BQDB14

Archaeological Investigation, Recording, Analysis and Publication on Phases 2 and 3 Beorma Quarter, Birmingham

Written Scheme of Investigation V1

Client: Sahlia Investments

9th December 2014

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1 INTRODUCTION

1.1 This document is submitted by Headland Archaeology (UK) Ltd as the Written Scheme of Investigation (WSI) for a programme of archaeological investigation, recording, analysis and publication within the area known as Phases 2 and 3 Beorma Quarter.

1.2 In 2007 (Ramsey), Salhia Investments, commissioned Birmingham Archaeology to undertake a Desk Based Assessment of the proposed development area. This focused on the known archaeology within the site as well as information about the historical development of the site and development of medieval Birmingham in general. Birmingham Archaeology then undertook trial trenching in 2008 (Duncan) in order to assess the extent, nature and survival of archaeological features within the site and to allow the archaeological advisor to Birmingham City Council to advise on the planning application and make recommendations for further investigations. This resulted in the production of a brief for the further archaeological work.

1.3 The trenching identified the surviving remnants of a large ditch, believed to be the town boundary. Also within the site were a number of features that were interpreted as being associated with tanning. Alongside these a waterlogged deposit predating the ditch was assessed and the foundations of a number of post-medieval buildings planned. Due to a high water levels in the area there is a good level of preservation of organic material.

1.4 Headland Archaeology (UK) Ltd has been commissioned by Salhia Investments to produce a Written Scheme of Investigation for a programme that will act as a mitigation to the impact of the development proposals for the site. This will also be undertaken in accordance with *Management of Archaeological Projects* and the Institute for Archaeologists' *Standard and Guidance for Excavation*.

2 DESCRIPTION OF THE SITE

2.1 The entire Medieval core of the first established 12th century (AD1166) settlement lies within 500m of the site there and there is little evidence to suggest occupation prior to this and nothing within the site itself. The name "Birmingham" has possible Saxon origins by referring to Beorma's people. Earlier finds in the vicinity of the site include a couple of Roman coins [3266 and 2992] and a prehistoric flint [2996]). A small number of flint artefacts and sherds of Roman pottery were found during work on the sites for the new Bullring development. These again imply very low levels of activity of these periods in the area.

2.2 The location of this medieval occupation is focused on a Keuper Sandstone Ridge near to a fault line that causes the ground to slope down to the south-east towards the Rea Valley. The fault has resulted in the presence of springs and easily bored wells and as such would have been attractive to settlers. The earliest features within the study area are large ditches, potentially channelling this abundant aquatic resource

3 ARCHAEOLOGICAL BACKGROUND

3.1 To the south of the site a 3m deep moat surrounding the medieval manorial site was partly excavated in 2000 with 12th -13th century pottery recovered from its base and the filling of the feature continuing up until 18th-19th century on the basis of pottery found higher up (EBM161). Reputedly medieval structures survived into the late 18th century here and the moat was still visible in 1815. Work during a watching brief on the site exposed two phases of wall relating to the manor.This feature was connected to the moat around the Parsonage to its west and forms

part of a roughly oval enclosure called the “Hersum” ditch, the northern loop of which bisects the proposed development site from its southeast to northwest corner.

3.2 Amongst the archaeological observations reported there is considerable variation in the nature of the geological deposits encountered. To the west (EBM430/1), northwest (EBM246/7) and within the centre of the site itself (EBM382) a compact yellow/orange sand is observed. This rises from 105.5m AOD in the site to 109m AOD to the west. Within and to the south of the site a compact red clay was observed at 106m AOD with a similar deposit to the north of the site (EBM435) at 111.5m AOD. On the lower ground to the south and east is a blue/green clay deposit (EBM240/205) referred to as Mercia Mudstone and lying at 101.7m AOD (EBM9). Deposits displaying organic preservation have been recorded from the Rea (about 500m to the east of the site) all the way to the site itself. The date of material associated with these organic deposits appears to get later the further to the east they are from the site. Within the site a c. 0.25m thick organic deposit was cut by a 12th-13th century ditch. Immediately to the east of the site the natural mudstone had been cut by pits dating between 14th – 15th centuries with activity of this date extending for another 100m (EBM205). Organic deposits, further east again (EBM9), contained wood and leather and material of 15th – 18th century date, whilst a similarly waterlogged but much thicker deposit adjacent to the current course of the Rea (EBM240) contained 17th century material. This evidence seems somewhat at odds with Hislop’s assertion that Digbeth High Street was a principle route into the city in the Medieval period (1, p4) as it all postdates the time by which the town ditch went out of use in the 14th century. However, 13th century occupation evidence associated with Park Street does tend to suggest that this latter road follows quite an early route way. In fact with the exception of the basal fills of the moat around the manor (mentioned above) and “Hersum” Ditch the only other evidence for occupation of pre-14th century date in the study area comes from features such as post holes and pits within the site and observations to the north along Park Street and on Edgbaston Street to the west. The presence of wasters of 12th – 13th century Deritend Ware might suggest there was pottery production in the near vicinity.

