



Archaeological Desk-Based Assessment in Advance of the Proposed Development of Land at Upnor Road, Upper Upnor, Medway.

June 2020

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National Grid Reference TQ 75323 70447



Report for Esquire Developments Ltd

Date of Report: 2nd June 2020

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Archaeological Desk-Based Assessment in Advance of the Proposed Development of Land at Upnor Road, Upper Upnor, Medway.

Summary

SWAT Archaeology has been commissioned by Esquire Developments Ltd to prepare an Archaeological Desk-Based Assessment of the proposed development area (PDA) of Land at Upnor Road, Upper Upnor, Medway.

This Desk Based Assessment is intended to explore and disseminate the known and potential heritage resource within the site and the surrounding area, and to assess the likely impacts of the development proposals on this resource. Based on this data the potential for archaeological sites either on or in the near vicinity of the proposed development can be summarized as:

- Prehistoric: **high**
- Iron Age: **low**
- Roman: **moderate**
- Anglo-Saxon: **low**
- Medieval: **low**
- Post-Medieval: **moderate**
- Modern: **low**

The PDA is situated on the western outskirts of Upper Upnor on the Hoo Peninsular in north Kent. The PDA covers an area approximately just over 11 acres and is currently two arable fields. The PDA is accessed in the north western corner from the Upnor Road, which forms its northern boundary. The land to the west is pasture with drainage channels. The northern part of the eastern boundary borders the rear gardens of houses on the western side of Castle Street, with the southern part of the eastern boundary bordering Tower Hill House. The southern boundary borders the Military training area of Tower Hill and is adjacent to sewage treatment works. The south west boundary follows the line of a drainage channel.

There is archaeological significance within the assessment area of high potential for the Prehistoric period, particularly the Bronze Age with moderate potential for the Palaeolithic and Post Medieval periods. All other periods are considered to be of low potential. Bronze Age finds have been found in the vicinity to the north west and just beyond is considered to be a Roman settlement area. The wider area is considered high although the PDA itself is of

different geology of alluvium to that of previous Palaeolithic finds in the area lowering its potential to moderate. Upnor and Tower Hill are associated with the military and continues to this day, initially with the castle for defence and later as an ordnance depot. Tower Hill having been an early 19th century siege training for the Royal Engineers and is still used today by the MOD. Bronze Age and Roman activity would be considered to be of local to regional significance. Should Palaeolithic activity be found this would be considered of national significance and could potential further our understanding of exploitation of the Medway and the Hoo Peninsular in this period. Any Post Medieval activity would be of local significance in assisting our understanding of the development of this area of the village and possibly military activity.

The addition of two rising water mains and manholes across the site would have had a total archaeological impact. It is not thought that the PDA has been built on or disturbed military but has been in agricultural and allotment use, which is considered to have had a low historical impact upon any potential archaeological remains. Any potential remains within the PDA in the area of the proposed development, should they survive in-situ will vulnerable to damage during the proposed development, which due to foundations required for the houses and associated access roads and services, along with the potential requirement for terracing is likely to have a high/total impact.

The need for, scale, scope and nature of any further assessment and/or archaeological works should be agreed through consultation with the statutory authorities but it is recommended for an archaeological evaluation to take place. In addition, consideration will need to be given with regards to the statutory protection of the hedgerows surrounding the site.

1 INTRODUCTION

1.1 Project Background

1.1.1 Swale & Thames Survey Company (SWAT) was commissioned by Esquire Developments Ltd (the 'Clients'), to carry out an archaeological desk-based assessment of the proposed development area (PDA) of Land at Upnor Road, Upper Upnor, Medway, Kent centred on National Grid Reference (NGR) TQ 75323 70447 (Fig 1).

1.2 The Site

1.2.1 The PDA is situated on the western outskirts of Upper Upnor on the Hoo Peninsular in north Kent. The PDA covers an area approximately just over 11 acres and is currently two arable fields. The PDA is accessed in the north western corner from the Upnor Road, which forms its northern boundary. The land to the west is pasture with drainage channels. The northern part of the eastern boundary borders the rear gardens of houses on the western side of Castle Street, with the southern part of the eastern boundary bordering Tower Hill House. The southern boundary borders the Military training area of Tower Hill and is adjacent to sewage treatment works. The south west boundary follows the line of a drainage channel. The land slopes upwards from west to east from a low 3m aOD to circa 9-12m aOD on the eastern side towards a high point circa 300m outside of the PDA to the south east of circa 30m aOD (Fig. 1).

Geology

1.2.2 The British Geological Society (BGS 1995) shows that the local geology at the PDA consists of a band of bedrock comprising of Lewes nodular chalk formation, Seaford chalk formation and Newhaven chalk formation (undifferentiated) - Chalk. The line of castle Street is the border of Thanet Formation – Sand, Silt and Clay. The PDA sits adjacent to an area of superficial deposits to the west of Alluvium – Clay, Silt, Sand and Peat and there are Head deposits to the east. The alluvium is unconsolidated detrital material deposited by a river, stream or other body of running water as a sorted or semi-sorted sediment in the bed of the stream or on its floodplain or delta. Given the broad resolution of the BGS mapping (1:50;000) the boundaries are not clearly defined and may not accurately reflect the actual geology at the PDA itself.

Geotechnical Information

- 1.2.3 A geotechnical survey was undertaken in November 2019 by Leap Environmental, at the PDA. The report confirmed topsoil of a depth between 0.30-0.55m overlying Head and Thanet Formation gravelly sandy clays between 0.40-3.0m, over highly weathered off white structureless chalk, possibly becoming more structured with depth from circa 1.95m and more.

1.3 The Proposed Development

- 1.3.1 The proposed development is for 75 residential houses with associated access roads, landscaping and private gardens with a SUDS area to the south west of the PDA (fig. 2).

1.4 Project Constraints

- 1.4.1 There were constraints associated with this project given that the archives at the Royal Engineers were closed. There are likely to be plans available concerning the land in and around the PDA.

1.5 Scope of Document

- 1.5.1 This assessment was requested by the Client in order to determine, as far as is possible from existing information, the nature, extent and significance of the Historic Environment and to assess the potential impact of development on Heritage Assets. The assessment forms part of the initial stages of the archaeological investigation and is intended to inform and assist with decisions regarding archaeological mitigation for the proposed development and associated planning applications.

2 PLANNING BACKGROUND

2.1 Introduction

2.1.1 National legislation and guidance relating to the protection of, and proposed development on or near, important archaeological sites or historical buildings within planning regulations is defined under the provisions of the Town and Country Planning Act 1990. In addition, local authorities are responsible for the protection of the historic environment within the planning system and ensure that a Heritage Asset is protected to enable it to be passed on to future generations.

2.1.2 Statutory protection is also provided to certain classes of designated heritage assets under the following legislation:

- Planning (Listed Buildings and Conservation Areas) Act 1990;
- Ancient Monuments and Archaeological Areas Act 1979; and
- Hedgerow Regulations (statutory Instrument No. 1160) 1997
- Treasures Act 1996
- Burial Act 1857.

2.2 National Planning Policy Framework (NPPF)

2.2.1 The National Planning Policy Framework (NPPF) sets out the Government's core principles in relation to planning and the historic environment and is covered in section 16, paragraphs 185-202. These principles are designed to underpin the planning and decision-making process to ensure that Local Planning Authorities (LPA), developers and owners of heritage assets adopt a consistent approach to the conservation of the Historic Environment.

2.2.2 The Historic Environment, as defined in the National Planning Policy Framework (NPPF 2019): Annex 2, comprises:

'all aspects of the environment resulting from the interaction between people and places through time, including all surviving physical remains of past human

activity, whether visible, buried or submerged, and landscaped and planted or managed flora.'

2.2.3 NPPF Annex 2 defines a Heritage Asset as:

'a building monument, site, place, area or landscape identified as having a degree of significance meriting consideration in planning decisions, because of its heritage interest. Heritage assets include designated heritage assets and assets identified by the local planning authority (including local listing).'

2.2.4 Paragraph 189 of the NPPF states that:

'In determining applications, local planning authorities should require an applicant to describe the significance of any heritage assets affected, including any contribution made by their setting.'

2.2.5 Paragraph 190 of the NPPF states that:

'The LPA should take this assessment into account when considering the impact of a proposal on a heritage asset, to avoid or minimise conflict between the heritage asset's conservation and any aspect of the proposal.'

2.2.6 The NPPF further provides definitions of terms which relate to the historic environment in order to clarify the policy guidance given. For the purposes of this report, the following are important to note:

- **Significance.** The value of a heritage asset to this and future generations because of its heritage interest. This interest may be archaeological, architectural, artistic or historic. Significance derives not only from a heritage asset's physical presence, but also from its setting.
- **Setting.** The surroundings in which a heritage asset is experienced. Its extent is not fixed and may change as the asset and its surroundings evolve. Elements of a setting may make a positive or negative contribution to the significance of an asset, may affect the ability to appreciate that significance or may be neutral.

- 2.2.7 The NPPF is supported by the Planning Policy Guidance, which includes Conservation Principles, Policy and Guidance (2008) as well as Good Practice Advice in Planning Notes 1 to 3, all issued by Historic England.

Hedgerow Regulations (statutory Instrument No. 1160) 1997

- 2.2.8 The Regulations apply to most countryside hedgerows. In particular, they affect hedgerows which are 20 meters or more in length; which meet another hedgerow at each end; are on or adjoin land used for: agriculture, forestry, the breeding or keeping of horses, ponies or donkeys, common land, village greens, Sites of Special Scientific Interest (SSSIs) or Local Nature Reserves. The act is to protect important countryside hedgerows from removal, either in part or whole. Removal not only includes grubbing out, but anything which could result in the destruction of the hedge.

2.3 Local Policies

- 2.3.1 Medway Council has a Local Plan adopted in 2003, retained in 2007. The plan has a policy relevant to SAM.

POLICY BNE20: SCHEDULED ANCIENT MONUMENTS

- 2.3.2 Development affecting scheduled ancient monuments or other nationally important sites will not be permitted if it would: (i) damaged or destroy such sites; or (ii) be detrimental to their setting.

POLICY BNE21 ARCHAEOLOGICAL SITES

- 2.3.3 Development affecting potentially important archaeological sites will not be permitted, unless:

(i) the developer, after consultation with the archaeological officer, has arranged for an archaeological field evaluation to be carried out by an approved archaeological body before any decision on the planning application is made; and

(ii) it would not lead to the damage or destruction of important archaeological remains. There will be a preference for the preservation of important archaeological remains in situ.

(iii) where development would be damaging to archaeological remains, sufficient time and resources are made available for an appropriate archaeological investigation undertaken by an approved archaeological body. Such investigations should be in advance of development and in accordance with a specification and programme of work approved by the council. Resources should also be made available for the publication of the results of the investigation.

2.3.4 A new Local Plan to cover the period until 2037 is currently in process.

2.3.5 The Council also has the following approach to Heritage:

- Restricting development that could have an unacceptable impact on a designated heritage asset and its setting;
- Ensuring that new development in Conservation Areas enhances their significance and special qualities, whilst respecting the historical and architectural character;
- Ensuring that all new development contributes to local distinctiveness and identity;
- Encouraging development that makes sensitive use of historic assets, particularly where they are under-used or redundant;
- Promoting the preservation of historic buildings considered to be 'at risk'.
- Resisting demolition or destruction of heritage assets without substantial justification that clearly demonstrates that public benefit outweighs the harm or loss resulting from the demolition or destruction.

Local Planning Guidance

2.3.6 The Kent Design Guide, 2008. Prepared by the Kent Design Group, it provides the criteria necessary for assessing planning applications. Helps building designers, engineers, planners and developers achieve high standards of design and construction. It is adopted by the Council as a Supplementary Planning Document.

3 AIMS AND OBJECTIVES

3.1 Introduction

- 3.1.1 This Desk-Based Assessment was commissioned by Esquire Developments Ltd to support a planning application. This assessment has been prepared in accordance with guidelines set out by the Chartered Institute for Archaeologists (see below) and in the National Planning Policy Framework and the Good Practice Advice notes 1, 2 and 3, which now supersede the PPS 5 Practice Guide, which has been withdrawn by the Government.
- 3.1.2 This Desk-Based Assessment therefore forms the initial stage of the archaeological investigation and is intended to inform and assist in decisions regarding archaeological mitigation for the proposed development and associated planning applications.

3.2 Desk-Based Assessment – Chartered Institute for Archaeologists (2017)

- 3.2.1 This desktop study has been produced in line with archaeological standards, as defined by the Chartered Institute for Archaeologists (2014, revised 2017). A desktop, or desk-based assessment, is defined as being:

‘Desk-based assessment will determine, as far as is reasonably possible from existing records, the nature, extent and significance of the historic environment within a specified area. Desk-based assessment will be undertaken using appropriate methods and practices which satisfy the stated aims of the project, and which comply with the Code of conduct and other relevant regulations of ClfA. In a development context desk-based assessment will establish the impact of the proposed development on the significance of the historic environment (or will identify the need for further evaluation to do so) and will enable reasoned proposals and decisions to be made whether to mitigate, offset or accept without further intervention that impact.’

(2017:4)

- 3.2.2 The purpose of the desk-based assessment is, therefore, an assessment that provides a contextual archaeological record, in order to provide:

- *an assessment of the potential for heritage assets to survive within the area of study*
- *an assessment of the significance of the known or predicted heritage assets considering, in England, their archaeological, historic, architectural and artistic interests*
- *strategies for further evaluation whether or not intrusive, where the nature, extent or significance of the resource is not sufficiently well defined*
- *an assessment of the impact of proposed development or other land use changes on the significance of the heritage assets and their settings*
- *strategies to conserve the significance of heritage assets, and their settings*
- *design strategies to ensure new development makes a positive contribution to the character and local distinctiveness of the historic environment and local place-shaping*
- *proposals for further archaeological investigation within a programme of research, whether undertaken in response to a threat or not.*

CIFA (2017:4)

4 METHODOLOGY

4.1 Introduction

- 4.1.1 The methodology employed during this assessment has been based upon relevant professional guidance including the Chartered Institute for Archaeologists' *Standard and guidance for historic environment desk-based assessment* (CIfA, 2017).

4.2 Sources

- 4.2.1 A number of publicly accessible sources were consulted prior to the preparation of this document.

Archaeological databases

- 4.2.2 Although it is recognised that national databases are an appropriate resource for this particular type of assessment, the local Historic Environmental Record held at Kent County Council (KCCHER) contains sufficient data to provide an accurate insight into catalogued sites and finds within both the proposed development area and the surrounding landscape.
- 4.2.3 The National Heritage List for England (NHLE), which is the only official and up to date database of all nationally designated heritage assets and is the preferred archive for a comprehensive HER search.
- 4.2.4 The Archaeology Data Service Online Catalogue (ADS) was also used. The search was carried out within a 500m radius of the proposed development site and relevant HER data is included in the report. The Portable Antiquities Scheme Database (PAS) was also searched as an additional source as the information contained within is not always transferred to the local HER.

Cartographic and Pictorial Documents

- 4.2.5 A full map regression exercise has been incorporated within this assessment. Research was carried out using resources offered by the Kent County Council, the internet, Ordnance Survey and the Kent Archaeological Society. A full listing of bibliographic and cartographic documents used in this study is provided in Section 10.

Aerial photographs

4.2.6 The study of the collection of aerial photographs held by Google Earth was undertaken (Plates 1-6).

Secondary and Statutory Resources

4.2.7 Secondary and statutory sources, such as regional and periodic archaeological studies, archaeological reports associated with development control, landscape studies, dissertations and research frameworks are considered appropriate to this type of study and have been included within this assessment.

Walkover Survey

4.2.8 The Site is visited for a walkover survey. This is for the purpose of:

- Identifying any historic landscape features not shown on maps.
- Conducting a rapid survey for archaeological features.
- Making a note of any surface scatters of archaeological material.
- Identifying constraints or areas of disturbance that may affect archaeological investigation.

5 ARCHAEOLOGICAL AND HISTORICAL DEVELOPMENT

5.1 Introduction

5.1.1 This section of the assessment will focus on the archaeological and historical development of this area, placing it within a local context. Each period classification will provide a brief introduction to the wider landscape (750m radius centred on each site of the PDA), followed by a full record of archaeological sites, monuments and records within the site's immediate vicinity. There were no Registered Parks and Gardens, Historic Parks and Gardens or Protected Military Remains in the search area. Time scales for archaeological periods represented in the report are listed in Table 1.

Prehistoric	Palaeolithic	c. 500,000 BC – c.10,000 BC
	Mesolithic	c.10,000 BC – c. 4,300 BC
	Neolithic	c. 4,300 BC – c. 2,300 BC
	Bronze Age	c. 2,300 BC – c. 600 BC
	Iron Age	c. 600 BC – c. AD 43
Romano-British		c. AD 43 – c. AD 410
Anglo-Saxon		AD 410 – AD 1066
Medieval		AD 1066 – AD 1485
Post-medieval		AD 1485 – AD 1900
Modern		AD 1901 – present day
Table 1: Classification of Archaeological periods		

5.1.2 The Kent HER records within the 750m assessment area are dominated by Marine entries, the majority of which have been added to a grid square circa 755m south of the PDA. Other records reflect the Post Medieval and Modern military activity in the area as well as the growth of Upnor as a settlement surrounded by scattered farmsteads.

5.2 Designated Heritage Assets

5.2.1 One of the tasks of the site visit was aimed to identify any designated heritage assets within the wider context of the PDA in accordance with The Setting of Heritage Assets – English Heritage Guidance (English Heritage 2011).

5.2.2 This guidance states that “setting embraces all of the surroundings (land, sea, structures, features and skyline) from which the heritage asset can be

experienced or that can be experienced from or with the asset” (The Setting of Heritage Assets, English Heritage 2011).

- 5.2.3 A separate heritage report has been produced to review these heritage assets.

