Archaeology South-East

ASE

A Watching Brief on Ground Investigations North West of West Wittering Beach, West Sussex

DRAFT

NGR 4771 0986

Project No: 4498
Site Code: WW10

ASE Report No: 2010134
OASIS id: archaeol6-83752

By Liane Peyre and Matt Pope
Illustrations by Justin Russell

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Abstract

Archaeology South-East carried out a watching brief during preliminary ground investigation works at West Wittering coastal footpath, West Wittering near Chichester. The geoarchaeological work took place between 17th and 18th August 2010. This included monitoring 2 cable percussion bore holes, 3 machine dug test pits and 2 hand dug test pits all situated along the beach front near Roman Landing on West Wittering beach.

Marine sediments; sands and gravels, raised beach deposits and alluvium were identified during the watching brief which are typical deposits expected in lower coastal plain geology. No archaeological material was recovered. The watching brief was able to successfully characterise a deep marine and alluvial sequence at the site. No occupation horizons or archaeological finds were recovered. The site does however preserve a deep sequence of sedimentation with potential for the reconstruction of Pleistocene/Holocene marine level channel and palaeogeographic context. The possible presence of interglacial deposits at depth in BH1 is potentially significant in providing a possible context for reconstructing environmental conditions at the site in the Middle- Late Pleistocene. Holocene Marine and Estuarine deposits have the potential for reconstructing the development of Chichester Harbour, the East Head spit and human landscape use in the Late Holocene. Scope now exists to continue the analysis of the identified sequence which could provide the necessary detailed environmental and dating evidence to attempt cross comparison with other coastal alluvial sequences in Sussex.

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1.1 Site Background

1.1.2 Archaeology South-East (ASE), a division of University College London Centre for Applied Archaeology (UCLCAA), was commissioned by ARUP on behalf of the Environment Agency to undertake a geoarchaeological watching brief during preliminary ground investigation works in preparation for a proposed flood defence barrier north west of West Wittering Beach and East of East Head at Snow Hill (NGR 47710986), henceforth referred to as 'the site' (Figure 1).

1.1.3 The site lies to the north west of the West Strand road along West Wittering beachfront, continuing along the public footpath to Coastguard Lane and Roman Landing. To the north west of the footpath lies the flint pebbled shore and sea inlet with low lying marshland, pastures (used for cattle grazing) and the village of West Wittering to the east.

1.1.4 Prior to the groundworks commencing the area being assessed consisted of the existing sea defence barrier, low lying, marshy, pastures to the east of this and the higher plateau or green at the terminus of Coastguard Lane. All areas aside from the pastures were accessible to the public.

1.1.5 The monitored ground investigation works consisted of (Figure 2):

- Cable Percussion Bore Holes 1 & 2
- Hand Dug Test Pits 1 & 2
- Machine Excavated Trial Pits 1,2 & 3

1.1.6 According to the British Geological Survey, Sheet 331Solid and Drift Edition the site lies on Brickearth and Raised Beach Deposits. Pockets of Storm Gravel Deposit could also be encountered slightly inland from the current coastline.

1.1.7 A Method Statement was prepared by ASE (ASE 2010), submitted and duly approved by the Environment Agency.

1.2 Aims and Objectives

1.2.1 The aim of the watching brief was to ensure that any artefacts or ecofacts of archaeological and palaeoenvironmental interest exposed exposed by the excavations were recorded and interpreted to appropriate standards. The following specific aims were identified:

- Is there any evidence of prehistoric activity, such as features or finds?
- Can the stratigraphic sequence of the deposits add any more information to the understanding of the lower coastal plains?

1.3 Scope of Report

1.3.1 The aim of the report is to present the results of the watching brief within a local, regional or national context as appropriate.

1.3.2 The archaeological fieldwork was undertaken between the 17th August and 18th August 2010 by Liane Peyre (archaeologist). The project was managed by Jon Sygrave (Fieldwork) and Jim Stevenson (Post-excavation).

