

Centre for Archaeology Report 1/2005

**Whitby Abbey Headland Project  
Heritage Lottery Funded Work 1998-2004**

Dave Hunter, Polydora Baker, Gill Campbell, Melanie Daulby,  
Karla Graham, Sarah Jennings and Sarah Paynter

Illustrations by Vince Griffin

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## **Whitby Abbey Headland Project Heritage Lottery Funded Work 1998-2004**

Dave Hunter<sup>1</sup>, Polydora Baker<sup>2</sup>, Gill Campbell<sup>2</sup>, Melanie Daulby<sup>2</sup>,  
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Illustrations by Vince Griffin<sup>2</sup>

### **Summary**

Plans for the construction of new visitor access to the ruins of Whitby Abbey (SAM 13284) provided the opportunity to greatly increase the understanding of the area and resulted in the important discovery of a well-preserved 17<sup>th</sup> century garden landscape adjacent to the standing ruin of what was known as the Banqueting House. The results of fieldwork, undertaken with funding from the Heritage Lottery Fund (HLF) contribute evidence for the development and abandonment of these gardens through some 400 years and how they altered and masked the remains of the medieval abbey. The significant pre-conquest occupation of the site was also glimpsed and adds a small but intriguing note to the study of Anglian monasticism. Allied research excavations at Whitby Abbey have expanded our knowledge of this period this to a much greater degree.

### **Keywords**

Early Medieval, Medieval, Post-Medieval, Excavation, Animal Bone, Copper Alloy, Glass, Jet/shale, Plant Remains, Pottery, Worked Stone

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# **INTRODUCTION**

## ***INTRODUCTION***

This report describes the archive created by English Heritage Centre for Archaeology (formerly Central Archaeology Service) during work centred on the building of a new visitor centre at Whitby Abbey in the shell of the 17<sup>th</sup> century building known as the Banqueting House. It was carried out between 1998 and 2004. Earlier work evaluating the archaeological potential of the Headland 1993-1997 has already been reported upon (Wilmott 1996; Brook, Jennings and Wilmott 2004 Site 594).

All the fieldwork was carried out in accordance with Planning Policy Guidance 15 and 16 and carefully designed to minimise the impact of development on both the standing and buried heritage.

In addition to the HLF-funded work outlined in this report, two further CfA projects were conducted on the Whitby Abbey Headland during 1999-2002. In 1999-2000 part of an Anglian cemetery was excavated under the direction of Kath Buxton (Whitby Research, Buxton in preparation), this was located south-west of the abbey church. During 2001 and 2002 Peter Busby, then Tony Wilmott and Sarah Jennings investigated pre-conquest settlement on the rapidly eroding edge of the East Cliff located to the north of the Abbey Church (Jennings *et al* in prep).

## ***LOCATION***

Whitby Abbey is located on a spur of high ground called East Cliff (NGR NZ 9030 1120; Fig. 1). The town of Whitby and the Esk Valley lies to the west. To the north and east there are steep cliffs with the North Sea at their foot. To the south and south east the headland gradually widens before rising to the North Yorkshire Moors several kilometres away.

The site can be reached from Whitby via the 199 Steps, also called the Church Stairs, and the churchyard of Saint Mary's Church. Running parallel with this access route is the Donkey Track, a steep stone flagged road. From the south Whitby Abbey is approached via Green Lane and Abbey Lane.

## ***SCHEDULED AREA***

The present Scheduled area (Fig. 1) comprises a landscape that includes:

- The buried remains of the 7<sup>th</sup>- to 9<sup>th</sup>-century Northumbrian monastery of Streaneahalch.
- Both standing and buried remains of the post-conquest Benedictine abbey and remnants of ridge and furrow in the surrounding fields.
- Buried and standing remains of the Cholmley family's house(s) and gardens occupied during the 16<sup>th</sup> to 19<sup>th</sup> centuries (known as the Banqueting House and Formal Gardens).
- Numerous post-medieval buildings and structures, including a farm (Abbey Farm), dwellings, commercial properties, and a coastguard station and television mast are also included within the boundary of the scheduled area.

## ***GEOLOGY***

The underlying geology of the headland is a Jurassic sedimentary sequence with a capping of glacial derived boulder clay.

## ***HISTORY AND PREVIOUS EXCAVATIONS***

### ***HISTORY***

The following sections are the briefest outline of the historical and archaeological background to the site of Whitby Abbey. For further and detailed information the Conservation Plan and CfA project designs should be consulted (see Appendix 1).

Traditionally the site of Whitby Abbey is recognised as the location of the 7<sup>th</sup>-century monastery of Streaneahalch (Sherley-Price 1990), founded by the abbess Hild in AD 656-7. Site clearance and excavations at Whitby Abbey in the

1920s recovered large quantities of high status Saxon artefacts and worked stone along with the ground plan of what was believed to be the female quarters of a double monastery. There is no evidence to suggest when this site was abandoned but it is unlikely to have survived into the later 9<sup>th</sup> century.

A Benedictine monastery was founded on the ruinous site of this early monastery in 1076 and soon after work commenced on the building the first of two great churches and associated conventular buildings. The present ruins date from the 13<sup>th</sup> to 15<sup>th</sup> (?) centuries (Goodall 2003).

After the dissolution in 1539 the lands of the abbey and its estate came into the possession of the Cholmley Family. Over the next 150 years the land within the monastic precinct boundary was developed into a formal landscape of terraces, courts and gardens, and a large new house, the Banqueting House, was constructed c 1672. In 1790 gales damaged the roof of the Banqueting House and by 1811 it was a roofless ruin (Lee 1997).

The shelling of the Abbey by German warships in 1914 precipitated the abbey being taken into Guardianship the following year. During the mid 1920s the then Office of Public Works conducted a campaign of site clearance and excavation in and to the north of the Abbey. In the mid 1930s the condition of the Banqueting Hall had declined sufficiently to warrant a major campaign of consolidation.

## **PREVIOUS EXCAVATIONS**

By far the largest scale investigations at Whitby Abbey were conducted by the Office of Public Works between 1920 and 1928 to the north of the abbey church (Peers and Radford 1943). These works were initially aimed at clearing and presenting the ruins of the medieval abbey church. The discovery of Saxon deposits and structures was accidental but resulted in a prolonged campaign of excavation and the recovery of a substantial quantity of high status Saxon artefacts. Considerable disturbance had been caused by medieval burials, but it is not clear if there was a pre-conquest burial phase, however, Anglian funerary monuments were recovered. These findings were not reported on until 1943 and re-analysis of the site plan (Rahtz 1976; 1995; Johnson 1989; 1993) and finds (Cramp 1976; 1976b; 1993) suggest that the interpretation of both the structures and function of the area are at fault. However the quality and quantity of the material recovered cannot be doubted.

The Banqueting House was threatened with demolition in 1933 (Lee 1997). However a reprieve and partial demolition was followed in 1935 by the removal of 19<sup>th</sup> century arches and beams and the insertion of four cast concrete buttresses tied to horizontal ring beams to reinforce the north façade. Various other works were conducted in order to make the building safe and the walls weather proof.

Although a building survey, drawings and photographs of this work survive there does not appear to have been an archaeological component.

In 1958 Philip Rahtz evaluated an area of Abbey Plain called Paylor's Field located north of the abbey ruins (Rahtz 1962). This work was conducted prior to the levelling of earthworks and the creation of a car park. Along with the foundations of medieval buildings; Saxon artefacts and structures were recovered from a number of trenches. At the same time further work, supervised by A Pacitto, uncovered part of an intensively used lay cemetery 150m to the south-east of the abbey pond. The evidence points to this cemetery dating to the 14<sup>th</sup> century (Rahtz 1968).

T C M Brewster, with the East Riding Archaeological Research Committee, conducted excavations to the north-east of the abbey ahead of the construction of a television transmission mast in the late 1960s (Clark 1997; A Pacitto *pers comm*).

Mark Johnson excavated two small trenches a few metres north of abbey church's west end in 1989 (Johnson 1989). Both medieval structures and Saxon deposits were found to survive intact at this location, and it was suggested that terracing had taken place at least in the medieval period. Surprisingly, given the results of previous excavations by Peers no burials were encountered.

An evaluation of Abbey Pond for Scarborough Borough Council and North Yorkshire County Council in 1990 investigated the condition and construction of the Abbey Pond. The results were equivocal, but suggested that the existing pond was post-medieval in date, perhaps associated with the gardens of Abbey House, but may have had earlier origins (Hunter and Grieveson 1990).

English Heritage Central Archaeology Service conducted three seasons of work between 1993 and 1995. This was focused to the south of the abbey church, areas A, B, C, D, and E, with one evaluation trench, SSD F1, located to the north-west of the abbey ruins (Fig. 1.) (Wilmott 1996).

Four major discoveries recast the then current knowledge of the Abbey Headland;

- 1 An early Christian (?) cemetery and boundary with traces of earth fast timber buildings and part of a large stone structure in the vicinity of Abbey Lands Farm.
- 2 Evidence of terracing from the 7<sup>th</sup> (?) century on Abbey Plain and in the vicinity of abbey church (SSD F1). Burials were not encountered.

- 3 A major phase of landscape planning in the mid 13<sup>th</sup> century characterised by the construction of a bank and ditch topped by a wall. To the south of this earlier features were masked by ridge and furrow.
- 4 Unsuspected terracing of the landscape to the north of the 13<sup>th</sup>-century boundary that masked earlier features and “enhanced” the setting and prominence of the abbey church. Terracing of this date was also recorded in trench F1.

The discovery of the early focus around Abbey Lands Farm and survival of Anglian features to the north-west of the abbey church were considered to be of major significance and national importance and compelled a reconsideration of the development plans then under consideration. In 1999 and 2000 a larger scale excavation was conducted on the early cemeteries (Buxton in preparation). Two 1m-square test pits were dug on Abbey Plain by Northern Archaeological Associates during 1998 for Yorkshire Water. Stratified Anglian artefacts and features were reported (Clark 1997).

This report details the work conducted by the Centre for Archaeology during the planning and construction of a new visitor centre in the Banqueting House and surrounding landscape. Excavation was focused on post-medieval formal gardens and structures, but, earlier medieval and Anglian phases of occupation were also investigated.

## **CONSERVATION PLAN**

In 1997 a Conservation Plan (Clark 1997) was written for the whole for the scheduled area and headland. This summarised the historical and archaeological significance of the headland; and presented the evidence in the two volumes, Annex One focused on the Banqueting House, Whitby Abbey and the historic landscape of the headland.

The conservation plan provided base-line information for further work on the HLF project and reinforced the landscape nature of the archaeological remains. It also “developed policies for the conservation of the site ensuring that significance was retained, [and] developed a strategy for specific developments on the headland based on the policies it contained”. As a result the role of CfA changed subtly. The objectives of fieldwork became increasingly tailored to providing specific information on the quality, quantity and depth of specific features, for example the foundations of the Banqueting House’s walls, and the survival of 17<sup>th</sup>-century garden features.

# **AIMS AND OBJECTIVES OF THE WHITBY ABBEY HEADLAND PROJECT HERITAGE LOTTERY FUND**

## ***THE WHITBY ABBEY HEADLAND PROJECT***

The following section is a brief summary of the development history of the Whitby Abbey Headland Project.

In 1992 a joint English Heritage and Scarborough Borough Council working party was formed to look at the visitor facilities offered on the Whitby Abbey Headland, and it was determined that these were totally inadequate. As a result the Whitby Abbey Headland Project was formed.

Initial plans for the relocation of car parking and the construction of a new visitor centre were drawn up. These facilities were to be located south of the abbey at Abbey Lands Farm. The Central Archaeology Service began three seasons of archaeological evaluation directed by Tony Wilmott from 1993 to 1995 (Wilmott 1996). The discovery of important early and later medieval features forced initial plans to change and refocus on the shell of a 17<sup>th</sup>-century building known as the Banqueting House.

As an aid to securing funding from the National Lottery Heritage Lottery Fund (HLF) a Conservation Plan was compiled for the entire Headland (Clark 1997). Further archaeological evaluation established the excellent preservation of 17<sup>th</sup>-century garden features to the north of the Banqueting House.

On 24 October 1997 outline agreement was reached with the HLF and work commenced in November 1997. As part of the revised application to the HLF in May 1998, a proposed link road and car park to the south of Abbey House (at the time Abbey House was a hotel) was dropped from the project, and plans for a new visitor entrance added to the south of the Abbey. Proposals to conserve and present the 'Hard Garden' to the north of the Banqueting House, discovered in November 1997, were also added.

In September 1998 the Heritage Lottery Fund, English Heritage and Scarborough Borough Council officially launched the project. Key elements of this were:

- To restore and protect the natural beauty and historic character of the headland [by removing intrusive and unsightly 20<sup>th</sup>-Century developments].

- To protect and conserve the historical and archaeological remains [through relocation of car parking, re-landscaping and more appropriate management].
- To integrate the restoration and use of Abbey Grounds, the Cholmley's House [Banqueting Hall [House]] and other parts of the Headland [to bring out the interrelationship and character of the principle buildings and monuments, in particular the little understood 17<sup>th</sup> -century building[s] and garden developments adjacent to the Abbey ruin itself].
- To increase safe public access and understanding of the whole area [by sensitive adaptation/ reuse of Cholmley's House [Banqueting Hall] as a Museum and Visitor Centre, with bridged access to the Abbey ruins and pedestrian access routes through Abbey Grounds]
- To improve the interpretative, educational and other facilities for visitors to the Headland [from the inadequate and unsightly facilities on Abbey Plain and guardianship site].
- To improve the status of Whitby Abbey and its Headland as a focus for visitors and to the benefit of the community of Whitby.

However, planning for the new visitor centre within the Banqueting House was problematic from the start. As a consequence of these difficulties the new visitor centre element of the project moved into serious delay. This matter was eventually resolved, with the help of the Strickland Estate, by the autumn 1999 and the new visitor centre element of the project was re-started with an archaeological excavation inside the Banqueting House.

Various agreements were concluded between the parties listed above and the European Regional Development Fund which joined the project by Christmas 1999 and between January and June 2000 budgets and agreements were ratified with the Heritage Lottery Fund. A subsidiary bid for additional funds for the restoration of the Banqueting House - North Entrance Courts ('Hard Garden') was submitted to the Heritage Lottery Fund and accepted. The Principal Contractor (W Birch Ltd.) was appointed and the design of the new visitor centre modified to reduce the impact on the buried archaeology and historic fabric. Some elements of the project became a Contractor Design Solution (Mechanical and Engineering, and Structural elements of the new visitor centre).

At this point the project's construction completion date was revised to September 2001, but this was subsequently varied as the project progressed to the opening of the new visitor centre at Easter 2002. Tight financial control of the project and

flexibility within the programme meant that a number of previously omitted or new items could be added back into the project.

Uncertainties relating to project design, programme and sequencing resulted in a very disjointed and often broken archaeological programme.

Both the project and the archaeological fieldwork were delivered on time and to the overall May 1998 budget.

## ***AREAS OF STUDY***

The character of the archaeological resource has already been defined (see Section 1. 4 Scheduled Area - above). This is more fully described and expanded in the Conservation Plan (Clark 1997).

The Whitby Abbey Headland is in the ownership of several different organisations, English Heritage, Scarborough Borough Council and the Strickland Estate are the major landowners. In order to clearly attribute artefacts recovered during excavation to their relevant owners the headland was divided into areas denoted by a letter, A to Q (Fig. 2). Existing landscape features, field walls, fences and paths were utilised to assist this and create 'real' boundaries between areas. All interventions, site subdivisions and recording briefs were allocated a letter code from this series and a numeric identifier, Q1, G123 etc.

Subsequent work has removed many of the boundaries.

The letter designations given to areas generally increase from south to north, but the nature of the landscape and timescale of work precluded against a linear allocation. Some areas, J, K and M, were not investigated. Other areas were only looked at once or twice. Other areas, particularly areas G and N were the scene of a great deal of evaluation, excavation and other forms of recording.

The nature of work and the desire to preserve (wherever possible) post-medieval garden deposits and features skewed the data recovered from fieldwork in areas H, N, P1, Q, R. Earlier phases of activity were only observed on a meaningful scale in areas G and Q.

Work adjacent to the abbey ruins was limited to exposing and recording structures (P1) and the evaluation and cleaning of the pond (P3, P4, P5, P7). A limited watching brief was kept on the provision of access routes and lighting in the abbey church. These works were confined to the active topsoil.



Watching briefs in the wider headland landscape, Q4, Q6, Q7, Q8, Q9, Q10, Q81 and Q82, recorded a small amount of data about medieval structures and the post-medieval estate.

## **RESEARCH AIMS**

Where appropriate and practical the Whitby Abbey HLF project tried to address the archaeological research priorities established in *Exploring Our Past* and the English Heritage Archaeology Division Research Agenda (English Heritage 1997; 1998)

The following research aims could be addressed directly:

### *PC6 The late Saxon to medieval period (c. AD 700- 1300)*

The surviving Whitby Abbey dates from the 13<sup>th</sup>-14<sup>th</sup> century but a monastery was founded on the site in the late 650s. It was hoped that additional evidence of this early establishment would be recovered along with evidence of its abandonment. Could these results be compared with the results from earlier excavations?

Evidence of the medieval Benedictine abbey (founded 1076) was also expected.

### *PC7 Transitions from medieval to post-medieval traditions (c. AD 1300- 1700)*

To investigate the potential of the site from the dissolution of the abbey to the development of the site during the 16<sup>th</sup> and 17<sup>th</sup> centuries through the relationships of structures and their use and subsequent abandonment.

### *PC8 The Industrial Revolution (c. AD 1700-1850)*

Whilst direct evidence for industrial activity during this period was not thought probable the products and influences of The Industrial Revolution were likely to be recovered.

The resources and materials required to build, maintain and run a grand house were likely to reflect developments in both the society and economy of the Whitby and further afield.

### *H4 The Impact of Christianity*

How had the establishment of a monastery in the 7<sup>th</sup> century affected the previous land use, land division and settlement of the headland?

Could similar influences be detected during the medieval period and how was the Reformation and Dissolution reflected in the development of the site?

Was it possible to detect differences between secular and sacred space?

### *T1 Settlement hierarchies and interactions*

Answers questions on the form and function of the Anglian monastery and how it interacted within the wider landscape and society of the 7-9<sup>th</sup> centuries.

Answer questions about the form, function and development of the Benedictine monastery and how it interacted with the town of Whitby and the wider landscape and society.

Could the development of the site post-conquest be seen in a wider landscape context, were there functional or social divisions of the landscape?

### *L2 Gardens*

Through excavation and survey recover and record, where possible, a complete and detailed plan of the formal gardens.

Date the development of the gardens.

To recover, where possible, the sequence of development within the gardens

Relate the development of the gardens to structures, both medieval and later, in the landscape.

To determine, if possible, the potential survival of pre-garden features and deposits throughout the area, and how they were effected by the construction of the gardens.

Investigate the form and date of the gardens in a regional and national framework.