5.3 Previous Archaeological Works

- 5.3.1 There have been a number of intrusive archaeological events in the area and these are provided in Figure 13 and predominately relate to the castle and Ordnance depot area or concerning structures which is less is less relevant for the PDA. The Key finds archaeological are discussed in greater detail below.

Hoo Road, Wainscott

- 5.3.2 This was a 2007 excavation circa 440m to the north west. It was here that a Palaeolithic mammoth tooth was found. A multi-period settlement site was revealed containing late Neolithic/Early Bronze Age pits, one with Bronze Age Breaker pottery along with field systems. The features were interpreted as being on the margins of the settlement. A probably late Iron Age trackway was also found that had also been seen on the same alignment to the north relating to the Roman period in the area of the Four Elms Roundabout, a second excavation area, suggesting this feature was in use for some time. A scatter of Roman artefacts was found and are likely to have been outliers of the Romano-British settlement to the north.
- 5.3.3 Anglo-Saxon evidence in the form of sunken featured buildings were seen indicating 7th century occupation, albeit it is considered to be a scattered small settlement of low domestic status with potentially the main settlement area to the north at the Four Elms Roundabout where feature included a bow-sided timber hall within and enclosure, alongside other wooden structures and enclosure. However, evidence of possible trade was seen with lava querns and silver sceatta coins. Given the lack of activity in the Medieval period, it is thought that the land had become agricultural. Of note is that relating to the Post Medieval

period was the amount of lead shot and five iron cannon balls, which is deemed to have come from the military training ground in Upnor.

Landscape Characterisation

- 5.3.4 The PDA is classed under the Hoo Landscape Characterisation as having been military related in 1914 based on aerial photographs. Prior to which it was regular informal fields in the early Post Medieval period. The extent of the military activity is unclear. The northern part of the PDA, having also been allotments (Fig.78).

Medway Valley Palaeolithic Project (MVPP)

- 5.3.5 The MVPP broadly follows the boundaries of the geology with area designated KT 15 matching the alluvium deposits (Fig. 23). There has on been one find in area KT 15 and the Palaeolithic importance classed as medium. The Tower Hill area, which is designated KT 14, has had Palaeolithic artefacts as well as flora and fauna and the Palaeolithic importance and potential is considered high as findings of deposits with fossil fauna and/or associated flora is considered scarce. Upnor being the the exception due to the location of an elephant skeleton within clay deposits and at the same level Wessex Archaeology found flint flakes which are located circa south east of the PDA. In addition, a 2007 excavation to the north, north west of the PDA found a mammoth tooth in natural gravel deposits, which also falls into the area designated KT 14. The geotechnical investigation with the presence of gravelly sandy clays suggests possible Palaeolithic potential in the area of the PDA. A study of the Lower Thames at Kent, shows that the Medway crosses chalk bedrock between Maidstone and Upnor, where it then widens into estuarine marshland overlying London Clay. There are a few isolated Pleistocene gravel outcrops mapped either side of this stretch of the river. One of these, at Cuxton Rectory, has produced a handaxe site, dating from circa 230,000 BP. There is also a concentration of terrace deposits in the Wainscott area, associated with a now-defunct west bank tributary of the Medway. These terraces have produced faunal remains and Levalloisian artefacts, and substantial areas mapped as Head in the vicinity probably conceal more extensive fluvial deposits.

NMP Cropmarks

- 5.3.6 A number of cropmark features have been identified in the vicinity of the PDA (Fig. 24), none of which are within the PDA. To the east of the PDA in the area of

Tower Hill, there are a number of features including the heavy anti-aircraft battery relating to the modern period. To the south west and west are clay and chalk pits of the Post Medieval/Modern period. To the north west is a ring ditch that is likely to be from the Bronze Age. This ties in with the nearby archaeological excavation at Wainscott that found a probably Bronze Age settlement area. To the north east are features associated with the Ordnance yard.

0-100m Radius

- 5.3.7 There are three KHER entries for this area. One is adjacent to the PDA being an outfarm at the south western end of Castle Street (MKE83288). To the north, north east in an area known as Ordnance Plantation, there are earthworks thought to be related to the Second World War (TQ 77 SE 182). Also, in nearby Castle Street was the national school (TQ 77 SE 102), that only appears in use until circa 1875.

100-200m Radius

- 5.3.8 There are 6 KHER entries for this area. The majority of which are to the south west of the PDA and relate to enclosure/earthworks of an unknown purpose marked on historical maps but are thought to be Post Medieval and possibly related to the nearby brickworks (TQ 77 SE 1102/1103/1104). In addition, there is a rectangular feature nearby of an unknown date or function (TQ 77 SE 1045). To the east on Tower Hill was the heavy anti-aircraft battery during the Second World War (TQ 77 SE 1316). To the north west is a possible Bronze Age ring ditch (TQ 77 SE 230).

200-300m Radius

- 5.3.9 There are nine KHER entries for this area. To the south east are Palaeolithic finds from near the shore found in antiquity of the elephant skeleton (TQ 77 SE 170) and flakes possibly found close by (TQ 77 SE 1378). To the east, a Roman quern stone was found in 1924 (TQ 77 SE 16). There are further cropmark features. To the south west is a circular one, possibly related to the Victorian brickworks that were located in that area (TQ 77 SW 1002). To the north in an arable field an unknown square cropmark feature (TQ 77 SE 1043). To the west is a chalk pit known as Dale Hole identified from 18th century historical maps, that later became the site of a lime kiln (TQ 77 SE 156). To the east are more earthworks, likely to

be modern and military related (TQ 77 SE 183). There is also a record for a modern period crane on the dockside (TQ 77 SE 1217).

300-400m Radius

- 5.3.10 There are 24 KHER records for this area. Nine of which are listed buildings to the east of the PDA within the historic core of Upnor, as well as four building records also associated with the historic settlement. All are Post Medieval. In terms of finds, a Bronze Age axe was found in the locality of Upnor Castle but little else is known about the find (TQ 77 SE 5) so it is located to a grid square. A further two Bronze Age axes were also found and reported in 1968, which have also been located to a grid square (TQ 77 SE 26). To the north west of the PDA, a Bronze Age pit and ditch was discovered during excavations (TQ 77 SW 179). In the same area, to the north west, a mammoth tooth was found in an excavation and is dated to the Palaeolithic (TQ 77 SE 195). Further Palaeolithic evidence was seen to the east, south east of flakes found in gravels during test pitting in the army training ground (TQ 77 SE 175).
- 5.3.11 The training ground also contained a pillbox (TQ 77 SE 131) and on the eastern side of Tower Hill was a naval railway (TQ 77 SE 136) that existed until 1961. To the south and south west is Whitewall Creek, which contained a number of wharfs (TQ 76 NE 1021/1022) and was the home of industry in the Victorian period for cement works (TQ 77 SE 295; TQ 76 NE 370).

400-500m Radius

- 5.3.12 There are 11 records that fall in this radius of which there are four listed buildings and two building records. The listing buildings include the Grade I barrack (TQ 77 SE 1189) and Grade II Traverse to former Shifting House at the Ordnance Depot (TQ 77 SE 199) to the east. A Victorian church to the north east (TQ 77 SE 116). To the south west is the Manor Farm complex, including the Grade II house (TQ 77 SW 1038), the Grade II oast (TQ 77 SW 1017) and a building record for the bullock shed (TQ 77 SW 1064). The house having originated in the late 16th century.
- 5.3.13 In terms of finds for this radius, Roman pottery has been found to the east by a fisherman in 1942 in the estuary (TQ 77 SE 18). To the north west at the 2007 excavation, Roman items were also found from the plough soil and spoil heaps.

Items included a brooch and gaming piece (TQ 77 SE 196). A Bronze Age pit, containing Beaker pottery, a quern and flints (TQ 77 SE 194). To the south west was the Manor Farm brickfield that also contained a tramway (TQ 77 SW 1096). To the east is a Victorian Causeway being the ferry link with the Chatham side of the river (TQ 77 SE 1050) that was in existence by 1858 until circa 1940.

Over 500m

- 5.3.14 There are 65 KHER records for this radius. 34 of the 122 KHER records are marine related. The vast majority of which have been located to a grid square to the south of the PDA. A full list is provided in figure 13 but the marine records are not considered relevant for this assessment. This radius also picks up further listed buildings and buildings related to the Ordnance depot to the north east as well as admiralty piers to the east and World War II sentry posts. This radius also picks up the Grade I listed 14 bay barn south west of the Manor House dating to the late 14th, early 15th century (TQ 77 SW 1029).
- 5.3.15 A number of Farmstead records, also fall within this radius. These were scattered farms one in Wainscott to the north west (MKE83289) with partial loss of form, one in the hamlet of Home Street (MKE83287) since demolished, to the east and Manor Farm (partial loss of form) to the south west (MKE83424). There was also an outfarm to the north east, which has since been demolished (MKE88522).
- 5.3.16 There are five Portable Antiquities Scheme (PAS) finds which have been allocated to grid square where the exact location is not revealed. These are all Medieval and are mainly coins, as well as a clasp and cooking vessel. To the west and south west is a limekiln and also a well. Along the eastern side on the coastline are a number of features. To the north east is the site of a pre-1688 battery (TQ 77 SE 9) and a nearby 17th century battery called Middleton's (TQ 77 SE 25). There are also more quays, piers and landing stages relating to the Post Medieval period onwards.

5.4 Archaeological and Historical Narrative

- 5.4.1 Hoo Peninsular has been subject to a Palaeolithic survey and many Palaeolithic finds in this area of west Kent are from gravel terraces associated with the Medway, Ebbsfleet and Thames Valleys. Palaeolithic artefacts and both, flora and fauna have been found in the area around Upnor, some with little provenance and stratigraphy, although there have been some more recent excavations as test pitting in the last decade or so that allows us a greater understanding of the potential in this period. East of the PDA a straight tusked elephant skeleton was found and to the north west a mammoth tooth. There is little evidence from the Mesolithic period. In the wider area, flint tools have been found at Cliffe, Higham and Erith.
- 5.4.2 Across the Hoo Peninsular, Bronze Age implements and features have been found. The Bronze Age also provides evidence for salt production where fragments of pottery vessels are found with structural remains of hearths and brine tanks especially at Hoo St. Werburgh to the north east. Closer to Upnor, to the north west by the Wainscott by-pass Late Neolithic, or early Bronze Age lithics were found along with middle Bronze Age pottery. The location of these sites suggested a preference for coastal locations.
- 5.4.3 The Iron Age is not well represented on the Hoo Peninsular, although in the wider area salt production was seen at Rose Court Farm on the Isle of Grain and Rochester itself may have developed initially in the Iron Age.
- 5.4.4 The Romans also provide evidence of salt production as seen on the foreshore between Hoo St. Werburgh and Stoke as well as elsewhere on the peninsular. The Romans have been credited with the first two attempts at building a sea wall. The subsequent draining of the marshes created pastureland to support sheep. Nearby Rochester was a Roman town and the main London to Dover Roman Road of Watling Street passed through with a bridge across the Medway. Its Roman name was Durobrivae meaning 'stronghold of the bridges'. It is likely that Upnor, being on the hinterland of Rochester in this period, was one of scattered farmsteads and villa estates and its proximity to the town, Medway and Watling Street would have attracted occupation to the area. Certainly, many villas were lined along the Medway and the Darent valleys. The nearby north Kent area around Upchurch also became significant for Pottery manufacture in the Roman

period, relying upon the Medway to transport goods. To the north west of the PDA, near the Four Elms Roundabout there is Roman settlement activity.

- 5.4.5 In the Anglo-Saxon period, Rochester became one of the two dioceses in Kent, Canterbury being the other. The bishopric for Rochester was established by Æthelberht in 604 AD, and the foundation of the cathedral there by Bishop Justus. In 764 AD, documentary evidence in the form of a charter shows that King Sigereð gave 20 ploughlands to land to Bishop Eardwulf at Æslingaham and subsequently confirmed by King Offa. It is thought that these lands included that of Frindsbury and Wainscott. Frindsbury meaning 'Friend's Stronghold'.
- 5.4.6 In the Domesday Book of 1086 AD, Frindsbury was called Frandesberie and it was owned by the Bishop of Rochester. The book refers to there being land of 680 ha, which is a reduction on the land on the earlier charter with only 16 ploughlands, nine slaves and a mill. There were 40 acres of meadow and woodland for five pigs.
- 5.4.7 At the time of the Domesday, the area was one of scattered hamlets. Wainscott may have been established around this time, although there is no written evidence for it. Its name probably means 'wagon shelter', suggesting a subordinate role in the larger estate of Frindsbury.
- 5.4.8 In 1292, Upnor, meaning 'at the bank' is referred to as 'atte nore' and later changed to 'uppan nore' meaning 'upon the bank', later becoming Upnore in 1374. Upnor has no Medieval church suggesting that it was not a key settlement area in this period.
- 5.4.9 Following the dissolution of the monasteries by Henry VIII in the 1530s, Frindsbury Manor was initially confiscated from Rochester Priory but returned to the Dean and Chapter in 1542. Following this breakaway from Rome, Henry VII surveyed England's coastal defences. This resulted in a number of blockhouses being built along the Thames, on the Kent and Essex sides at Gravesend and Tilbury. Construction at Upnor Castle started in 1559 during the reign of Elizabeth I. The castle undertook further defensive features in 1599 and 1601 with a ditch and palisade, as well as a gatehouse, drawbridge and barrack block. The castle saw action in 1667 with the Dutch coming up the Medway. As well as protecting the

castle and Rochester, on the opposite side of the Medway, was a significant a naval dockyard. It is around this time that Upnor begins to grow as a settlement.

- 5.4.10 In 1668 the castle became a magazine store and more barrack blocks were added with the magazine storage capabilities being extended in 1763 and 1808 and 1856.
- 5.4.11 The Royal School of Military Engineering (RSME) was founded by Major (later General Sir) Charles Pasley. As well as establishing barracks at Brompton, a training school was established at Upnor on lands surrounding the castle. This included an area known as Tower Hill and a small arable field on the west side, and south of the PDA. Practice works at Upnor included excavation of mines and communication galleries, sinking of shafts, battery construction and excavation of parallels. The lands at Upnor were given up by General Sir Pasley in 1833 due to the inconvenience of having to cross the Medway from their base on the Chatham side of the river.
- 5.4.12 Fields to the north of the siege area were divided into parcels and sublet by the Board of Ordnance to private individuals for the plantation of trees for the use of gun stocks and for use in fieldworks. The area was subsequently called Ordnance Plantation.
- 5.4.13 In 1824, circa 1km south of the PDA, a large basin was created at what was the Medway end of the Thames and Medway Canal connecting Strood to the Thames at Gravesend. The area began to attract industry and a wharf was created at Whitewall Creek, initially brickworks of which there were two and later the Formby cement works established in 1862 and continued until 1909. Upnor would have been a major crossing point by river from Chatham and this has led to a number of piers and hards along the waterfront.
- 5.4.14 By the 1870s it was realised that the magazine storage facilities at Upnor needed expanding. Consequently, an inland site at Chattenden was bought and five magazines were built along with barracks. In 1891 the decision was taken to apportion Britain's ordnance depots (which were all at that time overseen by the War Office) either to the Navy or to the Army. Under the new arrangements Upnor was given to the Navy and Chattenden to the Army. Without Chattenden the Navy lacked sufficient storage space, which led to the development of the

adjacent Lodge Hill site. This opened in 1899, and provided space for a dozen small magazines. A light railway was constructed in 1873 called the Lodge Hill and Upnor Railway linking Upnor with Chatterton and later Lodge Hill for the transportation of men and stores. The line also ran all the way down to Whitewall Creek. It ran until 1961 and in 1965 the track was lifted. The Upnor Ordnance depot closed in 1964.

- 5.4.15 During the Second World War, Tower Hill, was used as the site for heavy anti-aircraft artillery battery and a military camp was site on the hill north of the guns. The battery was set out in a cluster of defended gun emplacements in what is known as a clover leaf formation with a command point, generator and accommodation all linked by a support road. The Second World War also saw the creation of an embarkation hard at Upnor for the landing in Normandy for D-Day.

5.5 Cartographic Sources and Map Regression

Andrews, Dury and Herbert map of 1769

- 5.5.1 Andrews, Dury and Herbert published their atlas some thirty years before the Ordnance Survey, immediately becoming the best large-scale maps of the county. The map shows the location of the castle and the main road down to the waterfront for Upper Upnor. However, the road layout appears different with that of Upnor Road towards the castle seems to take a long route. The PDA itself lies east of the hamlet of Home Street and close to the higher ground of Tower Hill. There appears to be no buildings in the vicinity of the PDA (Fig. 3).

Hasted, 1798

- 5.5.2 This map is also generalised and the road layout does not match the present day. There are trackways across the area and the line to the Medway to the south of the PDA is also different (Fig. 4).

Frindsbury Tithe Map of 1841

- 5.5.3 The tithe map shows the road layout not dissimilar to the present day (Fig. 5). There is greater detail in that the PDA is made up of a number of fields, designated 382, 404, 413, 415, 414 and 408. Fields 382 belongs to a John Saab and is occupied by William Nicholson. The remaining fields are owned by Edwards Manclark and occupied by George Butler. Field 414 is arable and is called White Field. Field 415

is called Orchard Field and is also arable at this time. Field 404 is called Meadow Field and is arable whereas 409 is referred to as offices and meadow with field 413 a garden. Aside the PDA in between areas designated 413 and 408, there are three small cottages designated 410, 411 and 412. All were owned by Edward Manclark, with 412 unoccupied and 411 occupied by William Butcher and 410 occupied by William Burkett.

- 5.5.4 By this time Castle Street has been created and there are a group of small terraced houses along the southern portion of the street. The plots on Castle Street are owned and occupied by various individuals. The large area to the east of Castle Street is owned by the Board of Ordnance, as is the area to the north. To the west, area designated 416 contains the stream and is owned by the Bishop in Rochester called Parsonage Meadow with the other surrounding fields by the Diocese in Rochester.

