

THE DELL/HAPPY VALLEY AND SURROUNDING PARKLAND SALTRAM DEVON

Archaeological and Historic Landscape Survey



South West Archaeology Ltd. report no. 210317



www.swarch.net Tel. 01769 573555

The Dell/Happy Valley and Surrounding Parkland Archaeological and Historic Landscape Survey

By F. Balmond, MCifA
Report Version: FINAL
Draft Issued: 17th March 2021
Report Finalised: 28th April 2021

Work undertaken by SWARCH for the National Trust

SUMMARY

This archaeological and historic landscape survey of The Dell/Happy Valley and surrounding parkland was commissioned by the National Trust Archaeologist (South West Region) to bring together the results of previous documentary research covering this area of the Saltram Estate in the ownership of the National Trust, and to carry out a walkover survey to document previously unrecorded archaeological features within this area of the Estate and make recommendations for their future management. A range of sources including historic documents, maps, aerial photographs and LiDAR data were consulted as part of the work.

The Dell/Happy Valley comprises a mix of woodland/plantation and farmland. This report has determined that the majority of surviving archaeological remains within the survey area date to the post medieval or modern periods. There appear to be no surviving plans for the ponds within The Dell however it has been stated that they formed part of the late 19th century valley garden created by Albert Parker. This survey has shown that at least one of the ponds (Pond 1) was extant before this date, certainly by the 1860s when it is shown on the Ordnance Survey First Edition map although possibly prior to this as the boundary shown on the Tithe map appears to respect the feature depicted on the Ordnance Survey First Edition map. It seems likely that the history of the chain of ponds within The Dell/Happy Valley is complex and they may owe their origin to incremental changes by successive owners of the estate; whilst the south westernmost pond does appear to have early origins, the other pond features attributed to Albert Parker could, in part at least, be far more recent features.

The walkover survey was impeded in areas where the ground vegetation coverage consisted predominantly of brambles and ivy with areas of fallen deadwood and it is therefore not possible to consider this survey to have been exhaustive.



April 2021

South West Archaeology Ltd. shall retain the copyright of any commissioned reports, tender documents or other project documents, under the Copyright, Designs and Patents Act 1988 with all rights reserved, excepting that it hereby provides an exclusive licence to the client for the use of such documents by the client in all matters directly relating to the project as described in the Project Design.

CONTENTS

<i>SUMMARY</i>	2
<i>CONTENTS</i>	3
<i>LIST OF FIGURES</i>	4
<i>LIST OF TABLES</i>	6
<i>LIST OF APPENDICES</i>	6
<i>ACKNOWLEDGEMENTS</i>	6
<i>PROJECT CREDITS</i>	6
1.0 INTRODUCTION	7
1.1 PROJECT BACKGROUND.....	7
1.2 STATEMENT OF PURPOSE	7
1.3 METHODOLOGY	7
1.4 OWNERSHIP AND BOUNDARIES	8
1.5 PREVIOUS ARCHAEOLOGICAL AND HISTORICAL RESEARCH.....	9
1.6 DOCUMENTARY BACKGROUND.....	11
2.0 SUMMARY TABLE	14
3.0 THE PROPERTY	17
3.1 TOPOGRAPHY AND GEOLOGY	17
3.2 VEGETATION AND LAND USE.....	17
3.3 CURRENT PROTECTION AND SCHEDULING.....	18
4.0 ARCHAEOLOGICAL BACKGROUND	20
4.1 OWNERS OF SALTRAM	20
4.2 PREHISTORIC, ROMANO-BRITISH AND SAXON	20
4.3 MEDIEVAL.....	21
4.4 POST MEDIEVAL.....	21
4.5 THE EIGHTEENTH CENTURY.....	22
4.6 THE NINETEENTH CENTURY	24
4.7 THE TWENTIETH CENTURY.....	31
4.8 HISTORIC PLANTATIONS AND BOUNDARY PHASING	35
4.9 AERIAL PHOTOGRAPHY AND LIDAR DATA	38
5.0 WALKOVER SURVEY	44
5.1 THE DELL/HAPPY VALLEY.....	45
5.2 BARN PARK	72
5.3 HIGHER ORCHARD	74
5.4 HIGHER MEADOW	81
5.5 LOWER MEADOW.....	81
5.6 LOWER ORCHARD.....	81
5.7 SELLAR ACRES PLANTATION	84
5.8 SELLAR ACRES.....	87
5.9 QUAY FIELD.....	87
5.10 WIXENFORD BRAKE	88
5.11 GREAT DOWN.....	91
5.12 FURZE DOWN	92
5.13 MOWHAY MEADOW/PART DEAN.....	93
5.14 SHILLA FURZE.....	94
5.15 NEW PARK.....	94
5.16 LOWER HAY DOWN	95
5.17 BOUNDARY TYPE	96
5.18 SUMMARY.....	96
6.0 CONCLUSIONS	97
7.0 STATEMENT OF SIGNIFICANCE	99

8.0	MANAGEMENT RECOMMENDATIONS.....	100
8.1	SPECIFIC RECOMMENDATIONS.....	100
8.2	FURTHER ARCHAEOLOGICAL WORK.....	100
8.3	RECOMMENDATIONS FOR FURTHER DESIGNATION	101
8.4	INTERPRETATION AND ACCESS.....	102
9.0	BIBLIOGRAPHY	103
10.0	APPENDICES	104

LIST OF FIGURES

COVER PLATE: LOOKING WEST DOWN THE DELL FROM THE MAIN EXIT DRIVEWAY AT SALTRAM.

FIGURE 1:	LOCATION OF THE SITE.....	8
FIGURE 2:	MAP SHOWING THE SURVEY AREA AND NATIONAL TRUST OWNED LAND IN THIS AREA OF THE SALTRAM ESTATE.....	9
FIGURE 3:	SITES CURRENTLY RECORDED IN THE NATIONAL TRUST HER WITHIN THE SURVEY AREA (NT HER).....	11
FIGURE 4:	MAP SHOWING THE LOCATION OF SITES IDENTIFIED DURING THE WALKOVER SURVEY AND ALREADY RECORDED IN THE NTHER. .	16
FIGURE 5:	HISTORIC LANDSCAPE CHARACTERISATION OF THE SURVEY AREA.	18
FIGURE 6:	MAP SHOWING LEGAL DESIGNATIONS WITHIN THE SURVEY AREA.	19
FIGURE 7:	MAP SHOWING THE DIVISION OF THE LAND WITHIN THE SURVEY AREA INTO ITS COMPONENT FARMSTEADS.....	22
FIGURE 8:	EXTRACT FROM THE 1784-86 ORDNANCE SURVEY DRAFT MAP SHOWING THE APPROXIMATE SURVEY AREA (BL).....	23
FIGURE 9:	EXTRACT FROM THE 1809 ORDNANCE SURVEY MAP (TEASDALE 2017).....	24
FIGURE 10:	PUBLISHED VERSION OF THE 1809 ORDNANCE SURVEY MAP, PUBLISHED C.1830	25
FIGURE 11:	EXTRACTS FROM THE PLYMPTON ST MARY AND PLYMSTOCK TITHE MAPS WITH PLOTS NUMBERED (TNA)	26
FIGURE 12:	MAP SHOWING THE STUDY AREA BY CULTIVATION TYPE AT THE DATE OF THE TITHE SURVEY.	28
FIGURE 13:	FIRST EDITION ORDNANCE SURVEY MAP SHOWING THE SURVEY AREA. SURVEYED BY 1863 (NLS)	29
FIGURE 14:	EXTRACT FROM THE FIRST EDITION ORDNANCE SURVEY MAP SURVEYED BY 1863 (NLS).....	30
FIGURE 15:	EXTRACT FROM THE 1892 SECOND EDITION ORDNANCE SURVEY MAP (NLS).	31
FIGURE 16:	EXTRACT FROM THE 1912 ORDNANCE SURVEY REVISED SECOND EDITION MAP (NLS).....	32
FIGURE 17:	EXTRACT FROM THE 1933 ORDNANCE SURVEY REVISED SECOND EDITION MAP (NLS).....	33
FIGURE 18:	C.1946 AERIAL PHOTOGRAPH SHOWING THE SURVEY AREA INDICATED IN RED (NT).....	34
FIGURE 19:	PHASING OF BOUNDARIES WITHIN THE SURVEY AREA FROM HISTORIC MAPPING.	36
FIGURE 20:	PHASING OF BOUNDARIES WITHIN THE SURVEY AREA FROM HISTORIC MAPPING.	37
FIGURE 21:	PHASING OF PLANTATIONS WITHIN THE SURVEY AREA FROM HISTORIC MAPPING..	38
FIGURE 22:	MODERN AERIAL PHOTOGRAPH WITH THE SURVEY AREA OUTLINED IN RED.....	39
FIGURE 23:	2018 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	40
FIGURE 24:	2010 1M DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	41
FIGURE 25:	2018 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14 SLOPE Z1.....	42
FIGURE 26:	2018 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14 SLOPE Z1.....	43
FIGURE 27:	BOUNDARIES OF PLOTS/FIELDS SURVEYED AS PART OF THE WALKOVER SURVEY, BASED UPON THEIR TITHE SURVEY PLOT NAME.	44
FIGURE 28:	SQUARE FEATURE ALONGSIDE FOOTPATH IN NORTH EASTERN CORNER OF THE DELL; FROM THE SOUTH.....	46
FIGURE 29:	SLIGHT RECTANGULAR FEATURE CUT BY PATH VISIBLE ON THE RIGHT HAND SIDE OF THE IMAGE; FROM THE NORTH WEST.	46
FIGURE 30:	SLIGHT RECTANGULAR FEATURE CUT NEAR FOORPATH, VIEWED FROM THE WEST.	47
FIGURE 31:	SLIGHT RECTILINEAR SHAPED FEATURE ALONGSIDE THE SOUTH DRIVE.	48
FIGURE 32:	BLOCKS OF CONCRETE AND BRICK WERE OBSERVED AMONG THE VEGETATION OPPOSITE THE PATH INTO THE DELL.....	48
FIGURE 33:	TWO RECTANGULAR CUT PLATFORMS TO THE NORTH OF THE SOUTH DRIVE.....	49
FIGURE 34:	POSSIBLE RECTANGULAR CUT PLATFORM TO THE NORTH OF THE SOUTH DRIVE. INDICATED BY ARROW. FROM THE EAST.....	50
FIGURE 35:	SHORT SECTION OF EARTH BANK WITH SLIGHT HOLLOW TO THE EAST.	50
FIGURE 36:	TWO PLATFORM LIKE AREAS TO THE NORTH OF THE SOUTH DIVE, BISECTED BY A PATH. FROM THE SOUTH	51
FIGURE 37:	A SHORT SECTION OF BANK AT THE POINT AT WHICH THE PATH TOWARDS THE SOUTH DRIVE CUTS DOWN.....	51
FIGURE 38:	SLIGHT RECTILINEAR DEPRESSION BISECTED BY PATHWAY; FROM THE NORTH WEST	52
FIGURE 39:	TARMAC COVERED CONCRETE ROADWAY NOW ALMOST ENTIRELY COVERED WITH VEGETATION.	53
FIGURE 40:	CONCRETE PLATFORM WITH 1 BRICK HIGH SURVIVING EDGING IN SOME AREAS; FROM THE EAST.....	53
FIGURE 41:	POSSIBLE CURVED PLATFORM WITH FELLED TIMBER ON EASTERN END; FROM THE SOUTH WEST.	54
FIGURE 42:	APPROXIMATELY RECTANGULAR AREA OF STONE WITH OCCASIONAL BRICK; FROM THE NORTH	55
FIGURE 43:	FENCED OFF CUT FEATURE CLOSE TO THE WESTERN BOUNDARY OF THE DELL; FROM THE NORTH.	55
FIGURE 44:	FENCED OFF CUT FEATURE ALONG WESTERN BOUNDARY OF THE DELL; FROM THE EAST.....	56

FIGURE 45: FENCED OFF CUT FEATURE TO THE WEST OF THE MAIN PATH THROUGH THE DELL; FROM THE SOUTH..... 57

FIGURE 46: STEEP SIDED CUT FEATURE LOCATED BETWEEN TWO TREES IN THE DELL; FROM THE SOUTH. 57

FIGURE 47: FENCED OFF CUT FEATURE TO THE WEST OF THE PATH THROUGH THE DELL; FROM THE SOUTH EAST..... 58

FIGURE 48: POSSIBLE CURVED PLATFORM AT THE HEAD OF THE DELL; FROM THE WEST 59

FIGURE 49: PLATFORM OVERLOOKING THE PONDS AT THE TOP OF THE DELL WITH VIEWS DOWN THE VALLEY; FROM THE NORTH 59

FIGURE 50: POSSIBLE PLATFORM AT THE HEAD OF THE DELL WITH VIEWS DOWN THE VALLEY; FROM THE WEST 60

FIGURE 51: CURVED CIRCULAR STONE WALL WITH STONE BUILT FEATURE IN THE CENTRE; FROM THE SOUTH..... 61

FIGURE 52: U SHAPED SECTION OF BOUNDARY EAST OF BICKHAM SHOWN ON HISTORIC MAPPING; FROM THE NORTH..... 62

FIGURE 53: RANDOM CAST CONCRETE FLOOR TILE AND BRICKS ERODING FROM PATH EDGING..... 63

FIGURE 54: OCCASIONAL ROOF TILES APPEAR TO HAVE BEEN BUILT INTO THE PATH SURFACE..... 63

FIGURE 55: REMAINS OF TWO PARALLEL BOUNDARIES, THE ONE ON THE RIGHT ONLY VERY SLIGHT; FROM THE NORTH. 64

FIGURE 56: REMAINS OF BOUNDARY RUNNING EAST WEST TO THE STREAM AT THE BOTTOM OF THE DELL, FROM THE SOUTH. 64

FIGURE 57: SKETCH PLAN OF PONDS IN THE DELL. FOR IDENTIFICATION PURPOSES ONLY: NOT TO SCALE. 65

FIGURE 58: POND 5; FROM THE SOUTH 66

FIGURE 59: POND 4; FROM THE EAST 66

FIGURE 60: POND 3; FROM THE WEST 67

FIGURE 61: POND 2; FROM THE SOUTH 68

FIGURE 62: DAM/BRIDGE AT THE SOUTHERN END OF POND 2; FROM THE WEST 68

FIGURE 63: MODERN TOURIST STATUE FROM LOURDES PLACED IN THE OUTFALL OF POND 2. 69

FIGURE 64: WOODEN BRIDGE ALIGNED WITH THE NORTHERN END OF POND 1 AS SHOWN ON THE OS 1ST EDITION MAP; FROM THE SOUTH..... 69

FIGURE 65: POSSIBLE SECTION OF BANK OR WALL LOCATED TO THE WEST OF POND 1; FROM THE SOUTH..... 70

FIGURE 66: POND 1; FROM THE SOUTH. 71

FIGURE 67: LOOKING DOWN THE HISTORIC EXTENT OF POND 1 AS SHOWN ON THE OS 1ST EDITION MAP FROM THE NORTH. 71

FIGURE 67: PHOTOGRAPH OF BICKHAM CLUMP, FROM THE WEST..... 72

FIGURE 69: SECTION OF BANK OR STRUCTURE LOCATED IN WOODLANDS TO SOUTH-WEST OF STAG LODGE. FROM THE SOUTH-EAST. 73

FIGURE 70: DETAIL OF METAL AND CONCRETE POST LOCATED TO THE WEST OF THE BANK FEATURE, FROM THE SOUTH WEST..... 73

FIGURE 71: SHORT SECTION OF POSSIBLE STONE BOUNDARY ABUTTING A STONE FACED BOUNDARY BANK IN BARN PARK. 74

FIGURE 72: SMALL SECTION OF SURVIVING STONE WALLING IN THE LOCATION OF BICKHAM FARMHOUSE. FROM THE NORTH. 75

FIGURE 73: THE ENCLOSURE WHICH SURROUNDED THE SOUTH EAST SIDE OF BICKHAM FARMHOUSE; FROM THE SOUTH. 75

FIGURE 74: THE SETTING OF BICKHAM BARN SHOWING THE EXTENT OF THE SURVIVING FABRIC; FROM THE SOUTH WEST. 76

FIGURE 75: BICKHAM BARN SHOWING THE FRONT (SOUTH) ELEVATION PARTING FROM THE WESTERN ELEVATION. 76

FIGURE 76: THE INSIDE OF BICKHAM BARN; FROM THE NORTH EAST 77

FIGURE 77: THE TRUNCATED EASTERN END OF BICKHAM BARN, FROM THE SOUTH-EAST. 77

FIGURE 78: BOUNDARY SHOWN ON 1ST EDITION OS MAP SURVIVES AS A LOW EARTHWORK TOPPED WITH A TREE..... 78

FIGURE 79: BOUNDARY SHOWN ON 1ST EDITION OS MAP SURVIVES AS A LOW EARTHWORK PARALLEL WITH THE BOUNDARY BANK..... 78

FIGURE 80: PROBABLE PART OF A BOUNDARY SHOWN ON THE OS 1ST EDITION MAP. 79

FIGURE 81: VEGETATION COVERED MOUND IN THE NORTH WESTERN AREA OF HIGHER ORCHARD; FROM THE EAST..... 80

FIGURE 81: SMALL MOUND LOCATED ALONGSIDE THE BOUNDARY BETWEEN HIGHER ORCHARD AND THE DELL. 81

FIGURE 83: TERRACING IN LOWER ORCHARD, PARTICULARLY VISIBLE AT THE SOUTH EASTERN END. FROM THE WEST..... 82

FIGURE 84: TERRACING IN LOWER ORCHARD, PARTICULARLY VISIBLE AT THE SOUTH EASTERN END. FROM THE EAST..... 82

FIGURE 85: CONCRETE BLOCKS PLACED ON THE SOUTHERN SIDE OF THE STREAM IN LOWER ORCHARD WITH CONCRETE LINTELS. 83

FIGURE 86: LINE OF EXPOSED STONES ON THE SOUTHERN SIDE OF THE STREAM IN LOWER ORCHARD. FROM THE NORTH..... 84

FIGURE 87: EXPOSED STONE ON THE NORTHERN SIDE OF THE STREAM WITH PAINTED CIRCLE. FROM THE NORTH. 84

FIGURE 88: PART OF THE PATHWAY THROUGH SELLAR ACRES, NOW TRUNCATED AND OVERGROWN. FROM THE EAST..... 85

FIGURE 89: PATHWAY LEADING UPHILL FROM THE ORIGINAL MARKED PATHWAY THROUGH SELLAR ACRES AT A 45 DEGREE ANGLE. 85

FIGURE 90: POSSIBLE QUARRYING AT THE EASTERN END OF SELLAR ACRES PLANTATION. FROM THE NORTH. 86

FIGURE 91: STONE FACED BOUNDARY BANK WITH HALF PIPE INSERTED TO ALLOW STREAM TO PASS UNDER. FROM THE WEST. 86

FIGURE 92: THE HISTORIC COURSE OF THE STREAM THROUGH THE BOUNDARY BETWEEN SELLAR ACRES PLANTATION & LOWER ORCHARD. 87

FIGURE 93: STONE FACED BANK WITH MODERN FENCING ON THE EASTERN END OF THE WESTERN SECTION OF WIXENFORD BRAKE. 88

FIGURE 94: POSSIBLE STRUCTURE AT EASTERN END OF WIXENFORD BRAKE; FROM THE SOUTH..... 89

FIGURE 95: POSSIBLE STRUCTURE AT EASTERN END OF WIXENFORD BRAKE; FROM THE WEST. 90

FIGURE 96: APPROXIMATELY SQUARE HOLLOW AT THE EASTERN END OF WIXENFORD BRAKE, WITH SLIGHT BANK ON THE EAST. 91

FIGURE 97: POSSIBLE RECTANGULAR SHAPED DEPRESSION IN SOUTHERN AREA OF GREAT DOWN; FROM THE SOUTH. 92

FIGURE 98: CONCRETE COVERED FEATURE, PRESUMED WELL CAPPING, IN FURZE DOWN 93

FIGURE 99: MOUND CONTAINING STONY MATERIAL, COVERED IN BRAMBLES, IN THE NORTH WEST OF MOWHAY MEADOW. 94

FIGURE 100: BOUNDARY BANK ON NORTHERN EDGE OF NEW PARK, FROM THE NORTH..... 95

FIGURE 101: BOUNDARY BANK ON NORTHERN EDGE WITH MATERIALS FALLING OUT OF THE BOUNDARY, FROM THE NORTH..... 95

FIGURE 102: ASSESSMENT OF BOUNDARIES WITHIN THE SURVEY AREA BY TYPE.. 96

FIGURE 103: 2010 1M DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	104
FIGURE 104: 2018 1M DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	105
FIGURE 105: 2010 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	106
FIGURE 106: 2018 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14.....	107
FIGURE 107: 2010 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1.....	108
FIGURE 108: 2018 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1.....	109
FIGURE 109: 2010 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1.....	110
FIGURE 110 : 2018 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1D.	111

LIST OF TABLES

TABLE 1: SUMMARY OF ARCHAEOLOGICAL SITES.....	14
TABLE 2: LIST OF OWNERS OF SALTRAM (AFTER TEASDALE 2017 AND THOMAS 1992).....	20
TABLE 3: TITHE APPORTIONMENT EXTRACTS FOR PLOTS WITHIN THE STUDY AREA.	27

LIST OF APPENDICES

APPENDIX 1: PROCESSED LIDAR IMAGES FOR THE SURVEY AREA	104
APPENDIX 2: BRIEF FOR THE SURVEY	112

ACKNOWLEDGEMENTS

JIM PARRY (NATIONAL TRUST)
 ALEX SPROSON (NATIONAL TRUST)

PROJECT CREDITS

PROJECT DIRECTOR: DR. BRYN MORRIS, ACIFA
 FIELDWORK: FAYE BALMOND, MCIFA
 REPORT: FAYE BALMOND, MCIFA
 EDITING: DR. SAMUEL WALLS, MCIFA
 GRAPHICS: FAYE BALMOND, MCIFA

1.0 INTRODUCTION

LOCATION:	THE DELL/HAPPY VALLEY AND SURROUNDING PARKLAND; THE SALTRAM ESTATE
PARISH:	PLYMOUTH (AREA FORMERLY WITHIN PLYMPTON ST. MARY AND PLYMSTOCK PARISHES)
COUNTY:	DEVON
CENTROID NGR:	SX 52519 54830
SWARCH REF:	SHV21
OASIS REF:	SOUTHWES1-506088

1.1 PROJECT BACKGROUND

The Dell, also known as Happy Valley, and the parkland that surround it form part of the Saltram Estate and lie to the south of Saltram House. A detailed archaeological and historic landscape survey of this area of the estate is required to inform current and future management of this part of the Saltram Estate. The Saltram Estate was acquired in parts by the National Trust in lieu of death duties, beginning with the house and part of the parkland in 1957.

The Dell/Happy Valley is currently openly accessible to visitors to the estate while much of the parkland which surrounds it is grazed by a tenant farmer. This archaeological and historic landscape survey was carried out by South West Archaeology Ltd. (SWARCH) on behalf of the National Trust, undertaken in accordance with the Brief issued by Jim Parry (*Archaeologist for the National Trust South West Region*) (see Appendix 2).

1.2 STATEMENT OF PURPOSE

This report was undertaken to enhance understanding of the historic landscape within The Dell/Happy Valley and surrounding parkland area of the Saltram Estate and provide the necessary information to inform conservation and interpretation of its historic environment. The report attempts to determine the nature and significance of the archaeological remains identified across the study area.

The report is intended to provide information and advice to enable management priorities to be established and inform future research and conservation policies within this area of the estate. It makes reference to the *Saltram Conservation Management Plan (2017)* and prior research carried out into this area.

1.3 METHODOLOGY

The format of this report was specified in the Brief (Appendix 2). The survey was carried out in accordance with *National Trust Historic Landscape Survey Guidelines* (National Trust 2000) and the Chartered Institute for Archaeology Standards and Guidance for Archaeological Desk Based Assessment (Revised 2020) and Field Evaluation (Revised 2020). Due to the restrictions in place as a result of the Covid-19 pandemic at the time this report was undertaken it relies largely on secondary source material although all historic maps which are available online or through other secondary source material (e.g. Conservation Management Plans) have been consulted. No archives have been visited during the course of this study as a result of temporary closures and the National Trust Archives at Wansdyke was not consulted. As such the documentary (desk based) assessment part of this report is brief and summaries findings from other reports, detailed below. The National Trust and Plymouth City Council Historic Environment Records were consulted.

Historic aerial photographs and LiDAR data have been utilised in this survey. Aerial photographs were obtained from the National Trust and freely available internet sources. Images derived from

LiDAR data with a 1m sampling interval were obtained from the Environment Agency, through the open government license; these may be found in Appendix 1.



FIGURE 1: LOCATION OF THE SITE. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673. THE SURVEY AREA IS INDICATED IN RED. ALL LAND IN THE OWNERSHIP OF THE NATIONAL TRUST AT SALTRAM IS INDICATED IN BLUE.

A walkover survey of the study area was undertaken on 17th and 22nd February 2021, following on from the documentary and cartographic research. The walkover survey investigated and recorded those features identified by the analysis of the LiDAR images, as well as those features not previously identified. New archaeological features observed were recorded and plotted onto a map (see Figure 4). Digital colour photography was used throughout the survey and photographs of relevant features are included in this report.

1.4 OWNERSHIP AND BOUNDARIES

The Dell, also known as Happy Valley, and the surrounding parkland comprise part of the Saltram Estate now owned by the National Trust. It was previously in the ownership of the Parker family for a number of generations. The parkland area of the estate which is the focus of this study was acquired by the Parkers in the early 19th century to extend the area of parkland to the south of Saltram House. The boundary of the study area along with the National Trust ownership boundary is shown below. The area of this study comprises multiple land use types and sits across a number of historic farm holdings, the boundaries of which have altered over time. The northern boundary

of the study area currently comprises an area of woodland known as ‘The Belt’, with an area of plantation below this in the north western area named ‘Sellar Acres’. A further area of woodland is located in the central area of the study area and named ‘Wixenford Brake’. Areas of enclosed agricultural fields lie to the north and south of this woodland, belonging historically to the farmsteads of Bickham, Hay and Wixenford. The study area also sits across two historic ecclesiastical parishes; the majority of the site lies within Plympton St Mary while the southern corner (part of Wixenford Farmstead) lay within Plympton Parish.

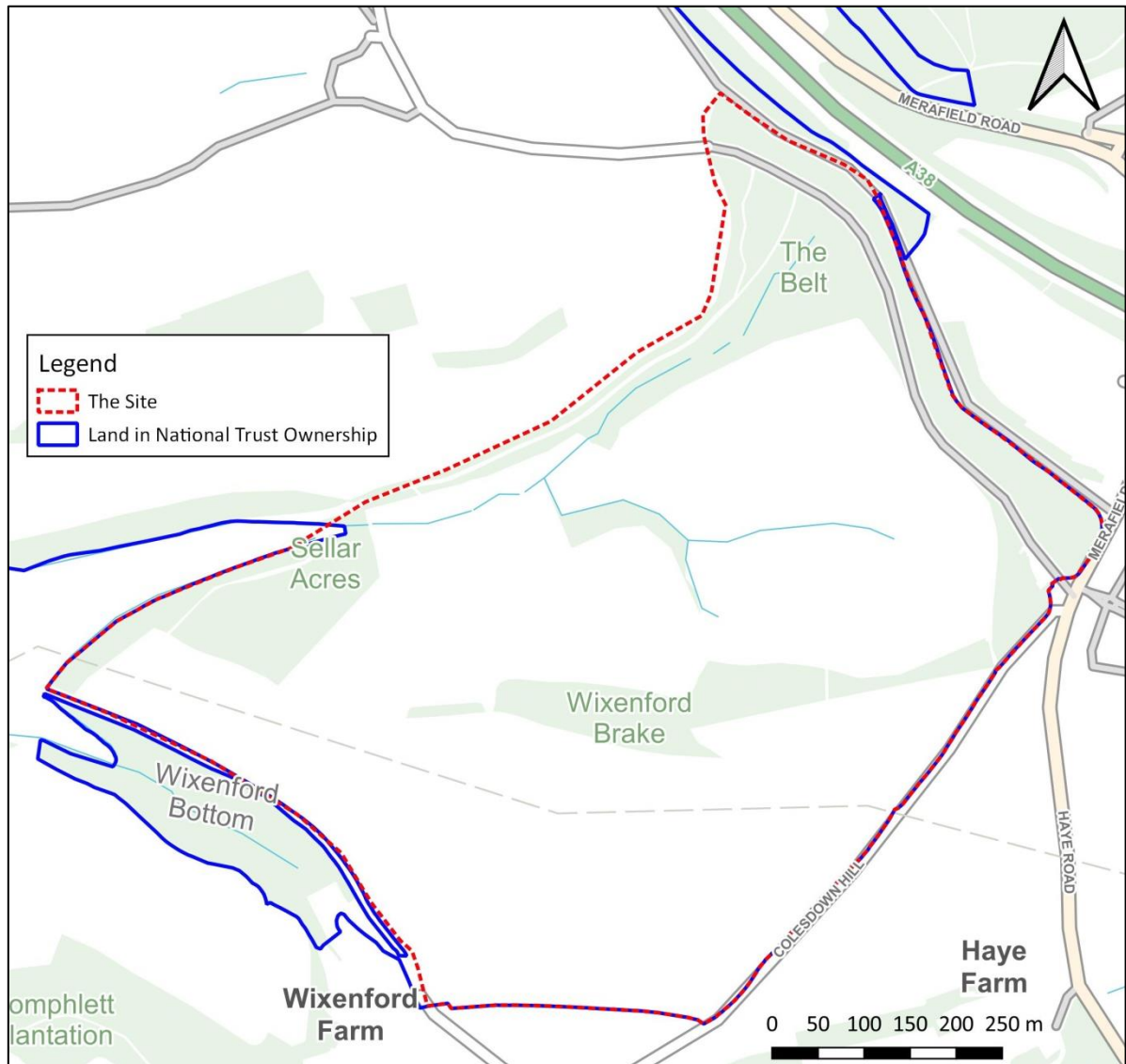


FIGURE 2: MAP SHOWING THE SURVEY AREA AND NATIONAL TRUST OWNED LAND IN THIS AREA OF THE SALTRAM ESTATE. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

1.5 PREVIOUS ARCHAEOLOGICAL AND HISTORICAL RESEARCH

The Saltram Estate has been the focus of historical and archaeological research however this has tended to focus on the estate as a whole and has generally been in the form of Conservation Management Plans with a broad remit (most recently Teasdale 2017). A Historic Landscape Survey and Management Plan for Saltram was carried out by Nicholas Pearson Associates in 1999 which included the area of this survey but focused on the estate as a whole. An archaeological survey of the estate was undertaken by the National Trust in 1992 and revised in 1998 (Thomas 1992) although this appears to be limited to sites identified in the National Trust Historic Environment

Record (NThER). No recent archaeological investigation appears to have taken place within the survey area, but there are nine entries for this area listed in the NThER (Figure 3). Two features are recorded on the Plymouth City Council Historic Environment Record (PCCHER); both are listed buildings and duplicate features recorded on the NThER.