2.0 ARCHAEOLOGICAL AND GEOARCHAEOLOGICAL BACKGROUND

2.1 The site is located on the west flank of a low lying peninsular known as Selsey Bill which comprise relatively flat land dissected by infilled estuarine channels (harbours) and protected from erosion by artificially maintained shingle barriers. The site specifically lies to the north-west of and immediately to the east of East Head, a sand spit projecting into Chichester Harbour. The site is only 1 to 2m O.D. and protected from the prevailing strong south westerly tides by the presence of the East Head Spit, itself a rapidly changing and fragile landform. The site does not therefore sit directly on the on the English Channel Coast, but rather on a series of intertidal creeks and infilled channels emptying into the Chichester Harbour estuary. It sits

2.2 The site is mapped by the BGS as lying on drift geology characterised by superficial Brickearth cover with localised outcrops of marine gravel. These gravels outcrops most probably relate to Holocene storm beaches although the possibility of outcrops of the Pleistocene Pagham Beach at the site is also possible (see below). The site is underlain by a Tertiary Bedrock solid Geology. Poorly mapped but present within the area are a series of infilled and partially active Holocene intertidal creeks and, a depth below marine deposits dating to the both the Pleistocene and Holocene, older interglacial channels.

2.3 The Selsey Bill peninsular is situated at the southerly extend of a staircase sequence of Pleistocene raised beach deposits which cover much of the West Sussex Coastal Plain. These raised beaches are preserved at discreet altitudes between 40m O.D., where the 500k year old Westbourne-Arundel Raised Beach is located (Roberst and Parfitt 1999) and the Pagham Raised Beach preserved at around 0-2m O.D. The latter outcrops on Selsey Bill where eroded by current marine activity and probably relates to high sea levels associated with the last interglacial. Pleistocene marine deposits are overlay often by Head Deposits from the last glacial maximum, comprising either fine grained silty-clay Brickearths or soliflucted and fluvially resorted flint gravels from the South Downs (Bates *et al.* 1997; 2010)

2.4 West Wittering lies on the coast, 8 miles south of the historic Roman city of Chichester and the area under development is considered by Chichester District Council as Archaeologically Sensitive Area. Evidence of Romano-British activity is reflected in current road names such as ‘Roman Landing’ close to where TP 04 and TP 05 are located, and historic evidence suggests a possible Roman road leading from West Wittering to Birdham providing access to the harbour (ARUP 2010). It is also postulated that Late iron Age settlement on the peninsular may have been extensive.. Understanding the

ate Holocene drainage and palaeogeography of the Chichester Harbour in this area is therefore important in considering the validity and nature of this Late iron Age and Romano-British occupation of the locale.

2.5 Prior to Roman occupation, evidence of Neolithic activity has been recorded within harbour system around Chichester and Langstone (Allen and Gardiner 2000)

3.0 METHODOLOGY

3.1 Ground works undertaken by the engineering contractors were monitored on a daily basis by a geoarchaeologist until it became clear beyond reasonable doubt that no archaeological remains and/or significant geoarchaeological deposits were present (e.g. when Tertiary bedrock was encountered).

3.2 The spoil from the excavations was also inspected for the recovery any artefacts or ecofacts of archaeological interest. Sub-sampling of sediments often had to be undertaken directly from the excavator bucket due to the constraints imposed by safety on entering the excavations or directly from the core sampler during bore holing.

3.3 Pleistocene sediments were recorded in the following manner: Beneath the modern horizons, the sediments were logged at 0.25m intervals or at the junction of major stratigraphic or lithological boundaries. The descriptions comprised matrix lithology, coarse components, sediment cohesion as well as characterisation of superficial structures and likelihood of decalcification. Given the presence of depositional contexts likely to preserve either artefactual or macrofaunal material at depths which are below the possibility of direct in-situ inspection, the arisings were placed in stratigraphical order to enable description and recording. Spoil was visually inspected for evidence of cultural material or organic rich deposits.

3.4 Sediment chromas and hues were recorded using a standard Munsell Soil Colour Chart. Section photography was undertaken were possible, however the nature of the core sampler made it largely impossible to take detailed photos of the strata.

3.5 Where deposits suitable for environmental sampling were encountered (buried soils, well-sealed slowly silting horizons) bulk soil samples (40 litres or 100% of smaller features) were taken for environmental analysis.

