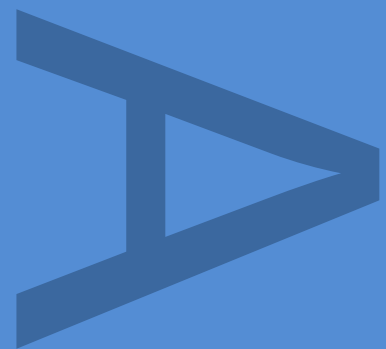


AN ARCHAEOLOGICAL EVALUATION AT
THE EXCHANGE BRIDGE CAR PARK,
GREENGATE/CHAPEL STREET, SALFORD,
GREATER MANCHESTER

MARCH 2014






PRE-CONSTRUCT ARCHAEOLOGY

DOCUMENT VERIFICATION

**THE EXCHANGE BRIDGE CAR PARK,
GREENGATE/CHAPEL STREET, SALFORD, GREATER MANCHESTER**

EVALUATION REPORT

Pre-Construct Archaeology Limited Quality Control	
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**An Archaeological Evaluation at the Exchange Bridge Car Park,
Greengate/Chapel Street, Salford, Greater Manchester**

Central National Grid Reference: SJ 835 988

Site Code: GSM 14

Local Planning Authority: Salford City Council

Planning Application Number: 11/60256/HYB

Commissioned (on behalf of ASK Property Developments and Network Rail) by:

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March 2014**

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1. NON-TECHNICAL SUMMARY

- 1.1 An archaeological trial trenching evaluation was undertaken 27 January–21 February 2014 by Pre-Construct Archaeology at the Exchange Bridge Car Park, Greengate/Chapel Street, Salford, Greater Manchester. The work was carried out as a condition of planning permission for a development scheme, known as 'Greengate Embankment', of the site of the former Exchange Railway Station and was commissioned by Carillion Construction Services, on behalf of joint venture developers, ASK Property Developments and Network Rail Infrastructure. The trial trenching was just one component of a programme of archaeological work being undertaken in association with the scheme.
- 1.2 The site, central National Grid Reference SJ 835 988, covers 6,825m². It lies entirely within the area administered by Salford City Council and comprises land bounded by the River Irwell, Chapel Street, Greengate and the former Liverpool to Manchester railway line. Although situated within Salford, the location of the site immediately adjacent to the River Irwell means that it lies in very close proximity to the retail and business core of central Manchester and directly opposite, across the Irwell to the south-east, Manchester Cathedral.
- 1.3 The site was formerly the Exchange Railway Station, which was largely demolished in 1969, and comprises a brick viaduct which carries the railway lines and former station well above street level. The site currently incorporates car-parking facilities on two levels. The outdoor upper podium level is reached via Cathedral Approach from the south or Salford Approach from the west. Beneath the majority of the podium level is a street level car park - the Exchange Bridge Car Park - which occupies the arches of the railway viaduct, accessed via Chapel Street. A small area at the south-western corner of the street level portion of the site is currently used for storage. A number of small former business premises occupy the street frontage portions of the arches along Chapel Street.
- 1.4 The site lies partially within the Cathedral Conservation Area and within the setting of the Flat Iron Conservation Area. The railway viaduct and retaining walls at the junction of Greengate and Chapel Street are listed Grade II.
- 1.5 The archaeological and historical background of the site has been examined through a number of desk-based studies, one of which (in 2008) incorporated the results of an archaeological watching brief undertaken in association with geotechnical site investigations. Desk-based research has established that the site was developed from the late-medieval period onwards, lying as it does within the historic core of Salford. The early arrangement of streets in the area included Greengate and Chapel Street, which are shown as having unbroken street frontage structures on mapping from the mid-17th century. The site was considered the site to have a high potential for the presence of late-medieval and post-medieval archaeological remains, including structures, features and deposits relating to industrial and domestic activity. The Exchange Station, including the arches of the viaduct within which the Exchange Bridge Car Park is located, was built by the London and North Western Railway in the early 1880s.

- 1.6 A programme of archaeological work is being undertaken as part of the planning condition, on the recommendation of the Greater Manchester Archaeological Advisory Service, the body which advises the City of Salford on the historic environment and the effect of development upon it. In the first place, the condition requires historic building recording of structures which will be affected by the scheme, including some associated documentary research, with the results of this work to be disseminated in a separate report, and potentially followed by fieldwork to investigate remains at the site pertaining to the railway and the Exchange Station. Secondly, archaeological evaluation is required at street level, within the Exchange Bridge Car Park, to determine the presence or absence of earlier pre-railway archaeological remains, with the results of this work set out in this report.
- 1.7 The aims of and methods to be employed during the archaeological evaluation were set out in a Written Scheme of Investigation compiled in 2012 by Pre-Construct Archaeology and approved by the Greater Manchester Archaeological Advisory Service. The work comprised the excavation of fourteen trial trenches (Trenches 1–6, 7a, 7b, 8, 9, 10a, 10b, 11 and 12) within the viaduct arches. In broad terms, the trial trenching component of the overall programme of archaeological work aimed to establish the archaeological potential of the site. For the most part, the trenches targeted the locations of specific structures depicted on 19th-century and earlier mapping in an attempt to determine the presence or absence of evidence of site occupation prior to the construction of the Exchange Station.
- 1.8 Trenches 1 and 2 were sited to test for archaeological remains of a brewery, shown on a 1794 map, and a cotton Mill, shown on the 1849 Ordnance Survey map, in the north-easternmost part of the site, towards the Irwell. A wall recorded at a depth of 0.70m below present ground level in Trench 2 may represent an 18th-century structure. Separate components of what was probably the same brick culvert were recorded in Trenches 1 and 2; this would have been a substantial underground structure, c. 5m wide, and it may have been associated with water power and supply for the brewery and/or the cotton mill. Its uppermost surviving part was encountered at depths of 0.80m and 0.70m below present ground level in Trenches 1 and 2, respectively.
- 1.9 Trench 3 was sited to test for archaeological evidence of occupation of the Greengate frontage in the north-westernmost part of the site. A possible infilled cellar was recorded, while an earlier brick wall, lying on a slightly different alignment, possibly represents an 18th-century structure; the wall was encountered at a depth of 0.50m below present ground level.
- 1.10 Parts of two brick cellars were recorded in Trench 4, these interpreted as components of back-to-back ‘workers’ housing’ shown on the 1849 Ordnance Survey map along Barrow’s Court and Nuttall’s Court, which the trench was sited to investigate. Where it was possible to expose the floor of one cellar, this demonstrated that the surface survived *in situ*. A cobbled surface leading to the cellar stairs also survived. Another cobbled surface at the north-western extent of the trench, at a depth of 0.30m below present ground level, may represent the external surface of Barrow’s Court. Artefactual and ecofactual material recovered from the cellar backfills is important for understanding the material culture of elements of low socio-economic sectors of 19th-century society in Salford. The uppermost surviving parts of the cellars were encountered at depths of 0.60m below present ground level.

- 1.11 Trench 5 was also sited to investigate Greengate frontage properties and the workers' housing on Nuttall's Court, as shown on the 1849 Ordnance Survey map. A brick cellar occupied a large part of the trench; the NE-SW aligned wall of this structure probably represents the rear wall of a frontage building of 18th- or 19th-century date. The uppermost surviving part of the wall was encountered at a depth of 0.50m below present ground level.
- 1.12 Trench 6 was located to the rear of the Greengate frontage to investigate a dye works and part of a street frontage premises, the Polytechnic Tavern, as shown on the 1849 Ordnance Survey map. A stone-lined well recorded in the trench may be of late medieval or early post-medieval date; it presumably lay within the backlot of a street frontage property. The well was truncated by a brick cellar of probable 19th-century date, which was only partially exposed as it was overlain by an extensive brick surface, possibly associated with the dye works. The remains in this trench were encountered at a highest level of 0.60m below the present ground surface.
- 1.13 No archaeological remains of note were recorded in Trenches 7a, 7b, 8 or 9, all sited in the south-westernmost part of the site, to investigate occupation of another part of the Greengate frontage. Two drains, probably associated with the construction of the viaduct in the 1880s, were recorded, to a depth of 1.20m below present ground level. Other drainage features in Trenches 8 and 9 were also likely associated with railway era use of the site.
- 1.14 Trenches 10a and 10b were sited to investigate buildings of a complex named as a 'Cloth Hall' on the 1794 map. Demolition material was recorded, but no significant archaeological remains.
- 1.15 Trench 11 was located in the easternmost part of the site, close to the Irwell, which the 1849 Ordnance Survey map depicts as an open area, named as a 'Horse and Carriage Bazaar'. A substantial sequence of levelling deposits was recorded, this material presumably deposited to build-up and level what would have been, until canalisation of the Irwell, marginal land. The investigations supported the cartographic evidence, with the only structural remains recorded comprising a brick and sandstone drain, of 18th- or 19th-century date, at a depth of 0.80m below present ground level.
- 1.16 Trench 12 was sited to test for archaeological remains of the former brewery and cotton mill, in the northern central part of the site. Two brick and sandstone drains were recorded, at a highest level of 0.70m below present ground level, these potentially pre-dating the brewery, but equally possibly associated with either that premises or the subsequent cotton mill.

2. INTRODUCTION

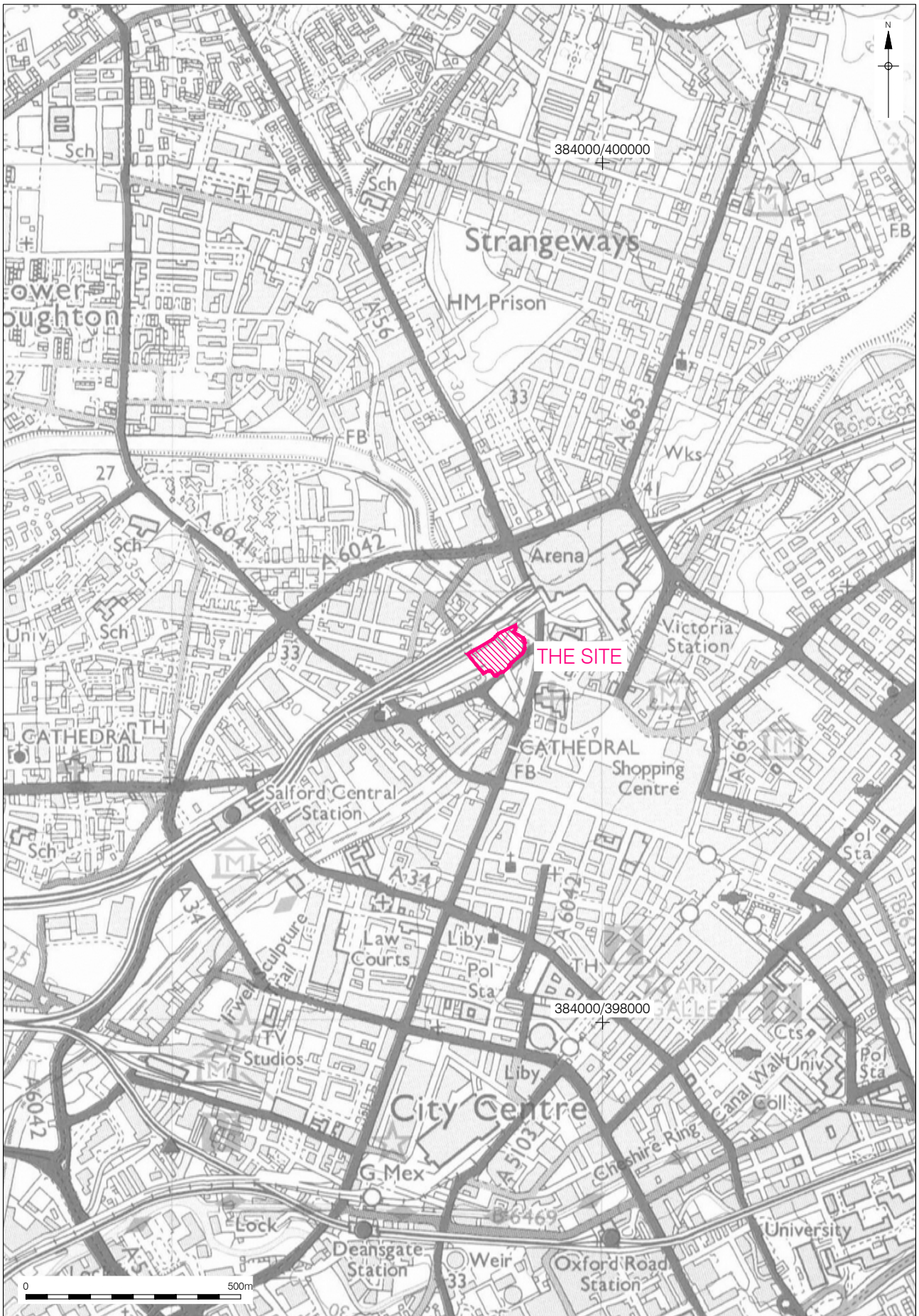
2.1 General Background

- 2.1.1 This report details the methodology and results of an archaeological trial trenching evaluation undertaken by Pre-Construct Archaeology (PCA) 27 January–21 February 2014 at the Exchange Bridge Car Park, Greengate/Chapel Street, Salford, Greater Manchester (Figure 1). The work was commissioned by Carillion Construction Services, on behalf of joint venture developers, ASK Property Developments and Network Rail Infrastructure.
- 2.1.2 The majority of the site subject to the archaeological evaluation comprises a street level car park, accessed from Chapel Street, located within the arches of the railway viaduct upon which the Exchange Railway Station was built by the London and North Western Railway in the early 1880s. Above is an outdoor, upper podium level car park accessed via Cathedral Approach from the south or Salford Approach from the west. A small area at the south-western corner of the street level portion of the site is currently storage space within the viaduct arches, accessed from Greengate.
- 2.1.3 Although situated within Salford, the location of the site immediately adjacent to the River Irwell means that it lies in very close proximity to the retail and business core of central Manchester and directly opposite, across the Irwell to the south-east, Manchester Cathedral. As such, the site lies partially within Manchester's Cathedral Conservation Area and it also lies within the setting of Salford's Flat Iron Conservation Area. The railway viaduct and retaining walls at the junction of Greengate and Chapel Street are listed Grade II.
- 2.1.4 The evaluation was undertaken as a condition of planning permission for a development scheme, known as 'Greengate Embankment', of the site of the former Exchange Railway Station. The development proposals will see the creation of a new business district, 'The Exchange at Greengate Embankment', new mixed-use retail opportunities within the viaduct arches, some residential developments, a new pedestrian bridge across the River Irwell and landscaped public realm spaces.
- 2.1.5 A number of desk-based studies have previously assessed the historic environment of the site and determined its archaeological potential (those of particular relevance being: PCA 2006 and 2011; Archaeo-Environment 2008). Collectively, this work established that the site was developed from the late medieval period onwards, as part of the historic core of Salford, adjacent to the River Irwell. Therefore, despite lying below the superstructure of the former Exchange Station, the site was considered have high potential for the presence of late medieval and post-medieval archaeological remains.
- 2.1.6 The evaluation was just one component of a wider programme of archaeological work being undertaken in association with the scheme, as required by the Greater Manchester Archaeological Advisory Service (GMAAS), and secured by the aforementioned planning condition. Historic building recording of structures which will be affected by the scheme will be undertaken, including some associated documentary research, with that element of the work to be reported on in a separate document, and potentially followed by fieldwork to investigate remains at the site pertaining to the railway and the Exchange Station.

- 2.1.7 The overarching aim of the trial trenching evaluation was to determine the presence or absence of earlier, pre-railway below ground archaeological remains in the street level Exchange Bridge Car Park. The evaluation comprised fourteen machine-excavated trial trenches, located for the most part to target buildings known to have stood on the site prior to the construction of the Exchange Station, as seen from historic mapping. A written scheme of investigation (WSI) (PCA 2012) for the overall programme of work, including the evaluation, was approved in 2012 by the GMAAS. The WSI was the document stipulated within the planning condition to detail the methodologies by which the initial required elements of work were to be conducted.
- 2.1.8 The Site Archive (Site Code: GSM 14) is currently held at the Northern Office of PCA and the retained element, comprising the written, drawn and photographic records, as well as the assemblage of artefactual material, will be deposited with the Manchester Museum of Science and Industry. The Online Access to the Index of Archaeological Investigations (OASIS) reference number for the project is: preconst1-173208.

2.2 Site Location and Description

- 2.2.1 The overall Greengate Embankment development site is an irregular shaped plot, covering a total area of 6,825m² and with central NGR SJ 835 988 (Figure 1). It is part of a developed area within an eastern bow in the River Irwell, which forms the boundary between the administratively distinct cities of Salford and Manchester and the site, therefore, lies within Salford. It is bounded to the east by the Irwell, to the south and west by Chapel Street and Greengate, respectively, and to the north by the former Liverpool to Manchester railway line.
- 2.2.2 The major structural feature at the overall development site is the SW-NE aligned 19th-century railway viaduct, carried upon massive brick piers and the presence of which creates the split-level form of the site. The Exchange Railway Station occupied the upper level and its very limited surviving remains are today situated approximately 6m above street level.
- 2.2.3 For the most part, the site currently comprises car parking facilities on two levels. The upper, podium level is reached from Cathedral Approach from the south or Salford Approach from the west, and comprises outdoor car parking on hard surfaces. Beneath the majority of the podium level is the street level portion of the site, occupying the brick arches of the viaduct (Figure 2). The majority of this part of the site is occupied by the Exchange Bridge Car Park, accessed from Chapel Street, while a small area at the south-western corner of the site is currently a storage space, still within the viaduct arches on the north-eastern corner of the junction of Greengate and Chapel Street and accessed from Greengate. A number of former small business premises occupy the street frontage portions of some of the arches along Chapel Street.
- 2.2.4 The area subject to the archaeological evaluation herein described comprises only the street level portion of the overall site, namely the Exchange Bridge Car Park and the adjacent storage space at the south-western corner of the site, on the corner of Greengate and Chapel Street.



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Figure 1
 Site Location
 1:12,500 at A4



Basement plan reproduced from drawings supplied by the client (August 2006)
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Figure 2
 Trench Location
 1:1,000 at A4

2.3 Geology and Topography

- 2.3.1 The area of the site is underlain by Triassic sandstone bedrock of the Chester Pebble Beds Formation, while a variety of superficial deposits have been recorded in the vicinity of this part of the River Irwell. The deposition of sand and gravel detrital material by riverine activity formed river terraces, with fine silt and clay from overbank flooding forming floodplain alluvium; Devensian Till of glacial (Quaternary) origin has also been recorded in the area (British Geological Survey website).
- 2.3.2 The watching brief on geotechnical site investigations in 2008 recorded orange grey sandy clay at depths generally not exceeding 1.0m below ground level (Archaeo-Environment 2008, 96). This could have been river terrace material of alluvial origin or could also represent the glacial Till deposits of the area.
- 2.3.3 The major topographic feature in the vicinity of the site is the River Irwell and the site lies at the eastern tip of the aforementioned bow in the river, this being the area which saw the development of the historic core of Salford. In the wider area, the river meanders from beyond Ramsbottom, to the north of Greater Manchester, through Bury, then bisects Salford and Manchester, joining the rivers Irk and Medlock in the process, before becoming the Manchester Ship Canal at Salford Quays.

2.4 Planning Background

- 2.4.1 The archaeological evaluation was carried out as a condition of planning permission granted by the Local Planning Authority (LPA), Salford City Council, for the Greengate Embankment regeneration scheme. The joint venture developers are ASK Property Developments Limited and Network Rail Infrastructure Limited.
- 2.4.2 Planning permission (App. No. 11/60256/HYB) and Listed Building Consent (11/60257/LBC) were granted in September 2011 for the scheme, described as 'partial demolition of viaduct structure', construction of 'a 10-storey class B1 office building (Building 101)', 'a 9-storey class B1 office building (Building 100)' and 'a 448 space car park together with class A1, A2, A3, A4 and B1 retail/commercial units.'
- 2.4.3 The proposal includes the removal of all the brick-built internal viaduct structure, the bridge over Greengate and a footbridge over the former railway lines. The retaining walls of the viaduct structure along Greengate and Chapel Street will be retained and the parapet of the bridge over Greengate will be repositioned to the north. In addition, Listed Building Consent (App. No. 12/61737/LBC) has been granted for partial demolition of the Cab Road Bridge, involving removal of an 1884 extension to the original 1844 Stephenson Bridge.
- 2.4.4 The GMAAS provides development control in relation to the historic environment throughout Greater Manchester. The archaeological potential of the site, in terms of below ground archaeological remains, was established by the aforementioned desk-based studies. The planning condition was attached on the recommendation of the GMAAS.

2.4.5 In full, the planning condition (no. 23) stated:

No development shall take place until the applicant or their agents or their successors in title have secured the implementation of a programme of archaeological works to be undertaken in accordance with a Written Scheme of Investigation (WSI). The WSI should be submitted to and approved in writing by the local planning authority. The WSI shall cover the following:

1. A phased programme of archaeological work to include:

- a level 3 historic building survey of railway structures and features affected by the scheme*
- an evaluation of below ground archaeological remains*
- (where merited by the evaluation) targeted open area excavation*

2. A programme for post investigation assessment to include:

- analysis of the site investigation records and finds*
- production of a final report on the significance of the heritage interests represented.*

3. Provision for publication and dissemination of the analysis and report on the site investigation.

4. A scheme for preserving the heritage of Exchange Railway Station and associated historic features and structures.

5. Provision for archive deposition of the report, finds and records of the site investigation.

6. Nomination of a competent person or persons/organisation to undertake the works set out within the approved WSI.

In accordance with PPS5 Policy HE12, to record and advance the understanding of the significance of any buried archaeological remains for archival and research purposes.

2.4.6 In April 2012, PCA was appointed by ASK Property Developments to prepare the required WSI for the overall programme of archaeological work and, following liaison with the GMAAS, the document was approved in August 2012 by the Heritage Management Director of the GMAAS.

2.4.7 The requirement to undertake the archaeological evaluation is in line with planning policy at both a national and local level. PPS5 (*Planning Policy Statement 5: 'Planning for the Historic Environment'* (DCLG 2010)) as mentioned in the planning condition, was replaced in March 2012 by the *National Planning Policy Framework* (NPPF) (DCLG 2012) to provide updated guidance for LPAs, property owners, developers and others on the conservation and investigation of the historic environment. Heritage assets - those parts of the historic environment that have significance because of their historic, archaeological, architectural or artistic interest - remain a key concept of the NPPF, retained from PPS5. Despite the deletion of PPS5, the *PPS5: Planning for the Historic Environment - Practice Guide* (English Heritage, DCMS and DCLG (revised) 2012), remains a valid, UK Government-endorsed, document.