3.3 Activity in the study area between the 15th – 17th centuries provides further indications of industrial processes taking place here. Features cut into the upper fills of the ditch within the site appear to relate to some form of hide processing. The types of features that are recorded include clay-lined pits, timber-lined pits as well as shallow lime-filled pits.

3.4 There is also evidence for water features such as a pool that was reputed to lie in the northeast part of the site in the 16th century through Brickley and Hill who quote a survey of Birmingham in 1553 (1, p6). The archaeological evidence also suggests that a considerable number of wells have been dug in the area. The site of the aforementioned pool appears to have been incorporated into Goffe and Co. mineral water manufacturer’s holding where an artesian well is meant to have been built and workmen digging in 1889 found a large (40ft) rectangular cistern dated 1854. A stone-lined well measuring 2.2m deep by 1.5m in diameter was the earliest found in the study area containing Medieval lower fills and discovered during work on the Moor Street site to the northwest of the current proposals (and).

3.5 In terms of the survival of archaeological features the north side of High Street appears to contain some of the best preserved archaeology within the study area. Very deep features such as the moat and portions of wall from the manor survive to the south but there has been little evidence for other features of an earlier date. At Edgbaston Street much further to the west of the site (EBM437) features dating back to the 13th century were also recovered including a timber-lined cistern or tank. This site which lies near the Parsonage moat provided considerable evidence for hide processing or tanning spanning from as early as the 12th – 14th century and continuing through to the 17th/18th century. Further to the north-west of the

site on Moor Street only a very small patch of archaeology had survived landscaping for later development (EBM435) (6 and 7) with the main early medieval feature being a section of the town boundary or “Hersum” ditch along with a few 12th-14th century pits, and 15th-16th century pits cutting these.

3.6 The largest zone of archaeological survival investigated within the study area adjoins the northwest corner of the site on Park Street. It again follows a similar theme to those sites mentioned above. At its southern extent the “Hersum” ditch was identified, although here along the eastern boundary of the historic plots fronting Park Street another ditch was identified. The depth and width of this feature were not established but it also appears to date as far back as the 12th-14th century. Kiln waste discovered in the ditch sections on this site along with a piece of kiln furniture indicate that pottery manufacture is likely to be taking place in the vicinity. As with almost every other investigation previously referred to, at least the rear of the plots adjacent to the ditch appear to have been given over to tanning pits spanning the medieval period and later. Other clay-lined features going out of use in the 15th century may be associated with industrial activity, with a kiln implying high temperature processes being present too.

4 OBJECTIVES

4.1 In general, the purpose of the investigation is to record and advance understanding of the significance of the heritage assets before they are lost. This will be achieved by determining and understanding the nature, function and character of any remains on the site, disseminating the results of that work and archiving the material and paper records.

4.2 The regional research context is provided by the West Midlands Archaeological Research Framework (Watts *et al* 2012). Any evidence retrieved during the works will be analysed in light of the objectives contained in this framework.

4.3 The archaeological investigations will be carried out in order to achieve the aims outlined in the archaeological brief for the work (Hodder 2007)

(i)To fully investigate the archaeological features and deposits on the site.

(ii)To sample and analyse palaeoecological remains(including pollen, plant macrofossils and beetles) from organic deposits located in the evaluation and to date those deposits by radiocarbon assay.

(iii)To recover and analyse remains of past environmental conditions from any other suitable deposits

(iv)To recover and analyse industrial residues of all kinds;

(v)To record the 19th century brick structures at an appropriate level of detail to enable them to be related to the documentary record

(vi)To relate the historic development of the site to that found by excavation on nearby sites.

4.4 Research objectives will be reviewed in the light of the results of the excavation prior to analysis and the project design updated.

4.5 The resulting archive (finds and records) will be organised and deposited with Birmingham Museums and Art Gallery to facilitate access for future research and interpretation for public benefit.

5 PHASING AND SCHEDULE

5.1 Archaeological excavation of the whole of the site is required, with the exception of those parts of the site where existing buildings are to be retained. This may have to be undertaken in stages and these will be determined during/following demolition and through consultation with the site's main contractor and works programme.

5.2 Prior to the commencement of any phase of work on site the archaeological contractor will notify the planning authority's archaeological advisor in writing of the date of commencement.

5.3 The date of the completion of the stripping of top-soils and other non-significant overburden in any phase of work shall be notified in writing to the planning authority's archaeological advisor within one week of the stripping works being completed.

5.4 The programme of work to investigate, sample and record archaeological deposits will be notified to the planning authority's archaeological advisor in advance of the date of commencement.

5.5 Within one week of the completion work on site the client's representative will notify the planning authority's archaeological advisor in writing of the completion of that phase.

5.6 On completion of all phases of work a post-excavation assessment will be provided to the archaeological advisor within six months of the completion of fieldwork. The programme of post-excavation analysis and draft publication report will be completed within two years of completion of fieldwork.

5.7 Following completion of the post-excavation assessment and the agreement of the updated project design with the planning authority, the client may request that the planning condition is discharged. The archaeological advisor will need to be satisfied that sufficient resources are provided to complete the work through to publication.

