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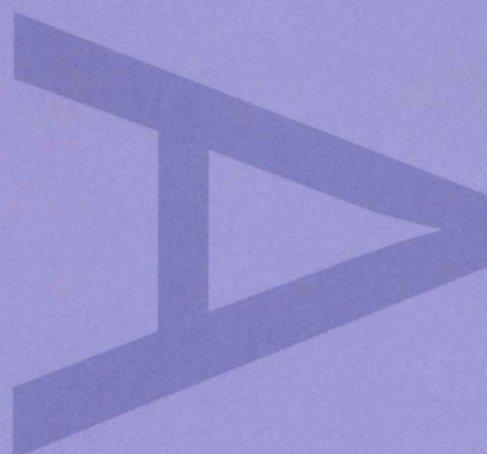
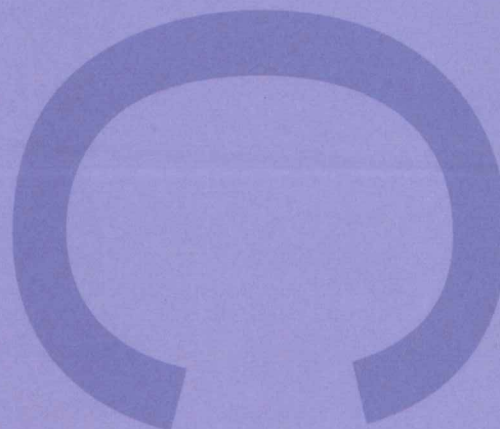
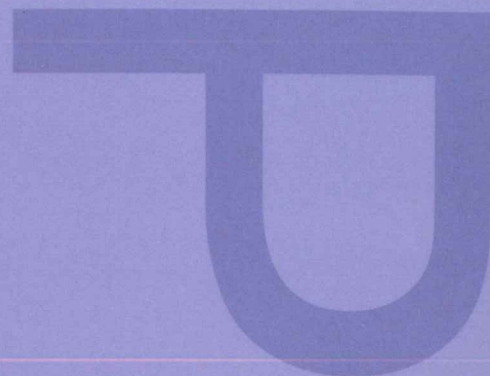
LONDON E1

LONDON BOROUGH OF TOWER

HAMLETS

ASSESSMENT OF AN

ARCHAEOLOGICAL INVESTIGATION



DOK 05

AUGUST 2008

PRE-CONSTRUCT ARCHAEOLOGY

DOCUMENT VERIFICATION

15 DOCK STREET
LONDON E1
LONDON BOROUGH OF TOWER HAMLETS

ARCHAEOLOGICAL INVESTIGATION

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**Assessment of Archaeological Investigations at 15 Dock Street,
London Borough of Tower Hamlets, E1**

**Site Code: DOK05
National Grid Reference: TQ 3418 8072**

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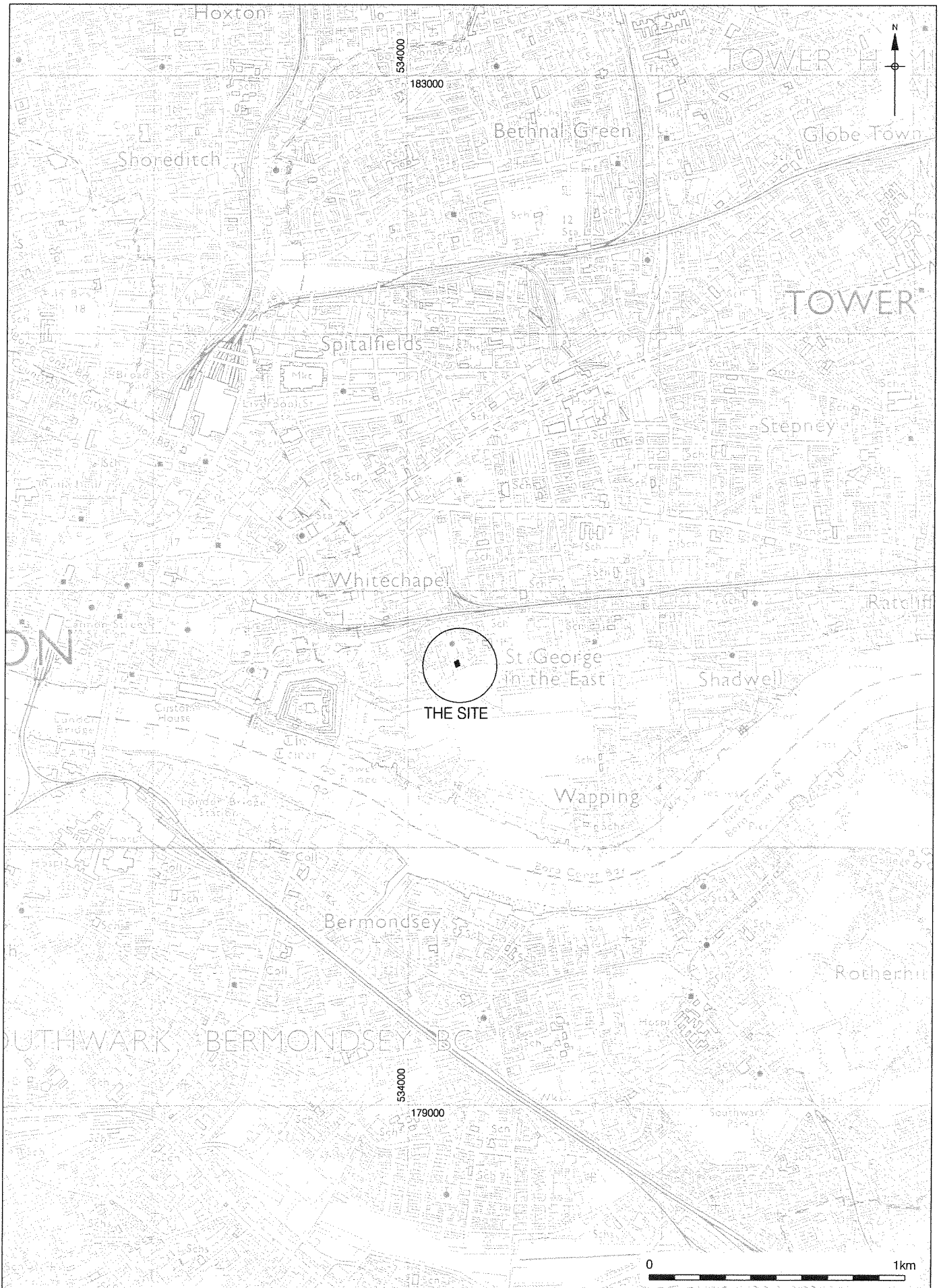
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1 ABSTRACT (figs 1 & 2)

- 1.1 This document details the results and working methods of archaeological investigations conducted at 15 Dock Street, London Borough of Tower Hamlets, E1. The site is centred at National Grid Reference TQ 3418 8072.
- 1.2 The investigations at 15 Dock Street consisted of archaeological watching brief, evaluation and excavation conducted between 22nd August and 28th September 2005.
- 1.3 The archaeological investigations at 15 Dock Street demonstrated the presence of a stratified archaeological sequence potentially dating to the Roman period and definitely dating to the medieval and post-medieval periods. Of particular note are the sizable quantities of Roman material, which even if residual, strongly hint at the presence of Roman activity in very close proximity, potentially remaining *in situ* below the pre-determined project level. In addition, whilst it is unclear whether the lower dumping sequence recorded on site is Roman or medieval in date, there is no doubt that the upper parts represent medieval ground reclamation and usage, particularly of the south of the site, potentially indicating a focus of medieval activity in the sites southern vicinity. The excavations recorded evidence for the site's development throughout the 17th century, where prior to the Great Fire of London a low-level site usage was apparent, whilst during the latter part of the century, into the 1700s, the site's concentrated development and usage as a glass factory adjacent to the western frontage of Dock Street was evident.
- 1.4 This report outlines the results of the archaeological investigations as a whole and assesses their importance. Recommendations for further analysis are also made, along with proposals for the publication of the results.

2 INTRODUCTION (figs 1 & 2)

- 2.1. This document details the results and working methods of archaeological investigations conducted at 15 Dock Street, London Borough of Tower Hamlets, E1. The site is centred at National Grid Reference TQ 3418 8072. The work was commissioned by Sterling Partners and was undertaken by Pre-Construct Archaeology under the supervision of Shane Maher and the project management of Peter Moore.
- 2.2 The site, which is located in the London Borough of Tower Hamlets, is bordered to the west by Dock Street, and to the north, south and east by residential and commercial properties. The redevelopment of the site comprised the renovation of the existing building and the expansion of the existing basement.
- 2.3 After an initial phase of evaluation and watching brief an area of excavation measuring 214m² (within a site boundary covering an area of 390m²) was opened. The archaeological investigations were conducted between the 22nd August and 28th September 2005.
- 2.4 Whilst possible Roman archaeology and a small, but significant amount, of medieval archaeology was recorded, in many ways the main body of archaeological material gleaned from the excavations pertains to the site's development throughout the 17th century. Initial development prior to the Great Fire of London in 1666 appears to have been typified as low-level site usage, however, in the later part of the century, into the 1700's, the sites concentrated development and usage as a glass factory adjacent to the western frontage of Dock Street was strikingly apparent.
- 2.5 The completed archive comprising written, drawn and photographic records and artefactual material will be deposited at the London Archaeological Archive Research Centre (LAARC) under the site code DOK05.



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Figure 1
 Site Location
 1:20,000

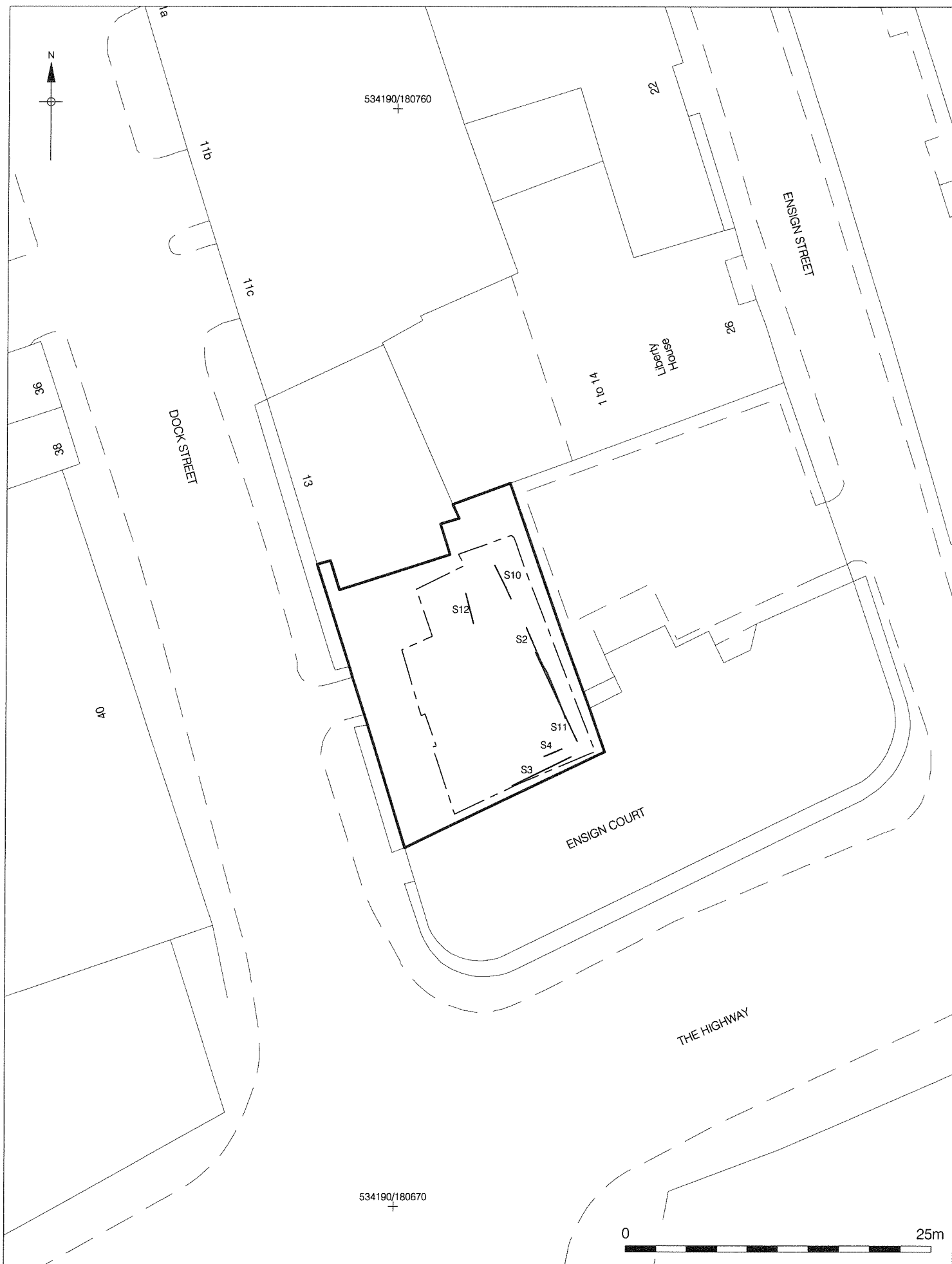


Figure 2
Trench Location
1:400 at A4

3 PLANNING BACKGROUND

3.1 Introduction

- 3.1.1 Prior to the archaeological investigations, an archaeological Desk Based Assessment was compiled for the redevelopment area. The site is located in an Archaeological Priority Zone and the DBA aimed to satisfy the objectives detailed in the London Borough of Tower Hamlets Unitary Development Plan (UDP), adopted in 1998. Shown below are extracts of the planning background of the site as detailed in the archaeological DBA (Taylor 2004):

Archaeology and Ancient Monuments

DEV42 Development which adversely affects nationally important archaeological remains, including scheduled ancient monuments, will not normally be permitted.

DEV43 Development which affects any locally important archaeological site or remains, including industrial archaeology, may be permitted depending upon:

The importance of the archaeological remains;

The need for the development; and

Measures proposed for the protection, enhancement and preservation of the site and the interpretation and presentation of the remains to the public.

DEV44 The permanent preservation in situ of nationally important remains will normally be required. Preservation of other remains will be a preference, subject to the importance of the remains and the need for development of the site. Where preservation is not appropriate, excavation and recording may be required. Development of archaeological sites should adopt suitable design, land use and site management to achieve these ends.

DEV45 Proposals involving ground works in areas of archaeological importance or potential, shown on the proposals map, or concerning individual sites notified to the council by English Heritage or the Museum of London will be subject to the following requirements:

Within areas of archaeological importance applicants will need to demonstrate that the archaeological implications of the development have been properly assessed. A written assessment (Archaeological Statement) based on the professional advice of an approved archaeology consultant or organisation should be submitted as part of the documentation required for a complete planning application;

Within areas of archaeological importance, the council may request, where development is likely to affect important archaeological remains, that an archaeological field evaluation of the site is carried out before any decision is made on the planning application;

Where the preservation of archaeological remains in situ is not appropriate, the council will seek to ensure that no development takes place on the site until archaeological investigation, excavation and recording has taken place by an approved archaeological organisation; and

In appropriate cases the council will seek to ensure that adequate opportunities are afforded for the archaeological investigation of sites, before and during demolition and development. Suitable provision should be made for in situ preservation of remains (DEV44) and finds in the original location, or for removing them to a suitable place of safe keeping

Tower Hamlets has a long and rich history. Archaeological remains are an important source of evidence of this history from Roman times to the recent industrial past. One of the principal sources of archaeological evidence is the development of sites, but this evidence is easily destroyed in the development process. The Council therefore wishes to ensure that development involving groundworks in areas which may contain archaeological remains makes early and specified allowance for the investigation of the archaeological potential of the site before groundworks for the development is allowed to proceed. The Council's preference will be to seek and maintain any finds and remains in situ. The Council will seek the guidance of English Heritage and the Museum of London in determining the importance of archaeological remains.

The Council is concerned to see that sites which may be of interest are properly investigated and records made of any finds before development takes place. It is important the Borough's archaeological heritage is made accessible to the public as an educational, recreational and tourist resource. The Council will therefore support and promote measures which protect and conserve sites and which will allow the public access to sites with archaeological remains to the extent that this is compatible with the protection of then remains.