NThER Records:

- A pair of gate piers about 600m south east of Saltram House on Stag Lodge Drive (MNA106318) Grade II* Listed Building; RPG Grade II*. Originally erected at Boringdon before being brought to 'Playbox Corner' at Chelston Meadow Race Course. Given to the NT in 1961 by Earl Morley and erected in their present location in 1971. Another pair remains at Boringdon.
- The Dell, RPG Grade II* (MNA106354). Park or garden feature.
- Stag Lodge Drive, RPG Grade II* (MNA106352). Pine trees to Stag Lodge Drive.
- Barn Park Clump, RPG Grade II* (MNA106353). Surviving but in need of care.
- Pond with dam, RPG Grade II* (MNA106351). Pond with stone faced dam. Part restored but leaking.
- Pond, RPG Grade II* (MNA106350). Site of pond. Relict stonework. *N.B This point is not mapped in the correct location; it appear to have been placed on a path through The Dell.*
- Bickham Barn, RPG Grade II* (MNA106323). Roofless ruin. *N.B The National Trust HER mapping shows this point in an incorrect location to the north of the actual site of the barn.*
- Bickham Meadows, RPG Grade II* (MNA106349). Field system of meadows and orchards, largely abandoned. Site of Farmhouse.
- Stag Lodges, Grade II Listed Building, RPG Grade II* (MNA106319). 19th century lodge, two square single storey buildings in ashlar sandstone on plinths; Square cross-section ashlar sandstone, with frieze and plinth as lodges; Outer flanking piers rectangular cross-section but otherwise as the gate piers; The central pair of gates controls the carriageway and is suspended from the piers.

PCCHER Records:

- Stag Lodge at Saltram House including inner and outer gate piers (SX55SW/122). Grade II Listed Building.
- Gate piers about 600m SE of Saltram House, Merafield Road (SX55NW/006/2). Grade II Listed Gate piers. (N.B The Historic England Listing confirms these are Grade II* as detailed above)

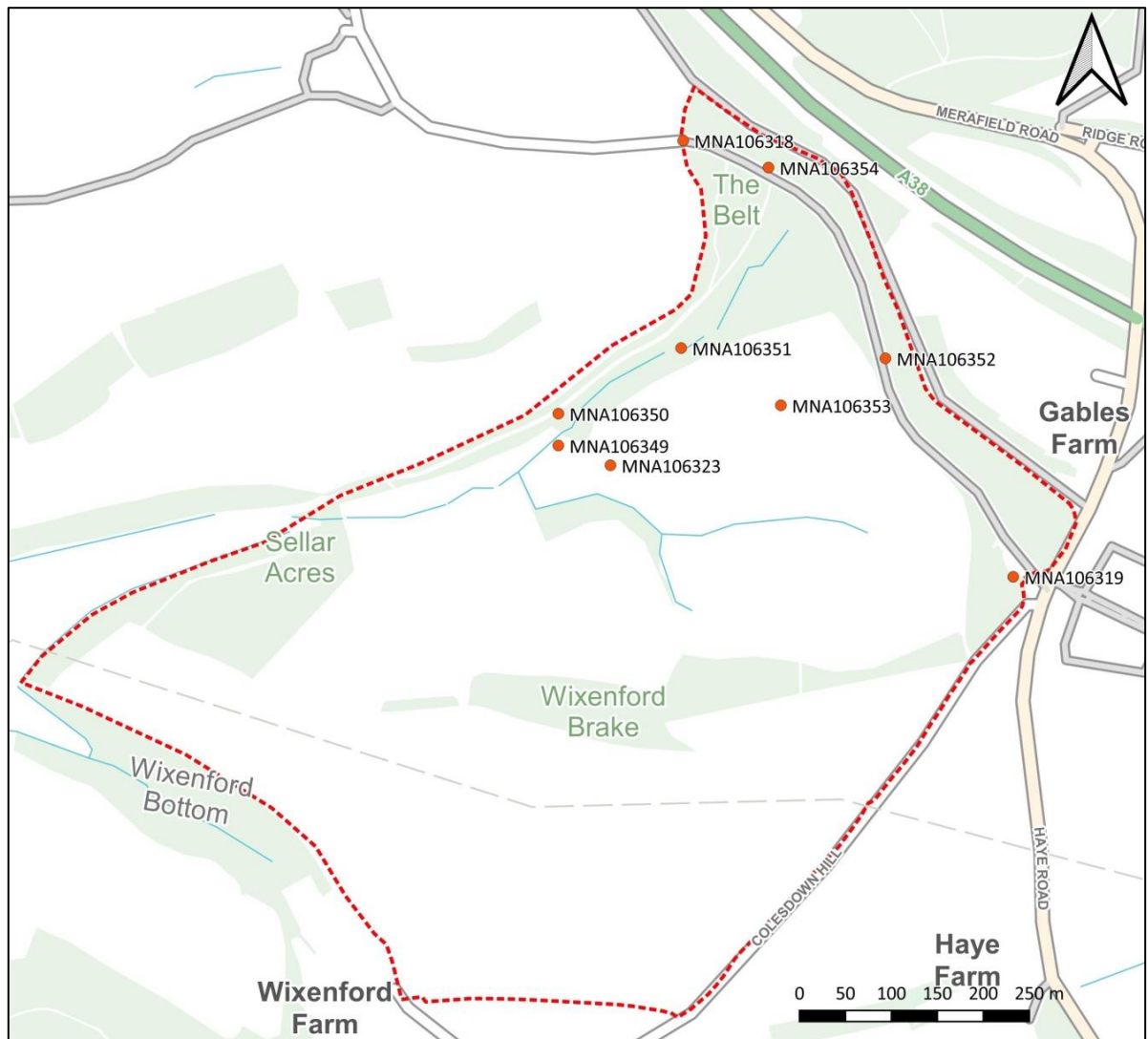


FIGURE 3: SITES CURRENTLY RECORDED IN THE NATIONAL TRUST HER WITHIN THE SURVEY AREA (NT HER) ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

1.6 DOCUMENTARY BACKGROUND

A summary of the historical background of the survey area taken from secondary source material is included below.

1.6.1 EARLY HISTORY: PREHISTORY TO MEDIEVAL

No prehistoric sites are documented within the survey area although an important prehistoric routeway dating from at least the Bronze Age crosses the Saltram Estate to ford the Laira at Ebb Ford, just north of Blaxton Meadow (Teasdale 2017, 3.1).

The settlement of Plympton was believed to have been established by the Saxon period and belonged to the King at Domesday (Teasdale 2017, 3.1). Saltram itself is not named at Domesday but may have belonged to the manor of Woodford (Odeford) which was recorded as having a fishery and salthouse and 3 furlongs of wood 1 furlong wide (Teasdale 2017, 3.1). Saltram is first mentioned in the Assize Rolls of 1218 as ‘Salterham’ and first referred to as Saltram in 1249, the ‘ham’ name element suggesting an early site of a homestead (Thomas 1992, 1). References from the later 16th century record the ownership of land at Saltram by the Mayes or Mayehows family including a 1588 lease to Nicholas Dyer by John Maye of Saltram to farm ‘Saltram Wood with all

houses, quays and buildings' (Thomas 1992, 1). It is suggested that the house and buildings at Saltram during this period may have been more considerable than previously thought and in keeping with the yeoman status of the Mayes or Mayhowes.

1.6.2 SEVENTEENTH CENTURY

The ownership of Saltram appears to have passed to James Bagg in 1614 who was succeeded by his son James in 1624. His son George Bagg inherited Saltram in 1638 and remained there until 1652. The Inquisition Post Mortem on the death of Sir James Bagg which took place in 1641 named lands at Bickham, Hay and Wixenford as being partly leased by Sir James, i.e. not belonging to the Estate (Thomas 1992, 3). The estate subsequently passed to Henry Hatsell and then by Royal Charter to Sir George Carteret in 1661.

1.6.3 EIGHTEENTH CENTURY

Saltram was purchased in 1712 by George Parker of North Molton and Boringdon although it had just been leased by Carteret to Thomas Wolstenholme for two lives or 99 years. Wolstenholme appears to have spent significant sums on renovations to the house and park. Thomas Wolstenholme the younger died in 1738 and John Parker, son of George Parker were the first of the Parker family to move from Boringdon to Saltram following the death of George in c.1743. Alterations to the house, gardens and surrounding landscape took place from the late 1740s onwards and John Parker II (1st Lord Boringdon) inherited Saltram in 1768. Further work was undertaken on the estate during his tenure and it was during his occupancy that Nathaniel Richmond and Robert Adam were commissioned to undertake work on the estate. Following the death in 1788 of John Parker II his son John Parker III 2nd Lord Boringdon, 1st Earl of Morley inherited the estate. As he was still a minor the estate was let to the 1st Earl of Lansdowne. The property was visited in 1789 by King George III although the Parkers were not present during the visit. Some management of the estate by John Parker's aunt appears to have taken place including planting of ornamental trees (Teasdale 2017, 3:11).

1.6.4 NINETEENTH CENTURY

From 1800 Lord Boringdon appears to have spent more time at Saltram and letters to his aunt refer to the 'new belt of plantation' which was the beginnings of 'The Belt' (Teasdale 2017, 3:13). In 1824 Stag Lodge plantation was established and Robert Adam's pepperpot lodges were moved from their original site at Merafield to the end of Hardwick Wood and then to the end of the south drive. The areas of Bickham, Hay and Wixenford tenements currently within the boundary of the Saltram Estate appear to have been purchased from the Earl of Bedford just prior to or around this time. After the death of his father in 1840, Edmund Parker, 2nd Earl of Morley inherited the estate. He let the estate between 1861 and 1884 when it appears to have experienced little management and general decline. His son, Albert Parker 3rd Earl of Morley returned to Saltram in 1884 with his family, selling a number of paintings to reduce the debt he inherited. He carried out significant repairs across the estate and was influenced in his management of the gardens and parkland by his father-in-law Robert Stayner-Holford, owner of Westonbirt Arboretum (Teasdale 2017, 3:17). The 3rd Earl is recorded as having planted a considerable number of ornamental trees in The Dell or Happy Valley. In 1890 a keeper's lodge was constructed at the south gate, behind the Robert Adam Pepperpot lodges. A substantial programme of replanting was undertaken in 1891 following 'the great blizzard' which caused significant destruction to the plantations across the estate including Stag Lodge plantation. Teasdale cites an article from the *Gardener's Chronicle* of 1903 which states that the ground at the head of The Dell '*was almost denuded of trees in the blizzard, and has since been planted with Maples in variety and Oaks of the most decorative autumnal tints, together with various trees possessing the same characteristics such as Parrotia persica, Carya alba, Gleditschia triacantha, Pavia indica, and others, which present a glorious sight when turning colour the Maidenhair-tree (Salisburia), Loquate, Phormiums, Fan Palms, Cordylines, Pittosporums, Woodwardia radicans and Osmundas add to the variety of the secluded scene*' (Teasdale 2017, 3:

20). Teasdale also states that '*Understorey planting included Gunneras and Bamboos, Eryngium pandanifolium, Polygonum sachalinense and great Fuschia bushes. Remnants of this valley garden survive, including a chain of small ponds, created by damming the stream that ran through the valley*'. The implication from this is that the ponds in The Dell were created at the very end of the 19th century.

1.6.5 TWENTIETH CENTURY

Following the death of Albert Parker in 1905 his son Edmund, 4th Earl of Morley inherited the estate. He took a keen interest in the estate and its gardens. He never married and after his death in 1951 the estate passed to his brother Montagu Parker. During the Second World War a large number of incendiaries fell in the parkland at Saltram and in 1943 American troops were stationed at Saltram and concrete roads across the estate were laid to accommodate tanks. The camp was apparently used to accommodate Italian POWs at the end of the war (Teasdale 2017 3:23).

1.6.6 NATIONAL TRUST OWNERSHIP

The National Trust acquired the house and part of the park at Saltram in 1957 through an arrangement in lieu of death duties. Between 1961 and 1969 the Trust acquired the western part of the Saltram parkland down to Saltram Point. Since the 1950s Saltram's landscape setting has been eroded by the creation of a landfill site on Chelston Meadow (the National Trust have widened and replanted parts of the 'The Belt' in order to create screening for the Chelston Meadows landfill site; it closed in 2008 and has now been grassed over) and the construction of the A38 to the east of the house through the parkland in the late 1960s and early 1970s.

2.0 SUMMARY TABLE

The locations of the archaeological sites listed below are shown on Figure 4, and are described in more detail in Section 5.

TABLE 1: SUMMARY OF ARCHAEOLOGICAL SITES.

NT HER	No	Site Name	Monument Type	Period	Status
MNA106319		Stag Lodges	Extant Structure	Post Medieval	Grade II*, RPG
MNA106318		Gate Piers	Extant Structure	Post Medieval	Grade II* RPG
MNA106353		Barn Park Clump	Extant Structure	Post Medieval	RPG
MNA106349		Bickham Meadows	Earthwork	Medieval-Post Medieval	RPG
MNA106352		Stag Lodge Drive	Extant Structure	Post Medieval	RPG
MNA106351		Pond with dam	Extant Structure	Post Medieval	RPG
MNA106323		Bickham Barn	Extant Structure	Medieval-Post Medieval	RPG
MNA106350		Pond	Unknown - point location is incorrect		RPG
MNA106354		The Dell	Landscape Feature	Post Medieval	RPG
	1	Square earth bank feature in north eastern corner of The Dell	Earthwork	Post Medieval- Modern	
	2	Possible rectangular feature in north eastern corner of The Dell	Earthwork	Post Medieval- Modern	
	3	Rectangular cut feature in north western corner of The Dell	Earthwork	Post Medieval- Modern	
	4	Possible rectilinear feature opposite path into The Dell	Earthwork	Post Medieval- Modern	
	5	Possible rectilinear feature opposite path into The Dell	Earthwork	Post Medieval- Modern	
	6	Two possible rectangular features cut into the slope on the northern side of the South Driveway	Earthwork	Post Medieval- Modern	
	7	A further possible rectangular feature cut into the slope on the northern side of the South Driveway	Earthwork	Post Medieval- Modern	
	8	Possible bank with hollow to east	Earthwork	Post Medieval- Modern	
	9	Two possible platform areas cut into slope to the north of South Drive	Earthwork	Post Medieval- Modern	
	10	Slight rectilinear depression cut through by path	Earthwork	Post Medieval- Modern	
	11	Short section of concrete road and concrete platform	Extant Structure	Modern	
	12	Possible curved platform cut into slope in The Dell	Earthwork	Post Medieval- Modern	
	13	Approximately rectangular spread of stone with occasional brick at the north western end of The Dell		Modern	
	14	Fenced off cut feature in The Dell	Earthwork	Modern	
	15	Fenced off cut feature in The Dell	Earthwork	Modern	
	16	Fenced off cut feature in The Dell	Earthwork	Modern	
	17	Fenced off cut feature in The Dell	Earthwork	Modern	
	18	Fenced off cut feature in The Dell	Earthwork	Modern	
	19	Possible curved platform south of South Drive at the head of The Dell.	Earthwork	Post Medieval- Modern	
	20	Platform located above ponds in The Dell	Earthwork	Post Medieval- Modern	
	21	Possible slight rectangular platform located above ponds in The Dell	Earthwork	Post Medieval- Modern	
	22	Curved stone wall with circular stone built feature	Earthwork	Post Medieval- Modern	
	23	Section of boundary forming historic extent of Bickham Farmstead	Boundary	Medieval-Post Medieval	
	24	Section of boundary forming historic extent of Bickham Farmstead	Boundary	Medieval-Post Medieval	
	25	Path repairs along the main path through The Dell	Path	Modern	
	26	Possible sections of boundary or wall shown on historic mapping marking the northern extent of Bickham.	Boundary	Medieval-Post Medieval	
	27	Pond located within The Dell (Pond 5)	Earthwork	Post Medieval- Modern	

THE DELL/HAPPY VALLEY AND SURROUNDING PARKLAND ARCHAEOLOGICAL AND HISTORIC LANDSCAPE SURVEY

	28	Pond located within The Dell (Pond 4)	Earthwork	Post Medieval-Modern	
	29	Pond located within The Dell (Pond 3)	Earthwork	Post Medieval-Modern	
	30	Pond located within The Dell (Pond 2)	Earthwork	Post Medieval-Modern	
	31	Wooden bridge and part of a bank located to the north of Pond 1 in The Dell	Earthwork	Post Medieval-Modern	
	32	Possible fragment of wall or bank	Earthwork	Post Medieval-Modern	
	33	Pond located within The Dell (Pond 1)	Earthwork	Post Medieval-Modern	
	34	Bickham clump	Earthwork	Post Medieval-Modern	
	35	Removed field boundary	Documentary	Medieval - Post Medieval	
	36	Possible section of bank or fragment of a building	Earthwork	Post Medieval-Modern	
	37	Possible section of boundary	Earthwork	Post Medieval-Modern	
	38	Site of Bickham Farmhouse	Earthwork	Medieval-Post Medieval	
	39	Bickham Barn	Extant Structure	Medieval-Post Medieval	
	40	Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map	Boundary	Medieval-Post Medieval	
	41	Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map	Boundary	Medieval-Post Medieval	
	42	Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map	Boundary	Medieval-Post Medieval	
	43	Surviving section of boundary wall shown on Ordnance Survey First Edition map	Boundary	Medieval-Post Medieval	
	44	Mound in the north west of Higher Orchard	Earthwork	Medieval-Modern	
	45	Small mound along the boundary between Higher Orchard and The Dell	Earthwork	Medieval-Modern	
	46	Lynchets or cultivation terraces	Earthwork	Medieval-Post Medieval	
	47	Concrete blocks and bridge lintels crossing the stream at the eastern end of Lower Orchard	Extant Structure	Modern	
	48	Stones alongside stream in Lower Orchard	Non archaeological feature?	Unknown	
	49	Short section of pathway in Sellar Acres Plantation	Path	Post Medieval	
	50	Section of pathway running north west-south east in Sellar Acres Plantation	Path	Post Medieval	
	51	Possible historic quarrying	Quarry	Medieval-Modern	
	52	Stone Faced boundary with culvert to allow stream to pass under	Boundary	Medieval-Modern	
	53	Stream culverted under boundary between Sellar Acres Plantation and Lower Orchard	Boundary	Medieval-Modern	
	54	Possible linears within Sellar Acres	Non archaeological feature	N/A	
	55	Possible linears within Quay Field	Non archaeological feature	N/A	
	56	Water filled feature, possible former quarry	Quarry	Medieval-Modern	
	57	Pathway or Gully in Wixenford Brake	Path	Post Medieval - Modern	
	58	Possible rectangular structure against stone faced bank in Wixenford Brake	Earthwork	Post Medieval-Modern	
	59	Hollow with bank on one side at the eastern end of Wixenford Brake	Earthwork	Post Medieval-Modern	
	60	Possible platform shown on LiDAR imagery - location of an electricity pylon	Non archaeological feature	N/A	
	61	Slight rectangular shaped depression in the south of Great Down	Earthwork	Medieval-Modern	
	62	Circular concrete covered feature within Furze Down	Extant Structure	Post Medieval-Modern	
	63	Stoney mound covered with brambles	Earthwork	Post Medieval-Modern	
	64	Presumed repairs to boundary bank	Boundary	Modern	

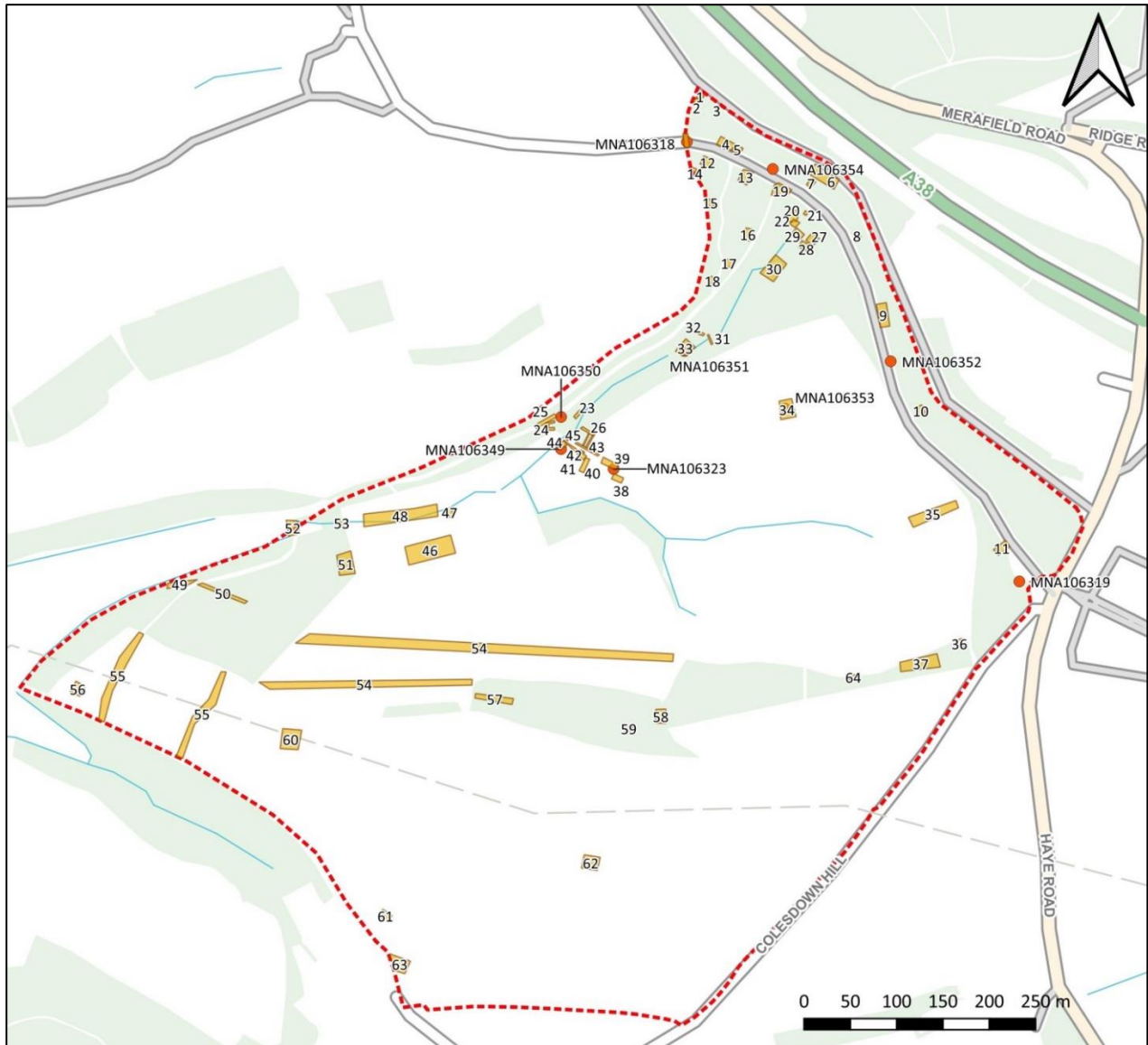


FIGURE 4: MAP SHOWING THE LOCATION OF THE SITES IDENTIFIED DURING THE WALKOVER SURVEY AND SITES ALREADY RECORDED IN THE OTHER ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

3.0 THE PROPERTY

3.1 TOPOGRAPHY AND GEOLOGY

3.1.1 TOPOGRAPHY

The survey area is located in the southern area of the Saltram Estate, to the south of Saltram House and comprises areas of woodland known as 'The Belt' and Wixenford Brake as well a number of enclosed agricultural fields. It lies on ground which slopes down to the west where it would historically have reached the River Plym in a part of the estuary known as Laira. The reclamation of land at Chelston Meadows and its subsequent use as a landfill site now blocks almost all views to the river from this area of the Saltram Estate. The survey area is bounded by 'The Belt' to the north, Saltram South Drive to the east, and Colesdown Hill to the south and south west. The A38 lies just to the north east of the site. The highest point of the site lies in the woodland alongside the South Drive at c.55m AOD and the lowest point is to the west near the boundary with Chelston Meadow at c.15m AOD. Two springs issue in the northern part of the site and run approximately east to west through 'The Belt' down through Sellar Acres before eventually joining the Plym at Saltram Point.

3.1.2 GEOLOGY

The geology underlying the survey area of the Saltram Estate is the sedimentary slate bedrock of the Upper Devonian Slates (BGS 2021)

3.1.3 SOILS

The soil types of this area of the Saltram Estate were surveyed by the Soil Survey of England and Wales (1983) as the well-drained fine loamy soils of the Denbigh 2 Association (SSEW 1983).

3.2 VEGETATION AND LAND USE

The Saltram Estate lies within National Character Area 151: South Devon (Natural England accessed 03/03/21). The survey area comprises woodland and enclosed agricultural land. The woodland consists of three areas known as 'The Belt', Sellar Acres and Wixenford Brake. The agricultural land lies to the north and south of Wixenford Brake and historically belonged to the farmsteads of Bickham, Hay and Wixenford. It is currently largely utilised as pasture, with a small area of orchard and some fenced corners of fields appear to be rougher grassland. The Devon Historic Landscape Characterisation shows the survey area as consisting of three elements (Figure 5). The woodland areas are recorded as *other woodland: Broad leaved plantations, re-planted ancient woodland or secondary woodland that has grown up from scrub*. The southern part of the survey area is classed as *medieval enclosures based on strip fields: areas which were probably first enclosed with hedge-banks during the later middle ages. The curving form of the hedge-banks suggests that earlier it may have been farmed as open strip-fields* while the central area is recorded as *post medieval enclosures: fields laid out in the C18th and C19th commonly with many surveyed dead-straight field boundaries*.

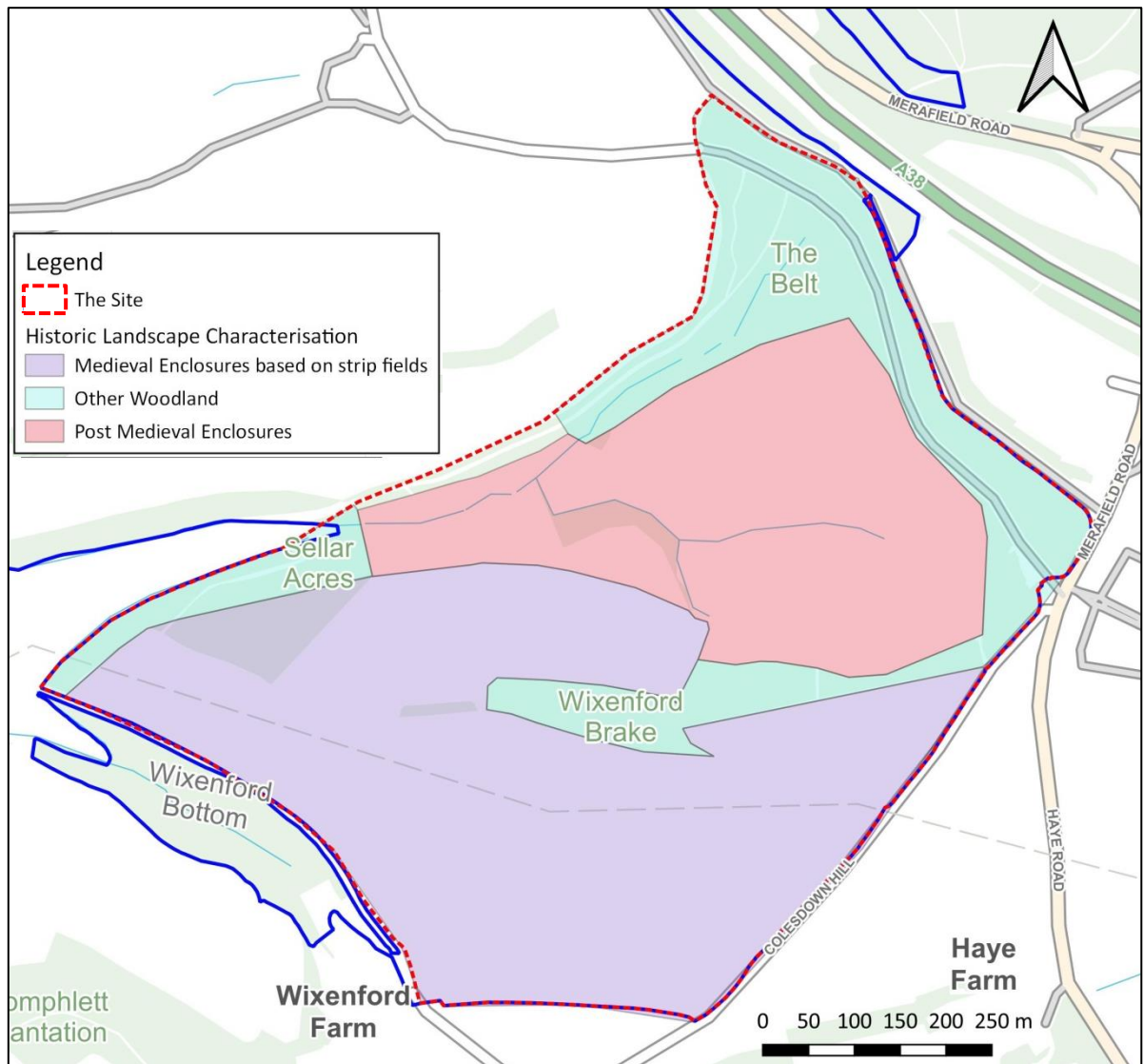


FIGURE 5: HISTORIC LANDSCAPE CHARACTERISATION OF THE SURVEY AREA. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673

3.3 CURRENT PROTECTION AND SCHEDULING

3.3.1 CONSERVATION AREA

There are no conservation areas within the Saltram Estate.

3.3.2 RIGHTS OF WAY

There appear to be no definitive public footpaths within the survey area although the West Devon Way runs to the west of the site, following the line of the river shore past the Saltram Estate. As a National Trust property, a number of publically accessible footpaths are located within the survey area.

