



maparch

MAP Archaeological Practice

Dicken Green Mill
Greenfield Lane
Rochdale

MAP-05-65-26

Planning Reference- PL/2026/0684

Project Design-Archaeological Investigation



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MAP Archaeological Practice

Client MCI Developments

Work Type Archaeological Investigation

Address Former Dicken Green Mill.
Greenfield Lane, Rochdale, OL1
1BL

LPA Archaeologist Ian Miller- Greater Manchester
Archaeology Advisory Service

NGR SD 90067 11897

What3Words /// admit.ideal.bonds

Site Code 05-65-26

Planning Reference PL/2026/0684

OASIS ID maparcha1-545566

Project Manager Paula Ware

Version History	Edited/QA by	Notes
A-300926	Max Stubbings	Updated to reflect comments from I. Miller
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Dicken Green Mill
Greenfield Lane
Rochdale

Archaeological Investigation

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Read & Understood by	Revision	Initial and Date

1. Background

- 1.1 The site is located on land to the west and south of Greenfield Lane to the south of Rochdale town centre (centred at SD 90067 11897, Fig. 1).

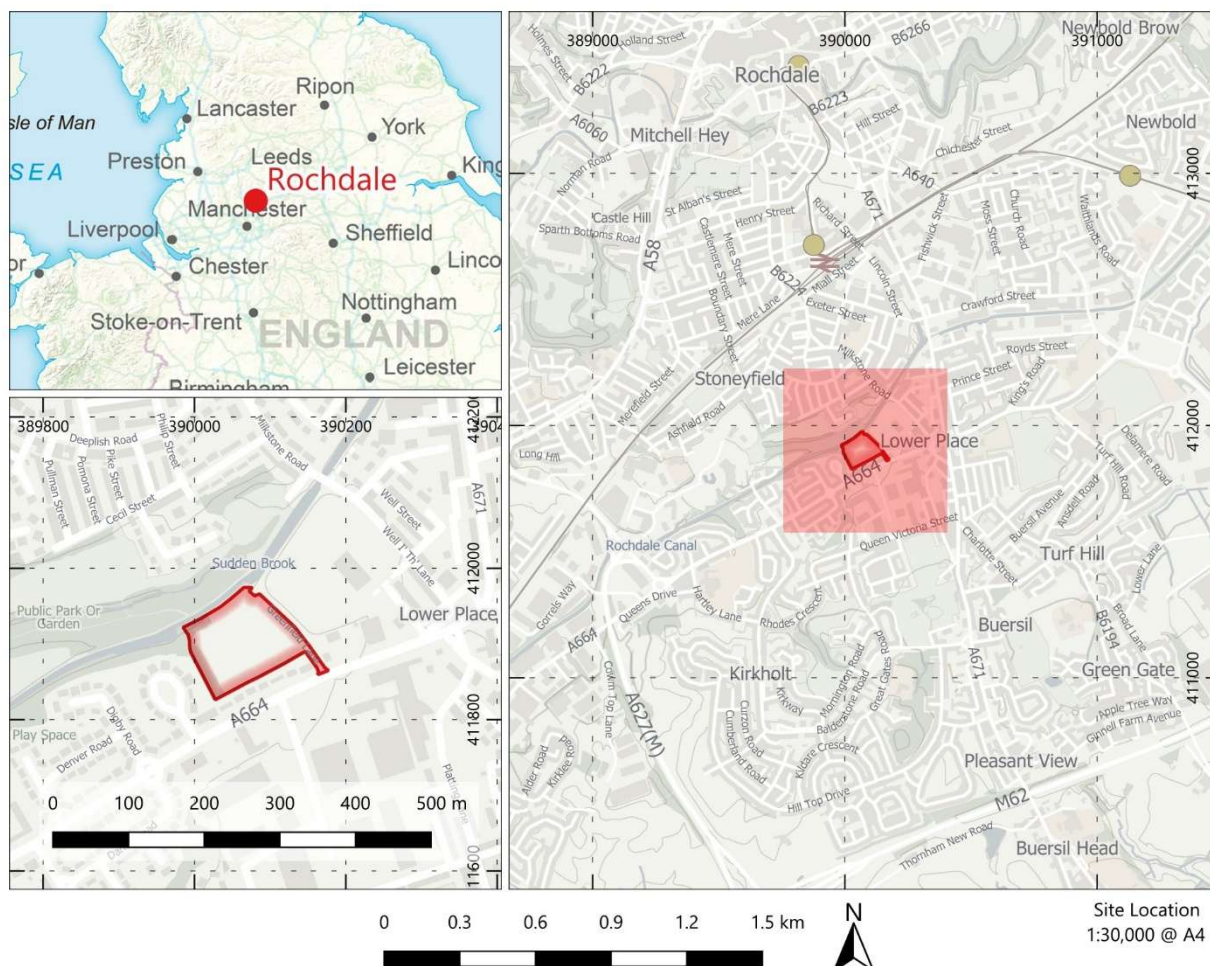


Figure 1: Site Location

- 1.2 The work will be monitored under the auspices of the Heritage Management Director at Greater Manchester Archaeology Advisory Service (henceforth the Curator), who will be consulted prior to the commencement of site works. Where necessary the regional Science Advisor at Historic England may also be contacted about the work.
- 1.3 An application has been made, to Rochdale Borough Council, for residential development at the site. at the time of writing the application is under consideration although during consultation Greater Manchester Archaeological Advisory Service suggested that the following condition be applied to any planning permission'

'No development works shall take place until the applicant or their agents or their

successors in title has secured the implementation of a programme of archaeological works in accordance with a Project Design which has been submitted to and approved in writing by the local planning authority. The Project Design shall cover the following:

- 1. A phased programme and methodology to include:
 - a) an archaeological evaluation;*
 - b) pending results of the above, targeted open-area excavation and / or a watching brief.**
- 2. A programme for post-investigation assessment to include:
 - a) analysis of the site investigation records and finds;*
 - b) production of a final report on the significance of the heritage interest recorded.**
- 3. Deposition of the final report with the Greater Manchester Historic Environment Record.*
- 4. Dissemination of the results of the site investigations commensurate with their significance.*
- 5. Provision for archive deposition of the report, finds and records of the site investigation.*
- 6. Nomination of a competent person or persons/organisation to undertake the works set out within the approved Project Design.*