3.6 Priority was placed on monitoring CPBH 1 & 2 due to the depth and likeliness in penetrating the underlying bedrock. Whilst this was undertaken, as and when possible, any other geotechnical investigations underway were also monitored intermittently.

3.7 The archive (quantified in Table 1), including the finds, is presently held at the Archaeology South-East offices in Portslade.

Number of Contexts	17
No. of files/paper record	1 file
Plan and sections sheets	0
Bulk Samples	2
Photographs	19 Digital photographs
Bulk finds	0
Registered finds	0
Environmental flots/residue	0

Table 1: Quantification of Site Archive

4.0 RESULTS

4.1 Two 10m geotechnical cable percussion bore holes (CPBH 1 & 2) were undertaken for detailed logging and sampling (see Figure 3). The core sample was recorded using standard protocols developed by the Boxgrove Project, recorded on the basis of either 0.25m spits or all units and unit boundaries fully described following the methodology of Jones *et al*. (1999).

4.2 The following observations were recorded:

CPBH1

Depth (m)	Stratigraphy	Colour (Munsell)	Lithology	Clast Component	Notes
0.5	Topsoil	7.5YR 4/2	Silty Clay	Occ. Rounded flint pebbles 10-20mm <20%	Fine, friable silt
1.4	Recent Marine Sands	75YR 5/8	Clay Sand	Occ. Tertiary rounded flint pebbles 10-30mm <1%	Gritty, medium grain, loose
c.3.2	Marine/ Estuarine sands	5Y 6/3	Sand	-	Medium grain, soft, no incusions, diffuse boundary.
3.4	Estuarine Clays	5Y 6/4	Clay	-	Clay lenses, slightly plastic, fine
3.8	Marine Sands	5Y 6/3 with 10% 7.5YR 5/8	Silt Sand	Infrequent flint grits <1mm <10%	Medium grain, fairly compact
4.0	Marine Sands	10YR 5/8 with 20% 5Y6/3	Silt Sand	-	Medium, slightly compact
c.5.2	Marine Sands	5Y 6/3 with 10% 7.5YR 5/8	Silt Sand	-	Medium, slightly compact
6.0	Marine Sands	10R 5/8 with 20% 10YR 6/2	Sand	-	Medium grain, dense, laminated
6.4	Marine Sands	2.5Y 6/4	Sand	-	Homogenous, medium, dense sand particles
c.7.0m	Marine Sands	GLEY1 4/1	Sand	-	Homegenous, medium, dense
10.0	Marine Sands and Possible Interglacial Channels (alluvium)	Gley 1 4/1	Sand with clay	Occ. Clay lenses	Very dense, compact, medium particle with fine, slightly plastic clay deposits.

CPBH2

Depth	Stratigraphy	Colour (Munsell)	Lithology	Clast Component	Notes
0.5	Topsoil	7.5YR 4/2	Silty Clay	Occasional Small singular flint frags	Fine, friable silt
2.2	Recent Marine Sand	7.5YR 5/8	Silty Sand	Occasional Tertiary rounded flint pebbles 10-30mm <1%	Gritty, medium grain, loose
3.5	Marine Sand	10YR 6/8	Silty Sand	-	Medium particle, homogenous
5.4	Estuarine Clays	2.5Y 6/3 with 10% 10YR 5/8	Clay Sand	-	Slightly plastic, laminations of clay
10	Marine Alluvium	Gley 1 4/1	Clay Sand	-	No inclusions, medium particles

4.3 Three machine dug test pits (TP 1, 2 and 3) were observed and recorded in accordance with the criteria adhered in 6.1.

TP 1

Depth	Stratigraphy	Colour (Munsell)	Lithology	Clast Component	Notes
0.4	Topsoil	7.5YR 4/2	Silty Clay	-	Fine rooting
0.9	Beach Shingle	-	Flint Shingle	Rounded, Sub rounded and worn platy flint pebbles	Mid brown silty, loose, unconsolidated matrix
1.3	Marine Deposit	Light yellow brown with 10% lenses of strong yellow brown	Sandy Clay	<10% sub rounded 10 – 20mm sub rounded flint pebbles	Fine – medium particle, malleable with infrequent flint grits and pebbles
2.4	Estuarine Clays	Gley 1 5/1 with 30% 10YR 5/8	Sandy Clay	Iron panning and flint grits	Sandier than above, seam of fe pan and flint grits. Maleable but breaks under pressure.