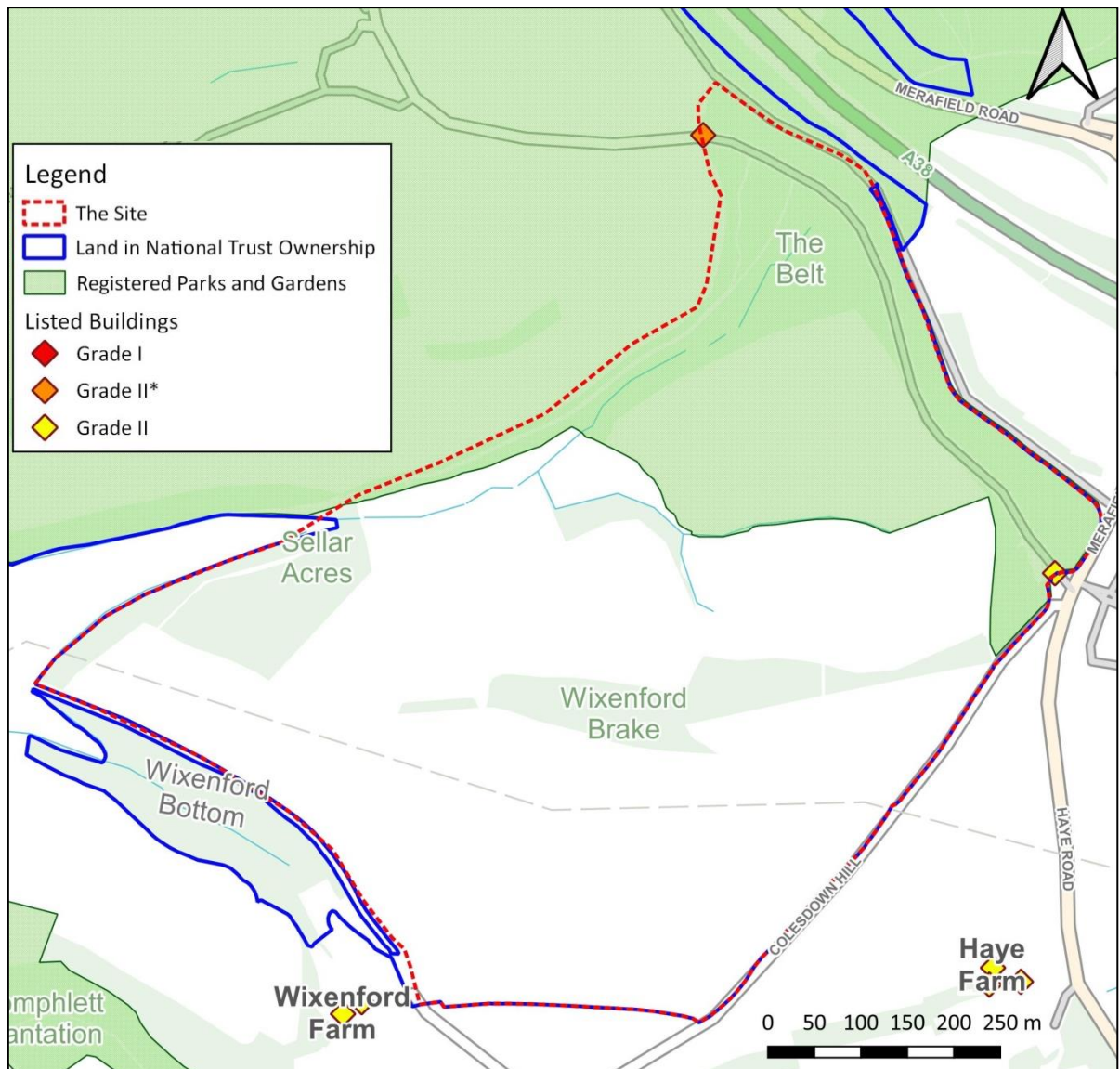


FIGURE 6: MAP SHOWING LEGAL DESIGNATIONS WITHIN THE SURVEY AREA. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673

3.3.3 SCHEDULED MONUMENTS

There are no scheduled monuments within the survey area.

3.3.4 HISTORIC PARKS AND GARDENS

The northern and eastern parts of the survey area lie within the Saltram Grade II* Listed Registered Park and Garden, list entry number 1000699 (Historic England List Entry accessed 03/03/21).

3.3.5 LISTED BUILDINGS

There are two Listed buildings within the survey area: Stag Lodges at the eastern side of the area and the gate piers on the northern boundary of the area (Historic England 2021).

3.3.6 SITES OF SPECIAL SCIENTIFIC INTEREST

There are no SSSIs within the area owned by the National Trust; the closest SSSI is at Billacombe, to the south west of the survey area. The Saltram Estate lies within the area identified as an SSSI impact risk zone (Natural England Magic Mapping Application accessed 03/03/21).

4.0 ARCHAEOLOGICAL BACKGROUND

This section summarises the land use and land use changes within the survey area at Saltram from the earliest available evidence through to the present day in chronological order, based largely upon previous research and utilising available historical mapping to provide a greater level of detail for the survey area. The evidence for the early periods is very limited. The major landowners and their dates of tenure are listed at the start of this section.

4.1 OWNERS OF SALTRAM

TABLE 2: LIST OF OWNERS OF SALTRAM (AFTER TEASDALE 2017 AND THOMAS 1992).

Year	Owner	
Prior to 16 th century	Unknown	
c. Mid-16 th century-1614	Mayes or Mayhowes Family	
1614-1624	James Bagg	
1624-1638	Sir James Bagg	House and Garden; leased other lands including Bickham, Hay and Wixenford
1638-1652	George Bagg	
1652-1661	Henry Hatsell	
1661-1712	Sir George Carteret	
1712-1738	George Parker (House leased to Thomas Wolstenholme)	
1738-1743	George Parker (estate in hand)	
c.1743-1768	John Parker	
1768-1788	John Parker 1 st Lord Boringdon	
1788-late 18 th century	John Parker II 2 nd Lord Boringdon, 1 st Earl of Morley (Leased to 1 st Earl of Lansdowne)	
c.1800-1840	John Parker II 2 nd Lord Boringdon, 1 st Earl of Morley (estate in hand)	Acquired Wixenford, Hay and Bickham from the Earl of Bedford.
1840-1861	Edmund Parker 2 nd Earl of Morley	
1861-1884	Edmund Parker 2 nd Earl of Morley (Estate leased)	
1884-1905	Albert Parker 3 rd Earl of Morley	
1905-1951	Edmund Parker 4 th Earl of Morley	
1951-1957	Montagu Parker 5 th Earl of Morley	House and gardens
1951-1962	Montagu Parker 5 th Earl of Morley	Remaining part of Saltram Estate
1957-present	National Trust	House and gardens
1961-1969-present	National Trust	Western part of parkland to Saltram Point
1962-present	Other owners e.g. Plymouth City Council, private developers.	Remaining parts of the estate

4.2 PREHISTORIC, ROMANO-BRITISH AND SAXON

There is little evidence to conclusively determine the land use history of the study area during the prehistoric, Romano-British and Saxon periods. No prehistoric sites are documented within the survey area although an important prehistoric routeway dating from at least the Bronze Age crosses the Saltram Estate to ford the Laira at Ebb Ford, just north of Blaxton Meadow (Teasdale 2017, 3.1). No archaeological sites or finds dating to these periods has been recorded within the survey area however the Plymouth HER records a number of sites of prehistoric date in the landscape surrounding the Saltram Estate including the Oreston Bone Cave sites just to the south of Saltram (SX55SW/023/001-003). Features from the later prehistoric periods including cropmarks and earthworks are also documented in the wider landscape around Saltram. These suggest relative continuity of occupation and utilisation of this landscape from the earliest prehistoric periods into the Roman period. The Plymouth HER records a relatively large number of coin finds dating to the Roman period, including two just to the north of the survey area, on the boundary of land in the ownership of the National Trust. The majority of these Roman coin finds appear to be chance finds and are likely associated with significant modern development occurring in this area; the sparsity of finds from the Saltram Estate may be reflective of the lack of modern development which has taken place resulting in the lack of chance finds.

4.3 MEDIEVAL

No sites of Medieval date are recorded within the survey area on the National Trust or Plymouth HERs. The first documented mention of Saltram is from the 13th century and therefore it can be assumed that the estate was in existence if not at Domesday then relatively soon afterwards. Nicholas Pearson Associates (1999) mentions strip fields within the Barn Park area of the survey area shown on a map of 1784 but gone by 1840 although these are not mentioned either in the archaeological survey of the Estate (Thomas 1992) or in the recent Conservation Management Plan (Teasdale 2017). If strip fields were located in this area it suggests a link to medieval farming systems, probably associated with the farmstead at Bickham. This area has since been subject to a modern arable farming regime and more recently restored to pasture. LiDAR data does not suggest any evidence of former 'strips' or for ridge and furrow ploughing, suggesting that former mechanised intensive arable production in the more recent past may have totally removed any traces of Medieval farming within this area of the estate.

4.4 POST MEDIEVAL

The land which comprises the survey area, with the exception of The Dell/Happy Valley appears likely to have been within the ownership of the Dukes of Bedford until the early 19th century. This land comprised the farmsteads of Bickham, Hay and Wixenford which were small tenant farms, farming the fields around their farmsteads. The 1840s tithe mapping gives an indication of the extents of each of the farms, which had been acquired by the Parkers and added to the parkland of the Saltram Estate by this date; Bickham appears to have been merged with Hay which also retains land in its own right (Figure 7). There is no indication however that the management of the farmland changed with the change of ownership; the Parkers appear to have been more concerned with owning the views out from their estate than with extending the formal parkland (Teasdale 2017 App E, 39). It appears likely from the Inquisition Post Mortem of Sir James Bagg in 1641 that the Saltram Estate may have leased these farmsteads from the Dukes of Bedford prior to their eventual purchase by the Parkers, although whether they had continued to be leased and were conveyed with the Saltram Estate to the Parkers is unclear.

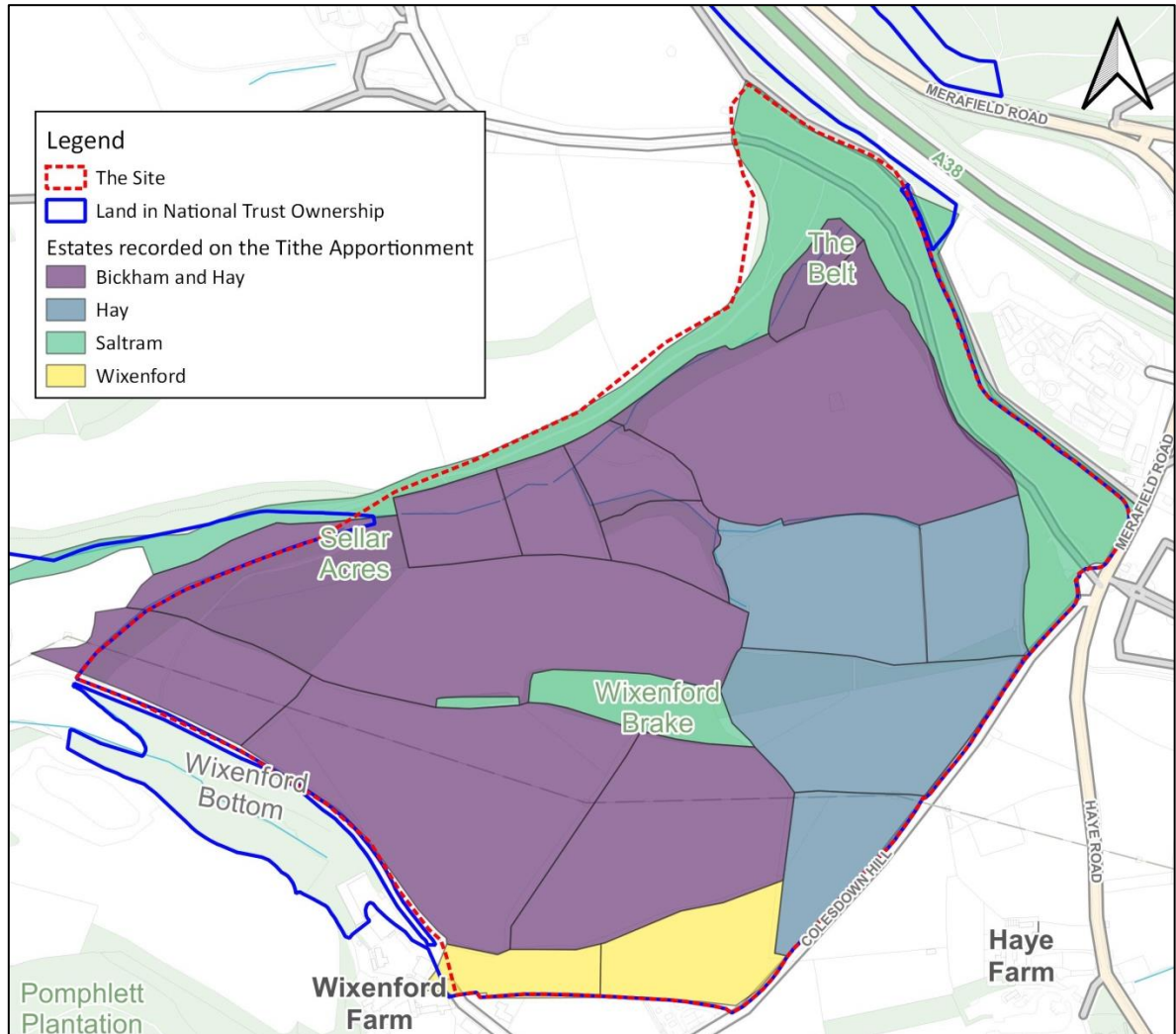


FIGURE 7: MAP SHOWING THE DIVISION OF THE LAND WITHIN THE SURVEY AREA INTO ITS COMPONENT FARMSTEADS AT THE DATE OF THE TITHE SURVEY. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673

4.5 THE EIGHTEENTH CENTURY

Although George Parker had acquired the Saltram Estate in 1712 the property was leased to the Wolstenholme family until 1738. It is recorded that they invested significantly in the property including planting trees within the grounds, possibly including avenues of trees in the fashion of the time (Teasdale 2017, 3:3). It is unclear whether their lease included the land to the south of The Dell, then in the ownership of the Duke of Bedford or whether their expenditure included any alterations to The Dell/Happy Valley.

Once the Parker Family moved to Saltram from Boringdon in the 1740s it is evident that they set about altering the mansion and creating new landscape gardens around the property. John Parker II and his second wife Theresa continued the development of the landscape around Saltram begun by his father, creating plantations, adding garden buildings, lodges and carriage drives. The early death of Theresa in 1775 appears to have slowed the enhancements the Parkers planned to the estate although Theresa’s sister Anne, who moved to Saltram to help bring up her children, appears to have managed a number of changes around the estate in the years following her sister’s death (Teasdale 2017, 3: 9). It is unclear whether any changes to The Dell/Happy Valley were undertaken at this time and the farms comprising the majority of the area of this study were not yet in the ownership of the Parker family. When John Parker III inherited the estate in 1788 he was still a minor and went to live with his guardian, his mother’s brother, at Newby Park. The Saltram Estate

was let and limited alterations appear to have taken place on the estate during this time, although his aunt, Anne appears to have continued to oversee the estate management from her home in London. The Ordnance Survey draft map, surveyed 1784-86 gives an impression of the estate at this date, although the field boundaries depicted on these maps are considered representational rather than necessarily completely accurate (Figure 8). It shows the access to Bickham farmstead from the north west and north east sides with a track providing access to the fields to the west of Bickham. The fields in the northern part of the survey area (Barn Park) do appear to retain a few narrow strips as discussed by Nicholas Pearson Associates (1999). Interestingly this appears contradictory to the Devon Historic Landscape Characterisation assessment which regarded the fields at Barn Park to be post medieval enclosure while classifying the fields to the south of Wixenford Brake (shown as larger more rectilinear fields on this map) as medieval enclosures based on strip fields. The road which forms the south eastern boundary of the survey area (Colesdown Hill) appears to bisect roughly rectilinear fields suggesting that the field pattern pre dates this road. Some woodland appears to be depicted within the survey area, to the west and north-east of Bickham and at Wixenford Brake.



FIGURE 8: EXTRACT FROM THE 1784-86 ORDNANCE SURVEY DRAFT MAP SHOWING THE APPROXIMATE SURVEY AREA OUTLINED IN RED (BL).

Although John Parker III was only occasionally resident between 1790-1800 he appears to have had an interest in extending the parkland to the south and south west of the house during this period and removing hedges to make it possible to walk down to the river (Teasdale 2017, 3: 11). It is probable that the parkland to the north of The Dell changed from its agricultural character to parkland at this date. He also took an interest in 'repairing and cleaning all the plantations' in 1797 which would presumably have included those of The Dell (which appears to have been a strip of plantation running north-east from Bickham along the valley but not extending as far as the current south drive at this date) and possibly Wixenford Brake.

A revised published version of the 1809 Ordnance Survey map shown below (Figure 10) does appear to be less heavily shaded and also suggests the presence of features in the positions indicated above.



FIGURE 10: PUBLISHED VERSION OF THE 1809 ORDNANCE SURVEY MAP, PUBLISHED C.1830 (SUPPLIED BY NICHOLAS PEARSON ASSOCIATES). TWO POSSIBLE FEATURES WITHIN THE DELL ARE INDICATED.

The death of John Parker III in 1840 coincides closely with the date of the tithe survey which records the landowner of the Saltram Estate only as the Right Honourable Earl of Morley. The Tithe map (Figure 11) shows a number of changes within the survey area of the Saltram Estate when compared to the 1809 Ordnance Survey map. It shows The Belt plantation extending up through The Dell/Happy Valley to meet the South Drive and also running south east forming a wooded route out of the estate to Stag Lodge (Stag Lodge Plantation). The Adam pepperpot lodges are depicted in their current location. The access into Bickham farmstead from the north east appears to have been removed by this date and the farmstead reduced to two small buildings. It still appears to be located within the remains of its field system. The woodland or plantation at Wixenford Brake is clearly illustrated on the Tithe map (although named Sellar Acres Higher Plantation) and also appears to have a second area of woodland located immediately to its west (Sellar Acres Lower Plantation). An enclosed area of orchard (Cullery Orchard) appears to have been planted at the northern edge of Barn Park, adjoining The Dell.

There is no indication of any ponds or structures shown on the Tithe map within The Dell/Happy Valley however the main interest of the Tithe surveyors was in quantifying the titheable lands rather than necessarily depicting any landscape features which they might have considered unnecessary to this assessment. The map also does not show a stream running through the valley. It is therefore possible that ponds or other structures may have been in existence at this date but were not illustrated on this map. The southern boundary around The Dell does appear to respect a pond feature shown on the Ordnance Survey First Edition map (discussed below), indicating this may have been an earlier feature. The tithe apportionment shows that at the date of the tithe survey much of the survey area was considered to be arable land with small areas of orchard and pasture (Figure 12).

Bickham was recorded as 'House, Garden, Orchard etc.' suggesting it continued to be regarded as a farmstead at this date although as it does not appear to be individually named on the 1841 or subsequent censuses, so it is unclear whether the farmhouse was occupied. The two fields which formed part of Wixenford were recorded as meadow while the wooded areas were considered to be timber and plantation. Plot numbers 2104 and 2105, Higher Meadow (Bickham and Hay) and Lower Hay Down (Hay) were classed as clear ground, arable and timber and were separately also classed as waste. It is unclear whether that may relate to the routeway into Bickham from the north east which is not illustrated on the tithe map. Whilst some of the plot names recorded on the tithe map are clearly descriptive or functional (e.g. Lower Hay Down; New Park; Lower Meadow), some are of interest, for example it is unclear to what the name 'Cullery Orchard' refers. The name Quay Field likely indicates the presence of a Quay close to this location, before the reclamation of Chelston Meadows while Sellar Acres could be derived from a personal name or possibly even suggesting storage cellars relating to the Quay. The field 'Shilla Furze' is also unclear as a name derivation.

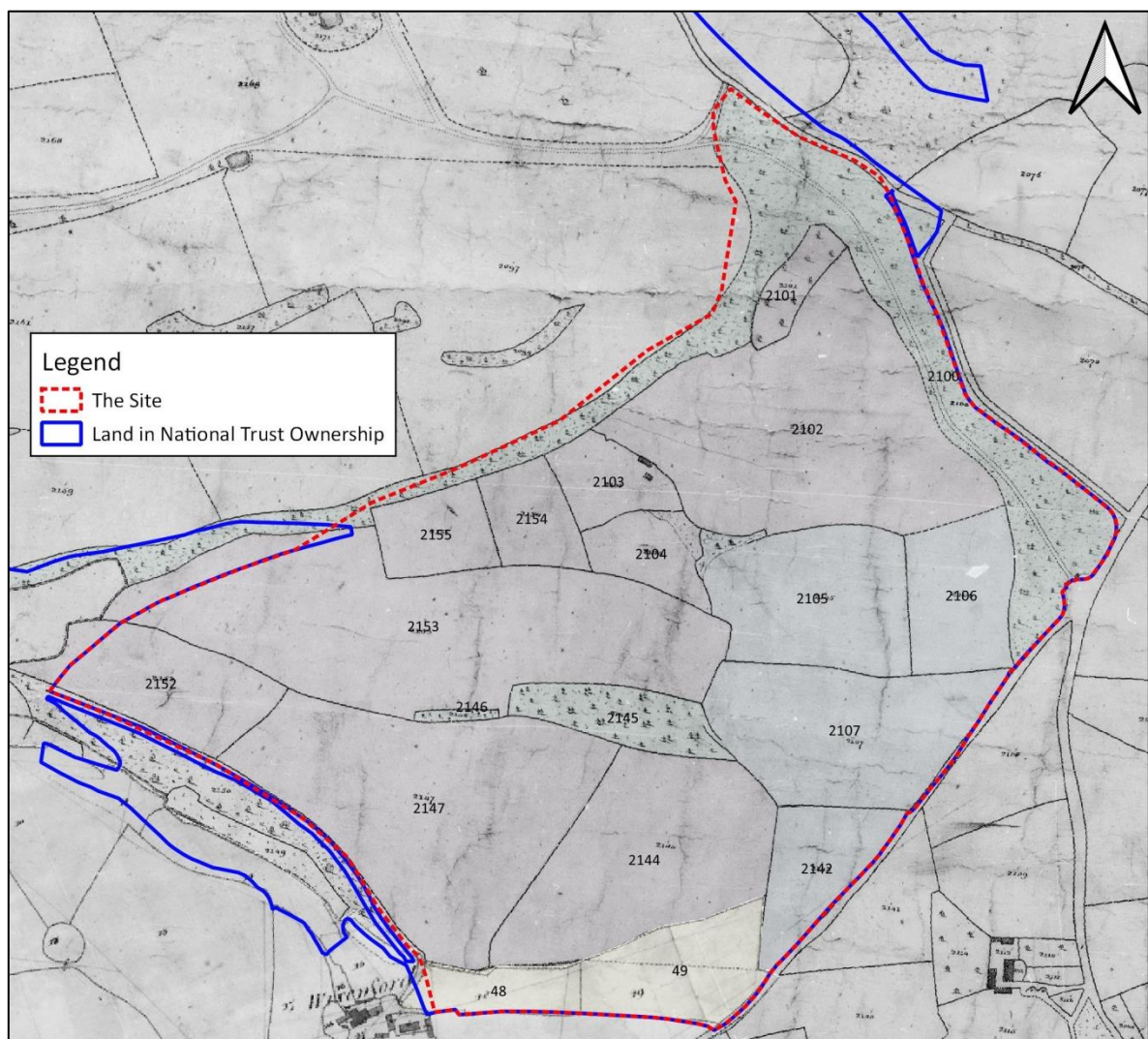


FIGURE 11: EXTRACTS FROM THE PLYMPTON ST MARY AND PLYMSTOCK TITHE MAPS WITH PLOTS NUMBERED (TNA)

TABLE 3: TITHE APPORTIONMENT EXTRACTS FOR PLOTS WITHIN THE STUDY AREA.

Plot No	Parish	Landowner	Occupier	Plot Name	Cultivation
Saltram					
2100	Plympton St Mary	Right Honourable Earl of Morley	Right Honourable Earl of Morley	Belt Plantation	House Timber and Plantation
2145	Plympton St Mary	"	"	Sellar Acres Higher Plantation	Timber and Plantation
2146	Plympton St Mary	"	"	Sellar Acres Lower Plantation	Timber and Plantation
Bickham and Hay					
2101	Plympton St Mary	Right Honourable Earl of Morley	William Cook	Cullery Orchard	Orchard
2102	Plympton St Mary	"	"	Barn Park	Arable
2103	Plympton St Mary	"	"	Higher Orchard	House Garden Orchard etc.
2104	Plympton St Mary	"	"	Higher Meadow	Clear Ground, Arable Timber etc; Waste
2144	Plympton St Mary	"	"	Furze Down	Arable
2147	Plympton St Mary	"	"	Great Down	Arable
2152	Plympton St Mary	"	"	Quay Field	Arable
2153	Plympton St Mary	"	"	Sellar Acres	Arable
2154	Plympton St Mary	"	"	Lower Meadow	Pasture
2155	Plympton St Mary	"	"	Lower Orchard	Orchard
Hay					
2105	Plympton St Mary	Right Honourable Earl of Morley	Joseph Pearse Junior	Lower Hay Down	Clear Ground, Arable and Timber; Waste
2106	Plympton St Mary	"	"	Barn Park	Arable
2107	Plympton St Mary	"	"	New Park	Arable
2142	Plympton St Mary	"	"	Shilla Furze	Arable
Wixenford					
48	Plymstock	The Earl of Morley	Thomas Little	Mowhay Meadow	Meadow
49	Plymstock	"	"	Part Dean	Meadow

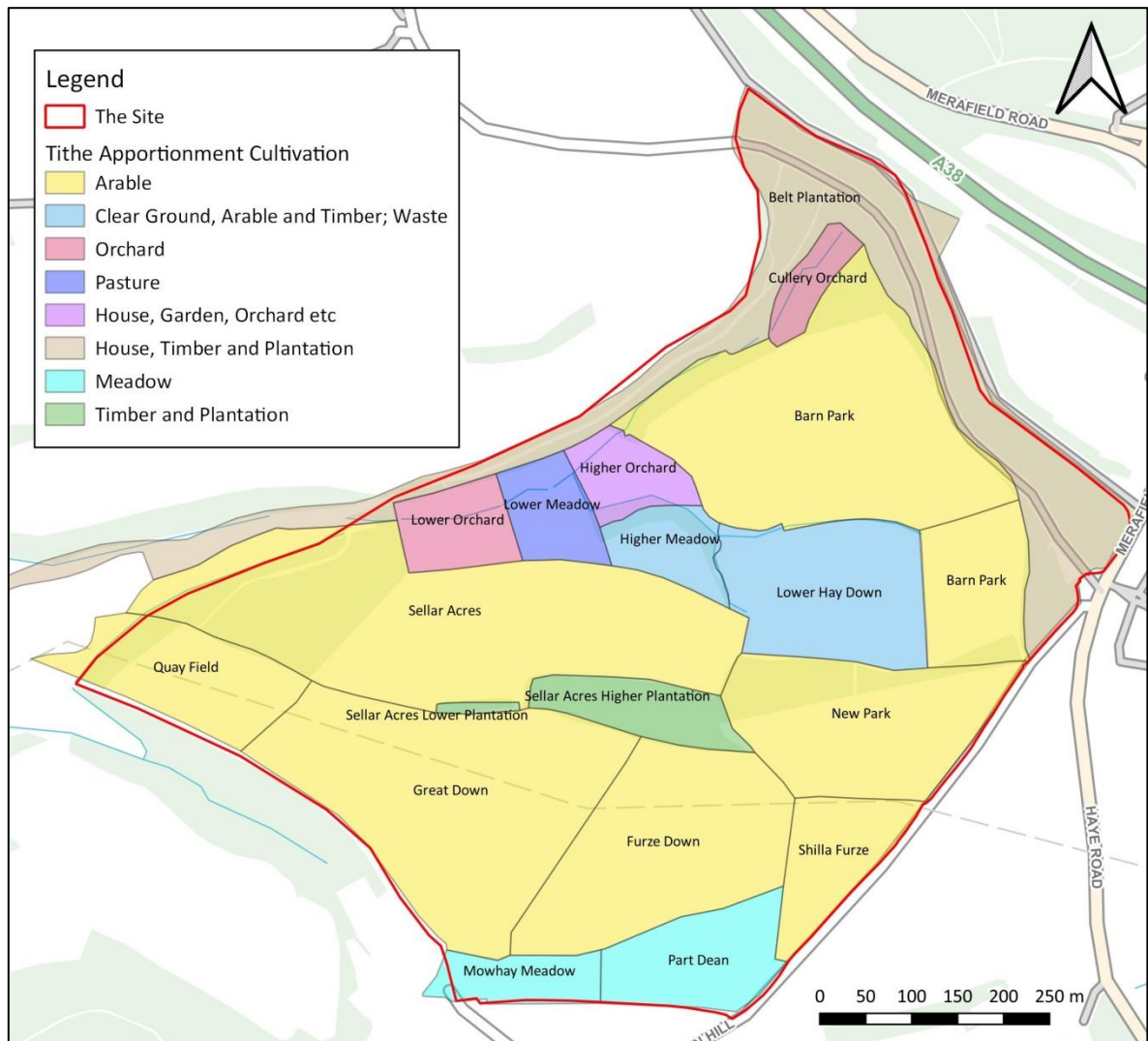


FIGURE 12: MAP SHOWING THE STUDY AREA BY CULTIVATION TYPE AT THE DATE OF THE TITHE SURVEY. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673

Following the death of John Parker III in 1840 his son Edmund inherited the estate. His focus appears to have been on reclaiming became increasingly run down due to a lack of investment and management (Teasdale 2017, 3:16). The First Edition Ordnance Survey map (Figure 13) was surveyed in 1863 and gives the first highly accurate representation of the estate. It shows established woodland around the northern and eastern sides of the survey area (The Dell/Happy Valley, extending down to The Belt and Stag Lodge Plantation), and at Wixenford Brake. The Barn Park clump is also clearly shown on this map. A small structure is shown against a field boundary close to the South Gate and a small enclosed area of ground is also shown in the woodland against the southern boundary of the estate in this area.

The field pattern appears to be unchanged from the Tithe map although the stream flowing through The Dell/Happy Valley is shown on this map. It appears to issue in two places; on the north eastern side of the plot named Cullery Orchard on the tithe map, and within the orchard, converging into one stream as it continues to run close to the boundary of the orchard. It exits through the boundary of the orchard to the west when it appears to flow into a pond shown as an approximately rectilinear feature with a defined boundary almost entirely enclosing it and a fill which indicates wet, marshy ground (Figure 14). From the pond the stream appears to continue down the valley to the north west of Bickham and flows through the Orchard immediately south of

Bickham. From there it may be culverted under most of the next field before flowing out through another orchard and out along the edge of the woodland of The Dell/The Belt where it appears to split and flow out towards the Laira Estuary on either side of Chelston Meadow. The clear depiction of a built feature along the course of the stream and its illustration, with an incomplete boundary and shown as marshy rather than standing water, suggests that this is not a newly constructed feature but possibly one which may date to the later 18th or early 19th century and has been neglected and therefore no longer functions for its intended purpose; or it is possible it may be a more recent venture which has failed to hold water as a pond. The boundary shown on the Tithe map appears to respect this feature, even though it is not illustrated as a pond on the Tithe map itself, suggesting that its origins date at least to the early part of the nineteenth century. Given its proximity to the farmstead at Bickham there is the possibility that this feature was originally related to agricultural activities e.g. providing water for livestock or domestic purposes rather than necessarily a landscape feature associated with The Dell/Happy Valley plantation.

