

Upper Frome and Sydling Valleys, West Dorset, Dorset, Aerial Investigation and Mapping Project

F Fleming

Discovery, Innovation and Science in the Historic Environment



Research Report Series no. 43/2021

Research Report Series 43-2021

Upper Frome and Sydling Valleys West Dorset, Dorset

Aerial Investigation and Mapping Project

F Fleming

© Historic England

ISSN 2059-4453 (Online)

The Research Report Series incorporates reports commissioned by Heritage Protection Commissions and by expert teams within Historic England.

The Research Report Series is not usually subject to external refereeing, and their conclusions may sometimes have to be modified in the light of information not available at the time of the investigation. Readers must consult the author before citing these reports in any publication. Opinions expressed in Research Reports are those of the author(s) and are not necessarily those of Historic England.

For more information write to <u>Res.reports@HistoricEngland.org.uk</u> or mail: Historic England, Fort Cumberland, Fort Cumberland Road, Eastney, Portsmouth, PO4 9LD

SUMMARY

This report presents the results of a systematic survey of a range of archaeological sites visible as earthworks, cropmarks and structures on aerial photographs and lidar imagery within a 100 square kilometre area of West Dorset. The project area lies entirely within the Dorset AONB and covers a nationally important historic chalk landscape with a high potential for prehistoric monuments. This area had been less intensively studied than neighbouring areas such as the South Dorset Ridgeway and Cranborne Chase and the project was undertaken on the basis of real opportunity for significantly improving our understanding of the historic environment of this area. The project area covered the upper reaches of the River Frome from Frampton in the south to Evershot in the north. On its eastern side, the River Sydling runs northwards through Sydling St Nicholas to Up Sydling. The project has provided significant enhancement to existing baseline data through the mapping, interpretation and recording of 975 archaeological sites, of which 900 were entirely new discoveries, previously unrecorded in the county or national databases. The results will be available for use by local communities, researchers, policy makers and managers of the historic and natural environment.

CONTRIBUTORS

Fiona Fleming, Carolyn Royall

ACKNOWLEDGEMENTS

This AI&M project was undertaken with funding from Historic England. The mapping and recording were carried out by Fiona Fleming and Carolyn Royall of Cornwall Archaeological Unit, Cornwall Council. The Cornwall Council Project Managers were Fiona Fleming and Carolyn Royall. Claire Pinder was the Historic Environment contact within Dorset Council. Jenni Butterworth was the PAO. Helen Winton and Matthew Oakey were the project managers for Historic England, Fiona Small, Historic England was responsible for external Quality Assurance.

COPYRIGHTS

This report and all the archaeological mapping illustrated within it are copyright Historic England. Aerial photographs were made available by Dorset Council in addition to aerial photographs loaned by the Historic England Archive and lidar data from the Environment Agency. The maps in this report are reproduced from Ordnance Survey map data with the permission of Ordnance Survey on behalf of Her Majesty's Stationery Office © Crown Copyright and Landmark Information Group Licence no: 0100060963. Where OS Opendata has also been used this is under © Copyright and database right 2021, with respective copyright statements included on all reproduced maps. Geological data, Agricultural Land Classification data and Dorset Landscape Character Areas are reproduced under Open Government Licence. Unauthorised reproduction infringes Crown Copyright and may lead to prosecution or civil proceedings. The views and recommendations expressed in this report are those of Cornwall Archaeological Unit and are presented in good faith on the basis of professional judgement and on information currently available.

Thanks to Claire Pinder at Dorset Council for the provision of HER data and aerial photographs. Thanks to Luke Griffin of the Historic England Archive for the supply of aerial photographs.

ARCHIVE LOCATION The Historic England Archive The Engine House, Fire Fly Avenue

© HISTORIC ENGLAND

Swindon SN2 2EH

DATE OF SURVEY February 2020 - March 2021

CONTACT DETAILS fiona.fleming@cau.org.uk carolyn.royall@cau.org.uk

CONTENTS

Contents

1. Introduction	4
Background to the Survey	4
Aims and Objectives	5
Methodology	6
2. The Project Area	7
Location and Geographic Extent	8
Geology, Soils and Landscape Character	8
3. Survey Results: Overview	12
Sources Used	12
Quantification	15
4. Thematic overview	25
Evidence for prehistoric ceremonial activity	25
Later prehistoric and Roman settlement and agricultural exploitation	35
The medieval and post-medieval landscape; settlement and land use	53
Wartime	73
Conclusion	78
Outcomes	79
Recommendations	
References	
Appendix 1: Methods	
Appendix 2: List of Significant Sites	
Appendix 3: Designations Long List	100

LIST OF FIGURES

Figure 1 The location of the project area7
Figure 2 Past NMP projects adjacent to the project area7
Figure 3 Bedrock geology of the project area. Contains British Geological Survey materials © UKRI [2021]. Reproduced under Open Government Licence8
Figure 4 Agricultural Land Classification within the project area, Grade 1 being the highest quality, Grade 5 the lowest. © Natural England. Reproduced under Open Government Licence9
Figure 5 The Dorset Landscape Character Areas within and adjacent to the project area, © Dorset Council (dorsetcouncil.gov.uk) and reproduced under Open Government Licence
Figure 6 Earthworks at Cattistock Castle depicted on a specialist oblique photograph13
Figure 7 A Second World War military hospital and D-Day camp, Hill, Sydling St Nicholas14
Figure 8 Environment Agency lidar coverage for the project area
Figure 9 The Upper Frome and Sydling Valleys AI&M project area showing all AI&M mapping16
Figure 10 Distribution of all monuments recorded during the project17
Figure 11 Scheduled Monuments within the project area19
Figure 12 Form and survival of monuments recorded within the project area. The relative density of extant earthworks within the southwest quadrant and along the river valleys is likely a product of the lidar coverage of these areas23
Figure 13 Neolithic and Bronze Age sites previously recorded in the Dorset HBSMR25
Figure 14 Neolithic and Bronze Age barrow sites recorded by the project (new and amended)26
Figure 15 Possible Neolithic oval barrow on Daws Hill, Wraxall
Figure 16 Bowl barrow on North Field Hill, Sydling St Nicholas
Figure 17 Round barrows to the west of Chilfrome, juxtaposed with late prehistoric and medieval field systems
Figure 18 The geographical positioning of round barrows to the west of Chilfrome. 32
Figure 19 Round barrows on Cross Hill, Sydling St Nicholas
Figure 20 Round barrows positioned at the junctions of prehistoric field boundaries at Chilfrome and on Grimstone Down
Figure 21 Late prehistoric and Roman sites recorded during the project
Figure 22 Middle Bronze Age enclosure and possible barrows on Shearplace Hill, Sydling St Nicholas

Figure 23 Middle Bronze Age enclosure and field system on Shearplace Hill, Sydling St Nicholas
Figure 24 Prehistoric field systems mapped during the project
Figure 25 Fragments of possible coaxial field systems on North Hill, Chilfrome, and Norden Hill, Cattistock41
Figure 26 Possible examples of historic boundary division to the south of Maiden Newton, relative to fragments of prehistoric field systems mapped by the project42
Figure 27 Examples of possible Iron Age enclosures mapped by the project43
Figure 28 Iron Age/Romano-British settlements on Grimstone Down and at New Barn, Maiden Newton44
Figure 29 Late Bronze Age/Early Iron Age enclosure (MDO1588) on Hog Cliff Hill, cut by the former Roman road between Dorchester and Ilchester45
Figure 30 Cross dyke on Hillfield Hill, Hillfield
Figure 31 Linear earthworks on West Hill, Frome St Quintin (left), and Shearplace Hill, Sydling St Nicholas (right) (MDO1195; 42950)47
Figure 32 Linear earthwork on Grimstone Down, Stratton (MDO42873)48
Figure 33 Parallel linear earthworks on Loscombe Hill, Sydling St Nicholas, and Batcombe Hill, Frome St Quintin (MDO2603; 1195)48
Figure 34 Possible Iron Age hillfort, 'The Castle', Cattistock, containing a Bronze Age barrow and overlain by a medieval strip field49
Figure 35 The Dorchester to Ilchester Roman road at Frome St Quintin50
Figure 36 The site of Frampton Roman villa, overlain by a protective flint and earth bank
Figure 37 Sites of medieval or possible medieval date mapped by the project55
Figure 38 Sites of post-medieval or possible post-medieval date mapped by the project
Figure 39 Deserted medieval hamlet of Blakemore on the south side of Chantmarle Lane, Frome St Quintin56
Figure 40 Shrunken medieval settlements at Crockway Farm and Throop, Frampton57
Figure 41 Medieval strip fields and strip lynchets to the west of Chilfrome, Cattistock
Figure 42 Frome St Quintin deer park (MDO1192) after Cantor and Wilson 1965, fig 361
Figure 43 Features associated with Frome St Quintin deer park (MDO1192) mapped by the project
Figure 44 Cerne medieval deer park
Figure 45 Features associated with Wynford medieval deer park (MDO3462) mapped by the project
Figure 46 Batcombe medieval moated manor in relation to Batcombe deer park.65

Figure 47 Post-medieval water meadow at Hyde Farm, Frampton	5
Figure 48 Water meadow and watercress beds at Sydling St Nicholas	7
Figure 49 Water meadow and watercress beds at Up Sydling	3
Figure 50 Extractive sites mapped by the project)
Figure 51 Post-medieval chalk pits on Magiston Hill, Godmanstone, and Orden Hill, Maiden Newton (MDO42924; 42975)70)
Figure 52 Chalk extraction on the north side of Long Ash Lane, Frome St Quintin, relative to the route of the Roman road (MDO43066)70)
Figure 53 Old chalk pit and lime kiln on Batcombe Hill, Batcombe (MDO43060).72	1
Figure 54 Old chalk pit, quarry and lime kilns on Whitesheet Hill, Toller Fratrum (MDO41998).	2
Figure 55 Second World War military sites73	3
Figure 56 Second World War anti-invasion defences and two military camps at Maiden Newton7 ²	1
Figure 57 Second World War military hospital and D-Day camp on Wardon Hill, Frome St Quintin (MDO43058)74	5
Figure 58 Rifle Range, Sydling St Nicholas (MDO43099)	5
Figure 59 Possible Second World War radio/radar station, Cattistock (MDO43142)72	7

1. INTRODUCTION

Background to the Survey

In December 2019 Cornwall Archaeological Unit (CAU) was instructed by England (HE) to undertake an aerial investigation and mapping (AI&M) survey of the Upper Frome and Sydling valleys in Dorset. The project was funded by a grant from HE following a Call for Proposals. The proposal submitted by CAU in October 2019 formulated the outcome of discussions between CAU, Dorset Council (DC) and the Dorset Area of Outstanding Natural Beauty (AONB) (Royall 2019). The Upper Frome and Sydling Valleys have been under-recorded in terms of their historic environment resource and were highlighted as the area of highest priority in the county for aerial investigation and mapping (C Pinder and T Munro 2019, pers. comm.). The proposal was for a detailed consideration of the archaeological resource of this area, through the review of all readily available aerial photographs and lidar imagery.

The landscape of West Dorset is predominantly rural and agricultural, characterised by large open fields of pasture and arable punctuated by blocks of woodland, overlying rolling chalk downlands (Natural England 2013). The Cerne and Sydling Downs Special Area of Conservation extends into the east side of the project area, which is entirely contained within the Dorset Area of Outstanding Natural Beauty (AONB).

Modern farming regimes have proved to have particularly destructive impacts in areas with thin topsoils such as the chalk downland (cf. Woodward 1991; Gingell 1992). The majority of the project area consists of Grade 3 or Grade 2 agricultural land (Maff 1988) under intensive arable farming regimes. Archaeological remains within this area are therefore highly susceptible to damage through yearly ploughing and the AONB has heritage assets that are already considered by Historic England to be vulnerable or 'at Risk'. There is a recognised need, therefore, for taking practical action to conserve and protect these vulnerable monuments, which would benefit from improved information and interpretation to help achieve this, embodied in projects such as SHINE, for example, a national database of sites selected from local HERs for their potential to benefit from Environmental Stewardship. AI&M survey is particularly useful in increasing understanding of known sites and in identifying new ones, enabling better understanding of the archaeology of an area and the context of any surviving remains.

The mapping was carried out between February 2020 and March 2021 and the report produced in 2021. This report describes the AI&M results through technical summary and synthesis, using a discussion of selected themes to illustrate some of the key findings. Where specific sites are mentioned the relevant HER and Historic England Research Records (formerly National Record of the Historic Environment (NRHE)) numbers are included in brackets (prefixes MDO and NRHE Hob UID). Where illustrations in the following report include sections of project mapping the symbology for these are reproduced following Historic England AI&M standards (see Appendix 1).

Aims and Objectives

This area has been less intensively studied than neighbouring areas of the upland chalk landscapes in Dorset such as the South Dorset Ridgeway and Cranborne Chase and therefore relatively few sites are listed in the HER. There are a number of major gaps in the current knowledge of the historic environment of the area which this project hopes to address. It is hoped that enhancement of the archaeological record for this area will help inform future strategic planning and research frameworks for the area. The results of the project will be accessible in digital and online formats available to private researchers, professional contractors and the general public alike, with the aim of promoting general awareness of, and engagement with, the historic environment of the area.

Aims

By systematically recording components of the historic environment from aerial photographs, a principle aim of this AI&M project has been to provide the essential data previously lacking within the Dorset HER and the Dorset AONB. The project results will facilitate a full assessment of the archaeological resource of the area and will inform any assessment to determine if sites are nationally important and suitable for scheduling.

The specific aims of this survey were to:

- Define, characterise and analyse the historic environment of the Upper Frome and Sydling Valleys.
- Enhance the local HER and provide a synthesis of the results in a comprehensive report that considers the archaeological sites recorded by the project relative to their period and landscape context.
- Realise the potential of the research dividend by improving understanding and facilitating decisions regarding strategic planning, management and preservation of the historic environment.
- Consider where the project results might inform the research objectives of the South West Regional Research Framework Research Strategy (Grove and Croft 2012) and identify new questions that may be posed.
- Facilitate increased public awareness of the historic environment of both the Dorset AONB and the wider county through enhancement of the local HER and through digital and online publication of the results.

Objectives

These aims will be achieved through the following objectives:

- Production and incorporation of baseline data into the Dorset Historic Environment Record (HER) to inform strategic and individual planning decisions.
- Digital mapping of the archaeological landscape within the project area to the standards specified in the brief for the Call for Proposals and supplied as a separate document detailing current AI&M standards: 'Aerial Investigation and Mapping (AI&M) Standards Technical Review' (Evans 2019).
- Enhancement of the Dorset HER for the project area through AI&M mapping. The Dorset HER uses the HBSMR database and MapInfo.

• Publication and dissemination of the results of the project to raise wider public awareness of the historic environment via outreach and activities carried out by the AONB, and through the Historic Environment Record.

Methodology

The project followed current Historic England AI&M standards. These have been developed over time by Historic England and its precursors. Numerous landscape mapping projects carried out by RCHME, such as the Yorkshire Wolds (Stoertz 1997) and Thames Gravels (Fenner and Dyer 1994), helped develop a set of techniques and standards which became formalised as the National Mapping Project (NMP) (Evans 2019).

The aim of the NMP was 'to enhance our understanding about past human settlement, by providing information and syntheses for all archaeological sites and landscapes (visible on aerial photographs) from the Neolithic period to the twentieth century' (Bewley 2001, 78). The guiding principle of NMP was 'to map, describe and classify all archaeological sites recorded by aerial photography in England to a consistent standard' (English Heritage 2017).

Building on the success of the NMP, AI&M standards facilitate a systematic methodology to the interpretation and mapping of archaeological features visible on aerial photographs and lidar (Winton 2017; Evans 2019). This includes not only recording sites visible as cropmarks and earthworks but also upstanding and removed structures, some of which relate to 20th century military activities. This comprehensive synthesis of the archaeological information available is intended to assist research, inform planning and guide protection of the historic environment.

The Upper Frome and Sydling Valley project followed standard AI&M methodology. It involved the systematic examination of all readily available aerial photographs (mainly from the Historic England Archive) as well as lidar imagery held by the Environment Agency (EA). Georeferenced Pan Government Agreement (PGA) vertical photograph tiles were made available to the project team; the online digital sources of aerial photographs held by Google Earth were also consulted. Scanned aerial photographs were rectified using AERIAL (Version 5.36) and archaeological features visible on them transcribed using AutoCAD Map3D 2015 (infrastructure design suite). Monument records were created for all mapped sites; the data being input directly into the Dorset HER databases using a remote link.

2. THE PROJECT AREA



Figure 1 The location of the project area.



Figure 2 Past NMP projects adjacent to the project area.

Location and Geographic Extent

The project area is located to the northwest of Dorchester in west Dorset, taking in the upper reaches of the River Frome from Frampton in the south to Evershot in the north, including its tributaries the River Hooke and the Wraxall Brook, as well as a stretch of the River Sydling that runs northwards through Sydling St Nicholas to Up Sydling in the east. In the west the project area extends to Higher Kingcombe (Fig 1). It lies wholly within the Dorset AONB and covers 100 square kilometres of a nationally important historic chalk landscape with high potential for prehistoric monuments.

The project area is bordered on its south side by the previously completed South Dorset Ridgeway NMP project. Two additional NMP projects, the Marshwood Vale and the Dorset RCZAS, were previously carried out to the west and southwest of the project area (Fig 2).

Geology, Soils and Landscape Character

Geology

Geological information for the project area is derived from the British Geological Survey (www.bgs.ac.uk/map-viewers/geology-of-britain-viewer/) and Ordnance Survey Opendata (see Fig 3).



Figure 3 Bedrock geology of the project area. Contains British Geological Survey materials © *UKRI* [2021]. *Reproduced under Open Government Licence.*

The underlying bedrock geology of the project area predominantly comprises Cretaceous Period chalk of the white and grey subgroups, part of the far southwestern arm of the Southern England Chalk. This is banded along the northwestern edges of the project area with Cretaceous Period mudstone, sandstone and limestone of the Gault Formation and Upper Greensand. Extending into the west and north sides of the project area are pockets of Jurassic Period mudstone, siltstone and sandstone of the Kellaways and Oxford Clays Formations and sandstone, limestone and argillaceous rocks of the Great Oolite Group (Fig 3).

Superficial geological deposits within the project area comprise alluvium, gravel river terrace deposits and Head deposits of clay, silt, sand and gravel along the river valleys, with clay with flints formation deposits on the chalk plateaux (illustrated in Fig 3), formed by weathering processes such as decalcification and cryoturbation.



Soils

Figure 4 Agricultural Land Classification within the project area, Grade 1 being the highest quality, Grade 5 the lowest. © Natural England. Reproduced under Open Government Licence.

Soils information for the project area is derived from Cranfield University's Soilscapes Viewer (Landis 2021) and The Soil Survey for England and Wales (1983). The dominant soils in the southeast of the project area, overlying the chalk, are shallow lime-rich rendzinas supporting some arable alongside calcareous grassland. Shelterbelts and hangars of beech, oak and ash are also to be found. In the area of the North Dorset Downs in the north of the project area soils comprise poor draining slightly acid loamy and clay brown earths across the higher downland, with more free draining lime-rich loamy brown earths along the slopes of the Upper Frome and Sydling river valleys. These soils support a rich agricultural landscape of arable and grassland alongside tracts of semi-natural ancient woodland. The dominant agricultural soil classes within the project area are Grades 3 and 4 (Fig 4).

Landscape Character

The Dorset Landscape Character Assessment (Dorset County Council 2009) identified 21 broad landscape character types across the county, based on broadly similar combinations of geology, topography, vegetation, land-use and settlement pattern. Within the project area the dominant landscape character area is the Chalk Valley and Downland, bordered to the north by the Chalk Ridge Escarpment and having narrow tracts of Chalk River Valley Floor and Valley pasture along the Upper Frome and Sydling valleys (Fig 5).



Figure 5 The Dorset Landscape Character Areas within and adjacent to the project area, © Dorset Council (dorsetcouncil.gov.uk) and reproduced under Open Government Licence.

The project area is situated within a downland landscape classified by Natural England as the Dorset Downs and Cranborne Chase National Character Area (Natural England 2013; NCA 134). In the northwest of the project area the landscape character of the North Dorset Downs comprises the remains of a once extensive chalk platform, now a series of undulating hogsback ridges and chalk stream valleys with deep stream-cut coombes in the ridge sides. To the southeast the higher ground gives out onto a rolling chalk dip slope, also dissected by steep-sided valleys and coombes (Natural England 2013). From the higher downland expansive and far-reaching views over the neighbouring landscapes contrast with the more intimate and enclosed character within the valleys and coombes.

The predominantly rural landscape is highly agricultural, with a mixed farming landscape of probable medieval origin comprising of small irregular fields and high hedgerows within the valleys and coombes and bordering the formal landscaped parklands, which include the remains of several former medieval deer parks. Along the chalk river valleys are numerous unimproved meadows and the remains of former water meadows and watercress beds; watercress remains commercially important in this area into the present day. Small-scale woodland is also to be found along the valley slopes. The higher downland is typically characterised by large arable fields defined by narrow hedgerows. These larger fields were formed by the enclosure of the downland to support sheep and corn production between the 16th and 19th centuries (Natural England 2013).

Historic settlement typically developed off the higher ground, seeking the shelter of the river valleys and coombes where closely spaced linear villages and hamlets formed close to the valley bottoms and around the spring-lines. A dense network of narrow twisting lanes flanked by thick hedgerows connects the settlements in these areas (Natural England 2013). In contrast to the valleys, the historic settlement character of the higher downland is one of scattered and isolated farmsteads (*ibid*).

Historic Landscape Character

The Historic Landscape Character of the chalk valley and downland within which the project area is situated is summarised on the Dorset Council website as being one of predominantly large-scale enclosure with some areas of Parliamentary enclosure. Much of this enclosure is more recent and includes some enclosure of areas of former open fields adjacent to villages (Dorset Council 2021). There are some notable country houses and parkland estates within this character type, although none directly within the project area. There are, however, the remains of a number of former medieval deer parks, whose distinctive boundary lines have clearly influenced later historic boundary development. Ribbons of woodland, along with some larger woodland tracts, are present along the sides of ridges and some plateaux, but do not dominate.

The relationship between geology, soils and land-use within the project area has undoubtedly played a significant role in the survival of archaeological monuments and the ways in which these can be identified using aerial photographs and lidar imagery. The long history of grazing on the chalk downland, for example, probably combined with the underlying geology and the nature of agricultural practices on more marginal land, has likely contributed to the high prevalence of surviving earthworks to be found in these areas. These are typically associated with extensive prehistoric field systems and affiliated sites, such as enclosures and settlements, large-scale boundaries and linear dykes. Within the project area there is not the same density of prehistoric ritual and ceremonial sites as are to be found further eastwards, within the confines of Cranborne Chase, for example, but the AIM project results demonstrate that a number of funerary barrows and barrow cemeteries of Neolithic and Bronze Age date are to be found scattered in amongst the field systems of the higher downland.