## ***AIMS AND OBJECTIVES***

At the inception of work by Central Archaeology Service general aims were established in order to provide the information needed to design and prepare archaeological mitigation strategies in advance of the construction of a new Visitor Centre at Whitby. These were:

- Establish the character and date of the archaeological deposits in each area and where possible retrieve material culture and ecofacts which could further our understanding of the history of Whitby Abbey, and its surrounding landscape.
- Establish the extent, and quality of survival of archaeological deposits in each area
- To evaluate the impact of the proposed development on the entire archaeological resource, and as a result:
- Provide advice on setting of facilities
- Provide recommendations on appropriate mitigation strategies resulting from the setting of facilities
- To report on the above.

Finds and environmental specialists were involved in the design of projects and implementation of specific measures.

In addition individual elements of fieldwork, governed by separate project designs, produced their own aims specific to the proposed excavation or evaluation. In all 22 Project Designs were produced for work between 1997 and 2004, these are summarised in Appendix 2 (CfA Project Designs).

Project Design 619Q *A Project Design For Watching Briefs, Excavation and Building Recording for the Whitby Abbey Headland Project (HLF)*, was an exception in that it laid down the generic principals for archaeological recording during construction work and the restoration of the historic landscape.

In line with MAP2 (English Heritage 1991) each project design further specified both detailed and more general objectives in advance of archaeological interventions. These ranged from general objectives such as “To retrieve, where possible, material culture and ecofacts which could further our understanding of the history of Abbey House and gardens, and Whitby Abbey, and its surrounding landscape” which is employed in several project designs to specific information sought from an intervention. For example the following primary objectives are from Project 619P:

1. To identify and characterise the nature of the foundations of the Banqueting House and the deposits upon which they are founded.

2. To investigate and date, where possible, the development of the terraces and archaeological deposits believed to underlie the New House.
3. To expose, investigate and date, where possible, any structures or features on or cut into the terraces underlying the New House.

As a general rule the aims and objectives became more specific as the project developed and the threat to archaeological remains became better understood.

## **CONSTRAINTS**

With a number of notable exceptions (Site Sub-divisions H20, H20a, G43, G44, G45, G46, N20, N25, N28, N31, Q1 and Q5) the precepts of significance and preservation set out in the Conservation Plan (Clark 1997) limited the areas of excavation to the latest phase of post-medieval work. At the same time the desire to minimise destruction of the buried heritage restricted deeper excavation to small areas.

The construction of extensive terraces from the 7<sup>th</sup> to 17<sup>th</sup> centuries has created a complex and interesting stratigraphic sequence up to 7m deep on the headland. The remodelling of the landscape and reworking, burial and truncation of deposits has resulted in a high level of residual artefacts (see Section 3.4.7). Together with limited and shallow excavation it is difficult to conclusively link phases of activity between areas and interventions

A further challenge rests in the protracted nature of the work that suffered many delays and redirections (Appendix 1 Chronology of Archaeological Interventions and Recording). Interventions were delayed and revisited leading to a lack of continuity with a concomitant detrimental effect on some areas of fieldwork and fieldwork recording (see Section 3.3.4 below).

At times archaeological fieldwork was reactive. While the desire to protect the archaeological resource was not sacrificed the quality of data recovered was limited by this approach. This constrains how far the Academic Research Aims can be met. For example the recording of an emergency drain (August 2001; SSDs N27 and G123) hinted at the development of drainage in the Inner Court, but was severely limited by time, methods and conditions. Gathering more, rather than less archaeological data at this time, could have pre-empted the need to seek a further drainage solution at a later date (November 2003; SSDs N28, N29, N30, N31), and dramatically expanded our knowledge of the use and development of the Courts.

This approach also affected the recovery of both artefact assemblages and environmental data (see Sections 3.4.7 and 3.5 below).

# **QUANTIFICATION OF THE SITE ARCHIVE**

## ***SUMMARY OF INTERVENTIONS***

A brief summary of all interventions undertaken during the HLF phase of work is held at the Centre for Archaeology (S:/projects/490/pr619). This list records allocated with brief a descriptions of each intervention and significance.

## ***METHODS***

Evaluations, excavations recording briefs and observations dating from 1997 to 2004 are summarised in this report (See Appendix 1. Chronology of Archaeological Interventions and Recording).

Where possible all excavation was performed by hand in accordance with Centre for Archaeology Draft Recording Manual (English Heritage 1999) and under conditions stipulated in the Scheduled Monument Consents obtained from the Department of Culture Media and Sport. Regrettably excavation by arbitrary spits was used in a number of trenches (G43, G44).

Mechanical excavation was used to clear demonstrably modern overburden e.g. in Q5, and to excavate deposits from Abbey Pond, P7. Three machine-dug trenches were cut in the eastern road access through the Inner and Outer Courts for engineering purposes (H22, H23, H24). These were excavated to the top of "ancient surfaces"- Alum shale walkway.

The recording brief on Abbey Plain consisted evaluations (Q2, Q3, Q4, Q6; PI. 4) and observation of the machine cleaning of topsoil and excavation for drainage. Where archaeological layers were encountered they were hand-excavated and recorded by CfA staff (SSDs Q2, Q3, Q7, Q9, Q10, Q81, Q83). The excavation of an emergency drain along the eastern side of the Inner Court to a discharge point behind the Banqueting House was carried out by mini-digger (SSDs N27 and G123), and was observed and recorded by CfA archaeologists.

## ***QUANTIFICATION***

### **CONTEXT RECORDS**

Excavation was conducted in keeping with the Centre for Archaeology Draft Recording Manual (English Heritage 1999). Where possible, single context recording was employed. However, since many interventions were small this was not always possible or sensible. Each context has a unique record number

allocated from the series used on site. Records were entered in the CfA's venerable database, Delilah, and have been checked for internal consistency.

A digitised photogrammetric survey of the Banqueting House was available for consultation (undertaken by RPS Survey Services for English Heritage) and was used as a basis for building recording. Additional information, records of foundations, and investigation of the fabric, were recorded using the methods described in the Centre for Archaeology Draft Recording Manual (English Heritage 1999).

Due to the amount of re-construction and consolidation to the standing structure of the Banqueting House it proved impossible to excavate the blocked windows under archaeological conditions. A close watching-brief was kept on contractors throughout and deposits and structures described and placed in a stratigraphic sequence.

In total 3421 context records have been completed and loaded onto the 490fg database. Record numbers given to pile record sheets in order to allow finds processing have not been included. The gross breakdown of context is:

Built Structure Records	305
Cuts	642
Deposits	2448
Skeleton Records	4
Timber Records	6
Total	3420

*Table 1; Gross Number of Context records by Type*

Two rogue records have entered the Delilah database. 17383 duplicates 17305 and 17993, does not exist. These have been removed from the total.

Table 2 breaks this gross summary into the areas investigated and the contexts types investigated.

Area	Context Type	No. of contexts
B	Cut	1
	Deposit	8
D	Deposit	8
E	Built structure	16
	Cut	21
E	Deposit	95

G	Built structure	154
	Cut	186
	Deposit	414
	Timber	6
Area	Context Type	No. of contexts
H	Built structure	18
	Cut	33
	Deposit	144
L	Built structure	2
	Cut	2
	Deposit	13
N	Built structure	78
	Cut	177
	Deposit	1319
P	Built structure	12
	Cut	12
	Deposit	75
Q		1
	Built structure	11
	Cut	186
	Deposit	293
	Skeleton Record	4
R	Built structure	14
	Cut	24
	Deposit	79

*Table 2; Context Records by Site Sub-division and Type*

Individual site sub-divisions have had stratigraphic matrices constructed and checked. However, due to various delays during the programme these have not been phased. Where possible an attempt has been made to link deposits and features across different interventions. However, fieldwork spans a period of 7 years and the degree of success has depended on staff continuity, and the quality of individual datasets.

Matrices exist in a number of formats, small interventions, paper, and larger matrices on drafting film. The computer package ArchEdit (Version 1.0) was also used to create running matrices (G46 East, G46 West, H24, N15, N20, N21, N25, N28, N31, P1, Q1, Q5). Attempts to perform basic phasing during December



2003 and January 2004 employed an AutoCAD “pro-forma” sheet developed by Liz Muldowney of the Centre for Archaeology.

## **DRAWN RECORD**

Drawings were made on pre-printed Perma-Trace sheets at relevant scales, 1:20 for plans and elevations and 1:10 sections. Digital field drawings were also made. AutoCAD and TheoLT on a pen computer linked to a Leica TCR 1105 were employed. Site drawings were digitised, where possible splitting plans into their component contexts by layer, and are held on the Whitby HLF Project Directory. A number of sketch location plans and interpretative sections were also drawn at relevant scales e.g. 1:100. These have not been digitised. Each drawing has a unique record number allocated from the series used on site.

In total 1034 Drawing Record numbers were allocated. They were drawn from two blocks of record numbers.

Block	Records Allocated
19000-19499	252
23000-23999	782
Total	1034

*Table 3; Drawing Record Numbers Allocated*

The drawings can be broken down into Elevations, Plans, and Sections:

Plan	367
Section	610
Elevation	40
Total	1017

*Table 4: Number of Drawing Records by Type*

A number of drawings do not fit into these categories, e.g. matrices, and some Drawing Record Numbers were mis-allocated and have been declared as void.

Field drawings were digitised for security and ease of manipulation (AutoCAD R14). Where possible digitising broke the drawings in to their constituent components, with each layer drawn on a separate layer in the AutoCAD file. This could not be done for all drawings. This was usually due to insufficient information on the drawing. It has been attempted to recover this information where possible.

Not By layer	68
By Layer	949
Total	1017

*Table 5; Number of Drawings Broken into Single Context Layers*

A rather more serious problem was the lack of geo-referencing in a significant number of drawings. Lost or corrupt TST/EDM data accounts for a large proportion these, however, the rump are a less than glowing testament to site procedures. These are identified in the archive by the name convention, drawing number AA.DWG, where AA signifies a problem.

## **PHOTOGRAPHIC RECORD**

An extensive photographic archive was compiled. This comprises 35mm monochrome print, colour transparency and digital formats (Kodak DCP115 and 215). Each image (image group) has a unique record number allocated from the series used on site.

A large proportion of all images record the construction process, and have only the minimum of archaeological content.

## **SIGNIFICANCE AND POTENTIAL**

The majority of records from the Whitby HLF relate to deposits in the 17<sup>th</sup> century and later gardens in area N. A large number are arbitrary layers with little potential for further analysis. Records relating to the construction and alteration of the gardens (including Areas H, N, R and P) do have potential for further analysis and phasing. However, in only a few areas was excavation deep enough to permit a meaningful sequence, from late medieval to modern, be recovered. Area Q to the north of the Courts is rather more significant since it contains evidence of pre-conquest activity with only limited disturbance by medieval and post-medieval activity. It was possible to completely excavate two areas, Q1 and Q5, which have produced a meaningful data on the Anglian period (see section 4.3)

A number of factors influenced excavation:

- The requirement to preserve ancient surfaces
- Terracing during the medieval and post-medieval periods
- Limiting excavation to that necessary to facilitate construction, and designing construction to preserve buried deposits.

Whilst generally successful in preserving the archaeological resource this approach did generate a somewhat piecemeal excavation record, and limits the interpretation of the site.

A further large number of records from SSD G45, 364 in total, have potential to illustrate a broad range of activities. These range from probable pre-conquest structures to early and late medieval monastic features and structures and early post-medieval gardens (Pl. 1). The archive from area G also has the potential to illustrate the construction and perhaps the destruction of the Banqueting House, along with its subsequent use and consolidation. The drawing record for G45 is however less useful. It relies heavily on composite plans that are of dubious value in an area of deep and complex stratigraphy.

## **SUMMARY OF FINDS** by Sarah Jennings

### **WHITBY HLF THE MATERIAL CULTURE ASSEMBLAGE**

A considerable amount of material was recovered during the work on the HLF funded excavations at Whitby Abbey. Virtually all the individual archaeological interventions yielded material of some type. This ranged from stratified Anglian (8<sup>th</sup>/9<sup>th</sup> century) finds to discarded 20<sup>th</sup>-century material. At present there are 332 boxes of material of all types, including environmental, from the HLF excavations; this total includes animal bone and slag– dealt with elsewhere in this report – and sample residues. Person-made items came from a range of deposit types, for example, occupation or use, construction, and from contexts comprising imported soil. The long term potential of any of this material will largely depend on its direct or indirect relationship with the site to be determined at the assessment stage. This caveat applies to all categories of finds e.g. objects, pottery, and building materials.

To note – for the purposes of this report all individually recorded items that have a unique identifying number, whatever their material or status, are called ‘small finds’.

Material	Standard box	Skull box	Stewart plastic box
Animal bone	60	3	
Architectural stone	3 *unboxed		
Coal/jet		3	
CBM tile/brick/floor	44		
Clay tobacco pipes		5	
Daub/fired clay	7	2	
Flint		2	
Glass (bulk find)	4	5	
Miscellaneous	15	23	
Mortar/plaster	4	3	
Pottery	11	8	
Shell	1	3	
Slag/metal working	11	3	
Small finds	13	16	13
Stone	5	5	

*Table 6; Summary of Material Culture*

## METHODOLOGY

All excavated material was initially collected, including all 'modern' material and everything recovered by means of metal detecting. Evidently modern material was noted on the relevant bulk finds form as a guide to the status of the context and then discarded.

For some contexts only a sample of the bricks was collected at the time of excavation, and only a comprehensive range of types was retained.

All retained material was dealt with as per the procedures defined in the CfA Recording manual. All classes of material defined as 'bulk finds' were recorded by material group on one sheet for each context, and were all counted and/or weighed. All individually recorded items were given a unique identifying number and either recorded on a single line form or on individual sheets, as appropriate.

## THE POTTERY

Pottery from 621 contexts was recovered. The date range reflected the longevity of occupation and use of the area – Anglian to 20<sup>th</sup> century, and the extent of imported soil. The range of fabrics also reflects Whitby's position as a port, with perhaps a greater range of imported fragments than would be expected from an inland site.

Methodology – pottery from each context was listed by fabric and sherd count and given an overall date range and a 'spot date'. The SVR (sherd/vessel ratio) was generally low and in many instances was recorded as 1:1; the number of vessels joining across contexts was also low when noted during spot dating. This has been recorded in two ways to distinguish between actual cross joining fragments, and those likely to be the same vessel but non-joining.

Only one kiln site is known in the immediate area of Whitby at Ruswarp some 6kms inland from the Headland, producing a coarse ware in the Northern Gritty tradition during the later 12<sup>th</sup> and 13<sup>th</sup> centuries (Hayes 1980). The pottery has been linked where possible to the known fabric types in the area e.g. Scarborough, Brandsby, Hambleton, and Humber-types (Holdsworth 1978; Brooks 1987; Jennings 1992), those in use for medieval continental imports (Hurst *et al* 1986), and the commonly accepted terms for factory made wares of the 18<sup>th</sup> century onwards. The basis of a Whitby wide fabric type series has been started, and will need to be finalised for the whole area at the assessment stage.

The pottery divides into four main period groups

1 Anglian – 8<sup>th</sup>/9<sup>th</sup> century

- 2 post conquest medieval – 12<sup>th</sup> century to 16<sup>th</sup> century
- 3 early post-medieval – 16<sup>th</sup> to early 18<sup>th</sup> century
- 4 late post-medieval – 18<sup>th</sup> to 20<sup>th</sup> century

## **ANGLIAN POTTERY**

Little Anglian pottery was recovered from the HLF areas although considerable amounts have been retrieved from the nearby excavations on the cliff edge (Jennings et al, in preparation). Most of the limited amount of stratified Anglian pottery came from Area Q in the vicinity of Abbey Lodge. It is all of the classic 'Whitby' type as defined by Hurst (Hurst 1976)

Note – no pottery identified as dating to the 10<sup>th</sup> to 12<sup>th</sup> centuries was recovered.

## **MEDIEVAL POTTERY**

The medieval pottery of the later 12<sup>th</sup> and 13<sup>th</sup> centuries recovered from the HLF areas of Whitby follows the pattern common in the region. The earliest types are Gritty and Splash Glazed wares. The Gritty wares were probably mostly produced in the Ruswarp kiln, although ICPS analysis will be required to establish this beyond doubt. The forms are the common bucket shaped cooking pot with square rims and the occasional piece from a pitcher form, which sometimes has the odd splash of a brownish coloured ill-fitting glaze. The Splash Glazed fabrics are from a number of sources, virtually all from pitchers of jugs, and Beverley and Scarborough might be the original for some of them.

The high medieval period draws on all the locally known kiln sources, such as York, Brandsby, Scarborough, and the Humber area. As usual these divide into coarse wares and glazed table wares. Not surprisingly Scarborough Wares are well represented, though Fabric I is, as usual, far more common than Fabric II. The jugs include the fairly common 'brown pellet' examples as well as a few examples of the more expensive knight jugs. Supplying Whitby by sea must have been a minor part of the major export industry of ceramics from Scarborough. York Glazed wares are a very minor component of the assemblage; Brandsby wares of both the early and middle period are only slightly more common. There is a consistent element of jugs in an unglazed or poorly glazed coarse sandy orange fabric from an unknown source.

In the later medieval period the supply chain changes slightly, but somewhat surprisingly Humber wares are always rare. This could be considered as unusual given the wide spread distribution of these in much of the rest of the county, particularly to the south and east, and the likelihood of sea trade with Hull at this

time. Coarse wares are either fairly local, but from unidentified areas, or possibly from Potter Brompton.

Continental imports from this period are rare. There is the very occasional piece of Saintonge green glazed, but no Saintonge Polychrome. This follows the pattern of distribution up the east coast of England, with the exception of Hull (Watkins 1987). The end of the medieval period sees the occurrence of a few vessels of both Siegburg and Langerwehe stoneware and Low Countries Redware *grapen*. Because of the longevity of the latter it is not always possible to tell from small pieces if is late medieval or early post-medieval in date.

### **EARLY POST-MEDIEVAL**

This is also a poorly represented period in this part of Whitby. Hambleton and Ryedale wares are the main local products, with occasional yellow glazed wares, probably from a Midlands source. Glazed red earthenwares also start to become common in the early to mid 17<sup>th</sup> century. A regional import worthy of note is the rim of a Surrey Borders ware pipkin (Pearce and Vince 1988).

Continental imports are slightly more common, with the expected increase in stonewares from the Rhineland and Low Countries Redwares. A more unusual piece is part of the Lower Rhineland *sgraffito* slipped bowl. French wares are totally absent, but there are several fragments from a North Italian slipped albarello. These are rare in any circumstance, however a number were recovered from a Dissolution deposit in the Great Drain at Barking Abbey (Jennings and Redknap forthcoming).