6 PROJECT TEAM

6.1 The project will be managed for Headland Archaeology by Andy Boucher (Project Manager); the field team will consist of Simon Mayes/Rob Blackburn (Project Officer – depending on availability at agreed start date) with other members of staff from Headland Archaeology as required. *Curricula vitae* of key personnel can be provided on request. The project team will familiarise themselves with the background to the site and will be aware of the project's aims and methodologies.

6.2 Specialist artefact analyses will be managed by Julie Franklin who is Headland's Finds Manager. Julie will undertake finds assessment within her areas of competence (medieval and post-medieval metalwork, glassware, clay pipes, ceramic building material and other small finds) and assisted by Julie Lochrie (lithics). Ceramic remains will be assessed and analysed by an appropriate recognised period specialists taken from the following list: Sarah Percival (Neolithic-Late Prehistoric), Ian Rowlandson (RB), Stephanie Ratkai (Medieval). Any other assemblages sub-contracted to recognised period specialists familiar with finds from this geographical area as appropriate. To ensure analysis is integrated with existing regional work, provision will be made for specialists to build up familiarity with local typologies, literature and expertise if required. See list attached in Appendix 1.

6.3 Environmental analysis will be managed by Dr Tim Holden. Headland has in-house specialists who can undertake analysis of pollen, plant macrofossils, insect remains and thin sections. Faunal remains will be assessed by Headland Archaeology's

faunal remains specialist (Tim Holden). Human remains will be assessed by Tegan Daly.

6.4 Headland Archaeology (UK) Ltd is a Registered Organisation and abides by the Codes of Conduct and Approved Practice and Standards of the Institute for Archaeologists. The company has all the necessary technical and personnel resources for the satisfactory completion of the evaluation.

7 INSURANCE

7.1 Headland Archaeology (UK) Ltd is fully indemnified and all necessary insurances can be presented on request.

8 HEALTH & SAFETY

8.1 All of Headland's work is undertaken in accordance with current H&S legislation. A risk assessment and method statement will be prepared prior to the commencement of fieldwork. All staff will wear appropriate PPE and this will include high-visibility clothing, hard hats and safety footwear. Welfare facilities (rest-area, toilet and hand-washing) will be supplied. Where appropriate, deep features will be fenced off using orange *netlon* fencing and road irons.

9 ACCESS & SERVICES

9.1 This Written Scheme of Investigation is submitted on the understanding that there will be unhindered access (including machine-access) to all areas of the site. A plan of any services within the proposed development area will also be provided by the client or their agents.

9.2 It is currently anticipated that a main contractor will be attendant on site and provide support for the works as appropriate. Where this is not that case Headland Archaeology has experience of acting as main contractor but will require the client to appoint a CDM co-ordinator for the work.

10 METHOD

Mechanical Removal of Topsoil

10.1 Overburden and subsoil will be removed by a mechanical back-acting excavator, fitted with a flat-bladed ditching bucket. All machine stripping will be carried out under close archaeological supervision and will cease when the upper surfaces of archaeological features/deposits are encountered. In the parts of the site not currently occupied by buildings, all surface deposits are to be mechanically removed. Where existing buildings are to be demolished, demolition is to be to slab only and is not to include grubbing out of walls or foundations. Slab removal is to be undertaken under archaeological supervision at the commencement of the archaeological excavation. Subsequent excavation is to be entirely manual

10.2 All machinery will be kept off the stripped areas until they have been fully excavated and recorded according to the specification and approved by the archaeological advisor.

10.3 It is anticipated that spoil will be stockpiled adjacent to the development area. Areas will be identified to be used if necessary for the storage of spoil should off-site storage not be practical.

10.4 Following completion of each stage of site strip a site meeting will be convened between all parties in order to define the most appropriate sampling and recording strategy.

10.5 Where deposits are extensive and/or deep, mechanical removal following partial manual excavation, under archaeological supervision, to expose underlying deposits and features, may be required subject to specific agreement of the Planning Archaeologist

Hand Investigation

10.6 All contextual, sample and drawing numbers will start from 2000 (in order to avoid duplicating evaluation numbers).

10.7 Archaeological features identified during machining stripping will be marked on the ground by spray paint (if this proves helpful). Pre-excavation planning will commence at the earliest opportunity and these plans will be digitised and used as the basis for the excavation strategy.

10.8 Stripped areas will be hand-cleaned where necessary.

10.9 All discrete features will be investigated where safe to do so. Deep features such as water pits and wells will be investigated to their base. Where this requires the appropriate use of a machine (for example to step or to batter excavation edges), a strategy will be submitted to the archaeological advisor for this in advance.

10.10 Stripped areas and spoil heaps will be scanned by metal detector.

Sampling levels

10.11 Sampling will take place of deposits likely to contain environmental data or industrial residues, including the organic deposits located in the evaluation. An appropriately qualified environmental archaeologist must advise on-site on sampling locations and methods:

10.12 All burials, ritual deposits (e.g. certain types of pit containing evidence of placement), industrial features including 'domestic' ovens, kilns and hearths and floor surfaces will be 100% excavated to assist in their understanding.

10.13 A minimum of 50% of any structural features.

10.14 With the exception of modern (20th century or later) pits, at least 50% of pits will be excavated where safe to do so. Where possible, all initial excavation will be located away from intersections with other features to obtain unmixed material. 18th and 19th century features will be assessed on site as to their relevance to achieveing the project's aims and a strategy for sampling them will be agreed with the archaeological advisor for the planning authority.