2.4.8 Chapter 12 of the NPPF 'Conserving and enhancing the historic environment' describes, in paragraph 126, how LPAs should '*...set out in their Local Plan a positive strategy for the conservation and enjoyment of the historic environment*' and details, in paragraph 128, that '*In determining applications, LPAs should require an applicant to describe the significance of any heritage assets affected, including any contribution made by their setting. The level of detail should be proportionate to the assets' importance and no more than is sufficient to understand the potential impact of the proposal on their significance. As a minimum, the relevant [Historic Environment Record] HER should have been consulted and the heritage assets assessed using appropriate expertise where necessary. Where a site on which development is proposed includes or has the potential to include heritage assets with archaeological interest, LPAs should require developers to submit an appropriate desk-based assessment and where necessary [the results of] a field evaluation*'.

2.4.9 While Salford City Council continues to prepare its Local Plan, planning applications are considered in the context of the NPPF and the existing Development Plan (including regional Strategy and saved Unitary Development Plan (UDP) policies), as well as other material planning considerations. Within the *City of Salford UDP 2004-2016 Saved Policies* (City of Salford website) are several policies relating to the city's heritage. Of particular relevance to the trial trenching evaluation, rather than the overall programme of required archaeological work, is 'Policy CH 5. Archaeology and Ancient Monuments', which states that

Planning permission will not be granted for development that would have an unacceptable impact on an ancient monument, or site or feature of archaeological importance, or its setting.

Where planning permission is granted for development that will affect known or suspected remains of local archaeological value, planning conditions will be imposed to secure the recording and evaluation of the remains and, if appropriate, their excavation and preservation and/or removal, prior to the commencement of the development.

2.5 Archaeological and Historical Background

2.5.1 The archaeological potential of the site was established by the aforementioned raft of desk-based research. Of the three most relevant studies, the first was an archaeological desk-based assessment (DBA) undertaken in 2006, ahead of what was a more extensive development scheme (PCA 2006). Another DBA followed in 2008, again for a wider development scheme, including land to the south-west of the current site (Archaeo-Environment 2008). Finally, a DBA was prepared in 2011 to accompany the planning application for the current development of the site as 'Greengate Embankment' (PCA 2011). These studies should be consulted for full details, including Historic Environment Record (HER) entries, bibliographic references and illustrated map regression. The summary below highlights key site-specific aspects only; the research and writing of those responsible for the previous reports is gratefully acknowledged. Additional sources have provided further information regarding site use.

2.5.2 The HER search undertaken for the 2011 desk-based assessment revealed an absence of both prehistoric and Roman find spots within the 100m search radius and it was concluded that archaeological remains of those periods should not be anticipated on site.

- 2.5.3 While the site lies within the medieval core of Salford, no medieval deposits had been previously encountered at the site and it was thought probable that any such remains may have been truncated by later post-medieval activity, particularly the construction of the Exchange Station and associated railway viaduct in the 1880s.
- 2.5.4 The site became developed from the late medieval period onwards, forming part of the historic core of Salford, which is generally thought of as the triangular area lying within a bend in the River Irwell and formed by Chapel Street, Greengate and Gravel Lane, or at least earlier versions of these thoroughfares. Mapping of the area from the mid-17th century depicts the streets which became Chapel Street and Greengate with unbroken street frontage structures (e.g. PCA 2011, figure 5).
- 2.5.5 Based upon the sustained structural development of the frontages of both Chapel Street and Greengate, and the usage of the external areas, from the late medieval period onwards, the site was considered to have a high potential for the presence of late medieval and post-medieval remains, including structures, features and deposits relating to domestic, trade and industrial activity.
- 2.5.6 Documentary material - including historic mapping - examined as part of the previous desk-based studies have allowed some detailed insights into activity at and occupation of the site between the 17th/18th centuries and its development as the Exchange Station in the 1880s. Green's map of c. 1794 (PCA 2011, figure 6) depicts 'New Cloth Hall', probably a purpose-built cloth hall, adjacent to the south-central site boundary. An irregular courtyard is illustrated, built-up on three sides and centred on a rectangular hall. This would have been an important commercial operation and its presence reflects the fact that, prior to the expansion of cotton manufacturing in Manchester, Salford was historically the regional centre for the distribution of older forms of textile, mainly woollen goods and linen, which were produced by local mills and innumerable domestic weavers. The same map shows another courtyard complex to the south-west, connecting with the Greengate frontage, and this structure, possibly an earlier cloth market venue, was probably the same building depicted on earlier maps, for example a map dated c. 1650 and Casson and Berry's map of 1741 (PCA 2011, Figures 5 and 6). The 17th-century map names Chapel Street as 'Sergeant Street, while the 1741 map names Greengate as 'Back-Salford'.
- 2.5.7 In the north-easternmost part of the site, Green's map names a 'Brewery' run by Messrs. Barnes and Hardman, which is known to have been the first of the larger breweries in Salford. A long rectangular building aligned SW-NE is depicted, with a large roughly triangular garden on its eastern side, overlooking an area of what was evidently marginal land, on the bank of the Irwell. The riverside setting would have been particularly suitable for the location of a brewery as water power would have greatly facilitated several of the key processes required for beer production on an industrial scale. A small detached building on the riverfront, to the north-east of the main building, may have been associated with water power for the brewery. A plan of Manchester and Salford produced by Bancks and Co. in 1831 (PCA 2011, Figure 9) shows the brewery in developed form, extended along its south-eastern side and at its northern end, towards the river, this possibly a yard. The garden alongside the building is not depicted on this plan, which indicates that, by this date, the land within the north-easternmost portion of the site had been reclaimed from the river, although it evidently remained undeveloped.

- 2.5.8 The Ordnance Survey 1st edition map of 1849 (1:500 scale) (PCA 2011, figure 10) depicts a significant change from the 1831 map, with the SW-NE aligned London and North Western Railway line running to the immediate north of the site, crossing the Irwell and entering Victoria Station in Manchester. Comparison of Green's map of 1794 with the Ordnance Survey 1st edition map indicates that the Irwell had been further canalised to make the channel navigable up to, and beyond, Victoria Bridge. Improved access along this stretch of the river, in addition to the construction of the railway, were instrumental in facilitating the industrial development of this part of Salford.
- 2.5.9 Within the site, the layout of the buildings and other areas are depicted in detail. By this date, the brewery occupying the northern end of the site had become Greengate Mill, a large cotton manufactory overlooking the Irwell. The form of the structure as depicted on the map suggests that it may have used the existing brewery buildings, probably with some modifications. The small structure on the riverfront to the north-east is shown in developed form and was still presumably associated with power generation. A directory of 1841 names the mill as being under the ownership of the Langworthy Brothers. Flanking the mill along its eastern side was an open 'Timber Yard', while to the south of this and the mill, was an extensive open area overlooking the river, named as a 'Horse and Carriage Bazaar', with some of the adjacent buildings, to the rear of the Greengate frontage, presumably involved with this concern providing, for example, stabling and fodder storage. A directory and street register of 1850 names John Broughton as the proprietor of a 'horse repository' in Cooke's Court, Greengate.
- 2.5.10 The 1849 map shows the Greengate frontage at the site fully developed, with three alleys from the street leading to rear areas, named as 'Barrow's Court', 'Nutt's [*sic*] Court' (the 1850 directory and street register indicates this was an abbreviation of 'Nuttall's') and 'Jackson's Square'. These dark, narrow passageways were associated with back-to-back 'workers housing', constructed following clearance of medieval or early post-medieval buildings, and such structures are particularly in evidence on the map along the first two named 'courts'. Such dwellings were a feature of the wider area, required to cater for the rapidly growing population as more industry arrived. Some of these houses were cellared, with subterranean spaces often utilised as dwellings. Immediately to the north of the site, adjacent to the railway line, was 'Miller's Lane', which linked the cotton mill to Greengate.
- 2.5.11 Along the Greengate frontage of the site, only one business premises is named on the 1849 map, this being 'The Polytechnic Tavern'. Thought to have been the only purpose-built music hall to be erected in Salford, The Polytechnic is documented as having been a white stone building, described when in use as an 'elegant music saloon'. The building was equipped with stage, scenery and an orchestra with capacity for approximately 1,500 people. The 1850 directory and street register names Thomas Towers as the proprietor of the tavern, its address given as 18 Greengate. It is known to have closed in 1880 when the Exchange Station was built. The Polytechnic is thought to have been built on the site of an earlier inn, 'The Angel', which was first recorded as an alehouse in 1792, kept by Edward Tomlinson. In 1816 the inn was licensed to Thomas and Mary Butler and known as 'The Plumber's Arms', then from 1822 'The Jolly Potters' and in 1830 'The Traveller's Inn', kept by Joseph Lord. Another inn, The Railway Tavern, probably stood on the site, at the corner of Greengate and Chapel Street, from the 1830s. However, no such establishment is named on the site on the 1849 map or in the 1850 directory and street register.

- 2.5.12 The only other business premises named on the 1849 map was a 'Dye Works' situated in the concentration of buildings to the rear of the frontage, south-east of The Polytechnic; the works may have been associated with the cotton mill in the north-eastern part of the site. The 1850 directory and street register lists Richard Wright, a 'dyer', at 14 Greengate and this may have been the premises depicted on the map. Archaeological evidence, in the form of stone-lined vats, machine bases, water channels, wheel pits and furnaces, has been recorded at the sites of other dye works across Greater Manchester.
- 2.5.13 As a result of congestion at Victoria Station, Exchange Station was constructed in the early 1880s under the direction of Mr Francis Stephenson, Designer-in-Chief for London and North Western Railway. It opened in June 1884. Although now disused, the structure of the station remains as a dominant feature of the centre of Salford. Built above ground level, at a height to match that of 1840s railway line on the viaduct to the north, the station sat on massive masonry piers with small businesses subsequently occupying the resultant arches and with roads including Greengate, and Chapel Street passing beneath. To access the station, a new bridge was constructed to the east of Victoria Bridge, known as Cathedral Approach, this brought traffic across from Manchester direct to the front of the station. The other main thoroughfare was via the Salford Approach, which ran behind Chapel Street. To facilitate this access, Blackfriars Street was extended and much of the western end of the historic core of Salford was demolished. At the eastern end of the station, the road was widened and a platform, Salford Bridge, extended out over the river, providing an additional tram link to Manchester.
- 2.5.14 The survival of any archaeological remains of occupation of the site prior to its development as the Exchange Station in the 1880s would clearly depend on the extent of preparatory and construction groundworks for that development. While mass clearance of standing structures at the site certainly took prior to the insertion of the viaduct footings, the extent to which demolition may have truncated earlier archaeological remains is unknown. Construction of the viaduct footings will have almost certainly resulted in complete destruction of archaeological remains within the footprint of each footing. This notwithstanding, survival of discrete pockets of archaeological stratigraphy in between substantial industrial era construction cuts/footings is known in the vicinity, for example at the Greengate Towers site (OAN 2007) and the Beetham Tower site on Deansgate (PCA 2005). At the latter location, situated at the south end of Deansgate, despite the Great Northern Railway viaduct having been built across the site, important archaeological remains - of Roman date in that instance - survived in pockets between the viaduct footings.
- 2.5.15 The archaeological watching brief undertaken at the site in 2008 in association with geotechnical investigations confirmed the presence of extensive demolition debris, but the report concluded that lower stratigraphy and deeper-cut features could still survive *in situ* (Archaeo-Environment 2008, 96).

2.5.16 Recent excavations conducted in the wider vicinity, such as the evaluation at the former Exchange Bus Station immediately to the south of the site, have exposed archaeologically significant post-medieval remains and artefacts (Gregory 2009). This work indicated that later 19th-century clearance of earlier buildings in the area was to ground level only, with below-ground remains, such as foundations, cellars and deeply-cut features, surviving. An evaluation and subsequent excavation on Blackfriars Road in Salford revealed that, although modern construction work and Victorian housing had truncated the majority of the archaeological deposits at the site, evidence of 18th and 19th-century industrial activity survived, as did evidence of similarly-dated workers' housing (Mottorshead and Newell 2006).

3. PROJECT AIMS AND RESEARCH OBJECTIVES

3.1 Project Aims

3.1.1 The project is 'threat-led' with potential to disturb or destroy important sub-surface archaeological remains, if present. Therefore, the broad aim of the project was to inform the LPA, advised by the GMAAS, and the joint venture Clients, regarding the character, date, extent and degree of survival of archaeological remains at the site.

3.1.2 Archaeological trial trenching was selected as the most appropriate investigative tool to test the archaeological potential of the site.

3.1.3 Additional aims of the project were:

- to compile a Site Archive consisting of all site and project documentary and photographic records, as well as all artefactual and palaeoenvironmental material recovered;
- to compile a report that contains an assessment of the nature and significance of all data categories, stratigraphic, artefactual, *etc.*

3.2 Research Objectives

3.2.1 Specific research objectives to be addressed by the project were formulated during the compilation of the WSI. Those objectives which relate to below-ground archaeological remains are set out below:

- To determine the natural topography of the site.
- To establish the presence or absence of prehistoric and Roman activity. Desk-based research suggests a low potential for these periods; can this be confirmed?
- To establish the presence or absence early medieval activity. The site is expected to have lain within undeveloped agricultural land during these periods – can this be attested in the archaeological record?
- To establish the presence or absence of late medieval activity, when the area is first thought to have developed. Does evidence exist of early development? Or can it be seen that the site lay in pastoral/cultivated ground beyond the nearby settlement?
- To establish the presence or absence of post-medieval activity at the site. The site is known to have lain within the centre of the late medieval and post-medieval settlement at Salford - can this be attested in the archaeological record?
- Can the expected mid-post-medieval development, which can be seen cartographically, be confirmed and understood in the archaeological sequence?
- To establish the nature, date and survival of activity relating to any archaeological periods at the site.
- To establish the extent of all past post-depositional impacts on the archaeological resource.

4. ARCHAEOLOGICAL METHODOLOGY

4.1 Fieldwork

4.1.1 The trial trenching evaluation fieldwork was undertaken 27 January–20 February 2014. All fieldwork was undertaken in accordance with the relevant standard and guidance document of the Institute for Archaeologists (IfA) (IfA 2009). PCA is an IfA-Registered Organisation. The evaluation was undertaken according to the WSI compiled by PCA, which should be consulted for full details of methodologies employed regarding archaeological excavation, recording and sampling (PCA 2012).

4.1.2 Archaeological trial trenching was considered as the most appropriate investigative tool to test the archaeological potential of the site. The evaluation was undertaken prior to any demolition necessitated by the new development. Current usage of the site, privately-managed public car-parking (the Exchange Bridge Car Park), continued whilst the evaluation took place. However, the evaluation took place in a phased manner (Phases 1–3) to reduce impact upon the continued usage of the site.

4.1.3 Fourteen trenches (Trenches 1–6, 7a, 7b, 8, 9, 10a, 10b, 11 and 12) were investigated within the car park and within the separate storage area at the corner of Greengate and Chapel Street. For the most part, the trenches were sited to target buildings known to have stood prior to the construction of the Exchange Station in the 1880s, as seen from historic mapping. The phasing, dimensions and purpose of the trenches, as designed and set out in the WSI, were as follows:

Evaluation Phase	Trench Number	Length (m)	Width (m)	Expected Max Depth (m)	Primary Objective	Secondary Objective
Phase 1	Trench 1	20.0	2.0	c. 1.20	Cotton Mill (OS 1849 map) and earlier Brewery (Green's 1794 map)	Any other archaeological remains
Phase 1	Trench 2	15.0	2.0	c. 1.20	Cotton Mill (OS 1849 map)	Any other archaeological remains
Phase 2	Trench 3	8.0	2.0	c. 1.20	Greengate street frontage properties (OS 1849 map and earlier maps)	Any other archaeological remains
Phase 2	Trench 4	15.0	2.0	c. 1.20	Back-to-back housing (OS 1849 map) on Nuttall's Court and Barrow's Court and earlier structures to rear of Greengate frontage (e.g. Green's 1794 map)	Any other archaeological remains
Phase 2	Trench 5	8.0	2.0	c. 1.20	Greengate street frontage properties (OS 1849 map and earlier maps) and back-to-back housing on Nuttall's Court (OS 1849 map)	Any other archaeological remains
Phase 2	Trench 6	20.0	2.0	c. 1.20	Dye Works and Polytechnic Tavern (OS 1849 map)	Any other archaeological remains
Phase 2	Trench 7a	1.5	2.0	c. 1.20	Greengate street frontage properties (OS 1849 map and earlier maps)	Any other archaeological remains
Phase 2	Trench 7b	1.5	2.0	c. 1.20		
Phase 2	Trench 8	8.0	2.0	c. 1.20		
Phase 2	Trench 9	5.0	2.0	c. 1.20	Greengate street frontage properties (OS 1849 map and earlier maps)	Any other archaeological remains
Phase 3	Trench 10a	3.0	3.0	c. 1.20	Cloth Hall 'complex' (e.g. Green's 1794 map)	Any other archaeological remains
Phase 3	Trench 10b	1.5	1.5	c. 1.20		
<i>The necessity for Trench 10b was to be contingent upon the results of Trench 10a</i>						
Phase 3	Trench 11	12.0	2.0	c. 1.20	Horse and Carriage Bazaar (OS 1849 map)	Any other archaeological remains
Phase 3	Trench 12	8.0	2.0	c. 1.20	Cotton Mill (OS 1849 map) and earlier Brewery (Green's 1794 map)	Any other archaeological remains

- 4.1.4 All 14 trenches were investigated as intended. The sequence of work was varied during the programme for logistical reasons. Trenches 1 and 2 were investigated as Phase 1, as intended; Trenches 3, 4 and 5 were investigated as the first part of Phase 2, as intended; Trenches 10a, 10b, 11 and 12 were investigated as the second part of Phase 2, rather than as Phase 3; Trenches 6, 7a, 7b, 8, and 9 were investigated Phase 3, rather than as part of Phase 2.
- 4.1.5 All trenches were mechanically-excavated by a c. 5-tonne excavator 360° tracked machine with toothless ditching bucket under archaeological supervision. The trenches were excavated to the top of the first significant archaeological horizon, or the clearly defined top of the natural sub-stratum, whichever was reached first.
- 4.1.6 Hand cleaning was undertaken of all trenches. All features were subject to partial or complete excavation within the trenches with photography and archaeological recording taking place at appropriate stages in the process. A selection of photographs is included as Appendix 8 to this report. All trenches were recorded, irrespective of whether or not they contained archaeological features. All trenches were planned to scale (1:20). One long section was drawn to scale (1:10) in each trench.
- 4.1.7 Temporary Bench Marks (TBMs) were established at the site using a dumpy level. The Ordnance Survey Bench Mark on the Cathedral Approach bridge abutment on the north side of Chapel Street (value 28.48m OD) was used as the source of all TBMs. The height of all principal strata and features were calculated relative to Ordnance Datum and indicated on the appropriate plans and sections.
- 4.1.8 All trenches were located relative to standing structures by triangulation from hand measurements.

4.2 Post-excavation

- 4.2.1 The stratigraphic data generated by the project is represented by the written, drawn and photographic records. Post-excavation work involved checking and collating site records, grouping contexts and phasing the stratigraphic data (Appendix 1). A total of 246 archaeological contexts were defined in the 14 trenches (Appendix 2). A written summary of the archaeological sequence was then compiled, as described below in Section 5.
- 4.2.2 The artefactual material from the evaluation comprised a small assemblage of pottery, clay tobacco pipe, ceramic building material, glass, metal and leather. Examination of the artefactual material was undertaken and relevant comments integrated into Section 5, with a summary report on the material included as Appendices 3–7. A small assemblage of animal bone and shell was also recovered, specialist examination was undertaken and a summary report is included as Appendix 8. No other categories of organic or inorganic artefactual material were represented. None of the material recovered during the evaluation required specialist stabilisation or an assessment of its potential for conservation research.

- 4.2.3 The palaeoenvironmental sampling strategy of the project was to recover bulk samples where appropriate, from well-dated stratified deposits covering the main periods or phases of occupation and the range of feature types represented, with specific reference to the objectives of the evaluation. To this end, no palaeoenvironmental remains were recovered since all archaeological remains of note to be exposed were exclusively subterranean structures, backfilled with demolition rubble and contemporary detritus. No other biological material was recovered.
- 4.2.4 The complete Site Archive will be packaged for long term curation. In preparing the Site Archive for deposition, all relevant standards and guidelines documents referenced in the Archaeological Archives Forum guidelines document (Brown 2007) will be adhered to, in particular a well-established United Kingdom Institute for Conservation (UKIC) document (Walker, UKIC 1990) and the relevant IfA publication (IfA 2008). The depositional requirements of the body to which the Site Archive will be ultimately transferred – the Manchester Museum of Science and Industry - will be met in full.

5. RESULTS: THE ARCHAEOLOGICAL SEQUENCE

During the evaluation, separate stratigraphic entities were assigned unique and individual 'context' numbers, which are indicated in the following text as, for example [1/23], where the first number refers to the trench number. The archaeological sequence is described by placing stratigraphic sequences within broad phases, assigned on a site-wide basis in this case. An attempt has been made to add interpretation to the data, and correlate these phases with recognised historical and geological periods.

5.1 Phase 1: Natural Bedrock

- 5.1.1 Phase 1 represents the solid geological material of the area, exposed only within a sample excavation area at the north-eastern extent of Trench 1 (Figure 3). This comprised sandstone bedrock, [1/35], recorded at a maximum height of 22.65m OD.
- 5.1.2 The depth at which bedrock was encountered below existing ground level was c. 3.50m and it was directly overlain by a substantial thickness of sand of fluvial origin.

5.2 Phase 2: Fluvial Deposits

- 5.2.1 Phase 2 represents natural fluvial deposits associated with the River Irwell, which were recorded across the site. These generally comprised firm to friable mid yellowish brown to orange brown sterile clayey sand ([1/17] Trench 1; [2/20] Trench 2; [3/14] Trench 3; [4/1] Trench 4; [5/13] Trench 5; [6/28] Trench 6; [7/10] Trench 7; [8/13] Trench 8; [9/8] Trench 9; [10/7] Trench 10a; [10/15] Trench 10b; [12/18] Trench 12).
- 5.2.2 The maximum recorded height of fluvial material was c. 26.41m OD in Trench 4, located in the north-western part of the site, and the minimum recorded height was c. 25.50m OD in Trench 9, located in the south-western part of the site. While this variation in height broadly reflects the natural topography of the site, with a slope down from NW-SE towards the River Irwell (in its canalised form), other recorded evidence indicates that the natural slope was far more pronounced towards the Irwell, so that substantial ground raising and levelling activity was required ahead of the construction of the Exchange Station viaduct in the 1880s. In Trench 11, the closest trench to the Irwell, a c. 3.10m deep sample excavation at the south-eastern end of the trench recorded a substantial thickness of levelling material (Section 6, Figure 13). This presumably overlay fluvial deposits, although it was not possible to fully excavate the levelling material so that such material was not exposed. The lowest exposed height of the levelling material in Trench 11 was 23.25m OD.
- 5.2.3 The depth at which fluvial material was encountered below existing ground level varied across the site, ranging from a minimum c. 0.50m, in Trenches 1, 3, 5, 6, and 10a, to a maximum of c. 1.20m in Trench 9, this in the south-western part of the site where a substantial thickness of levelling material overlay the fluvial deposits.

