance can be improved.

The attention of all *On-Site Archaeology* staff, and any others that may be engaged on *On-Site Archaeology* projects, is directed to this Health and Safety Policy Statement.

Signed..... Director

Statement of Safety Policy

The Safety Policy of *On-Site Archaeology* is, so far as is reasonably practicable:

- to maintain a working environment for employees which is safe and without risks to health and adequate as regards facilities and arrangements for their welfare at work;
- to maintain any place of work under the Company's control in a condition that is safe and without risk to health;
- to provide and maintain plant, equipment, and systems of work that are safe and without risk to health;
- to make arrangements for ensuring safety and absence of risks to health in connection with the use, handling, storage and transport of articles and substances;
- to provide such information, instruction, training and supervision as is considered necessary to ensure the health and safety of all staff;

The Company will also take reasonable practicable steps to conduct its operations in such a way that members of the public are not exposed to risks to their health and safety.

To achieve these objectives, full co-operation between all staff is essential. While at work they will be expected to act with reasonable care for themselves, other employees and the general public; exercising personal responsibility for their own safety and that of others. This is required by law.

A copy of this statement and any subsequent revision or amendment will be issued to all members of staff. Staff will be required to confirm that they have not only received a copy but that they have read and fully understood its contents.

The officer under whom the safety function is placed in the Company is:

Nick Pearson
On-Site Archaeology
25A Milton Street
York
Y01 3EP

Details of the arrangements for carrying out this policy at *On-Site Archaeology* are listed below. Documents will be available at all permanent work places showing the arrangements, which apply for promoting health and safety at work. These may be asked for and studied by any employee. They will show:

- what responsibilities the Director, the Safety Officer, Office Administrator and Project Officers have for applying the Company's policy;
- the names of members of *On-Site Archaeology's* Health and Safety Committee:
Director
Safety Officer
Office Administrator
and other essential information;

- any groups of employees in the Company for whom special safety precautions are necessary or desirable;
- an outline of the arrangements for safety training in the Company; and
- details of what individual employees are expected or required to do under the law and practice applying to them.

Health and Safety: Management Responsibility

Nick Pearson

- is responsible to the Company and under the Act, for ensuring that the Company's Health and Safety Policy is fully implemented;
- must know the broad requirements of the relevant legislation;
- will periodically attend meetings of *On-Site Archaeology's* Health and Safety Committee;
- will ensure that all administrative and supervisory staff are available for, and involved in, safety inspections, and that responsibility is properly assigned and accepted at all levels;
- shall occasionally accompany any Safety Officer or advisor invited by the Company on a tour of inspection to ensure that the Health and Safety Policy is effective;
- will report all accidents notifiable under The Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 1985 (RIDDOR);
- will ensure that an investigation is carried out in the event of any accident reportable under RIDDOR.
- represents the Company on matters of health and safety;
- will advise members of staff on matters of health and safety;
- will liaise with the Company's health and safety advisors.
- will attend meetings of *On-Site Archaeology's* Health and Safety Committee;
- will monitor the Company's working practices on site and in its permanent premises;
- will maintain the Company's Safety Audit records;
- will review Risk Assessments, COSHH Assessments and monitor safety reports for sites, premises and other workplaces used by staff, and ensure that unsatisfactory conditions not previously remedied are rectified;
- will hold copies of health and safety manuals, guidance notes and other essential literature, keep them up to date and circulate new information where relevant;
- will arrange for any staff training necessary;
- act on the recommendations of the Safety Consultants to ensure that their reports are put into effect;

- will ensure that vehicles are maintained in a roadworthy condition;
- will ensure that all drivers are aware of their responsibilities for the safety of themselves, their passengers and other road users.

The Office Administrator:

- must know the broad requirements of the relevant legislation;
- must ensure that all registers, records and reports are in order and that accident reports are completed and returned;
- must investigate accidents promptly to discover their cause and to report them immediately to the Director, the Company's safety advisors and the relevant authorities;
- must ensure that the qualified first-aider has all the items of first-aid equipment required, and that proper care is taken of any casualties;
- must maintain adequate training records and ensure that any authorisations are kept current;
- is accountable to the Director.