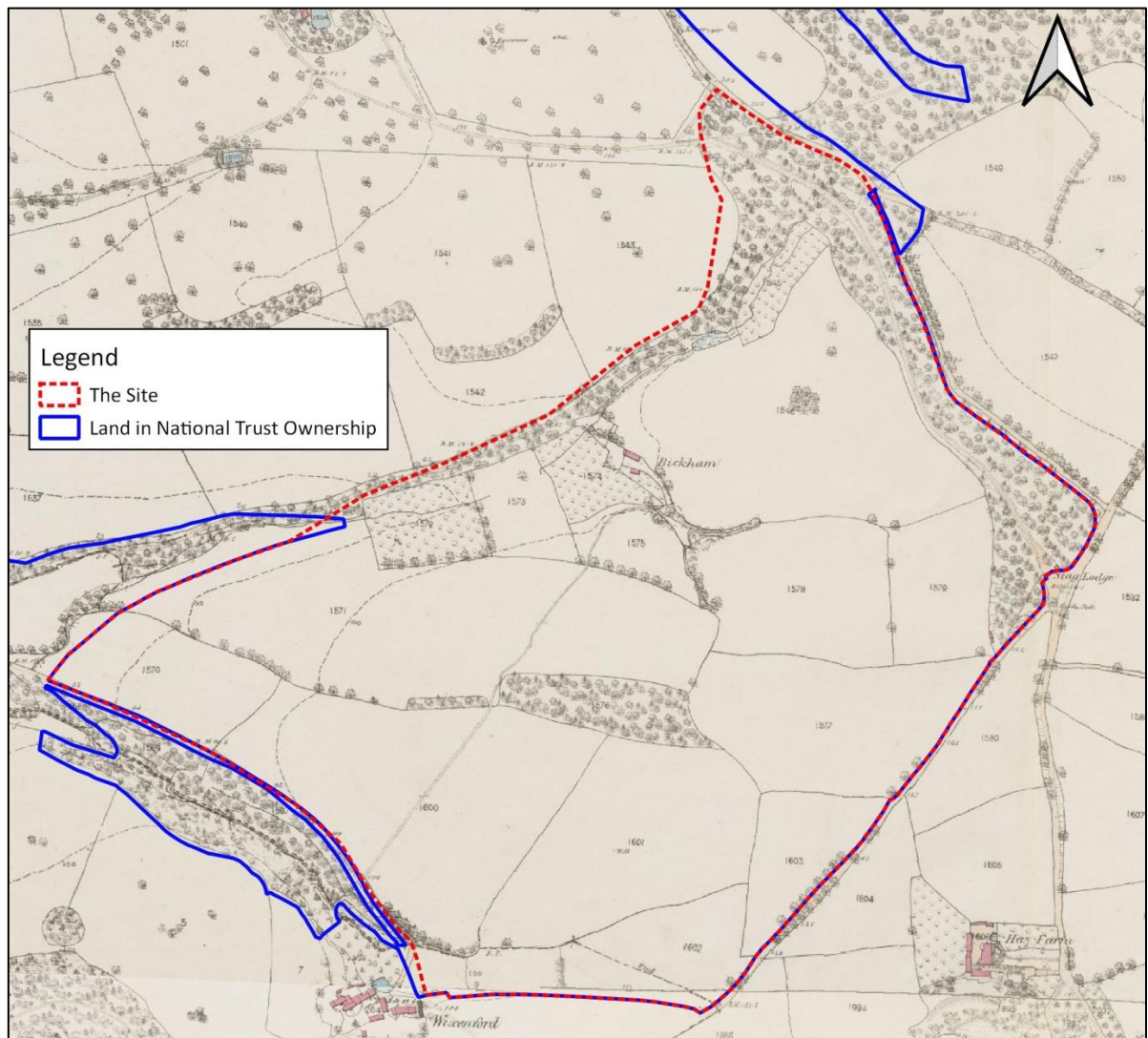


FIGURE 13: FIRST EDITION ORDNANCE SURVEY MAP SHOWING THE SURVEY AREA. SURVEYED BY 1863 (NLS)

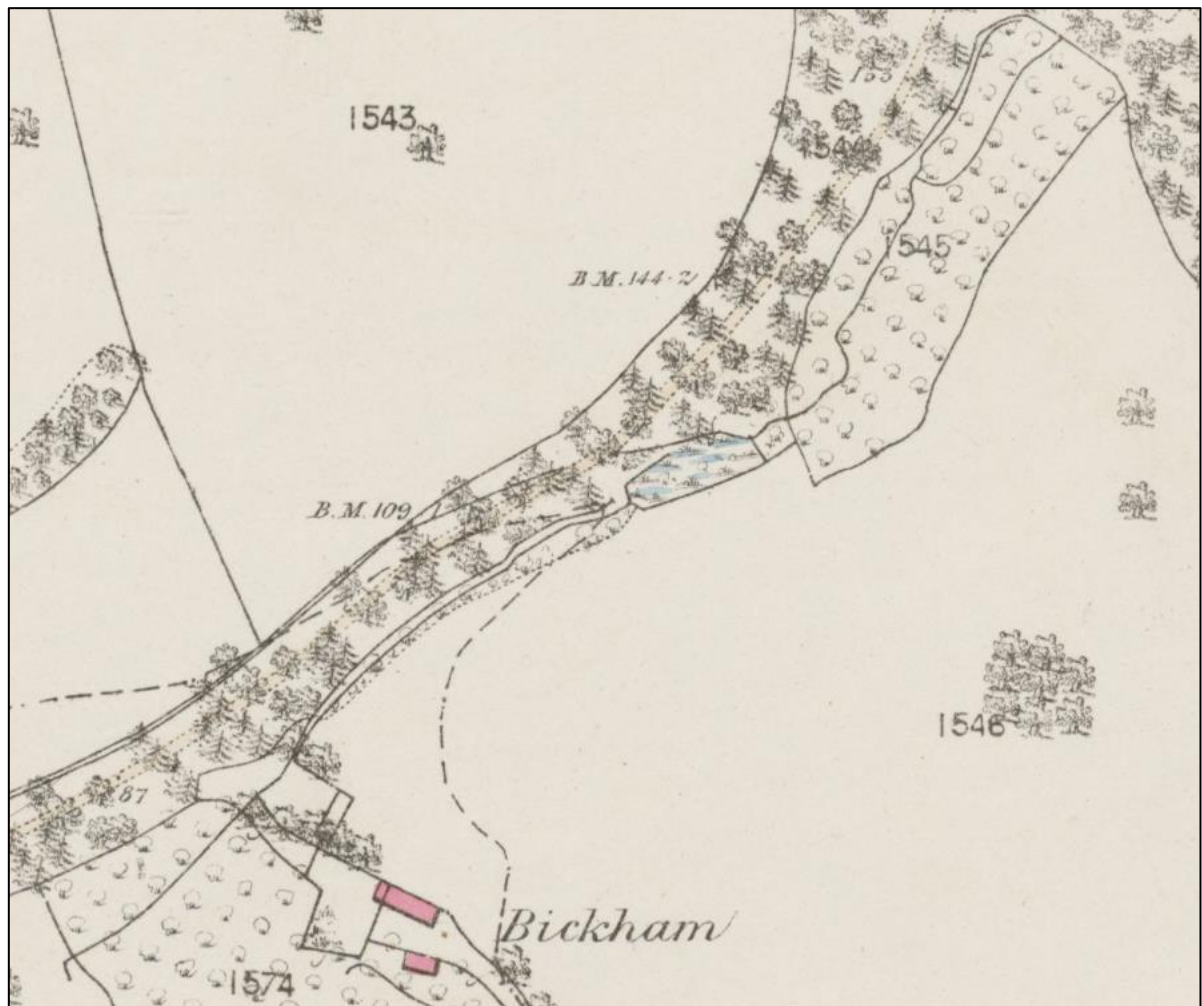


FIGURE 14: EXTRACT FROM THE FIRST EDITION ORDNANCE SURVEY MAP SURVEYED BY 1863 (NLS).

Following the death of Edmund Parker in 1884, his son Albert had returned to Saltram with his family and commenced significant repairs across the estate. His father in law owned Westonbirt Arboretum and it is believed that this influenced his management and planting of the gardens and parkland at Saltram. Albert Parker is documented as having planted a considerable number of ornamental trees in The Dell or Happy Valley and constructed a keepers lodge at the south gate, behind the Robert Adam Pepperbox lodges in 1890. A substantial programme of replanting was undertaken in 1891 following 'the great blizzard' which caused significant destruction to the plantations across the estate including to Stag Lodge plantation.

By the Ordnance Survey Second Edition map, surveyed in 1892 (Figure 15) the changes effected by Albert Parker are evident within the area of this survey. The Dell/Happy Valley plantation had been extended to the south east, subsuming the orchard named Cullery Orchard on the tithe map along with some of the agricultural land in Barn Park. The Barn Park Clump is also shown as less substantial on this map. The course of the stream through the valley appears to have been altered slightly and the pond outline is shown as even more fragmentary, with no indication of marshy wet ground within it. The stream is clearly shown flowing straight through the pond shown on the First Edition map. The farmstead at Bickham appears to have been altered slightly with the removal of some of the boundaries to the south of the barn but the apparent addition of small structures adjoining and close to the southern building. The stream which approaches Bickham from the south is clearly shown running through the orchard and alongside the field boundary where it meets with the stream running through The Dell, forming a small pool or pond as it crosses the boundary into the next field. The stream is still shown as culverted under part of that field before emerging in the

next orchard and continuing its course much as in the First Edition map. The new plantation in the northern part of Sellar Acres, widening this part of The Belt, is evident on this map and appears likely to have been a result of Albert Parker's connections to Westonbirt Arboretum. The agricultural field pattern in this part of the estate appears unchanged from the First Edition and Tithe maps although two small pockets of trees or plantation are shown in the northern corner of Lower Hay Down and along the southern boundary of Barn Park. Stag Lodge is evident on this map behind the Adam Pepperpot lodges at the South Gate.

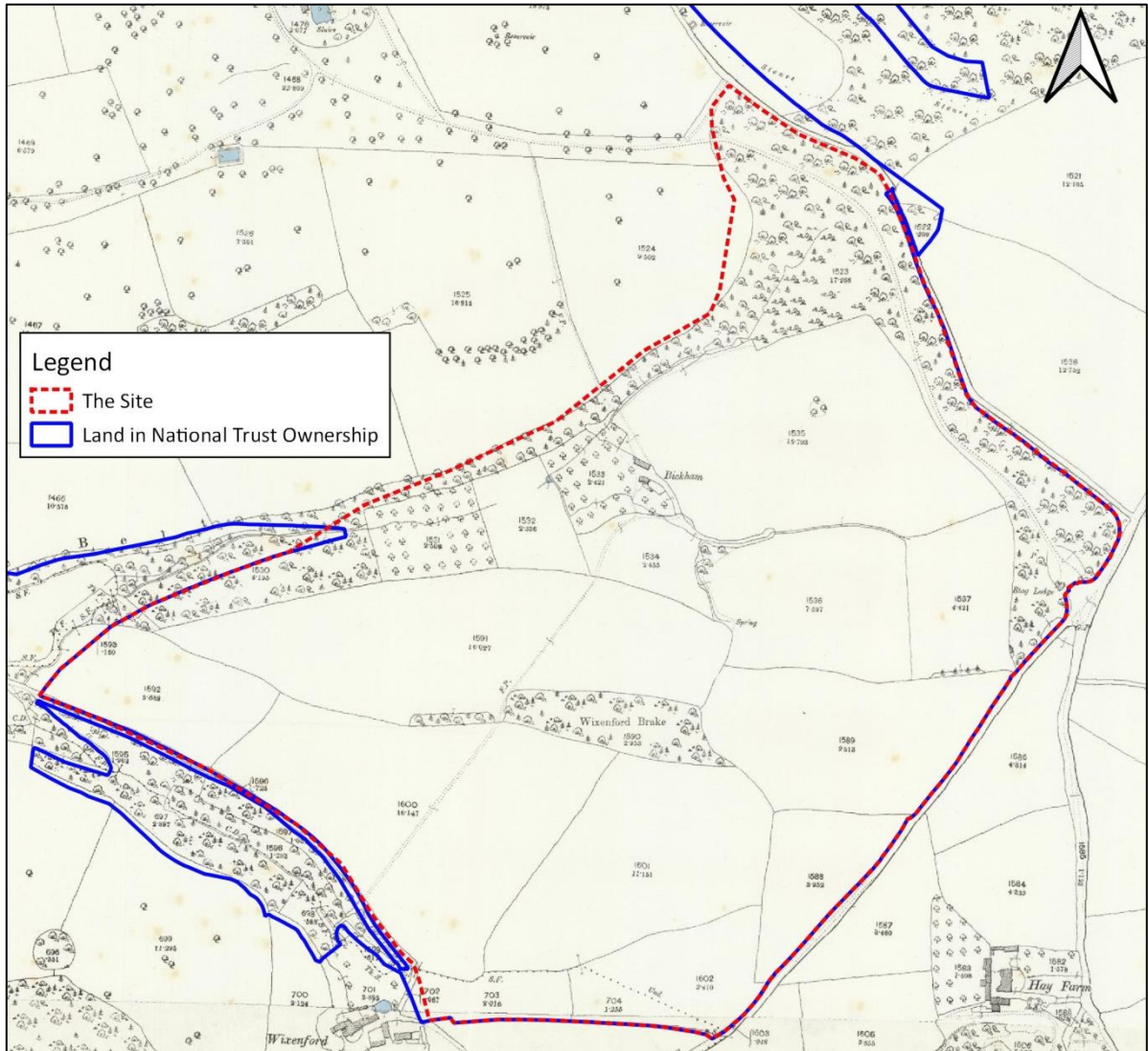


FIGURE 15: EXTRACT FROM THE 1892 SECOND EDITION ORDNANCE SURVEY MAP (NLS).

4.7 THE TWENTIETH CENTURY

After the death of Albert Parker in 1905 his son Edmund, 4th Earl of Morley inherited the Saltram Estate. He took a keen interest in the estate and its gardens. It is possibly he may have continued his father's planting schemes within the survey area. The Revised Second Edition Ordnance Survey map of 1912 (Figure 16) shows a number of minor changes to the survey area had taken place since the 1892 survey. Within the area of The Dell/Happy Valley a right angled area of wall or boundary appears to have been constructed close to the area in which the stream which flows through the valley issues. The southern boundary of The Dell/Happy Valley also appears to have been extended south in one area of Barn Park, creating a straight boundary along its southern edge down to Bickham. This area appears to have been planted with trees and may have been the work of Albert Parker, as part of the restoration and enhancement of this area following the 'great blizzard'. Two pathways forming a crossroads are evident at the Sellar Acres Plantation, which is named on this

map; the plantations at Wixenford Brake have also been renamed and are no longer known as Sellar Acres Higher and Lower plantations as on the Tithe map. The Barn Park Clump appears to be depicted as having a circular boundary around it by the date of this map. At Bickham farmstead, the barn appears to have been reduced to approximately two thirds of its previous size on its eastern end between 1892 and 1912 and a small building or structure is shown close to the stream in the field immediately south of Bickham (named Higher Meadow on the Tithe map).

Albert Parker has been credited with the development of The Dell/Happy Valley as a valley garden in the late Victorian period, including a chain of ponds which run down through the valley. It is therefore of note that the Ordnance Survey map of 1912 does not appear to depict any evidence of a system of ponds within this valley, even though if created by Albert Parker they would have been relatively recent features. It is possible that this is an omission from the map revision; the most south westerly pond, the existence of which is shown from the First Edition map and possibly indicated by the Tithe map and even the Ordnance Survey draft map is still shown. Alternatively it may be that Albert Parker's attempts to create ponds could have been unsuccessful and without any built form may have been regarded as not necessary to depict by the Ordnance Survey surveyor. A further alternative is that their history of the ponds within The Dell/Happy Valley is more complex and they may owe their origin to incremental changes by successive owners of the estate; while the south westernmost pond does appear to have early origins, the other pond features attributed to Albert Parker could, in part at least, be far more recent features.

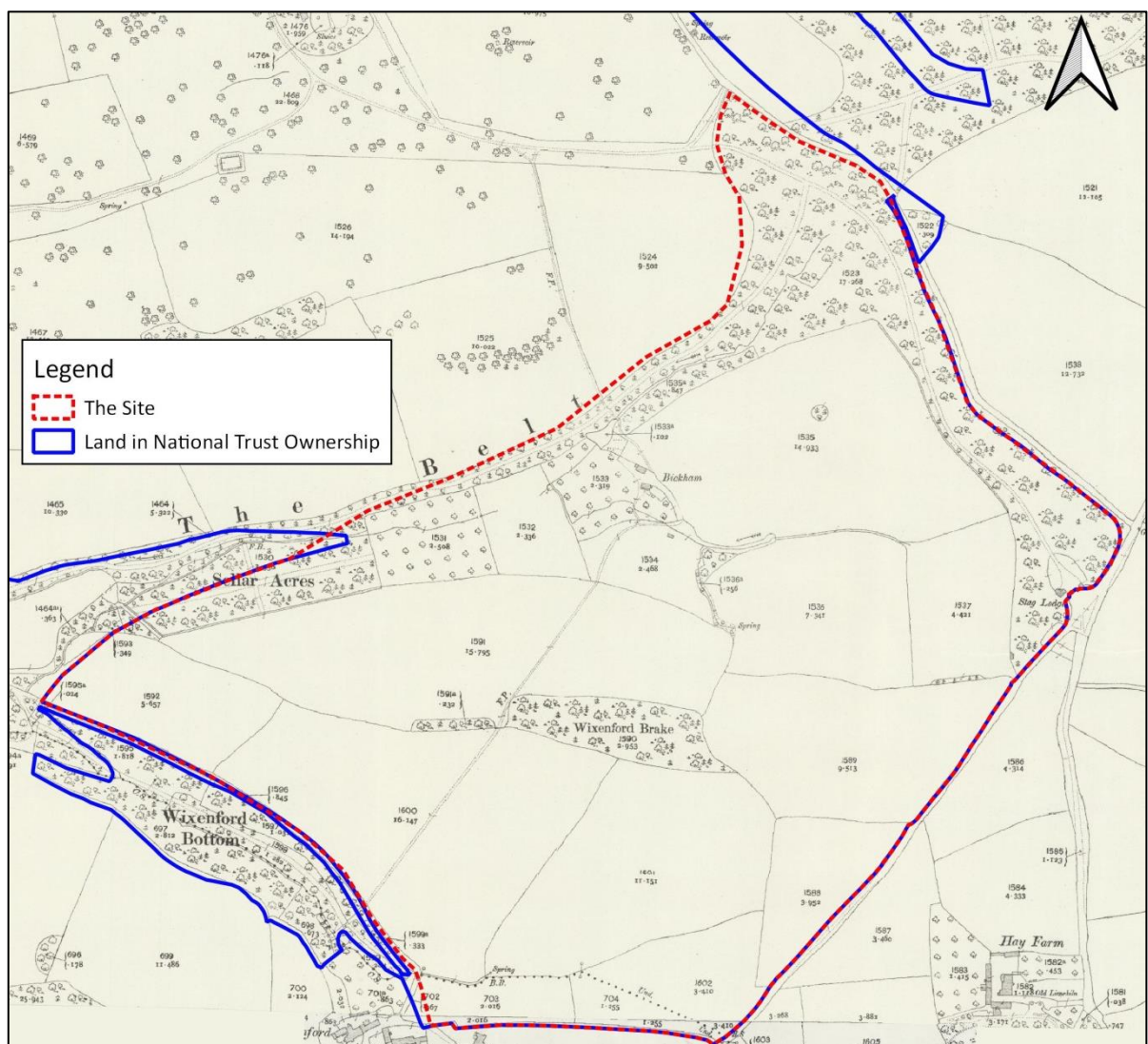


FIGURE 16: EXTRACT FROM THE 1912 ORDNANCE SURVEY REVISED SECOND EDITION MAP (NLS)

Further changes are visible across the survey area by the 1933 Revised Ordnance Survey map which shows the Sellar Acres plantation to have been extended further to the south to form an additional triangle of plantation. A pathway is shown through the larger plantation at Wixenford Brake, suggesting this may have formed part of an intended circuit through the parkland although the historic footpath shown between Bickham and Wixenford Farms, passing between the Wixenford Brake plantations is no longer shown. A boundary or wall appears to have been added across the valley in The Dell/Happy Valley, just below the pond identified on the First Edition Ordnance Survey map. The farmhouse at Bickham has apparently been demolished by this date leaving just as small square structure, previously adjoined to the building, within the former yard or garden to the east of the house. The small building or structure is shown close to the stream in the field immediately south of Bickham (named Higher Meadow on the Tithe map) is also no longer shown on this map, suggesting the total abandonment of Bickham as a farm unit, with perhaps just the need for a small barn for storage/animal shelter. The removal of the historic footpath between Bickham and Wixenford Farms on the map depiction adds further weight to this.

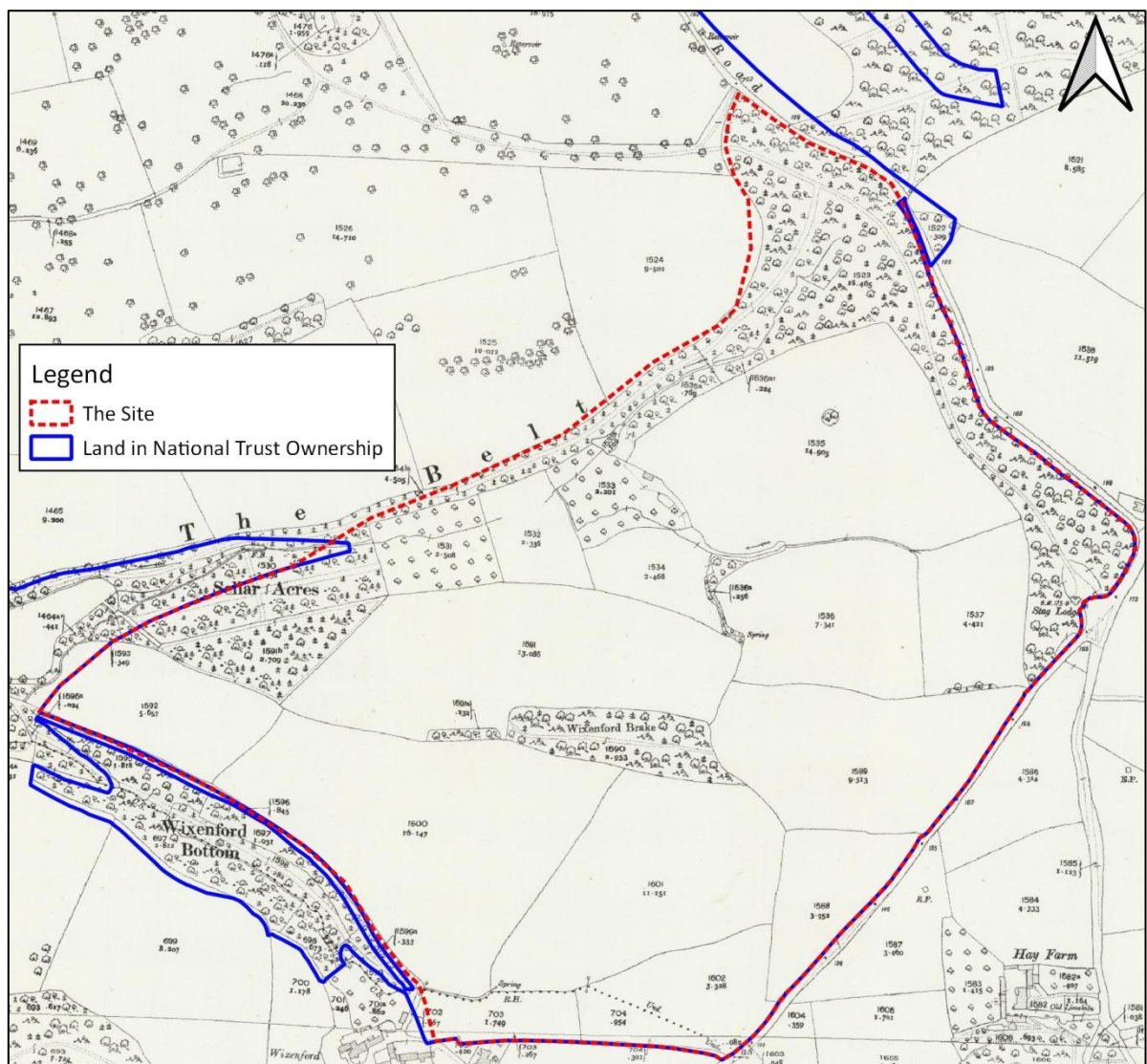


FIGURE 17: EXTRACT FROM THE 1933 ORDNANCE SURVEY REVISED SECOND EDITION MAP (NLS)

It appears that during the Second World War Saltram sustained damage in the form of a large number of incendiaries which fell in the parkland at Saltram. In 1943 American troops were stationed at Saltram and concrete roads across the estate were laid to accommodate tanks. The

camp was apparently used to accommodate Italian POWs at the end of the war (Teasdale 2017 3:23). Aerial photographs from c.1946 (Figure 18) show some details of the survey area in the immediate post war period. Although the tree cover makes it difficult to determine features with certainty, small areas of white suggest recent possible ground disturbance in places within the woodland of The Dell and to the north of the South Drive. Two short linear features are just visible to the west of Barn Park Clump although it is unclear whether these are related to military or agricultural uses. A possible structure is shown close to the boundary line with South Drive in Barn Park and further possible buildings or structures are evident close to the southern boundary of Barn Park with New Park and along the eastern boundary of New Park; the function of these structures is difficult to discern but could either be military or agricultural. Another possible structure is evident in Great Down, close to Wixenford and a further possible building or structure is evident between the Wixenford Brake Plantations.

A pathway through the triangular part of Sellar Acres Plantation to a gateway into Sellar Acres appears to have been created between 1933 and 1946. At Bickham, lynchets or terraces are visible in the southern half of Lower Meadow. The farmhouse appears to have been almost totally removed by this date, although the its location can just be determined; the wall enclosing its garden or yard can still be seen along with the small square structure in the north western corner. Bickham Barn appears to be roofed in the 1946 aerial photograph.



FIGURE 18: c.1946 AERIAL PHOTOGRAPH SHOWING THE SURVEY AREA INDICATED IN RED (NT).

After the death of Edmund Parker in 1951, his brother Montagu inherited the Saltram Estate. The National Trust acquired the house and part of the park at Saltram in 1957 through an arrangement in lieu of death duties. Between 1961 and 1969 the Trust acquired the western part of the Saltram parkland down to Saltram Point. Since the 1950s Saltram's landscape setting has been eroded by the creation of a landfill site on Chelston Meadow (the National Trust have widened and replanted

parts of the 'The Belt' in order to create screening for the Chelston Meadows landfill site; it closed in 2008 and has now been grassed over) and the construction of the A38 to the east of the house through the parkland in the late 1960s and early 1970s. A line of electricity pylons crossing the survey area through Quay Field, Great Down, Furze Down and Shilla Furze has been added since 1946. Ordnance Survey mapping from the 1960s shows that the path through the triangular area of Sellar Acres had been abandoned and part of the plantation in that area appears to have been cleared. The orchards around Bickham also appear not to have been maintained, with the loss of some of the trees. Two small ponds are shown within the area of the larger pond illustrated on the Ordnance Survey First Edition map and the fence or boundary around Barn Park Clump appears to have been removed. By the 1980s an area at the south of Barn Park and north of New Park appears to have been planted as woodland, creating a band of woodland connecting Stag Lodge Plantation to Wixenford Brake.

4.8 HISTORIC PLANTATIONS AND BOUNDARY PHASING

The maps below show the phasing of the boundaries and plantations within the survey area. Figure 19 indicates the date by which boundaries were added within this area of the estate. Those which were shown on the tithe map may have much earlier, possibly medieval, origins in some cases. Figure 20 shows historic boundaries within this area which have subsequently been removed, by date. It shows the majority of boundary change has occurred in the area of Bickham farmstead and in the north eastern area of The Dell. Relatively few boundaries have been lost across the agricultural land within the study area since the date of the Tithe survey.

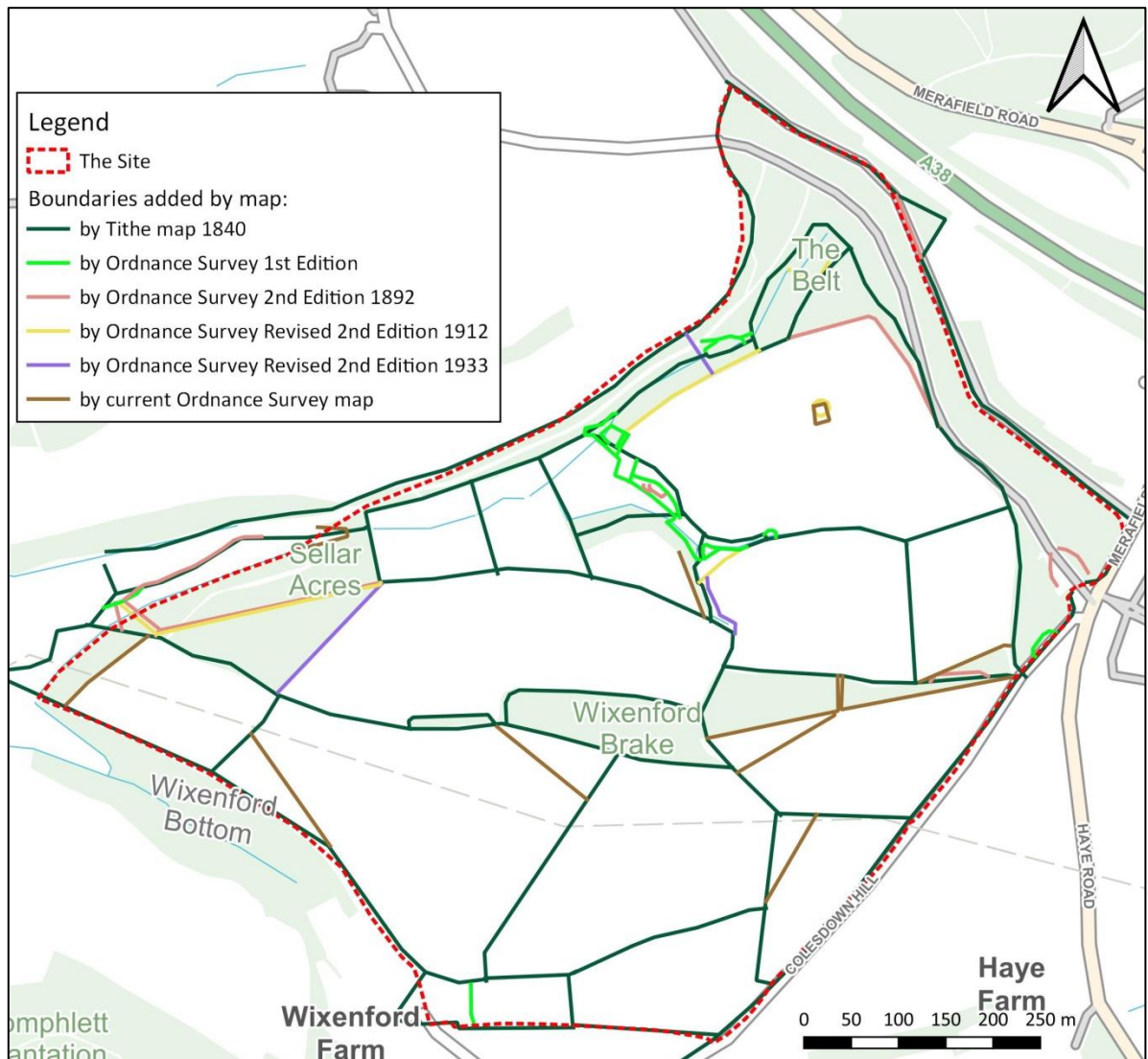


FIGURE 19: PHASING OF BOUNDARIES WITHIN THE SURVEY AREA FROM HISTORIC MAPPING. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

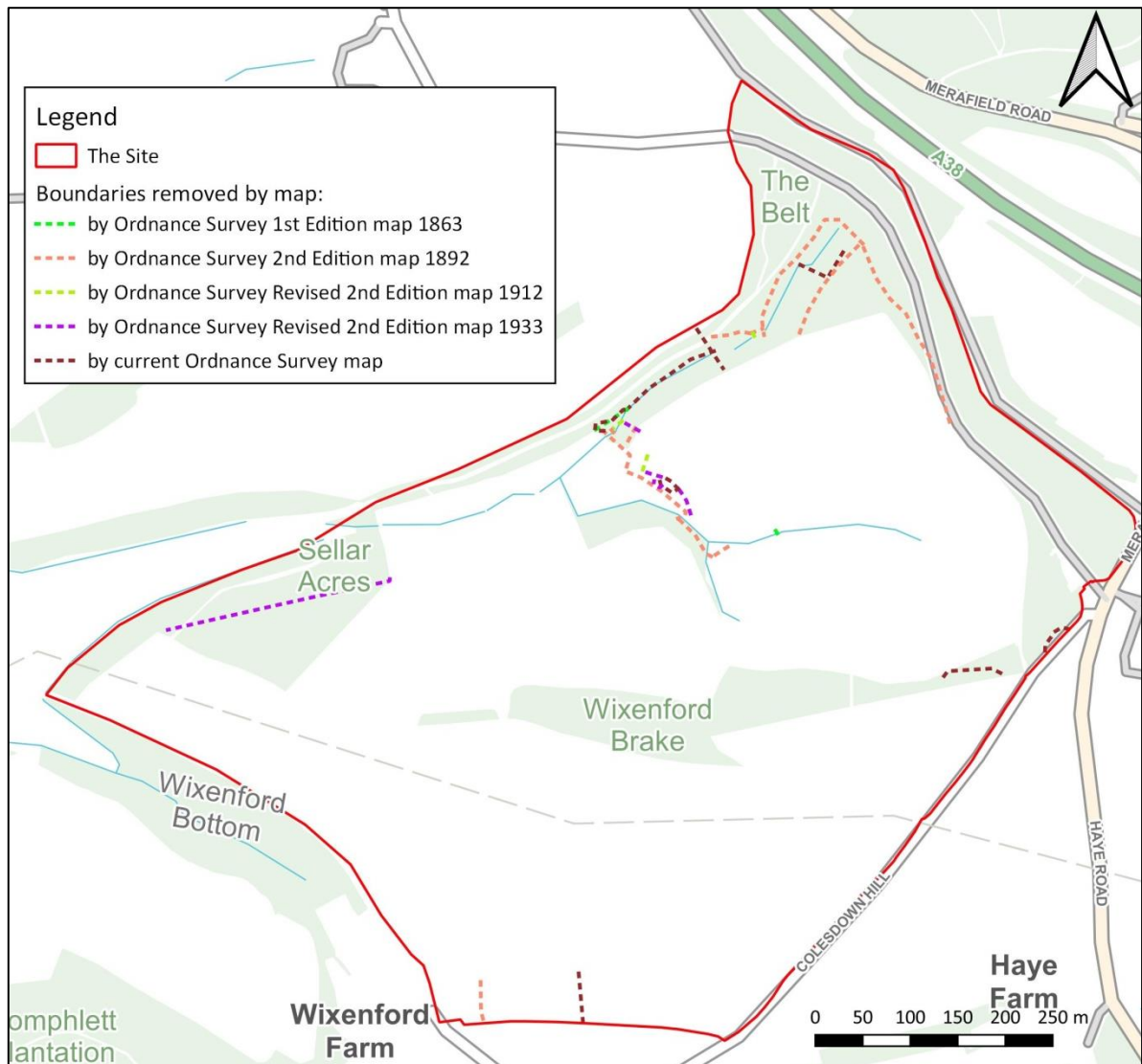


FIGURE 20: PHASING OF BOUNDARIES WITHIN THE SURVEY AREA FROM HISTORIC MAPPING. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

Figure 21 shows the dates by which the woodland and plantations within the survey area had been established. The Dell and Wixenford Brake are the oldest of the plantations within the survey area, with Barn Park Clump and a small area of planting to the south of Bickham established by the mid-19th century. By the end of the 19th century the southern extension of The Dell and the creation of the Sellar Acres plantation are evident, the latter being extended in the early 20th century. Some areas of more recent woodland are apparent within the survey area; established in the mid to late 20th century.