- 1.4 This document applies only to the evaluative stage of archaeological intervention. Should the results of the Trial Trenching warrant mitigation, this will be the subject of a separate Written Scheme of Investigation which will be approved by the Curator and formally lodged with Planning prior to the commencement of such works.
- 1.5 MAP will adhere to the principles of the ClfA Code of Conduct: professional ethics in archaeology (ClfA. 2025) throughout the project and to the ClfA standards and Universal guidance for Archaeological Field Evaluations (ClfA. 2023).
- 1.6 The project will be continuously reviewed in order to monitor the projects progress towards meeting the aims and objectives of the project. As a minimum the results of the evaluation will be assessed as the fieldwork is taking place, to allow for any necessary changes to the agreed methodology. Any deviance from the methodology outlined in this document must be agreed in writing by the Curator.
- 1.7 Prior to the commencement of site work a site briefing will be given by the Attending Archaeologist (site lead) to appraise all archaeologists and other contractors of the scope of the trial trenching. The briefing will also outline the associated obligations and matters relating to health and safety. Once the site is established updates will be given to appropriate personnel. The site briefings will not

remove the need for all staff and appropriate visitors to sign up to this Written Scheme of Investigation and site specific RAMS.

2. Site Information

2.1 *Land Use and Geology*

2.1.1 The site is currently vacant and largely occupied by concrete slab associated with the former mill (see section 2.2). The boundary of the site is bounded by residential gardens, vacant commercial units and the Rochdale Canal with areas of mature and self-seeded trees within the site itself.

2.1.2 Bedrock geology within the site boundary consists of Pennine Lower Coal Measures Formation overlain by glaciofluvial deposits of sand and gravel (BGS. 2026).

2.2 *Archaeological Potential*

2.2.1 The site was previously occupied by Dicken Green Mill (HER ID 5157.1.0), a steam powered cotton mill which dated to at least the mid-19th century. The earliest reference to the site appears in 1844 when it is recorded, albeit not named, on a township map. Cartographic sources depict the development of the site and, by the early 20th century the mill is depicted in detail on Ordnance Survey mapping and is named as Dicken Green Mill with small buildings to the north and south-east of the main mill complex, within which the octagonal chimney is shown to have been located close to the south-eastern corner. The mill boasted two engine houses, the earliest of which dated to the mid to late 19th century and held a beam engine whilst the second was added later.

2.2.2 The building stood until 2018 when it was gutted by fire and subsequently demolished to slab level to allow pockets of fire to be reached (BBC. 2018).

3. Project Details

3.1 *Aims and Objectives*

3.1.1 The aim of the Archaeological Trial Trenching is to determine the presence and/or absence of archaeological features. Should archaeological features be encountered, their extent, depth, character and/or significance will be investigated and recorded to enable an assessment of the archaeological potential. This will allow the Curator to make a reasoned decision regarding any required mitigation.

3.1.2 Based on archaeological activity recorded within the vicinity of the site, the following Research Questions, as identified in North West Regional Research Framework may be applicable;

- IND55: What is the evidence for the development of power production?
 - Is there archaeological evidence of the change of engine
- IND56: How can we improve our understanding of 20th century factory organisation?
 - Can the organisation of the mill be established during evaluation?
 - Can specific industrial processes being carried out within certain areas of the complex be ascertained?
- IND58-How have industrial buildings adapted to new technology and processes?
 - Was the change of engine prompted by a change in process?
 - Did the change of engine/ processes require any building alterations and/or additions?

3.2 *Excavation Rationale*

3.2.1 Three trenches are proposed, they are positioned across the site as to assess the potential survival of features and/or structures associated with the former mill. The rationale for the position of each trench is outlined in the below table.

