



**ARCHAEOLOGICAL
MONITORING OF BOREHOLE
STARTER PITS**

Northern Archaeological Associates Ltd.

Marwood House
Harmire Enterprise Park
Barnard Castle
Co. Durham
DL12 8BN

t: 01833 690800

f: 01833 690801

e: rf@naa.gb.com

**AELFLEDA TERRACE
WHITBY
NORTH YORKSHIRE**

Project No.: 1129
Text: Greg Speed
Illustrations: Dawn Knowles
Edited by: Richard Fraser

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			Prepared by	Edited by	Approved by
		Name	Greg Speed	Richard Fraser	Tania Simpson

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AELFLEDA TERRACE, WHITBY, NORTH YORKSHIRE
ARCHAEOLOGICAL MONITORING OF BOREHOLE STARTER PITS

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1.0 INTRODUCTION

- 1.1 Archaeological monitoring was carried out during hand-excavation of three borehole starter pits within a field adjacent to Aelfleda Terrace, Whitby, North Yorkshire (centred at NZ 9016 1099). Collapse of backyards behind five of the houses at the western side of Aelfleda Terrace in November 2012 (and subsequent demolition of Nos. 3-7 Aelfleda Terrace) requires that Yorkshire Water relocate one of the mains passing the site, which will be re-routed around the disturbed area through the field lying immediately to the east. The three boreholes formed part of a geotechnical investigation along the new pipeline route.
- 1.2 The archaeological monitoring was carried out on 11 February 2013 by Northern Archaeological Associates Ltd for J N Bentley Ltd on behalf of Yorkshire Water.

2.0 BACKGROUND

- 2.1 The works were carried out within the western edge of the field lying between the former Abbey Lands Farm (to the east) and Aelfleda Terrace (to the west) (Figs. 1 and 2). The field slopes steeply down from east to west, with a natural gentle terrace in the area of the works. Behind Aelfleda Terrace there is another steep slope down towards the harbour.
- 2.2 The site lies immediately to the south of the Scheduled area of Whitby Abbey; this means that the field was included in extensive not-intrusive surveys (aerial photographic, topographic, resistivity and magnetometry) undertaken across the area on behalf of English Heritage in the 1990s. Earthwork features preserved within the field include a large bank running down the slope from east to west, which is believed to represent the monastic *vallum*, the formal boundary to the medieval abbey precinct (Fig. 2). Lying to the south of this, and running parallel, are a series of earthwork furrows forming part of an extensive landscape of medieval ridge-and-furrow cultivation recorded across much of the area of the headland. The magnetometer survey shows several ferrous services crossing the field, two running westwards from Abbey Lands Farm and the third running from north to south just to the east of the current works.
- 2.3 At the north-western corner of the field the topographic survey recorded a pronounced rectangular platform projecting from the hillslope, its southern edge broadly in line with the course of the *vallum*. The 1994 resistivity survey recorded bands of high resistance (presumably stone walls) framing the southern and western sides of this platform (Fig. 2). An area of high resistance immediately to the south was suggestive of a metallised surface, possibly a yard or trackway delimiting the western edge of the ridge-and-furrow.

