



# RASPBERRY SOLAR FARM, IWADE, KENT

Archaeological Desk-Based Assessment

for JBM Solar Projects 27 Ltd

27/04/2022



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April 2022

Ver 1.6

### PROJECT INFORMATION:

HA JOB NO.	P21-362
NGR	588590, 167533
PARISH	Iwade CP and Lower Halstow CP
COUNCIL	Swale Borough Council

### PROJECT TEAM:

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VERSION COMMENTS	Fifth issue to client, incorporating amendments to proposed development layout





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## NON-TECHNICAL SUMMARY

This desk-based assessment presents the results of a desk-based assessment (DBA) commissioned by RSK ADAS on behalf of JBM Solar Projects 27 Ltd. It will support a planning application for a solar farm at land to the west of Iwade, Kent, nearest postcode ME9 8QG (centred on NGR 588590, 167533).

The Proposed Development Area (PDA) is a greenfield site of mixed-use agricultural land consisting of 15 fields; it contains a small, isolated parcel of land to the south of the main area in which the solar farm will be connected to the National Grid.

Within the wider Study Area, there is one Scheduled Monument (NHLE 1129344), one Conservation Area and eight listed buildings of Medieval and Post-Medieval date. Of these, one is Grade I listed while the remaining buildings are Grade II. There are 161 non-designated heritage assets within the Study Area of Mesolithic – Modern date.

There are no designated heritage assets and 29 non-designated heritage assets within the PDA boundary. These consist of Mesolithic and Neolithic findspots and the remains of Bronze Age, Iron Age and Early Romano-British field systems, occupation and cremations in Field 3 of the PDA (excavated prior to extensions of the operational quarry there); the above-ground remains of a 17th century field boundary; the sites of Post-Medieval buildings, wells, ponds and boundary stones; the course of a Post-Medieval trackway; extant Post-Medieval and Modern ponds and boundary stones; one probable geological feature; and one below-ground feature of unknown date. The below-ground remains of Post-Medieval field boundaries have also been identified. The below-ground remains of the Post-Medieval and earlier Lower Halstow and Iwade parish boundary between Lower Halstow and Iwade may be present within the PDA.

Due to previous archaeological investigations, there is negligible potential for remains of any date to be encountered within Field 3 of the PDA. Elsewhere in the PDA, there is assessed to be a low potential for previously unknown heritage assets dating to the Palaeolithic and Neolithic periods to be encountered within the PDA; a low – medium potential for previously unknown heritage assets dating to the Mesolithic period to be encountered within the PDA; a medium – high potential for previously unknown heritage assets of Bronze Age to Romano-British date to be encountered within the PDA; a medium potential for a low potential for previously unknown heritage assets of Early Medieval and Medieval date to be encountered in within the PDA; a medium potential for previously unknown remains of the Post-Medieval period to be encountered within the PDA; and a high potential for previously unknown palaeoenvironmental remains of this period to be encountered within the PDA. Unknown heritage assets within the PDA are likely to take the form of agricultural remains such as field systems, pits and ditches, the remains of occupation, funerary monuments such as cremations, and isolated findspots. They are likely to be of Low (Local) importance and derive their significance from their archaeological and historic interest.

In light of the known and potential archaeological remains at the site and the nature of the proposed development's groundworks the local planning authority may require site investigations such as trial trenching which can be secured as a condition of consent. Such works should be proportionate to the importance of the remains and significance of the impacts, and in accordance with the requirements of the NPPF, and should be conducted by a suitably qualified archaeological organisation in accordance with a written specification (WSI) agreed in advance with the Local Planning Authority.

Assessment of the impact of the proposed development on the setting and significance of non-designated heritage assets has identified adverse impacts on only two non-designated heritage assets. No further detailed setting assessment is considered likely to be necessary in support of an application to develop the PDA.

## ARCHAEOLOGICAL DESK-BASED ASSESSMENT

## 1. INTRODUCTION

### 1.1. PLANNING BACKGROUND

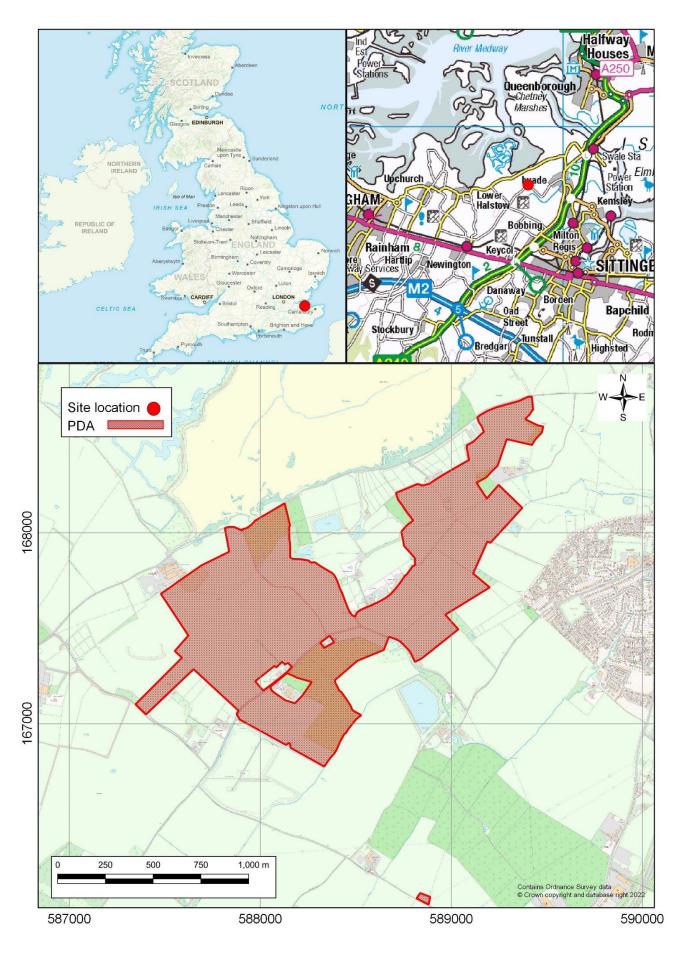
1.1.1. Headland Archaeology were commissioned by RSK ADAS on behalf of JBM Solar Projects 27 Ltd to prepare an archaeological desk-based assessment (DBA) to support a planning application for a solar farm at land to the west of Iwade, Kent, nearest postcode ME9 8QG (centred on 588590, 167533) (Illus. 1). The formal description of the development is as follows:

Installation and operation of a renewable energy generating station comprising ground-mounted photovoltaic solar arrays and battery-based electricity storage containers together with substation, switchgear container, inverter/transformer units, site access, internal access tracks, security measures, access gates, other ancillary infrastructure and landscaping and biodiversity enhancements<sup>1</sup>.

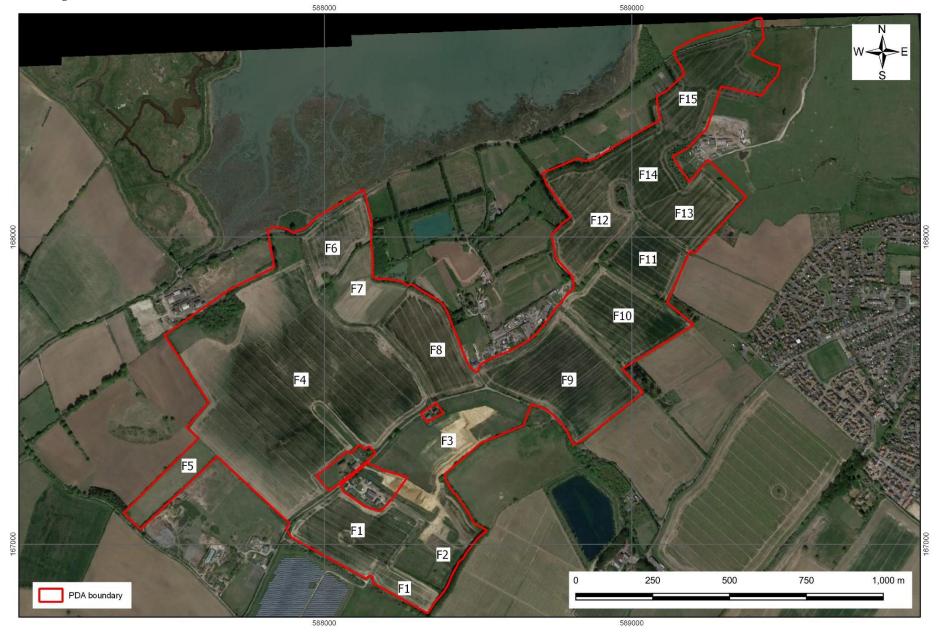
- 1.1.2. This report describes the known and potential archaeological resource within the PDA and assesses their significance, including an assessment of the contribution made by the settings of non-designated heritage assets on their significance, in order to identify potential historic environment planning constraints.
- 1.1.3. Detailed discussion of the built heritage and the settings of designated heritage assets, and an assessment of the impact of the proposed development on these, is dealt with in a separate document which will also form part of the proposed development's planning application<sup>2</sup>.
- 1.1.4. This approach is consistent with the requirements of national and local planning policies on the historic environment in the planning process (see Part 2).
- 1.1.5. The details of the proposed development and the scope of this DBA have been provided to Headland by ADAS.
- 1.1.6. This is version 1.5 of this report.

<sup>&</sup>lt;sup>1</sup> ADAS 2021

<sup>&</sup>lt;sup>2</sup> Anthony Heslehurst pers. comm., 1<sup>st</sup> February 2022



Illus 1. Site Location and Proposed Development Area (PDA)



Illus 2. Modern Aerial Image depicting the PDA. Field numbers are prefixed 'F'

#### 1.2. SITE DESCRIPTION

- 1.2.1. The Proposed Development Area (hereafter 'PDA') is located on land to the west of Iwade, Kent, nearest postcode ME9 8QG. It is centred on NGR 588590, 167533, and extends to NGR 587430, 167104 to the west and NGR 589301, 168115 to its east. It is situated 0.3 km to the west of Iwade town centre and 4.2km to the northwest of Sittingbourne. It falls under the jurisdiction of Swale Borough Council (Illus. 1).
- 1.2.2. The PDA straddles two civil parishes. Its eastern corner lies within Lower Halstow CP whilst the remainder of the PDA lies within Iwade CP.
- 1.2.3. The PDA covers an area of approximately 128 ha and is irregular in shape, being orientated south-west to north-east. A small land parcel of the PDA, 0.23ha in area, lies 975 m to the south of the main PDA area; cabling connecting the solar farm to the National Grid will be laid through this. Due to its small size, this area is not included in any report illustrations apart from Illus. 1, although relevant information pertaining to it is presented in the text.
- 1.2.4. The PDA is accessible through large gates in Fields 4 and 7 9 which front onto School Lane and the trackway which separates Field 4 from Fields 6 8. There is gated access to the small, southerly parcel of land from Stickfast Lane.
- 1.2.5. The PDA's northern boundary is next to Raspberry Hill Lane, Funton Brick Works, the land and buildings of White Horse Stables and Toad Hall Farm, and the properties and grounds of Plantation Lodge, Highview and Summer Cottage. The PDA's eastern boundary is close to Raspberry Hill Caravan Park and agricultural fields. Beyond the PDA's southern boundary are agricultural fields and the remains of earthworks related to the now-demolished Moat Farm. The PDA's western boundary is adjacent to Orchard Solar Farm, agricultural fields, and waste ground. Further to the PDA's north lie Chetney, Barksore Marshes, Funton Creek and Bedlam Bottom Marshes; to its east lies the town of Iwade and Coleshall Farm; further to the south lies Culnells or Cutnails Farm, Cambrey Farm and cottages, Great Norwood and the hamlet of Howt Green; and to the west lie the village of Little Halstow and hamlets of Great and Little Barksore. The small, southerly land parcel of the PDA is bordered by Stickfast Lane to its west and cultivated agricultural land on all other sides.
- 1.2.6. The height above sea level varies across the PDA. The land within its northern boundary adjacent to Raspberry Hill Lane lies at approximately 5 m AOD on its eastern side and 15 m AOD 18 m AOD on its western side. Within the remainder of the PDA's eastern side, the height about sea level ranges from approximately 57 m AOD (at Tiptree Hill) to approximately 25 m AOD by Moat Farm Cottages, with the ground sloping from east to west. Within its western side, the PDA lies at between 28 m AOD and 15 m AOD, with the ground sloping from south-west to north-east.
- 1.2.7. The PDA is, in the main, a greenfield site and under mixed land use. Fields 1, 3, 4, 6, 8 12, 14 and 15 are under arable cultivation; Field 5 and parts of Fields 2 and 4 are wasteland; Field 3 and the northern side of Field 2 are an operational quarry which have recently been the subject of archaeological excavation (Archaeological Event HAEv 1); part of Field 7 and all of Field 13 are pasture; and the remainder of Field 7 is wooded. The small, southerly land parcel is used for hop growing. The fields within the PDA are enclosed by fencing, tree lines and hedges and, in the case of Fields 9, 10, 11 12 and 14, drainage channels.
- 1.2.8. Three footpaths run through the PDA. The first, in Fields 4 and 7, runs roughly east west between Funton Brick Works and the ponds to the north of Swaysdown Game Farm; it continues on the same alignment within Field 12. The second, orientated south-west to north-east, runs between Summer Cottage, to the north of Field 9, to the eastern edge of Field 12. It meets the first footpath at this point, creating a third footpath which runs through Field 13 to meet Raspberry Hill Caravan Park.
- 1.2.9. The second footpath represents the remains of historic trackway HA8 and is entirely covered with trees and vegetation, such that one must walk parallel to it within either of the adjacent fields. The dried-up remains of pond HA3, in which trees and vegetation have taken root, was recorded in Field 6. No other copses, concentrations of shrubs and vegetation, or isolated trees were seen during the site visit. Pond HA15, in Field 11 and pond HA16, in Field 15, were noted.
- 1.2.10. Although the PDA was extremely boggy at the time of site visit due to recent rain, several particularly waterlogged areas were identified in Fields 1, 8, 11 and 15. The waterlogged area in Field 1 may relate to historic pond HA24. HA6, two ponds lying between Fields 12 and 14, were also identified during the site visit.
- 1.2.11. The above-ground earthworks of a former field boundary between Fields 7 and 8, HA1, were recorded during the site visit. Another possible feature, HA2, was recorded in Field 4. This was a very large and smoothly-sided circular depression which may be of geological rather than archaeological origin.

- 1.2.12. A dump of Post-Medieval and/or Modern ceramic building material (CBM) sat on a small area of hardstanding was recorded in Field 7. It is probable that this relates to the now-demolished Funton Farm (MKE85220). Frequent fragments of Post-Medieval and/or Modern CBM were also noted along the northern side of Field 6, possibly relating to the now-demolished Funton House (HA5). There are no modern structures on the site.
- 1.2.13. Pylons traverse Field 4 and the small, southerly land parcel of the PDA and overhead cables run above Fields 9 and 10, as well as the small, southerly land parcel of the PDA. These may cause constraints to any further archaeological mitigation. There are no above-ground indications of underground services within the PDA.
- 1.2.14. A selection of images taken during the site visit are shown in Illus. 3 40. Their locations are shown on Illus. 41.



Illus 3. Field 1 from its southern side, looking south-west to north-east, showing what may be pond HA24 in the foreground of the right of the frame



Illus 4. Field 1 from its north-west corner, looking north-east to north-west



Illus 5. Southern arm of Field 1, looking north-west.



Illus 6. Southern half of Field 2, looking north-east to south-east.



Illus 7. Northern part of Field 2, showing ground reduction and spoil bunding following Archaeological Event HAEv 1, looking north-east to south-east.



Illus 8. The remains of topsoil stripping associated with Archaeological Event HAEv 1 (Phase 1 and 1a) within the western side of Field 3, looking north-west.



Illus 9. View over Field 3 from School Lane, looking south-west. The grassed spoil bunds in the background to the left of the frame are likely to related to Archaeological Event HAEv 1, which took place between 2016 and 2019



Illus 10. View over Field 4 from School Lane, looking south-west to north-east. Tiptree Farm can be seen to the right of the frame



Illus 11. View over Field 4 from its western side, looking north-east to south-east



Illus 12. Northern half of Field 4, looking north-west to north-east



Illus 13. Depression HA2 in Field 4 (indicated by orange arrow), looking north-west



Illus 14. Depression HA2 in Field 4 (indicated by orange arrow), looking north-east



Illus 15. North-western triangular area of Field 4, looking north-east to south-east



Illus 16. Field 5 from its north-western corner, looking east to south-east



Illus 17. Field 6 from its north-western corner, looking north-east to south. HA3 can be seen in the background to the far right of the frame



Illus 18. Field 6 from its south-west corner, looking north to east. The solitary oak marks the location of pond HA3



Illus 19. HA3, looking north-east to east



Illus 20. Area of hardstanding rubble in Field 7 which may relate to the now-demolished Funton Farm (MKE85220)



Illus 21. Field 7 from its western side, looking north-east to south-east



Illus 22. HA1, a relict field boundary, looking north-east



Illus 23. Field 8 from its western side, looking north-east to south-east



Illus 24. Field 8 from its eastern side, looking south-west to north-west



Illus 25. Field 9 from its north-western corner, looking east to south-east



Illus 26. Field 9 from its southern side, looking north-east to south-east



Illus 27. Field 10 from its north-western corner, looking east to south-east



Illus 28. Field 10 from its south-eastern corner, looking north-west to north



Illus 29. Field 11 from its north-western corner, looking north-east to south-east



Illus 30. Field 11 from its south-eastern corner, looking west to north



Illus 31. View over Field 12 from its western edge, looking east. The line of trees marking HA8 can be seen in the centre to right of the frame



Illus 32. Field 12 from its northern side, looking east to south-east. The line of trees marking HA8 can be seen to right of the frame



Illus 33. HA6, two ponds, looking north-east



Illus 34. HA8, a former trackway, now footpath, looking east



Illus 35. Field 13 from its south-eastern corner, looking west to north



Illus 36. Field 14 from its western side, looking north-east to south-east



Illus 37. Field 15 from its southern side, looking south-west to north-east



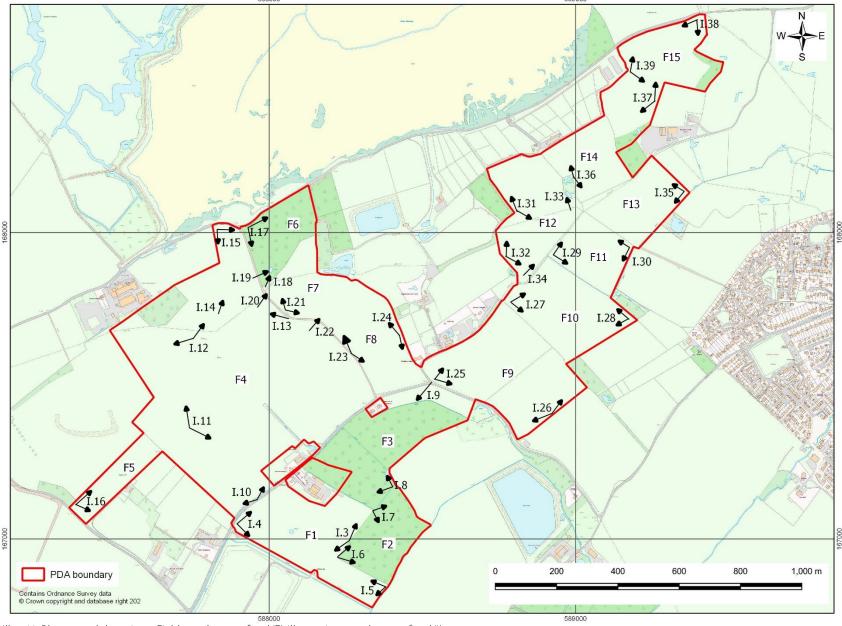
Illus 38. Far northern part of Field 15, looking south to south-west



Illus 39. View over Field 15 from its north-western corner, looking north-east to south-east



Illus 40. The PDA's southerly parcel of land, looking east from Stickfast Lane



Illus 41. Photograph locations. Field numbers prefixed 'F', illustration numbers prefixed 'I'

#### 1.3. GEOLOGY AND GEOMORPHOLOGY

- 1.3.1. The PDA is located within the North Kent Coastal Plain and the eastern extent of the Thames Basin. To its north lies the Swale river, an ancient river valley which was later subsumed into the Medway river. The surface deposits of the Swale are variable in depth and consist of alluvium, gravel, shingle, brickearth and landslip London Clay. These surface deposits overlie, on average, 26 m of London Clay, which in turn overlies Palaeocene Oldhaven sand beds, Woolwich shell beds, and Thanet sands. The base geology of the Swale is chalk and flints<sup>3</sup>.
- 1.3.2. The PDA sits within the far north-western corner of the study area of the Stour Basin project. Although no transects were taken within 2 0km of the PDA during the project, its results help to build a picture of the geology of the wider region. It notes that the area of Swale District between Sittingbourne and Faversham, in which the PDA is located, contains one of the most significant outcrops of head deposits (also known as brickearth) within the project's study area. Brickearth deposits are known for producing Palaeolithic artefacts. The Swale region is particularly important in this respect as an unusually large number of artefacts dating to between 80,000BCE and 30,000BCE are recorded in the area from these brickearth deposits<sup>4</sup>.
- 1.3.3. The underlying solid geology within the PDA itself is London Clay Formation (Illus. 42 and Illus. 43)). This is defined by the BGS as:

Sedimentary Bedrock formed approximately 48 to 56 million years ago in the Palaeogene Period. Local environment previously dominated by deep seas. Bioturbated or poorly laminated, blue-grey or grey-brown, slightly calcareous, silty to very silty clay, clayey silt and sometimes silt, with some layers of sandy clay. It commonly contains thin courses of carbonate concretions ('cementstone nodules') and disseminated pyrite. It also includes a few thin beds of shells and fine sand partings or pockets of sand, which commonly increase towards the base and towards the top of the formation. At the base, and at some other levels, thin beds of black rounded flint gravel occurs in places. Glauconite is present in some of the sands and in some clay beds, and white mica occurs at some levels<sup>5</sup>.

1.3.4. A band of superficial brickearth deposits are recorded by the BGS as lying within the southern edge of the PDA and abutting the PDA to its north (Illus. 42 and Illus. 43). These deposits are described by the BGS as

Clay And Silt. Superficial Deposits formed up to 3 million years ago in the Quaternary Period. Local environment previously dominated by subaerial slopes (U). Head is poorly sorted and poorly stratified, angular rock debris and/or clayey hillwash and soil creep, mantling a hillslope and deposited by solifluction and gelifluction processes. Solifluction is the slow viscous downslope flow of waterlogged soil and other unsorted and unsaturated superficial deposits. The term gelifluction is restricted to the slow flow of fluidized superficial deposits during the thawing of seasonally frozen ground. The flow is initiated by meltwater from thawing ice lenses. Polymict deposit: comprises gravel, sand and clay depending on upslope source and distance from source. Locally with lenses of silt, clay or peat and organic material.

Historic England notes that solifluction deposits are a type of colluvium and, if found within areas of chalk or limestone, they often preserve the remains of land snails but rarely pollen<sup>7</sup>.

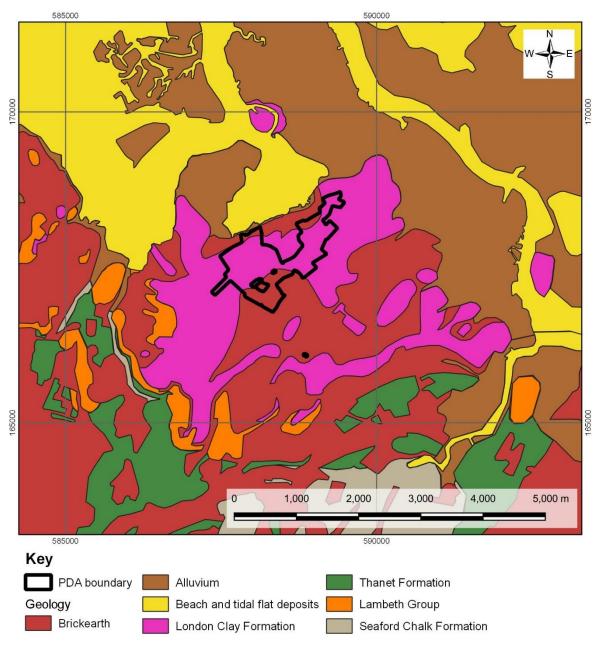
<sup>&</sup>lt;sup>3</sup> Allen 2012, 171 and 183

<sup>&</sup>lt;sup>4</sup> Kent County Council 2015, 6 and 7

<sup>&</sup>lt;sup>5</sup> https://webapps.bgs.ac.uk/lexicon/lexicon.cfm?pub=LC, accessed 11th January 2022

<sup>&</sup>lt;sup>6</sup> https://webapps.bgs.ac.uk/lexicon/lexicon.cfm?pub=HEAD, accessed 11<sup>th</sup> January 2022

<sup>&</sup>lt;sup>7</sup> Historic England 2015, 4

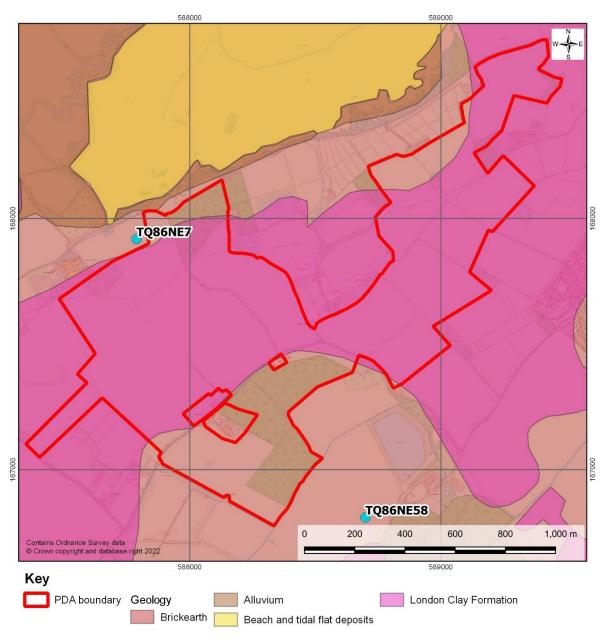


Illus 42. Underlying geology within a 3 km radius of the PDA

- 1.3.5. No borehole surveys have been carried out within the PDA. However, the BGS records the results of two borehole surveys to the north and south of the PDA.
- 1.3.6. To the north of the PDA and the west of Funton Brick Works, approximately 38 m to the north of the PDA's boundary, a borehole survey was undertaken in 1957 (BGS ID 641163 and BGS Reference TQ86NE78; Illus. 43). This recorded Drift and London Clay Formation deposits at depths of 0 m c. 21 m, underlain by Woolwich and Thanet bed deposits of c. 40 m thickness, which in turn overlay chalk and flints deposits.
- 1.3.7. To the south of the PDA, approximately 290 m to the south of the PDA's boundary, a borehole survey was undertaken in 2017 (BGS ID 20671084 and BGS Reference TQ86NE589; Illus. 43). This survey recorded 'brown subsoil' deposits at depths of 0 m 1 m and 'light brown yellow clay' deposits at depths of 1 m to 3 m. These deposits overlay alternating bands of grey clays and dark grey sands of 56m thickness. Chalk and flints deposits were encountered at depths of 61 m and below.

<sup>&</sup>lt;sup>8</sup> http://scans.bgs.ac.uk/sobi\_scans/boreholes/641163/images/12571805.html, accessed 11th January 2022

<sup>&</sup>lt;sup>9</sup> http://scans.bgs.ac.uk/sobi\_scans/boreholes/20671084/images/20671080.html, accessed 11th January 2022



Illus 43. Location borehole surveys TQ86NE7 and TQ86NE58

# 2. LEGISLATION, POLICY AND GUIDANCE

## 2.1. STATUTORY PROTECTION

2.1.1. The relevant heritage legislation in the context of the present site is described in the table below.

Table 1. Historic Environment Statutory Legislation

Legislation	Key Issues
Ancient Monuments and Archaeological Areas Act 1979	It is a criminal offence to carry out any works on or near to a Scheduled Monument without Scheduled Monument Consent. Development must preserve in-situ protected archaeological remains and landscapes of acknowledged significance and protect their settings.
Planning (Listed Buildings and Conservation Areas) Act (1990)	The 1990 Act is amended by the Enterprise and Regulatory Reform Act 2013 to introduce additional controls for works to listed buildings.  Section 1 of the Act requires the Secretary of State to compile and maintain lists of buildings of special architectural or historic interest. The principal statutory duty under the Act is to preserve the special character of these heritage assets, including their setting. Buildings on the list are assessed and graded against the criteria of architectural and historic interest. Buildings listed at Grade I are defined as those considered to be of exceptional interest. Grade II* listed buildings are particularly important buildings of more than special interest, while Grade II listed buildings are of special interest. This may include the extent to which the exterior of a building contributes to the interest of a group of buildings, i.e. 'group value'.
Treasure Act (1996)	The 1996 Act defines 'Treasure' as any object that is at least 10% gold or silver, associated with coins or groups of coins which are over 300 years old, objects formerly classed as 'treasure trove' (i.e. deliberately deposited items with a high content of gold or silver) and any objects found in association with the above. Any find of 'Treasure' must be reported to the local Coroner.
Burial Act (1857)	Under Section 25 of the 1857 Act, it is generally a criminal offence to remove human remains from any place of burial without an appropriate licence issued by the Ministry of Justice (MoJ), although recent legislative changes indicate that some cases are exempt from this requirement.

Legislation	Key Issues
Historic Buildings and Ancient Monuments Act (1953)	The 1983 Act created the Historic Buildings and Monuments Commission (HBMC) – now Historic England, a non-departmental public body, given the broad remit of managing the historic built environment of England. The Historic Buildings and Ancient Monuments Act 1953 authorises Historic England to compile a register of "gardens and other land" situated in England that appear to be of special historic interest.  Registered Parks and Gardens  The Register was established in 1984 and there are currently over 1,600 sites included.
Heritage Act (1980, amended 1983 & 1997)	Sites are graded I, II*, or II along the same lines as listed buildings. A registered park or garden is not protected by a separate consent regime, but applications for planning permission will give great weight to their conservation. The NPPF defines them as designated heritage assets and as such their conservation should be an objective of all sustainable development. Substantial harm to or total loss of a Grade II registered park or garden should be exceptional and for a Grade II* or I registered park or garden such loss or harm should be wholly exceptional.
	The Register of Historic Battlefields  Historic England maintains a Register of Historic Battlefields. Battlefields are not graded.  Like registered parks and gardens, registered battlefields are not subject to a separate consent regime, but they are considered designated heritage assets under the NPPF and therefore, as with parks and gardens, great weight should be given to their conservation and substantial harm or total loss of a registered battlefield should be wholly exceptional.

### 2.2. NATIONAL PLANNING POLICY FRAMEWORK

- 2.2.1. The National Planning Policy Framework (NPPF, 2021<sup>11</sup>) confirms that the historic environment, including archaeological remains, constitutes a material consideration in planning decisions, requiring applicants to describe the significance of heritage assets potentially affected by the development, including any contribution made by their setting.
- 2.2.2. Heritage and conservation forms one of the core planning principles of NPPF:

(189) "[Planning should conserve heritage assets] in a manner appropriate to their significance, so that they can be enjoyed for their contribution to the quality of life for this and future generations."

2.2.3. This report contributes to meeting the following Policies on the historic environment contained in the document (paragraph numbers in bold text)<sup>12</sup>.

(194) "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. The level of detail should be proportionate to the assets' importance and no more than is sufficient to understand the potential impact of the proposal on their significance. As a minimum the relevant historic environment record should have been consulted and the heritage assets assessed using appropriate expertise where necessary. Where a site on which development is proposed includes, or has the potential to include, heritage assets with archaeological interest, local planning authorities should require developers to submit an appropriate desk-based assessment and, where necessary, a field evaluation."

(**200**) Any harm to, or loss of, the significance of a designated heritage asset (from its alteration or destruction, or from development within its setting), should require clear and convincing justification. Substantial harm to or loss of:

a) grade II listed buildings, or grade II registered parks or gardens, should be exceptional;

<sup>11</sup> https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment data/file/1004408/NPPF JULY 2021.pdf
12 Government guidance on the application of the policies contained within the NPPF is available at https://www.gov.uk/government/publications/national-planning-policy-framework--2

b) assets of the highest significance, notably scheduled monuments, protected wreck sites, registered battlefields, grade I and II\* listed buildings, grade I and II\* registered parks and gardens, and World Heritage Sites, should be wholly exceptional.

(footnote 68) [Non-designated heritage assets of archaeological interest, which are demonstrably of equivalent significance to scheduled monuments, should be considered subject to the policies for designated heritage assets.]

(202) Where a development proposal will lead to less than substantial harm to the significance of a designated heritage asset, this harm should be weighed against the public benefits of the proposal including, where appropriate, securing its optimum viable use.

(203) The effect of an application on the significance of a non-designated heritage asset should be taken into account in determining the application. In weighing applications that directly or indirectly affect non-designated heritage assets, a balanced judgement will be required having regard to the scale of any harm or loss and the significance of the heritage asset.

#### 2.3. LOCAL PLANNING POLICY

2.3.1. The Swale Borough Council Adopted Local Plan: Bearing Fruits 2031 (adopted July 2017)<sup>13</sup> outlines the Council's approach to the historic environment in Policy CP8: Conserving and enhancing the historic environment, which states:

To support the Borough's heritage assets, the Council will prepare a Heritage Strategy. Development will sustain and enhance the significance of designated and non-designated heritage assets to sustain the historic environment whilst creating for all areas a sense of place and special identity. Development proposals will, as appropriate:

- 1. Accord with national planning policy in respect of heritage matters, together with any heritage strategy adopted by the Council;
- 2. Sustain and enhance the significance of Swale's designated and non-designated heritage assets and their settings in a manner appropriate to their significance and, where appropriate, in accordance with Policies DM 32-DM 36;
- 3. Respond to the integrity, form and character of settlements and historic landscapes;
- 4. Bring heritage assets into sensitive and sustainable use within allocations, neighbourhood plans, regeneration areas and town centres, especially for assets identified as being at risk on national or local registers;
- 5. Respond positively to the conservation area appraisals and management strategies prepared by the Council;
- 6. Respect the integrity of heritage assets, whilst meeting the challenges of a low carbon future; and
- 7. Promote the enjoyment of heritage assets through education, accessibility, interpretation and improved access.
- 2.3.2. Swale Borough Council's Heritage Strategy and Action Plan, A Heritage Strategy for Swale 2020 2032<sup>14</sup>, was adopted in March 2020.

#### 2.4. GUIDANCE

- 2.4.1. This DBA has been prepared with reference to the ClfA's *Standard and Guidance for Historic Environment Desk-Based Assessment* (2014, revised 2017 and 2020<sup>15</sup>) and *Code of Conduct* (2014, revised 2019<sup>16</sup>), in addition to *The Setting of Heritage Assets* (Historic England's Historic Environment Good Practice Advice in Planning GPA3, 2017<sup>17</sup>).
- 2.4.2. Statements of Heritage Significance: Analysing Significance in Heritage Assets (Historic England Advice Note 12, 2019<sup>18</sup>) contains guidance on the assessment of heritage significance through consideration of the component heritage values of an asset, and further guidance on the assessment of significance as part of the

<sup>&</sup>lt;sup>13</sup> Swale\_Borough Council 2017

<sup>&</sup>lt;sup>14</sup> Swale Borough Council 2020

<sup>15</sup> https://www.archaeologists.net/sites/default/files/ClfAS%26GDBA 4.pdf

<sup>16</sup> https://www.archaeologists.net/sites/default/files/Code%20of%20conduct%20revOct2019 0.pdf

<sup>17</sup> https://historicengland.org.uk/images-books/publications/gpa3-setting-of-heritage-assets/heag180-gpa3-setting-heritage-assets/18 https://historicengland.org.uk/images-books/publications/statements-heritage-significance-advice-note-12/heag279-statements-heritage-significance/

- planning application process is contained in *Managing Significance in Decision-Taking in the Historic Environment* (Historic England's Historic Environment Good Practice Advice in Planning GPA2, 2015<sup>19</sup>).
- 2.4.3. This DBA has also been prepared with reference to IEMA, IHBC and ClfA's July 2021 publication *Principles of Cultural Heritage Impact Assessment in the UK*<sup>20</sup>. This document presents the principles of and suggests good practice for assessment of the impact of a development proposal on cultural heritage assets.
- 2.4.4. Reference has also been made to the guidance contained in Historic England's 2015 document *Geoarchaeology: Using Earth Sciences to Understand the Archaeological Record*<sup>21</sup>. This document presents the principles of and suggests good practice for assessment and interpretation of geoarchaeological processes.
- 2.4.5. Guidance provided by Kent County Council for undertaking desk-based assessments has also been adhered to<sup>22</sup>.