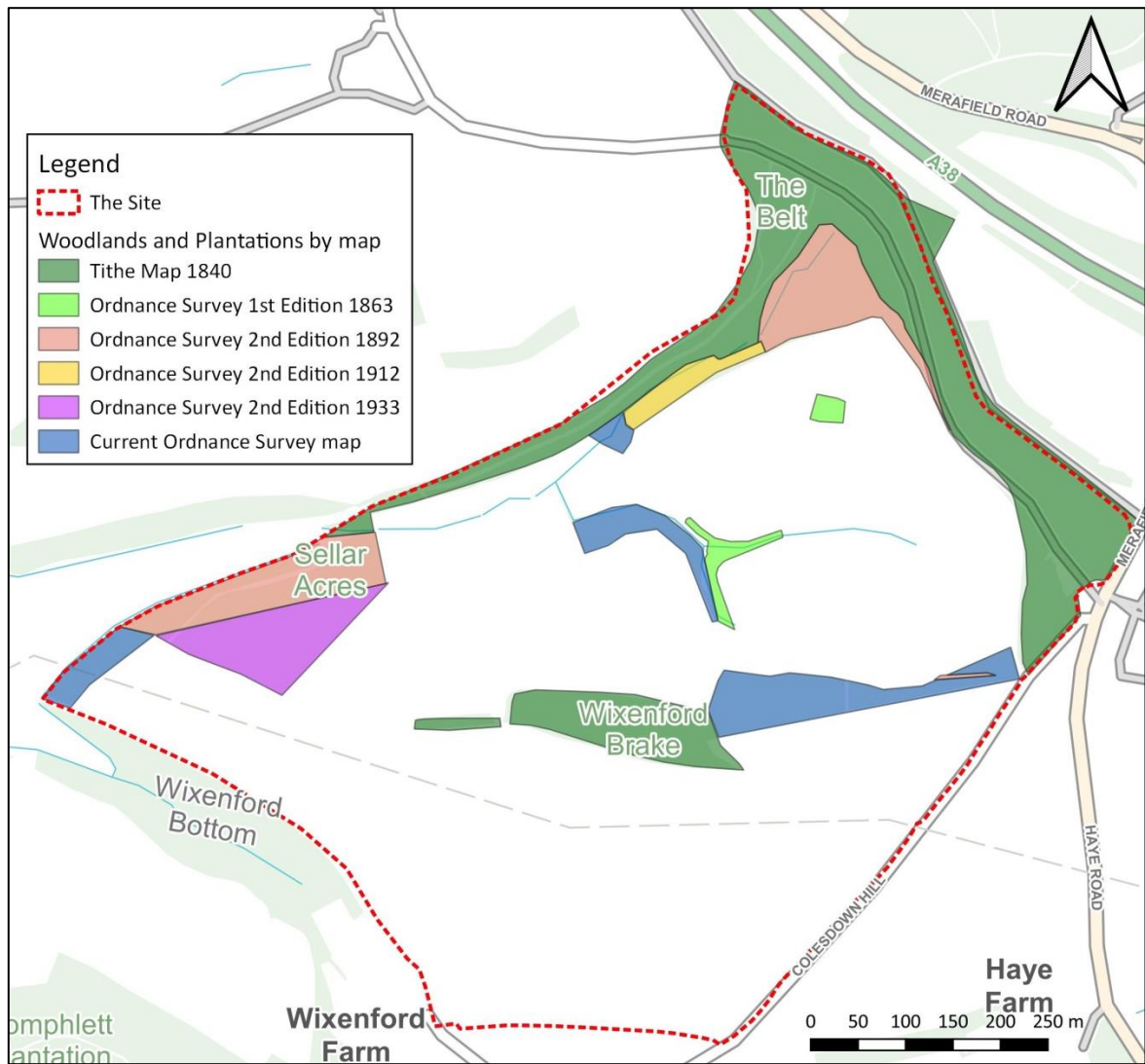


FIGURE 21: PHASING OF PLANTATIONS WITHIN THE SURVEY AREA FROM HISTORIC MAPPING. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

4.9 AERIAL PHOTOGRAPHY AND LIDAR DATA

Aerial photography of the survey area (Figure 22) is limited in its identification of archaeological features due to the large amount of woodland cover. Imagery of the enclosed agricultural fields shows them to be relatively featureless, a result of their former intensive arable use, which through modern ploughing is likely to have removed any archaeological features with the possible exception of substantial earthworks.



FIGURE 22: MODERN AERIAL PHOTOGRAPH WITH THE SURVEY AREA OUTLINED IN RED. SUPPLIED BY THE NATIONAL TRUST.

LiDAR data for the survey area is available at a survey interval of 1m from the Environment Agency (EA). While a 25cm interval is preferable for the identification of archaeological features, especially within woodland, a 1m resolution can be used, particularly for identifying larger archaeological features, LiDAR data for the years 2010 and 2018 has been processed as part of this survey due to the lack of complete coverage of the survey area in the 2018 data set (part of the southern field of the survey area was not included in the 2018 LiDAR survey). LiDAR data for both Digital Terrain Model (DTM) and Digital Surface Model (DSM) has been processed and examined. The DSM data illustrates the extent of tree coverage in the survey area and while the DTM data digitally removes the vegetation cover, the 1m survey interval can mean that in areas of 'no return' the blank spaces are digitally filled. This can therefore lessen the usefulness of this data to observe any archaeological features in especially dense woodland. A number of images of processed LiDAR covering the two data sets are shown below however a larger number of images are included in Appendix 1. Identification of features from the LiDAR data was undertaken in conjunction with a walkover survey and is discussed in Section 5.

4.9.1 LiDAR HILLSHADE

Figure 23 shows LiDAR data of the survey area from 2018 with the vegetation cover apparent. Figure 24 shows data from 2010 to provide full coverage of the survey area with the vegetation cover digitally 'removed'.



FIGURE 23: 2018 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

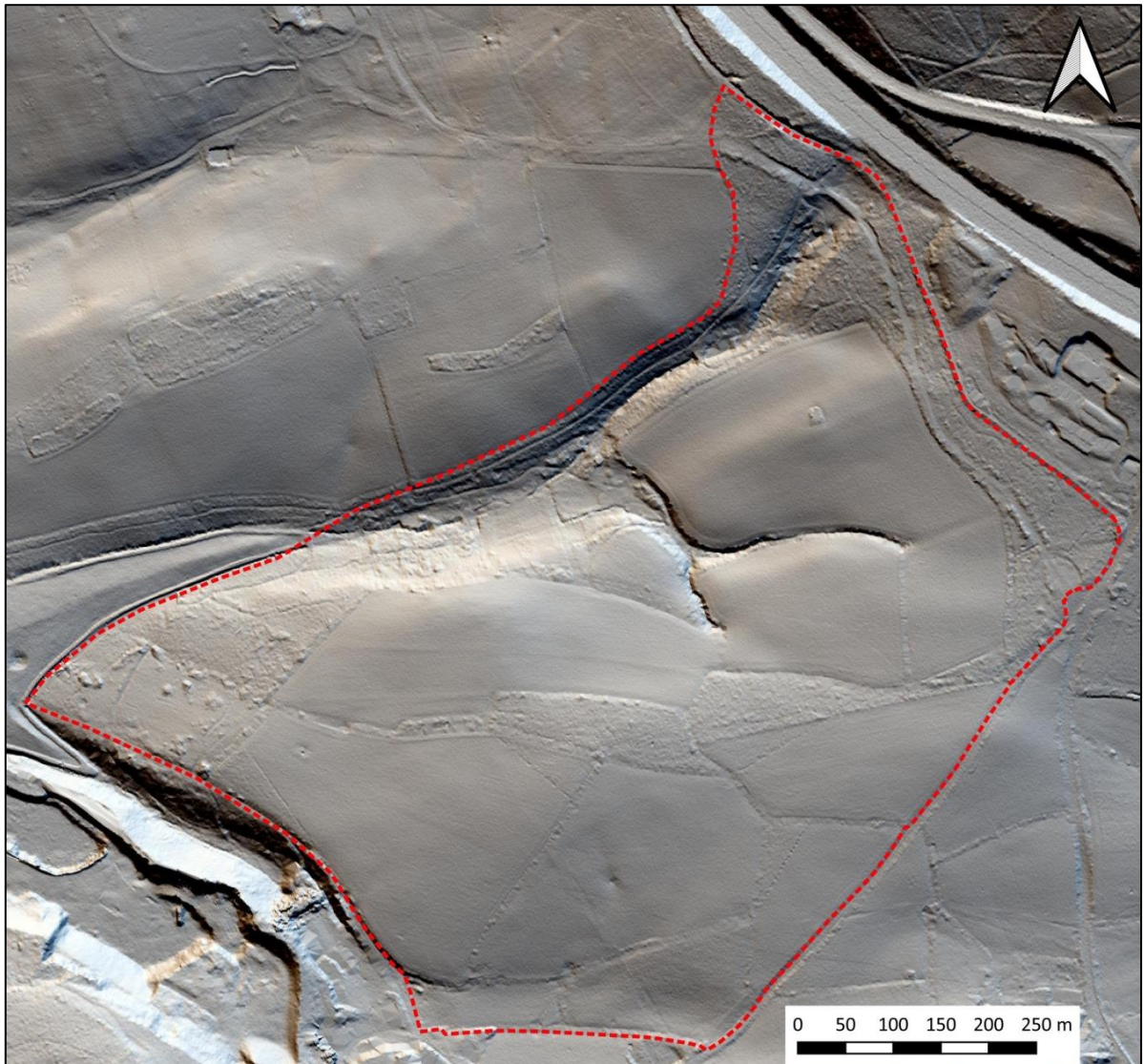


FIGURE 24: 2010 1M DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

4.9.2 LIDAR SLOPE

Figure 25 shows LiDAR data of the survey area from 2018 with the vegetation cover apparent. Figure 26 shows data from 2010 to provide full coverage of the survey area with the vegetation cover digitally 'removed'



FIGURE 25: 2018 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14 SLOPE Z1. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

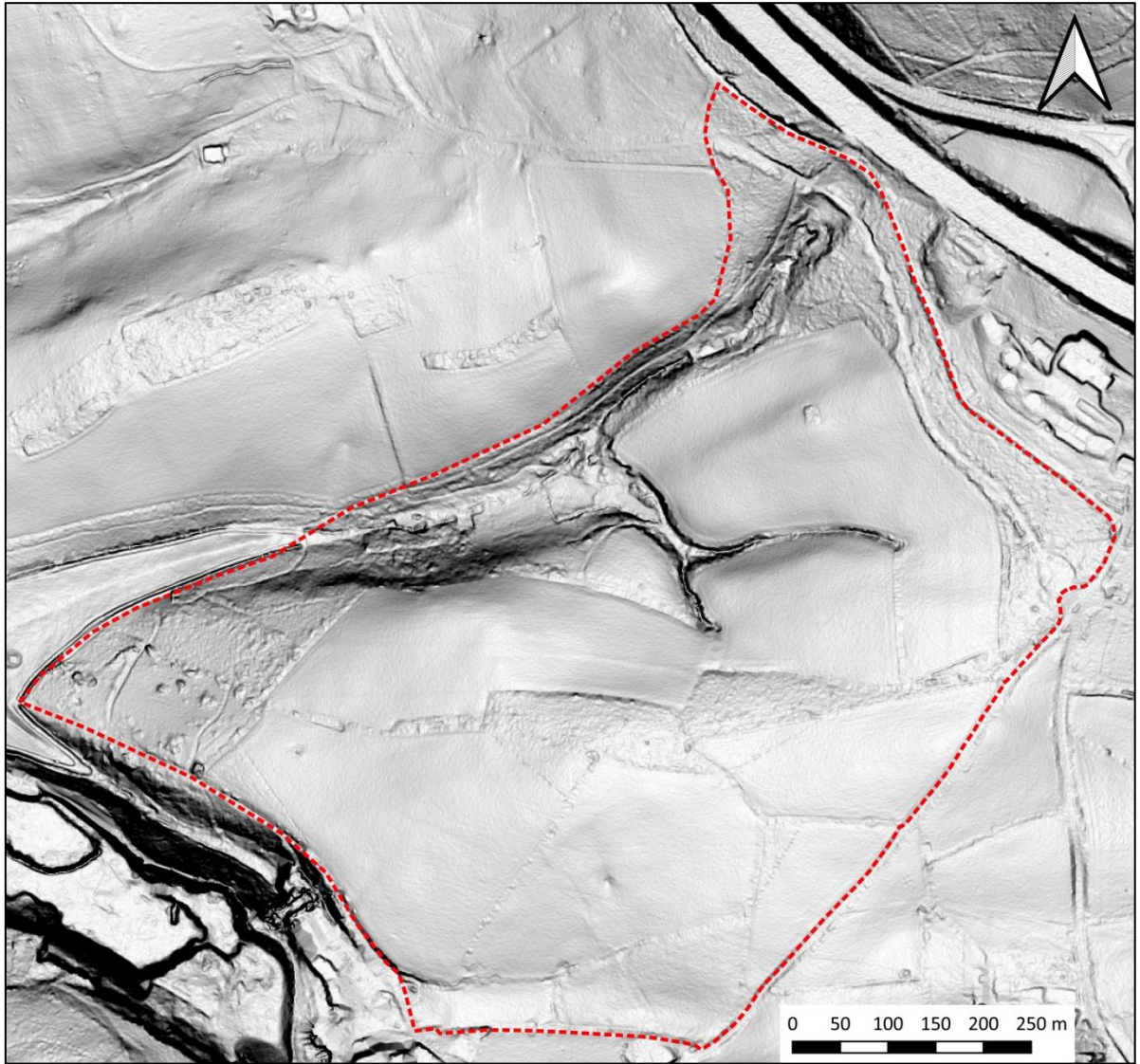


FIGURE 26: 2018 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14 SLOPE z1. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

5.0 WALKOVER SURVEY

A walkover survey of the area was undertaken over two days in February 2021. The weather conditions varied between overcast, moderate to heavy rain and clear sunny skies. The results of the survey are presented below. The results are presented below by field/area (Figure 27). Plot names as stated on the Tithe apportionment have generally been used to refer to each field/area with the exception of the Sellar Acres Plantation which refers to the plantation at the western edge of the survey area while the 'Sellar Acres Higher and Lower Plantations' of the Tithe map have been referred to by their present name of Wixenford Brake. The plot named Cullery Orchard on the Tithe survey has also not been included as it has become part of The Dell. The Tithe survey referred to 'The Dell' as 'Belt Plantation' however for clarity it is referred to as The Dell/Happy Valley in this survey. Although the field names from the Tithe Apportionment have been used, it is the modern extents of the fields/areas (where this differs from their historic extent) which are referred to in the discussion below.

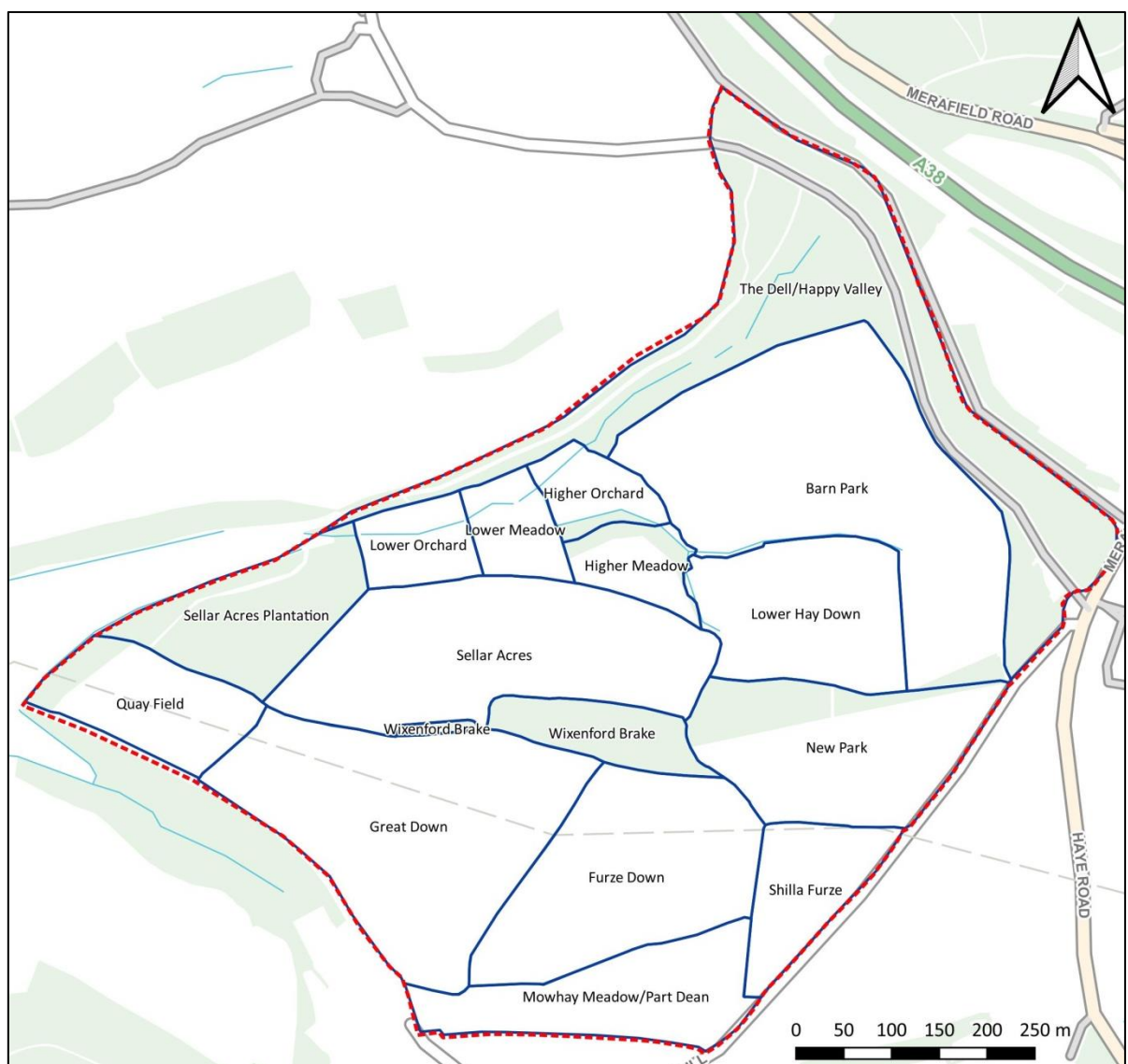


FIGURE 27: BOUNDARIES OF PLOTS/FIELDS SURVEYED AS PART OF THE WALKOVER SURVEY, BASED UPON THEIR TITHE SURVEY PLOT NAME BUT UTILISING MODERN BOUNDARIES WHERE THESE DIFFER FROM THE HISTORIC BOUNDARY. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

Features identified on the ground have been allocated a number and are shown on Figure 4. A summary of sites identified can be found in Section 2.

Within the wooded areas of the survey area the ground vegetation coverage consisted predominantly of brambles and ivy with areas of fallen/felled timber left, often in piles and subsequently also now covered in vegetation. This impeded assessment of possible archaeological features with the wooded areas of the survey area and also means that assessment of possible archaeological features from LiDAR data is further complicated by these 'features'. As a result it is not possible to consider this survey to have been exhaustive, however every attempt was made to access the ground within the woodland areas and make an assessment of possible archaeological features. It is possible that further features may exist, overlain by deadwood or dense vegetation cover. This is addressed in the recommendations of this report (Section 8).

5.1 THE DELL/HAPPY VALLEY

The Dell/Happy Valley is an area of woodland which is also known as part of The Belt. Although the 1784-6 Ordnance Survey map does appear to show some areas of plantation or orchard along the valley bottom, the plantation known as The Belt is considered to have been started in the early 19th century by John Parker III. By the date of the Tithe map The Dell/Happy Valley area of The Belt evidently occupied the extent of the valley from the South Drive south west and included the length of the South Drive to Stag Lodge. The Dell/Happy Valley had reached its current extent by the 1912 Ordnance Survey map, taking in agricultural land and orchard to its southern side. The Dell/Happy Valley continues to be woodland today with paths running along its northern side down historically towards the Plym, now the Chelston Meadows landfill site. Off the paths the ground cover is generally dense vegetation, particularly brambles and ivy, although alongside the upper parts of the valley historic 'garden' planting e.g. bamboo is also evident. There was also evidence for extensive animal burrowing, particularly in the north eastern parts of The Dell, along the South Drive. A gas pipe marker was observed along the path close to the northern boundary of The Dell at approximately SX 5235 5503.

1. Square earth bank feature in north eastern corner of The Dell

SX 5257 5540

A square earth bank feature c.2m x 2m x 0.5m deep is located just to the north of the narrow footpath that enters The Dell from the local access road which bounds The Dell on its north eastern side. It may have a possible entrance on its southern side although this may be caused by erosion of the bank. This feature may relate to military use of the estate during World War Two.



FIGURE 28: SQUARE FEATURE ALONGSIDE FOOTPATH IN NORTH EASTERN CORNER OF THE DELL; FROM THE SOUTH

2. Possible rectangular feature in north eastern corner of The Dell

SX 5257 5540

An approximately rectangular feature c. 2m x 1m appears to be partially cut by the narrow footpath that enters The Dell from the local access road which bounds The Dell on its north eastern side. A piece of concrete was observed on one side of this feature. This feature could relate to military use of the estate during World War Two.



FIGURE 29: SLIGHT RECTANGULAR FEATURE CUT BY PATH VISIBLE ON THE RIGHT HAND SIDE OF THE IMAGE; FROM THE NORTH WEST.

3. Rectangular cut feature in north western corner of The Dell

SX 5259 5539

A rectangular cut feature c. 1.5m x 1m is located close to the northern edge of The Dell near the narrow footpath that enters The Dell from the local access road which bounds The Dell on its north eastern side. This feature could relate to military use of the estate during World War Two.



FIGURE 30: SLIGHT RECTANGULAR FEATURE CUT NEAR FOOTPATH, VIEWED FROM THE WEST.

4. Possible rectilinear feature opposite path into The Dell

SX 5260 5535

A possible rectilinear feature c.7m x 3m is located on the north side of the South Drive opposite a footpath into The Dell. The feature is approximately rectangular in shape with no obvious built form discernible however brick, stone and lumps of concrete were observed on its surface. The vegetation cover of this area meant that no further features could be determined. It could be created as a result of widening of the driveway or possibly creating a lay-by (although this area is not presently a lay-by) and material may have been dumped in this area. This feature could relate to military use of the estate during World War Two.



FIGURE 31: SLIGHT RECTILINEAR SHAPED FEATURE ALONGSIDE THE SOUTH DRIVE. THE ARROW INDICATES AN AREA OF BRICK AND CONCRETE.

5. Possible rectilinear feature opposite path into The Dell
SX 5261 5535

A second approximately square feature c.2m x 2m is located adjacent to the feature discussed above on the north side of the South Drive opposite a footpath into The Dell. The feature has no obvious built form discernible however blocks of concrete and brick were observed on its surface. The vegetation cover of this area meant that no further features could be determined. It could be created as a result of widening of the driveway or possibly creating a lay-by (although this area is not presently a lay-by) and material may have been dumped in this area. This feature could relate to military use of the estate during World War Two.



FIGURE 32: BLOCKS OF CONCRETE AND BRICK WERE OBSERVED AMONG THE VEGETATION ON THE SURFACE OF THE TWO POSSIBLE FEATURES OPPOSITE THE PATH INTO THE DELL.

6. Two possible rectangular features cut into the slope on the northern side of the South Driveway SX 5270 5532

Two rectangular features were observed cut into the slope to the north of the south drive. Features can just be distinguished on LiDAR Imagery in this area. The western rectangular cut feature measures c.3m x2m x0.5m deep at the north eastern end while the eastern feature measures c.3m x 2m x 0.2m. These features could relate to military use of the estate during World War Two.



FIGURE 33: TWO RECTANGULAR CUT PLATFORMS TO THE NORTH OF THE SOUTH DRIVE. INDICATED BY ARROWS. FROM THE EAST

7. A further possible rectangular feature cut into the slope on the northern side of the South Driveway

SX 5269 5531

A further rectangular feature was observed cut into the slope to the north of the south drive, to the south of the features recorded above. The feature measures c.2m x1m x0.2m deep at the north eastern end. This feature could relate to military use of the estate during World War Two.



FIGURE 34: POSSIBLE RECTANGULAR CUT PLATFORM TO THE NORTH OF THE SOUTH DRIVE. INDICATED BY ARROW. FROM THE EAST

8. Possible bank with hollow to east

SX 5274 5525

A low section of bank c. 2m x 0.5m x 0.5m high was identified with a slight hollow to its east. This feature lies in an area of felled trees and other dense vegetation so identification on any further features was not possible.



FIGURE 35: SHORT SECTION OF EARTH BANK WITH SLIGHT HOLLOW TO THE EAST. THE FEATURE WHICH APPEARS TO BE A RETURN OF THE BANK AT A RIGHT ANGLE ON THE RIGHT HAND SIDE OF THE IMAGE IS AN IVY COVERED FALLEN TREE; FROM THE NORTH EAST.

9. Two possible platform areas cut into slope to the north of South Drive

SX 5277 5517

Two platform like areas are located either side of a path from the woodland onto the South Drive. They appear to be cut into slope and have a short area of bank above but may be one feature cut into two by the narrow pathway through. The western area measures c.3-4m x 3-4m x 0.5m while the eastern area is c.3m x 2m x 0.5m. They are covered with ivy and other vegetation.



FIGURE 36: TWO PLATFORM LIKE AREAS TO THE NORTH OF THE SOUTH DIVE, BISECTED BY A PATH. FROM THE SOUTH



FIGURE 37: A SHORT SECTION OF BANK AT THE POINT AT WHICH THE PATH TOWARDS THE SOUTH DRIVE CUTS DOWN TO THE SOUTH FROM THE PATH THROUGH THE WOODLAND.

10. Slight rectilinear depression cut through by path

SX 5281 5506

An approximately rectangular shaped slight depression oriented north-south is cut through by a path running east west to join the road at South Drive. The depression is c. 3m x 1.5m and the path clearly drops down into it and back upwards on the other side.



FIGURE 38: SLIGHT RECTILINEAR DEPRESSION BISECTED BY PATHWAY; FROM THE NORTH WEST

11. Short section of concrete road and concrete platform

SX 5289 5491

A short section of tarmac covered concrete road terminating in a concrete platform is located just to the north north west of Stag Lodge. The road is now entirely covered with vegetation. The platform appears to have previously had a brick structure built on it as a small number of red bricks are still visible set into the edges of the platform. The platform measures c. 3m x 5m. Teasdale (2017) notes that pig houses were previously located to the west of Stag Lodge but does not state where exactly or at what date. This feature lies almost north of Stag Lodge, with access of South Drive so while it could have been pig houses it may also relate to military use of the estate during World War Two.



FIGURE 39: TARMAC COVERED CONCRETE ROADWAY NOW ALMOST ENTIRELY COVERED WITH VEGETATION, LEADING OFF SOUTH DRIVE; FROM THE NORTH.



FIGURE 40: CONCRETE PLATFORM WITH 1 BRICK HIGH SURVIVING EDGING IN SOME AREAS; FROM THE EAST

12. Possible curved platform cut into slope in The Dell

SX 5258 5533

A curved flat platform area c. 6m in diameter appears to have been cut into the slope close to the north western side of The Dell. It is partially covered in fallen/cut timber. This feature is reminiscent of charcoal burning platforms however it is located close to what appears to be a pathway used to access The Dell and may be a more recent feature, possibly associated with woodland/estate management.