TP 02

Depth	Stratigraphy	Colour (Munsell)	Lithology	Clast Component	Notes
0.5	Topsoil	7.5YR 4/2	Silty Clay	-	Fine rooting
1.25	Beach Shingle	-	Flint Shingle	Rounded and sub rounded flint pebbles and gravels	Matrix varying from mid brown grey to yellowish brown silt clay, unconsolidated. Associated to modern beach deposits. Water level encountered.

TP 03

Depth	Stratigraphy	Colour (Munsell)	Lithology	Clast Component	Notes
0.5	Topsoil	7.5YR 4/2	Silty Clay	Moderate (20%) rounded and sub rounded flint beach gravels 20 – 50 mm	Fine rooting.
1.1	Beach Shingle	-	Flint Shingle	Rounded and sub rounded flint pebbles and gravels	Matrix varying from mid brown grey to yellowish brown silt clay, unconsolidated. Associated to modern beach deposits. Collapses at depth.

4.4 **TP 04, TP05 and hand dug pits.**

The sediment sequence in TP04 was similar to that found in CPBH2; namely strong brown yellow silty sand to a depth of 4.1m overlying grey alluvial sandy clay before the test pits sections began to collapse. TP05 was terminated at a depth of 2.5m with only loose beach gravels and deposits being exposed (B. Cusworth *pers. comm.).* Two hand dug trial pits (HDTP 1and HDTP 2) were also recorded once fully excavated and did not reach a depth exceeding the modern beach shingle at approximately 1.2m. In HDTP 01 a wooden beam underlying the current concrete sea defence was exposed, most likely relating to an earlier phase of sea barrier.

5.0 DISCUSSION AND SIGNIFICANCE

5.1 No archaeological finds, features or deposits were encountered during the hand dug or machine test pits, mostly due to the shallow impact of the hand excavation and the depths of beach shingle encountered at the edge of the current flood defence groyne. The current flood barriers are locally known to have been constructed during the Second World War by Canadian troops, however, this cannot be confirmed. The work however encountered evidence for West Sussex coastal alluvial sequences (discussed below).

5.2 Four main sedimentary bodies assist in identifying lower coastal plain geology which were observed to some extent during the borehole and machine excavated test pits (see Bates etc al. 2010):

5.3 **Marine and Estuarine sands/ gravels/ silts:**
These were the most commonly encountered sediments during the Cable Percussion Bore Holing and are associated to sea level highstands and fine grained terrestrial sediments accumulated under low energy fluvial conditions. These are typically identified as a series of marine deposits with horizontal laminae of marine sands and gravels and sit beneath the derived Brickearth subsoil. CPBH1& 2 identified marine sands and gravels to a depth of 10.0m, with occasional lenses of silts or gravels within these sand strata. Only Test Pit 1 produced marine and estuarine clays at 1.3m beneath modern beach deposits. Due to the location of the test pit behind the sea barrier within permanently wet saltmarsh, the lower deposits of clay showed evidence of ochre mottling due to the effects of gleying under anaerobic conditions (Hodgson 1967).

5.4 **Head: Poorly sorted angular flint gravels and silts:**
These deposits are associated to sea level low lands during the periglacial and cold climate stages, usually overlying marine deposits. Raised beach deposits of rounded and sub angular flint pebbles were observed on the current coast line and within TP 1, 2, 3 and 5.

5.5 **Sediments preserved in interglacial channels:**
Identified previously between Selsey and West Wittering, these channels appear at a lower elevation to some of the marine sands and marine gravels, over the tertiary sediments - however it is not possible to determine that these channels clearly underlie the raised beach deposits. Identifiable by a more clayey consistency, they harbour the possibility of preserving fossiliferous material which can vary in age from the Middle Pleistocene to Ipswichian (Bates et al. 1997). Although clay lenses were identified in CPBH1 at a depth of 10.0m within the gley marine deposits, it was not possible to ascertain whether these could have been from an interglacial channel. The unstructured boundary between sand and clay, alongside the inconsistency in depth and no clear change in sediment to an estuarine/ marine channel fill suggests these clay lenses are more likely to be part of the general marine alluvial sequence.