## 2.5. PROFESSIONAL STANDARDS AND ACKNOWLEDGEMENTS

- 2.5.1. Headland Archaeology (UK) is a Registered Organisation with the Chartered Institute for Archaeologists (CIfA), an audited status which confirms that all work is carried out in accordance with the highest standards of the profession.
- 2.5.2. Headland Archaeology (UK), as part of the RSK Group, is recognised by the Institute of Historic Building Conservation (IHBC) under their 'Historic Environment Service Provider Recognition' scheme. This quality assurance standard acknowledges that RSK works to the conservation standards of the IHBC, the UK's lead body for built and historic environment practitioners and specialists.
- 2.5.3. Headland Archaeology (UK) operates a quality management system to help ensure all projects are managed in a professional and transparent manner, which enables it to qualify for ISO 9001.
- 2.5.4. Ordnance Survey data is produced under © Crown copyright and database rights Licence 100065113.
- 2.5.5. LiDAR data is reproduced © Environment Agency copyright and/or database rights 2022. All rights reserved.

<sup>19</sup> https://historicengland.org.uk/images-books/publications/gpa2-managing-significance-in-decision-taking/gpa2/20 https://www.archaeologists.net/sites/default/files/i30361 iema principlesofchia v8.pdf

<sup>&</sup>lt;sup>21</sup>https://historicengland.org.uk/images-books/publications/geoarchaeology-earth-sciences-to-understand-archaeological-record/heag067-geoarchaeology/

<sup>&</sup>lt;sup>22</sup> KCC 2015; KCC 2018

# 3. AIMS AND OBJECTIVES

- 3.1.1. The aim of this DBA is to provide sufficient baseline data and assessment of the archaeological potential of the PDA to inform a planning application for redevelopment of the PDA.
- 3.1.2. The DBA aims to identify all known heritage assets potentially affected by the proposed development and the potential for currently unknown heritage assets, in addition to assessing their significance and importance.
- 3.1.3. The contribution of the settings of the built heritage and designated heritage assets within the Study Area and the potential for the proposed development to impact upon them are dealt with in separate documents to be submitted with the planning application<sup>23</sup>. However, the contribution of the settings of non-designated heritage assets within the Study Area and the potential for the proposed development to impact upon them are discussed in this DBA.
- 3.1.4. The CIfA's Standard and Guidance for Historic Environment Desk-Based Assessment (2017<sup>24</sup>) defines a DBA as '...a programme of study of the historic environment within a specified area or site on land, the inter-tidal zone or underwater that addresses agreed research and/or conservation objectives. It consists of an analysis of existing written, graphic, photographic and electronic information in order to identify the likely heritage assets, their interests and significance and the character of the Study Area, including appropriate consideration of the settings of heritage assets and, in England, the nature, extent and quality of the known or potential archaeological, historic, architectural and artistic interest. Significance is to be judged in a local, regional, national or international context as appropriate.'
- 3.1.5. GPA2<sup>25</sup>, para 12.3 requires that a DBA will determine, as far as is reasonably possible from existing records, the nature, extent and significance of the historic environment within a specified area.
- 3.1.6. Principles of Cultural Heritage Impact Assessment in the UK notes that:
  - (1.5) The need for [Cultural Heritage Impact Assessment] is triggered whenever somebody proposes to do something which could result in change to a cultural heritage asset or assets. This might be a plan, a policy or a project.
  - (1.6) This change could be at any scale, from the smallest intervention into the fabric of a historic building, to a policy for creating new towns. This need might occur under any of the planning, consenting or legislative regimes in the UK, or in an international context.
- 3.1.7. In addition, the objectives stated in Kent County Council's document *Specification for a Standard Desk-Based Assessment and Walk-over Survey in Areas of Known Palaeolithic Potential* will be followed, namely to:
  - i) establish the nature and distribution of sub-surface natural deposits at the site, both Quaternary ("Drift") and pre-Quaternary ("Solid")
  - ii) assess the archaeological potential and importance of the study area, with reference to relevant national and regional Research Frameworks (in particular the South-East Research Framework Resource Assessment & Research Agenda documents (held on-line at www.kent.gov.uk/serf), and to social value
  - iii) produce an overview, including summary plans, of previous archaeological work and other intrusive investigations (e.g. geotechnical boreholes, window samples and/or test pits) within the study area
  - iv) identify areas where sub-surface Quaternary deposits and archaeological remains of all/any periods may be present
  - v) identify any other potentially significant parts of the heritage resource present, such as built heritage assets, industrial remains, military structures, socially important structures, features, spaces, places, areas or landscapes
  - vi) identify and interpret, within the confines of the desk-based assessment and walk-over survey, any topographic features of potential archaeological relevance and visible exposures of sub-surface deposits within the study area
  - vi) produce a preliminary characterisation for the site, dividing it into different Historic Environment Areas of varying sub-surface geology and archaeological potential<sup>26</sup>.
- 3.1.8. The objectives are therefore to:
  - Collate all available written, graphic, photographic and electronic information relevant to the PDA;

<sup>&</sup>lt;sup>23</sup> Anthony Heslehurst pers. Com.., 1st February 2022

<sup>24</sup> https://www.archaeologists.net/sites/default/files/CIfAS%26GDBA 4.pdf

<sup>25</sup> https://historicengland.org.uk/images-books/publications/gpa2-managing-significance-in-decision-taking/gpa2/

<sup>&</sup>lt;sup>26</sup> KCC 2018

- Describe the nature, extent and significance and importance of the historic environment within the area potentially affected by the development, identifying any uncertainties in existing knowledge;
- Determine the potential for previously unknown archaeological remains within the PDA and their likely importance and significance;
- Identify non-designated heritage assets beyond the PDA that may be affected by development within their setting and to describe the contribution to their significance made by their setting.

## 4. METHODOLOGY

### 4.1. TERMINOLOGY – 'SIGNIFICANCE' AND 'IMPORTANCE'

- 4.1.1. Heritage assets are assessed in this report in terms of their significance and importance, following the requirement in NPPF paragraph 194 and HEAN12, and taking account of Historic England's guidance in *Managing Significance in Decision-Taking in the Historic Environment* (GPA2<sup>27</sup>).
- 4.1.2. The significance of a heritage asset will derive from factors including fabric, setting, rarity, completeness, historic and cultural associations, community, research and place-making potential. Significance is assessed in relation to the criteria in HEAN12<sup>28</sup> (i.e. in *archaeological, architectural, artistic,* or *historic* terms), which are intended primarily to inform decisions regarding heritage designations, but may also be applied more generally in identifying the 'special characteristics' of a heritage asset, which contribute to its significance and should be protected, conserved and enhanced according to the NPPF.
- 4.1.3. This use of the word 'significance', referring to the range of values or interest attached to an asset, should not be confused with the unrelated usage in EIA where the 'significance of an effect' reflects the weight that should be attached to it in a planning decision.
- 4.1.4. Relative importance of each identified heritage asset potentially affected by the proposed development has been determined to provide a framework for comparison between different heritage assets and to inform subsequent stages of archaeological assessment and the development of any appropriate mitigation which may be required (See Table 2 below).
- 4.1.5. For further terminology and definitions, see the Glossary.

### 4.2. IDENTIFICATION OF HERITAGE ASSETS THAT MAY BE AFFECTED

## STUDY AREA

4.2.1. The Study Area for this assessment comprises a 1km buffer surrounding the PDA, within which the archaeological and historical development of the site and surrounding area has been considered.

#### **DATA SOURCES**

- 4.2.2. The assessment has been based on a study of all readily available documentary sources, following the CIfA Standards and Guidance. The following sources of information were referred to:
  - Designation data from the National Heritage List for England, downloaded from the Historic England website<sup>29</sup> on 6<sup>th</sup> January 2022 and descriptions of designated heritage assets viewed on the Historic England website;
  - Archaeological and architectural records from the National Record of the Historic Environment, viewed through the Heritage Gateway website<sup>30</sup>;
  - Aerial photographs available to view on Google Earth and Historic England's Aerial Archaeology Mapping Explorer;
  - Archaeological records and aerial photographs held by the Kent County Council HER (data received 20<sup>th</sup> December 2021<sup>31</sup>);
  - Historic Landscape Characterisation (received from Kent CC HER);
  - Historic maps and plans (estate, tithe and OS) held in the Kent County Council archives;

<sup>27</sup> https://historicengland.org.uk/images-books/publications/gpa2-managing-significance-in-decision-taking/gpa2/

<sup>28</sup> https://historicengland.org.uk/images-books/publications/statements-heritage-significance-advice-note-12/heag279-statements-heritage-significance/

<sup>29</sup> https://historicengland.org.uk/listing/the-list/data-downloads/

<sup>30</sup> www.heritagegateway.org.uk

<sup>&</sup>lt;sup>31</sup> The Principal Archaeological Officer for KCC was consulted during the writing of v1.1 of the DBA and confirmed that an updated HER search was not necessary (Simon Mason pers. comm. 1st November 2021)

- Environment Agency LiDAR data<sup>32</sup>;
- Geological data available online from the British Geological Survey, including borehole survey reports<sup>33</sup>;
- The South-East Research Framework Resource Assessment & Research Agenda;
- Kent Historic Landscape Characterisation;
- Geoarchaeological reports such as the Stour Basin Project;
- Relevant Conservation Area Appraisals;
- Portable Antiquities Scheme data;
- Relevant internet sources including the Archaeology Data Service, British History Online and Archaeologia Cantiana;
- Readily available published sources (including place-name studies) and unpublished archaeological reports.
- 4.2.3. Heritage assets within the Proposed Development Area are shown in Illus 44 50, with detailed descriptions compiled in a gazetteer, which can be found in the Appendix.
- 4.2.4. Designated heritage assets are referenced in this report by National Heritage List for England list entry number. Undesignated assets are referenced by HER Monument ID. A single asset number can refer to a group of related features, which may be recorded separately in the HER and other data sources.
- 4.2.5. Newly-identified known or possible heritage assets and geological and topographical features identified during the site visit, on historic mapping and on aerial photographic and LiDAR imagery are referenced throughout this report by the prefix HA, 'Headland Archaeology'.

## SITE VISIT

- 4.2.6. A site visit was undertaken on 13<sup>th</sup> January 2022 during which all parts of the PDA were accessed<sup>34</sup>. Notes were made regarding site characteristics, any visible archaeology and geographical/geological features which may have a bearing on previous land use and archaeological survival, as well as those which may constrain subsequent archaeological investigation.
- 4.2.7. Records were made regarding extant archaeological features, such as earthworks or structural remains, any negative features, local topography and aspect, exposed geology, soils, watercourses, health and safety considerations, surface finds, and any other relevant information.

#### HISTORIC MAP REGRESSION

- 4.2.8. The historic Ordnance Survey (OS) mapping sequence corresponding with the PDA was consulted to collect information on former land use and development throughout the later historic periods.
- 4.2.9. Parish tithe mapping and associated apportionment documents as well as estate mapping were consulted to identify annotated structures and record any field name evidence indicative of archaeological potential.

## LIDAR

- 4.2.10. Light Detection and Ranging (LiDAR) is an airborne mapping technique, which uses a laser to measure the distance between the aircraft and the ground. Up to 500,000 measurements per second are made of the ground, allowing highly detailed terrain models to be generated in which it is possible to identify shallow or otherwise imperceptible topographic features.
- 4.2.11. A Composite Digital Terrain Model (DTM) has been produced by removing objects from the Digital Surface Model (DSM) which is available at 1m resolution for the Site. Composite data breaks down by spatial resolution i.e. 2m, 1m, 50cm and 25cm and is made up from a combination of the full EA dataset which has been merged and re-sampled to give the best possible coverage. This means that a 1m resolution tile may contain

<sup>32</sup> https://environment.data.gov.uk/

<sup>33</sup> http://mapapps.bgs.ac.uk/geologyofbritain/home.html

<sup>&</sup>lt;sup>34</sup> During the time of writing, the programme of trial trenching was ongoing and therefore it was thought that a second site visit would be uninformative

- decimated 50cm data as well as native captured 1m data. It is not possible using only the composite to know which part of a given tile was surveyed at which resolution.
- 4.2.12. Analysis was undertaken by a professional archaeologist using QGIS imaging and geo-referencing/mapping software.

## 4.3. LIMITATIONS OF BASELINE DATA

#### DATA SOURCES

- 4.3.1. Information held by public data sources is generally considered to be reliable; however, the following general points are noted:
  - Documentary sources are rare before the medieval period;
  - Whilst it is accepted that historic documents may be biased depending on the author, with content seen through the lens of context, wherever such documentary sources are used in assessing archaeological potential professional judgment is used in their interpretation in that the functionality of the document is considered;
  - HER records can be limited because opportunities for research, fieldwork and discovery depend on
    the situation of commercial development and occasional research projects, rather than the result of
    a more structured research framework. A lack of data within the HER records does not necessarily
    equal an absence of archaeology;
  - Where archaeological sites have been identified solely from aerial imagery without confirmation from archaeological excavation or supporting evidence in the form of find-spots for example, it is possible the interpretation may be revised in the light of further investigation.
  - The significance of sites can be difficult to identify from HER records, depending on the accuracy and reliability of the original source; and
  - There can often be a lack of dating evidence for archaeological sites.

## SITE VISIT

4.3.2. Any archaeological site visit has inherent limitations, primarily because archaeological remains below ground level may have no surface indicators.

### 4.4. ASSESSMENT OF IMPORTANCE, SIGNIFICANCE AND POTENTIAL

#### Assessment of importance

- 4.4.1. The importance of a heritage asset is the overall value assigned to it reflecting its statutory designation or, in the case of undesignated assets, the professional judgement of the assessor (Table 2). Historic England guidance also refers to an asset's 'level of significance' (GPA2<sup>35</sup>, paragraph 10), which in this usage has the same meaning as importance.
- 4.4.2. Any feature which does not merit consideration in planning decisions due to its significance may be said to have negligible importance. It is the role of the professional judgements made by the assessor to identify any historic remains within the PDA that are considered to be of negligible importance, to justify no further works.

Table 2. Criteria for Assessing the Importance of Heritage Assets

Importance of the asset	Criteria
Very High (International)	World Heritage Sites and other assets of equal international importance, that contribute to international research objectives

<sup>35</sup> https://historicengland.org.uk/images-books/publications/gpa2-managing-significance-in-decision-taking/gpa2/

Importance of the asset	Criteria	
High (National)	Grade I and II* Registered Parks and Gardens, Scheduled Monument Protected Wreck Sites, Registered Battlefields, Grade I and II* Listed Building and undesignated heritage assets of equivalent importance that contribute t national research objectives. Also Conservation Areas, Grade II Registere Parks and Gardens and Grade II Listed Buildings which have particular characteristics that merit a high level of importance.	
Medium (National or Regional)	Conservation Areas, Grade II Registered Parks and Gardens, Grade II Listed Buildings except where their particular characteristics merit a higher level of importance, heritage assets on local lists and undesignated assets that contribute to Regional research objectives	
Low (Local)	Locally listed heritage assets, except where their particular characteristics merit a higher level of importance, undesignated heritage assets of Local importance, including assets that may already be partially damaged	
Negligible	Identified historic remains of no importance in planning considerations, or heritage assets and findspots that have already been removed or destroyed (i.e. 'site of')	
Unknown / Uncertain	Heritage assets for which a level of importance cannot be defined on current information	

4.4.3. The importance of heritage assets that may be affected by the proposed development is identified in the impact assessment and summarised in the gazetteer, reproduced in the Appendix.

#### Assessment of Significance

4.4.4. Significance, in relation to heritage policy, is defined by the NPPF (Glossary, Annex 2) as

the value of a heritage asset to this and future generations because of its heritage interest. That interest may be archaeological, architectural, artistic or historic. Significance derives not only from a heritage asset's physical presence, but also from its setting.

4.4.5. This document considers the contribution made by setting to the significance of non-designated heritage assets. Consideration of the contribution made by setting to the significance of designated heritage assets is carried out in a separate document (JB Heritage 2021) and are therefore not discussed in this DBA.

#### Potential for unknown heritage assets

- 4.4.6. Archaeological features are often impossible to identify through desk-based assessment. The likelihood that significant undiscovered heritage assets may be present within the Proposed Development Area is referred to as archaeological potential. Overall levels of potential can be assigned to different landscape zones, following the criteria in Table 3, while recognising that the archaeological potential of any zone will relate to particular historical periods and types of evidence. The following factors are considered in assessing archaeological potential:
  - The distribution and character of known archaeological remains in the vicinity, based principally on an appraisal of data in the Kent HER;
  - The history of archaeological fieldwork and research in the surrounding area, which may give an indication of the reliability and completeness of existing records;
  - Environmental factors such as geology, topography and soil quality, which would have influenced land-use in the past and can therefore be used to predict the distribution of archaeological remains;

- Land-use factors affecting the survival of archaeological remains, such as ploughing or quarrying;
   and
- Factors affecting the visibility of archaeological remains, which may relate to both environment and land-use, such as soils and geology (which may be more or less conducive to formation of cropmarks), arable cultivation (which has potential to show cropmarks and create surface artefact scatters), vegetation, which can conceal upstanding features, and superficial deposits such as peat and alluvium which can mask archaeological features.

Table 3. Archaeological potential

Potential	Definition
High	Undiscovered heritage assets of high or medium importance are likely to be present.
Medium	Undiscovered heritage assets of low importance are likely to be present; and it is possible, though unlikely, that assets of high or medium importance may also be present.
Low	The study area may contain undiscovered heritage assets, but these are unlikely to be numerous and are highly unlikely to include assets of high or medium importance.
Negligible	The study area is highly unlikely to contain undiscovered heritage assets of any level of importance.
Nil	There is no possibility of undiscovered heritage assets existing within the study area.

#### **IMPACT ASSESSMENT**

- 4.4.7. Impact assessment considers the effects of the proposed development on the significance of the identified heritage assets, or its assessed archaeological potential, including both positive ('beneficial') and adverse ('harm') impacts.
- 4.4.8. The assessment of physical impacts considers the extent or degree of harm proposed relative to the importance of the physical remains.
- 4.4.9. The level of harm predicted is stated in accordance with the criteria contained in Paragraphs 200-203 of the NPPF (2021).

#### SETTING IMPACTS

- 4.4.10. Visual impacts are most commonly encountered but other introduced environmental factors can affect setting such as noise, light or air quality. Impacts may be encountered at all stages in the life cycle of a development from construction to decommissioning but they are only likely to lead to substantial harm during the prolonged operational life of the development.
- 4.4.11. Where potential impacts on the settings of a heritage assets are identified, the assessment of significance includes 'assessing whether, how and to what degree these settings make a contribution to the significance of the heritage asset(s)', following Step 2 of the staged approach to setting recommended in Historic England's guidance in *The Setting of Heritage Assets* (GPA3<sup>36</sup>).
- 4.4.12. Attributes of an asset's setting which can contribute to its significance are listed on page 9 of GPA3.
- 4.4.13. An assessment of the sensitivity of a heritage asset to change within its setting is a professional judgement, based on consideration of the asset's significance and the contribution its current and historical setting makes to that significance.

<sup>36</sup> https://historicengland.org.uk/images-books/publications/gpa3-setting-of-heritage-assets/heag180-gpa3-setting-heritage-assets/

- 4.4.14. As discussion of the nature and significance of the settings of designated heritage assets within the Study Area and the proposed development's impact upon them is discussed in separate documents<sup>37</sup>, this DBA considers only the nature and significance of the settings of the non-designated heritage assets within the Study Area and the proposed development's impact upon them.
- 4.4.15. The scope of this DBA is limited to identifying where no substantial setting impacts are anticipated requiring no further works, or where substantial setting impacts are anticipated, to identify which heritage assets are considered likely to be affected, and to make recommendations for proportionate further detailed assessments.

### MINIMISING HARM

- 4.4.16. Where appropriate, measures for further assessment of, or mitigation of identified impacts are recommended.
- 4.4.17. A summary is presented of the measures to remove, reduce or mitigate harm to heritage assets through careful design and consideration within the development proposals

<sup>&</sup>lt;sup>37</sup> Anthony Heslehurst pers. Comm., 1<sup>st</sup> February 2022

## 5. RESULTS

### 5.1. OVERVIEW OF THE HISTORIC ENVIRONMENT

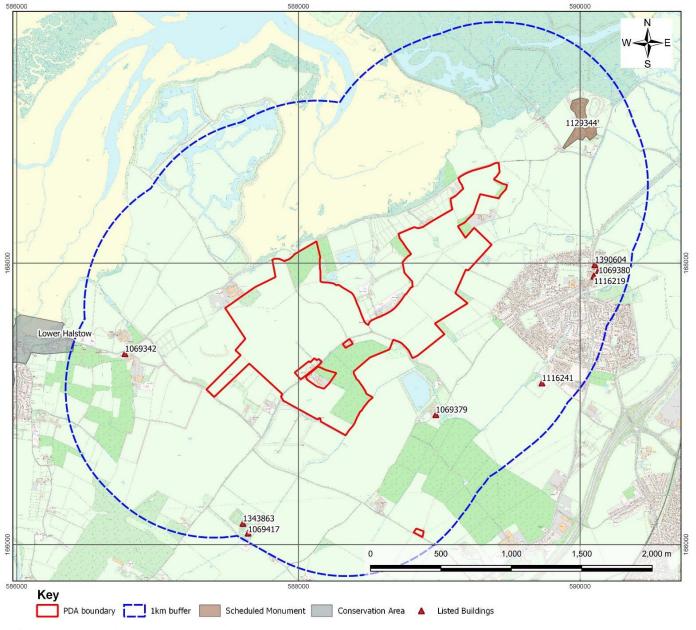
- 5.1.1. The full list of known heritage assets is presented in the Appendix and the location of each is shown on Illus. 44 and 46 50. The location of the archaeological events within the Study Area are shown on Illus. 45 and the location of the newly identified heritage assets, possible heritage assets, and geological and topographic features are shown on Illus. 50.
- 5.1.2. The importance and significance of these assets is discussed in the Assessment of Heritage Significance section below.
- 5.1.3. There are no designated heritage assets within the PDA boundary and 29 known and possible non-designated heritage assets, probable geological features and topographic features. These include Mesolithic and Neolithic findspots and Bronze Age and Iron Age Early Romano-British field systems, occupation and cremation cemeteries in Field 3 of the PDA (identified during Archaeological Event HAEv 1); the above-ground remains of a 17<sup>th</sup> century field boundary; the sites of five Post-Medieval buildings (including MKE85220, the site of Funton farmstead); the course of a Post-Medieval trackway; the sites of eight Post-Medieval ponds; five extant Post-Medieval and Modern ponds; the site of a Post-Medieval well; the sites of two Post-Medieval boundary stones; three extant Post-Medieval Modern boundary stones; one probable geological feature; and one below-ground feature of unknown date. The below-ground remains of five Post-Medieval field boundaries are also present.
- 5.1.4. Within the wider Study Area, there is one Scheduled Monument (a World War II Heavy Anti-Aircraft Gunsite: NHLE 1129344), one Conservation Area (Lower Halstow) and eight listed buildings. Of these, one is grade I listed while the remaining buildings are grade II. The Grade I listed building, the Church of All Saints, is of Medieval date but all of the other designated heritage assets are Post-Medieval in date.
- 5.1.5. There are 161 non-designated heritage assets within the Study Area. These include one findspot of Mesolithic flints; four heritage assets of Neolithic date; one heritage asset of Neolithic Bronze Age date; eight heritage assets of Bronze Age date; three assets of Bronze Age Iron Age date; five heritage assets of Iron Age date; one heritage asset of Prehistoric date and four of Later Prehistoric date; 19 heritage assets of Romano-British date; one heritage asset of Early Medieval date; one heritage asset of Early Medieval date; 11 heritage assets of Medieval date; 31 heritage assets of Post-Medieval date; 23 heritage assets of Post-Medieval Modern date; 30 heritage assets of Modern date; and 18 heritage assets of unknown date.

#### 5.2. SCHEDULED MONUMENTS

5.2.1. Within the Study Area, there is one Scheduled Monument (NHLE 1129344). This is a World War II Heavy Anti-aircraft gun site and its domestic camp. It lies approximately 460 m to the west-north-west of the PDA's north-eastern corner. Its history is discussed further in the Archaeological and Historic Narrative.

## 5.3. CONSERVATION AREAS

5.3.1. There is one Conservation Area (CA), Lower Halstow Conservation Area, whose western extent just encroaches into the Study Area, 985 m to the north-west of the PDA's boundary. As so little of the CA lies within the Study Area, and as this DBA focusses on the archaeological potential of the PDA, it is not thought relevant to discuss the CA further here.



Illus 44. Designated heritage assets within the Study Area

## 5.4. HISTORIC LANDSCAPE CHARACTER (HLC)

5.4.1. The PDA and Study Area lie within the Historic Landscape Character Area (HLCA) 28, 'Northern Coast and Marshland'. This is defined in the Kent Historic Landscape Characterisation Final Report Volume 1 as:

An extremely well-defined area both in terms of the HLTs and the topographic location. A case could be made for further subdivision based on geographic separation.

This area comprises a relatively balanced mix of reclaimed marsh and coastal landscape types typifying the relationship between humans and the marine environment. Areas situated closer to the mouth of the Thames, i.e. the area around the Hoo peninsula, contain a greater degree of industrial activity.

It is likely that this belt continued further east towards HLCA 19 (Wantsum Channel) but the expansion of Whitstable and Herne Bay town (part of HLCA 22, Former Blean Forest) has overlain any evidence of this.<sup>38</sup>

- 5.4.2. The Historic Landscape Character of the PDA itself is variable. For the most part, it falls within HLC 237, defined as 'small regular with straight boundaries (parliamentary type enclosure)'. However, in the south-western corner of Field 1, in Field 2 and in Field 6, the PDA falls under HLC 149 and HLC 239, both defined as 'orchards: areas of commercially grown fruit trees'. In the northern half of Field 15, the PDA falls under HLC 53, 'small rectilinear with wavy boundaries', whilst in Field 5 the PDA falls within HLC240, defined as 'medium regular fields with straight boundaries (parliamentary type enclosure)'.
- 5.4.3. The Kent Historic Landscape Characterisation Final Report Volume 2<sup>39</sup> explains that HLC 240 is 'a type of field [that] was typically created by 19th and 20th-century enclosure of downland and low-lying areas', and that it may include enclosures whose boundaries have been straightened as part of the field's formation. HLC 237 were also typically formed by 19th and 20th-century enclosure, but some fields of this type may have resulted from straightening of wavy bounded fields. However, fields of HLC type HLC 53 'probably date to the late medieval or 17th/18th-centuries and reflect a process of informal enclosure.'.
- 5.4.4. Additional HLC types seen within the wider 1 km Study Area are HLC 241, coastal wetlands; HLC 235, mudflats; and HLC 61, small irregular enclosures, all to the north of the PDA; various HLC types denoting post-1810 settlement to the east of the PDA; and HLC 127, prairie fields (19th century enclosure with extensive boundary loss), to the south of the PDA.
- 5.4.5. Missing from the above HLC is the presence of buried Prehistoric landscapes underlying Historic landscapes. These buried landscapes may be present within the PDA.
- 5.4.6. The Swale Borough Council Borough-Wide Heritage Strategy 2020-2032 discusses Swale Borough's historic landscape in detail and provides a broader context for the historic landscape of the PDA. It notes:

...many still recognizable historic landscapes are pre-industrial and stem from the medieval period or even earlier... the rural landscape displays the remains of farmsteads, enclosures and field ditches, woodland management features and the routes and trackways that have shaped the settlement pattern in the Borough we see today... Other early features that can be seen in the Swale Borough Area (and in many other parts of the country) creating historic landscapes are burial mounds, castle mounds and salterns.

The combination of Swale's industrial past interlocking with its farming and coastal fringe landscapes is arguably one of, if not the major factor that makes Swale's heritage unusual and special<sup>40</sup>.

5.4.7. The HLC's and HLCA's described above demonstrate the rural, agricultural nature of the PDA and the organic development of field patterns within it until the 19<sup>th</sup> century. Historic Landscape Characterisation data suggests that planned and formalised field division and small-scale settlement occurred from the early 19<sup>th</sup> century onwards; this development may have damaged or masked preceding historic landscapes within the Study Area and PDA.

#### 5.5. PREVIOUS INVESTIGATIONS

5.5.1. A total of 43 archaeological events have taken place within the 1 km Study Area. These consist of seven desk-based assessments and desk-top surveys, eight watching briefs, 13 evaluations, nine excavations, one fieldwalking survey, one dendrochronological assessment, one historic landscape and seascape

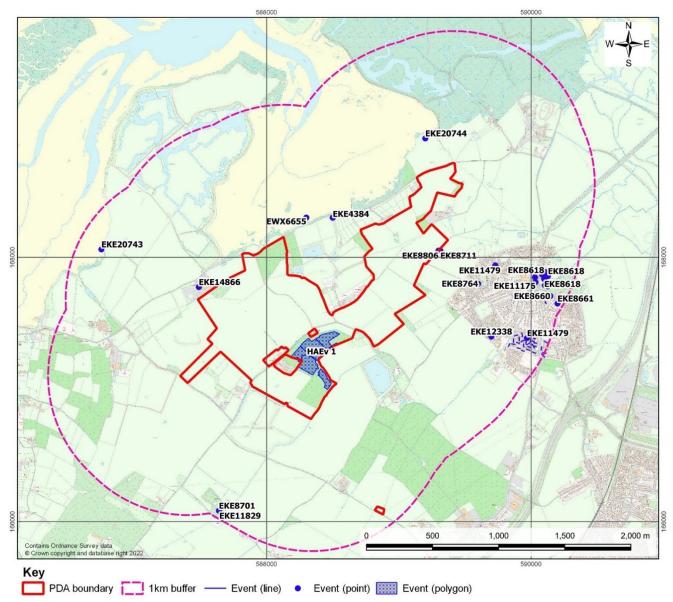
<sup>38</sup> KCC & English Heritage 2001a, 3-11

<sup>39</sup> KCC & English Heritage 2001b

<sup>&</sup>lt;sup>40</sup> Swale Borough Council 2020

characterisation project, one built heritage assessment, and two miscellaneous events which are likely to record archaeological fieldwork.

- 5.5.2. Six of these events are recorded in the HER as being carried out within the PDA. This are EKE10278, the Historic Environment of the North Kent Coast Rapid Coastal Zone Assessment Survey Phase 1 desk-based assessment; EKE14661, a desk-based assessment for Orchard Solar Farm; EKE13239, the Hoo Peninsula Historic Landscape Project; EKE14761, the archaeological survey of mineral extraction sites around the Thames Estuary; EKE20308, NKC Joint Fieldwork Report June-July 2004; and Phases 1, 1A, 2 and 3 of archaeological fieldwork carried out between 2016 and 2019 in Field 3 of the PDA, prior to extensions to an operational quarry located within that field. This archaeological event has not yet been entered into HER database and is therefore identified on Illus. 45 as HAEv 1. The Phase 3 report for HAEv 1 states that further phases of excavation are expected as further quarry expansion occurs<sup>41</sup>.
- 5.5.3. The reports for EKE14761 and EKE20308 could not be found on the ADS or within the collections of the Kent Local History Centre and therefore the details of their results could not be included in this DBA. The information and conclusions given within the reports for EKE10278, EKE13239, EKE14661 and HAEv 1 which are relevant to this DBA are discussed in the Archaeological and Historical Narrative.
- 5.5.4. A geophysical survey of the PDA has been commissioned and its results reported on under separate cover.
- 5.5.5. The locations of these events are shown in Illus. 45 and detailed descriptions of the archaeological remains encountered during the investigations carried out within the Study Area are presented in Table 4 below.



Illus 45. Results of HER search: Events

<sup>&</sup>lt;sup>41</sup> Rouard 2021, 1

Table 4: Archaeological events within the Study Area

EvUID	Name	Description	Easting	Northing
EKE10278	Historic Environment of the North Kent Coast: Rapid Coastal Zone Assessment Survey Phase 1	A desk based assessment of the North Kent Coast as part of the Rapid Coastal Zone Assessment Survey		
EKE11176	Watching Brief at Iwade Rising Main, Iwade	Monitoring of replacement of a rising main. No finds or features were observed.	590080	167770
EKE11479	Desk based assessment of three land parcels at Iwade	A desk based assessment of three land parcels around the core of Iwade.	589980	167630
EKE11504	Evaluation at Iwade Phase 8	Evaluation by means of 34 trenches. No archaeological finds or features were observed.	590310	167610
EKE11825	Evaluation of Area 6, Iwade	Evaluation by means of 33 trenches. No significant archaeological finds or features were observed.	589880	167980
EKE11829	Dendrochonology of timbers from the barn at Great Norwood Farm, Bobbing	Analysis of five samples from timbers from the barn. A site sequence was made but could not be matched to any reference chronologies. No date was obtained.	587642	166081
EKE11954	Evaluation of land east of All Saints' Church in Iwade	Evaluation by means of six trenches totalling 120m in length. Two ditches were found, probably representing post medieval field boundaries, a ditch on the same alignment is shown on the 1st edition OS map.	590180	167930
EKE12000	Desk based assessment, Iwade Village centre	Desk based assessment of a site in the village centre. No significant new information.	590030	167840
EKE12338	Desk based assessment of land south of Iwade	A desk based assessment of land south of Iwade.	589700	167400
EKE12485	Evaluation of land on School Lane	Evaluation by means of three trenches. No archaeological features were observed.	590000	167750
EKE12881	Evaluation of land adjacent to Coleshall Farm, Iwade	Evaluation by means of 129 trenches.	589780	167330
EKE12882	Excavation of land adjacent to Coleshall Farm, Iwade - phase 1	Excavation of three areas following evaluation. A large area in the northwest of the site and two areas along the route of the access road.	589710	167400
EKE13239	Historic landscape characterisation and historic seascape characterisation, Hoo Peninsula Historic Landscape Project	Historic landscape characterisation and historic seascape characterisation carried out as part of the Hoo Peninsula Historic Landscape Project.	579880	176650
EKE14661	Historic Environment Desk-based Assessment: Proposed Solar Farm at Orchard Farm, Iwade, Kent	Desk based assessment of potential impacts on heritage assets of proposed Solar Farm development.	588000	166840
EKE14761	Archaeological survey of mineral extraction sites around the Thames Estuary	Project to provide researchers and planning departments with a GIS-related database of important archaeological (including industrial) and geological sities within all know past, present and proposed mineral extraction sites in the area of Dartford, Gravesham and Thurrock.	578870	171170
EKE14866	Funton Brick Kilns, Ibstock Brick Funton Factory, Sheerness Road, Lower Halstow, Listed Building Assessment	English Heritage, evaluation of Funton brick kilns for Listed Building Status. Architectural and historic interest failed to meet criteria for Listed Building Status.	587480	167770