Historic OS Map 1869-70

- 5.5.5 This is the first properly scaled OS map. The PDA now consists of two fields. The area designated in the tithes (418) as Hog Marsh has now been expanded to refers to a wider area west of the PDA. In Castle Street the National School has been created. There have been changes in the area to the south with the creation of Whitewall Creek and brickfields and cement works and the area to the south having quarries and lime works. to the north the area is labelled Ordnance Plantation but there is no indication as to the nature of occupation at Tower Hill, which is usual for military sites. The south east part of Tower Hill has a designated area for the Convicts Gardens (Fig. 6).

Historic OS map 1897 1:2500

- 5.5.6 The northern part of the top field of the PDA is at this time allotment gardens. A number of footpaths cross the southern part of the PDA. Another field boundary has been added to the PDA for the southern boundary of the allotments. There is infill of housing along Castle Street on the eastern side and the school is no longer labelled (Fig.7).

Historic OS map 1898 1:10,560

- 5.5.7 This shows the wider area in that around the coast to the south east and south are wharfs and landing stages. There is also a tramway from the north that heads

towards Whitewall Creek around the eastern side of Tower Hill. The map shows the growth of Upnor with barracks and Police Quarters and north of the castle, ordnance depot. To the west there are chalk and clay pits (Fig.8).

Historic OS map 1907 Scale 1:10,560

5.5.8 There appears to be no change at the PDA other than an increase in the number of footpaths that cross the site (Fig.9).

Historic OS map 1909 Scale 1:2,500

5.5.9 The detail in this map confirms that the property located at the south western end of Castle Street still appears to be three separate properties. No other changes are noted (Fig. 10)

Historic OS map 1931-33 scale 1:10,560

5.5.10 The top field of the PDA is still allotments and the footpaths that previously crossed the southern field are no longer showing (Fig.11).

Historic OS map 1933 scale 1:2,500

5.5.11 There are no changes (Fig. 12).

5.6 Aerial Photographs

1940s

5.6.1 The top field is still an allotment the bottom two fields are arable. The area to the east at Tower Hill shows the heavy anti-aircraft artillery. In the clover formation and military buildings at the northern end (Plate 1).

1960

5.6.2 There appears little change at the PDA other than the area of the PDA allotments has reduced. There are now new plots of gardens for houses on the western side of Castle Street. The anti-aircraft artillery has been removed. To the south of the western end of the PDA there is sewage works and the brickfields no longer appear operational (Plate 2).

1990

- 5.6.3 The PDA is now just two fields. The boundaries in the lower half having been removed. The new houses along Castle Street on the western and eastern side can clearly be seen. The sewage works have expanded and at Tower Hill the land has been cleared with tracks by the MOD (Plate 3).

2003

- 5.6.4 There is little change (Plate 4).

2007

- 5.6.5 The centre part of the PDA has cropmarks and circular features. These are foul sewer manholes as there is 2 rising mains going through the PDA. The chambers would have been installed to a depth of 3-4 metres (Plate 5)

2018

- 5.6.6 There is no change (Plate 6).

5.7 Walkover Survey

- 5.7.1 The walkover survey is not intended as a detailed survey but the rapid identification of archaeological features and any evidence for buried archaeology in the form of surface scatters of lithic or pottery artefacts. A walkover was undertaken on the 3rd November 2019. No features or artefacts were seen (Plates 7-17).
- 5.7.2 The field was accessed from the Upnor Road in the north western corner with the arable crop having been harvested and the field recently manured. The northern boundary is a mature hedgerow on the roadside. The eastern boundary are the gardens of the houses on the western side of Castle Street. Except for the far south eastern section which forms a boundary with the MOD land on Tower Hill. The western boundary is also a mature hedgerow and there is a steep drop to Hog Marsh below. The field is divided into two by a bank with a sparse hedges and trees along it. The field itself undulates and slopes from a high point half way across to the low point on the western side. Due to this high point means it is not possible to view in its entirety from end to end. There are views across the valley

to the south west and west. Consideration will need to be given with regards to the statutory protection of the hedgerows surrounding the site.

5.8 Summary of Potential

Palaeolithic

5.8.1 The Palaeolithic period represents the earliest phases of human activity in the British Isles, up to the end of the last Ice Age. The Kent HER has four records from this period within the assessment area. To the north, north west circa 385m from the PDA a mammoth tooth was found during excavations by the Wainscott By-Pass. To the south east is the area where a straight tusked elephant was discovered and nearby two flakes were found in a test pit on the training ground. There are also 8 flint flakes in /Maidstone Museum from Upnor where the exact location is uncertain but thought to be in the area of the elephant skeleton. All these finds were in the area classed as KT 14 in the MVPP being either side of the watercourse and have a high potential classification for Palaeolithic finds. The PDA falls in between these two areas being part of the area covered by alluvium being KT 15 and has a medium potential. Therefore, the Palaeolithic potential in this area is considered **moderate**.

Mesolithic

5.8.2 The Mesolithic period reflects a society of hunter-gatherers active after the last Ice Age. The Kent HER has no record from this period. Therefore, it is considered that the potential for finding remains that date to this period is **low**.

Neolithic

5.8.3 The Neolithic period was the beginning of a sedentary lifestyle based on agriculture and animal husbandry. The Kent HER has no records from this period although it is possible that some of the find at the Wainscott excavation may fall in to the late Neolithic rather than early Bronze Age. However, the potential for finding remains that date to this period within the confines of the development site is considered **low**.

Bronze Age

5.8.4 The Bronze Age was a period of large migrations from the continent and more complex social developments on a domestic, industrial and ceremonial level. The Kent HER has five records from this period within the assessment area. The finds and features for this period cover the area to the south west and north west of the PDA. Closest is that of a ring ditch cropmark, which is likely to be Bronze Age. And just circa 155m north west from the PDA. West of the cropmark were pits with Bronze Age Breaker pottery along with field systems which were considered as being on the margins of the settlement. To the south west of the PDA, but assigned to a grid square as the exact location is unknown are records for the finding of socketed axes, three in all. Therefore, the potential for finding remains that date to this period within the confines of the development site is considered **high**.

Iron Age

5.8.5 The Iron Age is, by definition a period of established rural farming communities with extensive field systems and large 'urban' centres (the Iron Age 'Tribal capital' or civitas of the Cantiaci). The Kent HER has no records from this period within the assessment area. The potential for finding remains that date to this period within the confines of the development site is considered **low**.

Romano-British

5.8.6 The Romano-British period is the term given to the Romanised culture of Britain under the rule of the Roman Empire, following the Claudian invasion in AD 43, Britain then formed part of the Roman Empire for nearly 400 years. The Kent HER has three records from this period within the assessment area. A quern stone was reported in 924 as from Upnor and pottery sheds have been found in the estuary nearby. Roman finds were found to the north west at the Wainscott excavation and by the Four Elm Roundabout is thought to be a settlement area. We know on Hoo that the Romans exploited the foreshore, so the possibility of chance finds cannot be discounted. The potential for finding remains that date to this period within the confines of the development site is considered **moderate**.

Anglo-Saxon

- 5.8.7 The Kent HER has one record from this period within the assessment area where the Wainscott excavation identified a sunken featured building suggesting continuation of occupation in the area to the north west. No finds have been found on the eastern side of the watercourse. Therefore, the potential for finding remains that date to this period within the confines of the development site is considered **low**.

Medieval

- 5.8.8 The Kent HER has six records from this period within the assessment area. One record relates to a Grade I listed barn south west of the Manor House and circa 670m west south west of the PDA which is the central Manor House for the area in the Medieval period. The remaining records are all Portable Antiquities Scheme finds where the exact location is not revealed and the record assigned to a grid square. These include a few coins, a cooking pot and a clasp. Given the location of the PDA away from the Manor House and the centre of Upnor, which at this time the castle had not been built and therefore was not a major settlement, with the area being one of scattered farms, the potential for finding remains that date to this period cannot be discounted and is period is considered **low**.

Post Medieval

- 5.8.9 The Kent HER has 88 records from this period within the assessment area, although 36 of them are marine related. A further 19 are listed buildings and there are six building records as well as the Castle, which is a Scheduled Monument. Upnor following the building of the castle and subsequent Ordnance depot became an important settlement. These records reflect the growth of the village in this period and the important of the military activity in the area. The area immediately east of the PDA became a siege training ground and whilst it is not thought that the PDA was directly part of the training ground, the finding of artillery outside of the area as revealed in the Wainscott excavation, suggests as to the possibility that ordnance may be found at the PDA given its proximity to the military sites. Adjacent to the PDA in this period is the development of Castle Street and the use of the northern part of the PDA for allotments with the southern part remaining agricultural. The KHER monument records reflect the industry to the south at Whitewall Creek and the military activity, railway, piers

and hards. The potential for finding remains that date to this period is considered **moderate**.

Modern

5.8.10 KHER has six records dating to this period, the majority representing that of a Second World War especially the use of Tower Hill as a camp and heavy anti-aircraft artillery and the military trenches to the east and north east. The northern portion of the PDA remained in this period as an allotment until sometime between the 1960s and 1990 when the land reverted back to agricultural use. The Hoo Landscape classification also suggests the potential for the PDA having military use in 1914 although it is not clear as to what this is. The potential for finding archaeological remains dating to this period in the PDA is considered **low**.

Unknown

5.8.11 There are three records of unknown periods being that of cropmarks. One is in an area known to be a brickfield, whilst the others are square and rectangular. It is likely that these are Post Medieval given their shape and location.

Overview

5.8.12 This desk-based assessment has considered the archaeological potential of the site but this potential can only be tested by fieldwork.

5.8.13 The desk-based assessment has considered the archaeological potential of the site. Archaeological investigations in the vicinity, map research, the historical environment record results and recent archaeological investigations have shown that the PDA may contain archaeological sites and these can be summarised as:

- Prehistoric: **high**
- Iron Age: **low**
- Roman: **moderate**
- Anglo-Saxon: **low**
- Medieval: **low**
- Post-Medieval: **moderate**

- Modern: **low**

6 IMPACT ASSESSMENT

6.1 Introduction

6.1.1 Cartographic Regression, Topographical Analysis, and Historic Research have provided evidence for the historic use of the site. By collating this information, we have assessed the impact on previous archaeological remains through the following method of categorisation:

- **Total Impact** - Where the area has undergone a destructive process to a depth that would in all probability have destroyed any archaeological remains e.g. construction, mining, quarrying, archaeological evaluations etc.
- **High Impact** – Where the ground level has been reduced to below natural geographical levels that would leave archaeological remains partly in situ either in plan or section e.g. the construction of roads, railways, buildings, strip foundations etc.
- **Medium Impact** – Where there has been low level or random disturbance of the ground that would result in the survival of archaeological remains in areas undisturbed e.g. the installation of services, pad-stone or piled foundations, temporary structures etc.
- **Low Impact** – Where the ground has been penetrated to a very low level e.g. farming, landscaping, slab foundation etc.

6.2 Historic Impacts

6.2.1 Cartographic regression (5.5), Topographic analysis (1.2) and Historical research (5.4) indicate that the PDA has been in agricultural use until the late 19th century, when the northern portion became allotments for many decades before the entire PDA reverted back to agricultural use. It is not believed that the PDA formed part of the siege training area in the early 19th century although the Hoo Historic Classification suggests the PDA did have military use in 1914. There is no evidence to suggest that any feature or earthwork associated with military was ever located within the proposed site. Whilst it is not clear as to the activity that took place, it is not believed that the PDA was built upon. The PDA was impacted by the addition of two rising mains going through the site with pairs of four sewer manholes to a depth of circa 3-4m. This is likely to have caused a total impact on

any potential archaeology. The remaining area of the PDA is likely to be of low impact.

- 6.2.2 The proposed development comprises residential housing with and SUDS area in the south west corner. In addition, given the slope of the site, terracing may also be required. The proposed development is considered to have a high/total impact on any potential archaeology at the site.

7 SIGNIFICANCE

7.1 Introduction

7.1.1 Archaeological Significance is assessed under a number of criteria, which includes, Period, Rarity, Group Value, Survival/Condition, Fragility/Vulnerability and Potential. These criteria are the same as used by the Government in the scheduling of ancient monuments and provide a useful framework in assessing significance and also pulls together and summarises the findings in the report.

7.2 Significance Criteria

Period

7.2.1 There is archaeological significance within the assessment area of high potential for the Prehistoric, and moderate potential for the Roman and Post Medieval periods. All other periods are considered to be of low potential. This is due to the presence nearby of a Prehistoric settlement area to the north west of the PDA from the Bronze Age. The Palaeolithic period potential is moderate. The wider area is considered high although the PDA itself is of different geology of alluvium to that of previous Palaeolithic finds in the area lowering its potential to moderate. The Roman period is moderate due to the proximity of the PDA to a settlement area to the north west as well as the Roman's exploitation of coastal areas on Hoo.

Rarity

7.2.2 Bronze Age and Roman activity would be considered to be of local to regional significance. Should Palaeolithic activity be found this would be considered of national significance and could potentially further our understanding of exploitation of the Medway and the Hoo Peninsular in this period. Any Post Medieval activity would be of local significance in assisting our understanding of the development of the village and possibly military activity.

Documentation

7.2.3 The historical and landscape development of the PDA can be understood reasonably well from the cartographic, archive, photographic and other sources, although the use of military records held in the Royal Engineers archive may have shed further light in relation to the PDA and military land use. It is possible that

further detailed research may uncover more documentary evidence although the RE archive will not reopen until the middle of 2020.

Group Value

- 7.2.4 The potential for archaeology at the PDA group value in understanding the settlement and occupation of the area in the Bronze Age and Roman period. The potential for a Bronze Age ring ditch as seen by cropmark in between the area of the Wainscott By-pass and the PDA suggests activity does extend south eastwards from the Wainscott excavation area towards that of the PDA.

Survival / Condition

- 7.2.5 The addition of two rising water mains and manholes across the site would have had a total archaeological impact. It is not thought that the PDA has been built on or disturbed militarily but has been in agricultural and allotment use, which is considered to have had a low historical impact upon any potential archaeological remains.

Fragility / Vulnerability

- 7.2.6 Any potential remains within the PDA in the area of the proposed development, should they survive in-situ will be vulnerable to damage during the proposed development, which due to foundations required for the houses and associated access roads and services, along with the potential requirement for terracing is likely to have a high/total impact.

Potential

- 7.2.7 The impact assessment concludes that the site has a high potential for archaeological remains.

Significance

- 7.2.8 Based on the information gained in this report, it can be concluded that the site is of archaeological interest in relation to the Palaeolithic, Roman and Post Medieval period of which carries national, regional and local significance.

8 ARCHAEOLOGICAL MITIGATION

8.1 Introduction

The purpose of this archaeological desk-based assessment was to provide an assessment of the contextual archaeological record in order to determine the potential survival of archaeological deposits that may be impacted upon during any proposed construction works. The assessment has generally shown that the area to be developed is within an area of **high** archaeological potential for the Prehistoric period, **moderate** for the Roman and Post Medieval period and **low** potential for all other periods. However, the development proposals will encounter part of the site in the area of the rising water mains that would have been heavily truncated and disturbed, although the remaining parts of the site are considered to have had low historical impact. The need for, scale, scope and nature of any further assessment and/or archaeological works should be agreed through consultation with the statutory authorities but it is recommended for an archaeological evaluation to take place.

9 OTHER CONSIDERATIONS

9.1 Archive

- 9.1.1 Subject to any contractual requirements on confidentiality, two copies of this desk-based assessment will be submitted to the LPA and Kent County Council (Heritage) within 6 months of completion.

9.2 Reliability/Limitations of Sources

- 9.2.1 The sources that were used in this assessment were, in general, of high quality. The majority of the information provided herewith has been gained from either published texts or archaeological 'grey' literature held at Kent County Council, and therefore considered as being reliable.

9.3 Copyright

- 9.3.1 Swale & Thames Survey Company and the author shall retain full copyright on the commissioned report under the Copyright, Designs and Patents Act 1988. All rights are reserved, excepting that it hereby provides exclusive licence to Esquire Developments Ltd (and representatives) for the use of this document in all matters directly relating to the project.