Additional excavation may take place:

- where significant assemblages of finds are present;
- when the understanding of the form and function may be enhanced by full excavation; where stratigraphic relationships with other features are uncertain.

10.15 Postholes will be half sectioned initially. Where they represent parts of domestic/industrial activity, are located adjacent to contemporary activity, or have evidence of post-packing or *in-situ* burning they will be subject to full excavation.

10.16 With respect to the sampling of linear features the intersections between these and other features will be investigated as well as segments away from intersections with other features (in order to obtain un-mixed samples of material) with the total

extent of investigation amounting to at least 20% of the length of the linear features. Excavation slots will be at least 1m in width. Intervals between slots will be decided on-site and will be determined with reference to changes in form and fill, health and safety considerations and the potential for contamination from intercutting features. An exception to this may be the town ditch where a single section will be investigated at a location where the feature is best preserved. Further sections may be investigated with the assistance of mechanical plant to remove upper layers and make the section safe.

10.17 Any variations to the above sampling strategies will be agreed in advance with the archaeological advisor.

10.18 If such remains are encountered a license for the excavation of human remains will be obtained from the Ministry of Justice in accordance with Section 25 of the 1857 Burial Act. All excavation and treatment of cremated and inhumed human remains will be undertaken in cognisance of IfA Technical Paper Number 13 (Brickley & McKinley & 2004) and relevant English Heritage guidelines (2005).

Recording

10.19 All recording will follow IfA Standards and Guidance for conducting archaeological excavations and the Headland manual. All contexts, small finds and environmental samples will be given unique numbers. All recording will be undertaken on *pro forma* record cards.

10.20 Recording will follow the requirements of the WSI.

10.21 A diary record of the excavations will be kept including all details required by the Brief.

10.22 The photographic record will comprise black-and-white prints and colour slide, supplemented by digital photographs where appropriate for use in the report etc. A graduated metric scale will be clearly visible. A representative photographic record of the progress of the work will be kept.

10.23 An overall site plan will be recorded digitally using either a dGPS, or a Total Station using standard Headland Archaeology methodology (available on request). The site plan will be accurately linked to the National Grid. If additional detailed recording of features and sections is required then plans will be hand-drawn on permatrace at an appropriate scale (normally 1:20 for plans and 1:10 or 1:20 for sections). Sections or profiles will be drawn of all stratigraphic units at a scale of 1:10 in areas of detailed excavation.

10.24 Recording of 19th century brick structures will be at an appropriate level of detail to enable them to be related to the documentary record.

11 SAMPLES AND ARTEFACTS

11.1 All pre-18th century finds resulting from hand-excavation will be collected, unless otherwise agreed with the archaeological advisor during the course of the excavation. Finds of 18th century and later date will be assessed and Finds will be routinely recorded by context and recorded 3-dimensionally where appropriate (ie. where their position within a context can provide further significant information or the find is of particular significance). Any artefacts retrieved during the investigation will be cleaned using appropriate techniques and packaged and stored in accordance with *First Aid for Finds* (Watkinson & Neal 1998). All artefacts will be cleaned, marked and catalogued. Headland's in-house finds specialists will be available to provide advice remotely or on site if necessary. Conservation will be undertaken in line with *The Institute for Conservation* guidelines by Scottish Conservation Studio (for metalwork) and AOC Ltd (for organics).

11.2 The terms of the Treasure Act 1996 will be followed with regards to any finds which might fall within its scope. Any finds will be removed to a safe place and reported to the local coroner as required by the procedures laid down in the “Code of Practice”. Where removal cannot be effected on the same working day as the discovery, suitable security measures will be taken to protect the finds from theft and/or vandalism.

11.3 Deposits on the site are anticipated to be in both waterlogged and non-waterlogged condition. They are expected to comprise the fills of negative features, wooden, brick or stone structures. The site sampling strategy is to collect bulk samples from selected deposits for wet sieving and floatation in order to recover any environmental material and other finds (e.g. bone, pottery etc.). Deposits will be selected on site for sampling based upon their potential to contain artefacts or ecofacts relevant to understanding the character, date or significance of the deposit and of the environmental resource itself. It is noted that not all environmental remains are visible to the naked eye under field conditions, therefore bulk samples will be taken from features of potential significance even when no ecofactual/artefactual evidence has been directly observed.

11.4 A bulk sample will typically be 40 litres. However, where large deposits are encountered more than one bulk sample may be taken. Similarly, small deposits such as the fill of postholes may contain less than 10 litres of sediment and will be fully sampled. All samples collected on site will be processed and assessed, unless the stratigraphic assessment demonstrates that they derive from features with no archaeological significance, or unless they would provide duplicate information (e.g. multiple samples from the same phase of a ditch). A statement will be given on any discarded samples. The results and recommendations for any further work will be included in the post-excavation assessment report.