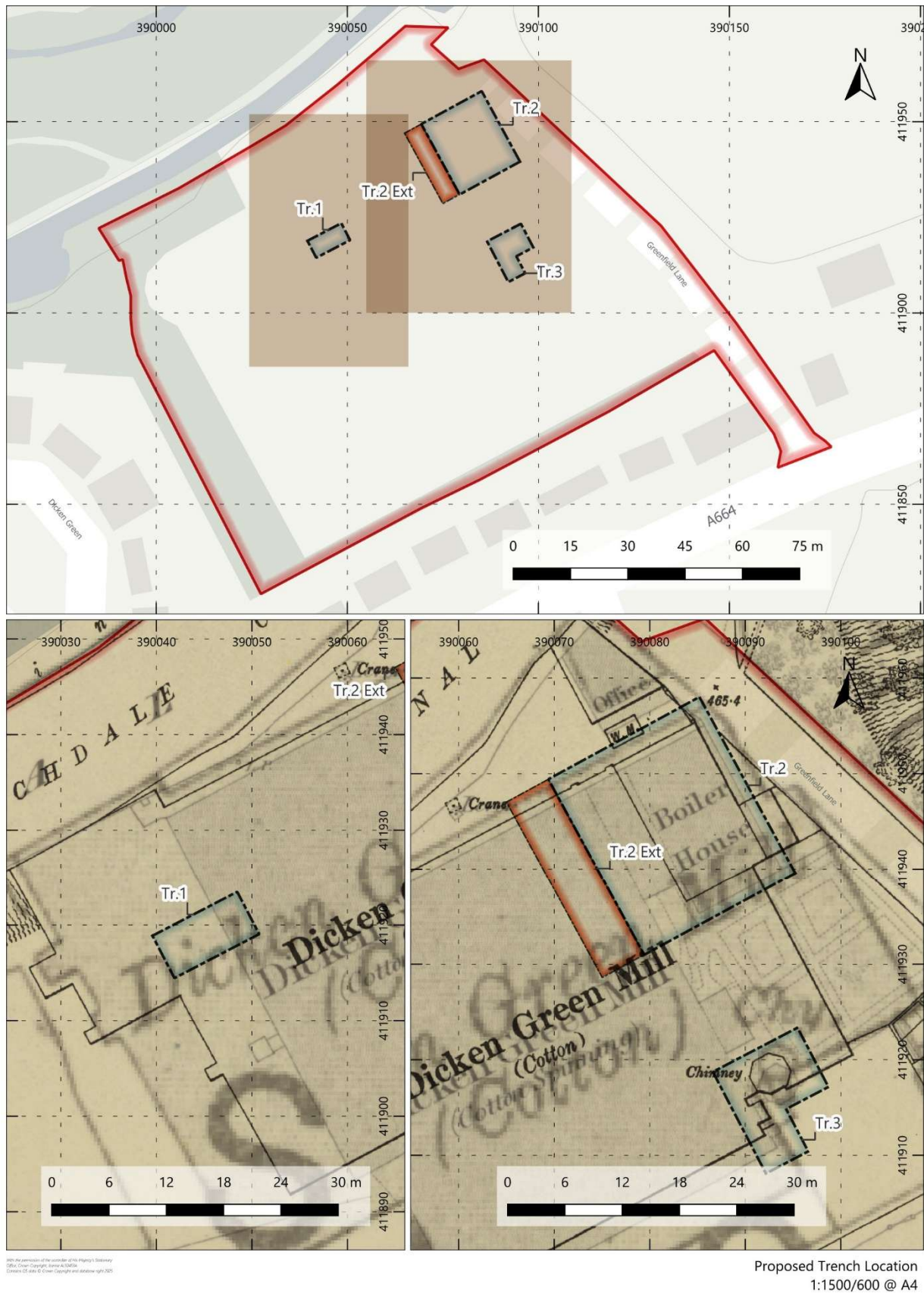


Figure 2: Trench Location and Layered Historical OS Maps



Figure 3: Trench Location Plan and Individual Historical OS Maps

Trench	Dimensions	Rationale
1	10m x 5m	To examine the western extent and wall of the original Mill building (circa 1851) and the connection to the westerly extension (circa 1892) and should give an indication of: Floor build-up. Internal walls. Confirm foundation survival. Assess preservation beneath later slabs Determine use of the extension
2	21m x 18	To examine the Boiler House (in it's entirety), possible beam engine house and Mill building adjacent and should give an indication of: Engine beds. Power transmission features. Structural abutments. Changes in construction phase. Identify the first bay of columns relative to the structure of the Mill building.
2 Ext	21m x 5m	Proposed contingency extension of Trench 2, to be utilised only if Trench 2 fails to identify the first bay.
3	12m x 5m/10m x 7m	To examine the chimney complex and Mill building in the vicinity of the chimney and should give an indication of: The preservation of the chimney base. Interaction with connecting structures. Possible flue line.
The following contingencies should be considered at the inception of the project • Should significant archaeology be encountered, further archaeological work may be required, at the discretion of the Curator. • Specialist sampling and/or scientific dating may be required during the excavation. This should be discussed at a mid-point review • Conservation of artefacts • Full post-excavation analysis and/or publication		

3.2.2 A contingency of trenching up to a further 5% of the available area could be requested by the Curator, if they felt there was a need to better understand the extents and character of archaeology, and in order to better help inform a mitigation strategy. Deep features should be excavated within the standard trenching provision, stepping should not count towards contingency trenching, as understanding the depth of the archaeological deposits within the trenches forms part of the aims and objectives of the evaluation (3.1.1).

3.2.3 As discussed above, should mitigation be deemed necessary, this will be the subject of an updated Project Design.

3.3 *Output and Dissemination*

3.3.1 It is anticipated that the project will produce the following output

Data type	Detail
Physical Archive	Drawn plans and sections- permatrace Site indices (context, photograph, drawing, samples) Finds collected during the evaluation Environmental material retained from samples collected during the evaluation
Digital Archive	Diggit derived data (PDF context sheets and indices. .xlsx indices) GIS ESRI Shapefile (.shp & .shx & .dbf, plus associated files) Photographs .jpg, .raw (to be deposited as .tiff). to include all photographs taken during the project Reports (.docx & PDF). WSI, evaluation report and all associated specialist reports
Reports	Printed evaluation report

3.3.2 All digital data will be curated in line with the attached Data Management Plan.

3.3.3 MAP undertake public engagement for all appropriate projects. This will be offered in numerous ways to reflect the nature of the archaeological works. It is likely that public engagement will be via site notices and discussions with the public during the duration of the fieldwork. A copy of the evaluation report will be submitted to the local Historic Environment Record for public access.

4. Fieldwork Methodology

4.1 *Excavation Methodology*

4.1.1 The positions of all trenches will be located using a Trimble GPS Rover and necessary precaution will be taken over underground services and overhead lines.

4.1.2 Any excavator will work under archaeological supervision at all times and will be fitted with a bladed bucket; a toothed bucket could be utilised if deposits/overburden are of a concreted nature, once removed a untoothed bucket should be used to continue the work, to the top of archaeological features or layers. Excavated material will be redeposited in bunds around the edge of the site, or at an alternative location, to be determined in agreement with the client. Topsoil and subsoils will be stored separately, and all spoil will be stored and managed in line with the standards of the Construction Code of Practice for Sustainable Use of Soils on Construction Sites (DEFRA. 2009).

- 4.1.3 Should it be deemed appropriate given the likely depths of the trenches and associated water ingress, provision will be made for the use of a pump to aid water management in within the excavated trenches.
- 4.1.4 Minor adjustments may be undertaken to avoid previously unknown obstacles such as vegetation or services, or to enable machine manoeuvring. Trenches located to target specific features will not be moved without prior agreement of the Curator.
- 4.1.5 Should trenches require stepping or shoring to reach their required depth, the base of the trench will reflect the size specified in section 3.2.
- 4.1.6 All potential archaeological features will be investigated and recorded unless otherwise agreed by the Curator.
- 4.1.7 Archaeological deposits will be cleaned and excavated by hand using appropriate tools. The stratigraphy of all trenches will be recorded, regardless of a lack of archaeological features.
- 4.1.8 Should trenches require stepping or shoring to reach their required depth for reasons of access and egress, the base of the trench will reflect their original size specified in section 3.2. However, the Curator may also request an extension of any such trenching to investigate deep and/or significant archaeology pursuant to a better understanding of the site.
- 4.1.9 Machine assistance may be required (with the approval of the Curator) for the excavation of very large/deep features.
- 4.1.10 Archaeological deposits will be cleaned and excavated by hand using appropriate tools. The stratigraphy of all trenches will be recorded, regardless of a lack of archaeological features.
- 4.1.11 The features will be excavated to a maximum safe working depth. Beyond this safe working depth or when required, provision following the current H&S regulations will be made for safe excavation (shoring/stepping).
- 4.1.12 Based on the expected archaeology within the site boundary, the excavation sampling policy is:
- All buildings and industrial features will be subject to sufficient excavation to establish the objectives of the evaluation

- No archaeological deposit will be entirely removed unless this is necessary to meet the aims of the project
- Any in situ building remains will be fully recorded for the extent that they are exposed. Brick and stone samples will be taken if potentially diagnostic of date or function.
- Further excavation of features will be undertaken after consultation with GMAAS and may require an updated project design

4.1.13 Should unexpectedly significant archaeological deposits or features be identified, the Curator will be contacted immediately and will be given the opportunity to visit the site prior to the excavation of the feature/ deposit.