5.6 **Significance**
The watching brief has established the presence of an intact sedimentary sequence spanning both Holocene and Pleistocene depositional environments. Although no well preserved organic horizons were observed during the watching brief, scope still exists for detailed palaeoenvironmental

reconstruction and dating should purposive geoarchaeology investigation be undertaken.

5.7 A combined sampling and dating programme based on the reconstruction of local sedimentary regime, water conditions and locale vegetation could be undertaken using methods including OSL dating, pollen analysis, microfaunal analysis and particle size analysis.

5.8 If targeted in this way the sediments could usefully help enhance our understanding of the evolution of the Eats Head locality during both the past 10k years and perhaps even deeper into the Pleistocene. Not only would this information be useful in determining local ground conditions and sea access during the Late Iron Age and Roman periods, but it would also allow a more detailed understanding of the development of the Eats Head spit, its age and vulnerability to past events such as storms and sea level change. These issues are directly relevant to its current management and provide a clear link between ancient palaeogeography and current management issues.

6.0 CONCLUSIONS

6.1 The watching brief was able to successfully characterise a deep marine and alluvial sequence at the site. No occupation horizons or archaeological finds were recovered. The site does preserve a deep sequence of sedimentation with potential for the reconstruction of Pleistocene/Holocene marine level channel and palaeogeographic context. The possible presence of interglacial deposits at depth in BH1 is potentially significant in providing a possible context for reconstructing environmental conditions at the site in the Middle- Late Pleistocene.

6.2 Scope now exists to continue the analysis of the recovered sequence which could provide the necessary detailed environmental and dating evidence to attempt cross comparison with other coastal alluvial sequences in Sussex. A single targeted borehole aimed at the recovery of complete, interrupted sealed sampled should now be considered in order to provide a samples for palaeoenvironmental reconstruction and recovery of material from the possible interglacial channel. Analysis of pollen and microfauna from these deposits would provide a useful characterisation of changing sedimentary regime and environment at the locale through the Pleistocene and Holocene,

BIBLIOGRAPHY

Archaeology South East, 2010 '*Method Statement: Watching Brief'.*

Allen, M.J. and Gardiner, J. 2002. Langstone Harbour. Shorter Contributions in: Proceedings of the Dorset Natural History and Archaeological Society, vol. 123 for 2001, pp. 101-121

Arup, 2010. '*Cultural Heritage Scoping Report: West Wittering'.*

Bates, M. R, et al., 2010 '*A New Choronological Framework for middle and Upper Pleistocene Landscape Evolution in the Sussex/ Hampshire Coastal Corridor,' UK. Proc. Geol. Assoc.*

Bates, M. R, Parfitt, S. A & Roberts, M. B. 1997*. 'The Chronology, Palaeogeography and Archaeological Significance3 of the Marine Quaternary Record of the West Sussex Coastal Plain, Southern England, UK.'* Quaternary Science Reviews, Vol. 16 pp 1227 – 1252.

British Geological Survey, '*Portsmouth'*, Sheet 331, Solid and Drift Edition.

East Sussex County Council, 2008. *Standards for Archaeological Fieldwork,Recording and Post-Excavation Work in East Sussex.*

English Heritage, 1991. *The Management of Archaeological Projects.* 2nd edition. London: English Heritage.

Gallois, R.W. 1965. The Wealden District. British regional Geology. Fourth Edition.

Hodgson, J. M. 1964. '*The Low Level Pleistocene Marine Sands and Gravels of the West Sussex Coastal Plain'.* Proceedings of the Geologists Association 75 pp. 547 – 562.

Hodgson, J. M. 1967. '*Soils of the West Sussex Coastal Plain' Soil Survey of Great Britain Eangland and Wales Bulletin no. 3.* The Chaucer Press.

IFA 2000. The Institute of Field Archaeologists' *Code of Conduct.*

IFA 2001. The Institute of Field Archaeologists' *Standards and Guidance* documents.