5.64 The Council will seek professional archaeological advice from English Heritage or a professionally qualified archaeological organisation or consultant as appropriate and expects applicants to do the same when proposing development which could affect archaeological remains. It is important that developers have properly assessed and planned for the implications of their proposals in terms of scheduling time and resources for investigations to be carried out of the site. Proposals for investigation should be built into the development programme at an early stage in the process. Supplementary Planning Guidance on Archaeology and Development outlines the preferred procedure for investigation before the development takes place. An archaeological assessment is normally a desktop evaluation of

existing information on the development site, commissioned from a professional archaeological body or consultant. Sources may include historic maps, written sources, previous finds, archaeological fieldwork and geographical surveys. An archaeological evaluation is in contrast field based, but, as distinct from a full archaeological excavation, is normally a small scale and rapid operation, entailing ground survey and limited trial trenching. It should, nevertheless, be carried out by a professionally qualified archaeological organisation or individual. An evaluation of this kind helps to define the character and extent of surviving archaeological remains in the area of a proposed development, and thus to indicate the weight that ought to be attached to their preservation.

Archaeologically important areas are found throughout the Borough as shown on the proposals map. There are also records of numerous finds which may indicate areas of potential. The Council will consult with English Heritage and the Museum of London in the designation of areas of archaeological importance and will consult them about any areas of potential. Proposals which fall within these areas will be subject to policies DEV42 to DEV45.

4 GEOLOGY AND TOPOGRAPHY

- 4.1 The British Geological Survey Map 256, 1:50,000 indicates that the underlying geology of the site is comprised of Taplow River Terrace Gravel over London Clay and the Woolwich and Reading Beds. The natural terrace gravel has been found at heights of c.8.00m OD in the vicinity (Pickard & Jarrett 2000).
- 4.2 A sandy-silt 'brickearth' horizon has been found to overly the natural gravel during archaeological investigations in the vicinity of the site (Pickard & Jarrett 2000).
- 4.3 Prior to the site's redevelopment it was occupied by a yard and an associated mid 19th century building adjacent to Dock Street with a warehouse located to the rear (Moore 2005a). The site lies c. 600m to the north of the river Thames and c. 500m to the east of the historic City walls.
- 4.4 It is probable that a sandy gravel layer [130], recorded during the investigations and encountered at 6.63m OD, represents the upper natural horizon on site (Appendix 1). Natural deposits were not encountered/recorded elsewhere during the archaeological investigations as a consequence of a pre-determined project level (see 'Archaeological Methodology').

5 ARCHAEOLOGICAL AND HISTORICAL BACKGROUND

5.1 General

- 5.1.1 Prior to the archaeological investigations, an archaeological Desk Based Assessment (DBA) was compiled for the redevelopment area. As part of the compilation of the DBA the historical and archaeological background and potential of the site was assessed through examination of all archaeological entries in the Greater London Sites and Monuments Record (GLSMR) within a 250m radius of the site. In addition, other archaeological, documentary, and cartographic sources were consulted. The archaeological and historical background of the site, as discussed in the DBA, is detailed below (Taylor 2004) with additions made where new data exists:

5.2 Prehistoric

- 5.2.1 The SMR search for the site indicated that there were no prehistoric finds in the 250m radius of the site (Taylor 2004).

5.3 Roman

- 5.3.1 The site is located approximately 500m from the Roman city wall of *Londinium*. The modern roads of East Smithfield and The Highway, immediately south of the site, follow the line of a Roman road that ran east from Tower Hill. A second Roman road to the north of the site runs from St. Claire Street to Hooper Street (Pickard & Jarrett 2000).
- 5.3.2 Associated with the roads were expansive cemeteries, located within the 'Hinterland' of *Londinium* and evidence for the presence of a large Roman cemetery has been recorded during excavations in the area (Barber et al 1990; Hall 1996; Barber & Bowsher 2000). A Roman tombstone inscription, now lost, was found at Cable Street in 1776 and portions of the Roman cemetery have been excavated at Prescott Street and Hooper Street. The excavations at Hooper Street also found evidence for a boundary ditch and a road or trackway running alongside the cemetery. It is currently believed that the southern limit of the burial ground is situated on the line of Royal Mint Street/Cable Street and as such does not appear to have encroached on the site (Taylor 2004).

5.4 Medieval

- 5.4.1 The landscape of the site and its vicinity during the Saxon and medieval periods appears to have been mainly agricultural in nature. Excavations at 38-40 Dock Street found two linear

ditches, one of which contained pottery dated to c.1240-1350, and a late medieval pit (Pickard & Jarrett 2000).

5.4.2 Located approximately 100m to the west of the site is the precinct of the Cistercian Abbey of St Mary Graces, founded in c.1350. The Abbey was probably established as a result of overcrowding in graveyards within the city although early 20th century writers claimed that Edward III erected the Abbey after vowing "to build a monastery when in peril of shipwreck some years previously" (Maddocks 1933). The precinct of the Abbey does not cross the site.

5.4.3 The SMR search indicated that two roads of possible medieval date are known in the area. The roads were found at Thomas More Street and at St George in the East (Taylor 2004).

5.5 Post-medieval

5.5.1 With the dissolution of St. Mary Graces in 1539 the former religious house became 'The Victualling Yard' or 'The Victualling Office' providing goods for the navy. The development of the priory helped instigate the expansion of settlement in the area in the form of small cottage industries (Maddocks 1933; Pickard & Jarrett 2000).

5.5.2 The area thrived as a result of the trade and international connections that were established at this time and in 1572 the precinct had 425 foreigners working within it. The quantities of different nationalities were recorded as: 328 Dutch, 69 French, 8 Danes, 5 Polanders, 2 Spaniards, 1 Italian and 12 Scots (Maddocks 1933).

5.5.3 After the Great Fire of London in 1666 there was a surge in quarrying, to obtain brickearth for new building materials and to dispose of debris, often to the detriment of pre-existing archaeological deposits. Large 17th century quarry pits have been excavated at Royal Mint Square, 4-10 Dock Street, 17-19 Prescott Street and 43-45 East Smithfields (Taylor 2004).

5.5.4 Documentary evidence indicates that in 1689 a glass factory belonging to a Philip Dallow occupied 15 Dock Street and a mound located between Dock Street Alley and Ensign Street was named as Glasshouse Hill on Rocques Map (Cox 1991). A number of late post-medieval warehouses still stand in the vicinity of the site and evidence for those that no longer exist is indicated from archaeological investigations and documentary evidence. A warehouse used for sugar refining, and later for tea, was situated on Dock Street before its demolition in 1989, glass works are known at East Smithfield, warehouses are known at St. Catherine's Dock and a number of listed early 19th century warehouses stand at Thomas More Street (Taylor 2004).

5.5.5 The presence of dockyards in the area during the post-medieval period encouraged economic growth and elements of the 19th century dockyard have been found in excavations close to the site including gate-lodges, offices and a warehouse associated with an 1805 Dockyard at

Thomas More Street and a dock wall and gate-pier at St Catherine's Way (Taylor 2004). The proximity of the dockyards ensured the community was internationally diverse and documentary evidence for the area surrounding the site paints a vivid image of life in this area of East London in the post-medieval period. An individual from 1872 gives this account of a tavern at Wellclose Square, immediately west of the site:

"There were French, Spanish, Italian, German, and Dutch seamen; there were Greeks from the Aegean Sea; there were Malays, Lascars, and even the "heathen Chinees" disguised in European costume, with his pigtail rolled up under a navy cap. There were mariners in fezes and serge capotes; there were Mediterranean dandies, girt with broad crimson scarves and with massive gold earrings glistening as they twirled around" (Anon 1872).

- 5.5.6 It seems that the diversity of life in this area of East-End London was not without its drawbacks. Crime seems to have been a daily part of life and 'The Proceedings of the Old Bailey' are littered with trials associated with "Salt-Petre Bank", the former name of Dock Street. One case tells of the trial of John Ball who was sentenced to transportation in 1724 for stealing a hamper and 13 Geese (POB). Indeed, the study site was located just to the north of Ratcliff Highway, now known as The Highway, which "became a byword not only for poverty and misery, but for the coarse, the brutal and the vicious" during this period (Anon. 1933).
- 5.5.7 Abundant evidence of demolished post-medieval buildings has been found during archaeological investigations in the area. These include yard surfaces, an east-west orientated drainage gully and a rubbish pit recorded during excavations at 38-40 Dock Street, evidence of 18th and 19th century buildings at Cable Street, an 18th century well recorded at Graces Alley and another well found at Wellclose Square (Taylor 2004).

6 ARCHAEOLOGICAL METHODOLOGY (fig 2)

- 6.1 The archaeological investigations at 15 Dock Street consisted of a watching brief conducted on general ground reduction, followed by a phase of archaeological evaluation (Moore 2005b). Approximately 0.60m of 19th/20th century made-ground, the upper height of which was encountered at c.9.86m OD, was removed under archaeological watching brief conditions. Following the confirmation that archaeological deposits dating to the 18th century and earlier existed *in situ*, archaeological mitigation, consisting of the excavation of all archaeological material placed at risk during the redevelopment of the site (e.g. a mitigation area measuring 214m² within a total site area of 390m²) was undertaken. The archaeological investigations were undertaken between the 22nd August and 28th September 2005 (Maher 2005).
- 6.2 The removal of non-archaeological deposits, e.g. dumps, made ground, surfaces etc post-dating the 18th century, was undertaken using a 360° mechanical excavator under the observation of an attendant archaeologist fitted with a flat bladed ditching bucket. The material was reduced in c.200mm horizontal spits until the uppermost archaeological horizon was reached.
- 6.3 Following machining, all faces of the excavation area were cleaned using appropriate hand tools. All investigation of archaeological deposits was by hand, with cleaning, examination and recording both in plan and section.
- 6.4 Following the hand excavation of the post-medieval archaeological sequence a secondary episode of machining was undertaken whereby c. 2m of made ground was removed under watching brief conditions and hand excavation of the secondary archaeological horizon was undertaken. As agreed by David Divers, English Heritage GLAAS, hand excavation ceased at a pre-determined project level (c.7.00m OD) although in the north of the site a sondage was excavated to a depth of 6.50m OD to assess the underlying deposits.
- 6.5 During the evaluation and watching brief baselines were established from which all archaeological features were located. The baseline was located to the National Ordnance Grid using a Total Station Theodolite (TST). During the mitigation a 5m grid was extended from the evaluation baseline extended using the TST.
- 6.6 Recording was undertaken using the single context recording system as specified in the Museum of London Site Manual. Plans were drawn at a scale of 1:20, and full or representative sections at a scale of 1:10. Contexts were numbered sequentially and recorded on *pro-forma* context sheets.

- 6.7 A temporary benchmark was transferred from a nearby Ordnance Survey Benchmark from which all archaeological Ordnance Datum heights were thus calculated.
- 6.8 The site was given the code DOK05.

7 THE ARCHAEOLOGICAL SEQUENCE

7.1 Introduction

7.1.1 The following description of the stratigraphy details the main characteristics of each context and its position within the phased stratigraphic matrix. Ordnance Datum levels, physical dimensions and soil descriptions are referenced when relevant to an understanding of the archaeological sequence and, when not cited, can be found referenced in Appendix 1.

7.1.2 When reference is made in the discussion to specialist appendices, the applicable context/s, when not specifically stated, are denoted "*".

7.2 Phase 1: Natural?

7.2.1 It has been tenuously proposed that a mid yellow brown, sandy gravel layer [130], encountered at 6.63m OD and recorded within a slot in the north of the site, may represent the upper natural horizon, however, this is by no means certain.

7.2.2 At no time during the archaeological investigations was the natural horizon securely exposed and recorded as a direct consequence of requirements to adhere to a pre-defined project level, e.g. the natural horizon, and any intervening archaeological horizons pre-dating Phase 2a, should remain *in situ* beneath the redeveloped site.

7.3 Phase 2a: Roman/medieval

7.3.1 For the most part, the earliest deposits encountered on site were a series of dump layers, tipped in a north to south direction, which were largely recorded in section from various localities on site. Pottery dated to the Roman period, two sherds dated between the 13th-15th centuries, a fragment of medieval glass and a late Roman copper alloy bracelet (SF6) were retrieved from dump layers *[45], *[146] and *[154] (Appendices 2, 3, 5, 7 & 8). The latter two contexts were situated at the base of a stratigraphic sequence of dumped layers, comprising *[132], [133], [135], [136], *[137], [155] and [157] and can thus be considered to provide a *terminus post quem* for the later sequence (fig 6). Given the presence of medieval material it is natural to assume that the sequence as a whole dates to the medieval period, however, the quantities of medieval material present is minimal and it remains possible that the medieval cultural material is intrusive with the implication that, at least some of, the dumping may date to the Roman period.

7.3.2 A number of additional dump layers were also recorded during the course of the excavations. Whilst the layers can be stratigraphically attributed to various archaeological phases, at present they have been tentatively attributed to Phase 2a. These comprised:

- stratified dump sequence (Phase range 2a-4a): [36], [37], [38], [39], [40], [41] and [42]
- stratified dump sequence (Phase range 2a-4d): [61], [62], [63], [64], [65], [66], [67] and [70] (fig 6)
- stratified dump sequence (Phase range 2a-4d): [101]/[106], [107], [108] and [109] (fig 6)
- stratified dump sequence (Phase range 2a-4b): [126], [127] and [128] (fig 6)
- singular dump layer (Phase range 2a-4a): [129], contained CBM in use between the 12th-19th century (Appendix 5)

7.4 Phase 2b: medieval (fig 3)

- 7.4.1 The upper dump horizon was truncated by a large pit [115], which was encountered at 7.63m OD and contained a firm, mid orange brown, silty gravel fill [114]. The pit had been truncated by an east-west orientated ditch [145] which was encountered at the same Ordnance Datum height and contained six separate fills [134], *[139], [140], [141], [142] and [143]. The uppermost fill contained pottery dated to the 15th century, in addition to residual Roman pottery and CBM in use between 12th and 18th centuries (Appendices 3 & 5; figs 3 & 6).
- 7.4.2 Sealing the east-west orientated ditch were dump layers [125] and [131], which were encountered at 7.19m OD and 7.34m OD respectively.
- 7.4.3 A rectangular pit [124], encountered at 7.29m OD and containing fill [123] from which no cultural material was retrieved, truncated the earlier dump horizon. This cut feature had subsequently been truncated by a later Phase 2b pit [122], encountered at 7.26m OD and containing fill *[121], from which residual Roman pottery was retrieved (Appendix 2; fig 3).
- 7.4.4 The earlier Phase 2b deposits had been truncated by an east-west orientated ditch [120] encountered at 7.51m OD. The ditch contained fill *[116] from which pottery dated to the 14th-15th century, a bone tuning peg (SF4) and a possible iron candle holder (SF13) were retrieved (Appendices 3 & 7; fig 3).
- 7.4.5 Pit [69], which was encountered at 7.35m OD and contained fill *[68], from which pottery dated to the 13th-15th century, a copper alloy toy wheel (SF7), an iron nail (SF8) and an iron knife (SF9) were retrieved, was also assigned to Phase 2b. Likewise, pit [148], which was encountered at 7.43m OD and contained fill *[147] from which 14th-15th century pottery and

CBM in use between the 12th-19th century was retrieved, was also assigned to Phase 2b (Appendices 3, 5 & 7; fig 3)

- 7.4.6 Pit [118], encountered at 7.19m OD and containing fill [117] from which no cultural material was retrieved was tentatively attributed to Phase 2b, however, it remains possible, based on its stratigraphic relationships, that it may date to Phases 3 or 4a (fig 3).

7.5 Phase 3: 15th/16th century (fig 4)

- 7.5.1 Posthole [111], which was encountered at 7.31m OD and contained fill *[110], was attributed to Phase 3. Pottery dating to the 15th-16th centuries was retrieved from the fill and the posthole represents the only context on site assigned to the transitional medieval/post-medieval period. Six cattle bones were retrieved from the posthole fill (Appendices 3 and 9; fig 4).

7.6 Phase 4: 17th and 18th centuries (figs 4 & 5)

- 7.6.1 For the purposes of the assessment report, Phase 4 has been sub-divided into two sub-phases: 4a and 4b. Essentially the sub-phases represent one continuous and prolonged period of occupation throughout the 17th and 18th centuries and it is envisaged that prior to the publication of the archaeological results, refinement/alteration of the sub-phases will be undertaken.