5.3 Phase 3: Undated

- 5.3.1 Phase 3 represents evidence of undated, but potentially medieval or early post-medieval, activity at the site. A single structure has been assigned to Phase 3, comprising a sandstone-lined well, [6/13], which was exposed cut into fluvial deposit [6/28], in the central portion of Trench 6.

- 5.3.2 The well was partially exposed adjacent to the south-western limit of excavation and comprised a circular sandstone-lined structure, [6/13], within a narrow construction cut, [6/14] (Figure 8a). It was built in sandstone rubble (blocks on average 330mm x 210mm x 150mm), bonded with clay. The construction cut, [6/14], was backfilled with firm, light yellowish brown clayey silt [6/11].
- 5.3.3 The external diameter of the well was c. 1.60m and its internal diameter was c. 1.0m. It was at least 1.0m high and was exposed for a maximum of eight courses; it was not possible to fully excavate the well. Its north-eastern portion had been truncated by Phase 4 cellar [6/8]. The upper part of the well had been backfilled with a firm, mid brown sterile clayey sand fill, [6/12], from which no artefactual material was recovered. The sterile nature of this deposit suggests the well was deliberately backfilled with re-deposited fluvial material.
- 5.3.4 No artefactual material was recovered from the well, but it does pre-date Phase 4 cellar [6/8], which was of brick construction and broadly of late 18th-or early 19th-century date. The construction technique and building materials used for the well indicate that it is likely to be of medieval or early post-medieval date. It would have been sited in the backlot of a burgage plot, one of a series of narrow, long properties running back from the Greengate frontage since the medieval period.

5.4 Phase 4: Post-medieval (18th–19th Century)

Trench 1 (Figure 3)

- 5.4.1 Trench 1 was sited to determine if archaeological remains of the cotton mill (Ordnance Survey 1849 map, Figure 15) and earlier brewery (Green's 1794 map) survived in this part of the site. Parts of two substantial features, [1/28] and [1/33], were recorded at the south-western end of the trench cutting into fluvial deposit, [1/17], at a maximum height of 25.76m OD. The south-westernmost of these features, [1/28], was recorded for a distance of at least 2.20m NE-SW by at least 2m NW-SE; only the north-eastern edge of this feature was exposed and it continued beyond the limit of excavation to the south-east and south-west. The base of the feature was not excavated and the only exposed fill, [1/29], comprised firm, sandy clay with small quantities of lime mortar and fragments of sandstone throughout. Located a short distance to the north-east, feature [1/33] was exposed for a distance of at least 2.40m NE-SW by at least 1.40m NW-SE; only a small part of its north-western edge was exposed within the limits of excavation. Feature [1/33] was excavated to a maximum depth of 0.60m and the lowest exposed fill, [1/13], which was at least 0.48m thick, comprised firm, mid greyish brown gravelly sand with occasional fragments of brick. Its upper fill, [21/12], comprised a c. 0.10m thick deposit of yellowish brown sand. Due to the limited exposure of both features, definitive interpretation is impossible, however, both are tentatively interpreted as representing the demolition of features prior to the construction of buildings which are shown in this area on later 18th-century mapping. Although no artefactual material was recovered from either feature, both were truncated by Phase 4 brick wall [1/9] and therefore pre-date this.

- 5.4.2 Cutting through demolition features [1/28] and [1/33] was a NW-SE aligned wall, [1/9], recorded within a narrow construction cut, [1/10], extending across the trench for a distance of c. 1.80m and continuing beyond the limits of excavation. The wall was 0.62m wide and was constructed with unfrosted handmade red bricks (average size 230mm x 110mm x 70mm) bonded with light grey lime mortar. Only one course of the wall survived, to a maximum height of 0.12m; this was in stretcher bond and was built on a c. 40mm thick bedding of lime mortar. The bricks used in the construction are not closely dateable and no other artefactual material was associated with the wall. Its NW-SE alignment is somewhat at odds with that of the brewery buildings depicted on later 18th-century mapping and those of the subsequent cotton mill; it more closely correlates with a regular arrangement of gardens plots (or possible structures) in the backlots, as illustrated on Cason and Berry's 1741 map.
- 5.4.3 The north-western side of a substantial NE-SW aligned brick-built culvert, [1/26], was recorded in a narrow construction cut, [1/14], at the south-western end of Trench 1. The culvert wall was exposed for a maximum distance of 1.80m, truncated to the north-east and south-west by Phase 5 intrusions, and consisted of an outer wall and a less substantial inner wall. Both walls were constructed using pressed wire-cut common bricks (average size 230mm x 110mm x 80mm), bonded with lime mortar. The outer wall was c. 0.44m thick and at least 0.52m high, with up to seven courses of brick laid in stretcher bond recorded. Located immediately to the south-east, parallel to the outer wall, was a c. 0.26m thick inner wall, with one course exposed laid in stretcher bond. This wall was set at an angle and presumably represents the remains of an arched-roof structure, springing from the more substantial outer wall. The culvert was backfilled by loose, dark grey ash and cinder, [1/25], from which no artefactual material was recovered.
- 5.4.4 Culvert [1/26] is interpreted as representing the north-western side of an arched brick culvert. On the basis of its orientation, it is reasonable to assume that it was probably associated the Brewery buildings depicted on later 18th-century mapping and/or those of the subsequent Cotton Mill. What was potentially a further element of this structure was recorded in Trench 2, this interpreted as representing the south-eastern side of the same culvert, as discussed below.

Trench 2 (Figure 4)

- 5.4.5 Trench 2 was sited to determine if archaeological remains of the cotton mill (Ordnance Survey 1849 map, Figure 15) and earlier brewery (Green's 1794 map) survived in this part of the site. Part of a substantial feature, [2/21], was located towards the central part of the trench, cutting into natural fluvial deposit [2/20], at a maximum height of 25.58 OD. This was recorded for a distance of 1.80m NE-SW by 1.40m NW-SE, continuing to the north-east and south-west beyond the limits of excavation and truncated to the north-west by the construction cut, [2/6], for a brick culvert, [2/7]. Feature [2/21] was excavated to a maximum depth of 0.48m and the only exposed fill, [2/9], comprised soft, greyish brown silty clayey sand with occasional small fragments of ceramic building material throughout. Although the function of this feature is uncertain, its similar alignment to culvert [2/7] suggests that they may have been associated and it could represent a construction feature or, alternatively, it could be a demolition feature associated with the removal of an earlier structure.

- 5.4.6 The south-eastern side of a NE-SW aligned brick culvert, [2/7], was recorded in a narrow construction cut, [2/6], towards the north-western end of Trench 2. It was exposed for a maximum distance of 1.80m and consisted of an outer wall and a less substantial inner wall identical in construction to that of brick-culvert [1/26], as recorded in Trench 1. The construction cut, [2/6], was backfilled with mid grey clayey silty sand, [2/8], from which no artefactual material was recovered. Both wall elements were constructed using pressed wire-cut common bricks (average size 230mm x 110mm x 80mm), bonded with lime mortar. The outer wall was c. 0.20m thick and a single brick course was exposed, laid in header bond. Immediately to the north-west, parallel to the outer wall, was a c. 0.30m thick inner brick wall, with at least two courses exposed, laid in stretcher bond. This was angled and, as discussed above, is interpreted as representing the remains of the south-eastern side of an arched brick culvert.
- 5.4.7 Culvert [2/7] had been backfilled with brownish grey sandy clayey silt, [2/5], which was recorded for a distance of 4.20m, continuing to the north-west beyond the limit of the trench. A dump of oyster shell was observed within this backfill. If, as postulated, structure [1/26] in Trench 1 and structure [2/7] in Trench 2 do indeed represent the lowermost surviving parts of an arched brick culvert, then this was a substantial feature, c. 5.0m wide. A small assemblage of artefactual material recovered from the backfill of the culvert in Trench 2 included pottery and a 19th-century wine bottle; the pottery assemblage as a whole provides a date of 1830–1900 for the infilling of the culvert (see Appendices 3 and 4).

Trench 3 (Figure 5)

- 5.4.8 Trench 3 was sited to test for the presence of remains of former buildings fronting onto Greengate, for example as illustrated on the 1849 Ordnance Survey map (Figure 15). A short length of a NE-SW aligned wall, [3/6], was partially exposed adjacent to the north-west limit of excavation within a narrow construction cut, [3/7], cutting through natural fluvial deposit [3/14]. It was exposed for a maximum distance of 0.90m, continuing to the north-west beyond the limits of excavation and truncated to the south-west by a substantial intrusion, [3/13], assigned to Phase 5. The maximum exposed width of wall [3/6] was 0.12m and a single skin of bricks, laid as stretchers, was exposed. It was constructed using unfrogged handmade red bricks (average size 240mm x 120mm x 60mm) bonded with a light grey lime mortar, with two courses exposed, to a maximum height of 0.12m. No artefactual material was recovered from the backfill, [3/5], of construction cut [3/7]. In terms of location and orientation this wall corresponds closely to the south wall of a long building extending back from the Greengate frontage, as illustrated on the 1849 Ordnance Survey map. However, due to the limited degree that it was possible to expose this wall, its interpretation remains inconclusive.

Trench 4 (Figure 6)

- 5.4.9 Trench 4 was sited to investigate back-to-back dwellings buildings along Barrow's Court to the north-west and Nuttall's Court to the south-east, as illustrated on the 1849 Ordnance Survey map (Figure 15). To this end, parts of two cellars, [4/6] and [4/7], were exposed in the central and south-eastern portions of Trench 4, both cutting through fluvial deposit, [4/1], at a maximum height of 26.29m OD. Although both cellars broadly correlate with buildings illustrated on the 1849 map (Figure 15), their precise date of origin is uncertain and they may have been built as part of earlier buildings, possibly during the 18th century.

- 5.4.10 The south-easternmost cellar, [4/7], as exposed measured c. 3.60m NW-SE by at least 1.90m NE-SW and comprised a narrow rectangular stairwell measuring c. 2.20m NW-SE by c. 1.20m wide, leading to a narrow cellar space measuring at least 1.90m NE-SW, continuing north-eastwards beyond the limit of excavation, by c. 1.60m NW-SE. The walls were built within a narrow constructed cut, [4/27], using unfrogged red brick (average 230mm x 110mm x 60mm), bonded by lime mortar, exposed to at least nine courses, laid in stretcher bond, to a maximum height of 0.62m. Of the steps, [4/28], exposed at the south-eastern extent of the stairwell, each measured 710mm by 450mm wide by 400mm high. The steps were constructed using sandstone blocks around a rubble core, bonded by light grey lime mortar, although only a single sandstone block (400mm x 180mm x 300mm) remained *in situ*.
- 5.4.11 Cellar [4/7] had been backfilled with various rubble deposits, [4/23], [4/24] and [4/25], which were exposed for a combined thickness of 0.70m. It was not possible to expose the base of the structure within the limits of excavation. No artefactual material was recovered from any of the backfill deposits.
- 5.4.12 The second cellar recorded in Trench 5, structure [4/6], was located in the central portion of the trench. It was exposed for a distance of c. 3.60m NW-SE by 2.30m NE-SW and comprised a stairwell to the north-west and part of a cellar space to the south-east. All its walls were built within a narrow construction cut, [4/22], backfilled with friable, dark grey clayey sandy silt, [4/21]. The north-westernmost extent of the cellar comprised a NE-SW aligned wall that varied in width from 0.26m to 0.32m at the location of the stairwell entrance. Three steps, [4/30], presumably leading to another cellar space to the north-east, were exposed, with each step measuring c. 0.95m by 0.26m and 0.30m high. The steps were constructed with rectangular dressed sandstone blocks (710mm x 240mm x 300mm) and unfrogged handmade brick (240mm x 110mm x 60mm), bonded by lime mortar. Located at the entrance of the stairwell was a cobble surface, [4/29], which measured 0.84m NE-SW by 0.98m NW-SE, contained within brick walls on three sides and bounded by the uppermost step, [4/30]. The surface was built with well-sorted sub-rounded river cobbles (average 100mm x 100mm), in a matrix of firm, dark grey clayey silt.
- 5.4.13 A cellar space was located c. 0.70m south-east of surface [4/29] and, as exposed, measured c. 1.40m NW-SW by 1.20m NE-SW, continuing to the north-east beyond the limit of excavation. Its walls were built with unfrogged handmade red brick (average 240mm x 120mm x 60mm), bonded with lime mortar and at least six courses laid in stretcher bond were exposed, to a maximum height of 0.51m. The north-western and south-eastern walls were laid as a single-skin of stretchers c. 0.12m wide. The south-western wall consisted, for the most part, of a double-skin wall, c. 0.20m wide, using a combination of whole bricks and half bats with the north-western extent consisting of a single-skin. The floor, [4/31], measured 1.17m NW-SE and was exposed for a distance of 0.76m NE-SW. It was constructed with unfrogged handmade red bricks (240mm x 120mm x 60mm) and dressed sandstone slabs (300mm x 260mm), in matrix of dark grey clayey silt.

- 5.4.14 The earliest stairwell backfill was a c. 0.40m thick deposit, [4/20], comprising greyish brown clayey coarse sand, from which a small assemblage of artefactual material was recovered, including pottery and clay tobacco pipe. This assemblage as a whole dates from the late 19th–20th century (see Appendices 3 and 5). An unusual discovery was that of a conch shell, which may represent a traveller's memento or evidence of long distance trade in the area (see Appendix 8). The earliest cellar backfill deposits, [4/19] and [4/18], comprised dark greyish brown clayey sand and mid brown silty sandy clay, respectively, and had a combined thickness of 0.29m. A small assemblage of artefactual material was recovered from deposit [4/19], including pottery, clay tobacco pipe, and glass. The pottery assemblage as a whole dates from the late 19th–20th century (see Appendix 3) and the glass comprised four bottles of mid to late 19th-century date (see Appendix 4). Two goose bones were also recovered (see Appendix 8). Three corroded pieces of thin iron plate were also found in this deposit (see Appendix 6). The uppermost backfill deposit in the stairwell and cellar comprised brick rubble within a matrix of crushed lime mortar, [4/17], up to 0.40m thick.
- 5.4.15 A small area of cobble surface, [4/12], was exposed at the north-western extent of Trench 4, within a narrow construction cut, [4/13]. It was exposed for a maximum extent of 2.0m NE-SW by 0.70m NW-SE, continuing beyond the limits of excavation. The surface was constructed with well-sorted sub-rounded river cobbles (average 100mm x 100mm), a matrix of dark grey clayey silt. This surface may represent a surviving element of the surface of Barrow's Court, as illustrated on the 1849 Ordnance Survey map; although due to its limited exposure, definitive interpretation is impossible.

Trench 5 (Figure 7)

- 5.4.16 Trench 5 was sited to test for the presence of remains of former buildings fronting onto Greengate and also buildings along Nuttall's Court, as depicted on the 1849 Ordnance Survey map (Figure 15). The remains of a cellar structure were recorded in the south-western half of Trench 5, bounded to the north-east by a NW-SE aligned wall, [5/11]. The wall was built within a narrow construction cut, [5/10], which cut through fluvial deposit [5/13] at a maximum height at 26.36m OD. The wall extended across the central portion of the trench for a distance of at least 2.20m and was 0.40m wide. It was built with unfrogged handmade red bricks (average size 230mm x 110mm x 60mm) bonded with light grey lime mortar and was exposed to at least five courses laid in stretcher bond, to a maximum height of c. 0.60m. The upper portion of the part of the wall located adjacent to the north-western limit of excavation appeared to have been disturbed and the brick courses were probably not *in situ*. A single brick buttress measuring 0.30m x 0.23m was recorded abutting the internal elevation of the wall at its south-eastern extent. Four rubble backfill deposits, [5/7], [5/8], [5/9] and [5/14], were exposed within the cellar, recorded for a distance of at least 4.80m NE-SW by 2.20m NW-SE, excavated for a combined maximum thickness of 0.70m. An assemblage of pottery recovered from the earliest exposed backfill deposit, [5/7], dates from the late 19th century, including pottery (see Appendix 3). This deposit also produced a fragment of cattle-sized animal bone and a bone from a rabbit (see Appendix 8).

- 5.4.17 The cellar exposed in Trench 5 was evidently of relatively large dimensions and probably lay below the rear part of a narrow building that fronted onto Greengate, as illustrated on the 1849 Ordnance Survey map; the wall recorded across the central portion of the trench corresponds closely with the rear wall of the building depicted on the map (Figure 15).

Trench 6 (Figures 8a and 8b)

- 5.4.18 Trench 6 was sited to test for the presence of remains of a dye works and the Polytechnic Tavern, as illustrated on the 1849 Ordnance Survey 1849 map (Figure 15). In the centre of Trench 6, part of a cellar, [6/8], was recorded within a narrow construction cut, [6/10], truncating Phase 3 well [6/13]. Parts of three sides of the structure were exposed, for a distance of 2.10m NW-SE- by at least 0.95m NE-SW, continuing to the north-east, encountered at a maximum height at 25.10m OD. The walls were uniformly 0.23m wide and constructed with unfrogged complete and half bat red bricks (average 230mm x 110mm x 60mm), bonded with lime mortar. The south-western wall was exposed to at least eight courses generally laid in stretcher bond, to at least 0.48m high. A brick surface, [6/7], directly overlay the cellar and as this was left *in situ*, no backfill material was exposed. No artefactual material was recovered from the construction cut backfill, [6/9].
- 5.4.19 Although the cellar recorded in Trench 6 is located within the area of the dye works (Figure 15), it is uncertain if it was associated with that manufactory. The cellar may have been built as part of an earlier building, possibly during the 18th century, thus pre-dating the dye works, for example a structure illustrated on Green's 1794 map.
- 5.4.20 A NE-SW aligned wall, [6/26], built within a narrow construction cut, [6/27] was recorded at the south-eastern end of Trench 6, cutting through fluvial deposit [6/28]. The wall was exposed for a distance of 1.50m NE-SW, truncated to the south-west and continuing to the north-east, and was 0.12m wide. It was constructed with unfrogged handmade red bricks (average size 220mm x 110mm x 60mm), bonded with light grey lime mortar and survived up to three courses laid in stretcher bond, up to 0.30m high. Although no artefactual material was recovered from its construction cut backfill, [6/25], its component bricks suggest that it was broadly contemporary with cellar structure [6/8] and it may also have been of 18th-century origin.
- 5.4.21 A brick surface, [6/7], which directly overlay basement structure, [6/8], was exposed for a distance of 6.20m NW-SE by 1.34m NE-SW, continuing beyond the limit of excavation to the north-east, encountered at a maximum height at 25.37m OD. This surface was constructed with unfrogged handmade red bricks (230mm x 110mm x 60mm) and was presumably laid down after the demolition of the building associated with cellar [6/8]. It could potentially represent a surface associated with the dye works illustrated on the 1849 Ordnance Survey map.

Trench 11 (Figure 13)

- 5.4.22 Trench 11 was located within the area occupied by the 'Horse and Carriage Bazaar', as depicted on the 1849 Ordnance Survey map (Figure 15). The earliest levelling deposits exposed in Trench 11 comprised firm, light grey silty sand, [11/18], exposed across the north-western half of the trench and friable, reddish brown clayey sandy silt, [11/15], exposed in a sample excavation area at the south-eastern extent of the trench.

- 5.4.23 Deposit [11/18] was recorded for a maximum distance of 5.80m NW-SE by 2m NE-SW, continuing to the north-east and south-west, and was at least 0.40m thick, encountered at a maximum height at 25.31mOD. Deposit [11/15] was exposed only in the sample excavation area and was at least 1.40m thick, encountered at a maximum height at 25.44m OD. Based on the relatively sterile compositions of both deposits, these probably represent an early phase of ground-raising and levelling alongside the River Irwell as it was canalised in the 18th-19th century. No artefactual material was recovered from these deposits.
- 5.4.24 Located at the north-western end of Trench 11, cutting through levelling deposit [11/18], was a c. 0.40m wide east-west aligned brick and stone culvert, [11/16], built within a narrow construction cut, [11/17]. This was exposed for a length of c. 2.40m, continuing beyond the limits of excavation. It consisted of two parallel brick walls c. 0.18m apart, capped with sandstone slabs and the base was also built with sandstone slabs. The walls were built with unfrogged handmade red bricks (average size 220mm x 100mm x 60mm), bonded with light grey lime mortar, while the sandstone base and capping slabs (410mm x 350mm x 350mm) were bonded with clay.
- 5.4.25 No dateable material was recovered from the construction cut backfill, [11/14]. A silty sand deposit, [11/13], contained within the culvert probably derived from natural silting and this produced a single sherd of pottery dated to 1800–1900 (see Appendix 3) and an iron nail with small square pyramidal head embedded in a wood fragment (see Appendix 7). Two fragments of horse bone were also recovered (see Appendix 8).

Trench 12 (Figure 14)

- 5.4.26 Trench 12 was sited to determine if archaeological remains of the cotton mill (Ordnance Survey 1849 map, Figure 15) and earlier brewery (Green's 1794 map) survived in this part of the site. Two culverts, [12/10] and [12/7], were recorded in Trench 12. The earliest, [12/10], was aligned north-south and was built within a narrow construction cut, [12/11], cutting through fluvial deposit [12/18]. It was exposed for a distance of c. 6.0m north-south, continuing beyond the limits of excavation, and was 0.73m wide, encountered at a maximum height at 25.99m OD. It consisted of two parallel brick walls c. 0.20m apart, capped with stone blocks and with a lined floor. The c. 0.30m high walls were constructed with three courses of unfrogged handmade red bricks (average size 230mm x 110mm x 80mm), bonded with light grey lime mortar. The capping comprised a combination of large, roughly hewn and dressed rectangular sandstone blocks (480mm x 390mm x 160mm), dry bonded, and the floor of the culvert was lined using slate slabs (230mm x 100mm x 10mm). The construction cut, [12/11], was backfilled with firm, dark grey clayey silt, [12/9], from which no artefactual material was recovered. Two sherds of pottery dated 1770–1830 were recovered from a deposit of coarse sandy silt, [12/16], which represented the silting-up of the culvert.
- 5.4.27 Truncating culvert [12/10] to the south was a similarly constructed, NE-SW aligned culvert, [12/7], 0.50m wide and exposed for a distance of 2.20m. It was constructed within a narrow construction cut, [12/8], and consisted of two parallel brick walls c. 0.24m apart, capped with sandstone slabs. The walls were constructed with unfrogged handmade red bricks (average 240mm x 110mm x 80mm), bonded with light grey lime mortar and the stone slab capping (460mm x 430mm x 50mm) was dry bonded. No artefactual material was recovered from the construction cut backfill, [12/6], or the culvert silting, [12/15].