- 2.4 Following the widely-agreed presumption that the monastic *vallum* returned to the north along the eastern edge of Almshouse Close (the 'Donkey Field'), the structure will have formed (and lain within) the south-western corner of the Abbey precinct.
- 2.5 Following the events of November 2012 in Aelfleda Terrace, a temporary trackway was laid down the field from the Abbey carpark and a working compound constructed at the western edge of the field in order to facilitate demolition of the houses (Fig. 2). The temporary access consists of a topsoil-stripped easement which has been stoned-up and surfaced with metal decking. The new temporary compound lies at the western edge of the field and measures approximately 25m long N-S and 12m wide within the base (Plate 1). The northern and eastern sides have been battered back so the upper dimensions are rather larger.
- 2.6 At the southern edge of the compound only topsoil appears to have been removed. To the north-east the compound has been progressively cut deeper into the slope to provide a level working area, but also apparently following the level top of natural boulder clay in this area. In the area of the wall marked on the accompanying figure this means that approximately 1.7m of deposits have been removed (rather less to the south and west). The area has subsequently been covered in 400mm thickness of large ballast immediately overlying clean boulder-clay.
- 2.7 Most of the surviving (battered) section along the eastern side of the compound area is obscured by a thick layer of churned spoil. However, at the dog-leg (see Fig.2), machine-damaged remnants of a substantial stone wall were visible immediately overlying the boulder clay, in a location corresponding to the structure recorded by the resistivity survey. The wall was more than 0.5m wide, survived to two courses high and was constructed of large (up to 0.5m) roughly squared un-bonded stone blocks. Material directly overlying the wall appeared to consist of robber-trench backfill (soil and rubble) extending up to a level of c.0.75m bgl. At the top of the section was a thick post-medieval deposit mainly comprising 19th-20th century domestic refuse, but including some jet-working debris probably derived from the adjacent jet-workers' cottages. This rubbish dump was recorded by the 1994 magnetometer survey as an area of 'noise' obscuring the underlying structure.
- 2.8 At the base of the available section immediately to the south of the wall, the boulder clay is overlain by c.0.3m of mid to dark brown sandy soil overlain by remnants of a rough cobble/rubble surface. The section above this was obscured by churned material.
- 2.9 Large quantities of finds have been scattered across the site as a result of these works. The vast majority derive from the post-medieval domestic midden; however, a moderate quantity of medieval pottery (?12th century onwards) is also present. Amongst the jet debris recovered, a bead may be pre-Victorian.

3.0 MONITORING RESULTS

- 3.1 During the current works, the pre-existing temporary site access and surfaced compound were utilised; only Borehole 3 was located outside this area, requiring access by the self-propelled tracked drilling-rig across a short stretch of the unprotected field surface.
- 3.2 The three starter pits for the boreholes were hand-excavated in a line from north to south parallel to, and 3-5m from, the western field boundary (Fig. 2). Each pit was 0.3-0.4m in diameter and 1.2m deep.
- 3.3 Starter Pits 1 and 2 were located within the previously stripped compound area (Plate 1). Both encountered 0.4m of large ballast (the compound surface) directly overlying mid brown sandy boulder clay.
- 3.4 Starter Pit 3 was located to the south of the compound, within the level area at the south-western corner of the field (Plate 2). At this location, 0.45m of topsoil overlay stony yellow-brown natural clayey sand.