Project Officers or their delegated representatives on site:

- are responsible for health and safety on the projects which they direct, and for ensuring that *On-Site Archaeology's* Health and Safety Audit is completed before the start and periodically during the project;
- must be fully familiar with the Company's Health and Safety Policy;
- must ensure that a Health and Safety representative is clearly delegated during ANY period of absence;
- must ensure that all persons under their supervision are adequately informed, and fully aware, of any hazards they are likely to encounter in the course of their work;
- must ensure that all employees under their supervision know what to do in the case of fire, and know the location of, and how to use, fire equipment and extinguishers;
- must inform all employees under their supervision who is the qualified first-aider, where that person can be found, the whereabouts of first-aid facilities, and that proper care is taken of casualties;
- must investigate accidents promptly to discover their cause and eliminate the possibility of a recurrence, and must ensure that any serious accident is immediately reported to the Director and the Company's safety advisors;
- must ensure that adequate supervision is available at all times, and in particular where new and inexperienced workers are concerned;
- are responsible for carrying out induction training as required by Regulation 11 of the Management of Health and Safety at Work Regulations 1992;
- will give any necessary 'on the job' training;

- will carry out and record Risk Assessments and COSHH Assessments for activities to be undertaken on their projects, and will communicate the significant findings to the Safety Officer, Project Supervisors and other staff who are likely to be affected;
- shall ensure, where reasonably practical, that all safety rules are observed, that protective equipment is worn, and used where appropriate, and that all safety devices are always fitted, properly adjusted, and fully maintained;
- shall ensure that defects are promptly reported and rectified;
- shall ensure that all equipment and machinery under their supervision is properly serviced and is safe to use by arranging for regular inspection;
- shall liaise with the Director and/or the other relevant staff on all matters relating to health and safety;
- shall delegate responsibility to appropriate members of staff;
- are accountable to the Safety Officer/Director Contracting Division.

Project Staff:

- will take reasonable care for the health and safety of themselves and of others who may be affected by their acts and omissions at work;
- will co-operate with their Project Supervisors and Project Officers, to enable any statutory duty or requirement to be performed or complied with;
- will ensure that authorised visitors to sites or other workplaces are both aware of potential risks and are supervised throughout their visit;
- will check that the correct tools and equipment for the job are used and that they are in good working order;
- will report health and safety hazards, including defects in plant and equipment, to Project Supervisors or line managers;
- will report incidents that have led or may lead to injury; report accidents or incidents in the workplace accident book, co-operate in the investigation of accidents and suggest ways of eliminating hazards.

Individual Responsibility

Each person working on a Company site or premises is responsible for ensuring that their place of work is safe for themselves, their fellow workers and the public at large.

Safety Manual

The company has adopted the manual 'Health and Safety in Field Archaeology' published by SCAUM (1997), and copies are available for consultation at the Company's permanent office. It also recommends 'Safety in Archaeological Fieldwork' prepared by A. Olivier (CBA Practical

Handbook No. 6).

For further information on safe practices the Company has copies of the health and safety at work regulations which came into force in January 1993 (produced by the Health and Safety Commissions). These comprise:

- Display Screen Equipment Work
- Work Equipment
- Workplace Health, Safety and Welfare
- Manual Handling
- Personal Protective Equipment at Work
- Management of Health and Safety at Work.

This information will be expanded from time to time by internal guidance memos on the safe use of equipment, which is exclusive to the Company.

Any updates of the SCAUM Manual, revisions of the 1993 Regulations or new legislation will be brought to the attention of all staff.

Health and Safety Advice

It is the responsibility of their immediate superiors to ensure that all *On-Site Archaeology* staff, and others engaged on *On-Site Archaeology* projects, using tools, equipment, and substances supplied for work, are made aware of any relevant information and instructions which may be provided by the manufacturer/supplier in order to comply with obligations under Section 6 of the Health and Safety at Work Act 1974 and the Control of Substances Hazardous to Health Regulations 1988 (COSHH) as appropriate. It is the responsibility of the person in charge of the work area to pass this information on to the user(s).

Exchange of information on risks with other occupiers, employers and contractors using shared work areas is the responsibility of the Director. This will normally be done by a delegated Project Officer at a meeting arranged prior to the commencement of work.

Any employee, or other person engaged on *On-Site Archaeology* work, who is in doubt about safe working practices and procedures should contact their immediate superior. In the event of any conflict between the demands of work and safety, the safety of members of *On-Site Archaeology* staff, other persons engaged on *On-Site Archaeology* work, and third parties will take precedence.

On-Site Archaeology Health and Safety Advisors

The Company's Health and Safety Advisors are:

E C Harris

Capitol House
Russell Street
Leeds
LS 1 5SP
Tel.No: 0113- 243 0624
Fax No: 0113- 243 2431

Contact Individual:

Simon McCudden Ba Msc (A.I.O.S.H; M.I.E.F; M.A.P.S)
Mobile No: 07771 354730

Their advice should be sought:

- In advance of any project where there is likely to be hazards outside the normal experience of Company staff, their sub-contractors or consultants (in these cases the Advisor will act as the Company's Safety Officer, reporting back to the Company's Director).
- In cases where *On-Site Archaeology* staff are working under the safety code of another contractor, where they can advise on negotiating a fair distribution of responsibilities.
- Immediately after any serious accident or dangerous occurrence, when they can be requested to make an immediate inspection so that they can represent the Company in any inquiry.