11.5 Where waterlogged deposits are encountered appropriate sampling techniques will be employed so as to maximise the environmental information gained from such deposits. This may include the taking of monolith or core samples for pollen and non-pollen palynomorphs (e.g. testates and fungal spores) and large specialist samples for plant macrofossil, wood (including waterlogged wood) mollusc, diatom and insect analyses. The English Heritage Science advisor will be consulted regarding appropriate strategies for waterlogged material and samples.

Contingency Arrangements

11.6 In the event of the discovery of unexpected archaeological remains over and above those predicted by archaeological evaluation, the planning authority’s archaeological advisor and the developer will be notified in order that an assessment of the importance of the remains and any provision for their recording may be made.

Monitoring

11.7 Access to the site will be afforded to the archaeological advisor for monitoring purposes. Regular progress updates will be made.

Reporting and Archive

11.8 All aspects of reporting and archive will be undertaken in accordance with guidelines published by the IfA on behalf of the Archaeological Archives Forum (July 2007) and the WSI. On completion of the excavation Headland will produce a site archive in line with the MAP2 specification, including all specialist assessment and analysis reports of excavated material.

11.9 The finds archive is expected to comprise ceramics (pottery, tile and CBM), faunal remains and palaeoenvironmental flots and residues. The finds and archive will be

deposited with Birmingham Museum. Provision will be made for storage costs. Deposition will be undertaken within two years of the completion of fieldwork. An online OASIS report will be completed.

11.10 On completion of the fieldwork, the first post-excavation task will be record checking and archive consolidation, this will comprise the following tasks:

- During or immediately after fieldwork all records will be checked and cross-referenced to ensure they are internally consistent.
- Artefacts will be processed and/or stabilised as appropriate, classified by type and period, quantified and marked.
- Environmental samples will be processed and assessed.
- Skeletal material will be cleaned and quantified.
- Photographic record will be developed, catalogued and labelled
- Site drawings will be digitised and geo-referenced.
- Contextual, artefactual and ecofactual data will be entered onto a database.
- A descriptive statement of results will be produced to form the interim report for each stage.

11.11 Final fieldwork report contents and format will be in line with the Local Planning Authority's requirements (the Brief) and with the principles of *Management of Research Projects in the Historic Environment* (English Heritage 2006). In this instance it will involve a Post-excavation Assessment (PXA) and Updated Project Design (UPD), followed by an appropriate report for publication.

11.12 If deemed necessary, the Post excavation assessment process will comprise:

- Introduction - planning and project background, site location, results of adjacent archaeological investigations etc;
- The creation of a provisional chronological sequence. This will be established based on the context/feature spotting undertaken during fieldwork.
- This will be discussed in terms of provisional chronological development with any major changes in layout or spatial organisation highlighted.
- The structural, artefactual and ecofactual data will be assessed (by specialists) and the results presented within quantifiable groups of information. The potential of each will be discussed, linked to the provisional chronological sequence both in terms of the original project objectives and any new ones that arose during fieldwork.
- Data Quantification - divided by data type (structural, arefactual and ecofactual);

11.13 The methodologies and timetable for post-excavation and publication will be included in the Updated Project Design. This is likely to comprise the following sections:

- Original Aims and Objectives of the Investigation;

- Potential of the Data to Address the Original and New Research Objectives - realistic discussion linked to the information presented in preceding sections, the assessment will determine the potential of the data to address the project objectives and therefore the nature and level of analysis required.

- Recommendation for further analysis will be presented. Any data, which is deemed insignificant within the terms of the project objectives, will not progress beyond the assessment stage.

- Discard strategies, based on specialist advice will be presented in the UPD where appropriate.

11.14 Following client approval, an unbound hard copy of the PXA and UPD, clearly marked 'draft', will be presented to the archaeological advisor for approval within 12 months of completion of fieldwork (unless otherwise agreed, or where this proves impractical). Following acceptance, a single hard copy and digital copy will be presented to the Birmingham City HER. If appropriate, a copy of the PXA and UPD will be sent to the local archaeological museum.

11.15 If appropriate, a summary report will be prepared for inclusion in the annual CBA East Midlands West Archaeology journal by the end of the calendar year in which the fieldwork takes place.

11.16 The final report on the works will be produced in line with the updated project design and published in a regional or national journal appropriate to the nature and significance of the results. Any publication will be produced within two years of the completion of the site work.

Reinstatement

11.17 Reinstatement of overburden is not expected to take place at this site. However, if spoil movement is required, any overburden/spoil will be kept separate by material type. Mechanical excavators will not operate from or track across excavation areas unless they have been fully investigated, recorded and approved by the archaeological advisor.

12 COPYRIGHT

12.1 Copyright will be retained by Headland Archaeology (UK) Ltd. Headland will licence the client, South Northamptonshire Council and other bodies as necessary for use in matters relating to the project and for use of the project archive by the relevant museum. This licence will also extend to non-commercial use by the Birmingham City HER.

13 PUBLICITY AND OUTREACH

13.1 A programme of public engagement will be implemented including where appropriate press items in local/national media and visitor's day and/or a local presentation on the results of the excavations. All public outreach events will be conducted following consultation with and approval by, the Client. The archaeological advisor will be given advance notice of any proposed public engagement events.

13.2 A summary of the excavation results and appropriate photographs will be provided to the archaeological advisor for publication on the planning website.