4.1.14 Unless safety considerations require otherwise, no backfilling of trenches will take place until the Curator has visited the site and confirmed that the evaluation has been carried out to an acceptable standard. If health and safety considerations mean that trenches need to be backfilled prior to sign off by the Curator, then appropriate health and safety measures will need to be put in place for the reopening of these trenches so that these can be appropriately inspected by the Curator and ensure that evaluation objectives are met.

4.2 Recording Methodology

4.2.1 All archaeological deposits and features will be recorded using DiggIt Archaeology, a digital recording system which is compatible with the MoLAS recording system. All indices will be produced using MAP's pro forma sheets.

4.2.2 A full written, drawn, and photographic record (inclusive of photogrammetry) will be made of all material revealed during the course of the Trial Trenching. Plans and section drawings will be drawn to a scale appropriate to the excavated feature.

4.2.3 Digital photography will be undertaken in accordance with standards set by Historic England and the recipient archive. All digital photography will be undertaken using a high quality camera recommended to have no less than an APS-C or DX size sensor of 10 megapixels and to be capable of generating images in RAW to be converted to TIFF for archive and JPEG for reporting.

4.2.4 Appropriately sized scales will be used in all photography.

4.3 *Sampling Strategy*

- 4.3.1 A sampling strategy for the recovery for environmental remains has been formulated in accordance with an Environmental Strategy written by an Environmental Consultant (Diane Aldritt, appendix 2).
- 4.3.2 Where necessary provision will be made for relevant specialists to visit the site.
- 4.3.3 Bulk samples will be taken from all securely stratified deposits using a strategy which combines systematic and judgement sampling, but which also follows the methodologies outlined in the English Heritage (2015) '*Environmental Archaeology: A Guide to the Theory and Practice of Methods, from Sampling and Recovery to Post-excavation* (Third Edition)' guidance. As standard a 40-litre sample will be taken, where this is not possible, entire contexts may be sampled.
- 4.3.4 Positive features will also be sampled; retention of structural material such as bricks will be implemented where necessary. Any surviving large fragments of cast-iron columns which may be retained for further investigation.
- 4.3.5 Flotation samples and samples taken for coarse-mesh sieving from dry deposits will be processed at the time of the fieldwork, or as soon as possible thereafter, partly to permit variation of sampling strategies.

4.4 *Human Remains*

- 4.4.1 It is not anticipated that human remains will be encountered during the archaeological work, however, should any inhumation or cremation burials be encountered, their extent, number and state of preservation will be established and GMAAS will be notified to discuss an appropriate strategy for their management. Remains should not be removed or chased beyond the existing limits of excavation prior to agreement with GMAAS.
- 4.4.2 It is considered best practice to not remove the remains during evaluation, however, this should be considered at a site-specific level. If it is deemed necessary to remove human remains, this will be carried out under the conditions of, and after the receipt of, licences for the removal of human remains (issued by the Ministry of Justice) and in accordance with the Burial Act (1857), '*Updated Guidelines to the Standards for Recording Human Remains*' (Brickley & McKinley. 2017), ClfA guidelines 'Excavation and Post-Excavation Treatment of Cremated and Inhumed Human Remains' (McKinley & Roberts. 1993), and all Historic England and Advisory Panel on the Archaeology of Burials

in England (APABE) guidance, to ensure that they are treated with due dignity. The preferred option would be for them to be adequately recorded before lifting, and then carefully removed for scientific study, and long-term storage with an appropriate museum; however, the burial licence may specify reburial or cremation as a requirement.

4.5 *Artefact recovery*

- 4.5.1 All stratified archaeological artefacts and ecofacts will be collected and bagged and labelled by type and context.
- 4.5.2 Removal, packaging, and labelling of finds will be undertaken in accordance with '*First Aid for Finds*' and specific Historic England guidance as required.
- 4.5.3 Artefacts defined as treasure under the Treasure Act 1996 (as supplemented by the Treasure (Designation) Order 2002) will be treated in accordance with the Treasure Act 1996 Code of Practice. All finds of treasure must be reported to the local coroner within 14 days of discovery. In the first instance, it is recommended that details of the find are provided to the local Portable Antiquities Scheme Finds Liaison Officer to confirm that it constitutes treasure; they will be able to apply for a Treasure Reference Number and declare the find to the coroner on your behalf. The Curator will also be notified. A short Treasure Report will be compiled for submission to the coroner.
- 4.5.4 Where recovery of treasure cannot be undertaken on the same working day as the discovery, suitable security measures will be taken to protect the finds from theft.

4.6 *Security of Archaeological Material*

- 4.6.1 To maintain the security and integrity of excavated finds all 'special finds' and human remains should be removed from site at the end of each day. Bulk finds and samples should be made secure overnight and removed on at least a weekly basis, to be returned to MAP's office. Aside from instances discussed in 4.6.4 where specific measures are in place, no finds or samples should be left in trenches/ excavation areas overnight.
- 4.6.2 All finds and samples leaving site will be added to MAP's proforma transfer sheet which will be deposited with MAP's post-excavation department.

5. Post-Investigation Assessment, Analysis and Reporting

5.1 *Assessment & Analysis*

- 5.1.1 Upon completion of the evaluation, the artefacts, soil samples and stratigraphic information will be assessed as to their potential and significance for further analysis.
- 5.1.2 A rapid scan of all excavated material will be undertaken by conservators and finds researchers in collaboration. Material considered vulnerable will be selected for stabilisation after specialist recording.
- 5.1.3 Where intervention is necessary, consideration will be given to possible investigative procedures (e.g. glass composition studies, residues in or on pottery, and mineral preserved organic material).
- 5.1.4 Allowance will be made for preliminary conservation and stabilisation of all objects and an assessment of long term conservation and storage needs.
- 5.1.5 Assessment of artefacts will include inspection of X-radiographs of all iron objects, a selection of non-ferrous artefacts (including coins), and a sample of any industrial debris relating to metallurgy
- 5.1.6 Once assessed, all material will be packed and stored in optimum conditions, as described in First Aid for Finds.
- 5.1.7 Waterlogged organic materials will be dealt with, following Historic England documents, Guidelines for the care of waterlogged archaeological leather, and guidelines on the recording, sampling, conservation and curation of waterlogged wood.
- 5.1.8 Processing of all samples collected for biological assessment, or subsamples of them, will be completed. Bulk and site-riddled samples from dry deposits will have been processed during excavation, where possible.
- 5.1.9 The preservation state, density and significance of material retrieved will be assessed, following methods presented in Environmental Archaeology (Historic England. 2011). Unprocessed sub-samples will be stored in conditions specified by the appropriate specialists.