7.7 Phase 4a: early 17th century (fig 4)

- 7.7.1 In the central part of the site was a small red brick basement [13], encountered at 8.41m OD, measuring 1.50m north-south by 2.55m east-west and standing to a depth of 0.50m. The basement was contained within construction cut [14] and a 0.05m thick, indurated, dark brown grey, clayey gravel floor surface [43], present at a height of 7.89m OD, had been lain within it. Retrieved animal bone signifies the presence of both food and processing waste. The internal floor surface of the basement had been truncated by a sizable posthole [7], measuring c.0.50m in diameter, which had been infilled by fill *[6] which contained pottery dated between 1580 and 1700 and a possible copper alloy coin (SF11) (Appendices 3 & 7 and 9; fig 4).
- 7.7.2 Whilst no backfill of the construction cut was evident, and thus the basement's precise date of construction cannot be proposed, the basement itself contained two infills representative of its use and disuse. The primary of these was a friable, light brown yellow white, sandy mortar fill *[8], encountered at 8.20m OD whilst the secondary infill was typified as a loose, mid grey brown, silty sand fill *[5]. The deposits contained pottery dating to the 16th-17th century, clay tobacco pipe (CTP) dating to the mid 17th century and ceramic building material (CBM) in use between 15th-17th and 12th-19th centuries, finds which collectively suggests the basements

disuse dates to the latter part of the 17th century. In addition, residual Roman pottery, lava quernstone, iron nails, bone working waste (SF10) and a possible copper alloy coin (SF1) were retrieved from the basement fills (Appendices 3, 4, 5, 7).

7.7.3 Two pits were also attributed to Phase 4a. The first pit [153] was encountered at 7.59m OD and contained fill *[152] within which was pottery dated to 1630-1680 and glass dated to the 17th-18th century. The second pit [113] was encountered at 7.55m OD and was filled by a firm, light brown grey, clayey sandy silt fill *[112] which contained pottery dated between 1550-1700, iron nails and an iron mount/fitting (SF12) (Appendices 3, 4, 6 & 7; fig 4).

7.8 Phase 4b: 17th-18th century (fig 5)

- 7.8.1 Sealing the infilled basement were a series of dump layers [17], *[18], *[19], [20], [21]/[25] and [22], the stratigraphically most recent of which was encountered at 9.31m OD, whilst sealing the Phase 4a pits was a 0.94m thick, indurated, mid yellow green, gravely sandy silt layer [11]/*[12], encountered between 9.24m OD and 9.27m OD. Spot heights on the upper parts of the dump sequence indicate ground level increased by c.0.70m during the latter part of the 17th century and is thought the upper horizon may have been utilised as a surface, with evidence that some areas had been heat affected. Minimal cultural material was found within the made-ground deposits although the pottery and CTP that was retrieved dated to the latter part of the 17th century. In addition, a double-sided ivory comb was also retrieved (SF2) (Appendices 3, 4 & 7; fig 6).
- 7.8.2 Truncating the dump horizon in the central-east of the site was a large, sub-round pit [27] measuring 1.74m north-south by 2.58m east-west. The pit contained a soft, dark grey brown, sandy silt, primary fill *[29], encountered at 8.59m OD, within which were abundant animal horn cores, representative of industrial waste. The pit also contained a secondary fill *[28] and a tertiary fill [26]. Pottery with a date range of 1580-1900, glass dating to the 17th-18th century and a crucible were retrieved from the primary and secondary fills (Appendices 3, 6 & 9; figs 5 & 6).
- 7.8.3 Truncating the heat effected surface was an east-west aligned, 1.00m wide ditch [49] containing a friable, dark grey brown, sandy silt fill *[33] within which was pottery dated to the late 17th century, CTP dated between 1680 and 1710, CBM in use between the 17th and 19th centuries and glass dated to the 17th-18th century (Appendices 3, 4, 5 & 6). Whilst it appears that the ditch was backfilled during the early 18th century its date of construction is unknown (figs 5 & 6).
- 7.8.4 A second feature truncated the heat-affected surface. This comprised a red-brick tank/basement [2]; contained within construction cut [3] and encountered at 9.29m OD, which measured 3.80m north-south by 3.20m east-west and stood to a depth of 2.68m. No cultural

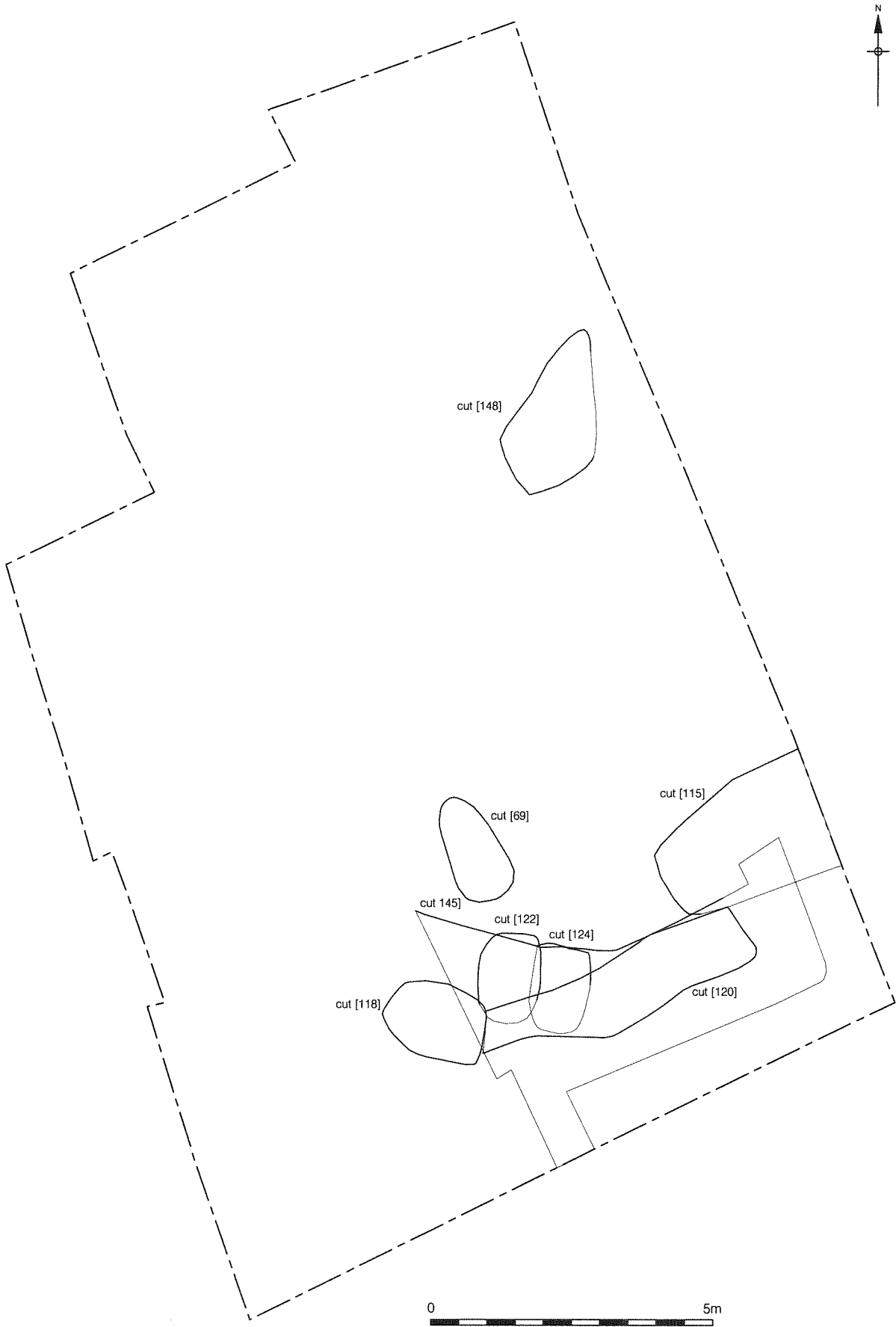
material was retrieved from the construction cut backfill [44] and its precise date of construction is unknown. However, the tank/basement contained three infills, the primary of which *[59] was encountered at 6.93m OD, the secondary fill *[4] was encountered at 9.09m OD and the tertiary was fill *[1] was encountered at 9.31m OD. The fills contained pottery dated mostly between 1670-1700, CTP dated between 1660-1780, CBM in use between the 12th and 19th centuries and glass dating to the 17th-19th century, suggesting the tank/basement ceased in use during the mid 18th century. The presence of two sherds of pottery dated between 1720 and 1780 and CTP dated to the early 18th century are possible intrusive or indicative of an episode of final infilling during the 18th century. The presence of ceramic crucibles (with residues indicative of glass manufacture), kiln furniture, glass slag material, charcoal and coal implies that glass working, probably wine bottle manufacture, was being undertaken on site (Appendices 3, 4, 5, 6, 7 & 10; figs 5 & 6).

- 7.8.5 An north-south orientated, 0.58m wide, red brick and tile drain/culvert/flue [10], contained within construction cut [16] and encountered at 9.22m OD, had been added to the southern side of the tank/basement. The drain/culvert/flue was infilled by fill *[47] from which residual material, including pottery dating to between 1580 and 1700, CTP stems dated to between 1580 and 1910 and glass dated to the 17th century was retrieved (Appendices 3, 4 & 6). Built into the eastern side of the tank/basement was an east-west orientated, 0.55m wide, red brick and tile drain/culvert/flue [9], contained within construction cut [15] and encountered at 9.23m OD. The drain/culvert/flue had been infilled by fill [48] from which no cultural material was retrieved (fig 5).
- 7.8.6 The east-west drain/culvert/flue was truncated by a large rectangular, vertical sided pit [32], which measured 1.80m north-south by 3.22m east-west (continuing beyond the limit of excavation). The pit was encountered at 9.23m OD and had been dug to a depth of 0.97m. The base of the pit had been covered with an indurated, dark grey brown, sandy gravel metallised fill [60], encountered at 8.29m OD, which is thought to have served as a working surface. In addition the remains of a, largely rotten, wooden frame [58] lined the sides of the pit. Truncating the indurated surface were four postholes [51], [53], [55] and [57], containing decayed wood fills [50], [52], [54] and [56] respectively. The postholes were located adjacent to the corners of the pit and are thought to have held posts supporting the timber frame. The pit had been backfilled by primary fill [46], encountered at 8.49m OD, and secondary fill *[31] encountered at 9.23m OD. The latter fill contained pottery dating to between 1660 and 1800, CTP dated between 1680-1710, CBM in use between 15th and 17th centuries and glass slag, indicative of glass manufacture, dated to the 17th century (Appendices 3, 4, 5 & 6; figs 5 & 6).
- 7.8.7 Two additional features, pit [24] containing fill *[23], within which were fragments of residual 16th-17th century pottery and glass slag and pit [105], which was seen in section only, containing primary fill [104], secondary fill [103] and tertiary fill [102], were also attributed to Phase 4b (Appendices 3 & 6; figs 5 & 6).

7.8.8 Two additional features were recorded during the course of the excavations which have been tentatively attributed to Phase 4b. These features contained no cultural material and stratigraphically could be attributed to various archaeological phases. These comprised:

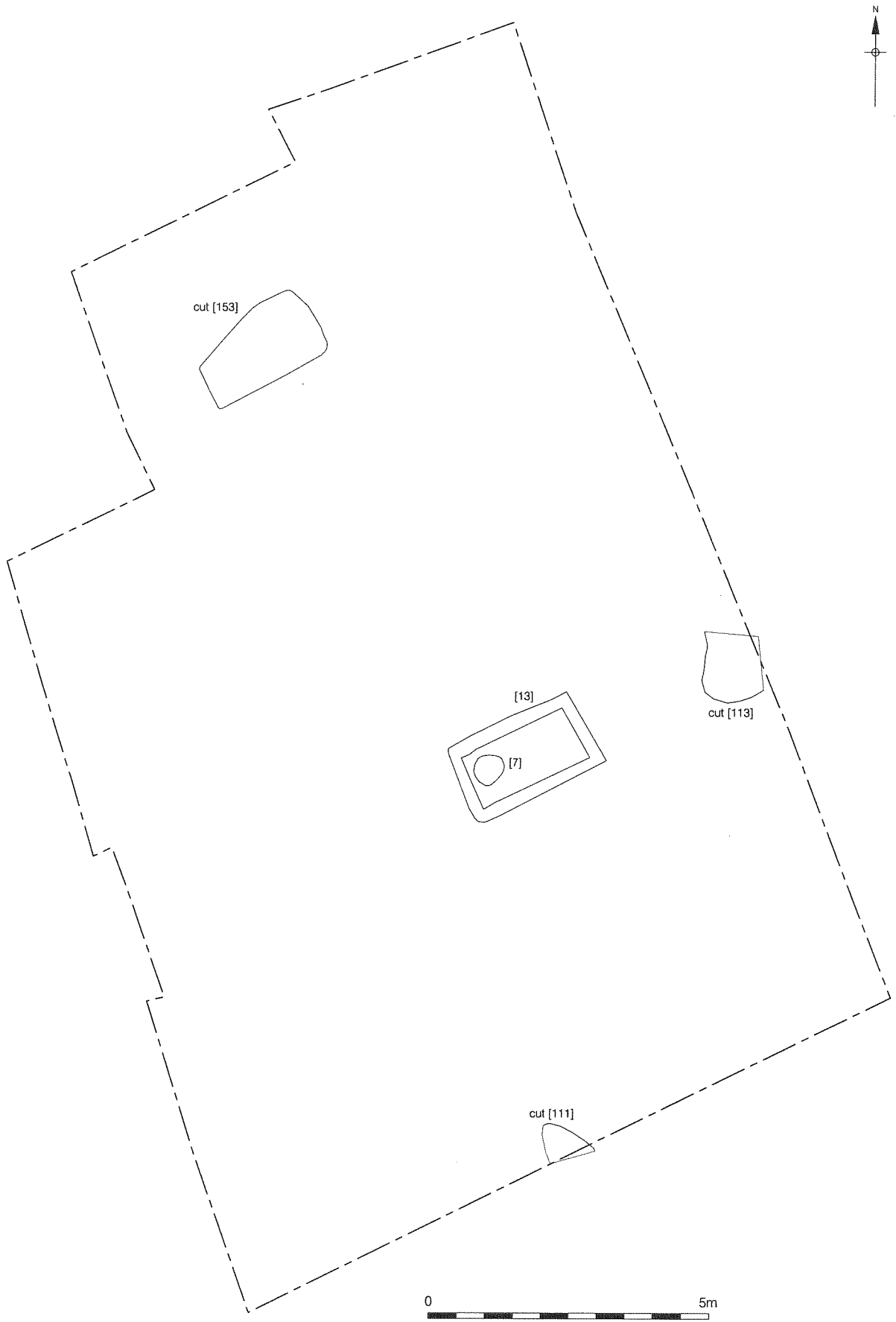
- Posthole [73] containing degraded post [72] and clay packing [71] (Phase range 2-4b; fig 5)
- Posthole [76] containing degraded post [75] and clay packing [74] (Phase range 2-4b; fig 5)

7.8.9 The 18th century archaeological horizon was sealed by c.0.60m of undifferentiated made-ground deposits, dating to the 19th/20th century and encountered at c.9.86m OD, which were removed under archaeological watching brief conditions prior to the commencement of the excavation.