There is also a prevalence for agricultural features, such as lynchets, field boundaries, and settlements of medieval date juxtaposed with some prehistoric field systems, particularly closer to, and often respecting, the coombe and valley sides. As mentioned above, there are several relict medieval deer parks within the project area and features associated with these were recorded by the project. Within the coombes and valleys, the more intensively farmed soils have led to a more partial survival of archaeological monuments. Even so, earthwork and cropmark evidence in these areas indicate a long-lived and complex agricultural and settled landscape extending back into at least the Iron Age, if not earlier. Typically, the presence of multi-period features in these areas represent a palimpsest of human activity and continuity, with many later prehistoric sites indicating some degree of ongoing relationship and modification into the medieval and post-medieval periods.

Post-medieval archaeological sites are dominated by features associated with chalk and gravel extraction, also water meadows along the valley bottoms. A number of modern military sites, particularly of Second World War date, were also recorded by the project, some of which still survive, or partially survive.

3. SURVEY RESULTS: OVERVIEW

Sources Used

Over 75 years of aerial reconnaissance has taken place in the project area. Extensive programmes of aerial photography were carried out by the Royal Air Force (RAF) in the years during and after the Second World War and the earliest photographs available to the project were vertical and oblique images dating to 1945. Continued programmes of vertical photography were carried out in the area by the RAF in the years immediately after the Second World War, although coverage of these for the project area is rather patchy. Near-blanket vertical cover is provided by flights carried out by the Ordnance Survey (OS) in the 1960s to the present day. Additionally, the Historic England Archive (HEA) holds a series of specialist oblique aerial photographs of significant monuments within the project area.

The primary source of aerial photographs used in this project was the HEA collection in Swindon; 1674 prints, laser copies and digital images were loaned from this collection. Pan Government Agreement geo-referenced digital aerial photographs were provided to the project by HE. Digital photographs from Google Earth were also available, accessed via the internet. Details of photographs used during the project are contained in Appendix 1.

Specialist oblique photographs

Systematic programmes of national aerial reconnaissance, specifically to record archaeological sites, important buildings, historic landscapes and other features of interest, have been undertaken since the later 1960s by the Royal Commission on the Historic Monuments of England, latterly as part of Historic England. The photographs collected by the National Monuments Record (NMR), now HEA, provided the bulk of the oblique coverage available to this project, which amounted to 476 prints in total, 30% of the overall aerial photographic loan.

Oblique photographs taken in slanting sunlight (either during the winter months or in the early morning or late evenings of summer) are an ideal medium for recording earthwork monuments as well as upstanding historic buildings (see Fig 6). Many sites recorded on oblique aerial photographs are also levelled features visible as cropmarks. Buried sites visible as cropmarks have been photographed in the project area since the 1960s. More recent aerial reconnaissance has recorded new sites as well as adding detail to previously known sites; this demonstrates the continued potential for further discovery of surface and sub-surface through programmes of ongoing reconnaissance.



Figure 6 Earthworks at Cattistock Castle depicted on a specialist oblique photograph.

A univallate hillfort (MDO466) known as Cattistock Castle. The upstanding features are picked out in low sunlight along with the linear earthworks of an adjacent medieval strip field system (MDO683). Photograph: Part of NMR 24507/01, 10 Jan 2007 © Historic England NMR.

Military oblique photographs

A small number (96) of military oblique photographs were available for the project area, just under 6% of the total aerial photographs on loan. These were entirely from sorties carried out in June 1945 along Wardon Hill, Sydling St Nicholas, which was the site of a military hospital and D-Day camp (MDO43058).

Vertical photographs

The advantage of vertical photography is that large areas are usually surveyed, although not usually for archaeological purposes. Therefore, whilst the combination of sorties available provide near blanket cover of the project area, many were not taken at the most favourable times of day or year to maximise the visibility of archaeological features.

The value of the RAF images taken in the 1940s cannot be overstated. These historic photographs provide a snapshot of the military landscape during and soon

after the war (Fig 7). They are also an important source of information, particularly for medieval and later agricultural and extractive features. The vertical aerial photographs provided on loan by the HEA amounted to 1609, just under 64% overall. The provision of a wide variety of later sorties (the OS collections and online digital colour photographs from Google) ensured that coverage from vertical photography for all areas was good.



Figure 7 A Second World War military hospital and D-Day camp, Hill, Sydling St Nicholas.

Important yet short-lived features are visible on this vertical photograph taken by the RAF towards the end of the war. MDO43058 Photograph: Part of RAF 106G/LA/218 FS 2017, 15 April 1945 Historic England RAF Photography.

Lidar data

Airborne laser scanning also known as lidar (Light Detection and Ranging) has become an invaluable tool for archaeological survey over recent years (English Heritage 2010). It is particularly useful in areas where conventional aerial photography is of little benefit, such as in woodland, as well as allowing the identification of very low earthworks in arable fields which would often require exceptional natural low slanting light to be seen from the air or on the ground.

Digital elevation models are created using pulsed laser beams bouncing off the surface ground. A Digital Surface Model (DSM) is a model of the surface of the earth including all features such as trees and buildings. Digital Terrain Models (DTM) are created using mathematical algorithms to remove all features above the natural ground surface such as the tree canopy. The technique allows the identification and recording of upstanding features on the ground to sub-metre accuracy. The benefits

of using lidar for archaeological recording have been previously recognized (Bewley *et al* 2005; Devereux *et al* 2005; Hesse 2010; Royall 2013; Carpenter *et al* 2016).



Figure 8 Environment Agency lidar coverage for the project area.

The Environment Agency (Geomatics) has been carrying out lidar surveys of the country since 2000. These provided approximately 39km² of lidar data cover for the project area, around 39% of the total, available in DSM and DTM format at 1m resolution. The coverage was greatest in the southwestern quadrant of the project area, with approximately 23km² of lidar data along the River Frome and its tributaries. The south eastern quadrant accounted for a further 11km², along Sydling Water. The remaining 5km² extended into the northern two quadrants, staying tight to the two river valleys. The bulk of the northern half of the project area and the tract of high ground between the two rivers, east of Maiden Newton, totalling approximately 61% of the project area, had no lidar coverage (Fig 8).

The DSM and DTM data were available as ascii grid files which were viewed and modelled in AutoCAD. To assist site identification and interpretation, multiple visualisations were generated using the Relief Visualisation Toolbox developed by the Institute of Anthropological and Spatial Studies at the Research Centre of the Slovenian Academy of Sciences and Arts.

Quantification

Overview of the AI&M Mapping

AI&M methodology entails the interpretation, mapping and recording of all archaeological sites from the Neolithic to the twentieth century from all readily

available aerial photographic sources and lidar imagery. Features visible on aerial photographs include moderately substantial ditched or banked features either surviving above ground as earthworks, or as sub-surface features revealed as cropmarks. Relatively slight earthworks under tree cover or in open ground can be identified from lidar imagery.

Historic aerial photography also provides details of earthworks and structures which have subsequently been denuded or levelled by ploughing, or otherwise destroyed or removed. The results of the AI&M mapping of the project area are presented in Figure 9. All sites mapped were recorded in the Dorset HBSMR database. This database automatically generates unique project record numbers prefixed MDO and all sites discussed in this report will be referenced using these.



Figure 9 The Upper Frome and Sydling Valleys AI&M project area showing all AI&M mapping.

Monuments Records

In total the Upper Frome and Sydling Valley AI&M Project created 975 monument records. The general locations of these sites are displayed as dot-data on the distribution map (Fig 10). The map shows that in terms of overall distribution, sites were plotted right across the project area although larger concentrations of sites were broadly found in the southwestern quadrant of the project area and along the river valleys and valley sides, with fewer sites located on the higher plateaux.

On average the project recorded 9.75 sites for each km². Of the 975 monuments recorded, 825 (84.6%) were for completely new sites not previously recorded in the Dorset HBSMR or in the national NRHE database curated by HE. A further 75 monuments (7.7%) were previously recorded in the NRHE database but were not

recorded in the Dorset HBSMR. The remaining 75 monuments (7.7%) were amendments made to sites already recorded in the Dorset HBSMR, and of these, 44 (59%) were also recorded in the NRHE database.



Figure 10 Distribution of all monuments recorded during the project.

Prior to the survey 242 monuments were recorded in the project area in the Dorset HBSMR. The project has therefore resulted in an enhancement of existing records of 31.8% and just over a 75% increase in the total number of monuments recorded for the project area once the mapping project was completed.

Scheduled Monuments

There are 36 Scheduled Monuments within the Upper Frome and Sydling Valleys project area (Fig 11). The following data (Table 1) is from Historic England's National Heritage List for England (NHLE) data © Historic England [2017].

NHLE	Name	NGR
1002416	Cerne Park boundary bank	ST 65061 01467
1002451	Round barrow on Magiston Hill	SY 64074 96991
1002460	Field system on Seldon Hill	ST 65064 02590
1002461	Round barrow on Ellston Hill	ST 63697 01747
1002464	Round barrow on North Field Hill	ST 62200 00739
1002465	Field system and enclosures on Middle Hill	ST 59985 00158
1002470	Round barrow NW of Jackman's Cross	SY 64544 96232

Table 1: Scheduled Monuments

1002683	Frampton Roman villa	SY 61599 95282	
1002766	Martin Down enclosure 300m N of Huish Barn	SY 64014 98574	
1002820	Earthworks on Loscombe Hill	ST 61942 00309	
1002832	Round barrow in Grimstone Clumps	SY 64519 95085	
1002833	Group of three round barrows NE of Jackman's Cross	SY 65152 96202	
1002855	Round barrows on Cross Hill	ST 62162 01646	
1002856	Earthwork on Cross Hill	ST 62180 01621	
1002850	Enclosed Iron Age farmstead and part of an associated	SV 60054 09752	
1002037	field system 215m west of New Barn	51 00954 98752	
1002863	Two bowl barrows 310m NE of Lancombe Farm	SY 56850 99383	
1002866	Field system W of Fore Hill	SY 60323 97682	
1003209	Tithe barn at Court Farm	SY 63047 99236	
1003228	Round barrow on Hogcliff Hill	SY 62171 96761	
1003771	Multi-period landscape 600m SE of Langford Farm	SY 64482 95594	
1004545	The Castle hillfort	ST 59426 00103	
1004548	Bowl barrow 660m SW of Chilstock	SY 58383 98212	
1005576	Wynford Wood boundary bank	SY 57135 96218	
1015041	Cross and Hand wayside cross 670m S of the Friary of	ST 63180 03780	
	St Francis		
1015042	Medieval standing cross 190m SE of St Mary's Church	SY 59708 97707	
1015044	Medieval standing cross 11m SE of the south porch of	SV 59638 97875	
1010011	St Mary's Church	51 07000 77070	
1015051	Bowl barrow 1km SW of Manor Farm	ST 56057 00221	
1015052	Bowl barrow on East Hill near Sydling Woods	ST 62125 02485	
1015053	Bowl barrow on East Hill near Sydling Woods	ST 62166 02446	
1015054	Bowl barrow on East Hill near Sydling Woods	ST 62223 02422	
1015178	Bowl barrow on Wancombe Hill 380m SW of southern	OT (A(0 = 0.001))	
1013178	corner of Sherriffs Wood	51 64605 02212	
1015179	Medieval standing cross 10m W of Broomhill Cottage	ST 56430 02551	
1016008	Bowl barrow on Batcombe Down 450m SW of the	ST 62847 04055	
1010090	Friary of St Francis	51 02047 04033	
1016376	Bowl barrow 140m SE of Broadwater Cottage	SY 58098 95621	
1017925	Bowl barrow 650m S of The Friary of St Francis	ST 63217 03805	
1020184	Park pale in Rampisham park	ST 55406 02396	



Figure 11 Scheduled Monuments within the project area.

Breakdown of monuments by period

The numbers of sites recorded by period are listed in Table 2. The date ranges used in this report conform to national standards (e.g., FISH 2021) and are those used in the Dorset HBSMR. With the exception of the early medieval period, archaeological sites were recorded for all periods from the Neolithic to the mid-20th century.

It should be noted that the nature of aerial photographic evidence means that only the broader archaeological periods can be assigned to sites unless there is further corroborative dating evidence arising from fieldwork, artefact scatters or excavation. In this report, sites have been assigned broad archaeological periods based on the evidence from morphology, context and association with other securely dated sites. Some generalisations have been made; for example, ring ditches which were considered to relate to funerary practices have been assigned to the Bronze Age despite their potential for being of Late Neolithic/Early Bronze Age origin. Similarly, late prehistoric enclosures, settlements and field systems have in the main been allocated an Iron Age/Roman date although some may have their origins in the Bronze Age. This broad approach reflects the indexing of the database entries within the Dorset HBSMR.

Additionally, for some sites where there were features of potentially multiple date present but where these were difficult to distinguish (e.g., for some late prehistoric field systems juxtaposed with features of potentially medieval or post-medieval date), the most predominant date was assigned, with qualification given in the HER record description.

Period	Amended Sites	New Sites	Total
Neolithic/Bronze Age		3	3
Bronze Age	14	28	42
Bronze Age/Iron Age		3	3
Bronze Age/Iron Age/Roman		1	1
Iron Age	3	5	8
Iron Age/Roman	22	68	90
Roman	1	1	2
Medieval	18	158	176
Medieval/Uncertain		1	1
Medieval/Post-Medieval		107	107
Post-Medieval	9	484	493
Post-Medieval/Uncertain		3	3
20th Century		1	1
Second World War	7	18	25
Uncertain	1	19	20
Total	75	900	975

Table 2 No. of sites recorded in the Dorset HER during the project, by period.

Simplified using an earliest 'date from' schematic (Chart 1), the largest number of monuments, 50.8% of the total, were considered to be post-medieval in origin. These were predominantly industrial or agricultural in character. A further 29% of monuments were awarded an at earliest medieval date and these were largely agricultural in nature or settlement related. Overall, these combined totals reflect the predominantly rural agricultural and small-scale industrial character of the historic landscape of the project area.



Chart 1 Simplified ratio of monuments by period derived from 'date from'.

Monuments of prehistoric date were relatively well-represented, at 15% of the total. These were predominantly associated with field systems, trackways, enclosures and settlements of broadly Iron Age to Roman date but included a number of Neolithic and/or Bronze Age barrows and some additional features, such as enclosures, ring ditches and boundaries, of less certain date. Distinctively Roman sites were poorly represented in the project area, with just two sites (0.2%) recorded.

A reasonably significant number of Second World War sites, comprising 2.6% of the total number of monuments recorded. These were largely defensive structures such as pillboxes and anti-tank obstacles but also included larger military sites and installations, including a military hospital and D-Day camp.

Breakdown of monuments by type

The highest ratio of monument types recorded by the project were those associated with post-medieval extraction, in particular small-scale chalk pits, followed by more generic extractive pits, gravel pits and quarries. Overall, these features make up over 42% of the total number of monuments recorded. Many of them are recorded on the OS 1st Edition c1880s maps, where most are shown as disused.

Agricultural sites such as field systems, enclosures, field boundaries, lynchets, strip lynchets and strip fields make up just under 30% of all recorded monuments, with a further 10.4% of sites indicating ridge and furrow cultivation or more generic cultivation marks. Additional monuments, such as deer parks, drove roads, trackways, orchards, water meadows, watercress beds and wood banks, make up a further 3.5% of the monument total, help illustrate the predominantly agricultural landscape of the project area between the later prehistoric to post-medieval periods, and the breadth of land use across these periods.

Bronze Age barrows make up 4.4% of the total number of monuments recorded. Cumulatively, Second World War sites represent 2.5% of the total overall. The majority of the remaining monument types individually come in around or below 0.1-0.2%. The totals for each monument type, derived from the principal feature representative of each site, are presented in Table 2, below.

Monument Type	No of Sites	% of Total
Anti-Aircraft Battery	1	0.1%
Anti-Tank Obstacle	9	0.9%
Barrow (Bowl, Oval, Round)	43	4.4%
Boundary Bank	1	0.1%
Cross Dyke	3	0.3%
Cultivation Marks/Ridge and Furrow	103	10.4%
Deer Park	4	0.4%
Deserted/Shrunken Settlement	7	0.7%
Drainage Ditch/Drainage System	15	1.5%
Drove Road	1	0.1%
Enclosed Settlement	2	0.2%

Table 2 Ratio of monument types recorded by the project.

Enclosure	28	2.9%
Extractive pits/Quarry	415	42.6%
Farmstead	1	0.1%
Field Boundary	156	16%
Field System	50	5.2%
Firing Range	1	0.1%
Lime Kiln	2	0.2%
Military Camp	2	0.2%
Military Hospital	1	0.1%
Moat	1	0.1%
Mound	2	0.2%
Orchard	3	0.3%
Pillbox	10	1%
Platform	1	0.1%
Radar Station	1	0.1%
Reservoir	1	0.1%
Ring Ditch	2	0.2%
Road	1	0.1%
Sewage Works	1	0.1%
Spoil Heap	2	0.2%
Strip Field	29	3%
Strip Lynchet/Lynchet	44	4.6%
Terraced Ground	1	0.1%
Trackway/Footpath/Hollow Way	16	1.6%
Univallate Hillfort	1	0.1%
Villa	1	0.1%
Water Channel	2	0.2%
Water Meadow	8	0.8%
Watercress Bed	2	0.2%
Wood Bank	1	0.1%

Form and Survival of Sites

The form and survival of each site was recorded in the project database. This captured both the earliest visible form of the site identified on aerial photographs or lidar imagery, as well as the latest visible form, where this could be established. Only the last known form was recorded in the Dorset HER, as visible on the latest Google Earth imagery or on lidar, for example, which was not necessarily the form of the site on the photographs from which it was plotted.

For example, if a site was visible as an earthwork on early 1940s RAF photographs but was later plough-levelled and consequently only visible as a cropmark on the

latest photography, then the site was recorded in the database as a cropmark. Similarly, if a site was not visible at all (neither as earthworks nor cropmarks) on the latest imagery but had been plotted as an earthwork from early photographs, it would be recorded in the database as a levelled earthwork. Where no assessment of the current state of the monument could be made, for example if the site was obscured by vegetation (tree-cover or scrub), it was recorded as an earthwork.

For many of the most complex sites, such as later prehistoric field systems, for example, monument survival was often reflected by a range of forms, as earthworks, cropmarks or levelled earthworks, dependent on varying land use, the time of year in which the aerial photographs were taken, and on the variation in survival and condition across the site itself. In these instances, the last visible form was recorded variously as earthworks, cropmarks or levelled earthworks.

Some broad generalisations over the survival of sites and their distribution can be made (see Fig 12). The majority of monuments recorded by the project survive as extant earthworks and these sites are distributed widely across the project area. Broadly, where sites have been partially or totally levelled, these are more prevalent along the valley and coombe sides and along the valley floors. Sites revealed by cropmarks or as a mix of cropmarks and earthworks have a similar distribution. A line of surviving structures following the railway line to the southeast of Maiden Newton are largely Second World War pillboxes. A small number of demolished or partially demolished structures along the same route represent further Second World War defences, since lost.



Figure 12 Form and survival of monuments recorded within the project area. The relative density of extant earthworks within the southwest quadrant and along the river valleys is likely a product of the lidar coverage of these areas.

A summary of the last known form of the monuments recorded by the project is presented in Table 3. Of the 975 sites recorded by the project, 86.9% survive as earthworks or partial earthworks or were visible as cropmarks. Just under 10% of earthworks (95 sites) are no longer visible as upstanding remains on the latest aerial photographs or lidar imagery. Fifteen sites (1.5%) survive as extant structures, with a further 18 sites (1.8%) recorded as demolished, moved or ruined structures.

Last Known Form	No of Sites	% of Total
Cropmark	67	6.9%
Cropmark/Levelled Earthwork	7	0.7%
Demolished Structure	6	0.6%
Demolished/Ruined Structure/Earthwork	5	0.5%
Demolished Structure/Levelled Earthwork	5	0.5%
Earthwork	669	68.6%
Earthwork/Cropmark	38	3.9%
Earthwork/Levelled Earthwork	66	6.8%
Levelled Earthwork	95	9.7%
Moved Structure	2	0.2%
Structure	15	1.5%

Table 3 Form and survival of monuments recorded in the Dorset HER.

4. THEMATIC OVERVIEW

The following section comprises a discussion of the sites mapped by the project in the context of their historic setting and function. The themes presented below are intended to provide a contextual discussion of the principal results using selected case studies as illustration. Some sites and period topics are therefore excluded from this section. A discussion of later prehistoric ceremonial activity largely focusses on Bronze Age barrows and their historic landscape context. Of particular note are settlement and agricultural activity during the later prehistoric and Roman periods, and into the medieval and post-medieval periods. Another notable theme is that of routeways through the landscape from later prehistory into the post-medieval period. The post-medieval extractive industry is also discussed, as is the wartime history of the project area, through a range of Second World War military sites; some already documented, others discovered for the first time.



Evidence for prehistoric ceremonial activity

Figure 13 Neolithic and Bronze Age sites previously recorded in the Dorset HBSMR.

Prior to the start of the project, the Dorset HBSMR recorded 58 sites of Neolithic or Bronze Age date within the project area. Only two sites of Neolithic date featured; a ploughed-out mound at Cromlech Crock Lane, Wraxall, recorded by Grinsell (1959) as a possible long barrow (MDO3449), and a Neolithic axe-head (MDO2629) found to the south of Sydling St Nicholas. The remaining 56 monuments are mainly Bronze Age barrows with a distribution pattern favouring the middle to high ground between the river valleys, typically located towards the tips of spurs or along the ridge edges above the 120m contour mark (Fig 13). During the project, 14 (25%) of the barrow sites already recorded in the Dorset HBSMR were amended, the remainder were not visible on the available aerial sources. An additional 29 barrow or possible barrow sites were identified and added to the Dorset HBSMR, however, an increase of almost 52%. The distribution of the barrows mapped by the project, both new and amended, exemplify a similar pattern to those already recorded, the majority of which sit between 170m and 190m OD with just a small number of sites extending onto the lower valley slopes (Fig 14).

Some of the earliest evidence for open land during the Neolithic period, is found on areas of lightest soils, including the chalk downland of Wessex where a recent reappraisal of the formation of this type of landscape revealed piecemeal woodland clearance commencing from around 9000 years ago , with open grassland well formed by around 3500 years ago (Allen and Scaife 2007, 32). The innovations of the Early Neolithic occurred over several centuries and included the adoption of new artefact forms, developments in domestic and monumental architecture, a move towards arable agriculture and pastoralism and exchange between communities (Oswald *et al* 2001, 1-2; Whittle *et al* 2011, 4-5). Dating evidence broadly suggests a gap of around 3 to 4 centuries between the earliest known Neolithic activity and the beginnings of monument building (Whittle *et al* 2011, 1). Based on modelling carried out by Whittle *et al* (2011, chapter 14), however, this may be more closely refined to around 250 years in south Wessex.



Figure 14 Neolithic and Bronze Age barrow sites recorded by the project (new and amended).

The project area lacks evidence for any of the large ceremonial monuments of the Early to Middle Neolithic period, such as causewayed enclosures or cursus monuments, for example, but may contain several examples of long barrows or oval barrows, part of the suite of long barrow forms. Long barrows were the first Early Neolithic monuments to appear (by around 3800 cal BC) and traditionally comprise of elongated mounds of material, rarely more than 50m in length and up to 25m wide, sometimes slightly trapezoidal or oval in form and often with one end higher and wider than the other (Historic England 2018a, 2). Typically, the mounds have ditches alongside from which the material of the mound may in part derive. The majority of long barrows known to date are located on elevated ground, typically on, or to one side of, ridges and orientated on an east-west alignment.