5.1.10 Assessments for any technological residues will be undertaken. Any required samples for dating will be submitted to laboratories promptly, so as to ensure that results are available to aid development of specifications for subsequent mitigation strategies.

5.1.11 Basic stratigraphic information will be supplied to the project specialists' outlines in section 7.

5.2 Reporting

5.2.1 A brief, interim report may be required shortly after the completion of fieldwork.

5.2.2 Prior to the commencement of the post-excavation assessment collections held by the Oldham and Bolton archives and also the Touchstones Museum will be interrogated. It is likely that the recording of features identified and recorded during the fieldwork phase of the project will identify specific areas of further research. This may include, but is not restricted to, specifics concerning the layout of the mill, associated machinery and manufacturing processes.

5.2.3 On completion of the post-excavation assessment, an assessment report will be prepared, to include the following as a minimum:

- An introduction including background information (with planning application details, where appropriate);
- The original research aims and objectives and rationale for selected area of investigation;
- An archaeological and historical baseline;
- A description of results including a stratigraphic matrix;
- A report of all finds and sample categories to assessment level, by appropriate specialists, including their research potential;
- The results of any scientific dating;
- A discussion of the results including a phased interpretation of the site;
- A summary of the results in their local, regional, and national context, and the extent to which the work has addressed the project aims and objectives;
- An assessment of the effectiveness of the evaluation strategy, including earlier stages of work;
- Recommendations for any further investigation, specialist analysis or conservation, recording and/or preservation of in situ archaeological remains, to be determined in consultation with the Curator;

- Supporting illustrations, including as a minimum:
 - A detailed location map;
 - A detailed site plan showing all trenches, as excavated;
 - Plans for all trenches where archaeological features were identified;
 - Detailed plans of archaeological features. These plans will display a representation of break of slope;
 - Detailed sections of archaeological features;
 - An overall (phased) site plan showing all archaeological features recorded;
 - A plan showing the location of any metal detector finds;
 - Selection of photographs of work in progress;
 - Select artefact illustrations and/or photographs.
- Supporting tables of data;
- Contact sheets of all photographs taken
- Acknowledgements identifying those involved in the project, including the curator

5.2.4 Where an updated WSI is necessary, the updated document should contain:

- Any changes to the aims and objectives of the project;
- The requirement and content of the final analysis report;
- Any changes to the archive arrangements, including details of proposed specialist conservation;
- Any updates to the Selection Strategy and Data Management Plan.

5.2.1 Copies of the report will be submitted to the commissioning body, the Local Planning Authority within 3 months of the completion of the evaluation, unless an alternative timescale is agreed.

5.2.2 We will provide a physical and digital copy of the report along with associated shapefiles, to the Historic Environment Record. A digital copy will also be lodged with OASIS.

5.2.3 Printed copies of reports will be included with the physical archive to the recipient museum (see section 6).

- 5.2.4 Unless the individual/organisation commissioning the project wishes to state otherwise, the copyright of any written, graphic or photographic records and reports rests with MAP.

6. *Archive Security of Archaeological Material*

- 6.1.1 To maintain the security and integrity of excavated finds all 'special finds' and human remains should be removed from site at the end of each day.
- 6.1.2 Bulk finds and samples should be made secure overnight and removed on at least a weekly basis, to be returned to MAP's office. Aside from instances discussed in 4.5.4 where specific measures are in place, no finds or samples should be left in trenches/ excavation areas overnight.
- 6.1.3 All finds and samples leaving site will be added to MAP's proforma transfer sheet which will be deposited with MAP's post-excavation department.
- 6.1.4 All physical archive materials and electronic equipment will be removed from site each night and stored in a secure location. All hand tools will be securely stored in a secure unit on site.
- 6.1.5 All devices used to record features via DiggIt will be synced at least weekly.

6.2 *Working Archive*

- 6.2.1 All material (whether digital or physical) recovered or generated through the duration of the field evaluation project will be appropriately and securely stored in a working project archive. This will be undertaken in accordance with the selection strategy and digital data management plan set out at the commencement of the project (appendix 1).
- 6.2.2 All physical documents or drawings will be indexed, collated, and stored in a secure location when not in use.
- 6.2.3 Secure digital security copies will be made of physical and born digital records at regular intervals, to be stored and backed up in a secure location. Documents and drawings will be scanned at an appropriate resolution (see appendix 1).

6.3 *Archive Deposition*

- 6.3.1 The requirements for archive preparation and deposition must be addressed and undertaken in a manner agreed with the recipient museum, who will be contacted before commencement of fieldwork. The museum will also be contacted during a mid-point review of the project during which information will be passed to the museum regarding the archive and the proposed timescale for deposition and following the completion of work.
- 6.3.2 Guidance set out in the ClfA Toolkit for Selecting Archives (2019) will be followed, prior to the commencement of fieldwork in order to establish project-specific strategies for the retention or discarding of material. The retention of material will also be discussed with the Museum with regards to the significance and research potential of the archive.
- 6.3.1 At the time of writing Your Trust has been contacted in regard to their Archive deposition strategy. The museum will issue an accession number following the completion of the work. The timetable for deposition shall be agreed on completion of the site archive and narrative. A copy of the archive receipt will be provided to the Curator.
- 6.3.2 The digital archive will be deposited with the Archaeology Data Service (ADS) at the University of York. A link to the final digital archive will be provided to the Curator.

