



University of
Salford
MANCHESTER

Salford **Archaeology**

Archaeological
Desk-Based
Assessment

Alberton House, St
Mary's Parsonage,
Manchester

Client:

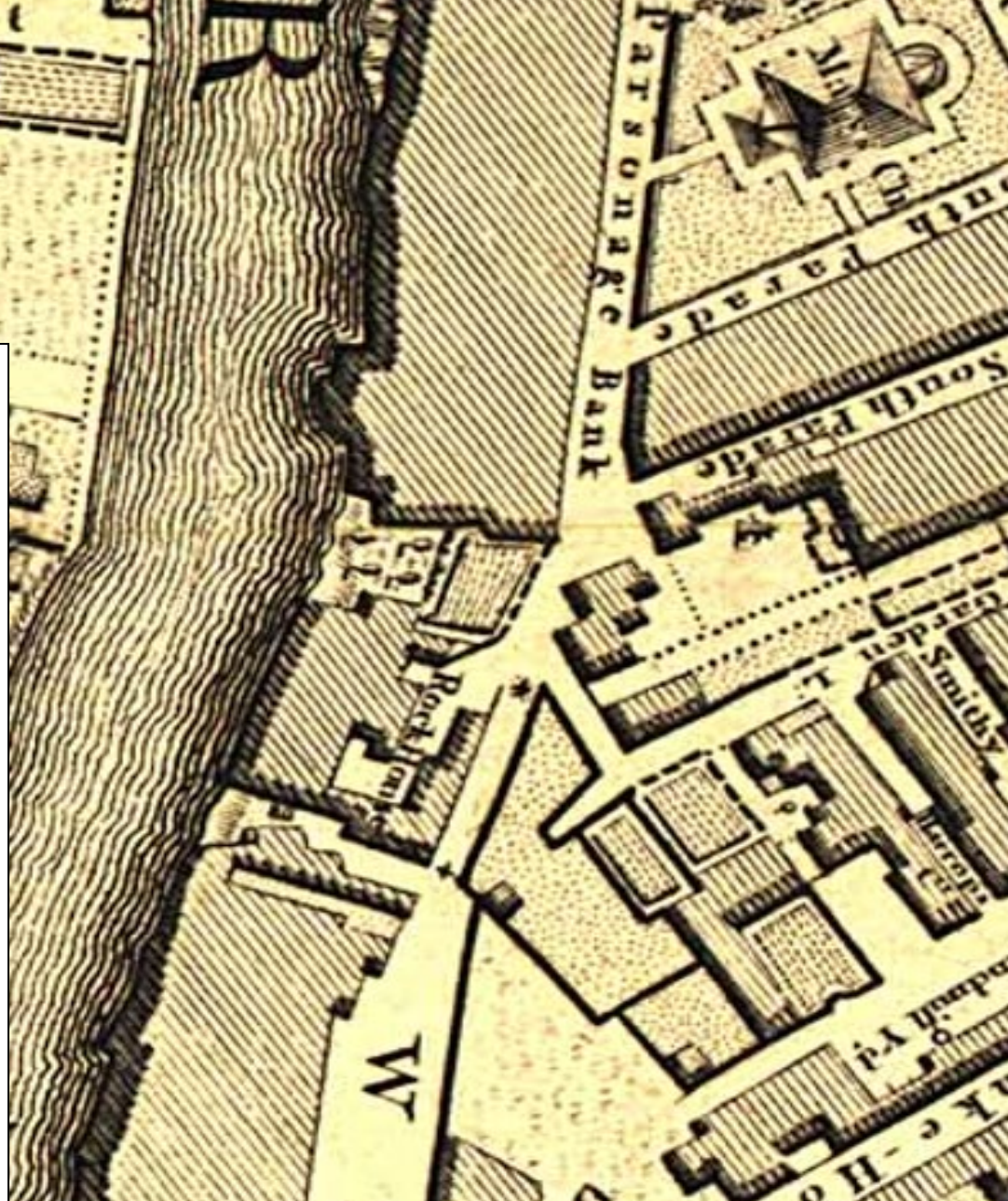
Deloitte UK

Technical Report:

Katie Fletcher

Report No:

2022/40



Site Location: The development area is located in Manchester City Centre and is bounded by the River Irwell to the north, Cardinal House to the east, St Mary's Parsonage to the south and Alberton Bridge House car park to the west.

NGR: Centred at NGR 383484 398417

Prepared for: Deloitte UK

Document Title: Alberton House, St Mary's Parsonage

Document Type: Desk-Based Assessment

Report No: 2022/40

Version: Version 2

Author: Katie Fletcher

Position: Project Officer (Heritage Management)

Date: May 2022

Checked By: Ashley Brogan

Position: Project Officer (Heritage Management)

Date: May 2022

Signed:



Copyright: Copyright for this document remains with the Centre for Applied Archaeology, University of Salford.

Contact: Salford Archaeology, Centre for Applied Archaeology, Peel Building, University of Salford, Salford, M5 4W

Disclaimer:

This document has been prepared by Salford Archaeology within the Centre for Applied Archaeology, University of Salford, for the titled project or named part thereof and should not be used or relied upon for any other project without an independent check being undertaken to assess its suitability and the prior written consent and authority obtained from the Centre for Applied Archaeology. The University of Salford accepts no responsibility or liability for the consequences of this document being used for a purpose other than those for which it was commissioned. Other persons/parties using or relying on this document for other such purposes agrees, and will by such use or reliance be taken to confirm their agreement to indemnify the University of Salford for all loss or damage resulting therefrom. The University of Salford accepts no liability or responsibility for this document to any other party/persons than by whom it was commissioned.

Contents

1. Summary	1
2. Introduction	3
2.1 Site location	3
2.2 Topography and geology	4
2.3 Designations	4
3. Method statement	5
3.1 Introduction	5
3.2 Research sources	5
3.3 Significance assessment methodology	5
3.4 Impact assessment methodology	6
3.5 The Document	6
4. Planning and legislative background	7
4.1 National Planning Policy Framework (NPPF)	7
4.2 Local Development Framework	8
5. Historical background	9
5.1 Prehistoric period	9
5.1.1 Archaeological Potential	9
5.2 Romano-British period	9
5.2.1 Archaeological Potential	10
5.3 Medieval period	10
5.3.1 Archaeological potential	11
5.4 Post-medieval period	11
5.4.1 Archaeological potential	12
5.5 Onset of the industrial revolution	13
5.6 History of gas	14
5.6.1 A brief history on lighting	14
5.6.2 The discovery and use of coal gas	15
5.6.3 Private use of gas	15
5.6.4 Gas lighting in the public domain	16
5.6.5 Later development and use of gas	17
5.7 Development of the Site	18
5.8 Previous archaeological works	30

5.9	Summary of archaeological potential	30
6.	Gazetteer	32
7.	Significance	35
7.1	Policy context for heritage assets.....	35
7.2	Designated heritage assets.....	35
7.3	Significance of the archaeological resource	35
7.3.1	Historical and archaeological interest.....	35
7.3.2	Baseline significance conditions.....	36
7.4	Summary of significance	38
8.	Impact assessment	39
8.1	Development Proposals	39
8.2	Impact upon archaeological resource within the Site.....	39
9.	Recommendations	40
9.1	Heritage Assets	40
9.2	Further Investigation	40
10.	Sources	41
10.1	Cartographic sources	41
10.2	Census Returns	41
10.3	Newspapers	41
10.4	Boulton & Watt Archive	41
10.5	Bibliography	41
10.6	Websites	43
	Acknowledgements	45
	Appendix 1: Figures	46

1. Summary

Deloitte UK is devising proposals for residential apartments, with potential commercial units at ground floor level. The proposed development includes the demolition of basement and office building with the exception of the shared staircase between Alberton House and Cardinal House and construction of a 20-storey office led development with basement gym, ground floor café / bar (Use Class E), and a rooftop amenity space including an external terrace and wellness facility, improvements to public realm surrounding the site and new loading bay and highways works. (centred on NGR 383484 398417). In order to support the planning application for the scheme, Deloitte UK commissioned Salford Archaeology to carry out an archaeological desk-based assessment of the proposed development site. This was intended to establish, as far as possible, the nature and significance of the sub-surface archaeological resource to enable informed recommendations to be made for the future treatment of any surviving remains.

The proposed development area is located in the St Mary's Parsonage area of Manchester City Centre. In 1398, Thomas La Warre became the parson of St. Mary's parish church in Manchester and was responsible for elevating it to a collegiate church by procuring a licence in 1421 from King Henry V. Extensive gardens were required to cater for its pupils, and consequently, the area now known as Parsonage Gardens was cultivated to provide food. By the early 17th century, Parsonage Croft/Gardens consisted of a two-acre plot on the west side of Deansgate, on the fringe of the medieval town. Mid-18th-century mapping shows that land within the proposed development site lies on the southern bank of the River Irwell, in the vicinity of Parsonage Gardens.

By the late 18th century, a street named Parsonage Bank (St Mary's Parsonage) had been laid roughly through the centre of the site, aligned broadly east to west. Both sides of the street had been developed, with an arrangement of buildings on the north side of the street annotated as Rock House. A warehouse/wharf named Rock House had been built by 1728 and may correspond to the late 18th-century building. A Riding School had been established on the southern side of the street.

Manchester's first municipal gas works had been established by the Police Commissioners in 1817. A red plaque commemorates the site of the former gasworks and states that it was the world's first public gasworks. In total, three gasholders lay partly within the site boundary. The same arrangement of buildings occupied the north part of the site, centred on a courtyard that was annotated Rock-Yard, potentially a reference to the name of the 18th-century warehouse. By the mid-19th century, the 18th-century building was occupied by Barton and Co, Brass and Copper Manufacturers.

By the late 19th century, the 18th-century building on the north side of Albert Street had undergone some slight alterations, and the gas works had been demolished and redeveloped into a Police Station. Late 19th-century mapping shows that the buildings within the site were likely to have been cellared. The same configuration of buildings occupied the site until the 1940s/50s. During the second half of the 20th century, Alberton House was erected across most of the development site.

The potential for the site to contain buried archaeological remains is considered to be moderate. Remains may include post-medieval garden soils, an 18th-century industrial building (Rock House) and elements of Manchester Gas Works, which would be of low to medium

significance. The late 19th-century Police Station may be considered negligible as there are several surviving examples.

The exact scope and extent of any further investigation of the proposed development area will be determined by the Greater Manchester Archaeological Advisory Service (GMAAS), in their capacity as archaeological advisor to Manchester City Council, however, it may be anticipated that an archaeological evaluation may be required to establish the presence or absence of buried archaeological remains and, if present, their extent and significance.

Should significant archaeological remains be encountered during the archaeological evaluation, further excavation may be required to offset the harm of the development to the buried archaeological resource, in line with the guidance provided by the National Planning Policy Framework. The scope and extent of any such further investigation will be determined by the Greater Manchester Archaeological Advisory Service (GMAAS), in their capacity as archaeological advisor to Manchester City Council.

2. Introduction

Deloitte UK has commissioned Salford Archaeology within the University of Salford to carry out an archaeological desk-based assessment to support design proposals for a residential development scheme at St Mary's Parsonage, Manchester (referred to herein as 'the Site'). The proposed development includes the demolition of basement and office building with the exception of the shared staircase between Alberton House and Cardinal House and construction of a 20-storey office led development with basement gym, ground floor café / bar (Use Class E), and a rooftop amenity space including an external terrace and wellness facility, improvements to public realm surrounding the site and new loading bay and highways works. The desk-based study aimed to identify as far as possible the nature, extent and significance of the sub-surface archaeological resource within the site so as to enable informed recommendations to be made for the future treatment of any surviving remains.

2.1 Site location

The Site (centred on NGR 383484 398417) is located in the St Mary's Parsonage area of Manchester City Centre and is bounded by the River Irwell to the north, Cardinal House to the east, St Mary's Parsonage to the south and Alberton Bridge House car park to the west (Figure 1; Plate 1). The 0.19-hectare site currently comprises a part 12, part four-storey office building, which has an L-shaped footprint with its main entrance set back from the St Mary's Parsonage street frontage. The 12-storey part of the building abuts the River Irwell on its north-western edge, and back of house servicing access is provided off St Mary's Parsonage along the Site's southwestern edge. Immediately adjacent to the service access route, to the west of the Site, is access to the pedestrian footbridge, Trinity Bridge.

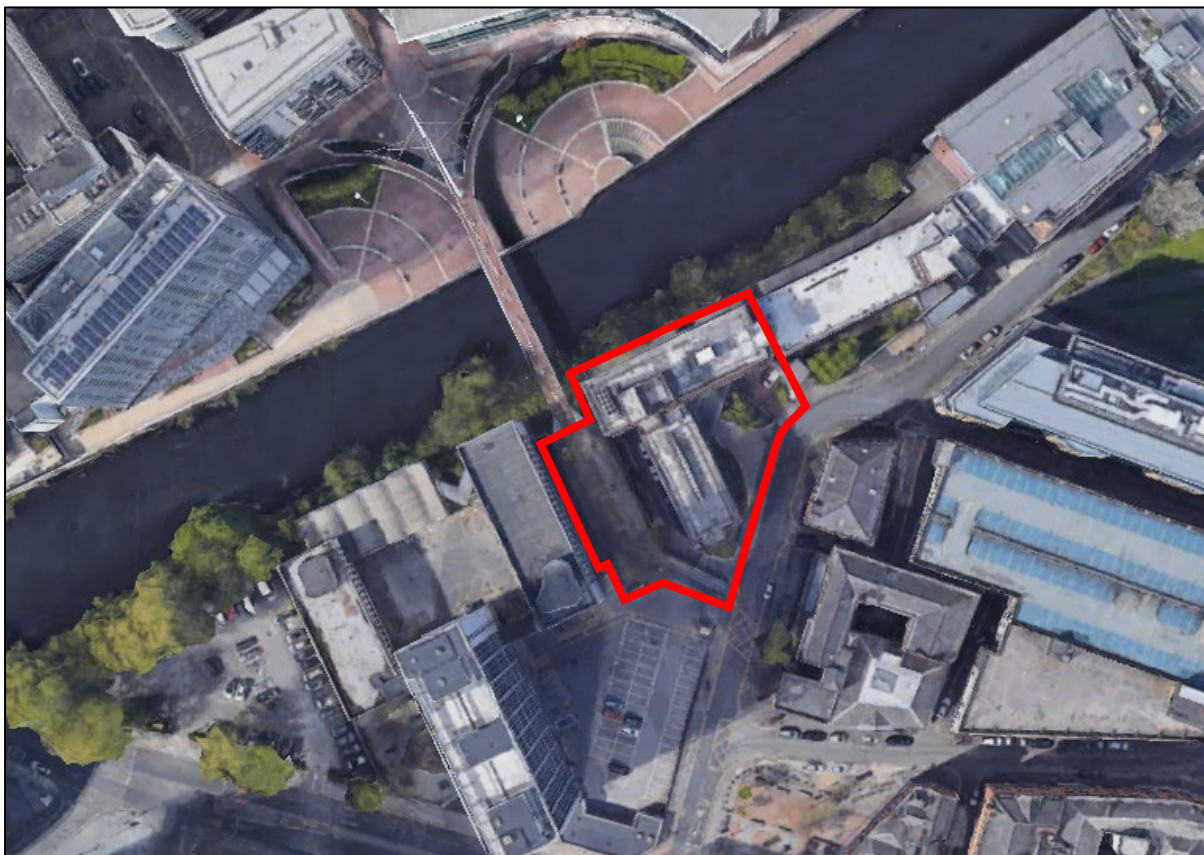


Plate 1 Site Boundary superimposed onto Satellite image of the Site

2.2 Topography and geology

Topographically, the Manchester conurbation as a region lies within an undulating lowland basin, which is bounded by the Pennine uplands to the east and to the north. The region as a whole comprises the Mersey river valley, whilst the rivers Irwell, Medlock, and Irk represent the principal watercourses in Manchester (Countryside Commission, 1998, p. 125). The Site lies at a height of 32.9m above Ordnance Datum (aOD).

The solid geology of the area comprises the Chester Sandstone Formation, which is overlain by glacial deposits. These superficial deposits consist of sand and gravel and till (predominantly clay) formed up to 2 million years ago during the Quaternary Period (British Geological Society, 2021).

2.3 Designations

The Site does not contain any heritage assets that are afforded statutory protection, such as Scheduled Monuments, listed buildings, or any Registered Parks and Gardens, and it does not fall within a conservation area.

The Parsonage Gardens Conservation Area lies 10m to the east Site, on the opposite side St Mary's Parsonage. The Site is also located within 100m of the Deansgate/Peter Street Conservation Area and within 200m of St Ann's Square Conservation Area, Albert Square Conservation Area and the Flat Iron Conservation Area in Salford. The Site is located within 250m of 21 listed buildings and within 150m of six listed buildings (Table 1). The proposed development will not have a physical impact on these designated heritage assets, and so they are not considered further in this report.

Site	Designation	HER Number	Location (NGR)
98–116 Deansgate (formerly part of Kendal Milne's Dept Store)	Grade II Listed Building	8374.1.0	SJ 8365 9837 (point)
31 and 33 King Street West, including 3 Smithy Lane	Grade II Listed Building	447.1.0	Centred SJ 8353 9837 (42m by
Arkwright House	Grade II Listed Building	8530.1.0	SJ 83586 98420
Masonic Hall	Grade II Listed Building	8295.1.0	SJ 8359 9842 (point)
St Mary's Parsonage (National Buildings)	Grade II Listed Building	12130.1.0	SJ 8349 9827 (point)
Former warehouse, St Mary's Parsonage	Grade II Listed Building	15482.1.0	SJ 8356 9847 (point)

Table 1 Designations located within 150m of the Site

3. Method statement

3.1 Introduction

The assessment considers the potential impact of the proposed development upon any buried archaeological remains within the Site, and comprises a desk-based study. The production of the assessment followed the Chartered Institute for Archaeologists (CIfA) standard and guidance for undertaking archaeological desk-based assessments (*Standard and Guidance for Historic Environment Desk-based Assessment*, 2017).

3.2 Research sources

The desk-based assessment made use of the following sources:

- Published and unpublished cartographic, documentary and photographic sources;
- The Greater Manchester Historic Environment Record, maintained by the Greater Manchester Archaeological Advisory Service;
- Manchester Local Archives and the Greater Manchester Record Office in Manchester Central Library;
- The National Heritage List for England;
- Salford Archaeology's extensive library of archaeological work carried out in the vicinity of the Site.

The aim of the research was to provide the relevant historical and archaeological background relating to the development of the Site. The available sequence of historical mapping was the principal source of information, as this provides evidence for the development of the Site since the late eighteenth century.

3.3 Significance assessment methodology

An accepted methodology for assessing archaeological significance is the Secretary of State's criteria for the scheduling of ancient monuments, outlined in Annex 1 of 'Scheduled Monuments: identifying, protecting, conserving and investigating nationally important archaeological sites under the Ancient Monuments and Archaeological Areas Act 1979' (DCMS, 2013). These criteria have all been utilised in this assessment and are listed below:

- Archaeological interest
- Historical interest
- Period
- Rarity
- Documentation
- Group value
- Survival/condition
- Fragility/vulnerability
- Diversity
- Potential

The significance assessment also uses the approach to assessing heritage value contained within '*Guidance on Heritage Impact Assessments for Cultural World Heritage Properties*' issued by the International Council on Monuments and Sites (ICOMOS) in January 2011

(ICOMOS, 2011). This document states that an archaeological asset's significance can be assessed as very high, high, medium, low, negligible or unknown.

3.4 Impact assessment methodology

The impact of the proposed development upon the significance of the archaeological resource within the Site is assessed using the approach outlined in '*Guidance on Heritage Impact Assessments for Cultural World Heritage Properties*' (ICOMOS, 2011), which states that impact to archaeological assets may be major, moderate, minor, negligible or cause no change. Mitigation is then recommended to reduce the level of impact on the significance of the identified assets.

3.5 The Document

The following presents the historical and archaeological evidence for the Site. Chapter 5 discusses the previous archaeological investigations that have taken place within the Site. A gazetteer (Chapter 6) is presented of heritage assets and sites of potential archaeological interest identified within the Site and this information, along with a map regression (Figs 3-9), is used to assess the significance of the remains (Chapter 7) and impact of the proposed development (Chapter 8). A mitigation strategy is outlined in Chapter 9, based on the assessment presented in the previous chapters.

4. Planning and legislative background

This assessment accords with National, Regional and Local Planning Policies which relate to the historic environment. National planning policies relevant to heritage asset management are contained within the National Planning Policy Framework (NPPF 2021).

4.1 National Planning Policy Framework (NPPF)

The significance of the archaeological resource identified within this report has been assessed as recommended in the revised *National Planning Policy Framework* (Ministry of Housing, Communities & Local Government, 2021). The NPPF sets out the Government's planning policies and outlines the presumption in favour of sustainable development, which is defined by three principles: economic, social and environmental. Of the core planning principles underpinning decision making, conserving heritage assets 'in a manner appropriate to their significance, so that they can be enjoyed for their contribution to the quality of life of existing and future generations' is one. Section 16 deals specifically with this historic environment (paragraphs 189-208), and states that local planning authorities should consider:

- the desirability of sustaining and enhancing the significance of heritage assets and putting them to viable uses consistent with their conservation;
- the wider social, cultural, economic and environmental benefits that conservation of the historic environment can bring;
- the desirability of new development making a positive contribution to local character and distinctiveness; and
- opportunities to draw on the contribution made by the historic environment to the character of a place.

Paragraph 194 states that "local planning authorities, when determining applications, should require the applicant to describe the significance of any affected heritage assets, 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 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, local planning authorities should require developers to submit an appropriate desk-based assessment and, where necessary, a field evaluation".

Paragraph 203 states that the effect of a proposal on non-designated heritage assets (designated assets are covered in paragraphs 199-202) should be taken into account in determining a planning application.

Paragraph 205 states that local planning authorities should require developers to record and advance understanding of any heritage assets to be lost, in a manner appropriate to their importance and impact, and to make this evidence publicly accessible.

4.2 Local Development Framework

The NPPF outlines the need for local planning policies to create local plans and frameworks to implement the NPPF at a local level. Manchester City Council adopted a Core Strategy in 2012, which is scheduled until 2027 (Manchester City Council, 2012) . The heritage strategy is outlined in *Objective 6: Environment* and summarises the approach the local authority will take in determining planning applications which may affect the historic environment (Manchester City Council, 2012, p. 164).

Policy EN3 states:

‘Throughout the City, the Council will encourage development that complements and takes advantage of the distinct historic and heritage features of its districts and neighbourhoods, including those of the City Centre.

New developments must be designed so as to support the Council in preserving or, where possible, enhancing the historic environment, the character, setting and accessibility of areas and buildings of acknowledged importance, including scheduled ancient monuments, listed buildings, registered parks and gardens, conservation areas and archaeological remains. Proposals which enable the re-use of heritage assets will be encouraged where they are considered consistent with the significance of the heritage asset.’

Manchester City Council is advised on archaeological matters by the Greater Manchester Archaeological Advisory Service (GMAAS).

5. Historical background

The following section provides a framework to the present study, working chronologically through the periods listed below (Table 3).