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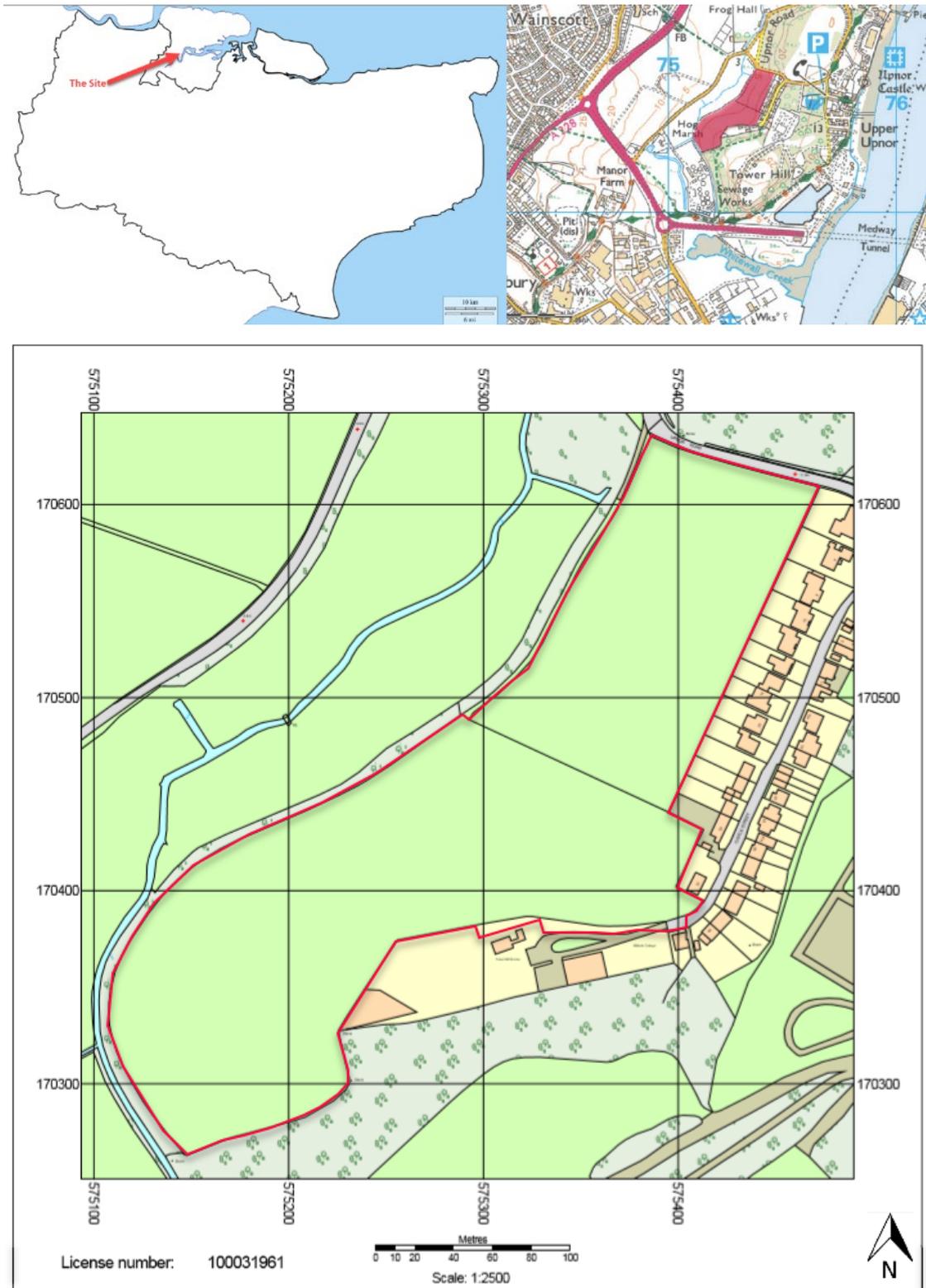


Figure 1: Location Maps, Scale: 1:5,000, 1:2,500



Figure 2: Proposed Development Area (Clague Architects)