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ASE would like to thank ARUP for commissioning the project.

APPENDIX 1: HER Data Summary

APPENDIX
Summary of Historic Environment Records for Areas of Interest at West Wittering

HER no.	NGR	Name	Site Type	Date/Period	Status	Summary of Interest
CD01	477820/98290	Roman pottery-The Wad	Findspot	Roman	Archaeologically Sensitive Area	Two Roman pots complete, though broken, found on a building site at The Wad. New Forest ware, 3rd century. The Wad housing estate is centred at SZ 7782 9829.
CD09	477700/98400	Monastery - West Wittering	Monastery	Early Medieval		A 'monasterium' was founded around 740 - possibly on the site of the rebuilt church. An inscribed stone found in the church during restoration work in 1875 is said to be from it.
CD12	477500/98200	Roman burials South of Coastguard Lane	Burial	Roman	Archaeologically Sensitive Area	Possible Roman cremations listed in this area by Copley. The area nearby (SZ 7710 9841) is known locally as 'The Roman Churchyard', and is supposed to have yielded Roman coins. Two urns - cremation burials and Roman sherds found in digging a ditch a mile from the Green Duver. Green Duver shown on the 1842 tithe map.
CD13	477300/98100	Roman coins – 'The Green Duer'	Findspot	Roman	Archaeologically Sensitive Area (ASA)	12 gold coins of 3rd & 4th century date, retained by finder. Coins include those of Constantius, Magnentius Julian II Valentinianus II, Magnus Maximus.
CD24	477690/98020	Windmill West of Berrybarn Lane	Windmill	Post Medieval		A windmill situated to the west of Berrybarn Lane. A windmill is shown in the vicinity on Budgen's map of 1724.
CD30	476730/98480	Neolithic site – Chichester Harbour	Flint Scatter	Neolithic		3 waste flakes, 1 retouched flake, 2 very rough scrapers (1 round, 1 end), 1 small end scraper, 1 flint hammerstone, 18 fire cracked flints
CD31	477180/98540	Neolithic site – Chichester Harbour	Flint Scatter	Neolithic		11 waste flakes, Concentration of 29 fire cracked flints
CD32	477320/98720	Neolithic site – Chichester Harbour	Flint Scatter	Neolithic		3 waste flakes [Four], probably Neolithic.
CD42	476877/98534	Fire-cracked flint East Head	Findspot	Prehistoric		During a coastline survey by Sussex Archaeological Society in August 1996, layers of fire cracked flint were noted in the exposed sea cliff.
CD48	477450/97780	Iron Age coin – West Strand	Findspot	Iron Age		A gold coin of Verica was found in 1872 Obv.: Convex, COM F, on a sunk tablet Rev.: VIR REX; a horseman charging to right, holding a short dart in his hand; behind the horse a lituus shaped object and beneath this an open crescent reversed; the whole enclosed in a beaded circle.
CD49	477100/98410	Roman coins – The	Findspot	Roman		Local place name. Roman coins have been found here.

		Roman Churchyard, West Wittering				
CD3325	477150/98569	Possible tidal mill - West Wittering	Mill	Medieval/ Post Medieval		The site of a possible mill (tidal?) and mill pond is shown on a coastal survey map of 1587 at West Wittering, noted as 'Wittering Mille'. The survey is reproduced in part in Heron Allen 1911.
CD5110	477366 98526	Nore House and nos 1 to 9 consecutive coastguard cottages	Terraced House	Post Medieval	Listed Building grade 2	Row of ten mid C19 cottages. Two storeys. Eleven windows in all stuccoed. Slate roofs. Casement windows. Six gabled porches, the outer ones serving single houses, the other serving pairs of houses.
CD8102	479377/98940	Possible Roman road - Birdham to West Wittering	Road	Roman		On field name evidence, a Roman road may have run from Birdham to West Wittering. W.E.P Done suggested that a road may have been constructed in order to provide access to ferries across the mouth of Chichester Harbour. Field names mentioned on the tithe map for West Wittering include 'Acre Street' (this apparently being the original name for a hamlet which lay along the western edge of the West Wittering Common between Holme's Farm and the Chichester road) and 'Street field'. The road may have followed the old way across the common westwards towards Nunnington Farm (known previously as Nunton's Farm) and then across the main road avoiding the original village core. 'Street field' lay on the west of the main road and if the assumed line is continued another 'Street Field' is encountered in which the 'Roman Landings' estate was built. A terrier of the Manor of Cackham dating to 1327 also mentions 'Stretfurlong' which must have taken its name from street which ran over or beside the land. It was not possible to identify this particular holding in the modern landscape.