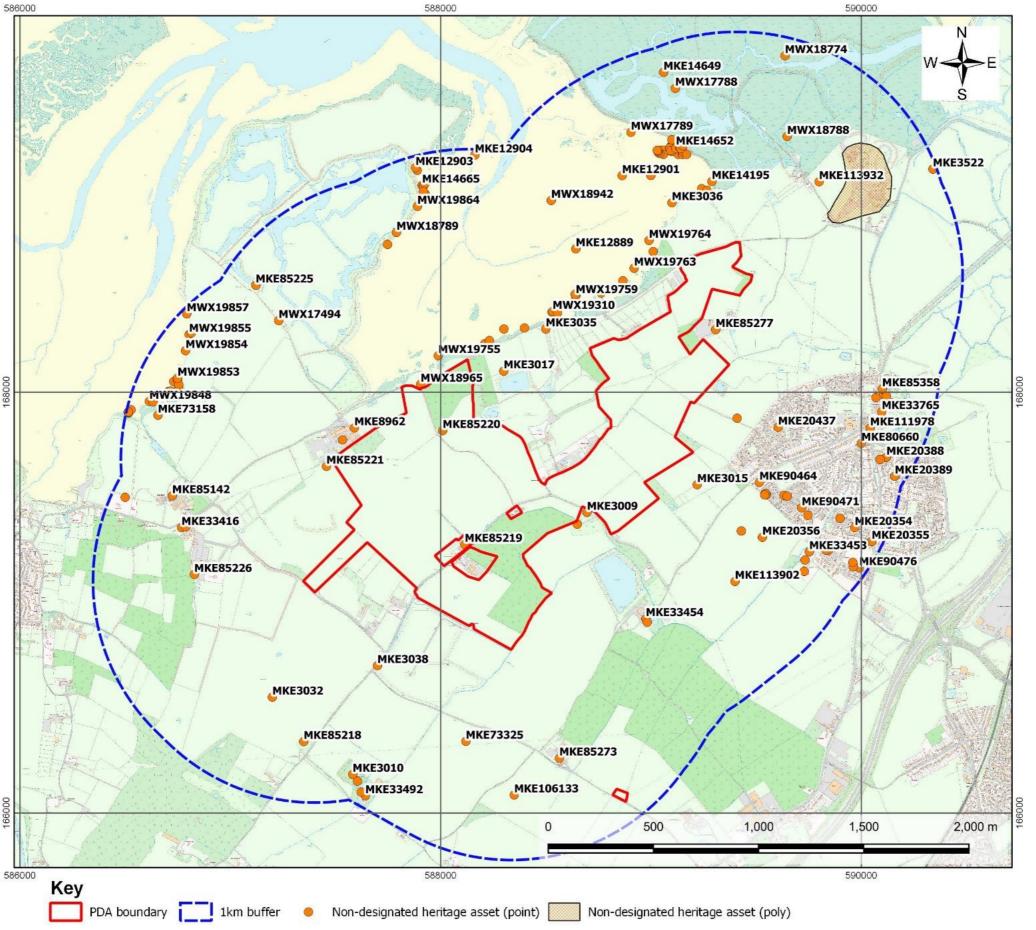
EKE20308	NKC Joint Fieldwork Report June- July 2004	Wessex Archaeology was commissioned by Kent County Council (Heritage Conservation Group) to undertake joint fieldwork with European partners in relation to the Planarch 2, action 2A: archaeological evaluation for wetlands.	591970	170130
EKE20743	Excavation east of Halstow Creek, 1924	Grid reference now appears to match location of this saltern site.	586750	168060
EKE20744	Excavation, Bedlam's Bottom, 1964- 66	No information given on the HER	589200	168900
EKE4383	FUNTON CREEK	Finds & archive were to go to Maidstone Museum & Art Gallery. Recent information, however, suggests that nothing has been received. (Mr G Guthrie, Keeper of Human History, Maidstone Museum. E-mail 30. 6. 03.). Dr M Still of Kent Archaeological Society suggests that material formerly held by Dr Detsicas may have been lost or discarded. Dr Detsicas died in 1999.	588300	168300
EKE4384	FUNTON CREEK	OS Card Reference: SALT The Study of an Ancient Indust 1975 28 (Eds KW de Brisay and KA Evans).	588300	168300
EKE8613	Evaluation on Area III, Iwade	An evaluation on land known as Area III, to the east of 'The Street' in Iwade revealed the presence of archaeological features across the area of proposed development. Features of potential prehistoric, medieval and post medieval date were recorded, although the summary also mentions Roman ceramic evidence. A number of linear ditches were identified and dated to the Later prehistoric period. These were interpreted as being part of a wider Iron Age agricultural landscape, recorded at a number of sites around Iwade. Residual Bronze Age material was also collected from the site. Medieval and Post Medieval activity was identified in the western part of the site, adjacent to an area known to contain residential dwellings until quite recently. This fitted into a suggested pattern of medieval activity in the area, associated with buildings with frontages on the street. It should be noted that a number of features exposed during the excavations remained undated, although some were tentatively asribed a prehistoric date. The site was approximately 0.6ha in size and the grid refs below delimit the perimeter of the observed archaeology and provide a centre point.	590100	167850
EKE8614	Evaluations at Iwade, Ferry Road, Site A	Evaluation by means of 30 trenches totalling 685m in length. Iron Age features were found in the east of the site and medieval features were found in the south east.	589950	167350
EKE8615	Excavation at Iwade, Site A and Site B (West), Iwade	Excavation at proposed housing development site. Multi-period archaeological features were recorded spanning the mesolithic to late iron age and medieval period. The main archaeological features consisted of a mid - late bronze age field system and a late iron age settlement enclosure with roundhouses. A later medieval field system associated with the village of lwade later covered the site.	590030	167320
EKE8616	Evaluation at Iwade, Ferry Road, Site B	Evaluation at proposed housing development site. Multi-period archaeological features were recorded spanning the Mesolithic to late Iron Age and medieval period. The main archaeological features consisted of a mid - late Bronze Age field system and a late Iron Age settlement enclosure with roundhouses. A later medieval field system associated with the village of Iwade later covered the site.	590160	167270
EKE8618	Area III, Iwade, Kent. An Archaeological Excavation Site Narrative	Following on from the evaluation in the winter of 2000/2001, an excavation took place on the site known as Area III, Iwade. It is of note that in a summary of the evaluation works in the excavation report, much greater emphasis is placed on a medieval interpretation of the features recorded. This appears to contradict the interpretation of more features being prehistoric in the original evaluation report. The excavation phase recorded numerous cut features throughout the area of excavation, including linear ditches on different alignments, dating to the late prehistotic, medieval and post medieval periods. The majority of features dated appeared to be 13th-14th century. There was a particular concentration of features in the northeastern quarter, although across the site a significant number contained no dateable finds. There were also a number of natural and unexcavated features. A centre point and perimeter of the observed remains	590100	167860

EKE8660	Watching Brief at Ferry Road, Iwade	Watching brief whilst topsoil stripping and trench cutting were undertaken. It is unclear whether archaeological features were uncovered, but the excavation (EKE8661) produced various finds and features.	590140	167700
EKE8661	Excavation at Ferry Road, Iwade	A small excavation carried out prior to housing development. Medieval features and finds were found.	590200	167650
EKE8662	Evaluation at Ferry Road, Iwade	Evaluation. 23 trenches were dug of which only 3 produced definite archaeological deposits. Small number of sherds of early modern pottery, peg-tile & slate were found. A possible ditch at the base of the slope was located. Two pits were found of which the most obvious deposit consisted of a large number of oyster shells.	590180	167690
EKE8663	Evaluation at The Street, Iwade	Evaluation excavation of 21 trenches. Evidence for early medieval iron working was found and a possible Neolithic cremation burial, or hearth.	590160	167600
EKE8683	Watching Brief at School Lane, Iwade	Watching brief on development work. No archaeological features were found.	590030	167780
EKE8701	Watching Brief on Work at a Barn at Great Norwood Farm, Bobbing	Watching brief on works of new development. Nothing of archaeological interest found.	587630	166080
EKE8711	Watching Brief on Land to North West of School Lane, Iwade	Watching brief on works for a balancing pond. No archaeological features found.	589314	168050
EKE8758	Evaluation at Plantation House, Ferry Road, Iwade	Evaluation prior to development. No archaeological features were found, but a small quantity of medieval potsherds and late bronze age flints were found in the topsoil.	590080	167680
EKE8764	Evaluation at Hillreed Homes Site C, Iwade	Evaluation trenching prior to housing development. No archaeological features were found, although residual finds indicate activity in the area during the prehistoric period and again in the medieval and post-medieval	589600	16780
EKE8806	Watching Brief on Land to North West of School Lane, Iwade	Watching on works soil stripping connected with housing development. Nothing of archaeological significance was noted.	589300	168050
EKE8807	Watching brief on land known as block C area 6, lwade	Watching brief on works for new housing development. Nothing of archaeological significance noted.	589880	167970
EKE9049	Watching brief during groundworks associated with development at land to the rear of 3A Ferry Road, lwade	Observation of trenches for wall footings at two locations and service trenches. A possible pond was encountered but no dating evidence was recovered for this. No other archaeological features or finds were noted.	590098	167660
EWX6633	Stage 1: Desk study A249 Iwade Bypass to Queenborough improvement	A desk study was carried out for Ove Arup & Partners as stage 1 of the archaeological survey in advance of bypass construction.	591800	170100
EWX6655	Excavation at Funton Creek, Iwade	Erosion on the foreshore at Funton Creek exposed pockets of burnt material (four salt-pans) and third century Roman pottery sherds.	588300	168300
EWX6659	Excavation at Romano-British salt panning site, Funton Marsh, Iwade	Rescue excavation of a Romano-British salt panning site due to cliff erosion.	588300	168300
EWX8091	Walkover survey for the North Kent Coast Rapid Coastal Zone Assessment Survey Phase II	Walkover survey at Queenborough and Upchurch as part of the North Kent Coast Rapid Coastal Zone Assessment survey.	587900	170800
HAEv 1	Land at Orchard Farm, Iwade, Kent, Phases 1, 1A, 2 and 3 Archaeological recording action	Two clusters of Middle Bronze Age (MBA) pits (several radiocarbon dated) were identified in the south-west of the Phase 1 area and in the Lagoon area. MBA residual finds were also recovered from a Late Iron Age (LIA) ditch. Two concentrations of LIA activity were recorded: the probable edge of a settlement including a possible round house and a	588310	167190

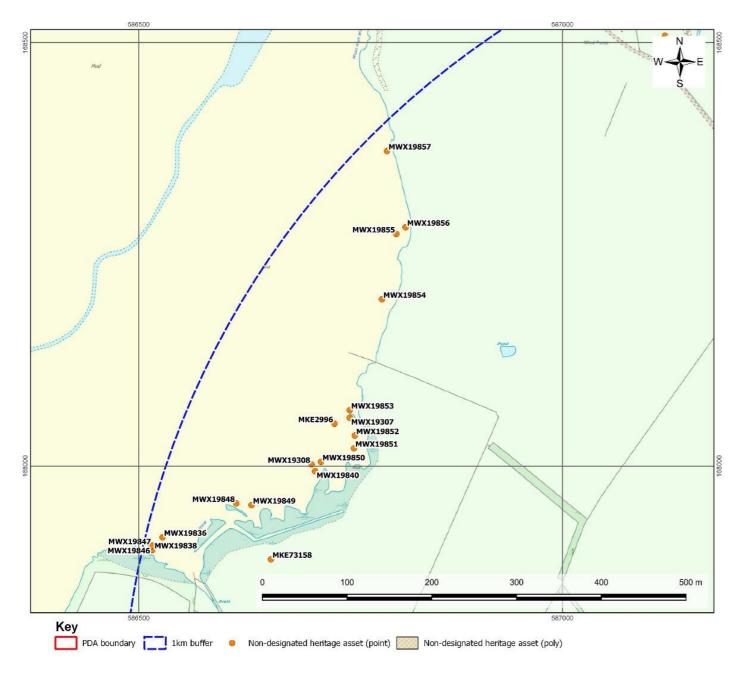
cremation cemetery within the Phase 1 area, and an extensive field system that was thought to extend beyond the limits of excavation in the Lagoon Area. Numerous undated pits and several undated linear features were also found <sup>42</sup> . Phase 2 of the works found isolated cremation burials, a cremation burial cemetery, field boundaries and enclosures in addition to various pits and postholes. The chronology of the site was supported by five radiocarbon dates that indicate that the deposits are predominantly of Bronze Age date. A cluster of three small ring gullies of Bronze Age date were identified in the south-eastern area of the site. A few linear features tentatively assigned to the Late Iron Age are likely related to the settlement excavated in Phase 1. Numerous undated pits and several struck flints of probable Mesolithic date were also found <sup>43</sup> . Phase 3 of the excavation found a continuation of the Bronze Age field systems identified in previous phases and an additional assemblage of Mesolithic flints as well as a Late Neolithic – Early Bronze Age polished axe (all unstratified). An Iron Age – Early Romano-British field system and associated isolated features were also identified; it is thought that the Iron Age remains date to a separate phase of activity than the remains of this date found in previous phases of excavation, with the core of the Phase 3 activity likely sited to the north or east of the Phase 3 excavated area <sup>44</sup> .	
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<sup>&</sup>lt;sup>42</sup> Hull 2019 <sup>43</sup> Rouard 2019 <sup>44</sup> Rouard 2021

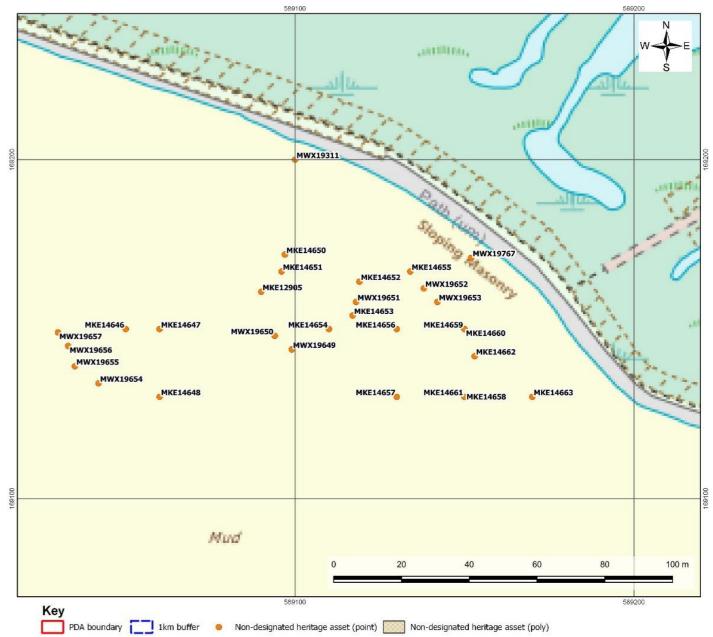
## 5.6. ARCHAEOLOGICAL AND HISTORICAL NARRATIVE



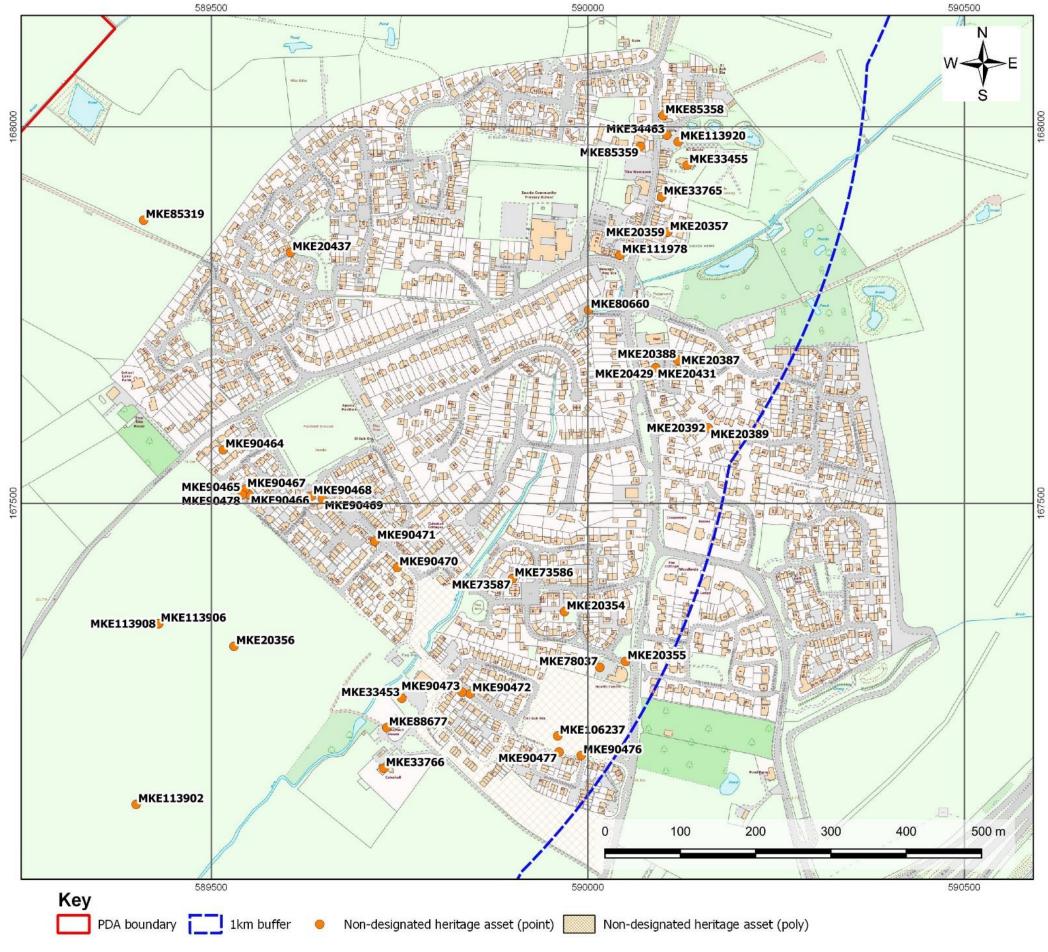
Illus 46. Overall illustration of Non-Designated Heritage Assets within the Study Area



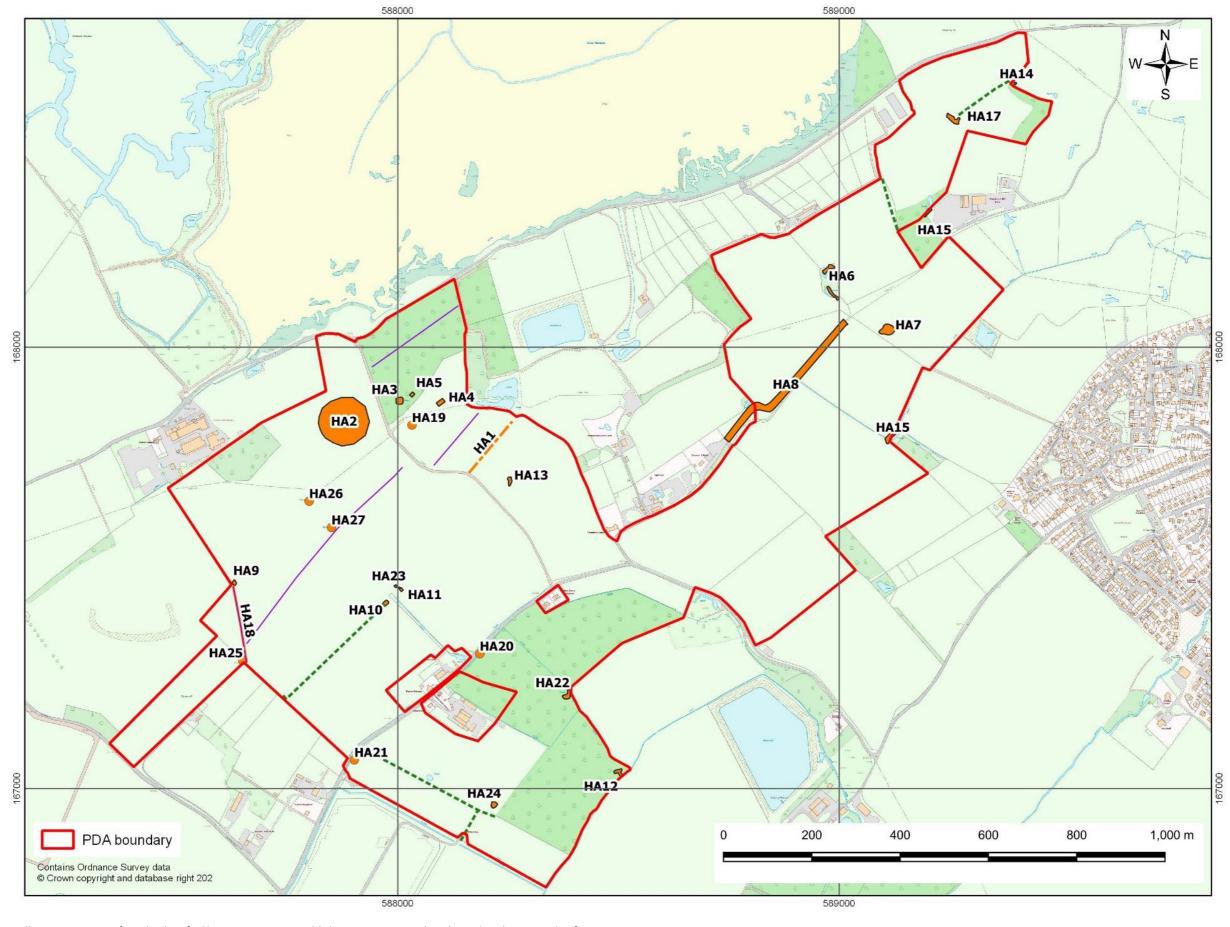
Illus 47. Detail of Non-Designated Heritage Assets in the north-west corner of the Study Area



Illus 48. Detail of Non-Designated Heritage Assets in the north-east corner of the Study Area



Illus 49. Detail of Non-Designated Heritage Assets in the east of the Study Area



Illus. 50. Location of newly-identified heritage assets, possible heritage assets and geological and topographic features

#### PREHISTORIC PERIODS

#### LOWER AND MIDDLE PALAEOLITHIC (800,000 – 48,000 BCE)

- 5.6.1. Archaeology from this period is normally represented by chance findspots of lithic artefacts rather than remains of in-situ activity such as settlements or burials. Current archaeological evidence suggests that human activity in Britain between 800,000 and 500,00 BCE was intermittent, after which the island was abandoned. Recolonisation likely occurred by around 425,000 BCE. The Palaeolithic population of Britain appears to have flourished for the next 150,000 years, with climatic deterioration from around 250,000 BCE leading to the country being mostly abandoned until the end of the Lower Palaeolithic period. Lower and Middle Palaeolithic remains have been shown to mostly be associated with the Neanderthals and their ancestors ('Archaic' Homo).<sup>45</sup>
- 5.6.2. There are no known heritage assets of this date recorded in the HER within the PDA or wider Study Area.
- 5.6.3. Allen<sup>46</sup> has highlighted that archaeological evidence from the Swale river valley between Whitstable and Herne Bay, 22 km 30 km to the east of the PDA, indicates that at least two sealed artefact-bearing horizons of late Pleistocene date exist within the deposits which comprise the Swale. The earlier phase contains Acheulean handaxes and Levallois flints, which are found throughout the Palaeolithic period. From this, he has argued that the Swale river valley bottom could contain Palaeolithic material and/or land surfaces.
- 5.6.4. There are no finds of this date recorded within the parishes of Iwade or Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.5. Although the PDA falls within the Study Area for the Stour Basin project, it lies more than 20 km from the nearest transect recorded and therefore it is not thought that detailed analysis of this transect would be relevant to the PDA. The overall results of the Stour Basin project are discussed in Section 1.3.
- 5.6.6. As is the case for much of the south-east of Britain, the recurrent glaciations of the Palaeolithic period are likely to have disturbed or destroyed the remains of much of the human activity within the PDA which preceded them, decreasing the potential for archaeological remains of the Upper and Middle Palaeolithic periods<sup>47</sup>.
- 5.6.7. Therefore, there is assessed to be a low potential for previously unknown heritage assets of this period to be encountered within the PDA.

#### UPPER PALAEOLITHIC (48,000 BCE - C.9,500 BCE)

- 5.6.8. Human activity within the South East during the Upper Palaeolithic period, often referred to as the Devensian, may have been extremely episodic due to Britain only being accessible during short periods as a result of climatic conditions. However, two broad periods of occupation within the South East can be determined: an earlier phase, dating to between 36,000 and 25,000 BCE, and a later phase, dating between 12,600 and 9,500 BCE. Archaeological remains generally consist of tool kits largely manufactured on blade blanks and containing projectile points<sup>48</sup>.
- 5.6.9. During the Upper Palaeolithic period, the Study Area is likely to have been impacted by the cycle of marine transgressions and regressions that have been documented within the Lower Thames Estuary. Near the end of this period, permanent inundation of the estuary is recorded in the geological strata. Therefore, much of what is now marshland within the Study is likely to have been dry land during at least the earlier and middle parts of the Upper Palaeolithic and, as discussed above, the Swale is highly likely to have a been a freshwater rather than saltwater river<sup>49</sup>.
- 5.6.10. Although the PDA falls within the Study Area for the Stour Basin project, it lies more than 20 km from the nearest transect recorded and therefore it is not thought that detailed analysis of this transect would be relevant to the PDA. The overall results of the Stour Basin project are discussed in Section 1.3 above.
- 5.6.11. There are no known heritage assets from the Palaeolithic recorded in the HER within the PDA or the Study Area.

<sup>&</sup>lt;sup>45</sup> Wenban-Smith *et al* 2019, 7 – 12

<sup>&</sup>lt;sup>46</sup> Allen 2012, 172 and 183

<sup>&</sup>lt;sup>47</sup> Moody 2008, 54

<sup>&</sup>lt;sup>48</sup> Pope et al 2019, 2 - 3.

<sup>&</sup>lt;sup>49</sup> Bishop and Bagwell 2005, 6 and 7; Allen 2000

- 5.6.12. There are no finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.13. There is assessed to be a low potential previously unknown heritage assets of this period to be encountered within the PDA.

### MESOLITHIC (8500-4000 BCE)

- 5.6.14. Climatic warming and accompanying changes to flora and fauna within Britain are generally understood to have been the catalyst for the recolonisation of the island and the beginning of the Mesolithic period. Evidence of Mesolithic activity tends to be represented by findspots of small flint flakes known as microliths, which typified this period, although several settlement sites, probably used seasonally, are known in the UK<sup>50</sup>.
- 5.6.15. It is probable that, by the Mesolithic period, the present landscape types of the Study Area and spatial divisions between them had been established<sup>51</sup>.
- 5.6.16. During Phases 2 and 3 of the excavations relating to the expansion of the operational quarry in Field 3 of the PDA (HAEv 1), struck flints of Mesolithic date, mostly unstratified and residual, were found<sup>52</sup>.
- 5.6.17. There is one known heritage asset of this date recorded in the HER within the Study Area. This is MKE90478, several Mesolithic flints found within a tree throw, 505 m to the east of the PDA.
- 5.6.18. Allen has highlighted that Mesolithic material has been recovered from the later phase of sealed artefact-bearing horizons within deposits from the Swale river valley between Whitstable and Herne Bay, 22 km 30 km to the east of the PDA. From this, he has argued that the remained of the Swale river valley bottom contains terraces which supported Holocene occupation from the Mesolithic onwards<sup>53</sup>.
- 5.6.19. There are no finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.20. There is assessed to be a low to medium potential for previously unknown heritage assets of this period to be encountered within the PDA.

### NEOLITHIC (4000-2200 BCE)

- 5.6.21. The Neolithic period was typified by a gradual transition towards settlement, associated with a shift towards agriculture. It was during this period that ceramics first made their appearance, almost certainly brought into Britain from the European mainland, and in some areas at least the period was characterised by group burial and the construction of large earth and stone monuments<sup>54</sup>.
- 5.6.22. During the Neolithic period, coastal Kent, including the Swale, became a part of a Trans-Continental trade route, known as the eastern route. This trade route connected Britain with Continental Europe, the Alps and Central Europe. Jadeite axes appear to have been the primary commodity which was traded along this route during this period<sup>55</sup>. It is possible, given the proximity of the Swale with the PDA, that remains contemporary to this trading route exist within the PDA.
- 5.6.23. Recent excavations at Iwade have suggested that, during the Neolithic period, the village was subject to sporadic and temporary visiting of the site and was the focus of some possible ceremonial activity<sup>56</sup>.
- 5.6.24. During Phase 3 of the excavations relating to the expansion of the operational quarry in Field 3 of the PDA (HAEv 1), an unstratified and residual polished axe of Late Neolithic or Early Bronze Age was found<sup>57</sup>.
- 5.6.25. Within the wider Study Area, there are four known heritage assets of this date recorded in the HER. These are MKE90467, a late Neolithic gully and ditch, 508 m to the east of the PDA; MKE90472, a Neolithic ditch and pits, 842 m to the south-east of the PDA; MWX19836, a wooden stake structure, 980 m to the west-north-west of

<sup>&</sup>lt;sup>50</sup> Pope *et al* 2019, 7 - 8

<sup>&</sup>lt;sup>51</sup> Bishop and Bagwell 2005, 7

<sup>&</sup>lt;sup>52</sup> Rouard 2019

<sup>&</sup>lt;sup>53</sup> Allen 2012, 183

<sup>&</sup>lt;sup>54</sup> Champion 2019, 2; Bradley 2010 7 – 23; Moody 2008, 62 - 64

<sup>&</sup>lt;sup>55</sup> Allen 2012, 1

<sup>&</sup>lt;sup>56</sup> Bishop and Bagwell 2005, 48

<sup>&</sup>lt;sup>57</sup> Rouard 2021

- the PDA; and MWX19837, a spread of worked flint, 990 m to the west-north-west of the PDA. MKE20392, a cremation burial of either Neolithic or Bronze Age date, was discovered 965 m to the east of the PDA.
- 5.6.26. There are no finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.27. There is assessed to be a low potential for previously unknown heritage assets of this period to be encountered within the PDA.

#### BRONZE AGE (2200-700 BCE)

- 5.6.28. During this period, humans began to work with copper and tin to create bronze. Ceramic styles changed, and henge monuments and group burials were gradually replaced by individual round barrows and burial mounds. Archaeological evidence suggests that as settlements became more permanent, land clearance and the establishment of likely farmed field systems became commonplace, and social hierarchies developed and solidified as the period progressed<sup>58</sup>.
- 5.6.29. Recent DNA analysis of Neolithic and Early Bronze Age populations has demonstrated that the transition from the Late Neolithic period to Early Bronze Age is intimately tied to the arrival of a group of continental peoples, who brought a distinct tradition of pottery production and burial to Britain, known as the Beaker culture<sup>59</sup>.
- 5.6.30. During the Bronze Age, coastal Kent, including the Swale, was a 'critical part' of the Trans-Continental eastern route, which during this period used primarily for the trade of bronze. This trade route appears to have fostered and cemented industries in weapon and tool production and scrap metal recycling within the northern coast of Kent. The Swale, along with nearby rivers such as the Medway and the Thames, formed part of 'a conduit through which the great majority of tradeable commodities entered and left south-east Britain.'60.
- Fecent excavations at Iwade have suggested that Iwade became progressively more settled during the Bronze Age period, culminating in the establishment of agricultural field systems and trackways by the Late Bronze Age, although no settled occupation was identified<sup>61</sup>.
- 5.6.32. Numerous Bronze Age features have been identified during excavations relating to the expansion of the operational quarry in Field 3 the PDA (HAEv 1). This includes two clusters of Middle Bronze Age (MBA) pits (several of which were radiocarbon dated), isolated cremation burials, a cremation burial cemetery, several ring gullies, an extensive field system (elements of which have been identified during all phases of work) and many pits and postholes. The chronology of the site is supported by radiocarbon dates<sup>62</sup>.
- 5.6.33. There are 12 known heritage assets recorded in the HER relating to this period within the Study Area. These consist of field systems, possible trackways, a cremation burial, pit groups and findspots.
- 5.6.34. Known and probable Bronze Age field systems within the Study Area are MKE20354, 940 m to the east of the PDA boundary; MKE20357, the location of field systems and other discrete features of probable Bronze Age Iron Age date, 955 m to the east of the PDA boundary; MKE90466, a Bronze Age or Iron Age field system, 510 m to the east of the PDA boundary; and MKE90468, a Bronze Age or Iron Age field system, 595 m to the east of the PDA boundary. These field systems are clustered within and to the immediate west of the village of Iwade.
- 5.6.35. Two possible trackways are known within the Study Area, MWX19759, 260 m to the north of the PDA boundary, and MWX19760, 265m to the north of the PDA boundary.
- 5.6.36. One group of pits of Bronze Age date, MKE90476, have been recorded 965 m to the south-east of the PDA boundary.
- 5.6.37. There are four findspots of Bronze Age material within the Study Area. These are MKE20429, the findspot of four flints, 890 m to the east of the PDA boundary; MWX19756, the findspot of possible Bronze Age flints, 115 m to the north of the PDA; MWX19762, the findspot of possible Bronze Age flints, 275 m to the north of the PDA boundary; and MWX19765, the findspot of possible Bronze Age pottery, 225 m to the north of the PDA boundary.

<sup>58</sup> Champion 2019

<sup>&</sup>lt;sup>59</sup> https://www.nhm.ac.uk/discover/news/2018/february/the-beaker-people-a-new-population-for-ancient-britain.html, accessed 19<sup>th</sup> November 2021

<sup>&</sup>lt;sup>60</sup> Allen 2012, 7 and 16

<sup>&</sup>lt;sup>61</sup> Bishop and Bagwell 2005, 49 - 50

<sup>62</sup> Hull 2019; Rouard 2019; Rouard 2021

- 5.6.38. A cremation burial of either Neolithic or Bronze Age date, MKE20392, was also discovered 965 m to the east of the PDA.
- 5.6.39. There are no additional finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.40. Therefore, there is assessed to be a medium high potential for previously unknown heritage assets of this period to be encountered in this part of the PDA.

#### IRON AGE (700 BCE- 43 CE)

- 5.6.41. The Iron Age is characterised by the solidification of permanent settlement and social hierarchy, a reliance on farming, the construction of large enclosed hillforts, the use of iron and introduction of coinage, and an apparent expansion of trade within Britain and between British and European communities<sup>63</sup>.
- During the Iron Age, the importance of the Trans-Continental eastern trade route waned substantially, probably due to the replacement of bronze with iron as the preferred metal of use<sup>64</sup>. This may be why an apparent rapid and abrupt decline in settlements within the northern coast of Kent appears in the archaeological record during this period. However, by the last few centuries of the Iron Age, the influence of the Roman Empire reignited the use of the eastern trading route, and settlement within the area seems to have expanded in tandem with this<sup>65</sup>.
- 5.6.43. Recent excavations at Iwade have identified the remains of a Late Iron Age farmstead (recorded in the HER under entry MKE20355, discussed below) and an associated agricultural system. It appears to have been occupied until the advent of the Roman Conquest<sup>66</sup>.
- 5.6.44. Late Iron Age features have been identified during excavations relating to the expansion of the operational quarry in Field 3 of the PDA (HAEv 1). These were centred on three concentrations of activity: the probable edge of a settlement, including a possible round house and a cremation cemetery, and two field systems seemingly in use during different periods<sup>67</sup>.
- 5.6.45. There are eight HER entries which record the locations of Iron Age remains within the Study Area. These consist of field systems, rural dwellings, and isolated archaeological features and findspots.
- 5.6.46. MKE20355, a mid late Iron Age farmstead, lies 945 m to the south-east of the PDA boundary. The farmstead underwent two phases of development, consisting of an enclosure cutting an earlier Bronze Age site, five roundhouses, a post-built structure, and a second enclosure.
- 5.6.47. The only confirmed Iron Age field system within the wider Study Area is MKE90470, a Middle Iron Age enclosure, 715 m to the south-east of the PDA boundary. There are three additional HER entries which record the locations of field systems which may be of Iron Age date. These are MKE20357, a group of field systems and other discrete features of probable Bronze Age Iron Age date, 955 m to the east of the PDA boundary, and MKE90468 and MKE90468, discussed above.
- 5.6.48. An Early Iron Age briquetage site and possible saltern, MKE2996, and the findspot of an Iron Age pottery sherd, MWX19308, lie 835 m to the north-west of the PDA boundary.
- 5.6.49. MKE90477, an Early Iron Age hollow way, is located 980 m to the south-east of the PDA boundary.
- 5.6.50. There are no additional finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.51. There is assessed to be a medium high potential for previously unknown remains of this period to be encountered within the PDA.

#### PREHISTORIC / LATER PREHISTORIC

5.6.52. There are five HER entries which record the locations of Prehistoric and Later Prehistoric remains within the Study Area. Although the Later Prehistoric period is generally taken to mean periods dating to the Bronze Age and later, the Prehistoric period can refer to any of the above periods. These heritage assets are:

<sup>&</sup>lt;sup>63</sup> Champion 2019

<sup>&</sup>lt;sup>64</sup> iron came from different regions than bronze and therefore the trade routes are likely to have changed accordingly

<sup>&</sup>lt;sup>65</sup> Allen 2012, 13 and 16

 $<sup>^{66}\,\</sup>text{Bishop}$  and Bagwell 2005, 83

<sup>&</sup>lt;sup>67</sup> Hull 2019; Rouard 2019; Rouard 2021

- MWX19855, the findspot of Prehistoric pottery and flints, 895 m to the north-west of the PDA boundary;
- MKE20437, Later Prehistoric flints found during an evaluation, 470 m to the east of the PDA boundary;
- MKE80660, the findspot of a Later Prehistoric flint, 800 m to the east of the PDA boundary;
- MWX19840, the findspot of Later Prehistoric pottery, 835 m to the north-west of the PDA boundary; and
- MWX19849, the findspot of Later Prehistoric pottery, 890 m to the north-west of the PDA boundary

#### Unknown

- 5.6.53. There are five HER entries which record the locations of remains of unknown date within the Study Area whose form and/or associated finds may suggest a Prehistoric date. These heritage assets are:
  - MKE3015, cinerary urns and burnt stones found c.0.6m below the modern ground surface, 200 m to the east of the PDA boundary;
  - MKE3017, the site of earthworks described as 'ancient fortifications', 250 m to the north of the PDA boundary;
  - MWX19838, a curvilinear ditch containing worked and burnt flint, 990 m to the north-west of the PDA boundary;
  - MWX19848, the course of a ditch which runs into an adjacent cliff, 905 m to the north-west of the PDA boundary; and
  - MWX19850, an area of burnt flints possibly representing a hearth, 825 m to the north-west of the PDA boundary.

## HISTORIC PERIODS

#### ROMAN/ROMANO-BRITISH PERIOD (43CE-MID-5TH CENTURY CE)

- 5.6.54. The beginning of this period is generally taken to be the Claudian invasion of 43 CE, although there is clear evidence that the British Iron Age population in the South East, at least, had been in frequent contact with their Romanised counterparts in Gaul for much of the century or so prior to this date. However, it is after 43 CE that the Roman army made its presence felt within Britain, expanding military operations as far north as the Antonine Wall and as far west as Wales, and establishing large urban centres, large-scale infrastructure, centralised administration, the use of Latin, and a trend for villa complexes and Roman material culture<sup>68</sup>.
- 5.6.55. Being an extremely fertile area, the north cost of Kent and the Swale district contains a significant concentration of Romano-British villa sites and offers the most consistent evidence for late Romano-British settlement in Kent. Archaeological investigations on the East Kent Access Road have shown that most early Romano-British farmsteads have late Iron Age origins, indicating that 'the fundamental pattern of early Romano-British settlement [was] a native one and not immediately impacted by the events of the [Roman] conquest.'. The archaeological record suggests that there was population growth during the 1st and 2nd centuries but that this trend reversed during the 3nd 4th centuries, as shown by the abandonment of early Romano-British sites which were not then replaced. Romano-British rural settlement in northern Kent tends to take the form of sub-rectangular or rectilinear ditched enclosures<sup>69</sup>. The Swale continued to form a critical part of the Trans-Continental eastern trading route during the Romano-British period<sup>70</sup>.
- 5.6.56. Seemingly at odds with the wider regional trend discussed above, recent archaeological investigations in lwade have suggested the earlier Iron Age settlement there was abruptly abandoned at around the time of Roman Conquest, the area being visited only infrequently by Romano-British pastoralists for the remainder of the Romano-British period<sup>71</sup>. However, Romano-British settlement has been proven archaeologically within the south of Lower Halstow parish, to the south-east of the PDA and beyond this DBA's Study Area<sup>72</sup>.
- 5.6.57. The most recent phase of excavation in Field 3 of the PDA, relating to the expansion of the operational quarry there, identified elements of an Early Romano-British field system and associated isolated features with

<sup>&</sup>lt;sup>68</sup> Allen, Bird, and Croxford 2019.