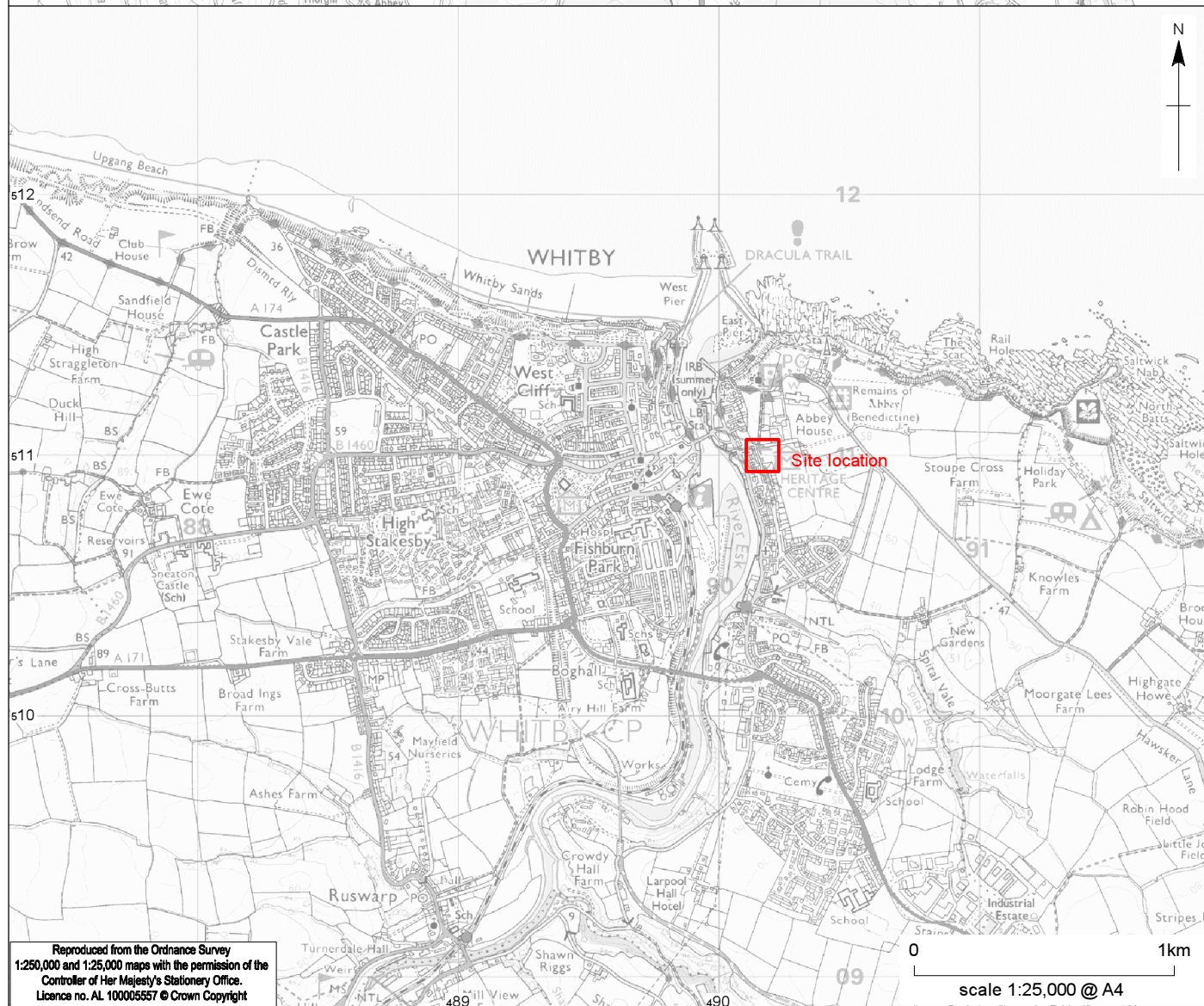
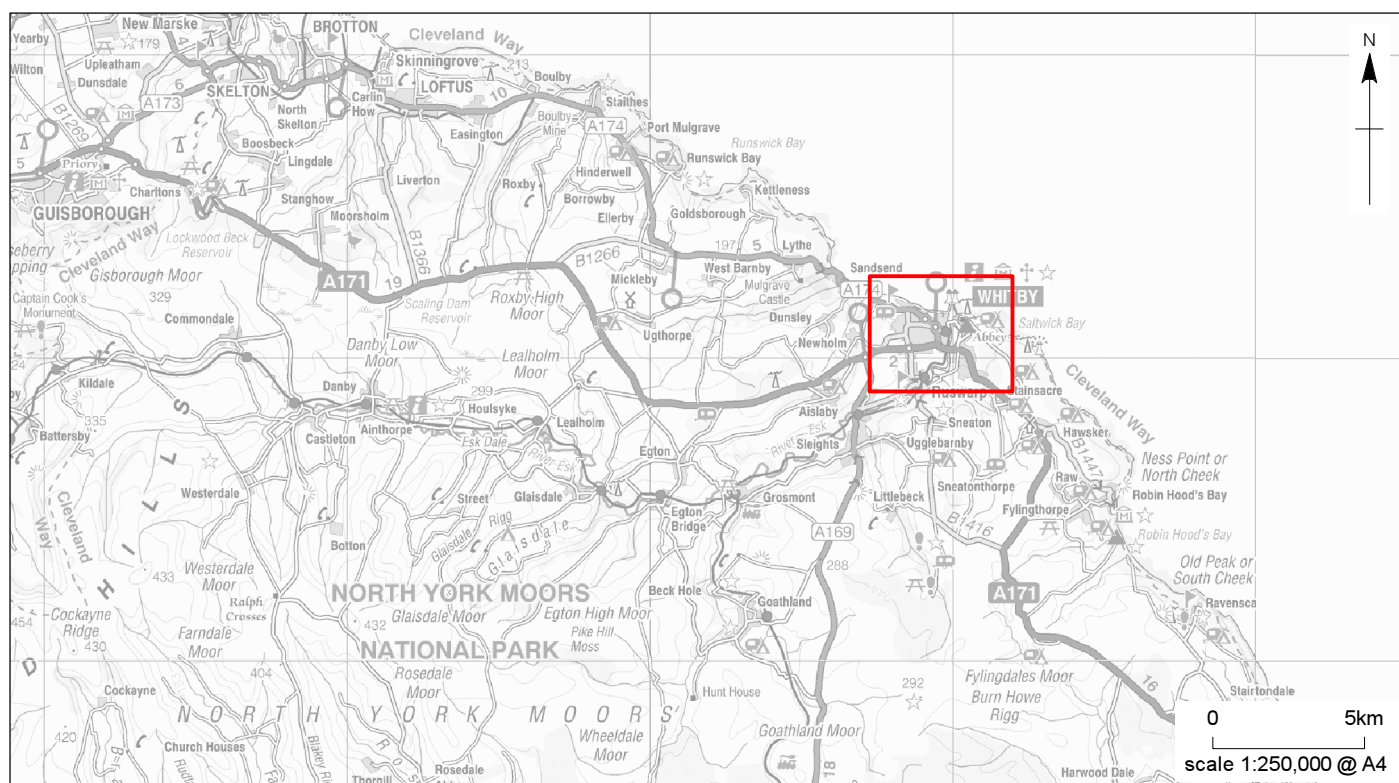
4.0 DISCUSSION AND RECOMMENDATIONS