FIGURE 41: POSSIBLE CURVED PLATFORM WITH FELLED TIMBER ON EASTERN END; FROM THE SOUTH WEST.

13. Rectangular spread of stone with occasional brick at the north-west end of The Dell

SX 5262 5532

An approximately rectangular area at the between the South Drive and two pathways into The Dell appears to be covered with a rough spread of stone and occasional brick. There appears to be no built form but this could be a dump of material.



FIGURE 42: APPROXIMATELY RECTANGULAR AREA OF STONE WITH OCCASIONAL BRICK; FROM THE NORTH

14. Fenced off cut feature in The Dell

SX 5256 5532

An approximately 1.5m square cut feature c.0.2m deep located along the western boundary of The Dell. It has been fenced off with a modern timber post and rail fence. There is possible animal burrowing activity in the north east corner of the feature.



FIGURE 43: FENCED OFF CUT FEATURE CLOSE TO THE WESTERN BOUNDARY OF THE DELL; FROM THE NORTH.

15. Fenced off cut feature in The Dell

SX 5258 5529

A rectangular cut feature c.2.5m x 0.7m x c.0.5m deep located along the western boundary of The Dell. It has been fenced off with a modern timber post and rail fence. These fenced off features may relate to military use of the estate during World War Two and may be the 'foxholes or dug-outs' referred to by Teasdale (2017).



FIGURE 44: FENCED OFF CUT FEATURE ALONG WESTERN BOUNDARY OF THE DELL; FROM THE EAST

16. Fenced off cut feature in The Dell

SX 5262 5525

A rectangular cut feature c.5m x 2m is located to the west of the main path through The Dell. It has been fenced off with a modern timber post and rail fence. It is covered with dense vegetation, mainly brambles which prohibit a clear view of the feature however it appears deeper at its south eastern end. These fenced off features may relate to military use of the estate during World War Two and may be the 'foxholes or dug-outs' referred to by Teasdale (2017).



FIGURE 45: FENCED OFF CUT FEATURE TO THE WEST OF THE MAIN PATH THROUGH THE DELL; FROM THE SOUTH

17. Fenced off cut feature in The Dell

SX 5260 5522

A steep sided rectangular cut feature c.2.5m x 1m x 1.5m deep is located close to the convergence of two pathways through The Dell. It has been fenced off with a modern timber post and rail fence. It is located between two trees with mounds of soil located to the south of the cut feature. These fenced off features may relate to military use of the estate during World War Two and may be the 'foxholes or dug-outs' referred to by Teasdale (2017).



FIGURE 46: STEEP SIDED CUT FEATURE LOCATED BETWEEN TWO TREES IN THE DELL; FROM THE SOUTH.

18. Fenced off cut feature in The Dell

SX 5258 5520

A rectangular cut feature c.3m x 1m x 1m deep is located to the west of a pathway through The Dell. It has been fenced off with a modern timber post and rail fence. These fenced off features may relate to military use of the estate during World War Two and may be the 'foxholes or dug-outs' referred to by Teasdale (2017).



FIGURE 47: FENCED OFF CUT FEATURE TO THE WEST OF THE PATH THROUGH THE DELL; FROM THE SOUTH EAST

19. Possible curved platform south of South Drive at the head of The Dell.

SX 5266 5530

A curved flat area appears to have been created at the head of The Dell, looking down the valley, just off the South Drive. It is unclear whether this dates to the creation of the valley garden or is a more modern feature.



FIGURE 48: POSSIBLE CURVED PLATFORM AT THE HEAD OF THE DELL; FROM THE WEST

20. Platform located above ponds in The Dell

SX 5266 5528

A slight platform c. 2m x 1.5m appears to have been created in the slope in the side of the valley, with views looking down to the ponds below and further down the valley.



FIGURE 49: PLATFORM OVERLOOKING THE PONDS AT THE TOP OF THE DELL WITH VIEWS DOWN THE VALLEY; FROM THE NORTH

21. Possible slight rectangular platform located above ponds in The Dell

SX 5269 5528

A slight platform c. 1.5m x 4m appears to have been created in the slope in the head of the valley, with views looking down to the ponds below and further down the valley.



FIGURE 50: POSSIBLE PLATFORM AT THE HEAD OF THE DELL WITH VIEWS DOWN THE VALLEY; FROM THE WEST

22. Curved stone wall with circular stone built feature

SX 5267 5527

A curved stone wall is built into the side of the valley close to the head of The Dell. A circular stone built feature or plinth is located within it. The stone work appears to be in good condition and this feature does not appear to be shown on Ordnance Survey maps. It is therefore possible that this is a modern construction, perhaps dating from the early 2000s when it is recorded that the National Trust undertook unspecified works to the ponds at The Dell (Teasdale 2017), or it could be an older feature which has been restored. It is unclear whether the circular plinth in the centre is intended to be a base for something or is the feature in its own right.



FIGURE 51: CURVED CIRCULAR STONE WALL WITH STONE BUILT FEATURE IN THE CENTRE; FROM THE SOUTH

23. Section of boundary forming historic extent of Bickham Farmstead

SX 5244 5506

A section of stone faced boundary bank shown on Ordnance Survey First Edition mapping as part of the historic extent of Bickham farmstead is extant but covered in vegetation on the eastern side of the stream at the bottom of The Dell.

24. Section of boundary forming historic extent of Bickham Farmstead

SX 5241 5505

A U shaped section of stone faced boundary bank shown on Ordnance Survey First Edition mapping as part of the historic extent of Bickham farmstead is extant but covered in vegetation on the eastern side of the stream at the bottom of The Dell.



FIGURE 52: U SHAPED SECTION OF BOUNDARY EAST OF BICKHAM SHOWN ON HISTORIC MAPPING; FROM THE NORTH

25. Path repairs along the main path through The Dell

SX 5240 5505

Presumed path repairs along the section of path through The Dell opposite Bickham farmstead appear to have utilised some materials which stand out against the vernacular (compacted earth path). There include a cast concrete floor tile, roof tiles and a section of brick and concrete used in path edging. It is assumed that these materials have been added since the National Trust ownership of this part of the estate as part of a path repair as it only occurs in this area however it is unclear if there is a reason for this.



FIGURE 53: RANDOM CAST CONCRETE FLOOR TILE AND BRICKS ERODING FROM PATH EDGING.



FIGURE 54: OCCASIONAL ROOF TILES APPEAR TO HAVE BEEN BUILT INTO THE PATH SURFACE

26. Possible sections of boundary or wall (marking the northern extent of Bickham Farmstead)

SX 5245 5503

Three possible sections of surviving boundary to the north of Bickham appear to align with boundaries marking the northern area of the farmstead on the Ordnance Survey First Edition map. These walls were no longer marked by the 1933 Ordnance Survey map.



FIGURE 55: REMAINS OF TWO PARALLEL BOUNDARIES, THE ONE ON THE RIGHT ONLY VERY SLIGHT, SHOWN ON OS 1ST EDITION MAP; FROM THE NORTH.



FIGURE 56: REMAINS OF BOUNDARY RUNNING EAST WEST TO THE STREAM AT THE BOTTOM OF THE DELL, SHOWN ON OS 1ST EDITION; FROM THE SOUTH.

5.1.1 THE DELL PONDS

The ponds located within The Dell have been assessed as part of this survey. As discussed above there is no map which definitively shows the ponds within The Dell at any date however there are indications of the existence of at least one from the early 19th century. In their 1999 report Nicholas Pearson Associates noted three ponds within The Dell. Teasdale (2017) mentions a number of ponds without specifying how many, but does note that ‘It is understood that they may have been modified in the early 2000s, when some work was carried out by the NT in an effort to restore the area.’ It is unclear what work the National Trust undertook in the early 2000s or whether this may have extended to the construction of additional ponds as this survey recorded five ponds within The Dell, two more than noted by Nicholas Pearson Associates in 1999 (although it is possible vegetation cover could have prohibited their identification of all of the ponds). In order to compile a valid timeline for the construction of ponds within The Dell, it is essential to confirm, possibly through conversations with staff or ex-staff who worked on The Dell in the early 2000s exactly what works were undertaken. A sketch plan of the current ponds was made to aid identification of each pond discussed below (Figure 56). Owing to the extensive vegetation around the ponds this plan is not to scale and should be used for identification purposes only. Recommendations for further works in this area can be found in Section 8.

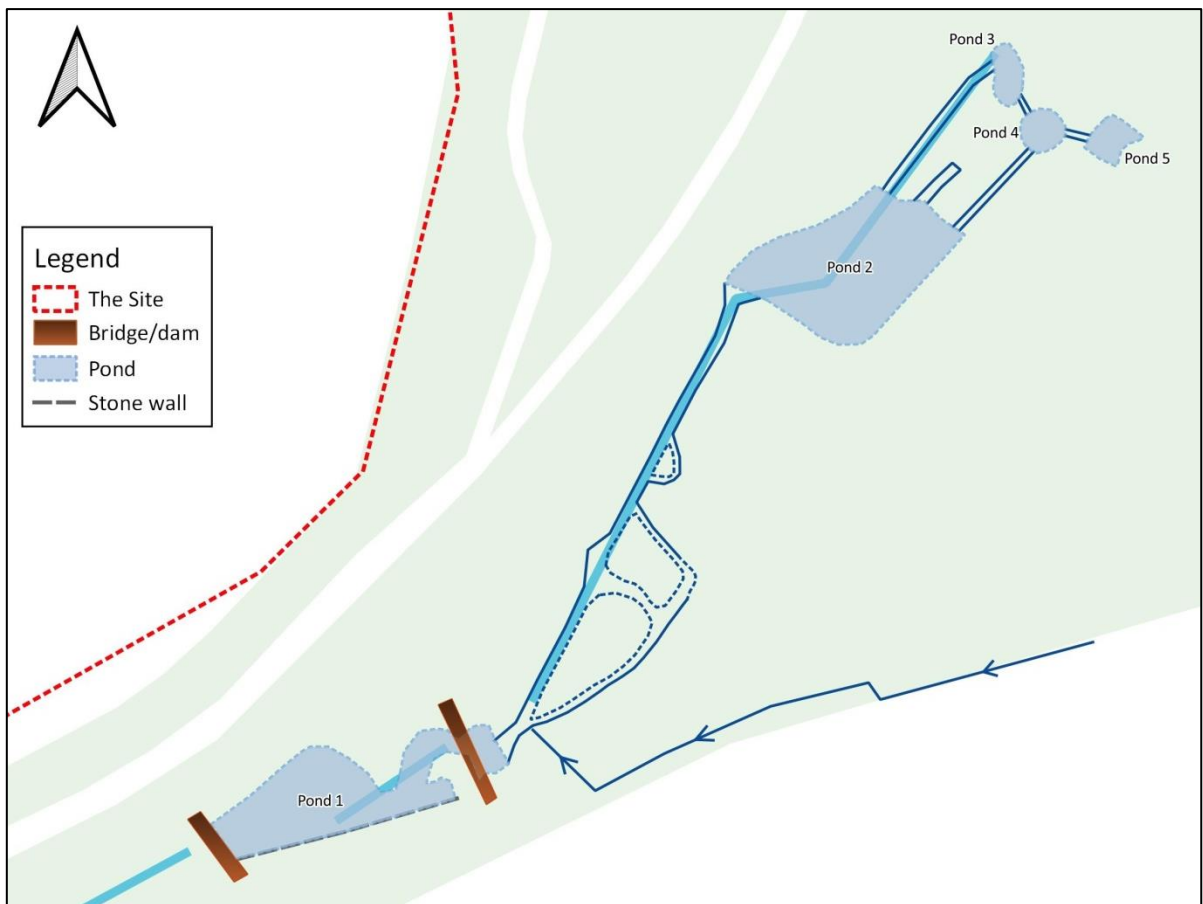


FIGURE 57: SKETCH PLAN OF PONDS IN THE DELL. FOR IDENTIFICATION PURPOSES ONLY: NOT TO SCALE.

27. Pond located within The Dell (Pond 5)

SX 5269 5525

An approximately rectangular pond appearing to hold water located to the east of the other ponds in the chain. It appears to be cut in to the valley slope on its north western side but the north eastern side is jagged and has possibly collapsed slightly. Water appears to flow between pond 5 and pond 4 under a path which contains the only apparent built element of this pond.



FIGURE 58: POND 5; FROM THE SOUTH

28. Pond located within The Dell (Pond 4)

SX 5269 5525

An approximately circular pond, holding water and located to the south west of pond 5. It is surrounded by dense vegetation so its exact form is difficult to discern although it does not appear to have any built structure. Water appears to flow into pond 4 from a channel from pond 3 and from pond 5. It then appears to flow south down a channel towards pond 2.



FIGURE 59: POND 4; FROM THE EAST

29. Pond located within The Dell (Pond 3)

SX 5268 5525

An approximately oval shaped pond, holding water and located to the north east of pond 4. It is surrounded by vegetation so its exact form is difficult to discern although it does not appear to have any built structure. Water appears to flow between pond 3 and 4 in a short channel and from pond 3 southwards through a channel towards pond 2.



FIGURE 60: POND 3; FROM THE WEST

30. Pond located within The Dell (Pond 2)

SX 5265 5522

Pond 2 is a much larger pond located downstream of ponds 3-5. It is surrounded by vegetation so its exact form is difficult to discern although it does not appear to have any built structure. It is filled with water which appears to be quite deep. A largely earth dam/bridge is located across the southern end of the pond. Water flows out of a stone built channel through the dam and cascades over a projecting piece of slate before continuing downstream towards pond 1. A modern tourist statue labelled 'Lourdes' had been placed in the outfall from pond 2, observed on the second site visit but not the first, suggesting the significance of this site to visitors.



FIGURE 61: POND 2; FROM THE SOUTH



FIGURE 62: DAM/BRIDGE AT THE SOUTHERN END OF POND 2; FROM THE WEST



FIGURE 63: MODERN TOURIST STATUE FROM LOURDES PLACED IN THE OUTFALL OF POND 2.

31. Wooden bridge and part of a bank located to the north of Pond 1 in The Dell

SX 5258 5514

A wooden bridge and part of a bank are located at the northern end of pond 1. The wooden bridge is evidently a modern replacement but is aligned with a section of bank which is shown on the Ordnance Survey First Edition map as the northern edge of pond 1.



FIGURE 64: WOODEN BRIDGE ALIGNED WITH THE NORTHERN END OF POND 1 AS SHOWN ON THE OS 1ST EDITION MAP; FROM THE SOUTH.

32. Possible fragment of wall or bank

SX 5257 5515

A small section of possible wall is located within a thicket of bamboo on the western side of pond 1. It consists of a slight bank seemingly with a number of stones set on edge running along its length. It appears to align with an area of wall or boundary shown on the Ordnance Survey First Edition map.



FIGURE 65: POSSIBLE SECTION OF BANK OR WALL LOCATED TO THE WEST OF POND 1; FROM THE SOUTH

33. Pond located within The Dell (Pond 1)

SX 5255 5513

Pond 1 is a large pond, the most southerly of the chain of ponds and the only one which appears likely to predate the Victorian valley garden located in The Dell/Happy Valley. Only the eastern side of the pond appears to consist of a stone built wall, with the remaining sections seeming to have no built form. The built wall on the eastern side starts at SX 5258 5513. A stone and earth dam at the southern end of the pond has a stone built channel to allow the water to continue south along the stream channel, through the fields of Bickham farmstead. The pond has either been shortened or holds less water than when originally constructed as instead of being the roughly rectangular shape shown on the Ordnance Survey First Edition map it curves in on its western side creating a funnel shape before curving outwards again to the point where it is crossed by the wooden bridge discussed above which marks its original northern edge.



FIGURE 66: POND 1; FROM THE SOUTH.



FIGURE 67: LOOKING DOWN THE HISTORIC EXTENT OF POND 1 AS SHOWN ON THE OS 1ST EDITION MAP FROM THE NORTH. THE POND HOLDS WATER IN ITS SOUTHERN AREA BUT APPEARS TO HAVE EITHER BEEN REDUCED IN SIZE OR HOLD LESS WATER THAN PREVIOUSLY DUE TO THE VEGETATION GROWTH IN THE NORTHERN AREA OF THE POND.

5.2 BARN PARK

Barn Park is currently under grass pasture and is seasonally grazed by cattle. No cattle were present during the walkover survey and the grass was approximately ankle height. Four possible archaeological features were recorded within Barn Park. These are:

34. Bickham Clump

SX 5248 5498

Bickham clump consists of a tree mound probably planted between the Parkers acquisition of Bickham farmstead in the early 19th century and the mid-19th century. It is fenced with modern timber and mesh fencing topped with barbed wire. Large modern concrete drinking troughs have been placed against the east and west sides of the fenced rectangle.



FIGURE 68: PHOTOGRAPH OF BICKHAM CLUMP, FROM THE WEST.

35. Removed field boundary

SX 5282 5495

Historic maps show a field boundary in this location. LiDAR data suggests a possible trace of the boundary however under the field conditions during the walkover survey no evidence for this removed field boundary was visible.

36. Possible section of bank or fragment of a building

SX 5285 5481

This area is very overgrown and covered with fallen deadwood so the exact dimensions of the features are difficult to determine. A section of bank c.5m x 1m x 0.7m high is located in the woodland to the south west of Stag Lodge. The bank appears to contain some concrete blocks. A metal post embedded in a substantial piece of concrete lies on its side on the western side of the bank. It is unclear what this feature represents however it appears in the approximate location of possible features or structures visible on 1946 aerial photographs. It is possible it may relate to the military use of the estate during World War Two.



FIGURE 69: SECTION OF BANK OR STRUCTURE LOCATED IN WOODLANDS TO SOUTH-WEST OF STAG LODGE. FROM THE SOUTH-EAST.



FIGURE 70: DETAIL OF METAL AND CONCRETE POST LOCATED TO THE WEST OF THE BANK FEATURE, FROM THE SOUTH WEST.

37. Possible section of boundary

SX 5280 5479

The meeting of a number of field boundaries in this area has created a thin strip of enclosed ground, possibly relating to an enclosed small strip of plantation shown on historic Ordnance Survey maps. A short low section of a possible former boundary is also evident in this area, aligned approximately north-south and constructed of stone.



FIGURE 71: SHORT SECTION OF POSSIBLE STONE BOUNDARY ABUTTING A STONE FACED BOUNDARY BANK ALONG THE SOUTHERN BOUNDARY OF BARN PARK.

5.3 HIGHER ORCHARD

Higher Orchard was replanted as an orchard in the early 2000s and is seasonally grazed by sheep (Teasdale 2017). No sheep were present during the walkover survey and the grass was approximately ankle height. The abandoned farmstead of Bickham is located within Higher Orchard. Eight possible archaeological features were recorded within Barn Park.

38. Site of Bickham Farmhouse

SX 5248 5499

The site of a building, thought to be Bickham Farmhouse is just evident as an earthwork with a small area of low stone wall surviving in this location. Historic mapping suggests the building had an enclosure on the south east side, with a small square structure which originally abutted the building surviving after the farmhouse itself had apparently been demolished. The enclosure is apparent as a rectilinear shape which sits higher than the surrounding ground on its south western side.



FIGURE 72: SMALL SECTION OF SURVIVING STONE WALLING IN THE LOCATION OF BICKHAM FARMHOUSE. FROM THE NORTH.



FIGURE 73: THE ENCLOSURE WHICH SURROUNDED THE SOUTH EAST SIDE OF BICKHAM FARMHOUSE; FROM THE SOUTH.

39. Bickham Barn

SX 5247 5501

A part of Bickham Barn is still standing although historic mapping shows that the eastern end has been truncated. A new access appears to have been formed at first floor level on this elevation with a raised platform indicating the area which the building previously occupied. The barn is built into a bank on its rear (northern) elevation. The barn is currently roofless and in very poor condition with the front (south) elevation appearing to part company from the western gable

elevation. If the current extent of the standing fabric of this structure is to be conserved, urgent remedial works are likely to be required.



FIGURE 74: THE SETTING OF BICKHAM BARN SHOWING THE EXTENT OF THE SURVIVING FABRIC; FROM THE SOUTH WEST.



FIGURE 75: BICKHAM BARN SHOWING THE FRONT (SOUTH) ELEVATION PARTING FROM THE WESTERN ELEVATION.



FIGURE 76: THE INSIDE OF BICKHAM BARN; FROM THE NORTH EAST



FIGURE 77: THE TRUNCATED EASTERN END OF BICKHAM BARN SHOWING THE CONTINUING STONEMWORK OF THE FORMER EXTENT OF THE STRUCTURE, FROM THE SOUTH-EAST.

40. Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map SX 5245 5501

Part of a boundary at Bickham farmstead shown on the Ordnance Survey First Edition map survives as a low earthwork. The boundary extends south from the surviving stone faced boundary wall and has a tree growing upon it.



FIGURE 78: BOUNDARY SHOWN ON 1ST EDITION OS MAP SURVIVES AS A LOW EARTHWORK TOPPED WITH A TREE.

41. Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map SX 5244 5502

Part of a boundary at Bickham farmstead shown on the Ordnance Survey First Edition map survives as a low earthwork. The boundary extends east west parallel with the surviving stone faced boundary wall and intersects at a right angle with the boundary discussed above.



FIGURE 79: BOUNDARY SHOWN ON 1ST EDITION OS MAP SURVIVES AS A LOW EARTHWORK PARALLEL WITH THE STONE FACED BOUNDARY BANK.

42. Surviving part of boundary at Bickham farmstead shown on Ordnance Survey First Edition Map SX 5245 5502

Part of a boundary at Bickham farmstead shown on the Ordnance Survey First Edition map survives as a short low earthwork with visible stone work construction in places . It appears to turn a right angle to the west at its northern end, adjacent to or intersecting with the standing stone faced boundary bank.



FIGURE 80: PROBABLE PART OF A BOUNDARY SHOWN ON THE OS 1ST EDITION MAP WITH SMALL AREAS OF STONE CONSTRUCTION JUST VISIBLE.

43. Surviving section of boundary wall shown on Ordnance Survey First Edition map SX 5245 5502

A section of boundary wall shown on Ordnance Survey First Edition mapping is still visible along the northern side of Bickham Farmstead. The wall stands to c.1m in height and is of stone construction. It extends from close to the stream eastwards to Bickham Barn before continuing eastwards. It has been breached to the east of Bickham Barn to create a gateway which is not shown on the Ordnance Survey First Edition map.

44. Mound in the north west of Higher Orchard SX 5242 5503

A vegetation covered mound c.2m in diameter containing visible stone is located in the north western area of Higher Orchard. It is unclear whether a structure is shown in this location on the Ordnance Survey First Edition map or whether it is a function of the vegetation shading however it appears to be the meeting point of a number of boundaries shown on that map. There is no structure shown on subsequent historic mapping.



FIGURE 81: VEGETATION COVERED MOUND IN THE NORTH WESTERN AREA OF HIGHER ORCHARD; FROM THE EAST.

45. Small mound along the boundary between Higher Orchard and The Dell

SX 5243 5503

A small, vegetation covered mound c.1.5m diameter is located along the boundary between Higher Orchard and The Dell, close to the stream which runs through the valley. It is possible this represents the former extension of the stone boundary wall down to the stream.



FIGURE 82: SMALL MOUND LOCATED ALONGSIDE THE BOUNDARY BETWEEN HIGHER ORCHARD AND THE DELL.

5.4 HIGHER MEADOW

Higher Meadow is currently largely under grass pasture with a wooded area along the north and east sides. No livestock were present during the walkover survey and the grass was approximately ankle height. No archaeological features were recorded within Higher Meadow.

5.5 LOWER MEADOW

Lower Meadow is currently under grass pasture with some scrubby areas on its southern slopes. No livestock were present during the walkover survey and the grass was below ankle height. No archaeological features were recorded within Lower Meadow.

5.6 LOWER ORCHARD

Lower Orchard is currently largely under grass pasture with some trees and scrub, particularly on its southern slopes. No livestock were present during the walkover survey and the grass was approximately ankle height. Three possible archaeological features were recorded within Lower Orchard.

46. Lynchets or cultivation terraces

SX 5228 5491

Slight terraces c.2-3m wide are visible on slopes at the south eastern end of Lower Orchard. This terracing is evident on 1946 aerial photographs and appears to have run the entire length of the southern half of Lower Orchard at this date. The trees growing along these terraces appear to be aligned with each other in the down slope direction. The terraces are slight but emphasised by scrub growth on their downslope sides.



FIGURE 83: TERRACING IN LOWER ORCHARD, PARTICULARLY VISIBLE AT THE SOUTH EASTERN END. FROM THE WEST.



FIGURE 84: TERRACING IN LOWER ORCHARD, PARTICULARLY VISIBLE AT THE SOUTH EASTERN END. FROM THE EAST.

47. Concrete blocks and bridge lintels crossing the stream at the eastern end of Lower Orchard
SX 5230 5495

Long concrete blocks have been placed on the southern side of the stream at the eastern end of Lower Orchard where the ground is particularly wet. A bridge crossing the stream appears to have been reinforced with concrete lintels.

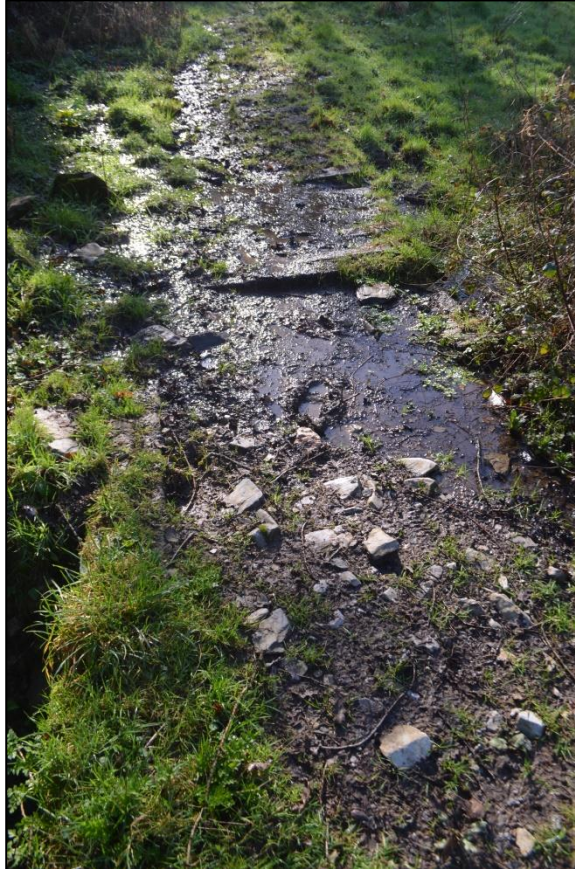


FIGURE 85: CONCRETE BLOCKS PLACED ON THE SOUTHERN SIDE OF THE STREAM IN LOWER ORCHARD WITH CONCRETE LINTELS TO SUPPORT A BRIDGE OVER THE STREAM.

48. Stones alongside stream in Lower Orchard
SX 5227 5495

A number of stones appear to have been exposed alongside the stream in Lower Orchard; one has a circle painted on it. The stones appear to be spaced at relatively regular intervals however it is unclear whether this is natural or archaeological; it may be a feature of erosion from livestock accessing the watercourse although it does not appear to have occurred in the adjacent field.



FIGURE 86: LINE OF EXPOSED STONES ON THE SOUTHERN SIDE OF THE STREAM IN LOWER ORCHARD. FROM THE NORTH.



FIGURE 87: EXPOSED STONE ON THE NORTHERN SIDE OF THE STREAM WITH PAINTED CIRCLE. FROM THE NORTH.

5.7 SELLAR ACRES PLANTATION

Sellar Acres Plantation is currently a wood with areas of brambles. The original full extent of Sellar Acres Plantation has been truncated by the Chelston Meadow landfill site. Five possible archaeological features were recorded within Sellar Acres Plantation.

49. Short section of pathway in Sellar Acres Plantation

SX 5201 5488

A short section of path leads off to the west from the path through Sellar Acres Plantation, terminating in dense vegetation close to the stream which runs along the northern boundary of the plantation. This appears to be part of the original pathway which ran at right angles through Sellar Acres, meeting in the centre. It is now very overgrown with brambles and a large tree limb appears to have either fallen or been left on it, further obscuring it.



FIGURE 88: PART OF THE PATHWAY THROUGH SELLAR ACRES, NOW TRUNCATED AND OVERGROWN. FROM THE EAST.

50. Section of pathway running north west-south east in Sellar Acres Plantation

SX 5206 5487

A short section of pathway leads to the top of the original extent of the Sellar Acres Plantation at a 45 degree angle to the original path which ran through the centre but has been truncated. This path does not appear on any Ordnance Survey mapping and appears to have been cut into the slope on one side but does not have any built form.



FIGURE 89: PATHWAY, POSSIBLY RELATIVELY MODERN LEADING UPHILL FROM THE ORIGINAL MARKED PATHWAY THROUGH SELLAR ACRES AT A 45 DEGREE ANGLE.

51. Possible historic quarrying

SX 5219 5490

It is possible that the slopes in this area of Sellar Acres may have been subject to historic quarrying as ground appears to slope more steeply than the surrounding areas however as it is densely covered with brambles and scrub it is difficult to see the ground surface and it is therefore possible that this change in slope is geological or is the result of a landslip.



FIGURE 90: POSSIBLE QUARRYING AT THE EASTERN END OF SELLAR ACRES PLANTATION. FROM THE NORTH.

52. Stone Faced boundary with culvert to allow stream to pass under

SX 5213 5494

A stone faced boundary which crosses over the course of a stream appears to have a modern half pipe inserted to enable the stream to pass underneath. It is probable this dates to the change to the stream's to permit the development of the Chelston Meadows landfill site.



FIGURE 91: STONE FACED BOUNDARY BANK WITH HALF PIPE INSERTED TO ALLOW STREAM TO PASS UNDER. FROM THE WEST.

53. Stream culverted under boundary between Sellar Acres Plantation and Lower Orchard
SX 5218 5494

The historic course of the stream appears to take it underneath the boundary bank between Lower Orchard and Sellar Acres Plantation. The culvert appears to be of stone rubble construction and is covered with moss and vegetation.



FIGURE 92: THE HISTORIC COURSE OF THE STREAM TAKES IT THROUGH THE BOUNDARY BETWEEN SELLAR ACRES PLANTATION AND LOWER ORCHARD, FROM THE WEST.

5.8 SELLAR ACRES

Sellar Acres is currently under grass pasture. No livestock were present during the walkover survey and the grass was approximately ankle height. Two possible archaeological features were identified within Sellar Acres.

54. Possible linears within Sellar Acres

SX 5233 5481 and SX 5221 5477

Two linear features were identified on LiDAR imagery of Sellar Acres running east west. These appeared to form possible 'strips' but there is no evidence on historic mapping of strip fields in this area and walkover survey suggested that these linears were aligned on gateways into Sellar Acres. There was no observable evidence of them being related to an earlier field system however the height of the grass sward combined with previous intensive arable cultivation of this field would make the detection of any earlier field system on the ground to be highly unlikely.

5.9 QUAY FIELD

Quay Field is currently largely under grass pasture with an area of woodland on the western side of the field. No livestock were present during the walkover survey and the grass was approximately ankle height. A pylon line crosses the field west to east. Three possible archaeological features were identified within Quay Field.