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Figure 3
Phase 2b: Medieval
1:100 at A4



0 5m

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Figure 4
Phases 3 and 4a: 15th - early 17th century
1:100 at A4

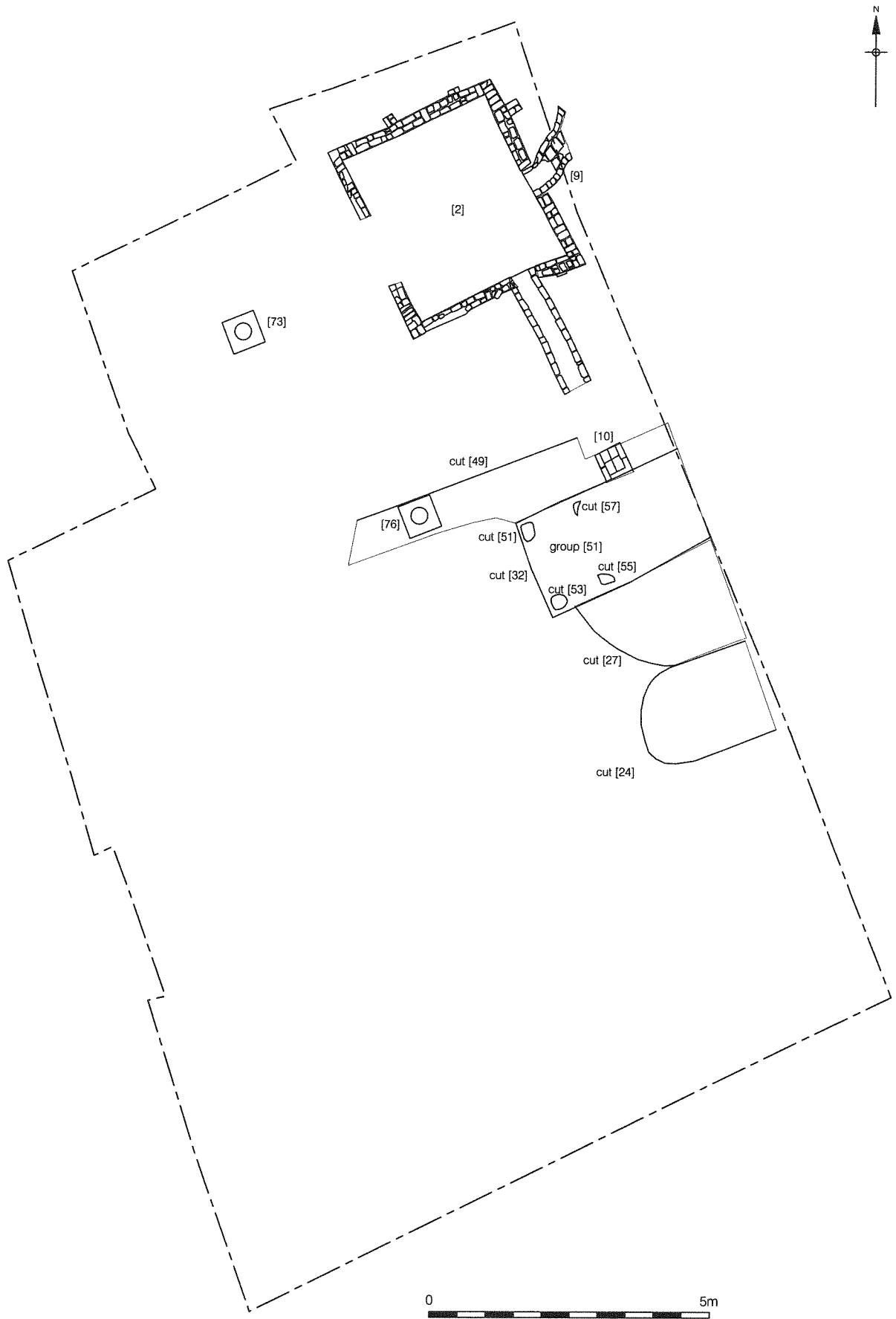
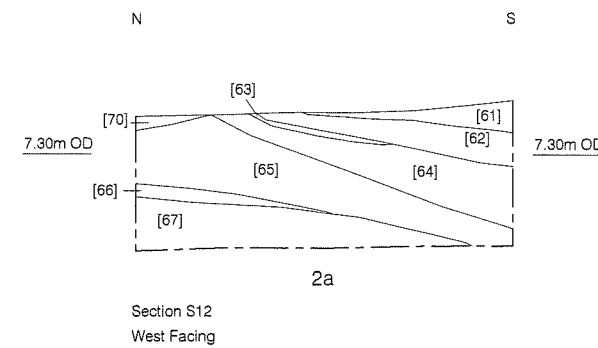
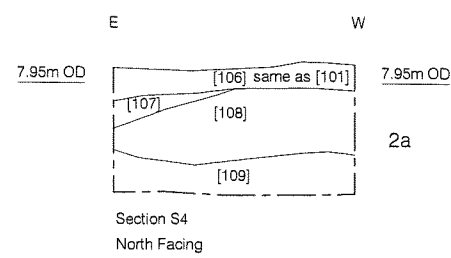
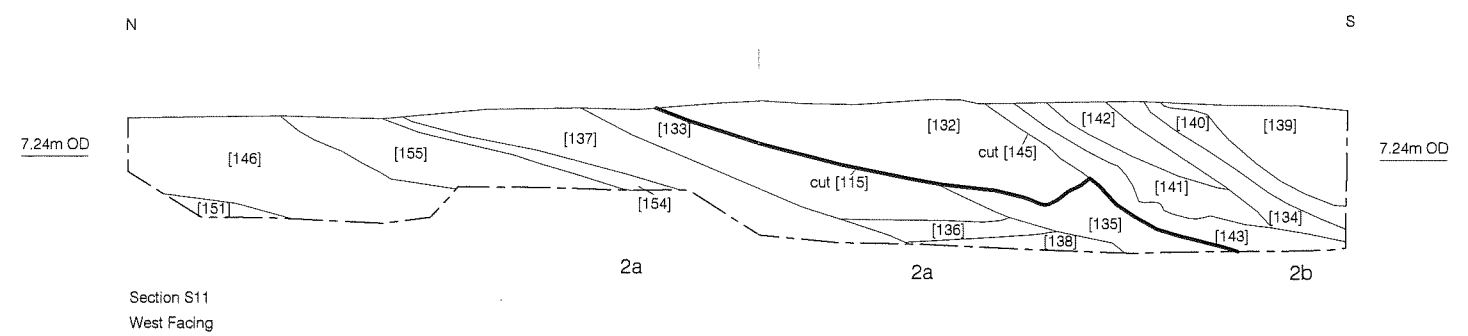
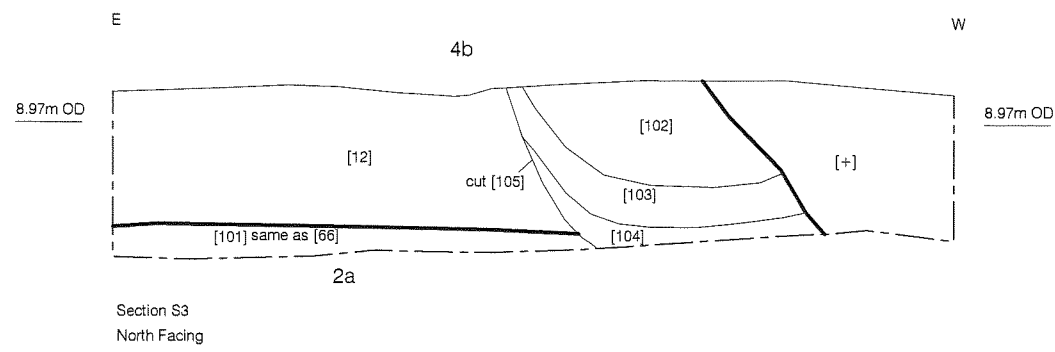
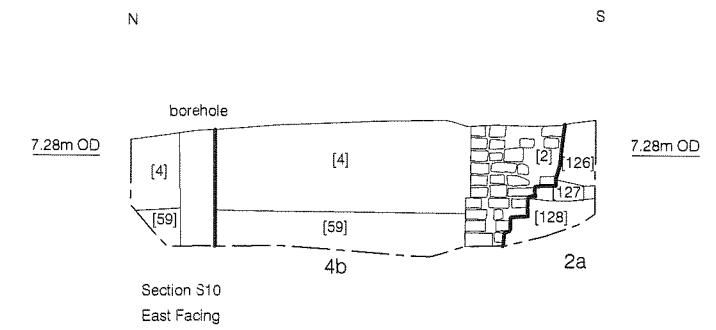
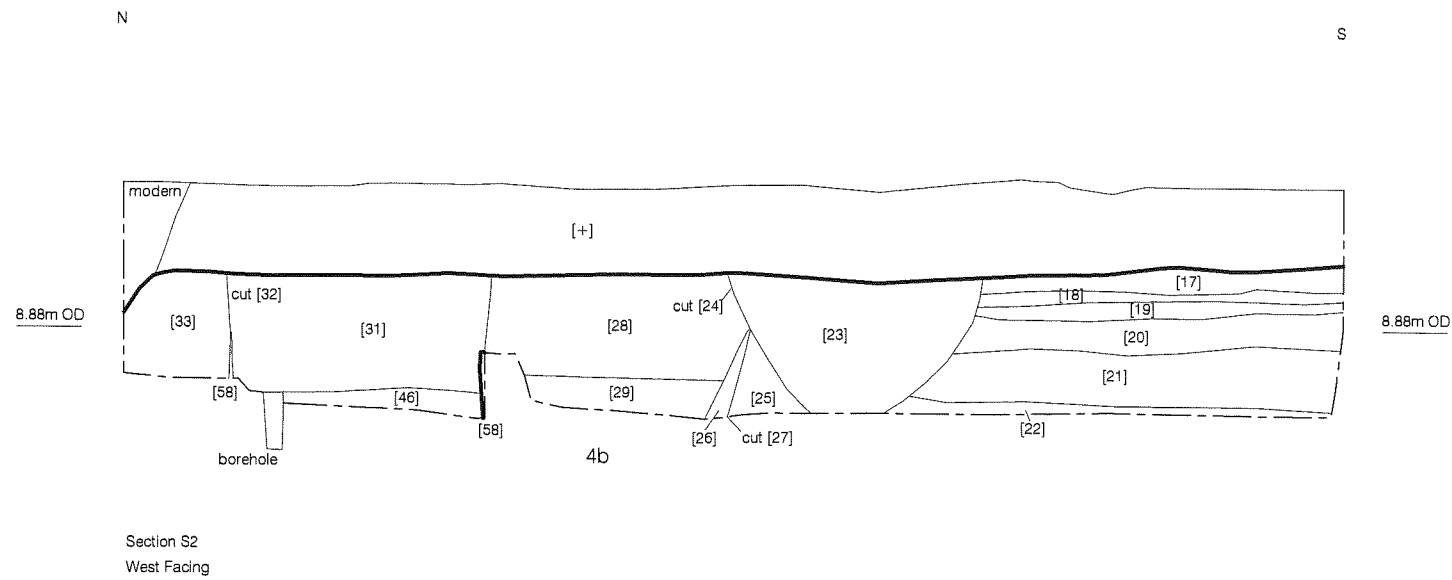


Figure 5
 Phase 4b: 17th - 18th century
 1:100 at A4



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Figure 6
Sections 2-4 and 10-12
1:50 at A3

8 RESEARCH OBJECTIVES

8.1 Original research objectives

8.1.1 Specific research objectives for the site were laid out in the original "Method Statement" compiled in 2005 (Moore 2005a). These are discussed below.

- *To define the nature of the natural soils*

The excavation was conducted to a pre-determined project level and whilst it is possible that a gravel layer recorded during the excavation may reflect the natural horizon this is by no means certain and as such no definitive natural deposits were encountered during the investigations.

- *To locate and define any prehistoric activity*

No evidence of prehistoric activity, either *in situ* or residual, was encountered during the archaeological investigation.

- *To locate, define and quantify any Roman archaeology on the site specifically to see how the site fits in with the pattern of agricultural, industrial and funerary usage as seen to the west, north and south and settlement, port, entertainment usage as seen to the east.*

Whilst no *in situ* evidence of Roman activity was encountered a sizable quantity of residual pottery and CBM, in addition to a Roman copper bracelet, indicate that a focus of Roman activity must be located in the vicinity of the site. It remains possible that two fragments of medieval pottery at the base of the Phase 2a dumping sequence may be intrusive, raising the possibility that at least some of the ground reclamation recorded on site may date to the Roman period. Furthermore the limitations placed on the depth of excavation, e.g. with one possible exception the natural horizon was not attained during the excavation, may have resulted in the consequence that archaeological deposits of Roman date remain *in situ* below the redeveloped site.

- *To locate and define medieval activity*

Whilst it remains possible that the early dumping sequences recorded on site may be either Roman or medieval in date, the archaeological investigations nonetheless demonstrated that during the late medieval period a concentrated episode of ground reclamation and utilization took place. The presence of pits and ditches dating to the 14th-15th centuries clustered in the south of the site suggest that a focus of medieval activity may have been located within the sites southern vicinity.

- To locate define and quantify post-medieval deposits and buildings

With the exception of a posthole dated to the transitional medieval/post-medieval period a general absence of activity was evident on site until the 17th century. The early 17th century deposits and features appear to relate to low-level activity prior to the Great Fire of London whilst during the latter part of the 17th century, continuing into the early 18th century, the site was apparently utilised for glass manufacture, as evidence by quantities of glass making slag, crucibles and kiln furniture. Indeed, analysis of documentary evidence pertaining to the site had previously identified the presence of a glass factory within the site boundary in 1689 (see Archaeological and Historical Background).

In addition, the material culture assemblage collected from the 17th-18th century contexts demonstrates the cultural diversity of the area, further demonstrating the role of this part of London at the hub of national and international trade routes entering London from the south and south-east.

8.2 Additional Research Questions

- To what extent can further analysis of the Phase 2a deposits elucidate on the presence or absence of *in situ* archaeology of Roman date?
- What evidence exists from sites in the vicinity to support the premise that medieval activity was focused to the south of the site?
- How can the general absence of activity during the 16th century be explained?
- What evidence exists to elucidate on the usage of the site prior to the Great Fire of London?
- To what extent can archaeological, documentary and cartographic evidence be incorporated into a cohesive whole to inform on the usage of the site during the 17th and early 18th centuries? Do the different types of evidence support or contradict each other?
- The Phase 4b animal bone assemblage might suggest the presence of a high status community. Does the historical evidence substantiate this?
- No archaeological features dating to the late 18th/19th century were recorded during the excavations. How can the absence of material of this date be explained?

9 CONTENTS OF THE ARCHIVE

9.1 Paper Records

- Contexts 124 sheets
- Plans 115 sheets
- Sections 25 sheets
- Environmental Sheets 3 sheets

9.2 The Finds

- Pottery (including crucibles and kiln furniture) 7.5 boxes
- CTP/lithics 0.5 boxes
- Ceramic building material 7 boxes
- Animal bone 2 boxes
- Glass 2 boxes
- Small Finds/Metal objects 2 boxes
- Miscellaneous (evaluation bone/CBM/pottery) 1 box

10 IMPORTANCE OF THE RESULTS

10.1 Importance Of The Results

10.1.1 The archaeological investigations at 15 Dock Street have demonstrated the presence of a stratified archaeological sequence potentially dating to the Roman period and definitely to the medieval and post-medieval periods. Of particular note are the sizable quantities of Roman material, which even if residual, strongly hint at the presence of Roman activity in very close proximity, potentially remaining *in situ* beneath the pre-determined project level. In addition, whilst it is unclear whether the lower dumping sequence recorded on site is Roman or medieval in date, there is no doubt that the upper parts represent medieval ground reclamation and usage, particularly of the south of the site, potentially indicating a focus of medieval activity in the sites southern vicinity.

10.1.2 In many ways the main body of archaeological material gleaned from the excavations pertains to the site's development throughout the 17th century, after an apparent hiatus during the 16th century. Initial development prior to the Great Fire of London in 1666 appears to have been typified as low-level site usage, however, in the later part of the century, into the 1700s, the site's concentrated development and usage as a glass factory adjacent to the western frontage of Dock Street is strikingly apparent.

10.2 Further work

10.2.1 It will be necessary to undertake further analysis and refinement of the stratigraphic sequences recorded on site, in conjunction with further examination of the results detailed in the specialist appendices. This is particularly pertinent when addressing the uncertainty of the dating of Phase 2a deposits. In addition it will be necessary to address the distribution of medieval features in the south of the site with particular attention paid to the locations of other medieval sites and findspots in the vicinity.

10.2.2 With regards the post-medieval archaeology it will be necessary to undertake analysis and research of historical and cartographic material in order that an attempt can be made to fully integrate the archaeological evidence. Particular attention should be paid to land ownership throughout the 17th and 18th centuries and comparison with other 17th century glass manufacturers will be required. With regards the diverse pottery assemblage collected on site, attempts should be made to incorporate this data with not only the usage of the site but also the wider area, particularly trade routes which may not only reflect the routes coming into this part of London but also may elucidate on those leaving it, e.g. the destination of the glass produced on site.

10.2.3 Future work has been identified in the specialist assessments included in this report (see appendices) and are listed below:

- **Roman pottery**

No additional work required

- **Medieval and post-medieval pottery**

Any future publication should include a small report on the medieval and post-medieval pottery recovered. Further analysis of crucibles and furnace or kiln furniture will also be required. It will be worth investigating the potential that petrological analysis will have in pinning down a possible provenance for crucibles, in terms of the viability of fireclay fabrics for study and the availability of any existing datasets for comparison. Inductively coupled plasma spectrometry (ICPS) of the residues within the crucibles could be undertaken in order to understand more about the glass manufactured although this can be misleading where high temperatures cause elements from the crucible to dissolve into glass thus it is suggested that direct analysis of the glass waste also recovered is likely to yield more reliable results.