- 5.4.28 Their stratigraphic relationship suggests that culverts [12/7] and [12/10] were not constructed contemporaneously. They may represent 18th- or early 19th-century drainage installed in association with the brewery depicted on Green's 1794 map, a manufactory which was replaced with the cotton mill depicted on the 1849 Ordnance Survey map (Figure 15).

5.5 Phase 5: Late 19th-Century Demolition, Levelling and Viaduct

- 5.5.1 Features and deposits representing the demolition of structures identified on 18th- and 19th-century maps were recorded in Trenches 1–3, 5, 6, 7b, 8, 9, 10a, 10b and 11, along with evidence of ground preparation ahead of the construction of the Exchange Station viaduct that currently occupies the site.

Trench 1 (Figure 3)

- 5.5.2 The upper part of Phase 4 wall [1/9] had been removed along its full length by a similarly aligned linear feature, [1/8], measuring 0.72m wide and up to 0.12m deep, encountered at a maximum height of 25.76m OD (Section 2, Figure 3). No dateable artefactual material was recovered from its firm, mid brownish grey sandy gravel fill, [1/7]. This feature likely represents deliberate removal/demolition of the wall, leaving only a single course of brick *in situ*.
- 5.5.3 A brick rubble deposit, [1/22], was recorded in the central portion of the trench. This was exposed for a maximum distance of 1.30m NW-SE by 2.40m, truncated by demolition features, [1/19] and [1/21], and was recorded in section for a maximum depth of 0.70m. This deposit probably represents a demolition layer associated with Phase 4 brick culvert [1/26], although due its limited exposure, a definitive interpretation is not possible.
- 5.5.4 Phase 4 brick culvert [1/26] was truncated to the north-east and south-west by substantial demolition features, [1/19] and [1/31], respectively, encountered at a maximum height of 25.78m OD. The south-westernmost feature, [1/31], was exposed for a distance of c. 2.60m NW-SE by 2.40m NE-SW and excavated to a maximum depth of 0.50m. Its only exposed fill, [1/30], comprising clayey sand, contained fragments of brick and lime mortar, probably derived from the demolished brick culvert. It was truncated to the south-west by another demolition feature, [1/34], which was exposed for a distance of c. 5.0m NE-SW by 2.0m NW-SE and for a maximum depth of 0.34m. Its single exposed silty clay fill, [1/11], contained fragments of brick and sandstone possibly derived from brick culvert [1/26].
- 5.5.5 Demolition feature [1/19], which truncated culvert [1/26] to the north-east, was recorded for a distance of c. 3.0m NW-SE by c. 3.0m NE-SW and was excavated to a maximum depth of 0.68m. No artefactual material was recovered from its single exposed fill, [1/18], which comprised loose ash and cinders.
- 5.5.6 The south-eastern extent of demolition feature [1/19] was truncated by a substantial demolition feature, [1/21], which extended across the north-eastern half of the trench for a distance of least 10.10m NE-SW by c. 2.0m NW-SE, continuing beyond the limits of excavation. A sample excavation area undertaken at the north-eastern extent of the trench established that it was at least 2.10m deep, with its base recorded at a height of 23.32m OD. The lowermost c. 1.50m thick fill, [1/32], comprised undifferentiated layers of rubble within a clayey sand matrix. Its upper c. 0.70m thick fill, [1/20], comprised greyish brown clayey silt. Neither fills yielded any artefactual material.

Trench 2 (Figure 4)

- 5.5.7 Parts of two linear, NW-SE aligned, demolition features, [2/18] and [2/17], were recorded cutting through fluvial deposit, [2/20], across the north-western portion of Trench 2. The south-westernmost feature, [2/18], was c. 1.0m wide and was exposed for a maximum distance of 2.90m NW-SE, continuing to the north-west and south-east, and for a maximum depth of 0.60m, encountered at a maximum height of 25.70m OD. Located c. 1.0m north-west of feature [2/18], feature [2/17] was 0.80m wide with a rounded terminal in the south-east and was exposed for a maximum distance of 2.90m NW-SE, continuing to the north-west, and was exposed for a maximum depth of 0.53m deep. The only exposed fills of both features comprised similar loose, grey silty sand, [2/19] and [2/16], which contained fragments of sandstone and ceramic building material. Both features likely represent demolition associated with the levelling of cotton mill illustrated on the 1849 Ordnance Survey map (Figure 15).
- 5.5.8 A clayey sand deposit, [2/4], overlay demolition features [2/18] and [2/17] and culvert backfill [2/5]. This deposit extended across Trench 2 and was up to c. 0.20m thick. It was encountered at a maximum height of 26.00m OD. This deposit had been laid down prior to the construction of a brick drainage structure, [2/13], and an associated concrete sub-base, [2/3], for the sandstone sett surface which formed the ground surface at the time of the evaluation. It is interpreted as a levelling and consolidation deposit associated with the construction of the late 19th-century surface.

Trench 3 (Figure 5)

- 5.5.9 A substantial demolition feature, [3/13], which truncated the south-western extent of Phase 4 wall [3/6], was exposed across the south-western half of the trench for a maximum distance of 5.10m NE-SW by 2.0m NW-SE, continuing beyond the limits of excavation. This was excavated to a maximum depth of 0.66m. The maximum height at which this feature was encountered was 26.55m OD. Three backfill deposits, [3/12], [3/11] and [3/10], were exposed within this feature. The earliest recorded backfill, [3/12], comprised cobbles within a sand matrix and was only exposed at the north-eastern side of the feature (Section 5, Figure 5). This was directly overlain by a loose sand deposit, [3/11], which was at least 0.55m thick. The uppermost backfill deposit, [3/10], which was c. 0.70m thick, comprised coarse sand with fragments of brick, sandstone and cobbles throughout. No artefactual material was recovered from any of the backfill deposits. This feature probably represents a substantial demolition feature associated with the removal of buildings that fronted onto Greengate, ahead of the construction of the Exchange Station viaduct.

Trench 4 (Figure 6)

- 5.5.10 A firm, silty sandy clay deposit, [4/13], overlay Phase 4 backfill deposits associated with cellars [4/6] and [4/7] (Section 4, Figure 6). This deposit extended across Trench 4 and was up to c. 0.23m thick, encountered at a maximum height of 26.43m OD. It had been laid down prior to the construction of a brick drainage structure, [4/15], and the concrete sub-base, [4/11], for a sandstone sett surface, [4/9], and is interpreted as a levelling and consolidation deposit directly associated with the construction of the surface.

Trench 5 (Figure 7)

- 5.5.11 Part of a demolition feature, [5/17], was recorded at the north-eastern extent of Trench 5 cutting through fluvial deposit, [5/13]. It was exposed for a maximum distance of 2.0m NW-SE by 0.90m NE-SW and it was 0.28m deep (Section 3, Figure 7), encountered at a maximum height of 26.28m OD. Its single fill, [5/16], comprised coarse sandy silt with frequent lime mortar inclusions.
- 5.5.12 Directly overlying Phase 4 backfill deposit [5/7] was a 0.12m thick clayey silt deposit, [5/15], recorded across the central portion of the trench for a maximum distance of 2.0m NW-SE by 1.50m NE-SW (Section 3, Figure 7). No artefactual material was recovered from this deposit, interpreted as a levelling deposit.

Trench 6 (Figure 8a)

- 5.5.13 Cutting fluvial deposit [6/28], adjacent to the south-western limit of excavation in Trench 6, was the north-eastern side of what appeared to be a demolition feature, [6/30]. It was exposed for a maximum distance of 1.20m NW-SE, continuing to the south-west beyond the limit of excavation, and was at least 0.30m wide; its depth was not established. Its single exposed fill, [6/29], comprised sandy silt from which no artefactual material was recovered.

Trench 7b (Figure 9)

- 5.5.14 The basal deposit recorded extending across Trench 7b comprised sandy silt, [7/16], which contained fragmented ceramic building material throughout. It was encountered at a maximum height of 25.90m OD and was at least 0.42m thick. This deposit is tentatively interpreted as a levelling deposit but, due to its limited exposure, a definitive interpretation is impossible and it may alternatively represent the backfill material of a cellar.

Trench 8 (Figure 10)

- 5.5.15 Part of a presumed to be linear feature, [8/11], cut through fluvial deposit [8/13], adjacent to the north-western limit of excavation. This was exposed for a distance of 1.50m NE-SW and was at least 0.25m wide and was excavated to a depth of 0.18m. It was encountered at a maximum height of 25.87m OD. Its single exposed fill, [8/10], contained frequent brick fragments throughout. Although only a small portion of this feature was exposed, the fragmented brick within its fill suggests that it represents demolition.
- 5.5.16 Directly overlying feature [8/11] was a c. 0.44m thick sandy silt deposit, [8/9], encountered at a maximum height of 26.27m OD. No artefactual material was recovered from this deposit. It is interpreted as possibly being derived from levelling activity prior to the construction of surfaces associated with the viaduct arches.

Trench 9 (Figure 11)

- 5.5.17 The basal deposit recorded in Trench 9 comprised friable, dark grey sandy silt [9/7], which contained frequent lime mortar inclusions and occasional fragments of brick throughout. It was encountered at a maximum height of 26.21m OD and was at least 0.65m thick. It was similar in composition to that of levelling deposit, [8/11], as recorded in Trench 8, and probably represents further ground consolidation and levelling activity towards the Irwell.

Trenches 10a and 10b (Figure 12)

- 5.5.18 Part of the south-western edge of an irregular-shaped substantial demolition feature, [10/6], was recorded in Trench 10a, cutting through fluvial deposit [10/7]. This was exposed for a maximum distance of 3.0m NW-SE by 2.50m NE-SW, continuing to the north-east and south-east, and it was up to 0.39m deep, encountered at a maximum height of 25.87m OD. Its single loose clayey silty sand fill, [10/5], contained frequent fragments of lime mortar and brick throughout.
- 5.5.19 In Trench 10b, part of the north-eastern edge of a demolition feature, [10/14], was exposed for a maximum distance of 1.50m NE-SW by 0.60m NW-SE, excavated to a depth of 0.14m. It was encountered at a maximum height of 25.98m OD. Its single exposed fill, [10/13], comprised firm sandy silt with occasional brick fragments.
- 5.5.20 Although both features recorded in Trenches 10a and 10b were only partially exposed, they are interpreted as potentially representing elements of a single demolition feature associated with the demolition of buildings illustrated on the 1849 Ordnance Survey map.

Trench 11 (Figure 13)

- 5.5.21 Six levelling deposits, [11/8], [11/9], [11/10], [11/11], [11/12] and [11/20], were recorded extending across Trench 11. These levelling deposits were variously coloured with varying compositions of clay, silt, sand and ash and all contained frequent quantities of fragmented sandstone and brick. The full thickness of these deposits was established within a sample excavation undertaken at the south-eastern extent of the trench, where they were recorded with a maximum combined thickness of up to 1.25m. The maximum and minimum heights encountered for the uppermost levelling deposit, [11/8], was 25.85mOD and 25.55m OD, respectively. No artefactual material was recovered from any of these deposits. It is likely that they were deposited during the late 19th century and represent infilling of low-lying ground towards the River Irwell, presumably ahead of the construction of the viaduct.

The Exchange Station viaduct and associated structures

- 5.5.22 Drainage features and structures interpreted as being directly associated with the viaduct were recorded in the majority of evaluation trenches, with the exception of Trenches 8, 10a, 10b and 11. These generally comprised variously aligned linear drainage features: [1/6], [1/16] & [1/24], Trench 1 (Figure 3); [3/9], Trench 3 (Figure 5); [4/5], Trench 4 (Figure 6) ; [5/6], Trench 5 (Figure 7); [6/20], [6/22] & [6/24], Trench 6 (Figures 8a and 8b); [7/7] & [7/9]; Trench 7a; [7/17], Trench 7b (Figure 9); [9/6], Trench 9 (Figure 11). Brick-built surface drainage structures were also recorded: ([2/13], Trench 2 (Figure 4); [4/15], Trench 4 (Figure 6); [6/17], Trench 6 (Figure 8a); [12/13], Trench 12 (Figure 12). All drainage features and structures were directly overlain by either levelling deposits or concrete sub-base material associated with the construction of the sandstone sett surface that formed the present ground surface across the majority of the site.

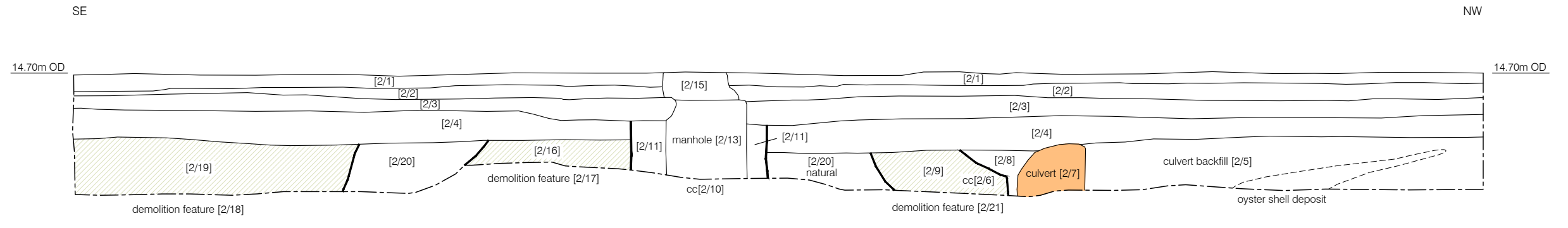
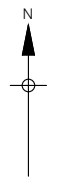
- 5.5.23 All recorded drainage features had similar profiles: up to 0.75m wide and 0.65m deep with vertical to near vertical sides and where exposed had a flat or shallow concave base. The exception was two intercutting features, [6/22] and [6/24], located at the south-eastern end of Trench 6 which measured 1.0m and 1.30m wide, respectively, and were at least 1.0m deep. At the base of drainage features [1/6], [1/16], [1/24], [5/6], [6/20], [7/7], [7/9], [7/17] and [9/6], a c. 0.30m diameter salt-glazed ceramic drain was present. All drainage features were backfilled with clayey silt, ([1/5], [1/15] & [1/23], Trench 1; [3/8], Trench 3; [4/4], Trench 4; [5/5], Trench 5; [6/19], [6/21] & [6/23], Trench 6; [7/6] & [7/8], Trench 7a; [7/18], Trench 7b; [9/5], Trench 9).
- 5.5.24 All surface drainage structures, ([2/13], Trench 2; [4/15], Trench 4; [6/17], Trench 6; [12/13], Trench 12), were similarly constructed within narrow construction cuts, [2/10], [4/16] and [6/18], respectively, with the exception of a broad construction cut, [12/14], for structure, [12/13], which measured at least 2.0m NE-SW by at least 3.70m NW-SE. The square brick-built surface drainage structures were all similarly constructed and where fully exposed measured c. 0.80m by 0.80m. They were constructed with unfrogged handmade red bricks (230mm x 110mm x 80mm), bonded by lime mortar. The full height of the structures was not established and the maximum exposed height for any was in Trench 12, where structure [12/13] was exposed to seven courses, in stretcher bond, to a height of 0.75m. All drainage structures were disused and where exposed were backfilled with loose brick rubble within a sandy matrix ([6/16], Trench 6 and [12/17], Trench 12). The drainage construction cuts, [2/10], [4/16], [6/18], and [12/14], were generally backfilled by friable to firm clayey sandy silt deposits, [2/11], [4/14], [6/15] and [12/12], respectively, from which no artefactual material was recovered.
- 5.5.25 Extending across the central portion of Trench 11 was the upper part of a substantial brick-built arched culvert, [11/19], built within a 1.20m wide construction cut, [11/7], truncating the uppermost Phase 5 levelling deposit, [11/8] (Figure 13). The culvert as exposed measured 2.0m NE-SW, continuing beyond the limits of the trench, and was encountered at a maximum height of 25.00m OD. It was constructed with unfrogged handmade red bricks (220mm x 90mm), bonded with cementitious mortar. No artefactual material was recovered from the construction cut backfill, [11/6].
- 5.5.26 The sandstone sett surface that formed the present surface across much of the site was similarly constructed in each evaluation trench. A levelling and consolidation deposit extended across each trench, ranging in thickness from 50mm in Trench 10a up to 0.32m in Trench 1. These levelling deposits generally comprised firm clayey sandy silt ([1/4], Trench 1; [3/4], Trench 3; [6/6], Trench 6; [7/5], Trench 7a; [7/15], Trench 7b; [9/4], Trench 9; [10/4] Trench 10a; [10/12] Trench 10b; [11/5], Trench 11 and [12/5], Trench 12). A concrete sub-base directly overlay each levelling deposit, ([1/3], Trench 1; [2/3], Trench 2; [3/3], Trench 3; [4/11], Trench 4; [5/4], Trench 5; [6/5], Trench 6; [7/4], Trench 7a; [7/14], Trench 7b; [8/7], Trench 8; [9/3], Trench 9; [10/3], Trench 10a; [10/11], Trench 10b; [11/4], Trench 11 and [12/4], Trench 12), and ranged in thickness from 0.18m in Trench 10 up to 0.34m thick in Trench 8.

- 5.5.27 In turn, sand bedding deposits, ([1/2], Trench 1; [3/2], Trench 3; [4/10], Trench 4; [5/3], Trench 5; [6/4], Trench 6; [7/3], Trench 7a; [7/13], Trench 7b; [8/6], Trench 8; [9/2], Trench 9; [10/2], Trench 10a; [10/10], Trench 10b; [11/3] Trench 11 and [12/3], Trench 12), c. 80mm thick, overlay the concrete sub-base at each location.
- 5.5.28 The surface itself ([1/1], Trench 1; [3/1], Trench 3; [4/9], Trench 4; [5/2], Trench 5; [6/3], Trench 6; [7/2], Trench 7a; [7/12], Trench 7b; [8/2], Trench 8; [9/1], Trench 9; [10/1], Trench 10a; [10/9], Trench 10b; [11/2], Trench 11 and [12/2], Trench 12) was built with roughly hewn rectangular sandstone setts (average 270mm x 150mm x 160mm thick), bonded with black bitumen. The sett surface was recorded at minimum and maximum heights of 26.05m OD in Trench 11, in the south-eastern part of the site, and 27.07m OD in Trench 3, at the north-western extent of the site, respectively.

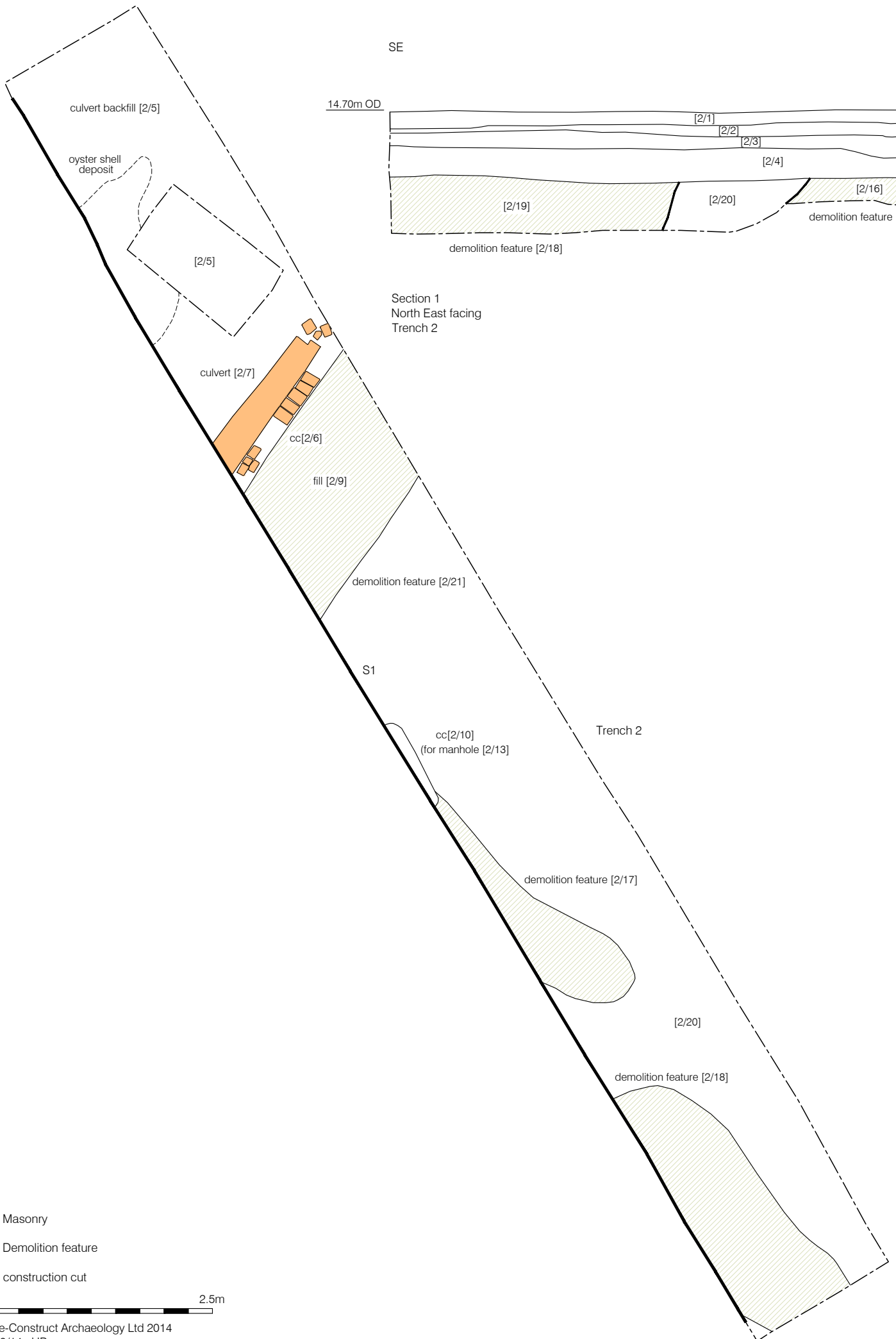
5.6 Phase 6: Modern



- 5.6.1 Surface drainage structure [2/13] in Trench 2 had been capped by a concrete slab, [2/15], recorded in section measuring 0.68m NW-SE and 0.28m thick. This was presumably undertaken when the original sett surface had been removed and a c. 0.12m thick concrete slab surface, [2/1], and associated c. 0.16m thick brick rubble bedding deposit, [2/2], were laid down.
- 5.6.2 In Trenches 4, 5, 6, 7a, 7b, 8, 10a and 10b, 11 and 12, 20th-century concrete surfaces ([4/8], Trench 4; [5/1], Trench 5; [7/1], Trench 7a; [7/11], Trench 7b; [8/1]; [10/8], Trench 10; [11/1], Trench 11 and [12/1], Trench 12), of varying thicknesses, directly overlay the sett surface. Concrete surfaces, [6/1] in Trench 6 and [8/14] in Trench 8, overlay c. 0.14m thick rubble bedding deposits, [6/2] and [8/15], respectively.
- 5.6.3 At the south-western end of Trench 8, a substantial brick inspection chamber, [8/8], was recorded within a broad construction cut, [8/4] (Figure 10). The chamber measured 0.60m x 0.60m square and was at least 2.50m deep. It was built with unfrogged moulded red bricks (230mm x 115mm x 65mm), bonded by cementitious mortar. From the chamber, drainage features extended for a distance of at least 5.50m NE-SW and at least 1.30m north-south, continuing beyond the limits of excavation, and were up to 1m wide. The chamber construction cut and the associated drainage features were backfilled with sandy silt, [8/3]. Around the chamber and associated drainage features, the sandstone setts had been lifted and re-laid, [8/5].
- 5.6.4 Towards the north-eastern end of Trench 8 was a brick wall, [8/12], which extended across the trench and was uniformly 0.48m wide and 0.28m high. It was constructed with unfrogged red bricks (220mm x 100mm x 65mm), bonded by cementitious mortar. The wall was recorded within a broad construction cut, [8/16], also incorporating the concrete surface, [8/14] and a rubble bedding deposit, [8/15]. This wall was observed in the concrete surface extending from the corner of a brick pillar to the north-west, across Trench 8 to the corner of a brick pillar to the south-east and probably represents an early 20th-century partition wall, forming a separate bay.