On-Site Archaeology can seek advice from the Health and Safety Executive as necessary.

APPENDIX 6 ~ ENVIRONMENTAL STRATEGY**THE UNIVERSITY** *of York****Palaeoecology Research Services***

Heslington, York YO1 5DD

Telephone: (01904) 434487

Facsimile: (01904) 433850

Answer phone: (01904) 433846

The document given below comprises a strategy for dealing with any potential paleoenvironmental material that may be present on the site, and has been prepared in conjunction with the EAU at the University of York.

- 6.1 Samples of sediment for bioarchaeological assessment and any subsequent analysis will be taken from all deposits:
 - which are the fills of features (and certainly in the case of primary fills)
 - which, like hearth accumulations, are thought to represent discrete activities
 - which are thought to represent naturally forming deposits such as soils or beds of peat
 - or which, like dumps, are likely to contain refuse from human occupation
- 6.2 Samples will be placed in one or more 10 litre plastic tubs per context, with a single tub as a minimum and two or more additional tubs being used to provide material for bulk-sieving, where appropriate, primarily for the recovery of small bones. Tubs will be labelled by means of an indelible marker on the side, and by means of at least one spun-plastic label on the inside.
- 6.3 In addition, spot finds of biological remains such as isolated bone, shell, nutshell and so on encountered during excavation of deposits of the kinds outlined above should be retained.
- 6.4 Preservation of bone appears, from the evaluation exercise, to be poor, so bone will be collected during excavation only in the event that well-preserved material is encountered in contexts of the kinds listed above.
- 6.5 In situ soils or buried ground surfaces should be examined, recorded and sampled by the Environmental Archaeology Unit's pedologist, who should be consulted at the earliest opportunity.

APPENDIX 7 ~ EVIDENCE OF INSURANCE

Certificate of Employers' Liability Insurance(a)



CORNHILL Insurance

(Where required by regulation 5 of the Employers' Liability (Compulsory Insurance) Regulations 1998 (the Regulations), one or more copies of this certificate must be displayed at each place of business at which the policy holder employs persons covered by the policy)

1. Policy number LX/9990097

2. Name of
policy holder

MR N PEARSON T/AS ON SITE ARCHAEOLOGY

3. Date of commencement of insurance policy 1 st April 1999

4. Date of expiry of insurance policy 1 st April 2000

We hereby certify that subject to paragraph 2:-

1. the policy to which this certificate relates satisfies the requirements of the relevant law applicable in Great Britain, Northern Ireland, the Isle of Man, the Island of Jersey, the Island of Guernsey and the Island of Alderney(b); and
2. (a) the minimum amount of cover provided by this policy is no less than £5 million(c);

Signed on behalf of Cornhill Insurance Public Limited Company

Authorised insurers

W.R. Treen
Chief Executive

Notes

- (a) Where the employer is a company to which regulation 3(2) of the Regulations applies, the certificate shall state in a prominent place, either that the policy covers the holding company and all its subsidiaries, or that the policy covers the holding company and all subsidiaries except any specifically excluded by name, or that the policy covers the holding company and only the named subsidiaries.
- (b) Specify applicable law as provided for in regulation 4(6) of the Regulations.
- (c) See regulation 3(1) of the Regulations and delete whichever of paragraphs 2(a) or 2(b) does not apply. Where 2(b) is applicable, specify the amount of cover provided by the relevant policy.

Account Number: 38/26969

Date printed: 11 th May 1999

Cornhill Insurance Public Limited Company is registered in England No 24638. Registered Office: 32 Cornhill, London. EC3V 3LJ.
Cornhill Insurance is a member of the Association of British Insurers and the Insurance Ombudsman Bureau.
Internet Address: <http://www.cornhill.co.uk>

ACTING AS AGENTS FOR R. E. BROWN & OTHERS
SYNDICATE 702 AT LLOYD'S**LLOYD'S****ERRORS & OMISSIONS (MISCELLANEOUS) CERTIFICATE**

THIS IS TO CERTIFY that in accordance with authorisation granted under the Certificate Number stated below to the undersigned by R.E. Brown & Others (Non Marine Syndicate 702 at Lloyd's) (hereinafter "Underwriters"), which shall be supplied on application by reference to the Binding Authority Number Y9914820 which bears the seal of Lloyd's Policy Signing Office, and in consideration of the premium specified herein, the Underwriters are hereby bound, their heirs, executors and administrators, to insure in accordance with the terms and conditions herein or endorsed hereon.