The crucibles, kiln or furnace furniture and glass waste should be compared with other contemporary glass manufacturing assemblages including those from Vauxhall and Old Broad Street. The possible presence of glass working and sugar-refining should also form the focus of any documentary research undertaken for the site. Approximately 5 illustrations will be necessary.

- **Clay tobacco pipe**

A short publication report on the clay tobacco pipe assemblage is suggested. Further identification and illustration of the non-local clay tobacco pipe bowl is required.

- **Glass**

Further analysis should be carried out of glass waste to better understand the manufacture of glass on the site. Further research should include documentary research for the manufacturing of glass on the site and comparison with other glass manufacturing assemblages.

- **Ceramic building material**

No additional work required

- **Small finds**

A range of metal objects should be x-rayed to facilitate identification and illustration. Three late medieval objects form a particularly significant group and further parallels should be sought for the small copper-alloy wheel. All three objects should be illustrated. The residual Roman bracelet requires further identification and should be drawn for publication; additional Roman

finds may be identified in the fragment of lava quern stone and possibly the piece of bone-working waste. The early modern ivory comb could also be illustrated and for this period the two possible copper-alloy coins should be further identified. In addition, a specialist should investigate the lump of metalworking slag.

- **Lithics**

No further work is warranted for the material but the presence of flints should be noted in any published accounts of the investigations

- **Animal bone**

It is recommended that the conclusions made for the assessment be further researched and possibly revised following the completion of the stratigraphic and dating analyses

- **Environmental**

No additional work required

10.3 Publication outline

10.3.1 The archaeological results will be published in London Archaeologist. A proposed outline of the publication is detailed below:

Archaeological Investigations at 15 Dock Street

- Introduction to the Project
- Historical and Archaeological Background
- Archaeological Sequence: medieval; 15th/16th century; 17th/18th century
- Discussion
- Acknowledgements
- Bibliography

11 ACKNOWLEDGMENTS

- 11.1 Pre-Construct Archaeology Limited would like to thank Sterling Partners for commissioning the work and David Divers (GLAAS) for monitoring the investigations.
- 11.2 The author would like to thank Shane Maher for supervising the archaeological investigations and undertaking the primary stages of the post-excavation work and in addition thanks are due to the field staff who worked on the project. The author would also like to thank Lisa Lonsdale for the logistics, Nathalie Barratt for the surveying, Josephine Brown for the illustrations and Berni Sudds, Chris Jarrett, James Gerrard, Mårit Gaimster, Sarah Carter, Kevin Hayward, Barry Bishop, David Hodson and Kevin Rielly for their respective reports. Furthermore, the author would like to thank Peter Moore for his project management and Frank Meddens for the post-excavation management.

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APPENDIX 1: CONTEXT INDEX

Context	Plan	Section	Phase	Description	Notes	n/s	e/w	Depth	High
1	n/a	n/a	4b	Fill of [3]	Firm, dark grey brown, sand silt	2.85	3.18	n/a	9.31
2	2	5, 6, 7, 8, 9, 10	4b	Tank/basement	Unfrogged red brick	3.81	3.21	2.68	9.29
3	3	10	4b	Construction cut for [2]	Rectangular, vertical sides, flat base	4.01	3.81	2.68	9.29
4	n/a	10	4b	Fill of [3]	Loose, mid orange brown, silt sand mortar	3.16	2.88	n/a	9.09
5	n/a	n/a	4a	Fill of [14]	Loose, mid grey brown, silt sand	1.04	2.02	2.41	8.28
6	n/a	n/a	4a	Fill of [7]	Friable, light grey brown, clay silt sand	0.52	0.56	n/a	8.04
7	7	n/a	4a	Post hole	Sub-round, near vertical sides, base NP	0.52	0.56	n/a	8.04
8	n/a	n/a	4a	Fill of [14]	Friable, light brown yellow white, sand mortar	1.04	2.02	0.32	8.2
9	9	6	4b	Drain/flue	Unfrogged red brick, tile base	0.58	1.1	n/a	9.22
10	10	8	4b	Drain/flue	Unfrogged red brick, tile base	2.64	0.55	n/a	9.23
11	11	n/a	4b	Possible surface	Indurated, mid yellow green, gravel sand silt	3.91	1.31	0.94	9.24
12	12	3	4b	Possible surface	Indurated, mid yellow green, gravel sand silt	3.21	4.21	0.94	9.27
13	13	n/a	4a	Tank/basement	Unfrogged red brick	1.51	2.55	0.41	8.41
14	14	n/a	4a	Construction cut for [13]	Rectangular, steep sides, flat base	1.54	2.61	0.41	8.41
15	15	6	4b	Construction cut for [9]	Sub-rectangular, near vertical sides, flat base	0.61	0.98	0.09	9.19
16	16	8	4b	Construction cut for [10]	Sub-rectangular, near vertical sides, flat base	2.31	0.71	0.19	9.25
17	n/a	2	4b	Dump/levelling layer	Friable, dark grey brown, sand silt	9.15	3.11	n/a	9.31
18	n/a	2	4b	Dump/levelling layer	Soft, light yellow brown, silt sand	2.41	n/a	0.11	9.15
19	n/a	2	4b	Dump/levelling layer	Soft, dark grey brown, sand clay silt	2.41	n/a	0.13	9.08
20	n/a	2	4b	Dump/levelling layer	Soft, dark brown, sand silt	2.53	n/a	0.25	9.01
21	n/a	2	4b	Dump/levelling layer	Friable, dark grey brown, sand silt	2.81	n/a	0.41	n/a
22	n/a	2	4b	Dump/levelling layer	Friable, dark brown black, sand silt	3.01	n/a	0.11	8.43
23	n/a	2	4b	Fill of [24]	Friable, dark grey brown, sand silt	1.71	n/a	0.88	9.25
24	n/a	2	4b	Pit	Shape in plan not seen, gradual sides, flat base	1.71	n/a	0.88	9.25
25	n/a	2	4b	Dump/levelling layer	Friable, dark grey brown, sand silt	0.71	n/a	0.58	8.88
26	n/a	2	4b	Fill of [27]	Friable, light grey white, mortar sand silt	0.15	n/a	0.58	8.88
27	n/a	2	4b	Pit	Sub-round, steep sides, base NP	1.74	2.58	0.96	9.25
28	n/a	2	4b	Fill of [27]	Friable, dark grey brown, sand silt	1.74	2.58	0.71	9.25
29	n/a	2	4b	Fill of [27]	Soft, dark grey brown, sand sit	1.32	n/a	0.25	8.59
30	Void	Void	Void	Void	Void	Void	Void	Void	Void
31	n/a	2	4b	Fill of [32]	Friable, mid grey brown, sand silt	1.77	3.22	0.81	9.23
32	n/a	2	4b	Pit	Shape in plan not seen, vertical sides, flat base	1.77	3.22	0.81	9.23
33	n/a	2	4b	Fill of [49]	Friable, dark grey brown, sand silt	1.01	4.55	0.87	9.27
34-35	Void	Void	Void	Void	Void	Void	Void	Void	Void
36	n/a	1	2a	Dump/levelling layer	Friable, mid grey brown, silt sand	n/a	n/a	0.24	8.28
37	n/a	1	2a	Dump/levelling layer	Friable, light grey brown, silt sand	2.81	n/a	0.13	8.07
38	n/a	1	2a	Dump/levelling layer	Loose, light grey brown, clay silt	3.61	n/a	0.19	8.02
39	n/a	1	2a	Dump/levelling layer	Friable, dark grey brown, silt sand	2.51	n/a	0.05	7.81
40	n/a	1	2a	Dump/levelling layer	Friable, mid grey brown, sand silt	2.48	n/a	0.13	7.75
41	n/a	1	2a	Dump/levelling layer	Friable, dark grey brown, sand silt	0.84	n/a	0.05	7.64
42	n/a	1	2a	Dump/levelling layer	Firm, mid yellow brown, sand gravel	2.45	n/a	0.58	7.72
43	n/a	n/a	4a	Surface within [14]	Indurated, dark brown grey, clay gravel	1.04	2.02	0.05	7.89
44	n/a	n/a	4a	Fill of [3]	Loose, light brown grey, silt clay sand	4.01	3.81	0.05	9.29
45	n/a	1	2a	Dump/levelling layer	Friable, light brown grey	0.51	n/a	n/a	7.21
46	n/a	2	4b	Fill of [32]	Friable, light black grey, sand silt	1.81	3.22	2.91	8.49
47	n/a	n/a	4b	Fill of [10]	Friable, mid grey brown, silt sand	1.61	0.31	0.11	9.23
48	n/a	n/a	4b	Fill of [9]	Friable, light white grey, silt sand	0.41	1.01	0.07	9.22
49	49	2	4b	Ditch	Linear, steep sides, concave base	1.01	4.55	0.87	9.27
50	n/a	n/a	4b	Fill of [51]	Friable, mid red brown, decayed wood	0.31	0.22	0.24	8.26

Context	Plan	Section	Phase	Description	Notes	n/s	e/w	Depth	High
51	51	n/a	4b	Posthole	Sub round, near vertical sides, pointed base	0.31	0.22	0.24	8.26
52	n/a	n/a	4b	Fill of [53]	Friable, mid red brown, decayed wood	0.24	0.28	0.29	8.21
53	51	n/a	4b	Posthole	Sub round, near vertical sides, pointed base	0.24	0.28	0.29	8.21
54	n/a	n/a	4b	Fill of [55]	Friable, mid red brown, decayed wood	0.21	0.25	0.41	8.27
55	51	n/a	4b	Posthole	Sub triangular, near vertical sides, pointed base	0.21	0.25	0.41	8.27
56	n/a	n/a	4b	Fill of [57]	Friable, mid red brown, decayed wood	0.14	0.14	0.34	8.29
57	51	n/a	4b	Posthole	Shape not apparent, near vertical sides, base NP	0.14	0.14	0.34	8.29
58	n/a	n/a	4b	Wooden frame	Rotted wooden frame	1.71	1.71	0.38	8.71
59	n/a	10	4b	Fill of [2]	Friable, mid grey brown, silt sand	3.81	3.21	0.28	6.93
60	60	n/a	4b	Surface within [32]	Indurated, dark grey brown, sand gravel	1.71	1.52	n/a	8.29
61	n/a	12	2a	Dump/levelling layer	Friable, light yellow brown, sand gravel	1.41	n/a	0.21	7.65
62	n/a	12	2a	Dump/levelling layer	Friable, dark grey brown, silt sand	1.71	n/a	0.23	7.58
63	n/a	12	2a	Dump/levelling layer	Firm, light yellow brown, sand gravel	1.05	n/a	0.05	7.57
64	n/a	12	2a	Dump/levelling layer	Friable, mid grey brown, silt sand	2.01	n/a	0.42	7.56
65	n/a	12	2a	Dump/levelling layer	Friable, light red brown, sand gravel	2.53	n/a	0.51	7.55
66	n/a	12	2a	Dump/levelling layer	Friable, mid grey brown, silt sand	1.31	n/a	0.11	7.11
67	n/a	12	2a	Dump/levelling layer	Loose, light brown grey, sand gravel	2.22	n/a	0.36	7.02
68	n/a	n/a	2b	Fill of [69]	Friable, light grey brown, silt sand	1.96	1.03	0.27	7.35
69	69	n/a	2b	Pit	Sub round, gradual sides, concave base	1.96	1.03	0.27	7.35
70	n/a	12	2b	Dump/levelling layer	Friable, mid grey brown, silt sand	0.51	n/a	0.09	7.56
71	n/a	n/a	4b	Post packing	Firm light blue grey, clay	0.61	0.61	n/a	8.15
72	n/a	n/a	4b	Post	Degraded wood post	0.31	0.31	n/a	8.15
73	73	n/a	4b	Post cut	Rectangular, sides NP, base NP	0.61	0.61	n/a	8.15
74	n/a	n/a	4b	Post packing	Firm light blue grey, clay	0.61	0.81	n/a	8.07
75	n/a	n/a	4b	Post	Degraded wood post	0.31	0.25	n/a	8.07
76	76	n/a	4b	Post cut	Rectangular, sides NP, base NP	0.61	0.81	n/a	8.07
77-100	Void	Void	Void	Void	Void	Void	Void	Void	Void
101	n/a	3	2a	Dump/levelling layer	Firm, mid yellow brown, clay sand	n/a	3.21	0.23	8.31
102	n/a	2	4b	Fill of [105]	Friable, mid grey brown, silt sand	n/a	1.22	0.71	9.26
103	n/a	3	4b	Fill of [105]	Indurated, mid yellow brown, silt sand	n/a	1.51	0.31	9.21
104	n/a	3	4b	Fill of [105]	Indurated, dark grey brown, silt sand	n/a	1.51	0.21	8.92
105	n/a	3	4b	Pit	Shape in plan not seen, steep sides, base NP	n/a	1.51	1.11	9.26
106	n/a	4	2a	Dump/levelling layer	Indurated, mid yellow brown, clay sand	n/a	1.61	0.22	8.09
107	n/a	4	2a	Dump/levelling layer	Indurated, light brown grey, clay sand gravel	n/a	0.81	0.18	7.91
108	n/a	4	2a	Dump/levelling layer	Firm, light brown grey, sand gravel	n/a	1.61	0.47	7.92
109	n/a	4	2a	Dump/levelling layer	Friable, mid yellow brown, silt sand gravel	n/a	1.61	0.28	7.51
110	n/a	n/a	3	Fill of [111]	Friable, mid grey brown, sand silt	0.64	0.74	0.47	7.31
111	111	n/a	3	Post hole	Shape unknown, steep sides, base NP	0.64	0.74	0.47	7.31
112	n/a	n/a	4a	Fill of [113]	Firm, light brown grey, clay sand silt	1.51	1.25	0.26	7.55
113	113	n/a	4a	Pit	Sub round, gradual sides, flat base	1.51	1.25	0.26	7.55
114	n/a	11	2a	Fill of [115]	Firm, mid orange brown, silt gravel	2.21	3.01	0.46	7.63
115	115	11	2a	Pit	Linear, gradual sides, concave base	2.21	3.01	0.46	7.63
116	n/a	n/a	2b	Fill of [120]	Firm, mid grey orange, gravel sand	1.15	5.11	0.25	7.51
117	n/a	n/a	2b	Fill of [118]	Loose, mid grey brown, silt sand	1.91	1.61	0.41	7.19
118	n/a	n/a	2b	Pit	Sub round, steep sides, flat base	1.91	1.61	0.41	7.19
119	Void	Void	Void	Void	Void	Void	Void	Void	Void
120	120	n/a	2b	Ditch	Rectangular, steep sides, irregular base	1.15	5.11	0.25	7.51
121	n/a	n/a	2b	Fill of [122]	Firm, mid red brown, silt sand	1.61	1.21	0.29	7.26
122	122	n/a	2b	Pit	Sub rectangular, near vertical sides, irregular base	1.61	1.21	0.29	7.26
123	123	n/a	2b	Fill of [124]	Firm, mid green brown, silt sand	1.61	1.01	0.33	7.29
124	124	n/a	2b	Pit	Rectangular, concave sides, irregular base	1.61	1.01	0.33	7.29
125	125	n/a	2b	Dump/levelling layer	Firm, mid red brown, silt sand	0.85	1.41	0.11	7.19
126	n/a	10	2a	Dump/levelling layer	Loose, light white yellow, sand gravel	0.26	n/a	0.43	7.51
127	n/a	10	2a	Dump/levelling layer	Friable, light brown grey, silt sand	0.41	n/a	0.14	7.11