Period		Date Range
Prehistoric	Palaeolithic	Pre-10,000 BC
	Mesolithic	10,000 – 3500 BC
	Neolithic	3500 – 2200 BC
	Bronze Age	2300 BC – 700 BC
	Iron Age	700 BC – AD 43
Romano-British		AD 43 – AD 410
Early Medieval		AD 410 – AD 1066
Late Medieval		AD 1066 – AD 1540
Post-medieval		AD 1540 – c 1750
Industrial Period		c AD1750 – 1914
Modern		Post-1914

Table 2 Summary of British archaeological periods and date ranges

5.1 Prehistoric period

The current understanding of human activity in the Manchester region during the prehistoric period is poor, although it is reasonable to suggest that several areas in the centre of the city, such as Castlefield, the area that now contains Manchester Cathedral and Chetham's School and Ardwick, may have been conducive for late prehistoric settlement on account of the natural topography and the abundance of natural water sources (i.e. rivers) (Gregory, 2007).

Prehistoric finds were discovered during the 19th century at Cathedral Yard, comprising a flint flake. Other prehistoric finds in this area include a polished stone axe, discovered at a depth of 20ft from the base of a ditch that was excavated at the junction of Corporation Street and Todd Street in 1870. A Bronze Age dagger and axe fragment were also found during excavations at the northeast corner of Hanging Bridge in 1870. The nearest known prehistoric find to the Site was a Neolithic flint flake discovered 220m to the southeast of the Site at Spinningfields, Deansgate, in the 19th century by the local antiquarian Charles Roeder (HER 414.1.0).

There are no known prehistoric remains within the Site and the survival of any *in-situ* prehistoric archaeological deposits is very unlikely.

5.1.1 Archaeological Potential

There is no known evidence for prehistoric activity within the boundary of the Site, and the potential for any such remains to survive from this period is considered to be very low.

5.2 Romano-British period

Archaeological evidence for Romano-British activity in Manchester is focused on the Roman fort of *Mamucium*, which was established on a sandstone bluff within Castlefield (Gregory, 2007). Archaeological excavation has shown that in the late 1st century, the fort comprised a

turf rampart and timber gates, covering an area of c. 1.2ha, and was of a size compatible with holding a 480-man infantry unit. The fort was rebuilt to similar dimensions in stone c AD 200 (*ibid*).

During the 2nd century, the fort was developed in association with a substantial extramural settlement, or *vicus* (Grealey, 1974, p. 11). Civilians occupied the extramural settlement, attracted by the security and commercial benefits of the nearby fort. Based on archaeological excavations and the distribution of Roman finds, the limits of this civilian settlement appear to have extended south-eastwards along Chester Road, terminating somewhere in the vicinity of Great Jackson Street, northwards from the fort to approximately Quay Street, westwards along Liverpool Road for c 100m from the north-west corner of the fort, eastwards across Deansgate to the area now occupied by the Beetham Tower. The Site lies approximately 400m to the north of the extramural settlement, however, it may have experienced low-level activity, on the fringe of the settlement.

Roads from the fort linked Manchester with Buxton to the south-east, Chester to the south, Wigan to the north-west, Ribchester to the north, and Castleshaw and York to the north-east. The settlement was well connected in terms of trade and consequently lasted until the late third century AD. The Roman road from Manchester to Ribchester (HER 14.1.0) is situated c 170m to the east of the Site. The road continues northwards continuing, following the course of Bury New Road. The Ordnance Survey map of 1851 (Fig. 6) annotates the route of Deansgate as the former Roman Road.

5.2.1 Archaeological Potential

There is no known evidence for Romano-British activity within the boundary of the Site, and the potential for any such remains to survive from this period is considered to be very low.

5.3 Medieval period

There is very little archaeological evidence in the region as a whole that represents the period between the end of the Roman occupation and the Norman Conquest of 1066. The area around Manchester came under the control of several kingdoms during this period. In AD 620, Edwin occupied Manchester, and it may have been at this time that settlement in the town was established around the cathedral (Farrer, 1911). It is believed that from the Saxon times, a small community existed on both banks of the River Irwell close to the point where it is joined by the River Irk.

In AD 919, the Anglo-Saxon king Edward the Elder established a fortified base, or burh, at Manchester, which was then part of Viking Northumbria. It has been suggested that the burh lay within the area around the cathedral, which had become a focus for settlement by the late 11th century. The site occupied presently by Chetham's School is thought to have been the site of a castle founded by Manchester's Norman barons. This early settlement at the confluence of the Rivers Irwell and Irk seems to have been bounded on the landward side by Hanging Ditch, whose curving line ran between the two rivers, taking a line that was followed subsequently by Toad Lane, the forerunner of Todd Street and Corporation Street.

Following the Norman Conquest, William I assigned most of the land between the Ribble and Mersey rivers to Roger of Poitou, who retained the manor of Salford demesne (Tupling, 1962), but divided his other newly acquired land into several fiefdoms (Kidd, 1996). The largest of these was the landholding centred on Manchester, created by the grant of extensive lands in the hundreds of Salford, Leyland and West Derby to Albert Grelley (Tupling, 1962, p. 116).

The first recorded reference to the plot of land now known as Parsonage Gardens was in 1066 when William I granted tenancies to Albert Grelley (DGM1605).

By the 13th century, the Grelley family had established a manor house at the confluence of the rivers Irwell and Irk and the medieval town grew up around it (Hartwell, et al., 2004, p. 256). It was from this hall that they governed both the manor and the extensive barony. In 1222 Manchester was granted an annual fair, and in 1301 Thomas Grelley was granted the Great Charter of Manchester by Edward I, and thus it became a free borough (*ibid*).

A survey of the medieval layout of the city was undertaken in the 1980s by GMAU, which led to the designation of a zone defined as the Area of Medieval Manchester (Morris, 1983). The survey demonstrated that in addition to the manorial and ecclesiastical heart of the town, streets radiated out from the centre, with Deansgate being one of the main thoroughfares. The Site lies within the Area of Medieval Manchester, to the west of Deansgate (HER 16050.1.0).

Deansgate is one of Manchester's most historic streets, and its name probably dates from the early medieval period. The origins of the street name are uncertain, but its name may derive from 'way to the Dean', 'way to Denys' or possibly a gate or route used by the Deans of the College.

The manor house and land granted to the Grelleys in the 11th century were transferred to the La Warre family in 1309 (DGM1605). Thomas La Warre succeeded as the twelfth baron in 1398 and later became the parson of St. Mary's, the parish church. The church, subsequently rebuilt, is now Manchester Cathedral. La Warre was responsible for elevating St Mary's to a collegiate church by procuring a licence in 1421 from King Henry V. Extensive gardens were required to cater for its pupils, and consequently, the area now known as Parsonage Gardens was cultivated to provide food (*ibid*). Parsonage Gardens is located 100m to the northeast of the Site.

Archaeological remains associated with medieval activity include the remains of a post-pit excavated at Spinningfields, located 240m to the southeast of the Site. The feature was sealed by a late medieval agricultural soil that contained medieval pottery, suggesting that the post was erected in the medieval or pre-medieval period. The medieval soils were sealed further by 18th-century deposits (HER 16257.1.0).

5.3.1 Archaeological potential

Although the Site lay in the vicinity of medieval settlement activity, the potential for buried archaeological remains is considered to be very low due to the extensive development that took place in the 18th and 19th centuries.

5.4 Post-medieval period

By 1539, John Leland was able to describe Manchester as the 'finest and busiest town in the whole of Lancashire, with the best buildings and the greatest population' (Chandler, 1993, p. 263), at a time when the textile industries in South Lancashire were beginning to flourish. Manchester emerged as a centre for the textile finishing processes, as woollen cloth was brought in from outlying areas for bleaching and dyeing. Most importantly, however, Manchester expanded its role as a market centre for textiles produced in the towns and hamlets of the surrounding district (Frangopulo, 1964, p. 26).

In 1547, during the reign of Edward VI, the college was dissolved by the Chantries Act, but was re-founded by Mary I in 1553 (DGM 1605). Elizabeth I granted a new charter, and the

wardens were provided with a college house in 1578, and in 1635 they were given the two-acre parcel of land known as Parsonage Croft, now called Parsonage Gardens.

A map of Manchester and Salford dated c 1650 shows a vast plot of gardens stretching from Deansgate to the River Irwell (Plate 2). The plot of land is annotated on the map as 'New Gardens' and may have been associated with Parsonage Croft. Narrow strips of gardens were also situated 240m to the southeast of the Site, surrounded by a wall in the 18th century (HER 11240.1.0). An excavation in this area revealed 18th-century remains (HER 16257.1.0). Post-medieval deposits, representing agricultural soils, were also found at an adjacent site (c 170m to the west of the site; HER 15862.1.0) close to the River Irwell. The Site was likely located in this vicinity, adjacent to the River Irwell.

Other archaeological remains retrieved from the immediate vicinity of the Site include an earthenware posset cup and clay pipes, which were found in the late 19th century, 100m to the northeast of the Site. The cup had been found in an old well (which had been filled up and built over) on the site of the old Deanery in Deansgate, Manchester. The decoration of the cup was an interesting example of old English marbling, produced by combing on coloured clays, followed by lead-glaze (HER 273.1.0).

From the early 17th century, fustians produced in a network of towns with Manchester at their hub were being exported regularly to western and southern Europe, and the town became the principal commercial centre for the region (Hartwell, 2001, pp. 8-9). A flourishing business community developed, which was dominated by a few wealthy merchant manufacturers and fustian-dealing families, notably the Chethams, the Booths, the Wrigleys, and the Byroms.

Manchester underwent a rapid expansion during the post-medieval period. The population of Manchester increased from approximately 1800 people in 1563 to just over 3000 people in the year 1642 (Willian, 1980, pp. 38-9). The Hearth Tax Returns of 1664 listed 820 households, which suggests a population of approximately 3690. The population of Manchester roughly doubled between 1563 and 1664, despite an outbreak of plague in 1645 (Phillips & Smith, 1994, p. 7).

In his tour of the country in the 1720s, Daniel Defoe (Defoe, 1727) noted that Manchester had 'extended in a surprising manner, being almost double to what it was a few years ago', reflecting the further expansion of the textile trade (Hadfield & Biddle, 1970). By the census of 1773, the town's population had dramatically increased even further, with approximately 24,937 people living in the township of Manchester, 23,032 of which were living in the town itself. During the post-medieval period, Manchester changed from what had been a small market centre into the largest town in Lancashire.

5.4.1 Archaeological potential

The Site lay within the vicinity of known post-medieval activity, however, the potential for buried archaeological remains is considered to be very low due to the extensive development of the Site during the industrial period.

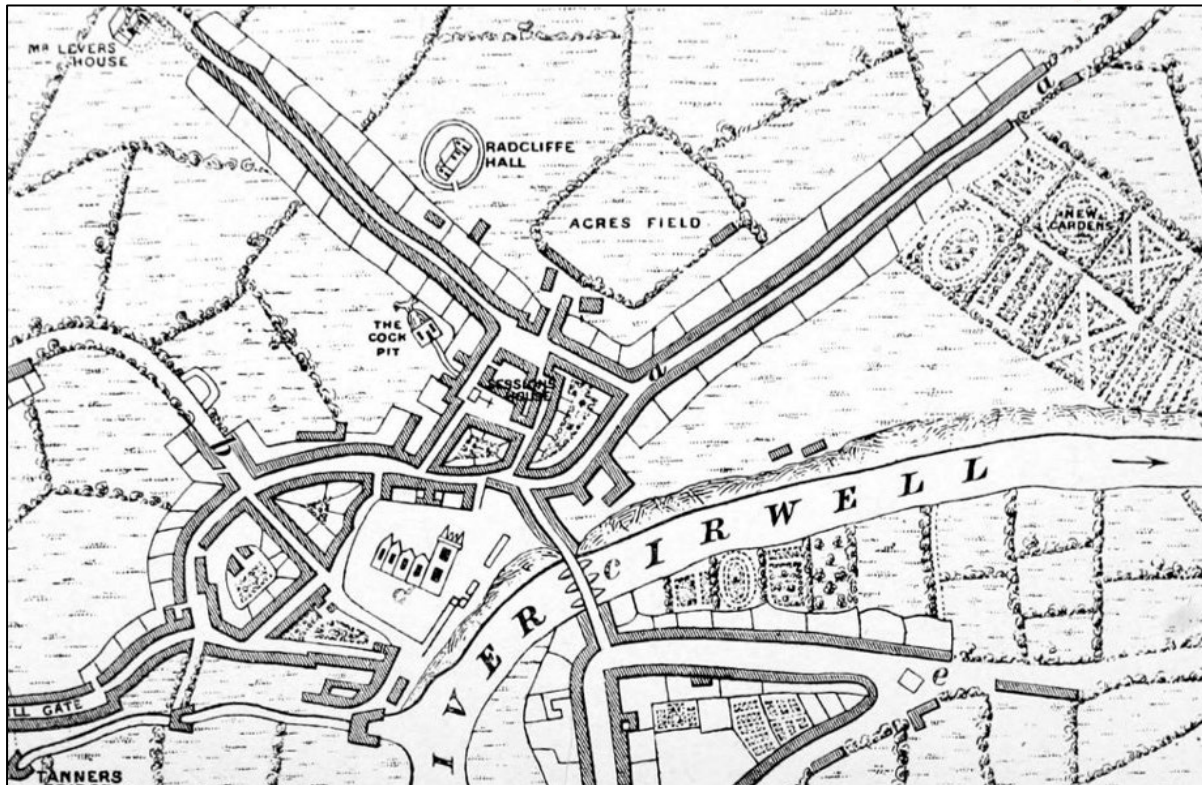


Plate 2: Map of Manchester and Salford c. 1650

5.5 Onset of the industrial revolution

Significant quantities of cotton began to be imported into south Lancashire from the early 17th century, firstly in linen/cotton fustians. By around 1750, pure cotton fabrics were being produced, and cotton had overtaken wool in importance. Textiles were generally manufactured in domestic-based workshops or weavers' cottages as part of the putting-out system, whereby merchants employed textile workers and supplied them with raw materials. By the 1780s, the national demand for textiles, particularly cotton, began to rise, resulting in a dramatic increase in mill building that transformed Manchester into a centre of factory-based cotton manufacturing industry of international repute (Baines 1835).

The second half of the 18th century was characterised by an accelerated pace of development, which was captured on the first detailed plans of the area, produced on four successive maps by Casson and Berry between 1741 and 1751 (Plate 3). The plans produced by Casson and Berry capture the expansion of Manchester and its suburbs. The growth of Manchester was enhanced by the development of waterborne transport. The first key development was the founding of the Mersey & Irwell Navigation Company in 1721, which aimed to provide a navigable route from the Mersey estuary to the Salford and Manchester by improving the course of the River Irwell and the River Mersey. The navigation opened in 1734, opening up trade from the growing port of Liverpool to Manchester and Salford (Geroge & Brummond, 2002, p. 22). A quay was established on the Manchester side of the river by Edward Byrom in 1736 to secure trade. A second quay was built on the Salford side of the river in 1755, connected to Chapel Street by Quay Street, located 160m to the northwest of the Site (HER 884.1.0). The Bridgewater Canal, the first true canal in the world, was completed between the Duke of Bridgewater's coal mines at Worsley and Castlefield by 1765. The success of the canal acted as the catalyst for the construction of numerous other canals across the country.

The growth of the new industries attracted migrants from the surrounding countryside and farther afield in search of employment opportunities. The phenomenal growth of the population in Manchester led to pressure for development, and a new church, St. Mary's Church, was built at Parsonage Gardens, consecrated in 1756 (HER 404.1.0). The earlier Church of St Mary had also been dedicated to St Denys and St George when it became a collegiate church. The church was connected via St Mary's Street to Deansgate. The names of the new streets laid across the former gardens reflected the ownership of the land by the church and included Parsonage Lane, St. Mary's Parsonage, College Land and St. Mary's Street.

As well as being at the forefront of advances in the industrialisation of the textile industry, Manchester and Salford's businessmen were eager to find new ways of lighting their mills at the beginning of the 19th century. Some of the earliest examples of private and public gas works were established in Manchester and Salford. At least two examples of early gas installations are within a 60m radius of the Site, together with the world's first municipal gas works, which were partly erected on the Site in 1817 by the commissioners of the Police.

5.6 History of gas

5.6.1 A brief history on lighting

During the Roman period, artificial light consisted of various oil lamps and candles, which were exclusively available to the wealthy. The light of a fire or rush lamps provided the only source of artificial light for working-class people who often went to bed after sunset (Edwards, 2008, p. 1). Public lighting was non-existent, and most people were superstitious about the dark and regarded the night air as dangerous. Artificial light sources were not strong enough to provide good quality light at night, confining activities to daylight until the late 18th century.

Growing concerns about lighting public areas at night began in at least the 15th century, when the Mayor of London, Henry Barton passed a law in 1417 that ordered all citizens to leave a light hanging outside their house between Hallowtide (31st October) and Candlemas (2nd February). An order issued in 1690 extended the number of months from Michaelmas (29th September) to Christmas and reminded householders to hang lights. The Common Council reiterated the same law in 1716, stating that all householders that lived on a street, passage or lane should hang out a lamp from at least 6 p.m. until 11 p.m. at night, failing to do so would lead to a one-shilling fine.

In domestic-based industries, artificial light was too poor to enable craftsmen to work at night and candles were too expensive for artisans to purchase. Furthermore, candles were subject to monopoly supply and were taxed until 1831 (Dillon, 2002, pp. 42-3). In most cases, craft guilds often prohibited their members from working before sunrise or after sunset. Attitudes to working during the hours of darkness were changed irrevocably by the rise of textile factories at the onset of the industrial revolution.

The world's first successful water-powered cotton mill opened in 1771 by Richard Arkwright in Cromford. Almost immediately after the mill was opened, it began to operate 24 hours a day, lit at night with huge quantities of candles and oil lamps. The sight of the cotton mill lit up at night was unparalleled and drew much attention. Nevertheless, the cost and fire risk associated with lighting mills by candles or oil lamps was problematic however, scientific investigations into other means of artificial lighting were already underway.

5.6.2 The discovery and use of coal gas

Coal has been extracted in bell pits from as early as 1500 in North East England. Deep shaft mining began to develop in the 18th century and rapidly expanded alongside the advent of steam power during the industrial revolution. Coal miners reported two types of dangerous gases called the chokedamp and firedamp. Details about the flammability of escaping natural gases from coal or oil shale beds were first written about in 1667 in a paper to the Royal Society by Thomas Shirley named 'A Description of a Well and Earth in Lancashire taking Fire, by a Candle approaching it' (Shirley, 1667). The discovery took place at a '*natural spring, which emanated carburetted hydrogen, thus igniting a candle when it was placed near the surface of the water*'.

John Clayton, a vicar from Wakefield, continued Shirley's work, and in 1684, excavated the base of the spring to find coal located 18 inches beneath the surface. The gas escaping from the coal measures was inflammable, and Clayton assumed that the coal was the source of the gas. Following his discovery, Clayton produced the earliest report on the distillation of coal in an open retort to produce a flammable gas (Chandler & Lacey, 1949). Experiments by other enthusiasts and scientists continued, and in 1726, Dr Stephen Hale was the first person to procure a flammable fluid from the distillation of coal, however, scientists overlooked the usefulness of the liquid. A third paper was published in the Philosophical Transactions of the Royal Society in 1733, detailing that coal gas retained its flammability after being stored for a considerable length of time, but it was not until 1790 when William Murdoch began experimenting with flammable gases that its full potential was recognised.

5.6.3 Private use of gas

Murdoch, an employee of Boulton and Watt, was specifically conducting experiments to see which gas would be most suitable for fuelling lamps. Coal gas undoubtedly produced the brightest flame, and Murdoch began installing gas lighting in his house in Cornwall, which was functioning by around 1792 (Thomson, 2003). The gas was produced by distillation of coal that was stored and transported through tubes to illuminate gas lamps. It was not until Gregory Watt (James Watt's son) visited Paris and saw the rival work of Phillipe Lebon that Murdoch's employers began to fully support his research, eventually investing £5000 in Murdoch's experiments.

In 1802, Murdoch lit the exterior of Boulton and Watt's Soho Manufactory in Birmingham to celebrate the Peace of Amiens. The illumination was the first public exhibition of gaslighting, which attracted much public interest. Murdoch, and his assistant Samuel Clegg, continued experiments in gas production and designing retorts before Clegg resigned in 1805. Clegg founded his own firm, eventually patenting his own inventions that helped to develop the gas industry. Meanwhile, the first of Boulton & Watt's steam engine customers, George Lee, a partner in Phillips and Lee's Salford Twist Mill (HER 1960.1.0; located 60m to the northwest of the Site), began to show an interest in the new technology. Perhaps, the incentive behind George Lee's interest occurred when he was offered a greatly reduced insurance cost (one-third of the previous cost) for having the Salford Twist Mill converted to gaslighting. Lee arranged for gas lighting to be trialled in his house in 1804 before deciding to install it in his factory. By 1805, the Boulton and Watt factory was the only supplier of gas-making plant in the world, and in the same year, Murdoch developed the world's first circular gasholder.

A letter from Phillips & Lee, dating to 19th July 1803 is held in the Boulton and Watt archive (B&W archive 3147/5/804b). The date of the letter and its contents imply that preparations for the gas works were already underway.

The first retorts supplied by Boulton and Watt to Salford Twist Mill in 1805 were like those that Murdoch used for his experiments at Soho. The retorts consisted of a vertical cylindrical vessel with a single door on the top (West, 2008, pp. 148-9). The design of the early retort made it difficult to remove the coke and other by-products produced from burning coal, so a second door was added at the bottom of the retort. By 1808, Boulton & Watt had improved retort design, and horizontal D-shaped retorts, typically 1.2-1.5m long, 650mm wide and 250mm high, superseded the earlier retort. Variants of the D-shaped retort were subsequently installed at Salford Twist Mill (BHM 3147/5/804k) and several other sites (ibid).

Between 1806 and 1811, Boulton and Watt installed gas works at 16 textile mills. The average price for a gas plant was approximately £1088, however, the cost for the gas works at Phillips & Lee was £4104. It is likely that as Boulton & Watt's first customers, Phillips & Lee paid a higher price for materials, but also had a much larger quantity of lights installed. Salford Twist Mill was lit with 550 cockspur and 300 Argand lights, equivalent to 3,725 candles (BHM 3147/3/478/16). The number of lights at the Twist Mill may have been excessive, as comparisons with mills of a similar size suggest that between 1000 and 2200 candle equivalents were installed (West, 2008, p. 108). After the commissioning of Salford Twist Mill, the quantity of lighting at McConnell & Kennedy was reduced from 4200 to 2200, implying that Boulton & Watt realised that fewer lights were required than they first expected (ibid).

In 1808, Murdoch presented a paper to the Royal Society entitled "Account of the Application of Gas from Coal to Economical Purposes". The paper described the application of coal gas to Salford Twist Mill. The plant was commissioned in January 1806 and represented Boulton and Watt's first commercial production of a gas-making plant, completed in 1807. The gas plant comprised eight holders housed in a rectangular building and a coal oven. This basic design served as the prototype for the larger plants built in cities in Britain. The mill itself may have been the first to be lit by this technique, although Samuel Clegg, claimed to have installed plant two weeks before Murdoch at Willow Hall Mill in Halifax, Yorkshire. Nevertheless, the publicity surrounding the use of gas at the Salford Twist Mill prompted a surge in orders for gas plant (Wilson, 1991, pp. 3-4). The economic advantages were highlighted in Murdoch's paper, which stated that by 1808, the annual lighting bill at Salford Twist Mill had been reduced from £2000 using candles to £600 (Wilson, 1991, p. 6).

