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WALSINGHAM PLANNING

FORMER SANDGATE CINEMA

BERWICK-UPON-TWEED

NORTHUMBERLAND


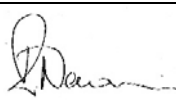

GEOARCHAEOLOGICAL ASSESSMENT REPORT

November 2015

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WALSINGHAM PLANNING

**Former Sandgate Cinema, Berwick-upon-Tweed, Northumberland
 Geoarchaeological Assessment**

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SUMMARY

Wardell Armstrong Archaeology (WAA) was commissioned by the client Walsingham Planning, to undertake a geoarchaeological evaluation by monitoring geotechnical borehole sampling at the site of the former Sandgate Cinema, Berwick-upon-Tweed (NGR: NT 399855 652684). The assessment was sought in order to assess the nature and extent of any buried archaeological remains across the site.

Two geotechnical boreholes were taken from the site; sampling from the current ground surface to the bedrock. Generally these showed that a layer of waterlogged archaeological material exists beneath the site, at least around the two borehole locations, and possibly over the whole site.

ACKNOWLEDGEMENTS

Wardell Armstrong Archaeology (WAA) thanks the client Whitbreads for commissioning the project, and Helen Binns at Walsingham Planning for her help through the project.

Wardell Armstrong Archaeology also thanks R.D. Drilling for their help during this project.

The assessment was supervised by Don O'Meara, who also wrote the report. The project was managed by Frank Giocco (Wardell Armstrong Archaeology, Director). The report was edited by Richard Newman, Post-Excavation Manager.

1. INTRODUCTION

1.1 Project Circumstances and Planning Background

1.1.1 In December 2015 Wardell Armstrong Archaeology (WAA) undertook an geoarchaeological evaluation on land at the former Sandgate Cinema site, in Berwick-upon-Tweed, Northumberland (NGR: NT 399855 652684) (Figure 1). The evaluation was commissioned by Whitbreads, via their consultancy Walsingham Planning, who intend to construct a hotel on the site.

1.1.2 The project involved working alongside the geotechnical team as they sampled the area for ground contamination, as advised by Historic England for the early assessment of archaeological sites (English Heritage 2007, 16). While this geotechnical work was being undertaken the onsite Environmental Archaeologist made geoarchaeological notes on the deposits being encountered.

1.1.3 This report is intended to compliment the desk-based assessment undertaken for this site (ASUD 2006a), and the evaluation also undertaken at this site (ASUD 2006b). This geoarchaeological report provides current baseline data for the preservation levels and extent of the archaeological and natural layers which form the subsurface drift geology across this site.

1.1.4 The project was undertaken with the understanding that deeply buried archaeological remains need to be considered when ground-disturbing work is being undertaken in urban centres with known heritage assets. For deeply buried deposits this can be undertaken using a windowless or window samplers (Bates and Bates 2000).

1.2 Project Documentation

1.2.1 This report outlines the work undertaken on site, the subsequent programme of post-fieldwork analysis, and the results of this scheme of archaeological evaluation.

2. METHODOLOGY

2.1 Project Design

2.1.1 The fieldwork was undertaken in one key phase from November 30th – December 1st 2015. This involved the recovery of deeply buried soil sequences using a cable percussion rig sampler. In total the recovery of two cores was undertaken. Four environmental samples were collected during the fieldwork; which relate to a deposit

interpreted as a buried medieval surface which is present across the site. The notes from the field examination of the core samples are presented in Appendix 1.

2.1.2 By monitoring the geotechnical testing, identifying the archaeological deposits, and reporting the results of this investigation this project addresses recommendations made within the North East Regional Archaeological Research Framework (Petts 2006, 207)

2.2 Documentary Research

2.2.1 An archaeological desk-based assessment was prepared by Archaeological Services University of Durham in 2005, which set out the archaeological and historical background of the site, and provided an assessment of the significance of the main heritage assets in the vicinity (ASUD 2006a).

3. BACKGROUND

3.1 Location and Geological Context

3.1.1 Berwick-upon-Tweed is the most northerly town in England, with the historic core largely located on the north bank of the estuary of the River Tweed. The town is situated on a peninsula, and therefore is surrounded on three sides by an estuary. This has affected the character of the underlying drift geology deposits with estuarine sands and gravels underlying those parts of the town located close to the river; such as the current site.

3.1.3 The solid geology of the site is comprised of a red, coarse grained sandstone; therefore when this material is encountered all material above this can be largely dated to the Holocene and has potential for evidence of human activity to varying degrees.

3.2 Historical and Archaeological Background

3.2.1 Archaeological evidence from the vicinity has identified some Roman activity, in the form of a single quern stone (SMR 228), and it is suggested that there may have been a small settlement here during the Saxon period. However, firm archaeological evidence for either a Roman or Saxon settlement has not been uncovered as yet. Archaeological evidence points to the town being settled by at least the 12th century, and though there is the potential for earlier material to be recovered for the present purposes it can be suggested that all archaeological remains identified will date to the period after the 12th century. A previous desk based assessment of the site suggested that that site was a former granary (ASDU 2006, 8); however a re-examination of the historic mapping referred to in this document does not suggest that this building had a specified use based on the cartographic evidence. The site was occupied a cinema for much of the 20th century.