### **LATE POST-MEDIEVAL TO MODERN**

A considerable amount of pottery of this period was recovered and includes fragments from well into the 20<sup>th</sup> century. However, most of this is likely to derive from soil imported on to the site. A large collection comes from soil over the cobbled garden in Area N. The usual range of Staffordshire factory made products that would be expected this distance from source are evident (Jennings 1981). White salt-glazed stonewares, creamwares, and underglazed painted wares are all represented. Coarse, or kitchen wares still continue to be made in glazed red earthenware, and towards the end of the period – from the very late 18<sup>th</sup> century onwards – Sunderland wares become dominant. While there is little Lustre ware there is a considerable percentage of various Sunderland kitchen wares, including plain, slipped and mottled. Many of these are pieces of large pancheons. In parallel and also slightly later than these are the Banded wares made in Stoke-on-Trent

Imports are mainly represented by late Raren and Westerwald stonewares, but there are several examples of Chinese Export Porcelain including a few good quality tea bowls

One of the few groups of pottery that might be contemporary with the use of Cholmley's House comes from H24 and contains a base fragment of a Chinese Export Porcelain dish with part of a hand written name on the back reading 'Stric....' The fragment is broken after the letter 'c' but this could read as 'Strickland'. This piece is currently on display at the Cholmley's House Museum (SF 200124675).

There is no evidence that any of the material dating to the 19<sup>th</sup> and 20<sup>th</sup> centuries came from occupation of the area and all is likely to be present as a result of importing soil at various times.

## **POTTERY SUMMARY**

The initial impression is that the pottery from the HLF interventions has little potential in its own right. The assemblages are generally too small, too fragmented and diverse, and too separated to make detailed statistical analysis a worthwhile option. However, it does have potential to contribute to dating and phasing and has an important place in the supply and provisioning of the Headland at various periods when taken in conjunction with the other Whitby Projects.

## **THE BULK FINDS**

*Clay tobacco pipes* – little work has been done on the clay pipes from Whitby so because of this the collection from the CfA excavations forms an important resource to address a lacuna in the national study (Higgins 2001). A few pipe bowls were examined prior to their display in Cholmley's House Museum. This revealed that Whitby was mainly supplied by pipes from Scarborough, Bridlington and some that might have originated in London. It is also likely that there may be the occasional example from the Low Countries, which would be compatible with the small amounts of contemporary pottery.

*Ceramic Building materials* – a diverse assemblage of bricks, roof and some floor and wall tiles was recovered. Much of this material is post-medieval in date. The range and number of floor tile is small, with a very few pieces of inlaid decorated tile. Most of the early post-medieval floor tiles are Low Countries, and



of the smallest size. These occur in both green and yellow versions. There are also a few 'local' pieces of as yet unknown origin.

The roofing tiles are either plain peg tiles or plain and black glazed pan tiles. Only context information is likely to divide the peg tiles into medieval or post-medieval date. The pan tiles are the typical late post-medieval variety and a number of buildings in Whitby still have both types on their roofs.

Samples of brick were retained, but many of these came from contexts that suggest their reuse, particularly in garden features. They do though include a number of different sizes of hand made varieties.

All the small number of wall tiles were tin-glazed. Most of these were plain, but there were a couple of pieces of manganese swirled and a few more pieces that were blue painted.

The potential of the ceramic building materials is limited, in part probably because stone was the main building material. Most seems to be late medieval or, more probably, post-medieval in date.

*Glass* – nearly all the glass was given individual identification numbers. The small amount that was treated as bulk finds comprises late bottle glass and very late window glass. As such it has little potential.

*Building stone* – the architectural building stone that was retained derives either from the medieval abbey and was reused, or is associated with the hard garden in front of Cholmley's House. Some roofing slate was also recovered, but exclusively from later post-medieval deposits.

## **SMALL FINDS**

This covers all items that were given individual records number, for whatever reason.

This Data is summarised in Tables 7 and (Appendices 3 and 4) below.

Just over 1300 items were individually records. All the metal work has been x-rayed.

The period divisions are those used of the pottery.

## **ANGLIAN**

Only very few finds dating to the Anglian period were recovered. The most important of these was a piece of a cross head <200124502> dating to the late 8<sup>th</sup> – early 9<sup>th</sup> century (Fig. 10; Lang 2002). This came from the back fill of a pit in SSD Q1 (Context 17501) and was associated with an 8<sup>th</sup>-century copper alloy pin <200124504> and a small fragment of glass.

## **MEDIEVAL**

A small number of significant and important objects were recovered from medieval deposits as part of the HLF project. These include a jet chess piece with white metal inlay in the ring and dot motifs dating from mid 11<sup>th</sup> - late 12<sup>th</sup> century (<200024038> Fig. 8); a small jet cross with similar style of decoration (<200024038> Fig. 8); and a Scottish silver penny David II 1333-1357 <200024234> (Barry Knight *pers comm*).

A small amount of medieval window glass was found. This included plain but complete quarries, probably from a sacrificial border, and about 10 painted quarries. All of it must come from the medieval abbey. This material is too limited to have much potential but should be scanned. There is also a small amount of associated came.

Iron work was represented a numbers of nails and nail fragments. There were also some interesting copper alloy pieces including gilded book mounts/fastening and a possible box mount. Lead comprised mostly either came, off-cuts or waste,

## **EARLY POST-MEDIEVAL**

The most significant finds from this period are six jettons, mostly Nuremberg but also one French 16<sup>th</sup> century jetton.

## **LATE POST-MEDIEVAL**

By far and away the largest collection of finds came from the later post-medieval period. These cover a large range of categories, personal possessions, personal apparel (shoe buckles, coat buttons), recreation (musket balls and gun flints). Two items that are particularly rare are a mid 17<sup>th</sup>-century seal matrix cum pipe tamper <200124350> (Fig. 9) and a Russian lead flax seal dated in the 1770s <199711601> (Fig. 9) (Geoff Egan *pers comm*).

A small but interesting group is evidence for the Victorian jet working industry that was known to have been taking place on the Headland. Finds include rough-outs, partly finished but abandoned items, and complete objects such as a bead and a button.

## **SIGNIFICANCE AND POTENTIAL**

A selection of appropriate and better finds from the HLF project was selected for display in the new Cholmley's House Museum and so have already been conserved, drawn, identified and studied prior to going on permanent display. Hence the degree of information that is available at this stage about some items.

The bulk of the individually recorded material derives from importation of soil into the area of the hard garden. Although it is a fairly significant collection of later post-medieval items it evidently does not derive from use or occupation of the area. Associated with the small finds are equally large quantities of ceramics and clay tobacco pipes. Much of this material has significance in its own right (see above comment on the clay tobacco pipes), or as a group of later artefacts from an area, but little significance for the site itself.

Interrogation of the medieval deposits will be required to clarify this, but at this stage it seems likely that most of the medieval and early post-medieval finds also come from levelling-up or episodes of dumping. As an assemblage the pottery would be better looked at as part of the overall occupation of the Headland in different periods even if it has potential to provide relevant dating information.

Some of the objects are undoubtedly significant in their own right, such as the jet chess piece and the cross head fragment. It will not be until the assessment stage that it will be possible to determine how much of the material has direct relevance to the stratigraphy and interpretation of the various areas.

## **ENVIRONMENTAL** by Gill Campbell

This report covers the samples and information recovered from the 1997-2003 excavations. Previous work is covered in the 1996 assessment report (Rouffignac 1996; Wiltshire 1996).

### **1.1.1 METHODOLOGY**

Standard (flotation) samples of forty litres were taken from closely dated and well-sealed deposits where possible. In some cases the sampling of some deposits was discontinued, where previous sampling and assessment had demonstrated the poor survival or absence of charred plant remains and bone (e.g. post-holes, terraces and buried soils within the east end of the Banqueting House). Where large deposits of bone were observed large 100 litre samples were taken in order to maximise the recovery of small bones, especially fish from these deposits. If the volume of a feature was less than 40 litres, 100% of the feature was sampled.

Small numbers of samples were also taken for pollen, to determine the nature of particular deposits, for technological analysis, and mortar analysis.

Initially 10 litres of each standard flotation was floated. This was because the clay rich deposits from Whitby made flotation very difficult. Thus, rather than floating standard 40 litre samples, it was decided to float 10 litre sub-samples, assess these as to their content, and depending on the results either float the remaining sample, discard the remaining sample, or sieve the sample on 4mm mesh to recover animal bone and/or artefacts. Where charred remains other than charcoal or badly preserved cereal grain were noted all the remaining sample was floated. Where only charcoal was recovered the remaining sample was normally sieved for bone and/or artefacts. Where it was thought material preserved by anoxic conditions were present, separate samples were taken or 10 litre sub-samples retained for processing in the laboratory.

Table 9 (Appendix 5) summarises the samples taken during the excavation by site sub-division, and type.

## **CHARRED PLANT REMAINS AND CHARCOAL**

Some 200 samples were floated for charred plant remains from the HLF excavations (1997-2003). Around half of these were taken during the excavation of the interior of the east end of the Banqueting house (G45). In addition, 17 samples taken from the test pits dug in the west end of the Banqueting House (G44 and G43). The other main areas that were sampled for charred plant remains were in area Q, the evaluation of Abbey Lodge's garden (Q1), and the car park areas (Q5, Q8), and the excavation of the new electricity substation (E24).

95 flots from 10 litre sub-samples were scanned as to their content (see Section 3.5.1, Methodology - above). For each of these flots notes were made on the quality and quantity of the charred plant remains present. The amount of charcoal, cereal, chaff and weed seeds in each sample was recorded using the following four point scale: 1= present, 2=frequent, 3=common, 4=abundant. The presence of other charred material such as hazel nutshell fragments, and other remains such as small animal bones was also noted. These notes have been entered into an Access97 database (whitby97 S:/projects/490/whitby/general). Where charred remains other than charcoal or badly preserved cereal grain were noted all the remaining sample was floated. Where only charcoal was recovered the remaining sample was normally sieved for bone and/ or artefacts.

The results obtained from scanning of these samples show that although charcoal and charred plant remains are well preserved in deposits from within the Banqueting House (medieval terraces) charred plant remains in particular are only present in very low numbers. The culverts and some of the pits did produce quite large assemblages of charcoal but given the secondary nature of their fills will only be able to give a very basic idea of the types of wood used on site during the different periods.

The odd cereal grain and other remains recovered in the samples scanned to date suggest accidental loss during domestic activity. The scant remains should allow us to track changes in the types of cereal foods, and some other foods such as pulses used on the site during different periods but on the basis of present evidence no study or changes in arable economy over time will be possible. Similarly there is very little evidence for the use of wild plant resources such as peat and heathland resources; although three samples did produce fragments of seaweed (see Harvey, 1999)

Just over hundred samples still require assessment for charred plant remains. This may lead to the discovery of richer assemblages of charred plant remains

that may have the potential to answer wider questions regarding plant utilisation at Whitby. To date very few samples from area Q have been scanned so this area remains un-assessed.

## **WATERLOGGED PLANT REMAINS**

It was thought that some of the deeper deposits in the west end of the Banqueting House might contain remains that had been preserved due to permanent waterlogging (G44). The most promising sample from context 16452 (sample 11212) was evaluated to see if this was the case. A 250g sub-sample was sieved in the laboratory to 250 microns. It was found to contain only woody decay-resistant seeds and other items such as elder (*Sambucus nigra*), henbane (*Hyoscyamus niger*) and the odd fruit stone fragment. This indicates that differential preservation of remains has occurred in this deposit and no further work on these deposits is proposed. The remains that were recorded probably indicate general domestic rubbish.

One other sample was evaluated for waterlogged plant remains and insects, from a well deposit in area E24. Preservation of both insect remains and plant remains was excellent, with remains of cereals, both bran and chaff, and fragment of flax seeds plentiful. However, it was found that this material was of very recent date, 19<sup>th</sup> or 20<sup>th</sup> century. For this reason no further work on this sample is recommended

## **POLLEN**

A number of 'spot' samples were taken to check preservation of pollen in the deposits encountered. No details survive regarding five of these samples, while two were taken from 'soil horizons' to test pollen survival. These are of little use given their provenance. A single core was taken through silts infilling Whitby Abbey pond during the 2001 intervention. Pollen preservation was good and plant macrofossils were well-preserved. However, given that these deposits are relatively recent in date no further work is recommended on this material.

A pollen core was obtained from the pond excavated in 1990 by R Parish. In spite of enquires at Durham University where the work was carried out, no results have been obtained.

## **SHELL**

Four boxes of shell were recovered from the excavation. Some was handpicked while some was retrieved from samples. This group forms a useful comparison with that recovered from the 2001-2003 Whitby Cliff excavations. The material

from both these excavations would be most usefully assessed as a single assemblage to gauge the utilisation of foreshore resources at different periods.

## **ANIMAL BONE** by Polydora Baker

### **METHODS**

The Whitby HLF excavations yielded a large quantity of animal bones, which are housed in 60 standard size and 3 skull boxes. Fourteen boxes from the different excavation areas were scanned quickly in order to gain an idea of preservation, species range, and availability of metric and age data.

### **ANIMAL BONE**

The bone from all areas is in general very well-preserved and in some areas it is excellent, with little or no surface deterioration. In others there is some sign of weathering but this is not extreme. A wide range of species is present, including domestic livestock, mainly cattle and sheep/goat. Pig is less common and a few equid bones and teeth were observed. Other domestic mammals include dog and cat (skeleton in 17161). Wild species include possible deer (context 22114), rabbit and small mammals (in sieved samples).

Bird remains are present throughout the collection, including large bird, possibly goose (e.g. contexts 17601 and 17149), domestic fowl, other medium size birds and smaller species, probably passerines (in sieved samples). A few bones of very large fish are present and smaller species were observed in the samples; sample 11210 from context 16442 in particular included many fish bones.

### **THE HORSE** by Polydora Baker and Melanie Daulby

During excavations in 2001, an early 20<sup>th</sup> century horse burial was discovered in the area of the formal gardens of the Banqueting House. The skeleton was the subject of a detailed study (Daulby and Baker 2003), and one side of the animal has been mounted for display at outreach activities (National Archaeology Days 2002, 2003, Festival of History 2003). The skeleton is relatively complete and well-preserved. The position of the bones, and evidence of cutting on the upper hind limbs, shows that the horse was disarticulated, probably to allow the whole animal to fit into the burial pit. Bone measurements suggest that the animal stood c. 1.7m at the withers and comparison to skeletons of known Shires suggests that it was a type of heavy horse. The animal was probably female, as indicated by the absence of canines, and wear on the incisors suggest that it was at least 12 years of age at death. Extensive exostoses and marginal lipping were observed and there is possible evidence for the condition *spondylosis deformans*.



The reason for the burial is unclear. The horse may have been a favoured animal, perhaps belonging to Paylor's Farm, and carefully buried there. Equally, the weight of the animal would have made removal difficult, so burial in the smallest pit possible may have been the next best option. The entire skeleton, including the mounted display, is curated at the Centre for Archaeology, Portsmouth. No further work is required on the skeleton.

## **OVERALL IMPRESSION**

The availability of sieved samples will be very useful as a check against the hand-collected data for species distribution. Fusion data are abundant for the main domestic mammals, but relatively few teeth or tooth rows were observed. There is good potential for recording measurements. Given the good preservation and large size of the assemblage, it merits formal assessment in order to determine the potential of the material from the individual areas and different phases of site occupation. Species distribution, number of recordable bones/teeth, availability of age (and sex) and metric data, and bone modification (preservation and butchery evidence) should be considered.

## ***HUMAN BONE***

Four skeletons were recovered from SSD Q1. They are very fragmented and the bone is generally in a poor condition. These skeletons provide a small group for comparison with those recovered from the Anglian cemetery as part of the research excavations undertaken by K Buxton (1999-2000) (Buxton in preparation). Although, this group are likely to be Christian they are otherwise undated.

## **ANCIENT TECHNOLOGY** by Sarah Paynter

### **METHODOLOGY**

The metal working waste from selected priority contexts was examined by eye and assigned to the categories described below. In Table 10, the weight of material in each category is listed by context. A small quantity of vitreous material was allayed using X-Ray Fluorescence Analysis to gain a better understanding of its nature and possible date (for further detail see Bayley J *et al* 2001).

*Smithing hearth bottom slags (SHB)* are lumps of iron-working slag that accumulated in the smith's hearth, in the fuel bed beneath the blowing hole. SHB's have characteristic convex bottom surfaces and concave upper surfaces.

*Amorphous smithing slags* are irregularly-shaped or fragmented lumps of iron-working slag, often with a rusty appearance and containing numerous pores and fuel fragments, likely to be a by-product of smithing but lacking a well-defined SHB shape.

*Vitrified clay* can be a by-product of both smelting and smithing, since both furnaces and hearths were often partly or entirely clay built. The vitrified surface of the clay is the result of reactions that take place at high temperatures between the clay and ashes from the fuel. However other high temperature processes can also produce vitrified clay so alone it is not diagnostic of metalworking.

*Undiagnostic slag* describes waste, particularly small fragments, lacking sufficient diagnostic features for it to be confidently attributed to any other group.

### **RESULTS**

These are summarised in Table 10 (Appendix 3) see below.

### **X-RAY FLOURESCENCE ANALYSIS**

Fragments of a dense, opaque-grey to glassy-blue waste were recovered from some contexts (1.12kg from fence postholes at Abbey Lands Farm, 0.8kg from context 25154 and 6g from context 25056). Some fragments had flowed surfaces preserved from when the material had been molten. X-ray fluorescence (XRF) analysis showed that the waste was predominantly a lime-alumina-silicate that

would have required very high temperatures to melt and therefore this material is a slag by-product of a post-medieval industrial process.

## **OVERALL STATEMENT OF POTENTIAL**

All of the diagnostic waste assessed from Whitby HLF was characteristic of iron smithing and therefore it is likely that the undiagnostic waste was also produced by this process. No evidence of iron smelting was found. No complete smithing hearth bottom slags were present, although some probable fragments of these characteristically shaped slags were identified. The majority of the slag was in the form of amorphous lumps of varying size, with a diagnostic rusty appearance, containing numerous small pores and fragments of charcoal fuel. The diagnostic iron working slag (SHB slag plus amorphous smithing slag) totalled 12.2kg and 84% of this came from context 17501.

Several contexts contained many small fragments of mineral fuel. However this is unlikely to have been associated with the smithing process as the smithing slag examined contained charcoal fragments, indicating that this is what the smith used as fuel.

If any remaining contexts contain significant quantities (in excess of 100g) of slag this will be quantified. The spatial and chronological distribution of the larger slag deposits from the site will be discussed when context and phasing information is available.

## **CONSERVATION** by Karla Graham

### **FIELDWORK**

During fieldwork, English Heritage conservators provided advice and training in the packaging of finds and site specific guidelines (Cox 2000).

### **X-RADIOGRAPHY FOR SITE ARCHIVE COMPLETION**

#### **Aims of x-radiography**

To provide information for the assessment stage on the following:

- Form, typology and technology.
- The condition of all the finds (even nails) at one point in time for the purpose of commenting on burial conditions in each context and the processes of deterioration. Variations in condition across the site may reflect differences in burial conditions and processes of deterioration.

#### **Film X-Radiography**

In 2003, the remaining ferrous and non-ferrous material for x-radiography from all seasons was evaluated (visually and using realtime x-radiography). Where appropriate, finds were x-rayed.

**Total number of finds x-rayed** (provisional): 1150

**Total number of x-rays:** 114

The x-radiographs and a digital list of the x-radiograph numbers are archived at the CfA.

### **CONSERVATION FOR THE CHOLMLEY HOUSE MUSEUM, WHITBY 2002**

To note: a significant number of the objects covered in this section are not from the HLF project, but come from either The Whitby Cliff or Research Excavation.