7. **Staffing**

- 7.1 MAP is a ClfA Registered Organisation, through ClfA, MAP has undergone thorough scrutineering for its methods, policies and abilities. MAP also has several accredited members of staff who have equally progressed through ClfA robust scrutineering process. As a company we have undertaken and do undertake an extensive range of archaeological work across the UK, working on small to large scale sites, inclusive of heritage assessments, evaluations, excavations, and building recordings.
- 7.2 The industrial sites we have undertaken include
- Heritage Assessments of the 18th to 20th century Butterley Iron Works in Ripley,
 - 19th and 20th century Penwortham Mill in Preston,
 - 18-20th century Riverside Mill in Horsforth
 - Mid-19th century worker's houses and public house at Church Row, Leeds;

- Preparatory cultural heritage work for the former Froghall Copper Works in Stafford
- Proposed service corridor across Ironbridge in Shropshire;
- Watching Briefs at 18th-19th century Hill Mill in Bolton and Riverside Mills in Horsforth; building record at Hill Mill in Bolton and Sude Hill Mill in New Mill Fulstone
- Record of the cranes at Fagley Quarry in Fagley,
- Evaluations at Gowthorpe, Selby (glass bottle manufacturer), Castleford Flint Mill, Castleford Brick and Glassworks, Iron Foundry at Pottery Street, Manchester, terraced housing at Duke Street Manchester, coal mining at Seacroft in Leeds
- Excavations at the Glassworks Castleford and a 19th-20th century tannery at Hull Road in York.
- Evaluation at Burslem Bank bottle kilns, Stoke on Trent
- Evaluation and excavation of brick kilns at Matlock, Derbyshire
- Monitoring and Reporting & Trial Trenching at Holt St, Oldham

- 7.3 The project is to be managed by Paula Ware MCIfA (Managing Director). Paula has over 40 years' experience within archaeology, having managed MAP from its inception. She has managed archaeological projects of all scales and nature for the company. Sites relevant to Dicken Green Mill include documentary research in advance of archaeological work at Castleford brickworks and glass works, the brick works and watermills at Storrs Bridge, Ironbridge pylon corridor, Penwortham Mill and Riverside Mill (both Cotton Mills)
- 7.4 Kelly Hunter ACIfA (Senior Project Officer & Post Excavation Manager) will oversee the on-site work and is an experienced archaeologist with over 30 years in the field with particular experience of post-medieval and Industrial era sites throughout the north of England. In the past, she has undertaken Heritage Assessments of mill's, quarries and former foundries; Building Recording of mill sites, evaluation/excavation of industrial sites in Selby, Leeds, Manchester and York.
- 7.5 CVs of all other staff assigned to the project will be supplied to GMASS following the instruction of the fieldwork.
- 7.6 All MAP sites are overseen by a Project Manager who is accredited at MCIfA level by the Chartered Institute for Archaeologists. All site leads, as a minimum, hold Site Supervision Safety Training Scheme training.

- 7.7 The Curator will have free access to the site (subject to Health and Safety considerations) and all records to ensure the works are being carried out in accordance with this WSI and all other relevant standards.
- 7.8 At the time of writing the field work team is to be confirmed, however as a minimum the following contacts will be relevant for the duration of the project.
- 7.9 At the time of writing the field work team is to be confirmed, however as a minimum the following contacts will be relevant for the duration of the project.
- Paula Ware- Managing director
Telephone – 01653697752
Email – paula@maparchltd.co.uk
 - Kelly Hunter- Senior Project Officer & Post Excavation Manager
Telephone – 07920816802
Email – Kelly@maparchltd.co.uk
- 7.10 The Based on anticipated finds, the following Specialists have been contacted as are available to work on the project:
- Environmental Sampling – Diane Alldritt
 - Conservation – York Archaeology
 - Ceramic Building Material – Dr David Griffith
 - Clay Tobacco Pipe – M R Stephens (MAP)
 - Brick-David Johnson
- 7.11 MAP has an Environmental Policy which outlines our commitment to reducing the impact our work has on the environment. We are committed to reducing our carbon footprint as much as possible be it through the considered use of vehicles or reducing paper usage through digital recording,

8. Bibliography

BBC News. 2018. Rochdale fire: Former mill to be demolished: <https://www.bbc.co.uk/news/uk-england-manchester-45177976>, Accessed 01.09.26

British Geological Society. Geology of Britain Viewer. Available at: <http://mapapps.bgs.ac.uk/geologyofbritain/home.html> [accessed 01.09.2026]

CIfA. 2023. Standard for archaeological field evaluation

CIfA. 2023. Universal guidance for archaeological field evaluation

Appendix 1: Digital Data Management Plan

Project Administration	
Project Name	Dicken Green Mill
Site Code	05-65-26
Project Description (E.g., number of trenches, area of excavation)	Excavation of 6 archaeological trenches
OASIS ID	maparcha1-545566
Museum Name & Accession code (where applicable)	Your Trust Accession Code TBC
Client/ Landowner (where applicable)	MCI Developments
Project Lead	TBC
Project Manager	Charlie Puntorno
Date & Version	VA 01.09.26

Data Collection

Data to be Collected/ Created (to be updated throughout duration of project)		
Type	Format	Volume
GIS	ESRI Shapefile (.shp & .shx & .dbf, plus associated files) (Metadata to be deposited as .csv)	3 shapefiles •Development Outline •trenches •Services 1 Geopackage •Site Location
CAD	.dwg, .dxf (Metadata to be deposited as .csv)	
Spreadsheets & databases	Excel (.xlsx) Access (.accdb) (to be deposited as .csv)	
Images	.jpg, .raw (to be deposited as .tiff)	WSI=1 .jpg
Text/ Documents	Word (.docx) PDF (.pdf)	WSI = 3.docx & 5 pdf

- All data will be collected in line with the project specific Written Scheme of Investigation, *Guides to Good Practice* produced by the ADS and MAP's guidance on the *Creation and Treatment of Documentary, Digital and Material Archives*.

- The digital archive will be stored in an appropriately named project specific folder which will be regularly backed up. All data raw data will be stored in the appropriate folder. Version control will be maintained throughout the project.

Documentation and Metadata

- Data collected will include standard formats which maximise opportunities for use and reuse in the future
- Data documentation will meet the requirement of the Museum Deposition Guidelines, Digital Repository Guidelines and the methodology described in the Written Scheme of Investigation. Following the completion of the project all paper-based material will be digitised and included within the archive.
- A metadata form consistent with ADS examples will be completed for each dataset and included within the final archive. As a minimum the metadata will include a file name, keywords & dates, creator & date of creation, copyright holder, location (site address or coordinates as appropriate), software and version
- An archive catalogue documenting both physical and digital archive products will be maintained and submitted with both the Museum and Trusted Digital Repository (ADS).

Ethics and Legal Compliance

- MAP staff must only participate in work which conforms to accepted ethical standards and which they are able to competently preform. Where there is any doubt, which should be raised with management.
- MAP places an emphasis on internal peer review of documents and the discussion of results. All Written Schemes of Investigations are reviewed by the relevant Local Authority Archaeologists prior to submission. Where confidentiality is requested by a client, this is strictly upheld by MAP.
- The project archive will include the names of all individuals who contributed to the project unless it is requested otherwise. No personal data will be held within the project archive.