5.6.5 A substantial feature, [9/11], was recorded truncating the sett surface, [9/1], in Trench 9 and measured at least 1.80m NE-SW by 1.60m NW-SE and was at least 1.22m deep (Figure 11). Its backfill, [9/10], comprised sandy silt. This feature probably represents a recent geotechnical/engineering sample excavation to test the depth of the adjacent wall foundation. At the location of the test-pit the setts had been re-laid, [9/9].



Section 1
North East facing
Trench 2



-  Masonry
-  Demolition feature

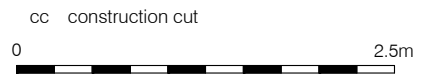
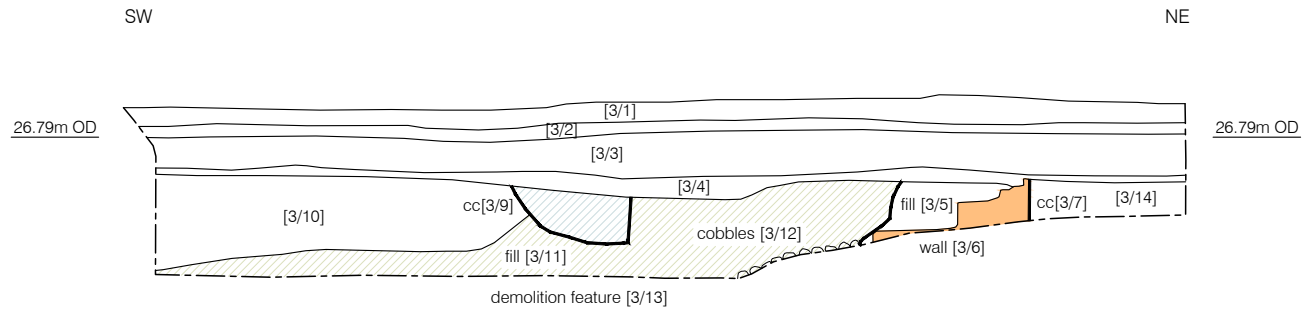
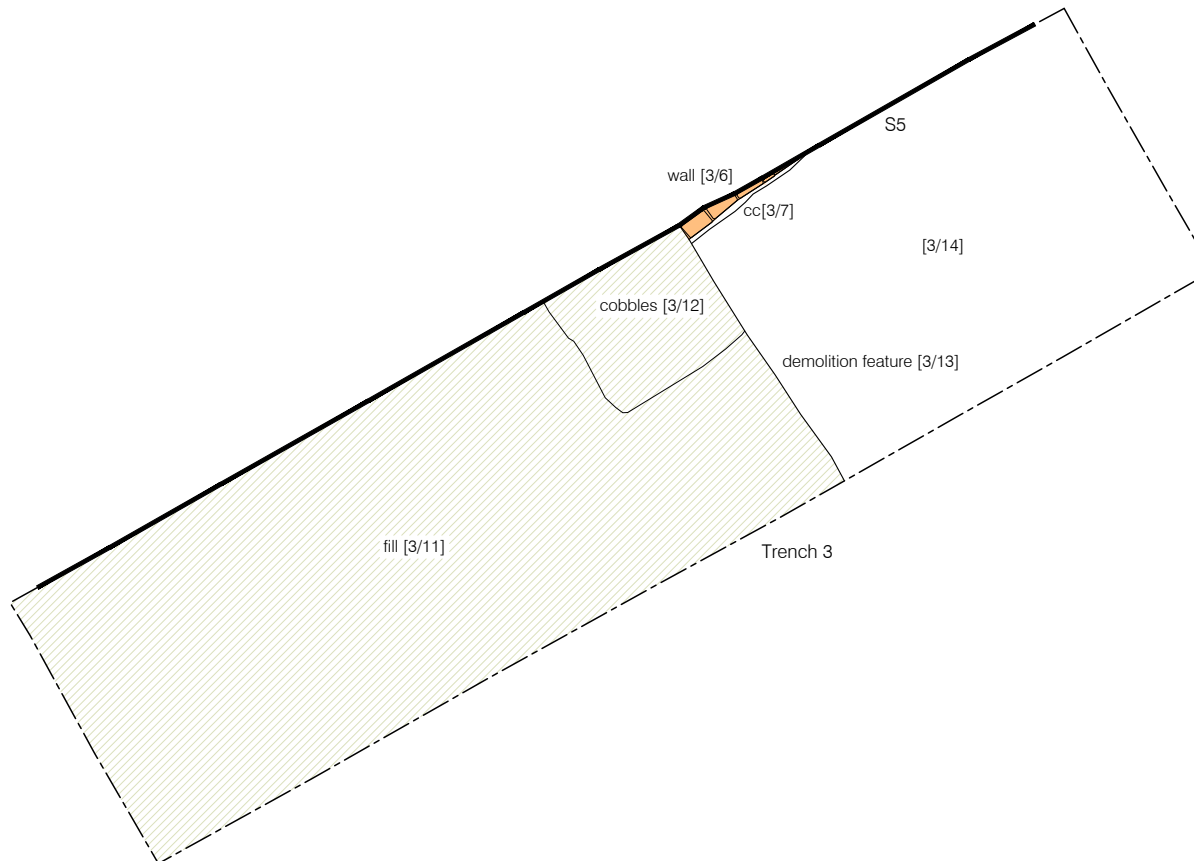





Figure 4
Trench 2 Plan & Section 1
1:50 at A3



Section 5
South East facing
Trench 3



-  Masonry
-  Demolition feature
-  Drainage feature

cc construction cut



Figure 5
Trench 3 Plan & Section 5
1:50 at A4

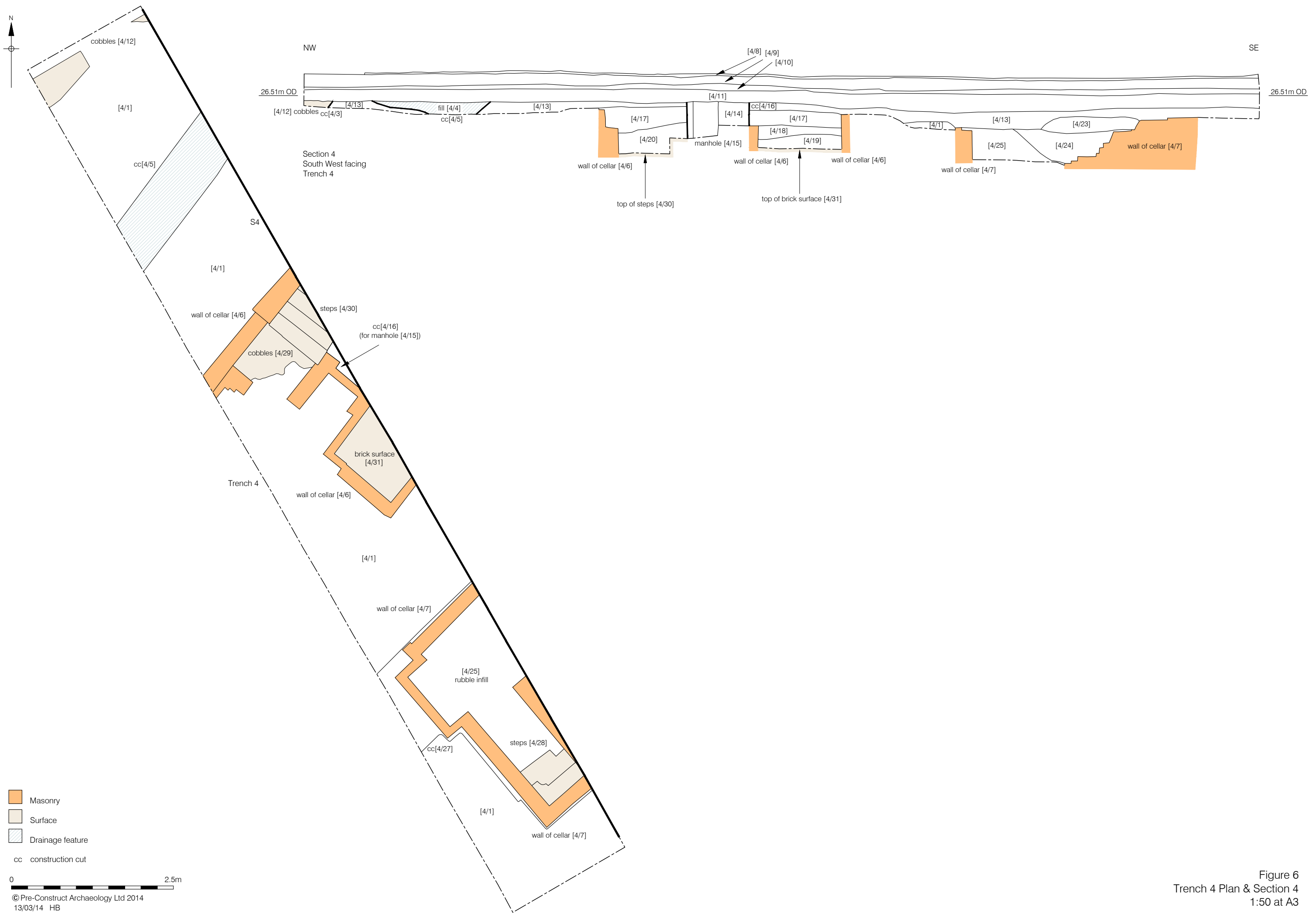
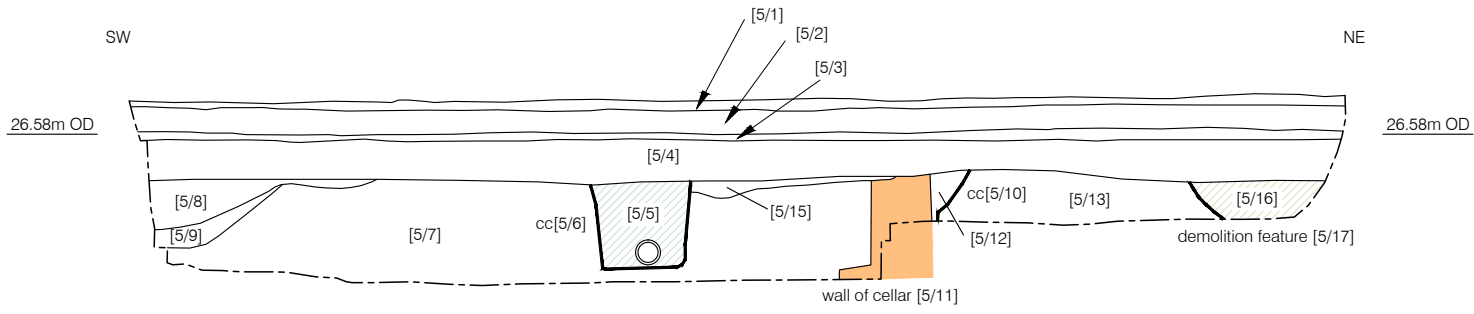
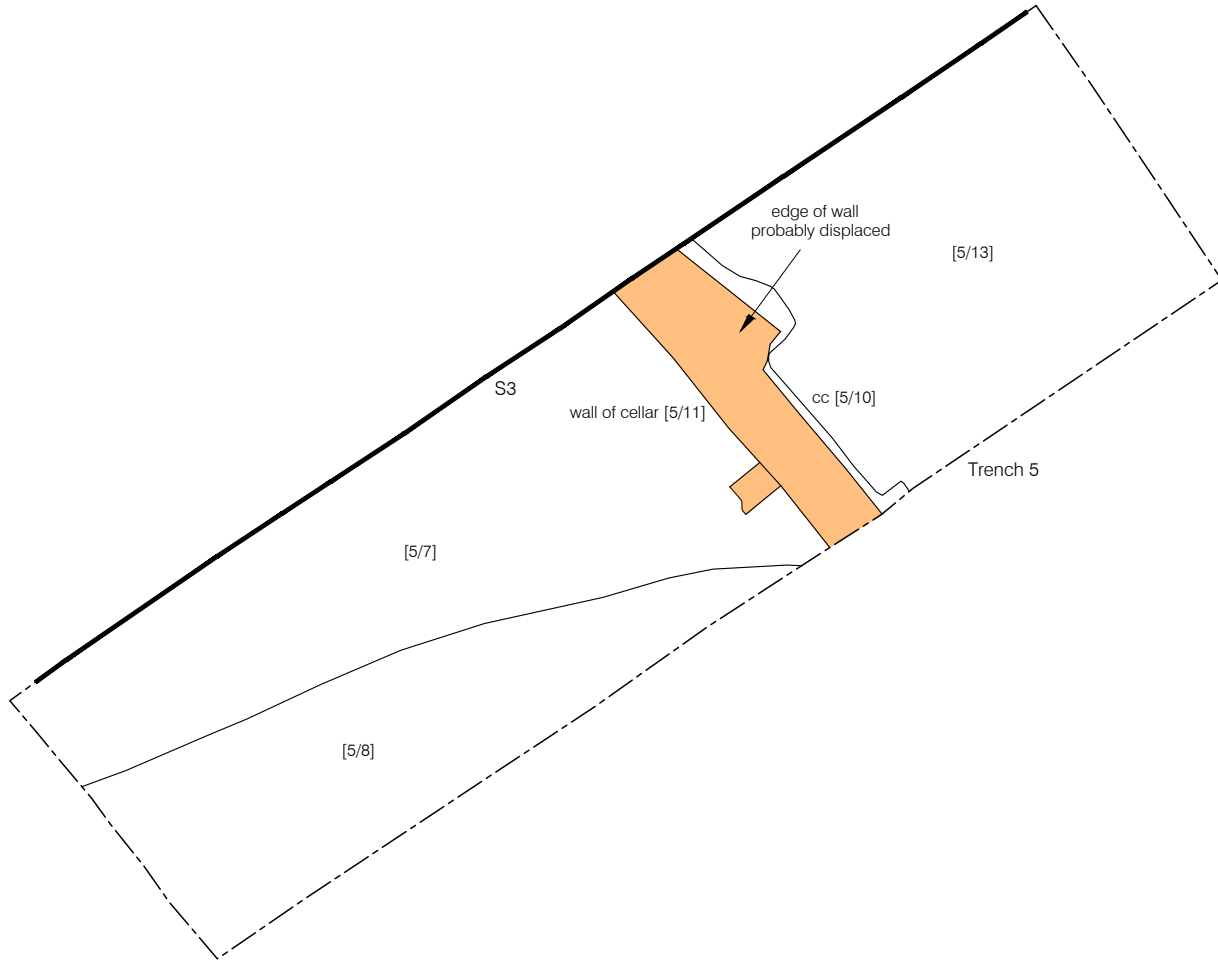





Figure 6
Trench 4 Plan & Section 4
1:50 at A3



Section 3
South East facing
Trench 5

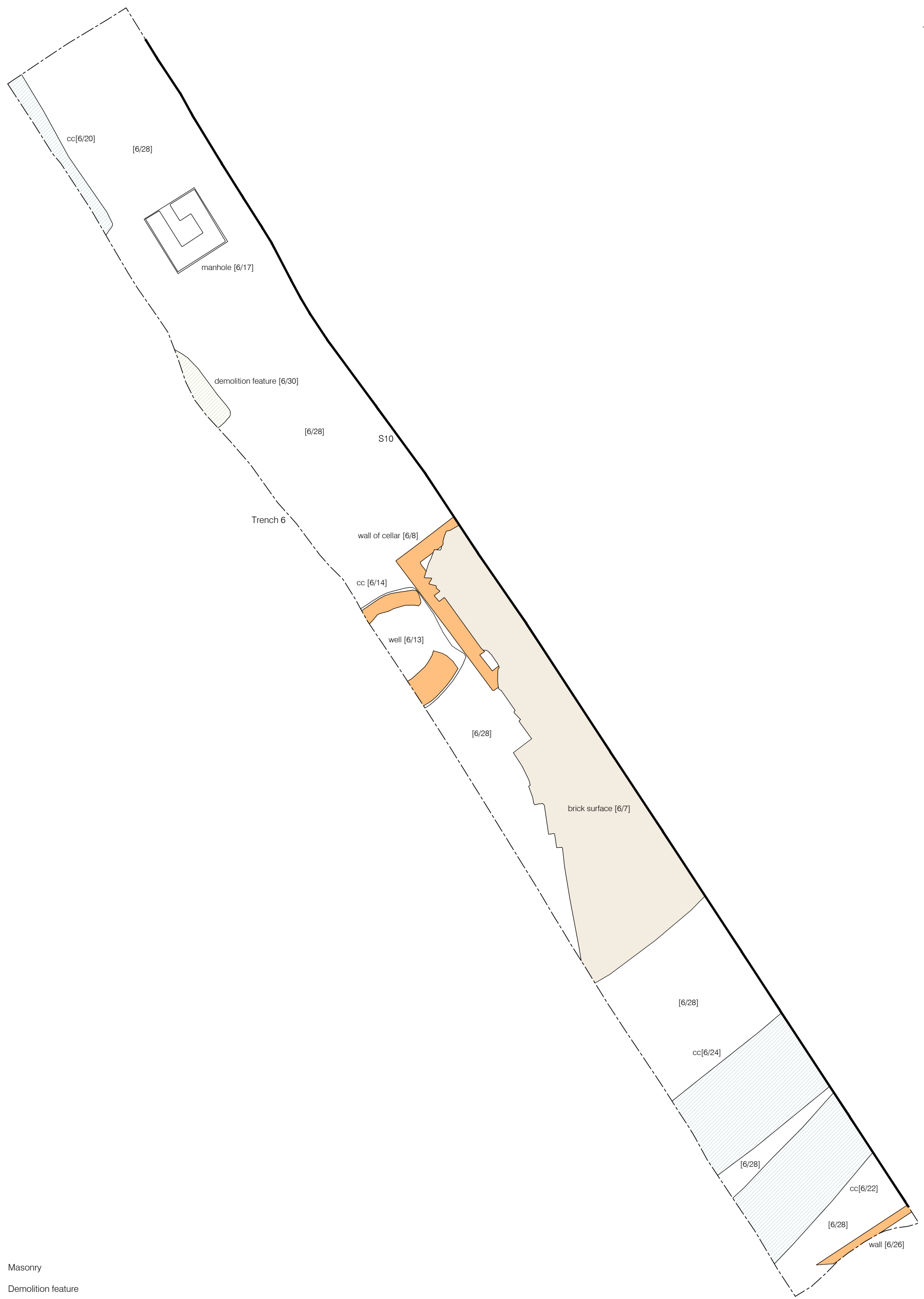


-  Masonry
-  Demolition feature
-  Drainage feature

cc construction cut



Figure 7
Trench 5 Plan & Section 3
1:50 at A4






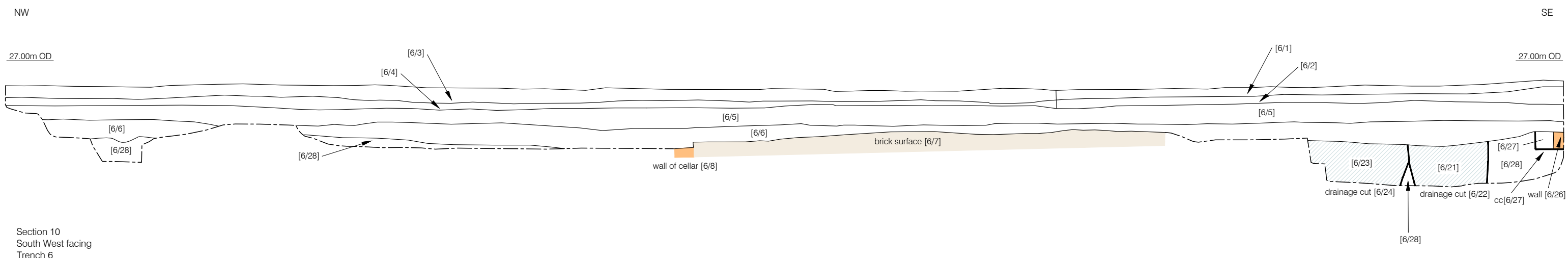
-  Masonry
-  Demolition feature
-  Drainage feature
- cc construction cut