Figure 3: Andrew, Dury and Herbert Map from 1769



Figure 4: Hasted, 1798

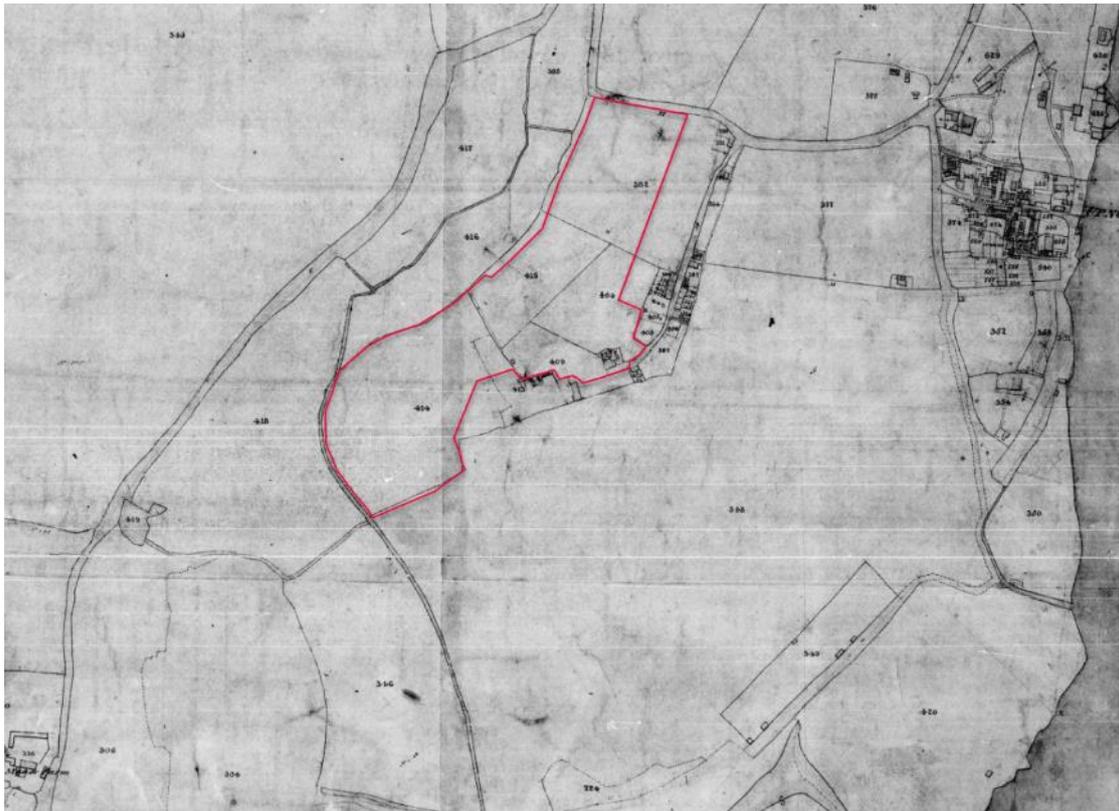


Figure 5: Frindsbury Tithe Map 1841

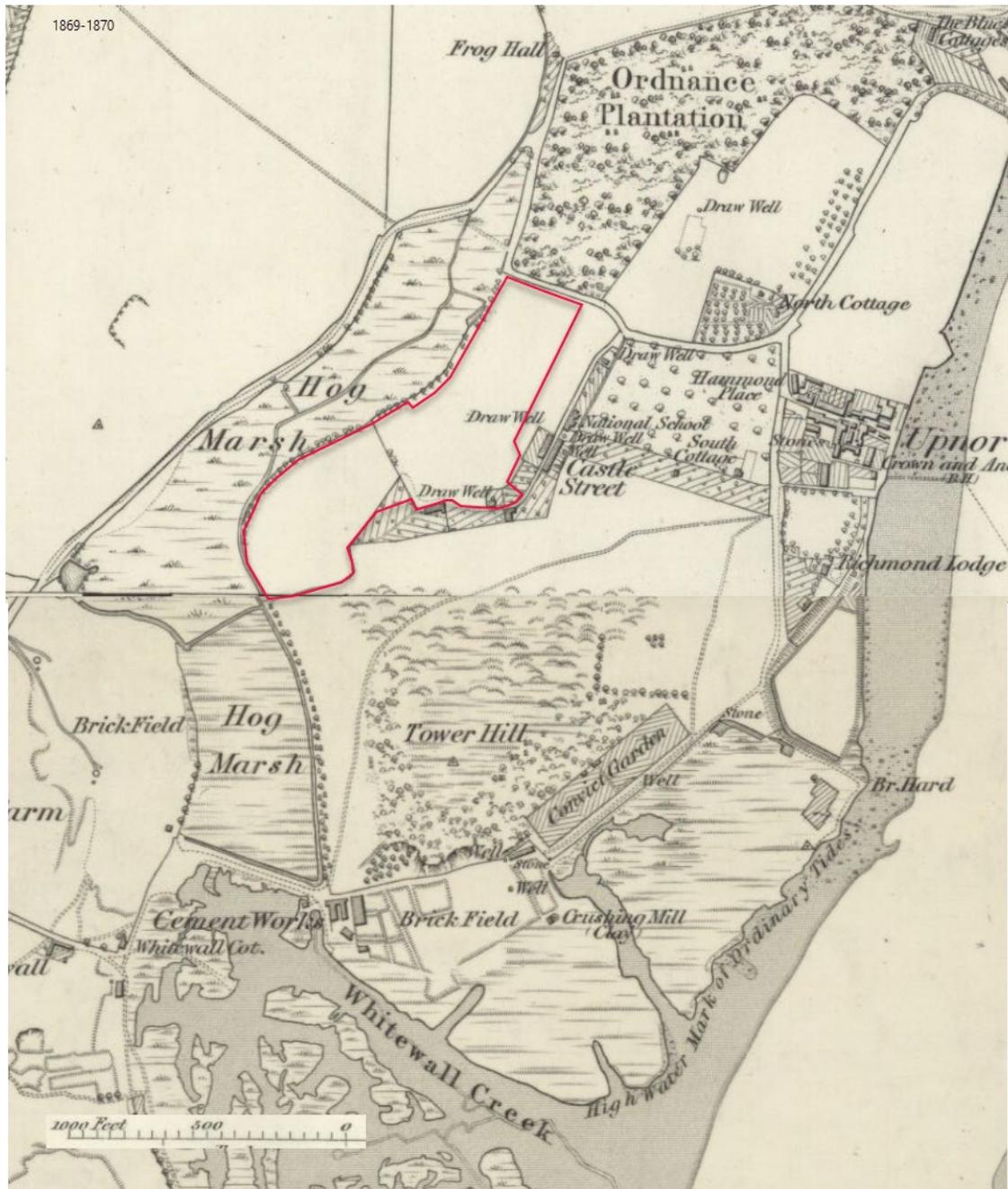


Figure 6: Historic OS Map 1869-70 Scale 1:10560

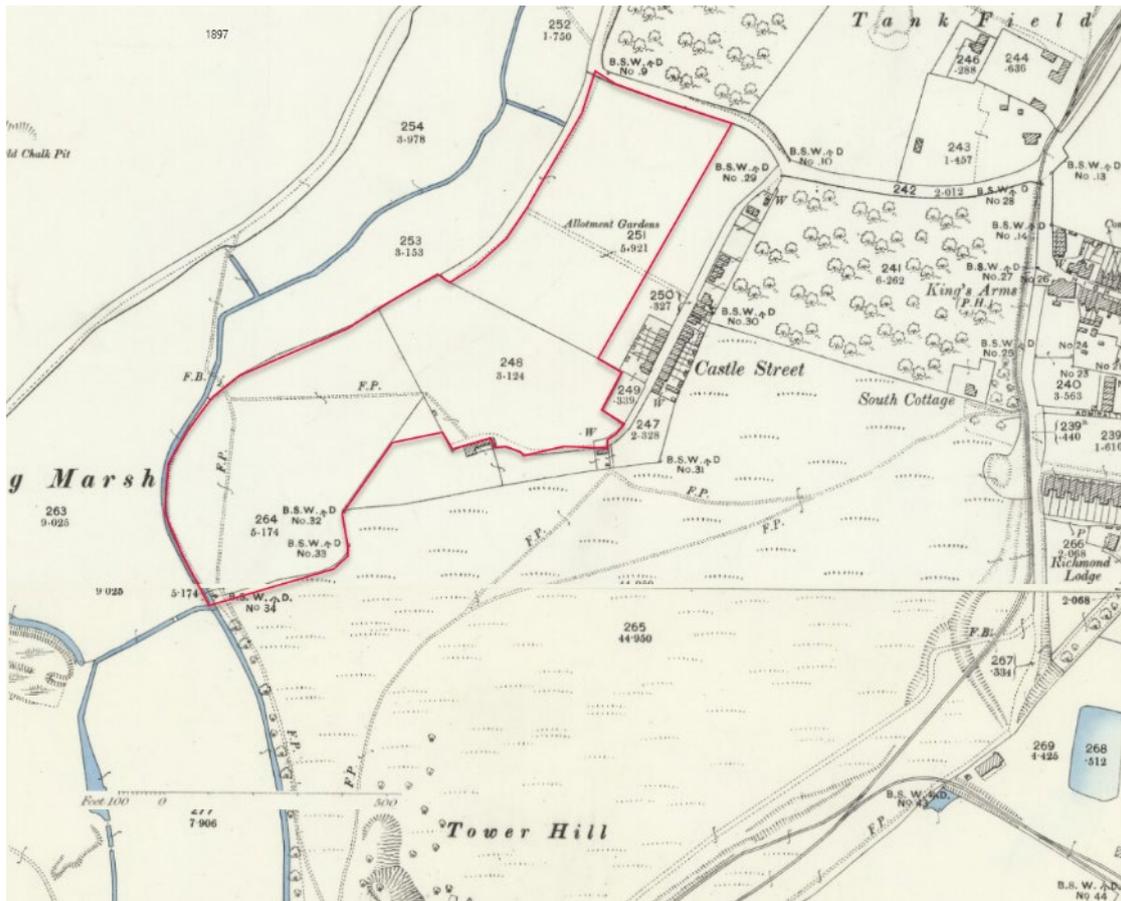


Figure 7: Historic OS Map from 1897 1: 2500

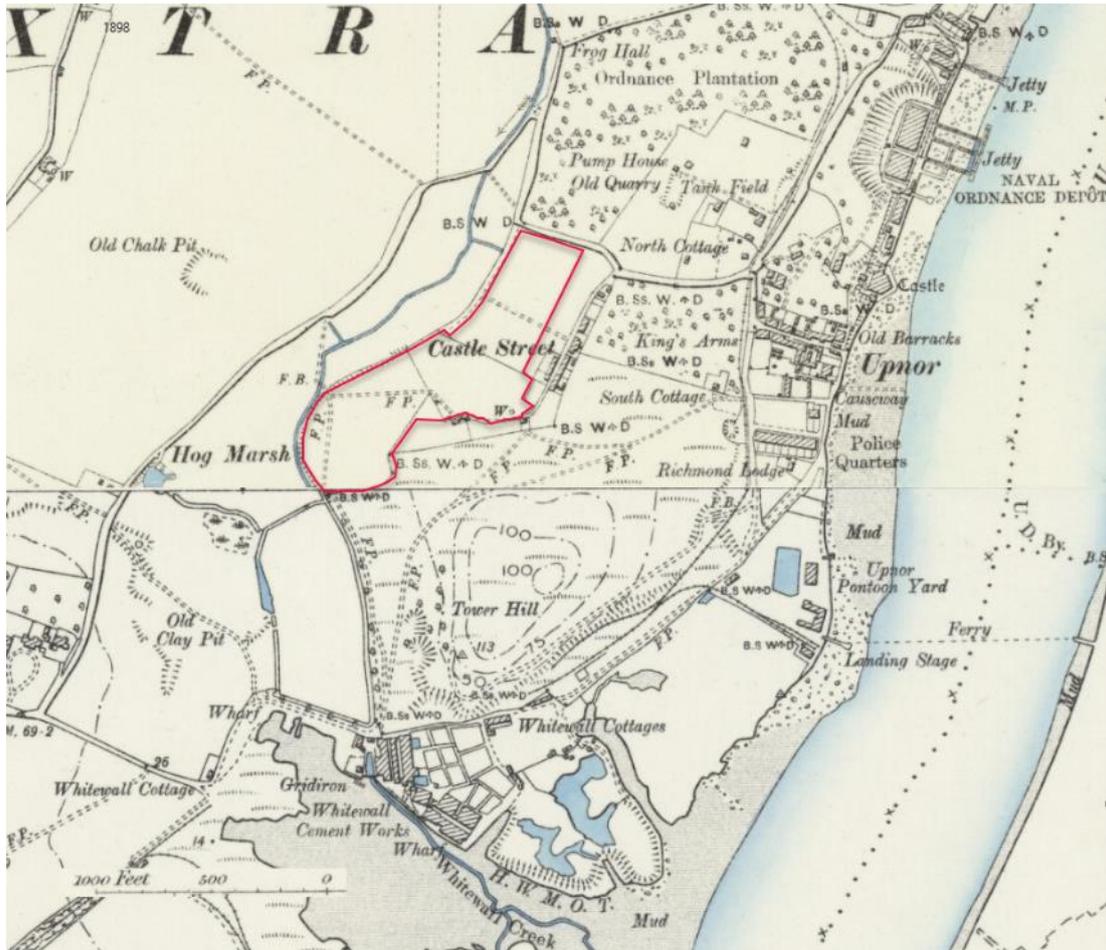


Figure 8: Historic OS Map 1898 Scale 1:10,560



Figure 9: Historic OS Report 1907 Scale 1:10,560

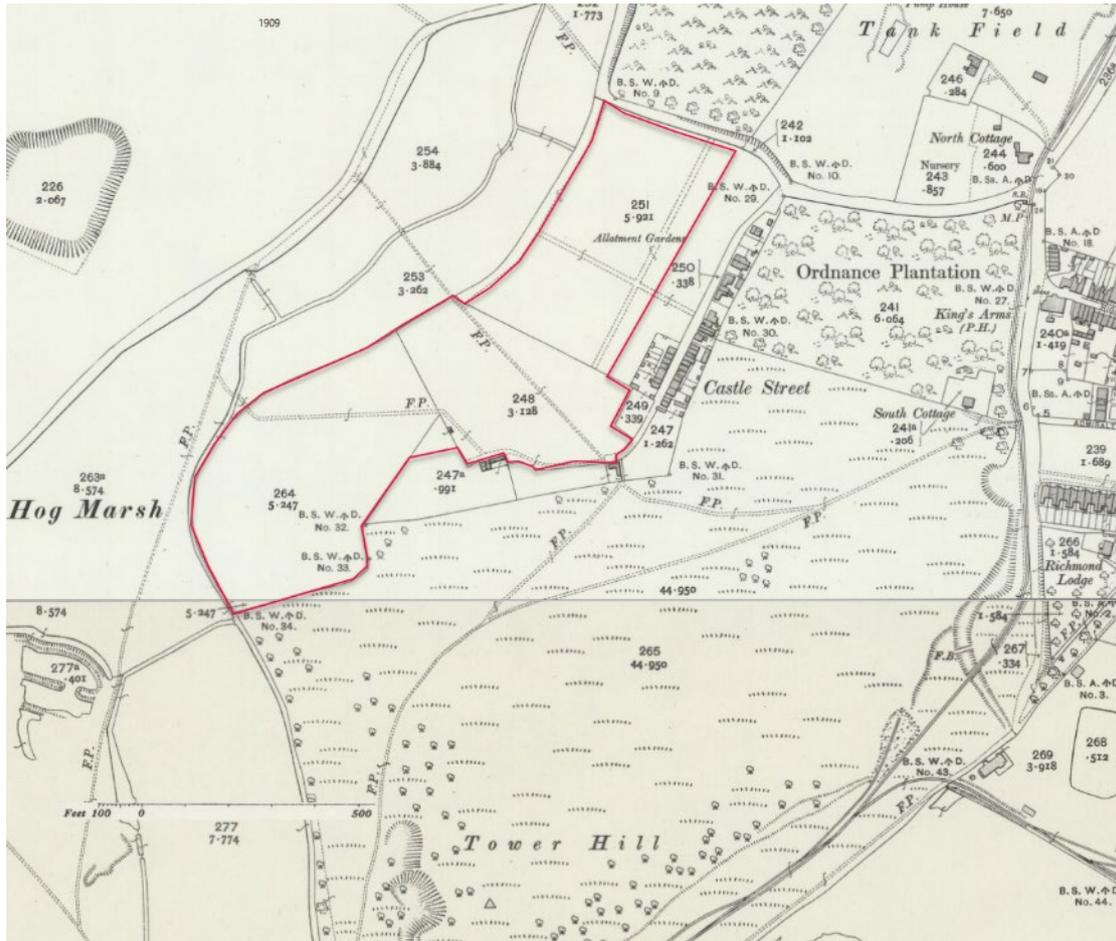


Figure 10: Historic OS Map 1909 1:2500



Figure 11: Historic OS Map 131-1933 Scale 1:10,560

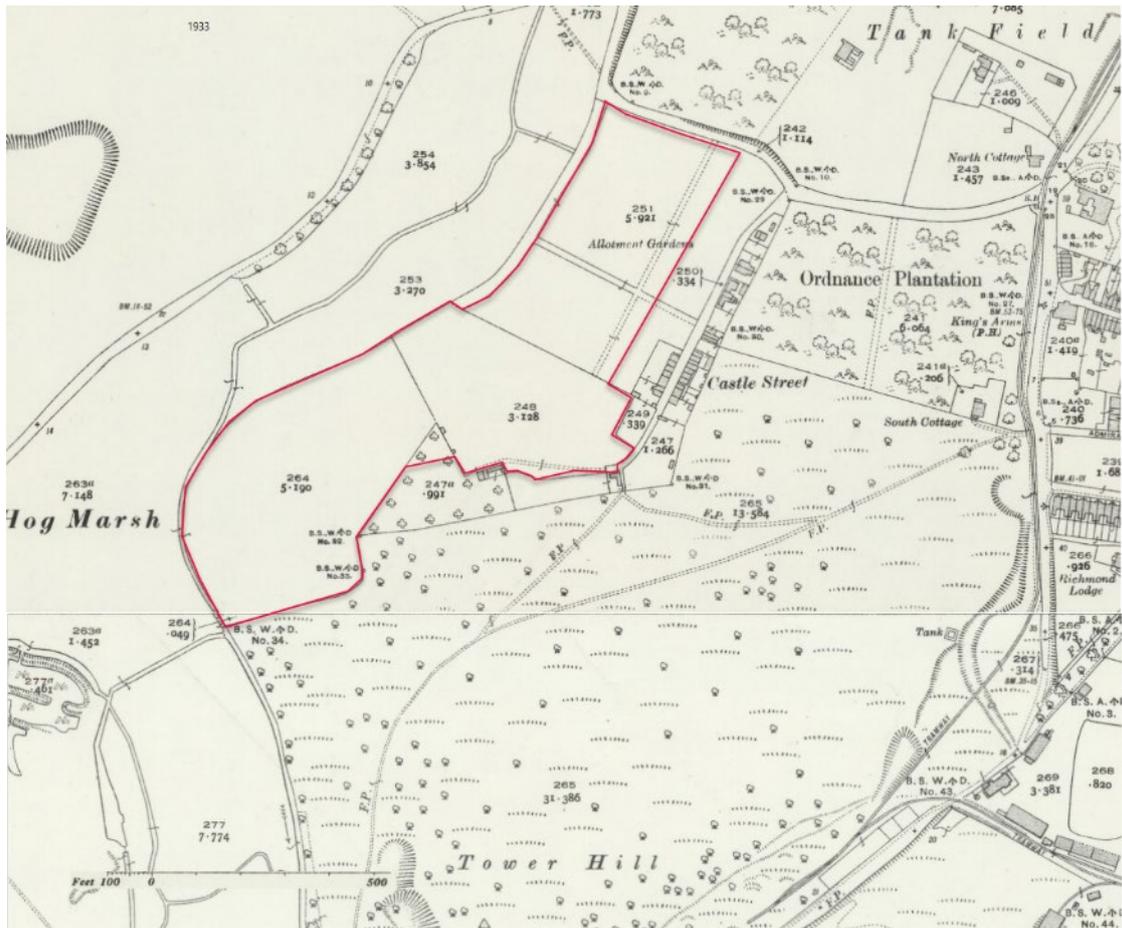


Figure 12: Historic OS Map 1933 1:2500

11 APPENDIX 1 – KCC HER DATA (SEE FIGURES 13-25).

KHER	Type	Location	Period	Description
TQ 77 SE 112	Building	c. 350m E	Post Medieval	Salem Baptist Chapel, High Street, Upnor. appears on the Ordnance Survey map 1862-1875, 1997-1900, 1907-1923, 1929-1952.
TQ 77 SE 116	Building	c. 455m NE	Post Medieval to Modern	St Philip & St James Church, Upnor Road, Upnor. Established in 1869 after breaking away from Frindsbury All Saints.
TQ 77 SE 230	Monument	c. 155m NW	Bronze Age	Ring-ditch seen in cropmark form, Wainscott (photographs from the 1950s).
TQ 76 NE 218	Marine	c. 755m S	Post Medieval	Ariel
TQ 76 NE 219	Marine	c. 755m S	Post Medieval to Modern	Azima
TQ 76 NE 220	Marine	c. 755m S	Post Medieval	Cabby
TQ 76 NE 221	Marine	c. 755m S	Post Medieval to Modern	Circe
TQ 76 NE 222	Marine	c. 755m S	Post Medieval	Florinda
TQ 76 NE 223	Marine	c. 755m S	Post Medieval	Gonda
TQ 76 NE 224	Marine	c. 755m S	Post Medieval	Harry
TQ 76 NE 225	Marine	c. 755m S	Post Medieval	Jim wigley
TQ 76 NE 226	Marine	c. 755m S	Post Medieval	Mollie

TQ 76 NE 227	Marine	c. 755m S	Post Medieval	Ninety
TQ 76 NE 228	Marine	c. 755m S	Post Medieval	Redwing
TQ 76 NE 229	Marine	c. 755m S	Post Medieval	Valkyrie
TQ 76 NE 230	Marine	c. 755m S	Post Medieval to Modern	Viking
TQ 76 NE 231	Marine	c. 755m S	Post Medieval	Gipsy
TQ 76 NE 232	Marine	c. 755m S	Post Medieval	Insider
TQ 76 NE 233	Marine	c. 755m S	Post Medieval	Elwin
TQ 76 NE 234	Marine	c. 755m S	Post Medieval	Trent
TQ 76 NE 235	Marine	c. 755m S	Post Medieval	Fidler
TQ 76 NE 236	Marine	c. 755m S	Post Medieval	Gryp
TQ 76 NE 237	Marine	c. 755m S	Post Medieval	Clyde
TQ 76 NE 238	Marine	c. 755m S	Post Medieval	Drake
TQ 76 NE 239	Marine	c. 755m S	Post Medieval	Dorothea
TQ 76 NE 240	Marine	c. 755m S	Post Medieval to Modern	Emma
TQ 76 NE 241	Marine	c. 755m S	Post Medieval	Gladys
TQ 76 NE 242	Marine	c. 755m S	Post Medieval	Gleaner

TQ 76 NE 243	Marine	c. 755m S	Post Medieval	Larkfield
TQ 76 NE 244	Marine	c. 755m S	Post Medieval	Victor
TQ 76 NE 245	Marine	c. 755m S	Post Medieval	Viper
TQ 76 NE 246	Marine	c. 755m S	Post Medieval	Wouldham court
TQ 76 NE 247	Marine	c. 755m S	Post Medieval to Modern	Prince
TQ 76 NE 248	Marine	c. 755m S	Post Medieval	New ada
TQ 77 SE 221	Marine	c. 860m E	Post Medieval	Mars
TQ 77 SE 94	Monument	c. 770m ENE	Post Medieval to Modern	Upnor pier, Frindsbury Extra. Merchant vessel landing stage in the River Medway. The original date of is unknown. It was operated by the Medway Conservancy Board from 1928 who added a timber causeway in 1933. The pier is now disused.
TQ 77 SE 131	Monument	c. 350m SSE	Modern	Pillbox, Tower Hill Camp, Frindsbury Extra. Brick faced concrete, Type 24. Good condition. Tower Hill Camp, Royal Engineers.
TQ 77 SW 72	Monument	c. 740m W	Post Medieval	Site of a Limekiln, Jarrett Avenue, Wainscott. A well located in an orchard was thought to be the possible remains of a chalk well operated by a local individual called James Summers in 1855-65 for his limekiln. Site has now been developed and the condition of the well is unknown.
TQ 77 SE 156	Monument	c. 255m WNW	Post Medieval	Site of a Limekiln at Dale Hole, Frindsbury. A chalk pit known as Dale Hole was depicted on a 1768 map as disused. This was later reopened and may be associated with lime kilns operated 'in Wainscott' in 1838 by Thomas Gransden.
TQ 76 NW 295	Monument	c. 310m SW	Post Medieval	Crown cement works, Frindsbury. A cement works was first operating at this site in c.1847. It became known as the Crown

				works when it was sold to William Tingey & Son in 1856. It became part of APCM in 1900 and was modernised. This eventually led to the destruction of part of the works possibly due in part to a shift in production.
TQ 76 NE 370	Monument	c. 310m S	Post Medieval to Modern	Whitewall Creek cement works, Frindsbury. A cement works was formerly located at Whitewall Creek near Tower Hill, Frindsbury. It was established in c.1862 and became the Formby Cement works in 1881. The site closed in 1907 after running out of quarrying resources.
TQ 77 SE 169	Building	c. 370m ESE	Post Medieval to Modern	Site of Richmond Lodge, Upper Upnor, Frindsbury Extra. Remains of the cellar relating to Richmond Lodge were found during a watching brief on the construction of 1 Upchat Road. Richmond Lodge was constructed sometime between 1840 and 1865. It had previously been used as a Storekeeper's House having been purchased by the Crown in 1838. It was also used by the Royal Engineers as a 'hunting lodge' for their Drag Pack. The Lodge was composed of a number of outbuildings, including a kennel or possibly a carriage house. It was demolished sometime between 1961 and 1999.
TQ 77 SW 94	Monument	c. 660m WSW	Post Medieval to Modern	Post medieval well, north west of Manor Farm, Frindsbury. A large industrial well, located just north west of Manor Farm and visible on the 1st edition Ordnance Survey map (c.1858/1873). Appears to have served a clay pit. The well was visited by the Kent Underground Research Group in 2005 on the advice of Kent County Council. It was seen to be dry, 17.2m deep to rubbish with a 1.5m wide shaft.
TQ 77 SE 173	Monument	c. 465m NNW	Early Medieval or Anglo-Saxon	Anglo-Saxon enclosure with sunken featured building, Hoo Road, Wainscott. Found during an evaluation carried out by Wessex Archaeology in 2007.

TQ 77 SE 5	Findspot	c. 310m SW	Bronze Age	Socketed axe, near Upnor Castle, Frindsbury. No further information.
TQ 77 SE 9	Monument	c. 595m NE	Post Medieval to Modern	James battery, Lower Upnor, Frindsbury Extra. Site of a pre-1688 battery known as James Fort ten guns. Site of monument seen in 2004 during a rapid assessment of the north Kent Coast by Wessex Archaeology. Likely that the battery site is still in use for military purposes.
TQ 77 SE 16	Findspot	c. 260m E	Roman	Quern stone, probably Roman, Upnor, Frindsbury Extra. Reported in 1924.
TQ 77 SE 18	Findspot	c. 460m E	Roman	Roman potsherds, Medway Estuary near Upnor, Frindsbury Extra. Found by an individual fishing in the Medway Estuary near Upnor. The finds were presented to Rochester Museum and included a so-called incense cup. Reported in 1942.
TQ 77 SE 25	Monument	c. 735m ENE	Post Medieval	Middleton's battery, Lower Upnor, Frindsbury Extra. A late 17th century battery constructed near Upnor Castle in 1667 after a heavy attack from the Dutch on the English fleet. This move appears to have been a successful one; when the Dutch attacked Upnor Castle on the 13th June they met strong resistance and could advance no further up the Medway. Present condition uncertain as located within a military site.
TQ 77 SE 26	Findspot	c. 310m SW	Late Bronze Age	Two bronze socketed axes, Upnor. sited to locality only] (i) Bronze, socketed axe, single loop; part of a blade missing and rim damaged at the time of casting; length: 3 5/8in. Late Bronze Age. Upnor. (ii) Bronze socketed axe, single loop; length: 3 1/2in. Late Bronze Age. Reported in 1968.
TQ 77 SW 1034	Listed Building	c. 845m W	Post Medieval	Cypress House. Grade II listed building (1085739). C17, refaced in mid-C18.
TQ 77 SE 1186	Listed Building	c. 325m E	Post Medieval	No. 3 High Street. Grade II listed building (1085740). Early 19C.

TQ 77 SE 1188	Listed Building	c. 380m E	Post Medieval	Waterhouse Cottage. Grade II listed building (1085741). Cottage pair, now house, 17C.
TQ 77 SE 1189	Listed Building	c. 415m E	Post Medieval to Modern	The Barracks. Grade I listed building (1085742). Elizabethan fortification, early 18th century barrack bloc, now store and museum.
TQ 77 SE 1193	Listed Building	c. 375m E	Post Medieval to Modern	30-32 High Street. Grade II listed building (1085743). Cottage pair, now one house. Jettied.
TQ 77 SW 1038	Listed Building	c. 450m SW	Post Medieval	The Manor House. Grade II listed building (1085745). Farmhouse, late 16c refronted in 1753.
TQ 77 SE 1196	Listed Building	c. 380m E	Post Medieval	Waterside Cottage. Grade II listed building (1204303). House, circa 1800.
TQ 77 SW 1029	Listed Building	c. 670m WSW	Medieval	Barn 30 Yards South West of The Manor House. Grade I listed building (1204320). Barn circa 1300. 14 bays. However, tree-ring analysis of samples taken from the arcade posts has shown that six of the timbers were from trees felled in the period c. AD 1392-1412 and probably c. 1403 "suggesting [the barn] to be later than originally believed.
TQ 77 SE 1195	Listed Building	c. 470m ENE	Post Medieval to Modern	Upnor Castle. Grade I listed building (1204365). Also schedules monument (1012980). Built in 1559 to protect the Queen's navy when moored in Chatham Reach and later enlarged at the end of the 16th century. Subsequently it was converted into a magazine establishment in the late-17th century after the Dutch raid on the Medway.
TQ 77 SW 1017	Listed Building	c. 415m SW	Post Medieval	Manor Farm Oast. Grade II listed building (1278058). Oasthouse, probably 1860s.
TQ 77 SW 1036	Listed Building	c. 815m W	Post Medieval	Vine Cottage. Grade II listed building (1336489). Later 18C cottage.
TQ 77 SE 1184	Listed Building	c. 365m E	Post Medieval	Albermarle Cottage. Grade II listed building (1336490). Cottage pair, 17C.

TQ 77 SE 1177	Listed Building	c. 345m E	Post Medieval	12-18 High Street. Grade II listed building (1336491). Cottage row, Mid18th Century.
TQ 77 SE 1179	Listed Building	c. 385m E	Post Medieval	Walsall House. Grade II listed building (1336492). House Late 18th century.
TQ 77 SE 1182	Listed Building	c. 350m ENE	Post Medieval	Upnor Castle House. Grade II listed building (1336493). House Mid-17th century. To north with late 18th century garden front to south.
TQ 77 SE 1181	Listed Building	c. 390m E	Post Medieval	The Tudor Rose Public House. Grade II listed building (1390628). Western part late 17th century, or early 18th century. Eastern part early 19th century, added at the same time the western wing was refenestrated.
TQ 77 SE 1217	Building	c. 255m ENE	Modern	Crane. Travelling dockside crane of steel construction.
TQ 77 SE 1205	Building	c. 360m ESE	Post Medieval to Modern	Admiralty Terrace Upnor. Former Royal Marine Police houses to guard the Upnor magazines.
TQ 77 SE 1313	Building	c. 385m E	Post Medieval to Modern	Police Senior officers quarters, Upnor
TQ 77 SE 1200	Building	c. 515m NE	Post Medieval to Modern	Railway track - Lodge Hill / Upnor Light Railway. Only surviving section of former admiralty railway.
TQ 77 SE 1312	Building	c. 525m NE	Modern	Gas decontamination building. Very good surviving example of second world war gas decontamination building.
TQ 77 SE 1297	Building	c. 770m ENE	Modern	Admiralty ammunition pier. Second world war period admiralty pier for the shipment and receiving of ammunition.
TQ 77 SE 1288	Building	c. 745m NE	Modern	Travelling crane. Former admiralty crane for loading and unloading ammunition barges.
TQ 77 SE 182	Monument	c. 60m NNE	Modern	Earthworks in Ordnance Plantation, Lower Upnor. An oval enclosure defined by a bank with a narrow internal ditch. Probably some form of Second World War earthwork, perhaps a training redoubt.