Normally, conservation up to the site archive stage comprises x-radiography of the ferrous and non ferrous finds. However, finds that were selected for display in the new Cholmley House museum and visitor centre went beyond the site archive stage and through the full investigative conservation procedure followed by conservation for display. Many of these artefacts were excavated in the 18 months prior to the visitor centre opening. The finds included metalwork (copper alloy, iron, lead, silver and metal alloy) and antler, bone, ivory, flint, stone, fired clay, ceramic, jet, shale and glass.

The conservation of the material displayed in the museum was undertaken by Dylan Cox, an English Heritage University contract conservator based at the CfA. Full details are outlined in the conservation report on the material (Cox 2002).

The investigative conservation and conservation for display included the following:

- Visual and low powered microscope examination
- Condition assessment
- Analysis (where required)
- Treatment (where required)
- Additional packaging (to allow examination without the need for extensive handling and to minimise mechanical and chemical damage during transportation to Whitby)

Of the 148 finds that were assessed by Dylan Cox, 83% required conservation treatment. 7% of the finds were analysed as part of the investigative conservation process:

- X-ray fluorescence analysis (XRF) was used to identify alloys, inlays and coatings including the identification of tinning on a copper alloy shoe buckle (laboratory no. 9711681) and mercury gilding on a copper alloy buckle (laboratory no. 200130154). The composition of the white metal material in the ring and dot motif of a jet gaming piece (laboratory no. 200024038) was identified as tin with traces of lead.
- A Scanning electron microscope (SEM) was used to record mineral preserved organic material preserved on metalwork.

## **Condition assessment**

All the Whitby finds will be condition assessed in the assessment stage. Overall, the finds display a wide range of conditions.

The 148 finds conserved for display in the Cholmley Museum were condition assessed. These finds were specifically selected for display and are not necessarily representative of the assemblage as a whole. Overall, the finds

assessed display a range of conditions. Stability of the finds was not a factor in selection (for example, only 49% of the copper alloy finds were stable and 44% were unstable).

## **ASSESSMENT POTENTIAL**

- Material associated with the Whitby Display selection has shown a great deal of potential for investigative conservation. In particular, investigative conservation of individual items to provide technological information relating to manufacture and use.

Finds for investigative conservation will be selected at the assessment stage in conjunction with the finds specialist.

- It will not be possible to comment on the effect of the burial environment upon preservation and deterioration processes:

a) It will be difficult to establish whether the degree of preservation is the result of burial conditions or post excavation deterioration. In particular, deterioration caused by the type of storage medium used up to 2003.

Of the 49 boxes containing metalwork that was x-rayed, 55% were cardboard and therefore provided no environmental control. 45% were 'Stewart' boxes (polypropylene) containing silica gel to control the environment (to keep the relative humidity low and slow down the rate of deterioration).

b) The x-radiography was not completed at the end of each fieldwork season. As a consequence not all the material from each context was x-rayed at the same point in time. Therefore, it will not be possible to use the x-rays to compare and comment on the condition of the finds and the burial environment.

A full CfA report on the conservation is forthcoming.

## RESULTS

The following section looks at selection of the areas investigated in greater depth. Following this is an overview of how the data meets the research aims established in Section 2.2.

### **SSD H**

This comprises 6 interventions and observations made during a geotechnical survey (Dynamic Probe). The 6 trenches in area H (H1, 20, 20a, 21, 23 and 24) were all located in a modern garden to the south of Abbey House (Fig. 2; Pl. 2). This area has been known as Parlour Yard from at least the early 18<sup>th</sup> century and is recorded on the 1700 Map (Fig. 12). From east to west Parlour Yard is the third highest in a “stack/cascade” of at least 7 terraces which step down from the Long Walk (roughly at the level of the monastic precinct) into the Esk valley. These terraces and yards once formed a complex formal landscape (Clark1997)

Parlour yard is bounded to the south and west by garden walls and stands at a higher level than the present ground surfaces beyond these walls. The use of both brick and stone in the construction of these walls, and clear evidence of alterations to them, hints at the development and manipulation of this landscape since the mid 16<sup>th</sup> century (?).

To the east of Parlour Yard a bank rises sharply up to the level of the Middle Yard. A 19<sup>th</sup> century wall (containing medieval worked stone *spolia*) divides the two garden terraces. To the north the bank gives way to a stone built retaining or terrace wall (c. 28m long). The northern boundary of area H is marked by Abbey House, and a high wall in the location of the Chapel shown on the 1700 map (Fig. 12).

Initial evaluation trenches and geotechnical investigations were targeted to aid in design of a proposed car park in this location (1997, see Section 2.1 - above). This scheme was abandoned. During the spring of 2001 a new electricity supply trench was routed through area H and it proved possible to archaeologically excavate a c. 80m long trench through the area.

The first Hugh Cholmley (AD1600-1657) was constructing gardens at Whitby Abbey by 1652 although the Conservation Plan suggests a date of the 1630s (Binns 2000, 13, 115 fn 462; Clarke 1997, 10). The archaeological evidence cannot be as explicit, but does illustrate that the present Parlour Yard has been altered heavily and repeatedly from its original form.



## **MEDIEVAL TERRACE WALL**

Although several features of possible medieval date were encountered in this area the problem of residuality makes it difficult to attribute them this period (see Section 3.4.7 - above). Further work may help in clarifying this.

Amongst the earliest features encountered in N20 and H24 were the footings of a severely robbed east to west aligned wall located slightly south of the middle of Parlour Yard (Fig. 2). Dynamic probing confirmed this alignment. Whilst it was initially suggested that the wall (13053 H20 and 13256 H24) was constructed on top of an ancient turf like deposit, (13026 H20) further work pointed to the wall cutting this deposit (13260 H24, which produced a spot date of 12<sup>th</sup> -13<sup>th</sup> century). The turf layer appears to have been buried rapidly by later deposits.

The deposits to the north and south of the wall suggest it may have retained a medieval terrace. To the south up to 0.55m of medieval deposits, perhaps the make-up of a terrace survive (Contexts 13252, 13259), whilst to the north a series of sloping deposits and dumps are post-medieval in date (13257 and 13258).

This proposed terrace wall and levelling deposits were encountered in the area of deepest excavation. A few metres to the north the base of SSD H24 rested on natural clay or sandy clay (13211, 13284). There seems every possibility of that a second terrace wall lies a few metres to the north of H20.

A pronounced change in the western boundary wall of Parlour Yard, from brick to stone construction, lies close to the proposed western end of wall 13053/13256. This may independently confirm the existence of a terrace edge (Pl. 3).

## **WEST AND EAST BOUNDARIES**

Excavation of the eastern bank of Parlour Yard revealed a north - south wall (13016) retaining the Middle Yard terrace. This wall sat in a foundation trench (13055), which cut into a levelling layer (13009) containing material dating from the 12<sup>th</sup> to 18<sup>th</sup> century (an alternative function for this cut is discussed below, see Ground Level). Layer 13009 lay on top of the turf layer 13026/13260.

The top of the wall had been truncated. Wall 13016 was constructed from roughly squared sandstone blocks bonded with a yellow white mortar and a blue white mortar. This may indicate re-pointing and maintenance. Bricks were revealed on the walls truncated upper face. It can be suggested that these indicate a brick

core, or that the upper part of the wall was constructed in brick. A further length of this terrace wall was encountered to the south in SSD H21 (13049 not illustrated) and that the wall noted in the northern part of Parlour Yard is the same feature. It seems likely, but was not proven, that a path would have been provided at the top of this terrace wall.

In the south-eastern corner of H20 the lower courses of a stone structure (13015) had been built against the western face of wall 13016 (not illustrated). It was not possible to investigate how far this feature continued south beyond the limits of the trench. However a similar feature (13065) had been added to the inner face of the western wall. This was observed in SSD H20a (Fig. 3); its full dimensions remain unknown. Since these features are not bonded to their respective walls and exhibit symmetry across the north-south axis of Parlour Yard it can be suggested they had a decorative function. However, this need not rule out a structural role as well.

The eastern wall had been demolished and its footings buried creating the present bank. Spot dates from the bank deposits gave a latest date of 18<sup>th</sup> century.

## **GROUND LEVEL**

Given that Parlour Yard had functioned as a garden during the 17<sup>th</sup> century and that the structures described above are associated with this function, it is necessary to address at what level the contemporary ground surface lay? Two different ground levels may be suggested in H24. Layer 13009 may represent a ground surface at 48.27m AOD, slightly more than 0.6m lower than the present (Fig. 3). However, a level of around 48.6m AOD can also be suggested. This matches the upper surface of context 13008, a possible garden soil, and a rubble layer (13018 H20, and 13201 H24), which was interpreted as the base for a path.

It could be argued that the construction trench cut 13055 was in fact a planting trench, which ran concentric with the boundaries of Parlour Yard. Such a feature was encountered at the northern and southern ends of SSD H24 and in SSD H21. A further factor, which may suggest the lower figure, is that the rubble path make-up extends north from SSD H20, but not to the south, suggesting the path stopped at this point and belongs to a later garden scheme. It is also possible that the rubble was derived from the demolition of the eastern terrace and the raising of Parlour Yard to its present height.

## **NORTH AND SOUTH BOUNDARY**

The present southern boundary of Parlour Yard was found to be preceded by an earlier east-west wall (13236, Fig. 4) located 1.2m to the north. This wall had been partly demolished but it was not clear if the rubble deposit to its south (13263) witnessed this event or constituted makeup for a bank (The presence of a bank was suggested by sloping deposits in L1 to the south (Fig. 2: not discussed further).

To the north of the wall a construction trench (13271/13270) was partly excavated. Cutting this was planting trench (13210/13269) which had in turn been cut into a thick layer of sandy silt, context 17202, which produced a spot date of late 17<sup>th</sup> to mid 18<sup>th</sup> century.

Assuming the upper surface of the planting trench was close to the level of the post-medieval ground surface a figure of c. 28.57m AOD is indicated. This is reassuringly close to the second level proposed for a ground surface in H20.

A similar wall and planting trench was excavated to the north of H24 and appears to mark the northern extent of Parlour Yard 17.75 south of the high "Chapel" wall (13223, 13224/13273), Steps in the modern garden, overlying a deposit of interlocking stones (13232) mark the position of a low terrace (c. 0.3m high) which the northern wall sits on, raising it above the rest of Parlour Yard.

The northern wall was narrower than the southern (0.38 against 0.52 at their demolished tops). This may reflect a structural requirement. It is presumed that the southern wall supported a bank and a raised walkway, whereas the northern wall, which was built at a higher level, and cut into clay would not have needed to lend as much support to the deposits above and behind it.

## **OTHER FEATURES**

Apart from the planting trenches described above, no features suggestive of decorative planting or cutwork were encountered.

In the northern part of H24 a number of features were observed cut into the natural clay. These include a wide but poorly defined east west ditch or robbed out wall (cut 13276 Fig. 4). A stone built and capped drain (cut 13279) was also aligned east to west and sealed below a layer of re-deposited clay (13211 and 13283). Cutting into this clay was a shallow north to south linear feature (13213) that was filled with sandstone "blocks". It seems likely this was a later drainage feature although the possibility of a structural role cannot be discounted.

To the north of the northern wall and planting trench two possible robber trenches were encountered (Cuts 12338 and 13255 not illustrated). Both were aligned east to west. Of the two, context 13238, was the more convincing, it lay c. 1.8m to the north of the wall and planting trench and may tentatively be identified as the robbed out footings of the Parlour illustrated on the 1700 Map (Fig. 12). It cut a layer of re-deposited clay (13242) which produced a spot date in the range 1730 to 1820.

A number of possible post holes were encountered in the north of H24 but due to the confined trench and heavy truncation by modern and 19<sup>th</sup>-century drains (Pl. 4) little can be said about them, save they cut the natural clay and were sealed by a dump layer (13219) of 19<sup>th</sup>-century date.

No trace of the Chapel, floors or foundation trench, were discovered. However a watching brief at the northern end of H24 (January 2004) observed that the present east wall of Abbey House (post 1860) was built on a wide stone foundation (13295). It was not possible to ascertain if this footing was medieval (The Chapel), or part of the late 17<sup>th</sup>-century house.

## **OVERALL IMPRESSION AREA H**

Early features in area H appear to have an east to west alignment, although it is not clear if the proposed early terrace wall is actually medieval. There is a possibility that this terrace may have a functional relationship with a medieval southern access route proposed by Mark Corney (Clark 1997; part 2, 8) and features excavated by Tony Wilmott during 1994 (Wilmott 1996). However it would be difficult to resolve this without further fieldwork in both the Parlour and Drying Yards.

It has so far proved difficult to tie the construction of features in the Parlour Yard to a named historical individual. The first Hugh Cholmley is possible and work may have begun before the civil war. However his sons William (1625-1662) and Hugh (1632-1689) may have had a hand in the refinements to Parlour Yard. Hugh II is generally credited with most of the work, but this seems rather too simplistic a model. Later Cholmleys, Hugh III (Grandson of Hugh II, 1685-1722) and Nathaniel (1721-1791) are also likely to have been "busy in the gardens" at Whitby.

Stylistically there are clear similarities between the proposed walled garden and other historic landscapes. To take one example, the terraces in the Great Garden at Kirby Hall bear a startling similarity to the eastern retaining wall and later bank in Parlour Yard (Dix *et al* 1995, 315-26). The two symmetrically disposed features

noted above (Contexts 13015 H20 and 13065 H20a) could even be reconciled with the foundation plinths to support statues or ornaments (Dix *ibid*). The creation and remodelling of the Great Garden is attributed to c. 1610-20 and c.1685-1694 respectively (Dix *ibid*).

The construction and remodelling of Parlour Yard may lag behind these dates by as much as 20 years but broadly follow the same trends - Compartmentalising the landscape then opening and softening it. Only further careful work on the dating and sequence of construction and remodelling in Parlour Yard can refine this.

A later parallel can be drawn between the flight of terraces in which Parlour Yard stands and recent discoveries in Greenwich Park (Pattison 1998, 42). Here during the 1661 works included the construction of a flight of Giant Steps or Ascents that are reminiscent of the present banks between the Long Walk, Middle Yard and Parlour Yard. Hugh II was a courtier at this time, and it seems likely that the polite landscape and buildings of contemporaries influenced him.

## **SSD N25**

Area N comprised both Inner and Outer Courts to the north of the Banqueting House. The Courts were assumed to be solely the work of the second Hugh Cholmley, 1632 – 1689, and linked to the building of the Banqueting House.

No less than 31 different Site Divisions were opened in area N, however, the vast majority were either evaluations or both small scale and excavated to a limited depth. Taken as a whole the interventions describe and date the construction, use and abandonment of the Courts.

The Inner Court, which was restored as part of the opening of the visitor centre, is better understood than the Outer Court, which, after evaluation was protected and re-turfed (See CfA Project Design 619R for a summary of the Outer Court). A number of interventions, N12, N20, N21, and N25, N27, N28 and N31 did establish the presence of pre-1670s archaeology, medieval terrace levels and the natural clay.

N25 was the designation given to the Inner Court during its restoration, and covers archaeological records made during this process between June 2001 and March 2002. Opportunities arose to investigate a number of areas in more detail, and it is proposed to discuss two of these areas below.

## **THE INNER COURT**

The Inner Court comprises six distinct structures; the cobbled courtyard, the raised walkways, the central statue base or plinth, the dividing wall and gateway from the Outer Court, a shallow trench immediately in front of the Banqueting House - the architectural feature - and the robbed out remains of a shallow flight of steps in the centre of the southern part of the court (Fig. 12). The preservation of these structures was such that once defined it was possible to restore them as fully as resources and the evidence allowed.

The two courts were separated by a low stonewall, the "dividing wall". The 1700 map (Fig. 12), suggests the presence of railings on top of this wall. As originally constructed the Inner Court could only be entered from the north via a central gateway in the dividing wall. The main northern entrance to the Banqueting House was the only southern route from which to enter or leave the Inner Court. No evidence of alternative access routes was uncovered.

Raised walkways were arranged around all four sides of the c. 33m square, cobbled yard or court (12053, 21367, 21481, 21487) and were only broken by the northern entrance described previously. The raised walkways were surfaced with alum shale. The walkways added a further c. 10.5m to the overall dimensions of the court.

An unpaved band, c. 0.9m wide, (21368, 21443, 21452, 21470), separated the cobbled surface from the dwarf retaining walls of the raised walkways (interrupted by the northern entrance and the base for centrally placed steps to the south). This was cut by trenches robbing the dwarf walls down to their lowest or foundation courses (Pl. 5 and Pl. 8). It seems likely that the unpaved bands may have been planting beds and contemporary with the latest formal scheme in the gardens. As part of the restoration this marginal strip was paved.

## **NORTH WESTERN AREA N25**

Excavation of the unpaved strip in the north-east corner of the Inner Court uncovered evidence of an earlier garden scheme/design. The robbed out remains of the dwarf wall retaining the northern raised walkway was observed to butt an earlier structure, context 21376, which protruded slightly beyond the southern face of the dwarf wall (21369).

Removal of the clay and mixed shale-sand make-up of the raised walkway (Fig. 5, contexts 21381 and 21394) revealed a stone faced and rubble cored rectangular structure (Pl. 7, contexts 21376, 21392). Only one course of this structure survived. The make-up material also sealed a level layer of alum shale (Fig. 5, context 21433).

Taken together these two elements point to an earlier and lower level for the northern walkway and the survival of the bottom tread of a set of stone steps which led up to the western raised walkway. Further observations confirmed that the structure of the steps rested on the footings of the dwarf wall retaining the western walkway (context 21363). It was not possible to recover the relationship between the step structure and the dividing wall (21366); this had been destroyed by robbing, contexts 21431/21432 (Pl. 7).

The earlier alum shale path did however seal the construction trench of the dividing wall (21436/21437). A seal matrix cum pipe tamper signet ring pipe tamper (SF200124350) (Fig. 9) of mid 17<sup>th</sup>-century date was found in this deposit.

## **NORTH EASTERN AREA N25**

A small trench was opened in the north-eastern corner of the Inner Court in order to test these results and to investigate the presence of symmetry in the projected earlier garden design. This proved to be a valid assumption and a further set of symmetrical disposed was discovered

Here, the steps linking the eastern raised walkway (context 21479) had been buried by a layer of clay, (context 21477) (see Pl. 6). An earlier, and lower layer of alum shale (context 21480), was also observed running up to and sealing the base of the lowest step.

The southern part of these steps had been heavily disturbed by a later north-east to south-west drain, (contexts 21466/21467). This drain was also observed running up to the dividing wall in SSD N14, which lay adjacent to the east (deposit 21145).

It could not be ascertained if the raising of the alum walkway and the construction of the drain were contemporary events. However, it seems likely that the raising of the northern walkways and construction of drains were both responses to flooding; a problem which still affects lower parts of the Inner and Outer Courts.

## **OVERALL IMPRESSION AREA N**

If we accept such a functional reason for the alteration of the Inner Court when did it occur? At present the best evidence is the 1700 map (Fig. 12) which points to a period improvements to the Banqueting House-Abbey House complex and the gardens.