13.3 No press contact will be made without client approval. The archaeological advisor will be offered the opportunity to be acknowledged in any press release.

14 BIBLIOGRAPHY

Archaeological Archives Forum Archaeological Archives: a guide to best practice in creation, compilation, transfer and curation (published by the IfA 2007).

Brickley M & McKinley J 2004 Guidelines to the standards for recording human remains (IfA Paper No 7).

Duncan, M. (2008) Digbeth Cold Store, Birmingham: An archaeological evaluation 2007: Birmingham Archaeology PN1703.01

English Heritage 1991 exploring our past: strategies for the archaeology of England.

English Heritage 2004 *Geoarchaeology: Using earth sciences to understand the archaeological record*

English Heritage 2005 Guidance for best practice for treatment of human remains from Christian burial grounds in England (Church Archaeology Human Remains Working Group Report 2005).

English Heritage 2011, *Environmental Archaeology: A Guide to the Theory and Practice of Methods, from Sampling and Recovery to Post-excavation (second edition)*

Hodder, I. 2007 Digbeth Cold Store/ Beorma Quarter(SP 0749 8655) Brief for Archaeological Excavation in advance of commencement of development BIRMINGHAM CITY COUNCIL DEVELOPMENT DIRECTORATE

IfA 1999a Code of Conduct. Institute for Archaeologists

IfA 1999b Standard & Guidance documents (Desk-Based Assessments, Watching Briefs, Evaluations, Excavations, Investigation and Recording of Standing Buildings). Institute for Archaeologists

IfA 2001 Guidelines for Finds Work. Institute for Archaeologists

IfA Standards and Guidance for archaeological field evaluation (revised October 2008).

Ramsey, E. (2007) Digbeth Cold Store, Birmingham: An Archaeological Desk-Based assessment 2007: Birmingham Archaeology PN1703

Watkinson D & Neal V First Aid for finds, (Third Edition 1998).

Appendix 1 – List of specialists

Period	Type	Name	Internal
Prehistoric	Pottery (early)	Sarah Percival	N
	Pottery (late)	Sarah Percival	N
	Lithics	Julie Lochrie	Y
	Metal small finds	Julie Franklin	Y
	Worked stone small finds	Julie Franklin	Y
	Bone small finds	Julie Franklin	Y
Roman	Pottery	Ian Rowlandson	N
	Metal small Finds	Holly Duncan	N
	Bone small Finds	Holly Duncan	N
	Glass small Finds	Holly Duncan	N
	CBM	Phil Mills	N
	Samian (if necessary)	Margaret Ward	N
Saxon	Pottery	Jane Timby	N
	Small finds	Julie Franklin	Y
Medieval	Pottery	Paul Blinkhorn	N
	Metal small Finds	Julie Franklin	Y
	Bone small Finds	Julie Franklin	Y
	Glass small Finds	Julie Franklin	Y
	CBM	Julie Franklin	Y
Post med	Pottery	Paul Blinkhorn	N
	Metal small Finds	Julie Franklin	Y
	Bone small Finds	Julie Franklin	Y
	Glass small Finds	Julie Franklin	Y
	CBM	Julie Franklin	Y
	Clay Pipes	Julie Franklin/Alan Peacey	Y/N
All	Leather	Quita Mould	N
	Animal bone	Sheila Hamilton-Dyer	N
	Human bone	Jason Murphy	Y
	Cremations	Jaquie Mckinley	N
	Plant macrofossils	Dr Tim Holden/James Greig	Y/N
	Carbonised plant	Laura Bailey (Scott)	Y
	Pollen	James Greig	N
	Molluscs	Dr Martin Bates	N
	Diatoms	Nigel Cameron (UCL)	N
	Sediments	Dr Martin Bates	N
	Wood and charcoal identification	Laura Bailey (Scott)	Y
	High temperature residues	Kath Crookes	N

BIRMINGHAM CITY COUNCIL DEVELOPMENT DIRECTORATE
Digbeth Cold Store/ Beorma Quarter(SP 0749 8655)
Brief for *Archaeological Excavation* in advance of commencement of development

1.Summary

Proposed development at Digbeth Cold Store will affect below-ground archaeological remains, including remains of medieval and post-medieval domestic and industrial activity, particularly water-using industries, and deposits that will provide information on past environmental conditions. This brief is for ***archaeological excavation in advance of commencement of development followed by analysis and publication of the results****.*

2.Site location and description

The site is bounded by Digbeth on the south-west, Allison Street on the east, Well Lane on the north and 138 Digbeth on the west. The part of the site south of Well Lane is currently an open car park with various surfaces, and most of the rest is occupied by buildings, except for a car parking area behind 137-138 Digbeth and a yard fronting onto Digbeth between the Cold Store and 123-125 Digbeth. The Cold Store is a grade II listed building,136-139 Digbeth are locally listed, and the entire site lies within the Digbeth, High Street Deritend and High Street Bordesley Conservation area.