5.6.4 Gas lighting in the public domain

Competing pioneers in the gaslighting industry included a French inventor, Phillipe Lebon, who invented the thermolamp in 1799. Frederick Winsor, who moved to England and changed his name to Frederick Winsor, allegedly stole Lebon's ideas, founding the 'National Heat and Light Company'. Winsor was seeking a Royal Charter for a monopoly supply of piped gas throughout Britain, promoting the idea of large central gas works supplying large districts. Boulton and Watt, however, believed that the future of the gas industry lay in separate small gas works serving each area or premises. A Parliamentary Committee in 1809 examined these opposing ideas on the Bill for the (London) Gas Light and Coke Company founded by Winsor. The Bill was defeated however, a Royal Charter to supply piped gas for public use to parts of Central London was passed in 1810. The headquarters of the Gas Light and Coke Company was established in Westminster and is identified as the original company from which British

Gas PLC descended (Stirling, 1949). Winsor employed Samuel Clegg in 1813 as the first gas engineer at the Gas Lighting and Coke Company and within ten years, London had eight gas works (Thomas, 2013).

The rivalry between Boulton and Watt and Frederick Winsor may have begun two years before the proposals for the defeated bill, in a race to illuminate the first street. The first well-recorded public street lighting was by Winsor in Pall Mall, London on 28th January 1807 (Thomas, 2013). However, by 1806, the gas works at Philips & Lee were not only lighting Salford Twist Mill but were also supplying gas to several lights on Chapel Street, making this the earliest street in the world known to have been lit by gas (Wilson, 1991).

Gasworks began to spring up around the country, particularly in industrial cities where demand was greater and by 1826, only two towns in Britain with a population over 10,000 did not have at least one gas company. The cost and technical demands of gas production soon favoured large, centralised works over small private ones. Outside London, Preston became the first town to have a public gas supply, which was in use by 20th February 1816. Exeter and Liverpool soon followed suit and obtained Acts of Parliament in 1816 (Thomas, 2013).

In Manchester, the first municipal gas works was installed at Albert Street (St Mary's Parsonage) by the Manchester Police commissioners. The police first showed an interest in 1806 when they installed a gas street lamp outside their station on King Street. The police were responsible for lighting and watching the streets, which, at the time, was produced by oil lamps. An article in the *Manchester Mercury*, in 1797, states that it was the police commissioner's responsibility for lighting oil lamps throughout the town and that they required a contractor to replace and repair all broken lamps (*Manchester Mercury*, 6th September 1797). A further article reported that an Act of Parliament had been passed, which stated that the police were responsible for '*the cleansing, lighting, watching and regulating the street lanes, passages and places within Manchester and Salford*' (*Manchester Mercury*, 18th February 1806). The police commissioners in Manchester passed a resolution in 1817 to build a gasworks to light the police stations, principal streets and sell any surplus to private customers. The gasworks was transferred to the Manchester Corporation in 1843 (Thomas, 2013, p. 5). A red plaque at Alberton House commemorates the gas works at Albert Street as the world's first municipal gas works to sell gas to the public, which was partly within the Site boundary.

Similarly, in Salford, in 1819, a group of local businessmen, consisting of Thomas Appleby, Richard Bain, Edward Fisher and a Mr Clay, decided to build a gasworks capable of supplying a wider area. The gas works were situated on Clowes Street (HER 12743.1.0) and were in operation by 1820, representing one of the earliest public gas undertakings in the region (Wilson, 1991, p. 27). In 1830, an Act of Parliament allowed the Salford Police Commissioners to purchase the gas works on Clowes Street, and until this date, the supply of gas was relatively limited. In 1844, a Charter of Incorporation was granted to the town, and the gas works came under the control of the Salford Corporation.

5.6.5 Later development and use of gas

By 1819, The Gas Lighting and Coke Company had laid nearly 290 miles of pipes in London to supply the public. Over 1000 gas works had been established across the country by 1859 to meet the demand for the new fuel. By 1888, there were 1500 gas works in Britain, employing 60,000 people (Hide, 2010, p. 12).

American inventor, Thomas Eddison, designed the first indoor electric power utility in the late 19th century using incandescent light bulbs. The new system was designed to function like gas lighting. The light bulbs were lit by direct current power, however, the voltage from the power plant dropped as the distance increased, which meant that all lamps had to be within a mile radius of the power plant. Therefore, gaslighting, remained widespread, with some new buildings using dual fuel systems of gas piping and electrical wiring. The development of alternating current power transmissions in the 1880s and 1890s solved the voltage and distance problem, overcoming many of the limitations of direct current, enabling the growth of low-cost electrical power. Electric lighting only gradually began to replace gaslighting in the early to mid-20th century. The supply of electricity in Britain was inefficient and fragmented until the Electricity (Supply) Act of 1926 was passed to establish the National Grid, which was operating as a national system by 1938. Following the completion of the National Grid, the growth in electric users in Britain was the fastest in the world, rising from three-quarters of a million in 1920 to nine million in 1938 (Gilbert 2010).

During the late 19th century, natural gas began to replace coal gas, as a cleaner and cheaper alternative. Britain was not abundant in natural gas, and in 1959, the North Thames Gas Board began importing Liquefied Natural Gas (LNG) from the Gulf of Mexico to a special facility built at Canvey Island. In other locations throughout the country, coal gas continued to be burnt until 1968 when natural gas was discovered in the North and Irish Seas. All coal gas plants were converted or replaced to use natural gas between 1967 to 1977. Gasholders became redundant and began to be demolished in large numbers from about 2000 onwards (The Historic England Blog, 2020).

5.7 Development of the Site

The development of the Site can be traced reasonably well from the sequence of available historic mapping. Cartographers Russell Casson and John Berry produced four successive maps from 1741 to 1751, providing the earliest detailed survey of the town (Plate 3). The map depicts Parsonage Croft, shortly before St Mary's Church was erected. In total, seven houses had been erected to the north of the parsonage. The lane to the west was annotated as Parsonage Lane and had also been partly developed (currently St Mary's Parsonage). The lane to the south of Parsonage Croft led west towards the River Irwell, with further gardens depicted along the southern side of the road. The Site lay in the vicinity of the gardens, adjacent to the bank of the river (Plate 3).

Other buildings in existence by the 18th century, included Manchester Poor House (established in 1764; HER 15267.1.0) and former buildings at New Magistrates Court (HER 11264.1.0). These were situated on Wood Street, located 180m to the southeast of the Site. Northcliffe House had been established at Spinningfields by 1740 and was one of the largest private mansions in the 18th century (HER 11240.1.0). A warehouse known as Rock House/Moss Wharf was also within the vicinity of the Site, built by 1728, though it does not seem to have been captured on Casson and Berry's map. The wharf was a sloping platform that reached the river downstream of Blackfriars Bridge, at the southern end of this frontage (HER 9913.1.0).



Plate 3 Extract from Casson and Berry's map of 1741, showing approximate Site location

Tinker's map of 1772 (Plate 4) shows that the vicinity of the Site had been developed further, with several new streets laid, extending west from Deansgate towards the Parsonage/river frontage. The map is the first to depict St Mary's Church, built in 1753-6 on Parsonage Croft. The church was based on the design of the parish church at Knutsford (HER 404.1.0). The most impressive part of the church was said to have been the lantern, composed of 8 Ionic pillars supporting a spire, surmounted by a large globe and cross. Further buildings had been added to the streets surrounding the church, and Dole Field (later Bridge Street) had been laid c 90m to the south of the Site. The Site was located between the end of Back South Parade and Garden Lane, centred on the bend on Parsonage Lane. These streets were not annotated on the plan but had been laid to the south of the church, aligned broadly east to west. Some development had taken place between Parsonage Lane and the river frontage, though it is unclear if any of these buildings lay within the Site boundary. The key on the map indicates that the number '25', marked on the streets surrounding the Site, referred to the Parsonage, whilst 'b' confirms the location of St Mary's church.

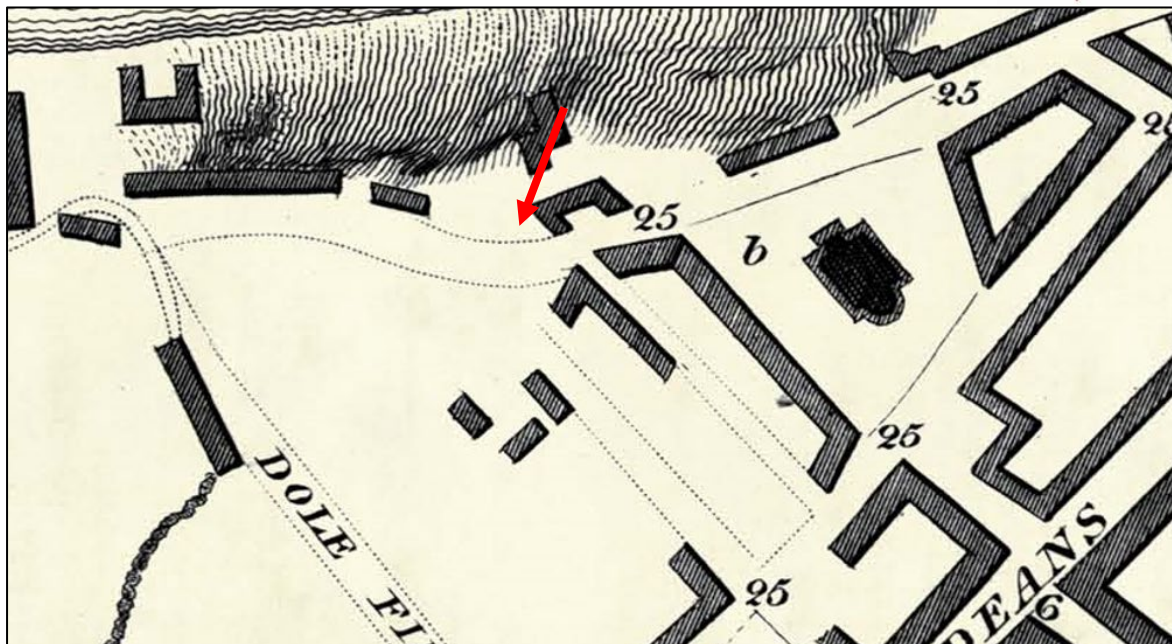


Plate 4: Tinker's map of 1772, showing approximate Site location

Similarly, Laurent's map of 1793 (Plate 5) and Green's map of 1787-94 (Plate 6; Fig. 3) captures the rapid expansion of the town, particularly in the parcel of land between Deansgate, the River Irwell and Bridge Street, in the area formerly owned by the church. The new street names reflect the former use and ownership of the land around the Site, including Parsonage Bank (formerly Parsonage Lane), College Land and Garden Lane. By the end of the 18th century, most of the Site had been developed. Laurent's plan indicates that the Site lay at the southern end of Parsonage Bank (formerly Parsonage Lane), at its junction with Water Street. The map shows that the Site may have included part of the warehouse known as Rock House (HER 9913.1.0), although the HER implies that the warehouse was further upstream than the map.

The building annotated as Rock House consisted of an irregular block that bordered the River Irwell. The building returned along the Parsonage Bank frontage to form a C-shaped building, with an enclosed yard. Green's map of 1787-94 (Plate 6) shows an almost identical configuration of buildings as Laurent's map, indicating that Rock House was within the Site boundary (although not annotated on Green's map). Rock House was built before 1726 and may have been expanded during the 18th century to extend within the Site boundary (HER 9913.1.0). Green's map shows that the southern part of the Site was enclosed land that belonged to a 'Riding School'. There does not seem to be any record of a riding school in contemporary trade directories or newspapers, however, a later newspaper article refers to the police premises being on the site of the late Oldham's riding school (*Manchester Mercury*, 2nd December 1806). The southeast edge of the Site remained undeveloped.

Scholes' trade directory of 1794 recorded Jacob Bradbury, a velvet dresser at Rock-yard, St Mary's (Scholes, 1794, p. 19). Textile workshops, merchants and warehouses had been established in the surrounding area. The trade directory confirms that the streets between Deansgate, the River Irwell, Salford Bridge and Bridge Street were in St Mary's District. In 1806, a newspaper advertisement referred to the sale of fustians and woollens at Mr Barnard's warehouse on Parsonage Lane (*Manchester Mercury*, 29th July 1806). It is unclear whether the article refers to the warehouse within the Site.

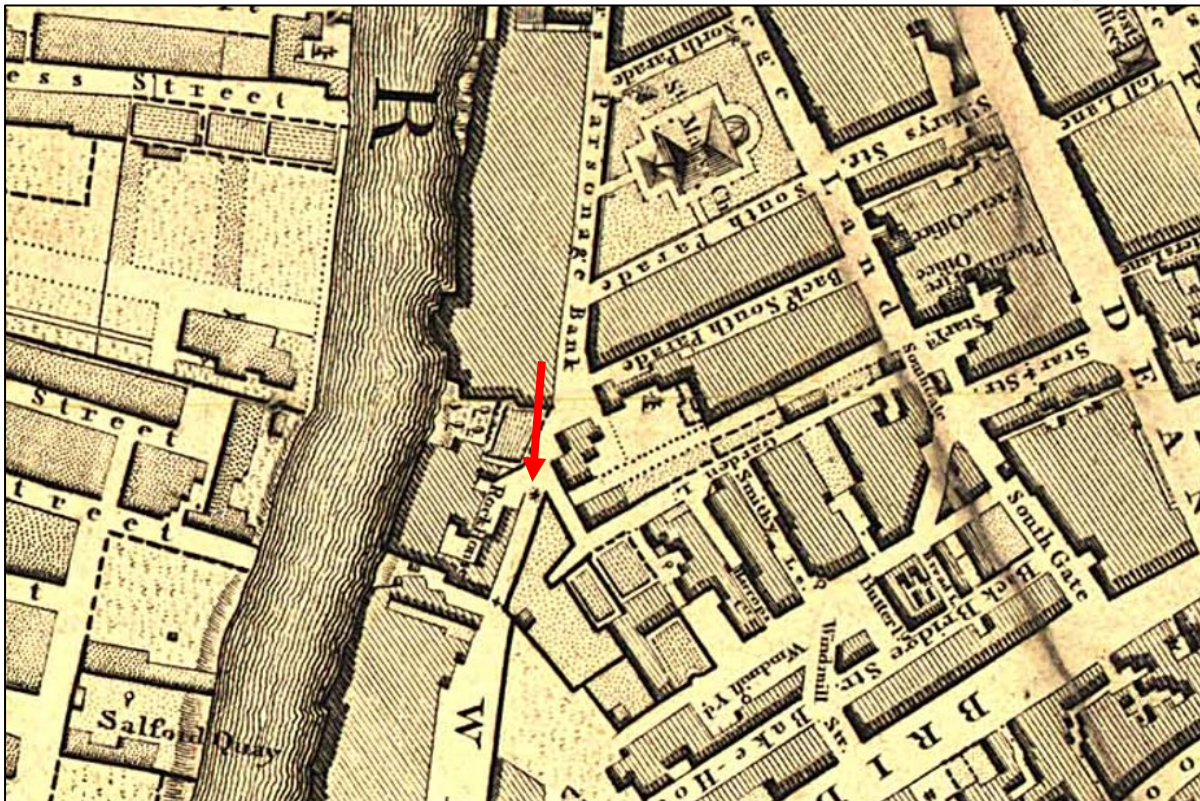


Plate 5: Laurent's plan of 1793, showing the approximate Site location



Plate 6 Extract from Green's map of 1787-94, showing area to the east of the Site

The earliest available map that details the Site is Swire's map of 1824 *Manchester and its Environs* (Plate 7; Fig. 4). The map shows that the buildings on the north side of the street remained mostly unchanged. A plot of vacant land lay on the southeast side of the possible warehouse. A key on Swire's map refers to the group of buildings shaded in black and numbered '26' as 'Gas Works (Manchester)'. The gasworks established on the southern side of the street had three circular holders, which were situated partly within the Site boundary. The gasworks was the first municipal gasworks in the world to sell gas to the public and was erected in 1817 by the Commissioners of Police. The earliest references to the gasworks appear in newspaper articles in the early 1820s. An advertisement in the *Manchester Mercury* stated 'iron founders wanted for the Manchester Gas Works. Thirty-six retorts with hydraulic main, upright pipes &c. and fifteen retorts to replace old ones. Tenders for the above must be delivered to the Police Office' (*Manchester Mercury*, 22nd April 1823).

An illustration of Manchester Gas Works, dated 1850, shows the frontage of the gasworks (Plate 8). A newspaper article suggests that a fire broke out at the Manchester and Salford Gas Manufactory in the St Mary's district on 6th October 1828 (*Public Ledger & Daily Advertiser*, 6th October 1828). The fire was thought to have originated from gas that had escaped from a loose valve at one of the gasometers. The gasworks was almost destroyed.

Several industries had been established along St Mary's Parsonage (formerly Parsonage Bank), including coopers, hat manufacturers, textile warehouses, public houses and farriers (Pigot & Dean, 1821). It is not clear whether any of the entries in the trade directory refer to the buildings within the Site.



Plate 7 Extract from Swire's map of 1824, showing the approximate Site Area

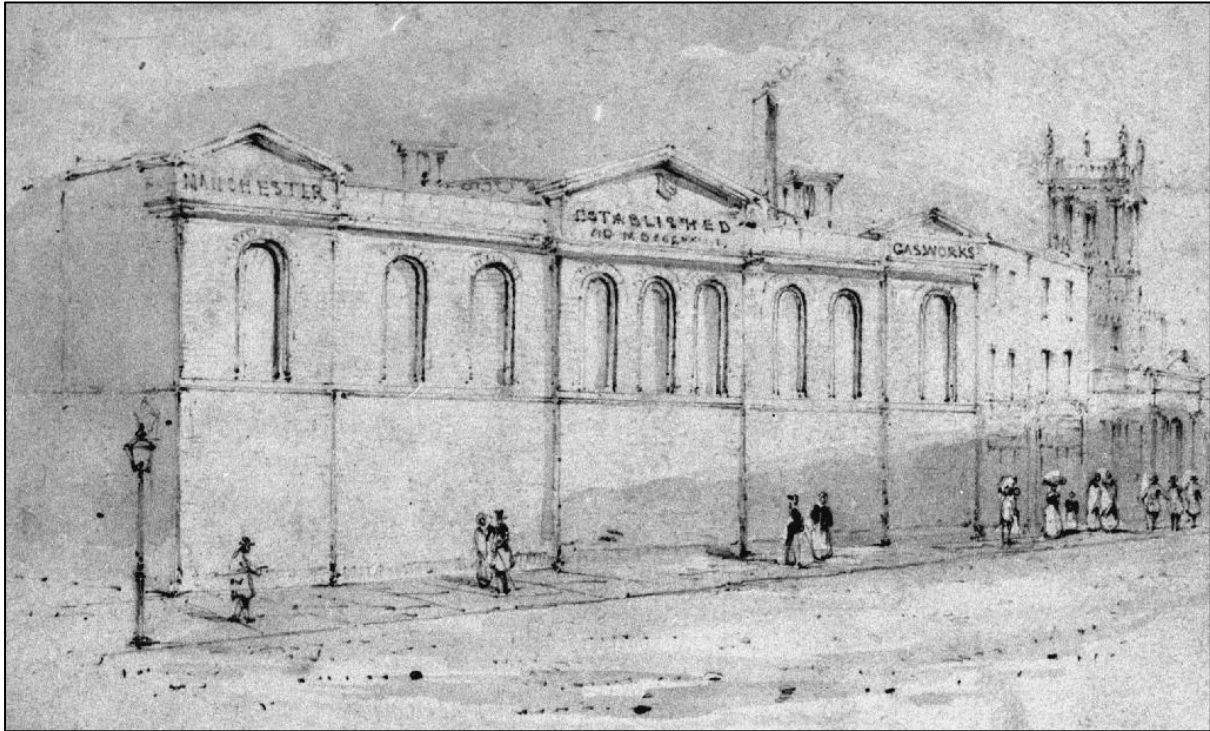


Plate 8: Sketch of Manchester Gas Works in 1850, courtesy of Manchester Local Image Collection

Bancks and Co's *Plan of Manchester and Salford*, published in 1831, is the next available map that captures the Site (Plate 9; Fig. 5). The map shows that the northeast end of the street that ran through the Site was called St Mary's Parsonage, whilst the southwest end was named Albert Street. Bancks' map shows the same buildings between the southern bank of the River Irwell and St Mary's Parsonage. The map shows the individual buildings within the Site, indicating that the adjoining buildings along the St Mary's street frontage consisted of four buildings. Land to the southwest of these buildings had been divided into two plots, containing small outbuildings. The frontage of a building partially extended within the west Site boundary. The footprint of the gasworks continued to occupy the southern part of the Site. The smaller gasholder shown on Swire's map was no longer extant and could indicate that it was this gasholder that was destroyed in the fire of 1828. A rectangular building had been erected against the west elevation of the southernmost gasholder. Generally, the gasworks occupied the same footprint, presumably with a separate office building along the St Mary's street frontage.

A newspaper article in 1845 describes the Manchester gasworks, '*now the most extensive in Great Britain, or in the world, were first commenced in 1817, and in December of that year, the Manchester public were first supplied with gas, from the establishment, at a charge of 15s per 1000 cubic feet. The funds for this purpose were supplied by the Commissioners of the Police out of the police funds (but which were afterwards repaid by virtue of an Act of Parliament, giving power to the Commissioners of Police to borrow, for this and other purposes therein named, a sum not exceeding £80,000) and have almost without exception, been annually extended...Extensive as are the Manchester Gas Works at the present moment, a further extension, it is said, is being now contemplated...the public may need not wonder if, in the next two years, the gas works should be extended 33 percent*' (Leeds Intelligencer, 4th January 1845).



Plate 9 Extract from Bancks' and Co's map of 1831, showing the Site boundary

The next available map that captures the Site is the Ordnance Survey map of 1850 (Plate 10; Fig. 6). The map is the first accurate map that details the Site, annotating several of the buildings within the Site and its vicinity. The map labelled the gasworks as '*Manchester Gas Works Reserve Station No. 1*'. The same two gasholders were depicted on the map, together with a new larger gasholder, erected in roughly the centre of the gasworks. The gasworks was bounded by a brick wall that ran along Lower King Street, Gas Street and Albert Street. A building associated with the gasworks ran the length of Gas Street. In comparison to the earlier maps, this building occupied a much smaller footprint. A building that had occupied the southern side of Albert Street had been demolished.

A similar footprint of buildings continued to stand between the River Irwell and Albert Street (formerly St Mary's Parsonage), which had been converted into a 'Brass and Copper Works (Barton and Co)'. A water outlet ran into the River Irwell from the Brass and Copper Works, in the north limit of the Site boundary. The buildings along the street frontage were no longer adjoined to the Brass and Copper Works at the southwest end but were instead adjoined by a new building to the northeast. The southwest end of the building seems to have been expanded over a former yard, and the frontage of an adjacent property extended slightly within the Site boundary. The earliest reference to the company is in the '*Certificates*' section of a newspaper in 1846 listing '*Barton and Co, copper roller manufacturers*' (*Weekly Chronicle London*, 30th August 1846), though the address of the premises was not listed. The buildings along the street frontage had pavement lights, indicating that they had cellars. An external

staircase ran alongside the north elevation of the building, which may have provided access to the cellar. The yard between the buildings was annotated as Rock Yard, perhaps a reference to the earlier warehouse, known as Rock House. The yard and building along the river frontage were accessed via a covered entrance along St Mary's Parsonage.