55. Possible linears within Quay Field

SX 5194 5478 and SX 5203 5474

Two linear features were identified on LiDAR imagery in Quay Field running approximately north-south. Walkover survey identified these as depressions made by vehicles moving between the gateways into Quay Field and Sellar Acres Plantation.

56. Water filled feature, possible former quarry

SX 5190 5476

A water filled feature of uncertain depth c.3m x 2.5m is located at the western end of Quay Field. It is possible this feature may represent a former small quarry however the recorded use of this field as an illegal traveller site for approximately 20 years may indicate alternative possible interpretations of this feature and a discussion with a National Trust employee or tenant familiar with the site prior to the 1980s may assist with further interpretation.

5.10 WIXENFORD BRAKE

Wixenford Brake comprises two areas of woodland, a larger area to the east, shown on the 1784-6 Ordnance Survey map and a smaller area to the west, first shown on the Tithe map. Both are enclosed by substantial stone faced banks, in generally good condition. Modern timber and wire fences have additionally been added around Wixenford Brake to allow cattle grazing within the fields which surround the plantations. A wide access between Sellar Acres and Great Down separates the two areas of Wixenford Brake. Three possible archaeological features were identified in Wixenford Brake, all within the eastern section of the plantation.



FIGURE 93: STONE FACED BANK WITH MODERN FENCING ON THE EASTERN END OF THE WESTERN SECTION OF WIXENFORD BRAKE. FROM THE EAST.

57. Pathway or Gully in Wixenford Brake

SX 5234 5475

A slight linear pathway or gully c. 20m in length is visible at the western end of the eastern section of the Wixenford Brake plantation. It aligns approximately east-west and seems to be in a similar location to a pathway through the plantation shown on the 1933 Ordnance Survey map. It appears that water now runs along this feature, which emphasises this part of it. It is likely this section is a remnant of the pathway shown on the historic Ordnance Survey map. It does not appear to have any evident built form.

58. Possible rectangular structure against stone faced bank in Wixenford Brake

SX 5253 5474

A possible rectangular structure abuts the western side of the stone faced bank at the eastern end of Wixenford Brake. It appears to consist of earth banks c.5m x 2.5m x 1m in height with a rectangular depression in the centre. It is unclear what this represents as there are no structures or buildings shown on historic mapping in this location.



FIGURE 94: POSSIBLE STRUCTURE AT EASTERN END OF WIXENFORD BRAKE; FROM THE SOUTH.



FIGURE 95: POSSIBLE STRUCTURE AT EASTERN END OF WIXENFORD BRAKE; FROM THE WEST.

59. Hollow with bank on one side at the eastern end of Wixenford Brake

SX 5249 5472

An approximately square depression c.2m square is located towards the eastern end of the eastern Wixenford Brake plantation. There appears to be a slight bank on the eastern side of the hollow, which itself is filled with water. It is possible that this feature could be natural in origin (e.g. eroded tree throw) however its seemingly square shape suggests it could be archaeological and of unknown date/function. 'Dug out' features relating to the US military occupation of the site during World War Two have been noted on the estate however although this feature appears potentially similar in form to a 'dug out/foxhole' it appears to be the only feature with this form within Wixenford Brake.



FIGURE 96: APPROXIMATELY SQUARE HOLLOW AT THE EASTERN END OF WIXENFORD BRAKE, WITH SLIGHT BANK ON THE EASTERN SIDE; FROM THE NORTH.

5.11 GREAT DOWN

Great Down is currently largely under grass pasture with fenced triangular areas in the north east and western corners of rough grass/vegetation. No livestock were present during the walkover survey and the grass was approximately ankle height. A gas pipeline marker was observed at the northern boundary of Great Down, close to the gateway through to Sellar Acres, against the stone faced boundary bank of the eastern section of Wixenford Brake. One possible archaeological feature was recorded within Great Down and a feature which was present on LiDAR imagery was confirmed to be an electricity pylon.

60. Possible platform shown on LiDAR imagery - location of an electricity pylon

SX 5213 5471

A possible platform shown on LiDAR imagery of the estate was confirmed by walkover survey to be the site of a modern electricity pylon situated on a flattened area of ground in the western end of the field.

61. Slight rectangular shaped depression in the south of Great Down

SX 5223 5452

LiDAR data shows a very slight anomaly close to the southern boundary of Great Down. Walkover survey confirmed a slightly waterlogged north west-south east aligned rectangular depression with a possible slight bank on its south western side. It is unclear what this feature may be; it is close to a possible structure visible on 1946 aerial photographs although it does not appear to be in the exact location or on the same orientation as that structure.



FIGURE 97: POSSIBLE RECTANGULAR SHAPED DEPRESSION IN SOUTHERN AREA OF GREAT DOWN. IT CAN JUST BE SEEN TO HOLD WATER IN THE CENTRE OF THE IMAGE; FROM THE SOUTH.

5.12 FURZE DOWN

Furze Down is currently under grass pasture. No livestock were present during the walkover survey and the grass was approximately ankle height. One possible archaeological feature was recorded within Furze Down. A naturally wet area was observed at the boundary of Furze Down and Mowhay Meadow/Part Dean. As a well is marked north of this site on historic Ordnance Survey maps it is possible this is a spring head site. These sites can be associated with prehistoric (often Mesolithic) occupation although no flint finds appear to be recorded on the Saltram Estate and none were observed during the walkover survey.

62. Circular concrete covered feature within Furze Down

SX 5245 5457

An approximately circular concrete covered feature was observed in the centre of Furze Down. This corresponds with a well-marked on the Ordnance Survey First Edition map and is therefore likely to be the capping of a well.



FIGURE 98: CONCRETE COVERED FEATURE, PRESUMED WELL CAPPING, IN FURZE DOWN

5.13 MOWHAY MEADOW/PART DEAN

Mowhay Meadow/Part Dean is currently under grass pasture. No livestock were present during the walkover survey and the grass was approximately ankle height. This field previously formed two separate fields until sometime between 1933 and the present Ordnance Survey mapping although based on 1946 aerial photographs it appears likely that the boundary between the two was removed prior to 1946. One possible archaeological feature was recorded.

63. Stoney mound covered with brambles

SX 5224 5446

A large mound up to c.1.5m in height is located in the north western corner of Mowhay Meadow/Part Dean. It appears to contain stony material but is covered in a dense thicket of brambles so nothing further about its form could be determined. It is possible this mound represents a dump of material, possibly from Wixenford Farm or removal of boundaries in this area as no structure is shown in this location on historic mapping.



FIGURE 99: MOUND CONTAINING STONY MATERIAL, COVERED IN BRAMBLES, IN THE NORTH WEST OF MOWHAY MEADOW. FROM THE EAST.

5.14 SHILLA FURZE

Shilla Furze is currently largely under grass pasture. No livestock were present during the walkover survey and the grass was approximately ankle height. No archaeological features were recorded within Shilla Furze.

5.15 NEW PARK

Shilla Furze is currently largely under grass pasture, with an area of woodland along the northern boundary which was created between 1946 and the 1980s. A fenced triangular area of rough grass/vegetation is located in the north western corner, against the woodland. No livestock were present during the walkover survey and the grass was approximately ankle height. No archaeological features were recorded within New Park, but the historic stone faced boundary bank with Lower Hay Down appeared to have been patched with an assortment of non-traditional materials.

64. Presumed repairs to boundary bank

SX 5274 5478

Presumed repairs to the stone faced boundary bank in this area appear to have utilised a range of non-traditional materials including brick and concrete, most of which appears to have failed and is collapsing.



FIGURE 100: BOUNDARY BANK ON NORTHERN EDGE OF NEW PARK, FROM THE NORTH.



FIGURE 101: BOUNDARY BANK ON NORTHERN EDGE WITH MATERIALS FALLING OUT OF THE BOUNDARY, FROM THE NORTH.

5.16 LOWER HAY DOWN

Lower Hay Down is currently largely under grass pasture with a wooded area in the north western corner. No livestock were present during the walkover survey and the grass was approximately ankle height. No archaeological features were recorded within Lower Hay Down.

5.17 BOUNDARY TYPE

The character of boundaries between the plots comprising the survey area was assessed (Figure 102). The form of the historic boundaries across the survey area i.e. those which have changed little since the tithe map were predominantly stone faced banks assessed as in generally good condition. The modern boundaries within the survey area are post and wire fencing.

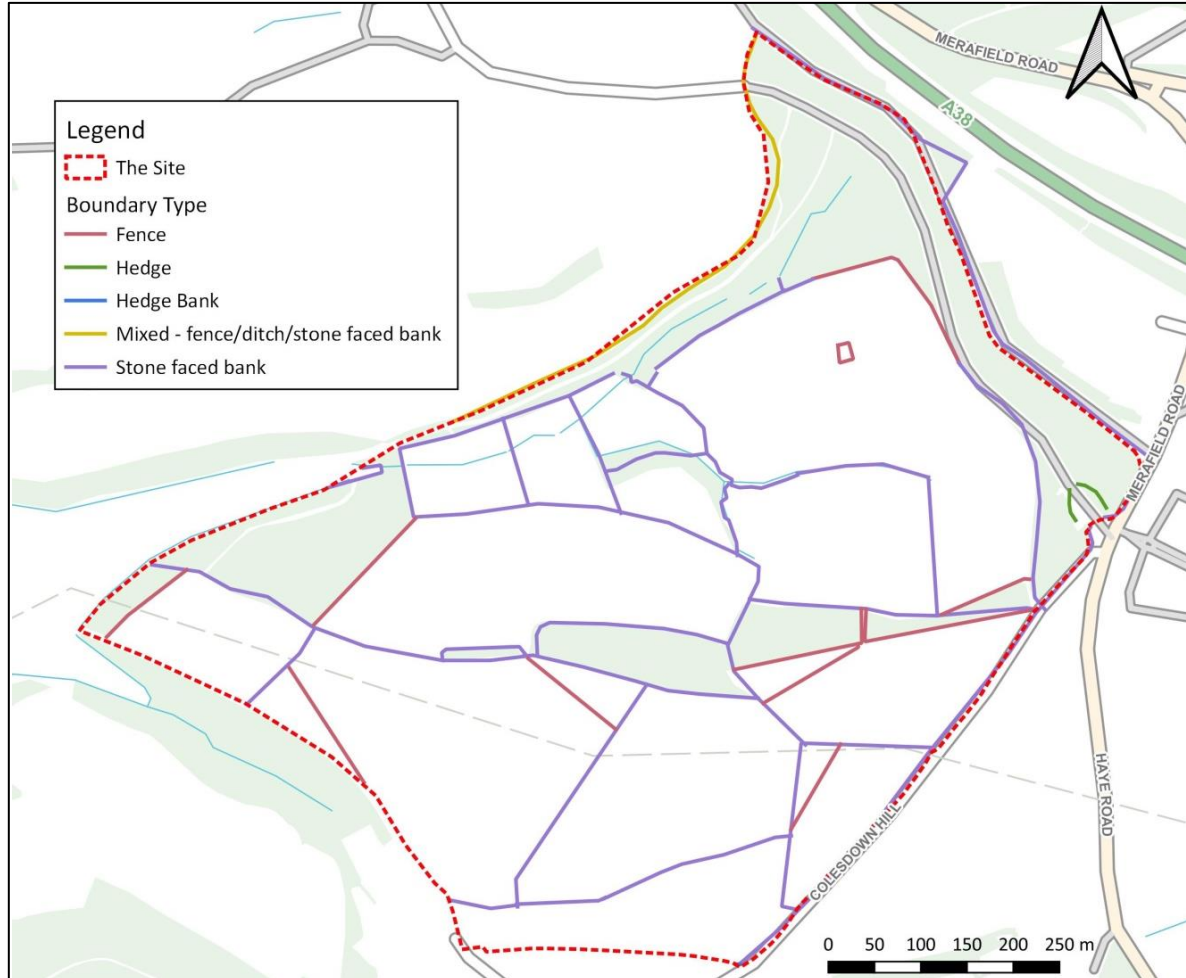


FIGURE 102: ASSESSMENT OF BOUNDARIES WITHIN THE SURVEY AREA BY TYPE. ORDNANCE SURVEY MAPPING PROVIDED BY THE NATIONAL TRUST © CROWN COPYRIGHT AND DATABASE RIGHTS 2021 ORDNANCE SURVEY 0100031673.

5.18 SUMMARY

In total 64 features were identified within the survey area although some were determined to be non-archaeological in origin. It is likely that the majority of the features date to the post medieval period, with some more modern features associated with the military occupation of the estate during World War Two. It is possible some of the features relating to field systems have earlier, medieval origins however the regime of arable production across most of the agricultural fields within the survey area until relatively recently appears to have effaced any certain traces of earlier field systems. Within the other areas of the survey area the ground vegetation coverage consisted predominantly of brambles and ivy with areas of fallen deadwood. This impeded assessment of possible archaeological features with the wooded areas of the survey area and it is therefore not possible to consider this survey to have been exhaustive.

6.0 CONCLUSIONS

The land which comprises the survey area, with the exception of The Dell/Happy Valley appears to have been within the ownership of the Dukes of Bedford until the early 19th century. This land comprised the farmsteads of Bickham, Hay and Wixenford which were small tenant farms. The Saltram Estate is documented from the 13th century and although much of the survey area was not within the ownership of the estate at this date it appears that it may have been leased from the Dukes of Bedford since at least the 17th century, prior to its purchase by the Parker family.

Although no sites of Medieval or earlier date have been identified within the survey area historic mapping from the later 18th century may indicate the existence of strip fields around Bickham, suggesting it may have medieval origins, however mechanised intensive arable production in the more recent past appears to have removed any traces of Medieval farming within this area of the estate; no evidence for the former access into Bickham shown on historic mapping was evident either on LiDAR data or on the ground. The oldest plantations within the survey area appear to be The Dell and Wixenford Brake, with Barn Park Clump and a small area of planting to the south of Bickham established by the mid-19th century. By the end of the 19th century the southern extension of The Dell and the creation of the Sellar Acres plantation are evident, the latter being extended in the early 20th century. Some areas of more recent woodland are apparent within the survey area; established in the mid to late 20th century.

The development of The Dell/Happy Valley appears to have begun in the early 19th century with the establishment of 'The Belt' plantation. The South Drive was constructed in its current form and the Adam pepperpot lodges were also moved to their current site c.1824. The next intensive phase of alterations within The Dell is believed to have taken place under the ownership of Albert Parker at the end of the 19th century. His father in law was the owner of Westonbirt Arboretum and it is believed this influenced his designs and planting schemes within The Dell and Sellar Acres plantation which was also created during this period. There appear to be no surviving plans for the ponds within The Dell however it has been stated that they formed part of the late 19th century valley garden created by Albert Parker. This survey has shown that at least one of the ponds (Pond 1) was extant before this date, certainly by the 1860s when it is shown on the Ordnance Survey First Edition map although possibly prior to this as the boundary shown on the Tithe map appears to respect the feature depicted on the Ordnance Survey First Edition map. It seems likely that the history of chain of ponds within The Dell/Happy Valley is complex and they may owe their origin to incremental changes by successive owners of the estate; while the south westernmost pond does appear to have early origins, the other pond features attributed to Albert Parker could, in part at least, be far more recent features.

The field pattern across the survey area appears to have changed little since at least the 1840s, the main changes being the extension of The Dell to the south assimilating an orchard shown on the Tithe map and part of Barn Park. During the Second World War the estate was used as a temporary base for American troops, with concrete roads laid across the estate to accommodate tanks. Since the 1950s Saltram's landscape setting has been eroded by the creation of a landfill site on Chelston Meadow, screened by widening and replanting parts of the 'The Belt'; and the construction of the A38 to the east of the house through the parkland in the late 1960s and early 1970s.

A walkover survey identified 64 features within the survey area although some were determined to be non-archaeological in origin. It is likely that the majority of the features date to the post medieval period, with some more modern features associated with the military occupation of the estate during World War Two. It is possible some of the features relating to field systems have earlier, medieval origins however the regime of arable production across most of the agricultural fields within the survey area until relatively recently appears to have effaced any certain traces of

earlier field systems. Within the other areas of the survey area the ground vegetation coverage consisted predominantly of brambles and ivy with areas of fallen deadwood. This impeded assessment of possible archaeological features with the wooded areas of the survey area and it is therefore not possible to consider this survey to have been exhaustive.

7.0 STATEMENT OF SIGNIFICANCE

A number of archaeological features have been identified across the survey area. The area includes the Grade II* Listed Gate Piers at the entrance to The Dell and the Grade II Listed Stag Lodges. As Listed Buildings these sites are of National Significance and any works to these structures would need to be undertaken in consultation with Historic England and are likely to require Listed Building Consent. N.B. Although the pepperpot lodges at Stag Lodge are only Grade II Listed it is believed their Listing grade was assessed without consideration of their provenance i.e. that they were designed by Robert Adam. These structures have a greater significance as a result of their association with Adam.

The Registered Park and Garden at Saltram into which part of the survey area falls is assessed as being of Grade II* standard. It is of National Significance. The Sellar Acres Plantation falls outside the area of the Registered Park and Garden however as part of the story of the designed landscape of Saltram it should be considered to be of equal value.

The majority of features which were recorded during a walkover survey of this site are of local significance. Those which fall within the Grade II* Registered Park and Garden and have a connection to the RPG (e.g. designed landscape features, boundaries), should be considered to have the same significance as the RPG i.e. to be of National Significance.

It is recognised that the National Trust have, in conjunction with their farm tenant(s), more recently adopted a policy of moving from arable to pastoral farming within the survey area. This policy will benefit any surviving archaeological deposits in this area however it is noted that historic ploughing is likely to have removed any of the more ephemeral features within this landscape. Further recommendations are noted in Section 8.

8.0 MANAGEMENT RECOMMENDATIONS

8.1 SPECIFIC RECOMMENDATIONS

The majority of the archaeological sites discussed in this report are considered to be in a stable condition as a result of low visitor footfall on sites away from the main paths through The Dell, a shift away from arable agriculture on the farmland areas of the survey area and relatively static woodland in the remaining areas. The following are specific recommendations for the survey area:

- A barrier to the walkover survey undertaken as part of this report was the observed policy of leaving stacked cut logs, fallen deadwood etc. across the estate. Whilst it is noted that this is carried out for ecological reasons it is suggested that a brief archaeological survey of any areas which are subsequently cleared of vegetation/timber could be carried out, in case features have been missed by this survey as a result of poor ground visibility.
- A number of boundaries across the survey area were noted to have been unchanged since at least the early 19th century. Many of these comprised stone faced banks which were generally in good or acceptable condition however period condition monitoring of these features, possibly by volunteers, would enable repairs to be made in good time and prevent the potential loss of these features through neglect. This is particularly the case where new post and wire fences have been installed to enable grazing by cattle as the banks themselves are not functional as field boundaries.
- Brambles and dense vegetation were encountered across the wooded areas of the estate. Some appropriate vegetation management could be carried out, particularly on the sites within The Dell (e.g. the ponds, possible Second World War features) to enable greater visibility and interpretation and allow further information to be recorded.
- The ponds within The Dell were noted to be extensively overgrown. The Dell appears to be an area which is highly popular with visitors to the estate, particularly those with dogs. It was observed that the banks and dams of ponds 1 and 2 where they lay close to the path or had bridges crossing them were denuded of vegetation and extremely muddy. It appears that dogs frequently enter the water in these locations causing significant erosion. It is recommended that following a detailed survey (see below) that measures should be undertaken to stabilise the banks of the ponds and to prevent further erosion. If the intention is to restore the ponds within The Dell this should form part of a restoration plan with a clear focus. Given the apparent piecemeal construction (and likely alteration) of the ponds within The Dell any restoration plan would need to consider what the intention of the restoration is and whether it is possible to recreate any 'one' historic period within The Dell's history. The depth of the ponds is unclear however in places they appeared to be silty and reasonably deep. If the ponds are to be restored and access encouraged, advice on any safety implications involved should be sought.

8.2 FURTHER ARCHAEOLOGICAL WORK

This survey has identified a number of archaeological features and potential archaeological features across the survey area. Further archaeological work is recommended as follows:

The Dell/Happy Valley

- Detailed measured survey of the surviving ponds should be carried out following sufficient clearance of vegetation to permit a meaningful and accurate survey.
- Discussion with National Trust staff (past and present) and consultation of any surviving National Trust archive documents should be undertaken to establish what work was carried out to the ponds in the early 2000s and hopefully establish a more accurate timeline for the creation of each element of the pond system.
- Detailed survey of some of the features identified in this study including potential Second World War military features may assist in further determining their exact form and function. This could inform interpretation focusing on the Second World War period of the estate.

Bickham

- A detailed survey of the upstanding building remains and earthworks at Bickham should be undertaken to enable an understanding of the history and function of the farmstead. This may provide evidence for changes which took place at the farmstead following its purchase by the Saltram Estate. It may also enable a better understanding of the features which surround Bickham and its role within the Saltram Estate.
- A rapid assessment of the condition of Bickham Barn is urgently needed. This should be undertaken by a suitably qualified person and a plan either for its conservation as a structure or consolidation as a ruin should be made. A high level record of the standing fabric should be made prior to any works to the site.

Bickham Clump

- Bickham Clump has been fenced with modern post and wire fencing and two drinking troughs have been added against the fencing. This detracts from the historic tree clump and although the fencing is likely to be necessary to prevent damage by livestock any replacement of these modern features should be considered to determine whether less intrusive equipment could be utilised. The tree clump itself should be periodically monitored and repairs undertaken to its structure as necessary. Replanting of trees should also be considered as necessary to ensure that the clump survives into the future.

Documentary Research

- Due to the constraints of the Covid-19 Pandemic limited documentary research was carried out as part of this survey. Further documentary research may be able to provide greater information, in particular on the Second World War history of the estate (e.g. the National Archives at Kew; American Military Archives). The Bedford Archive could also be consulted for documents and maps relating to the farmsteads of Bickham, Hay and Wixenford prior to their purchase by the Saltram Estate.

8.3 RECOMMENDATIONS FOR FURTHER DESIGNATION

- The Adam Pepperpot lodges should be considered for upgrading of their Listing Grade from Grade II to Grade II*.

8.4 INTERPRETATION AND ACCESS

Although the land within the survey area is owned by the National Trust, only The Dell appears to have public access with clearly well used footpaths running along its length. One interpretation board was noted, on the north side of South Drive, close to the gate piers at the entrance to The Dell. Although set back slightly from the South Drive, it was none the less close to where cars passed by in order to exit the estate. The Dell and the woodland leading from it towards the Stag Lodges appears to be well visited and a conflict between pedestrians and vehicles was observed, with cars apparently keen to exit the estate and pedestrians unable to leave the roadway in some areas due to the steepness of the banks on each side. This is likely to be a particular problem for families with young children. Although there appears to be a path through the woodland from Stag Lodge to The Dell, signs were in place notifying it as closed at the time of the walkover survey due to felling work (although this did not appear to be taking place at the time of the walkover). It is possible that the road access is less of an issue when this path is open.

Some further interpretation of The Dell could perhaps be placed on the south side of the South Drive, near to where visitors access the path through The Dell. This might include details of the planting within The Dell and its history. Interpretation of this area could also be available at the main visitor reception (it is not known what interpretation is currently available due to the house being closed to visitors as a result of the Covid-19 pandemic). If further survey work and restoration of the pond features in The Dell were to take place, this could also provide opportunities for interpretation of this area of the estate.

The Sellar Acres Plantation has been truncated by Chelston Meadow landfill site and its original pathways appear to have been lost or altered. It also appears to have no public access. Consideration should be given as to whether access to this part of the estate might be possible and could be linked to interpretation of the Saltram Estate as it developed under Albert Parker.

9.0 BIBLIOGRAPHY

Published Sources:

Soil Survey of England and Wales 1983: *Legend for the 1:250,000 Soil Map of England and Wales (a brief explanation of the constituent soil associations)*.

Websites:

British Geological Survey 2021: *Geology of Britain Viewer*.

http://maps.bgs.ac.uk/geologyviewer_google/googleviewer.html

DEFRA Survey Data Download 2021:

<https://environment.data.gov.uk/DefraDataDownload/?Mode=survey>

Magic Mapping Application 2021:

<http://magic.defra.gov.uk/MagicMap.aspx>

Natural England 2021: *National Character areas*

<http://publications.naturalengland.org.uk/publication/4646942?category=587130>

Unpublished Sources:

National Trust 2000: *Historic Landscape Survey Guidelines*.

Nicholas Pearson Associates 1999. *Saltram. Historic Landscape Survey and Management Plan*