3.Planning background

The Cold Store and parts of locally listed buildings along the Digbeth frontage are to be retained. Existing buildings at the corner of Digbeth and Allison Street, between Allison Street and Orwell Passage, the rear parts of locally listed buildings fronting on Digbeth, and a building at the corner of Digbeth and Park Street are proposed to be demolished. Built development is proposed over most of the site, including the sites of these buildings and the area currently a car park. Because the site is known to include archaeological remains which would be affected by the proposed redevelopment, **archaeological excavation is required in advance of commencement of development, followed by analysis and publication of the results.** This is in accordance with Policy 8.36 of the City Council's Unitary Development Plan, the City Council's Archaeology Strategy which has been adopted as Supplementary Planning Guidance, and government advice in Planning Policy Guidance Note 16, "Archaeology and Planning".

4.Existing archaeological information

The site was included in an archaeological desk-based assessment of of the whole of the Digbeth/High Street Deritend/High Street Bordesley frontage undertaken in 1995. Additional information about the likely archaeological remains on the Cold Store site is provided by the results of archaeological excavations in the surrounding area, particularly excavations on the east side of Park Street, adjoining the Cold Store site at the west end of Well Lane, in 2001.

The 1995 desk-based assessment drew attention to former watercourses and pools, in addition to wells, on the Cold Store site. These would have attracted

water-based industries and suggest that organic remains such as wood and leather survive on the site, together with other plant and animal remains relating to the use of the site in the past. The below-ground archaeological remains may have been affected by later buildings on the site, but are nonetheless likely to survive around and between later wall footings and cellars.

The Park Street excavations demonstrated extensive survival of well-preserved archaeological remains, mostly dating from the 12th century onwards. There were medieval boundary ditches, debris from pottery manufacture and metalworking, and 17th century timber-lined tanks probably used for hemp or flax processing. There were also, unexpectedly, a few pieces of Roman pottery, but no remains of Roman structures were found.

A historic environment study of the Cold Store site was undertaken in 2005 and an archaeological desk-based assessment and archaeological field evaluation, both specifically relating to the proposed Beorma development, were undertaken in 2007.

The historic environment study draws attention to the location of the site within, and near the centre of, the town established in the 12th century. The rear boundaries of the Digbeth properties were delineated by the ditch discovered in excavation on the adjoining sites, a feature that probably marked the extent of he borough of Birmingham. The boundaries of properties fronting Digbeth are likely to have been laid out as burgage plots in the 12th century and this group of property boundaries is a remarkable survival in the city centre. The north-eastern part of the site has a different pattern of development, largely connected with the presence of water. It may have been the site of a pool in the 16th century and water was being exploited from springs here by the mid 19th century.

The archaeological desk-based assessment focussed on below-ground archaeological remains and concluded that the likelihood of important environmental and industrial archaeological deposits surviving on the site was high. It drew attention to the flood-lain deposits found in excavations at Park Street on higher ground immediately adjoining the site and suggested that the lower part of the site might have been even more prone to flooding. Historic and cartographic evidence for wells, springs and pools in the area is indicative of its wetness throughout all periods of its history, suggesting the survival of environmental deposits. The water resource would have been beneficial to water-using industries. The line of town ditch divides the area into two. Archaeological deposits to the south and west of the ditch have the potential to contain remains relating to the origin and early development of the town. Archaeological deposits relating to early industry and settlement might also survive to the north and east of the ditch but their nature may significantly differ from those to the south and west. Excavations on the adjoining site demonstrated that archaeological deposits of medieval and later date showed survived despite truncation by later walls.

An archaeological evaluation consisting of five trenches, located in the then accessible parts of the site, was undertaken in 2007.

The earliest layers encountered were a sequence of waterlain organic deposits which predated the cutting of the town boundary ditch. The uppermost parts of these deposits contained a small quantity of 12th to 13th century pottery, which may be intrusive and therefore not date the deposits, which may be considerably earlier in date. Pollen and beetle preservation in these deposits was excellent and suggested grazing on the site itself, surrounded by woodland dense at first but then with a more open canopy, with some cereal cultivation nearby.

The medieval town boundary ditch was located and was up to 9.7m wide and at least 2m deep. The backfilled ditch was cut by two wood-lined lime storage pits. A medieval pit and postholes near the Digbeth frontage are likely to have been in a backplot behind a dwelling on the original frontage. Other pits containing 16th top 18th century pottery are likely to relate to leather tanning. One had traces of a timber structures and its backfill contained bark. The latest activity is represented by brick built structures, including cellars and sumps, of 19th and 20th century date.

In summary, the main features of archaeological remains on the site as revealed by the evaluation trenching and as deduced from the desk-based assessments are as follows:
(i)Well-preserved archaeological remains survive in all areas sampled by trenching.
(ii)The archaeological remains located in trenching are of medieval and post-medieval date.
(iii)The archaeological remains located in trenching include a medieval boundary ditch, medieval pits and postholes, pits used in leather tanning in the medieval and post medieval periods, and 19th century brick structures.
(iv)The archaeological remains located in trenching include intercut features and layers of deposits.
(v)Organic deposits predating the medieval boundary ditch contain pollen and beetles which provide information on the environment of the site prior to medieval occupation and subsequent urban development.
(vi)Archaeological remains are likely to survive in the areas which were inaccessible for trenching (under existing buildings fronting Park Street, Digbeth, and Allison Street, and under Well Lane car park). Their exact character is unknown but they are likely to be similar to those in the areas trenched.