TQ 77 SE 183	Monument	c. 205m E	Modern	Possible military slit trenches, Ordnance Plantation, Lower Upnor. Earthwork remains of an area of military slit trenches, likely to be of 20th century date.
TQ 77 SE 187	Listed Building	c. 580m ENE	Post Medieval to Modern	Building LU001 (Former B Magazine), Upnor Depot. Magazine. 1856-7, by Lt Col Savage, the Commanding Royal Engineer at Chatham.
TQ 77 SE 188	Listed Building	c. 610m ENE	Post Medieval to Modern	Wall Extending Ne From Upnor Castle Along the River Medway. Early C19. Brick, stone-coped, with four blocked openings along its length.
MKE71520	Findspot	c. 810m WNW	Medieval to Post Medieval	PAS Find. Medieval coin. Half Penny.
MKE71521	Findspot	c. 810m WNW	Medieval	PAS Find. Medieval silver coin. Edward III halfpenny. Date: from 1327 AD to 1377 AD.
MKE72005	Findspot	c. 560m WSW	Medieval to Post Medieval	PAS find. Medieval copper alloy vessel. Post Medieval cast copper alloy pot leg widely used from c.1200-1700 for serving and cooking.
MKE72006	Findspot	c. 560m WSW	Medieval to Post Medieval	PAS find. Medieval copper alloy clasp. An incomplete Post Medieval cast copper alloy toggle clasp. Date: from Ante 1450 AD (Possibly) to Circa 1600 AD (Certain).
MKE72007	Findspot	c. 560m WSW	Medieval to Post Medieval	PAS find. Copper alloy coin. Nuremberg jetton, 16th century.
TQ 77 SW 179	Monument	c. 365m NW	Late Bronze Age	A Bronze Age pit and ditch, Hoo Road, Wainscott. Found during evaluation work carried out by Wessex Archaeology in 2007.
TQ 77 SE 194	Monument	c. 450m NNW	Early Bronze Age	A Beaker pit, Hoo Road, Wainscott. A pit with sherds from at least four Beakers, part of a saddle quern and 57 worked flints, including an end scraper. Thought to date from the very end of the 3rd or early 2nd millennium BC. Found during an excavation in 2007 by Wessex Archaeology.
TQ 77 SE 195	Palaeolithic Findspot	c. 385m NNW	Palaeolithic	A mammoth tooth, Hoo Road, Wainscott. During an excavation in 2007 by Wessex Archaeology, a mammoth tooth was found in

				natural gravel deposits, below archaeological features of Late Prehistoric, Romano-British and Anglo-Saxon date.
TQ 77 SE 196	Findspot	c. 425m NNW	Roman	Metal detecting finds from Hoo Road, Wainscott. A number of other metal objects from the plough soil and spoil heaps of the 2007 excavation. These included a bow brooch of unknown date and type, a 1st century AD terret and a spool-shaped gaming piece.
TQ 77 SE 198	Listed Building	c. 500m ENE	Modern	WWI Sentry Post at the Lower Upnor Ordnance Depot. A concrete polygonal (11-sided) structure approximately 2.5m high with a shallow domed roof. S single, small but heavy concrete hatch-doorway with steel-hinges. Vegetation growth precluded easy access but other examples of this type have observation apertures on alternate sides. The visible aperture above the doorway has a deep reveal and very small observation slit.
TQ 77 SE 199	Listed Building	c. 495m ENE	Post Medieval to Modern	Traverse to former Shifting House, Lower Upnor Ordnance Depot, 1811. Grade II listed (1402942).
MKE83287	Farmstead	c. 800m W	Post Medieval	Home Street Farm. Loose courtyard with working agricultural buildings on one side and with additional detached elements to the main plan. Farmhouse detached side on to yard. Located within a village. Farmstead completely demolished.
MKE83288	Farmstead	Adjacent to PDA	Post Medieval	Outfarm south west of Castle Street. An outfarm with a loose courtyard plan with a building to one side of the yard. Altered - partial loss of original form (less than 50%).
MKE83289	Farmstead	c. 640m NNW	Post Medieval	Farmstead in Wainscott. A regular L-plan farmstead. Farmhouse detached gable end-on to yard: Located within a village. Altered - partial loss of original form (less than 50%).
MKE83424	Farmstead	c. 500m SW	Post Medieval	Manor Farm. A regular U-plan courtyard farmstead. Farmhouse detached in central position. Isolated position. Altered - partial loss of original form (less than 50%).

MKE88522	Farmstead	c. 630m NE	Post Medieval	Outfarm south west of Lower Upnor. An outfarm or field barn group consisting of two detached buildings. Farmstead completely demolished.
TQ 77 SW 1064	Building	c. 490m SW	Post Medieval	Bullock Shed at Manor Farm. Disused late 19th century cattle shed, associated in 1907 with 2 stockyards; some alterations since 1907.
TQ 77 SE 1007	Marine	c. 795m E	Post Medieval	Wreck of Charles V (17th)
TQ 77 SE 1011	Monument	c. 835m ENE	Post Medieval	Site of Chatham Boom, River Medway near Chatham Dockyard. Marked on a chart of 1760.
TQ 77 SE 1016	Marine	c. 265m S	Post Medieval to Modern	Whitewall Creek
TQ 77 SE 1046	Marine	c. 610m SE	Post Medieval to Modern	Two hulked barges
TQ 76 NE 1011	Marine	c. 635m SSE	Post Medieval to Modern	Hulked vessel in inlet (in 1944/1945/1947 AP)
TQ 77 SE 1045	Monument	c. 160m SW	Unknown	Rectangular feature, near Tower Hill, Frindsbury. Rectangular cropmark feature of unknown date or function. Identified from aerial photographs.
TQ 77 SW 1002	Monument	c. 225m SW	Unknown	Circular cropmark feature, near Tower Hill, Frindsbury. Area is marked as a brickfield on the Ordnance Survey 1st edition map of c.1858-1873.
TQ 77 SE 1043	Monument	c. 295m N	Unknown	Square cropmark feature, Frindsbury Extra. Unknown date or function. Identified from aerial photographs on 1947.
TQ 77 SE 1013	Monument	c. 700m ENE	Post Medieval	Upnor Powder Quay marked on a map of 1802
TQ 77 SE 1048	Monument	c. 665m ESE	Post Medieval	Site of a Bridge Hard, Upper Upnor, Frindsbury Extra. Later edition maps show this was replaced by a landing stage.
TQ 77 SE 1050	Monument	c. 455m E	Post Medieval to Modern	Upnor Causeway, Frindsbury Extra. the Upnor terminal of a ferry link with Princess Bridge (TQ 77 SE 1008) on the Chatham

				side of the river. It is marked on the Ordnance survey historic maps (1858-1940).
TQ 77 SE 1077	Monument	c. 685m ENE	Post Medieval	Hard site, Upnor Reach, Frindsbury Extra. Marked on the first edition Ordnance Survey map at Upnor reach (c.1858-1873). It is not present on any of the later edition maps.
TQ 76 NE 1021	Monument	c. 365m S	Post Medieval to Modern	Site of a Wharf, Whitehall Creek, Frindsbury Extra. Marked on the Ordnance Survey historic maps (c.1858-1940). No longer visible.
TQ 76 NE 1022	Monument	c. 305m SSW	Modern	Site of a Wharf, Whitehall Creek, Frindsbury Extra. A Wharf near Whitehall Creek is marked on the 2nd and 3rd edition Ordnance survey historic maps (c.1891-1922). It is also visible on the 4th edition map of c.1931-1940. No longer visible.
TQ 77 SE 1102	Monument	c. 150m SW	Post Medieval to Modern	Inner arm of an enclosure/earthwork, Wainscott, Frindsbury Extra. Part of the inner structure of a rectangular enclosure/earthwork, located near Wainscott. Marked on the 2nd, 3rd and 4th edition Ordnance Survey historic maps (c.1891-1940). The function of this enclosure is unknown.
TQ 77 SE 1103	Monument	c. 150m SW	Post Medieval to Modern	Inner arm of an enclosure/earthwork, Wainscott, Frindsbury Extra. Part of the inner structure of an enclosure/earthwork, located near Wainscott. Marked on the 2nd, 3rd and 4th edition Ordnance Survey historic maps (c.1891-1940). The function of this enclosure is unknown.
TQ 77 SE 1104	Monument	c. 150m SW	Post Medieval to Modern	Outer arm of an enclosure/earthwork, Wainscott, Frindsbury Extra. Part of the outer structure of an enclosure/earthwork, located near Wainscott. Marked on the 2nd, 3rd and 4th edition Ordnance Survey historic maps (c.1891-1940). The function of this enclosure is unknown.
TQ 77 SE 170	Monument	c. 295m SE	Lower Palaeolithic to Middle Palaeolithic	Skeleton of extinct straight-tusked elephant (<i>Palaeoloxodon antiquus</i>), from near the shore-line at Upnor

TQ 77 SE 175	Monument	c. 315m ESE	Lower Palaeolithic to Middle Palaeolithic	Lower / middle Palaeolithic flakes, Upnor Training Ground. Two flakes were found from the sieving of basal gravels in a test pit at the army's Upnor Training Ground. The flakes were undiagnostic technologically, though the larger one had hints of a Levallois approach.
TQ 77 SE 1378	Findspot	c. 295m SE	Lower Palaeolithic to Middle Palaeolithic	Palaeolithic flint flakes from Upnor. Held in Maidstone Museum. Their origin is uncertain. However, it is possible that these flakes might be from the deposit just above the elephant skeleton.
TQ 77 SE 102	Monument	c. 60m E	Post Medieval	Site of National school, Castle Street, Upnor, Frindsbury. The building as the National School is shown on the Ordnance Survey map 1862-1875, after this it appears not to have been used as a school.
TQ 77 SW 1096	Monument	c. 475m SW	Post Medieval to Unknown	Manor Farm, Frindsbury brick field, tram, well and pump. A large brickfield has existed either side of Upnor road, Frindsbury since at least the time of the 1st edition OS map (1862/1875). The map shows an extensive brick pit forming a crescent around the north of Manor Farm with a tramway running from east to west. At the east end was a post-medieval well and at the east end was a pump.
TQ 77 SE 229	Monument	c. 575m SE	Modern to Unknown	Second World War embarkation hard, Upper Upnor
TQ 77 SE 231	Monument	c. 520m NE	Post Medieval to Modern	Lower Upnor Ordnance Depot. Early 19th century magazine and ordnance depot. Built in a former gravel quarry the depot was constructed in c. 1813 to hold and test gunpowder. It replaced an earlier store south of Upnor Castle which itself replaced the Castle as a gunpowder store.
TQ 77 SE 1316	Monument	c. 125m E	Modern	Heavy Anti-Aircraft battery in Upper Upnor at the south end of Tower Hill, visible in aerial photographs from 1946, in Upper Upnor. The camp for the battery was c. 120m to the north.

TQ 77 SE 136	Monument	c. 350m E	Post Medieval to Modern	Naval Railway, Lower Upnor, Frindsbury Extra. Former 19th and 20th century Naval military railway that connected munitions and military depots around Hoo. It runs from the Lodge Hill enclosure, on through the Chattenden enclosure, passing through Lutnor junction and Chattenden depot before running to Upnor and a little way beyond it to the pontoon hard. The railway first started in 1873, and taken over by the Navy in 1891. The line was extended around 1905. The last train ran in May 1961.
TQ 65 NE 307	Monument	c. 730m E	Post Medieval to Modern	River Medway navigation. The Medway was improved by Navigation Acts of 1664, 1740, 1792, 1802 and 1824. Connecting Tonbridge to the Thames at Sheerness, there are 10 locks between Tonbridge and Allington Lock, below which the river is tidal. Below Allington, river craft up to 180 feet long with a beam of 20 feet could be accommodated. Above Allington Lock, the maximum craft dimensions were 80 feet long by 18 feet 6 inches.
EVENT ID	TYPE	YEAR		DESCRIPTION
EKE10158	DENDROCHRONOLOGICAL SURVEY	2002	Intrusive	Tree-ring analysis of timbers from Manor Farm Barn, Frindsbury
EKE10235	WATCHING BRIEF	2007	Intrusive	Watching Brief on Drainage Works on the North Platform Upnor Castle, Medway
EKE10236	DENDROCHRONOLOGICAL SURVEY	2008	Intrusive	Tree-Ring Analysis of Two Oak Trees, Upnor Castle, Upnor, Kent
EKE10961	BOREHOLE SURVEY	2010	Intrusive	Geoarchaeological assessment at Plot 1, Anthony's Way, Medway City Estate
EKE10962	EVALUATION	2005	Intrusive	Evaluation at Frindsbury Barn, Rochester

EKE8658	WATCHING BRIEF	1999	Intrusive	Watching Brief at 1, Upchat Road, Upper Upnor
EKE8733	GEOTECHNICAL SURVEY	2001	Intrusive	Geotechnical survey at Anthony's Way, Rochester
EKE8734	WATCHING BRIEF	1998	Intrusive	Ground investigation at Medway City Estates Rochester
EKE9576	TEST PIT	2005	Intrusive	Medway Valley Palaeolithic Project, Upnor, test pit
EKE9579		2005	Intrusive	Wainscott East, Medway Valley Palaeolithic Project test pits
EWX6565	WATCHING BRIEF	1993	Intrusive	Watching brief at Upnor Castle, near Rochester
EWX6621	BOREHOLE SURVEY; ENVIRONMENTAL SAMPLING; EVALUATION	1994	Intrusive	Geoarchaeological and Environmental Evaluation of the Medway Tunnel Engineering Scheme
EKE16691	WATCHING BRIEF		Intrusive	Report of an archaeological watching brief on drainage works on the north platform, Upnor castle, Medway, Kent
EKE10159	WATCHING BRIEF; TRIAL TRENCH	2008	Intrusive	A Watching and Recording Brief at Frindsbury Barn, Rochester
EKE10237	WATCHING BRIEF	2008	Intrusive	Archaeological recording on the foreshore, Upnor Castle, Medway, Kent
EKE10953	EXCAVATION	2007	Intrusive	Excavation at Hoo Road, Wainscott
EKE15951	TRIAL TRENCH	2012	Intrusive	Wainscott Primary School, Medway, Kent, An archaeological evaluation report
EKE8686	EVALUATION	2001	Intrusive	Evaluation at the McDonalds Burger Bar, Anthonys Way, Frindsbury
EKE9237	EVALUATION	2007	Intrusive	Evaluation on land at Hoo Road, Wainscott
EKE17097	EVALUATION	2006	Intrusive	An Archaeological evaluation at the R.S.M.E. Engineering Park, Lower Upnor, Medway, Kent

EKE10234	EVALUATION	2009	Intrusive	Evaluation at RSME Upper Upnor, Frindsbury, Kent
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Figure 13: Gazetteer of KHER Records