<sup>69</sup> Booth 2016

<sup>&</sup>lt;sup>70</sup> Draper 2016a, 47

<sup>&</sup>lt;sup>71</sup> Bishop and Bagwell 2005, 7 and 104

<sup>&</sup>lt;sup>72</sup> Stevens 1999, 18

probable Late Iron Age antecedents; the core of this activity is likely situated to the north or east of the Phase 3 excavated area<sup>73</sup>.

- 5.6.58. There are 19 heritage assets recorded in the HER relating to this period within the wider Study Area. These include eight salt working sites, three kiln sites, four isolated archaeological features, and four findspots.
- The salt working sites within the Study Area are concentrated on Funton Marsh and Funton Creek. They consist of MKE3035, Romano-British saltworks near Funton complete with a rectangular hearth, evaporating vessels, triangular bricks, hearth debris, burnt soil, a firebar, vitreous slag, and the site of a possible building, 300 m to the north of the PDA boundary; MKE3036, a Romano-British saltworks containing salt pans near Funton, 230 m to the north of the PDA; MWX0012, a Romano-British salt working site at Bedlams Bottom, 290 m to the north of the PDA boundary; MWX17622, a Romano-British salt-panning site at Funton Creek, 130 m to the north of the PDA boundary; MWX19310, a Romano-British salt-panning site fringing Funton Marsh, 250 m to the north of the PDA boundary; MWX19757, a Romano-British in situ saltern<sup>74</sup>, 225 m to the north of the PDA boundary; and MWX19775, the remains of a Romano-British salt panning site, 145 m to the north of the PDA boundary.
- Salt production was an established small-scale industry and held an important economic role within the north coast of Kent during the Romano-British period, although it almost certainly had its origins in prehistory. The archaeological evidence from Funton Marsh and Funton Creek suggests that salt was primarily extracted from either sea water through the trapping of sea water in ditches, channels and depressions within inter-tidal zones and salt-marsh or through the burning of salt marsh plants to create a concentrated brine. The brine resulting from either method was then heated in briquetage vessels over a hearth until the salt was fully dried and tradeable. It is probable that this process was both carried out in full on site and was taken only to its intermediate stage, with the brine solution transported to other sites for heating, drying and distribution. It is probable that salt working was seasonal industry (late spring early autumn) and that nearby local settlements controlled the production of salt, although some of the salt works may have been controlled by villa estates<sup>75</sup>.
- 5.6.61. Several kiln sites are also recorded within the Study Area in the HER, some of which are likely to have been related to the nearby salt working sites discussed above. These are MKE3020, evidence of industrial activity in the 2<sup>nd</sup> century CE including briquetage and pottery, 75 m to the north of the PDA boundary; MKE3022, a possible Romano-British kiln site, 250 m to the south-west of the PDA boundary; MKE3025, the site of a possible Romano-British pottery kiln (now lost through erosion), 990 m to the west of the PDA boundary; and MWX19307, Roman kiln debris and pottery near Halstow Creek, including an early 1st century salt winning area including circular ditch, post holes and natural drainage channel, 830 m to the north-west of the PDA boundary.
- 5.6.62. The locations of several isolated Romano-British features identified during archaeological investigations are recorded under HER entries MKE90465, a Romano-British post hole and possible Romano-British cremation, 500 m to the east of the PDA boundary; MKE90469, a Romano-British cremation, 610 m to the east of the PDA boundary; and MKE90471, a Romano-British ditch, 715 m to the east of the PDA boundary.
- 5.6.63. Romano-British findspots within the Study Area are recorded in HER entries MKE20387, the findspot of two sherds of Roman pottery were found during excavation at Ferry Road, Iwade, 920 m to the east of the PDA boundary; MWX19758, the findspot of Romano-British pottery and briquetage, 230 m to the north of the PDA boundary; MWX17494, the findspot of Romano-British pottery, 700 m to the north of the PDA boundary; and MWX19852, the findspot of Romano-British pottery sherds, 805m to the north-west of the PDA boundary.
- 5.6.64. There are no additional finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.65. The archaeological record of the Study Area suggests that extensive salt working activity occurred between 100 m and 1 km to the north, north-west and north-east of the PDA. The proximity of these saltworks to the PDA's northern boundary, and the low elevation of the land within the north-western and central western areas of the PDA, maintains the potential for salt working related activity to have been carried out within the PDA boundary during the Romano-British period. However, most of the PDA, lies at higher elevations than the foreshore and exhibits undulating terrain: it most likely formed agricultural hinterland and was likely to have been regularly traversed by salt workers travelling to the saltworks.

<sup>&</sup>lt;sup>73</sup> Rouard 2021

<sup>&</sup>lt;sup>74</sup> Salterns are irregular mounds formed by the dumping of the waste from the salt working process (Carpenter, Newsome, Small and Hazell 2013, 42)

<sup>75</sup> Biddulph 2016

5.6.66. There is assessed to be a medium potential for previously unknown remains of the Romano-British period to be encountered within the PDA.

#### EARLY MEDIEVAL PERIOD (410-1066 CE)

- 5.6.67. The Early Medieval period was one of great and rapid change. It is traditionally taken to begin with the return of Roman troops to Rome in the early  $5^{th}$  century, but there is substantial evidence that the material culture and social structure which had been introduced into Britain were not abandoned overnight. The archaeological record does indicate an economic and social downturn between the mid- $5^{th}$  century to early  $6^{th}$  century, when the Angles, Saxons and Jutes arrived on British shores. From the  $6^{th}$  century onwards, British material culture and society underwent seismic changes, including the cultural effects of Viking raiding and settlement during the late  $7^{th} 10^{th}$  centuries; the transition from paganism to Christianity; the development of kingdoms; the emergence of modern urbanisation; and the development of minsters, estates and manors. Many of these changes can still be glimpsed today, for example in the boundaries of modern counties and parishes, which often mirror that of the Anglo-Saxon kingdoms and estates  $^{76}$ .
- 5.6.68. Documentary sources such as the Anglo-Saxon Chronicle narrate that, during the mid-5<sup>th</sup> century, Kent was the subject to civil unrest which led to Germanic and Scandinavian peoples being invited to settle in exchange for assistance in the fighting. Available archaeological evidence, especially that from burial, does not indicate an abrupt arrival of foreign peoples but rather a significant Scandinavian and Germanic cultural influence during the 5<sup>th</sup> and 6<sup>th</sup> centuries CE<sup>77</sup>.Later documentary sources illustrate that the Viking incursions into Thanet could be violent, such as the sacking of the monastery at Minster. In general, the latter half of the Early Medieval period appears to have been at least politically unstable if not violent, with vying nobles, kings and kingdoms jostling for regional control<sup>78</sup>.
- 5.6.69. The pattern of Early Medieval settlement in the north coast of Kent consisted of isolated farmsteads or small hamlets rather than nucleated villages. No true 'strip' field systems, common elsewhere in England, were utilised; instead, privately-owned enclosed fields were interspersed with common land. Therefore, cropmarks of ridge and furrow are not seen in the area. The Swale continued to form a critical part of the Trans-Continental eastern trading route during the Early Medieval period<sup>79</sup>. During the 9<sup>th</sup> century, the Isle of Sheppey, 2.5 km to the north-east of the PDA, and parts of the Kentish north coast suffered from waves of attacks from Viking invaders<sup>80</sup>.
- 5.6.70. The PDA formed part of the hundred of Milton Regis during the Early Medieval period, which in turn was in the Milton half-lathe<sup>81</sup>. Documentary sources suggest that Milton Regis emerged at the beginning of the period as a royal estate whose primary economy was trade, likely seasonal. From the 9<sup>th</sup> century, the estate had blossomed into a small market and port town, and for a short period in 892 was the winter camp of Viking invaders. It is first seen in documentary sources dated to 893<sup>82</sup>. Sittingbourne and Milton Regis are the only documented towns in the hundred during the Early Medieval period, a scenario currently supported by archaeological evidence<sup>83</sup>.
- 5.6.71. Archaeological evidence suggests that Early Medieval Iwade parish was low-lying, marshy and isolated<sup>84</sup>. However, the fertility of the reclaimed salt marshes and the continued importance of the salt trade is certain to have attracted some, at least seasonal, settlement; as Brookes argues, 'it would be a mistake to regard the coastal marshes as devoid of settlement [during the Early Medieval period].'<sup>85</sup>. There is also evidence, primarily through nearby place names such as Sheppey, that the land surrounding the PDA and likely the PDA itself was

<sup>&</sup>lt;sup>76</sup> Thomas 2019

<sup>&</sup>lt;sup>77</sup> Thomas 2019, 15

<sup>&</sup>lt;sup>78</sup> Simkins 1932

<sup>&</sup>lt;sup>79</sup> Draper 2016a, 44 and 47

<sup>&</sup>lt;sup>80</sup> Brookes 2016, 106

<sup>&</sup>lt;sup>81</sup> Lathes are an administrative unit unique to Kent which were likely to have been the primary administrative division of Early Medieval Kent, taking in the smaller administrative units known as hundreds from the 10<sup>th</sup> century (Morgan and Morris 1983). Documentary references to lathes appear from the 6<sup>th</sup> century onwards but Milton half-lathe is thought to have been formed during the 9<sup>th</sup> or 10<sup>th</sup> centuries (Draper 2016a, 49). Milton half-lathe contained only the hundred of Milton Regis (Morgan and Morris 1983).

<sup>82</sup> Glover 1982, 128

<sup>83</sup> Draper 2016b, 91

<sup>84</sup> Draper 2016b, 92

<sup>85</sup> Brookes 2016, 127

used seasonally for sheep and possible pig farming during this period<sup>86</sup>. Recent archaeological investigations in Iwade town have not produced any evidence of Early Medieval occupation<sup>87</sup>.

- 5.6.72. The Early Medieval history of Lower Halstow is not attested in documentary sources but is also likely to have formed part of the hundred of Milton Regis and may have been subject to Viking raids. Archaeological evidence for Early Medieval settlement within the parish exists but does not fall within this DBA's 1 km Study Area<sup>88</sup>.
- 5.6.73. Eleventh century documents pertaining to the North Kent Marshes, in which the PDA lies, suggest that Early Medieval settlement was focussed on the marsh fringe, between the available 'upland' and the marsh pastures<sup>89</sup>. At present, the PDA falls within a fringe area between marsh land and higher dry land, and therefore may have been a focus of settlement according to the above criteria.
- 5.6.74. There are no heritage assets recorded in the HER from this period within the PDA.
- 5.6.75. There are two heritage assets of Early Medieval date recorded in the HER relating to this period within the wider Study Area. These are MKE20388, the findspot of very late Early Medieval pottery within a predominantly Medieval site, 920 m to the west of the PDA boundary; and MKE90473, an Early Medieval enclosure found during archaeological excavation, 830 m to the south-east of the PDA boundary.
- 5.6.76. Place names are key to understanding and interpreting Early Medieval settlement, especially as archaeological evidence is limited within the Study Area. Although work to complete the survey of Kentish place names by the English Place Name Society is still ongoing<sup>90</sup>, Wallenburg and Glover have both produced dictionaries for the many Kentish settlements, if not all isolated farmsteads or field names. Modern place names which are given as having their etymological origins in the Early Medieval period are as follows:
  - Norwood, OE norð + wudu 'wood to the north of the parish'; 91
  - Milton, OE *middel* + *tūn* 'Middle farmstead'<sup>92</sup>;
  - Iwade, OE *īw gewæd* 'ford where the yews grow"93;
  - Lower Halstow, OE *hālig stow* 'holy place'94;
  - Cutnails Farm, OE personal name Cutta + halh 'Cutta's corner of the field'95;

These place names indicate a strong Anglo-Saxon influence rather than a Viking or Latin influence.

- 5.6.77. There are no finds of this date recorded within the parishes of Iwade and Lower Halstow on the Portable Antiquities Scheme database.
- 5.6.78. In summary, the PDA is most likely to have been in use as agricultural hinterland during the Early Medieval period, particularly for sheep grazing. It is possible that the northern boundary of the PDA, however, fell within the footprint of the salt working industry. The PDA was likely to have been regularly traversed by salt workers moving between nearby settlements and the salt working areas.
- 5.6.79. Therefore, there is assessed to be a low potential for previously unknown remains of this period to be encountered within the PDA.

Medieval Period (1066CE-1500CE)

5.6.80. The Medieval period begins with the cultural and political shock of the Norman Conquest in 1066CE and is generally understood to end around the beginning of travel into and exploitation of the Americas and Africa at the beginning of the 16<sup>th</sup> century. Although material culture and agricultural practices appear to have changed little, Medieval society was subjected to the feudal system, and the building of castles and moated

<sup>&</sup>lt;sup>86</sup> Bishop and Bagwell 2005, 7

<sup>87</sup> Bishop and Bagwell 2005, 104

<sup>&</sup>lt;sup>88</sup> Stevens 1999, 19

<sup>&</sup>lt;sup>89</sup> Carpenter, Newsome, Small and Hazell 2013, 163

<sup>90</sup> https://www.nottingham.ac.uk/research/groups/epns/survey.aspx, accessed 17th November 2021

<sup>&</sup>lt;sup>91</sup> Glover 1982, 136

<sup>&</sup>lt;sup>92</sup> Glover 1982, 128

<sup>93</sup> Glover 1982, 106

<sup>94</sup> Glover 1982, 97

<sup>95</sup> Glover 1982, 54

sites, particularly in the years immediately following the Conquest, was commonplace. The era is also characterised by the coming of the Black Death and the social and economic upheavals which followed<sup>96</sup>.

- The most common farmstead type to found within the north coast of Kent is the 'regular courtyard' farmstead. Their outfarms were sometimes constructed on the marshes, which may indicate that marshes were managed by bailiffs, lookers and shepherds for absentee landlords<sup>97</sup>. The reclamation of intertidal land through a process known as inning (the building and maintenance of sea walls to prevent incursions by the tides) grew exponentially during the Medieval period, and by the end of the period extensive parts of the north coast of Kent had been inned<sup>98</sup>.
- 5.6.82. Salt production continued to be an important industry within northern Kent throughout the Medieval period. However, by the 14<sup>th</sup> century, Medieval salt production had waned due to competition with cheaper French imports<sup>99</sup>. Of increasing economic importance for the northern coast of Kent during the Medieval period was the grazing of sheep to serve the London markets. Salt marshes were used intensively for this, as the high salt content of their vegetation appears to have substantially decreased the risk of parasites such as liver fluke and therefore increased and/or maintained the health of the flock<sup>100</sup>.
- 5.6.83. In the Domesday book of 1086, the king held the Manor or Milton Regis<sup>101</sup>. The manor contained 84 surlungs of land<sup>102</sup>, 309 villagers with 169 ploughs, 6 mills, 27 salt houses, 32 fisheries and 10 slaves. Hamo the sheriff, Hugh of Port, and Wadard and Young Alnoth held some of this land from the king, whist the abbot of St. Augustine's held the church and tithes of the manor<sup>103</sup>.
- During the 12<sup>th</sup> and 13<sup>th</sup> centuries, tracts of land within the Manor of Milton were granted by the Crown to noble families and individuals. These tracts of land became their own manorial estates, which were subservient to the Manor of Milton. These subservient manors included the Manor of Barksore, which encompassed land within the north-eastern corner of the PDA and lay within Lower Halstow parish; the Manor of Holmes or Helmes (sometimes referred to as Soames), the remains of whose moat is identified within the HER under entry MKE3009, which abuts the south-eastern corner of the PDA, within Iwade parish; and the Manor of Norwood or Northwood Chasteners (MKE3010), abutting the southern boundary of the PDA<sup>104</sup>.
- 5.6.85. Although Iwade parish church was constructed during the early 13<sup>th</sup> century, recent excavations in the village have produced evidence of renewed settlement in the area from the late 12<sup>th</sup> century onwards<sup>105</sup>. Iwade village appears to have been composed of several farmsteads fronting onto 'The Street', a Medieval trackway and Holloway now known as the Sheppey Way. Lower Halstow village may be of slightly earlier date, as there are documentary sources naming the settlement dated to c.1100, and its parish church was established during the latter half of the 12<sup>th</sup> century<sup>106</sup>.
- 5.6.86. Documentary sources show that Culnells or Cutnails Farm, to the south of the PDA, had been established by at least the early 13<sup>th</sup> century<sup>107</sup>.
- 5.6.87. Documentary sources indicate that Funton was settled by the mid-14<sup>th</sup> century, deriving its name from the Old French Fontaine, 'fountain or spring'. Documents dating to 1410 refer to it as a manor, but this is likely to have been short-lived, as it is not identified by Halsted in the late 18<sup>th</sup> century<sup>108</sup>.
- 5.6.88. The establishment of Iwade and Lower Halstow villages and Culnells or Cutnails Farm is likely to have corresponded with a period of land reclamation. Land within Iwade and Lower Halstow parish was probably subdivided and parcelled out to each of the manors listed in paragraph 5.7.85 as well as the inhabitants of the

<sup>&</sup>lt;sup>96</sup> Weeks 2019

<sup>97</sup> Carpenter, Newsome, Small and Hazell 2013, 115

<sup>98</sup> Carpenter, Newsome, Small and Hazell 2013, 139

<sup>99</sup> Carpenter, Newsome, Small and Hazell 2013, 43

<sup>&</sup>lt;sup>100</sup> Carpenter, Newsome, Small and Hazell 2013, 125 and 135

<sup>&</sup>lt;sup>101</sup> The administrative units of Milton Regis given in the Domesday Book, from smallest to largest, are Milton Hundred, the Manor of Milton, and Milton half-lathe (see Halsted 1798, available online at <a href="https://www.british-history.ac.uk/survey-kent/vol6">https://www.british-history.ac.uk/survey-kent/vol6</a>, accessed 26<sup>th</sup> January 2022)

 $<sup>^{102}</sup>$  A surlung was the name given to a unit of around 200 acres of ploughland (Page 1908, 322 – 323)

<sup>&</sup>lt;sup>103</sup> Morgan and Morris 1983

<sup>104</sup> Halsted 1798, available online at https://www.british-history.ac.uk/survey-kent/vol6, accessed 26th January 2022

<sup>&</sup>lt;sup>105</sup> Bishop and Bagwell 2005, 104

<sup>&</sup>lt;sup>106</sup> Glover 1982, 97; Phillpotts and Hawkins 2015; Halsted 1798, available online at <a href="https://www.british-history.ac.uk/survey-kent/vol6">https://www.british-history.ac.uk/survey-kent/vol6</a>, accessed 26<sup>th</sup> January 2022

<sup>107</sup> Glover 1982, 54

<sup>&</sup>lt;sup>108</sup> Glover 1982, 77

villages<sup>109</sup>. It is highly likely that the PDA comprised one or several of these parcels of land during the Medieval period, probably in use as pasture rather than arable land (see paragraph 5.7.83).

- 5.6.89. There are no known heritage assets recorded in the HER relating to this period within the PDA.
- 5.6.90. There are 12 heritage assets recorded in the HER as containing remains of Medieval date within the Study Area. One of these is the Grade I listed 13<sup>th</sup> century Church of All Saints, the parish church of Iwade (NHLE 1069380 and HER MKE33455, 900 m to the east of the PDA boundary). The remaining 11 heritage assets consist of the remains of a manorial estate, small scale industrial sites, field systems, archaeological features and findspots.
- 5.6.91. The Manor of Norwood or Norwood Chasteners, discussed above, is recorded in the HER under entry MKE3010, located 880 m to the south-west of the PDA boundary. Documentary sources demonstrate that the manor was held by the Norwood (formerly Shepey) family during the Medieval period and contained a deer park and moated manor site within its grounds<sup>110</sup>. The remains of the moat survive into the present, although in poor condition, but no trace of the deer park has been found.
- Archaeological remains of small-scale industry within the Study Area are represented by HER entries MKE3522, the location of three probable salt mounds, 970 m to the north-east of the PDA boundary; and MKE20388, a possible hearth and MKE20389, a group of features probably representing ploughed-out ash pits, metalworking hearths or fire pits, which indicate a 12<sup>th</sup> 14<sup>th</sup> century metalworking site, 920 m to the east of the PDA boundary. These remains show that a variety of small-scale industries were active within the Study Area during the Medieval period.
- 5.6.93. Identified Medieval field systems within the Study Area are recorded under HER entries MKE20356, a 12<sup>th</sup> 14<sup>th</sup> century field system containing a droveway and a post-built structure, 530 m to the south-east of the PDA boundary; and MKE90464, a possible field system incorporating ditches, pits and an enclosure, 480 m to the east of the PDA boundary. MKE20358 also falls within the category, recording the remains of two large enclosures of 13<sup>th</sup> or 14<sup>th</sup> century date and numerous ditches, linear features, pits and postholes of 12<sup>th</sup> to 14th century date; these are located 950 m to the east of the PDA boundary<sup>111</sup>.
- 5.6.94. Recorded archaeological features include MKE3009, the remains of a Medieval moat at Moat Farm (previously known as the Manor of Holmes, Helmes or Soames, discussed above), abutting the PDA's southern boundary; and MKE78037, the site of a Medieval pit and dew pond, 945 m to the south-east of the PDA boundary.
- 5.6.95. Findspots, often recorded by the Portable Antiquities Scheme, comprise the more common Medieval heritage assets within the Study Area. They are MKE106133, the findspot of a copper alloy sword, 695 m to the south of the PDA boundary; MKE113932, the findspot of a late Medieval or early Post-Medieval gold ring, 490 m to the north-east of the PDA boundary; MKE20431, the findspot of Medieval pottery, 890 m to the east of the PDA boundary; and MKE73158, a copper alloy harness fitting, 850 m to the north-west of the PDA boundary. These findspots represent casual losses and point to the movement of people through the Study Area.
- The archaeological and documentary record suggests that settlement within the Study Area was focussed on the villages of Iwade and Lower Halstow, with a handful of surrounding farmsteads and/or outfarms. The marsh lands were primarily utilised for salt working and sheep grazing, although other small-scale specialist industries were also practised. Within this landscape, the PDA probably formed part of the agricultural hinterland, likely focussed on pasture rather than arable use. It is possible that the northern boundary of the PDA however, as with earlier periods, was utilised as part of the salt working industry. The PDA was likely to have been regularly traversed by salt workers moving between the settlement and the saltworks. Now-demolished marshland outfarms may have been present within the PDA.
- 5.6.97. There is assessed to be a low potential for previously unknown remains of this period to be encountered within the PDA.

#### Post-Medieval Period (1500-1900CE)

5.6.98. The Post-Medieval period is characterised by the rise of market towns and cities; the social, political, and economic effects of the Industrial Revolution and capitalism; the movement of people from the countryside and into urban areas; and the fall of the feudal system and disintegration of medieval manorial estates. Much change also occurred within the religious sphere, with the monasteries being dissolved and their wealth

<sup>&</sup>lt;sup>109</sup> Phillpotts and Hawkins 2005; Halsted 1798, available online at <a href="https://www.british-history.ac.uk/survey-kent/vol6">https://www.british-history.ac.uk/survey-kent/vol6</a>, accessed 26<sup>th</sup> January 2022

<sup>&</sup>lt;sup>110</sup> A detailed history of this manor is given in Halsted 1798, available online at <a href="https://www.british-history.ac.uk/survey-kent/vol6">https://www.british-history.ac.uk/survey-kent/vol6</a>, accessed 26<sup>th</sup> January 2022

<sup>111</sup> Further details of these remains are discussed in Bishop and Bagwell 2005, 104 - 105

distributed to the new Church of England and noble families by Henry VIII in 1540, and the rise of Protestantism in the 17<sup>th</sup> century. The political upheavals these events created contributed to the outbreak of civil war in 1642. During the latter two centuries of the Post-Medieval period, Britain profited greatly from the colonisation of the Americas and Africa, most notably through the slave trade, and amassed a global and hugely wealthy empire<sup>112</sup>.

- 5.6.99. From the 18<sup>th</sup> century, the Swale played a key role in the defence of Britain<sup>113</sup>, and fostered a thriving brick making industry during the late Post-Medieval period<sup>114</sup>. The Isle of Sheppey, being only accessible by boat, was separated from the mainland until 1860, when the Kingsferry Bridge was built, taking both road and rail<sup>115</sup>.
- 5.6.100. The Medieval local economy of the Study Area (primarily salt working and sheep grazing) does not appear to have changed during much of the Post-Medieval period, and the Medieval settlement and field system patterns described above continued into at least the 19<sup>th</sup> century<sup>116</sup>.
- 5.6.101. By the 19<sup>th</sup> century, the final demise of the salt working industry had occurred, but had arguably been replaced by the brickmaking industry, at least in Lower Halstow. The rise of this industry combined with the opening of the London, Chatham and Dover railway line in the 1859<sup>117</sup>, to the south-east of the Study Area, may have been responsible for the population growth that Lower Halstow experienced during the latter half of the 19<sup>th</sup> century<sup>118</sup>.
- 5.6.102. Flooding of the marshes was a frequent problem in Iwade and Lower Halstow parishes during the Post-Medieval period, referenced extensively in contemporary documents. These floods required frequent reclamation works and regular maintenance of the sea walls, presumably requiring engagement from every member of the community<sup>119</sup>.
- 5.6.103. The land surveyed for Sir John Dorell's estate map of 1674 (KRO<sup>120</sup> U229/P4; Illus. 51) included most of Field 4 of the PDA and all of Fields 5 and 8 of the PDA. It demonstrates that, during the late 17<sup>th</sup> century, Field 4 was divided into more than three separate fields, but that Field 5 and probably Field 8 had already taken on their modern form<sup>121</sup>. The three fields within Field 4 belonging to Sir John Dorell were named Barn Field (OE *bere-warn*, 'barn', originally 'barley building'<sup>122</sup>), Rushe(y) Field (OE *risc*, *rysc*, *riscig*, 'land overgrown with rushes'<sup>123</sup>), and Thissye (?) Field (probably deriving from OE *Pistel* 'thistle'<sup>124</sup>), Field 5 was named The Six Acres, and Field 8 was named The Eight Acres.
- This map confirms that the building alluded to in field name 'Barn Farm' is of at least early Post-Medieval, if not Medieval date; however, it does not indicate whether the barn was still standing in 1674. It also shows that field boundary HA1 between Fields 7 and 8, the above-ground remains of which were identified during the site visit, is of at least early Post-Medieval date and very likely to be of Medieval date. Lastly, the map demonstrates that School Lane, Basser Hill and the track between Field 4 and Fields 7 and 8 had been established by 1674.

<sup>&</sup>lt;sup>112</sup> Barber 2019

<sup>&</sup>lt;sup>113</sup> Swale Borough Council 2017, 39

<sup>114</sup> Swale Borough Council 2017, 42

<sup>&</sup>lt;sup>115</sup> Swale Borough Council 2017, 49

<sup>&</sup>lt;sup>116</sup> Carpenter, Newsome, Small and Hazell 2013

<sup>&</sup>lt;sup>117</sup> Swale Borough Council 2017, 52

<sup>&</sup>lt;sup>118</sup> Carpenter, Newsome, Small and Hazell 2013, 44 and Stevens 1999, 34 and 35

<sup>119</sup> Carpenter, Newsome, Small and Hazell 2013, 139; Stevens 1999, 124 - 127

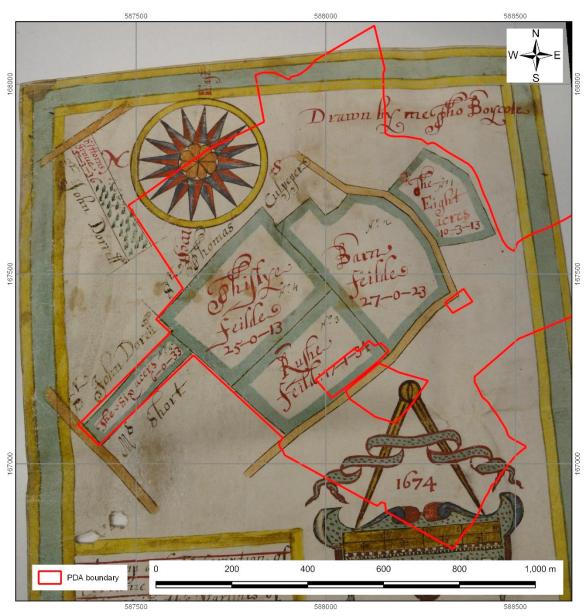
<sup>120</sup> Kent Record Office

<sup>&</sup>lt;sup>121</sup> Therefore, Field 5 does not fall within HLC 240 as stated in the Kent Historic Landscape Characterisation project, fields of 19<sup>th</sup> or 20<sup>th</sup> century date, but is more suited to be assigned HLC type HLC 53, late Medieval – 18<sup>th</sup> century piecemeal enclosure

<sup>&</sup>lt;sup>122</sup> Cavill 2018, 23

<sup>&</sup>lt;sup>123</sup> Cavill 2018, 362

<sup>&</sup>lt;sup>124</sup> Cavill 2018, 422



Illus 51. Sir John Dorell's estate map of 1674 (KRO U229)

5.6.105. Halsted, writing in 1798, provides contemporary commentary on the parishes of Iwade and Lower Halstow, providing us with a wider context for the landscape, land use and settlement of the PDA.

#### 5.6.106. Halsted described Iwade thus<sup>125</sup>:

Commonly called Warde, lies northward from Bobbing last-described, the parish of Milton intervening, the greatest part of which lies within that hundred, over which that manor claims as paramount. The remaining, or eastern part of it is within the hundred of Tenham, and the lands in it are held of that manor.

This parish lies very low, and on a level with the adjoining marshes, the situation and look of it is not unlike the sens in Lincolshire. It is hardly known, excepting to those who travel towards the Isle of Shepey, to which the road leads through this parish over the marshes to the King's ferry, from which the village, with the church, stand at about a mile distance, and about two from the town of Milton north-westward.

There are sixteen houses in it, and about sixty or seventy inhabitants. The lands are very even and flat, of a soft boggy nature, almost all of them are pasture ground and marshes, which have great quantities of sheep continually seeding on them... Its low and moist situation close to so large a tract of marshes and the waters of the Swale, which are its northern boundary, render it hardly ever free from fogs and noisome vapours, and in summer in dry weather, the stench of the mud in the ponds and ditches, and the badness of the water, contribute so much to its

<sup>125</sup> Halsted 1798, available online at https://www.british-history.ac.uk/survey-kent/vol6, accessed 26th January 2022

unwholesomeness, that almost every one is terrified from attempting to live in it, and it is consequently but very thinly inhabited.

From Halsted's description, sheep grazing was clearly the principal trade in Iwade. His commentary suggests that, although the land may have been reclaimed from the salt marshes, it was largely unimproved, and that the area probably suffered from mosquito-borne diseases, leading to low population levels.

5.6.107. Halsted's description of Lower Halstow is as follows 126:

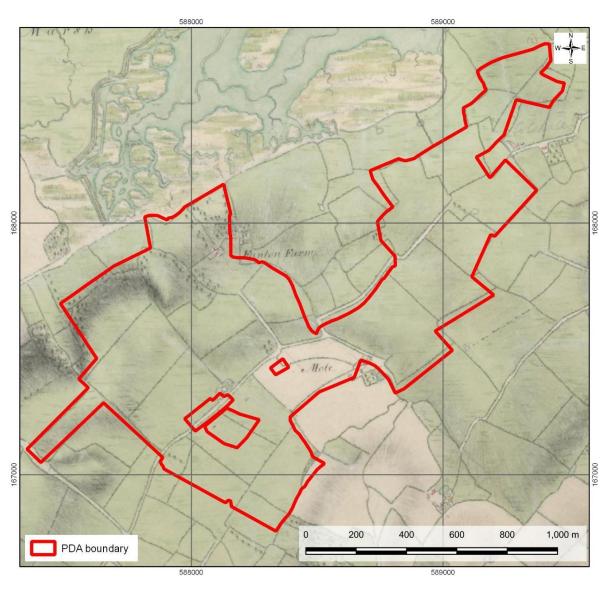
[Lower Halstow] is a very obscure and unfrequented parish, though the road from Chatham to the King's Ferry leads through the lower part of it, across a branch of the creek, here called the Stray, which is at high water hardly passable with safety...Halstow creek [...] becomes so shallow, as to be used only by the small vessels belonging to the dredger men, who live here, and make up the principal part of the inhabitants of this parish...There are two small hamlets in the lower part of it, near the creek, the one built round a green, and called from thence Halstow-green, and the other at a small distance from it called Lower street. This part of the parish lies on a level, and open to the adjoining marshes, which render it most unpleasant, and at the same time unhealthy to an extreme, the look of which the inhabitants carry in their countenances; indeed, it seems so enveloped among creeks, marshes and salts, the look over which extends as far as the eye can see, that it seems a boundary, beyond which the traveller dreads to hazard his future safety.

The whole of this parish, excepting towards the marshes, has a woody appearance, the shaves and hedge-rows being very broad round the fields, it contains about twelve hundred acres of land, the soil of it is in general a very stiff and wet clay, a heavy tillage land, some few parts of it are gravel, and others, a black unfertile sand, with much broom and brakes, or fern on it. The clayey lands have of late years been much improved, by spreading them over with lime, brought at a heavy expense from the upper part of Hartlip,..Towards the eastern part of the parish the hills rise pretty high, over much of which the adjoining manor of Norwood in Milton claims. In the north-east part is Basser farm [Barksore Manor], almost the whole of which is pasture, and some of it so fertile as to be good fatting land for beasts.

Halsted's description indicates that sheep grazing was the principal trade of Lower Halstow, as in Iwade, although dredging was also a significant industry. Lower Halstow may also have suffered from mosquito-borne diseases, although appears to have more heavily populated than Iwade at this time. It contained large areas of woodland as well as marshland.

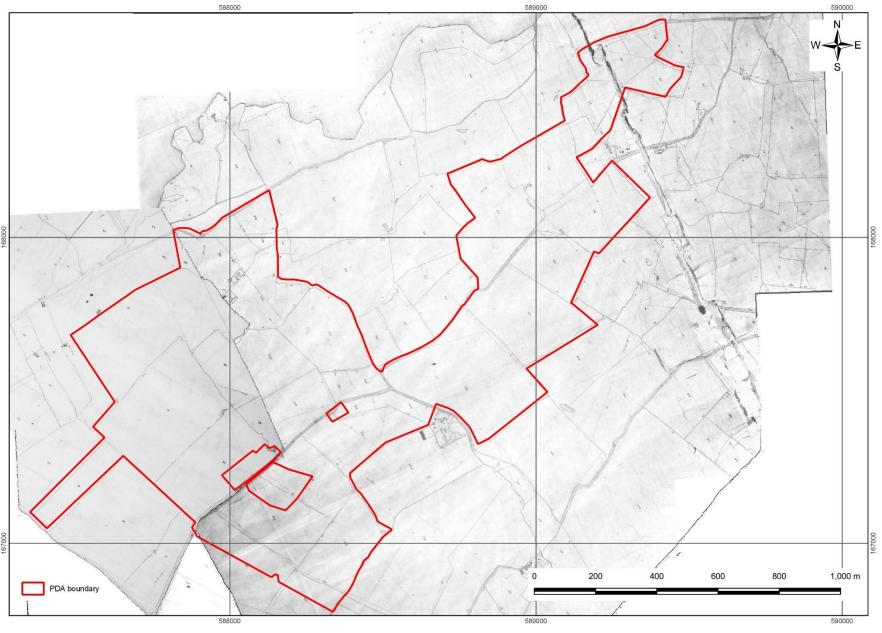
- Solution 5.6.108. Roughly contemporary with Halsted is the OS map of Halstow, dated 1797, on which the whole of the PDA is shown in detail (Illus. 52). The PDA was separated into 31 fields at this date. The settlements of the 18th century Funton Farm (HA4) and 'Mote', analogous with the Manor of Holmes or Helmes discussed above, were marked, and School Lane and the track between Field 4 and Fields 7 and 8 shown. The offshoot of School Lane leading to the modern properties bordering Field 9 of the PDA continued eastwards towards Raspberry Hill caravan park at this date, running between Fields 10 and 11 and Field 12. This now-abandoned section of the lane has been assigned the number HA8 and is now in use as an (albeit overgrown) public footpath. One pond was marked within the PDA on this map, in Field 13; no corresponding feature was seen during the site visit. A pond was also marked outside of the PDA but within Field 4, corresponding to the extant pond which lies next to Tiptree Farm.
- 5.6.109. The small, southerly land parcel of the PDA lay within the corner of an open agricultural field. As this reflects the landscape in which it sits today, the subsequent map regression does not discuss the evolution of this part of the PDA.
- 5.6.110. Following comparison with later tithe and OS mapping, it is believed that the building named as Funton Farm on the 1797 OS map, HA4, was not the same building as that shown on later mapping. The 18<sup>th</sup> century Funton Farm must therefore have been demolished and rebuilt close by between 1797 and 1841. It is possible that the Post-Medieval ceramic building material noted along the northern boundary of Field 6 during the site visit are related to HA4.
- 5.6.111. The boundary between the parishes of Iwade and Halstow, today located within the PDA, is not shown on the OS map of 1797. However, Halsted is clear that Iwade and Lower Halstow were separate parishes of some longevity by 1798 and identifies Holmes or Helmes manor (shown as 'Mote' on the 1797 map) as lying within Iwade but Little Barksore manor (shown as 'Little Barksoe' on the 1797 map) as lying within Lower Halstow. Therefore, despite not being depicted, it is almost certain that the parish boundary between Iwade and Lower Halstow traversed the PDA in 1797 much as it does today.