5.Requirements for work

The archaeological field evaluation and desk-based assessment indicate the presence of well-preserved archaeological remains which would be affected by the proposed development. Archaeological excavation is therefore required in advance of commencement of development to ensure that these remains are investigated and recorded, followed by analysis and publication of the results.

The aims of the excavation are as follows:
(i)To fully investigate the archaeological features and deposits on the site.
(ii)To sample and analyse palaeoecological remains(including pollen, plant macrofossils and beetles) from organic deposits located in the evaluation and to date those deposits by radiocarbon assay.
(iii)To recover and analyse remains of past environmental conditions from any other suitable deposits
(iv)To recover and analyse industrial residues of all kinds;
(v)To record the 19th century brick structures at an appropriate level of detail to enable them to be related to the documentary record
(vi)To relate the historic development of the site to that found by excavation on nearby sites.

6.Stages of work
(i)Excavation:
Extent: Archaeological excavation of the whole of the site is required, with the exception of those parts of the site where existing buildings are to be retained.
Method: In the parts of the site not currently occupied by buildings, all surface deposits are to be mechanically removed, using a toothless bucket, under archaeological supervision. Where existing buildings are to be demolished, demolition is to be to slab only and is not to include grubbing out of walls or foundations. Slab removal is to be undertaken under archaeological supervision at the commencement of the archaeological excavation. Subsequent excavation is to be entirely manual and to be in accordance with a strategy agreed with the Planning Archaeologist. The strategy will include:
-identification and manual excavation of features and deposits. The proposed proportion of excavation of each type of feature and deposit must be specified in the written scheme of investigation and agreed with the Planning Archaeologist in advance of commencement. Where deposits are extensive and/or deep, mechanical removal following partial manual excavation, under archaeological supervision, to expose underlying deposits and features, may be required subject to specific agreement of the Planning Archaeologist
-recording 19th century brick structures at an appropriate level of detail to enable them to be related to the documentary record
-sampling of deposits likely to contain environmental data or industrial residues, including the organic deposits located in the evaluation. An appropriately qualified environmental archaeologist must advise on-site on sampling locations and methods
-finds are to be cleaned, marked and bagged and any remedial conservation work undertaken.
(ii)Post-excavation Assessment:
An assessment of the potential of the results of the excavation for further analysis, in accordance with the recommendations in English Heritage's *Management of Archaeological Projects* (MAP 2*)* and *MoRPHE*.
(iii)Post-excavation Analysis:
Following assessment, full analysis of the results of the project, including: dating and interpretation of excavated features; pottery and other finds analysis; analysis of samples for environmental data (including pollen, plant macrofossils and beetles) and industrial residues; radiocarbon dating of organic deposits; discussion of the results in their local, regional and national

context, including relating the excavated features to documentary evidence for the site and to excavated evidence from nearby sites.

(iv)Preparation of a report for publication in an archaeological journal:
A written report accompanied by appropriate illustrations is to be submitted for publication in the *Transactions of the Birmingham and Warwickshire Archaeological Society* or other appropriate archaeological publication.

7.Standards and Staffing
The archaeological excavation is to be carried out in accordance with the Code of Conduct, Standards and Guidelines of the Institute of Field Archaeologists, and all staff are to be suitably qualified and experienced for their roles in the project. It is recommended that the project be under the direct supervision of a Member or Associate Member of the Institute of Field Archaeologists.

8.Written Scheme of Investigation
A written scheme of investigation for the excavation which details methods (including provision for analysis of palaeoecological remains and industrial residues) and staffing (including appropriately skilled environmental archaeologists and including specialists for post-excavation analysis) must be submitted to the Planning Archaeologist for approval in advance of commencement of work.

9.Monitoring
The excavation must be carried out to the satisfaction of Birmingham City Council, and will be monitored by the Planning Archaeologist. At least five working days' notice of commencement of the excavation must be given to the Planning Archaeologist, so that monitoring meetings can be arranged. The monitoring stages will be as follows:
(i)Consideration of excavation strategy;
(ii)Site visits during excavation, at least weekly;
(iii)Consideration of post-excavation assessment report;
(iv)Monitoring post-excavation analysis;
(iv)Consideration of draft report for publication

11.Archive deposition
Subject to the agreement of the site owner, it is recommended that the written, drawn and photographic records of the excavation, together with any finds, are deposited in Birmingham Museums and Art Gallery, within a reasonable time of completion. The deposit will be accepted in accordance with the guidelines issued by the Society of Museum Archaeologists, *Transfer of Archaeological Archives to Museums*. Finds must be deposited in the standard boxes used by the City Museum and accompanied by box lists.

12.Summary Publication
In addition to the full report described in Part 6 above, the contractor must submit a short summary report for inclusion in *West Midlands Archaeology* and summary reports to appropriate period journals.

On completion of the project the contractor must complete the obligatory fields of the OASIS form and submit an electronic version of the report to OASIS (http://ads.ahds.ac.uk/oasis)

BIRMINGHAM CITY COUNCIL
Date prepared: 2 June 2008
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