Smaller than the larger long barrow, the oval barrow was previously considered to be a new form of construction independent from the larger long and bank barrows. Now, however, it has been shown to be a later development of that same tradition. This was recently demonstrated by radiocarbon dating of Wor Barrow, for example, a Neolithic oval barrow on Cranborne Chase, which indicated that the main period of construction took place towards the end of the 38th or the first half of the 37th century cal BC (Allen *et al* 2016, 17).

The round barrow became the dominant funerary monument type during the Early Bronze Age. The earliest barrows are typically small-scale and associated with Beaker pottery, which first enters the archaeological record from around 2500 cal BC. The main period of round barrow construction dates to between 2000-1500 BC (Historic England 2018a, 3). The size of round barrows can vary enormously, from just 5-6m across to monumental examples over 50m in diameter and over 6m high. A variety of forms of round barrow are known, of which the most common is the bowl barrow; generally, a 'pudding bowl' shaped mound of earth and stone, usually but not exclusively derived from a surrounding quarry ditch (*ibid*, 2).

Many barrows occur in groups of two or three, although isolated examples are also common. Sometimes multiple barrows of up to thirty or more are positioned together to form larger barrow cemeteries, which can include linear forms (Historic England 2018a, 7). Research is showing that many barrow groups contain barrows without burials – or demonstrate that burials represent a minor element of the activity on the barrow site. In the Wessex area this is particularly true of enclosure barrow types, such as saucer barrows and pond barrows, for example, which often contain pits with objects rather than people (e.g., Jones and Quinnell 2014). What may have been developing over the time of use of barrows as burial mounds was the concept of a funerary area focussed on a broader sphere of ceremonial activity rather than solely for burial.

The overall distribution pattern of Neolithic and Early Bronze Age sites recorded across the project area echoes the wider picture in Dorset, with a clear predilection for the lighter chalk soils and river valley floodplains, which is where the majority of prehistoric monuments in Dorset are found. This apparent predominance of sites on the middle to higher ground within the project area may reflect, however, at least in part, a broader bias towards the preservation and visibility of prehistoric monuments on chalk downland, which saw little cultivation or intensification of agriculture until relatively recent times. Barrows are known elsewhere to occur anywhere within the landscape, with many known examples of levelled barrows within river valley environments (Historic England 2018a, 7). The higher chalk downland was probably less intensively occupied than the lower lying valleys during the Neolithic to Early Bronze Age, although settlement remains of this date are difficult to detect, usually identified by proxy from lithic scatters (Field 2006; Taylor 2004). Taylor (2004, 29) notes that the lower valleys would have been the

principal areas of settlement during this period, from where the positioning of barrows just below the crests of the ridge tops would have visibly dominated. The true extent of Neolithic to Early Bronze Age activity within the project area is therefore likely to be far more complex than the current evidence suggests.

The character, scale and distribution of Neolithic and Early Bronze Age ceremonial monuments within the chalk downland landscape of the project area can be compared with other areas sharing a similar physical landscape character, such as Cranborne Chase to the northeast, for example, and the Stonehenge World Heritage Site landscape, further to the northeast in Wiltshire. In contrast to the project area, both these latter areas contain extensive Neolithic/Early Bronze Age monumental landscapes, with complexes of Neolithic monuments providing a focus around which a density of future Early Bronze Age funerary monuments became established, most notably those of particular complexity, wealth and status (e.g., Woodward 2000).

On Cranborne Chase, the Neolithic henge sites forming the Knowlton Circles provided one of these foci, becoming central to an extensive Bronze Age ceremonial landscape that developed within and around it. This landscape was mapped by Stoertz (2007) during the Knowlton Circles Landscape Project, and subsequently during the Lower Dorset Stour AI&M project (Fleming and Royall 2020). The juxtaposition of ceremonial monuments with contemporary and later settlement surrounding Knowlton Circles is demonstrated at High Lea Farm, to the south of Knowlton, where a complex linear Bronze Age barrow cemetery was excavated by Bournemouth University in the early 2000s (Gale et al 2004; 2007; 2008). The evidence demonstrated that the earliest activity on the site was in the form of two Neolithic oval barrows, which were followed by a small Beaker settlement associated with an early mortuary enclosure containing cremation burials. A wooden structure found underlying one of the best-preserved barrows in the linear barrow cemetery was radiocarbon dated, revealing it to be closely contemporary with the Southern Henge at Knowlton (Gale 2017). There was also evidence of subsequent Middle Bronze Age activity in the form of a ring ditch associated with Deverel-Rimbury ware. Overlying the ring ditch was a small Saxon cemetery (Gale et al 2008, 112).

Within the project area the mapping results indicate a much more attenuated distribution of sites, which typically consist of solitary barrows or small groupings rather than large complex arrangements. Early Bronze Age round barrows feature, notably bowl barrows, often simple mounds without any evident outer ditch, implying they were constructed from turf stripped from the surrounding area. It has been suggested that these simple barrows may be relatively early in the sequence, possibly dating to before c 2200-2100 BC, and being potentially single-phased barrows associated with a single inhumation burial (Garwood 2007, 36). On the available evidence, there appears to be an absence of the more sophisticated forms of round barrow, such as bell, saucer, pond and disc barrows, for example, which have sometimes been referred to in the past as 'fancy barrows' or 'Wessex barrows' as it was believed that they were most commonly found to be associated with the 'Wessex Culture' in this area (Historic England 2018a, 5; Woodward 2000).

Examples of later Early Bronze Age/Middle Bronze Age barrows, or sometimes reused Early Bronze Age barrows, are known in Dorset, typically associated with Deverel-Rimbury ware and cremation burials; as at Simons Ground cemetery near Wimborne, for example (White 1982). Current evidence suggests these later barrows are typically located closer to settlement areas beyond the locus of the Early Bronze Age monumental landscapes and are often of smaller construction, sometimes encircled by shallow ditches (Bradley and Fraser 2010). There is also some correlation between Middle Bronze Age barrows and settlements of this date (Woodward 2000). It is possible that two barrows recorded in association with a Middle Bronze Age settlement on Shearplace Hill may fall into this category (see p38-9 below).

The distribution pattern of barrows within the project area may be more typical of areas beyond the foci of the large, monumental complexes but what this signifies in terms of comparative societal indicators such as belief systems, social organisation, wealth and status and cultural expression is still a topic of ongoing research (e.g., Garwood 2007; Johnston 2020). Physically, the spacing and location of sites towards the ends of ridge tops and spurs along the river valleys appears remarkably even, with a notable number of barrows sited at around 170m-190m OD; as if some deliberate construction and associations were taking place (to the west of Chilfrome below, for example, and see Fig 18). The positioning may be partly topographically determined but also crafted to optimise visibility for the communities living within the lower valleys. Whilst the recorded sites almost certainly represent just part of the overall picture, it would be interesting to explore, through viewshed analysis, for instance, how far these sites were intervisible with each other and with certain areas of the landscape to see if any identifiable patterns emerge.

Neolithic

Three sites of possible Neolithic date were mapped by the project, all comprising of low oval mounds considered to be possible oval barrows (MDOs 42237; 42240; 43215). One of these (MDO43215), a possible Neolithic oval barrow on the north side of Daws Hill, Wraxall, is visible on 1940s aerial photographs as a low oval mound approximately 25m by 16.3m, encircled by a continuous 4.5m wide outer ditch (Fig 15).

Closely adjacent to barrow MDO43215 are linear earthworks associated with a prehistoric field system of possible Iron Age to Roman date (MDO42461), but with potentially earlier origins. This juxtaposition of Neolithic and Early Bronze Age monuments with later prehistoric field systems and settlements is a common theme within the project area, as further exemplified in the discussion on Bronze Age round barrows in the following section (see p33-4). In some areas, the pattern of later settlement and field systems within the project area appears to respect and even preserve these earlier ceremonial monuments but to what extent these may have held any social recognition or meaning for later Bronze Age societies is uncertain. There were considerable lapses of time between the construction of the Neolithic long barrows and that of the Early Bronze Age round barrows but where both traditions of barrow construction are found on the chalk downland, these former ceremonial sites nonetheless appear to have become enfolded within the developing settled agricultural landscape of the Middle Bronze Age onwards, with some suggestion of deliberate association in places.



Figure 15 Possible Neolithic oval barrow on Daws Hill, Wraxall. MDO43215. Photograph: Part of RAF/CPE/UK/1974 RP 3386 11-APR-47 Historic England RAF Photography.

Bronze Age

Forty-two barrows or possible barrows of probable Bronze Age date were mapped by the project, all considered to be some form of simple round barrow, mainly bowl barrows. As previously noted, the majority of the barrows recorded by the project were isolated examples, although some of these stood in relative proximity to further barrows that were recorded in the Dorset HBSMR and the NRHE databases but were not visible on available aerial sources and therefore not mapped.

One prominent example of a solitary bowl barrow (MDO2615) was plotted from 1940s aerial photographs on North Field Hill, Sydling St Nicholas. The barrow consists of a low mound just over 10m in diameter, situated on a small southeast facing spur on the northern ridge of a small coombe at around 185m OD (Fig 16). A curvilinear earthwork encloses the spur on its southwest, south and northeast sides, effectively containing the barrow. The earthwork forms part of a wider area of linear earthworks associated with a prehistoric field system (MDO2620), interspersed and respected by areas of medieval to post-medieval ridge and furrow (MDO43131/2).

There are a small number of examples of loose barrow groups within the project area, as well as individual barrows that stand apart, but which may have been constructed in relation to each other, perhaps sited so as to be deliberately intervisible or sharing an association with a particular area or landscape. To the west of Chilfrome, for example, two individual round barrows (MDO42239; 42230) were mapped by the project from lidar imagery on Whitesheet Hill and Luxmore Hill (Fig 17).

The southernmost of these (MDO42399) consists of a low mound roughly 11m in diameter and positioned on the plateau of a west-facing spur at 170m OD. The barrow is situated amongst an extensive area of linear earthworks associated with a

prehistoric field system (MDO42160) on the edges of the high ground to the south and west, and a medieval field system (MDO920) on the lower slopes to the north.



Figure 16 Bowl barrow on North Field Hill, Sydling St Nicholas. MDO2615. Photograph: Part of RAF/CPE/UK/1974 FS 2382 11-APR-47 Historic England RAF Photography.

The northernmost barrow (MDO42230) consists of a low mound approximately 15m in diameter and positioned just below the brow of a south-facing ridgetop, also at around 170m OD. Adjacent to the west and southwest are earthworks associated with the same prehistoric field system MDO42160, juxtaposed to the southeast of the barrow with lynchets associated with a medieval field system (MDO42324) that extends along the lower slopes between the ridge top and Chilfrome.



Figure 17 Round barrows to the west of Chilfrome, juxtaposed with late prehistoric and medieval field systems.

MDO42239; 42230. © Historic England; source Environment Agency.
The two barrows to the west of Chilfrome are situated around 950m distant from each other. They form part of a loose arrangement of barrows in this locality, positioned between 500m and 1km apart on the ends of ridges and hilltops between the 170m and 190m contour mark (Fig 18). Their location suggests potentially deliberate construction so as to be intervisible with each other, as well as possibly laying claim to particular topographic areas. They would also probably have been visible from certain areas within the wider landscape. This potentially deliberate positioning is an example of the broader pattern that extrapolates out across the project area, as suggested above (p29), indicating possible associations and relationships even amongst individual barrows as well as larger barrow groups.



Figure 18 The geographical positioning of round barrows to the west of Chilfrome.

One example of a small barrow group mapped by the project comprises three bowl barrows (MDOs 2605-2608) positioned together in a loose east-west aligned row on top of Cross Hill, northwest of Up Sydling, Sydling St Nicholas (Fig 19). As with the individual barrow examples above, this group is situated on a bulbous southeast-facing spur at 180m OD. Two of the three barrows are separated off by a historic field boundary and comprise of two low mounds approximately 11m and 17m in diameter, under grass. The third barrow is located just under 90m to the southwest and is visible as a sub-circular earthwork approximately 12.5m in diameter and with evidence of prior excavation across its surface. It is situated within an area of possible medieval ridge and furrow cultivation, bounded by a rectilinear earthwork to the south and west. Although probably a field boundary of contemporary date it is closely adjacent to areas of prehistoric field systems (MDO43081; 2623) along the ridges to the north and northwest. On the south side of the earthwork is a small rectilinear enclosure (MDO2604), possibly of post-medieval date (Fig 19).



Figure 19 Round barrows on Cross Hill, Sydling St Nicholas. MDO2615. Photograph: Part of RAF/CPE/UK/1974 FS 2382 11-APR-47 Historic England RAF Photography.

As observed above (p29; 31), a common theme of the project area is the relationship between Neolithic and Bronze Age barrows and late prehistoric field systems. In many cases barrow sites are contained and respected by prehistoric field boundaries, with a few instances of barrows which appear to have been deliberately integrated into the boundary earthworks, being positioned at corners or junctions (Fig 20).



Figure 20 Round barrows positioned at the junctions of prehistoric field boundaries at Chilfrome and on Grimstone Down.

MDO42231-2; 42876-8. © Historic England; source Environment Agency.

Whether there was inherent meaning in this is uncertain; were they being deliberately incorporated because their former significance still resonated or was

this just a practical and functional response to the re-use of former upstanding earthworks. Perhaps there was deliberate inclusivity in the way these former monuments were absorbed into the social changes taking place, with communities showing their connection to areas of land by referencing ancestral places.

The juxtaposition of barrows with prehistoric field systems has previously been observed elsewhere on chalk downland landscapes (e.g., Fleming 1987, 191; Woodward 2000, 53-4). Recent examples in Wessex include those identified during the Dorset Ridgeway NMP project (Royall 2011, 45) and within the Stonehenge World Heritage Site Landscape and the Salisbury Plain Training Area, for example (Bowden *et al* 2012; McOmish *et al* 2002). Within the Stonehenge World Heritage Site Landscape, examples of field systems in association with the Lake Barrow and Diamond Barrow groups were found to be contemporary with evidence of Middle Bronze Age activity at the barrows, in the form of deposition of Deverel-Rimbury urns (*ibid*, 30). The survey by Bowden *et al* (2012, 30, 32) also concluded that there was distinct chronological depth to the field systems, which included evidence for later sub-division in character with later Romano-British fields but lacking any material evidence to date this as such.

McOmish *et al* (2002, 61) particularly noted some correlation to the east of the Avon between increased sub-division of fields relative to greater densities of barrows. It was mooted that field systems there might have been laid out with reference to pre-existing landscape markers, such as barrows, but the presence of significant hollows at the intersections of some field boundaries was also observed. The use for such features as territorial markers, or alternatively, meeting places, was suggested, mooting that such features were perhaps communally recognised as significant, thus explaining their inclusion into later earthworks (*ibid*, 62).

Summary

To summarise, the evidence currently suggests a focus of Neolithic and Early Bronze Age activity along the edges and tops of the higher ground above the upper Frome and Sydling river valleys, with barrow sites spaced at relatively even intervals just below the crests of ridges and on spurs, the majority at a broadly similar elevation of between 170m and 190m OD. The barrows are situated individually or within small loose groups and largely appear to be simple round barrow types, predominantly bowl barrows. The majority of sites are positioned in relation to later prehistoric field systems, probably originating during the later Early Bronze Age to Middle Bronze Age, which appear to respect the earlier sites through containment, with some instances of barrows positioned at corners or junctions. This may imply deliberate intent to re-use these earlier features in a meaningful way, as territorial markers or meeting places perhaps. There is currently scant evidence to indicate whether Bronze Age activity extended into the valley regions, although this seems probable, nor, if so, how this compared or contrasted with patterns of activity on the higher ground.

Later prehistoric and Roman settlement and agricultural exploitation

Period overview

In contrast to the monumental landscapes of the Neolithic and Early Bronze Age, the evidence for human activity during later prehistory is predominantly settlement related. Evidence for Early Bronze Age settlement is ephemeral and houses very few and far between. Agricultural features associated with Early Bronze Age settlements include cairnfields and small unenclosed fields, perhaps defined by stone markers and covering only a few hectares at most. These unenclosed fields typically date to the latter end of the Early Bronze Age; they are sometimes found in association with, and often underlying, settlements dating to the Middle Bronze Age, *c* 1500 BC (Historic England 2018b, 3). A possible example of this may be found within the project area at a settlement (MDO42932) on Shearplace Hill, where a Middle Bronze Age enclosure overlies an earlier field boundary ditch (Rahtz 1962 and see p38 below).

By the Middle Bronze Age, an increasingly organised and settled landscape exhibiting aspects of formal land division and enclosure was developing. Growing numbers of farms and settlements became enclosed and burial monuments gradually stopped being used. Earthwork-enclosed settlements were probably small farmsteads supporting a single family or extended family group and they are often found located within contemporary field systems. Examples of Middle Bronze Age settlement in Dorset include sites such as South Lodge, Rushmore Park, and Down Farm on Cranborne Chase, both associated with the Deverel-Rimbury Culture (Barrett *et al* 1991), as well as the aforementioned site MDO42932 on Shearplace Hill, Sydling St Nicholas (Rahtz 1962, 289 and see p39 below).

This enclosed settlement form continued into the Early Iron Age, although open settlements are also known from this period and both types are to be found in Dorset. Few Early Iron Age settlements survive as extant earthworks, but cropmarks identified through aerial investigation are assisting the identification and understanding of these sites. Studies of later Bronze Age and Early Iron Age settlement indicate a densely settled landscape, with dispersed farmsteads spread out across the landscape (Cunliffe 2010; Sharples 2010). This is particularly evident on the chalk downlands, as exemplified within the Salisbury Plain Training Area (McOmish *et al* 2002, 67-73).

The formal division of land that developed during the later Early to Middle Bronze Age resulted in the formation of 'brickwork' coaxial field systems that extended over large areas, often several square kilometres in size. The 'coaxial' identifier was first coined by Fleming (1987, 188) who describes these field systems as having one prevailing axis of orientation, with boundaries running along this or perpendicular to it, and frequently made up of shorter boundary sections rather than single lengths. These types of field system are often extensive, covering large areas and frequently 'terrain-oblivious', running across valleys and steep hillsides (*ibid*). They are also often found in association with linear territorial boundaries constructed of earth banks accompanied by ditches; particularly visible on the chalk downland in Dorset (Davey 2013; see also McOmish *et al* 2002).

Alongside these coaxial field systems, a regular form of accreted field system can also be found, often adjacent to prehistoric settlements and sometimes appending

the coaxial fields or, more rarely, contained within them, making it difficult to separate the two types (Historic England 2018b, 6). Some layouts of accreted fields follow a gently curving course; some may have kinks resulting from changes in direction. Gradual development of these types of fields is indicated by changes in alignment and the addition of further plots. The two types of field system are broadly contemporary but use of the accreted field system type can extend into the Iron Age and Roman periods (*ibid*).

In contrast, irregular accreted field systems are characterised by small, conjoined, fields plots of irregular size and shape, often arranged around settlements (Historic England 2018b, 6). Individual field plots are predominately rectilinear in outline, but triangular and polygonal examples do exist, and they form discrete blocks of fields defined, largely, by low, curving earthworks, rarely covering more than 10 hectares. As in all other classes of field system, trackways, either embanked or hollowed, are integral components (*ibid*).

The theme of enclosure is a key debate in Iron Age studies. What is generally agreed is that the cultural changes that occurred during the later Bronze Age and Early Iron Age reflect changing ideologies in kinship and social grouping, incorporating concepts such as status and hierarchy, territory and ownership. These were consciously and deliberately expressed through the adoption of physical boundary forms that continued the tradition of expressing dominance and ownership over the landscape. The defining and protection of property may have been managed cooperatively through mutual agreement or under the control and oversight of a higher authority (Papworth 2011, 14).

The most visual monuments associated with emerging social organisation and hierarchy are the Iron Age hillforts. The hillfort tradition has its origins in the later Bronze Age, but the main building phase began in the Early Iron Age (800-300 BC). Hillforts were preceded by, and in many cases developed from, palisaded enclosures and early hilltop enclosures. The early hillforts were simple univallate enclosures with single entrances, often extending to over 10 hectares in size and located in prominent positions in the landscape (Historic England 2018c, 6). During the Middle Iron Age some smaller hillforts were abandoned whilst others were enlarged, often with more elaborate defences. These developed hillforts remained in use until about 100 BC when the majority of hillforts went out of use. During the late 2nd century, a new form of enclosed high-status settlement, the *Oppida*, began to emerge. Morphologically close to the developed hillfort, the Oppida demonstrated particular artefactual associations and a chronology of development regarded as indicators of political centralisation, settlement and industrial growth, and craft specialisation (Historic England 2018d, 1).

The evolution and function of hillforts over the course of the Iron Age is still not clearly understood. These were complex sites with what appears to have been a range of functions and purposes that probably altered over time alongside changes in social organisation and ideology. The long-held view of hillforts was that of a 'central place' under the control of a local chief or dominant high-status authority. This may have been true of some sites, such as Maiden Castle, near Dorchester, for example, but it is not the most straightforward interpretation in most cases. Nor was a defensive role uppermost for the majority of hillforts, although evidence for warfare is certainly present at some sites, such as Cadbury Castle in Somerset, for example. What is clear is that hillforts were evidently intended to be prominent foci of the Iron Age social landscape and as such may have served a number of roles as settlements, meeting places, religious centres and refuges, dependent on community need (Gale 2003, 109; Historic England 2018c, 8; Papworth 2011, 19).

During the Late Iron Age (100 BC –AD 43) settlement remained predominantly rural and based around an agricultural economy. Enclosed farmsteads, settlements and field systems were re-established in the landscape, heralding a long period of settlement continuity. The range in size and complexity of enclosure suggests that the majority housed multiple households of varying number and scale (Sharples 2010, 58-60). Some open settlements were still to be found, however, and in some areas, such as Cranborne Chase, for example, there appears to have been little if any boundary definition, suggesting a different form of social organisation, perhaps that of more permeable and fluid societies (Papworth 2011, 13; Sharples 2010, 57).

Later Iron Age Britain was a tribal society comprised of confederacies or ethnic groups identifiable by way of their distinct material culture, including pottery and coinage. Dorset, along with parts of south Somerset and east Wiltshire, was the province of the Durotriges, a wealthy confederacy sharing a common coinage and with trade links to the Continent; as indicated by the evidence from coastal 'ports' at Poole Harbour and Hengistbury Head, for example (Cunliffe 1987; Papworth 2011, 38). The precise boundaries of the Durotrigian territory are unclear but may have extended to the north and west as far as the Rivers Brue and Parrett in Somerset, and to the south as far as the River Axe in Devon, with the north eastern boundary broadly following the Avon Valley and River Wylye (Papworth 2011, 46-7).



Evidence within the Project Area

Figure 21 Late prehistoric and Roman sites recorded during the project.

Prior to the project commencing, the Dorset HBSMR recorded 65 sites of broadly later prehistoric, Iron Age or Roman date within the project area. This included the Middle Bronze Age settlement (MDO42932) on Shearplace Hill, mentioned above. Most of the sites recorded were field systems and settlements, alongside a possible Iron Age hillfort at Cattistock (MDO666). Roman sites included two Roman villas, at Frampton (MDO42814) and Wynford Eagle (MDO3457), as well as sections of Roman road and a Roman aqueduct (MDO1611) at Maiden Newton (Fig 21).