<sup>126</sup> Halsted 1798, available online at <a href="https://www.british-history.ac.uk/survey-kent/vol6">https://www.british-history.ac.uk/survey-kent/vol6</a>, accessed 26th January 2022



Illus. 52. 1797 OS map of Halstow

- 5.6.112. The PDA is shown on the tithe maps of Iwade, dated 1841, and Lower Halstow, dated 1840 (Illus. 53). These maps illustrate that by this date the PDA had been further subdivided and consisted of 34 fields. As discussed above, the original iteration of Funton Farm, HA4, had apparently been demolished and replaced with a new farmstead and at least one rectangular outbuilding to HA4's west. The location of this new, 19<sup>th</sup> century Funton Farm is entered into the HER under entry MKE85220. A small parcel of land within modern Field 6 had been enclosed and a building, HA5, constructed, along with a pond, HA3, the remains of which were seen during the site visit. It is possible that the Post-Medieval ceramic building material noted along the northern boundary of Field 6 during the site visit are related to HA5 and/or the 19<sup>th</sup> century iteration of Funton Farm.
- 5.6.113. Within Field 4, a probable pond, HA10, and two possible small buildings, HA11, stood on the boundary of tithe plots 46 and 48. A second probable pond, HA9, lay adjacent to Field 4's western boundary, close to Field 5. Ponds also lay within Field 2 (HA12), Field 8 (HA13), and Field 15 (HA14). No indications of these ponds were seen during the site visit. However, HA6, two ponds lying between Fields 12 and 14; HA15, a pond in Field 11; and HA16, a pond in Field 15, were recorded during the site visit.



Illus. 53. Iwade, Halstow and Milton tithe maps of 1840 - 1841

5.6.114. The tithe map's accompanying apportionment lists the following names and land uses for the plots which fall within the PDA and are shown in Tables 5 and 6.

Table 5: Tithe apportionment for Iwade

Owner	Occupier	Plot No	Name	Land Use
John Tulleston	William Fairman and Samuel Creed	53	4 acre piece	Pasture
Edward Baron	Thomas Murton	56	Licklehams <sup>127</sup>	Pasture
John Tulleston	William Fairman and Samuel Creed	57	Lower 4 acres	Pasture
Lord George William Harris	James Fullagar	58	Lock <sup>128</sup> Field	Pasture
Wardens of Kings Ferry	James Terry	155	Ferry warden piece	Pasture
John Tulleston	William Fairman and Samuel Creed	156	Ruffett <sup>129</sup> Piece	Pasture and ruffett
William Jefferys	Thomas Tapp	219	Funton House Meadow	Pasture
William Jefferys	Thomas Tapp	220	Funton House wood	Wood
William Jefferys	Thomas Tapp	222	Part of Barn field	Arable
William Jefferys	Thomas Tapp	223	Tap Field	Arable
William Jefferys	Thomas Tapp	224	Funton House	House and yard
William Jefferys	Thomas Tapp	225	Funton farm yard	Barn yards etc
The Hon. John Wingfield Shatford	Thomas Wakely	226	Great Bratts <sup>130</sup> Ruffett	Wood
Lord George William Harris	Henry William Matson	227	Part of Eye <sup>131</sup> field	Pasture
Lord George William Harris	Henry William Matson	228	Part of 12 acre field	Pasture
Lord George William Harris	Henry William Matson	229	10 acre piece	Pasture
Edward Baron	Thomas Murton	234	Barkers <sup>132</sup>	Pasture
The Hon. John Wingfield Shatford	Thomas Wakely	235	11 acre field	Pasture
Lord George William Harris	Edward Anderson	236	9 acres	Pasture
Rev, Richard Gascoyne	William Gascoyne	237	Thistle Field	Pasture
Lord George William Harris	Edward Anderson	241	Weather cock <sup>133</sup> field	Pasture
Lord George William Harris	Edward Anderson	242	Plantation	Orchard
Lord George William Harris	Edward Anderson	243	Part of Vents <sup>134</sup> field	Arable and shaw
Lord George William Harris	Edward Anderson	244	Part of Vents field	Hops and share
Lord George William Harris	Edward Anderson	245	Long meadow	Orchard and Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	247	11 acre field	Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	248	9 acre field	Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	249	18 acre field	Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	250	Part of 16 acre field	Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	252	7 acre field	Pasture
Thomas Hartnett Junior	Thomas Hartnett Junior	253	12 acre ruffett	Pond and Pasture

Table 6: Tithe apportionment for Lower Halstow

Owner	Occupier	Plot No	Name	Land Use
Executors of William Jefferys	Thomas Tapp	43	Funton Hill Field	Α
Lord George William Harris	Henry Matson	46	Bushey Field	Р

<sup>&</sup>lt;sup>127</sup>The etymology of this name is unknown, but the element -ham is likely to derive from either Old English *hām*, 'homestead' or Old English *hamm* 'enclosure, land within the bend of a river' (Cavill 2018, 190). The suffix 's' may indicate that the first element 'Lickle' derived from a personal name and indicates possession of the land parcel

<sup>&</sup>lt;sup>128</sup> Derived from Old English *loc*, 'enclosed land, enclosure' (Cavill 2018, 257)

<sup>&</sup>lt;sup>129</sup> Derived from Old English *rūhet*, 'rough, overgrown land' (Cavill 2018, 360)

<sup>&</sup>lt;sup>130</sup> Derived from Old Norse *brot*, 'small allotment' (Cavill 2018, 44)

 $<sup>^{131131}</sup>$  Derived from Old English  $\bar{e}g$  or Old Norse ey, 'low-lying marshey ground, partially surrounded by water' (Cavill 2018, 131)

<sup>&</sup>lt;sup>132</sup> Derived either from a Middle English personal name or referring to land owned or used by a barker (oak bark was used in the tanning process) (Cavill 2018, 22)

<sup>&</sup>lt;sup>133</sup> May refer simply to the location of a weathercock or be derived from Old England *weðer*, 'land for keeping castrated male sheep on' + Old English *cocc*, 'a heap or hillock' (Cavill 2018, 454 and 477)

Old English Cocc, a neap or fillock (Cavill 2018, 454 and 477)

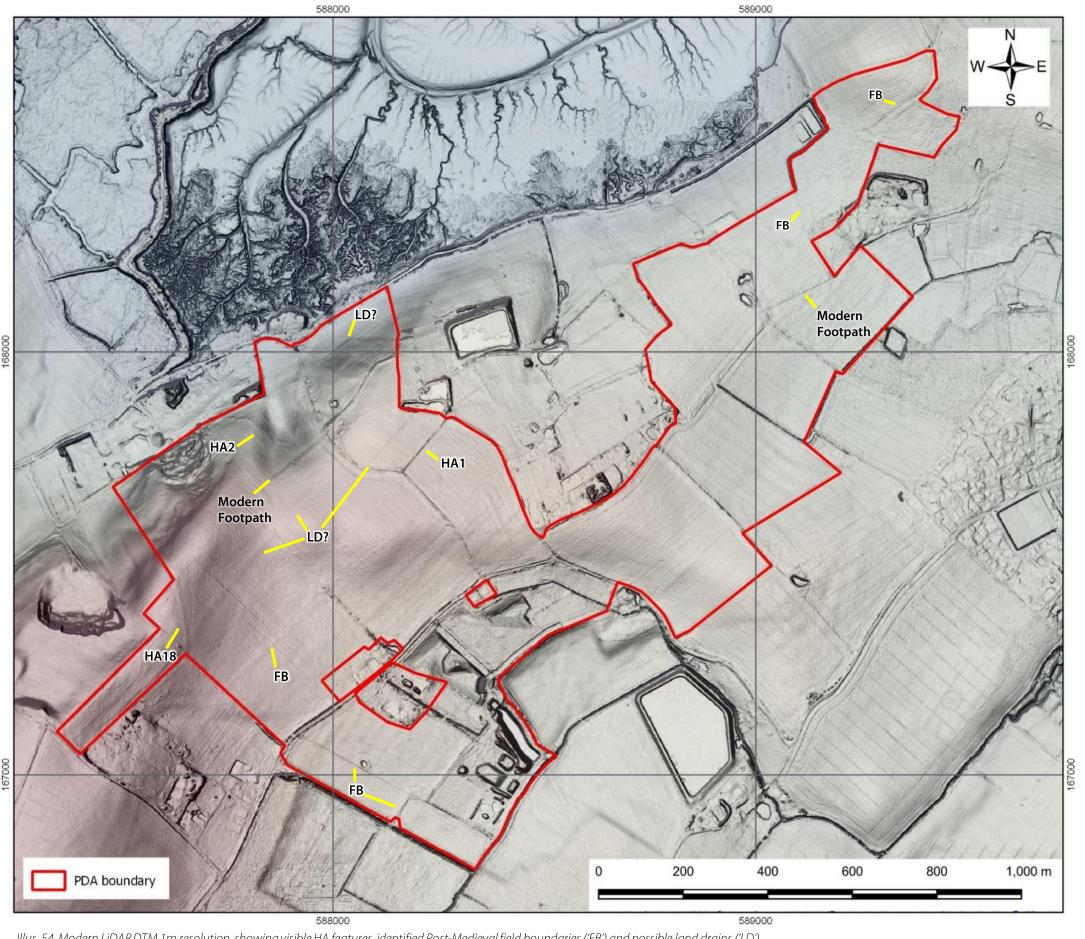
134 Likely derived from a personal name, but potentially related to Old Cornish *fenten*, 'land by or containing a spring or well' (Cavill 2018, 445)

Lord George William Harris	Henry Matson	47	Rye Grass	Р
Lord George William Harris	Henry Matson	48	Adjoining Bushey Field	Р
Lord George William Harris	Henry Matson	49	Bankeys <sup>135</sup>	Р
Lord George William Harvis	Henry Matson	76	Adjoining Rye Grass	Р
Executors of William Jefferys	Thomas Tapp	271	Ferry Field	Р

- 5.6.115. Iwade tithe apportionment shows that HA5, the building depicted in Field 6, was named Funton House and is entered into the apportionment separately to Funton Farm. However, both buildings were owned and occupied by the same individuals. Therefore, Funton House and Funton Farm probably formed two parts of one residential and agricultural complex.
- 5.6.116. Most of the field names given within the apportionments describe either the size of the fields, their topography, their vegetation or their land use. It is highly like that tithe plots 155 and 223 refer to their owners or occupiers at this date, and that tithe plot 271, located so close to the salt marshes, referenced a ferry which operated close to that field. Interestingly, tithe plot 222, part of Barn Field, is located very close to the Barn Field of the 1674 map, indicating the longevity of the field name. Tithe plot 46, Bushey Field, is probably an evolution of the 1674 Rushe(y) Field but appears to have been assigned to the 1674 Thissle(?) Field by the 19<sup>th</sup> century.
- 5.6.117. The small, southerly land parcel of the PDA falls within tithe plot 39 of Bobbing parish, named 'Soldiers'. The etymology of this field name is unknown but may refer to a recruitment or assembly place for local militia; land owned by active or retired soldiers; or to a wild plant<sup>136</sup>.
- 5.6.118. The tithe mapping suggests that the PDA was primarily used as pasture rather than arable land during the 19<sup>th</sup> century. This may indicate good levels of preservation for any in situ below-ground archaeological remains.
- 5.6.119. Modern LiDAR imagery indicates that the below-ground remains of the boundaries between tithe plots 250 and 252 (In Field 1), tithe plots 46 and 47 (in Field 4), tithe plots 235 and 56 (in Field 15) and tithe plots 156 and 53 (in Field 15) remain in situ (Illus. 54).

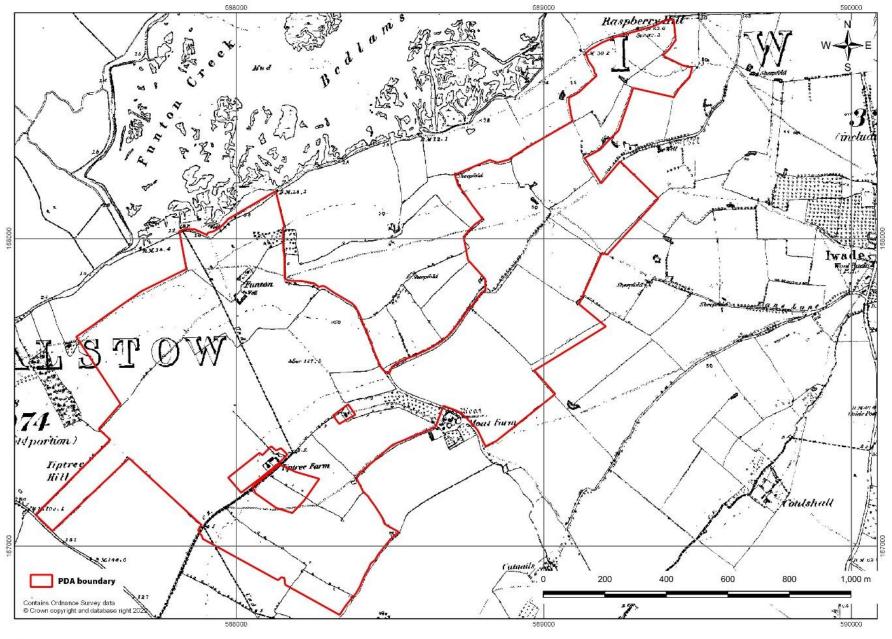
<sup>&</sup>lt;sup>135</sup> Derived from Middle English banke, 'land on, by or containing slopes or embankments' (Cavill 2018, 20)

<sup>136</sup> Cavill 2018, 393 and 392

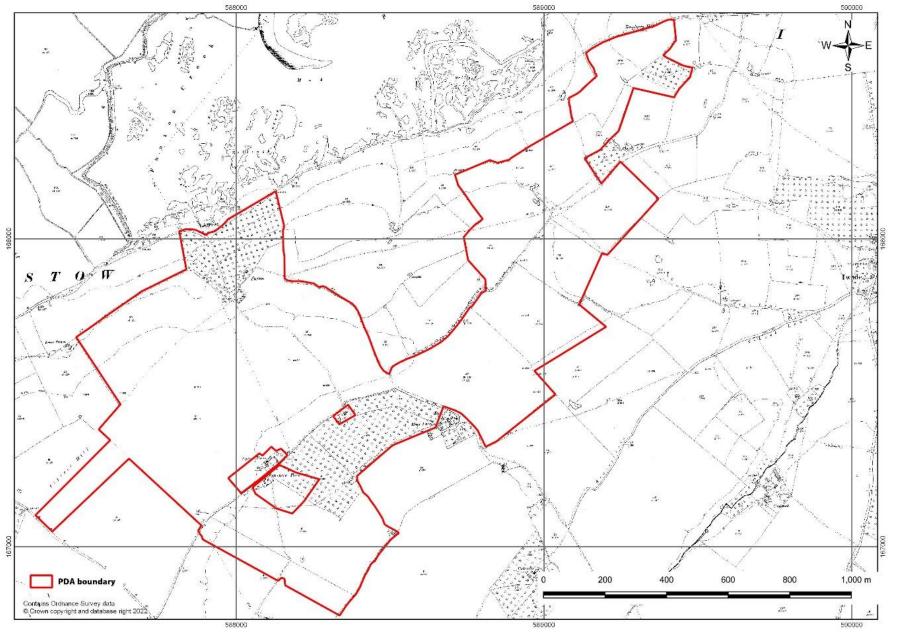


Illus. 54. Modern LiDAR DTM 1m resolution, showing visible HA features, identified Post-Medieval field boundaries ('FB') and possible land drains ('LD')

- 5.6.120. The 1869 1:10 560 County Series 1st Edition OS map (Illus. 55) shows that several of the earlier fields within Field 4 had been amalgamated, leaving only three fields intact. There had also been some boundary changes within Fields 1, 2 and 15. There had been some development at Tiptree Farm and in tithe plot 345 (both of which fall outside of the PDA red line boundary).
- 5.6.121. The 1869 map demonstrates that, by this date, HA8 was in use as a footpath rather than a track or road. It noted a well by Funton Farm (HA19) and two boundary stones, one near Tiptree Farm (HA20) and another in Field 1 (HA21). These stones no longer exist. The map also depicted a still-extant pond in Field 1, HA22, and the sites of two further probable ponds, one in Field 4 (HA23) and the other in Field 1 (HA24). The two possible small buildings shown on tithe mapping, HA11, and ponds HA9, HA10 and HA12 HA14 were not marked.
- The next available map of the area, the 1896 1:2 500 County Series 1st Revision OS map (Illus. 56), depicted Fields 4, 7 and 8 in their present state and some further, minor amalgamation of earlier fields in Field 15. Fields 3 and 6 were plantation or orchard at this date, as was the eastern side of Field 15. Orchard Farm, abutting the PDA's red line boundary, had been constructed. Ponds HA7 and HA23 and boundary stone HA21 were not depicted. Within the wider Study Area, there had been several minor changes to field boundaries and land use, particularly to the south-west and south of the PDA.



Illus 55. 1869 1:10 560 County Series 1st Edition OS map



Illus 56. 1896 1:2 500 County Series 1st Revision OS map.

- 5.6.123. There is one known heritage asset recorded in the HER associated with this period within the PDA. This MKE85220, the site of the now-demolished 19<sup>th</sup> century Funton Farm.
- 5.6.124. There are 61 additional known heritage assets recorded in the HER associated with this period within the Study Area. These consist of designated built heritage, maritime wrecks, built heritage, sea defences, small-scale industry, transport and communication networks, isolated archaeological remains and findspots.
- There are seven listed buildings within the Study Area recorded on the HER. All are Grade II listed. These are NHLE 1069342 and MKE85143, the 18<sup>th</sup> century Little Barksore Farm, 760 m to the west of the PDA boundary; NHLE 1069379, MKE33454 and MKE85279, the 17<sup>th</sup> century Culnells Farm, 485 m to the south of the PDA boundary; NHLE 1069417 and MKE33492, a 17<sup>th</sup> century barn close to Great Norwood, 940 m to the south-east of the PDA boundary; NHLE 1116219 and MKE33765, the early 18<sup>th</sup> century Ivy Cottage, 945 m to the east of the PDA boundary; NHLE 1116241, MKE33766 and MKE88677, the 16<sup>th</sup> century Coleshall Farm, 800 m to the south-east of the PDA boundary; NHLE 1343863 and MKE34202, the 18<sup>th</sup> century Great Norwood Farm, 910 m to the south-west of the PDA; and NHLE 1390604 and MKE34463, and 18<sup>th</sup> century traditional barn, 850 m to the east of the PDA boundary.
- 5.6.126. There is a total of 18 HER entries identifying wrecked vessels within the Study Area. Only one of these vessels, the Ellen lines (MKE14487), is recorded as being wrecked during the Post-Medieval period. She lies 445 m to the north of the PDA boundary.
- 5.6.127. One of the wrecked vessels is a concrete lighter hulk, not seen during a survey of 2002. It forms part of the HER entry MWX18789, discussed further below.
- 5.6.128. The remainder of the wrecked vessels were seen during surveys of 1961, 1990 and 2002 and on aerial photographs dating to 2000. They may have been wrecked during the late Post-Medieval or Modern period; nothing more is known about them. Between 540 m and 565 m to the north of the PDA are the remains of MKE12905, MWX19649, MWX19650, MWX19651, MWX19652, MWX19654, MWX19655, MWX19656 and MWX19767; between 885 m and 980 m to the north of the PDA boundary lie MKE14664, MKE14666, MWX19677 and MWX19678, 885 m to the north of the PDA boundary; 155 m to the north of the PDA boundary lies MWX19653; and 95 m to the north of the PDA boundary lies MWX19755.
- 5.6.129. Seventeen HER entries record extant and now-demolished built heritage within the Study Area. There are eight extant structures and nine now-demolished structures.
- 5.6.130. Extant structures consist of MKE85142, Great Barksore Farm, 860 m to the west of the PDA boundary; MKE85216, Great Norwood Farm, 930 m to the south-west of the PDA boundary; MKE85219, Tiptree Farm, which is encircled by the PDA boundary; MKE85226, an outfarm of Little Barksore Farm, 520 m to the west of the PDA boundary; MKE85273, Cambray Farm, 830 m to the south of the PDA boundary; MKE85277, a farm to the south of Raspberry Hill, 120 m to the east of the PDA boundary; MKE85279, Culnells or Cutnails Farm, 485 m to the south of the PDA boundary; and MKE85359, an outfarm in Iwade, 900 m to the west of the PDA boundary. Now-demolished built heritage consists of MKE111978, the site of National School in Iwade, 910 m to the east of the PDA boundary; MKE33416, the site of Little Barksore Farmhouse, 795 m to the west of the PDA boundary; MKE33453, the site of a barn at Coleshall Farm, 750 m to the south-east of the PDA boundary; MKE85218, the site of a farmstead north of Great Norwood Farm, 865 m to the south-west of the PDA boundary; MKE85221, the site of Little Funton farm, 50 m to the west of the PDA boundary; MKE85225, the site of a sheepfold on Barksore Marshes, 905 m to the north of the PDA boundary; MKE85278, the site of Moat Farm, 15 m to the south of the PDA boundary; MKE85319, the site of an outfarm west of Iwade, 260 m to the east of the PDA boundary; MKE85358, the site of a farmstead in Iwade, 810 m to the east of the PDA boundary; and MWX18965, the site of a well, 20 m to the north of the PDA boundary.
- 5.6.131. Heritage assets referring to sea defences consist of MWX17788, now inundated defensive earthworks, 810 m to the north of the PDA boundary, and MWX19864, a timber alignment of historic sea defences, 850m to the north of the PDA boundary.
- 5.6.132. Heritage assets referring to small-scale industry, specifically salt working, consist of MWX18789, a group of salt mounds and associated earthworks, now damaged, 735 m to the north of the PDA, and MWX19329, salt working mounds on the Isle of Sheppey, 1 km to the east of the PDA boundary.
- 5.6.133. Post-Medieval travel and communication networks are represented in the HER by MKE3032 and MKE3038, two telegraph stations, 835 m and 375 m to the south-east of the PDA boundary respectively; MWX17789, an extant path, 960 m to the north of the PDA; and MWX18942, a path shown on historic mapping, 725 m to the north of the PDA boundary.
- 5.6.134. Isolated archaeological features consist of MKE12889, an identified feature seen only on aerial photography, 480 m to the north of the PDA boundary, and MKE20359, ditches, pits and postholes found during an evaluation at lwade, 955 m to the east of the PDA boundary.

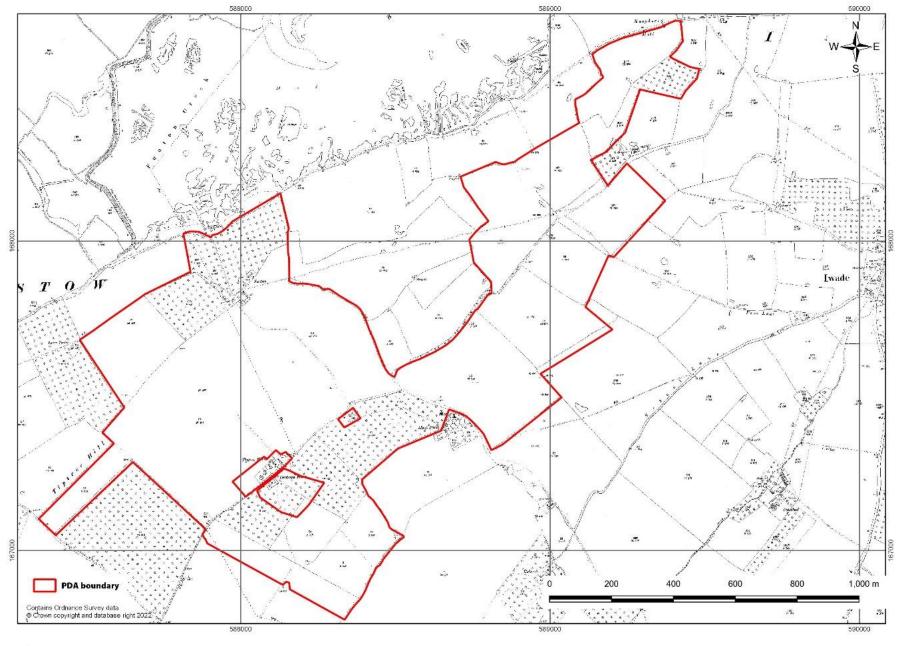
- 5.6.135. Eight findspots of Post-Medieval artefacts identified through the Portable Antiquities Scheme have been recovered from the Study Area. These are MKE106237, MKE113906 and MKE113908, all silver coins, 940 m and 425 m and to the south-east of the PDA boundary respectively; MKE113902, a copper alloy buckle, 550 m to the south-east of the PDA boundary; MKE113920, a copper alloy button, 855 m to the east of the PDA boundary; MKE113932, a gold finger ring, 475 m to the north-east of the PDA boundary; and MKE73586 and MKE73587, copper alloy bells, 870 m to the east of the PDA boundary.
- 5.6.136. During the site visit, a concentration of Post-Medieval and/or Modern ceramic building material was seen within the northern edge of Field 6. This may be demolition material related to either the 18<sup>th</sup> century Funton Farm (HA4), Funton House (HA5) or the 19<sup>th</sup> century Funton Farm (MKE85220).
- 5.6.137. The documentary, cartographic and archaeological record suggest that, by the Post-Medieval period, the settlements and landscape of the Modern PDA and Study Area had been established. The PDA apparently remained agricultural hinterland during this period, used predominantly as pasture, almost certainly for sheep grazing. Salt working continued to a lesser extent than in earlier periods to the north of the PDA. At least six Post-Medieval field boundaries are likely to remain in situ as buried remains within the PDA.
- 5.6.138. Therefore, there is assessed to be a medium potential for previously unknown remains of this period to be encountered within the PDA.

## MODERN (1900CE - PRESENT)

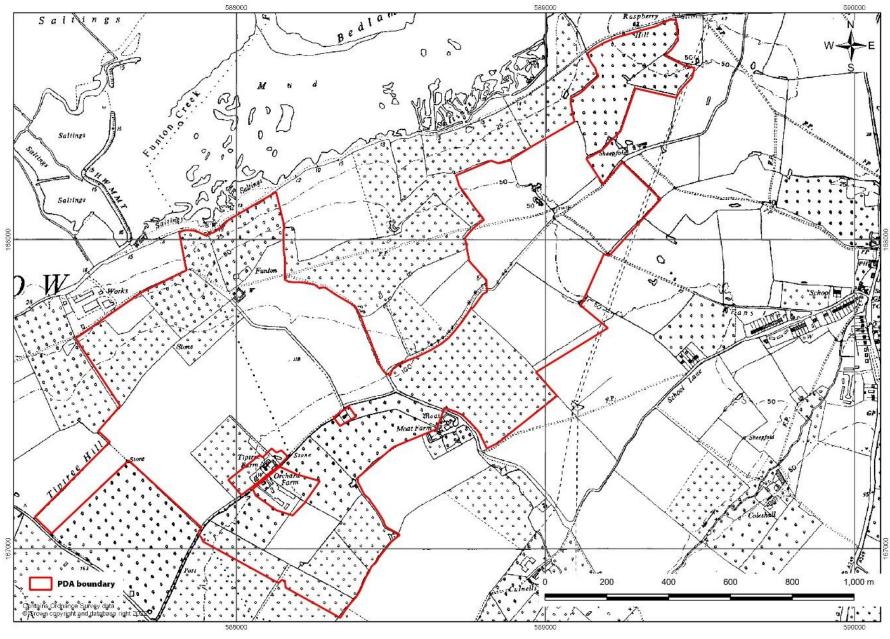
- 5.6.139. The Modern period is taken to begin in 1900CE and is characterised by, among other things, modern technology, the two world wars, the emancipation of women, and space travel.
- 5.6.140. The North Kent coast played an important role in the defence of Britain during the 20<sup>th</sup> century due to its location. Recent investigations, such as the ongoing Defence of Swale project, have identified a dense landscape of First World War anti-invasion defences that extend from Detling through to Iwade and Grovehurst. The area is one of the best examples of anti-invasion precautions in the country, with the physical remains complimented by cartographic and photographic data<sup>137</sup>.
- 5.6.141. Although historic mapping shows that Iwade underwent substantial development during the latter half of the 20<sup>th</sup> century (see below), Lower Halstow was subject to notable population decline, probably in part due to the closure of the Lower Halstow brickworks in 1966<sup>138</sup>.
- 5.6.142. Few changes are shown between the 1896 map discussed in the previous section and the 1908 1:2500 County Series second revision OS map (Illus. 57). In Field 1, a small pond seen during the site visit, HA24, had been excavated, and the north-eastern quadrant of the field was in use as an orchard or plantation. Likewise, the north-eastern quadrant of Field 4, in roughly the location of HA2, had been converted to orchard or plantation. Two boundary stones, HA25 and HA26, had been erected in Field 4; although they are marked on modern mapping, they were not seen during the site visit.
- 5.6.143. No further changes are shown on historic mapping until the 1961 National Grid 1:10 560 1st Imperial Edition map (Illus. 58). It appears that further areas of Fields 1, 2, 4 and 15 and the whole of Field 9 had been given over the orchard or plantation by this date. There had also been a small amount of field division in Field 4 and field amalgamation in Field 15. Orchard Farm, outside of the PDA but encircled by its red line boundary, had been expanded and new buildings erected. In Field 6, Funton House (HA5) had been demolished. Within the wider Study Area, Iwade had begun to expand to the west and there had been some minor land use and field boundary changes, particularly to the south-west of the PDA.
- 5.6.144. The PDA underwent some additional changes by the mid-1960s (Illus. 59). The 19<sup>th</sup> century Funton Farm (MKE85220) was demolished; HA19, the well associated with Funton Farm, was not depicted and was presumably filled in; and HA20, the site of a boundary stone near Tiptree Farm, was not marked.
- 5.6.145. Historic mapping indicates that HA12, a pond in Field 2, and HA17, a pond in Field 15, were infilled during the 1970s or early 1980s. A final boundary stone, HA27, was erected in Field 4 during the mid-1960s; although still marked on modern mapping, this was not seen during the site visit. There are no notable changes within the wider Study Area between the 1970s and 1990s, with the exception of the expansion westwards of Iwade during the 1970s (illus. 60).

<sup>137</sup> Swale Borough Council 2017, 40 and 72

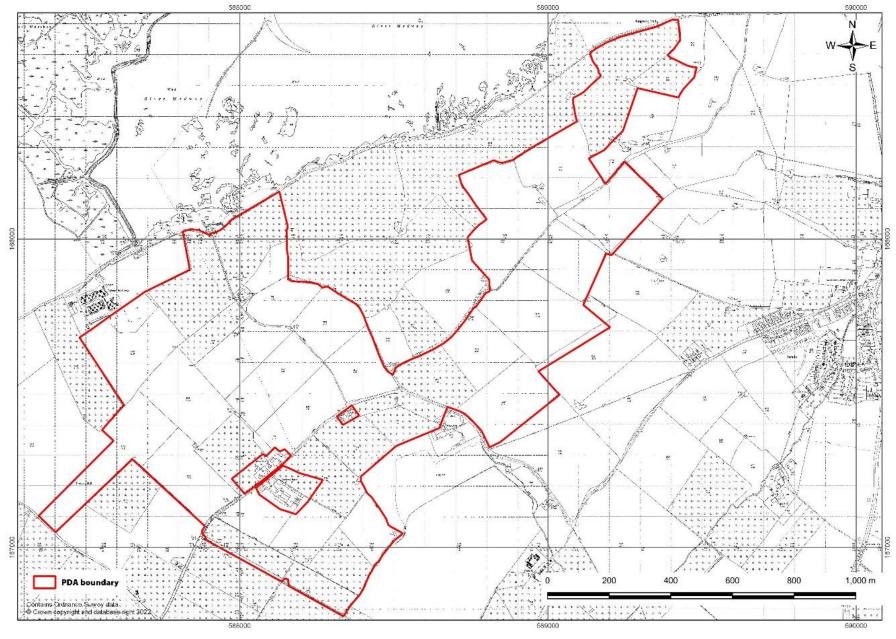
<sup>&</sup>lt;sup>138</sup> Stevens 1999, 39 and 148



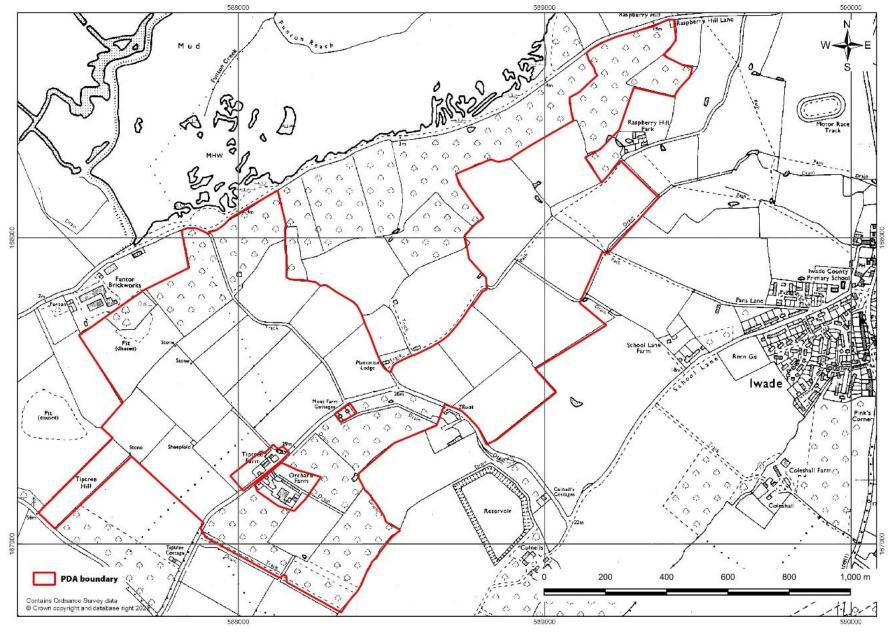
Illus 57. 1908 1:2500 County Series second revision OS map



Illus 58. 1961 National Grid 1:10 560 1st Imperial Edition map



Illus. 59. 1963 - 1967 National Grid 1:2500 1st edition map



Illus 60. 1991 National Grid 1:10 000 map

- 5.6.146. There are no known heritage assets recorded in the HER relating to this period within the PDA.
- 5.6.147. There are 31 known heritage assets recorded in the HER relating to this period with the Study Area, in addition to the 17 wreck sites that may be of Modern discussed in paragraphs 5.7.124 5.7.126. These are a Scheduled Monument, wreck sites, remains related to the brick making industry, and isolated archaeological features.
- 5.6.148. Scheduled Monument NHLE 1129344 (entered separately into the Kent HER under DKE19163) is a World War II anti-aircraft gun site, 470 m to the north-east of the PDA. This gun site and its associated domestic camp was first constructed in February 1940 and underwent several phases of development; a detailed description of its history can be found in the Appendix. Historic England highlights that 'surviving examples [of this type of gun site] are sufficiently rare to suggest that all 60 well preserved examples are of national importance. Furthermore, the AA gun site at Iwade is one of only nine sites nationally to survive with its layout, including its domestic site, substantially intact, and is one of only two such sites in Kent. Its surviving elements represent at least two stages in the development of the site, each with distinct building types and layouts. This physical record of the site's development is significant and is rare nationally. Historically, the importance of the site is further enhanced by the significant part it played in the defence of Britain against aerial bombardment during World War II'.
- The HER records 26 wreck sites within the Study Area dating to the Modern period, all identified during surveys of the 1960s, 1990s and 2002. Of these, three have been identified by name: the Squeak, built in 1898 and wrecked in the mid-20<sup>th</sup> century (MKE14195, 326m to the north of the PDA boundary); the Sirdar, again built in 1898 and wrecked by the 1980s (MKE14196, 300 m to the north of the PDA boundary); and the Veronica, built in 1906 and wrecked by the 1980s (MKE14197, 450 m to the north of the PDA, boundary). The remainder are unidentified and consist of MKE12896, 895 m to the north-north-west of the PDA boundary; MKE12903 and MKE12904, both 1 km to the north of the PDA boundary; and MKE14666, 950 m to the north of the PDA boundary; MKE14667, 910 m to the north of the PDA boundary; and MWX19857, 970 m to the north-west of the PDA boundary.
- 5.6.150. Two Modern heritage assets relating to brick making industry are recorded within the Study Area. These are MKE8962, Funton brickworks, built in the 1930s and still in operation, 60 m to the north of the PDA boundary; and MKE97732, a Staffordshire brick kiln within Funton brickworks, 50 m to the north of the PDA boundary.
- 5.6.151. There is one archaeological feature of Modern date within the Study Area. This is MKE12901, an 'unidentified obstruction', seen through aerial photography, 775 m to the north of the PDA boundary. No further information is given in the HER.
- 5.6.152. No features of Modern date were seen on aerial photographs held by Kent County Council, Google Earth Pro and Historic England's Aerial Archaeology Mapping Explorer or on LiDAR imagery.
- 5.6.153. The archaeological record demonstrates that the Modern remains within the Study Area relate to maritime heritage, brick making and WWII defensive infrastructure. The PDA continued in use as agricultural land throughout this period. The settlement pattern and land use within the Study Area seems relatively unchanged from that of the Post-Medieval period.
- 5.6.154. Therefore, there is assessed to be a low potential for previously unknown remains of this period to be encountered within the PDA.