Context	Plan	Section	Phase	Description	Notes	n/s	e/w	Depth	High
128	n/a	10	2a	Dump/levelling layer	Firm, mid red brown, sand	0.61	n/a	0.31	7.01
129	129	n/a	2a	Dump/levelling layer	Firm, light white green, sand gravel	1.24	1.74	n/a	6.55
130	129	n/a	1	Natural gravel?	Indurated, mid yellow brown, sand gravel	1.41	1.58	n/a	6.63
131	131	n/a	2b	Dump/levelling layer	Firm, light red brown, sand gravel	2.71	3.41	0.51	7.34
132	n/a	11	2a	Dump/levelling layer	Firm, mid orange brown, silt sand gravel	2.51	n/a	0.33	7.62
133	n/a	11	2a	Dump/levelling layer	Soft, mid grey brown, sand silt	2.94	n/a	0.36	7.57
134	n/a	11	2a	Fill of [145]	Firm, mid grey brown, sand silt	1.83	n/a	0.23	7.62
135	n/a	11	2a	Dump/levelling layer	Firm, light grey brown, silt clay gravel	2.07	n/a	0.39	7.03
136	n/a	11	2a	Dump/levelling layer	Soft, mid orange brown, silt sand	1.51	n/a	0.15	6.86
137	n/a	11	2a	Dump/levelling layer	Firm, mid brown grey, gravel sand silt	3.51	n/a	0.34	7.56
138	n/a	11	2a	Dump/levelling layer	Soft, dark grey, sand clay silt	1.38	n/a	0.11	6.75
139	n/a	11	2a	Fill of [145]	Firm, light brown grey, sand gravel silt	1.25	n/a	0.64	7.61
140	n/a	11	2a	Fill of [145]	Indurated, light brown orange, gravel sand	1.61	n/a	0.23	7.63
141	n/a	11	2a	Fill of [145]	Friable, mid grey brown, sand silt	1.88	n/a	0.26	7.62
142	n/a	11	2a	Fill of [145]	Indurated, light orange brown, sand gravel	1.37	n/a	0.27	7.62
143	n/a	11	2a	Fill of [145]	Loose, light orange brown, silt gravel sand	2.57	n/a	0.26	7.61
144	Void	Void	Void	Void	Void	Void	Void	Void	Void
145	145	11	2a	Ditch	Linear, concave sides?, concave base	2.57	n/a	0.97	7.61
146	n/a	11	2a	Dump/levelling layer	Loose, mid brown grey, sand silt	2.22	n/a	0.63	7.51
147	n/a	n/a	2b	Fill of [148]	Firm, mid brown grey, silt sand clay	2.31	2.24	1.34	7.43
148	148	n/a	2b	Pit	Irregular, gradual sides, flat base	2.31	2.24	1.34	7.43
149-151	Void	Void	Void	Void	Void	Void	Void	Void	Void
152	n/a	n/a	4a	Fill of [153]	Friable, dark grey, sand gravel silt	1.32	2.25	0.58	7.59
153	153	n/a	4a	Pit	Sub rectangular, steep sides, flat base	1.32	2.25	0.58	7.59
154	n/a	11	2a	Dump/levelling layer	Soft, mid grey brown, sand silt	2.05	n/a	0.11	7.51
155	n/a	11	2a	Dump/levelling layer	Firm, mid red brown, sand gravel	2.38	n/a	0.35	7.51
156	Void	Void	Void	Void	Void	Void	Void	Void	Void
157	n/a	11	2a	Dump/levelling layer	Firm, mid red brown, sand gravel	0.91	n/a	0.16	6.99

APPENDIX 2: ROMAN POTTERY ASSESSMENT

James Gerrard

Eleven sherds of residual Romano-British pottery were recovered from eight contexts. Of these eight contexts, six produced medieval pottery and the Romano-British pottery can thus be considered residual. The remaining two contexts ([121], [132]) cannot be conclusively shown to be Roman as they post-date deposits containing small quantities of medieval pottery. If the mere two medieval sherds from [146] and [154] are intrusive, then [132] may be of Roman date however [121] is unlikely to be Roman because it is stratigraphically later than [139], which contains nine sherds of medieval pottery.

The small size of the Roman assemblage limits its interpretive value. The range of fabrics seems to slightly favour the later Roman period and is indicative of late Roman activity in the vicinity. This is not surprising given the site's location just beyond the City wall. The only noteworthy sherd is a fresh rim sherd from a Gose 490 bowl in an orangey-brown Mayen fabric. This is an import from the Rhineland where it is dated c.AD250-300 (Gose 1950, 42, Tafel 47). Mayen ware imports are a common, if extremely minor, component of late Roman assemblages in London and the Thames estuary. This sherd is paralleled by similar vessels (Gose 1950, No. 488) from the Tobacco Dock / Babe Ruth sites in Shadwell (Douglas, Gerrard and Sudds *forthcoming*).

It is recommended that no further work be undertaken on this assemblage. Any publication text can be drawn from this assessment and should illustrations be required then the AHFA 2FX jar from [132], the MAYEN Gose 490 bowl from [45] should suffice.

Context	Pottery	Spot Date	Residual?
[+]	1 x AMPH	50-400	Yes
[5]	1 x BB2	120-250	Yes
[45]	1 x MAYEN, 4GOSE490	250-300	Yes
[121]	1 x SAND, burnt	50-400	
[132]	1 x AHFA, 2FX, fresh 1 x OXRC, abraded	300-400	
[139]	1 x OXWWW, 7M22	300-400+	Yes
[146]	1 x SAM, abraded 2 x SAND, abraded	50-400	Yes

Table 1. Catalogue of sherds. (For fabric and form codes see Symonds 2000)

References

- Douglas, A., Gerrard, J. & Sudds, B. *forthcoming*. The Excavation of a late Roman Bathhouse and adjacent settlement at Shadwell, East London. London: Pre-Construct Archaeology Monograph
- Gose, E., 1950. Gefäßstypen der römischen Keramik im Rheinland. Bonner Jahrbuch Beiheft 1, Bonn

Symonds, R. 2000. Recording Roman pottery: a description of the methodology used at Museum of London Specialist Services (MoLSS) and Museum of London Archaeology Service (MoLAS).
MoLAS: Unpublished document (available from MoLAS)

APPENDIX 3: POST-MEDIEVAL POTTERY ASSESSMENT

Berni Sudds

Methodology

The Museum of London Specialist Service's (MOLSS) pottery type codes have been used to classify the ceramics. The material was quantified for each context by fabric, vessel form and decoration using sherd count (with fresh breaks discounted) and estimated vessel numbers. Examples of the fabrics can be found in the archives of PCA and/or the Museum of London. A ceramic database cataloguing these attributes has been generated using Microsoft Access.

Introduction

The assemblage of pottery excavated from Dock Street dates largely to the late 16th to 17th century. The remainder of the group is comprised of a small quantity of medieval pottery. Although fragmentary, the majority of the material is in good condition.

The Pottery

Medieval

The small assemblage of medieval pottery, amounting to 25 sherds, can be well paralleled in London. The group includes both local and regional products from London, the Thames valley, Surrey and Hampshire in addition to a couple of sherds from Germany. The majority dates to the late 14th to 15th century, comprised largely of Coarse border ware (CBW) from the Surrey/ Hampshire borders and Cheam whiteware (CHEA) from Surrey. Coarse border ware forms include cooking pots with flat-topped and bifid rims, large rounded jugs and a bowl. A small quantity of Late London-type ware (LLON), dating to 15th century and early Langerwehe stoneware (LANG), dating from the late 14th to 15th century, was also recovered. The remainder of the assemblage is comprised of a few non-diagnostic sherds of Early medieval sandy ware (EMS) and Kingston-type ware (KING).

Post-medieval

The post-medieval assemblage is quantified by source in Table 1 below. The ratio of local and regional products is fairly typical for the early post-medieval period in London. The three most dominant pottery types, each accounting for a roughly equal quantity, are the local redwares, the local tin-glazed wares and the regional Surrey / Hampshire border wares. Given the Thames side location of the site and proximity of the docks both the source and relatively high quantity of imported material is not considered unusual.

	Source	SC	MNV	Totals
Local	Local	90	76	90 (76)
Regional	Dorset	1	1	84 (69)
	Essex	29	24	
	Midlands	3	3	
	Surrey/ Hampshire border	42	35	
	Great Britain	9	6	
Imported	China	3	3	39 (35)
	Germany	31	27	
	Italy	4	4	
	Spain	1	1	
Unsourcesd	Miscellaneous	41	25	41 (25)

Table 1: Breakdown of the post-medieval assemblage by source.

Local pottery

With the exception of two sherds of London stoneware the local post-medieval pottery assemblage is divided equally between redwares and tin-glazed ware (Table 2). The London area post-medieval redware (PMR) forms are restricted largely to food preparation and storage, namely pipkins, jars and deep bowls. A sugar mould and syrup collecting jar were also recovered that would have been used in conjunction in the process of sugar refining. Sugar refining vessels represent frequent finds on riverside sites, favoured for the location of refineries due to the proximity of water required for both the process of manufacture and in the transportation of the raw materials and refined sugar (Brooks 1983, 11). The presence of these vessels does not necessarily imply production on site, particularly given the small number recovered, but may potentially indicate activity of this nature was taking place in the vicinity. The vessels probably date to the 17th century at a time when many small-scale sugar-refining enterprises were operating in London (ibid).

As expected the tin-glaze assemblage includes a high-proportion of decorative serving or display vessels, namely bowls and dishes, dating largely to the 17th century. The decoration is largely geometric or floral (TGW D), although a small number of early to mid 17th century Chinese influenced panel-based designs in the so called Wan Li style were also identified (TGW A). Other tin-glazed forms identified include drug jars, a porringer and a possible pedestal beaker. The latter is undecorated (TGW C) but represents an unusual find with no immediate parallel.

Source	Fabric code	Common name	SC	MNV
Local	LONS	London stoneware	2	2
	PMR	London area post-medieval redware	36	31
	PMRE	London area early post-medieval redware	4	4
	PMSRG/Y	London area post-medieval slipped redware with green or clear glaze	3	3
	TGW	English tin-glazed ware	12	12
	TGW BISC	Biscuit-fired tin-glazed ware	1	1

Source	Fabric code	Common name	SC	MNV
	TGW BLUE	Tin-glazed ware with plain pale-blue glaze	1	1
	TGW A	English tin-glazed ware with Orton type A decoration (Wan li)	7	5
	TGW C	English tin-glazed ware with Orton type C decoration (plain white glaze)	12	6
	TGW D	English tin-glazed ware with Orton type D decoration (polychrome/ geomtr)	12	11

Table 2: Local post-medieval pottery

Regional pottery

The regional pottery assemblage is dominated by Surrey/ Hampshire border products and Post-medieval redwares from Essex (Table 3). The Surrey/ Hampshire border wares are predominantly white bodied with either yellow or green glaze (BORDY/G). Bowl and dish forms are common but a tripod pipkin, a skillet, a porringer, a colander and a moneybox are also represented. An unusual and unparalleled cylindrical closed form decorated with a notched band and external yellow glaze will require further research. The red bodied Surrey/ Hampshire border wares (RBOR/G/SL) also include bowl and dish forms in addition to a chamber pot.

The pottery from Essex is comprised of Post-medieval black-glazed redware (PMBL), Post-medieval fine redware (PMFR) and Metropolitan slipware (METS). The black-glazed redware is represented typically by tyg forms and the fine redware by a broader range including jugs, a bowl, a dish and a chamber pot. A brown-glazed fine redware cup was also recovered. The Metropolitan slipware forms include dishes and a possible chamber pot or large jug.

Source	Fabric code	Common name	SC	MNV
Dorset	VERW	Verwood ware	1	1
Essex	METS	Metropolitan slipware	4	3
	PMBL	Post-medieval Essex black-glazed redware	13	11
	PMFR	Post-medieval fine redware	10	8
	PMFRB	Post-medieval fine redware with brown glaze	2	2
Midlands	MPUR	Midlands purple ware	2	2
	SWSG	White salt-glazed stoneware	1	1
Surrey / Hampshire	BORDB	Surrey/ Hampshire border whiteware with brown glaze	1	1
	BORDG	Surrey/ Hampshire border whiteware with green glaze	12	11
	BORDO	Surrey/ Hampshire border whiteware with olive glaze	2	2
	BORDY	Surrey/ Hampshire border whiteware with clear (appearing yellow) glaze	13	10
	RBOR	Surrey/ Hampshire border redware	9	8
	RBORG	Surrey/ Hampshire border redware with green glaze	4	2
	RBORSL	Surrey/ Hampshire border redware with slip-trailed decoration	1	1
Great Britain	ENGS	English stoneware	2	1
	STSL	Combed slipware	7	5

Table 3: Regional post-medieval pottery

The remainder of the regional assemblage includes Midlands purple ware (MPUR) and White salt-glazed stoneware, both common in London, the latter representing one of the few 18th century sherds

recovered. The single sherds of English stoneware and Combed slipware could have been produced at a number of centres across Britain but also represent frequent finds locally. The Verwood ware from Dorset, however, is more unusual occurring more infrequently.

Imported pottery

The majority of the imported assemblage originates from Germany and of that group, as can be well-paralleled on other sites across London during the late 16th and 17th century, the greatest quantity derives from Frechen (FREC; see Table 4). The other fabrics identified can also be well paralleled in London but the relative proportion of imports to local and regional products is of note and can be explained by the proximity of the site to the Thames, and more importantly the docks. Indeed, to the west of the site, both within and adjacent to the Tower of London, the relative quantity and diversity of imports was found to be even more pronounced (Blackmore 1996; Sudds 2008). Here the status of the Tower may play a part but, particularly for sites outside on Tower Hill, the number of imports is likely to result from proximity to the landing points for foreign ships at Custom House, Wool Key and Galley Key (Blackmore 1996). This proximity to the river may also explain why Chinese porcelain, pre-dating 1650 was found on site (CHPO KRAAK).

Source	Fabric code	Common name	SC	MNV
China	CHPO BW	Chinese blue and white porcelain	1	1
	CHPO KRAAK	Chinese porcelain with Kraak decoration	1	1
	CHPO SWAT	Swatow provincial porcelain	1	1
Germany	FREC	Frechen stoneware	29	25
	RAER	Raeren stoneware	1	1
	SIEG	Siegburg stoneware	1	1
Italy	MLTG	Montelupo polychrome maiolica	2	2
	NIMS POLY	North Italian polychrome slipware	1	1
	NISG	North Italian (Pisa) sgraffito redware	1	1
Spain	OLIV	Spanish olive jar	1	1

Table 4: Imported post-medieval pottery

Jugs, including the ubiquitous Bartmannkrug typically represent the dominant form type identified for the German stonewares. The two Montelupo polychrome maiolica dishes date to the early or mid 17th century. One is decorated in the so called 'Estenuazione dei motivi rinascimentali' or extension of the renaissance motifs (Genere 53; Berti 1998, p.358/ PI.269) and the second with 'Foglia verde' or green leaves (Genere 70; Berti 1998, p.214).

Crucibles and kiln furniture

A small assemblage of ceramic crucibles and kiln furniture (39 fragments) was also retrieved from site, predominantly from the backfill of brick lined tank [2]. The majority of pottery recovered from the tank dates to the late 17th century and although two 18th century sherds were also identified these are likely to be intrusive or perhaps represent final infilling. The residues present on the crucibles and kiln

furniture suggest they were used in the manufacture of glass. Taken together with the glass waste and slag also recovered the evidence would appear to suggest that glass working was being undertaken during the 17th century either on the site or in the immediate vicinity.

Both the crucibles and kiln furniture seem to be made of the same off-white (although often reduced grey) refractory clay. The crucibles are fragmentary but demonstrate different wall thicknesses and varying coarseness of fabric. One possible cylindrical industrial vessel is built from a fine white clay, near biscuit ware in appearance, and has a very thick base. Another medium-walled vessel, probably a crucible, is constructed of a medium coarse fireclay and has glass slag concreted to outside and some melted glass inside. A number of crucible sherds are very thick walled and made from a medium coarse fireclay, mostly reduced grey through use. These sherds are from large vessels and demonstrate a thick opaque glass or slag externally and a clear to green glass residue internally. One example has a thick residue of glass crystals to the base, likely to represent cullet intended for re-melting. Finally, a single crucible has been identified in a fabric resembling stoneware, although this may simply represent vitrified fireclay (fill [29]).

Fragments of kiln or furnace structure and/ or furniture, perhaps representing bats for stacking, were also identified. These were also made of a fireclay and resemble irregularly moulded thin bricks. Some are vitrified with bubbled, aerated surfaces and most have a glass residue, or a self-glaze to one surface. One example demonstrated fragments of glass or glass slag in the fireclay fabric but it is not clear at present if this could suggest that the on site or local manufacture of furnace structure or furniture was taking place. The base of a large thick-walled circular vessel or structure was also identified. The base has a central hole with a slag deposit set in the process of pouring through.

Potential and recommendations

The pottery not only provides dating evidence for individual contexts but also reflects the nature of activity taking place in the vicinity of site, mainly during the 17th century. Many of the individual feature assemblages are small, recovered from the backfill of pits and ditches, but two medium sized groups were also excavated from a brick tank and the fill of a basement. The assemblage includes both utilitarian and decorative pottery, ubiquitous to many sites across London, but also includes a number of interesting imports. As discussed above this would tie in within other excavations in the vicinity and is no doubt explained by the proximity of the site to the river. The presence of industrial ceramics would also indicate that glass manufacture and possibly sugar-refining was taking place nearby.