During the project 25 of the sites already recorded in the Dorset HBSMR were amended. An additional 71 new sites were added, of which 27 (38%) were previously recorded only in the NRHE database. The majority of new sites recorded by the project were field systems, or features associated with field systems, such as field boundaries and lynchets, linear earthworks and trackways, as well as several enclosures and settlements and a number of Iron Age cross dykes.

The Middle Bronze Age Settlement on Shearplace Hill

The settlement (MDO42932) on Shearplace Hill was excavated by Philip Rahtz in 1957. The site consisted of a small complex of earthworks around a central enclosure containing two hollow-set sub-circular houses (Fig 22). Integral with the enclosure was a wider arrangement of fields and droveways, which included a substantial east-west aligned hollow way running across the north side of the site (Rahtz 1962, 289). Trial excavation of two low mounds identified to the south of the settlement suggested these were constructed solely of flints or ploughsoil mixed with flints and no further discussion or identification of these was given (*ibid*, 295).



Figure 22 Middle Bronze Age enclosure and possible barrows on Shearplace Hill, Sydling St Nicholas.

MDO42932-6. Photographs: Part of RAF/39/3829 V 0034-5 11-NOV-71 Historic England RAF Photography; Part of NMR 169/137 04-MAR-70 © Historic England NMR.

The central enclosure was constructed over an earlier field or enclosure ditch, indicating prior activity on the site (Rahtz 1962, 296-8). The main phase of

occupation was dated to the Middle Bronze Age through the presence of Deverel Rimbury pottery, although it was suggested that the construction of the enclosures and houses dated to an earlier occupation phase (*ibid*, 289). This was based on typologies of pottery found during the excavations, the dating of which may not be considered reliable now. The early results of radiocarbon dating from charcoal samples taken from the site (context not stated) returned a date range of 1360 to 1000 BC (*ibid*). The settlement was abandoned in the Late Bronze Age but may have seen some residual re-occupation or use during the Roman period (*ibid*, 307).

The site on Shearplace Hill was mapped by the project (Fig 23). The mapping confirms much of the layout of earthworks recorded by Rahtz and provides a wider landscape context for the site. Whilst unable to confirm precise chronologies and relationships of features, the mapping results demonstrate the scale and range of later prehistoric activity in and around the site, as well as suggesting aspects of phasing. The principal enclosure banks are visible on aerial photographs and lidar imagery, some surviving as cropmarks but with some substantial earthworks still extant (see Fig 22). Two hollow ways are visible running from east to west along the north and south sides of the enclosure. Rahtz (1962, 293) suggested these linked in with a further north-south aligned hollow way running in from the north, also visible on aerial photographs and lidar imagery. Integrated with these hollow ways on a broadly similar axis are multiple boundary banks and enclosures that may be part of a contemporary and/or later field system (MDO42933).



Figure 23 Middle Bronze Age enclosure and field system on Shearplace Hill, Sydling St Nicholas.

Cropmarks visible on an aerial photograph taken in 1970 shows two sub-circular features (MDO42934;42935), as well as a possible ring ditch (MDO42936) to the north of these (Figs 22 and 23). From their morphology these features were

mapped by the project as possible barrows; the two sub-circular cropmarks may correspond with the two mounds excavated by Rahtz, for which evidence was inconclusive. As mentioned above (p35), there are known examples of later Early Bronze Age/Middle Bronze Age barrows found in association with areas of Middle Bronze Age settlement and these features on Shearplace Hill may be examples of such, although this is currently speculative. From the evidence, the settlement on Shearplace Hill appears to represent a small, enclosed dwelling established on the valley margins above the more well-settled valleys, in conjunction with a system of contemporary fields and hollow ways. The settlement may have represented a seasonal or temporary dwelling, at least at first, and may have been established close to a group of existing barrows, or perhaps been a site where contemporary barrows were established during a period of more permanent occupation.

The available evidence suggests the settlement on Shearplace Hill went out of use in the Late Bronze Age, with only a suggestion of residual late Roman activity (Rahtz 1962, 307). The system of fields and trackways around the settlement probably comprised a phased development of field systems that continued to evolve into the following Iron Age and possibly Romano-British periods, although this may have consisted of episodic periods of disuse and re-use rather than a seamless period of continuous use. A discussion of the chronology and development of the prehistoric field systems in the project area is presented below (p40-42).



Prehistoric field systems

Figure 24 Prehistoric field systems mapped during the project.

The distribution of sites mapped by the project reveal a pattern of later prehistoric field systems skirting the middle to high ground of the valley sides (Fig 24). The

field systems occupy a similar geographical location to the barrows associated with the Early Bronze Age ceremonial landscape and as noted in the previous section, it is probable that some of these field systems had earlier origins, possibly extending back into the later Early Bronze Age and Middle Bronze Age. Interspersed with the field systems are several enclosures and settlements of possible Iron Age or early Romano-British date, although some examples may be earlier in origin, potentially dating to the Middle or Late Bronze Age. Linking between some of the areas are several hollow ways, trackways, and cross dykes. Extensive areas of similar field systems were mapped further down the Frome Valley towards Dorchester by the Dorset Ridgeway NMP (Royall 2011).

The morphology of the field systems within the project area includes fragments of potential coaxial systems consisting of small, gridded fields laid out symmetrically along a linear axis, such as those on North Hill, Chilfrome (MDO42160), and Norden Hill, Cattistock (MDO681; 42979), for example. On Norden Hill, the field system may be a mix of coaxial fields appended by fragments of accreted fields to the east and southeast (Fig 25). The accreted fields within the project area are typically more irregular in shape and size and appear to follow more closely the twists and turns of the local topography. The variations in size and character of the prehistoric field systems may indicate independent phases of development but could also partly be the result of survival and visibility bias. McOmish *et al* (2002, 54) observed similar differences in form even within the coaxial fields on the Salisbury Training Area, where they attributed the earliest phases of activity to the smaller gridded fields towards the centre of the field systems, in contrast to more elongated forms surrounding these.



Figure 25 Fragments of possible coaxial field systems on North Hill, Chilfrome, and Norden Hill, Cattistock.

The field system on Norden Hill may also consist of additional fragments of aggregated fields appending it to the east and southeast.

In his exploration of linear landscapes, Davey (2013, 177-8) discussed the coaxial fields of the lower Frome Valley north of Dorchester, which he observed were typically contained by strong linear boundaries that ran perpendicular to the river

valley and clearly influenced later historic land organisation and boundary division in this area. This is not so readily apparent within the Upper Frome and Sydling valleys, although some putative examples of historic linear boundaries as described by Davey could be identified on historic mapping for the area to the south of Maiden Newton (Fig 26). Fragments of field systems that broadly aligned with these stronger boundary lines in places were mapped by the project, tentatively indicating an association, although this is not conclusive (Fig 26).



Figure 26 Possible examples of historic boundary division to the south of Maiden Newton, relative to fragments of prehistoric field systems mapped by the project.

Most of the field systems mapped by the project have been assigned an Iron Age/Roman date, although as already discussed, their origins may well be much older. Field systems of similar character on Salisbury Plain were considered by McOmish *et al* (2002, 53) as having their initial period of construction in the Middle Bronze Age, roughly between 1500 and 1000 BC. Through association with more easily dateable earthworks, such as linear earthworks and enclosures, it was considered in many instances that these field systems continued to develop in some form into the Iron Age and early Romano-British periods (*ibid*, 54).

Several examples of prehistoric enclosures and settlements were mapped by the project. These include a number of sub-oval ditched and banked enclosures of varying size (between 160m and 350m across), thought morphologically likely to be Late Bronze Age to Early Iron Age in date (Figs 27 and 29). The enclosures are typically positioned just below the crests of ridges or hilltops on east or northeast facing slopes. They are also located within prehistoric field systems but in what appear to be 'cleared' areas or having only fragments of comparatively larger field enclosures in close proximity. This may be partly due to visibility or survival bias but may alternatively imply that the enclosures were inserted into an existing fieldscape that saw some associated clearance and modification coinciding with or

subsequent to their construction. A similar occurrence at Lidbury, on Salisbury Plain, was observed by McOmish *et al* (2002, 56), for example, where an Early Iron Age enclosure was constructed over earlier small field enclosures. An enlargement of the fields adjacent to the enclosure occurred simultaneously or at some point following its construction.



Figure 27 Examples of possible Iron Age enclosures mapped by the project.

Two prehistoric settlements previously recorded in the NRHE database were also mapped by the project. The sites on Grimstone Down (MDO42865; NRHE Hob UID 453182) and at New Barn, Maiden Newton (MDO42980; NRHE Hob UID 453063), are visible as earthworks on aerial photographs and lidar imagery, comprising of banked and ditched rectilinear enclosures associated with hollow ways and comparatively large regular fields. Whilst some of these may be contemporary, they may also include earlier elements; particularly suggested on Grimstone Down where the rectilinear enclosure may overlie earlier boundaries on its east side and abut a further area of settlement adjacent to a later prehistoric trackway (MDO42873) to the southeast which may also be earlier in date (Fig 28). There is also an apparently deliberate relationship between the earthwork banks on this side and Bronze Age barrows, which may indicate an early date of formation, although settlement within the Grimstone Down enclosure is of predominantly Late Iron Age date. Investigation of both settlement sites uncovered Iron Age and Romano-British pottery, whilst excavations on Grimstone Down also found Roman nails and roof tiles that may indicate the presence of buildings. Overall, the span of occupation on Grimstone Down appears to date between the Early Iron Age and the late Roman period (see e.g., Bailey 1971; Farrar 1950).



Figure 28 Iron Age/Romano-British settlements on Grimstone Down and at New Barn, Maiden Newton.

Papworth (2011, 77-80) remarks on a perceived hiatus in occupation in the vicinity of the Frome Valley between the Late Bronze Age and Early Iron Age, followed by a focus of Early to Middle Iron Age settlement around hillforts, such as Maiden Castle, for example. He also observes that during the Later Iron Age there was a re-expansion of settlement in this area (*ibid*). It may be that the evidence for field systems and settlements within the project area, as presented above, is illustrative of some of these phases of contraction and expansion, which perhaps included the modification and alteration of earlier field enclosures to suit changing requirements and functions.

In some cases, the evidence within the project area suggests that enclosures and fields of Iron Age or earlier date are made wholly or partially redundant as a result of changes made during the Roman period. The route of the two major Roman roads through the area, for example, now forming the line of the A37 between Dorchester and Ilchester and the road out of Maiden Newton towards Exeter, can be seen to cut through an earlier agricultural landscape. This is particularly illustrated on Hog Cliff Hill, Maiden Newton, where the line of the Dorchester to Ilchester road dissects a pre-existing settlement enclosure (MDO1588; NRHE Hob UID 453035) (Fig 29).

The enclosure MDO1588 was constructed of a substantial outer bank and inner ditch, containing a settlement area of around 2.6ha. Ten internal circular enclosures were excavated by Rahtz in 1959-60 and these proved to be small circular huts. Dating evidence showed the settlement was in use during the Early Iron Age,

possibly originating during the Late Bronze Age (Rahtz 1959; 1960). The enclosure was mapped by the project, along with fragments of field systems adjacent to the northeast and southwest. As with the previously discussed Late Bronze Age/Early Iron Age enclosures, it may have been constructed within a 'cleared' space. Linear earthworks on the west and south sides of the enclosure may be contemporary or later field boundaries (Fig 29). The later Roman road cuts almost directly through the middle of the banked enclosure, which suggests it was either out of use by this time or made deliberately redundant by the road's construction.

Examples of extensive field systems pre-dating and cut by Roman roads have been demonstrated elsewhere in the country, such as the now well-cited example at Scole-Dickleborough in Essex (Hinton 1997; Williamson 1987;1998) and alongside more recent discoveries at Cheshunt, Herts and the Arrow Valley in Herefordshire (Bryant *et al* 2005; White 2003 and cf. Rippon *et al* 2015). Further studies of prehistoric field systems (e.g., Williamson 2008) have since shown that the chronology of these large-scale field systems is both complex and variable and subject to a long time-depth of modification; a point of view substantiated by the evidence from within the project area. The broad consensus appears to be that these field systems demonstrate a long chronology of use, development, and modification, although this was not always necessarily continuous or uniform.



Figure 29 Late Bronze Age/Early Iron Age enclosure (MDO1588) on Hog Cliff Hill, cut by the former Roman road between Dorchester and Ilchester.

Late prehistoric linear earthworks

Land boundaries have been important to society for thousands of years. Linear earthwork boundaries make an appearance from the Neolithic period but are found in greater numbers from the Middle Bronze Age (*c* 1500 BC). Alongside newly

constructed boundaries, some of these early features were used to structure the social and economic landscape of the Iron Age and Roman periods. Some have seen continuous use or reuse into the present day, helping define subsequent patterns of land organisation and administrative boundary lines (Historic England 2018e, 7). Linear earthworks are not always easy to date and their form is not typically diagnostic, so late prehistoric examples can often be confused with medieval or later ones. For this reason, it is often their association with other monuments that helps shed light on potential dating and function (*ibid*).

Several linear earthworks were mapped by the project, mainly found in conjunction with late prehistoric field systems and considered likely to be boundary markers or trackways. Three sites were recorded as being probable cross dykes, one of which, on Balls Hill, Sydling St Nicholas (MDO2647) was already recorded in the Dorset HBSMR, with a second, on Grimstone Down, Stratton (MDO42874), previously recorded in the NRHE database (Hob UID 453187). The third site recorded as a cross dyke, on Hillfield Hill, Hillfield (MDO43046), comprised of sections of a double banked linear earthwork that ran below historic boundaries and a trackway. The feature is visible as an earthwork on a 1947 aerial photograph and is recorded on the OS 1st Edition map as 'Great Ditch' (Fig 30).



Figure 30 Cross dyke on Hillfield Hill, Hillfield.

The linear earthwork (MDO43046) is recorded as 'Great Ditch' on the OS 1st Edition map. Photograph: Part of RAF/CPE/UK/1975 FP 1051 11-APR-47 Historic England RAF Photography.

Where linear earthworks were found closely integrated with later prehistoric field systems and settlements they were more typically recorded as trackways or hollow ways, but in truth there was much similarity in form with those features recorded as cross dykes, and potentially some crossovers in interpretation without further ground-based survey. Two particular examples are visible as earthworks on aerial photographs and lidar imagery on West Hill, Frome St Quintin (MDO1195), and Shearplace Hill, Sydling St Nicholas (MDO42950). Both trackways are in close association with later prehistoric field systems, the earthwork on Shearplace Hill situated just north of the Middle Bronze Age settlement MDO42932 (Fig 31).



Figure 31 Linear earthworks on West Hill, Frome St Quintin (left), and Shearplace Hill, Sydling St Nicholas (right) (MDO1195; 42950).

Photographs: Part of RAF/CPE/UK/1795 FP 1057 11-APR-47; Part of RAF/39/3829 V 0034 11-NOV-71 Historic England RAF Photography.

Another substantial linear earthwork (MDO42873) mapped by the project runs along the east side of Grimstone Down, on the edge of the later prehistoric settlement and field system MDO42865 (Fig 32). The double banked earthwork is documented as being part of the later prehistoric trackway between Wrackleford and Batcombe Hill (NRHE Hob UID 453808). On Grimstone Down the trackway passes an area of small enclosures and earthworks that form part of the wider area of settlement and field systems recorded under MDO42865 (Fig 32 and see Fig 28). As mentioned above, these features may also represent an area of settlement. On their north side a short section of double banked linear earthwork, probably another trackway, links into MDO42873, suggesting an association. During the medieval period trackway MDO42873 may have re-used to form part of the medieval monastic road between Abbotsbury and Cerne Abbas. The trackway exemplifies the importance and longevity of such routeways and boundary markers, from later prehistory onwards, demonstrating continuity of use despite potential shifts in function and significance.

On Loscombe Hill, Sydling St Nicholas, two linear earthworks (part of MDO2603) are visible on aerial photographs, situated in close proximity to each other and running near parallel on a broadly south to north alignment. The earthworks are situated just over 100m west of a later prehistoric enclosure and within a wider landscape of later prehistoric field systems and trackways (Fig 33 and see Fig 27). A similar relationship between linear earthworks can be seen on Batcombe Hill, Frome St Quintin, where several banked and ditched linear earthworks extend across the hill on a southeast to northwest axis, also broadly parallel to each other and between 100m and 200m apart (Fig 33). These linear earthworks also sit within a wider landscape of later prehistoric field systems; MDO2624 to the southwest and MDO1195 to the northwest. They may represent trackways or boundary markers, possibly forming some sort of link between the two areas.



Figure 32 Linear earthwork on Grimstone Down, Stratton (MDO42873).

The trackway was re-used to form part of the medieval monastic road between Abbotsbury and Cerne Abbas. Photograph: Part of NMR 66/385 (SY6495/5) 26-MAR-68 © Historic England NMR.



Figure 33 Parallel linear earthworks on Loscombe Hill, Sydling St Nicholas, and Batcombe Hill, Frome St Quintin (MDO2603; 1195).

Photographs: Part of JRB 386/2331 (ST6200/4) 23-OCT-71 © Historic England NMR; Part of RAF/CPE/UK/1794 RS 4379 11-APR-47 Historic England RAF Photography.

'The Castle', Iron Age Hillfort, Cattistock

Only one Iron Age hillfort (MDO666) was mapped by the project: 'The Castle' at Cattistock. The earthwork is positioned on a low spur of ground above the east side of the River Frome at 180m OD and consists of a sub-oval 170m by 150m enclosure with a 7m wide bank which encloses the flat hilltop. Two causewayed

entrances are present on the upper east and west sides. The form of the earthwork is relatively simple and has been interpreted as perhaps unfinished or possibly an early type of defended earthwork or hillfort (NRHE Hob UID 195860). This distinction, when compared to other substantial enclosures within the project area, such as the one on Hog Cliff Hill (MDO1588), for example, may be due to the relative scale of the ramparts and the presence of causewayed entrances, as well as its comparatively prominent location on a spur of ground overlooking the River Frome, thereby giving it a more defensive and commanding position. Within the earthwork enclosure is a Bronze Age barrow (MDO42459) and lynchets on the scarp to the southeast form part of a prehistoric field system (MDO43218). Within and around the enclosure are later earthworks of a medieval strip field system (MDO683), visible on aerial photographs (Fig 34).



Figure 34 Possible Iron Age hillfort, 'The Castle', Cattistock, containing a Bronze Age barrow and overlain by a medieval strip field.

MDO666; 683; 42459. Photograph: Part of OS05033 V 074 13-MAR-95 Crown Copyright Ordnance Survey.

The relatively dominant position location of the hillfort above the River Frome, at the 180m datum, puts it at the same level as much of the ceremonial Early Bronze Age landscape, with presumably similar intervisibility. The 180m datum would appear to be a constant in the historic landscape, probably topographically determined to some extent, and perhaps representing the median divide between the settled valleys and the relatively marginal ground of the upper valley slopes.

Although there is scant evidence for potentially contemporary sites in the immediate vicinity of the hillfort or within the valley floor, there are extensive field systems on the higher slopes to the south and southwest, all at a similar height and potentially having some contemporaneous use. The range of Iron Age settlement sites across the wider project area is clearly complex, demonstrating considerable variation in size, morphology and associative relationships. It is likely that the hillfort at Cattistock commanded some authority over settlements within the neighbouring area, although a relatively weak tribal hierarchy may have existed here. It is also possible that the hillfort may have been subsidiary to the larger

hillforts of Eggardon Hill and Maiden Castle, which lie 7km southwest and 14km southeast respectively, although any potential contemporaneity with these is currently unknown. Further research would be merited to properly understand the complex social dynamic of Iron Age settlement in this area, particularly in terms of relative morphology and function of sites, as well as potential inter-relationships and hierarchy.

Roman Activity in the Upper Frome Valley

The two major Roman roads that run through the project area cross the higher plateaux between the From and Sydling river valleys (the Dorchester to Ilchester road) and the Hooke River and Wraxall Brook (the road between Maiden Newton and Exeter). The two Roman roads through the region are largely fossilised in the modern road network but linear cropmarks visible on 1940s aerial photographs within a field on the north side of Long Ash Lane, Frome St Quintin, may represent a short section of the former Dorchester to Ilchester Roman road (MDO1194) and these features were mapped by the project (Fig 35).



Figure 35 The Dorchester to Ilchester Roman road at Frome St Quintin. MDO1194. Photograph: Part of RAF/CPE/UK/1975 FP 1057 11-APR-47 Historic England RAF Photography.

A Roman aqueduct built by the Second Legion in the 1st Century AD to carry water from the River Frome to Dorchester Newton is documented as starting near Frampton, Maiden Newton (MDO1611; Historic England Research Records Hob UID 959813 and see also Putnam and Hewitt 1996; Putnam 1998; 2007). No evidence for this monument was visible on available aerial photographs or lidar imagery within the project area and the site was not mapped by the project. Within the valleys are various findspots of Roman pottery that indicate the lower ground was well settled by communities readily adopting Roman material culture as part of their everyday use. Two possible Roman villas in the south of the project area are recorded in the Dorset HBSMR; at Wynford Eagle (MDO3457), where a tessellated mosaic floor and Roman coins were discovered some time prior to 1864, and at Frampton, Maiden Newton (MDO42814), where excavations by Lysons in 1796 uncovered five tessellated mosaic floors of elaborate design. Religious imagery contained within the floors, including the Christian Chi-Ro symbol, had led to the suggestion that the site may not have been a villa, but rather a temple or a cluster of religious buildings (Stewart *et al* 2020, 3).



Figure 36 The site of Frampton Roman villa, overlain by a protective flint and earth bank.

The villa is situated beside the river within an area of possible medieval ridge and furrow and post-medieval water meadow. MDO42814. Photograph: Part of RAF/CPE/UK/2431 RS 4272 22-JAN-48 Historic England RAF Photography.

Investigations of the site at Frampton were recently carried out by Stewart *et al* (2020) to establish the scale of archaeological preservation and the extent of the buildings. Primary findings from the investigations revealed that the flint and soil bank covering the site for preservation contained collapsed building material, including roof tegulae and flue tiles; the L-shaped bank is visible on 1940s aerial photographs and lidar imagery and was mapped by the project (Fig 36). The investigations further showed that the surviving mosaic floors are in a good state of preservation, although not as complete as when excavated by Lysons in 1796. The building complex to date has revealed an L-shaped main building with a further building to the east of this, the extent of which is currently unknown (*ibid*).

The two villa sites within the project area are also situated within the valley floors, no doubt to capitalise on the prime agricultural land there yet with good access to the Roman road network. The cumulative evidence of Roman activity within the project area generally points to a well-settled agricultural landscape with evidence of high-status Roman occupation in close proximity to road and river networks that would have been the main arteries of communication and trade.

Summary

The evidence for prehistoric settlement and agriculture in the project area reveals extensive areas of later prehistoric fields exhibiting a long time-depth of use and modification from the Middle Bronze Age into the Roman period. The relationship and associations between different forms of settlement and enclosure found in conjunction with these field systems can usefully point towards some relative chronologies. There is also evidence for some deliberate association between the formation of later prehistoric fields relative to earlier funerary barrows, which may indicate their re-use as territorial markers or meeting points. Several linear earthworks were mapped by the project, often closely associated with areas of later prehistoric field systems. Potentially trackways or boundary markers, these may also represent some form of territorial land division. Within the southwest of the project area there is some indication for later prehistoric field systems associated with strong linear boundaries preserved in the historic field pattern. These may be much older in origin, possibly derived from later prehistoric territorial boundaries which subsequently influenced the development of historic land organisation and division. The presence of only one hillfort in the project area may indicate a relatively weak tribal hierarchy in this area, possibly subsidiary to the larger hillforts of Eggardon and Maiden Castle at 7km and 14km distant. During the Roman period the valleys within the project area appear to have remained well-settled with some evidence for high-status settlement, including two possible villas. Roman military activity in the area included an aqueduct built to carry water to the military base in Dorchester as well as the construction of two major roads out of Dorchester towards the Roman centres of Ilchester and Exeter.