Teasdale, J. 2017: *Saltram Estate Conservation Management Plan*

Thomas, R 1992. *The National Trust Archaeological Survey: Saltram, Devon*

10.0 APPENDICES

APPENDIX 1: PROCESSED LIDAR IMAGES FOR THE SURVEY AREA

Digital Terrain Model: Hillshade

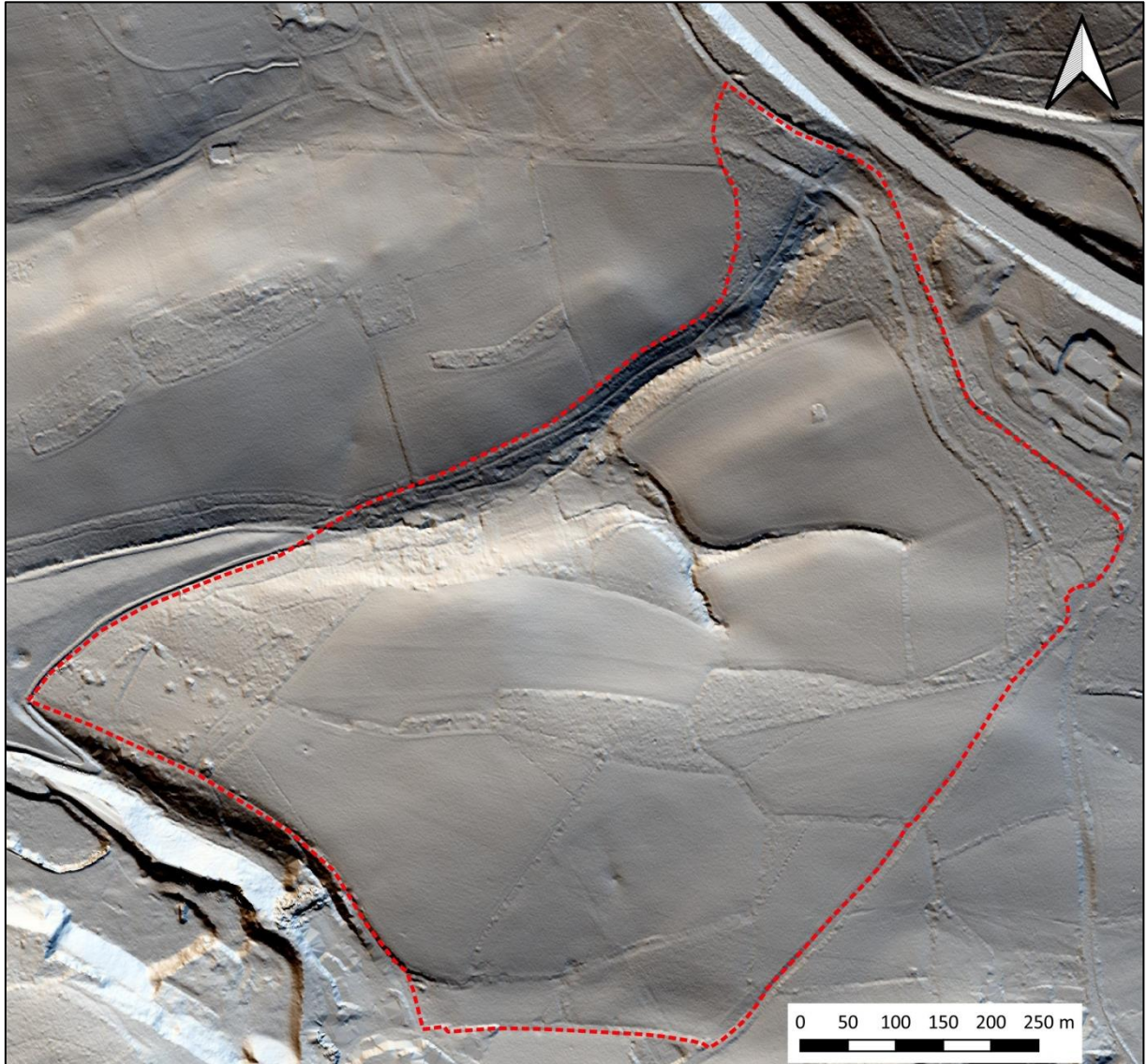


FIGURE 103: 2010 1m DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

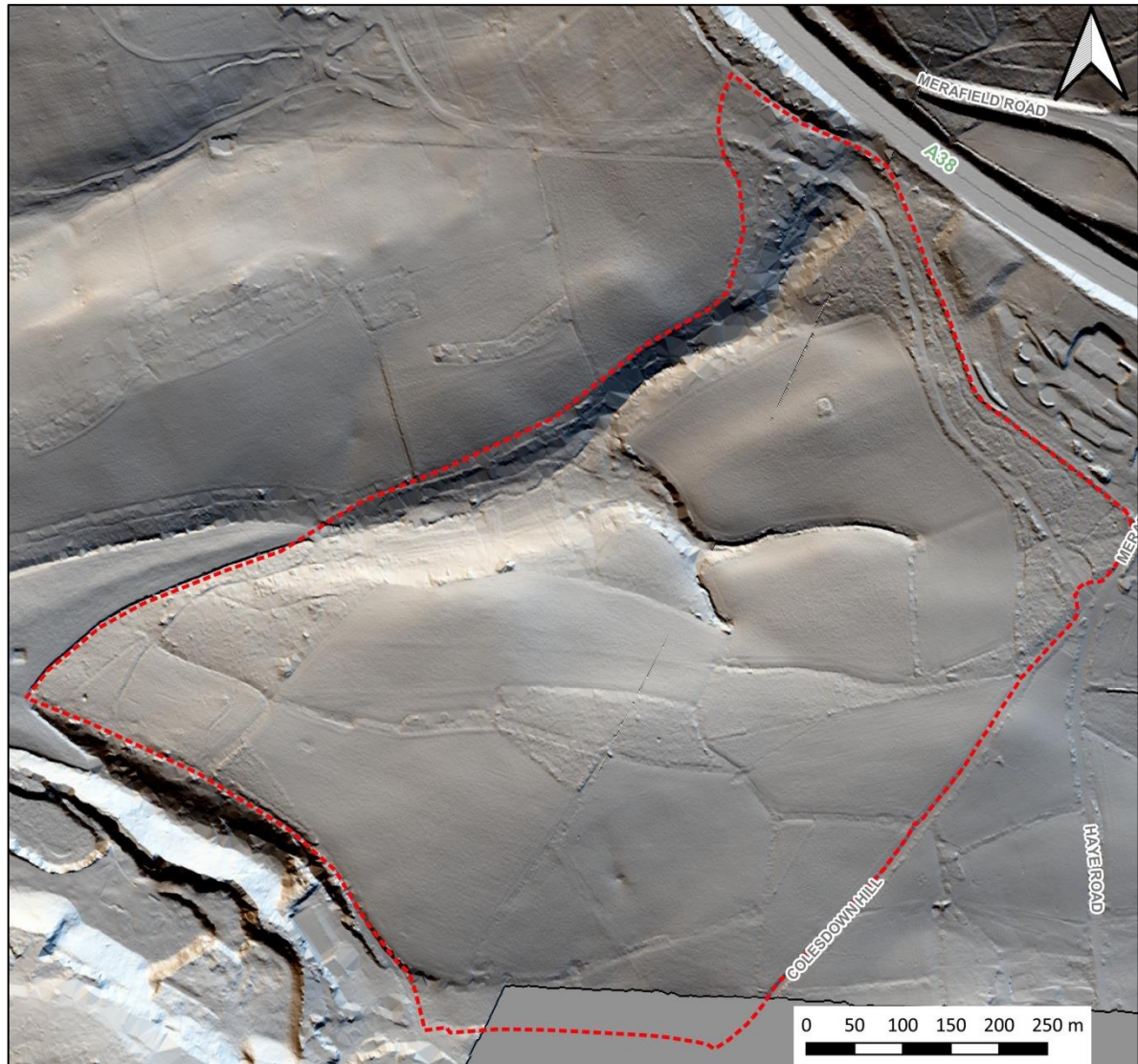


FIGURE 104: 2018 1M DTM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

Digital Surface Model: Hillshade

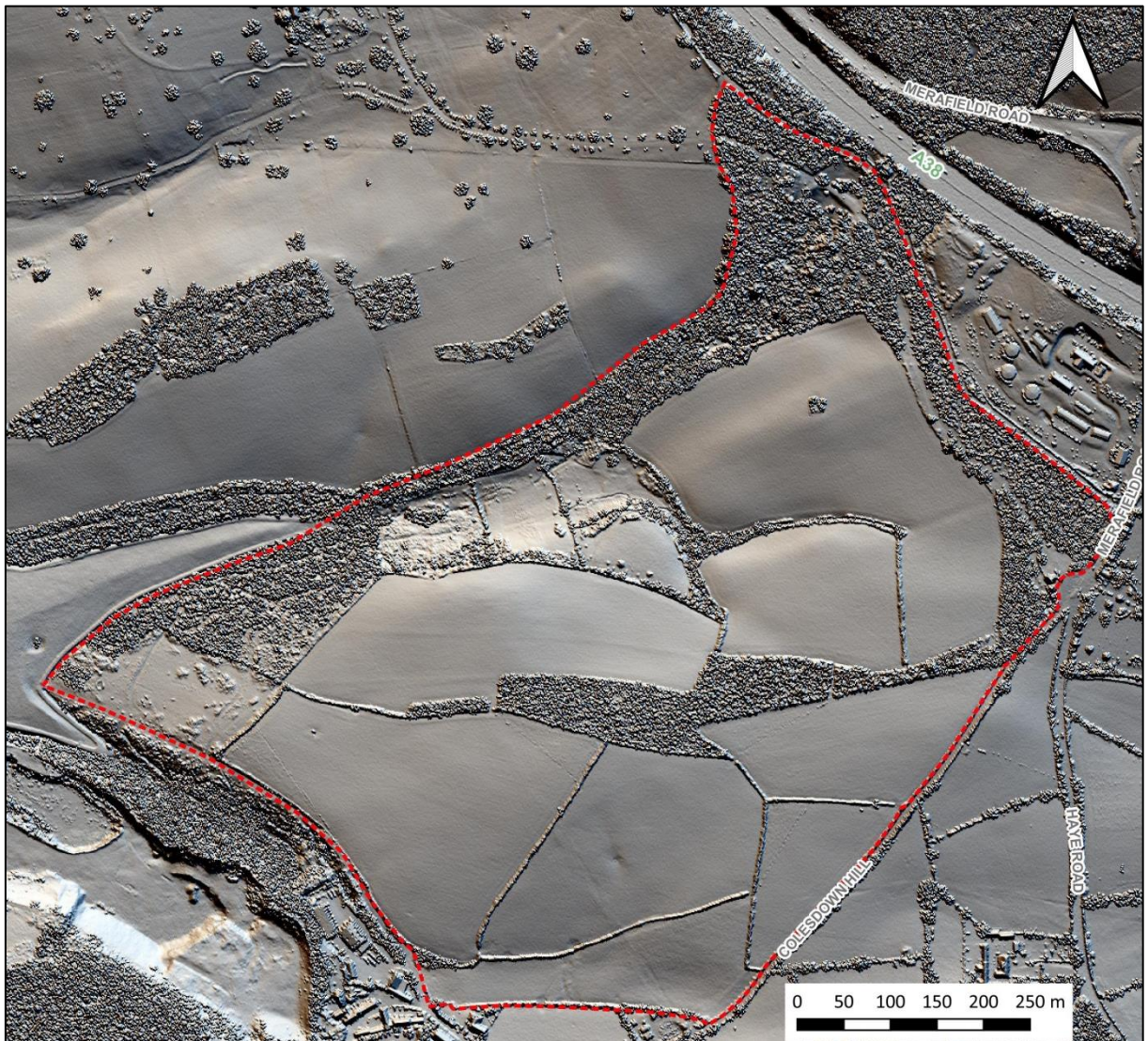


FIGURE 105: 2010 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

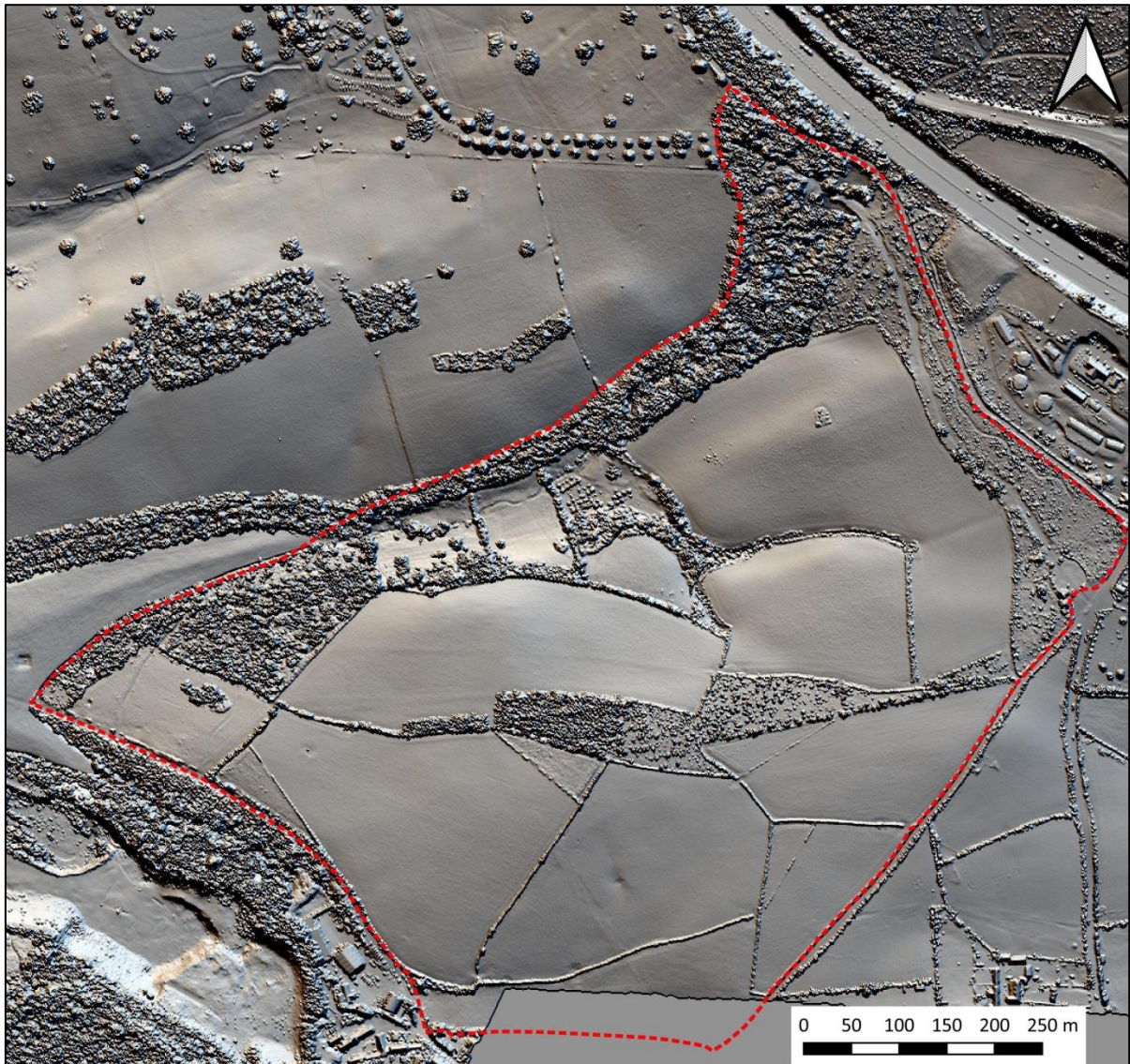


FIGURE 106: 2018 1M DSM LIDAR DATA PROCESSED WITH RVT 2.2.1 MULTIHILLSHADE D32_H35_Z2 AND QGIS 3.14. © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

Digital Terrain Model: Slope

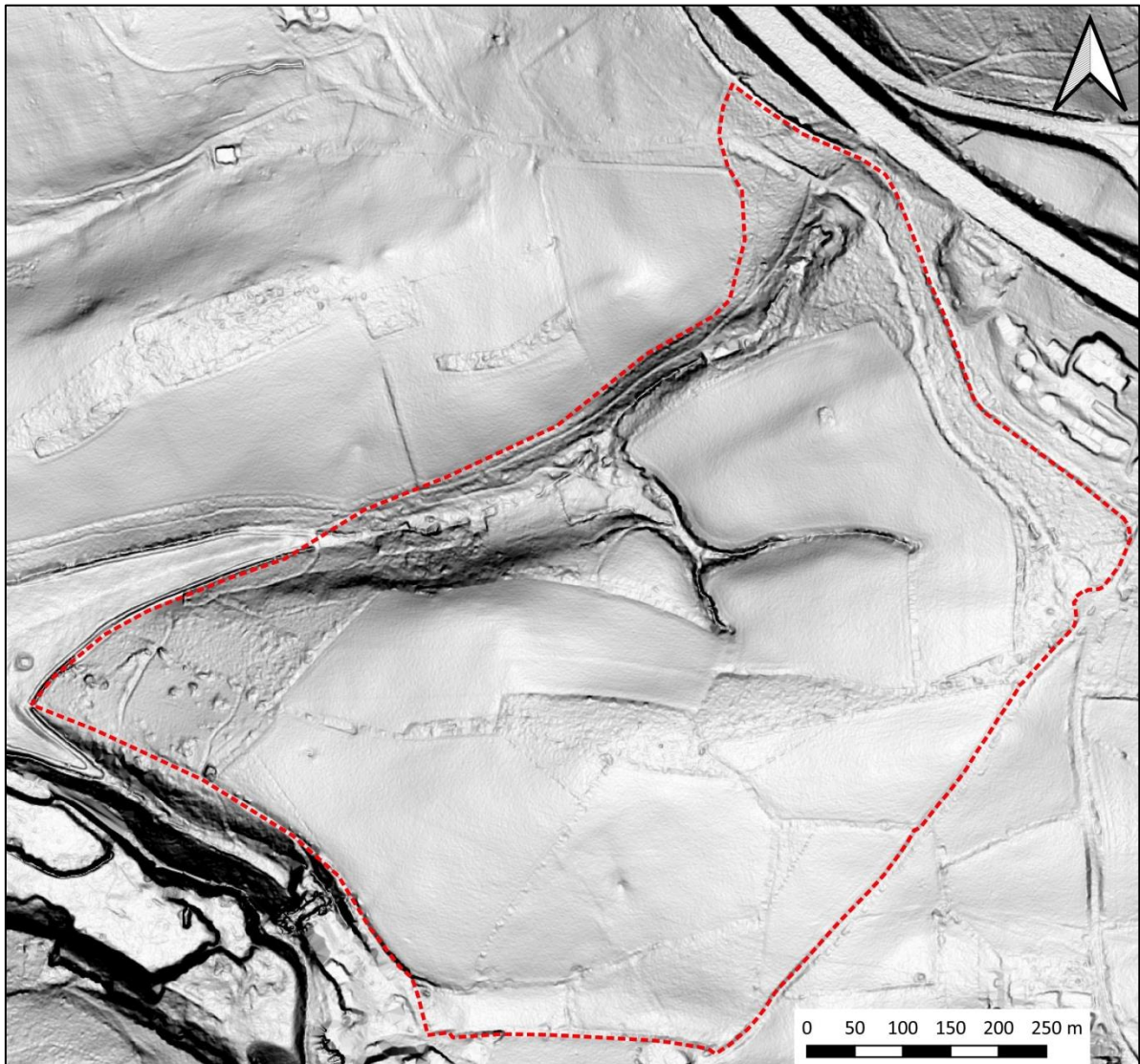


FIGURE 107: 2010 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1 © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

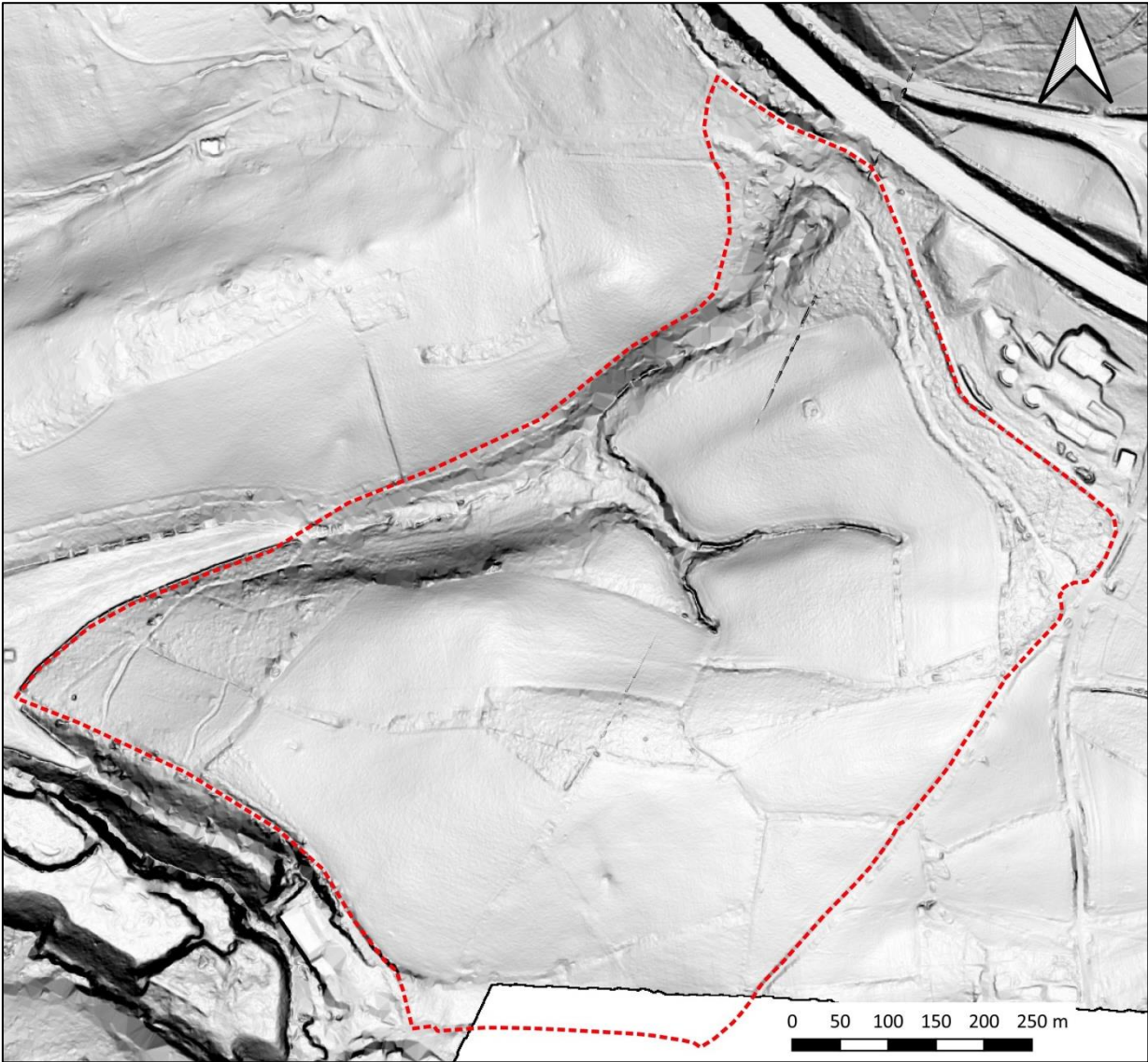


FIGURE 108: 2018 1M DTM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1 © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.



FIGURE 109: 2010 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1 © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.



FIGURE 110 : 2018 1M DSM LIDAR DATA PROCESSED WITH QGIS 3.14. SLOPE_Z1 © ENVIRONMENT AGENCY COPYRIGHT AND/OR DATABASE RIGHT 2015. ALL RIGHTS RESERVED.

APPENDIX 2: BRIEF FOR THE SURVEY

South West Region (Devon) THE DELL/HAPPY VALLEY, SALTRAM

Brief for Historic Landscape Survey

1.0 INTRODUCTION

1.1 The Dell (also named Happy Valley) and surrounding fields, are located in the western half of the Saltram Estate and have been identified as in need of a more detailed historic landscape survey in order to better inform both current and future management. The Dell is recorded as being a wooded valley dating from at least the mid-18th century and retains evidence of multiple phases of adaptation, particularly during the 19th century when it was partly ornamentalised. The surrounding parkland area incorporates Bickham, Barn Park and Wixenford (see Figure 2). This survey will enable the National Trust to fully assess and best understand the evolution of the landscape.

1.2 The historic landscape survey will identify and describe sites, areas and aspects of archaeological and landscape interest both through documentary research and site walkovers. The level and nature of survival of pond features will need to be of particular focus. The survey will enable a clear understanding of the structures within the Happy Valley and Bickham and the evolution of the wider site through time and how it might be impacted into the future. Recommendations for the future management and conservation of the heritage resource are required. In areas where the archaeological resource cannot be determined using current information, the potential for previously unrecorded features should be assessed. This report will consequently form the principal document informing the National Trust of the effect of any future management proposals.

1.3 This brief has been prepared by the National Trust curator and archaeologist in order to ensure that a suitable assessment of the archaeological and built resource is undertaken meeting The National Trust Historic Landscape Survey Guidelines 2000¹ and the Institute for Field Archaeologists² Standards and 1 The National Trust historic landscape survey guidelines can be found at the following link: www.nationaltrust.org.uk/main/w-arch4.pdf

2 Henceforth CIFA Guidance for Archaeological Desk-Based Assessment and English Heritage guidance

2.0 ASSESSMENT AREA

2.1 The focus of the assessment area is on The Dell, which lies on the northern edge of the Saltram Estate, Plymouth, Devon, and runs between NGR SX 5218 5497 – SX 5270 5530). The wider site includes Bickham, Barn Park, Wixenford and South Drive (Figures 1 and 2).

3.0 ARCHAEOLOGICAL AND HISTORICAL BACKGROUND

3.0.1 The Ordnance Survey drawing of 1784-'86 shows that part of the valley now known as The Dell was already planted; a belt of woodland ran down the valley as far as the Bickham farmstead. The rest of the plantation woodland that dates from the late 18th century. By 1801, Lord Boringdon (John Parker III) had extended the parkland southward as far as the valley now known as 'The Dell' and defined the whole parkland boundary – including Queen Park, Ellacombe

Piece and the North Lakes - by planting a continuous ribbon of woodland, known as 'The Belt'. The OS map of 1809 shows that the woodland of the Dell had become part of this more extensive belt. On the 25" OS maps of 1880 (surveyed 1863) onwards the notation indicates that it is plantation.

3.0.2 Probably after 1884, when the 3rd Earl of Morley returned to Saltram, The Dell began to be planted with ornamental trees and shrubs. In 1891, the Great Blizzard caused considerable damage to the trees at the higher end of The Dell. Sellar Acres was replanted with many varieties of maple and scarlet oak. In 1901, the 3rd Earl recorded planting rhododendron in 'the bottom': This may have been in the Dell, or possibly Wixenford Bottom.

3.0.3 In 1903, the Gardeners' Chronicle describes 'Happy Valley' (i.e. The Dell), lying half a mile to the east of the house, as running from the wooded hills (Hardwick Wood) to the low-lying meadows (Chelson Meadow).

3.0.4 During the Second World War, when a number of American Army units were stationed at Saltram temporarily prior to deployment, The Dell is understood to have been a popular spot with the soldiers and their girlfriends. It was also used for training exercises. A number of 'foxholes' (dug-outs) survive and American cooking utensils, etc. have been found in this area.

3.0.5 What Survives: The woodland comprises primarily beech, oak, Norway maple, and pedunculated oak. The understorey consists of frequent elm with holly, yew, elder and field maple.

3.0.6 The stream has a number of small, dammed ponds, which always contain water. It is understood that they may have been modified in the early 2000s, when some work was carried out by the NT in an effort to restore the area.

3.0.7 The valley contains significant lengths of boundary banks, of uncertain date (possibly medieval origins) and in varying condition.

3.0.8 Much of the planting of The Dell valley garden of the late C19th – early C20th is lost, but the small chain of ponds still survives. Spring water supplying The Dell originates on the slopes below Hardwick Plantation beyond the A38. A supply pipe was installed when the A38 Expressway was built to continue to supply the Dell. However this is no longer running and is believed to have been crushed by the weight of the road embankment above.

3.0.9 Further details on the remaining areas can be requested from the NT and are extracted from the recently completed Conservation Management Plan (2017)

3.1 Existing Records and Designations (Historic Environment)

3.2.1 NHLE Number: 1000699, NHLE Grade II*

NT HBSMR Mon IDs: MNA 106350 – Pond

MNA 106351 – Pond with dam

MNA 106354 – The Dell

MNA 106319 – Stag Lodges

MNA 106352 – Stage Lodge Drive

MNA 106354 – The Dell

MNA 106355 – Site of Hardwicke Arch and drive

MNA 106323 - Bickham Barn

MNA 106349 – Bickham Meadows

MNA 106353 – Barn Park clump

Devon County Wildlife Site

3.2.2 A significant resource exists in the form of the Saltram Conservation Management Plan (2017). Amongst other things this defines landscape parcels alongside related gazetteer entries

4.0 SPECIFICATIONS

4.1 Objectives

4.1.1 The assessment should elucidate the character, distribution, extent and importance of the archaeological remains which exist in the assessment area including those from a landscape perspective. It should enable the understanding of the archaeological and historical development of the site. It should specifically focus on the surviving nature and development of the garden and assess its significance both regionally and nationally. It should also identify those areas where the assessment alone would be insufficient to provide sufficiently detailed information for the drawing up of future management recommendations and suggesting future types of work to address this.

4.1.2 The assessment report should provide information that is sufficiently detailed so that informed decisions to protect and manage the heritage resources may be taken on the basis of the contents. This would include informing proposals such as property management and conservation plans as well as future field based archaeological surveys.

4.1.3 A rapid assessment of the historic landscape and its value should also be undertaken in consultation with the resulting in a statement of significance.

4.2 Scope of the Work

4.2.1 The archaeology of defined area, in its wider local or regional context should be considered. Any remains of interest should be considered, whatever their date and this should include standing structures, industrial remains, ornamental landscape features, etc. Evidence for previous use of the site

that may have damaged or destroyed the archaeological resource, should also be sought. Whilst the work should concentrate on the defined assessment area the archaeological Resource outside should also be noted especially when features could extend inside the boundaries. The impact of the current land management on monuments and their settings located within and outside the application area should also be considered along with recommendations for future management.

4.4 Methodology

4.4.1 The landscape assessment will be undertaken in accordance with be the National Trust Level Three Survey, as outlined in the document 'The National Trust Historic Environment Survey Guidelines 2000', which should be read in conjunction with this outline brief. Also refer to the Chartered Institute for Archaeologists Standards and Guidance for Archaeological Desk-Based Assessment

4.4.2 The professional contractors should prepare a Project Design (PD) for the assessment at Saltram (in accordance with CIFA guidelines). The PD should be submitted to and agreed in writing by the National Trust before the assessment work is carried out.

4.4.3 The contractor is advised to visit the site before completing their quote as there may be implications for accurately costing the project. At a minimum, the assessment will consist of:

4.4.4 The collection of all existing information on the various heritage assets. This will include the consultation of all accessible and relevant primary and secondary documentary and map sources, aerial photographs and previous survey or historical research relating to or in the immediate environs of the property as required. This will include the County HER (including Historic Landscape Characterisation), NMR, Devon Record Office, EA LiDAR maps (if available), Tithe maps, Ordnance Survey maps, other historic maps and illustrations, consultation with NT staff and volunteers at the property for local knowledge and consultation of records held at the property and the National Trust HBSMR at Regional Office, Killerton.

4.4.5 A visual inspection in the form of a walkover survey to locate and record both formerly identified sites and any previously un-identified archaeological features. All areas of the site will be examined as far as is practicable and safe. The immediate surroundings of the site will be assessed for features that may continue into the site. A written record of any features noted will be made, together with scaled sketch plans/drawings and photographs where appropriate.

4.4.6 Any topographic features which might be a focus for human activity should be noted even if there are no current indications of archaeological features being present (e.g. springs, level platform areas). Likewise, any activity that could have masked archaeological sites (e.g. tipped material, marshy ground, peat etc.) Should be noted.

4.4.7 The existing boundaries will be inspected and the type and pattern noted.

4.4.8 The current state of preservation and land-use of features will be determined.

4.4.9 An important element of this assessment is the development of a comprehensive understanding of the surviving nature and extent of the of ponds in The Dell

4.4.10 Interpret the historic and archaeological development of the site, tracing its development from the earliest known evidence to the present day, including as far as possible agricultural use and integrating key data gathered.

4.4.11 Produce a statement of significance and a statement of guiding principles for the future management of the historic and archaeological features. Identify management and maintenance needed on a continuing basis. Any potential conflicts or mutual benefits of management should also be identified,

4.5 Report Contents

4.5.1 The report should be in a form and language that is accessible to the non-specialist.

The report will include at a minimum:

4.5.2 Contents List (also note allied material e.g. database, etc.)

4.5.3 Summary (no more than one page, which accurately reflects the method, results and conclusions of the report)

4.5.4 Introduction Section (including assessment background, objectives and scope, methodology, layout of report, site description, topography, geology, present day state, ownership, designations.

4.5.5 Archaeological and Historical Background (to include a synthesis of the development of the historic landscape and its changing land use, tracing the development of the property from the earliest known evidence to the present day including as far as possible agricultural use. Assess the relationship of the NT property to the surrounding landscape and produce a statement of the Archaeological and landscape significance of the property. Refer to historic maps, illustrations and documents. All relevant maps and plans referred to in the text should be included within the report.

4.5.6 Survey Results (to include summary descriptions of all sites including landscape features, cross-referenced to relevant scaled sketch and location plans and site inventory).

4.5.7 Discussion and Management Recommendations (to include review of existing land use and management issues, recommendations for future management (including site specific work where appropriate), access, interpretation and presentation, potential future archaeological work including monitoring).

4.5.8 Acknowledgements.

4.5.9 Bibliography (including sources and references).

4.5.10 Archive (contents and location, an archive recording form and archaeological project record form will be completed (see Appendix 1)).

4.5.11 Site Inventory (a full inventory of archaeological sites and structures on the property. To include unique NT HBSMR reference number (and HER/NMR where relevant), NGR, site type, period, description, condition, management (present and recommended). Include photographs and drawings where appropriate. This could build on existing records in the HBSMR and HER database).

4.5.12 Illustrations (to include a site location map, map showing extent of area designations, Historic Land Characterisation mapping, historic maps, plans, illustrations and photographs (including relevant aerial photographs), map(s) illustrating all sites identified in the site inventory, site photographs, features scaled sketches. All maps photographs should be fully cross referenced to the text/inventory).

4.5.13 Appendices

5.0 REPORT DEPOSITION

5.1 A draft of the report will be supplied to the NT for discussion before completion

5.2 8 copies of the report will be required. (Property x 3, Archaeologist 2, central office x 1, County HER, NMR) The report will be presented in a bound A4 format; larger pages will be folded into the document.

5.3 A copy of the report will be provided to the NT Archaeologist in agreed digital formats (the original digital formats (e.g. Word, .dxf, .jpeg) and a .pdf copy).

5.4 The final report will be Joint Copyright with the National Trust. The archive may be copied for bona fide research or in relation to local authority development control activities without infringement of copyright or need for permission from the originator.

5.5 The archaeological contractor shall complete an online OASIS (Online Access to the Index of archaeological investigations) form in respect of the archaeological work. This will include a digital version of the report. The report will also include the OASIS ID number.

6.0 MONITORING

6.1 The successful archaeological contractor will discuss the project and confirm details of the brief with the NT curator and archaeologist prior to the production of a Project Design. Any problems or queries will be directed to the NT Archaeologist, Curator or the property staff (as detailed below). The contractor should keep the NT regularly informed of the project's progress, including during report preparation. The contractor will discuss the results of the survey with the NT and property staff, with a draft report (circulated in advance), before the final Completion of the report.

7.0 ARCHIVE

7.1 The full supporting archive of material including plans, documentation, digital illustrations, photographs (and negatives) and any finds should be systematically and appropriately organised and catalogued with reference to the Historic England guidelines and in accordance with National Trust

property archive guidelines this will be deposited with the National Trust to be retained as part of the Property Archive.

8.0 ASSESSMENT TIMETABLE

8.1 A costed project programme and proposal is required. If VAT is payable, this too should be included in the bid.

8.2 A breakdown of the time allocation for producing a PD, conducting the archaeological work and its duration to achieve the required result, should be included in the costed proposal. The assessment work is planned to be undertaken between January and February 2021, with the final report due end of March 2021.

8.3 The successful archaeological contractor will produce a PD detailing the proposed assessment work, methodology, staffing etc. in accordance with this brief and CIFA guidelines. This should also include a review meeting with the NT staff, for discussion before the final compilation of the report.

8.4 The National Trust will require the final report within 3 months of the completion of the fieldwork.

8.5 Any proposed variations in the project design should be discussed with the NT and /or the Property Manager and agreed changes submitted in writing to the National Trust before such changes are implemented.

8.6 The NT reserves the right to withhold payment until all agreed reporting has been completed and meets with the approval of the NT Project Manager.

8.7 Any publicity for the project will be under the direction of the Property Manager

9.0 HEALTH AND SAFETY AND INSURANCE REQUIREMENTS

9.1 The National Trust requires all working on NT properties to observe health and safety requirements as set out in 'General Requirements for Work' a National Trust internal document. The contracted archaeologist is responsible for the health, safety and insurance of all their staff employed on the project. The NT requires evidence that the contractor has public liability insurance to a minimum of £2 million.

10.0 CONTACTS

For further background information about the tender, property access and local health and safety issues:

Alex Sproson

Senior Building Surveyor

Tel: 07557758419

Email: Alex.Sproson@nationaltrust.org.uk

For consultation on the brief, contents of the report and liaison on any archaeological queries:

Jim Parry

Archaeologist

National Trust

South West Region

Lanhydrock

Bodmin

Cornwall

PL30 4DE

Tel: 07810 384582

Email: james.parry@nationaltrust.org.uk



The Old Dairy
Hacche Lane Business Park
Pathfields Business Park
South Molton
Devon
EX36 3LH

Tel: 01769 573555
Email: mail@swarch.net