Site Code	WW10					
Identification Name and Address	West Wittering Beach, West Wittering					
County, District &/or Borough	Chichester, West Sussex					
OS Grid Refs.	NGR 4771 0986					
Geology	Raised Beach Deposits and Brickearth					
Arch. South-East Project Number	4498					
Type of Fieldwork	Eval.	Excav.	**Watching Brief**	Standing Structure	Survey	Other
Type of Site	Green Field	Shallow Urban	Geoarch	Other		
Dates of Fieldwork	Eval.	Excav.	**WB.**	Other		
Sponsor/Client	4-Delivery					
Project Manager	Neil Griffin and Jim Stevenson					
Project Supervisor	Liane Peyre					
Period Summary	**Palaeo.**	**Meso.**	**Neo.**	BA	IA	**RB**
	AS	MED	PM	Other		

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OASIS Form

OASIS ID: archaeol6-83752

Project details

Project name	West Wittering Geotech watching brief
Short description of the project	Archaeology South-East carried out a watching brief during preliminary ground investigation works at West Wittering coastal footpath, West Wittering near Chichester. The geoarchaeological work took place between 17th and 18th August 2010. This included monitoring 2 cable percussion bore holes, 3 machine dug test pits and 2 hand dug test pits all situated along the beach front near Roman Landing on West Wittering beach. Marine sediments; sands and gravels, raised beach deposits and alluvium were identified during the watching brief which are typical deposits expected in lower coastal plain geology. No archaeological material was recovered. The watching brief was able to successfully characterise a deep marine and alluvial sequence at the site. No occupation horizons or archaeological finds were recovered. The site does however preserve a deep sequence of sedimentation with potential for the reconstruction of Pleistocene/Holocene marine level channel and palaeogeographic context. The possible presence of interglacial deposits at depth in BH1 is potentially significant in providing a possible context for reconstructing environmental conditions at the site in the Middle- Late Pleistocene. Holocene Marine and Estuarine deposits have the potential for reconstructing the development of Chichester Harbour, the East Head spit and human landscape use in the Late Holocene. Scope now exists to continue the analysis of the identified sequence which could provide the necessary detailed environmental and dating evidence to attempt cross comparison with other coastal alluvial sequences in Sussex.
Project dates	Start: 17-08-2010 End: 18-08-2010
Previous/future work	No / Not known
Any associated project reference codes	WW10 - Sitecode
Type of project	Field evaluation
Site status	Heritage Coast
Current Land use	Coastland 6 - Other
Methods & techniques	'Test Pits'

Project location

Country	England
Site location	WEST SUSSEX CHICHESTER WEST WITTERING west wittering coastal path
Postcode	PO11 9
Site coordinates	SZ 718 988 50.7837554124 -0.981383415803 50 47 01 N 000 58 52 W Point

Project creators

Name of Organisation	Archaeology South-East
Project brief originator	Environment Agency
Project design originator	Archaeology South-East
Project director/manager	JON SYGRAVE
Project supervisor	Liane Peyre
Type of sponsor/funding body	Environment Agency

Project archives

Physical Archive Exists?	No
Digital Archive recipient	Local Museum
Digital Archive ID	WW10
Digital Contents	'Survey'
Digital Media available	'Survey','Text'
Paper Archive recipient	Local Museum
Paper Archive ID	WW10
Paper Contents	'Survey'
Paper Media available	'Context sheet','Correspondence','Diary','Drawing','Photograph','Plan','Report','Survey'