The medieval and post-medieval landscape; settlement and land use

Period overview

By the 11th century the historic settlement pattern of Dorset was well-established. The villages, hamlets and farms that were in place by this time probably had their roots in the earlier Romano-British landscape but were shaped and organised as a result of more structured social processes from around the 7th to 8th centuries onwards (Taylor 2004, 72-75, Jones and Page 2006; Rippon 2008).

On the higher chalk downland the medieval settlement character remained that of isolated farmsteads, in contrast to closely spaced linear villages and hamlets on the lower lying ground; along the valley bottoms and hugging the spring-lines at the foot of the coombes and scarps. These were rarely the characteristic nucleated villages found within central England during the medieval period but more usually simple ribbon settlements consisting of a single long street and a back lane. Slightly more complex settlements formed in the wider valleys or beside the major river crossing points (Taylor 2004, 75-6). A marked contraction and abandonment of such settlements occurred during the 14th and 15th centuries, most notably in chalk areas, and several deserted and shrunken medieval settlements are recorded in this part of Dorset (Natural England 2013; Taylor 2004). This phenomenon forms part of a wider national picture, due to a marked decline in population during this period, largely attributed to repeated outbreaks of the plague and high background mortality rates (e.g., Campbell 1993, 60-1).

An enclosed mixed farming landscape of small fields bounded by thick hedgerows is characteristic of valley and spring-line locations today, formed through the late and post-medieval enclosure of the extensive arable open fields that spread up the valley sides during the medieval period. The legacy of medieval cultivation patterns and practices still survives in many places today and is visible as earthworks on aerial photographs and lidar imagery. These are typified by medieval ridge and furrow cultivation within areas of former open field and long narrow terraces of strip lynchets on the hillsides of the chalk downland, thought to date to a period of arable expansion into these areas around the 12th to 13th centuries (Taylor 2004, 88).

The wider flood plains were used as meadowland during the medieval period and artificial water meadows are common features of the valley bottoms during the post-medieval period. These were established from the 17th century onwards to improve grazing conditions for sheep, allowing for larger numbers of sheep to be kept in these areas. On the higher chalk the open pastureland had remained mostly unenclosed up until the 14th century, after which there was gradual piecemeal enclosure and then a more rapid expansion from the 16th century onwards as large fields were established; again, to capitalise on sheep and corn farming (Campbell 1993, 63-4; Taylor 2004, 127). The chalk downlands subsequently saw the creation of strong rectilinear fields during the Parliamentary enclosure of the 18th and 19th centuries (Natural England 2013; Taylor 2004).

Deer parks and large manorial estates are also a feature of the medieval landscape of the chalk downlands and the remnants of six former medieval deer parks survive within the project area. The organisation and administrative division of medieval land ownership in Dorset was relatively fixed by the 10th to 11th centuries and went on in many cases to form the basis of the historic ecclesiastical parishes that followed (Taylor 2004, 50-1). In chalk areas, for example, these divisions typically took a shared resource approach which resulted in long and narrow linear manorial estates that extended from the valley bottoms and up the valley sides onto the open downland (Natural England 2013; Taylor 2004, 51).

The evidence for high status medieval sites such as mottes, manors and moated sites within the project area is very limited. Within the project area, the project mapped only one possible moated site (MDO149) at Batcombe, already recorded in the Dorset HBSMR.

Evidence within the Project Area

Prior to the project commencing, the Dorset HBSMR recorded 69 sites of broadly medieval to post-medieval date within the project area. During the project, 28 (40.5%) of the sites already recorded in the Dorset HBSMR were amended. An additional 765 new sites were added, of which 17 (2%) were previously recorded only in the NRHE database. The majority of new broadly medieval sites recorded by the project were features associated with settlement and agriculture, including deserted or shrunken settlements, field systems, field boundaries, strip lynchets, strip fields, ridge and furrow cultivation and trackways. Features from four of the five deer parks were also mapped, as well as a possible moat. Sites of broadly postmedieval date were principally of an agricultural or small-scale industrial nature and included numerous field boundaries and evidence for cultivation, including narrow ridge and furrow and several orchards, water meadows and watercress beds. Post-medieval industrial sites largely comprised of small extractive pits, particularly chalk pits and some gravel pits, and a small number of quarries. Some of the chalk pits were associated with small lime kilns, some of which were also mapped by the project.

The distribution of medieval sites can immediately be seen to contrast with those of later prehistoric date, in that the medieval sites are predominantly located on the lower valley sides and across the valley floors. The medieval settlements that were mapped are all located along the river valleys, in association with numerous areas of ridge and furrow cultivation and strip fields. Further areas of strip lynchets and lynchets can be seen extending up onto the edges of the higher ridges and here there is some overlap and mixing with the edges of later prehistoric field systems (Fig 37).

The distribution of post-medieval sites is more widespread but agricultural sites remain largely on the lower valley sides and within the valley floors, with a number of water meadows and watercress beds alongside the Frome and Sydling rivers. Small-scale extraction, predominantly chalk pits, extends along the valley sides and across the ridge tops, with a number of gravel and sand pits along the river floodplains. In many areas the chalk pits are closely integrated within areas of pasture and arable fields and in some cases, extraction appears to have involved the digging out of earlier banks and lynchets associated with areas of later prehistoric and possibly medieval field systems (Fig 38).



Figure 37 Sites of medieval or possible medieval date mapped by the project.



Figure 38 Sites of post-medieval or possible post-medieval date mapped by the project.

Medieval Settlement and Field Systems

The evidence for medieval settlement mapped by the project is predominantly associated with earthworks visible on aerial and lidar imagery on the edges of existing villages bordering the Frome and Sydling rivers, as at Chilfrome, Sydling St Nicholas and Up Sydling, for example. This would appear to suggest that the primary evidence for medieval settlement in the project area lies below existing villages within the valley floors. Several areas of shrunken or deserted settlement associated with small medieval hamlets or farmsteads were, however, mapped by the project, including at Chantmarle Farm (MDO43178), Frome St Quintin, and at Crockway Farm and Throop (MDO42812; 1598) to the west of Frampton. Despite demonstrating a degree of abandonment or shrinkage, many of the settlements mapped by the project continue in some form into the present day, alongside earthworks representing former crofts and tofts, trackways and field boundaries, often associated with areas of strip fields and ridge and furrow cultivation.

An area of settlement (MDO43178) mapped to the northwest of the present day Chantmarle Farm, for example, is recorded in the NRHE database as the site of the medieval hamlet of Blakemore (NRHE Hob UID 943610). Earthworks visible on a 2001 aerial photograph suggest several partial house platforms and a curvilinear track or lane on their west side. Part of a possible hollow way links into the east side of the settlement; the lane to the east of this is historic and may be associated (Fig 39). The present day Chantmarle Farm is of 20th century date and there is no indication of a former settlement at this location recorded on the OS 1st Edition map, except for a large irregular curvilinear enclosure formed of the historic field boundaries. This would infer that the hamlet of Blakemore was wholly abandoned at some point prior to the 19th century (Fig 39).



Figure 39 Deserted medieval hamlet of Blakemore on the south side of Chantmarle Lane, Frome St Quintin.

MDO43178. Photograph: Part of OS019999 V 9579 07-MAY-01 Crown Copyright Ordnance Survey.

In contrast to Blakemore, earthworks mapped at Crockway Farm (MDO42812) and Throop (MDO1598) may represent a shrinkage of medieval settlement rather than

wholesale abandonment. Both of these historic settlements are situated on the floodplain beside the River Frome (Fig 40).



Figure 40 Shrunken medieval settlements at Crockway Farm and Throop, Frampton.

MDO42812;1598. Photograph: Part of RAF/CPE/UK/2431 RS 4272 22-JAN-48 Historic England RAF Photography.

Earthworks comprising of a series of rectilinear scarps and terraces on the south side of the lane below Crockway Farm are visible on aerial photographs and lidar imagery, potentially representing former house platforms or crofts, linked by lanes or trackways. Similar areas of earthworks are also visible to the east and west of Throop House, again indicating areas of possible medieval settlement. Those to the east of Throop may, however, include features associated with a post-medieval brick works recorded on the OS 1st Edition map. The earthwork remains of medieval strip fields associated with areas of ridge and furrow cultivation are also visible on aerial photographs and lidar imagery to the south of Throop, alongside the western

end of a post-medieval water meadow (MDO42813) to the north. The site of Frampton Roman Villa (MDO42814) is located just 0.2km to the east of Throop (Fig 40 and see also Fig 35).

Chilfrome, Cattistock, medieval settlement and field systems

Within the project area, numerous examples of medieval strip fields and strip lynchets were mapped by the project, often associated with areas of ridge and furrow cultivation. At Chilfrome, Cattistock, the relationship between the medieval field pattern and the medieval settlement is extremely well illustrated (Fig 41). Earthworks are visible on lidar imagery to the east and west of Holy Trinity Church that may indicate an area of shrunken medieval settlement focussed on the church on the east side of Chilfrome Lane.



Figure 41 Medieval strip fields and strip lynchets to the west of Chilfrome, Cattistock.

On the west side of Chilfrome Lane the historic field pattern is illustrated by a series of narrow curvilinear field boundaries whose morphology indicates historic field boundaries created from the enclosure of former strip fields sometime during the later medieval period, which are still visible as low curvilinear earthworks on lidar imagery. These earlier strip fields are contained by strong curvilinear boundaries to the north and south, clearly defined on the OS 1st Edition map and still extant (Fig 41). This linear division of land, perpendicular to the river, may represent the extent of an area of former medieval open field associated with the settlement of Chilfrome, as well as being a possible example of the linear land divisions found in this part of Dorset, as identified by Davey (2013) and discussed in relation to the late prehistoric landscape on p41-2, above. The western end of the linear parcel extends

up onto the higher ground, perhaps illustrating a shared resource-led approach to land organisation and ownership.

To the northwest of Chilfrome is a further area of medieval field systems comprising large numbers of strip lynchets (Fig 41). These strip lynchets extend around the edge of a low east-facing plateau of ground, continuing north and west towards North Hill. The historic field boundaries to the northwest of Chilfrome suggest an area of later, probably post-medieval, enclosure, being more regular in form and enclosing larger rectilinear fields. It may have been an area of down or common land that was extended onto during the medieval period, possibly contracting again with the earlier agricultural pattern superseded by the later pattern of enclosure. This may have been as a result of the enclosure of downland around the 14th to 16th centuries due to the expansion of sheep-corn farming, or possibly the result of later Parliamentary enclosure during the 18th and 19th centuries. At the very least the evidence indicates phases of agricultural practice during the medieval period; some of which have become fossilised by former patterns of land organisation that influenced the development of the later historic landscape, some of which have become obscured.

Medieval Deer Parks

Four medieval deer parks were mapped by the project, at Frome St Quintin (MDO1192), Sydling St Nicholas (MDO2628), Cerne Abbas (MDO736) and Wynford Eagle (MDO3462). Two further deer parks, at Batcombe (MDO147) and Rampisham (MDO2322) were not mapped as the surviving sections of the former park pales are fossilised in still extant historic boundaries and no other features were visible on available aerial photographs. Despite some reorganisation and historic boundary removal, all four of the mapped parks survive as legible landscape features, some sections of the ditched and banked park pales remaining visible as earthworks or cropmarks on aerial photographs and lidar imagery, with some further sections still preserved as historic boundary features, enclosing fields or bordered by historic lanes.

The park tradition was introduced by the Normans and about 35 deer parks across the country are recorded in the Domesday Book (Rackham 1986, 88). The number of parks had escalated by the 12th century; possibly due in part to the introduction of fallow deer, which were easier to confine than native species (*ibid*, 123). The distribution of medieval deer parks in England is closely linked to that of woodland, although most parks combined tree cover with open spaces for hunting and grazing.

Owning a deer park was a status symbol in the medieval period and they were typically associated with the upper echelons of society, such as royalty and aristocracy as well as lesser wealthy institutions such as monasteries and minor gentry (Rackham 1986, 123). Planning permission was required to establish a new park, so deer parks are relatively well documented. The defining feature of a medieval deer park was the park pale, which usually consisted of substantial banks with inner ditches, often topped by timber paling or walling. Internal features might variously comprise inner compartments, managed coppices and wood banks, park lodges, rabbit warrens, fishponds and tracts of open grazing land.

The identification of medieval deer parks in the present-day landscape relies on the survival of extant boundary features, such as long gently curving enclosure banks

and ditches, the patterning of historic field lanes and parish boundaries that respect former deer park boundaries, and natural features such as streams. Place-name evidence can also indicate the existence of possible parks – the use of 'Park', 'Hatch', 'Lodge' and 'Hay' place-names, for example, are all associated with medieval deer parks (Muir 2000, 21), as are names associated with dogs or kennels, warrens ('coney') and hunting towers ('trist', 'stand'), for example. The shape of deer parks was commonly oval or roughly circular and they may be found sited at the edge of manorial holdings, away from the prime arable land (Muir 2000, 19). The medieval deer park declined in popularity from around the 16th to 17th centuries when some saw a new lease of life as ornamental parks, part of the culture of designed landscapes that rose in popularity from around this time (Rackham 1986, 127-8).

Only three of the deer parks within the project area are historically documented. Batcombe is the least certain of these, thought to be one of the parks referred to in an Inquisition in 1338 where Hugh de Poyntz declared his combined manor of 'Stoke St Edwald and Badecombe' held two parks (Wilson 1972, 169). The earliest documentary reference to Rampisham Park is 1299, when Edward 1st awards the manor of Ramesham owned by Philip Paynel to his widow, Elizabeth. The park is then documented through several changes of ownership, including a return to the king, the latest reference dating around 1530. It was de-parked at some time prior to 1583 (Cantor and Wilson 1964, 150). Wynford Park is also documented, the earliest reference dated 1279 when it was under the ownership of Matilda, wife of Robert Walerand. It was still extant in 1578 when under the ownership of Thomas Sydenham (Cantor and Wilson 1963, 152).

The deer parks within the project area are relatively small examples of their type but can all be traced, at least partially, on the basis of surviving features. Place-name evidence also contributes in all cases. Batcombe, Sydling St Nicholas and Frome St Quintin deer parks all contain fields with 'park' names recorded in the Tithe apportionment (Cantor and Wilson 1966, 229-233 and see Fig 36, for example). Rampisham Park contains a 'Park Moor' as well as a 'Duke's Plantation (Cantor and Wilson 1964, 148). The OS 1st Edition map records a 'Keepers Lodge' within Cerne Park; a 'Park Farm' on the east side of Frome St Quintin and 'Frome Park Coppice' within Frome St Quintin Park; and 'Park Coppice' within Sydling St Nicholas Park.

Frome St Quintin deer park is not documented but the site was surveyed by Cantor and Wilson (1966) who conjectured its historic extent on the basis of surviving sections of the medieval park pale (Cantor and Wilson 1966, fig 3 – and see Fig 42). Sections of the former park pale are also visible as substantial ditched and banked earthworks on aerial photographs and would appear to broadly correspond with Cantor and Wilson's (1966) record (Fig 42). There is potentially evidence that the park may have been smaller at one stage, however, as indicated by a curvilinear historic field boundary that appears to continue the line of a section of park pale northwards; whereas the record has this dog-legging at 90 degrees to create a small rectilinear extension to the northwest end of the park (Figs 42 and 43).

It is also noticeable that the historic boundary pattern east of Frome St Quintin creates a large curvilinear enclosure, part of which corresponds with the north and north eastern sides of the deer park (Figs 42 and 43). This enclosure incorporates Park Farm and the east side of Frome St Quintin. Park Farm is located a short distance southwest of what is perceived to be the historic extent of the medieval deer park at Frome St Quintin, but the pattern of historic enclosure on the east side of the

village may indicate a more complex story of land ownership and organisation. It may represent part of the medieval manor holding, with the deer park situated on its northeast side, although this remains conjectural without further study.



Figure 42 Frome St Quintin deer park (MDO1192) after Cantor and Wilson 1965, fig 3.

A larger area of conjectured medieval enclosure, possibly indicating a manorial holding, is outlined in green, based on the pattern of historic field boundaries on the OS 1st Edition map. Photograph: Part of RAF/CPE/UK/1974 RS 4382-3 11-APR-47 Historic England RAF Photography.

Additional features mapped within the medieval deer park at Frome St Quintin include further boundaries (MDO43071) of possible medieval to post-medieval date that enclose an area of the northeast side of the park. A section of medieval drove road (MDO43069) (a possible continuation of Sheepwash Lane to the northeast) enters into the northeast side of the park and corresponds with the northern leg of this enclosure – a further section of double banked earthwork on the south side of the enclosure may be a continuation of this feature (Fig 43). The relationship and chronology of these features relative to the medieval deer park is not known but they may post-date the deer park's use.

In contrast to the other deer parks within the project area, those at Cerne Abbas and Wynford Eagle are both predominantly wooded. Cerne deer park is well defined, its park pale recorded on the OS 1st Edition map (Fig 44). Several coppices and hangars are named within the park, along with the keepers' lodge. The park pale is clearly visible as earthworks and cropmarks on 1940s aerial photographs (Fig 44).



Figure 43 Features associated with Frome St Quintin deer park (MDO1192) mapped by the project.



Figure 44 Cerne medieval deer park.

MDO736: Photograph: Part of RAF/CPE/UK/1974 FS 2378-9 11-APR-47 Historic England RAF Photography.

The extent of Wynford deer park was conjectured by Cantor and Wilson (1963, 152-3) to broadly correspond with the area enclosing Wynford Wood, but to also include a strip of ground beyond the western edge of the wood. Earthwork banks

and ditches mapped by the project may at least partially represent sections of former park pale, although some may alternatively be wood banks or boundaries (Fig 45).

As with Frome St Quintin, there is some suggestion, based on the pattern of historic enclosure around Wynford, that the deer park may have, at some point at least, also extended beyond Wynford Wood to the northeast (Fig 45). Alternatively, this may have been a phase of later medieval enclosure when the deer park changed use. The OS 1st Edition map records a small land holding (of possible later medieval date) within this extended area of enclosure, which may have been established after the park fell into disuse; Taylor (2004, 121) documents that Wynford Park had been divided into pasture closes by the 16th century. Alongside the park pale and possible wood banks, several further field boundaries and enclosures (MDO42278; 42331) of probable later medieval or post-medieval date were mapped by the project within and adjacent to the deer park, that may be associated with later phases of the park's use (Fig 45).



Figure 45 Features associated with Wynford medieval deer park (MDO3462) mapped by the project.

Lidar images © *Historic England; source Environment Agency.*

Batcombe Medieval Moat

The one medieval moated site (MDO149) mapped by the project is situated to the north of Batcombe. Earthworks visible on a 1948 aerial photograph describe a double-banked semi-circular 90m by 75m enclosure. The pattern of historic field boundaries recorded on the OS 1st Edition map historic suggest these partially fossilised the enclosure, defining its north and east sides. A broken curving row of trees defines its west side (Fig 46). No earthworks are recorded on the OS 1st Edition map, which might be expected if extant, but these are clearly visible on the 1948 aerial photograph (Fig 46).

Additional earthworks mapped by the project at Batcombe include areas of ridge and furrow cultivation to the south of the moated site and respecting its north and west sides, as well as several historic field boundaries. A banked and ditched linear earthwork running across the southern side of the moated enclosure from east to west was also mapped. This feature may be a trackway, or perhaps part of the moat. Its north eastern end may even incorporate part of the medieval park pale on the south eastern side of Batcombe deer park (MDO147), as mentioned above (p60).

The moated site is situated against the probable south side of the medieval deer park, possibly even within it. Wilson (1972, 169) documents a moated manor at Batcombe, thought to be associated with the deer park. He references Hutchin's (1861-73) '*History of Dorset*', quoting, 'In a ground called The Park, are some remains of a house and a moat round it, which the tradition says, was the seat of the Staffords, or some more ancient lords, who resided there'. At the time the moated site was unidentified but the distribution of 'park' field names, after Wilson (1972, fig 1), indicate that this site is the likely candidate (and see Fig 46).

As with Frome St Quinton deer park, above, the pattern of historic enclosure at Batcombe can potentially tease out some observations on the possible medieval manor holdings and their organisation. Based on the distribution of 'park' field names (after Wilson 1972, fig 1) and the morphology of historic enclosure, it is possible to broadly conjecture the extent of the medieval deer park. This appears to be situated at the northern end of, and within, a large lozenge-shaped enclosure, which may represent a medieval manorial land holding and/or an area of medieval open field (Fig 46). The manorial centre may have stood close by St Mary Magdalen Church to the southeast, which was probably established by around the 11th century (www.opcdorset.org/BatcombeFiles/Batcombe.htm), although the exact site is not documented. A wider area of medieval-derived fields is identifiable at Batcombe, however, extending from the southwest of St Mary Magdalene Church as far as Batcombe and Court Farms to the north of Batcombe moated site, so clearly the pattern of medieval land ownership and organisation around Batcombe is more complex and probably altered throughout the period.

Moated manors elsewhere in the country are considered to date from around the 12th century, with a particular concentration between the 13th and 14th centuries. Such sites often resulted from a wider gradual break-up of manorial lands; a process known as subinfeudation that saw smaller manors develop out of larger ones through inheritance and the transfer of land into private ownership (Bailey 2002, 12). It is possible, therefore, that the moated manor house at Batcombe is a later addition, potentially the result of a division of the earliest medieval manor. As such it may post-date the deer park and the original manorial enclosure. There is some suggestion of land division at Batcombe, as there appears to be a narrower linear enclosure formed out of the eastern side of the larger one, within which the moated manor is situated (Fig 46). Whether this represents an earlier or later enclosure is uncertain, but it could potentially be contemporary with the moated manor, which current understanding would suggest post-dates the earliest manor. Areas of ridge and furrow cultivation extend across the area of the larger enclosure and respect the moated site, suggesting the ridge and furrow is at least contemporary with or later than the moated site where it abuts this feature. Further study would help clarify more precisely, but it is possible that phases of land ownership and enclosure are indicated at Batcombe, which would make an interesting case study of medieval land ownership and change.



Figure 46 Batcombe medieval moated manor in relation to Batcombe deer park.

The conjectured extent of the medieval deer park and possible medieval manorial enclosure are illustrated, 'park' field names shown after Wilson 1972, fig 1. MDO149. Photograph: Part of RAF/CPE/UK/2431 RS 4269 22-JAN-48 Historic England RAF Photography.

Post-medieval water meadows

Water meadows were a distinctive feature of the post medieval agricultural landscape between the 17th to 19th centuries. Areas of grassland along the river valleys were improved through irrigation to produce rich hay crops or grazing land. The pre-17th century system of irrigation was a simple process involving the damming of a watercourse to allow the flooding of the surrounding farmland; a process known as 'floating upwards'. From the 18th century more sophisticated systems were developed, allowing greater control of the movement of water through the construction of precisely engineered channels. These enabled a thin sheet of water to flow steadily across the meadows for set periods of time at prescribed seasons of the year; a system known as 'floating downwards' (Historic England 2018f). Two main forms of floating downwards were used, 'catchworks' and 'bedworks', each suited to different topographies (*ibid*, 2).