#### UNKNOWN

- 5.6.155. There are a 13 HER entries which record the locations of remains of unknown date within the Study Area whose form and/or associated finds suggest a Historic date. These heritage assets are:
  - MKE73325, an unidentified lead object; 530 m to the south of the PDA boundary;
  - MWX18774 and MWX18788, circular embankments, 900 m and 560 m to the north-east of the PDA boundary respectively;
  - MWX19754, timber piles, possibly related to a nearby landfill site; 680 m to the north of the PDA boundary;
  - MWX19761 and MWX19763, probable fishtraps, 240 m and 290 m to the north of the PDA boundary respectively;
  - MWX19764, a fishtrap, 280 m to the north of the PDA boundary;
  - MWX19846 and MWX19847, two postholes, both 900 m 995 m to the north-west of the PDA boundary;
  - MWX19851, two parallel lines of posts, 800 m to the north-west of the PDA boundary;

- MWX19853, a hurdle fence, 825 m to the north-west of the PDA boundary;
- MWX19854, a timber structure of unknown function, 865 m to the north-west of the PDA boundary; and
- MWX19856, possible sea defences, 895m to the north-west of the PDA boundary
- 5.6.156. The Kent HER records a series of cropmarks, probably agricultural in nature, 900 m to the north-east of the PDA. These are of unknown date.
- 5.6.157. During the site visit, large depression HA2 was identified in Field 4 of the PDA. As LiDAR imagery and OS contour data does not show the edges of the feature clearly, the feature had very smooth sides, and no spoil heaps or extraction debris was seen within the vicinity of HA2, it is thought most likely that this is a natural geological feature. However, this does not preclude the presence of archaeological material within HA2, as it may have been infilled by Holocene Coombe deposits or Holocene alluvial material. The possibility of HA2 being manmade cannot however be entirely ruled out. It is possible that HA2 was formed through mineral extraction activities, as chalk, the underlying bedrock of the PDA, was historically an important material needed for a number of process, most notably in the production of lime; the Swale district contains many old hollows in the landscape which are relics of mineral extraction<sup>139</sup>.
- 5.6.158. A second possible heritage asset of unknown date, HA18, was identified on LiDAR imagery (Illus. 54). This is a linear feature orientated north-south which lies within the north-western corner of Field 4, terminated at the boundary between Fields 4 and 5. No above-ground indications of HA18 were seen during the site visit. As it does not align with field boundaries shown on historic mapping, it may predate the Post-Medieval period. It may be a Post-Medieval or Modern drain.

<sup>139</sup> Swale Borough Council 2017, 64

## 6. STATEMENT OF SIGNIFICANCE AND IMPORTANCE

## 6.1. KNOWN HERITAGE ASSETS WITHIN THE PDA

- 6.1.1. There are no designated heritage assets within the PDA boundary and 29 known and possible non-designated heritage assets, probable geological features and topographic features. These include findspots of Mesolithic and Neolithic lithics and Bronze Age and Iron Age Early Romano-British field systems, occupation and cremation cemeteries in Field 3 of the PDA (HAEv 1); the above-ground remains of a one 17<sup>th</sup> century field boundary (HA1); the sites of five Post-Medieval buildings (HER MKE85220, HA4, HA5, and HA11); the course of a Post-Medieval trackway (HA8); the sites of eight Post-Medieval ponds (HA7, HA9, HA10, HA12, HA13, HA14, and HA23); five extant Post-Medieval and Modern ponds (HA3, HA6, HA15, HA16, and HA24); the site of a Post-Medieval well (HA19); the sites of two Post-Medieval boundary stones (HA20 and HA21); three extant Post-Medieval Modern boundary stones (HA25, HA6 and HA27); one probable geological feature (HA2); and one below-ground feature of unknown date (HA18). The below-ground remains of five Post-Medieval field boundaries have also been identified.
- 6.1.2. Of these heritage assets, those which are 'sites of' are of Negligible importance whilst the remainder are of Low (Local) importance and derive their significance from their archaeological and historical interest.

## 6.2. PARISH BOUNDARIES

- 6.2.1. The parish boundary between Lower Halstow and Iwade runs roughly north to south through Field 4 of the PDA. It is not shown on mapping pre-dating 1840 and was not identified during the site visit or on aerial photographic or LiDAR imagery. However, it is likely that was established by at least the early Post-Medieval period and possibly earlier since many of the administrative boundaries of the county were formed during the Early Medieval period.
- 6.2.2. As there are no indications of the above-ground or below-ground remains of the parish boundary, it is deemed to be of only Low (Local) importance, deriving its significance from its historical and possibly archaeological interest.

### 6.3. IMPORTANT HEDGEROWS

- 6.3.1. All of the present field boundaries bordering the PDA are of pre-1850 date. Therefore, those which are currently hedged (such as in Fields 1, 2, 4, and 9 15) may be worthy of protection according to the criteria of the 1997 Hedgerow Regulations (Table 1).
- 6.3.2. These heritage assets are of Low (Local) importance and derive their significance from their historical interest.

#### 6.4. KNOWN HERITAGE ASSETS WITHIN THE STUDY AREA

- 6.4.1. Within the Study Area, there is one Scheduled Monument of Modern date (World War II Heavy Anti-Aircraft Gunsite: NHLE 1129344), one Conservation Area (Lower Halstow) and eight listed buildings. Of these, one is Grade I listed while the remaining buildings are Grade II. The Grade I listed building, the Church of All Saints, is of Medieval date but all of the other listed buildings are Post-Medieval in date.
- 6.4.2. The Scheduled Monument and Grade I listed building are of High (National) importance and the Grade II listed buildings are of Medium (Regional) importance. They derive their significance from their historical and architectural interest.
- 6.4.3. There are 161 additional non-designated heritage assets within the Study Area. These include one findspot of Mesolithic flints; four heritage assets of Neolithic date; one heritage asset of Neolithic Bronze Age date; eight heritage assets of Bronze Age date; three assets of Bronze Age Iron Age date; five heritage assets of Iron Age date; one heritage asset of Prehistoric date and four of Later Prehistoric date; 19 heritage assets of Romano-British date; one heritage asset of Early Medieval date; 11 heritage assets of Medieval date; 31 heritage assets of Post-Medieval date; 23 heritage assets of Post-Medieval Modern date; 30 heritage assets of Modern date; and 18 heritage assets of unknown date.
- 6.4.4. Those non-designated heritage assets which are 'sites of' or findspots are of Negligible importance whilst the remainder are of Low (Local) importance. They derive their significance from their archaeological and historical interest.

## 6.5. SETTING OF KNOWN HERITAGE ASSETS

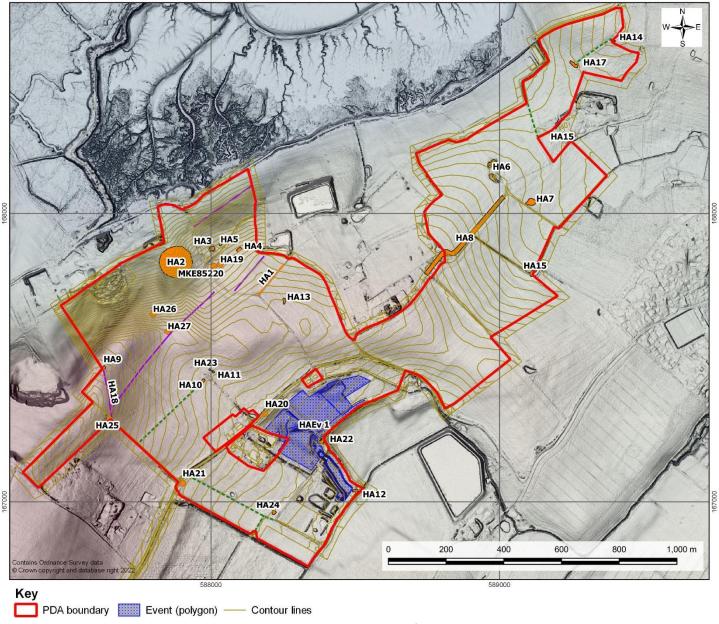
- 6.5.1. The contribution of the designated assets' settings within the Study Area to their significance is considered in a separate document<sup>140</sup> and therefore is not discussed here.
- 6.5.2. The non-designated heritage assets discussed above are findspots, sites of historic buildings and wrecks, built heritage, archaeological remains, and geological and topographical features. They lie either within a sparsely populated rural area consisting of large areas of open agricultural land, fronting onto salt marshes, or within the salt marsh and riverine areas of Funton Creek and Marsh, Barksore Marsh and Bedlam's Bottom.
- 6.5.3. As the findspots, 'sites of' and some of the archaeological remains no longer exist within their original setting, their settings cannot contribute to their significance. Similarly, archaeological remains which remain in situ but have been built over do not have settings which can be appreciated from above ground.
- 6.5.4. However, extant and above-ground non-designated heritage assets (such as wrecks, field boundaries, built heritage, ponds and boundary stones) do contribute to an appreciation of the wider agricultural and riverine/marshland setting of the PDA and Study Area.

<sup>&</sup>lt;sup>140</sup> JB Heritage, forthcoming

## 7. STATEMENT OF POTENTIAL

# 7.1. IMPACT OF THE GEOLOGY AND TOPOGRAPHY ON THE ARCHAEOLOGICAL POTENTIAL OF THE PDA

- 7.1.1. The superficial brickearth deposits of the Swale region are known to contain Palaeolithic and Mesolithic artefacts and land surfaces. Although only the southern side of the PDA is currently recorded by the BGS as containing brickearth deposits, it is surrounded by brickearth deposits and therefore these deposits are likely to be present throughout the PDA. Borehole surveys undertaken to the north and south of the PDA suggest that these brickearth deposits are found at depths of greater than 1 m.
- 7.1.2. The likely presence of brickearth deposits within the PDA therefore increases the potential for remains of Palaeolithic and Mesolithic date to be encountered at depth within the PDA.
- 7.1.3. The average depth of brickearth deposits within the Study Area (approximately 26m) removes the possibility of the underlying geological strata of London Clay Formation being extracted as a mineral resource.
- 7.1.4. In the western half of the PDA, a ridge of high ground runs roughly east to west through Fields 4, 6 and 7, with the land sloping downwards at varying gradients to its north and south. Fields 1, 2 and 8 also slope downwards very gently towards their north, so that School Lane lies in the shallow 'valley' these slopes create. Within the eastern half of the PDA, the land slopes downwards from east to west from Field 15 (the highest ground) to Field 9 (the lowest ground). Fields 1 3 and 9 -12 are the most low-lying areas of the PDA (Illus, 61).
- 7.1.5. The modern use of the varying topography suggests that different areas of the PDA were similarly historically best suited to different activities. For example, as today, the low-lying parts of the PDA are most likely to have suited to sheep grazing, transport networks (due to ease of travel) and settlement (due to sheltered conditions). The preference for low-lying areas for transport networks and settlement in the past is borne out by the early date of School Lane and the presence of Bronze Age and Iron Age occupation in Field 3 of the PDA, a low-lying area. The higher areas of the PDA may have been more suited to the construction of prominent manmade landscape features such as barrows, hilltop enclosures and funerary monuments designed to be seen from afar, although they will have also been used as agricultural land, as they are today. The specific consequences of the impact of the PDA's topography on its potential archaeological resource is discussed in relevant paragraphs of Section 7.2 below.



Illus 61. LiDAR DTM 1m resolution imagery overlain with OS contours and identified heritage assets within the PDA. Contour lines provided by the client from imagery created from LiDAR data produced by Tír 3D (Ireland)

## 7.2. ARCHAEOLOGICAL POTENTIAL

- 7.2.1. Due to previous archaeological investigations within it, there is negligible potential for remains of any date to be encountered within Field 3 of the PDA.
- 7.2.2. There is assessed to be a low potential for archaeological remains dating to the Palaeolithic and Neolithic periods and a low medium potential for archaeological remains dating to the Mesolithic period to be present within the PDA. Any remains from these periods are likely to take the form of isolated findspots or sealed land surfaces, discussed further in Section 7.3. They are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 7.2.3. There is assessed to be a medium high potential for previously unknown heritage assets of Bronze Age and Iron Age date to be encountered within the PDA. Given the results of recent excavations in Field 3, adjacent to Orchard Farm, and in Iwade village, these are thought most likely to take the form of agricultural remains such as field systems, pits and ditches, the remains of occupation, and funerary monuments such as cremations. Due to the PDA's topography, it is thought that occupational remains are most likely to be present within Fields 1 3 and 9 14, whilst funerary monuments are most likely to be present in the northern half of Field 4, Fields 6 8 or Field 15. It is possible that remains relating to the Bronze Age eastern trade route, such as findspots of bronze artefacts, will be present in the PDA. They are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 7.2.4. There is assessed to be a medium potential for previously unknown heritage assets of Romano-British to Medieval date to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits, ditches and small rural buildings, industrial remains relating to salt working, and isolated findspots. Due to the PDA's topography, it is thought that occupational and industrial remains are most likely to be present within Fields 1 3 and 9 14. Any unknown heritage assets of these dates are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 7.2.5. There is assessed to be a medium potential for previously unknown remains of the Post-Medieval period to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits, and ditches; the below-ground remains of buildings (in particular, remains relating to HA4, HA5 and MKE85220) and historic trackways (such as HA8); topographic features such as ponds; and isolated findspots. It is also possible that below-ground remains of the Iwade and Lower Halstow parish boundary will be present, although the reviewed sources do not indicate this. Any unknown heritage assets of these dates are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 7.2.6. There is assessed to be a low potential for previously unknown remains of the Modern period to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits, and ditches; topographic features such as ponds; and isolated findspots. Any unknown heritage assets of this date are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 7.2.7. Tithe mapping suggests that the PDA was primarily used as pasture rather than arable land during the 19<sup>th</sup> century, which may indicate good levels of preservation for any in situ below-ground archaeological remains.

#### 7.3. PALAFOENVIRONMENTAL POTENTIAL

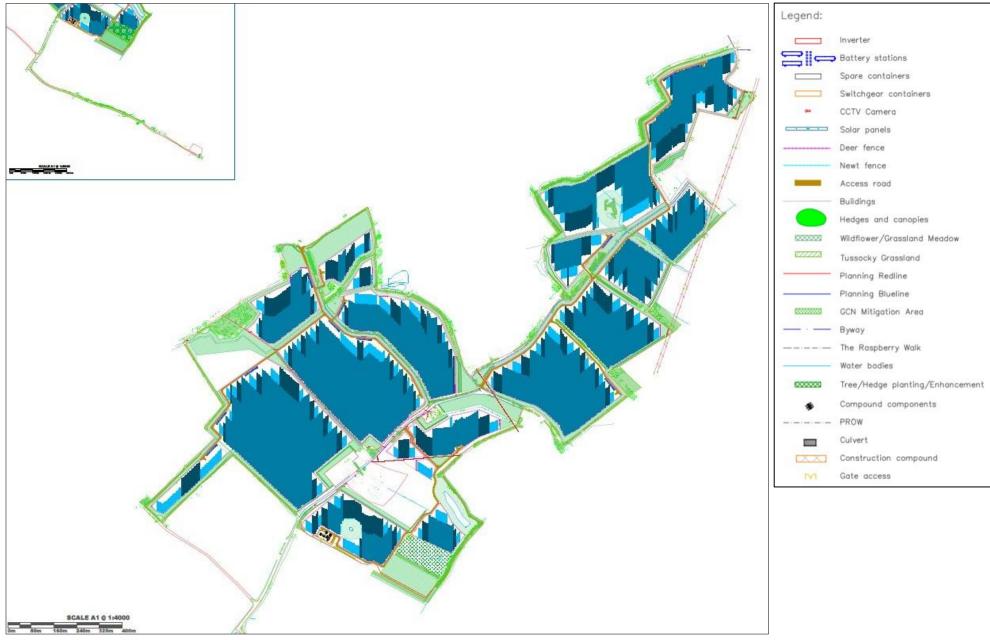
- 7.3.1. Brickearth deposits are highly likely to be present within the PDA beneath historic topsoil and subsoil strata. These deposits are colluvial and are most likely to have been laid down between 80,0000 and 10,000 years ago. Nearby archaeological evidence suggests that they may seal Palaeolithic and Mesolithic land surfaces, which may preserve ecofactual evidence, such as land snails, of past environments. Borehole surveys taken from the north and south of the PDA suggest that brickearth deposits are unlikely to be present at depths of less than 1m.
- 7.3.2. From the Lower Palaeolithic to Post-Medieval periods, sediments related to the cycle of marine transgressions and regressions of and seasonal flooding within the Lower Thames Estuary are likely to have been laid down within the PDA. These alluvial sediments may contain ecofactual material such as pollen or wood which provide information about past environments. Borehole surveys taken from the north and south of the PDA suggest that these are unlikely to be present at depths of more than 1 m.
- 7.3.3. During the site visit, the boggy conditions of the ground were noted. Although this may have merely reflected the recent heavy rainfall, it is possible that waterlogged deposits are present within the PDA, particularly

around the sites of Post-Medieval ponds HA3, HA6, HA7, HA9, HA10, HA12 – HA17, HA22 - HA24, and the likely infilled well HA19. If such waterlogged deposits exist, they may contain well-preserved ecofactual material (such as pollen, vegetation and timber) and organic artefacts (such as leather and textiles) of historic date.

7.3.4. Therefore, there is a high potential for previously unknown palaeoenvironmental remains of this period to be encountered within the PDA.

## 8. PROPOSED DEVELOPMENT

- 8.1.1. The proposed development is for the "installation and operation of a renewable energy generating station comprising ground-mounted photovoltaic solar arrays and battery-based electricity storage containers together with substation, switchgear container, inverter/transformer units, site access, internal access tracks, security measures, access gates, other ancillary infrastructure and landscaping and biodiversity enhancements".
- 8.1.2. The development has a forecast lifespan is 40 years and the chosen solar panel array type is the Tracker System.
- 8.1.3. The proposed development will contain central inverter stations or string inverters, a 132 kV substation compound in Field 1, deer fencing, CCTV security cameras, an internal access track from the site entrance to the substation control building, and a temporary construction lay-down area in Field 2. HA6, the location of two extant Post-Medieval ponds, will not be subject to construction activities.
- 8.1.4. The cabling for the solar farm's connection to the National Grid will run through the small, southerly parcel of the PDA adjacent to Stickfast Lane and is likely to entail limited groundworks.
- 8.1.5. The proposed layout of the solar farm is shown below in Illus. 62.



Illus 62. Proposed development layout

## 9. PREDICTED IMPACTS OF THE PROPOSED DEVELOPMENT

## 9.1. DIRECT IMPACTS

### ARCHAEOLOGICAL REMAINS

- 9.1.1. The assessment presented in this report has considered the known archaeological and heritage resource within and surrounding the application site in order to establish the potential constraints and implications for construction of a residential development.
- 9.1.2. Groundwork activities (such as construction enabling works, cut and fill, bulk excavation and landscaping) associated with the elements of the proposed development as described above have the potential to truncate or remove buried archaeological remains, resulting in a direct impact on the known heritage assets within the PDA.
- 9.1.3. The following non-designated heritage assets are present within the PDA:
  - HER (MKE85220, the site of the 19<sup>th</sup> century Funton Farm;
  - HAEv 1, a Mesolithic Early Romano-British site incorporating most of Field 3 of the PDA;
  - HA1, the below-ground remains of a Medieval Post Medieval field boundary;
  - HA2, a large circular depression in Field 4 that is most likely of geological origin;
  - HA3, the extant dried-up remains of a Post-Medieval pond in Field 6;
  - HA4, the site of the 18<sup>th</sup> century Funton Farm in Field 7;
  - HA5, the site of the 19<sup>th</sup> century Funton House in Field 7;
  - HA6, two extant Post-Medieval ponds between Fields 12 and 14;
  - HA7, HA9, HA10, HA12, HA13, HA14, and HA23, the sites of Post-Medieval Modern ponds in Fields 2, 4, 8, 11, and 15;
  - HA8, the course of a Post-Medieval trackway between Fields 12 and 11, now a footpath;
  - HA11, the site of two possible Post-Medieval buildings in Field 4;
  - HA15, HA16, and HA24, extant Post-Medieval ponds in Fields 1, 11 and 15;
  - HA18, a linear feature of unknown date seen on LiDAR imagery in Field 4;
  - HA19, the site of a Post-Medieval Modern well associated with the 19<sup>th</sup> century Funton Farm (MKE85220);
  - HA20 and HA21, the sites of Post-Medieval boundary stones in Fields 1 and 4; and
  - HA25, HA6 and HA27, extant Modern boundary stones in Fields 4
- 9.1.4. The below ground remains of five Post-Medieval field boundaries have also been identified within Fields 1, 4 and 15 of the PDA through LiDAR imagery, and it is possible that below-ground remains of the Iwade and Lower Halstow parish boundary traverse Field 4 of the PDA.
- 9.1.5. Although groundworks associated with the proposed developments are likely to disturb the in situ below-ground remains of the heritage assets described above<sup>141</sup>, it is worth noting that most solar farm developments cause only partial (c.5 10%) rather than total truncation of below-ground assets and therefore are likely to present less harm to unknown heritage assets than other forms of development.
- 9.1.6. Moreover, the installation of the solar array with prevent ploughing within the field for the lifespan of the facility and thereby prevent ongoing degradation of any remains.

<sup>&</sup>lt;sup>141</sup> The archaeological remains associated with HAEv 1 are at limited risk of disturbance from project groundworks, as archaeological investigations within Field 3 have recorded and/or removed much of this archaeological resource.

## PALAEOENVIRONMENTAL POTENTIAL

- 9.1.7. There is high potential for palaeoenvironmental remains to be encountered within the PDA. Brickearth deposits with palaeoenvironmental potential are likely to be present at depths of greater than 1m within the PDA and historic waterlogged deposits with paleoenvironmental potential may be present at depths of less than 1 m within the PDA.
- 9.1.8. Any deep excavations have the potential to disturb this resource and repository of potential valuable environmental information.

#### IMPORTANT HEDGEROWS

- 9.1.9. All of the field boundaries bordering the PDA are of pre-1850 date, although only those within Fields 1, 2, 4, and 9 15 are hedgerows. Due to their date, these hedgerows may be important under the 1997 Hedgerow Regulations.
- 9.1.10. The proposed layout of the proposed development (Illus. 62) does not suggest that any of these hedgerows will be physically impacted during the proposed development's construction or use. Therefore, disturbance of these hedgerows amounting to significant harm is not anticipated.

## Parish Boundaries

- 9.1.11. Although the parish boundary between Iwade and Lower Halstow is shown on historic mapping dating to the 19<sup>th</sup> century, no further indications of associated above ground remains were recorded during the site visit or can be seen on aerial photographic or LiDAR imagery.
- 9.1.12. Notwithstanding the above, any below-ground remains of this heritage asset may be directly impacted by the proposed development during the course of its construction.

#### 9.2. SETTING IMPACTS

- 9.2.1. Those non-designated heritage assets which have been removed from their original locations (such as findspots and 'sites of') no longer exist within their original settings. Therefore, their settings cannot be impacted by the proposed development.
- 9.2.2. The settings of the non-designated heritage assets of below-ground in situ archaeological features cannot be appreciated from above ground and therefore their settings cannot be impacted by the proposed development.
- 9.2.3. However, the setting (a rural, agricultural landscape) of the above-ground archaeological feature HA1, the remains of a 17<sup>th</sup> century field boundary, can be appreciated from ground level. The setting contributes the heritage significance of the feature in that its original function was to separate two agricultural fields and it is best It is best understood in its current context. A solar panel array is planned be constructed over and around HA1, and therefore its setting will be changed by the proposed development.
- 9.2.4. The setting of the non-designated heritage asset of Tiptree Farm (MKE85219), open agricultural land, is arguably appreciated best from within the radius of Fields 1, 2 and 4 and from School Lane. The rural setting was a part of its original role as a farm and it is best understood in relation to surrounding fields. Its setting will be changed by the proposed development.
- 9.2.5. The topography of the Study Area (low-lying land interspersed with raised ridges and hills) and numerous tree lines, hedge rows and areas of dense vegetation within it (in particular, the vegetation surrounding Moat Farm, MKE3009 and MKE 85278) mask views of the remainder of the extant non-heritage assets of the Study Area from the PDA.
- 9.2.6. Therefore, any change introduced by the likely nature of the proposed development will only affect the settings of the non-designated heritage assets HA1 and MKE85219. This change may be significant although they are assets of low, local importance.

#### 9.3. HISTORIC LANDSCAPE CHARACTER

9.3.1. Most of the PDA falls within the Historic Landscape Character of HLC 237, defined as 'small regular with straight boundaries (parliamentary type enclosure)'. However, in the south-western corner of Field 1, in Field 2 and in Field 6, the PDA falls under HLC 149 and HLC 239, both defined as 'orchards: areas of commercially grown fruit trees'. In Field 5 and the northern half of Field 15, the PDA falls under HLC 53, 'small rectilinear with wavy

boundaries', whilst in Field 5 the PDA falls within HLC240, defined as 'medium regular fields with straight boundaries (parliamentary type enclosure)'.

9.3.2. The proposed development constitutes a distinct change to the landscape character and land use within the PDA and is therefore likely to impact upon the HLC in a manner in which the changes cannot be readily absorbed and retain their current character.

## 10. HERITAGE RISK

## 10.1. POTENTIAL CONSTRAINTS

- 10.1.1. Based on the likelihood of buried archaeological remains being present within the site (low high) and their importance (negligible low), the potential direct impacts upon known and unknown heritage assets arising from the proposed development are not considered to be sufficiently significant to represent a likely constraint on development consent.
- 10.1.2. Groundworks associated with the proposed development are thought likely to directly impact upon known and unknown archaeological remains within the PDA. Therefore, the local authority may require investigations, which can be secured as a condition of consent. Depending upon the results of such investigations, mitigation measures might be required. Such works should be proportionate to the importance of the remains and significance of the impacts, and in accordance with the requirements of the NPPF.
- 10.1.3. Further investigations which may be required could include:
  - Trial trenching to confirm the presence/absence and condition of any buried archaeological remains at the PDA.
  - Depending upon the results of the trial trenching, mitigation measures such as adjustment to the scheme design to minimise impacts or advance excavation of some areas of the PDA.
- 10.1.4. Any such works should be conducted by a suitably qualified archaeological organisation in accordance with a written specification agreed in advance with the Local Planning Authority.

## 10.2. POTENTIAL SETTING ISSUES

- 10.2.1. The proposed development will only affect the settings of the non-designated heritage assets HA1 and MKE85219. This change may be significant but on heritage assets of low importance.
- 10.2.2. As the settings of only two non-designated heritage assets are impacted by the proposed development, it is anticipated that no further detailed setting assessment would be necessary in support of the planning application.

## 11. CONCLUSIONS

- 11.1.1. This desk-based assessment has presented the baseline data of known heritage within the PDA and a 1 km Study Area and has considered its significance and importance. Subsequently, an assessment of the archaeological potential of the PDA has been made.
- 11.1.2. It is intended that this report contains exhaustive objective baseline data and presents a sufficiently thorough assessment of the likely impact that future development would have on potential below-ground archaeological remains to allow for an informed and reasonable decision to be made regarding whether further investigation and mitigation is required at the proposed development site, in consultation with the local planning authority archaeological advisors.
- 11.1.3. The PDA is a greenfield site of open agricultural land. It falls within the North Kent Coastal Plain, a largely low-lying and marshy region, and the Swale river valley, whose brickearth deposits contain sealed artefact-bearing horizons of Palaeolithic and Mesolithic date. During the Neolithic Romano-British periods, the Swale river formed part of an important Trans-Continental trading route. Throughout the historic period and until the present day, the PDA seems to have served as agricultural hinterland to surrounding settlements, which were established during the Early Medieval and Medieval periods. It is probable that it was frequently traversed by salt workers travelling between the salt marshes and the surrounding settlements during the Romano-British and Medieval periods. It is possible that salt working related activities also took place within the PDA.
- 11.1.4. There are no designated heritage assets within the PDA boundary and 29 known and possible non-designated heritage assets, probable geological features and topographic features. These include Mesolithic and Neolithic findspots and Bronze Age and Iron Age Early Romano-British field systems, occupation and cremation cemeteries in Field 3 of the PDA; the above-ground remains of a one 17<sup>th</sup> century field boundary; the sites of five Post-Medieval buildings; the course of a Post-Medieval trackway; the sites of eight Post-Medieval ponds; five extant Post-Medieval and Modern ponds; the site of a Post-Medieval well; the sites of two Post-Medieval boundary stones; three extant Post-Medieval Modern boundary stones; one probable geological feature; and one below-ground feature of unknown date. The below-ground remains of five Post-Medieval field boundaries have also been identified. Of these heritage assets, those which are 'sites of' are of Negligible importance whilst the remainder are of Low (Local) importance and derive their significance from their archaeological and historical interest.
- 11.1.5. The parish boundary between Lower Halstow and Iwade runs roughly north to south through Field 4 of the PDA. It is not shown on mapping and was not identified during the site visit or on aerial photographic or LiDAR imagery. It is of Low (Local) importance, deriving its significance from its historical and possibly archaeological interest.
- 11.1.6. All of the present field boundaries bordering the PDA are of pre-1850 date. Therefore, those which are currently hedged (such as in Fields 1, 2, 4, and 9 15) may be worthy of protection according to the criteria of the 1997 Hedgerow Regulations (Table 1). These heritage assets are of Low (Local) importance and derive their significance from their historical interest.
- 11.1.7. Within the Study Area, there is one Scheduled Monument of Modern date (World War II Heavy Anti-Aircraft Gunsite: NHLE 1129344), one Conservation Area (Lower Halstow) and eight listed buildings. Of these, one is Grade I listed while the remaining buildings are Grade II. The Grade I listed building, the Church of All Saints, is of Medieval date but all of the other designated heritage assets are Post-Medieval in date. The Scheduled Monument and Grade I listed building are of High (National) importance and the Grade II listed buildings are of Medium (Regional) importance. They derive their significance from their historical and architectural interest.
- 11.1.8. There are 161 additional non-designated heritage assets within the Study Area. These include one findspot of Mesolithic flints; four heritage assets of Neolithic date; one heritage asset of Neolithic Bronze Age date; eight heritage assets of Bronze Age date; three assets of Bronze Age Iron Age date; five heritage assets of Iron Age date; one heritage asset of Prehistoric date and four of Later Prehistoric date; 19 heritage assets of Romano-British date; one heritage asset of Early Medieval date; 11 heritage assets of Medieval date; 31 heritage assets of Post-Medieval date; 23 heritage assets of Post-Medieval Modern date; 30 heritage assets of Modern date; and 18 heritage assets of unknown date. Those non-designated heritage assets which are 'sites of' or findspots are of Negligible importance whilst the remainder are of Low (Local) importance. They derive their significance from their archaeological and historical interest.
- 11.1.9. Due to previous archaeological investigations within it, there is negligible potential for remains of any date to be encountered within Field 3 of the PDA.
- 11.1.10. There is assessed to be a low potential for archaeological remains dating to the Palaeolithic and Neolithic periods and a low-medium potential for archaeological remains of the Mesolithic period to be present within the PDA. Any remains from these periods are likely to take the form of isolated findspots or sealed land surfaces.

- 11.1.11. There is assessed to be a medium high potential for previously unknown heritage assets of Bronze Age, Iron Age and Romano-British date to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits and ditches, the remains of occupation, and funerary monuments such as cremations.
- 11.1.12. There is assessed to be a low potential for previously unknown heritage assets of Early Medieval and Medieval date to be encountered within the PDA. If present, remains from these periods are most likely to take the form of agricultural remains such as field systems, pits, ditches and small rural buildings, remains relating to the salt working industry, and isolated findspots. Occupational and industrial remains are most likely to be present within Fields 1 3 and 9 14.
- 11.1.13. There is assessed to be a medium potential for previously unknown remains of the Post-Medieval period to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits, and ditches; the below-ground remains of buildings (in particular, remains relating to HA4, HA5 and MKE85220) and historic trackways (such as HA8); topographic features such as ponds; and isolated findspots. It is also possible that below-ground remains of the Iwade and Lower Halstow parish boundary survive in situ.
- 11.1.14. There is assessed to be a low potential for previously unknown remains of the Modern period to be encountered within the PDA. These are likely to take the form of agricultural remains such as field systems, pits, and ditches; topographic features such as ponds; and isolated findspots.
- 11.1.15. There is a high potential for previously unknown palaeoenvironmental remains of this period to be encountered within the PDA. These are most likely to be present in Palaeolithic or Mesolithic brickearth deposits, at depths greater than 1m, or waterlogged deposits of historic date at depths of less than 1m.
- 11.1.16. Any unknown heritage assets within the PDA are likely to be of Negligible or Low (Local) importance and derive their significance from their archaeological and historic interest.
- 11.1.17. Tithe mapping suggests that the PDA was primarily used as pasture rather than arable land during the 19<sup>th</sup> century, which may indicate good levels of preservation for any in situ below-ground archaeological remains.

#### POTENTIAI CONSTRAINTS

11.1.18. In light of the archaeological potential of the proposed development site and the nature of the proposed development's groundworks, it is possible that the local authority may require site investigations, which can be secured as a condition of consent. Such works should be proportionate to the importance of the remains and significance of the impacts, and in accordance with the requirements of the NPPF.

## 12. POLICY TESTS

#### NPPF

#### 12.1.1. The NPPF (2021) states:

- (194) "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. The level of detail should be proportionate to the assets' importance and no more than is sufficient to understand the potential impact of the proposal on their significance. As a minimum the relevant historic environment record should have been consulted and the heritage assets assessed using appropriate expertise where necessary. Where a site on which development is proposed includes, or has the potential to include, heritage assets with archaeological interest, local planning authorities should require developers to submit an appropriate desk-based assessment and, where necessary, a field evaluation."
- (203) The effect of an application on the significance of a non-designated heritage asset should be taken into account in determining the application. In weighing applications that directly or indirectly affect non-designated heritage assets, a balanced judgement will be required having regard to the scale of any harm or loss and the significance of the heritage asset.
- (206) Local planning authorities should require developers to record and advance understanding of the significance of any heritage assets to be lost (wholly or in part) in a manner proportionate to their importance and the impact, and to make this evidence (and any archive generated) publicly accessible.
- 12.1.2. This DBA has described the significance of identified designated and non-designated heritage assets. For non-designated heritage assets, this has included describing and assessing contributions to significance made by their setting. The historic environment record has been consulted and this report forms 'an appropriate desk-based assessment' for the nature of the PDA and the proposed development.
- 12.1.3. The further mitigation suggested in this DBA will entail the recording of any heritage assets to be lost and will entail public dissemination of the information in the form of grey literature.
- 12.1.4. Therefore, this DBA fulfils the relevant requirements of the NPPF.

#### Local Planning Policy

12.1.5. Policy CP8 of Swale Borough Council's Local Plan states:

Development proposals will, as appropriate:

- 1. Accord with national planning policy in respect of heritage matters, together with any heritage strategy adopted by the Council;
- 2. Sustain and enhance the significance of Swale's designated and non-designated heritage assets and their settings in a manner appropriate to their significance and, where appropriate, in accordance with Policies DM 32-DM 36;
- 3. Respond to the integrity, form and character of settlements and historic landscapes;
- 4. Bring heritage assets into sensitive and sustainable use within allocations, neighbourhood plans, regeneration areas and town centres, especially for assets identified as being at risk on national or local registers;
- 5. Respond positively to the conservation area appraisals and management strategies prepared by the Council;
- 6. Respect the integrity of heritage assets, whilst meeting the challenges of a low carbon future; and
- 7. Promote the enjoyment of heritage assets through education, accessibility, interpretation and improved access.
- 12.1.6. As discussed above, this DBA fulfils the relevant requirements of the NPPF.
- 12.1.7. It has described the significance of identified designated and non-designated heritage assets within the PDA and Study Area. For non-designated heritage assets, this has included describing and assessing contributions to significance made by their setting. This will provide guidance and a framework for the retention and enhancement of these heritage assets by the proposed development.
- 12.1.8. It has described the integrity, form and character of the settlements and historic landscape of the PDA and Study Area. This will provide guidance and a framework for the retention and enhancement of their integrity, form and character by the proposed development.
- 12.1.9. The results of this DBA will be publicly accessible following the report's upload onto the OASIS database.
- 12.1.10. Therefore, this DBA fulfils the relevant requirements of Swale Borough Council's local planning policy.