Project bibliography 1

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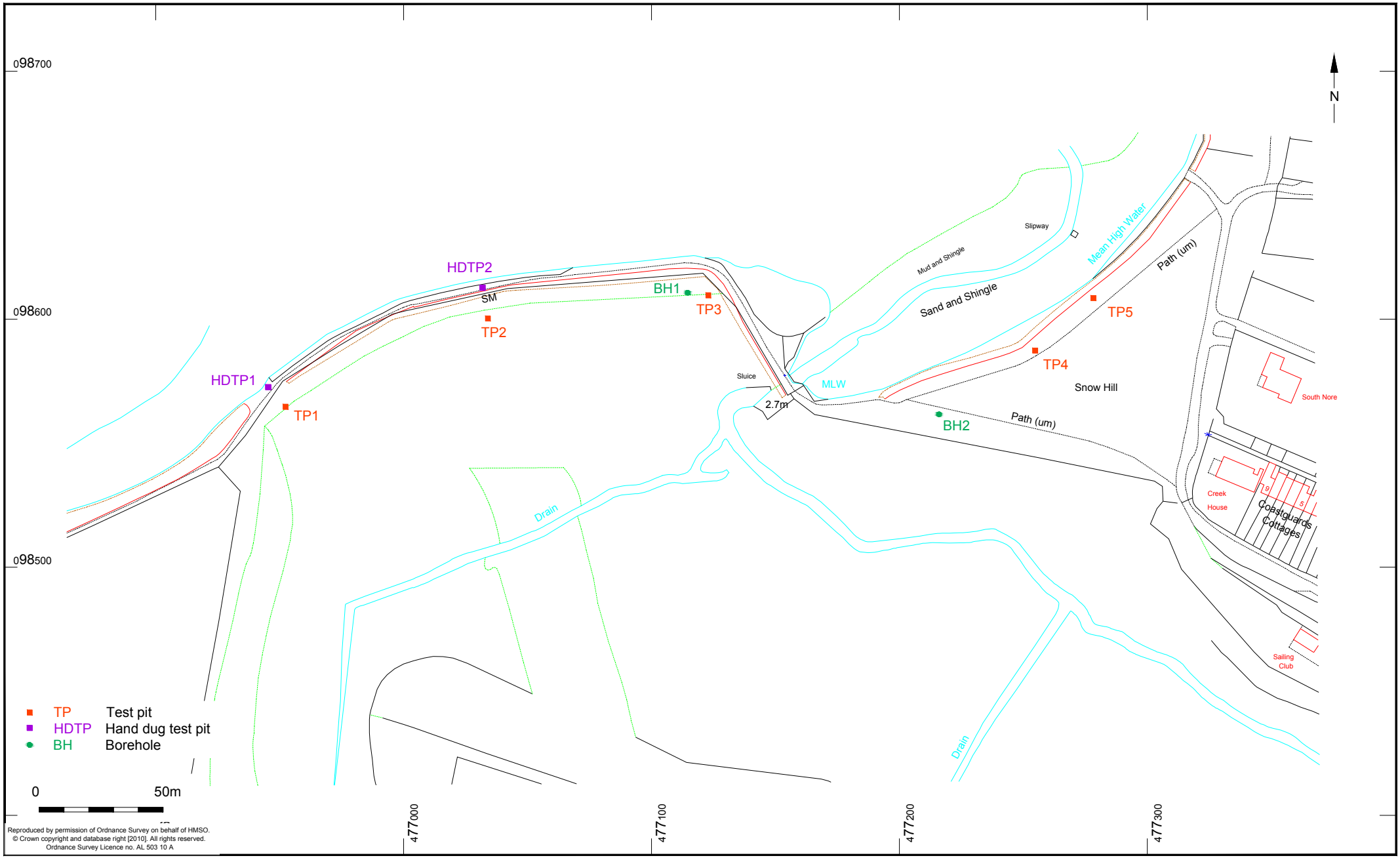
Entered on	4 October 2010

© Archaeology South-East		West Wittering	Fig. 1
Project Ref: 4498	Sept 2010	Site location	
Report Ref: 2010134	Drawn by: JLR		



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Project Ref: 4498	Sept 2010	Test pit location	
Report Ref: 2010134	Drawn by: JLR		

Fig. 3.1: Cable percussion bore hole

Fig. 3.2: Hand dug test pit 1

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