The distinctive character of downward-floated water meadow lies in their pattern of drains and carriers. Catchworks were used to irrigate hillslopes or valley sides and bedworks to irrigate the relatively level ground on river floodplains. A weir or dam

was constructed across the river to divert water along a main channel or 'head main'. This diverted water off along a series of channels that eventually ran along the apex of parallel ridges, or 'beds'. Run-off was removed from the meadow via a network of drains between the ridges, leading towards a single 'tail drain' (Historic England 2018f, 5).

Bedworks appear as prominent ridges with interlocking channels. They can resemble historic plough ridges and recent research suggests some early ridge and furrow might have been reused to form water meadows. However, the location of water meadows and the presence of additional water control structures help distinguish water meadows from areas of ridge and furrow cultivation (Historic England 2018f, 5). By the 18th century water meadows were widespread across Wiltshire, Dorset and Hampshire, the use of bedworks having become so profitable that they occupied almost every significant floodplain in the region. From the 19th century, however, water meadows fell out of use, following the onset of the agricultural recession (*ibid*).

Eight water meadows were mapped by the project, predominantly located along the River Frome and its tributaries, the Hooke River and the Wraxall Brook. Several extensive stretches of water meadow (MDO42861) were also mapped along the Sydling Water, from the south of Sydling St Nicholas as far as Up Sydling, which were also associated with several later watercress beds (MDO42861;42862;43101).



Figure 47 Post-medieval water meadow at Hyde Farm, Frampton. MDO42813. Photograph: Part of RAF/CPE/UK/2431 RS 4272 22-JAN-48 Historic England RAF Photography.

At Hyde Farm, Frampton, for example, an area of water meadow (MDO42813) on the north side of the river is visible as earthworks on 1940s aerial photographs, where a series of rectilinear ditches link into longer channels and sluices, many of these recorded on the OS 1st Edition map (Fig 47). At the north eastern end of the water meadow linear ditches with rectangular sluices are visible within an area of parallel ridges and ditches (MDO42819) that may be an example of the re-use of former medieval ridge and furrow to form areas of water meadow, as mentioned above (see Fig 47). Along Sydling Water, stretches of water meadow (MDO42861; 43101) are visible on 1940s aerial photographs, extending from below Langford Farm, south of Sydling St Nicholas as far as Up Sydling. As at Frampton, the water meadows are visible as a series of linear ditched channels that feed into longer channels and sluices recorded on the OS 1st Edition map (see Fig 48 for example). In the main the precise engineered character of the channels and ridges in between suggests post-medieval bedworks but there are also areas containing individual channels or more organic arrangements of less regular channels. Some of the difference may be due to some loss of form since the main period of use, or perhaps some alteration or addition over time.



Figure 48 Water meadow and watercress beds at Sydling St Nicholas. MDO42861. Photograph: Part of RAF/CPE/UK/2431 RS 4269 22-JAN-48 Historic England RAF Photography.

There are three sections of water meadow between Sydling St Nicholas and Up Sydling where a series of rectilinear structures have been added. These are thought to be the shallow rectangular trays constructed to contain watercress beds. The structures are visible on 1940s aerial photographs, where they may still be in use, at least to some extent (Fig 49 and see Fig 48).


Figure 49 Water meadow and watercress beds at Up Sydling. MDO42861;43101. Photographs: Part of RAF/CPE/UK/1974 RP 3378 11-APR-47; Part of RAF/CPE/UK/1974 FS 2380 11-APR-47 Historic England RAF Photography.

Post-Medieval Extraction

The evidence for small-scale extraction is widespread across the project area. In total, 416 extractive sites were mapped by the project, which included chalk pits, gravel pits, lime kilns and quarries. Evidence for gravel extraction and undefined extractive pits is generally confined to the river terraces and lower valley sides. Chalk pits and quarries, some with lime kilns, are predominantly situated on the chalk uplands (Fig 50). Chalk extraction is known to date back into later prehistory and was widely used as an agricultural additive during the later medieval period to marl or sweeten acidic soils. Chalk and marl, a decomposed form of chalk, were commonly dug from pits, and these are a common feature of many chalk landscapes (Stanier 1993, 33). Although the extractive features within the project area have been widely attributed a post-medieval date, it is entirely possible that some sites were being quarried during the medieval period, and perhaps earlier.

Many of the extractive sites mapped by the project comprise of groups of chalk pits, which are widespread across the chalk uplands. These are typically found in conjunction with the many later prehistoric field systems in these areas, and in some cases appear to have extracted directly from the upstanding earthworks

associated with these, as on Magiston Hill, Godmanstone (MDO42924), and Orden Hill, Maiden Newton (MDO42975), for example (Fig 51). As mentioned above, although a broadly post-medieval date has been assigned to the extractive sites within the project area, it is possible that some of these have earlier origins, although there is no certain evidence for this. The juxtaposition of the majority of chalk pits within areas of later prehistoric field systems suggests that much of the chalk extraction is likely to be at least post-Roman in date, however.



Figure 50 Extractive sites mapped by the project.

One site previously recorded in the NRHE database (Hob UID 199121) is ascribed a possible Roman date based on local tradition. The site is located within a historic field on the north side of Long Ash Lane, Frome St Quintin and the earthworks were mapped by the project from aerial photographs (MDO43066). The site comprises multiple shallow scoops and a small number of deeper irregular hollows, closely conjoined to create a wider area of disturbance approximately 200m by 150m in extent (Fig 52). The route of the Dorchester to Ilchester road (MDO1194) is documented as crossing through the site and linear cropmarks to the southwest of the extractive area may be associated with this (Fig 52). Assuming that the road underlies the area of extraction, it seems more plausible that this extractive site is also later than the Roman period in date.



Figure 51 Post-medieval chalk pits on Magiston Hill, Godmanstone, and Orden Hill, Maiden Newton (MDO42924; 42975).

Photographs: Part of RAF/CPE/UK/1974 FP 1376-7 11-APR-47; Part of RAF/39/3829 V 0040-1 11-NOV-71 Historic England RAF Photography.

Figure 52 Chalk extraction on the north side of Long Ash Lane, Frome St Quintin, relative to the route of the Roman road (MDO43066).

Photograph: Part of RAF/CPE/UK/1975 FP 1057 11-APR-47 Historic England RAF Photography.



Several of the chalk extractive sites are associated with lime kilns, many of which are recorded on the OS 1st Edition map. The use of lime as a building mortar or limewash dates back to Roman times, but the production of quicklime as an agricultural fertiliser increased exponentially from the 17th century, along with a rapid growth in the number of rural limekilns. Throughout the 18th and 19th centuries, many small rural kilns were constructed to supply the local agricultural industry and most villages and private estates had their own limekilns (Stanier 1993, 33). Most crops, including grassland, flourish better in neutral or basic soils. Farm manure will acidify a soil over time and rain will wash out lime, even from soils in chalk or limestone areas. Applying crushed limestone or lime to agricultural land increases both soil fertility and soil texture and initially it was applied to the

fields directly from the kiln. Mixed with the topsoil layer and drawn into heaps, the quicklime could destroy any organic tissue, thus releasing nutrients into the soil (Isham 2000, 21; Stanier 1993, 33).

Most of the lime kilns recorded on the OS 1st Edition map within the project area are no longer visible as extant structures on earlier aerial photographs, such as the RAF 1940s series, although earthworks sometimes remain visible to indicate their former location. At a site on Batcombe Hill, for example, a chalk pit and lime kiln are recorded on the OS 1st Edition map, although the chalk pit is already disused by this time (Fig 53). On a 1945 aerial photograph the outline of the chalk pit is still visible as an elongated shallow earthwork on the edge of the hill. Two linear banks correspond with earthworks shown on the OS 1st Edition map, but the lime kiln itself appears demolished, although its footprint may just be discerned (Fig 53).



Figure 53 Old chalk pit and lime kiln on Batcombe Hill, Batcombe (MDO43060). Photograph: Part of RAF/106G/LA/218 V 1040 15-APR-45 Historic England RAF Photography.

At another site, on Whitesheet Hill, Toller Fratrum, on the other hand, two lime kilns are recorded on the OS 1st Edition map alongside a small pit recorded as an old chalk pit and a series of further scarps that may indicate an expansion of quarrying during the later 19th century (Fig 54). The larger of the lime kilns, on the east side of the site, corresponds with an extant building visible on a 1947 aerial photograph. The chalk pit and the larger quarry to its southwest are visible on the same aerial photograph as large irregular depressions either side of the A356 road. Various trackways run up to and past the quarry on the south side of the road, whilst on the north side, additional buildings are present in 1947 to those shown on the OS 1st Edition map. The quarry is also larger in extent in 1947, suggesting continued use (Fig 54). The quarry appears larger again but now in disuse on current Google Earth imagery. The features on the north side of the A356 are overgrown, whilst those on the south side are grassed over and no longer visible. Whilst most of the small-scale extraction appears to have taken place up until and during the late 19th century, clearly some larger, more productive, sites, such as the one on Whitesheet Hill, continued in use into the early to mid-20th century.



Figure 54 Old chalk pit, quarry and lime kilns on Whitesheet Hill, Toller Fratrum (MDO41998).

Photograph: Part of RAF/CPE/UK/2431 RP 3279 22-JAN-48 Historic England RAF Photography.

Summary

The sites mapped by the project suggests that during the medieval period the Upper Frome and Sydling valleys continued to be well-settled and farmed. Earthworks associated with ridge and furrow cultivation, strip fields and strip lynchets are still a highly visible part of the landscape, indicating a rich arable landscape along the valleys and valley sides, shaped by medieval land organisation and agricultural practices. The remains of medieval deer parks and wider patterns of historic enclosure are clues to the structure of medieval lordship and tenure, with many of these earlier boundaries influencing later arrangements of fields, farmsteads and settlements. Equally, the remains of shrunken and deserted villages and farmsteads, still visible as earthworks on aerial photographs and lidar imagery, chart some of the social changes that took place during the mid to late medieval period, such as the decline in population during the 14th to 16th centuries, for example, largely attributed to the repeated plague outbreaks during this period (e.g., Campbell 1993, 60-61). The area continued to remain mainly agricultural into the post-medieval period, although improvements in technology and industry resulted in larger-scale agricultural schemes and water management. Within the project area, extensive stretches of water meadows were created along the river floodplains between the 17th and 19th centuries, some of which were adapted during the later 19th and early 20th centuries to support watercress beds. Earthworks and structures associated with these former sites still survive in many areas and remain visible on aerial photographs and lidar imagery. The evidence for widespread chalk extraction during the post-medieval period, and possibly earlier, is evident across the project area, often associated with small lime kilns, which do not generally survive. The production of lime fertiliser from the chalk would have been used for lightening and enriching heavier and more acidic soils. Although many of the small-scale chalk pits and quarries were already falling into disuse by the late 19th century, some of the more productive sites may have continued in use into the 20th century.

Wartime

During the Second World War, the entire length of the south coast of England become the front-line of the European conflict and was fortified in anticipation of invasion. Large areas of the countryside were commandeered for military training areas, camps, storage depots and for the construction of airfields and hospitals. Whilst other parts of Dorset may have been more heavily utilised for training or defensive sites, such as the heathlands of east Dorset, or the lower Stour and Avon valleys, for example, there are several sites of Second World War, or probable Second World War, date within the project area. In total 25 sites were recorded during the mapping project, the majority of these being pillboxes or anti-tank obstacles located along the railway line at Maiden Newton. An anti-aircraft battery (MDO43222) and a small military camp (MDO42337) was also recorded at Maiden Newton, with a further military camp and hospital (MDO43058) recorded on Wardon Hill, Sydling St Nicholas. Two sites of possible Second World War date comprised of a firing range (MDO43099) at Sydling St Nicholas and a possible radar station (MDO43142) at Lankham Bottom, Cattistock (Fig 55).



Figure 55 Second World War military sites.

Military Defences, Maiden Newton

Maiden Newton was the location for a concentration of Second World War military sites, which formed part of the Southern Command Dorchester Stop-Line (CBA 1996a, 93-108; and see also Dobinson 1996a). This ran between Yeovil and Weymouth via Dorchester, and at Maiden Newton primarily followed the railway line (DOB Archive S0008793). A system of coastal and inland 'stop-lines' were established under the directive of the Home Defence Executive, which was formed under General Ironside, Commander-in-Chief Home Forces, on 27th May 1940 to

organise the defence of Britain. These stop-lines frequently improvised from existing features such as waterways, embankments, railway lines and bridges, for example, which were then defended with pillboxes and enhanced with anti-tank obstacles (CBA 1996, 78; Dobinson 1996a, 32). At Maiden Newton, a series of pillboxes and anti-tank cubes were constructed alongside the railway line and at points within the town, effectively encircling it (Fig 56). The anti-invasion defences, under 50 Division, created an anti-tank 'island', or nodal point (DOB S0008793), intended to form a threat to the flanks and rear of any invasion force breaking through a stop-line (CBA 1996, 78-9). Many of the sites associated with this were recorded by the Defence of Britain Project, including the pillboxes, anti-tank obstacles and a spigot mortar emplacement. A series of anti-tank obstacles and pillboxes are visible as extant structures at Maiden Newton on 1947 and 1948 aerial photographs and these were mapped by the project (see Fig 56, for example).



Figure 56 Second World War anti-invasion defences and two military camps at Maiden Newton.

MDO42337; 43222; 43221; 42900; 17972;17976-8. Photograph: Part of RAF/CPE/UK/1974 RS 4276 22-JAN-48 Historic England RAF Photography.

The town is also documented as having been the site of military encampments housing a succession of regiments in the run-up to D-Day, as well as Prisoners of War (Matthews 2021). Cattistock Camp (Camp no. 295), a German working camp was established at Maiden Newton, although the precise location is currently unknown (Thomas 2003, 42). Two military camps (MDO42337; 43222) at Maiden Newton were mapped by the project from RAF aerial photographs taken in 1947 (Fig 56). The largest of the military camps, on the east side of the town, may be the site documented as being at one point the 55th QM Base Depot for the US Army's 453rd AA AW Battalion (Wartimes.ca, 2021). An article compiled by the Maiden Newton and District Community Museum Trust features on the Pillbox Study Group website (http://www.pillbox-study-group.org.uk/defence-articles/maidennewton-poole-harbour-stop-line/) and this also places the Lincoln and Royal Sussex regiments, and later, the 1st US Infantry Division, in the town during the Second World War (Matthews 2021). The same article documents a camp on Chilfrome Lane housing Canadians and French Canadians manning two gunemplacements (*ibid*). This may be the smaller site visible on 1947 aerial photographs on Chilfrome Lane, indicated as the site of gun emplacements on the Pillbox Study Group Website (Matthews 2021); the gun emplacements are not visible on the 1947 aerial photograph, although two buildings within a quarry on the south side of Chilfrome Lane may be part of this site (Fig 56).

Wardon Hill Military Hospital and D-Day Camp

A military camp on Wardon Hill, Frome St Quintin, is visible on 1940s aerial photographs (see Figs 7 and 57). An aerial photograph taken in April 1945 shows the site comprising of a concentration of rectilinear huts and covered walkways on the west side of Wardon Hill, adjacent to Long Ash Lane. Within the site are a number of small rectilinear structures, thought to be water tanks, possibly intended for firefighting if required. To the east of the main site the hillslope is criss-crossed by several trackways alongside which are a series of additional loosely grouped structures, possibly an ancillary area of the camp. The site is recorded in the NRHE database (Hob UID 1416128) as a military hospital and D-Day camp and is listed on the Wartimes.ca website as a US Army camp and hospital (Wartimes.ca 2021).



Figure 57 Second World War military hospital and D-Day camp on Wardon Hill, Frome St Quintin (MDO43058).

Rifle Range, Sydling St Nicholas

A rifle range is visible on 1940s aerial photographs to the south of New Barn, Sydling St Nicholas. On an aerial photograph taken in April 1945 the site is accessed via an entrance road off Sydling Road. Two parallel roads run off the main access route on a southwest-northeast axis, each having six narrow rectilinear structures appended off its north side, positioned at regular intervals, around 90m apart and parallel to each other. The northernmost of these two roads is accessed via a trackway and may be a secondary feature or extension of the original site. At the northeast end of each road are further groups of structures, including some smaller rectangular buildings. Closer to the entrance into the site is a large square feature, possibly a building or hard standing, however, the detail is unclear (Fig 58). On its west side the site partially overlies older earthworks (MDO43098) visible on aerial photographs and lidar imagery. The OS 1st Edition map records these as the site of a British Settlement but the NRHE database documents the earthworks as the site of the former medieval settlement of Elston (Hob UID 199261).

The rifle range is not recorded on any historic mapping and is likely to be early to mid-20th century in date. It appears to be in current use in 1945 and may have been a Second World War military training site.



Figure 58 Rifle Range, Sydling St Nicholas (MDO43099). Photograph: Part of RAF/106G/LA/218 V 1037 15-APR-45 Historic England RAF Photography.

Possible Radar Station, Cattistock

A possible Second World War radar station (MDO43142) was mapped by the project at Lankham Bottom, Cattistock. The site is visible on an aerial photograph taken in April 1947, where it consists of a 22m by 10m rectilinear building housed within a 50m by 25m rectangular compound. A smaller rectilinear building also lies within the compound, on the south side of the main building. The compound is accessed from the road to the north, linked by a curving vehicular trackway. Running south westwards from the compound is a straight rectilinear hardstanding just under 200m long, towards the end of which is a single tower with a base of approximately 4m by 3m (Fig 59). Although simple in its set-up, the arrangement of the structures suggests a possible transmitter/receiver tower and a control room. The site is not documented and does not conform to the larger and more complex chain home stations, which were set up around the south and east coasts during the Second World War (see e.g., CBA 1996; Dobinson 2000). Although its purpose at this location is unknown, the indications are for a possible radar or radio station of

early to mid-20th century date, possibly Second World War in origin. The site is located on an area of higher ground just under 2.5km northeast of Maiden Newton, which was a nodal point in the anti-invasion defences of Second World War Britain (see above), and it is possible there may be some association between the two areas.

The interpretation of this site is made with low to medium confidence as parts of the site are still extant but marked on the modern OS Mastermap as a water treatment works. The configuration of the main building and compound, along with the vehicular access road, is the same as that visible in 1947 and it is possible that the treatment plant has re-used these former structures. Google Earth imagery shows that by 2002 the tower was no longer extant, and that by that time a small 9m by 9m compound was positioned over part of its footprint and linked to the access road by a new pathway. The scar of the rectilinear hardstanding connecting the tower to the main building to the northeast is also almost completely grassed over on 2002 imagery, indicating a lengthy period of disuse.



Figure 59 Possible Second World War radio/radar station, Cattistock (MDO43142).

Photograph: Part of RAF/CPE/UK/1974 RP 3382 11-APR-47 Historic England RAF Photography.

Summary

During the Second World War Maiden Newton was a nodal point in the antiinvasion defences of Great Britain. Various anti-tank obstacles, alongside additional defensive structures, such as pillboxes and gun emplacements, were established alongside the railway embankment and at key points around the town to create an 'anti-tank island'. A small military encampment was also established within the town and a further camp is documented to have been sited on Cattistock Lane (not identified during the project. Troops housed within the town over the course of the war included English, Canadian and US Army divisions, as well as POWs. A Military hospital and D-Day camp was constructed on Wardon Hill, Frome St Quintin. Although not much is documented about this site, it was clearly a substantial establishment and at one time housed US Army personnel. Two smaller sites of possible Second World War date within the project area comprise a rifle range and a possible radar or radio station. The aerial photographic coverage of the project area during and prior to 1945 is relatively limited and of low-quality resolution and as a result, it is possible that further Second World War sites existed but could not be identified through the available resources.

CONCLUSION

The mapping of the Dorset Upper Frome and Sydling Valleys has identified 975 monuments of which 825 (84.6%) were previously unrecognised or unrecorded in the county and national historic environment databases. The project mapped a wide range of sites from the Neolithic through to the early 20th century, with a particularly high concentration of monuments associated with later prehistoric field systems and settlements on the higher chalk plateaux between the river valleys and with medieval and post-medieval agriculture and settlement along the valley floors and lower valley slopes. There was also significant evidence for small-scale post-medieval chalk and gravel extraction.

Of the 975 sites recorded, 773 (79.3%) were still extant or partially extant earthworks and 15 (1.5%) were extant buildings or structures. A total of 113 (11.6%) sites were completely or partially moved, levelled, and/or destroyed. The remaining 74 (7.6%) sites were visible as cropmarks on aerial photographs, some of these accompanied by levelled earthworks. In this respect the project fulfilled its aim of improving knowledge of the archaeological resource, by providing fuller awareness of the range and extent of archaeological remains within the project area. This enhanced knowledge and understanding can help inform and facilitate future management, protection and strategic decision-making of the heritage resource, as well as feed into future research objectives and strategies for the Dorset AONB and Dorset as a whole. In particular, the project feeds into the concept of landscape approach outlined in the Dorset AONB's current Management Plan (Dorset AONB 2019, concept 5.3). This concept is formed around the principles of landscape character assessment, which include consideration of historical and cultural qualities as a basis for determining future management strategies.

The project also feeds into the following research themes presented in the South West Regional Research Framework's (Grove and Croft 2011) Research Agenda:

- Theme A Settlement Sites and Landscapes urban, rural, prehistoric. In particular, research aim:
 - o 28: Improve understanding of Neolithic settlements and landscapes.
 - o 29: Improve understanding of non-villa Roman rural settlement
 - 31: Address the long-running debates about Early Medieval landscapes and territories.
 - 33: Widen understanding of the origins of villages
- Theme B: Artefacts and the Built Environment technologies, resources, links to trade. In particular, research aim:
 - 45: Broaden understanding of Post-Medieval to Modern technology and production.
- Theme D: Social Identity and Change transition, identity, territories, conflict, religion and death. In particular, research aim:
 - 54a, 54b: Widen understanding of monumentality in the Neolithic and Early Bronze Age

- 64: Improve understanding of the less-researched areas of Post-Medieval to Modern defence and warfare.
- Theme E: Economies and Subsistence trade, subsistence, agriculture, transport and communication. In particular, research aim:
 - 42: Improve understanding of medieval farming.
- Theme F: Widening Access and Interpretation engaging the public, accessing resources. In particular, research aim:
 - 2: Encourage works of synthesis within and across periods, settlements, monuments and areas.
 - 4: Encourage wide involvement in archaeological research and present modern accounts of the past to the public.
- Theme H: Methodologies developing new approaches and techniques. In particular, research aim:
 - 1: Extend the use of proven methodologies for site location and interpretation and encourage the development of new techniques.
 - 3: Address apparent "gaps" in our knowledge and assess whether they are meaningful or simply biases in current knowledge.

Outcomes

The results of the mapping have improved our understanding of human activity within the Dorset Upper Frome and Sydling valleys, both within the lower lying river valleys and on the higher chalk downland in between. There is some evidence for early ceremonial monuments on the chalk plateaux, predominantly Early Bronze Age round barrows, but with some potentially earlier sites of Neolithic date. A significant number of the sites recorded further relate to the settled agricultural landscapes that developed from the Middle Bronze Age onwards, with numerous later prehistoric settlements and field systems recorded on the higher chalk soils.