Only a combination of historical research on the Cholmley family archives and finessing of the archaeological dating of the Inner Court can supply this information. Further investigation of the seal matrix cum pipe tamper, which carries the initials A. R. may also prove rewarding and help to name an individual associated with the construction of the gardens.

In concert with further work on area H it should be possible to define a second phase of building and perhaps changing expectations and requirements in the landscape of the Whitby Abbey Headland.

## **SSD Q1 AND SSD Q5**

Site Sub Divisions Q1 and Q5 produced the best evidence of early settlement encountered during the HLF work. This comprised a dense scatter of postholes (83 in Q1 and 43 in Q5), 8 large pits/pit groups and 4 inhumations (Fig. 6).

Both trenches lay to the north of the wall and gate of the 17<sup>th</sup>-century courts on Abbey Plain (Fig. 2). Q1 was defined by the curving boundary of Abbey Lodge's garden wall. Q5 was a raised grassy knoll, broadly triangular in shape. Both areas were excavated ahead of creating a vehicle turning area and a flat paved area in front of the main entrance to the 17<sup>th</sup>-century courts.

Whilst it was possible to totally excavate SSD Q5 (approximately 28m<sup>2</sup>) the requirements of site access and storage meant that Q1 was evaluated then partly excavated over several years to different horizons. Only the north-eastern corner and an area to the west of Abbey Lodge was totally excavated (c. 130m<sup>2</sup>).

Limited analysis permits a number of clearly defined activities be defined in SSD Q1 and Q5.

## **POST HOLE STRUCTURES**

Earliest appear to be a considerable number of post holes Based on early phasing it is possible to suggest 4 buildings (Fig. 6 - A, B, C and D; Pl. 10).

A group of post holes in the north east corner of SSD Q1 clearly form a right angle suggesting a building. This alignment may continue to the north in Q5 establishing a north - south alignment for this structure's long axis. To the immediate west of this "building" two short linear features may be an eaves drip or, conceivably, a building trench belonging to a post in trench built structure. This feature was not observed in Q5.



To the west in Q1 two distinct groups of post holes suggest further buildings (Fig. 6 B and C). It is probable that the entire plan of one structure was recovered (C) and that its north-western wall was identified as using the post in trench construction technique. These two structures would appear to be on a roughly east west alignment, perpendicular to the first structure described.

In Q5 there was a great deal of inter-cutting between post holes but the overall impression is of least one structure. Due to the limited area excavated it is impossible to be certain what this structure's orientation was, and if it had a relationship with the first structure (A) discussed which may be present in both Q1 and Q5. Further work on the stratigraphic sequence of the inter-cutting post holes may help clarify this.

## **PITS**

Of the eight features identified as pits two were composed of inter-cutting features that proved difficult to separate (due in the main to evaluation followed by excavation and the similar nature of the deposits backfilling them).

Three had no stratigraphic relationship with the post hole groups and lay to their south-west. The most westerly of these (I) contained material as late as the 15<sup>th</sup> century, adjacent to the east, pit (II), produced a spot date of 13<sup>th</sup>/14<sup>th</sup> century and the third contained no datable material. During excavation these features were "felt" to be early and produced pre-conquest material, including a fragment of 8<sup>th</sup>-9<sup>th</sup> century cross (pit II, <200124502>), domestic and industrial waste. However, this can now be questioned. The Anglian material appears to be residual.

Pit IV lay between Buildings B and C and contained no datable material, but cut the earlier post holes.

Two inter-cut pits in the south-east corner of Q5 (V) (Pl. 11) had a somewhat equivocal relationship with a post hole, but both contained material dating to the 8<sup>th</sup>/9<sup>th</sup> century.

Overall it seems likely that the pits in Q1 are medieval and their backfill incorporates earlier material. The pits in Q5 however appear to be pre-conquest in date.

## **LINEAR**

A linear feature running north-west – south-east across Q1 may have originally been a wall footing or a drainage feature. A small (0.78m x 0.72m) roughly

square chamber, constructed in stone with clay bonding (?) was located in the south-eastern part of the linear. This had been truncated by re-cutting the feature. The backfill of the re-cut produced a spot date of 12<sup>th</sup> to 14<sup>th</sup> century.

This feature cut the possible eaves drip of Building A, and a post hole at the east of Building C.

## **GRAVES**

Four inhumation burials were located in the angle between Abbey Lodge and the northern wall of the 17<sup>th</sup> century gardens and two were truncated by the building of this wall (Pl. 12). All four shared the same north-west to south-east orientation, with the skeleton's heads in the traditional Christian position to the west. The south-western grave was truncated by a complex sequence of re-cut linear features, which were earlier than the 17<sup>th</sup>-century boundary wall.

No grave goods or physical evidence of coffins or shrouds was recovered, but the soil "ghost" of a coffin (22154) was observed in grave 22156.

## **OVER ALL IMPRESSION AREAS Q1 AND Q5**

SSDs Q1 and Q5 clearly show evidence for potential of medieval and perhaps pre-conquest activity at Whitby Abbey. However there remains much work which could be done.

The post hole structures described bear a strong similarity to buildings excavated on the early Anglian monastic sites of Hartlepool and Whithorn (Daniels 1988; Hill 1997). However there is little evidence, save form, to attribute them to this period.

Unfortunately the quantity of early material recovered from secure contexts is very low. In Q1 only 22 deposits contained datable ceramics. Of these 22 there are: 3 early medieval or earlier, 3 medieval and 16 post-medieval. Q5 fares even worse, only 7 deposits were spot dated; 5 early medieval or earlier, 1 medieval and 1 post-medieval. The "distressing Anglo-Saxon tendency of not having finds sufficient well associated within [structures]" is well illustrated (Daniels *ibid*, 206). The residual nature of much of the Anglian material in the backfill of pits has already been touched on above and discussed by Jennings above (Section 3.4.7).

However, a more rewarding avenue for further research may be found in comparing the meagre collection of material from the HLF work with that of the 1920s excavation. The lack of "early" stone buildings encountered during this

work may be significant in light of recent reinterpretations of the site (see section 1.6 above and Peers and Radford 1943, Rahtz 1976; 1995).

Wilmott stresses the importance of an early (8<sup>th</sup>/9<sup>th</sup> century) terrace discovered in SSD F1 during the 1995 evaluations (Wilmott 1996). The leading edge of a low terrace on a similar alignment was encountered in both Q1 and Q5. Further analysis of this feature may help in further understanding the buildings encountered.

Finally, the relative lack of features either cut by the graves or cutting them suggests the presence of a boundary or some form of marker as to their position. But again the manifest (and reassuringly Christian) lack of associated material makes dating these inhumations impossible. The possibility that they are “early” can not be ruled out.

## **OVERVIEW OF ACADEMIC GOALS**

Given the constraints on fieldwork it has not been possible meet some of the project's Research Aims (Section 2.3). However the existing archive does permit the majority of research aims to be investigated further.

The evidence of pre-conquest occupation in Q1 and Q5 clearly meet Aim PC 6, (The late Saxon to Medieval period) in a limited fashion. That this occupation takes a very different form to that recorded during the 1920s excavations, but bear a strong resemblance to sites of a similar date and type is significant.

Considering previous work at Whitby and the level of residuality in the HLF artefact assemblage it is tempting to suggest the structures excavated in the 1920s do not belong to an Anglian phase. The finds are residual. However, the material recovered from Q1 and Q5 although similar to the 1920s collection was not as extensive nor as rich, begging the question are we comparing like with like? Work in area Q should be integrated with the results of the excavations of the east cliff (Jennings *et al* in preparation)

Evidence of developments in the abbey during the medieval period was in the main limited to SSD G45, where a complex sequence from the 11<sup>th</sup> century to the 20<sup>th</sup> was uncovered (Pl. 1). Further work on a postulated change in building alignment in the east of G45 is likely to be rewarding and may link to the sequence identified by Wilmott during evaluation of the abbey precinct (Wilmott 1996).

The development of terraces in the medieval period is evidence of the developing landscape. Good evidence of the location of medieval terraces was observed in SSDs G45, H20 and N28. Drainage, in the form of stone lined culverts, is another avenue through which the medieval landscape could be explored (H24, G45, G57, N27, R5?).

The transition from medieval to post-medieval traditions, PC7, was inferred from many of the interventions but more rarely directly observed. Once again much useful data was collected in the Banqueting House, G45, but limited excavation and the desire to preserve the latest historic layers, and not investigate the immediate post-dissolution use of the site limits potential further work.

The presence of demolished buildings, forming the raised verge and path along Abbey Lane, clearly represents part of a changing post dissolution landscape (Q4 and Q6). But little potential for further work exists.

An earlier landscape, elements of which include gardens and garden structures, was glimpsed in SSDs G45, G46 (east), H20, H24, N25, P1, P3, P4, P5 and P7. Generally there is little evidence to build upon, and the little that exists is fragmentary. The abbey ruins and location of the Banqueting House and gardens can be extrapolated backwards in general terms to indicate the continued use and development of the site in the 16<sup>th</sup> and 17<sup>th</sup> centuries.

Copious quantities of post-medieval pottery and artefacts attest to the influence of the Industrial Revolution (c.1700-1850), PC8. As has been suggested above (Section 3.4.7) this material has significance in its own right, as an assemblage from this period.

Regarded from a historical perspective the construction of the Banqueting House and associated landscape are evidence of the growth of industry. The Cholmley family began the direct exploitation of costal alum deposits in the early 1650s (Binns 2000). While further research would be required to quantify how important a source of income this was during the later 17<sup>th</sup> century, it seems likely to have helped fund the extravagance of the New House, gardens and courts.

Can the use of alum shale to pave the raised walkways of the Inner Court be seen as both a practical solution and symbolic of the fount of seigniorial wealth? Given that the Yorkshire alum industry flouted a papal embargo and exported alum to the continent, yet more layers of symbolism could be suggested (Rosalind Barker, *pers comm*).

Returning to the more practical level, the use of brick in the construction of the Banqueting House and the walls of garden compartments indicates changing attitudes to materials and their use. The use of brick in the Banqueting House was concealed, where as that in the gardens is overtly displayed and embellished with stone dressings (Pl. 3). Materials appear to have been an important medium of display and not just used in construction.

Finally the glazing of Hugh It's New House would have required a large amount of glass, be it quarries or larger pieces. By introducing new skills and uses of materials in the 1670s did Hugh II presage the wider influences of the industrial revolution?

Clearly the establishment of a monastery on the headland in the 7<sup>th</sup> century had a major impact on the surrounding landscape and population (H4 The Impact of Christianity). However, unequivocal evidence of this is much more difficult to detect. Artefacts with an overtly Christian nature, such as a fragment of Anglian stone cross, and later medieval jet crosses were recovered, but there was little opportunity to explore the potential of a changing landscape. The 4 Christian (?)

graves excavated in SSD Q1 are a further maker of the site's Christian heritage and use.

Evaluations to the south of the abbey (Wilmott 1996) and the results of other Whitby Headland projects are better suited to meeting this aim.

Aim T1, Settlement hierarchies and interactions, is also difficult to explore using the HLF data set.

Finally the gardens, aim L2, were addressed directly. Whilst it is difficult at the present stage of work to see all of this landscape in sharp focus there is a great deal of potential for further research and comparison. A joint approach utilising historic sources, landscape survey and excavation results is likely to help in developing a narrative.

Early, pre-restoration gardens may have detected; structure 25141, P1 (Fig. 7, Pl. 9), seems likely to be the footings of a gazebo or banqueting house of late 16<sup>th</sup> century date. The detailed development of the later 17<sup>th</sup>-century landscape is well represented in the archive and with further work can be used to expand our understanding of the garden sequence and symbolism as a whole.

## OVERALL STATEMENT OF POTENTIAL

While limited in area there is potential for further work on the small sample of pre-conquest archaeology examined. It forms an important link between evidence of Anglian settlement on the cliff (Jennings *et al* in preparation) and burial south of the abbey (Buxton in preparation). It may also be possible to question the nature of the artefacts recovered during the 1920s excavation and compare settlement at Whitby with other sites of a similar period.

The very limited nature of evidence pertaining to the medieval abbey was recovered. While its presence directly influenced later activity and destroyed earlier evidence it is of limited value in understand the medieval monastery. With the exception of one area, G45, there is little potential for further work.

More positive evidence of post-medieval buildings and gardens exist. Improving our understanding of the creation and abandonment of the formal gardens and development of the Courts is possible and would add to both regional and national studies in garden archaeology. However, this would require the contributions of both historians and experts in garden archaeology.

## **APPENDICES**

### ***APPENDIX 1 CHRONOLOGY OF INTERVENTIONS AND RECORDING***

1996	SSD G 1-10, SSD G 11-25, Dynamic probe under Jenny Stopford Project Design.
January 1997	Car-park evaluation (Project 594)
1997	Conservation Plan
Autumn 1997	N1-9, initial evaluation of Courts H1, Bank in Parlour Yard H2-19 Geotechnical Cores Parlour Yard H20 Extension of H1 H20a Extension of H20 to west, deep not a lot found
1998	H21, Building in eastern bank of Parlour Yard, southern end H22, Evaluation of southern wall and bank L1 Evaluation in The Ramp Proposed Car Park on Parlour Yard abandoned G40, Clearing of overburden in the Banqueting House (Re-start) mini digger used
September 1998	N10 Inner Court Clearing
Autumn 1998	SSD Q1 Evaluation
1999	Outer Court Evaluation
Spring 1999	Courts Protected
March 1999	SSD G41 and 42, Window opening SSD G43 and 44 Deep test pits, west end Banqueting House



Summer 1999	Building Southern Visitor Entrance Evaluations around Abbey Lands Farm E-E24? Research Excavation, season 1 Old Pay Perimeter removed
Autumn 1999	G45, excavation in Banqueting House begins
2000	G45, some Post Excavation Work (Record checking digitizing)
Spring 2000	N11-18 Work in Outer Court
June 2000	HLF Contract begins (Original estimate 64 weeks) SSD N14, Dividing wall between courts SSD G46, Old Vault SSD R1, West Façade of Banqueting House SSD G46, West interior banqueting House
August 2000	SSD P1, Bridge Abutment SSD Q2 and Q3 Evaluations Abbey Plain
September 2000	SSD G46, R2 and R3, Piles and Underpinning SSD P2 Old Pay Perimeter SSD Q4 and Q6, Evaluations Abbey Lane
October 2000	SSD Q1 Excavation
December 2000	SSD Q5 Excavation SSD Q7, Watching Brief on Abbey Lane
January 2001	SSD G 87, Drain in court behind the Banqueting House

	SSD Q1 and Q5 Finish
February 2001	Building recording begins
	SSD P3-6, pond evaluation (P6 Environmental sample)
March 2001	SSD N20,
	SSD H24 Service trench in Parlour Yard
	SSD Q8, Q9, Q10, Q80 and Q81
April 2001	SSD N21, Service trench in inner and Outer Courts
	SSD G118, Service trench southern area of Old Vault
June 2001	SSD N 22, 23, 24, test holes in road along east side Courts
	SSD N25 Inner Court restoration and recording begins
September 2001	SSD R4, Service trench west façade Banqueting House
	SSD N27, French Drain East side Courts
	SSD G123, French Drain Old Vault and behind Banqueting House
October 2001	SSD N25 Courts restoration and recording
November 2001	SSD Q7, Pond excavation/clearing
December 2001	SSD N25, Courts restoration and recording
	Watching Briefs in topsoil Area F and P
January 2002	SSD R5, R6 and R7, catering area, west side Banqueting House
February 2002	SSD Q1, Skeletons
March 2002	Visitor Centre opens
June 2002	SSD P8 and P9

November 2002	SSD N28, N29, N30 and N31, Drainage improvements and resurfacing Inner and Outer courts
January 2004	Watching brief H24, Parlour Yard

## **APPENDIX 2 CENTRE FOR ARCHAEOLOGY PROJECT DESIGNS**

<b>Project Design</b>	<b>AIMS</b>	<b>Areas/SSD</b>
619A	To contribute towards a better understanding of the paleogardens to the north of the Banqueting House, Whitby Abbey and to inform the plans to reconstruct these gardens.	N1, N2, N3, N4, N5
619B	To fully realise the archaeological potential of the area designated for the development of a link road from the proposed car park to the rear of Abbey House in the area of the Abbey House gardens known as the Parlour Yard, to the new public car park to the south of the Abbey.	D, E, H, L
619D and E	To fully realise the archaeological potential of the area designated for the development of a Link Road from the rear of Abbey House to the new public car park to the south of the Abbey and a new Car Park in the area of the Abbey House gardens known as the Parlour Yard.	A, B, H, L
619F	To contribute towards a better understanding of the gardens to the south of Abbey House and to define the historic limits of Parlour Yard.	H
619G	To contribute towards a better understanding of the gardens to the south of Abbey House and to define the historic limits of Parlour Yard. (Eastern boundary)	H
619H	To contribute towards a better understanding of the development of the area to the north of the Old House (Abbey House), the construction, use, and disuse of Hugh Cholmley II's New House (Banqueting House).	G 40
619J	To contribute towards a better understanding of the gardens to the south of Abbey House and their historic limits.	H 20- 22
619K	To contribute towards a better understanding of the seventeenth century gardens of the Inward and Outward Courts, to the north of the Banqueting House, Whitby Abbey development of Abbey Plain to the north the gardens, to inform the plans to consolidate these gardens Primary objectives.	N10, N11, N12, Q1

619L	To contribute towards a better understanding of the development of this area of the monastic precinct and Whitby House. In particular to investigate the function of the medieval buildings underlying Abbey House and the date of an apparent change in the alignment of these buildings during the Medieval period.	G45, G46
619M	To archaeologically excavate the areas of the Old Vault, High and Middle Yards threatened by the works associated with the construction of a bridge between the New Visitor Centre within the Banqueting House and the Abbey. To investigate the relationship between the Old Vault, Cloisters and their associated Ranges, and the High and Middle Yards of the post-medieval garden and the function of these areas. This contributes towards a better understanding of the development of the medieval monastery, the Abbey House complex of buildings and their associated gardens. (Never Happened)	P1?
619O	To excavate vegetation and sediment from Abbey Pond and restore it as an environmental and visual amenity within the current pay parameter of Whitby Abbey, without disturbing archaeologically significant deposits.	P7
619P	To determine the nature of the foundations of the Banqueting House and to contribute towards a better understanding of the development of this area of Abbey Headland.	G43, G44
619Q	To archaeologically excavate the areas of the Old Vault, High and Middle Yards threatened by the works associated with the construction of the New Visitor Centre within the Banqueting House and to help develop a long term management strategy for this area of the Headland. Also to contribute towards a better understanding of the development of the medieval monastery, the Abbey House complex of building and associated gardens.	Generic for areas N, G, P, Q
619R	To contribute towards a better understanding of the seventeenth century gardens of the Inward and Outward Courts, to the north of the Banqueting House, Whitby Abbey and their development, so as to inform the plans to consolidate these gardens and the route of new services to the new visitor	N14, N15

	center.	
619T	To evaluate the archaeological deposits and structures between Abbey Lane and the perimeter wall of Whitby Abbey, to the south of Abbey Farm and determine the founding depth of the wall and road.	Q4, Q5, Q6 (Q5 reallocated)
619U	To evaluate and date the archaeological deposits and structures within Abbey Pond with a view to determining it's archaeological significance. To advise the Inspector of Ancient Monuments on how much sediment can be removed from the pond, and on methods for its removal	P3, P4, P5, P6
619V	To evaluate the archaeological deposits and structures between Abbey Lane and the perimeter wall of Whitby Abbey, to the south of Abbey Farm and determine the founding depth of the wall and road.	Q4, Q6 Q7
619W	To archaeologically excavate and record any deposits disturbed by the restoration of the formal gardens to the north of Banqueting House.	N27, G123
619X	To archaeologically excavate service trenches for the installation of services to the New Visitor Centre within the Banqueting House and to advise the Inspector of Ancient Monuments, which walls, structures, deposits should be left <i>in situ</i> .	N21, H24, G87 D, I, M
619Y	To archaeologically excavate and record the route of the Permissive Footpath between the New Car Park and the Tea Rooms.	D, J, I, M
619Z	To archaeologically excavate areas placed at risk by the installation of drainage runs and to carry out a close watching brief in less sensitive or previously excavated areas. To advise the IAM which walls structures and deposits should be left <i>in situ</i> .	N28, N29, N30, N31