- MAP have a GDPR compliant Privacy Policy underpins the management of all personal data. Such data is not retained in project specific folders and is not accessible to unauthorised staff nor will it be shared with any third-party companies.
- Unless otherwise agreed at the inception of a project, the copyright of all data collected throughout the project belongs to MAP. The inclusion of data derived from external specialists and/or contractors is secured at the point of agreement of their participation on the project.
- By depositing an archive with an HER or museum MAP gives permission for the material presented to be used by the recipient, in perpetuity, although MAP retains the right to be identified as the author of all project documentation and reports as specified in the Copyright, Designs and Patents Act 1988 (Chapter IV, section 79).
- All relevant licences and permissions to reproduce external data are discussed in the site-specific Written Scheme of Investigation and all subsequent reporting, including Desk Based Assessment. Where site specific licences are required (i.e. for the removal of human remains), licence numbers and dates will also be included within site reports and a copy of the licence held within the archive.

Data Security: Storage and Backup

- MAP's current IT infrastructure is divided between SharePoint for documents and an NAS (Network Attached Storage) drive for larger data files (acting as back up of locally held files on work laptops). Both require username and password intrinsic to the individual users.
- Digital Recording is currently provided by DiggItArchaeology.com, who provide access to their mobile app and web app via email and password login. The backup of recorded material is provided by DiggIt's use of the three-point server system with automatic backups working in tandem. DiggIt's data is encrypted in transit and stored and backed up on a MongoDB Atlas server cluster of 3 replicate nodes in the Republic of Ireland (in the GDPR-compliant EEA). In the rare event that one server is down, a replicate node instantly replaces it with no perceptible change in behaviour or functionality. These servers are backed up daily, and the datacentres housing them are accredited to ISO 27001 (2005) or higher. In the very unlikely scenario that data must be restored from a backup, we estimate the Recovery Time Objective (RTO) for

restoring this data to be approximately 10 minutes of downtime. At the close of the site material will be downloaded and stored using SharePoint.

- In regard to filing within the SharePoint and NAS, a folder template sets out the associated locations of files; these folders should be appropriately named and populated with file names for field data stored on the NAS. See section on “Naming Conventions”
- SharePoint is maintained/delivered under licence by Practical Networks with in-house maintenance by the Commercial Director. The NAS drive is a WD PR2100 and is maintained by the Archaeology and Geomatics Manager with weekly backups and checks of the data; field data such as photographs and survey data to be uploaded weekly by the Project Officer.
- Field and in-house access to the SharePoint and the NAS drive is limited/restricted by user email and password.
- Files such as databases, tables and documents required by the external specialists and in-house post-excavation team will be distributed using the SharePoint system. Any further data such as photographs, AutoCAD files, QGIS projects etc will be distributed via secure alternative means (WeTransfer or similar) to protect the integrity of the NAS Drive.

Selection and Preservation

- A selection strategy and the DMP for each project will be considered from the inception of the work. The process of selection should be devised in consultation with LPA frameworks, guidance and individual stakeholders, reviewed by the Appointed Project Manager at each milestone of a project’s lifespan; inclusive a peer review and appropriate consultation with stakeholders to provide quality assurance.
- The strategy should dictate which parts of the archive, both digital and analogue, are relevant and would provide future generations with a soundly curated archive. Documents and Data should be quality assured prior to deposition, checking for consistency and following any deposition guidance of the eventual repository
- All costs relating to the digital archiving have been factored into the original quote and intended repository will be notified. At each milestone costing considerations

must be undertaken to ensure that deposition is not out of pocket or unexpectedly above factored levels.

Data Sharing

- A summary of the site will be made available at the earliest opportunity, latterly curated and adapted at each major milestone to reflect most up to date information regarding the site.
- All reports relevant to the site will also be curated and added to the OASIS record, updated at pertinent milestones of the project; the final report must be lodged with the HER in the first instance.
- Any archive material must be authorised for dissemination by the relevant stakeholders, primarily this is likely to be the client; though any such action will only be temporary, and usually as a result of planning issues.

Responsibilities

- The appointed Project Manager shall ensure the DMP is correctly followed, reviewed and adapted (where appropriate) at each milestone. In the unlikely event that the project changes hands, the responsibility will ultimately rest with the Managing Director, who will ensure the needs of the DMP are addressed and properly handed over to the next Project Manager.
- Curation of the field data, data synthesis/analysis, quality assurance should be the responsibility of senior figures of the project team, usually the Project Officer/Supervisor. They will make sure that all data is stored correctly and backed up to minimise any loss of integrity of the archive.
- Reports both internal and external shall be subject to MAP's ideal naming preferences of project files. It is the responsibility of each department to ensure their curated report/work is correct, quality assured and seek clarification from the authors (external or otherwise) of any document which contains errors.
- All work will be latterly audited by the Project Manager working towards creating an archive and level of reporting which is both ethically sound, accurate and reliable for future use by anyone internal or external to the company.

Naming Conventions

- Files and Folders should be named consistently throughout the project folder. The use of an _ (underscore) should be used to separate words instead of spaces e.g. use Pott_Asmnt instead of Pottery Assessment. File names vary according to the content of the file, the _ rule still applies here.
- There should be no spaces in any file naming
- No symbols (e.g. #?,,) should be used as they are not ADS compliant
- Full stops in file names are not accepted, except between file name and file type
- Abbreviate where possible, losing extraneous vowels and consonants, as file paths are cumulative and cannot exceed a certain number of characters
- Naming Examples.

- Reports and digitised registers

Should follow the structure of: Site Code, Type of Work (Adding excavation Phase if required), Component, Version. Varied slightly for digitised registers as per example:

e.g. 05-08-20-TT_FINALReport_A210622

05-26-19-EXC_PhB_App01_CtxtListing

- Digital Photographs and Black & White Photographs

Should include the Site Code, Type of Work (Adding excavation Phase if required), and Frame No, varied slightly for B&W film:

e.g. 05-08-20-TT_Digi_001

05-26-19-EXC_PhB_BW_FLM01-001

NB be aware that jpegs and raw (as well as selected archive tiff's) should be in separate folders and be concurrent with each other

- Scanned Site Registers

Should be scanned in pdf format and be formatted as: Site Code, Type of Work (Adding excavation Phase if required), Register Name.

e.g. 05-08-20-TT_CtxtReg

05-26-19-EXC_PhB_DrawReg

- Scanned Context Sheets & other site sheets
Should be scanned in pdf format and be formatted as: Site Code, Type of Work (Adding excavation Phase if required), Type of Sheet, Sheet Nos.
e.g. 05-08-20-TT_Ctxt-0001-0050
05-26-19-EXC_PhB_Ctxt0001-0050

- Site Drawings and Plans
Should be scanned as TIFF's and be formatted as: Site Code, Type of Work (Adding excavation phase if required), Drw, Sheet No
e.g. 05-08-20-TT_Drw_Sh-001
05-26-19-EXC_PhB_Drw_Sh-001

NB. The phase of work or field numbers may only be relevant at the time the work was undertaken, if work is part of a larger continuing outline, check where the next tranche of numbers will start and bare that in mind or check with PM prior to archiving reports.