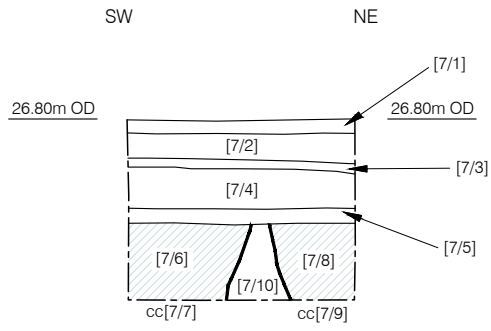


Figure 8a
Trench 6 Plan
1:50 at A3

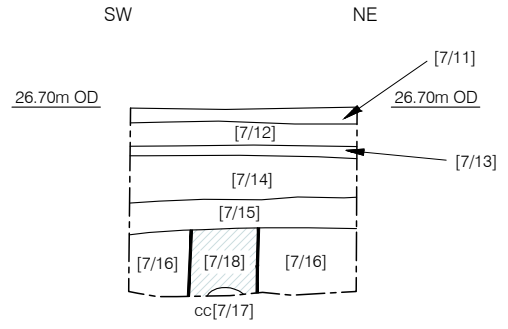


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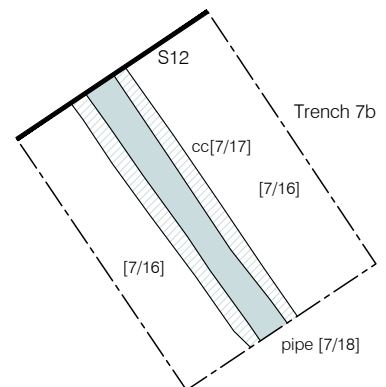
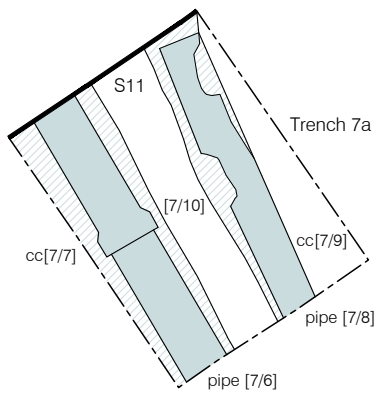
Figure 8b
Trench 6, Section 10
1:50 at A3



Section 11
South East facing
Trench 7a



Section 12
South East facing
Trench 7b

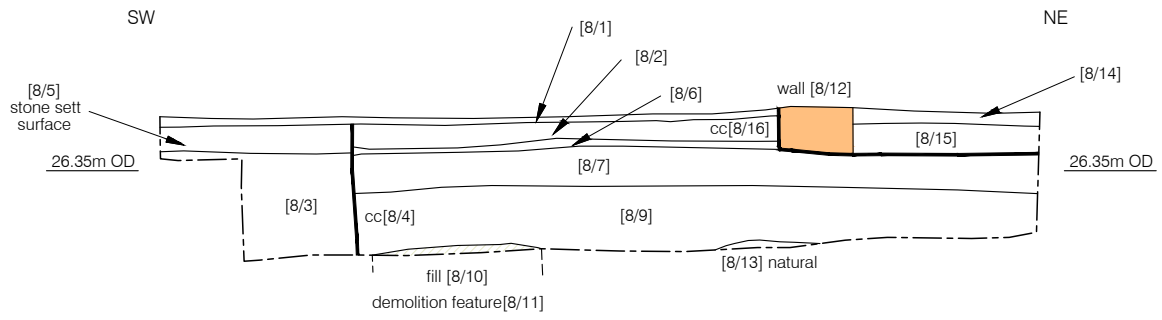


Drainage feature

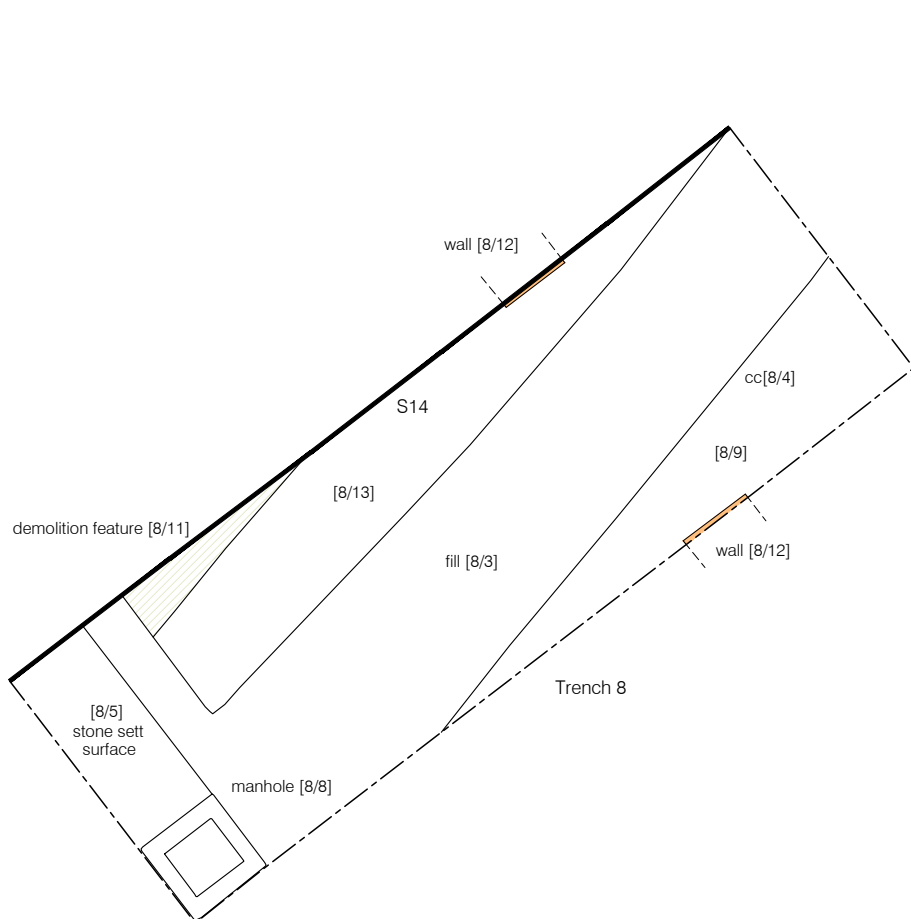
cc construction cut

0 2.5m

Figure 9
Trenches 7a & 7b Plans & Sections 11 & 12
1:50 at A4



Section 14
South East facing
Trench 8

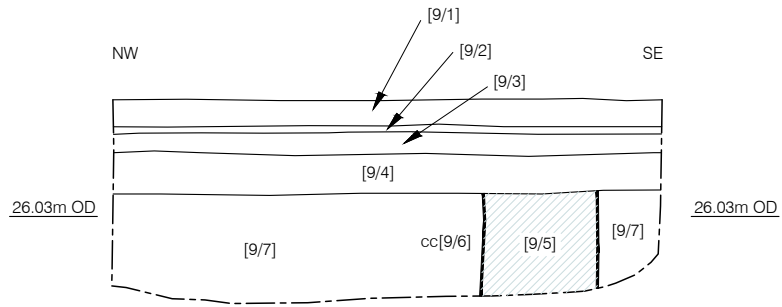


- Masonry
- Demolition feature

cc construction cut




Figure 10
Trench 8 Plan & Section 14
1:50 at A4



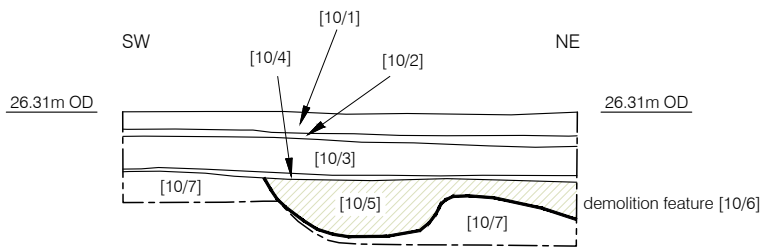
Section 13
South West facing
Trench 9



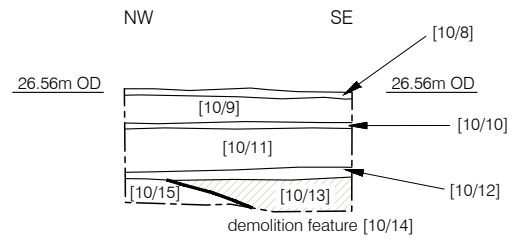
 Drainage feature

cc construction cut





Section 8
South East facing
Trench 10a



Section 9
South West facing
Trench 10b

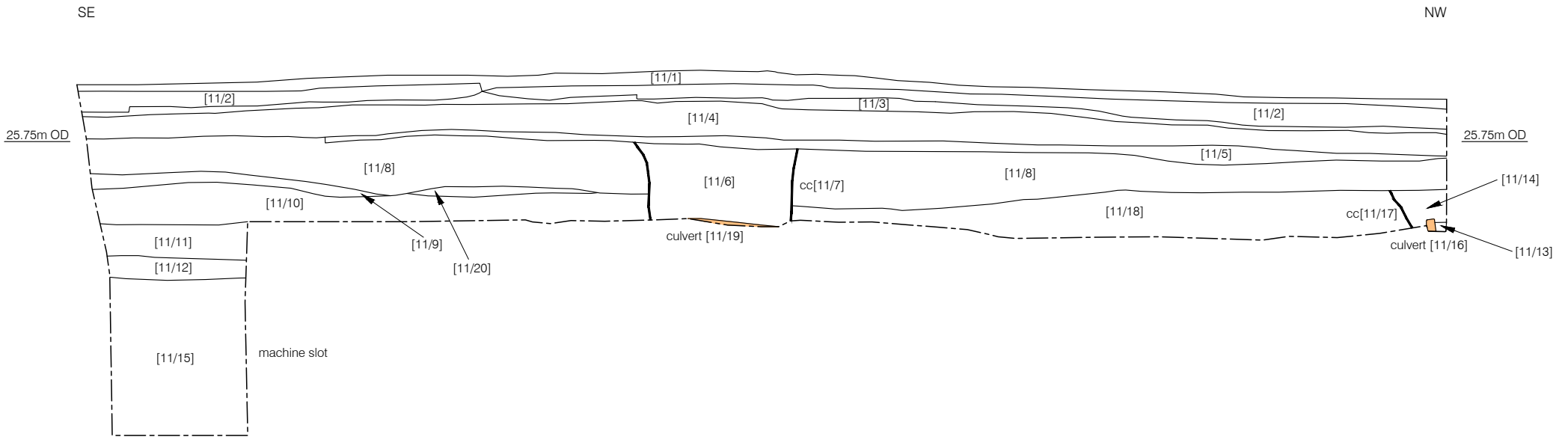


 Demolition feature

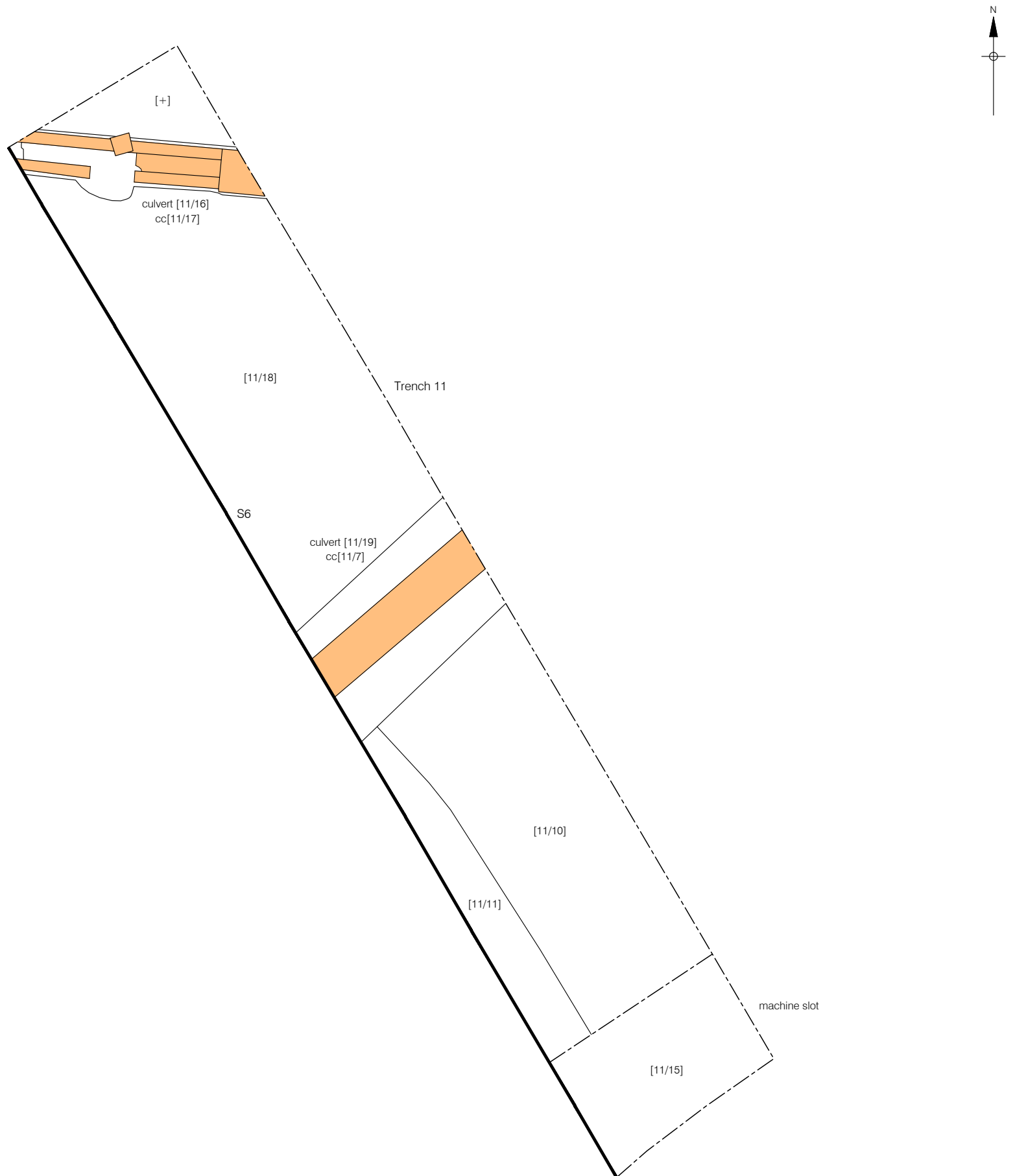
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Figure 12
Trenches 10a & 10b Plans & Sections 8 & 9
1:50 at A4



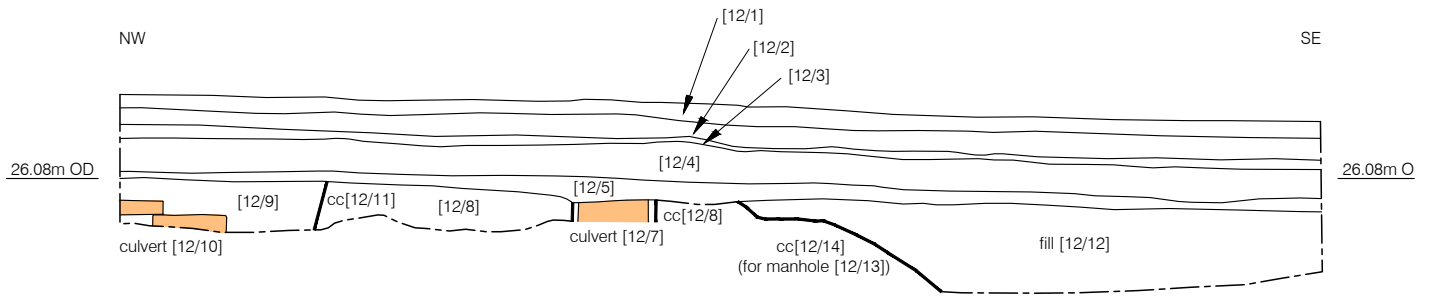
Section 6
North East facing
Trench 11



 Masonry


cc construction cut





Section 7
South West facing
Trench 12



 Masonry

cc construction cut



Figure 14
Trench 12 Plan & Section 7
1:50 at A4



Figure 15
 Structural remains overlain on 1849 Ordnance Survey map
 1:625 at A4

6. CONCLUSIONS AND RECOMMENDATION

6.1 Conclusions

- 6.1.1 The evaluation aimed to address a series of specific research questions, as set out in the Research Objectives (Section 3.2). A concluding summary of the recorded evidence relevant to each objective is set out below.

Natural Topography of the Site

- 6.1.2 Sandstone bedrock, which represents part of the Triassic sandstone bedrock of the Chester Pebble Beds Formation, was exposed only at the north-eastern extent of Trench 1, in the northernmost part of the site. Bedrock was recorded at a height of 22.65m OD, at a depth of c. 3.50m below existing ground level, and was directly overlain by a c. 0.70m thick fluvial deposit.
- 6.1.3 Fluvial clayey sand deposits were recorded within all trenches investigated, with the exception of Trench 11, located in the south-eastern part of the site, nearest to the River Irwell. The level at which fluvial deposits were recorded varied from c. 26.40m OD in Trench 4, in the north-western part of the site, to c. 25.50m OD in Trench 9, in the south-western part of the site. The depth at which fluvial material was encountered below existing ground level varied from a minimum c. 0.50m, in Trenches 1, 3, 5, 6, and 10a, to a maximum of c. 1.20m in Trench 9. These heights reflect the natural topography of the site, with a slope down to the south-east towards the Irwell. However, the drop in natural ground level is more pronounced in the south-eastern part of the site; natural deposits were not reached in Trench 11 at the maximum excavated height of 23.25m OD, this at a depth of 3.20m below present ground level.
- 6.1.4 The site has evidently seen substantial ground raising and levelling, beginning with reclamation of the western margin of the Irwell during the post-medieval period, possibly earlier, but mainly as a result of later post-medieval occupation. The need for dry land in the backlots of properties fronting onto Greengate increased in this era, culminating in the construction of the Exchange Station viaduct in the 1880s, a significant construction episode which effectively saw the sloping natural topography of the site levelled-out.

Prehistoric and Roman Activity

- 6.1.5 The previous desk-based studies suggested that there was a low potential for the presence of prehistoric and Roman activity at the site and this was confirmed by the evaluation. No evidence for activity of either period was encountered, either as archaeological features or residual artefactual material.

Early Medieval Activity

- 6.1.6 No evidence was encountered for early medieval activity at the site, either as archaeological features or residual material. No evidence was recorded which could confirm whether or not some or all of the site lay within undeveloped agricultural land during this period.

Late Medieval and Early Post-Medieval Activity

- 6.1.7 It is considered likely that the site was first developed during the late medieval period, forming the easternmost part of the historic core of Salford, which is generally considered to be the triangular area, within a bend in the River Irwell, formed by Chapel Street, Greengate and Gravel Lane, or earlier versions of these thoroughfares. Based upon the sustained structural development of the frontages of both Chapel Street and Greengate, and the usage of external areas, from the late medieval period onwards, the site was considered to have high potential for the presence of late medieval and post-medieval remains, including structures, features and deposits relating to domestic occupation, as well as trade and industrial activity.
- 6.1.8 No horizontal stratigraphy of late medieval or early post-medieval date was recorded at the site. The only possible evidence for late medieval or early post-medieval occupation was a stone-lined well, recorded in the central part of Trench 6. Located in the south-western part of the site, the well presumably lay within the backlot of a property that fronted Greengate; a map of c. 1650 shows that, by this date, buildings lined the entire street frontage of Greengate. No dating evidence was recovered from the excavated portion of the structure; it was not possible to fully excavate the backfill deposits. There remains the possibility that dating evidence for abandonment could be found in lower deposits and, equally, dating evidence for the construction of the well may be contained within the unexcavated construction cut backfill. The only clues to the period of origin of the well lie in its form of construction and the fact that that it pre-dates a cellar wall which may be of 18th- or 19th-century date.

Mid-Post-Medieval Development

- 6.1.9 Cartographic evidence charts the development of the site during the 18th and 19th centuries and a specific research objective was to determine if any archaeological evidence for activity of this date survived below ground.
- 6.1.10 Although no horizontal stratigraphy of mid-post-medieval date was recorded at the site, structural evidence of 18th- or 19th-century date was recorded in all trenches, with the exception of Trenches 7a, 7b, 8 and 9, all situated in the south-westernmost part of the site, along the Greengate frontage.

Backlots of Greengate properties

- 6.1.11 Possible evidence for the demolition of structures which could pre-date the brewery shown on Green's 1794 map was recorded in Trench 1. The fragmentary remains of a NW-SE aligned wall, recorded in the south-western part of that trench, were also likely of 18th-century date, again potentially representing a structure which stood in the Greengate backlots prior to the brewery or possibly the brewery itself.
- 6.1.12 The north-western side of a substantial brick culvert was located within the central part of Trench 1 and what was probably the corresponding south-eastern side was encountered to the south, in Trench 2. This structure, NE-SW aligned, would have been of significant dimension, c. 5.0m wide, and may have been associated with water supply and power for the brewery and/or the subsequent cotton mill. Evidence of structural demolition recorded in the north-eastern part of Trench 1 probably represents demolition of the cotton mill.

- 6.1.13 A north-south aligned brick and sandstone drain, truncated by a similar NE-SW aligned drain, were recorded in Trench 12. These structures potentially pre-date the brewery, but equally could have been associated with it, although probably lying outwith the footprint of the main building.
- 6.1.14 To the south-east, in Trench 11, another brick and sandstone drain likely represents late 18th- or early 19th-century drainage activity within a previously marginal area overlooking the Irwell, which, by 1849, was in use as a 'Horse and Carriage Bazaar'.