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## HISTORIC MAPS

1797 OS map: Halstow

1840 Tithe map of Lower Halstow parish

1841 Tithe map of Iwade parish

1869 1:10 560 County Series 1st Edition OS map

1896 1:2 500 County Series 1st Revision OS map

1898 1:10 560 County Series 1st Revision OS map

1908 1:2 500 County Series 2nd Revision OS map

1909 1:10 560 County Series 2nd Revision OS map

1938 1:10 560 County Series 3rd Revision OS map

1939 1:2 500 County Series 3rd Revision OS map

1961 National Grid 1:10 560 1st Imperial Edition

1968 National Grid 1:1250 1st Revision

1970 National Grid 1:10 560 1st Revision

1978 - 1986 National Grid 1:2500 1st Revision

## 1991 National Grid 1:10 000 Latest Version

## KENT RECORD OFFICE

U229/P4. Sir John Dorell's estate. 1624

# **GLOSSARY**

## **DEFINITIONS**

Term	Definition
Designated Heritage Asset	Assets registered on the National Heritage List for England. These may be protected by primary legislation (e.g. listed buildings, conservation areas, scheduled monuments) or have a non-statutory designation (e.g. World Heritage Sites, registered battlefields, registered parks and gardens, designated wrecks)
Heritage Asset NPPF (Annex 2)	"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." Some heritage assets are designated as Scheduled Monuments, Listed Buildings, World Heritage Sites, Conservation Areas, Registered Parks and Gardens, Registered Battlefields, or locally designated through policies in the Local Plan. Undesignated assets may be recorded in Historic Environment Records, while many other assets are currently unrecorded.  Information contained in HERs and SMRs is not definitive, since they may include features which, for instance, have been entirely removed, or are of uncertain location, dubious identification, or negligible importance. The identification of undesignated heritage assets is therefore to some extent a matter of professional judgement.  Both discrete features, and extensive landscapes defined by a specific historic event, process or theme, can be defined as heritage assets; and assets may overlap or be nested within one another.
Listed Building	A building or structure which is considered to be of 'special architectural or historic interest'
Non-Designated Heritage Asset	Assets identified by the local planning authority or national registers for the historic environment which have no formal designation but are considered to have a degree of significance meriting consideration in planning decisions. These can include locally listed buildings, information on sites held by the relevant Historic Environment Record and National Record of the Historic Environment
Archaeological Site (also 'Monuments')	Heritage assets which may consist of surface and/or sub-surface remains, features, deposits and/or material relating to past human activity with a degree of significance meriting consideration in planning decisions.
Significance: NPPF	"the value of a heritage asset to this and future generations because of its heritage interest. That interest may be archaeological, architectural, artistic or historic. Significance derives not only from a heritage asset's physical presence, but also from its setting"
Significance: GAPN 2	"The significance of a heritage asset is the sum of its archaeological, architectural, historic, and artistic interest. A variety of terms are used in designation criteria (for example, outstanding universal value for World Heritage Sites, national importance for scheduled monuments and special interest for listed buildings and conservation areas), but all of these refer to a heritage asset's significance."

Term	Definition
Significance: NPPF (PPG para 6) and Historic England guidance Statement of Heritage Significance: Analysing Significance in Heritage Assets (2019, HEAN 12)	Cultural values in the historic environment that people want to enjoy and sustain for the benefit of present and future generations.  Archaeological - There will be archaeological interest in a heritage asset if it holds, or potentially holds, evidence of past human activity worthy of expert investigation at some point;  Architectural - These are interests in the design and general aesthetics of a place. They can arise from conscious design or fortuitously from the way the heritage asset has evolved. More specifically, architectural interest is an interest in the art or science of the design, construction, craftsmanship and decoration of buildings and structures of all types;  Artistic - Artistic interest is an interest in other human creative skills, like sculpture;  Historic - An interest in past lives and events (including pre-historic). Heritage assets can illustrate or be associated with them. Heritage assets with historic interest not only provide a material record of our nation's history, but can also provide meaning for communities derived from their collective experience of a place and can symbolise wider values such as faith and cultural identity.
Setting: NPPF	"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 the significance or may be neutral" (an extended consideration of Setting is contained in GAPN 3)

# TERMS

Term	Definition
Artefact	An item of archaeological interest
Baseline	'Baseline conditions' are the environmental conditions in existence just before the occurrence of an impact – i.e. they are the conditions that would be affected.
Bronze Age	The period of human activity between 2,500 BCE and 700 BCE
Desk study	A collation and review of relevant existing information available from published, archival or online sources, including for instance geological and hydrogeological mapping, historical maps, environmental records etc., allowing an assessment of risks to the human and environmental receptors to be undertaken.
Earthworks	The moving of soil or rock to reconfigure the topography of a site.
Fieldwalking survey	Method of systematic non-intrusive survey involving walking across a plough field along transects to collect archaeological artefacts.
Geology	Geology is the study of solid earth, the material of which it is composed (principally rocks) and the processes by which they evolve.
Geophysical survey	Method of non-intrusive investigation involving the use of magnetometers to identify fluctuations in the earth's magnetic field which might indicate the presence of archaeological remains. Burnt remains and metals are best identified through this method of survey.

Term	Definition
Heritage asset	An item of heritage interest, for example an historic building or an archaeological find.
Historic Environment Records (HER)	A database maintained by individual counties or local authorities, containing records of archaeological sites, historic buildings and other aspects.
Historic landscape character types (HLC)	Historic landscape character types are distinctive and repeated combinations of components defining generic historic landscapes such as 'ancient woodland' or 'parliamentary enclosure'. The types used in this study were defined based on evidence from historic maps and other sources.
Iron Age	The period of human activity between 700 BCE and 43 CE
Made Ground	Ground created by infilling an area with material taken from elsewhere; typically, reworked soils, rubble, gravel, sand or former waste material e.g. ash.
Medieval	The period of human activity between 1066 CE and 1550 CE
Mesolithic	Middle Stone Age. The period of human activity between 10,000 BCE and 4,500 BCE.
Metal detector survey	Method of intrusive investigation involving the use of metal detectors to locate buried metal objects.
Mitigation	Measures which have the purpose of avoiding, reducing or compensating for adverse environmental impacts. It may also include measures to create environmental benefits.
Modern	The period of human activity from 1900 to the present day
National Mapping Programme (NMP)	A project funded by Historic England and local councils involving assessment and interpretation of aerial photographs and other remote sensing data, such as LiDAR.
Neolithic	New Stone Age. The period of human activity between 4,500 BCE and 2,500 BCE
Ordnance Datum	The standard measure of sea level in the UK, from which all heights are measured for mapping purposes.
Palaeolithic	Old Stone Age. The period of human and pre-human activity before around 10,000 BCE
Post-medieval	The period of human activity between 1550 CE and 1900 CE
Prehistoric	The period before the year 43 CE
Roman	The period of human activity between 43 CE and 410 CE
Saxon	The period of human activity between 410 CE and 1066 CE

# ABBREVIATIONS AND ACRONYMS

AOD	Above Ordnance Datum (above sea-level)
BCE	Before Common Era
BGS	British Geological Survey
ВН	Borehole
C	Century
CBM	Ceramic building material
CE	Common Era
CIfA	Chartered Institute for Archaeologists
DBA	Desk-based Assessment
ES	Environmental Statement
HER	Historic Environment Record
HLC	Historic Landscape Character(isation)
LPA	Local Planning Authority
LiDAR	Light Detection and Ranging
MLWS	Mean low water springs
NGR	National Grid Reference
NHLE	National Heritage List for England
OS	Ordnance Survey
RO	Registered Organisation (with CIfA)
SM	Scheduled Monument

## APPENDIX: RESULTS OF HER SEARCH

NHLE/HER/HA Ref	Name	Description	Easting	Northing	Period	Status	Importance
NHLE 1129344, HER DKE19163,	WORLD WAR II HEAVY ANTI- AIRCRAFT GUNSITE (TS2), 300M EAST OF CHETNEY COTTAGES	The monument includes a World War II Heavy Anti-aircraft gunsite, and its domestic camp, situated on the western side of Old Ferry Road, about 1 km north of Iwade village, overlooking Chetney Marshes and the River Medway beyond. The gunsite, known as TS2 (Thames South 2), formed part of a chain of batteries, positioned to defend the industrial and military targets in the Lower Thames and Medway areas from high flying strategic bombers approaching from the south and east. Sources indicate that the gunsite was established by February 1940, and was equipped with Gun Laying Mk 1A Radar and armed with four 4.5 inch guns during 1942, It became one of 18 batteries to be upgraded to accept the first allotment of 5.25 inch guns during 1942, It became one of 18 batteries to be upgraded to accept the first allotment of 5.25 inch guns in 1944 and these were emplaced, by the end of the year, in four new positions to the north. In January 1946 the battery was selected to form part of the reduced, post-war layout known as the "Nucleus Force", with its guns held in readiness off-site. The earlier installation consists of a north east facing, semicircular arrangement of four octagonal gunpits, and a central command post for the 4.5 inch guns. The command post, and three of the surrounding emplacements, were infilled after the war but are expected to survive in buried form. Aerial photographs, and the partial remains of the fourth gunpit, indicate that each emplacement consisted of a central gun, anchored by a steel holdfast, surrounded by six ammunition lockers, protected by an outer, externally embanked concrete blast wall. These, and the later guns, were served by a five-bay magazine, located a few metres to the north of the 4.5 inch gun positions. This survives as a single storey, semi-sunken concrete structure, set within a concrete walled enclosure. The flat-roofed structure is entered from an open corridor to the rear, which is reached from ground level by a ramp at each end. Other structures surviving within this area of	590025	168989	Modern	SM	High

	_
about 100m south east of the gun emplacements, and consists of accommodation huts and other	l
associated structures, flanking the entrance roadway from Old Ferry Road. The majority of the camp	l
buildings survive, and consist mainly of red brick, modular structures with pitched corrugated asbestos	l
sheet roofs, together with some Nissen and Curved Asbestos hutting. A series of timber huts was	l
constructed along the south western edge of the camp. These were demolished during the 1950s,	l
although elements of their foundations are likely to survive in buried form. Two speedway race tracks,	l
constructed during the latter part of the 20th century, are located beyond the area of protection,	l
immediately north of the 5.25 inch gun emplacements and to the east of the gunsite. The following	l
features are excluded from the scheduling: an observation kiosk, connected with the northern race	l
track, constructed on the parapet of one of the 5.25 inch gun positions; a third, small speedway track	l
located behind the guns; all modern surfaces, fences, gates and structures; materials used to seal the	l
doors and/or windows of some of the surviving buildings; all modern materials, vehicles and	l
equipment stored within and around the emplacements, camp buildings and operational structures; all	
modern fixtures and fittings, and all components of the modern plumbing and electrical systems.	l
However, the ground beneath all these features, and/or the structures to which they are attached, are	l
included. Reasons for Designation: Although of comparatively recent date, 20th century military sites	l
are increasingly seen as historic survivals representing a defining episode in the history of warfare and	
of the century in general; as such they merit careful record and, in some cases, preservation. One of the	l
more significant developments in the evolution of warfare during this period was the emergence of	l
strategic bombing in World War II, and this significance was reflected by the resources invested in	l
defence, both in terms of personnel and the sites on which they served. During the war, the number of	
people in Anti-aircraft Command reached a peak of 274,900 men, additional to the women soldiers of	l
the ATS who served on gunsites from summer 1941, and the Home Guard who manned many sites	
later in the war. A national survey of England's Anti-aircraft provision, based on archive sources, has	l
produced a detailed record of how many sites there were, where they were and what they looked like.	
It is also now known from a survey of aerial photographs how many of these survive. Anti-aircraft	l
gunsites divide into three main types: those for heavy guns (HAA), light guns (LAA) and batteries for	l
firing primitive unguided rockets (so called ZAA sites). In addition to gunsites, decoy targets were	
employed to deceive enemy bombers, while fighter command played a complementary and significant	l
role. Following the end of World War II, 192 HAA sites were selected for post-war use as the Nucleus	l
Force, which was finally closed in 1955. The HAA sites contained big guns with the function of	
engaging high flying strategic bombers, hence their location around the south and east coasts, and	l
close to large cities and industrial and military targets. Of all the gunsites, these were the most	l
substantially built. There were three main types: those for static guns (mostly 4.5 and 3.7 inch); those for	
3.7 inch mobile guns; and sites accommodating 5.25 inch weapons. These were all distinct in fabric,	l
though they could all occupy the same position at different dates, or simultaneously by accretion. As	
well as the four or eight gun emplacements, with their holdfast mountings for the guns, components	l
will generally include operational buildings such as a command post, radar structures including the	l
radar platform, on-site magazines for storing reserve ammunition, gun stores and generating huts,	l
usually one of the standard Nissen hut designs. Domestic sites were also a feature of HAA gunsites, with	
huts, ablutions blocks, offices, stores and amenities drawn from a common pool of approved structures.	l
Sites were often also provided with structures for their close defence; pillboxes are the most common	l
survivals, though earthwork emplacements were also present. The layout of HAA gunsites was	l
distinctive, but changed over time, for example to accommodate the introduction of radar from	l
December 1940, women soldiers from summer 1941, and eight gun layouts from late 1942. Nearly 1,000	l
gunsites were built during World War II, and less than 200 of these have some remains surviving.	

		However, at only around 60 sites are these remains thought sufficient to provide an understanding of their original form and function. This includes 30 of the 192 examples which continued in use until 1955. Surviving examples are therefore sufficiently rare to suggest that all 60 well preserved examples are of national importance. Furthermore, the HAA gunsite at Iwade is one of only nine sites nationally to survive with its layout, including its domestic site, substantially intact, and is one of only two such sites in Kent. Its surviving elements represent at least two stages in the development of the site, each with distinct building types and layouts. This physical record of the site's development is significant, and is rare nationally. Historically, the importance of the site is further enhanced by the significant part it played in the defence of Britain against aerial bombardment during World War II.					
NHLE 1069380, HER MKE33455	CHURCH OF ALL SAINTS	Parish church. C13 with C14 fenestration, south aisle c. 1504, restored 1874, south porch added 1893. Rubble and plain tiled roof, with flint and rubble tower with shingle roof. Nave and chancel, south aisle and south porch, west tower. Two stage tower with blocked west doorway, single light over and belfry openings. South aisle built after 1504 (money bequest in that year) with diagonal buttresses 2 offset buttresses and 2 two-light Perpendicular windows. Restored south-east and east windows, 3 light Perpendicular. Chancel roof line steps down and in to nave roof, showing separate build. North nave and chancel wall with 4 offset buttresses three C14 windows and plain chamfered north doorway. Gabled south porch, moulded outer doorway with hood. Inner doorway and door of c. 1504, overlapping plank and stud, strapped ironwork, ring handle with 2 dragons twisted round; door surround roll moulded with hollow chamfer and basket arch with quatrefoil over. Interior: nave with 2 bay arcade to south aisle on octagonal piers with broad, double chamfered arches. Double chamfered doorway to tower. Roof of 4 crown posts, as also south aisle. Floor level internally raised approximately 1 foot. No chancel arch. Single arched opening from chancel to south aisle, chancel roof C19 crown posts. Fittings: water stoup by south door, piscina in chancel and cusped piscina in south aisle. Wooden screen in south aisle, 3 bays with Perpendicular tracery and door in left bay, finely moulded with attached shafts for (missing) statues. Brasses: on large stone slab in south west corner, to Symon Snelling d. 1467 and wife Jokuosa (Joyce). One foot high, Symon has lost his head. Glass: south-east window, c. 1504 crucifixion scene, repaired 1840. Royal Coat of Arms: George III, on the west wall.	590132	167949	Medieval		High
NHLE 1069342, HER MKE33416	LITTLE BARKSORE FARMHOUSE	Farmhouse. C18. Timber framed and clad with painted weatherboard with concrete tiled roof. Two storeys and stacks to left and right ends. Regular fenestration of 3 wood casements on first floor and 2 on ground floor, and central board door with flat hood.	586768	167356	Post- Medieval	l II	Medium
NHLE 1069379, HER MKE33454	Culnells	Farmhouse. C17. Red brick in English bond and plain tiled roof. Lobby entry plan. Two storeys on plinth with plat band, coved eaves cornice to hipped roof and stacks to left and to end right. Irregular fenestration of 3 sash windows and 1 wood casement on first floor and 3 sash windows and 1 blocked window opening to left, on ground floor all with gauged heads. Halfglazed doors to right, and to left in gabled porch. Rear elevation with red brick English bond lean-to, and rear-wall of part plastered timber frame.	588970	166920	Post- Medieval	II	Medium
NHLE 1069417, HER MKE33492	BARN 20 YARDS SOUTH OF GREAT NORWOOD	Barn. C17. Timber-framed on brick plinth and clad with weatherboard with corrugated iron hipped roof and shallow sloping central entry. Interior: 4 bays with aisles, passing shores to arcade posts, arched bracing to tie-beams; clasped purlins with diminished principals and wind bracing. Dendrochronology of timbers from the barn established a 93 tree ring site sequence but this could not be matched to any reference chronologies. No date was obtained.	587642	166080	Post- Medieval	II	Medium
NHLE 1116219, HER MKE33765	Ivy Cottage	House. Circa 1700. Red brick and plain tiled roof. Two storeys and attic on plinth with plat band and coved eaves cornice. Two hipped dormers and stacks end left and end right. Regular fenestration of 5 wood casements on first floor and 4 on ground floor, all with gauged heads, and central door of 6 raised and fielded panels with rectangular fanlight and hipped hood.	590090	167900	Post- Medieval		Medium

NHLE 1116241, HER MKE33766 and MKE88677	COLESHALL FARMHOUSE	Farmhouse. C16, clad C18 and extended C19. Timber framed and clad with painted brick and plain tiled roof, and painted brick and slate roofed extension. Entrance front: 2 storeys on plinth, with slate roofed C19 wing left, 1 glazing bar sash to each floor, 2 storey gabled porch, with half-glazed door, and wood casement on first floor, returned hip of C16 building to centre and C18 hipped wing recessed with 1 wood casement to right. Stacks rear centre and right front. Left return: 2 storeys, hip and gablet roof, central stack, 3 glazing bar sashes on each floor, with centre-right oriel on first floor, and central glazed door with open pediment on fluted pilasters. C19 wing to right. This is the original, possibly a Wealden, wing. Interior: evidence of jettied front, possibly Wealden or continuous jetty. Curved braces, coupled rafter roof, probably later. Group value with Barn to Coleshall Farnhouse.	589720	167140	Post- Medieval		Medium
NHLE 1343863, HER MKE34202	GREAT NORWOOD	Farmhouse in moated site. C18. Timber framed and clad in red brick and weatherboard with plain tile roof. Two storeys and attic, with hipped roof and stacks to end right and rear left. Double hipped projecting wing right, and return hip left. Irregular fenestration of 4 wood casements to each floor and central half-glazed door.	587600	166150	Post- Medieval		Medium
NHLE 1390604, HER MKE34463	TRADITIONAL AGRICULTURAL BARN	Barn. C18, but some C17 or earlier timbers and some C20 alterations. Timberframed on brick plinth, clad in weatherboarding, much of which is tarred to the north and west. Roof reported to have been formerly thatched but currently clad in C20 asbestos sheeting. Aligned east to west and of four bays with cart entrance with double doors to the penultimate bay to the west. The interior wallframe has a midrail and jowled upright posts. The east end has two curved braces, C17 or earlier. Some later boarding has been fixed to the interior of the west end, but where this is missing the original wall frame is visible, including lath panels. The tie beams have curved braces. The roof has rafters withiout purlins with original rafters to east and west but replaced rafters to the centre. Some collars, mainly of poles, have been inserted later. Substantially complete C18 barn with some earlier timbers which has strong group value in a village centre.	590100	167980	Post- Medieval		Medium
HER MKE106133	Medieval Copper alloy sword	Portable Antiquities Scheme find. A facetted octagonal Medieval (AD 1300-1500) copper alloy sword pommel. Description: The faces and sides are smooth and appear to be undecorated. The octagonal faces are raised and longer on the central vertical sides. There is a rectangular (16.95mm x 8.63mm) slot in one of the sides, with a coresponding slot on the oposing side. This slot is distorted and enlarged by a historical break. Measurements: Weight: 67.72g, height: 45.05mm, width: 52.58mm, depth: 20.56, thickness of faces approx. 2.85mm Discussion: This form of pommel was particularly popular during the 14th and 15th centuries and is clearly defined by Oakeshott (1991, 10) as type 11.	588350	166080	Medieval	Non- designated heritage asset	Negligible
HER MKE106237	Post Medieval Silver coin	Portable Antiquities Scheme find. A silver penny of Elizabeth I (1558-1603) First Issue, dating to 1560-1. Mint or issue place: The Tower of London. The bust has been obliterated. ??Obverse description: Bust has been obliteratedObverse inscription: [ ] SINE [] Reverse description: Square shield on long cross fourchee dividing the legend. Lis (wire inner circle), cross crosslet, marletReverse inscription: CIVI/TAS/LON/DON	589960	167190	Post Medieval	Non- designated heritage asset	Negligible
HER MKE111978	Site of National School, School Lane, Iwade, Swale	Site of National School, School Lane, Iwade. The building as the National School is shown on the Ordnance Survey map 1862-1875, then as School on the 1897-1952 maps.	590040	167820	Post Medieval	Non- designated heritage asset	Negligible
HER MKE113902	Post Medieval copper alloy buckle	Portable Antiquities Scheme find. Post Medieval (16th - 17th century), cast copper alloy spectacle buckle.Description: Double loop oval buckle with angled frame, with a narrowed strap bar. The concave sides come to a point at the upper and lower apex of the loops. The inner edge is bevelled and there appears to be no indentation from a pin on either loop.Measurements: Length: 32.56mm, width: 28.08mm, thickness: 2.25mm, Weight: 3.91gmsSimilar buckles were produced over several centuries, from AD1350-1720. The style of this buckle indicates possibly c.AD1500-1650	589400	167100	Post Medieval	Non- designated heritage asset	Negligible

HER MKE113906	Post Medieval silver coin	Portable Antiquities Scheme find. A heavily worn and clipped Post-Medieval silver halfgroat in the name of Charles I (1625-1649), Group D, star mintmark dating 1640-1641. North (1991) No.2258.  Measurements: 16.27mm in diameter, 0.69mm thick and 0.93g in weight.	589430	167340	Post Medieval	Non- designated heritage asset	Negligible
HER MKE113908	Post Medieval silver coin	Portable Antiquities Scheme find. worn and clipped Post-Medieval silver threepence of Elizabeth I, North's second issue (1561-1582). Dated 1573, Acron mint mark, North (1991) type 1998.Measurements: 19.28mm in diameter, 0.75mm thick, 1.33g in weight.	589430	167340	Post Medieval	Non- designated heritage asset	Negligible
HER MKE113920	Post Medieval copper alloy button	Portable Antiquities Scheme find. A complete copper alloy livery button dating to c. 1879-1904. The button has a raised rim on its slightly convex front, and also bears a crest on a wreath consisting of a spoonbill which has a fish in its beak. There are small traces of gilding around the beak and down the back of the bird's neck. On its reverse, it has a central stitching loop, around which is a concentric ridge. Beyond this ridge are circled the manufacturer's details: FIRMIN & Down and 47 WARWICK ST REGENT ST below, with LONDON above the ridge on the lower side. Firmin & Down and Archives' brief history of the company: http://discovery.nationalarchives.gov.uk/details/r/ecb1c423-95d9-4799-86c9-a52a4ec52e1e. The family with the spoonbill crest has not been identified.	590120	167980	Post Medieval	Non- designated heritage asset	Negligible
HER MKE113932	Post Medieval gold finger ring	Portable Antiquities Scheme find. A facetted gold ring of late Medieval to Post-Medieval date. Description: The loop is formed from 12 pointed moulded oval segments or petals aligned diagonally to the loop and abutting each other on their sides. The pointed ovals alternate hatched lines in raised rim and incised lines in one plain within raised rim. It is possible this isn't direct decoration but the adhering surface for enamel which is now missing. Despite these elements missing any possible enamel the ring remains in good conditionMeasurements: 18.49mm in diameter, 3.37mm thick and 1.96g in weight. Discussion: This ring resembles the decorative wreathing or twisted loops seen on a number of precious metal rings from the late Medieval to early Post-Medieval period, c.AD 1400-1600. A number of rings featuring this twisted /wreathing decorative loops, albeit all of different designs have been reported to the PAS @: DUR-59E6D7 (2015T426), ESS-7CA61A (2017 T517), NMS-26FEF9 (2016T516) and NCL-8BD8F4 (2008 T367). Conclusion: It is therefore clear that this ring dates to before 1718 and as the object is made of more than 10% precious metals, it constitutes potential Treasure under the stipulations of The Treasure Act 1996.	589800	169000	Post Medieval	Non- designated heritage asset	Negligible
HER MKE12889	Unidentified feature	Vertical Datum: LAT 15-NOV-1979 OBP shown in 51 22 07N 000 42 41E on survey [k7005]. 08- MAR-1991 Not visible on photoplot pg 2005.	588642	168680	Post Medieval to Modern	Non- designated heritage asset	Low
HER MKE12896	Remains of hulked barge	One of a group of hulked barges in varying states of decomposition lying either side of a flood defence embankment. Some of the barges are heaped one on top of the other. Identified during 2002 survey and comprises a concrete barge, standing c.2m proud	587920	168920	Modern	Non- designated heritage asset	Low
HER MKE12901	Unidentified obstruction	Vertical Datum: LAT 18-MAR-1991 Obstruction shown in 51 23 18N 000 42 53E on photoplot.	588862	169028	Modern	Non- designated heritage asset	Low
HER MKE12903	Remains of unidentified craft	Stranded wreck. Identified during 2002 survey and comprises a concrete barge mostly with a submerged stern and midship. Bow stands c.1m pround and the vessel is intact	587880	169060	Modern	Non- designated heritage asset	Low

HER MKE12904	Unidentified wreck	Vertical Datum: LAT 15-NOV-1979 Stranded wreck dries 4.2m Shown in 51 23 22N 000 42 17E on survey. 08-MAR-1991. Not visible on photoplot.	588162	169126	Modern	Non- designated heritage asset	Low
HER MKE12905	Unidentified wreck	"The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990."	589089	169160	Post Medieval to Modern	Non- designated heritage asset	Low
HER MKE14195	Squeak	Registration No. LONDON 105556 Precise coordinates not available, last known location of vessel reported by Society for Spritsail Barge Research. SQUEAK (ex DORCAS) was built at Rochester in 1898. She was owned successively by East Kent Brewery and Scholey. She is noted as a roads barge at East Greenwich in 1921, a hulk in 1948 and as being burnt around 1974.	589280	169000	Modern	Non- designated heritage asset	Low
HER MKE14196	Sirdar	Registration No. LONDON 110033 Precise coordinates not available, last known location of vessel reported by Society for Spritsail Barge Research. SIRDAR was built at Ipswich in 1898. She was owned successively by Shrubsall, Parry and the L.R.T.C She is described as a motor barge and charter barge. She is then noted as a hulk and as being partially visible as burnt remains in 1986	589240	168960	Modern	Non- designated heritage asset	Low
HER MKE14197	Veronica	Registration No. LONDON 120691 Precise coordinates not available, last known location of vessel reported by Society for Spritsail Barge Research. VERONICA was built at East Greenwich in 1906. She was owned successively by Parker and Everard. She is recorded as being refitted in 1956. She is noted as a hulk and her remains visible in 1986.	588990	169020	Modern	Non- designated heritage asset	Low
HER MKE14487	Ellen lines	and the degree of hazard which she presents to navigation. It also mentions her sale to Robert Palmer in October 1894 and to further work dismantling the vessel. A sketch shows how much of the vessel is visible above the water. The minutes of the Conservancy Committee note on 29 May 1895 that the Admiralty have taken responsibility for the wreck. They also note contracting Arthur Gann for 400 to disperse the vessel, and on 14 April 1896 that the bed is clear. This last date has been taken for the date of loss."	588990	169020	Post Medieval	Non- designated heritage asset	Low
HER MKE14646	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589050	169140	Modern	Non- designated heritage asset	Low
HER MKE14647	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589060	169140	Modern	Non- designated heritage asset	Low
HER MKE14648	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589060	169120	Modern	Non- designated heritage asset	Low
HER MKE14649	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589060	169510	Modern	Non- designated heritage asset	Low
HER MKE14650	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589097	169171	Modern	Non- designated	Low

						heritage asset	
HER MKE14651	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589090	169160	Modern	Non- designated heritage asset	Low
HER MKE14652	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589110	169160	Modern	Non- designated heritage asset	Low
HER MKE14653	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589110	169150	Modern	Non- designated heritage asset	Low
HER MKE14654	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589100	169140	Modern	Non- designated heritage asset	Low
HER MKE14655	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589130	169160	Modern	Non- designated heritage asset	Low
HER MKE14656	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589130	169140	Modern	Non- designated heritage asset	Low
HER MKE14657	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589130	169120	Modern	Non- designated heritage asset	Low
HER MKE14658	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589150	169120	Modern	Non- designated heritage asset	Low
HER MKE14659	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589150	169140	Modern	Non- designated heritage asset	Low
HER MKE14660	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589150	169140	Modern	Non- designated heritage asset	Low
HER MKE14661	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589150	169120	Modern	Non- designated	Low

						heritage asset	
HER MKE14662	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589150	169140	Modern	Non- designated heritage asset	Low
HER MKE14663	Remains of unidentified wreck	The 1961 survey shows a group of 35 barges in this location. They are all double-ended with open holds. The 1967 survey shows around half this number. Site records have been prepared for the 18 remaining in 1990.	589170	169120	Modern	Non- designated heritage asset	Low
HER MKE14664	Remains of unidentified barge	"The 1961 has no barges in this area. This barge appears on the 1967 survey and that for 1990. On the later survey it seems to be more settled in the mud and its hold has begun to fill. Position of point based on 2000 E.A. aerial photograph. Vessel identified during 2002 survey and comprises a concrete barge stern mostly submerged the bow stands c.2m pround. It has wooden planks running down the sie of the ship at intervals, possibly bouys once bolted into the concrete"	587880	169050	Post Medieval to Modern	Non- designated heritage asset	Low
HER MKE14665	Remains of unidentified barge	The 1961 has no barges in this area. This barge appears on the 1967 survey and that for 1990. On the later survey it seems to be more settled in the mud and its hold has begun to fill. Position of barge based on 2000 E.A. aerial photgraph. Identified during 2002 survey and comprises a concrete barge only one end is visible the rest buried (possibly the stern)	587910	168980	Modern	Non- designated heritage asset	Low
HER MKE14666	Remains of unidentified barge	The 1961 survey shows no barges in this area. A group of barges appears on the 1967 survey and that for 1990. On the later survey they seem to be more settled in the mud. On both surveys the remains seem to relate to seven barges, some are only partially visible and others are lying over the remains of their neighbours. The proximity and confusion of remains has made allocation of individual National Grid References solely from the aerial photograph impractical. Position of point based on 2000 E.A. aerial photograph. Site identified during 2002 survey and comprises an intact concrete barge, standing proud by at least by 2m	587910	168980	Post Medieval to Modern	Non- designated heritage asset	Low
HER MKE14667	Unknown Barge	"There are seven barges lying partially submerged on the inside of a sea wall (earth). They are only partially visible above the water but appear to be doubleended with open holds and all of the same design. The proximity and lack of clarity of the remains has made allocation of individual NGR solely from the aerial photgraphs impractical. An eighth barge lies to the south of the main group. Position of point based on 2000 E.A. aerial photograph. Identified during 2002 survey and comprises a concrete barge, one tanding at least 4m proud, intact"	587920	168940	Modern	Non- designated heritage asset	Low
HER MKE20354	Mid - Late Bronze Age Field System, Iwade	A series of linear ditches, focused in excavation area A, and pits representing an enclosed field and trackway dating to the mid to late bronze age. The extent of the field boundaries probably extends beyond the excavation area. Quern stones and animal bones recovered indicate a mixed arable/pastoral economy. Although no evidence of a settlement was found, storage pits and hearths were, and unabraded potsherds, indicating that a settlement maybe located nearby. Two pits contained deliberately placed pots and two contained the fragmentary remains of near-complete vessels. It is believed that they were of a ritual nature. A small amount of potsherds from the bronze age feature suggest that the settlement may have continued into the early iron age. Occupation seems to have then recommenced on the site in the late iron age	589960	167350	Bronze Age	Non- designated heritage asset	Low

HER MKE20355	Mid - Late Iron Age Enclosure Settlement, Iwade	"A mid to late Iron Age settlement, possibly ending in the early post-conquest period, c.50AD. The archaeological probably extends beyond the excavation area. The site seems to have gone through two stages of development. A farmstead consisting of an enclosure cutting an earlier Bronze Age site (TQ 96 NW 102), with three roundhouses began around 150-100 BC. Two further roundhouses where added between 75 BC and 50 AD with nearby post built structure, possibly a store or animal shed, and a second enclosure dug to the south-east. The function of the second enclosure remains unclear due to truncation of the centre by a modern road and medieval droveway to its west. Several Roman potsherds found suggest that it continued in use into the Roman post-conquest period as a livestock enclosure."	590040	167290	Iron Age	Non- designated heritage asset	Low
HER MKE20356	Medieval Field System, Iwade	A medieval field system dating to between 1150 - 1350 AD. The features recorded included field boundaries a track and drove way, both running north-south, and a post-built structure. This structure, 10m by 6m, is possibly a barn, sheepfold or temporary dwelling.	589530	167300	Medieval	Non- designated heritage asset	Low
HER MKE20357	Prehistoric features at Area III, Iwade	"The evaluation report states that a number of linear ditches and other features were identified as being of likely prehistoric date. It also states that the prehistoric archaeology appeared to be far more widespread than the later medieval component of the archaeology. In the excavation phase, the principal late prehistoric features were two ditches, located in the south eastern quarter of the site. Orientated NE-SW and NW-SE; one cuts the other at 90 degrees and both continue beyond the southern boundary of the site. One had been recut at its northern end. A small amount of prehistoric pottery was recovered from one of the ditches and it was concluded that the features were broadly contemporary in date and may represent the remnants of a late prehistoric system. A number of isolated pits and a posthole were also recorded, which were dated on the basis of their finds assemblages. Three tree hollows also contained small quantities of prehistoric finds. The report did not attempt to date these features any more closely than Late Prehistoric, with a date range of c.1500-50 BC. Prehistoric pottery sherds were also found as residual finds in later features. The excavation did not record any Roman features to elucidate the evaluation report's findings of residual Roman pottery. Medieval (TQ 96 NW 106) and Post Medieval (TQ 96 NW 107) phases of activity were also recorded. The site covered an area of 0.6ha"	590100	167860	Middle Bronze Age to Late Iron Age	Non- designated heritage asset	Low
HER MKE20358	Medieval features at Area III, Iwade	In the evaluation, the majority of medieval features were recorded in the western part of site, prompting the report to suggest that this fitted a pattern of medieval activity in the area associated with buildings with frontages on 'The Street'. Later Prehistoric features were thought to be far more widespread. The excavation produced a quite different picture. Two large enclosures of 13th/14th date occupied the majority of the site. The northern enclosure (I) was dug first, it's shape loosely defined by three ditches, which bound an area containing a number of medieval pits. All three sections of enclosure ditch contained 13th century pottery. The enclosure had a rounded southern end and extended beyond the area of excavation to the north. The later southern enclosure (II), also consisted of three sections of ditch, which contained 13/14th century pottery. This enclosure had a rounded northern end and it extended south beyond the limits of excavation. Two further linears have been associated with the second enclosure along with a number of other contemporary short linear ditches. These contained a range of 12th-14th century pottery. Numerous pits containing medieval pottery were excavated within both enclosures and further pits were recorded east and west of the enclosures. It was unclear how the pits related to the enclosures. They contained a mixture of 13th/14th centur	590100	167860	Medieval	Non- designated heritage asset	Low

		pottery. In addition a number of postholes and short linears/gullies were recorded. A number of medieval features also cut enclosure I. Late Prehistoric (TQ 96 NW 105) and Post Medieval (TQ 96 NW 107) phases of activity were also recorded. The site covered an area of 0.6ha					
HER MKE20359	Post Medieval Features at Area III, Iwade	In the evaluation, the majority of post medieval evidence came from the western part of the site. In the excavation phase, two linear ditches were identified, in the northern half of the excavations. Both contained 16th-17th century pottery. Two pits and a posthole were also dated to this period, all three containing 16th-17th century pottery. A number of more modern features were also identified containing residual post medieval finds. Two other phases of activity were recorded on site, a Late Prehistoric (TQ 96 NW 105) and a Medieval phase (TQ 96 NW 106). The site covered an area of 0.6ha	590100	167860	Post Medieval	Non- designated heritage asset	Low
HER MKE20387	Roman Pottery at Ferry Road, Iwade	Two sherds of Roman pottery were found during excavation at Ferry Road, Iwade. 1) Fine Canterbury pink-buff, of mid 2nd to early 3rd century date and 2) Central Gaulish Micaceous ware, pre-Claudian jar bodysherd with igneous inclusions.	590120	167680	Romano- British	Non- designated heritage asset	Negligible
HER MKE20388	Medieval features and finds at Ferry Road, Iwade	Ditches of medieval date were found. It is probable that these were cut for drainage on the heavy clay. They appear to have been deliberately infilled. A hearth and scorched areas perhaps indicate rural crafts, possibly metalworking indicated in an evaluation of 1997. A presumed area of hard standing was uncovered but its specific function could not be ascertained. Oyster shell was found in several areas, including one obvious deliberate dump. Pottery totalled 167 sherds, of which 2 were Roman (TQ 96 NW 108), the rest mainly dating from c.1150-c.1300.	590120	167680	Early Medieval or Anglo- Saxon to Medieval	Non- designated heritage asset	Low
HER MKE20389	Early Medieval activity at The Street, Iwade	Five roughly bowl-shaped features contained daub and pottery sherds indicating an early medieval date. The fills also contained much charcoal, together with both slag and hammerscale, indicating ironworking. The features probably represent either ploughed-out ash pits, metalworking hearths or fire pits.	590150	167590	Medieval	Non- designated heritage asset	Low
HER MKE20392	Possible Neolithic or Bronze Age cremation burial at The Street, Iwade	Evaluation excavation found an isolated, shallow, flat-bottomed pit at the east end of the site, which contained four sherds of a flint-tempered Deverell-Rimbury type pottery vessel of Bronze Age date, a flint flake and charcoal No bone was seen, but it is thought likely that the feature was a solitary cremation burial although a hearth is also possible.	590150	167590	Middle Neolithic to Middle Bronze Age	Non- designated heritage asset	Low
HER MKE20429	Late Bronze Age Flints, Iwade	Four hard hammer struck flints dated to probably the late bronze age.	590090	167680	Bronze Age	Non- designated heritage asset	Negligible
HER MKE20431	Medieval/Early Post Medieval Pottery Sherds , Iwade	A small quantity of pottery sherds dating from the late 12th to 16th century.	590090	167680	Medieval	Non- designated heritage asset	Negligible
HER MKE20437	Prehistoric Flints, Iwade	Evaluation trenching prior to housing development. No archaeological features were found, although a number of burnt flints and one possible struck flint indicate activity in the area during the prehistoric period.	589604	167832	Later Prehistoric	Non- designated heritage asset	Negligible
HER MKE2996	Early Iron Age briquetage site	The remains of what had once been an extensive spread of Early Iron Age briquetage was found in 1925. The layer was some 2ft. thick, beneath 3ft. of post-Roman marsh clay, and yielded a fine series of La Tene II and III sherds, including several portions of pedestal urns. See AO/58/59/2 and 3. This find is located below a Roman cultural horizon and may be compared with the Red Hills of Essex. In the	586730	168050	Iron Age	Non- designated heritage asset	Low