## **APPENDIX 3 TABLES**

**TABLE 7. Small Finds By Material**

Alloy	14
Amber	1
Antler	1
Bone	25
Ceramic	13
Copper alloy	236
Fired clay	5
Flint	130
Glass	427
Granite	1
Iron	531
Ivory	2
Jet	40
Lead	459
Lead + other metals	3
Leather	2
Pipe clay	29
Plastic	1
Pottery	1
Silver	2
Slate	1
Stone	35
Tile	1
Wood	2
Unknown	2
Mixed/misc	11

**TABLE 8. Small Finds by Type**

Antler, off cut	1
Architectural stone	16
Bar, iron	32
Bead	6
Binding	1
Blade	13
Bolt	7
Book clasp	1
Bottle, glass	49
Buckle	6
Button	21
Came	483
Coins	16 + 7 jettons
Clay pipe stems and bowls	29
Counter	9
Cross head	1
Crucible	4
Dolls leg	1
Domestic, household	34
Domestic, personal	27
Domestic, structural	22
Domestic, small craft	20
Domestic, sport and games	21
Domestic, misc	3
Domestic, transport	7
Domestic, trade	2
Fittings	8
Jet, working waste/natural	36
Miscellaneous	14
Mounts	1
Nails	451
Objects	34
Pins	112
Sherds	4
Sheet	55
Spring	10
Strips	53
Structural fittings	2
Structural, stone	1
Tacks	7



Tools	7
Unidentified/corrosion/lumps	206
Utilised stone	6
Vessel and bottle glass	72
Window glass	317
Waste/off cuts	280
Wire	27
Worked flint	65



Q8	1	-	-	-	-	-	-	-	-	-	-	-
Q10	1	-	-	-	-	-	-	-	-	-	-	-
R1	-	-	2	3	-	-	-	-	-	-	-	-
R5	5	4	-	-	-	-	1 'spot'	-	-	-	-	-
<b>TOTAL</b>	<b>193</b>	<b>8</b>	<b>2</b>	<b>20</b>	<b>5</b>	<b>2</b>	<b>2</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>4</b>

**Table 10. The Weight of each Type of Metal Working Waste (g) by Context for the Slag Assemblage**

Box	Context	SHB fragments	Amorphous smithing slag	Vitrified clay	Undiagnostic
152	17101			7	
	17115	94	69		25
	17148				27
	17149	22	102	4	
	17161				6
	17166	37	339	26	
	17167	225			
665	17276	123			67
	17297			8	
	17343				9
609 and 665	17398			57	6
665	17407				88
	17467				8
	17500				10
609 and 665	17501	2558	6857		9
609	17506	242	221		
665 and 609	17508			49	
665 and 609	17510		299	23	31
609	17563				206
	17568				23
367	22008				20
	22018				36
665	25101				116
	25111				11
	25180			100	
	25200				24
	25204			95	371

25209	82	13
25218		77

## BIBLIOGRAPHY

- Bayley, J, Dungworth, D, and Paynter, S 2001 *Centre for Archaeology Guidelines: Archaeometallurgy*, London: English Heritage.
- Binns, J 2000 *memoirs and Memorials of Sir Hugh Cholmley of Whitby, 1600 to 1657*, Leeds: Yorkshire Archaeological Society
- Briggs, S 1999 'Aberglasney: The Theory, History and Archaeology of a post-medieval landscape' *Post-medieval Archaeology* **33**, 242-284
- Brook, E, Jennings S, and Wilmott, T 2004 *Site 594*, Unpublished English Heritage Report
- Brooks, C 1987 *Medieval and later pottery from Aldwark and other sites. Archaeology of York, The Pottery* **16/3**. York: CBA
- Buxton, K in preparation, *Research Excavation at Abbeylands Farm, Whitby Abbey*, English Heritage
- Carver, M 1993 *In Search of Cult: Archaeological Investigations in Honour of Philip Rahtz*, Woodbridge: Boydell and Brewer
- Clark, K 1997, *Whitby Headland Project, Conservation Plan*, English Heritage Report
- Cox, D 2000, *Some guidelines for the excavation, processing and storage of human bone from Whitby Abbey*. Unpublished English Heritage Report
- Cox, D 2002, *Conservation Report. Report on the conservation and analysis of a variety of materials selected for display at the new Cholmley House Museum, Whitby, North Yorkshire*. Unpublished English Heritage Report
- Cramp, R 1976 'Analysis of the finds register and location plan of Whitby Abbey', in Wilson (1976), 453-457
- Cramp, R 1976b 'Monastic Sites', in Wilson (1976), 201-252
- Cramp, R 1993 'A Reconsideration of the Monastic Site of Whitby', in Spearman and Higgitt (1993), 64-73
- Daniels' R 1988, 'The Anglo-Saxon monastery at Church Close, Hartlepool, Cleveland', *The Archaeological Journal*, **145**, 158-210
- Daulby, M, and Baker, P 2003, *An early 20th-century horse skeleton from Whitby, North Yorkshire*. Unpublished English Heritage Report
- Dix, B, Soden, I, Hylton, T 1995, 'Kirby Hall and its Gardens; Excavations in 1987-1994', *The Archaeological Journal*, **152**, 291-380
- English Heritage 1991, *Management of Archaeological Projects* (2<sup>nd</sup> edn), London: English Heritage
- English Heritage 1997, *English Heritage Archaeology Division Research Agenda, Draft*, Unpublished English Heritage Report
- English Heritage 1998 *Exploring Our Past*, London: English Heritage
- English Heritage 1999 *Centre for Archaeology Draft Recording Manual*. Unpublished
- Goodall, J 2003 *Whitby Abbey Guide Book*, London: English Heritage

- Harvey, E 1999 *Assessment of plant remains from Whitby Abbey Excavations*, Unpublished English Heritage Report
- Hayes, R 1980 'Medieval pottery kilns on Ruswarp Bank, near Whitby'. *Whitby Literary and Philosophical Society Annual Report*, 25-30
- Higgins, D 2001 *Clay tobacco pipes and wig curler from Whitby*. Unpublished report.
- Hill, P 1997 *Whithorn and St Ninian; The Excavation of Monastic Town, 1984-91*, The Whithorn Trust/Sutton publishing,
- Hoey, L R 1995 *Yorkshire Monasticism: Archaeology, Art and Architecture, From the 7th to 16th Centuries*, London: The British archaeological Association
- Holdsworth, J 1978 *Selected pottery groups AD 650-1780. Archaeology of York, The Pottery 16/1*. CBA: York.
- Hunter, D, and Grieveson, K, 1990, *Abbey Pond, Whitby Abbey, North Yorkshire: Evaluation and Environmental Survey*, Yedingham: Landscape Research Centre Unpublished Report
- Hurst, J G 1976 'The pottery' in D M Wilson (ed) *The archaeology of Anglo-Saxon England*. London: Methuen, 283-348
- Hurst, J G, Neal D S, van Beuningen, H J E 1986, *Pottery produced and traded in north-west Europe 1350-1650*. Rotterdam Papers VI. Boymans-van Beuningen Museum, Rotterdam
- Jennings, S, Muldowney, E, Wilmott, T *In preparation, Rescue Excavations on Whitby Abbey Headland*, English Heritage
- Jennings, S 1981, 'Eighteen Centuries of Pottery from Norwich', *East Anglian Archaeol* **13**
- Jennings, S 1992 *Medieval pottery in the Yorkshire Museum*. York: The Yorkshire Museum
- Jennings, S, and Redknap, M forthcoming, 'The pottery from the Dissolution deposits of the Great Drain and other features', in *Excavations at Barking Abbey*, [formerly Passmore Edwards Museum Monograph Series **2**]
- Johnson, M 1989 *Whitby Abbey Evaluation, Assessing Disturbance Caused by the Construction of a Visitor Facility*, Yedingham: Landscape Research Centre unpublished report
- Johnson, M 1993 'The Saxon Monastery at Whitby: past, present and future', in Carver (1993), 85-89
- Lang, J 2002 *The corpus of Anglo-Saxon stone sculpture, Vol VI: Northern Yorkshire*, London: The British Academy
- Lee, R 1997 'Whitby Abbey Headland Project Conservation Plan, Annex One: Significance. Part 1: The Banqueting Hall', in Clark (1997)
- Pattison, P 1998 'Giant Steps: fieldwork in London's Royal Parks', In P Pattison (1998), *There by Design: Field Archaeology in Parks and Gardens*, BAR, British Series, **267**, 39-46
- Pearce, J, and Vince, A 1988 *A dated type-series of London medieval pottery. Part 4: Surrey Whitewares*. Museum of London and London and Middlesex Archaeol Soc.

- Peers, C, and Radford, R 1943 'The Saxon monastery at Whitby', *Archaeologia* **89**, 27-88
- Rahtz, P 1962 'Whitby 1958', *Yorkshire Archaeological Journal*, **40**, 604-18
- Rahtz, P 1968 'Whitby 1958, Site Two', *Yorkshire Archaeological Journal*, **42**, 72-73
- Rahtz, P 1976 'The Building Plan of the Anglo-Saxon Monastery at Whitby'. In Wilson (1976), 459-462
- Rahtz, P 1995 'Anglo-Saxon and later Whitby', In Hoey (1995), 1-11
- Rouffignac, C 1996 'Assessment of environmental material', in Wilmott (1996) 36-41
- Sherley-Price, L 1990 *Bede's Ecclesiastical history of the English People*, London: Penguin Books
- Spearman, R, and Higgit, M 1993 *The Age of Migrating Ideas*, Edinburgh and Stroud: National Museums of Scotland and Alan Sutton
- Watkins, J G 1987 'The pottery' in *Excavations in High Street and Blackfriargate. Hull Old Town Report Series No 5*. East Riding Archaeologist **8**, 53-181.
- Wilmott, T 1996 *Whitby Abbey, North Yorkshire: Archaeological evaluation assessment report*, Unpublished English Heritage Report
- Wilson, D M 1976 *The Archaeology of Anglo-Saxon England*, Cambridge: Cambridge University Press
- Wiltshire, P 1996 'Assessment of palynological deposits from the pond in field B', in Wilmott (1996)



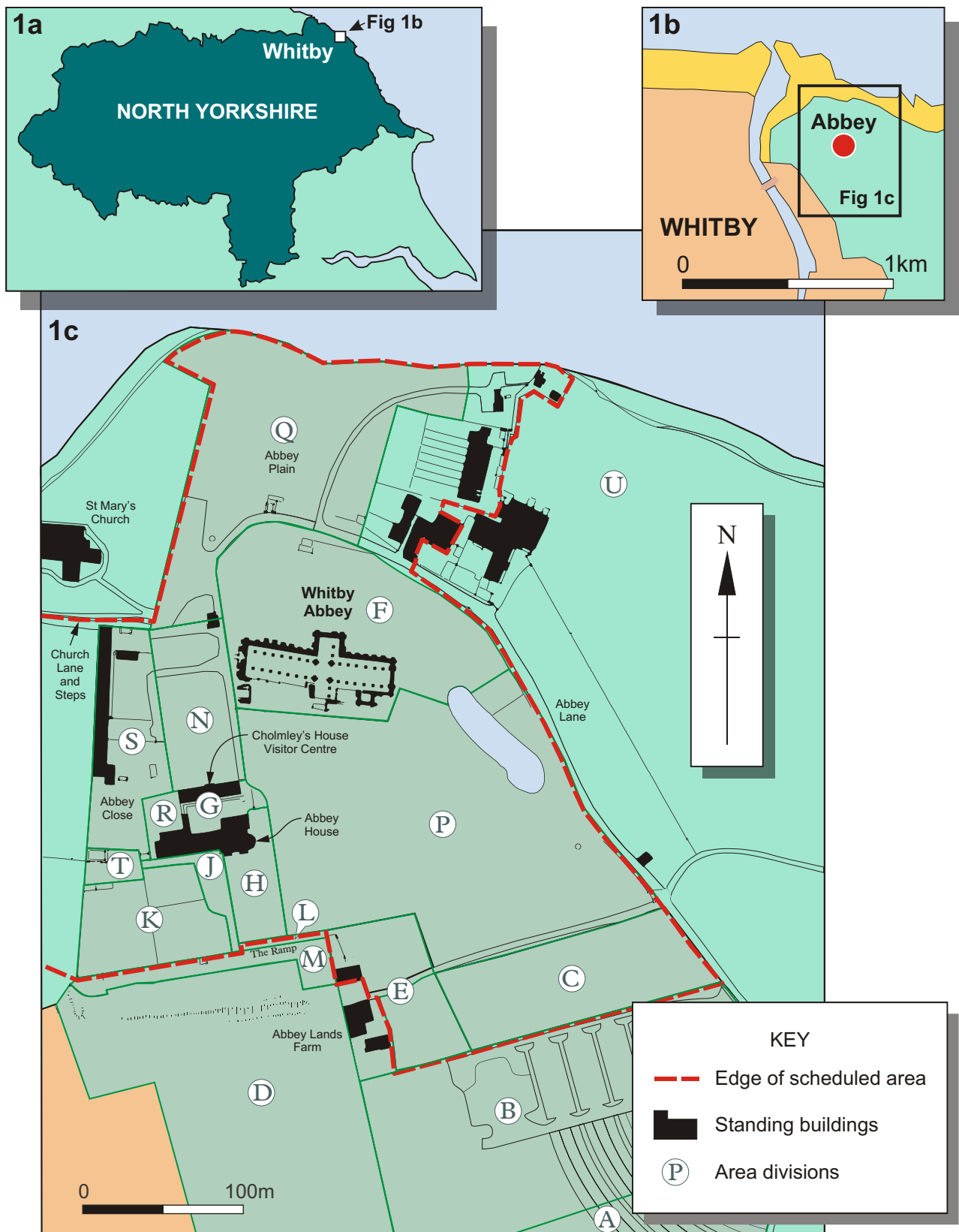


Figure 1. Location maps showing: 1a. Whitby in North Yorkshire; 1b. Whitby Town; 1c. Whitby Abbey Headland