- 4.1 No archaeological deposits were present at any of the three locations. In the case of Starter Pits 1 and 2 this was clearly the result of recent truncation. Starter Pit 3 lay at the point furthest from the known archaeological remains (within the northern part of the area), in an area which was presumably under agricultural usage during the medieval period as evidenced by the adjacent ridge and furrow remains.
- 4.2 Although any archaeological remains within the area of the temporary compound have previously been removed down to the top of the natural boulder clay, and probably similarly truncated to the south as a result of past agricultural activity, there remains the possibility for features such as pits, postholes and ditches to survive cutting into the boulder clay.
- 4.3 The current works will have no impact upon the archaeological remains exposed along the eastern edge of the temporary compound, which lie out-with the route of the new pipeline. All access to the site will be via the existing temporary trackway from the Abbey carpark.
- 4.4 In view of the possibility of archaeological features cut into the boulder clay in the area of the new main, it is recommended that archaeological monitoring be undertaken during excavation of the new trench, down to a level where clean natural deposits have been observed throughout the route.
- 4.5 In addition, use of heavy plant should be avoided, as far as is practicable, on unprotected parts of the field surface lying beyond the existing areas of hard-

standing (the trackway and temporary compound area) in order to limit any further damage to any below-ground archaeological remains which may be present.

REFERENCES

- Noel, M J and Wright, J W (1994) *Geophysical and Topographic Surveys at Whitby Abbey 1994*. Unpublished GeoQuest Associates report
- Stopford, J (1997) *Geophysical survey and aerial photography of Whitby Headland – interim report*. Unpublished