A description of the buildings and size of the Brass and Copper Works appears in a newspaper advertisement stating *'PLOT of LAND, situate in Albert-street, Manchester, and adjoining to the river Irwell, containing in the whole 1,997 Superficial Square Yards of LAND, or thereabouts, upon which are now standing the copper and brass works of Messrs. John Barton and Co., with messuages, cottages, warehouse, and other erections. The above has a street frontage of about 100 yards, and a river frontage of about 90 yards. Messrs. John Barton and Co. having removed their business to their new works at Broughton, the machinery, lathes, tools, &c. used by them at the Albert-street works, the business of copper smiths and brass finishers, will be Sold by Auction on the 8th and 9th days of November next, on the premises'* (Manchester Courier and Lancashire General Advertiser, Saturday 28th October 1854).

An article in the Edinburgh Gazette gives further insight into the works. It states that the *'Partnership between John Barton, George Barton and John Parks, carrying on business as Copper Roller Manufacturers, Coppersmiths, Brassfounders and Gas Engineers, at No. 4, Albert-street, Manchester, Back Shaw-street, Salford, and Broughton-bridge, in Broughton, all in the county of Lancaster, under the style or Firm of John Barton and Co., was as to the said John Parks, on 13th March, dissolved by mutual consent; and that in future the said several businesses will be carried on under the above style or firm by the undersigned John Barton and George Barton only, by whom all debts due and owing to and from the said late partnership will be received and paid'* (Edinburgh Gazette, 30th March 1855). The company seem to have had three places of business in Manchester and Salford, including the works within the Site that was at no. 4 Albert Street.

Slater's trade directory of 1850 recorded some of the trades along Albert Street, listing the Gas Works, bookkeepers, a milk seller, a tailor, a hatter, a cooper, a cork cutter, a beer retailer, a milliner, a merchant and an engineer (Slater, 1850, p. 1). St Mary's Street was occupied by a joiner, a whitesmith, iron and red liquor manufacturer, auctioneers, a drysalter and a plumber (Slater, 1850, p. 91).

The census returns of 1851 recorded the Gas Works as No. 1 Albert Street, which had a residential property on the site. The property was occupied by Joseph Courtney, a porter at the gasworks, his wife, Mary, their son, daughter-in-law, and grandchild. All the residents were born in Manchester, except for the daughter-in-law who was born in Liverpool (Census Returns 1851 Manchester, St Mary's, Lancashire). The premises on the north side of the street, within the Site, were not recorded in the census returns, indicating that they were industrial buildings. No. 2 was occupied by Margaret Rodden, who was 'out of business'. No. 10 was occupied by Robert Baines, a crucible maker, his wife, and their child. The residents were born in Northumberland, Cambridge and Scotland.

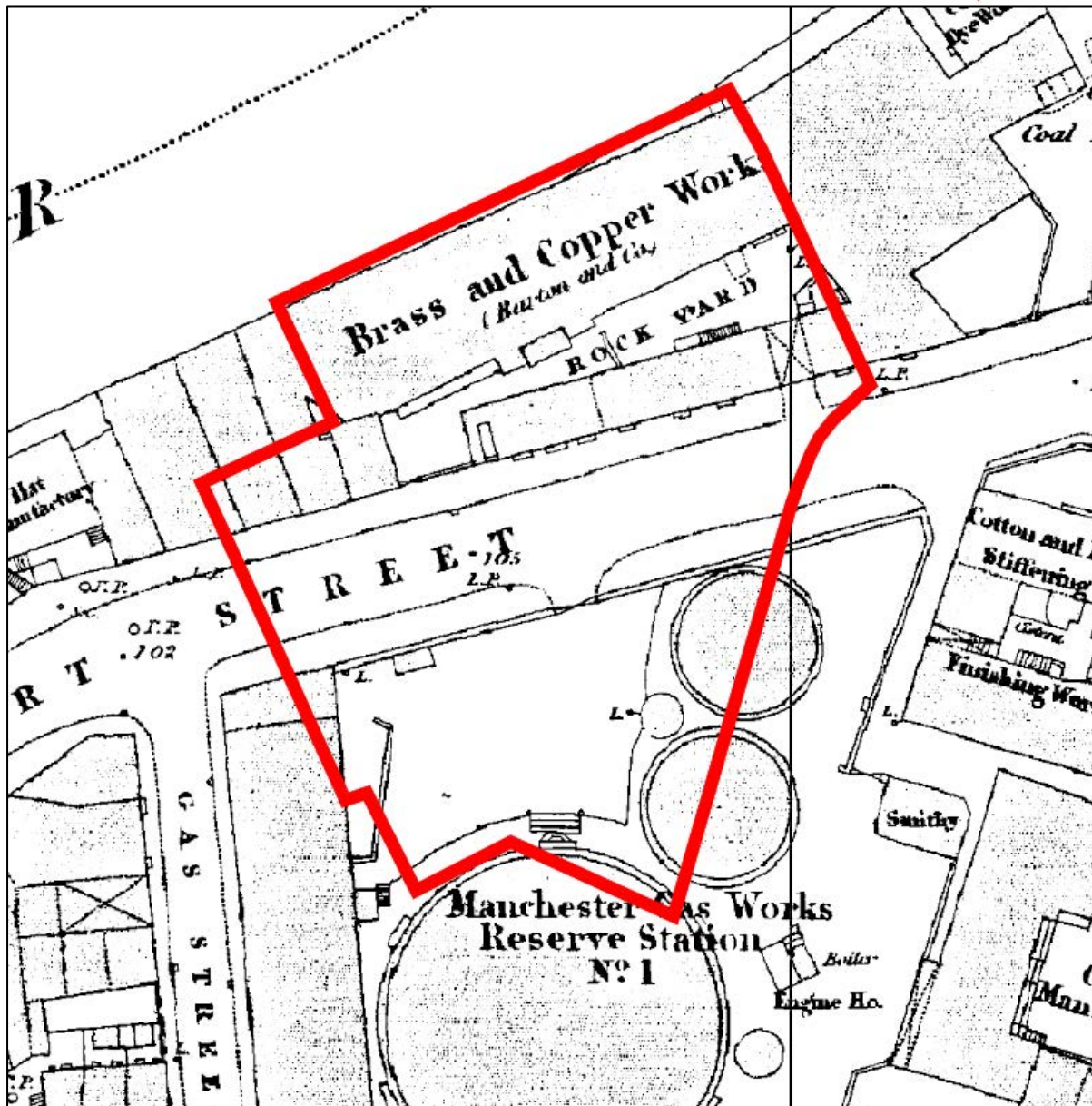


Plate 10 Extract from the Ordnance Survey map of 1850, showing the Site boundary

By the Ordnance Survey map of 1891 (Plate 11; Fig. 7), the Manchester Gas Works site had been demolished and replaced by a Police Station, which occupied the Albert Street frontage between Gas Street and Greek Street. The Police Station had access to the rear of the building via King Street West (formerly Lower King Street). Pavement lights were shown along the southern elevation of the building, implying that it may have contained a cellar or sub-cellar. Newspaper articles refer to the police offices on Albert Street as early as 1861 (*Rochdale Observer*, 30th March 1861). Slater's trade directory of 1863 confirms that the Police Station had been erected by the early 1860s, listing Police Station, A Division at No. 5-9 Albert Street (Slater, 1863, p. 2). A photograph, taken in 1905, shows the Police Station within the Site, which was between two- and three-storeys high and appears to have been brick-built with stone dressings.

The buildings on the north side of Albert Street had been altered slightly. Most of the alterations had taken place at the west edge of the Site, where two additional covered entrances had been added, one of which stretched towards the riverbank. The location of a chimney was

also marked on the map. The southwest end of the factory building had altered to form a square building.

Slater's trade directory of 1863 lists the businesses along Albert Street. The buildings on the north side of Albert Street had even street numbers, and the buildings within the Site may have included No.'s 2-9. Ede, Brothers & Co, merchants, occupied no. 2, Kirk Wheatley, an engineer, lived at no. 4, and John Fitzmaurice, a coachbuilder, occupied no. 8 (Slater, 1863, p. 2). Ede Brothers & Co at no. 2 Albert Street also appear in Straker's annual mercantile, ship insurance register of 1863 (Straker, 1863, p. 79).

Slater's trade directory of 1895 recorded the Police Station at no. 7 Albert Street. On the opposite side of the road, no. 2 Albert Street was occupied by multiple companies, including John. A Bremner & Co, oil importers, Henry Render, a miller and The Lancashire Explosives Co manufacturers of bellite. Bellite was an explosive used in coal mines and was made in various strengths (*Staffordshire Sentinel*, 27th November 1897). No. 4 was occupied by the Robinson Brothers, cork importers. James Thompson & Son, carriers were at no. 6, and James Dilworth & Son, yarn agents, occupied no. 8 (Slater, 1895, p. 6). It is likely that no. 2 Albert Street corresponded with the large premises on the north side of the street (formerly the brass and copper manufactory and possibly of 18th-century date).

The census returns for 1891 did not record the businesses on the north side of the street, however, the Police Barracks was occupied by 19 police constables and a prisoner, John Mullon, who worked as a basket weaver and was born in Ireland. The Policemen had been born in various locations throughout the country, including Cheshire, Staffordshire, Lincolnshire, Norfolk, Gloucestershire, Yorkshire and Ireland as well as Manchester and Salford (Census Returns 1891 Manchester, Exchange, St Mary's, Lancashire, England). The property next door was occupied by the police sergeant and his family.

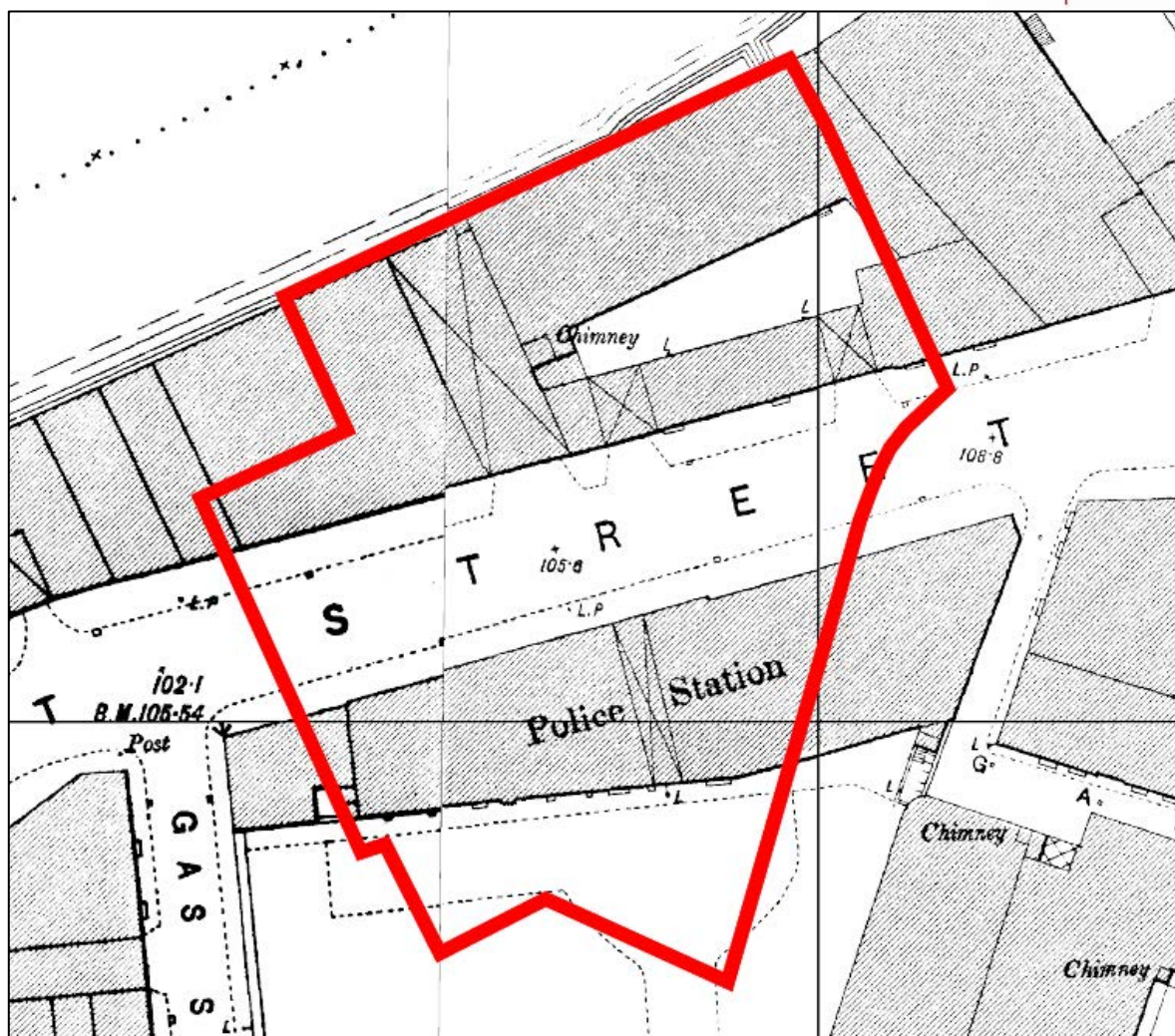


Plate 11 Extract from the Ordnance Survey map of 1891, showing the Site boundary



Plate 12 Albert Street Police Station, taken in 1905, courtesy of Manchester Local Image Collection

The same configuration of buildings was captured on the Ordnance Survey map of 1922 (Fig. 8). Slater's trade directory of 1911 recorded Philip Cobden as the superintendent of the police station, whilst police constable, William Hewitt, lived at the adjacent property (Slater, 1911, p. 10). By the turn of the century, most of the warehouses and factories on the north side of the street were occupied by multiple companies. No. 2 was occupied by Henry Render, a miller, Chas Bethell, plumbers' merchants, and Robert Rogerson, grey cloth agent. No. 4 was occupied by Robinson Brother Cork Growers Limited, cork importers. Jas Dilworth & Son, yarn agents, occupied no. 6 and Goodall, Lamb & Heighway Limited, cabinet makers, occupied no. 8 (ibid).

Air raids undertaken by the German Luftwaffe during the Second World War may have damaged the area surrounding the Site. The nearest known casualties were on Bridge Street and Black Friars Bridge. By the end of the 1940s, all the buildings between Albert Street and the river frontage were annotated as ruins. Several plots of land were vacant along King Street West, and the police station had been demolished.

The Ordnance Survey map of 1956 (Fig. 9) shows that a garage had been partly erected on the site of the former police station. A new road layout is also captured on the map, showing that Gas Street was no longer extant and that Alberton Street had been laid to the east of the Site, aligned north to south. Albert Street also appears to have been renamed Alberton Street.

During the 1960s, Albert Street was no longer extant, and Albert Bridge House (Government Offices) had been erected between the river frontage and Bridge Street to the southwest of the Site. By 1970, Alberton House had been erected on the Site. Alberton Street has since been renamed St Mary's Parsonage (Fig. 2).

5.8 Previous archaeological works

Within a 250m radius of the Site, 13 desk-based assessments, five watching briefs, four archaeological evaluations and six archaeological excavations have been undertaken. Some of the desk-based assessments resulted in intrusive archaeological interventions to mitigate the loss of archaeological remains.

In 2006, UMAU carried out the first phase of an archaeological evaluation at Chapel Wharf, consisting of three evaluation trenches and two trial pits (EGM 3903). Phase 2 (EGM 3904) was undertaken two years later, comprising 18 evaluation trenches between Clowes Street and Barlows Croft, which resulted in an open area excavation, where medieval and post-medieval burbage ditches were excavated (UMAU, 2007). The third phase of works consisted of an archaeological excavation, which targeted the footprint of Salford Twist Mill and workers' housing (EGM 4890). The archaeological works were undertaken on the opposite side of the river, 60m to the northwest of the Site (Salford Archaeology, 2017).

Significant archaeological remains were also excavated at Plot 106, Spinningfields, located 22m to the southeast of the Site. The excavation revealed four phases of activity, including a pre-medieval or medieval post pit that was perhaps associated with a timber structure or fence line; a medieval plough soil, associated with a small assemblage of 12th- to 14th-century pottery; a post-medieval garden soil, containing 15th- to 18th-century artefacts; and a series of late 18th-century buildings, which originally flanked Cumberland Street (UMAU, 2007).

Further post-medieval soils were revealed at the Pump House, Manchester, located 180m to the south of the Site. The soils consisted of a small surviving area of post-medieval deposits, associated with a small assemblage of late 17th-and early 18th-century artefacts, which lay close to River Irwell. Late 18th-century houses were also excavated in the area (UMAU, 2008).

Excavations 180m to the southwest of the Site, at Plot 104, revealed the remains of four late 18th-century buildings, one of which had functioned as an industrial property, before being converted into workers' housing. A large assemblage of clay tobacco pipes and kiln waste was recovered from the Site (UMAU, 2008).

5.9 Summary of archaeological potential

No prehistoric activity is known to have taken place within the Site. Similarly, no Roman activity is known to have taken place within the Site, though it lies 170m to the west of the Roman road to Ribchester. The Site lay in the vicinity of Parsonage Croft during the medieval period, which is corroborated by mid-18th-century mapping.

By the late 18th century, the Site had been developed, and the buildings in the north part of the Site were annotated as Rock House, whilst the southern part of the Site functioned as a riding school. A warehouse/wharf named Rock House had been built by 1728 and lay to the northeast of the Site. The building captured on the late 18th-century maps most likely corresponds with the early 18th-century building described in the HER. A similar configuration of buildings occupied the north side of the street until the mid-20th century.

During the early 19th century, the first municipal gasworks was erected on the southern part of the Site. In total, three gasholders lay partly within the Site boundary. By the late 19th century, the gasworks had been redeveloped into a Police Station. The same configuration of buildings occupied the Site until the 1940s/50s. The Site was redeveloped into Alberton House by 1970.

The Site has moderate potential to contain 18th-century buildings (Rock House) in between the former course of Albert Street and the river frontage. The Site also has some potential to contain buried remains of post-medieval garden soils, Manchester Gas Works and a Police Station.

6. Gazetteer

The following gazetteer entries (GE) summarise the sites of potential archaeological interest within the Study Area and elements of the historic landscape. The identification of these heritage assets is drawn primarily from the historic map regression analysis, Historic England, and the HER data. The locations of the gazetteer entries are shown on Figures 10 within Appendix 2: Figures.

Gazetteer Entry 01

Site Name	Pre-industrial landscape
Designation	No designation
HER Number	-
Site Type	Gardens (site of)
Period	17 th and 18 th century
NGR	383500 398416
Source	HER; 1640 map; Casson and Berry's map of 1751
Description	In 1635, the college wardens were provided with the two-acre parcel of land known as Parsonage Croft, now called Parsonage Gardens. The 1650 map (Plate 2, 13) of Salford and Manchester annotated a plot of land between Deansgate and the River Irwell as 'New Garden's', which appears to have been in the vicinity of the Site. Casson and Berry's map of 1751 Plate 3, 19) clearly shows Parsonage Croft and a strip of gardens between Deansgate and the River Irwell, in the vicinity of the Site. Excavations within a 250m radius of the Site have uncovered medieval and post-medieval agricultural soils and features. The survival of the pre-industrial landscape is rare in Manchester and Salford and has often been removed by extensive development in the 19 th century.
Assessment	Remains of the medieval and post-medieval landscape could survive in isolated patches and therefore, may be affected by the proposed development scheme, though much of the pre-industrial landscape is likely to have been removed by the 18 th - and 20 th -century development of the Site.

Gazetteer Entry 02

Site Name	Rock House/Brass and Copper Works
Designation	No designation
HER Number	9913.1.0
Site Type	Industrial premises (site of)
Period	18 th century
NGR	383493 398426 (centre at)
Source	HER; Historic Mapping
Description	The HER describes Rock House ' <i>The river bank at this point was sandstone (a warehouse called Rockhouse was built with the end gable to the river and road). It is shown on the 1728 and 1734 Prospects of Manchester – called the Moss Wharf; the wharf is in fact a sloping platform reaching to the river just downstream of Blackfriars Bridge. Rock House was at the southern end of this frontage</i> '. The HER co-ordinates for Rock House place it to the north of the Site. Laurent's map of 1793 (Plate 5, 21) shows a building named Rock House within the Site. Green's map of 1787-94 (Fig. 3) shows the exact same building as Laurent's map. The late 18 th -century building may correspond to the early 18 th -century building described in the HER. Mid-19 th -century maps shows broadly the same configuration of buildings that likely contained cellars and was annotated as a Brass and Copper Works at Rock-Yard. The same building occupied the Site until it was demolished in the mid-20 th century.
Assessment	Roughly the same configuration of buildings between Albert Street and river frontage occupied the Site from the late 18 th -century until the mid-20 th century. Remains associated with these buildings could be affected by the proposed development scheme.

Gazetteer Entry 03

Site Name	Manchester Gas Works
Designation	No designation
HER Number	-
Site Type	Gas plant (site of)
Period	Early 19 th century
NGR	383492 398396 (centred at)
Source	Swire's map of 1824; Bancks & Co's map of 1831; OS mapping
Description	In total, three gasholders fall within or partly within the Site boundary. The police commissioners in Manchester passed a resolution in 1817 to build a gasworks to light the police stations, principal streets and sell any surplus gas to private customers. This was the first example of a municipally owned gas undertaking in the world. A gasworks is first shown on Swire's map of 1824 (Plate 7, 22) shaded in black and noted as ' <i>Gas Works (Manchester)</i> '. The gasworks was transferred to Manchester Corporation in 1843 and is marked on the OS map as Manchester Gas Works Reserve Station No. 1 (Plate 10, 26). Demolished by 1860 and replaced by a Police Station.
Assessment	Remains of the gasholders may survive within the Site and could be affected by the proposed development scheme.

Gazetteer Entry 04

Site Name	Police Station, A Division
Designation	No designation
HER Number	-
Site Type	Police Station (site of)
Period	Mid-19 th century
NGR	383485 398407 (centred at)
Source	OS mapping
Description	A police station was erected on the site of the former gasworks by 1861. Historic mapping indicates that the station may have been cellared. The building was demolished in the mid-20 th century and replaced by Alberton House.
Assessment	Remains of the police station may survive within the Site and could be affected by the proposed development scheme.

7. Significance

7.1 Policy context for heritage assets

The archaeological resource of an area can encompass a range of assets, including below-ground remains, earthworks, and standing buildings and other structures. Some of these remains may have statutory protection, such as Scheduled Monuments or listed buildings. Others do not, but may nevertheless be of archaeological significance. Under both national and local planning policy, as outlined below, both statutory and non-statutory remains are to be considered within the planning process.