In addition to the abundance of later prehistoric sites associated with settlement, agriculture and industry were a number of trackways and earthworks associated with ancient routeways and boundaries. A number of long linear trackways and boundary earthworks of likely ancient origin were mapped within the project area; the majority of these crossing the high chalk downland. These landmark features give some indication of land organisation and control during later prehistory and some of these clearly survived to inform the pattern of lanes and administrative boundaries that became established during the medieval period; some of which still survive as defining elements of the present-day landscape. Two important Roman roads cross through the project area, both largely fossilised in the modern road network. Cropmarks associated with a possible section of the former Dorchester to Ilchester Roman road are visible in a field near Frome St Quintin. Both roads clearly cut through areas of later prehistoric fields and settlements, suggesting that at least some of these areas may have fallen into disuse – or been forced into disuse – by this time.

Within the valleys the settlement landscape was more medieval in character, but this distinction is most likely due to the more fertile valley soils having been in the most continuous use, resulting in a bias of archaeological survival. Extending onto the higher ground within the project area are the remains of five medieval deer parks. The boundaries of these, along with potential evidence for wider patterns of associated medieval enclosure may offer insights into the manner of medieval land ownership and organisation, as well as possible shifts in manorial boundaries and sub-division over the course of the medieval period.

The highest numbers of sites recorded are of post-medieval or 19th century date, predominantly relating to later agriculture and industry across the wider project area. Of particular note was the profusion of small chalk pits that were recorded across the higher downland, with a much smaller scale of gravel extraction along the river terraces. Several extensive areas of post-medieval water meadows were also recorded alongside the rivers, some of these along the Sydling Water being adapted to support later watercress beds.

A small number of sites are early 20th century in date, the majority of these associated with Second World War military activity in the area; most notably at Maiden Newton, which was a key nodal defence point on the Southern Command Dorchester Stop-Line.

Overall, the results have greatly added to our understanding of the character and extent of human activity within the project area from later prehistory onwards. In particular they have significantly contributed to the understanding of key themes within the project area's history; the early monumental landscapes of the chalk downlands, the development of settlement and agriculture, land division and social organisation from the Middle Bronze Age through into the medieval period, the post-medieval development of agricultural technologies and small-scale industry that utilised the regions natural resources, and the role played by the region during the Second World War in the defence of Britain and the run-up to D-Day.

The distinctive historic character of the project area resides in the sites and monuments of all periods that are to be found within it; both known and unknown. Qualities found within these sites can be measured against defined values that communicate certain aspects of heritage and community in a way that allows the richness of our past to colour and shape our present and future. Historic England's *Conservation Principles* (English Heritage 2008) defines four values that can be used to describe the significance of a place:

- Evidential value: the potential of a place to yield evidence about the past.
- Historical value: the ways in which past people, events and aspects of life can be connected through a place to the present.
- Aesthetic value: the ways in which people draw sensory and intellectual stimulation from a place.
- Communal value: the meanings of a place for the people who relate to it, or for whom it figures in their collective experience or memory.

Evidential value

The evidential value of the project area is reflected in sites of all periods across its whole extent, with a time-depth of archaeological survival extending back into later prehistory. The physical remains of past human activity are a record of historic substance and evolution of places and the people and cultures that shaped these (English Heritage 2008).

There is particularly good evidence for later prehistoric activity within the project area, with a moderate number of Bronze Age ceremonial sites alongside a far greater number of settlements and field systems that potentially range in date from the Middle Bronze Age to the Roman period. Many of the enclosures and field systems within the project area were previously recorded in the Dorset HBSMR and/or NRHE databases but just over three quarters of possible Middle Bronze Age to Romano-British sites recorded by the project were newly identified.

Many of the extensive settlements and field systems of Bronze Age to Romano-British date within the project area demonstrate distinctive morphologies that are already identified and comparatively well-studied. The survival of many of these sites on the higher chalk soils is relatively good, with the majority visible as earthworks on aerial photographs and lidar imagery. Some sites are partially identified through cropmarks, which confirm some sub-surface survival of sites that would otherwise be difficult to identify. The morphology and juxtaposition of later prehistoric field systems and enclosures, as well as more complex settlement sites, permitted observations on the subtleties of dating and relationship to each other and the surrounding later prehistoric and historic landscapes that may contribute to future studies in this area.

Alongside the evidence for later prehistoric settlement and agriculture are a number of ancient route-ways and boundary earthworks that testify to the way in which the land was divided and organised and the ways in which access through the landscape was established. Some of these features appear to have continued in some form into at least the medieval period and have played a part in shaping the pattern of lanes and administrative boundaries that developed during this time. A late prehistoric trackway between Wrackleford and Batcombe Hill, for example, appears to have been partially re-used as the route of the medieval monastic road (MDO42873) between Abbotsbury and Cerne Abbas.

Although there is not a high number of distinctively Roman sites within the project area, those that were recorded are already known, and include the two main Roman roads through the region, as well as two possible Roman villa sites, at Frampton and Wynford Eagle, and a Roman aqueduct at Maiden Newton. Only a short, possible, section of the Roman road between Dorchester and Ilchester (MDO1194) was identified through cropmark evidence at Frome St Quintin and the site of the Roman villa (MDO42814) at Frampton was only identifiable by the L-shaped protective earth mound constructed following excavations at the site. Nonetheless, the evidence indicates that a relatively high-status villa landscape was established within the river valleys and closely adjacent to the Roman roads through this region and it is likely that further evidence may survive to inform future studies in this area.

There is particularly good evidence for a number of medieval settlements, both simple farmsteads and more complex sites. These are predominantly settlements that have become deserted or shrunken, or where the main core of settlement has moved from its original location. In addition to these are a significant number of sites associated with medieval cultivation, such as strip fields and ridge and furrow, for example, with large numbers of strip lynchets still visible as earthworks along the sides of the scarps and ridges of higher ground. Earthworks associated with a smaller number of distinctively medieval sites such as moated sites and deer parks also survive. Over 93% of the medieval sites recorded by the project are new sites.

Along with those sites already known, the results significantly enhance our understanding of medieval settlement and land use in the area, as well as patterns of lordship, land ownership and land organisation in this part of Dorset. This increase in knowledge can also be related to wider local, regional and national processes that were taking place at this time.

The evidential value of the post medieval, historic and 20th century sites recorded by the project lies predominantly in wider-scale agriculture and industry, as well as relatively limited evidence for military activity and wartime defence. Many of the post-medieval to 20th century sites survive as earthworks or structures (or partial structures). Over 95% of post medieval sites mapped by the project were newly identified, demonstrating significant enhancement of the archaeological record.

Military sites, particularly wartime sites, are often ephemeral and short-lived, so identification of these can be difficult, and gaining a true understanding of their form and function, challenging. Early 1940s aerial photographs are often the only source of evidence and through these the project has been able to identify and map a number of wartime military sites in some detail. Although many of these are documented to some degree, the project has confirmed the location of some sites and helped inform our understanding of wartime military activity in this part of Dorset as a whole. Although survival of many of these sites is generally low, where elements do survive, as earthworks or structures, the data provided by this project can provide the broader context for these.

Historical value

The historical value of the project area resides in the relationship and interplay between local communities and their landscape over centuries of habitation, subsistence and adaptation. Of the two types of historical value, illustrative and associative, the sites mapped by the project are predominantly illustrative, having the ability to link past people or events to the present. The mapped sites comprise features from a wide range of periods, relating to a scope of human activities, including monument building, settlement, land use, land organisation, land management, resource exploitation and industry, and military offence and defence.

The early monumental landscape of the project area demonstrates the importance of prominence of burial/ceremonial monuments for the communities who constructed them and lived amongst them, with evidence for deliberate positioning to maximise visibility and associative relationships. The monuments reflect contemporary ideologies about landscape, place and territoriality as well as enhancing understanding about the prevalent ancestral beliefs and ritual practices of the time.

The high proportion of sites of Middle Bronze Age to Romano-British date reflect a time when the landscape became more permanently settled and farmed. Many sites of these periods demonstrate distinctive and measurable morphologies and characters that can significantly inform contemporary studies in social organisation and status, domestic habits and agricultural practices. The patterns of land organisation, routeways, settlement and enclosure that developed through these periods reflect these social changes, and in many cases formed a legacy of change that is still recognisable in the present-day landscape.

The majority of medieval sites within the project relate to settlement and agriculture and developing patterns of lordship and control during this period. The historical narrative of this period is rooted in the pre-Conquest settlement landscape and how division and control of this changed during the following centuries. High-status manorial sites and associated features (such as deer parks, for example) are all illustrative of this period of social change. The character and distribution of deserted and shrunken villages, alongside the distribution of strip lynchets relative to strip fields and ridge and furrow cultivation are also indicators of shifts in social circumstance, changes in population and the expansion and contraction of land use that ran alongside these.

The majority of post-medieval sites have historical value in the way they illustrate a period of technological growth in agriculture and industry. The abundance of small chalk pits, for example, may be related to the increased use of lime as a building material as well as an agricultural soil improver. Equally, the construction of extensive water meadows can be directly associated with a particular period of agricultural growth; the dominance of the sheep-corn economy between the 17th to 19th centuries.

The Second World War sites mapped by the project are predominantly associated with military defence and auxiliary support. Maiden Newton was one of the key nodal defence points along the Southern Command Dorchester Stop-Line. The pattern of anti-tank obstacles, pillboxes and gun emplacements around the town demonstrate the use of the railway as a natural defence line, augmented by the additional defences. A number of camps and billets within the town housed military personnel drafted into the town, as well as Prisoners of War, reported to have been held in a camp near Cattistock. The military hospital on Warden Hill was probably established as an auxiliary base in case of invasion or to cater for wounded troops brought home from the front and was manned by the US Army. It served as a D-Day camp and may also have been intended for use in the aftermath of D-Day, although no documentary accounts of the site are known. The rifle range at Sydling St Nicholas, and the possible radar/radio station at Cattistock, are potentially illustrative of support sites associated with military training and communications as part of wartime defensive and offensive strategy.

Aesthetic value

Across the chalk downland and within the lower-lying river valleys, the historic landscape, with its pattern of farms, villages, and fields, is illustrative of its long time-depth of settlement and agriculture and the patterns of land organisation that helped shape it. Its aesthetic value is therefore deeply rooted in its historical and cultural development and this has resulted in distinctive areas of landscape character.

Across the higher ridges and ridge tops the historic pattern of fields is underlain by the extensive earthworks of later prehistoric field systems and settlements, which on the edges of slopes are characteristically interspersed by medieval strip lynchets. Although typically characterised by areas of larger fields, open pasture and tracts of woodland in the present-day, the aesthetic value of this landscape is enhanced by the evidence of earlier agricultural practices, which demonstrate the ebb and flow of human activity on the higher chalk downland. The higher ground was also the location of the major communications routes through the region, with numerous later prehistoric trackways and boundary earthworks, as well as the two subsequent Roman roads, which ran directly along the ridge tops between the valleys. These form the basis of the present-day road network through the area.

Within the river valleys the aesthetic qualities of this area reflect the long continuity of settlement and land-use and are the location for the major settlements centres which became established during the medieval period. The character of this landscape is more intimate and enclosed, with much of the historic field pattern still reflective of its medieval origins, and in places the older territorial boundary lines which influenced its development. The presence of at least two Roman villas in the south of the area indicate a high-status estate-organised landscape during this period, which may have had some influence on later settlement and boundary organisation in this area. Smaller farmsteads within the river valleys may have been established as early as the medieval period, potentially on sites with much older origins. The riversides still retain the visible remains of the post-medieval water meadows and later watercress beds that were established along sections of the river, with their distinctive patterns of channels and sluices.

Communal value

The results of this project represent evidence for human activity across a range of historic landscapes and time periods. The evidence also reflects a range of social ideologies and beliefs and patterns of landscape development that arose from changes in social organisation and control. All the sites mapped by the project demonstrate tangible links to the communities who lived in this part of Dorset from later prehistory onwards. The communal value of the area as a whole is therefore enriched by a range of different elements that come together to express its distinctive character and the meaning of the place in local consciousness.

The results of this project have contributed towards a better understanding of the historic character of this part of Dorset as well as informing the heritage values discussed above. The mapping has provided an enhanced level of detail regarding the form and extent of archaeological features within the project area, and this can be used to inform future planning and historic environment management decision-making. The following recommendations arise from these results.

Recommendations

- Continuing aerial reconnaissance and lidar survey. Specialist aerial reconnaissance has been undertaken over the project area in recent decades and a number of important new sites have been identified from this photography. In addition, a large number of remains were identified from vertical photographs taken by the OS and by the RAF in the 1940s. Lidar survey is increasingly improving in technique and coverage and there remains considerable potential for the discovery of archaeological sites through a continuing programme of aerial reconnaissance and lidar survey. The use of AI&M mapping as part of future aerial investigation will also allow much greater efficiency by facilitating better targeting in areas of very dense archaeological remains.
- Further AI&M projects. The significant numbers of important new sites recorded during the project demonstrate the effectiveness of aerial mapping

within Dorset. Despite a long history of aerial reconnaissance over these counties since the 1920s, many areas of the county remain unmapped. Further AI&M projects for these areas would therefore be of enormous value, especially in areas subject to continued ploughing. Increasing the number of known sites and monuments and presenting these within their wider historic and landscape context enhances our understanding of the county's heritage resource and facilitates future management and strategic planning related to this. It also increases the potential for public benefit, through making the results available in digital formats that can be widely accessed and enjoyed, both in their own right, and in the manner in which they can inform public experience of particular sites, whether recreationally or as part of volunteer groups and community involvement.

• Further investigation of sites recorded from aerial photographs. Although a large number of sites have been recorded from aerial photographs, a relative lack of fieldwork and excavation in many areas means that little is known about them. In particular the date and function of certain features remains unclear. A programme of ground-based investigation of a representative sample of the sites recorded by AI&M, involving field-walking, geophysical survey and targeted 'ground-truthing' excavation, would significantly enhance current knowledge of later prehistoric, Roman and early medieval rural settlement, land management and industry. There is potential public benefit to be had in this area too, providing opportunities for communities to engage in fieldwork projects.

A selection of sites which would benefit from further ground-based investigation is included in Appendix 2. Of notable interest are many of the extensive later prehistoric field systems on the chalk downland, but in particular the sites on Grimstone Down (MDO42865; 42873; 42874), which would benefit from further assessment of form, character, dating and associative relationships, also the possible medieval moated site (MDO149) at Batcombe to assess its form and date, as well as its potential relationship to the medieval deer park and other aspects of potential manorial enclosure. The deserted medieval settlement at Elston (MDO43098) might also benefit from survey and assessment to assess its form and dating, as well as its potential for Scheduling. The OS 1st Edition map, perhaps erroneously, records this site as a British Settlement and this interpretation might merit further investigation.

• Enhanced Designations. The aerial investigation and mapping have added to the interpretation of a number of important archaeological monuments within the project area. In some cases, the extent of previously known sites is suggested to be greater than that included in the current designation and ground-based survey of the site is recommended to assess extent and condition of the relevant sites. At least one site, that of a Bronze Age barrow north of Naked Cross, Corfe Mullen (NHRE1015786) may be wrongly located and would merit checking. A list of the potentially national and regionally important sites that would merit further assessment and review is included in Appendix 3.

REFERENCES

Allen, M, J, Smith, M, Jay, M, Montgomery, J, Ramsay, C, B, Cook, G, and Marshall, P, 2016. *Wor Barrow, Cranborne Chase, Dorset: Chronological Modelling*, Historic England Archaeological Reports

Allen, M, J, and Scaife, R, 2007. A New Downland Prehistory: Long-Term Environmental Change on the Southern English Chalklands in A, Fleming and R, Hingley (eds), *Prehistoric and Roman Landscapes; Landscape History after Hoskins*, 16-32, Macclesfield, Windgather Press

Bailey, C, J, 1971. Romano-British Occupation on Grimstone Down, Stratton, *Proc Dor Nat Hist Archaeol Soc* 93, 156-7

Bailey, M, 2002. *The English Manor c.1200-c.1500*, Manchester, Manchester University Press

Barrett, J, Bradley, R, and Green, M, 1991. *Landscape, Monuments and Society: The Prehistory of Cranborne Chase*, Cambridge, Cambridge University Press

Bewley, R, 2001 Understanding England's Historic Landscapes: an Aerial Perspective, *Landscapes* 1, 74-84

Bewley, R, Crutchley, S, P, and Shell, C, A, 2005. New light on an ancient landscape: Lidar survey in the Stonehenge World Heritage Site, *Antiquity* 79, 636-60

Bowden, M, Field, D, and Soutar, S, 2012. *Stonehenge World Heritage Site Landscape Project: Lake Barrows, The Diamond and Normanton Gorse, Archaeological Survey Report*, Research Report Series 29-2012, English Heritage

Bryant, S, Perry, B, and Williamson, T, 2005. A Relict Landscape in South-East Hertfordshire: Archaeological and Topographic Investigations in the Wormley Area, *Landscape History*, 27 (1), 5-16

Campbell, B, M, 1993. 'A Fair Field Once Full of Folk: Agrarian Change in an Era of Population Decline, 1348-1500', *Ag Hist Rev* 41, 60-70

Cantor, L, M, and Wilson, J, D, 1963. The Medieval Deer-Parks of Dorset: II, *Proc Dor Nat Hist Archaeol Soc* 84, 145-153

Cantor, L, M, and Wilson, J, D, 1964. The Medieval Deer-Parks of Dorset: III, *Proc Dor Nat Hist Archaeol Soc* 85, 116-121

Cantor, L, M, and Wilson, J, D, 1966. The Medieval Deer-Parks of Dorset: V, *Proc Dor Nat Hist Archaeol Soc* 87, 223-233

Carpenter, E, Small, F, Truscoe, K, and Royall, C, 2016. *South Downs National Park, The High Woods from above*, NMP, Historic England Council for British Archaeology, 1996. 20th Century Defences in Britain. *Practical Handbooks in Archaeology* 12 (rev edn), York, Council for British Archaeology Cunliffe, B, 1987. *Hengistbury Head, Dorset, Volume 1: The Prehistoric and Roman Settlement 3500 BC-AD 500*, Oxford University Committee for Archaeology Monograph 13

Cunliffe, B, 2010. Iron Age communities in Britain – an account of England, Scotland and Wales from the seventh century BC until the Roman Conquest, London, Routledge (fourth edition)

Davey, J, 2013. Rectilinear Landscapes in Dorset, *Proc Dor Nat Hist Archaeol Soc* 134, 175-190

Devereux, B, J, Amble, G, S, Crow, P, and Cliff, A D, 2005. The Potential of Airborne Lidar for Detection of Archaeological Features under Woodland Canopies, *Antiquity* 79, 648-660

Dobinson, C, S, 1996a. *Twentieth Century Fortifications in England Vol 2, Antiinvasion defences of WWII*, Council for British Archaeology

Dobinson, C, S, 2000. *Twentieth Century Fortifications in England Vol 7.1, Acoustics and radar*, Council for British Archaeology

Dorset AONB, 2019. *Management Plan 2019-2024* [Online], available at: https://www.dorsetaonb.org.uk/wpcontent/uploads/2019/04/DAONB_Managmentplan.pdf [accessed 30th September 2021]

Dorset Council, 2021. *Chalk Valley and Downland* [Online], available at: https://www.dorsetcouncil.gov.uk/countryside-coast-parks/the-dorsetlandscape/landscape-character-type.aspx?id=68b3eaf6-28c6-4e4d-a7d5-45c77da578d1 [accessed 13th April 2021]

Dorset County Council, 2009. *The Dorset Landscape Character Assessment* [Online], available at https://www.dorsetcouncil.gov.uk/countryside-coast-parks/countryside-management/biodiversity/pdfs/the-dorset-landscape-character-assessment.pdf [accessed 13th April 2021]

English Heritage, 2010. *The Light Fantastic: using airborne lidar in archaeological survey*, English Heritage

English Heritage, 2017. *The National Mapping Programme. Standards and guidelines for the use of aerial photographs for archaeological landscape mapping and analysis*, Historic England

Evans, S, 2019. *Historic England Aerial Investigation and Mapping (formerly National Mapping Programme) Standards Technical Review*, Research Report Series 46/2019, Historic England

Farrar, R, H, 1950. Early Iron Age remains at Grimstone Reservoir, *Proc Dor Nat Hist Archaeol Soc* 72, 88-9

Fenner, V, and Dyer, C, 1994. *The Thames Valley Project: A report for the National Mapping Programme*, Royal Commission on the Historical Monuments of England

Field, D, 2006. Earthen Long Barrows, Stroud, Tempus Publishing Ltd

FISH, 2021. *Forum on Information Standards in Heritage*, [Online], available at http://www.heritage-standards.org.uk/fish-vocabularies/ [accessed 14th April 2021]

Fleming, A, 1987. Co-axial Field Systems: Some Questions of Time and Space, *Antiquity*, 61, 188-203

Fleming, F, and Royall, C, 2020. *Dorset Stour River Catchment Aerial Investigation and Mapping Project*, Research Report Series 224/2020, Historic England Gale, J, 2003. Prehistoric Dorset, Stroud, Tempus Publishing Ltd

Gale, J, 2017. Knowlton Circles: 'A Later Neolithic and Early Bronze Age Ceremonial Complex and its Environs – a Review', *Landscapes* 18 (2), 102-19, [Online], available at:

http://eprints.bournemouth.ac.uk/30482/3/GALEKNOWLTON_AOM.pdf [accessed 24 April 2021]

Gale J, Cheetham P, Laver J, and Randall C, 2004. Excavations at High Lea Farm, Hinton Martell, Dorset: An Interim Report on Fieldwork Undertaken During 2002-3, *Proc Dor Nat Hist Archaeol Soc* 126, 160-166

Gale, J, Hewitt, I, and Russell, M, 2008. Excavations at High Lea Farm, Hinton Martell, Dorset: A Third Interim Report on Fieldwork Undertaken During 2007-7, *Proc Dor Nat Hist Archaeol Soc* 129, 105-114

Gale J, Laver J, and Russell M, 2007. Excavations at High Lea Farm, Hinton Martell, Dorset: An Interim Report on Fieldwork Undertaken During 2004-5, *Proc Dor Nat Hist Archaeol Soc* 128, 100-106

Garwood, P, 2007. Before the Hills in Order Stood: Chronology, Time and History in the Interpretation of Early Bronze Age Round Barrows in J, Last (ed) *Beyond the Grave: New Perspectives on Barrows*, Oxford, Oxbow Books

Gingell, C, 1992. *The Marlborough Downs: Later Bronze Age Landscape and its Origin*, Wiltshire Archaeological & Natural History Society

Grinsell, L, V, 1959. Dorset Barrows, Dor Nat Hist Archaeol Soc Monograph

Grove, J, and Croft, B, 2012. *The Archaeology of South West England South West Archaeological Research Framework Research Strategy 2012–2017*, Somerset County Council

Hesse, R, 2010. Lidar-derived Local Relief Models – a new tool for archaeological prospection, *Archaeological Prospection*, 17, 67-72, Wiley InterScience

Hinton, D, A, 1997. The 'Scole-Dickleburgh Field System' Examined, *Landscape History*, 19, 5-12