3.2.2 The site has been subject to a desk based assessment (ADSU 2006a), as well as an archaeological evaluation (ASDU 2006b). However, the archaeological evaluation did not proceed below 1.6m and therefore would only have evaluated the upper deposits, which it can now be shown largely relate to the post-medieval/modern activity on the site.

4. GEOARCHAEOLOGICAL ASSESSMENT RESULTS

4.1 Introduction

- 4.1.1 The boreholes showed some variation in the overall depths of the deposits, but were largely comparable in terms of the general deposits.
- 4.1.2 The upper deposits consisted of c.3m of modern brick, both possible structural brick in the case of borehole 1, as well as rubble in the case of borehole 2. This also had a large amount of sandy mortar, as well as small coal fragments.
- 4.1.3 At c.3-3.5m there is a c.0.5m layer which is richly organic, and includes preserved fibrous plant material and oyster shell within the deposit. This suggests a well preserved waterlogged layer, though the narrow nature of the examined area makes it unclear whether this was part of a medieval garden soil, or other sort of occupation deposit.
- 4.1.4 After c.3.5m there follows a c.0.3m band of sands and clays in the case of borehole 1, overlying alluvial material. In borehole 2 the archaeological layers were situated on top of the alluvium. The alluvium is c.1-1.5m thick, and consists of very wet coarse sands, gravels and silt. This overlies a very dense, pink clay which extends to a depth of c.7m. At 7m the sandstone substrata is present. Sampling did not penetrate below this layer.

5. CONCLUSIONS

5.1 Interpretation

5.1.1 The current site consists of c.3m of post-medieval deposits which overly a richly organic layer with evidence of waterlogging; suggesting high levels of preservation of organic remains. It is suggested here that these deposits date from the 13th-16th century as the material may be comparable to that found at New Quay, Berwick, where dumps of organic material were identified, possibly as part of layers to build up the ground level (Huntley 1999, 103-105). Where encountered at this site the material was visually examined; though processing of the four collected samples might be needed in order to fully assess their content.

5.1.2 The nature of the sandy-gravel deposits are of interest as much of the quayside of Berwick had been created by the deposition of ballast dumps; such as Ballast Quay, and New Ballast Quay (Dearham 2013, 12). In this case it is suggested that the blue-grey sandy material identified below the organic archaeological layers is alluvial material, rather than artificially dumped ballast. The nearby site of Dewar's Lane Granary also produced the sequence observed here (organic material, sands, sandy-clay), with the organic material being dated to the 13th-16th centuries (Dearham 2013, 18).

5.2 Significance

5.2.1 This phase of work has demonstrated that beneath the post-medieval/modern demolition material there is a layer of archaeological deposits, possible representing a buried soil or ground surface. This layer exhibits organic preservation, including plant fibres. This suggests that a high level of preservation within the site.

5.3 Recommendations

5.3.1 The samples collected from the site should be processed to identify fully the nature of some of the deposits encountered.

5.3.2 If further geotechnical testing is taking place on this site it is recommended that an archaeological be present in order to identify further the nature and extent of these remains.

5.3.3 If an absolute date is required from this site then a suitable radiocarbon samples was recovered from borehole 1. This consisted of a waterlogged hazelnut shell from the

lowermost organic deposit. Should this be taken then it would form a lower baseline above which other potential archaeological remains could be measured.

6. BIBLIOGRAPHY

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APPENDIX 1: BOREHOLE DESCRIPTIONS

Site Code: PCB-A		Location: Former Sandgate Cinema, Berwick-upon-Tweed		Core No.: 1
Equipment: Cable percussion sampler			Height OD: Final Depth: 735cm	Compiled by: D O'M
Cm depth	Description			
0-300	Demolition layers, mainly consisting of brick and fragments of sandy mortar. Some of the brick fragments may form parts of a foundation at this location as the initial coring was slowed by greater resistance than one would expect from loose bricks			
300-350	Dark brown, organic rich garden soil type material. Material includes fibrous plant material reminiscent of animal dung remains.			
350-420	Laminated sands with thin (c.2-3cm) organic layers. A sample was taken at 420 of a waterlogged hazelnut shell.			
420-550	Alluvium deposits, dark blue-grey, coarse sands, angular gravels with silty material.			
550-690	Very stiff, pink clay. Finely laminated, very consistent			
690-735	Sandstone deposits, possibly with some compressed gravel deposits from 690-730, but this may have been crushed bedrock from the percussion rig.			

Site Code: PCB-A		Location: Former Sandgate Cinema, Berwick-upon-Tweed		Core No.: 2
Equipment: Cable percussion sampler			Height OD: Final Depth: 735cm	Compiled by: D O'M
Cm depth	Description			
0-230	Demolition layers, mainly consisting of brick and fragments of sandy mortar.			
230-300	Dark brown, organic rich garden soil type material. 10 litre bulk sample taken from this layer			
300-420	Alluvium deposits, dark blue-grey, coarse sands, angular gravels with silty material.			