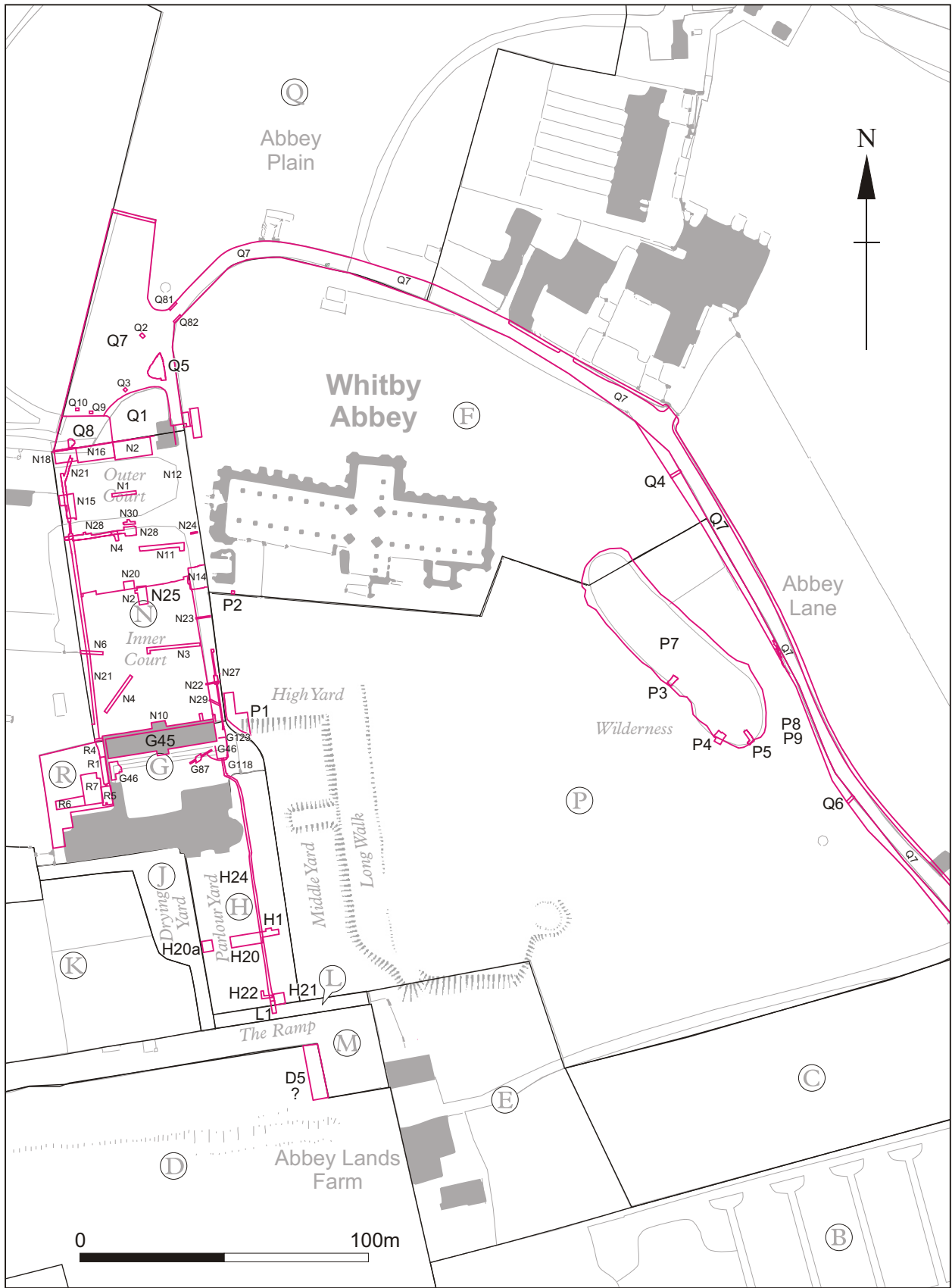


Figure 2. Map showing trench locations

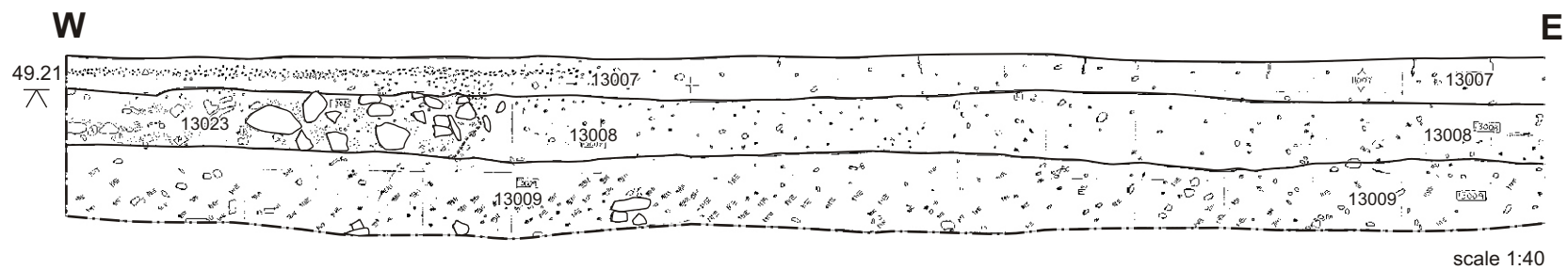
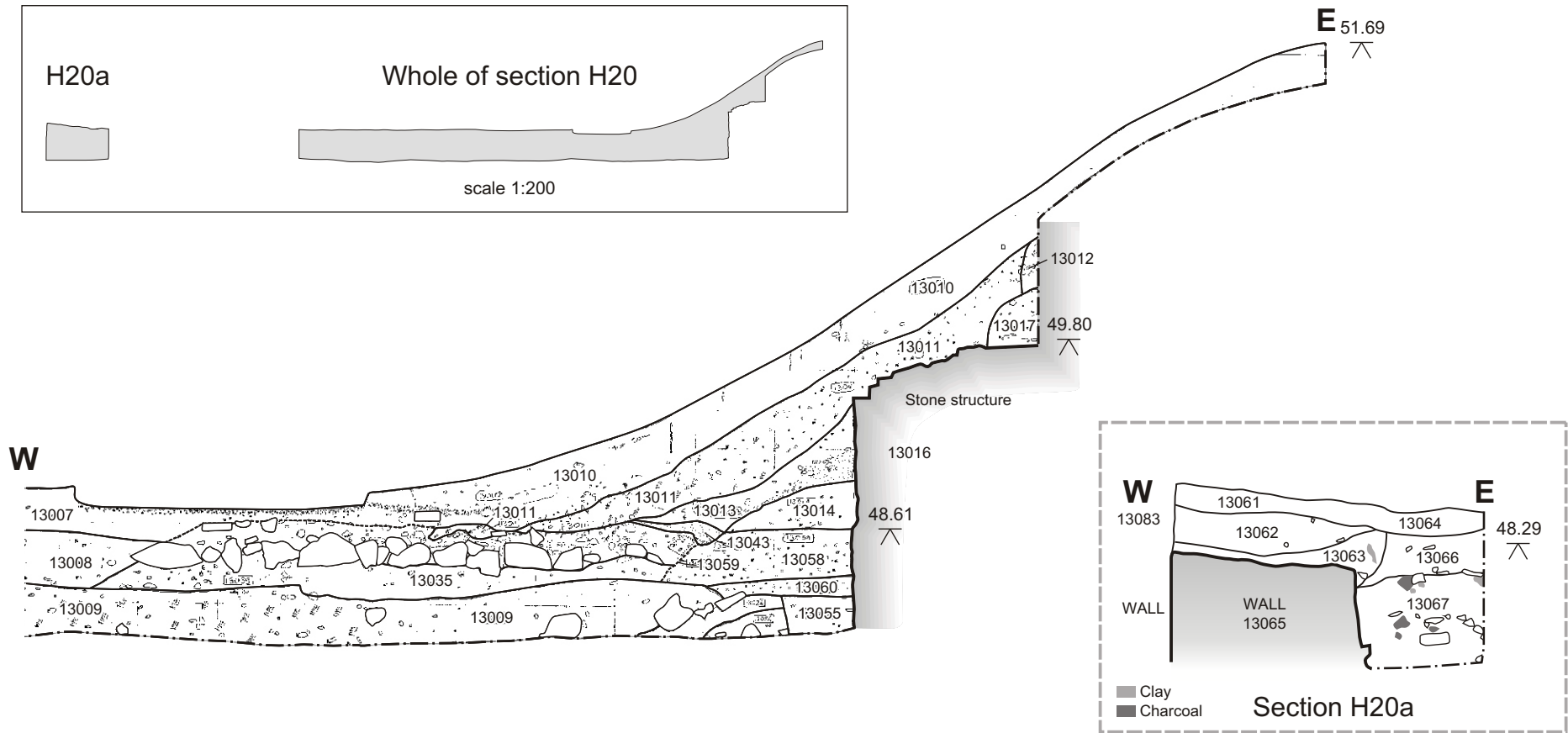
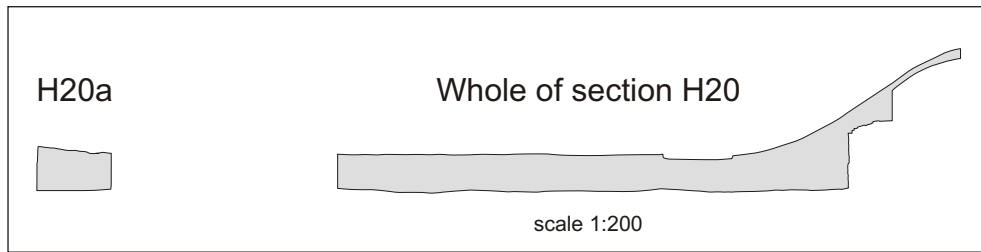