The Greengate frontage and associated buildings

- 6.1.15 Part of a substantial brick cellar was exposed within Trench 6, which had been sited to investigate the remains of a dye works and the Polytechnic Tavern, as illustrated on the 1849 Ordnance Survey map. It was not possible to investigate the cellar as, following infilling, it had been overlain by a brick surface. The cellar may have been built in association with buildings depicted on 18th-century maps to the rear of the street frontage properties, or indeed it may have been a component of the building used as the 19th-century dye works, while the brick surface may have also been associated with that manufactory.
- 6.1.16 Trench 4 was sited to investigate what appeared to be rows of adjoining small dwellings ('workers' housing') to the rear of the frontage, along Barrow's Court to the north-west and Nuttall's Court to the south-east, as illustrated on the 1849 Ordnance Survey map. Two well-preserved brick cellars were recorded. It was not possible to reveal the base of the south-easternmost cellar, but structural remains of a stairwell and the upper part of two sides of the walls were recorded. The cellar in the central part of the trench was particularly well preserved and a cobbled surface lead to steps which survived *in situ*. The base of this cellar comprised a brick and sandstone floor. A relatively large artefactual and ecofactual assemblage recovered from the cellar backfill included pottery, clay tobacco pipe, glass and metal, which collectively indicate that the cellar was backfilled in the late 19th century, probably ahead of the construction of the Exchange Station viaduct. A portion of cobbled surface at the north-western end of the trench may represent part of the external surface of Barrow's Court.
- 6.1.17 Back-to-back 'workers' housing' was a typical feature of 19th-century urban development in the region, where it was built to cater for the rapidly growing population. As here, such dwellings were often located to the rear of long-established street frontage buildings, accessed along narrow passageways through the developed frontage, and were often constructed following clearance of medieval or early post-medieval buildings. Such dwellings were often cellared, with subterranean spaces even utilised as dwellings, such was the pressure on accommodation. Trench 4 was sited across adjoining rows of back-to-back houses shown on the 1849 map and the position and alignment of the cellars recorded within the trench indicate that that these likely represent cellars of the houses depicted.
- 6.1.18 Structural remains of another cellar were recorded to the south-west, in Trench 5. A NW-SE aligned wall recorded in the trench probably represents the back wall of a property which fronted onto Greengate. It was not possible to expose the base of this cellar, but as with other cellars investigated, the excavated backfill deposits produced artefactual material indicating a deposition date in the late 19th century.

- 6.1.19 Trench 3 was sited to investigate buildings fronting onto Greengate in the north-western corner of the site; the south-western part of the trench was occupied by demolition material which may represent an infilled cellar of a frontage property. An earlier brick wall, on a slightly different alignment, may be associated with an 18th- or 19th-century building.

All Past Impacts on the Archaeological Resource

- 6.1.20 No horizontal stratigraphy, such as successive occupation deposits *etc.*, of medieval or post-medieval date, was recorded by the evaluation. Development prior to the construction of the Exchange Station viaduct in the 1880s may have removed earlier archaeological deposits towards the Greengate frontage. Medieval and post-medieval strata are less likely to have accumulated in the eastern part of the site, which, until canalisation of the Irwell in the later post-medieval period, was marginal land.
- 6.1.21 Horizontal stratigraphy of medieval or post-medieval date – potentially only ever present in the western part of the site - was likely removed wholesale from the site as result of ground preparation for the construction of the Exchange Station viaduct in the 1880s. The viaduct itself will certainly have removed all archaeological remains within the footprint of each of its footings. It is concluded, therefore, that, in terms of archaeological remains of importance, only deeply-cut subterranean features – for the most part structural - of medieval and post-medieval date probably survive at the site, and these only in areas not affected by the viaduct footings.

6.2 Recommendation

- 6.2.1 The results of the evaluation, as set out in this report, will be used by the GMAAS to make a decision regarding any requirement for, and scope of, further archaeological work at the site.

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http://services.salford.gov.uk/saved-udp/section_d228681e122.html

University of Leicester Special Collections Online website (including *Historical Directories of England and Wales*):

<http://cdm16445.contentdm.oclc.org/cdm/landingpage/collection/p16445coll4>

8. ACKNOWLEDGEMENTS AND CREDITS

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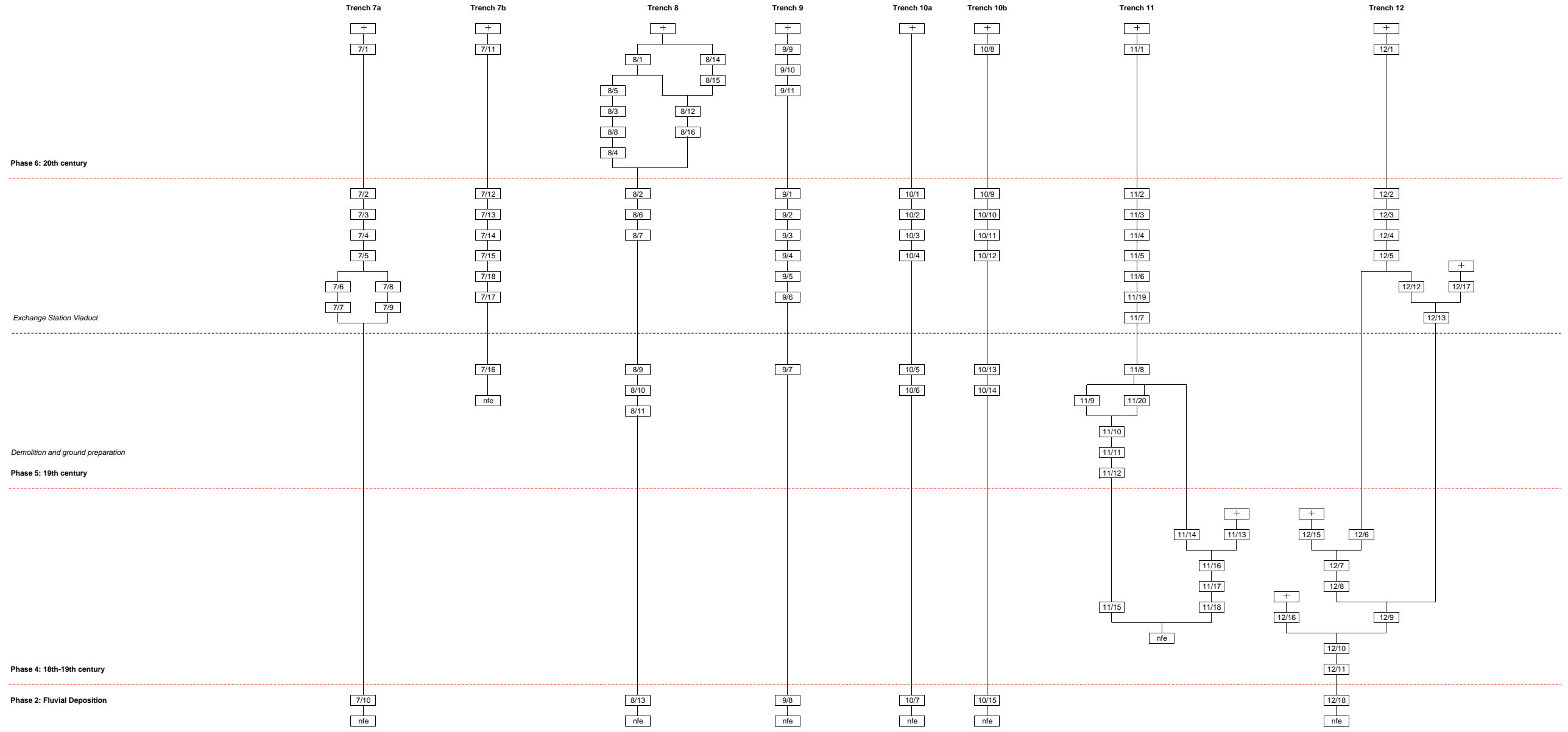
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APPENDIX 1
STRATIGRAPHIC MATRICES

GSM 14: STRATIGRAPHIC MATRICES



**APPENDIX 2
CONTEXT INDEX**

GSM 14: CONTEXT INDEX

Context	Trench	Phase	Type 1	Type 2	Interpretation
1/1	1	5	Masonry	Surface	Sandstone sett surface
1/2	1	5	Deposit	Layer	Sand bedding for surface [1/1]
1/3	1	5	Deposit	Layer	Concrete bedding for surface [1/1]
1/4	1	5	Deposit	Layer	Levelling deposit
1/5	1	5	Deposit	Fill	Fill of drainage feature [1/6]
1/6	1	5	Cut	Linear	Drainage feature, filled by [1/5]
1/7	1	5	Deposit	Fill	Fill of demolition feature [1/8]
1/8	1	5	Cut	Discrete	Demolition feature, filled by [1/7]
1/9	1	4	Masonry	Wall	Brick wall
1/10	1	4	Cut	Linear	Construction cut for wall [1/9]
1/11	1	5	Deposit	Fill	Fill of demolition feature [1/34]
1/12	1	4	Deposit	Fill	Fill of substantial feature [1/33]
1/13	1	4	Deposit	Fill	Fill of substantial feature [1/33]
1/14	1	4	Cut	Linear	Construction cut for culvert [1/26]
1/15	1	5	Deposit	Fill	Fill of drainage feature [1/16]
1/16	1	5	Cut	Linear	Drainage feature, filled by [1/15]
1/17	1	2	Deposit	layer	Natural fluvial deposit
1/18	1	5	Deposit	Fill	Fill of demolition feature [1/19]
1/19	1	5	Cut	Discrete	Demolition feature, filled by [1/18]
1/20	1	5	Deposit	Fill	Fill of demolition feature [1/21]
1/21	1	5	Cut	Discrete	Demolition feature, filled by [1/20], [1/32]
1/22	1	5	Deposit	Layer	Demolition / levelling
1/23	1	5	Deposit	Fill	Fill of drainage feature [1/24]
1/24	1	5	Cut	Linear	Drainage feature, filled by [1/23]
1/25	1	4	Deposit	Fill	Backfill of culvert [1/26]
1/26	1	4	Masonry	Structure	Brick culvert
1/27					<i>number not used</i>
1/28	1	4	Cut	Discrete	Possible demolition feature, filled by [1/29]
1/29	1	4	Deposit	Fill	Fill of demolition feature [1/28]
1/30	1	5	Deposit	Fill	Fill of demolition feature [1/31]
1/31	1	5	Cut	Discrete	Demolition feature, filled by [1/30]
1/32	1	5	Deposit	Fill	Fill of demolition feature [1/21]
1/33	1	4	Cut	Discrete	Substantial feature, filled by [1/12], [1/13]
1/34	1	5	Cut	Discrete	Demolition feature, filled by [1/11]
1/35	1	1	Deposit	Layer	Natural bedrock
2/1	2	6	Deposit	Layer	Concrete surface
2/2	2	6	Deposit	Layer	Brick rubble bedding for surface [2/1]
2/3	2	5	Deposit	Layer	Concrete sub-base for removed stone setts
2/4	2	5	Deposit	Layer	Levelling deposit
2/5	2	4	Deposit	Fill	Backfill of culvert [2/7]
2/6	2	4	Cut	Linear	Construction cut for culvert [2/7]
2/7	2	4	Masonry	Structure	Brick culvert
2/8	2	4	Deposit	Fill	Backfill of construction cut [2/6]
2/9	2	4	Deposit	Fill	Fill of substantial feature [2/21]
2/10	2	5	Cut	Discrete	Construction cut for inspection chamber [2/13]
2/11	2	5	Deposit	Fill	Backfill of construction cut [2/10]
2/12	2				<i>number not used</i>
2/13	2	5	Masonry	Structure	Brick inspection chamber
2/14	2				<i>number not used</i>
2/15	2	6	Deposit	Layer	Concrete and rubble cap for inspection chamber [2/13]
2/16	2	5	Deposit	Fill	Fill of demolition feature [2/17]
2/17	2	5	Cut	Linear	Demolition feature filled by [2/16]
2/18	2	5	Cut	Linear	Demolition feature filled by [2/19]
2/19	2	5	Deposit	Fill	Fill of demolition feature [2/18]
2/20	2	2	Deposit	Layer	Natural fluvial deposit
2/21	2	4	Cut	Linear	Demolition feature filled by [2/9]
3/1	3	5	Masonry	Surface	Sandstone sett surface
3/2	3	5	Deposit	Layer	Sand bedding for surface [3/1]
3/3	3	5	Deposit	Layer	Concrete sub-base for surface [3/1]
3/4	3	5	Deposit	Layer	Levelling deposit
3/5	3	4	Deposit	Fill	Backfill of construction cut [3/13]
3/6	3	4	Masonry	Wall	Brick wall
3/7	3	4	Cut	Linear	Construction cut for wall [3/6]

GSM 14: CONTEXT INDEX

Context	Trench	Phase	Type 1	Type 2	Interpretation
3/8	3	5	Deposit	Fill	Fill of drainage feature [3/9]
3/9	3	5	Cut	Linear	Drainage feature, filled by [3/8]
3/10	3	5	Deposit	Fill	Fill of demolition feature [3/13]
3/11	3	5	Deposit	Fill	Fill of demolition feature [3/13]
3/12	3	5	Deposit	Fill	Fill of demolition feature [3/13]
3/13	3	5	Cut	Discrete	Demolition feature, filled by [3/10], [3/11], [3/12]
3/14	3	2	Deposit	Layer	Natural fluvial deposit
4/1	4	2	Deposit	Layer	Natural fluvial deposit
4/2	4				<i>number not used</i>
4/3	4	4	Cut	Discrete	Construction cut for surface [4/12]
4/4	4	5	Deposit	Fill	Fill of drainage feature [4/5]
4/5	4	5	Cut	Linear	Drainage feature, filled by [4/4]
4/6	4	4	Masonry	Structure	Brick cellar
4/7	4	4	Masonry	Structure	Brick cellar
4/8	4	6	Deposit	Layer	Concrete surface
4/9	4	5	Masonry	Surface	Sandstone sett surface
4/10	4	5	Deposit	Layer	Sand bedding for surface [4/9]
4/11	4	5	Deposit	Layer	Concrete sub-base for surface [4/9]
4/12	4	4	Masonry	Surface	Cobble surface
4/13	4	5	Deposit	Layer	Levelling deposit
4/14	4	5	Deposit	Fill	Backfill of construction cut [4/16]
4/15	4	5	Masonry	Structure	Brick inspection chamber
4/16	4	5	Cut	Discrete	Construction cut for inspection chamber [4/15]
4/17	4	4	Deposit	Fill	Backfill of brick cellar [4/6]
4/18	4	4	Deposit	Fill	Backfill of cellar [4/6]
4/19	4	4	Deposit	Fill	Backfill of cellar [4/6]
4/20	4	4	Deposit	Fill	Backfill of cellar [4/6]
4/21	4	4	Deposit	Fill	Backfill of construction cut [4/22]
4/22	4	4	Cut	Discrete	Construction cut for cellar [4/6]
4/23	4	4	Deposit	Fill	Backfill of cellar [4/7]
4/24	4	4	Deposit	Fill	Backfill of cellar [4/7]
4/25	4	4	Deposit	Fill	Backfill of cellar [4/7]
4/26	4	4	Deposit	Fill	Backfill of construction cut [4/27]
4/27	4	4	Cut	Discrete	Construction cut for cellar [4/7]
4/28	4	4	Masonry	Structure	Sandstone steps within cellar [4/7]
4/29	4	4	Masonry	Surface	Cobble surface associated with cellar [4/6]
4/30	4	4	Masonry	Structure	Sandstone steps within cellar [4/6]
4/31	4	4	Masonry	Surface	Brick and sandstone surface associated with cellar [4/6]
5/1	5	6	Deposit	Layer	Concrete surface
5/2	5	5	Masonry	Surface	Sandstone sett surface
5/3	5	5	Deposit	Layer	Sand bedding for surface [5/2]
5/4	5	5	Deposit	Layer	Concrete sub-base for surface [5/2]
5/5	5	5	Deposit	Fill	Fill of drainage feature [5/6]
5/6	5	5	Cut	Linear	Drainage feature filled by [5/5]
5/7	5	4	Deposit	Layer	Backfill of cellar [5/11]
5/8	5	4	Deposit	Layer	Backfill of cellar [5/11]
5/9	5	4	Deposit	Layer	Backfill of cellar [5/11]
5/10	5	4	Cut	Discrete	Construction cut for wall [5/11]
5/11	5	4	Masonry	Wall	Brick wall
5/12	5	4	Deposit	Fill	Backfill of construction cut [5/10]
5/13	5	2	Deposit	Layer	Natural fluvial deposit
5/14	5	4	Deposit	Fill	Backfill of cellar [5/11]
5/15	5	5	Deposit	Fill	Backfill of cellar [5/11]
5/16	5	5	Deposit	Fill	Fill of demolition feature [5/17]
5/17	5	5	Cut	Discrete	Demolition feature, filled by [5/16]
6/1	6	6	Deposit	layer	Concrete surface
6/2	6	6	Deposit	layer	Rubble sub-base for surface [6/1]
6/3	6	5	Masonry	Surface	Sandstone sett surface
6/4	6	5	Deposit	layer	Sand bedding for surface [6/3]
6/5	6	5	Deposit	layer	Concrete sub-base for surface [6/3]
6/6	6	5	Deposit	layer	Levelling deposit
6/7	6	4	Masonry	Surface	Brick surface
6/8	6	4	Masonry	Structure	Brick cellar

GSM 14: CONTEXT INDEX

Context	Trench	Phase	Type 1	Type 2	Interpretation
6/9	6	4	Deposit	Fill	Backfill of construction cut [6/10]
6/10	6	4	Cut	Discrete	Construction cut for cellar [6/8]
6/11	6	3	Deposit	Fill	Backfill of construction cut [6/14]
6/12	6	3	Deposit	Fill	Fill of well [6/13]
6/13	6	3	Masonry	Well	Stone-lined well
6/14	6	3	Cut	Discrete	Construction cut for well [6/13]
6/15	6	5	Deposit	Fill	Backfill of construction cut [6/18]
6/16	6	5	Deposit	Fill	Backfill of inspection chamber [6/17]
6/17	6	5	Masonry	Structure	Brick inspection chamber
6/18	6	5	Cut	Discrete	Construction cut for inspection chamber [6/17]
6/19	6	5	Deposit	Fill	Fill of drainage feature [6/20]
6/20	6	5	Cut	Linear	Drainage feature, filled by [6/19]
6/21	6	5	Deposit	Fill	Fill of drainage feature [6/22]
6/22	6	5	Cut	Linear	Drainage feature, filled by [6/21]
6/23	6	5	Deposit	Fill	Fill of drainage feature [6/24]
6/24	6	5	Cut	Linear	Drainage feature, filled by [6/23]
6/25	6	4	Deposit	Fill	Backfill of construction cut [6/27]
6/26	6	4	Masonry	Wall	Brick wall
6/27	6	4	Cut	Linear	Construction cut for wall [6/26]
6/28	6	2	Deposit	layer	Natural fluvial deposit
6/29	6	5	Deposit	Fill	Fill of demolition feature [6/30]
6/30	6	5	Cut	Discrete	Demolition feature, filled by [6/29]
7/1	7a	6	Deposit	Layer	Concrete surface
7/2	7a	5	Masonry	Surface	Sandstone sett surface
7/3	7a	5	Deposit	Layer	Sand bedding for surface [7/2]
7/4	7a	5	Deposit	Layer	Concrete sub-base for surface [7/2]
7/5	7a	5	Deposit	Layer	Levelling deposit
7/6	7a	5	Deposit	Fill	Fill of drainage feature [7/7]
7/7	7a	5	Cut	Linear	Drainage feature, filled by [7/6]
7/8	7a	5	Deposit	Fill	Fill of drainage feature [7/9]
7/9	7a	5	Cut	Linear	Drainage feature, filled by [7/8]
7/10	7a	2	Deposit	Layer	Natural fluvial deposit
7/11	7b	6	Deposit	Layer	Concrete surface
7/12	7b	5	Masonry	Surface	Sandstone sett surface
7/13	7b	5	Deposit	Layer	Sand bedding for surface [7/12]
7/14	7b	5	Deposit	Layer	Concrete sub-base for surface [7/12]
7/15	7b	5	Deposit	Layer	Levelling deposit
7/16	7b	5	Deposit	Layer	Levelling deposit
7/17	7b	5	Cut	Linear	Drainage feature, filled by [7/18]
7/18	7b	5	Deposit	Fill	Fill of drainage feature [7/17]
8/1	8	6	Deposit	Layer	Concrete surface
8/2	8	5	Masonry	Surface	Sandstone sett surface
8/3	8	6	Deposit	Fill	Fill of drainage feature [8/4]
8/4	8	6	Cut	Linear	Drainage feature, filled by [8/3]
8/5	8	6	Masonry	Surface	Replacement sandstone sett surface
8/6	8	5	Deposit	Layer	Sand bedding for surface [8/2]
8/7	8	5	Deposit	Layer	Concrete sub-base for surface [8/2]
8/8	8	6	Masonry	Structure	Brick inspection chamber
8/9	8	5	Deposit	Layer	Levelling deposit
8/10	8	5	Deposit	Fill	Fill of demolition feature [8/11]
8/11	8	5	Cut	Linear	Demolition feature, filled by [8/10]
8/12	8	6	Masonry	Wall	Brick wall
8/13	8	2	Deposit	Layer	Natural fluvial deposit
8/14	8	6	Deposit	Layer	Concrete surface
8/15	8	6	Deposit	Layer	Sub-base for concrete surface [8/14]
8/16	8	6	Cut	Discrete	Construction cut for wall [8/12] and associated surface [8/14]
9/1	9	5	Masonry	Surface	Sandstone sett surface
9/2	9	5	Deposit	Layer	Sand bedding for surface [9/1]
9/3	9	5	Deposit	Layer	Concrete sub-base for surface [9/1]
9/4	9	5	Deposit	Layer	Levelling deposit
9/5	9	5	Deposit	Fill	Fill of drainage feature [9/6]
9/6	9	5	Cut	Linear	Drainage feature, filled by [9/5]
9/7	9	5	Deposit	Layer	Levelling deposit