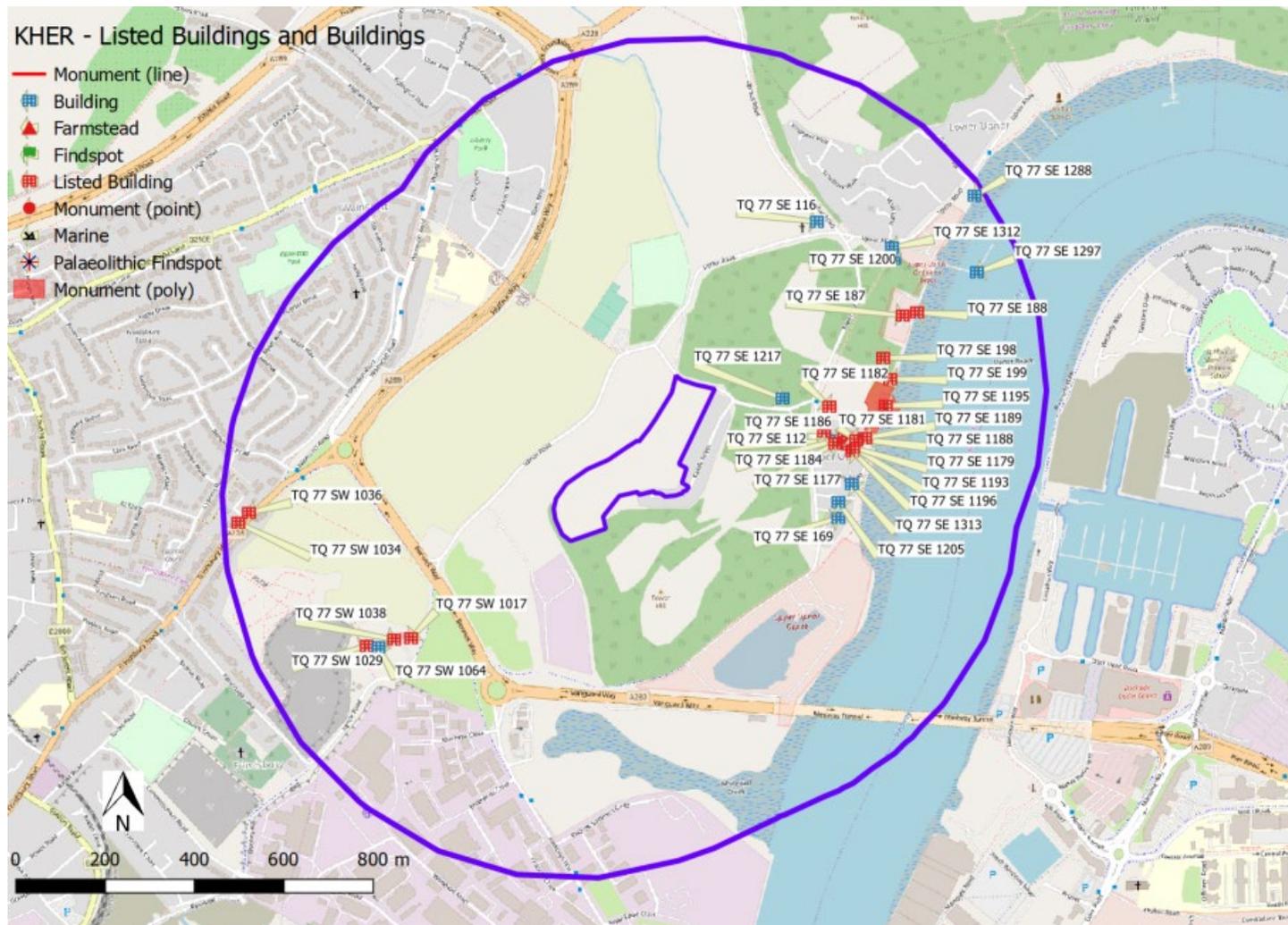


Figure 14: KHER Monument Record –Buildings and Listed Buildings

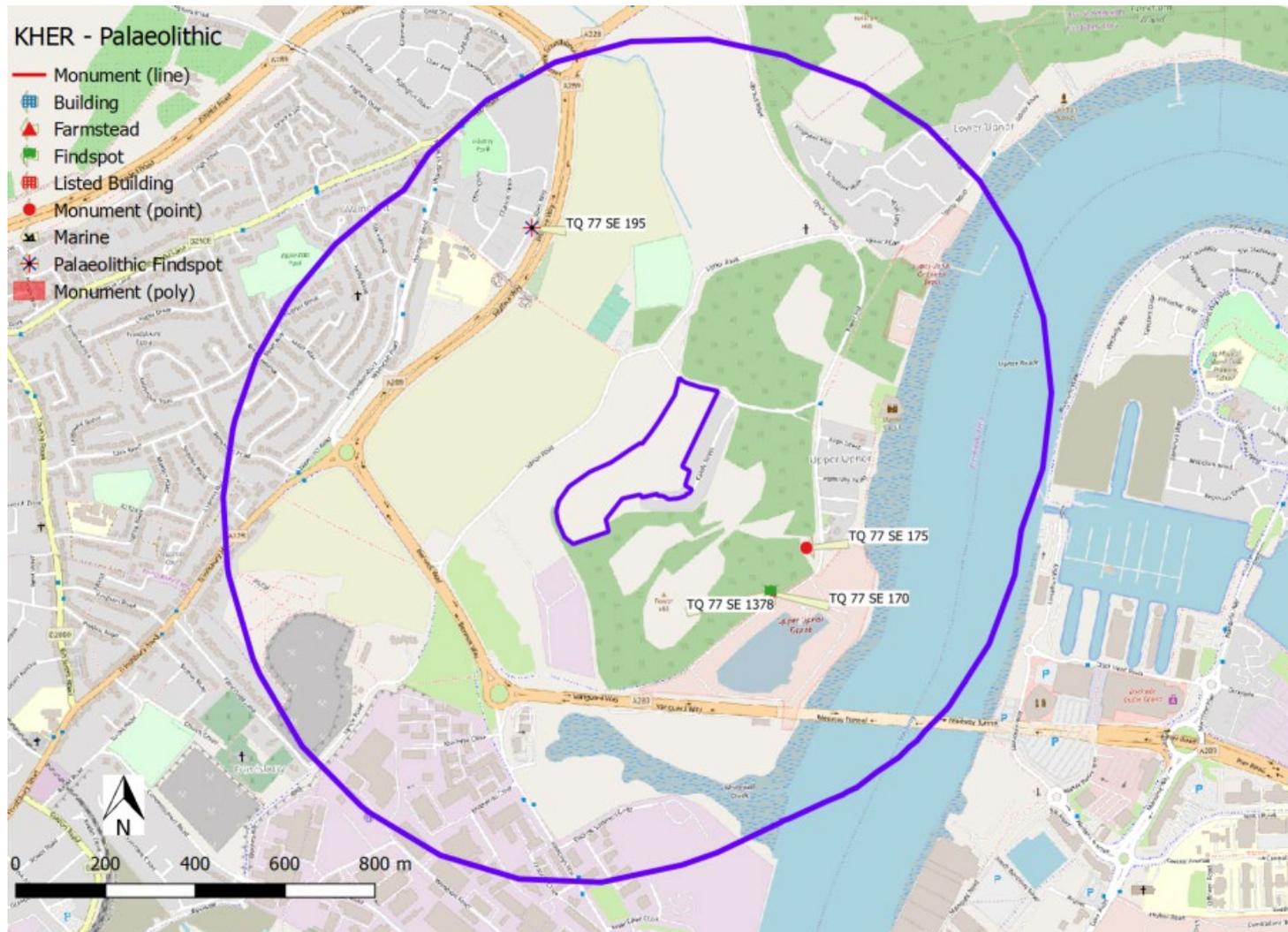


Figure 15: KHER Palaeolithic

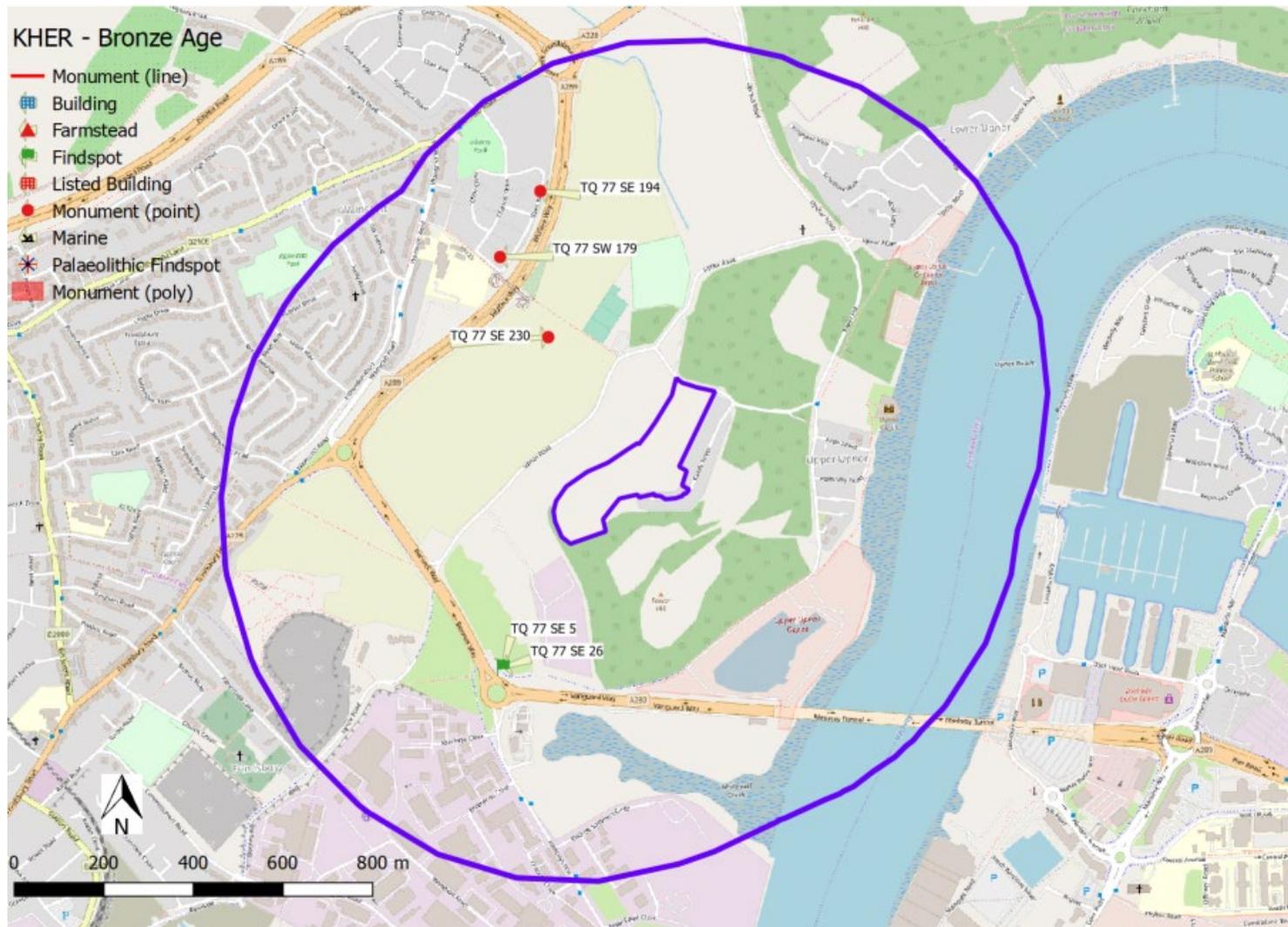


Figure 16: KHER Bronze Age



Figure 17: KHER Roman

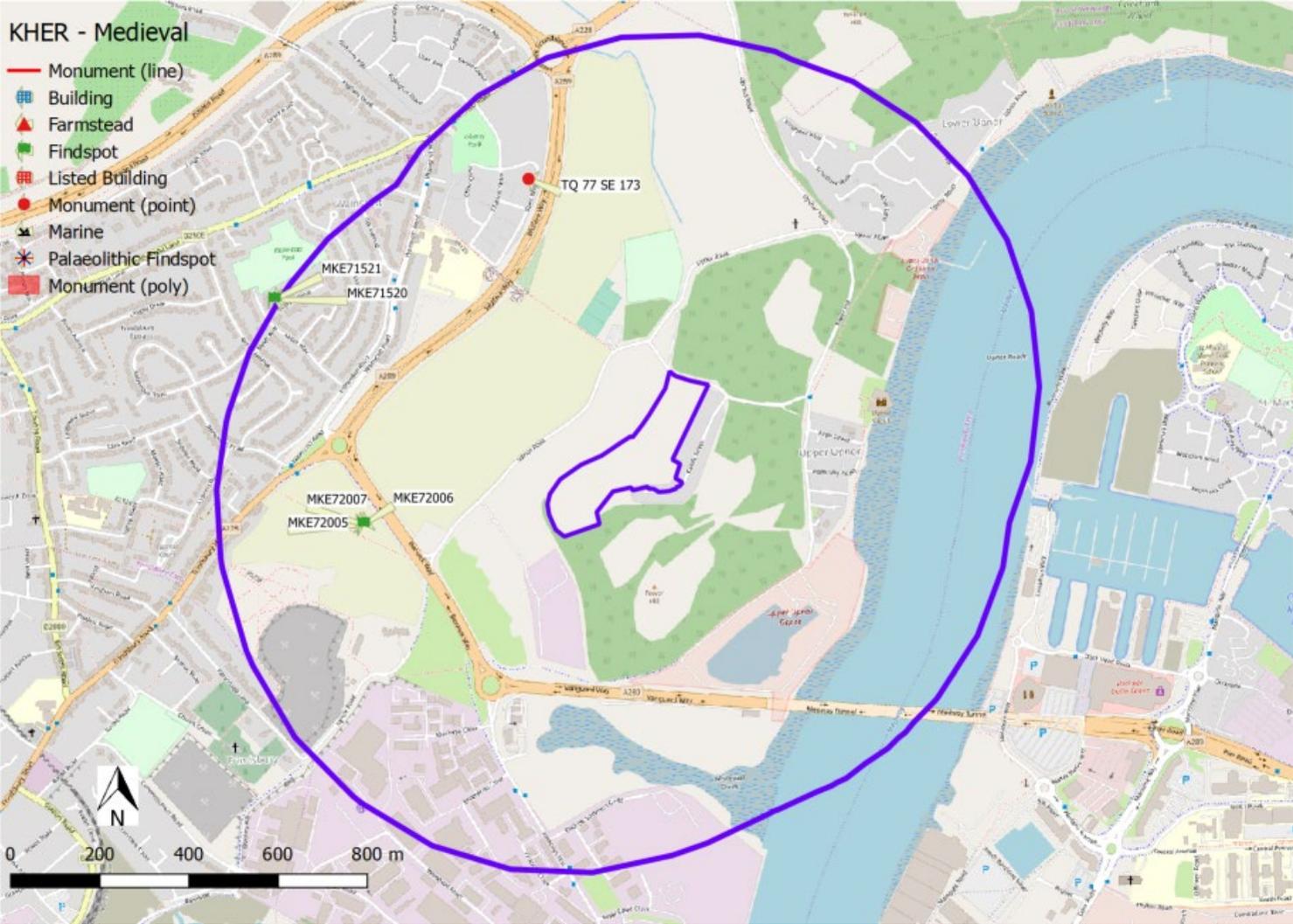


Figure 18: Medieval

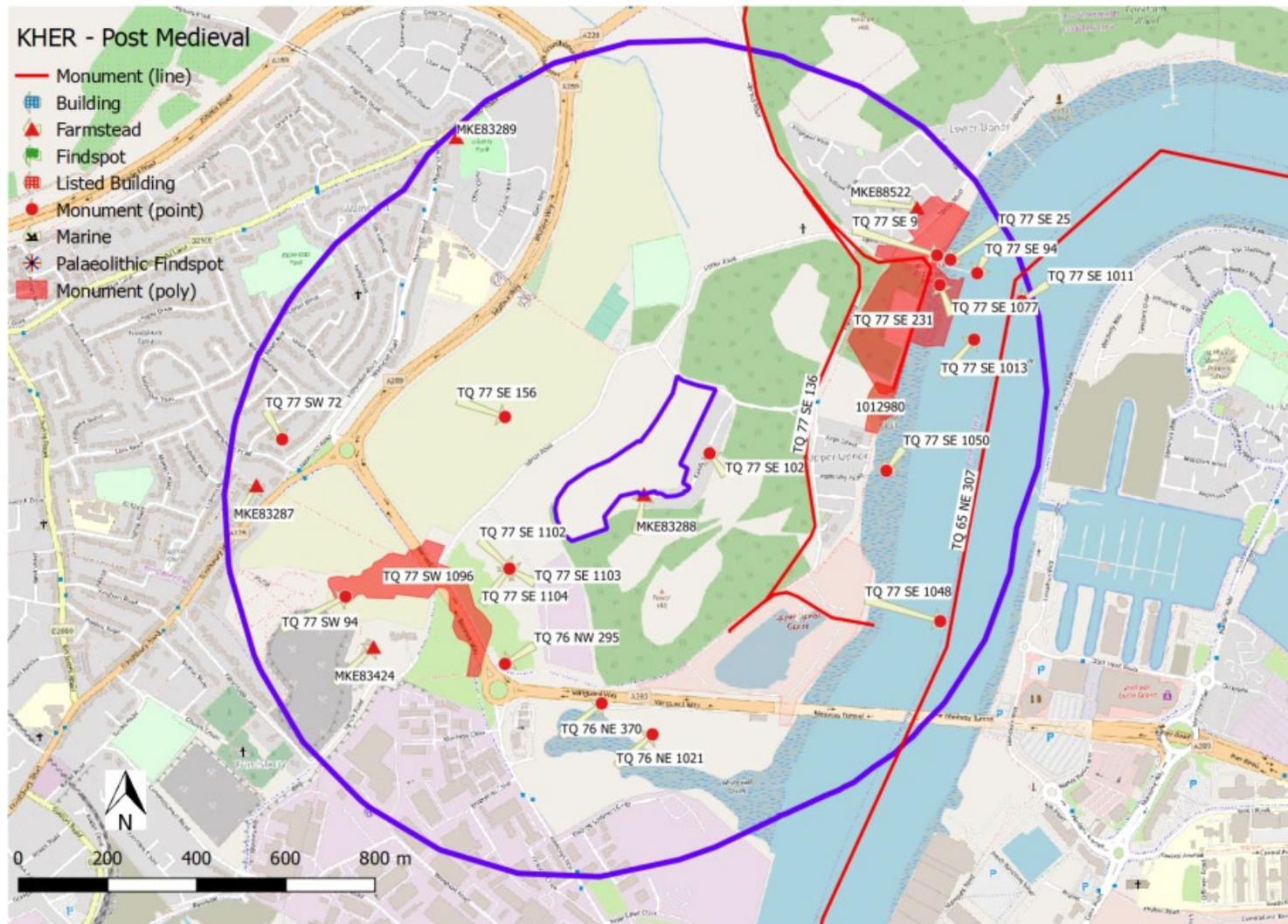


Figure 19: Post Medieval

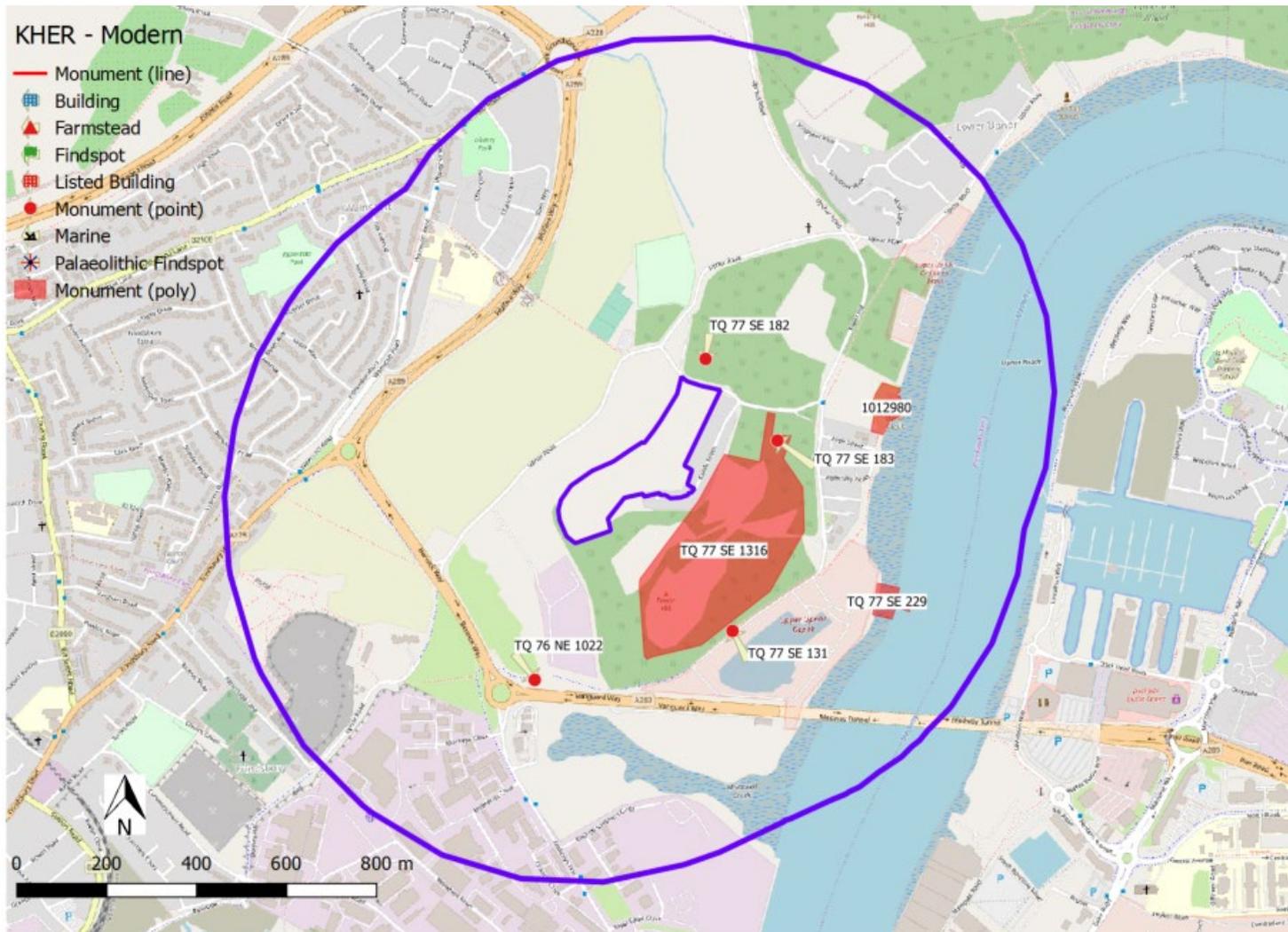


Figure 20: KHER Modern

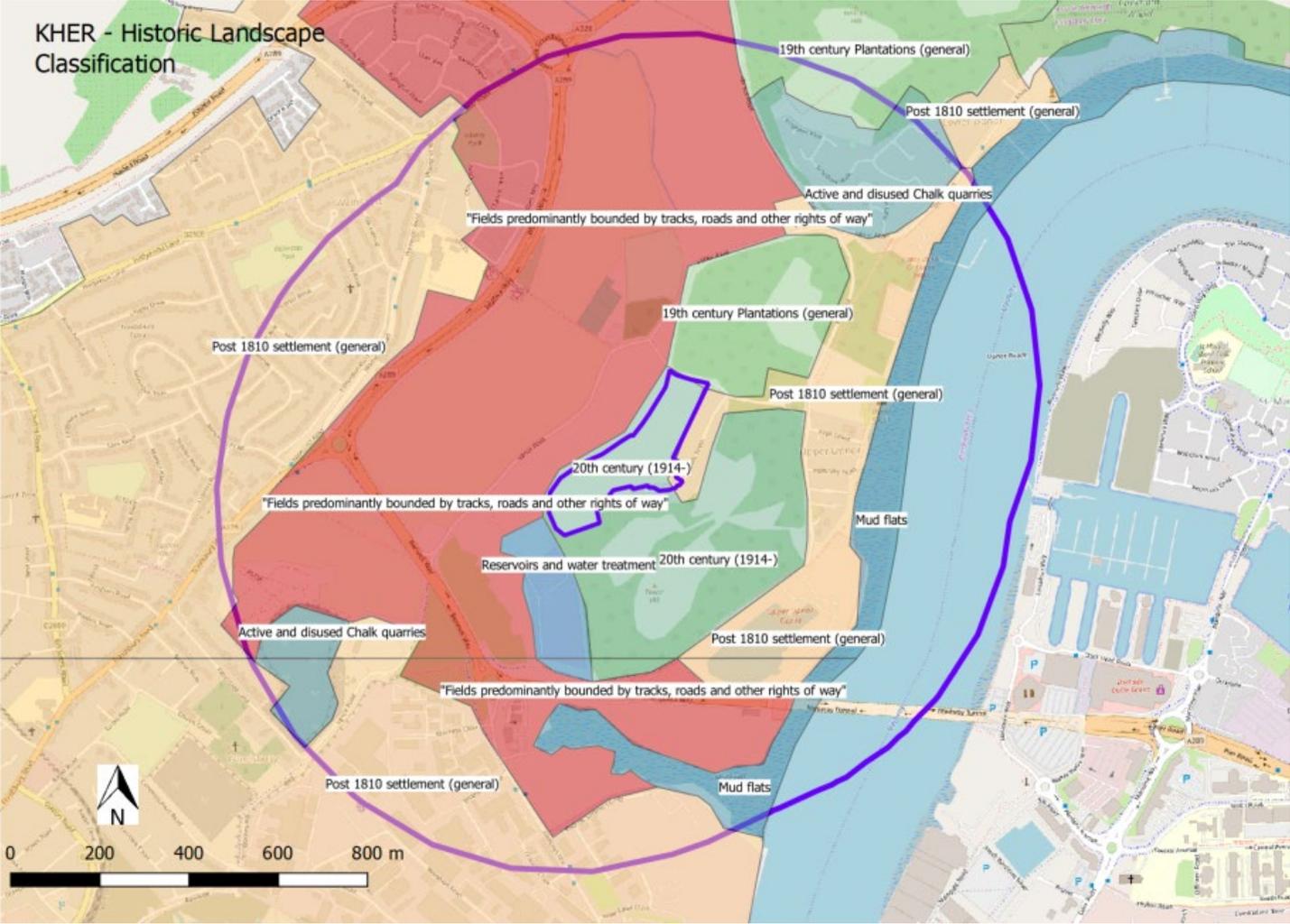


Figure 21: KHER Historic Landscape Characterisation

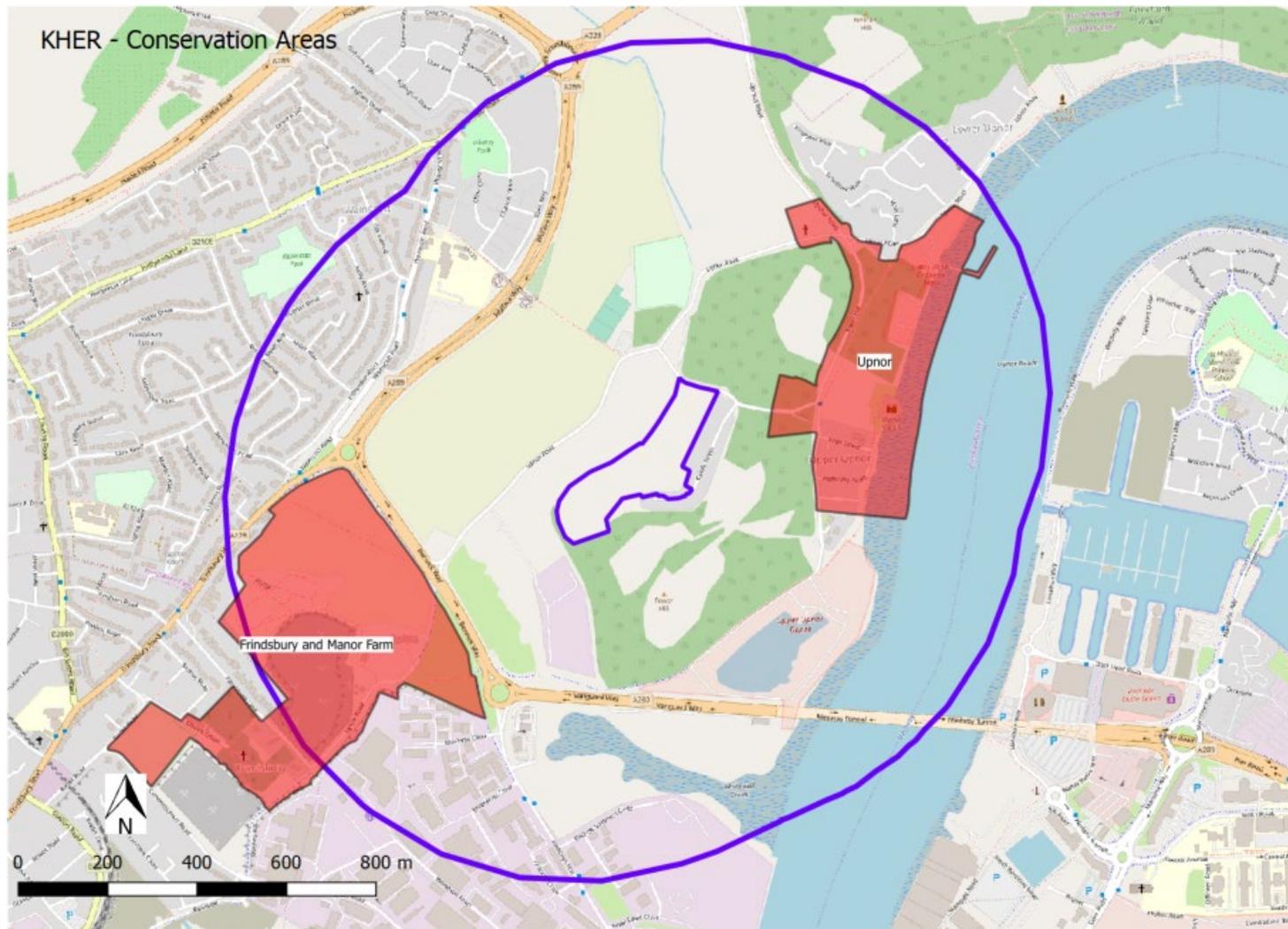


Figure 22: KHER Conservation Areas

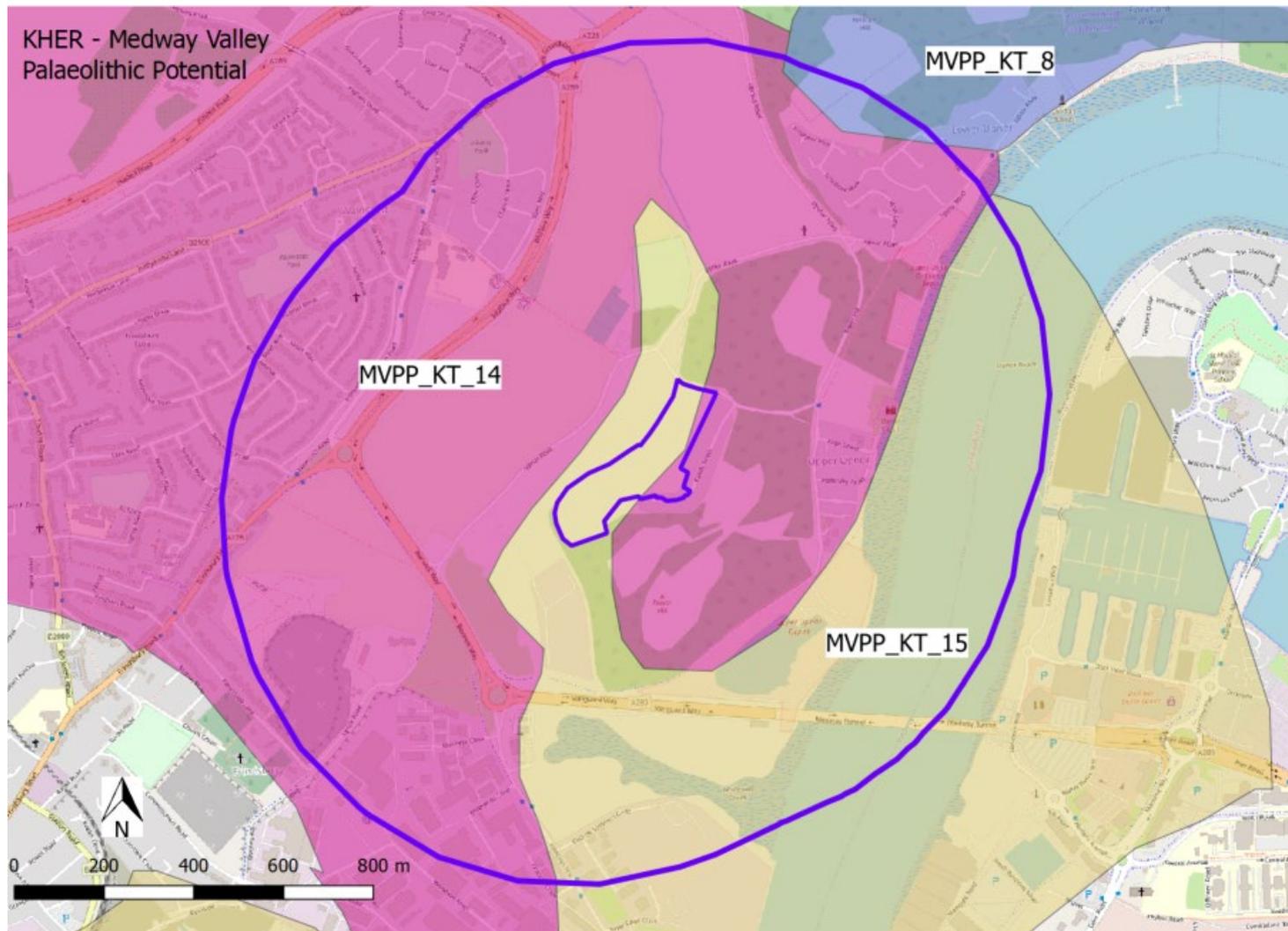


Figure 23: KHER Medway Valley Palaeolithic Areas

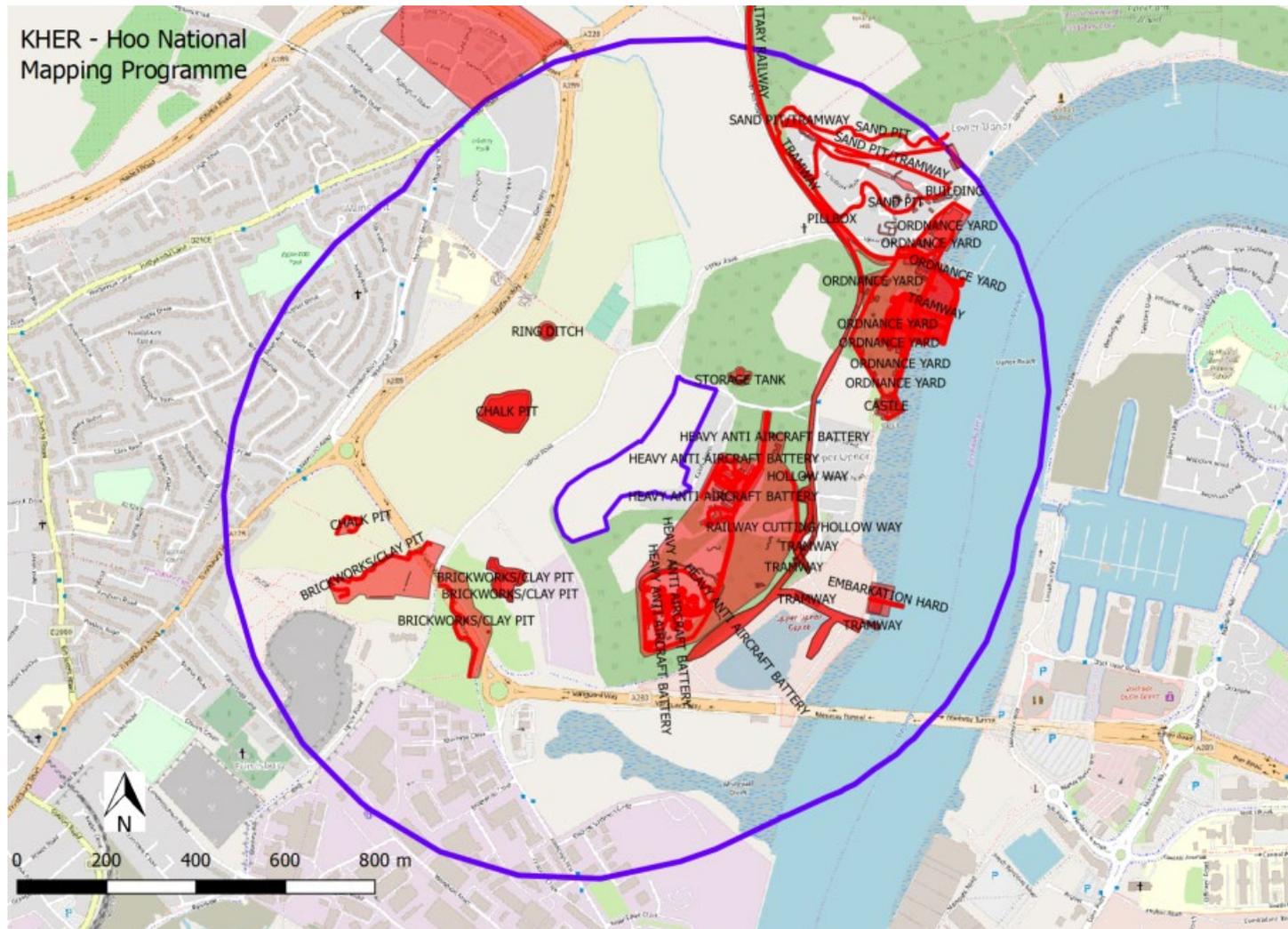


Figure 24: KHER – Hoo National Mapping Programme



Plate 1: 1940s. (Google Earth).



Plate 2: 1960 (Google Earth)



Plate 3: 1990 (Google Earth)



Plate 4: 2003 (Google Earth)



Plate 5: 2007 (Google Earth)



Plate 6: 2018 (Google Earth)



Plate 7: Entrance to the PDA (facing S)



Plate 8: View of the northern boundary with Upnor Road (facing E)



Plate 9: View across the PDA from the north western corner (facing S)



Plate 10: View across the northern part of the PDA towards the eastern boundary (facing SE)



Plate 11: View across the PDA from the north eastern corner (facing SW)



Plate 12: View across the northern half of the PDA from the mid field boundary (facing N)



Plate 13: View across the southern half of the PDA from the mid field boundary (facing SW)



Plate 14: View of the southern boundary of the PDA (facing NW)



Plate 15: View across the PDA from the southern boundary (facing NE)



Plate 16: View of Tower Hill from the southern end of the PDA (facing SE)



Plate 17: View across the PDA from the south western corner (facing ENE)



Plate 18: Plate Locations