Historic England 2018a. *Field Systems: Introductions to Heritage Assets*, Swindon, Historic England

Historic England 2018b. *Prehistoric Barrows and Burial Mounds: Introductions to Heritage Assets*, Swindon, Historic England

Historic England 2018c. *Hillforts: Introductions to Heritage Assets*, Swindon, Historic England

Historic England 2018d. *Oppida: Introductions to Heritage Assets*, Swindon, Historic England

Historic England 2018e. *Prehistoric Linear Boundary Earthworks: Introductions to Heritage Assets*, Swindon, Historic England

Historic England 2018f. *Water Meadows: Introductions to Heritage Assets, Swindon*, Historic England

Hutchins, J, 1861-73. *The History and Antiquities of the County of Dorset*, Third Edition, corrected, augmented, and improved by William Shipp and James Whitworth Hodson, London

Isham, K, 2000. *Lime Kilns and Limeburners in Cornwall*, St Austell, Cornish Hillside Production

Jones, A, M, and Quinnell, H, 2014. Saucer Barrows: Places for Ritual within Wessex Early Bronze Age Chalkland Barrow Cemeteries, *Oxford J Archaeol* 33, 339-359

Jones, R, and Page, M, 2006. *Medieval Villages in an English Landscape*, Macclesfield, Windgather Press

Johnston, R. 2020. *Bronze Age Worlds: A Social Prehistory of Britain and Ireland*, London, Routledge

Landis, 2021. *Soilscapes Viewer*, Cranfield University [Online], available at: http://www.landis.org.uk/soilscapes/ [accessed 12 April 2021]

Matthews, G, G, 2021. *Maiden Newton-Poole Harbour Stop Line, The Maiden Newton to Dorchester Section*, the Pillbox Study Group [Online], available at: http://www.pillbox-study-group.org.uk/defence-articles/maiden-newton-poole-harbour-stop-line/ (accessed 28 May 2021)

McOmish, D, Field, D, and Brown, G, 2002. *The Field Archaeology of the Salisbury Plain Training Area*, Swindon, English Heritage

Muir, R, 2002. The NEW Reading the Landscape, Exeter, Exeter University Press

Natural England, 2013. *National Character Area profile: 134 Dorset Downs and Cranborne Chase* [Online], available at http://publications.naturalengland.org.uk/publication/5846213517639680?catego ry=587130 [Accessed 05 March 2021]

Oswald, A, Dyer, C, and Barber, M, 2001. *The Creation of Monuments: Neolithic Causewayed Enclosures in the British Isles*, Swindon, English Heritage

Papworth, M, 2011. *The Search for the Durotriges; Dorset and the West Country in the Late Iron Age*, Stroud, The History Press

Putnam, B, 1999. Dorchester Roman Aqueduct 1998, *Proc Dor Nat Hist Archaeol Soc* 120, 97-8

Putnam, B, 2007. Roman Dorset, Tempus Publishing Ltd

Putnam, B, and Hewitt, I, 1996. Excavations and Fieldwork on the Dorchester Roman Aqueduct, *Proc Dor Nat Hist Archaeol Soc* 120, 128-131

Rackham, O, 1986. The History of the Countryside, London, J. M. Dent Ltd

Rahtz, P, A, 1959. Interim Report on Excavations at Hog Cliff Hill, Maiden Newton, *Proc Dor Nat Hist Archaeol Soc* 81, 94

Rahtz, P, A, 1960. Second Interim Report on Excavations at Hog Cliff Hill, Maiden Newton, *Proc Dor Nat Hist Archaeol Soc* 82, 83

Rahtz, P, A, 1962. Excavations at Shearplace Hill, Sydling St. Nicholas Dorset, England, *Proc Prehist Soc* 28, 289-328

Rippon, S, 2008. *Beyond the Medieval Village*, Oxford, Oxbow Books

Rippon, S, Smart, C, and Pears, B, 2015. *The Fields of Britannia: Continuity and Change in the Late Roman and Early Medieval Landscape*, Oxford, Oxford University Press

Royall, C, 2011. *National Mapping Programme: South Dorset Ridgeway Mapping Project*, Cornwall Archaeological Unit

Royall, C, 2013. *National Mapping Programme: New Forest Remembers Mapping Project*, Cornwall Archaeological Unit

Sharples, N, 2010. Social Relations in Later Prehistory: Wessex in the First Millennium BC, Oxford, Oxford University Press

Soil Survey of England and Wales, 1983. *1:250,000 Soils Map of England and Wales*, Soil Survey of England and Wales, Harpenden, Lawes Agricultural Trust

Stanier, P, H, 1993. Dorset Limekilns: A First Survey, *Proc Dor Nat Hist Archaeol Soc* 115, 33-51

Stewart, D, Russell, M, Cheetham, P, and Manley, H, 2020. *Frampton Roman Villa: An Interim Statement on Excavations in 2019 and 2020* [Online], available at:

https://www.academia.edu/45121008/Frampton_Roman_Villa_an_interim_stat ement_on_excavations_in_2019_and_2020nd 2020 [accessed 24 May 2021]

Stoertz, C, 1997. *Ancient Landscapes of the Yorkshire Wolds*, Royal Commission on the Historical Monuments of England

Stoertz, C, 2007. 'Aerial photographic survey of Knowlton Circles' in C, French, H, Lewis, M, J, Allen, M, Green, R, Scaife and J, Gardiner (eds) *Prehistoric landscape development and human impact in the upper Allen valley, Cranborne Chase, Dorset*, 40-43, (McDonald Institute Monographs), Cambridge, McDonald Institute for Archaeological Research

Taylor, C, 2004. *The Making of the English Landscape: Dorset*, Wimborne, the Dovecote Press

Thomas, R C, 2003, *Twentieth Century Military Recording Project: Prisoner of War Camps (1939 – 1948)*, Swindon, English Heritage Report, [Online], available at: https://historicengland.org.uk/images-books/publications/prisoner-of-war-camps/prisoner-of-war-camps/ (accessed 28 May 2021)

Wartimes. ca, 2021. *First and Second World War – Army Camps in England*, [Online], available at https://wartimes.ca/forums/viewtopic.php?t=159 [accessed 28 May 2021]

White, D, 1982. *The Bronze Age Cremation Cemeteries at Simons Ground Dorset*, Dor Nat Hist Archaeol Soc Monograph 3, 24-6

White, P, 2003. The Arrow Valley, Herefordshire, Archaeology, Landscape Change and Conservation, *Herefordshire Studies in Archaeology Series* 2, Herefordshire Archaeology

Whittle, A, Healy, F, Bayliss, A, 2011. *Gathering Time: Dating the Early Neolithic Enclosures of Southern Britain and Ireland*, Oxford, Oxbow Books

Williamson, T, 1987. Early Co-axial Field Systems on the East Anglian Boulder Clays, *Proc Prehist Soc 53*, 419-31

Williamson, T, 1988. The 'Scole-Dickleburgh Field System' Revisited, *Landscape History*, 20 (1), 19-28

Williamson, T, 2008. Co-axial Landscapes: Time and Topography in P, Rainbird (ed) *Monuments in the Landscape*, 123-35, Stroud, Tempus Publishing

Wilson, J, D, 1972. The Medieval Deer-Parks of Dorset: XI, *Proc Dor Nat Hist Archaeol Soc* 93, 169-175

Winton, H, 2017. *Standards for National Mapping Programme projects*, Version 0.1, Historic England

Woodward, A, 2000. *British Barrows: a Matter of Life and Death*, Stroud, Tempus Publishing Ltd

Woodward, P, J, 1991. *The South Dorset Ridgeway. Survey and Excavations* 1977–84, Dor Nat Hist and Archaeol Soc Monograph 8

Appendix 1: Methods

The project followed current AI&M standards and methodology.

Sources

<u>Photographs</u>

All readily available aerial photographs were consulted during the project. The Historic England Archive (HEA) in Swindon holds large numbers of aerial photographs of the project area. These include vertical prints taken by the Royal Air Force (RAF), Meridian Airmaps (MAL) and the Ordnance Survey (OS) ranging in date from the 1930s onwards.

The HEA also holds a large collection of oblique prints; including military obliques taken by the Ministry of Defence (MOD) in the 1940s and 50s and a collection of specialist oblique prints, slides and digital images which were taken for archaeological purposes and range in date from the 1950s to the present day. In addition, early oblique images taken in the 1920s and 30s by OGS Crawford and others are held in the HEA collection, although these were not available for the project area.

In all 1641 photographs were consulted from the HEA collection. These included 1069 vertical prints, 476 specialist oblique prints and 96 military oblique prints. A loan arrangement was put in place enabling the consultation of these photographs at the office of Cornwall Council in Truro.

Cambridge University Committee for Aerial Photography (CUCAP) holds an important national collection containing a number of vertical photographs taken for a range of non-archaeological purposes as well as specialist oblique photography resulting from archaeological reconnaissance. This important collection was not accessible during the lifetime of the project.

Additional digital photographs available to the project included photographic tiles provided by HE from the Pan Government Agreement (PGA). Online photographic images from Google Earth were also accessed via the internet.

<u>Lidar Tiles</u>

Lidar tiles were provided by the Environment Agency (Geomatics) as .asc files. These were converted into hillshades, gradient slope and LRM tiles by HE, using RVT. The available lidar included blanket 1m resolution cover along the river valleys, extending over 39% of the total project area.

<u>Datasets</u>

Data from the Dorset HER was provided to the project team as a series of Arcview GIS shape files with attached object data.

Monument data from the National Record of the Historic Environment (NRHE) AMIE database was provided to the project team for the project area by HE at the start of the project as was data from the from the National Heritage List for England (NHLE - scheduled monuments). This data was provided digitally in a series of PDF files and Arcview GIS shapefiles.

Map Sources

In addition to the current OS MasterMap data which was used as the primary source of control for the rectification and mapping. The Historic Ordnance Survey mapping dating from the late 19th century and early 20th century (1st, 2nd and 3rd editions) was consulted to further understand the archaeology of the project area and to aid interpretation of specific sites.

Archaeological Scope

The AI&M Sphere of Interest is defined as all archaeological features visible on aerial photographs as cropmarks, soilmarks, parchmarks or earthworks and some structures. The earliest sites recognised on aerial photographs usually date from the Neolithic onwards. AI&M projects therefore record all archaeological features visible on aerial photographs with a date range from the Neolithic to the twentieth century.

The AI&M mapping is designed to be viewed against an OS base map and therefore AI&M projects do not usually record non-archaeological features visible on aerial photographs and depicted on the modern base map and still in use, such as buildings, field walls, hedges, canals and railways. In some contexts, however, it may have been appropriate to map structures visible on historic maps - the archaeological context or importance determined whether features such as field boundaries, shooting butts, sheepfolds, relict quarries, canals, railways, tracks etc. were mapped.

Cropmarks, parchmarks, soilmarks

All sub-surface archaeological remains visible as cropmarks, parchmarks or soilmarks were recorded.

Earthworks

All archaeological earthworks visible on aerial photographs were mapped and recorded. This included features visible as earthworks on early photographs, which had subsequently been levelled and archaeological features marked on the OS maps.

Ridge and furrow

All areas of medieval and post medieval ridge and furrow were mapped using a standard convention to indicate the extent and direction of the furrows.

Post medieval field boundaries

All removed field boundaries and field systems were plotted where they were considered to pre-date the OS 1st Edition map (*c*1880) and were not already recorded on any other OS map. Where post medieval field boundaries mapped by the OS may be misinterpreted (e.g., within complex areas of archaeological features), these may have been plotted or mentioned in the text record.

Buildings and Structures

All foundations of buildings visible as cropmarks, soilmarks, parchmarks, earthworks or ruined stonework were mapped and recorded. Standing roofed or unroofed buildings are usually more appropriately recorded by other methods, so were not generally be mapped. However, buildings were recorded and mapped in specific archaeological contexts (e.g., industrial and military complexes).

Twentieth Century Military Features

The AI&M standard includes First and Second World War remains and Cold War features visible on aerial photographs or lidar. The project mapping of military sites aimed to be a "snapshot" of the main features of the site at a relevant date such as the latest development of the site, e.g., 1945. Military structures recorded included outlines of extensive features such as camp perimeters as well as buildings and earthwork structures, and all ephemeral features such as lines of tank cubes, etc.

Industrial Features and Extraction

Areas of industrial archaeology were recorded using the appropriate conventions where they were recognised as predating 1945. Depiction was using the 'extent-of-area' symbol and mapping the main features within the complex. Features mapped included buildings (roofed or unroofed), structures, spoil heaps, and transport features associated with industrial processes. All extractive features believed to predate 1945 were mapped. These included large-scale quarries and industrial clay pits as well as small-scale extraction of resources for immediately local use (chalk pits, marl pits, stone quarries, gravel pits).

<u>Transport</u>

Major transport features (i.e., disused canals and main railways) were not mapped unless considered to be archaeologically significant in the context of the project.

Natural features

Natural features which are geological or geomorphological in origin were excluded. If there was a risk of confusion in contexts with other archaeological features, then natural features were mentioned in the text record.

Mapping and recording

Transcription

The results of the mapping were produced entirely in digital format. Archaeological features were digitally transcribed according to a nationally agreed layer structure and using agreed line and colour conventions as specified by Historic England (Winton 2017). A combination of aerial photographs and lidar were used to map archaeological features and interpretations were based on morphological comparison to well know site types, topographical location and other published evidence.

Oblique or vertical photographs were scanned and then rectified using AERIAL 5.36 software. Control was derived from the Ordnance Survey 1:2,500 scale MasterMap® vector data. Digital terrain models derived from 5m interval contour data supplied by Next Perspectives were used to improve the accuracy of the rectification. Archaeological features were traced off geo-referenced and rectified aerial photographs or lidar visualisations using AutoCAD Map 3D 2018.



Conventions used for Dorset Stour AI&M mapping.

LAYER NAME	COLOUR	DESCRIPTION
BANK	Red	Used to outline banks, platforms, mounds and spoil heaps
DITCH	Green	Used to outline cut features such as ditches, ponds, pits or hollow ways.
EXTENT _OF_FEATURE	Orange	Used to depict the extent of large area features such as airfields, military camps, or major extraction.
MONUMENT_POLYGON	White	Used to indicate the extent of the monument record as defined in the NRHE or HER database.
RIDGE_ AND_FURROW_ALIGNMENT	Cyan	Used to outline a block of ridge and furrow.
RIDGE_FURROW_AREA	Cyan	Line or arrow(s) (hand drawn not a symbol) depicting the direction of the rigs in a block of ridge and furrow.
SCARP_SLOPE_ EDGE	Blue	The top of the "T" indicates the top of slope and the body indicates the length and direction of the slope. Used to depict scarps, edges of platforms and other large earthworks.
STRUCTURE	Purple	Used to outline structures including stone, concrete, metal and timber constructions e.g., buildings, Nissen huts, tents, radio masts, camouflaged airfields, wrecks, fish traps, etc.

Table showing AI&M standard layers used in the project

Map Note Sheets (MNS) were maintained for each OS quarter sheet within the project area. MNS record the progress of each sheet and the sources used. Quality assurance checks were carried out on selected map sheets to ensure that all sheets were completed to AI&M standards.

Project database

Data for all features mapped during the project was input into the Dorset HBSMR v5 database. This database automatically generated unique Project UID numbers (Prefixed MDO) and contained fields enabling monument indexing to be carried out to HEA and ALGAO standards. Appropriate data was entered into this database for each archaeological feature mapped (data recorded included summary, description, photographic references, site type and period, locational information and details of the interpreter).

Data exchange

The mapped data was provided to the HE as AutoCAD drawings as well as GIS data in a format suitable for incorporation in to the HE Corporate GIS. All data supplied was to AI&M monument recording standards and in line with HE minimum standards for monument recording.

Copies of the Project Design, Final Report and all other relevant project documentation will be deposited with HE. The PDF version of the report will be deposited with Archaeology Data Service (ADS).

Appendix 2: List of Significant Sites

List of sites that would benefit from further work – recommendations to include what kind of work – for example, analytical earthwork survey, doc research, excavation, geophysics, more aerial work, etc.

Description	Place	HER and/or NRHE Monument No.	NGR	Assessment of significance/reason and/or nature of further work
Settlement sites, field system and trackways on Grimstone Down, Stratton	Grimstone down, Stratton, Dorset	MDO42865 MDO42873 MDO42874	SY 6437 9558	Field visit/earthwork survey/assess character, chronology and significance of earthworks, level of survival and relationship.
Curvilinear Enclosure, Wynford Eagle, extant on lidar	Wynford Eagle, Dorset	MDO42280	SY 5896 9703	Field visit/earthwork survey/geophysical survey to assess character, dating and significance and potential for scheduling.
Iron Age farmstead and field system at New Barn, Maiden Newton	New Barn, Maiden Newton, Dorset	MDO42980 MDO42979	SY 6105 9854	Field visit/geophysical survey/earthwork survey to assess character, date and significance and review Scheduled Area.
Cattistock Castle, Iron Age hillfort	Cattistock, Dorset	MDO666	ST 594 000	Field visit/earthwork survey/geophysical survey to update previous surveys and assess dating, character and significance.
Frampton Roman villa	Frampton, Maiden Newton, Dorset	MDO42814	SY 6158 9529	Field visit geophysical survey to assess extent and character and to review Scheduled Area.
Possible shrunken medieval settlement, Throop Farm, Maiden Newton	Throop Farm, Maiden Newton, Dorset	MDO1598	SY 613 953	Earthwork survey/geophysical survey/documentary research to assess character, date, level of survival and significance.

Deserted medieval settlement of Elston, Sydling St Nicholas	New Barn, Sydling St Nicholas, Dorset	MDO43098	ST 6354 0058	Earthwork survey/geophysical survey/documentary research to assess character, date, level of survival and potential for Scheduling.
Possible shrunken medieval settlement, Crockway Farm, Maiden Newton	Crockway Farm, Maiden Newton, Dorset	MDO42812	SY 6133 9577	Earthwork survey/geophysical survey/documentary research to assess character, date, level of survival and significance.
Possible shrunken medieval hamlet, Frome St Quintin	Chantmarle Farm, Frome St Quintin, Dorset	MDO43178	ST 5933 0200	Earthwork survey/geophysical survey/documentary research to assess character, date, level of survival and significance.
Possible shrunken medieval settlement and strip fields, Chilfrome	Chilfrome, Dorset	MDO42291 MDO920 MDO917 MDO42324	SY 5904 9885 (Settlement)	Earthwork survey/geophysical survey/further aerial survey, documentary research to assess character, date, relationship, level of survival and significance.
Possible medieval moated site at Batcombe	Batcombe, Dorset	MDO149	ST 6170 0436	Field visit/field walking/geophysical to access level of survival, significance and potential for Scheduling. Also, to include the deer park to the north of the moated site.
Wynford Wood deer park	Wynford Eagle, Dorset	MDO3462	SY 572 965	Field visit/earthwork survey/assess character and date of earthworks, level of survival and potential for extending Scheduled Area.

Appendix 3: Designations Long List

List of Scheduled Monuments in the area where the survey could improve the location, extent, interpretation. This will also include any new sites of potential regional or national importance that might merit designation.

Description	Place	List No.	NGR	Recommendation
Multi-period landscape including an Iron Age or Romano-British settlement, part of an associated field system, six bowl barrows and an enclosure 600m south east of Langford Farm	Stratton, Dorset	1003771	SY 64482 95594	Scheduled area may merit review to ascertain whether it needs extending to include further earthworks to the west and south, and more of the trackway to the east, as well as possibly including a section of trackway/cross dyke to the north, depending on survival. This would enhance context and understanding as well as increase protection.
Field System W of Fore Hill	Maiden Newton Dorset	1002866	SY 60323 97682	Scheduled area may merit review to include additional linear features in fields to the north and east.
Enclosed Iron Age farmstead and part of an associated field system 215m west of New Barn	Maiden Newton, Dorset	1002859	SY 60954 98752	Scheduled area may merit review to include additional linear features to the west and in between the two Scheduled Areas, possibly to encompass both fields on the north side of Drill Road as well as the enclosure already included to both sides of the road. Fieldwork and earthwork survey/geophysical survey may be worthwhile to help determine.
Frampton Roman Villa	Maiden Newton Dorset	1002683	SY 61599 95282	The record was enhanced in 2015, having originally been an 'old county number'. The Scheduled Area may merit review in light of further survey/geophysical survey being undertaken to determine extent of any underground features.
Wynford Wood Boundary Bank	Wynford Eagle, Dorset	1005576	SY 57135 96218	Scheduled area may merit review to include additional linear features on the northeast side,

				visible as earthworks on lidar imagery. Fieldwork and earthworks survey may be merited to assess extent of survival and significance.
Curvilinear Enclosure, Wynford Eagle, extant on lidar	Wynford Eagle, Dorset	MDO42280	SY 5896 9703	Curvilinear banked enclosure, 227m by 260m, of probable later prehistoric date that appears well-preserved on lidar imagery. Gaps in the enclosure banks to southwest and north. Located within an associated later prehistoric field system (MDO42336; NRHE Hob UID 450628). Further assessment and survey would be beneficial to fully understand the site and its significance and potential for Scheduling.
Possible medieval moated site at Batcombe	Batcombe, Dorset	MDO149	ST 6170 0436	The earthworks of a possible medieval moated site and manor on the south side of Batcombe Deer Park. Earthworks in poor state of survival and would benefit from protection. Further assessment, survey and documentary research would be beneficial to fully understand the site and its significance and potential for Scheduling.
Deserted medieval settlement of Elston, Sydling St Nicholas	New Barn, Sydling St Nicholas, Dorset	MDO43098	ST 6354 0058	Earthworks of the possible medieval settlement of Elston are still visible on lidar imagery but may have seen significant reduction- 1940s aerial photographs indicate more extensive earthworks, similar to those recorded on the OS 1st Edition map, which records them as the site of a 'British Settlement'. Further assessment, survey and documentary research would be beneficial to fully understand the site and its significance and potential for Scheduling.



Historic England Research and the Historic Environment

We are the public body that looks after England's historic environment. We champion historic places, helping people understand, value and care for them.

A good understanding of the historic environment is fundamental to ensuring people appreciate and enjoy their heritage and provides the essential first step towards its effective protection.

Historic England works to improve care, understanding and public enjoyment of the historic environment. We undertake and sponsor authoritative research. We develop new approaches to interpreting and protecting heritage and provide high quality expert advice and training.

We make the results of our work available through the Historic England Research Report Series, and through journal publications and monographs. Our online magazine Historic England Research which appears twice a year, aims to keep our partners within and outside Historic England up-to-date with our projects and activities.

A full list of Research Reports, with abstracts and information on how to obtain copies, may be found on www.HistoricEngland.org.uk/researchreports

Some of these reports are interim reports, making the results of specialist investigations available in advance of full publication. They are not usually subject to external refereeing, and their conclusions may sometimes have to be modified in the light of information not available at the time of the investigation.

Where no final project report is available, you should consult the author before citing these reports in any publication. Opinions expressed in these reports are those of the author(s) and are not necessarily those of Historic England.

The Research Report Series incorporates reports by the expert teams within the Research Group of Historic England, alongside contributions from other parts of the organisation. It replaces the former Centre for Archaeology Reports Series, the Archaeological Investigation Report Series, the Architectural Investigation Report Series, and the Research Department Report Series

> ISSN 2398-3841 (Print) ISSN 2059-4453 (Online)