Any future publication work should include a small report on the medieval and post-medieval pottery recovered. Further analysis of crucibles and furnace or kiln furniture will also be required. It will be worth investigating the potential that petrological analysis will have in pinning down a possible provenance for crucibles, in terms of the viability of fireclay fabrics for study and the availability of any existing datasets for comparison. Inductively coupled plasma spectrometry (ICPS) of the residues within the crucibles could be undertaken in order to understand more about the glass manufactured

although this can be misleading where high temperatures cause elements from the crucible to dissolve into glass (Dungworth 2006) thus it is suggested that direct analysis of the glass waste also recovered is likely to yield more reliable results.

The crucibles, kiln or furnace furniture and glass waste should be compared with other contemporary glass manufacturing assemblages including those from Vauxhall and Old Broad Street (Tyler & Willmott 2005; Mortimer 1995). The possible presence of glass working and sugar-refining should also form the focus of any documentary research undertaken for the site. Approximately 5 illustrations will be necessary.

Context	Size	Date range of pottery		Latest dated pottery		Suggested date of deposition
0	47	1300	1900	1630	1846	-
1	70	1400	1926	1720	1780	1720 – 1780 (mostly 1670 – 1700)
4	4	1480	1900	1550	1700	1550 – 1700
5	43	1480	1900	1630	1846	1650 – 1680
6	2	1550	1900	1580	1900	1580 – 1700
8	8	1480	1900	1580	1900	1580 – 1700
12	20	1500	1900	1630	1700	c.1650)
18	1	1580	1700	1580	1700	1580 – 1700
19	1	1580	1900	1580	1900	1580 – 1900
23	1	1550	1700	1550	1700	1550 – 1700
28	1	1580	1900	1580	1900	1580 – 1900
29	7	1480	1900	1580	1900	1580 – 1700
31	9	1480	1900	1580	1900	1580 – 1700
33	22	1480	1900	1660	1870	1660 – 1800
45	1	1270	1500	1270	1500	1270 – 1500
47	5	1580	1900	1580	1900	1580 – 1700
68	3	1270	1500	1270	1500	1270 – 1500
110	1	1480	1600	1480	1600	1480 – 1600
112	1	1550	1700	1550	1700	1550 – 1700
116	6	1270	1500	1380	1500	1380 – 1500
139	9	970	1550	1400	1500	1400 – 1500
146	1	1340	1500	1340	1500	1340 – 1500
147	2	1350	1500	1350	1500	1350 – 1500
152	11	1580	1900	1630	1846	1630 – 1680
154	1	1240	1400	1240	1400	1240 – 1400

Table 5. Dating table. All contexts containing post-Roman pottery listed. Size = sherd count.

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APPENDIX 4: CLAY TOBACCO PIPE ASSESSMENT

Chris Jarrett

Introduction

A small sized assemblage of clay tobacco pipes was recovered from the site (1 box). Most fragments are in a fairly good condition, indicating that they had not been subject to much redeposition or were deposited soon after breakage. Clay tobacco pipes occur in ten contexts as mostly small groups (under 30 fragments), except for one medium group (30-100 fragments) found in context [5].

All the clay tobacco pipes (156 fragments, of which 53 are unstratified) were recorded in an ACCESS database and classified by Atkinson and Oswald's (1969) typology (AO) and 18th-century examples by Oswald's (1975) typology and prefixed OS. The pipes are further coded by decoration and quantified by fragment count. The degree of milling has been noted and recorded in quarters, besides the quality of finish. The tobacco pipes are discussed by their types and distribution.

The Clay Tobacco Types

The clay tobacco pipe assemblage from the site consists of 68 bowls, 82 stems and six nibs or mouthparts. The clay tobacco pipe bowls range in date between 1610 and 1780.

London area bowls

1610-40

AO6: one spurred bowl with complete milling of the rim and very nicely finished.

1640-60

AO9: three spurred bowls. The extent of rim milling varies between half and three quarters of the bowl rim and the quality of finish is mostly fair with one good quality example.

AO10: five heeled bowls, with a number of variants, one narrow, one wide besides a tall example. Only two bowls have complete milling and additionally two have three quarters and the fourth has a quarter milling: all the bowls are of a fair finish.

1640-1670

AO11: three short, heart-shaped heeled bowls with three quarters or complete milling of the rim and fair finishes.

1660-80

AO13: nineteen heeled bowls from several different moulds, but a more bulbous variant is noted as three examples. Milling of the rim is variable from none to complete and the finish of the bowls is either fair or a good quality finish.

AO15: Twenty-four spurred bowls of a fair but mostly good quality finish and mostly three quarters or full milling of the rim. A number of different moulds are represented, with two short examples noted and one example noticeably waisted above the spur.

AO18: four straight-sided, heeled bowls mostly with a good finish with none, three-quarter or full milling of the rim. The tall variant of this bowl type with no milling is also present.

1680-1710

AO20: two rounded profiled, heeled bowls, fair in quality. One bowl is a shorter variant with a sloping rim. The other bowl only has a quarter milling which is normal for this period.

AO22: one straight-sided bowl with quarter milling of the rim and a good finish.

1730-80

OS22: one bowl with its rim and spur damaged.

Unidentified

There are four fragmentary bowls that cannot be assigned to a type.

Non-local

There is a single non-local example with a rounded front and back to the bowl. It most closely resembles the AO4 London type bowl, dated 1610-1640.

Distribution

Table 1 shows the distribution of the clay tobacco pipes, showing the number of fragments, the date range of the types and the latest bowl, the range of bowl types, together with a spot date for each context tobacco pipes occur in.

Context	Quantity	Date range	Latest date range	Bowl types present	Spot date
1	17	1660-1780	1730-1780	AO13, AO15, AO18, OS22	1730-1780
4	1	1660-1680	1660-1680	AO13	1660-1680
5	35	1640-1680	1660-1680	AO10, AO13, AO15, AO18	1660-1680
8	6	1640-1660	1640-1660	AO9, AO10	1640-1660
12	15	1610-1680	1660-1680	AO6, AO13, AO15	1660-1680
31	1			Stem	1580-1910
33	21	1640-1710	1680-1710	AO9, AO10, AO13, AO15, AO20, Non-local	1680-1710
47	5			Stems	1580-1910
59	1			Stem	1580-1910
152	1			Stem	1580-1910

Table 1. DOK05: distribution of clay tobacco pipes.

Significance of the Collection

The clay tobacco pipes are of significance at a local level for demonstrating what types of pipes are made locally or marketed to this area. The clay tobacco pipes follow the chronology and typology for the London area. The clay tobacco pipes cover a relatively narrow period of time between c.1610-1710 and except for the presence of one later mid 18th-century example, later diagnostic bowl types are unusually absent. None of the tobacco pipes are maker marked, which is somewhat unusual, but this may indicate that the assemblage is associated with a lower socio-economic status community, although a slight contradiction to this is that the finish on the some of the pipes is good. There is no evidence for clay tobacco pipe production amongst the assemblage. Other assemblages of clay tobacco pipes have been recorded locally at the high status site of the Tower of London (Higgins 2004; Jarrett 2008)

Potential

The clay tobacco pipes have the potential to date the contexts they were found in. Only one bowl requires illustration. The assemblage may back up the documentary evidence for the socio-economic status of the people living on the site. It is also becoming clearer that to a certain extent there is regionalism in the distribution of different 17th-century bowl types within London and how this site at Dock Street fits into this pattern is of interest.

Research Aims

The following are suggested as avenues of research:

- How does the quality of the clay tobacco pipe assemblage fit into the documented socio-economic status of the 17th-century residents of the site?

- Do the 17th-century clay tobacco pipes fit into the regional pattern for the distribution of different clay tobacco pipes for this area of London?

Recommendations for Further Work

A short publication report on the clay tobacco pipe assemblage is suggested. Further identification and illustration of the non-local clay tobacco pipe bowl is required.

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APPENDIX 5: BUILDING MATERIAL ASSEMBLAGE

Kevin Hayward

Introduction and Aims

Five boxes of building material (ceramic building material and stone) were retained from the excavation of 15 Dock Street, London E1.

This material was assessed in order to:

- Identify (under binocular microscope) the post-medieval ceramic building material fabric and form and stone type.
- Date ceramic building material on fabric and forms and how it may relate to the occupation phases. Special reference will be made to the large brick tank and a smaller brick basement (16th–17th Century).

Methodology

The building material was examined using the London system of classification with a fabric number allocated to each object. The application of a 1kg mason's hammer and sharp chisel to each example ensured that a fresh fabric surface was exposed. The fabric was examined at x20 magnification using a long arm stereomicroscope or hand lens (Gowland x10).

Ceramic Building Material Form and Fabric

An overview of the ceramic building material from Marks Lane, Romford by fabric and form serves to provide valuable dating evidence in the phase summary at the end of this review.

Roman Ceramic Building Material

Fabric 2452; 3004; 3006; 3019; 3060b

3kg of residual and re-dumped Roman ceramic building material including brick, tile and tegulae were recovered from Phase 2 ditches and fills. Most of the material had evidence for re-use and the material from the fill of the linear ditches, [139] and [146], was heavily abraded.

The local early sandy fabrics 2452; 3004; 3006 (AD50-160) are present in some quantity together with an early Hampshire silty fabric 3019 (AD100-120) attesting to second century activity in the vicinity of Dock Street.

Of interest are the 4 fragments of the later but rare Hertfordshire Iron Oxide Fabric 3060b (AD170-230) also from these ditches. One of the tegulae [146] has a maker's circular mark and another with finger impressions [139].

Medieval and post-medieval Ceramic Building Material

The remainder of the ceramic assemblage consisted of 14.3kg of medieval and post-medieval brick, peg and pan tile from the dumps, brick tank and small brick basement.

Medieval Brick and Tile

Fabric 2587

A single fragment in a post-medieval dump [132] of a reused early (1240-1450) glazed iron oxide fragment is the sum total of medieval material at Dock Street.

Transitional/post-medieval Bricks and Tile

Brick

Fabrics 3032nr 3033; 3033; 3034

A small assemblage of thin (49-60mm), stock moulded unfrogged early post-medieval brick fragments characterised by the fabrics 3032nr3033 (1666-1725) and 3033 (1450-1700) are found in the fill of the construction cut of the post-medieval brick tank [14]; [59] to the north-east of the site and the timber lined pit [31] towards the east. These undoubtedly belong to an earlier structure in this vicinity.

Two examples of the later fresh post-Great Fire stock moulded Brick fabric 3034 (1666-1850) are also present [1] one with a distinct frog dating it to between 1750 and 1850. The absence of machine frogged bricks attests to the absence of later mid/late Victorian activity. The mortar (Roman cement) on the reused earlier post-medieval fabrics would indicate reuse after 1790.

Pan and Peg Tile

Pan Tile Fabric 2279

Peg Tile Fabrics 2276; 2586

Accumulations of the common Pan Tile Fabric 2279 (1640-1850) and Peg Tiles 2276; 2586 (1150-1800) some of which is reused compliment the brick fabrics and forms from Phase 2.

Stone – Geological Description and Source

Fabrics and Forms

3120; 3125; 3135; 3117

Igneous Rocks 3120; 3135

Cobble fragments of basalt, andesite and Plagioclase granite were all found in the fill [1] of the construction cut of tank [2]. These are all common hard materials brought in for courtyard/road cobbles in London during the 18th and 19th century. Their source is not secure – but they are very likely to have

come from a Western or Northern Britain Source (Cornwall; Leicestershire (Charnwood; North Wales; Lake District; Northern Scotland) and probably brought to London as ballast in boats.

Sedimentary Rocks 3117; 3135

Flint and Hard Chalk (Clunch) are common local materials.

Kiln Furniture and Crucibles

A collection of crucibles [1]; [4]; [29]; [33]; [47] and a fragment of kiln furniture [1] attest to some activity relating to metalwork and pottery/CBM production in the vicinity.

Summary

Little can be added to the detail above other than to mention

- The Roman material would indicate much activity within the local area.
- The quantity and condition of the post-medieval brick work points to utilitarian structures relating to post-medieval small-scale industry, possibly metalwork and pottery kilns.

Context	Size	Date range of material		Latest dated material	
1	15	50	1950	50	1950
4	5	1180	1900	1180	1900
5	6	1180	1900	1180	1900
6	1	1180	1800	1180	1800
8	3	55	1700	1450	1700
31	2	1450	1700	1450	1700
33	6	1640	1850	1640	1850
45	6	55	1900	1180	1900
59	11	50	1900	1180	1900
129	5	1180	1900	1180	1900
132	2	50	1450	1250	1450
137	2	1180	1900	1180	1900
139	4	50	1800	1180	1800
146	9	50	1900	1180	1900
147	4	50	1900	1180	1900

Table 1: Dating table

APPENDIX 6: GLASS ASSESSMENT

Sarah Carter

Methodology

The material was quantified for each context by colour, form and date and the glass assemblage has been recorded in an Access database.

Introduction

Of the 252 fragments of glass recovered from this site the majority, 177 fragments, were of glass slag, cullet and other waste. 11 window glass fragments were found. Of the remaining 64 fragments most, 49 fragments, were bottle glass. Tablewares are only represented by 1 drinking vessel fragment and 3 probable beaker fragments along with a stopper from a mallet decanter. All the identifiable glass dates between the mid 16th century to the 18th century with the majority dating from the 17th – 18th centuries.

The Glass Waste

Around 6.9kg of glass waste was recovered at Dock Street. The majority (6.1kg) is slag, also known as gall, which unfortunately tells us nothing about the nature of the glass being manufactured. The cullet (0.8kg) and the drops, pulls and runs (0.05kg) indicate that glass vessels were being made in green, natural pale green, natural pale blue and colourless metals. Pulls and drops of wine bottle glass are the most numerous and it is probable that wine bottles were being manufactured. However, as the majority of the glass waste would have been routinely recycled and without the recovery of any wasters, the nature of the glass being manufactured is uncertain.

Context	Quantity	Colour	Form	Comments
0	6		Slag	Fragments of waste glass
0	1	Colourless	Cullet	Colourless waste from manufacture
0	4	Green	Cullet	3 fragments of green pulls from wine bottle manufacture. 1 fragment of cullet
0	1	Natural pale green	Cullet	Pale green cullet
1	23		Slag	Glass slag
1	3		Slag	Glass slag
1	4		Slag	Glass slag
1	2		Slag	Glass slag
1	1	Colourless	Cullet	Colourless cullet
1	1	Colourless	Waste	Waste from a pincer handle?
1	5	Green	Cullet	Glass cullet
1	1	Green	Cullet	Wine bottle cullet
1	3	Natural green	Cullet	Pale green cullet
1	2	Natural pale green	Cullet	
23	2	Green	Cullet	Cullet or moils
31	36		Slag	Glass slag

Context	Quantity	Colour	Form	Comments
31	7	Green	Waste	Pulled waste and cullet
33	1	Natural green	Cullet	
47	1		Slag	
47	11	Natural green	Cullet	
59	2		Slag	Glass slag
59	28	Colourless	Waste	28 fragments of waste, trails and scraps
59	9	Green	Waste	Tiny scraps and waste from wine bottles
59	5	Natural pale blue	Waste	Tiny scraps and waste
59	18	Natural pale green	Waste	Tiny scraps and waste

Table 1: Distribution of glass waste

The Bottles

Although no complete bottles remain the fragments indicate that the majority are from wine bottles dating to the 17th – 18th centuries. 4 earlier case bottles are represented dating to the 16th – 17th centuries. A further 3 fragments are probably from bottles but are too fragmentary to be certain.

Context	Number of frags	Colour	Date
+	2	Green	17th - 18th C
+	2	Green	18th C
+	1	Green	E - Mid 18th C
+	1	Green	L 16th - 18th C
+	1	Green	Mid 18th C
1	16	Green	17th - 18th C
1	3	Green	E 17th C
1	6	Green	L 17th - 19th C
1	1	Green	L16th - 18th C
1	1	Green	L17th - E18th C
1	2	Green	Mid 17th - Mid 18th C
1	1	Natural green	?
1	1	Natural green	19th C
1	1	Natural green	Mid 16th - 18th C
4	1	Green	Mid - L17th C
29	2	Green	Mid 17th - 18th C
31	3	Natural green	L 17th C?
33	1	Green	L17th - Mid 18th C
47	1	Natural green	E 17th C?
59	1	Green	L17th - E 18th C
152	1	Green	17th - 18th C

Table 2: Distribution of bottles

Other Glass

7 fragments from phials were recovered dating from the mid 17th to the Late 18th centuries. One fragment of colourless glass from a possible flask, 4 fragments from drinking vessels in both

colourless and green glass also from the 17th and 18th centuries and a colourless ball-finished stopper decorated with a tear dating to the Early – mid 18th century are the only fragments from tablewares. There are 2 fragments from unidentified vessels and 11 fragments of window glass.