The NPPF sets out the Government's planning policy and framework for England, and how these are expected to be implemented. The NPPF places particular emphasis on assessing the development proposals in line with an up-to-date local plan. Consequently, Manchester's Core Strategy (adopted July 2012) was consulted as the key Development Plan Document in the Local Development Framework (LDF), with particular reference to Policy EN3: Heritage. In determining applications, local planning authorities must be able to understand the significance of any heritage assets affected by a proposed development in order to assess its impact. This enables the conservation of heritage assets in a manner suitable to their significance so that they can be enjoyed for their contribution to the quality of life of this and future generations, or else they can be recorded and advance understanding of the significance of any heritage assets to be lost in a manner proportionate to their importance and the impact, and to make this evidence publicly accessible.

7.2 Designated heritage assets

The Site is situated within 250m of five Conservation Areas, the nearest of these is the Parsonage Gardens Conservation Area, however, the proposed development will not have a physical impact on these designated heritage assets, and so they are not considered further in this report (see Section 2.3). No non-designated heritage assets are located within the Site boundary, however, several sites that have archaeological potential have been identified (see Section 6).

7.3 Significance of the archaeological resource

7.3.1 Historical and archaeological interest

Historical interest

The Site is located 10m to the west of the Parsonage Gardens Conservation Area. The name of the Conservation Area, and surrounding streets, reflect the area's former use as gardens that catered for the Collegiate Church during the 15th to 18th centuries. Historic maps indicate that the Site most likely contained gardens during the mid-18th century and is likely to be connected to the history of the Conservation Area. By the late 18th century, the Site was almost entirely developed, containing an early industrial building, annotated Rock House. Another important industrial development within the Site was the establishment of the world's first municipal gasworks. Therefore, the Site is considered to be of historical interest.

Archaeological interest

Archaeological remains within the Site could be associated with the early use of the area as gardens associated with the Collegiate Church, which adds to the archaeological interest of the Site. The potential archaeological remains of an early 18th-century building also hold

archaeological interest as buildings pre-dating the 19th century are rare. Furthermore, the gasworks would also be of archaeological interest.

7.3.2 Baseline significance conditions

Period

No prehistoric or Roman activity is known to have taken place within the Site, and the potential for such remains is considered to be extremely low due to the intensive development of the Site since the early 19th century.

The most likely remains to be encountered within the Site would date to the post-medieval and industrial periods, which could include gardens (GE01), an 18th-century industrial building annotated on late 18th-century mapping as Rock House on the northern side of Albert Street (GE02), Manchester Gas Works (GE03) and a Police Station (GE04). The industrial period is significant to Manchester's history. Therefore, sites reflecting Manchester's industrial heritage may be considered significant due to period.

Rarity

Buried remains pre-dating the 19th century (GE01-2), would be considered significant due to rarity, as few remains survive within the area due to extensive development during the industrial period. Archaeological remains associated with the gasworks (GE03) and police station (GE04) may not be considered rare as there are many several surviving examples.

Documentation

The historical development of the Site can be traced reasonably well from cartographic and other primary sources. Further documentary research would undoubtedly furnish additional evidence, although this is unlikely to alter the outline and conclusions presented in this assessment.

Group value

The Site lies within an area of Manchester that was developed during the early industrial period. The buildings erected within the Site are characteristic of this period and may hold some group value.

Survival / condition

The survival, extent and condition of any below-ground archaeological remains within the Site is presently unknown, however, the industrial building (GE02) and Police Station (GE04) may have contained cellars. Since the demolition of the buildings, the Site has been redeveloped into Alberton House. Buried archaeological remained may survive beneath this structure, depending on the construction methods employed.

Fragility / vulnerability

Any buried archaeological remains, should they be present and survive *in situ*, are vulnerable to damage or destruction during any earth-moving works associated with the restoration scheme.

Diversity

The heritage assets within the Site are mostly associated with the development of the industrial period, however, the Site may have been in use since the medieval and post-medieval period and therefore may be considered significant due to diversity.

Potential

There are no prehistoric sites within the Site or its environs, and the potential for prehistoric or Romano-British remains is considered to be very low. The Site was within an area that contained gardens during the late medieval and post-medieval periods, which were used to cater for the Collegiate Church. The survival of former agricultural activity may have some potential to address the research agendas outlined in the current *Archaeological Research Framework for North West England* (<https://researchframeworks.org/nwrf/industrial/#section7>; <https://researchframeworks.org/nwrf/sample-page/post-medieval/>):

LM05: How can we recreate the medieval land-use patterns within townships?

LM12: How do we improve our knowledge of the regions various agricultural practices, plant and animal husbandry, and how did these change and develop over time?

PM11: How can palaeoenvironmental indicators of consumption enhance our understanding of the wider patterning and social context?

Ind09: How does the nature of rural settlement change during this period?

Ind15: How well recorded and understood are farming landscapes and field patterns?

Ind21: How did industrial period towns affect the pre-existing historic landscape?

It is unlikely that below-ground remains pertaining to the gardens will survive within the Site due to the development that took place in the 18th century and the redevelopment of the Site in the late 1960s, though isolated patches of garden soil cannot be ruled out entirely. The Site has some potential to address the research aims listed above.

An industrial building had been erected on the north side of Albert Street by the late 18th century, annotated Rock House (Plate 6, 21). The research agendas listed in the *Archaeological Research Framework for North West England* (<https://researchframeworks.org/nwrf/industrial/#section-24>) aim to address urban housing:

PM27: How do the industries associated with the North West evolve and develop during this period?

Ind53: What can archaeology tell us about the production and use of consumer products and their typologies from the late 18th to early 20th centuries?

Ind58: How have industrial buildings adapted to new technology and processes?

The building was demolished in the mid-20th century and replaced by Alberton House. The Site may have some potential to address the research aims listed above, depending on the construction methods used to build Alberton House.

The development of power production sites has been recognised as an avenue of research. This is articulated in the current *Archaeological Research Framework for North West England* (<https://researchframeworks.org/nwrf/industrial/>) which identified several initiatives that should be prioritised for archaeological research:

Ind52: What Industrial and Modern period type sites need further study?

Ind55: What is the evidence for the development of power production?

Ind61: What are the gaps in our understanding of power production sites in the North-West?

The world's first municipal gasworks, built in 1817, was partly across the southern part of the Site. In total, three gasholders were partly within the Site. The redevelopment of the gasworks into a police station may have impacted the survival of buried remains. The Site may have some potential to address the research aims listed above, depending on the construction methods used to build the police station and Alberton House. It may also be worth noting that all redundant non-designated gas holders are currently being demolished across the country. These structures are being recorded as part of this national programme (*ibid*).

There is also potential for buried remains of a police station to survive within the Site. Remains of the police station may have potential to address a research aim listed in the current *Archaeological Research Framework for North West England* (<https://researchframeworks.org/nwrf/>), including:

Ind106: To what extent have we identified and protected the most important examples of police and fire stations in the region?

Buried remains of the police station have limited potential to address the research aim listed above.

7.4 Summary of significance

It can be concluded from the information gained from the desk-based research that the Site is of archaeological interest and has potential to contain buried remains dating to the late medieval/post-medieval period to industrial period.

Using the above criteria and the ICOMOS guide for assessing value of heritage assets (the Site most likely contains non-statutory archaeological remains of low and medium significance (ICOMOS, 2011).

The Site has potential to contain garden soils (GE01) that would be considered to be of low significance. It also has potential to contain an 18th-century industrial building (GE02) and Manchester Gas Works (GE03) that are considered to be of medium significance. The police station (GE04) may be considered as negligible.

8. Impact assessment

8.1 Development Proposals

The delivery of the proposals will the demolition of basement and office building with the exception of the shared staircase between Alberton House and Cardinal House and construction of a 20-storey office led development with basement gym, ground floor café / bar (Use Class E), and a rooftop amenity space including an external terrace and wellness facility, improvements to public realm surrounding the site and new loading bay and highways works. The delivery of the proposals will involve ground-breaking works that have the potential to affect any surviving archaeological remains within the Site.

8.2 Impact upon archaeological resource within the Site

Delivery of the development proposals will necessitate some ground-breaking and landscaping works across the Site, with potential to impact on buried archaeological remains.

This assessment has demonstrated that the Site has the potential to retain buried remains of post-medieval garden soils, an 18th-century industrial building known as Rock House, Manchester Gasworks and a police station. Any such remains that do exist within the Site are likely to be of low to medium significance and, without a programme of mitigation, the scheme could damage or destroy these remains.

9. Recommendations

9.1 Heritage Assets

The NPPF makes clear that where the loss of the whole or a material part of a non-designated heritage asset's significance is justified by a development, the developer should be required to record that asset and advance understanding of its significance, and to make this evidence publicly accessible.

9.2 Further Investigation

The exact scope and extent of any such further investigation of the Site will be determined by the Greater Manchester Archaeological Advisory Service (GMAAS), in their capacity as archaeological advisor to Manchester City Council. It may be anticipated, however, that an archaeological evaluation may be required to establish the presence or absence of buried archaeological remains and, if present, their extent and significance.

Should significant archaeological remains be encountered during the archaeological evaluation, further excavation may be required to offset the harm of the development to the buried archaeological resource, in line with the guidance provided by the National Planning Policy Framework. The scope and extent of any such further investigation will be determined by the Greater Manchester Archaeological Advisory Service (GMAAS), in their capacity as archaeological advisor to Manchester City Council.

10. Sources

10.1 Cartographic sources

A Plan of the Towns of Manchester and Salford in the County Palatine of Lancaster, R. Casson and I. Berry, 1746

A Plan of Manchester and Salford, W. Green 1787-1794

Map of Manchester and its Environs, W. Swire, 1824

A Map of Manchester and Salford, Bancks & Co, 1831

Ordnance Survey 1:1056 Town Plan, published 1851

Ordnance Survey 1:500 Town Plan, published 1891

Ordnance Survey 1:2500 County Series Map, 1908 edition, surveyed 1908

Ordnance Survey 1:2500 County Series Map, 1922 edition

Ordnance Survey 1:1250 National Grid Map, published 1956

10.2 Census Returns

1851 Census Returns, St Mary's, Manchester, Lancashire

1891 Census Returns 1891 Manchester, Exchange, St Mary's, Lancashire, England

10.3 Newspapers

Manchester Mercury, 6th September 1797

Manchester Mercury, 18th February 1806

Manchester Mercury, 29th July 1806

Manchester Mercury, 2nd December 1806

Public Ledger & Daily Advertiser, 6th October 1828

Leeds Intelligencer, 4th January 1845

Weekly Chronicle London, 30th August 1846

Manchester Courier and Lancashire General Advertiser, Saturday 28th October 1854

Edinburgh Gazette, 30th March 1855

Rochdale Observer, 30th March 1861

Staffordshire Sentinel, 27th November 1897

10.4 Boulton & Watt Archive

3147/5/804b

BHM 3147/5/804k

10.5 Bibliography

Countryside Comission, 1998. Countryside Character Volume 2: North West. In: Cheltenham: s.n.

- Chandler, D. & Lacey, A. D., 1949. *The rise of the gas industry in Britain*. s.l.:British Gas Council.
- Chandler, J. H., 1993. *John Leland's Itinerary: Travels in Tudor England*. s.l.:Sutton Publishing Ltd.
- ClfA, 2017. *Standard and Guidance for Historic Environment Desk-based Assessment*, Online resource: The Chartered Institute for Archaeologists.
- DCMS, 2013. *Annex 1: Scheduled Monuments & nationally important but non-scheduled monuments*, Online resource: Department for Culture, Media and Sport.
- Defoe, D., 1727. *A Tour Thro' the Whole Island of Great Britain (1720s)*. s.l.:s.n.
- Dillon, M., 2002. *Artificial Sunshine: A Social History of Domestic Lighting*, London: National Trust.
- Edwards, J., 2008. Post Roman Pottery. In: D. Garner, ed. *Excavations at Chester: 25 Bridge Street 2001, two thousand years of urban life in microcosm, archaeological service excavation and survey report no 14*. s.l.:Chester City Council, pp. 187-242.
- Farrer, W. B. J., 1911. *Victoria County History of Lancashire*. London: s.n.
- Frangopulo, N. J., 1964. *Rich Inheritance: A Guide to the History of Manchester*. s.l.:S. R. Publishers.
- Geroge, D. & Brummond, D., 2002. The Mersey Irwell Navigation - The Old Quay. In: R. McNeil & D. George, eds. *The Heritage Atlas 4: Manchester - Archetype City of the Industrial Revolution*. s.l.:s.n.
- Grealey, S., 1974. *Roman Manchester*. s.l.:Manchester University Press.
- Gregory, R., 2007. *Roman Manchester: The University of Manchester's Excavations within the vicus 2001-5*. Oxford: s.n.
- Hadfield, C. & Biddle, G., 1970. *The Canals of North West England*. s.l.:Newton Abbot.
- Hartwell, C., 2001. *Manchester*. s.l.:Pevsner Architectural Guide.
- Hartwell, C., Hyde, M. & Pevsner, N., 2004. *The Buildings of England. Lancashire: Manchester and the south-east*. London: s.n.
- Hide, K., 2010. *Profession versus Trade? A defining episode in the development of the gas lighting*, s.l.: Unpub PHD report.
- Historic England, 2015. *Managing Significance in Decision-Taking in the Historic Environment. Historic Environment Good Practice Advice in Planning: 2*, Online resource: Historic England.
- ICOMOS, 2011. *Guidance on Heritage Impact Assessments for Cultural World Heritage Properties*, Online resource: International Council on Monuments and Sites.
- Kidd, A., 1996. *Manchester*. 2 ed. Keele: s.n.
- Manchester City Council, 2012. *Manchester's Local Development Framework Core Strategy and Development Plan Document*. s.l.:Manchester City Council.
- Ministry of Housing, Communities & Local Government, 2021. *National Planning Policy Framework*, Online resource: Ministry of Housing, Communities & Local Government.
- Morris, M., 1983. *The Archaeology of Greater Manchester: Medieval Manchester*. s.l.:s.n.

- Phillips, C. B. & Smith, J. H., 1994. *Lancashire and Cheshire from AD1540*. s.l.:Routledge.
- Pigot, J. & Dean, R. W., 1821. *Pigot and Dean's New Directory of Manchester and Salford for 1821-2*. Manchester: R. W Dean.
- Salford Archaeology, 2017. *Archaeological Post-excavation Assessment*, s.l.: unpub report.
- Scholes, P., 1794. Scholes' Manchester and Salford Directory . In: Manchester: Sowler and Russell.
- Shirley, T., 1667. A Description of a Well and Earth in Lancashire taking Fire, by a Candle approaching it. *Royal Society*.
- Slater, I., 1850. *General and Classified Directory and street register of Manchester and Salford and their vicinities*. Manchester: Isaac Slater.
- Slater, I., 1863. *Slater's Royal National Commercial Directory of Manchester and Salford, with their vicinities*. Manchester: Slater and Son.
- Slater, I., 1895. *Slater's Royal National Commercial Directory of Manchester and Salford, with their vicinities*. Manchester: Isaac Slater.
- Slater, I., 1911. *Slater's Royal National Commercial Directory of Manchester and Salford, with their vicinities*. Manchester: Isaac Slater.
- Stirling, E., 1949. *The History of the Gas Light and Coke Company, 1812-1949* , s.l.: London.
- Straker, S., 1863. *annual mercantile, ship insurance register*. London: Straker & Son.
- The Historic England Blog, 2020. *A brief introduction to gasholders*. [Online].
- Thomas, R., 2013. The History and Operation of Gas Works. *Researchgate*.
- Thomson, J., 2003. *The Scot Who Lit The World, The Story Of William Murdoch Inventor Of Gas Lighting*. s.l.:s.n.
- Tupling, G. H., 1962. *Manchester and its Regions*. Manchester: s.n.
- UMA, 2007. *Chapel Wharf Phase 2, Clowes Street, Salford: An Archaeological Evaluation and Excavation*. s.l.:unpub report.
- UMA, 2007. *Plot 106, Spinningfields, Manchester*, s.l.: unpub report.
- UMA, 2008. *Plot 4, Crown Square, Spinningfields, Manchester: An Archaeological Excavation*, s.l.: unpub report.
- UMA, 2008. *The Pump House, Left Bank, Manchester: An Archaeological Excavation*, s.l.: unpub report.
- West, I., 2008. *Light Satanic Mill - the impact of artificial lighting in early factories*, University of Leicester: unpub report.
- Willian, T. S., 1980. *Elizabethan Manchester*. s.l.:Manchester University Press.
- Wilson, J. F., 1991. *Lighting the Town: A Study of Management in the North West Gas Industry* , s.l.: Paul Chapman Publishing for British Gas PLC North Western.

10.6 Websites

British Geological Society

<https://www.bgs.ac.uk/map-viewers/geology-of-britain-viewer/>
Date accessed: 25/03/2022

North West Regional Research Framework
<https://researchframeworks.org/nwrf/research-agenda/>
Date accessed: 07/04/2022

Acknowledgements

Salford Archaeology would like to thank the Deloitte UK Ltd for commissioning the project. Further thanks also given to Ian Miller and Lesley Dunkley of GMAAS for their advice and assistance.

The desk-based research and report were compiled by Katie Fletcher, and illustrations were provided by Sarah Mottershead. The report was edited by Ashley Brogan.

Appendix 1: Figures

- Figure 1: Site location map
- Figure 2: Site boundary superimposed on modern mapping
- Figure 3: Site boundary superimposed on Swire's map of 1824
- Figure 4: Site boundary superimposed on Bancks & Co's map of 1831
- Figure 5: Site boundary superimposed on the Ordnance Survey Town Plan, published 1850
- Figure 6: Site boundary superimposed on the Ordnance Survey Town Plan of 1890
- Figure 7: Site boundary superimposed on the Ordnance Survey 1:2500 County Series Map, 1908 edition, surveyed 1908
- Figure 8: Site boundary superimposed on the Ordnance Survey 1:2500 County Series Map, 1922 edition
- Figure 9: Site boundary superimposed on the Ordnance Survey 1:1250 National Grid Map, published 1956
- Figure 10: Gazetteer sites superimposed onto modern mapping

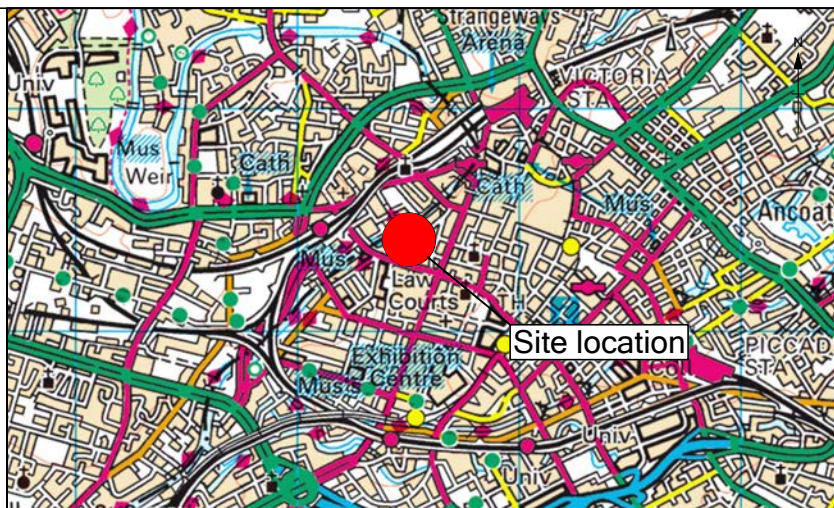


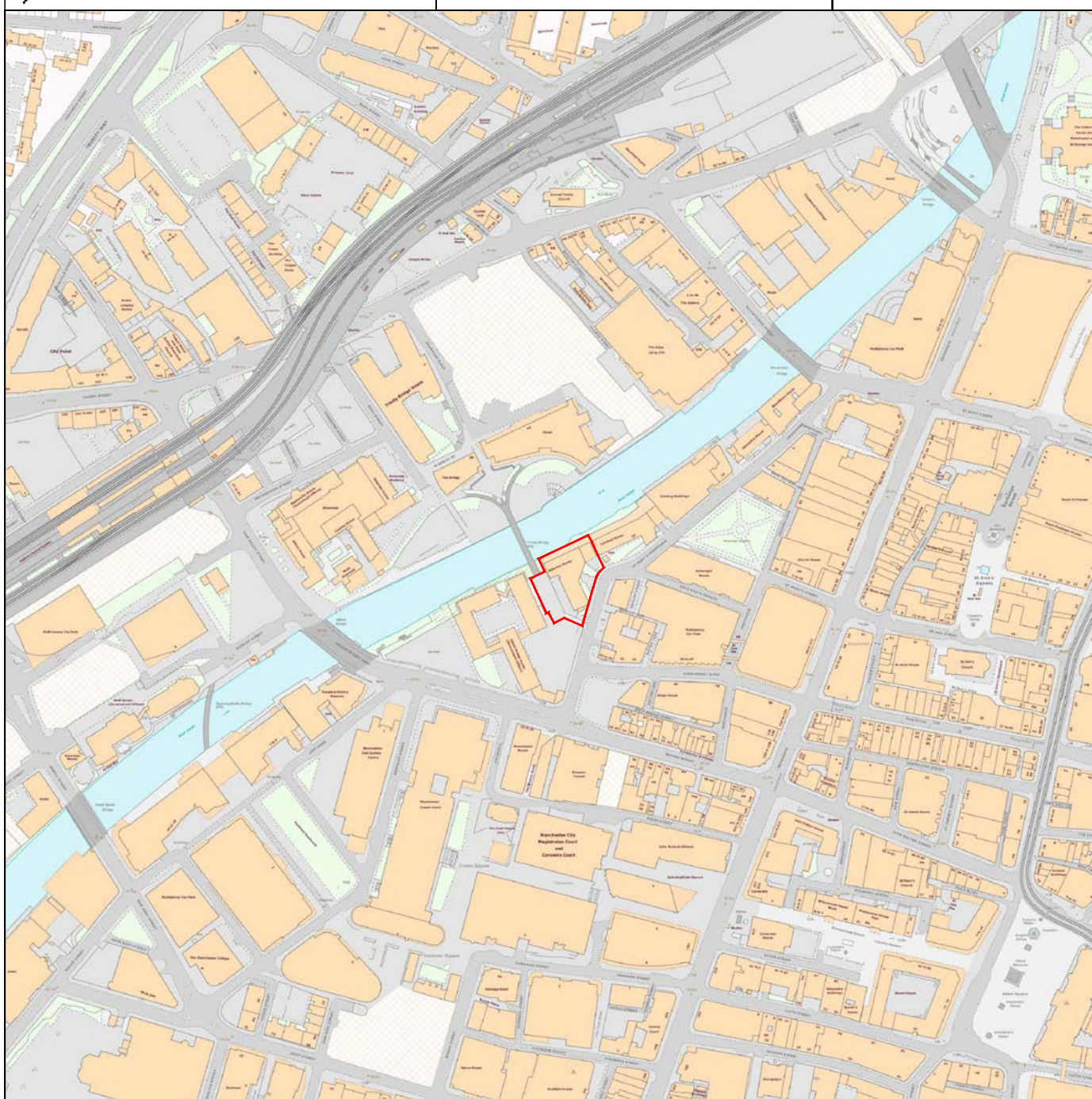
Figure 1:

Site Location

Contains Ordnance Survey data © Crown copyright and database right 2022



**SALFORD
ARCHAEOLOGY**



Contains OS data © Crown copyright and database right (2019)