		Romano-British briquetage site, which I described in auth., Mr. Burrows of 62 Salisbury Road, Gillingham, found an early 2nd century cremation group comprising an urn, 6 1/4 inches high, covered by a dish and accompanied by a small vase. Additional bibliograhic entries. The exact spot was pointed out to me by Mr. Anderson, Warden of the Lower Halstow Rifle Range. Unknown location. Salt winning site under observation by the Upchurch Archaeological Group. Large deposits of briquetage waste. Reference from field report. Survey in 1999 confirms early 1st century salt winning area including circular ditch, post holes and natural drainage channel. 2nd century cremation burials at higher level intruding into 1st century debris. Briquetage found at this site					
HER MKE3009	Medieval Moat, Moat Farm, Iwade	Homestead moat at Moat Farm, Iwade, near the waters of a creek of the Medway. Only the north and west arms of the moat survive, partly water-filled and in poor condition. Published 25" survey revised. Moat Farm, Iwade, listed in the county checklist for moated sites in Kent - December 1979.	588690	167420	Medieval	Non- designated heritage asset	Low
HER MKE3010	Medieval moat, manor (site of), deer park, Great Norwood Farm, Bobbing	Moat. Stephen, son of Jordan de Shepey, who lived in the reigns of Richard I and John, obtained a grant of the manor of Norword and built himself a moated mansion which he encompassed with a deer park. Before his death he gave two acres in Northwode for the building of a chapel. Great Norwood Homestead moat remains around the farmhouse and buildings. Homestead moat, part water filled but generally in poor condition. No trace of the park was found. Published 25" survey revised. Moated site at Great Norwood, Bobbing, listed in the county checklist for moated sites in Kent - December 1979.	587580	166180	Medieval	Non- designated heritage asset	Low
HER MKE3015	Cinerary urns/U; burnt stones/U	Cinerary urns and burnt stones were found dispersed over a field known as 'The Downs' about 2 feet (c.0.6m) below the surface during a land-draining exercise. The area is now under pasture.	589220	167560	Unknown	Non- designated heritage asset	Low
HER MKE3017	undated earthworks	Earthworks described as ancient fortifications documented within an area known as Swaines Down, a name which is of Danish origin. The earthworks are no longer visible and the area is now an orchard.	588300	168000	Unknown	Non- designated heritage asset	Low
HER MKE3020	Possible Roman kiln	A rescue excavation conducted in 1963 near Funton Creek by the Lower Medway Research Group revealed evidence of industrial activity in the 2nd. c A.D. The precise nature of the site has yet to be ascertained. The site of this excavation, centred at TQ 8821 6823, is clearly visible in the sea-eroded cliff of Funton Creek. No structures are visible but there is a strong concentration of briquettage along the foreshore, and some 1st.c/2nd.c sherds were found.	588210	168230	Roman	Non- designated heritage asset	Low
HER MKE3022	Possible Roman kiln site	The foreshore of Funton Creek at TQ 8853 6838 is littered with Roman brick and tile fragments, some of which are wasters, and much briquettage: pottery is very scarce and consists of sherds of "Upchurch" ware. Some excavations were carried out here in 1964 by A. E. Detsicas and A. Miles, and revealed a deposit of ash and briquettage with a few, apprarently Roman, pot sherds mixed in with it: on the surface of the deposit some pieces of molten lead were found and a brass coin of Severus Alexander. The excavators would not commit themselves on the site but there is sufficient evidence here to tentatively identify it as a Roman brick and tile kiln.	588520	168370	Roman	Non- designated heritage asset	Low
HER MKE3025	Romano-British pottery kilns?	Surface collections of pottery, evidence of potting and settlement, were found at Funton Creek saltings in the late 19th century. These finds may represent unlocated Roman pottery kiln sites now destroyed by erosion.	586000	167000	Roman	Non- designated heritage asset	Low
HER MKE3032	Callum Hill telegraph station	Callum Hill. Former location of a admiralty shutter telegraph station of the late 18th century.	587100	166500	Post Medieval	Non- designated	Negligible

						heritage asset	
HER MKE3035	Romano-British saltworks	"A Romano-British salt-panning site at Funton Marsh, one of a number discovered as a result of an archaeological survey of the area in 1962. It is located on a mud bank in the Medway estuary and is partially covered at high tide. It was found to be in danger of erosion and rescue excavations were therefore undertaken in 1984 by the Lower Medway Archaeological Research Group. A rectangular hearth, 4ft 6ins x 2ft was found. The ash floor consisted of hard- packed ash and saltern debris, with globules of lead imbedded in the surface. A layer of saltern debris west of the hearth consisted of evaporating vessels, triangular bricks, hearth debris, burnt soil, a firebar and vitreous slag. A further trench revealed layers of saltern debris, tile, oyster, magstone and a thick ash deposit. It would seem that a succession of pits had been dug. The presence of a post-hole and building debris suggests that a building may have existed on the site. The dating of the site is uncertain. The few indeterminate potsherds included a fragment of Samian and a dupondius of Severus Alexander was found on the surface."	588500	168300	Roman	Non- designated heritage asset	Low
HER MKE3036	Romano-British saltworks	The Funton salt-pans relied on fire for the evaporation of the brine they contained. Dating, in the circumstances of the foreshore, remains insecurely established. It is however likely, on the basis of pottery found on marsh sites, that the production of salt from brine began during the late Iron Age, if not earlier, and continued until at least the third century on north Kentish sites. RB pot sherds discovered from sea-cut section	589000	168900	Romano- British	Non- designated heritage asset	Low
HER MKE3038	Site of telegraph station	Former location of a telegraph station on the Chatham, Sheerness and Deal line of 1796.	587700	166700	Post Medieval	Non- designated heritage asset	Negligible
HER MKE33453	Former site of a barn at ColeshallL Farm	Former site of a Grade II listed building. Main construction periods 1680 to 1720. Original listing description: Barn. Circa 1700. Timber framed and clad with weather board and corrugated iron roof. Half-hipped with 2 hipped strays. Interior: 5 bays with aisles, queen post roof. Cl6 to C17. An aisled timber barn of 5 bay with a Queen post roof. The outside is now clad in corrugated iron sheeting, but the end elevation is weatherboarded. 1/2 hipped roof with 2 hipped pentices. Group value with Coleshall Farmhouse	589753	167240	Post Medieval to Modern	Non- designated heritage asset	Negligible
HER MKE3522	Saltmound, med/post-med	4 mounds in Eastchurch Marshes. Probably medieval salt workings.	590340	169050	Medieval	Non- designated heritage asset	Low
HER MKE73158	Medieval copper alloy harness fitting	Portable Antiquities Scheme find. Copper alloy (some lead oxide) disc with large central boss, two raised rings with triangles between. All edges very rounded. Stud attachment.	586656	167890	Medieval	Non- designated heritage asset	Negligible
HER MKE73325	Unknown lead unidentified object	Portable Antiquities Scheme find. Rectangular lead or lead alloy tablet, with inlaid metal (iron?) wavy line on both sides. Function and date unknown.	588120	166340	Unknown	Non- designated heritage asset	Negligible
HER MKE73586	Post Medieval copper alloy bell	Portable Antiquities Scheme find. A Post Medieval cast copper alloy bell probably dating from the 17th century AD. The bell is spherical in shape with a square suspension loop with a drilled perforation protruding from the upper hemisphere. The lower hemisphere is decorated with a sun burst design.	589900	167400	Post Medieval	Non- designated heritage asset	Negligible

		The surface of the bell is corroded and there are signs of iron corrosion around the suspension loop. The bell is 50.5mm high, 41.5mm in diameter and weighs 71.4 grams.					
HER MKE73587	Post Medieval copper alloy bell	"Portable Antiquities Scheme find. A Post Medieval cast copper alloy bell probably dating from the 17th century AD. The bell is spherical in shape with a square suspension loop with a drilled perforation protruding from the upper hemisphere. The both hemispheres are decorated with a petal design. The 'pea' or rumbler inside the bell is still present. The bell is 36.1mm high, 28.4mm in diameter and weighs 27.4 grams."	589900	167400	Post Medieval	Non- designated heritage asset	Negligible
HER MKE78037	Medieval pit and possible dew pond, Iwade	In 2000 Pre-Construct Archaeology carried out an evaluation of land at Iwade ahead of housing development. A small pit and a shallow possible dew pond, both of medieval date, were found in the south east of the site. Pottery found within the pond was Tyler Hill ware and dated to the mid 13th to the mid 14th century whilst a sherd of Shelly Ware was found in the pit.	590010	167280	Medieval	Non- designated heritage asset	Low
HER MKE80660	A flint blade, The Waterway, Iwade	In 2009 Kent Archaeological Projects carried out an evaluation. A flint blade was found in brickearth.	590000	167750	Later Prehistoric	Non- designated heritage asset	Negligible
HER MKE85142	Great Barksore	"Type: Loose courtyard with working agricultural buildings on three sides and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survivial: No apparent alteration. New sheds: Large modern sheds built beside the historic farmstead, the farmstead could still be in use"	586720	167500	Post Medieval	Non- designated heritage asset	Low
HER MKE85143	Little Barksore	"Type: Loose courtyard with working agricultural buildings on one side and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survival: Only the farmhouse remains. Notes: Triangular shaped yard."	586780	167360	Post Medieval	Non- designated heritage asset	Low
HER MKE85216	Great Norwood Farm	"Type: Loose courtyard with working agricultural buildings on three sides and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survival: Altered - significant loss of original form (more than 50%). New sheds: Large modern sheds built beside the historic farmstead, the farmstead could still be in use"	587620	166090	Post Medieval	Non- designated heritage asset	Low
HER MKE85218	Farmstead north west of Great Norwood Farm	"Type: Loose courtyard with working agricultural buildings on two sides Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survivial: Farmstead completely demolished"	587340	166330	Post Medieval	Non- designated heritage asset	Negligible
HER MKE85219	Tiptree Farm	Type: Regular courtyardL with working agricultural buildings on three sides. Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survivial: Altered - partial loss of original form (less than 50%)	588110	167270	Post Medieval	Non- designated heritage asset	Low
HER MKE85220	Funton	Type: Regular courtyard. Farmhouse: Uncertain which building is/was the farmhouse. Position: Isolated position. Survivial: Farmstead completely demolished. Notes: House might be on SW side	588010	167810	Post Medieval	Non- designated heritage asset	Negligible
HER MKE85221	Lower Funton	Type: Linear with additional detached elements. Farmhouse: Farmhouse attached to agricultural range. Position: Isolated position. Survivial: Farmstead completely demolished. Notes: Uncertain if a smallholding or very small farm	587450	167640	Post Medieval	Non- designated heritage asset	Negligible

HER MKE85225	Sheepfold on Barksore Marshes	"Type: Loose courtyard with working agricultural buildings on one side Position: Isolated position. Survivial: Farmstead completely demolished"	587120	168500	Post Medieval	Non- designated heritage asset	Negligible
HER MKE85226	Outfarm south south east of Little Barksore	A field barn with no associated yard. Type: Single. Position: Isolated position. Survivial: No apparent alteration	586820	167130	Post Medieval	Non- designated heritage asset	Low
HER MKE85273	Cambray Farm	"Type: Loose courtyard with working agricultural buildings on three sides and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survival: Altered - partial loss of original form (less than 50%)"	588560	166260	Post Medieval	Non- designated heritage asset	Low
HER MKE85277	Farmstead south of Raspberry Hill	"Type: Loose courtyard with working agricultural buildings on two sides Farmhouse: Farmhouse detached in central position. Position: Isolated position. Survivial: Altered - significant loss of original form (more than 50%)"	589300	168290	Post Medieval	Non- designated heritage asset	Low
HER MKE85278	Moat Farm	"Type: Loose courtyard with working agricultural buildings on three sides and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position Survival: Farmstead completely demolished"	588650	167370	Post Medieval	Non- designated heritage asset	Negligible
HER MKE85279	Cutnells (Cutnails)	"Type: Loose courtyard with working agricultural buildings on one side and with additional detached elements to the main plan. Farmhouse: Farmhouse detached in central position. Position: Isolated position Survival: Altered - significant loss of original form (more than 50%)"	588980	166900	Post Medieval	Non- designated heritage asset	Low
HER MKE85319	Outfarm west of Iwade	An outfarm or field barn group consisting of two detached buildings. Type: Single with working agricultural buildings on two sides. Position: Isolated position. Survivial: Farmstead completely demolished	589410	167870	Post Medieval	Non- designated heritage asset	Negligible
HER MKE85358	Farmstead in Iwade	Type: Dispersed multi-yard. Farmhouse: Farmhouse detached in central position. Position: Located within a village. Survivial: Altered - significant loss of original form (more than 50%). Notes: Only listed barn remains	590100	168010	Post- Medieval	Non- designated heritage asset	Low
HER MKE85359	Outfarm in Iwade	"Type: Loose courtyard with working agricultural buildings on three sides Position: Located within a village. Survivial: No apparent alteration. Notes: OUTFARM?"	590070	167970	Post Medieval	Non- designated heritage asset	Low
HER MKE8962	Funton brickworks	Brickworks opened by redlands in 1950's, still operating. Works were built in the late 1930s but not operated until after 1945.	587590	167830	Modern	Non- designated heritage asset	Low
HER MKE90464	Medieval enclosure and field system, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. A medieval enclosure was found in the northwest part of the site. Ditches, pits and post holes were found. Adjacent to this area of activity was a series of ditches possibly forming part of a field system.	589510	167570	Medieval	Non- designated heritage asset	Low

HER MKE90465	Roman post hole and possible Roman cremation, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. An isolated post hole dated to the Roman period and an undated cremation that could also be of Roman date were found.	589540	167510	Roman	Non- designated heritage asset	Low
HER MKE90466	Bronze Age or Iron Age field system, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. Ditches were found that could form part of a Bronze Age or Iron Age field system.	589550	167510	Middle Bronze Age to Late Iron Age	Non- designated heritage asset	Low
HER MKE90467	Late Neolithic gully and ditch, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. A gully and a ditch were found and dated to the Late Neolithic.	589540	167510	Neolithic	Non- designated heritage asset	Low
HER MKE90468	Bronze Age or Iron Age field system, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. Ditches were found that could form part of a Bronze Age or Iron Age field system.	589630	167500	Middle Bronze Age to Late Iron Age	Non- designated heritage asset	Low
HER MKE90469	Possible Roman cremation, lwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. An isolated post hole dated to the Roman period and an undated cremation that could also be of Roman date were found.	589640	167500	Roman	Non- designated heritage asset	Low
HER MKE90470	Middle Iron Age enclosure, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. A large enclosure of Middle Iron Age date was found. A ditch curved across the central part of the site, c.2.3m wide and c.65m long. It followed the natural contour with higher ground to the south. Other Iron Age features found included ditches, a horseshoeshaped gully and pits.	589740	167410	Iron Age	Non- designated heritage asset	Low
HER MKE90471	Roman ditch, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. An isolated ditch of Roman date was found in the central part of the site.	589710	167450	Roman	Non- designated heritage asset	Low
HER MKE90472	Neolithic ditch and pits, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. Middle Neolithic pits and Late Neolithic ditch terminus, post hole and a pit were found.	589840	167240	Neolithic	Non- designated heritage asset	Low
HER MKE90473	Early Medieval enclosure, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. An early medieval enclosure was found.	589830	167240	Early Medieval or Anglo- Saxon	Non- designated heritage asset	Low
HER MKE90476	Bronze Age pits, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. Two Middle to Late Bronze Age isolated pits were found.	589990	167160	Bronze Age	Non- designated heritage asset	Low
HER MKE90477	An Early Iron Age hollow way, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. A hollow way c.4.8m across and 0.67m deep was found. Early Iron Age pottery was found within the feature. A similar feature on a similar alignment was found in excavations to the north but was dated to the medieval period.	589960	167170	Iron Age	Non- designated heritage asset	Low

HER MKE90478	Mesolithic flints, Iwade	In 2011 Swale and Thames Archaeological Survey Company carried out an evaluation and an excavation in 2012. Mesolithic flints were found in tree throws. The condition of the flint suggests that the tree throws themselves may be of this date.	589540	167510	Mesolithic	Non- designated heritage asset	Negligible
HER MKE97732	Brick Kilns, Ibstock Brick Funton Factory, Sheerness Road, Lower Halstow	"The kiln at Funton site is suggested to be of the Staffordshire type. The Staffordshire kiln was patented in 1904. The Staffordshire type kiln is a development form of transverse-arch, continuous-chamber kiln, which itself evolved from the Hoffman kiln, one of the earliest continuous kilns, developed in the mid-C19. The transverse-arch, continuous-chamber kiln used transverse arches, at right angles to the direction in which the fire travelled, to create physical separation between the chambers, and allow an increased width and there for capacity of the chambers over the original design. The Staffordshire type kiln was particularly advanced in its design: alloing the firing process to be very closely controlled at each, production stage, producing a better quality product with less wastage. English Heritage concluded that the Staffordshire kiln at Funton 'is of some technological interest, however it is a late example which has been visually altered, and is not exceptional'. Listed status was not granted."	587530	167770	Modern	Non- designated heritage asset	Low
HER MWX0012	Roman saltworking site, Bedlams Bottom	Roman briquetage eroding and coarse pottery from the shoreline. Probably a Roman saltworking site.	589266	168959	Roman	Non- designated heritage asset	Low
HER MWX17494	Romano-British pottery found	RB pottery found during fence post digging.	587230	168340	Romano- British	Non- designated heritage asset	Negligible
HER MWX17622	Salt-panning site at Funton Creek	Erosion on the foreshore at Funton Creek exposed pockets of burnt material (four salt-pans) and third century Roman pottery sherds	588300	168300	Roman	Non- designated heritage asset	Low
HER MWX17788	Earthworks enclosing fields on 1st edition OS, now inundated		589116	169444	Post Medieval	Non- designated heritage asset	Negligible
HER MWX17789	Hardway	Surviving part of hardway, same as WX18942 (on 1st-3rd ed OS)	588905	169235	Post Medieval to Modern	Non- designated heritage asset	Negligible
HER MWX18774	Circular embankment		589638	169599	Unknown	Non- designated heritage asset	Low
HER MWX18788	Circular embankment	Circular embankment identified during 2002 survey	589648	169215	Unknown	Non- designated heritage asset	Low

HER MWX18789	Unidentified concrete lighter hulk	"One of a group of many salt-working mounds on the Neatscourt/ Cheyney Marshes one of which was badly mutilated by the cutting of the new Kingsferry Bridge road. Published 25' survey revised [for salt-working on Sheppey see TQ 97 SW 6]. Eight salterns were located and planned in 1992. Extensive platform and ditch and drain systems associated with some of the mounds were also noted. Lighter not seen during 2002 survey "	587790	168759	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX18942	Hardway	Hardway, shown on 1st, 2nd and 3rd ed OS, not present on current mapping. Path of route changes slightly between editions	588520	168910	Post Medieval to Modern	Non- designated heritage asset	Negligible
HER MWX18965	Well	Well, shown on 1st, 2nd and 3rd ed OS 6 inch. Not present on current mapping	587905	168037	Post Medieval to Modern	Non- designated heritage asset	Negligible
HER MWX19307	Roman kiln debris and pottery	On the E. bank of Halstow Creek, centred at `B' TQ 8675 6806, there is a dense concentration of kiln debris and pottery wasters of both `Upchurch' and coarse gritty ware. It has been exposed by sea erosion and extends for about 100m. Mr. Burrows confirmed the find spot of this cremation group at TQ 86756806 not as given by Auth.5. TQ 86756806: A probable Roman pottery kiln site, with a settlement and salting nearby. Unknown location: Salt winning site under observation by the Upchurch Archaeological Group. Large deposits of briquetage waste. Survey in 1999 confirms early 1st century salt winning area including circular ditch, post holes and natural drainage channel. 2nd century cremation burials at higher level intruding into 1st century debris. Briquetage found at this site	586700	168000	Roman	Non- designated heritage asset	Low
HER MWX19308	Iron Age pottery sherd	An Iron Age pottery sherd from Lower Halstow, now in Maidstone Museum	586700	168000	Iron Age	Non- designated heritage asset	Negligible
HER MWX19310	Possible Roman salt panning site	"A Romano-British salt-panning site at Funton Marsh, one of a number discovered as a result of an archaeological survey of the area in 1962. It is located on a mud bank in the Medway estuary and is partially covered at high tide. It was found to be in danger of erosion and rescue excavations were therefore undertaken in 1984 by the Lower Medway Archaeological Research Group. A rectangular hearth, 4ft 6ins x 2ft was found. The ash floor consisted of hardpacked ash and saltern debris, with globules of lead imbedded in the surface. A layer of saltern debris west of the hearth consisted of evaporating vessels, triangular bricks, hearth debris, burnt soil, a firebar and vitreous slag. A further trench revealed layers of saltern debris, tile, oyster, magstone and a thick ash deposit. It would seem that a succession of pits had been dug. The presence of a post-hole and building debris suggests that a building may have existed on the site. The dating of the site is uncertain. The few indeterminate potsherds included a fragment of Samian and a dupondius of Severus Alexander was found on the surface. The Funton salt-pans relied on fire for the evaporation of the brine they contained. Dating, in the circumstances of the foreshore remains insecurely established. It is nevertheless very likely, on the basis of pottery found on marsh sites, that the production of salt from brine began during the late Iron Age, if not earlier, and continued on north Kentish sites at least into the third century AD"	588500	168300	Roman	Non- designated heritage asset	Low
HER MWX19311	Romano-British saltworks	"Salt-panning site fringing Funton Marsh. The Funton salt-pans relied on fire for the evaporation of the brine they contained. Dating, in the circumstances of the foreshore, remains insecurely established. It is however likely, on the basis of pottery found on marsh sites, that the production of salt from brine began during the late Iron Age, if not earlier, and continued until at least the third century on north Kentish sites. RB pot sherds discovered from sea-cut section, TQ 891 689 by RCHME site inspection 1994."	589100	169200	Roman	Non- designated heritage asset	Low

HER MWX19649	Remains of unidentified wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589090	169140	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19650	Remains of unknown vessel	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589090	169140	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19651	Remains of unknown wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589110	169150	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19652	Remains of unidentified wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589130	169160	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19653	Remains of unidentified wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589140	169150	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19654	Remains of unknown wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589040	169130	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19655	Remains of unknown vessel	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589030	169130	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19656	Remains of unidentified wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589030	169140	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19657	Remains of unknown wreck	Position located on 2000 Environment Agency aerial photograph. May appear on earlier photoplots.	589030	169140	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19677	Remains of unidentified barge, on 2000 airphoto	Remains of unidentified barge, on 2000 airphoto. Identified during 2002 survey and comprises a concrete barge, only one end visible the rest possibly buried but marjority of vessel is hidden from view by other barges	587920	168990	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19678	Remains of unidentified barge, on 2000 airphoto	Remains of unidentified barge, on 2000 airphoto. Identified during 2002 survey and comprises a concrete barge, vessel leaning heavily to one side but intact	587910	168950	Post Medieval to Modern	Non- designated heritage asset	Low

HER MWX19754	Timber piles	TIMBER PILES - PROBABLY REVETMENT FOR ADJACENT LANDFILL. Identified during 2002 survey	587748	168702	Unknown	Non- designated heritage asset	Low
HER MWX19755	Wooden barge	WOODEN BARGE CONSTRUCTED WITH MACHINED IRON BOLTS, SURVIVES TO GUNWALES. PROB C20TH	587989	168173	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19756	Possible Bronze Age (?) flints	3 BRONZE AGE? FLINTS ON EDGE OF MARSH	588399	168305	Bronze Age	Non- designated heritage asset	Low
HER MWX19757	Saltern	BRIQUETAGE, POT, TILE AND BONE ERRODING OUT OF SLIGHT CLIFF	588556	168377	Roman	Non- designated heritage asset	Low
HER MWX19758	Pottery and briquetage	SMALL NUMBER OF ROMAN POTTRY SHERDS UNDER SLIGHT CLIFF	588638	168433	Roman	Non- designated heritage asset	Low
HER MWX19759	Trackway	LINE OF POSTS - POSSIBLY THE REMAINS OF A BA(?) TRACKWAY	588643	168458	Bronze Age	Non- designated heritage asset	Low
HER MWX19760	Trackway	WELL PRESERVED BRUSHWOOD TRACKWAY	588640	168465	Bronze Age	Non- designated heritage asset	Low
HER MWX19761	Fishtrap	LINES OF UPRIGHT STAKES FORMING A 'V' SHAPE ALTHOUGH MAY BE AN OLD SHOOTING HIDE	588763	168471	Unknown	Non- designated heritage asset	Low
HER MWX19762	Bronze Age finds?	SMALL CONCENTRATION OF ?BA FLINTS UNDER SLIGHT CLIFF	588867	168529	Bronze Age	Non- designated heritage asset	Negligible
HER MWX19763	Line of stakes	LINES OF ROUNDWOOD STAKES - POSSIBLY A FISHTRAP	588920	168589	Unknown	Non- designated heritage asset	Low
HER MWX19764	Fish trap	LARGE FISH TRAP FORMED BY LINES OF STAKES AND STONE RUBBLE	588991	168721	Unknown	Non- designated heritage asset	Low

HER MWX19765	Pottery findspot	SHERD OF BA(?) POT AT FOOT OF SLIGHT CLIFF	589011	168668	Bronze Age	Non- designated heritage asset	Negligible
HER MWX19767	Remains of 25 vessels	REMAINS OF 25 VESSELS, INCLUDING AN IRON LANDING CRAFT, SWIMHEAD BARGES AND DUMB LIGHTERS	589152	169171	Post Medieval to Modern	Non- designated heritage asset	Low
HER MWX19775	Salt panning site	REMAINS OF ROMAN SALT PANNING SITE	588232	168245	Roman	Non- designated heritage asset	Low
HER MWX19836	Wooden stake structure, Halstow Creek	Wooden stakes in a line on landward side and two curving arches on seaward side, possibly three structures, unable to draw polygon due to soft mud. The area is worth further investigation, and worked flint found within structure. Seen in 2004, although no finds were recovered, as the foreshore was covered in seaweed.	586528	167916	Neolithic	Non- designated heritage asset	Low
HER MWX19837	Worked flint	Spread of worked flint with some diagnostic pieces retained	586516	167901	Neolithic	Non- designated heritage asset	Negligible
HER MWX19838	Curvelinear ditch	Curvelinear ditch, c.50cm wide, with worked and burnt flint found in top	586516	167906	Unknown	Non- designated heritage asset	Low
HER MWX19840	Body sherd of prehistoric pot	Body sherd of prehistoric pot (retained)	586708	167994	Later Prehistoric	Non- designated heritage asset	Negligible
HER MWX19846	Sub-circular post hole	Sub-circular post hole, c.40cm diameter	586515	167905	Unknown	Non- designated heritage asset	Low
HER MWX19847	Small post hole	Small post hole, c.30cm diameter	586516	167906	Unknown	Non- designated heritage asset	Low
HER MWX19848	Ditch	Ditch, c.2m wide running north-west/south-east with a organic fill. The feature runs into adjacent cliff	586615	167956	Unknown	Non- designated heritage asset	Low
HER MWX19849	Prehistoric pot sherd		586633	167954	Later Prehistoric	Non- designated heritage asset	Negligible

HER MWX19850	Possible hearth	Patch of burnt flint covering area of c.1.5m (possible hearth) with some burnt and worked flint visible	586715	168005	Unknown	Non- designated heritage asset	Low
HER MWX19851	Two parallel lines of timber posts	Two parallel lines of timber posts, rounded with a c.10cm diameter, with pottery found between posts	586754	168021	Unknown	Non- designated heritage asset	Low
HER MWX19852	Romano-British pottery sherds		586755	168036	Roman	Non- designated heritage asset	Negligible
HER MWX19853	Hurdle fence	Inter-woven poles that appear to be a trackway or more likely a collapsed hurdle fence, possibly lying within a cut which extends into the cliff edge	586749	168066	Unknown	Non- designated heritage asset	Low
HER MWX19854	Structure	Group of eight uprights running north-west/south-east for c.1.5m with one piece lying horizontally. All timbers are split with a maximum width of c.15cm	586787	168197	Unknown	Non- designated heritage asset	Low
HER MWX19855	Prehistoric pottery and flint flake		586804	168274	Prehistoric	Non- designated heritage asset	Negligible
HER MWX19856	Line of rounded wooden posts	Line of rounded wooden posts; probably remnant sea defences	586815	168282	Unknown	Non- designated heritage asset	Low
HER MWX19857	Unknown Wooden Vessel	Wooden vessel with a plywood base and modern nails has a flat bottom but the bow and stern are missing	586793	168372	Modern	Non- designated heritage asset	Low
HER MWX19864	Timber alignment	8 timbers sticking out of the sand - possibly an old sea defence that runs in a line parellel to the shore	587890	168883	Post Medieval to Modern	Non- designated heritage asset	Low
HA1	Pre-1850 field boundary	Field boundary between Fields 7 and 8, identified on mapping dating 1674 (KRO U229/P4). Last depicted on mapping dating to 1869; remains seen during site visit	588205	167760	Early Medieval - Post- Medieval	Newly- identified heritage asset	Low
HA2	Large depression in Field 4	Large depression seen in Field 4 during site visit and visible on LiDAR imagery. However, OS contours suggest that this may be a natural feature. Not shown on historic mapping	587878	167826	Unknown	Newly- identified heritage asset	Low

HA3	Pond associated with Funton House	Dried-up remains of Post-Medieval pond seen during the site. Appears on maps dating from 1841 onwards. Very likely served HA5 (the now-demolished Funton House)	588003	167877	Post- Medieval	Newly- identified heritage asset	Low
HA4	Site of 18th century Funton Farm	Site of Funton Farm as shown on OS map of 1797. Presumably demolished in the early 19th century and replaced by MKE85220	588096	167873	Post- Medieval	Newly- identified heritage asset	Negligible
HA5	Site of Funton House	Site of 19th century Funton House, now demolished. First seen on tithe mapping dating to 1841; demolsihed by 1961	588031	167892	Post- Medieval - Modern	Newly- identified heritage asset	Negligible
НА6	Two ponds	Two ponds between Fields 12 and 14, still extant. First appear on Iwade tithe map of 1841	588970	168153	Post- Medieval - Modern	Newly- identified heritage asset	Low
НА7	Site of pond	Site of pond shown on OS map of 1797 in Field 11. Not shown on mapping after 1869	589110	168038	Post- Medieval	Newly- identified heritage asset	Negligible
HA8	Post-Medieval lane	Length of lane which formed an eastern extension of an offshoot of School Lane, between Summer Cottage and Raspberry Hill Caravan Park; now a footpath. First shown on mapping dating to 1797. First shown as a footpath on mapping dating to 1869	588900	167197	Post- Medieval	Newly- identified heritage asset	Negligible
НА9	Site of pond	Site of small pond in Field 4 shown on tithe mapping only	587630	167465	Post- Medieval	Newly- identified heritage asset	Negligible
HA10	Site of pond	Site of small pond in Field 4 shown on tithe mapping only	587872	167419	Post- Medieval	Newly- identified heritage asset	Negligible
HA11	Site of buildings?	Site of two possible small buildings in Field 4 shown on tithe mapping only	588006	167450	Post- Medieval	Newly- identified heritage asset	Negligible
HA12	Site of pond	Site of small pond in Field 2, shown on mapping dating between 1841 and the late 1970s/early 1980s	588505	167033	Post- Medieval - Modern	Newly- identified heritage asset	Negligible
HA13	Site of pond	Site of small pond in Field 8 shown on tithe mapping only	588255	167696	Post- Medieval	Newly- identified heritage asset	Negligible

HA14	Site of pond	Site of small pond in Field 15, shown on tithe mapping only	589399	168597	Post- Medieval	Newly- identified heritage asset	Negligible
HA15	Pond	Extant small pond in Field 11, shown on maps dating from 1841 onwards	589113	167794	Post- Medieval - Modern	Newly- identified heritage asset	Low
HA16	Site of pond	Extant small pond in Field 15, shown on maps dating from 1841 onwards	589201	168306	Post- Medieval - Modern	Newly- identified heritage asset	Low
HA17	Site of pond	Site of small pond in Field 15, shown on mapping dating to between 1841 and at least 1970	589256	168516	Post- Medieval - Modern	Newly- identified heritage asset	Negligible
HA18	Linear feature	Linear feature seen on LiDAR imagery in Field 4, orientated north-east to south-west. Does not align with boundaries shown on historic mapping and not recorded during the site visit. May be line of late Post-Medieval/Modern land drain or underground service	587640	167382	Unknown	Newly- identified heritage asset	Unknown
HA19	Site of well associated with Funton Farm	Site of well associated with 19th century Funton Farm, shown on mapping to dating to between 1869 and 1961	588032	167823	Post- Medieval - Modern	Newly- identified heritage asset	Negligible
HA20	Site of boundary stone	Site of boundary stone neat Tiptree Farm, shown on mapping dating between 1869 and 1961. Not seen during site visit	588184	167305	Post- Medieval - Modern	Newly- identified heritage asset	Negligible
HA21	Site of boundary stone	Site of boundary stone in Field 1, shown on mapping dating 1869 only	587901	167074	Post- Medieval	Newly- identified heritage asset	Negligible
HA22	Pond	Pond, still extant, in Field 1, first shown on mapping dating to 1869	588385	167214	Post- Medieval - Modern	Newly- identified heritage asset	Low
HA23	Site of pond?	Site of possible pond in Field 4, show on mapping dating to 1869 only	587995	167458	Post- Medieval	Newly- identified heritage asset	Negligible
HA24	Pond	Pond in Field 1, shown on mapping dating from 1869. Recorded during site visit	588216	166960	Post- Medieval - Modern	Newly- identified heritage asset	Negligible

HA25	Boundary stone	Extant boundary stone between Fields 4 and 5, first shown on historic mapping dating to 1908. Not seen during site visit	587648	167290	Modern	Newly- identified heritage asset	Low
HA26	Boundary stone	Extant boundary stone in Field 4, first shown on mapping dating to 1908. Not seen during site visit	587797	167650	Modern	Newly- identified heritage asset	Low
HA27	Boundary stone	Extant boundary stone in Field 4, first shown on mapping dating to the mid-1960s. Not seen during site visit	587849	167590	Modern	Newly- identified heritage asset	Low





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