Potential and recommendations

The glass provides dating evidence for individual contexts and reflects the activity taking place on or in the vicinity of site during the 17th and 18th centuries. Further analysis should be carried out of glass waste to better understand the manufacture of glass on the site.

Further research should include documentary research for the manufacturing of glass on the site and comparison with other glass manufacturing assemblages including those at both Vauxhall and Old Broad Street (Tyler & Willmott 2005; Mortimer 1995).

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APPENDIX 7: SMALL FINDS ASSESSMENT

Märít Gaimster

Seventeen metal and small finds were retrieved from the excavations, including objects of metal, bone or ivory and stone; there was also a sizeable lump of metalworking slag. The finds are listed in Table 1.

The majority of finds were associated with 16th/17th-century pottery; besides iron nails and fittings, the group includes two probable and heavily corroded copper-alloy coins (sf <1> and <11>). An incomplete double-sided comb of ivory (sf <2>), while not associated with pottery, is a type characteristic of the 16th and 17th centuries (Margeson 1993, 66-68). The fragment of a lava quern stone in Phase 4a is almost certainly residual from Roman occupation, and this may be true also of the bone-working waste (sf <10>) from the same context. The copper-alloy bracelet (sf <6>), from the medieval Phase 2a, is certainly a residual Roman find (cf. Swift 2003, 27-28). In addition, the medieval Phase 2b is represented by a small group of distinct objects. They comprise a copper-alloy wheel (sf <7>, possibly part of a toy), an iron knife (sf <9>), a probable iron candleholder (sf <13>) and the bone tuning peg from a stringed musical instrument (sf <4>).

Context	SF No	Phase	Description	Recommendation
+		n/a	Iron strip; W 7mm	X-ray
4		4b	Slag; large lump of ?tap slag from metalworking	Further id.
5		4a	Iron nails; three incomplete	
5		4a	Lava quernstone; fragment only	
5	10	4a	Bone-working waste	
6	11	4a	Copper-alloy ?coin	X-ray/clean
8	1	4a	Copper-alloy ?coin	X-ray/clean
22	2	4b	Double-sided ivory comb; incomplete; l80mm	Draw
68	7	2b	Copper-alloy ?toy wheel; complete; six spikes and central perforation; diam.85mm	Further id; draw
68	8	2b	Iron nail; complete; L 80mm	
68	9	2b	Iron knife	X-ray
112		4a	Iron nail; complete; L 60mm	
112	12	4a	Flat iron mount or fitting; incomplete; c.40 x 65mm	X-ray
116	4	2b	Bone tuning peg; complete; squared end for turning with a wrench or key, and a narrow cylindrical shaft with a hole for the string; L 52mm	Draw
116	13	2b	Socketed iron object with spike at right-angle; L 80mm; possible cupped candleholder; now very fragile	X-ray; draw
146	6	2a	Copper-alloy cogwheel bracelet; residual late Roman	Further id; draw

Table 1: DOK05 metal and small finds

Recommendations

The metal and small finds add valuable information of the past inhabitants and activities on the site and, where relevant, should be included in any further publication. For this purpose, a range of metal objects should be x-rayed to facilitate identification and illustration; these are marked in Table 1. The three late medieval objects form a particularly significant group, where further parallels should be

sought for the small copper-alloy wheel. All three objects should be illustrated. Also the residual Roman bracelet requires further identification, and should be drawn for publication; additional Roman finds may be identified in the fragment of lava quern stone and possibly the piece of bone-working waste. The early modern ivory comb could also be illustrated, and for this period the two possible copper-alloy coins should be further identified. In addition, a specialist should investigate the lump of metalworking slag.

References

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APPENDIX 8: LITHICS

Barry Bishop

Introduction

A small quantity of burnt flint was recovered during the investigations at the above site. This report quantifies and describes the material, and recommends any further work required.

Quantification

Context	Burnt Flint (no.)	Burnt Flint (wt:g)
133	2	38.7

Table 1: Quantification of Burnt Flint by Context

Description

Both fragments consisted of flint, probably small water rounded pebbles, that had been burnt to the extent that they had become 'fire crazed', fragmented and changed to a grey-white colour. This would indicate that they had been subjected to a high temperature, probably from having been in a hearth or similar fire. Burnt flint, once removed from the ground, is undateable but its presence does indicate the use of fire, probably hearths, at the site. Its recovery from a medieval dump layer suggests that it may have been residually deposited and it therefore cannot comment on the date or location in which the burning occurred.

Recommendations

No further work is warranted for the material but its presence should be noted in any published accounts of the investigations.

APPENDIX 9: ANIMAL BONE ASSESSMENT

Kevin Rielly

Introduction

A small collection of medieval and post-medieval features provided a reasonable assemblage comprising 123 bones by hand collection and a further six by sieving (taken from three samples). The medieval component is relatively minor, while the later levels are more substantial, featuring in particular a large brick-lined tank and a pit containing cattle horn-cores. The latter bones were identified and measured during the processing stage, with information available for 20 horncores (see below). The bones from these deposits are all well preserved and only minimally fragmented. It can be assumed that this area was open ground during the medieval period up to its development in the 17/18th century, as shown by construction levels dating to this period at various nearby sites, as for example at 10-20 Dock Street and two sites in Prescott Street i.e. 43-61 (PSE98) and 41-63 (PCO06) (London Archaeologist Round-up 2006 and see Rielly 2006).

Methodology

The bone was recorded to species/taxonomic category where possible and to size class in the case of unidentifiable bones such as ribs, fragments of longbone shaft and the majority of vertebra fragments. Recording follows the established techniques whereby details of the element, species, bone portion, state of fusion, wear of the dentition, anatomical measurements and taphonomic including natural and anthropogenic modifications to the bone were registered. The cattle horncores, describe above, were recorded separately, noting the basal dimensions (they were all incomplete) as well as their age (following Armitage 1982).

Description of faunal assemblage by phase

Counts of bone fragments and the number of identified specimens are shown in Table 1. Note that this total does not include the 20 horncores from the post-medieval pit, as it is not clear whether this collection represents a sub sample and/or bones chosen for their relative completeness and measurability. The great majority of the bones were clearly taken from the post-medieval levels, these generally dating to the 17th century, although with some 18th century material. The smaller medieval collections appear to cover a large part of this period from the 13th century onwards, but with a clear concentration in the 14/15th centuries. Hand collection was augmented by a sampling programme, with two samples providing a very minor addition to the overall assemblage.

Phases 2a and 2b: medieval

Small collections of animal bones were collected from Phases 2a and 2b. The bones derived from Phase 2a dump levels, while the larger Phase 2b collection was taken from the fill of pit [148] and ditches [145] and [120]. Both phases feature a mixture of cattle, sheep and pig (including the cattle- and sheep-size fragments), with minor representations of chicken, horse, dog and small mammal (the latter comprising the sieved assemblage) in the later phase. The few cattle and sheep fragments all appear to be derived from old adult individuals i.e. in excess of 3 to 3.5yrs of age. 2 of the cattle bones, a distal femur (2b) and a distal tibia (2a), both show butchery marks which can be interpreted as jointing cuts. The single items of horse and chicken are represented by a radius from an adult bird and a humerus shaft fragment respectively.

Species/Animal size class	2a	2b	3	4a	4b
Cattle (<i>Bos taurus</i>)		5	4	10	15
Horse (<i>Equus caballus</i>)	1				
Cattle-size	1	3		12	7
Sheep/Goat (<i>Ovis aries</i> / <i>Capra hircus</i>)	1	1	1	5	12
Sheep (<i>Ovis aries</i>)				1	1
Pig (<i>Sus scrofa</i>)	1	1	1		2(2)
Sheep-size	2			6	5
Dog (<i>Canis familiaris</i>)	-1			1	3
Cat (<i>Felis sp</i>)				1	4
Small mammal	-1				1(2)
Chicken (<i>Gallus gallus</i>)		1			
Grand Total	8(2)	11	6	37	49 (4)

Table 1: Counts of animal bone in each occupation phase including hand collected and sieved bones (in brackets).

Phase 3: 15-16th century

6 bones were taken from the fill of a posthole [111] largely composed of a selection of cattle bones from one or more adult individuals.

Phase 4a and 4b: 17th – 18th century

Almost all the bones from Phase 4a were derived from the construction fill of the small brick basement [13] (28 bones). These collections are mainly composed of cattle and sheep/goat, with minor representations of pig and small mammal (dog and cat). Cattle and sheep are represented by a mixture of skeletal parts, signifying the presence of food, as well as processing waste. There appears to be a difference in the general age of the two major domesticates. The single dog bone from Phase 4a was a complete humerus with a greatest length of 108.7mm and a shoulder height (following Harcourt 1974) of 346.3mm.

The greater part of the Phase 4b bone assemblage was taken from the large brick-lined tank [2] with 45 bones (including 4 from the sample), which, similar to the previously described basement (Phase 4a) was also taken from the construction fill. The remainder of the collection, just 7 bones, was derived from drain [10], timber-lined pit [32] and ditch [49]. Otherwise, there are the 20 horncores from pit [27]. These collections are very similar to those described above.

Essentially within the Phase 4b assemblage, cattle is represented by a majority of juvenile and young adult individuals, and sheep by young to old adults (see table 2). This would suggest a meat preference/availability of calves (probably veal calves) and prime beef, with sheep represented mainly by mutton and older individuals, all providing at least a few clips of wool.

	Juvenile <6mo-1yr	Subadult or older >1yr	Subadult 1-2yrs	Adult >2yrs	Young adult 2-3yrs	Old adult >3yrs
Cattle	5	0	0	0	3	
Sheep	0	3	1	2	1	3

Table 2. Age distribution of cattle and sheep, using epiphysis fusion (ages following Schmid 1972, 75).

Two out of the three dog bones are of some interest, including an unfused proximal tibia from a large animal, probably Alsatian-sized plus the anterior half of a skull showing a defined stop (a marked downward curve between the brow and the snout), a characteristic of certain breeds of terrier (Foulsham 2001, 42 and 48).

The cattle horncore collection from pit [27] appears to have derived from the primary fill of this feature most probably representing a dump of industrial waste. None of the horncores collected were complete and judging by their basal dimensions, they all appear to be in the Medium and Large-horn categories as devised by Armitage (1982). The latter type may well represent unimproved longhorns which are commonly found amongst late 17th and 18th century London horncore collections (see West 1995).

Conclusion and recommendations for further work

Very little information can be gleaned from the Phase 2a/2b assemblage, other than the fact that meat usage was largely restricted to adult cattle and sheep. The representation of other species is rather sparse, both in this and the later phase collections, even with the availability of sieved bone assemblages. It does seem unlikely that the local population was averse to poultry and fish, especially considering the wealth of such bones at contemporary sites elsewhere in the medieval and early post-medieval city, as for example from the slightly earlier levels (15/16th century) at Prescott Street (Rielly 2006).

The more substantial post-medieval assemblage is clearly from well-dated deposits, with moderate collections dating to the 17th and 18th centuries. There is again a dominance of cattle and sheep, and

unlike the previous phase, cattle are clearly represented by calves and prime beef animals. Veal was certainly more popular in London from the late medieval period, coinciding with an increase in dairy production (Albarella 1997, 22) but the juxtaposition with young adults may be significant. While the quantities are too small to warrant any definitive conclusions, the presence of such high quality meats could point to waste from a high status community. In contrast the sheep are likely to represent animals from wool flocks, the general exploitation pattern during this period concerned with the production of both wool and mutton, with a cull taking place at about 3 years of age (Armitage 1984, 140).

Finally, the concentration of cattle horncores can be interpreted as a dump of industrial waste. They most probably represent hornworking waste, derived from one or more of the hornworking establishments based at this time in the Whitechapel area and especially along Petticoat Lane (Yeomans 2004, 79). Several pits lined with cattle horncores have been found in this eastern area, with substantial collections for example recovered from The Royal Navy Victualling Yard site opposite Tower Hill (West 1995). The quantity of horncores from this pit is rather small and any further work on these cores would add very little to that already carried out on more substantial collections recovered in this area.

It is recommended that these conclusions be further researched and possibly revised following the completion of the stratigraphic and dating analyses.

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APPENDIX 10: ENVIRONMENTAL ASSESSMENT

David Hodson

The Bioarchaeological remains from the samples taken at 15 Dock Street, Tower Hamlets are summarised in Table 1. These remains were retrieved by flotation of 19, 9 and 19 litres respectively of the samples, whilst 1 litre from each was retained as a sub-sample for any further investigation that may be required.

Although significant remains of coal/coke and charred wood were present in sample <1>, there was no charred animal bone. All the animal bone present was either pulverised or from very small animals. No fish bone was present in any sample and only one (sample <1>) produced any oyster remains (2 fragmentary pieces).

No seed or snail remains were present in any sample.

Small finds from the samples, consisting of small amounts of diagnostic CBM, pottery sherds, metal finds and glass, processed and stored. The gravels in sample <1> indicated possible inclusion in hardcore and a large piece of glass slag was also present in the sample. The majority of CBM retrieved came from sample <1> (context [59]), the only pottery retrieved came from sample <3> (context [146]).

Sample	Context	Volume processed (litres)	Charred wood	Bone	Oyster	Coal/coke
<1>	-59	19*	4	1	1	4
<2>	-129	9*	-	1	-	-
<3>	-146	19*	1	1	-	-

Table 1: Bioarchaeological remains (* = 1 ltr sub-sample retained)

APPENDIX 11: OASIS FORM

OASIS ID: preconst1-45195

Project details

Project name	Assessment of Archaeological Investigations at 15 Dock Street, London Borough of Tower Hamlets, E1
	The archaeological investigations at 15 Dock Street have demonstrated the presence of a stratified archaeological sequence potentially dating to the Roman, medieval and post-medieval periods. Of particular note are the sizable quantities of Roman material, which even if reduced, strongly hint at the presence of Roman activity at any time, probably potentially emanating at 15m below the pre-determined project level. In addition, whilst it is unclear whether the lower dumping sequence recorded on site is Roman or medieval in date, there is no doubt that the upper parts represent medieval ground reclamation and usage, particularly of the south of the site, potentially indicating a focus of medieval activity in the sites southern vicinity. In many ways the main body of archaeological material gleaned from the excavations pertains to the sites development throughout the 17 th century after an apparent hiatus during the 16 th century, initial development prior to the Great Fire of London in 1666 appears to have been typified as low-level site usage, however, in the later part of the century, into the 1700's the sites concentrated development and usage as a glass factory adjacent to the western frontage of Dock Street is strikingly apparent.
Project dates	Start: 22-08-2005 End: 28-11-2005
Previous/future work	No / No
Any associated project reference codes	DOK05 - Sitecode
Type of project	Recording project
Site status	Local Authority Designated Archaeological Area
Current Land use	Industry and Commerce 2 - Offices
Monument type	PITS Medieval
Monument type	DITCHES Medieval
Monument type	PITS Post Medieval
Monument type	MASONRY Post Medieval
Significant Finds	POTTERY Roman
Significant Finds	BRACELET Roman
Significant Finds	POTTERY Medieval
Significant Finds	TOY WHEEL Medieval
Significant Finds	IRON KNIFE Medieval
Significant Finds	POTTERY Post Medieval
Significant Finds	BONE COMB Post Medieval
Investigation type	'Open-area excavation', 'Watching Brief'
Prompt	Direction from Local Planning Authority - PPG16
Project location	
Country	England
Site location	GREATER LONDON TOWER HAMLETS TOWER HAMLETS 15 Dock Street, London Borough of Tower Hamlets, E1
Study area	390.00 Square metres
Site coordinates	TQ 3418 8072 51.5089571758 -0.06627715816540 51 30 32 N 000 03 58 W Point
Height OD	Min: 6.63m Max: 6.63m
Project creators	

Name of Organisation	Pre-Construct Archaeology Ltd
Project brief originator	Pre-Construct Archaeology Ltd
Project design originator	Peter Moore
Project director/manager	Peter Moore
Project supervisor	Shane Maher
Type of sponsor/funding body	Sterling Partners
Project bibliography 1	
Publication type	Grey literature (unpublished document/manuscript)
Title	Assessment of Archaeological Investigations at 15 Dock Street, London Borough of Tower Hamlets, E1
Author(s)/Editor(s)	Taylor, J
Date	2008
Issuer or publisher	Pre-Construct Archaeology
Place of issue or publication	London