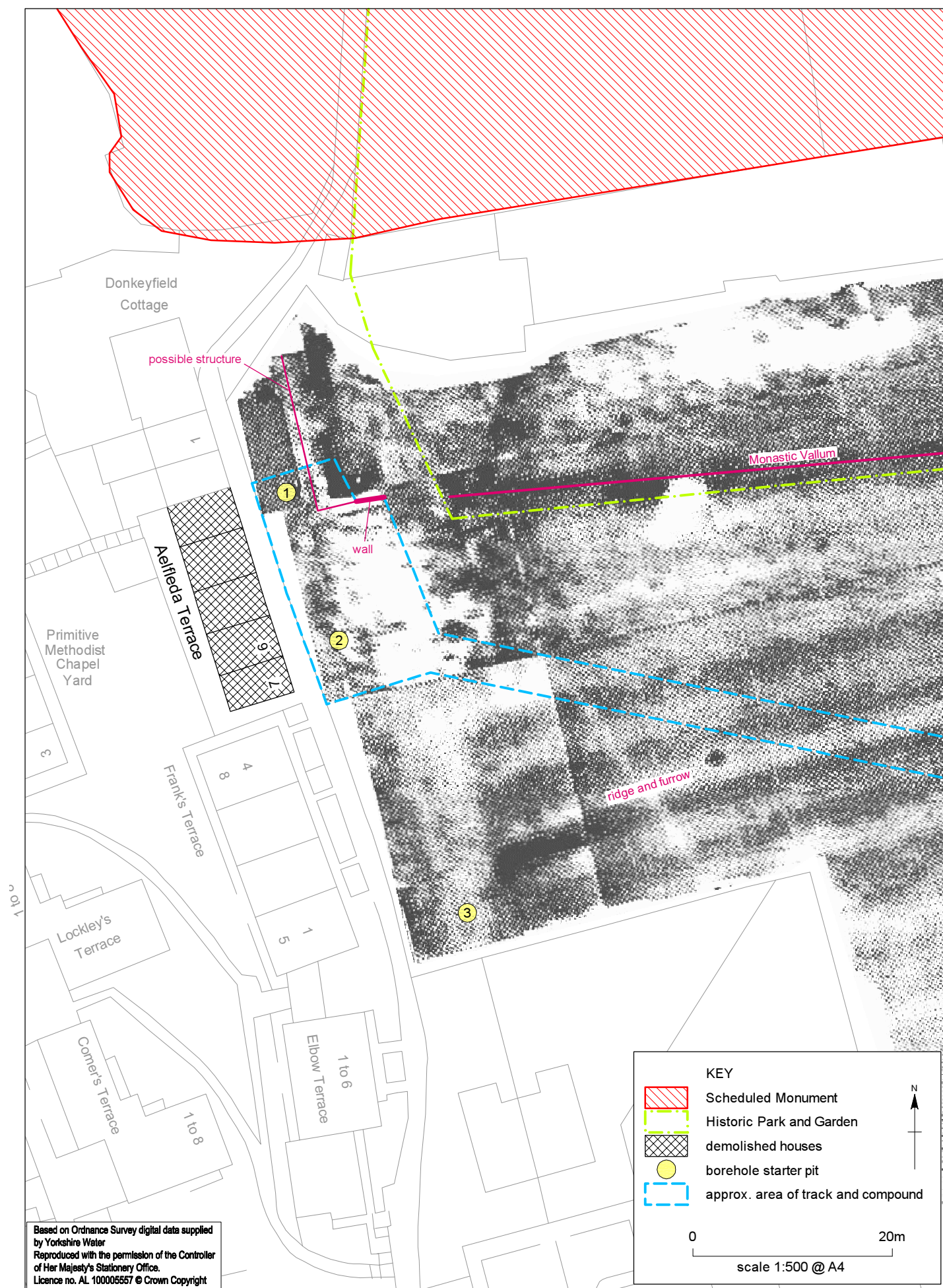


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Aelfleda Terrace, Whitby: site location

Figure 1



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Aelfleda Terrace, Whitby: location of borehole starter pits
(Resistivity survey data after Noel and Wright, 1994)

Figure 2



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Aelfleda Terrace, Whitby: Compound Area, starter pit 1 under excavation, starter pit 2 located adjacent to plant on left, facing north

Plate 1



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Aelfleda Terrace, Whitby: south-west corner of field showing starter pit 3, facing south-west

Plate 2