Figure 3. Sections H20 and H20a

Whole of section H24

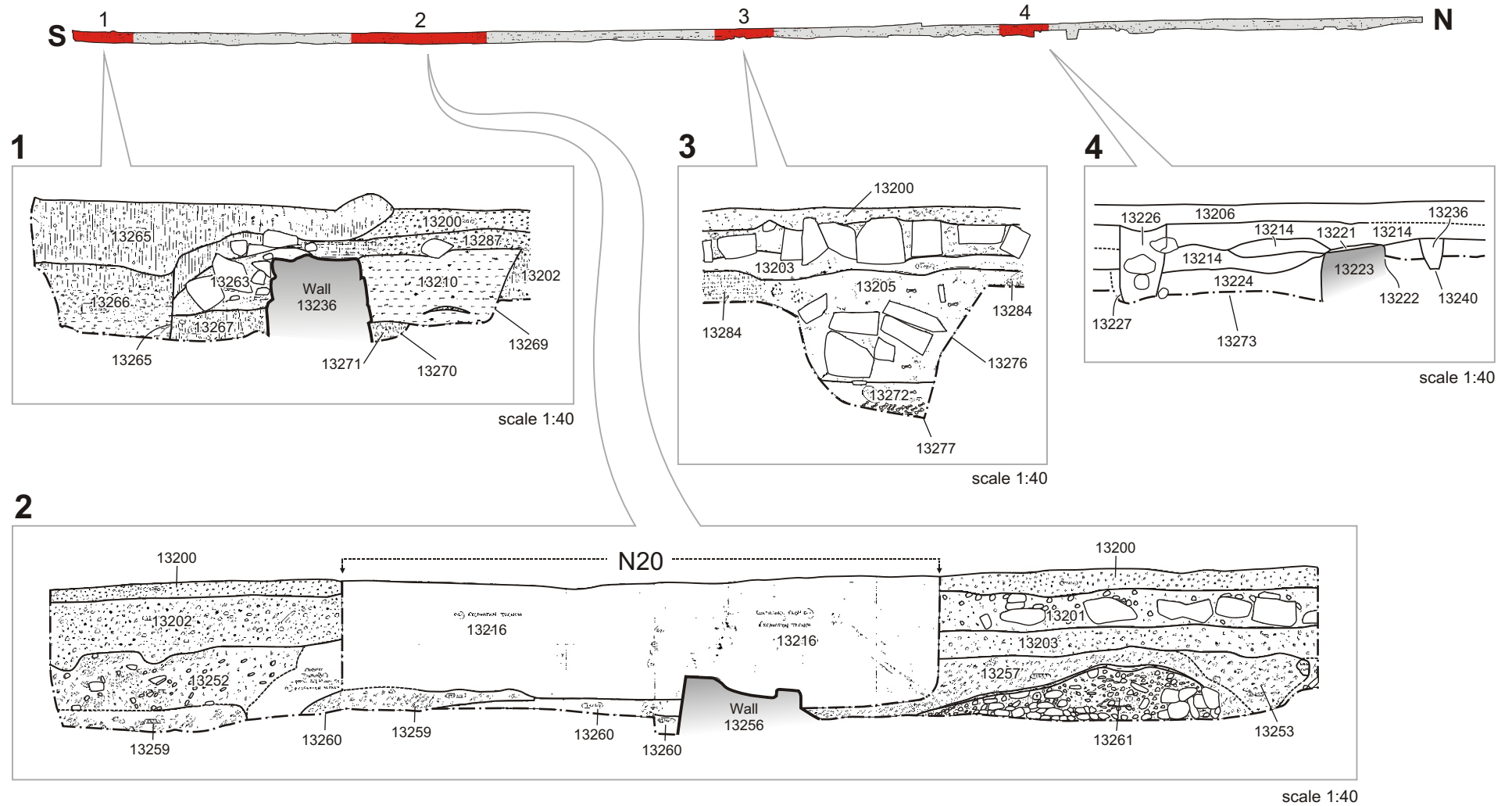


Figure 4. East facing section H24

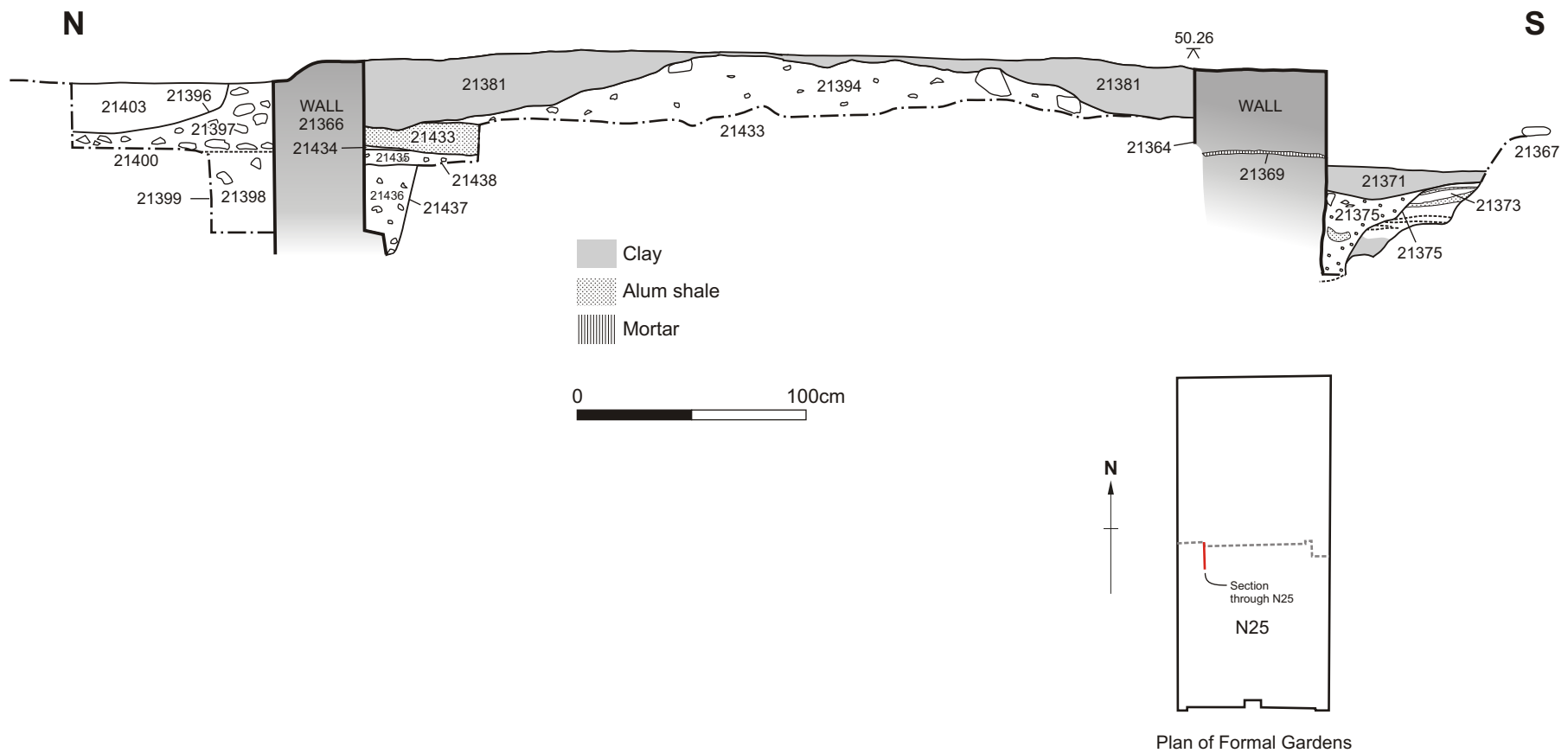


Figure 5. Section N25. Raising the walkway NW corner N25



Working in Q1

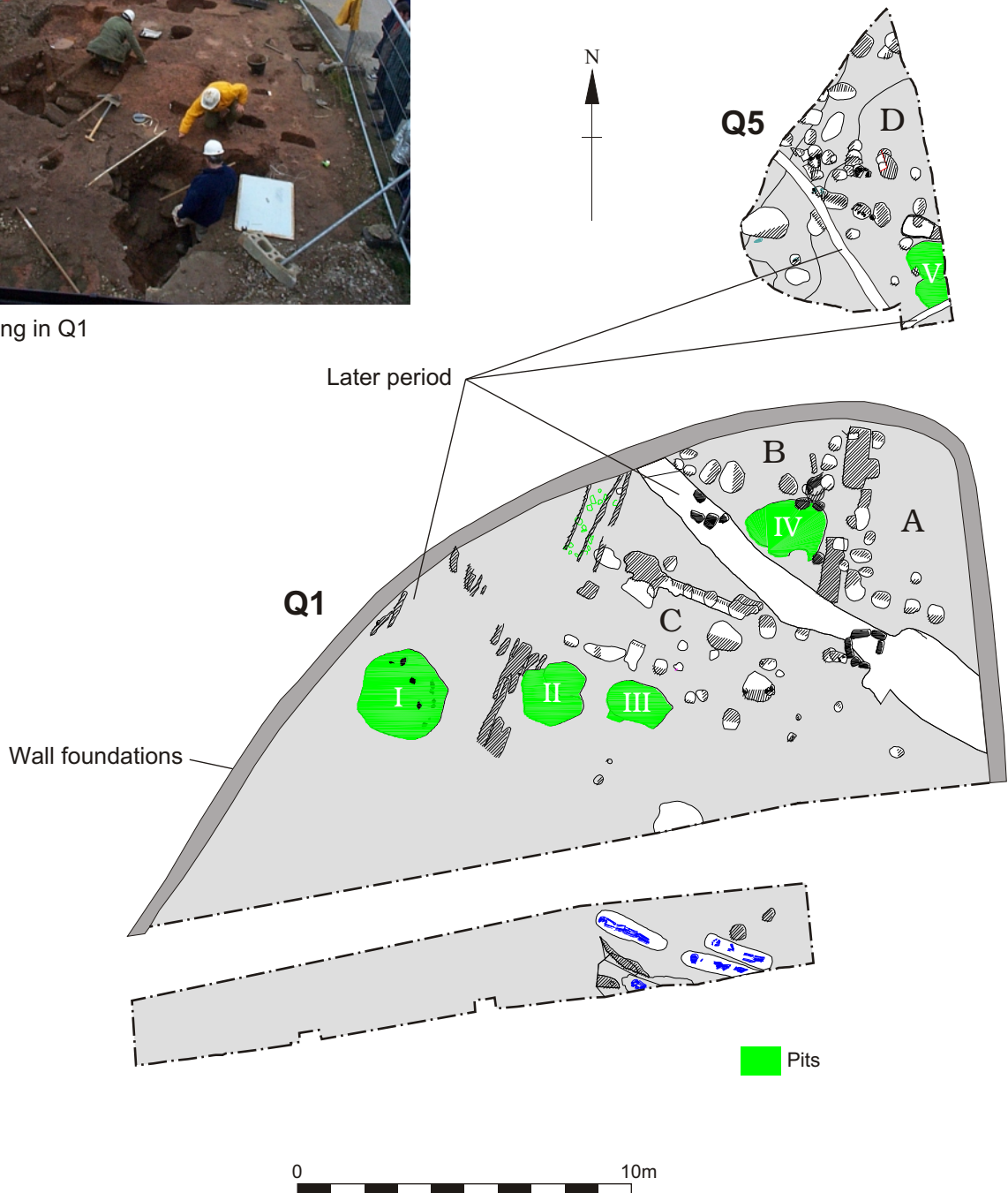


Figure 6. Plan of early features Q1 and Q5

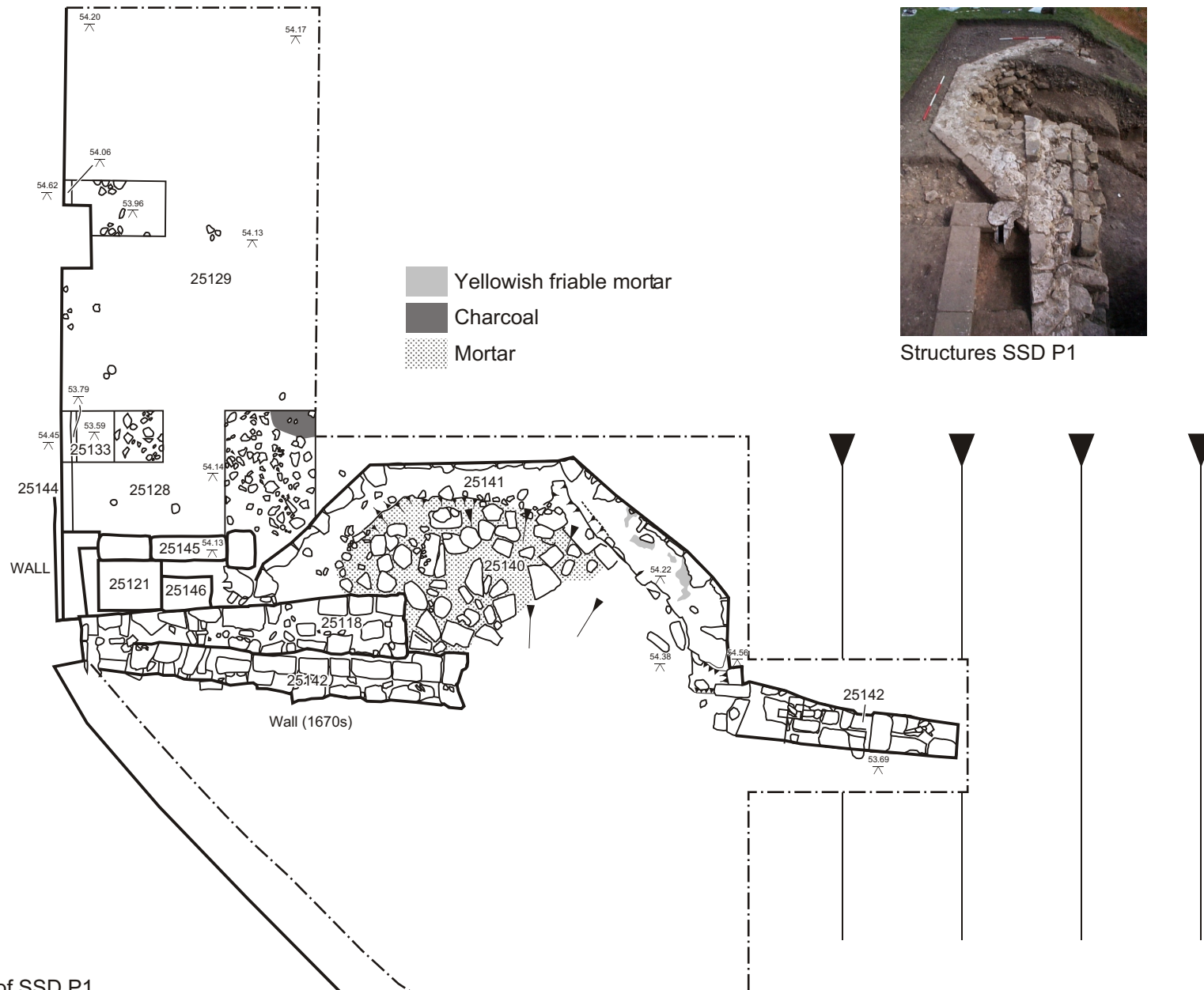


Figure 7. Plan of SSD P1

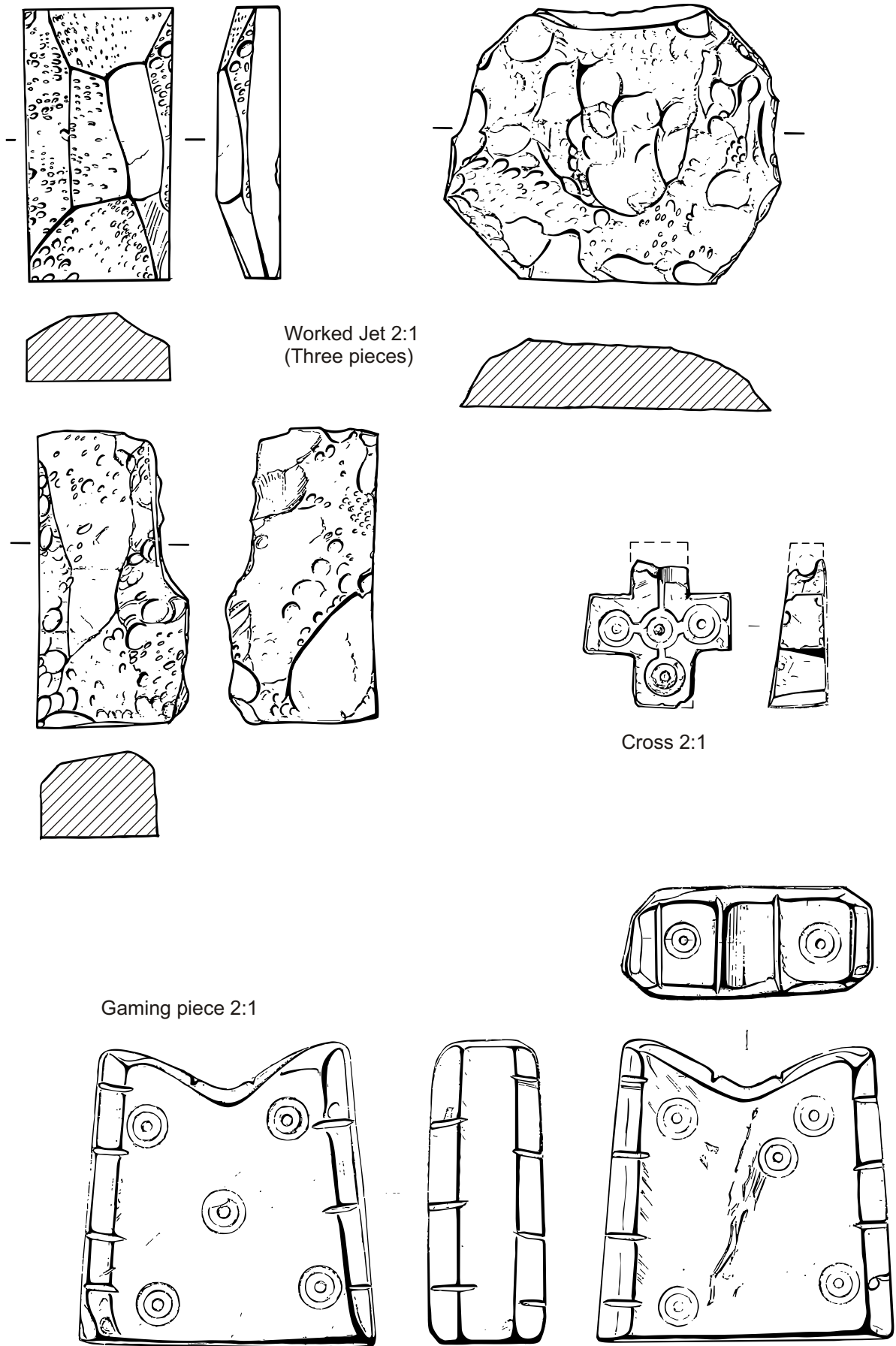


Figure 8. Small Finds - Jet





Copper alloy (seal ring cum) pipe tamper 2:1  
 (reverse impression 4:1)  
 SF: 200124350  
 mid-17th to early 18th century



Russian lead seal 2:1  
 SF: 9711601  
 Dated 1770s

Figure 9. Small Finds - Seals

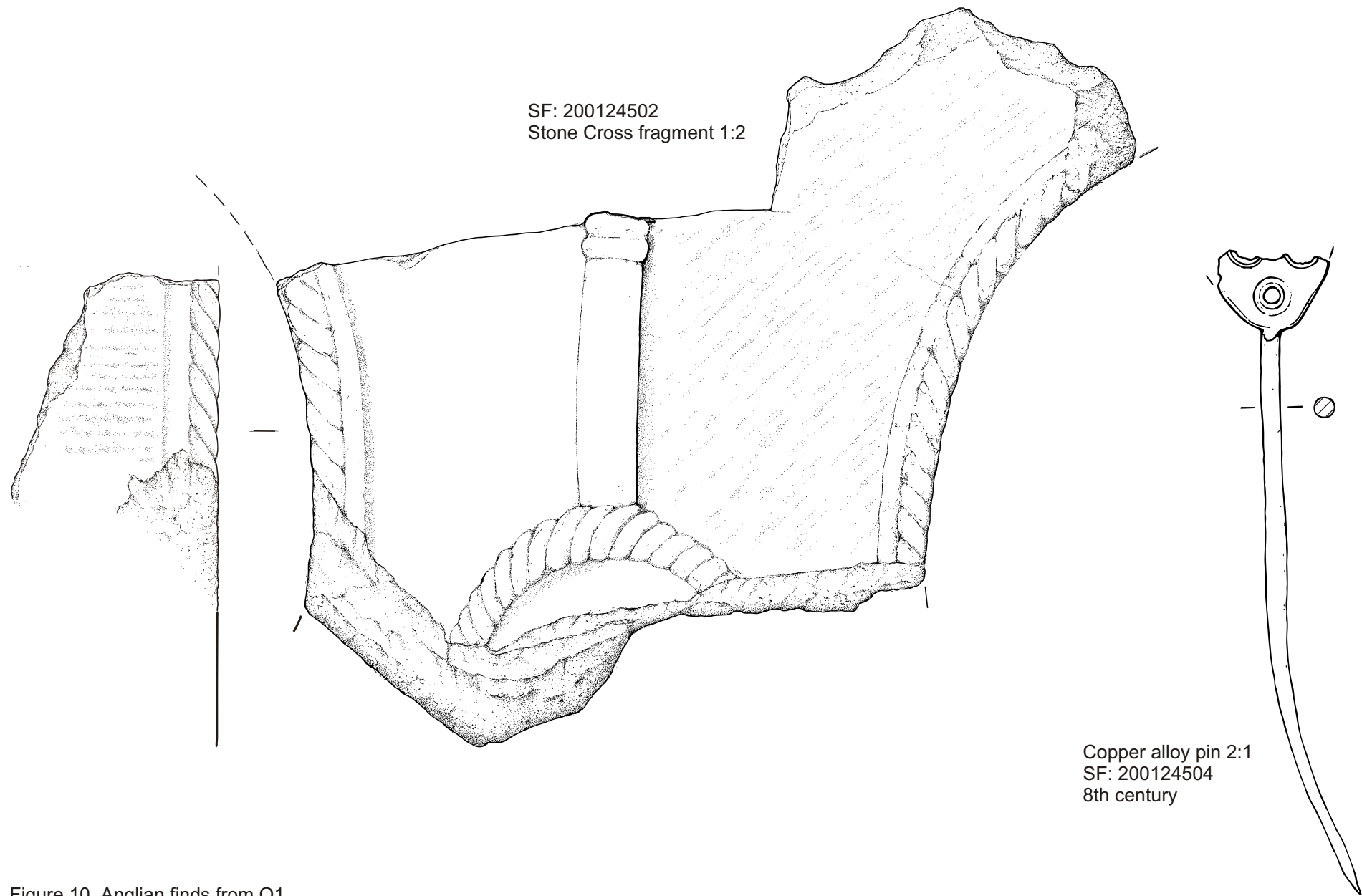
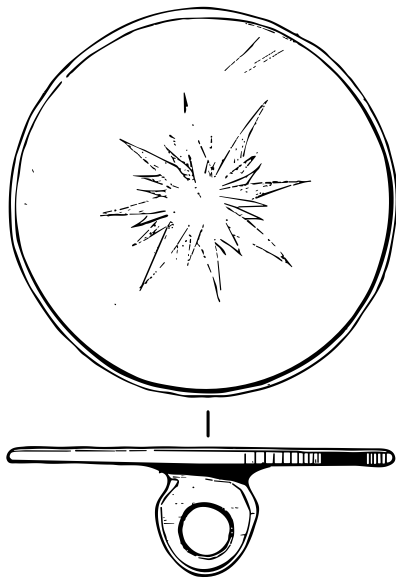
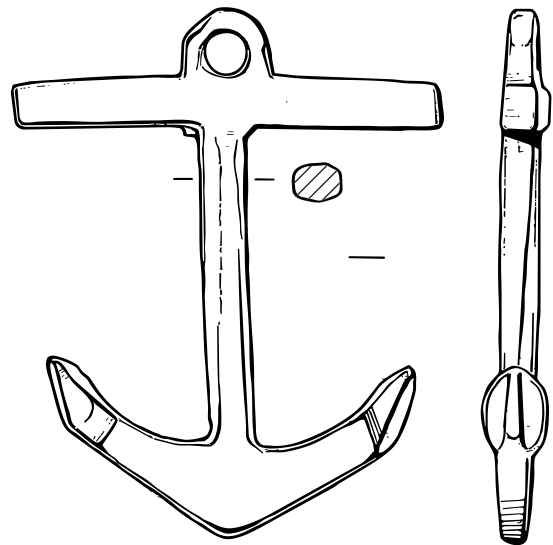


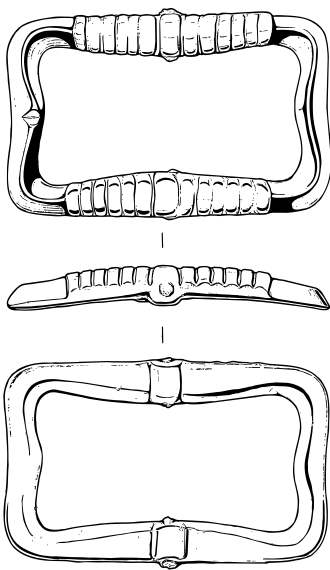
Figure 10. Anglian finds from Q1



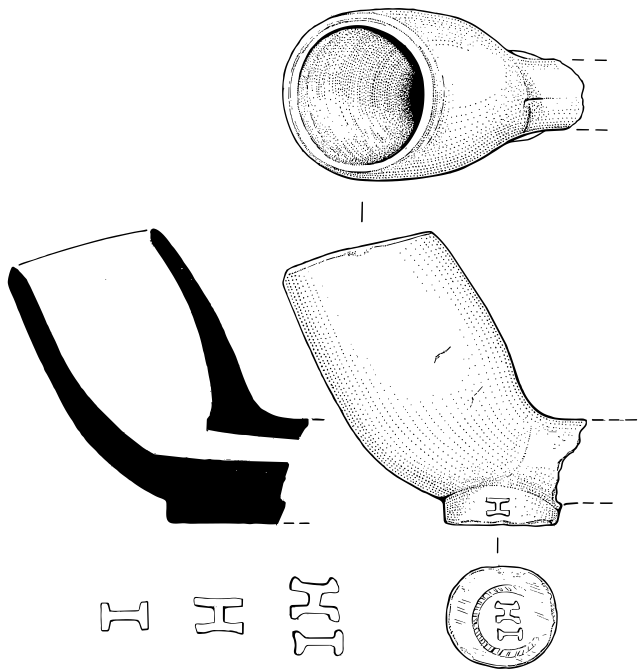
Metal alloy button 2:1  
SF: 200124662



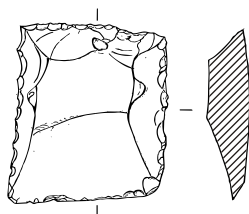
Copper alloy pendant 2:1  
SF: 9911719



Copper Alloy shoe buckle 1:1  
SF: 200024213



Clay pipe bowl 1:1  
(Stamps 2:1)  
SF: 200124654  
Date 1680-1700



Gun flint 1:1  
SF: 9911725  
probably from a  
horse pistol,  
mid-18th to  
mid-19th century

Figure 11. Small Finds (Post-Medieval)

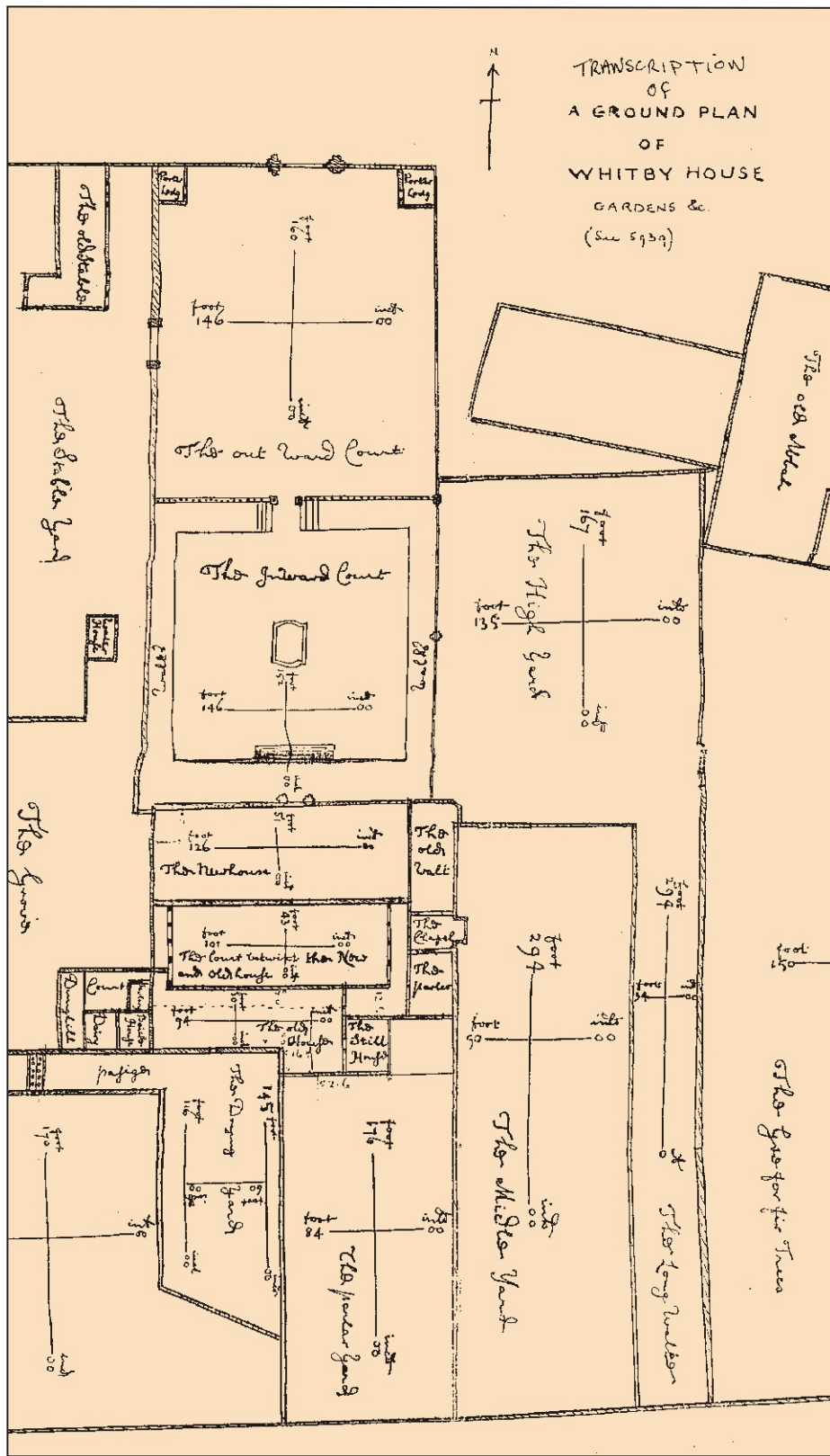


Figure 12. 1700 map of house and formal gardens



Plate 1. Site Subdivision G45, Medieval walls and pits, facing west



Plate 2. Area H, Parlour Yard, general view to north from Middle Yard



Plate 3. Area H/J West wall of Parlour Yard, junction of brick and stone, possible terrace edge



Plate 4. Site Subdivision H24, constrained working conditions, facing north



Plate 5. Site Sub-division N25, robbed dwarf wall, context 21463, facing west



Plate 6. Site Sub-division N25, early steps sealed by clay butting eastern "dwarf Wall"



Plate 7. Site Sub-division N25, robbed early steps and structures western side



Plate 8. Site Sub-division N25, early alum shale walkway, 21433





Plate 9. Site Subdivision P1, Structures



Plate 10. Site Subdivision Q1, Structure A



Plate 11. Site Sub-division Q5, Pit group V



Plate 12. Site Sub-division Q1, Burials 22152 and 22156, facing west



Plate 13. Site Sub-division Q4, section