420-590	Very stiff, pink clay. Finely laminated, very consistent
590-620	Dense, angular crushed gravel type material
620+	Sandstone deposits.

APPENDIX 2: FIGURES

Wardell Armstrong
Archaeology
2015

PROJECT: Playhouse Cinema, Sandgate,
Berwick-upon-Tweed

SCALE: 1:25,000 at A4

REPORT No: CP11603


CLIENT: Walsingham Planning


DRAWN BY: AB

DATE: December 2015

FIGURE: 1

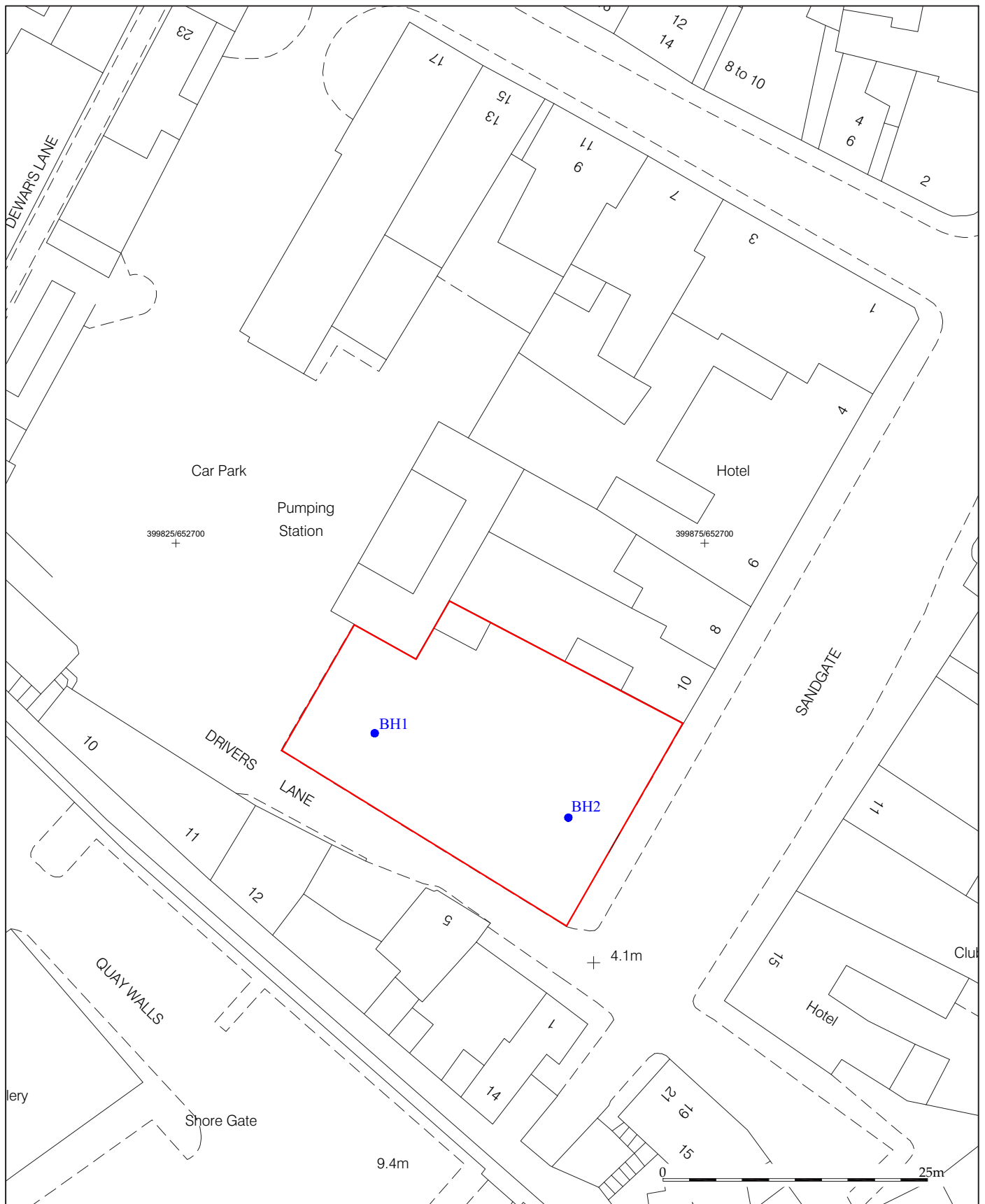
KEY:

 Site location



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Figure 1: Site location.







 <p>Wardell Armstrong Archaeology 2015</p>	<p>PROJECT: Playhouse Cinema, Sandgate, Berwick-upon-Tweed</p> <p>SCALE: 1:500 at A4</p> <p>REPORT No: CP11603</p> <p>CLIENT: Walsingham Planning</p> <p>DRAWN BY: AB</p> <p>DATE: December 2015</p> <p>FIGURE: 2</p>	<p>KEY:</p> <p> Site boundary</p> <p> Boreholes</p>	 <p>Reproduced by permission of Ordnance Survey on behalf of The Controller of Her Majesty's Stationery Office. © Crown copyright. All rights reserved. Licence number 100019512</p>
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Figure 2: Location of boreholes.

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