SCHEDULE

CERTIFICATE NO :	SE101J99A520/1177
Assured :	NICHOLAS F. PEARSON T/AS ON SITE ARCHAEOLOGY
Address :	25A Milton Street York N. Yorks YO10 3EP
Assured's Business :	Archaeological fieldwork including desk top study, evaluation, survey and excavation.
Period of Insurance :	01/04/1999 to 31/03/2000 (both dates inclusive)
Limit of Indemnity :	£ 500,000
Excess :	£250
Retroactive Date :	01/04/1999
Jurisdiction :	UK
Date of Proposal :	18/04/1999

IN WITNESS whereof this Certificate has been signed by :

A handwritten signature in black ink, appearing to be "N. F. Pearson", is written over the signature line.

on behalf of R. E. BROWN UNDERWRITING LIMITED.

Dated : 05/05/1999

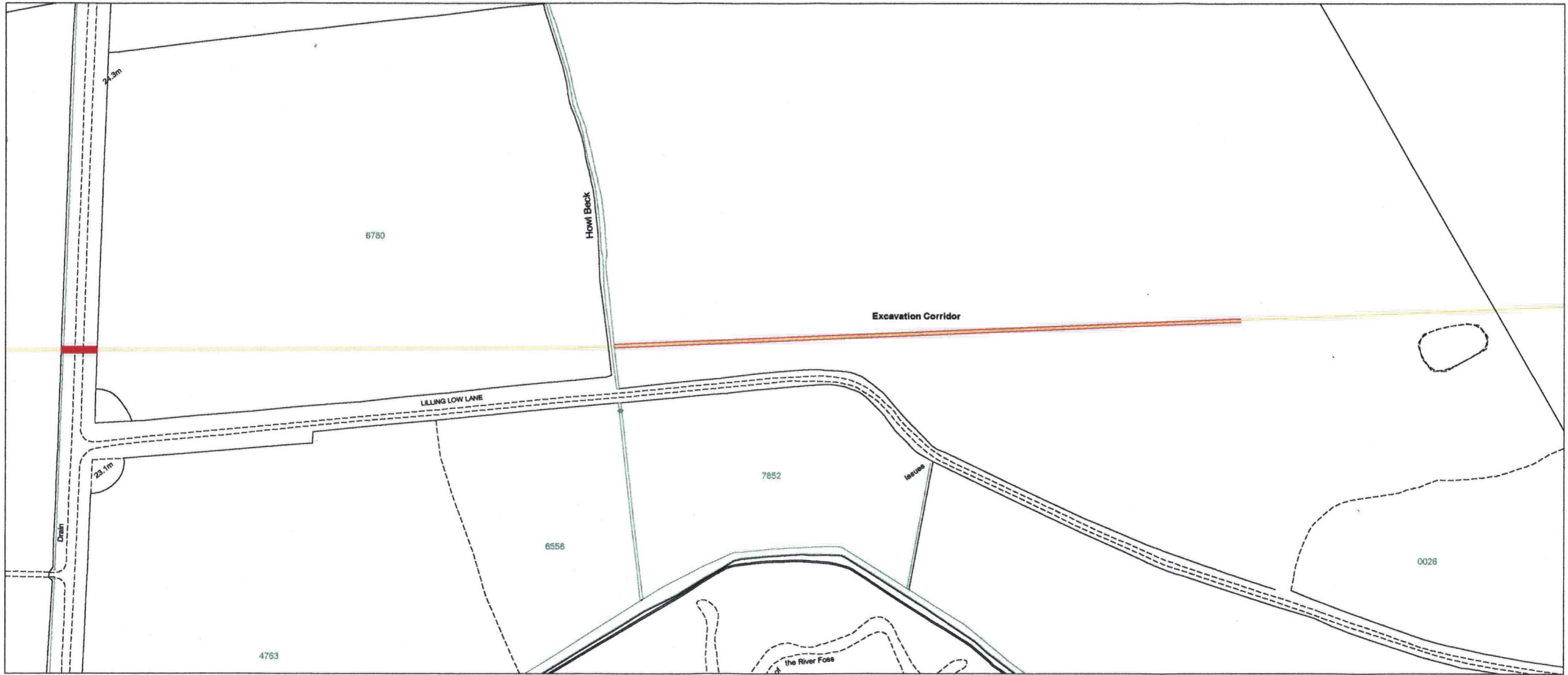


Figure 1. Excavation corridor. Scale 1:2500