383450

383500

398450

398400

398450

398400

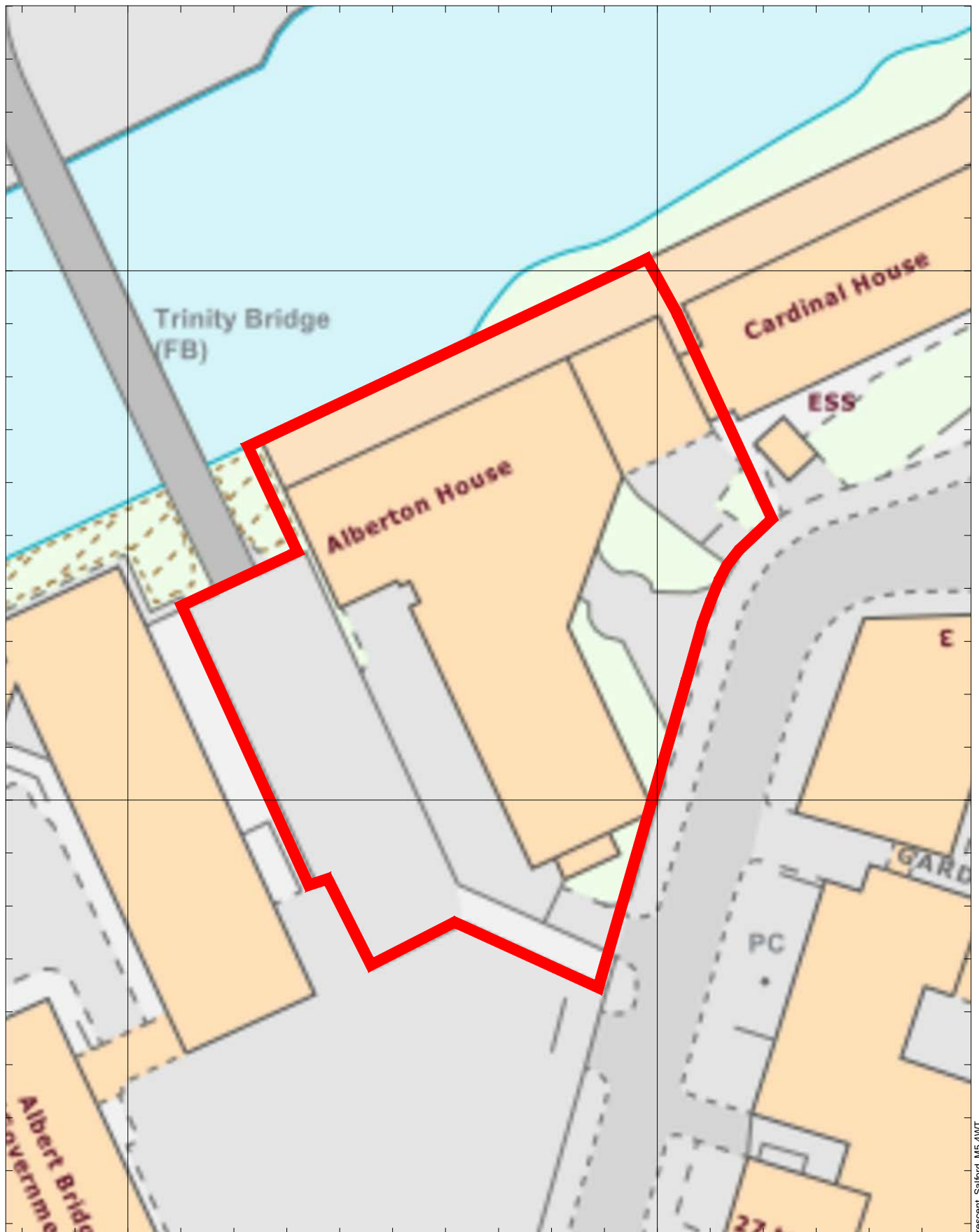


Figure 2:

Site Boundary Superimposed onto Modern Mapping

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

 Site Boundary

SALFORD
ARCHAEOLOGY

0

20 m

Scale at A4 1:500

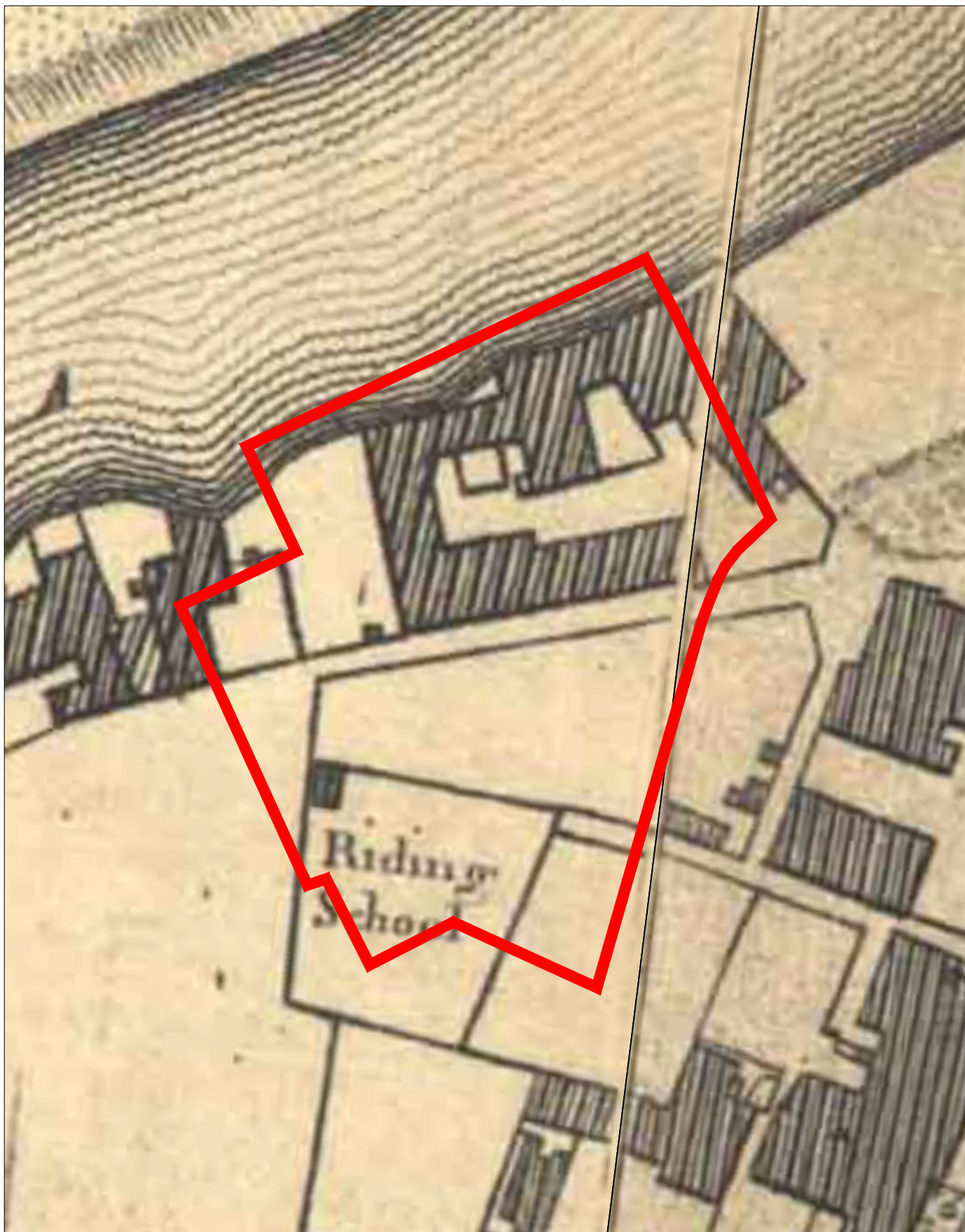


Figure 3:
Site Boundary Superimposed onto Green's Map of Manchester & Salford 1787-94



Key:
— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500



Figure 4:
Site Boundary Superimposed onto Swire's Map of Manchester & the Environs 1824



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500



Figure 5:

Site Boundary Superimposed onto Bancks & Co's Map of Manchester & Salford 1831



Key:

— Site Boundary



SALFORD
ARCHAEOLOGY

0 20 m
Scale at A4 1:500

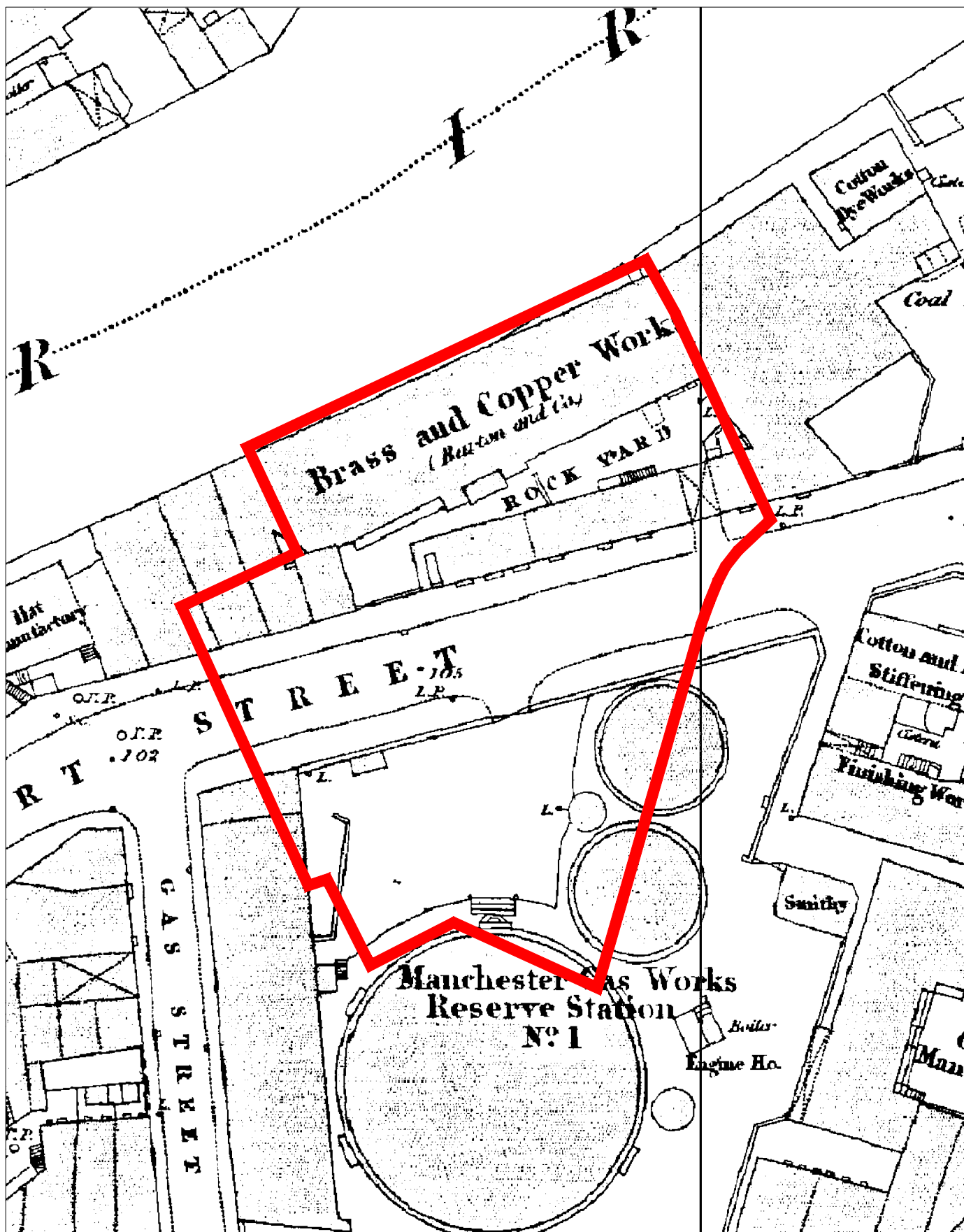


Figure 6:

Site Boundary Superimposed onto the 1:1056 Town Plan of 1851

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

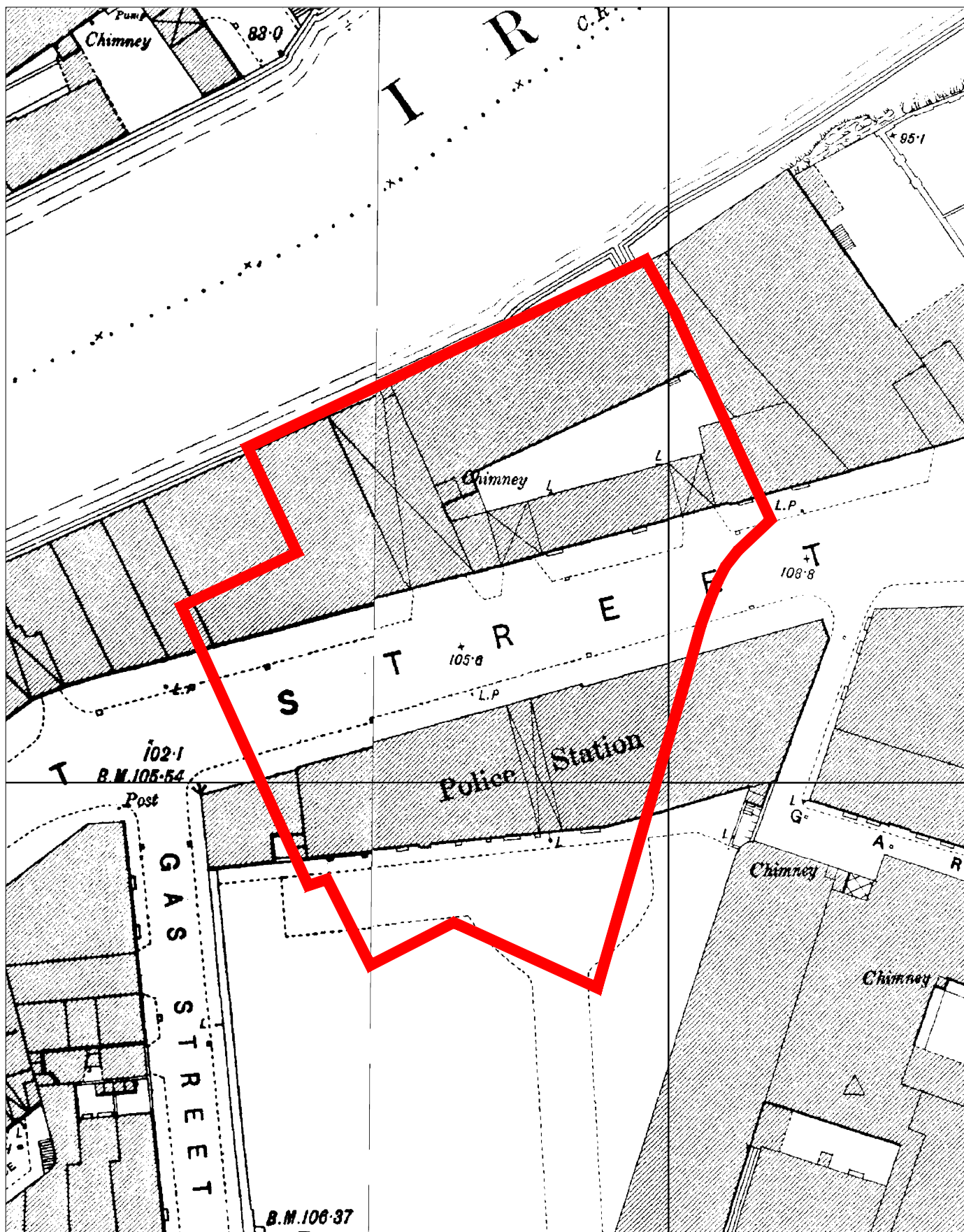


Figure 7:

Site Boundary Superimposed onto the 1:500 Town Plan of 1891

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

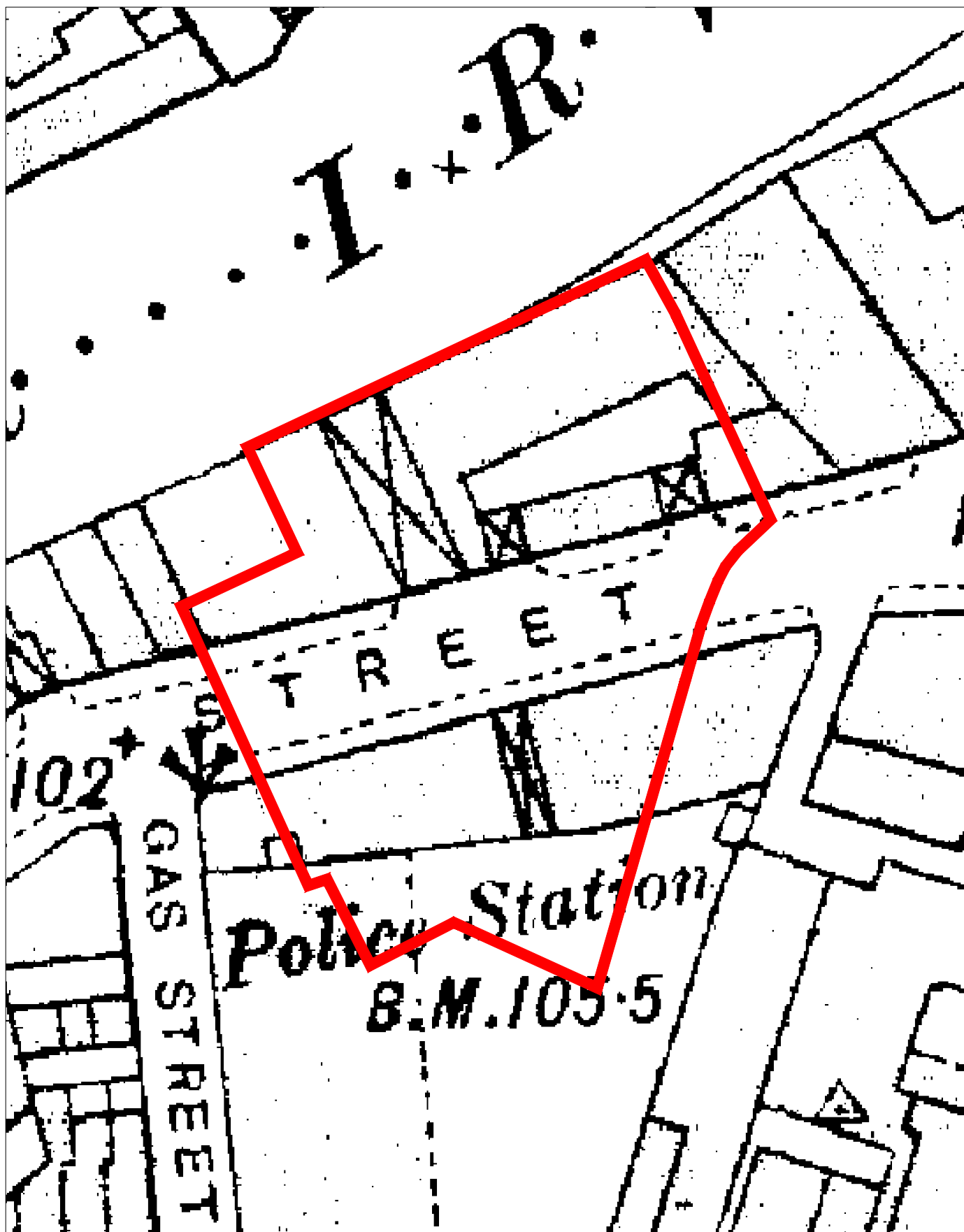


Figure 8:

Site Boundary Superimposed onto the 1:2500 County Series Map of 1908

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

 Site Boundary**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

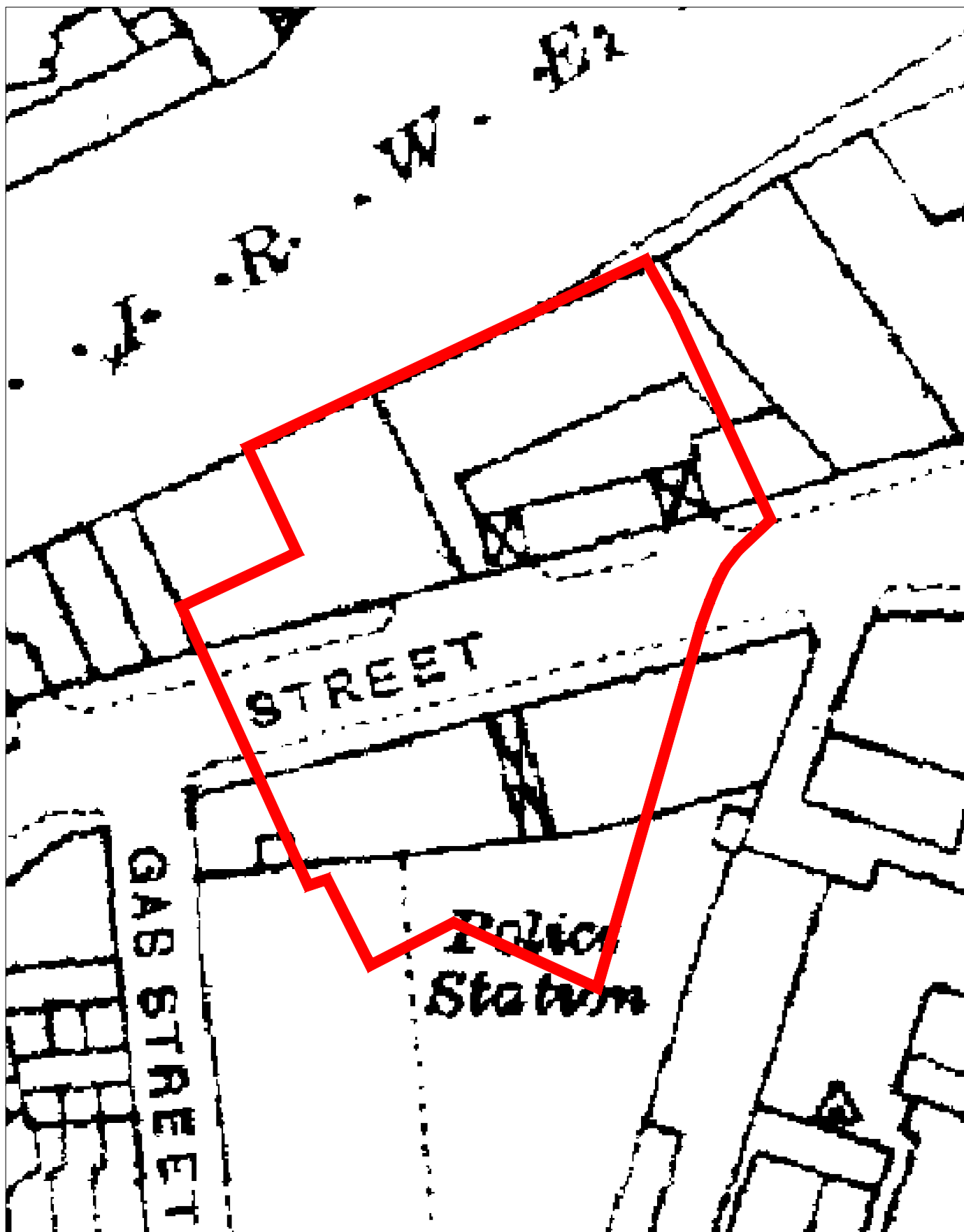


Figure 9:

Site Boundary Superimposed onto the 1:2500 County Series Map of 1922

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

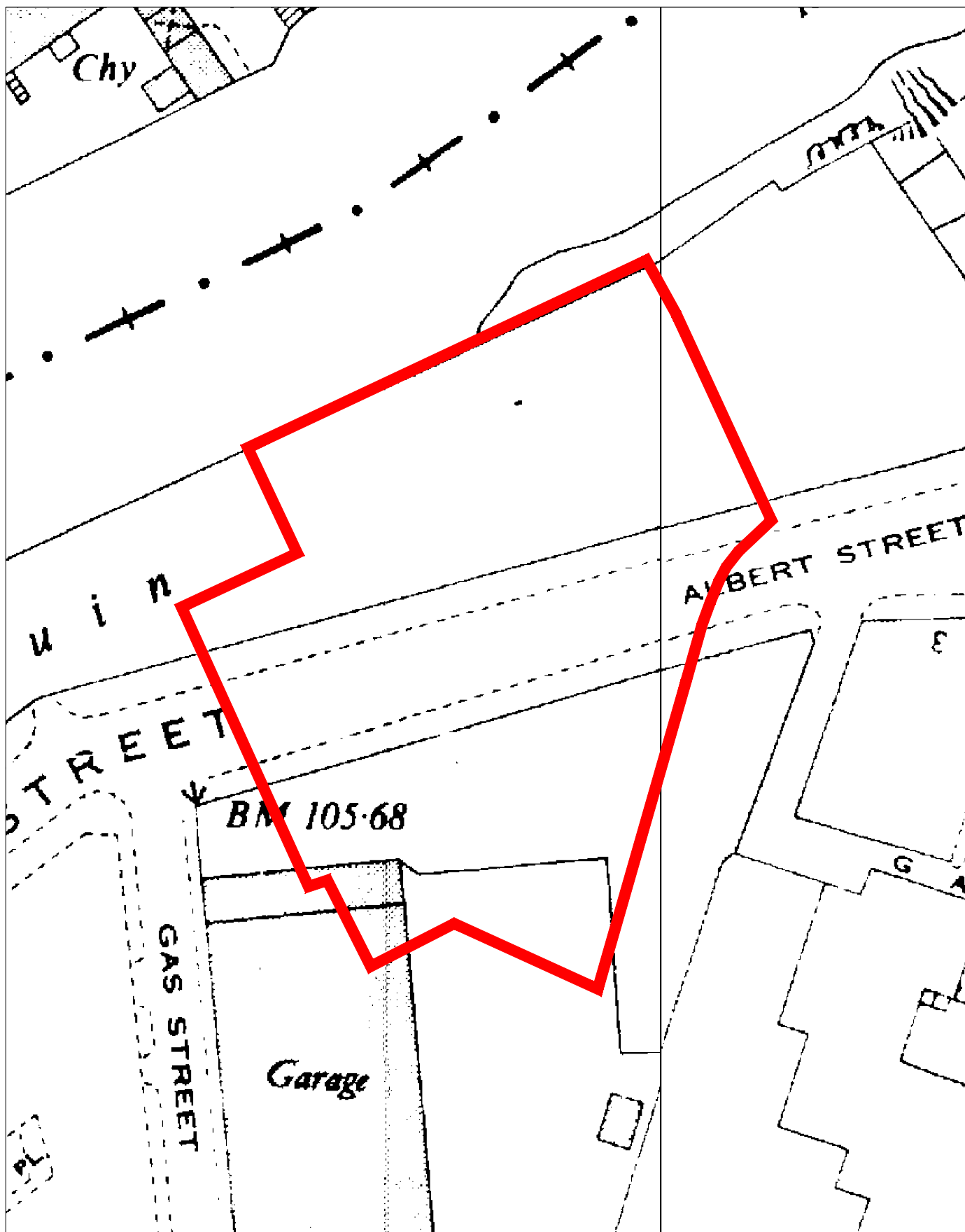


Figure 10:

Site Boundary Superimposed onto the 1:1250 National Grid Map of 1949

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

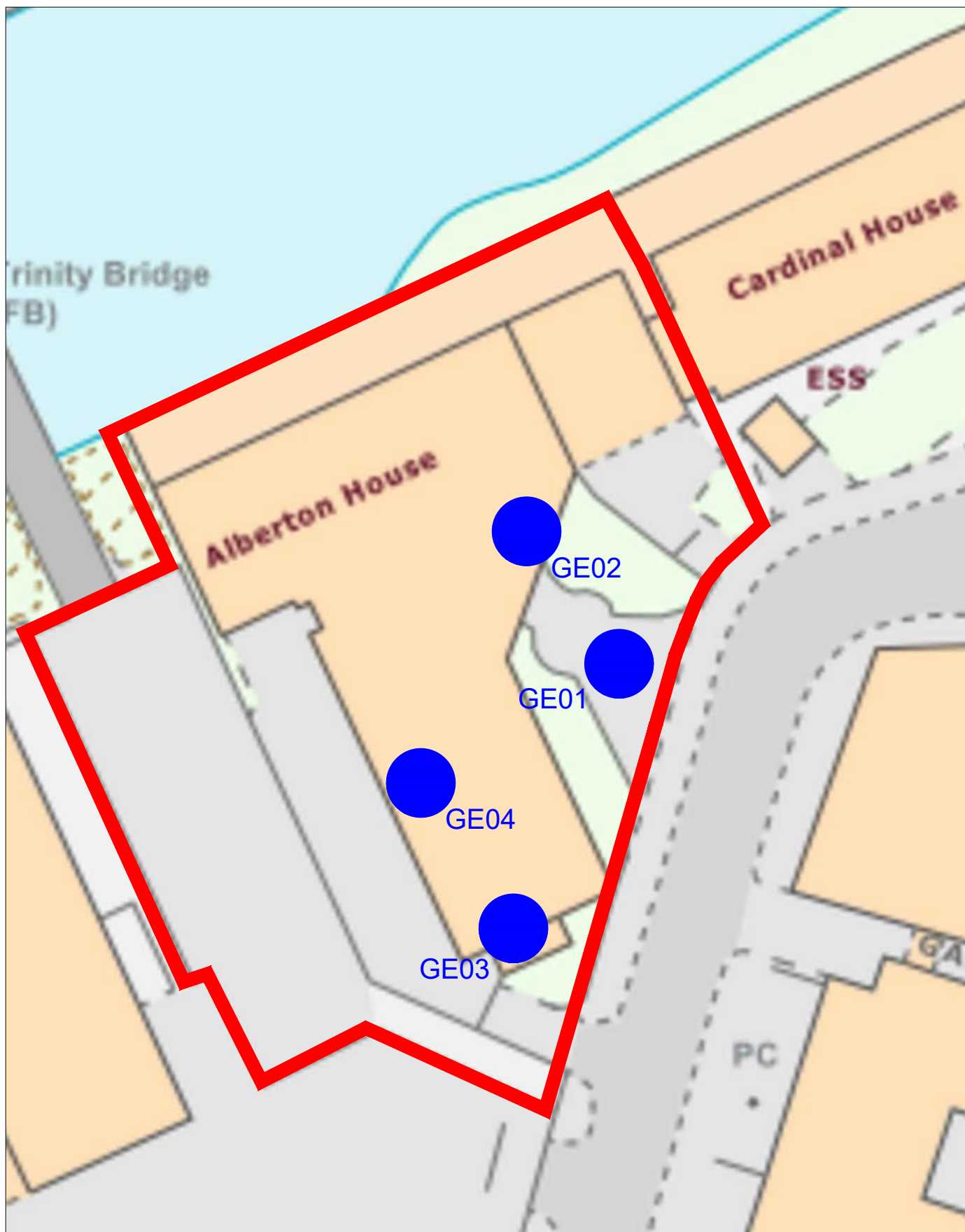


Figure 11:

Gazetteer Entries Superimposed onto Modern Mapping

Contains Ordnance Survey data © Crown copyright and database right 2022

Key:

- Site Boundary
- Gazetteer Entries

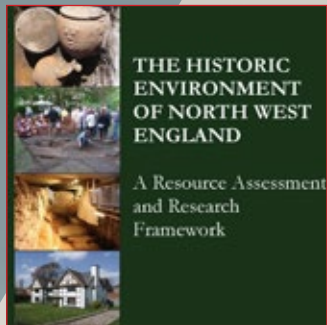


SALFORD
ARCHAEOLOGY

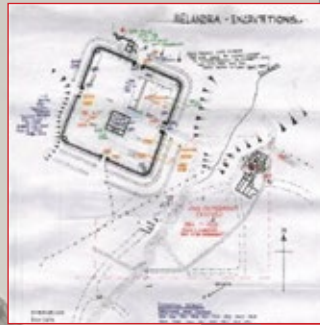
0 20 m
Scale at A4 1:400



CONSULTANCY



DESK-BASED ASSESSMENTS



WATCHING BRIEF & EVALUATION



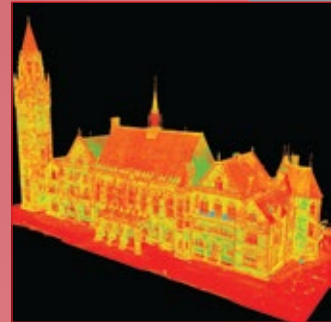
EXCAVATION



BUILDING SURVEY



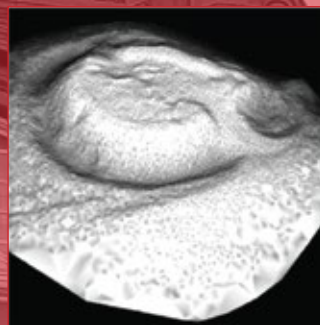
3D LASER SCANNING



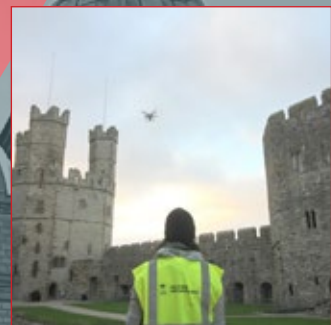
COMMUNITY INVOLVEMENT



LANDSCAPE SURVEYS



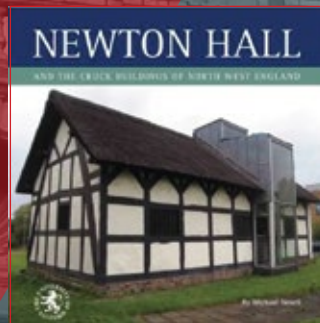
DRONE SURVEYS



WORKSHOPS & VOCATIONAL TRAINING



RESEARCH PUBLICATIONS



SEMINARS, DAYSCHOOLS CPD EVENTS



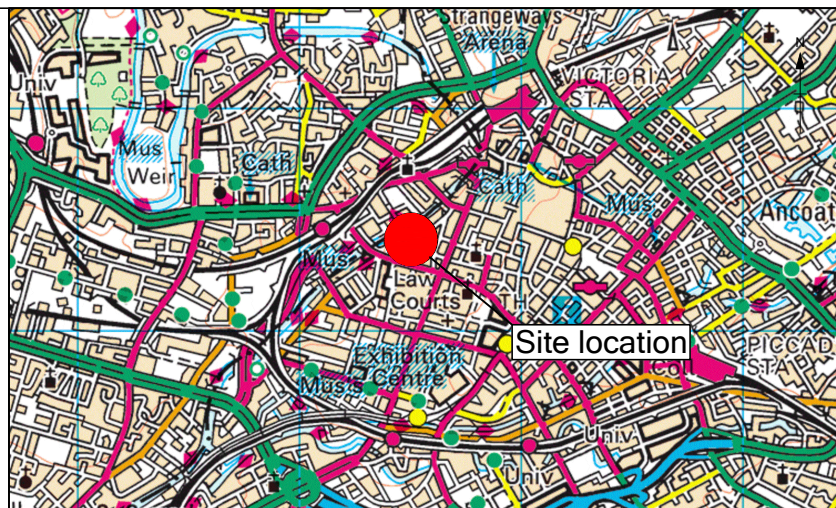


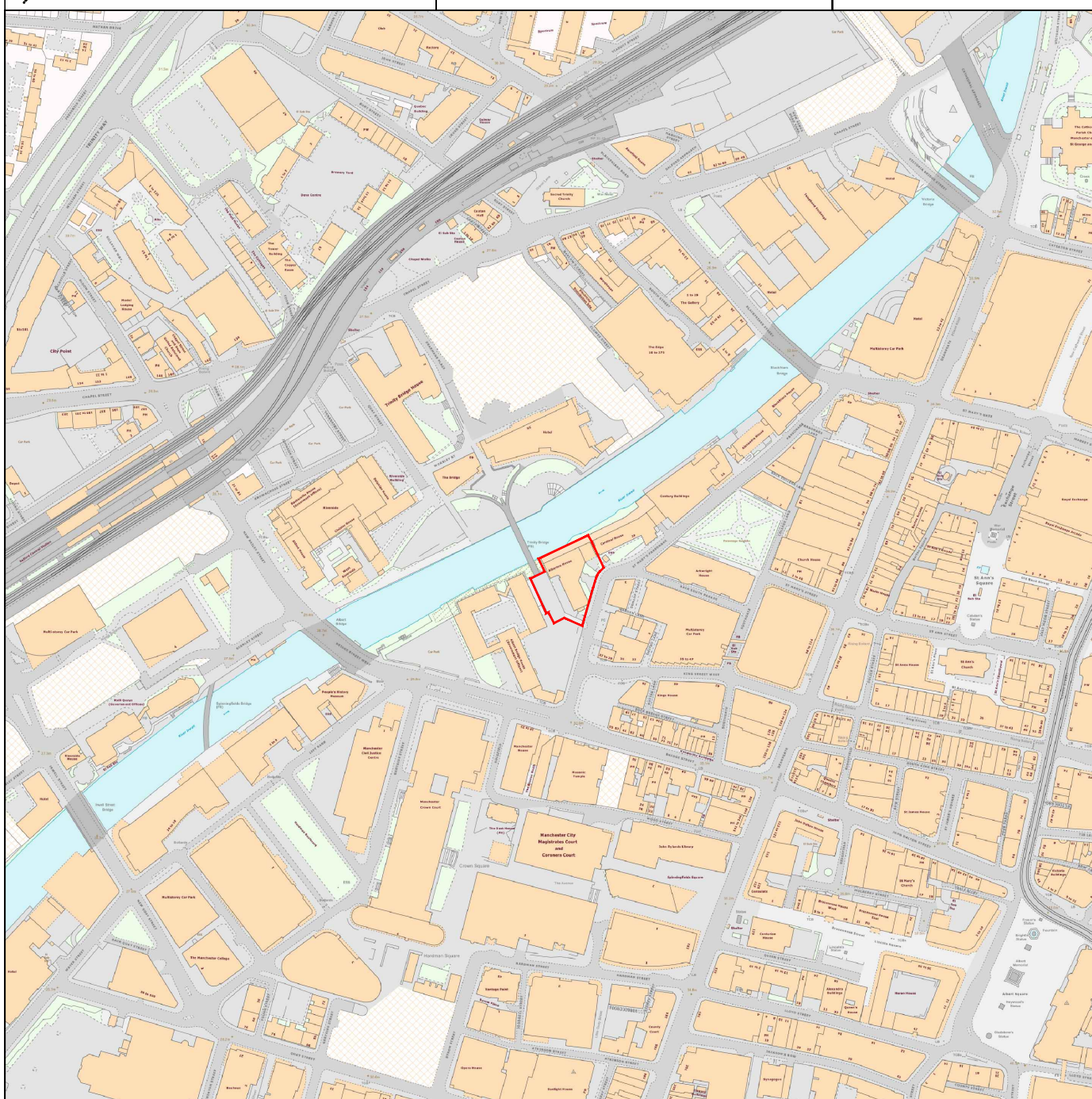
Figure 1:

Site Location

Contains Ordnance Survey data © Crown copyright and database right 2022



**SALFORD
ARCHAEOLOGY**



Contains OS data © Crown copyright and database right (2019)

383450

383500

398450

398400

398450

398400



Figure 2:

Site Boundary Superimposed onto Modern Mapping

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

 Site Boundary

SALFORD
ARCHAEOLOGY

0 20 m



Scale at A4 1:500

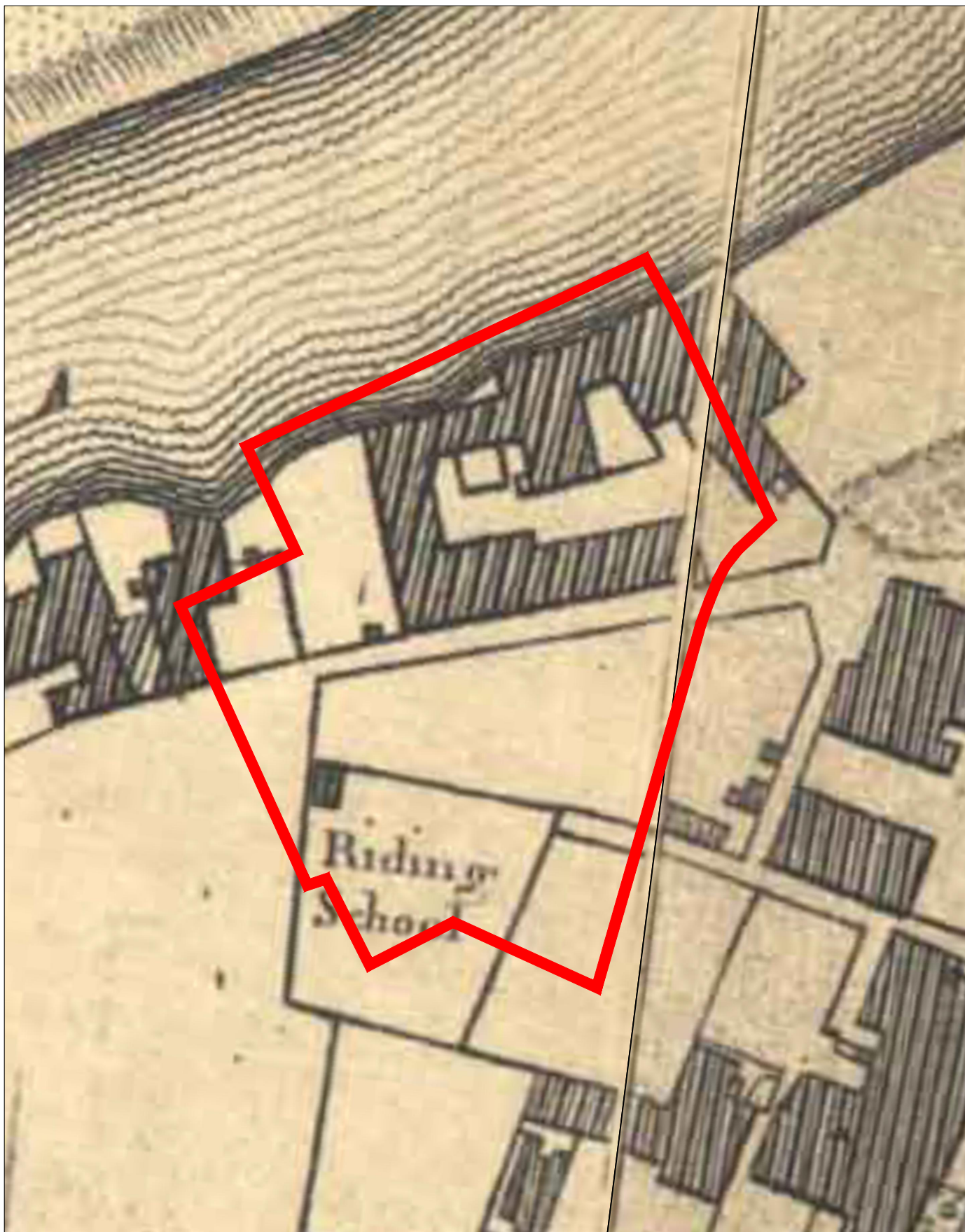


Figure 3:
Site Boundary Superimposed onto Green's Map of Manchester & Salford 1787-94



Key:
— Site Boundary



SALFORD
ARCHAEOLOGY

0 20 m
Scale at A4 1:500



Figure 4:
Site Boundary Superimposed onto Swire's Map of Manchester & the Environs 1824



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500



Figure 5:

Site Boundary Superimposed onto Bancks & Co's Map of Manchester & Salford 1831



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

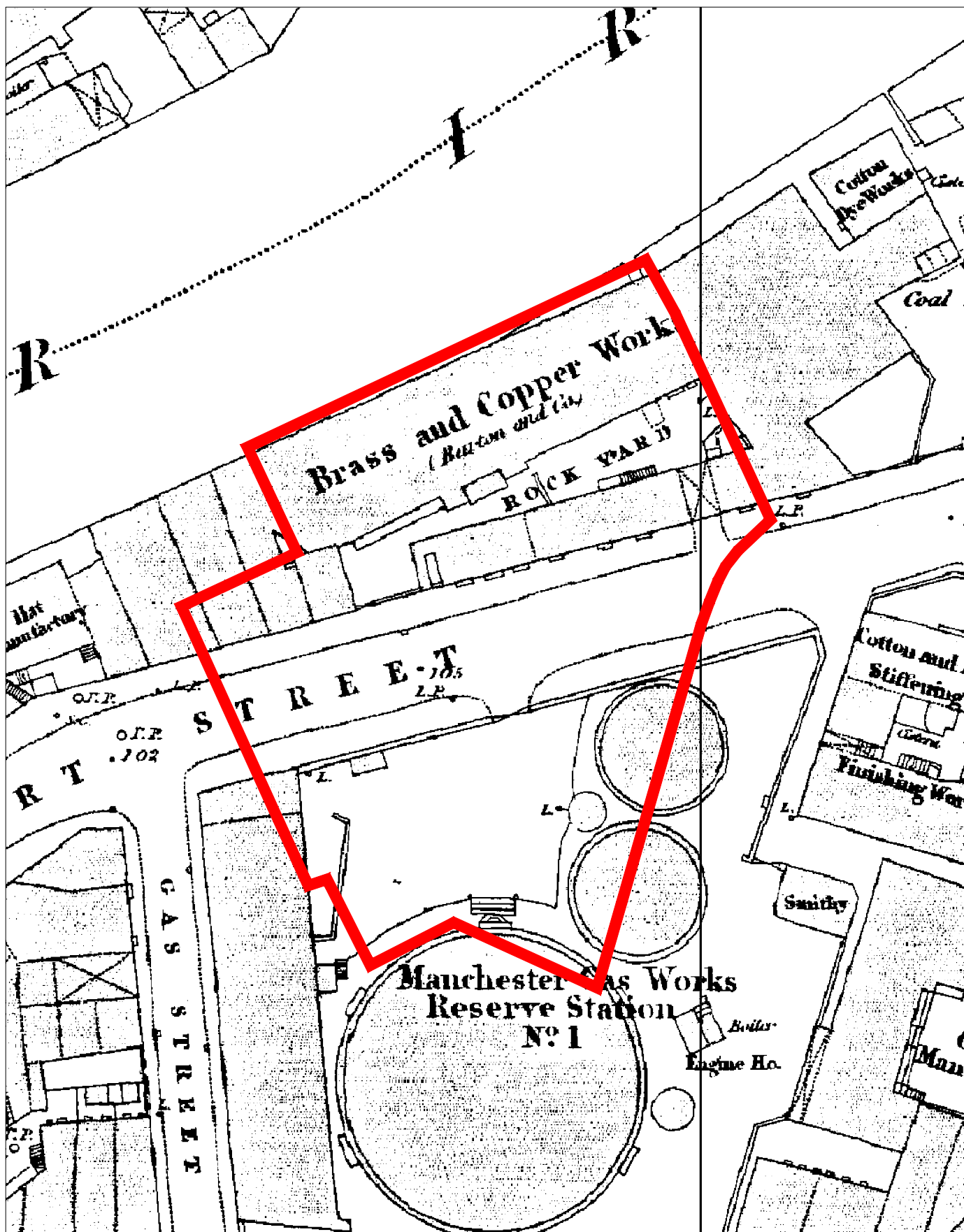


Figure 6:

Site Boundary Superimposed onto the 1:1056 Town Plan of 1851

Contains Ordnance Survey data © Crown copyright and database right 2022



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

Key:

— Site Boundary

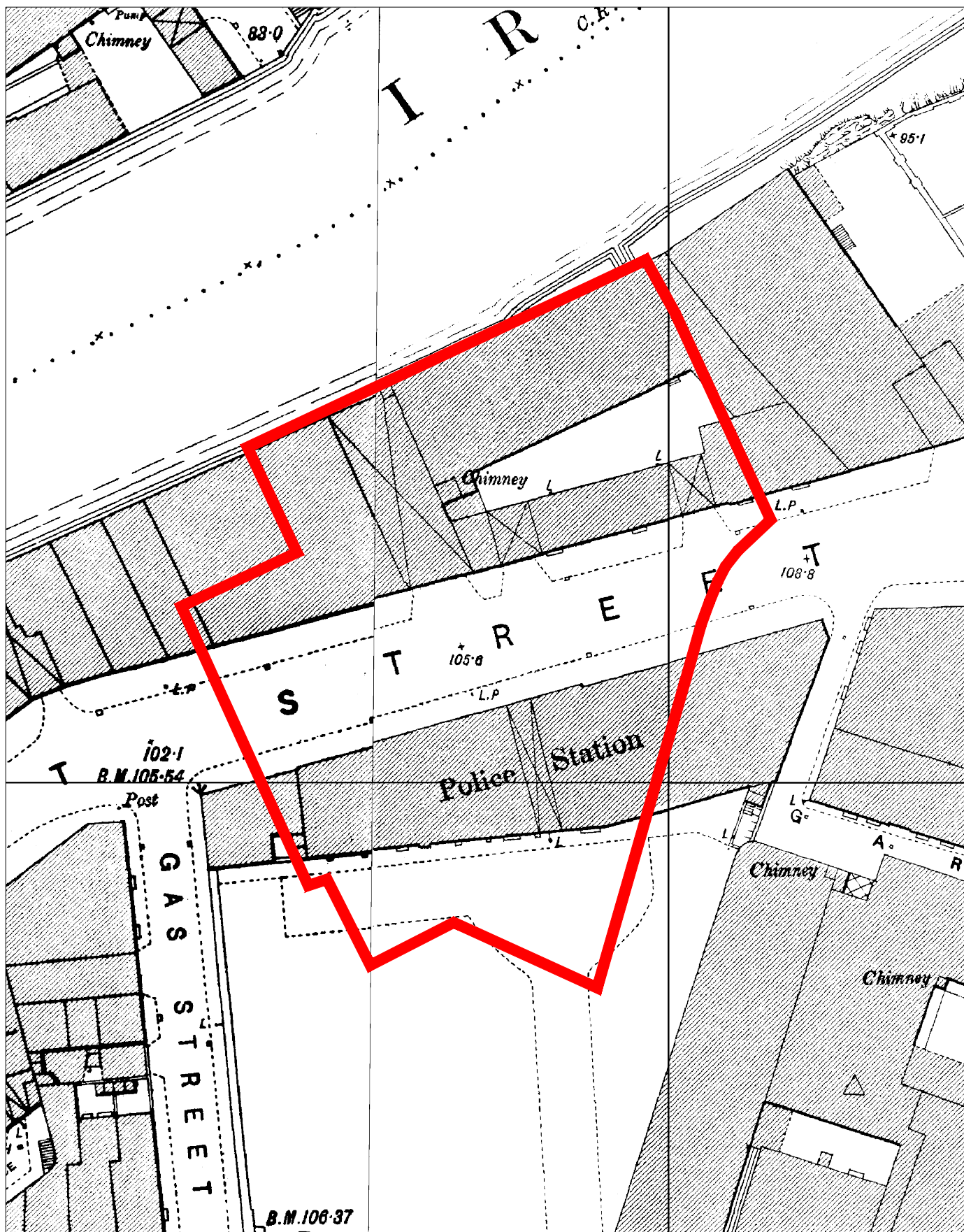


Figure 7:

Site Boundary Superimposed onto the 1:500 Town Plan of 1891

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

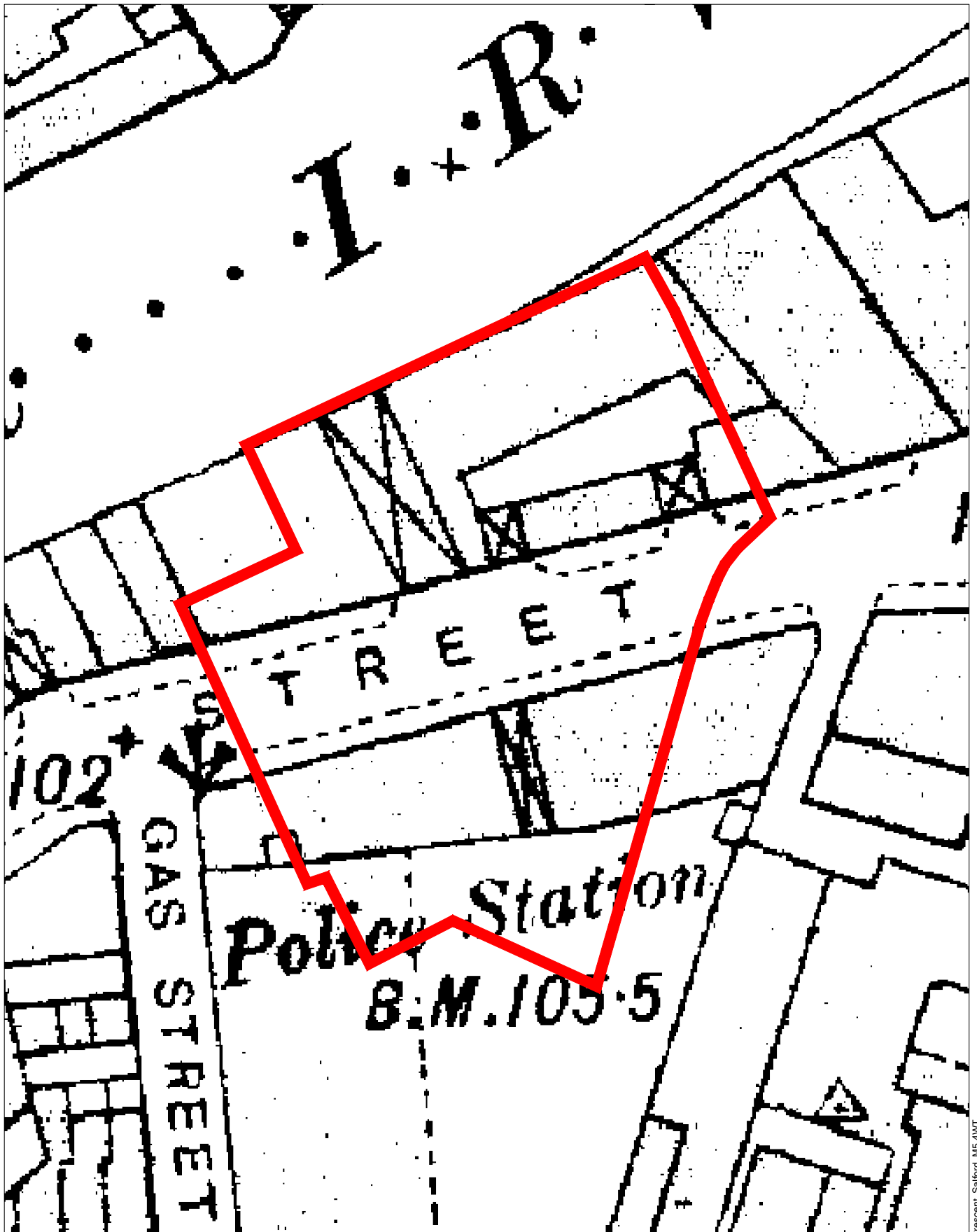


Figure 8:

Site Boundary Superimposed onto the 1:2500 County Series Map of 1908

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

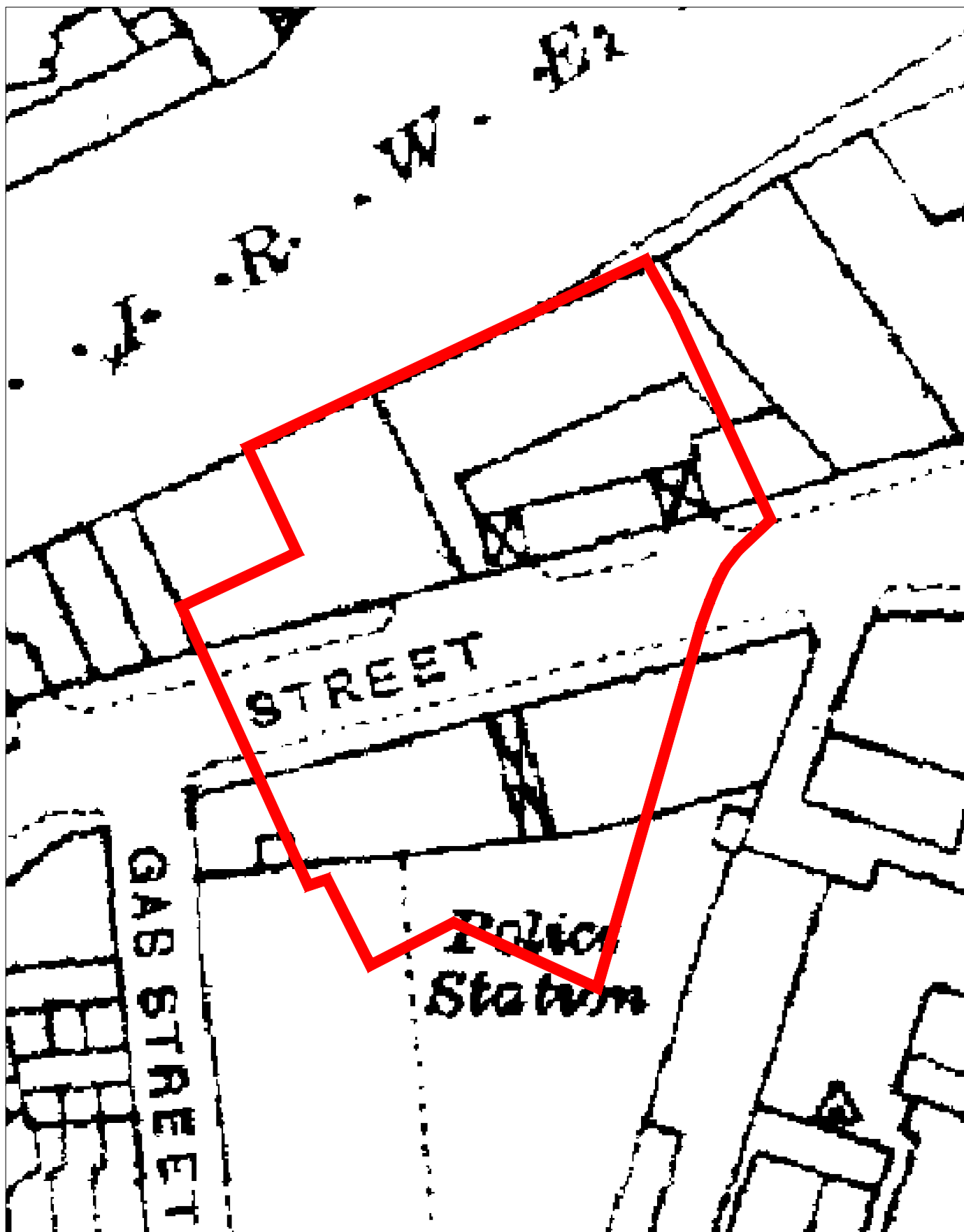


Figure 9:

Site Boundary Superimposed onto the 1:2500 County Series Map of 1922

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

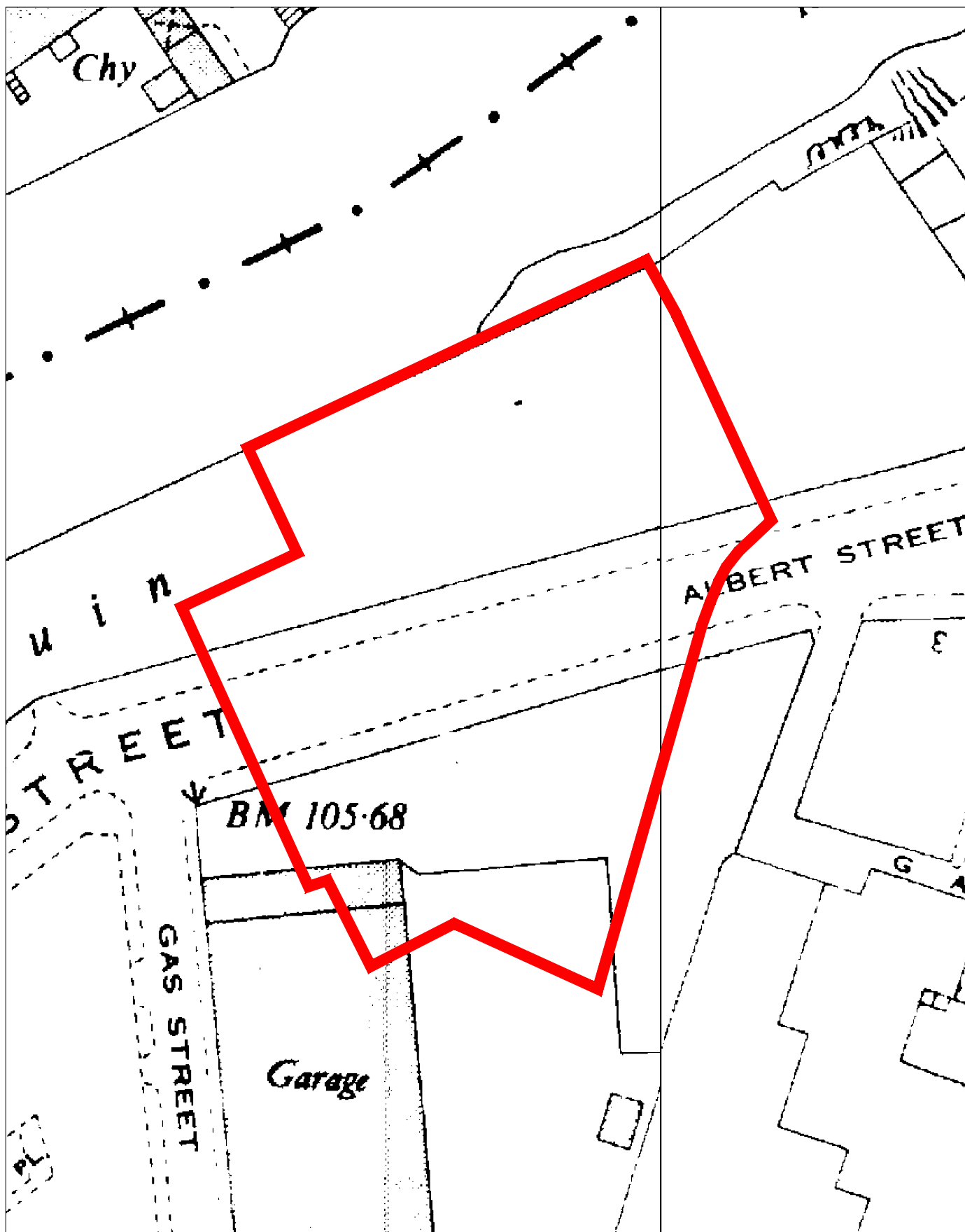


Figure 10:

Site Boundary Superimposed onto the 1:1250 National Grid Map of 1949

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

— Site Boundary



**SALFORD
ARCHAEOLOGY**

0 20 m
Scale at A4 1:500

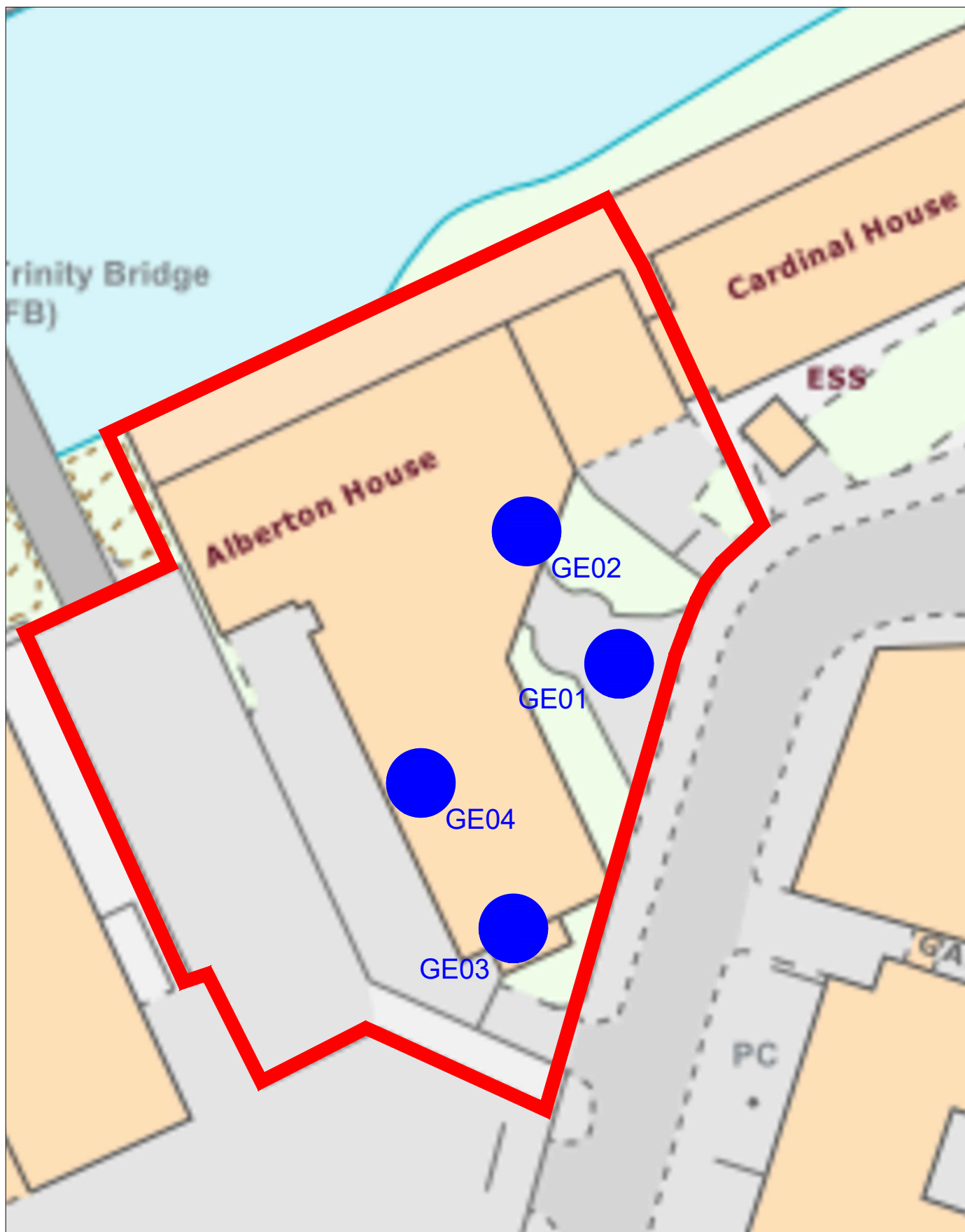


Figure 11:

Gazetteer Entries Superimposed onto Modern Mapping

Contains Ordnance Survey data © Crown copyright and database right 2022



Key:

- Site Boundary
- Gazetteer Entries

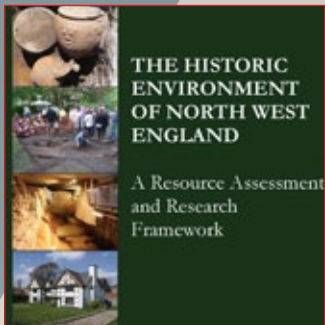


SALFORD
ARCHAEOLOGY

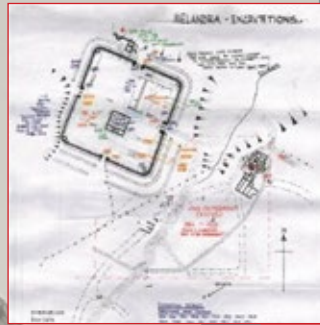
0 20 m
Scale at A4 1:400



CONSULTANCY



DESK-BASED ASSESSMENTS



WATCHING BRIEF & EVALUATION



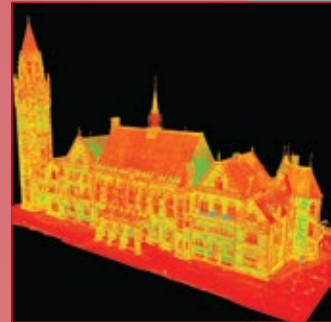
EXCAVATION



BUILDING SURVEY



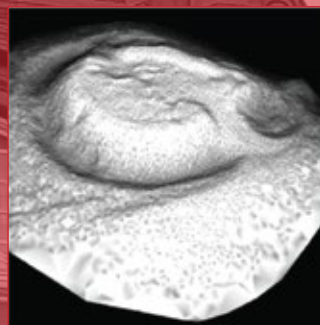
3D LASER SCANNING



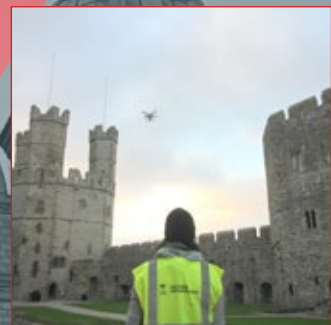
COMMUNITY INVOLVEMENT



LANDSCAPE SURVEYS



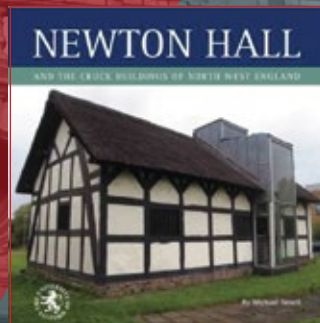
DRONE SURVEYS



WORKSHOPS & VOCATIONAL TRAINING



RESEARCH PUBLICATIONS



SEMINARS, DAYSCHOOLS CPD EVENTS