List of Abbreviations

Registers

Ctxt

Drw

Digi

BW

Env

SF

Specialist Reports

Pott Pottery

ABn Animal Bone

FeR Iron Waste Residues

Crbn Carbonised Plant Remains

Cnsrv Conservation

Appendix 2: Environmental Strategy

By Diane Alldrit

The on-site environmental sampling strategy will systematically seek to recover a representative sample of botanical, molluscan (both terrestrial and aquatic), avian and mammalian evidence from the full range of contexts encountered during the excavation. This will enable, at the assessment stage, the possibility for radiocarbon dating material to be obtained, and for an initial analysis of the economic and environmental potential of the site. In order to achieve this, a bulk sample (BS, Dobney *et al* 1992) comprising an optimum size of 40litre of sediment (where possible) should be taken from **every stratigraphically secure and archaeologically significant context**. In practice it may not always be possible to obtain 28l of sediment from certain features during the assessment stage, for instance from partially excavated pits or post-holes, in which case a single bucket sample, c.10 to 14litre should be taken at the site supervisors' discretion. Deposits of mixed origin, for instance topsoil, wall fills and obvious areas of modern contamination, should be avoided where possible, as these will contain intrusive material and not provide secure radiocarbon dates.

All buckets and other sampling equipment must be clean and free of adherent soil in order to prevent cross-contamination between samples. If dry soil is to be stored for any length of time it should be kept in cool, dry conditions, and away from strong light sources. However, it is preferable to process samples as soon as possible after excavation.

Bulk soil samples shall be processed using an Ankara-type water flotation machine (French 1971) for the recovery of carbonised plant remains and charcoal. The flotation tank should contain a >1mm mesh for collection of the retent or 'residue' portion of the sample (which may contain pottery, lithics and animal / bird bone, in addition to the heavier fragments of charcoal which do not float). The 'flot' portion of the sample, which may include carbonised seeds, cereal grain, charcoal and sometimes mollusc shell, should be captured using a nest of >1mm and >300micron Endicot sieves. Flotation equipment, including sieves, meshes, brushes and so forth must be meticulously cleaned between samples in order to prevent contamination of potential radiocarbon dating material. All material resulting from flotation will be dried prior to microscopic examination. Flotation is not suitable for the recovery of pollen or for processing waterlogged samples, which shall be discussed below.

Where there is potential for waterlogged preservation, shown for instance by the presence of wood and other organic or wet material, then a 5 to 10litre size sample should be taken (GBA sample, Dobney *et al* 1992). This material is to be retained for later processing using laboratory methods to enable the recovery of waterlogged plant material and insects. For assessment purposes a 1litre sub-sample of the organic sediment from each potential waterlogged sample shall be processed using laboratory wash-over methods, and once processed **kept wet**. All waterlogged samples awaiting processing should be kept damp, preferably stored in plastic sealable tubs, and in cool conditions. Where large waterlogged timbers are recovered these should be stored under refrigerated conditions and an appropriate conservator consulted.

There is the possibility that the waterlogged deposits may require parasite egg analysis. It is proposed that the 'squash' technique is adapted, this would require small lumps of raw sediment approximately 3mm in diameter taken from three separate points from within the sample and homogenised in a little water by shaking. After allowing coarse particles to settle for a few moments, a drop of the supernatant was removed. This work would be undertaken by either John Carrott or Harry Kenwood if necessary.

If sediment suitable for pollen analysis is encountered, for instance rich organic peaty deposits, or deep ditch sections with organic preservation, the archaeobotanical specialist is to be consulted prior to any sampling taking place. These deposits would require sampling with large kubiena tins and require the specialist to be on-site. Pollen analysis, even at assessment level, would subsequently impose a considerable cost implication should it be carried out.

The specialist is available to provide consultation and advice on the environmental sampling strategy throughout the course of the excavation and during post-excavation processing if required.

References

- Dobney, K. D., Hall, A. R., Kenward, H. K. and Milles, A. 1992 A working classification of sample types for environmental archaeology. *Circaea* 9 24-26.
- French, D. H. 1971 An Experiment in Water Sieving. *Anatolian Studies* 21 59-64.

Appendix 3: Conservation Strategy

By Ian Panter of York Archaeological Trust

Artefacts from all categories and all periods will be recovered as a matter of routine during the excavation. When retrieved from the ground finds will be kept in a finds tray or appropriate bags in accordance with **First Aid for Finds**. Where necessary, a conservator may be required to recover fragile finds from the ground depending upon circumstances.

If waterlogged conditions are encountered a wide range of organic materials may be recovered, including wood, leather and textiles. Advice will be sought from a conservator to discuss optimum storage requirements before any attempt is made to retrieve organic finds and structural timbers from the ground.

After the completion of the fieldwork stage, a conservation assessment will be undertaken which will include the X-radiography of all the ironwork (after initial screening to separate obviously modern debris), and a selection of the non-ferrous finds (including all coins). A sample of slag may also be X-rayed to assist with identification and interpretation. Wet-packed material, including glass, bone and leather will be stabilised and consolidated to ensure their long-term preservation. All finds will be stored in optimum conditions in accordance with **First Aid for Finds** and **Guidelines for the Preparation of Excavation Archives for Long-Term Storage** (Walker, 1990).

Waterlogged wood, including structural elements will be assessed following the English Heritage guidelines, **Waterlogged wood: sampling, conservation and curation of structural wood** (Brunning 1996). The assessment will include species identification, technological examination and potential for dating.

The conservation assessment report will include statements on condition, stability and potential for further investigation (with conservation costs) for all material groups. The conservation report will be included in the updated project design prepared for the analysis stage of the project.