GSM 14: CONTEXT INDEX

Context	Trench	Phase	Type 1	Type 2	Interpretation
9/8	9	2	Deposit	Layer	Natural fluvial deposit
9/9	9	6	Masonry	Surface	Replacement sandstone sett surface
9/10	9	6	Deposit	Fill	Fill of modern intrusion [9/11]
9/11	9	6	Cut	Discrete	Modern intrusion, filled by [9/10]
10/1	10a	5	Masonry	Surface	Sandstone sett surface
10/2	10a	5	Deposit	Layer	Sand bedding for surface [10/1]
10/3	10a	5	Deposit	Layer	Concrete sub-base for surface [10/1]
10/4	10a	5	Deposit	Layer	Levelling deposit
10/5	10a	5	Deposit	Layer	Fill of demolition feature [10/6]
10/6	10a	5	Cut	Linear	Demolition feature, filled by [10/5]
10/7	10a	2	Deposit	Layer	Natural fluvial deposit
10/8	10b	6	Deposit	Layer	Concrete surface
10/9	10b	5	Masonry	Surface	Sandstone sett surface
10/10	10b	5	Deposit	Layer	Sand bedding for surface [10/9]
10/11	10b	5	Deposit	Layer	Concrete sub-base for surface [10/9]
10/12	10b	5	Deposit	Layer	Levelling deposit
10/13	10b	5	Deposit	Fill	Fill of demolition feature [10/14]
10/14	10b	5	Cut	Discrete	Demolition feature, filled by [10/13]
10/15	10b	2	Deposit	Layer	Natural fluvial deposit
11/1	11	6	Deposit	Layer	Concrete surface
11/2	11	5	Masonry	Surface	Sandstone sett surface
11/3	11	5	Deposit	Layer	Sand bedding for surface [11/2]
11/4	11	5	Deposit	Layer	Concrete sub-base for surface [11/2]
11/5	11	5	Deposit	Layer	Levelling deposit
11/6	11	5	Deposit	Fill	Backfill of construction cut [11/7]
11/7	11	5	Cut	Linear	Construction cut for culvert [11/19], filled by [11/6]
11/8	11	5	Deposit	Layer	Levelling deposit
11/9	11	5	Deposit	Layer	Levelling deposit
11/10	11	5	Deposit	Layer	Levelling deposit
11/11	11	5	Deposit	Layer	Levelling deposit
11/12	11	5	Deposit	Layer	Levelling deposit
11/13	11	4	Deposit	Layer	Levelling deposit
11/14	11	4	Deposit	Fill	Backfill of construction cut [11/17]
11/15	11	4	Deposit	Fill	Silting of culvert [11/16]
11/16	11	4	Masonry	Structure	Brick and sandstone slab culvert
11/17	11	4	Cut	Linear	Construction cut for culvert [11/16], filled by [11/14], [11/15]
11/18	11	4	Deposit	Layer	Levelling deposit
11/19	11	5	Masonry	Structure	Brick culvert
11/20	11	5	Deposit	Layer	Levelling deposit
12/1	12	6	Deposit	Layer	Concrete surface
12/2	12	5	Masonry	Surface	Sandstone sett surface
12/3	12	5	Deposit	Layer	Sand bedding for surface [12/2]
12/4	12	5	Deposit	Layer	Concrete sub-base for surface [12/2]
12/5	12	5	Deposit	Layer	Levelling deposit
12/6	12	4	Deposit	Fill	Backfill of construction cut [12/8]
12/7	12	4	Masonry	Structure	Brick and sandstone slab culvert
12/8	12	4	Cut	Linear	Construction cut for culvert [12/7], filled by [12/6], [12/15]
12/9	12	4	Deposit	Fill	Backfill of construction cut [12/11]
12/10	12	4	Masonry	Structure	Brick and sandstone block culvert
12/11	12	4	Cut	Linear	Construction cut for culvert [12/10], filled by [12/9], [12/16]
12/12	12	5	Deposit	Fill	Fill of construction cut for inspection chamber [12/13]
12/13	12	5	Masonry	Structure	Brick inspection chamber
12/14	12	5	Cut	Discrete	Construction cut for inspection chamber [12/13]
12/15	12	4	Deposit	Fill	Backfill of culvert [12/7]
12/16	12	4	Deposit	Fill	Silting of culvert [12/10]
12/17	12	5	Deposit	Fill	Backfill of inspection chamber [12/13]
12/18	12	2	Deposit	Layer	Natural fluvial deposit

**APPENDIX 3
POTTERY ASSESSMENT**

POTTERY ASSESSMENT

By: *Chris Jarrett*

Introduction

A small-sized assemblage (one box) of post-medieval pottery was recovered during the evaluation. None of the material shows evidence for abrasion and no residual material is present, indicating that the pottery was deposited fairly rapidly after breakage. The state of fragmentation of the assemblage is as mostly sherd material and a number of vessels are present with complete profiles; one vessel is intact or nearly so. The pottery was quantified by sherd count (SC) and estimated number of vessels (ENVs), as well as weight. Pottery was recovered from eight contexts and the size of the groups of pottery are all small (fewer than 30 sherds).

In total, the assemblage consists of 74 sherds, 57 ENV, 6.974kg (none of which was unstratified). The assemblages were examined macroscopically and microscopically using a binocular microscope (x20), and recorded in an ACCESS database, by fabric, form and decoration. The pottery is discussed by its distribution and types.

The Assemblage

Trench 2

Context [2/5], spot date: 1830-1900

Black-glazed red earthenware, 1600-1900, 2 sherds, 2 ENV, 235g, forms: jar; cylindrical and unidentified

Midlands purple ware, 1400-1750, 2 sherds, 2 ENV, 61g, form: unidentified

Refined white earthenware with under-glaze painted decoration (chrome colours), 1830-1900, 1 sherd, 1 ENV, 9g, form: tea cup

Refined white earthenware with industrial slip decoration, 1805-1900, 2 sherds, 2 ENV, 14g, form: mugs; cylindrical

Staffordshire-type red-slipped glazed ware, 1750-1800, 1 sherd, 1 ENV, 10g, form: drinking vessel

Transfer-printed refined whiteware, 1780-1900, 2 sherds, 2 ENV, 56g, forms: plate; dinner, saucer

Total: 10 sherds, 10 ENV, 385g

Trench 4

Context [4/19], spot date: late 19th-20th century

Black-glazed red earthenware, 1600-1900, 1 sherd, 1 ENV, 1.114kg, forms: bowl; flared (handled)

Bone china, 1794-1900, 5 sherds, 4 ENV, 188g, forms: saucers

English stoneware, 1700-1900, 1 sherd, 1 ENV, 712g, forms: bottle: cylindrical

Plain refined white earthenware, 1805-1900, 2 sherds, 2 ENV, 91g, forms: saucers

Refined white earthenware with sponged or spattered decoration, 1805-1900 1 sherd, 1 ENV, 27g, forms: bowl; small rounded

Transfer-printed refined whiteware, 1780-1900, 2, sherds, 2 ENV, 42g, forms: plate; dinner, tea cup

Transfer-printed refined whiteware with 'flow blue' decoration, 1830-1900, 1 sherd, 1 ENV, 48g, form: saucer

Brown or black transfer-printed refined whiteware, 1810-1900, 2 sherds, 2 ENV, 64g, forms: plate; dinner, tea cup

Transfer-printed refined whiteware with green, purple or red designs, 1825-1900, 2 sherds, 2 ENV, 67g, forms: tea cup, saucer

Transfer-printed refined whiteware with under glaze printed and over-glaze painted decoration, 1840-1900 2 sherds, 1 ENV, 192g, form: plate; large

Total: 19 sherds, 19 ENV, 2.545kg

Context [4/20], spot date: late 19th-20th century

Black-glazed red earthenware, 1600-1900 6 sherds, 1 ENV, 1.554kg, form: bowl; deep

Derbyshire stoneware, 1700-1900 1 sherd, 1 ENV, 386g, form: bowl; flared

English stoneware, 1700-1900, 1 sherd, 1 ENV, 131g, form: jar; small cylindrical

Post-medieval red earthenware, 1580-1900, 3 sherds, 2 ENV, 516g, forms: flower pots

Refined white earthenware with under-glaze painted decoration (chrome colours), 1830-1900, 1 sherd, 1 ENV, 38g, form: saucer

Refined white earthenware with industrial slip decoration, 1805-1900, 10 sherds, 3 ENV, 377g, forms: jug; rounded, barrel-shaped

Transfer-printed refined whiteware, 1780-1900, 1 sherd, 1 ENV, 61g, form: jar; medium cylindrical

Transfer-printed refined whiteware with under-glaze printed and over-glaze painted decoration, 1840-1900, 3 sherds, 1 ENV, 91g, form: jar; medium cylindrical

Plain yellow ware, 1820-1900, 1 sherd, 1 ENV, 12g, forms: unidentified

Total: 27 sherds, 12 ENV, 3.166kg

Trench 5

Context [5/7], spot date: late 19th century

English stoneware, 1700-1900, 1 sherd, 1 ENV, 73g, form: bottle; cylindrical

White granite ware, 1840-2000, 1 sherd, 1 ENV, 119g, form: jug

Midlands orange ware, 1400-1820, 2 sherds, 2 ENV, 406g, form: bowl; deep flared

Plain refined white earthenware, 1805-1900, 1 sherd, 1 ENV, 21g, form: possible rounded jug

Refined white earthenware with under-glaze painted decoration (chrome colours), 1830-1900, 2 sherds, 2 ENV, 121g, form: plate; dinner

Refined white earthenware with industrial slip decoration, 1805-1900, 2 sherds, 2 ENV, 16g, forms: bowl; medium carinated, jug

Staffordshire-type red-slipped glazed ware, 1750-1800, 1 sherd, 1 ENV, 10g, form: dish; rounded

Sunderland-type coarseware, 1800-1900, 1 sherd, 1 ENV, 37g, form: bowl; medium rounded

Transfer-printed refined whiteware, 1780-1900, 1 sherd, 1 ENV, 12g, form: saucer

Total: 12 sherds, 12 ENV, 815g

Trench 6

Context [6/6], spot date: late 19th-20th century

Blue coloured refined whiteware body, 1850-1900, 1 sherd, 1 ENV, 4g, form: unidentified.

Total: 1 sherd, 1 ENV, 4g

Trench 10

Context [10/4], spot date: 1807-1840

Pearlware with under-glaze blue painted decoration, 1770-1820, 1 sherd, 1 ENV, 12g, form: plate

Pearlware with blue transfer-printed decoration (stipple and line), 1807-1840, 1 sherd, 1 ENV, 33g, form: bowl; medium rounded

Total: 2 sherds, 2 ENV, 45g

Trench 11

Context [11/13], spot date: 1800-1900

Rockingham mottled brown-glazed ware, 1800-1900, 1 sherd, 1 ENV, 2g, form: unidentified

Total: 1 sherd, 1 ENV, 2g

Trench 12

Context [12/16], spot date: 1770-1830

Green-glazed creamware, 1760-1830, 1 sherd, 1 ENV, 1g, form: bowl

Pearlware with under-glaze blue painted decoration, 1770-1840, 1 sherd, 1 ENV, 11g, form: plate

Total: 2 sherds, 2 ENV, 12g

Significance, Potential and Recommendations for Further Work

The pottery has some significance at a local level. The assemblage has a national ceramic profile typical for the 19th century with industrial finewares, made in such places as The Potteries/Staffordshire, being most frequent, although regional redwares such as Black-glazed red earthenware and Midlands orange wares, characteristic of North West England post-medieval assemblages, are also present. The assemblage also contains a notable quantity of low socio-economic wares, such as factory made slipwares, sponge decorated wares, as well as items of a poor quality (with very crazed glazes), such as a blue banded slipware jug recorded in Trench 4, context [4/20]. A bone china saucer recovered from Trench 4, context [4/19] was very conspicuous as a second with an internal pool of brown glaze.

Therefore, the assemblage is important for understanding the material culture of elements of low socio-economic sectors of society resident in Salford. No 'institutional wares' were recorded which may have been associated with the Exchange Railway Station. Such ceramics may have been derived from canteens, tea rooms and buildings associated with the employees at the station and could be recognised by monogram for the railway companies operating at the station. Further archaeological work at the site could possibly uncover pottery associated with the railway station and this may be of interest for understanding certain levels of organisation within it.

A very significant and large assemblage of post-medieval pottery has been recovered from an archaeological excavation undertaken in the near vicinity at Greengate Towers, Salford (OAN 2007) which allows for comparison with the current assemblage.

The pottery has the potential to date the deposits it was recovered from. None of the pottery merits illustration. The assemblage also has the potential to characterise low socio-economic groups of pottery for Salford as well as correlating the location of groups of pottery with the documentary evidence to determine if the pottery can be assigned to specific properties. Certainly the study area was the location for a number of drinking establishments, such as The Angel, The Polytechnic Inn, The Railway, besides shops and other business concerns, such as The Cloth Market, as well as industrial premises such as a cotton mill. The ceramics recovered from further archaeological work at the site may be important for defining 'signature finds groups' that can be associated with certain professions.

There are no recommendations for further work on the pottery recovered from the evaluation, although the importance of this material should be reviewed subsequent to future archaeological work on the site.

Reference

OAN, 2007. *Greengate Towers, Salford, Greater Manchester: Archaeological Investigation*, Oxford Archaeology North, unpublished report (no. 2006-7/639).

APPENDIX 4
CLASS ASSESSMENT

GLASS ASSESSMENT

By: Chris Jarrett

Introduction

A small-sized assemblage (one box) of glass was recovered during the evaluation. The glass dates to the post-medieval period and specifically the 19th century. None of the material shows evidence for abrasion and no residual material is present, indicating that the glass was deposited fairly rapidly after breakage. The assemblage is in a fragmentary state although large parts of vessels survive and all of the forms could be identified to type. The glass was quantified by fragment count and minimum number of vessels (MNV), besides weight. The assemblage was recovered from two contexts and the sizes of the groups of glass are all small (fewer than 30 sherds).

In total, the assemblage consists of five fragments, 5 MNV, 1.618kg (none of which was unstratified). The assemblage was recorded in an ACCESS database, by glass type, colour, form and decoration. The glass is discussed by its distribution and types.

The Assemblage

Trench 2

Context [2/5], spot date; 19th century

English cylindrical wine bottle, late type: olive green natural glass, optically blown; rounded base, with a rounded kick and pontil scar and a straight sided wall, 1 fragment, 1 MNV, 382g, 19th century

Trench 4

Context [4/19]

Bottle, cylindrical: aquamarine coloured soda glass, moulded (two-part); intact from the neck to the base, convex rounded underside and embossed vertically on the wall is the legend 'LINGARD & CO/GREENGATE/ SALFORD', 1 fragment, 1 MNV, 377g, mid- late 19th century

Bottle, Hamilton type: clear, green tinted soda glass, moulded (two-part); applied blob rim, flaring neck, embossed on the wall 'SODA...' and 'TOL...', 1 fragment, 1 MNV, 377g, mid- late 19th century

Bottle, oval section: pale blue coloured soda glass, moulded (two-part); prescription type rim finish, tubular neck attached to a rounded shoulder and oval cross section wall, 1 fragment, 1 MNV, 377g, mid- late 19th century

English cylindrical wine bottle, late type: olive green natural glass, optically blown; rounded base, with a tall, flat-topped kick and pontil scar, straight sided wall, 1 fragment, 1 MNV, 649g, 19th century

Significance, Potential and Recommendations for Further Work

The glass has some significance at a local level. The glass forms are typically those one would expect to be recovered from 19th-century deposits nationally. Forms are present for alcohol storage (wine bottles), drink storage (the Hamilton bottle) and liquid storage, which includes the cylindrical bottle embossed 'LINGARD & CO/GREENGATE/ SALFORD', for an unknown substance purveyed by a local shop or manufactory, besides the blue glass oval section bottle, which is most likely to have contained a pharmaceutical, possibly a toxic substance.

The bottles are mostly mould made and the non-wine bottles reflect the growth of consumerism during the 19th century and the need for mass produced containers.

The glass has the potential to date the contexts it was recovered from, however it can also be studied holistically with the other associated finds (such as the pottery) in order to determine the range of functions present in a group of finds, which may infer specific activities or professions present in the past at the site or in its vicinity.

There are no recommendations for further work on the glass recovered from the evaluation, although the importance of this material should be reviewed subsequent to future archaeological work at the site and the glass associated with it. At that stage It would be interesting to undertake further research on the 'LINGARD & CO/GREENGATE/ SALFORD' embossed cylindrical bottle, in order to determine the history of the company marked on the item, and so provide a more precise date for the bottle and also to discover what were the contents of the bottle.

APPENDIX 5
CLAY TOBACCO PIPE ASSESSMENT

CLAY TOBACCO PIPE ASSESSMENT

By: Chris Jarrett

Introduction

A small-sized assemblage of clay tobacco pipes was recovered from the evaluation, consisting of three stems and a single mouth part.

The Assemblage

All the recovered items are thin to medium in thickness and have fine bores indicating a broad date range of c. 1730-1910 and possibly later. The nib is thickened, oval in profile with a flat, slightly roughly cut surface and it is probably 19th century in date. The material was recovered from three contexts each containing a single stem: Trench 4, contexts [4/19] and [4/20], and Trench 10 context [10/4], while the nib was recovered from Trench 4, context [4/19].

Significance, Potential and Recommendations for Further Work

The assemblage has no significance, its only potential is to give broad dating to the contexts it was recovered from and there are no recommendations for further work on the material.

**APPENDIX 6
BRICK ASSESSMENT**

BRICK ASSESSMENT

By: *Jenny Proctor*

Introduction

Brick samples were taken from six Phase 4 structures: Trench 1 brick culvert [1/26]; Trench 3 brick wall [3/6]; Trench 4 brick cellar wall [4/6] and brick cellar wall [4/7]; Trench 5 brick wall [5/11]; and Trench 11 brick and sandstone culvert [11/16].

Catalogue

Context no.	Sample no.	Weight (kg)	Length (mm)	Width (mm)	Thickness (mm)	Fabric	Comments
[1/26]	1	4	230	110	80	light reddish brown fabric	handmade, unfrogged
[3/6]	2	3.6	230	115	55	mid reddish orange fabric	handmade, unfrogged
[4/6]	3	2.8	230	110	65	dark reddish brown fabric, very overfired	handmade, unfrogged
[4/7]	4	2.8	230	110	55	light reddish orange fabric	handmade, unfrogged
[5/11]	5	3	220	110	55	dark red brown fabric with large inclusions, vegetation impressions visible on lower face	handmade, unfrogged
[11/16]	6	3	220	105	60	dark reddish orange fabric	handmade, unfrogged

Significance, Potential and Recommendations for Further Work

All of the recovered bricks were handmade, presumably of local manufacture, and as such are not closely datable. In broad terms they can be dated to the mid-late 18th to 19th century.

No further work is recommended on the brick samples, however if further samples were to be obtained during any future work at the site then the assemblage as a whole should be examined by a specialist with knowledge of brick manufacture in the Salford/Manchester area.

APPENDIX 7
SMALL FINDS (METAL AND LEATHER) ASSESSMENT

SMALL FINDS (METAL AND LEATHER) ASSESSMENT

By: *Mårit Gaimster*

Introduction

Four small finds - three iron objects and a fragment of leather shoe - were retrieved during the evaluation. Trench 2 produced a fragment of a solid square-section iron bar, likely to be from a railing or structural ironwork. Three pieces of thin iron plate and a fragment of a leather shoe came from Trench 4, while an iron nail was retrieved from Trench 11. All objects were associated with 19th-century or later pottery.

Catalogue

Context no.	Description	Pottery date
2/5	Solid cast square-section iron bar; W 17mm; L 135mm+; ?fragment of railing or structural fitting	1830-1900
4/19	Iron plate; three corroded pieces; largest piece 50 x 65mm	19th-20th century
4/20	Leather shoe; fragment of stitched upper only	late 19th-20th century
11/13	Iron nail with small square pyramidal head; embedded in wood fragment; L 60mm+	1800-1900

Recommendations

None of the objects are diagnostic or worthy of further investigation; X-raying is unlikely to produce additional information of the iron objects.

APPENDIX 8
ANIMAL BONE AND SHELL ASSESSMENT

ANIMAL BONE AND SHELL ASSESSMENT

By: *Kevin Rielly*

Introduction

A small number of animal bones (6 fragments) and a single near complete conch shell were recovered from 19th- to 20th-century deposits (Phase 4). All of these items were in good condition.

The Assemblage

Trench 11

Context [11/13]

A near complete equid left humerus from a medium-sized individual, possibly 13 to 14 hands, was recovered from the fill [11/13] of culvert [11/16]. Another mid shaft humerus fragment could represent the remains of the corresponding right humerus.

Trench 4

Context [4/19]

The backfill [4/19] of brick cellar [4/6] provided two goose bones; a humerus and a tarsometatarsus, possibly from the same adult bird. Knife cuts to the proximal end of the humerus may attest to the manner of removal of the wing at the shoulder joint. The size of this bird is commensurate with the wild greylag goose and it is conceivable that this bird may represent game rather than a domesticate.

Context [4/20]

The conch shell recovered from another backfill [4/19] of brick cellar [4/6] is yet to be positively identified but it does appear very similar to the Pink or Queen conch *Lobatus gigas*, which has a modern distribution in the north-western tropical Atlantic from Bermuda to Brazil (*Encyclopaedia of Life website*).

Trench 5

Context [5/7]

A cattle-sized limb bone fragment and a rabbit mandible were recovered from the fill [5/7] of basement structure [5/11].

Significance, Potential and Recommendations for Further Work

These few bones describe the local deposition of general food and non-food waste in this area, possibly just prior to the construction of the railway lines and station. The single or possible pair of equid humeri bore no cut marks or other signs of modification and it can be assumed that these are the remains of a carcass buried or otherwise disposed of in the general vicinity. The conch may represent long distance trade or could be a traveller's keepsake.

No further work is recommended on the animal bone collection however, it would be of interest to properly identify the conch shell. This would be achieved either by visiting a specialist or a specialist collection, as for example at the Natural History Museum in London.

Reference

Encyclopaedia of Life. <http://eol.org/pages/455238/details>

APPENDIX 9
PHOTOGRAPHIC PLATES



Plate 1. Trench 1, overview, wall [1/9] in foreground, looking north-east (scale 2m)



Plate 2. Trench 1, culvert [1/26], looking north-west (scale 1m)



Plate 3. Trench 2, overview, culvert [2/7] in foreground, looking south-east (scale 2m)



Plate 4. Trench 3, wall [3/6] and demolition feature [3/13], looking north-west (scale 1m)



Plate 5. Trench 4, cellar [4/6], looking south-east (scale 1m)



Plate 6. Trench 4, cellar [4/7], looking south-east (scale 1m)



Plate 7. Trench 4, cellar [4/6] detail, steps [4/30], looking south-west (scale 1m)



Plate 8. Trench 4, cellar [4/6] detail, surface [4/31], looking south-west (scale 1m)



Plate 9. Trench 5, overview, cellar wall [5/11] in rearground, looking north-east (scale 2m)



Plate 10. Trench 5, cellar wall [5/11] detail, looking north-west (scale 1m)



Plate 11. Trench 6, cellar [6/8], brick surface [6/7] and (pre-excavation) stone-lined well [6/13], looking west (scale 1m)



Plate 12. Trench 6, stone-lined well [6/13], looking north (scale 1m)



Plate 13. Trench 8, overview, drainage feature [8/4], looking south-west (scale 2m)



Plate 14. Trench 9, overview, looking west (scale 2m)



Plate 15. Trench 10a, demolition feature [10/6], looking south-west (scale 1m)



Plate 16. Trench 10b, demolition feature [10/14], looking north-east (scale 1m)



Plate 17. Trench 11, overview culvert [11/19] in foreground, looking north-west (scale 2m)



Plate 18. Trench 11, culvert [11/16], looking west (scale 1m)



Plate 19. Trench 12, overview, culvert [12/13] in foreground, looking north-west (scale 1m)



Plate 20. Trench 12, culverts [12/7] and [12/10], looking south (scale 1m)

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