

**Assessment Report on the Results of Metro
North Advance Archaeological Test Trenching,
Testing Area 4, Belinstown and Lissenhall Little
townlands, Co. Dublin,
RPA ref: (MN101) Belinstown to Fosterstown**

Excavation Licence Number: 09E462

Director: John Channing

Report Authors: John Channing and William O. Frazer

Project Code: RPMN08

Client: Railway Procurement Agency RPA 7120_5

Townlands: Belinstown, Lissenhall Little

Ordnance Datum: 9.5 m

NGR: 318423/249381



HEADLAND
ARCHAEOLOGY Ltd

**Assessment Report on the Results of Metro
North Advance Archaeological Test Trenching,
Testing Area 4, Belinstown and Lissenhall Little
townlands, Co. Dublin,
RPA ref: (MN101) Belinstown to Fosterstown**

Excavation Licence Number: 09E462

Director: John Channing

Report Authors: John Channing and William O. Frazer

Project Code: RPMN08

Client: Railway Procurement Agency RPA 7120_5

Townlands: Belinstown, Lissenhall Little

Ordnance Datum: 9.5 m

NGR: 318423/249381

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin, RPA ref: (MN101) Belinstown to Fosterstown

DOCUMENT HISTORY LOG

Revision	Report Status	Issue Date	Description	Prepared by	Checked by	Approved by
01	1 st Draft		Advance archaeological test trenching assessment report, Testing Area 4 for Metro North	JC and WOF	PL and JH	PL

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin, RPA ref: (MN101) Belinstown to Fosterstown

CONTENTS	PAGE
SUMMARY	4
1.0 INTRODUCTION	6
2.0 SITE LOCATION AND DESCRIPTION	7
3.0 PROJECT BACKGROUND	8
3.1 <i>Environmental Impact Statement</i>	8
3.2 <i>Archaeological Strategy Document</i>	9
3.3 <i>Previous Metro North Investigations</i>	9
4.0 ARCHAEOLOGICAL AND HISTORICAL BACKGROUND	9
5.0 OBJECTIVES	13
6.0 METHODOLOGY AND CONSTRAINTS	13
6.1 <i>Methodology used for recording the townland boundary</i>	15
7.0 RESULTS	15
7.1 <i>Interpretative assessment of the geophysical survey anomalies in Testing Area 4</i>	16
8.0 IMPACT ASSESSMENT	17
9.0 PROPOSED MITIGATION	17
REFERENCES	19

APPENDICES

Appendix 1: Field Register

Appendix 2: Trench Register

Appendix 3: Context Register

Appendix 4: Photograph register

Appendix 5: Drawing register

Appendix 6: Archive Quantities

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin, RPA ref: (MN101) Belinstown to Fosterstown

LIST OF TABLES

Table 1: Testing Areas and their assigned excavation licence numbers

LIST OF FIGURES

Figure 1: Testing Area 4, location and RMP extract

Figure 2: Testing Area 4 (Sub-areas 9 and 10) Belinstown and Lissenhall Little Townland, RPA Ref: MN101 Belinstown to Fosterstown

Figure 3: North-facing section through Belinstown/Lissenhall Little Townland Boundary (HC#413)

LIST OF PLATES

Plate 1: General view of Sub-area 9, Test Trench 5

Plate 2: General view of Sub-area 9, Test Trench 14

Plate 3: General view of Sub-area 10, Test Trench 2

Plate 4: View of Sub-area 10, Test Trench 5, Drain (005)

Plate 5: View of section excavated through Townland Boundary HC#413 in Sub-area 9, Test Trench 13, facing southeast

Plate 6: Eastern side of Townland Boundary (HC#413) facing northwest

Plate 7: Measurement point 1, east side of Townland Boundary (HC#413)

Plate 8: Measurement point 2, east side of Townland Boundary (HC#413)

Plate 9: Measurement point 3, east side of Townland Boundary (HC#413)

SUMMARY

Metro North is a light rail project, the route of which will run along a proposed 18km corridor, from Belinstown in North County Dublin, through Dublin Airport, to the City Centre at St. Stephen's Green.

Headland Archaeology (Ireland) Ltd was commissioned by the Railway Procurement Agency (RPA) to carry out advance archaeological testing of the proposed Metro North scheme. For the purposes of archaeological assessment the Metro North route has been sub-divided into fourteen Testing Areas, TA 1–14. This report outlines the results of Advance Archaeological Test Trenching undertaken in Testing Area 4 Belinstown and Lissenhall Little townlands (MN101), Co. Dublin on the footprint of the Metro North alignment and part of the Lissenhall (provisional) Stop (09E462).

The programme of advance archaeological testing for Metro North was carried out following a series of non-invasive archaeological investigations including an Environmental Impact Assessment (EIA; CRDS Ltd 2008), the preparation of an Archaeological Strategy Document (MGL & FitzGerald 2009) and a programme of geophysical survey (08R0117; Thébaudeau and Harrison 2009).

The EIA process originally identified the townland boundary between Belinstown and Lissenhall Little townlands as a site of archaeological significance within Testing Area 4 (CRDS Ltd. 2008; HC#413). A further site HC#8 was identified to the west of Metro North but will not be impacted upon by the proposed scheme. In addition to this, anomalies of possible archaeological significance were identified during the geophysical survey, including two small curvilinear features and two possible pit-like features (AS2–AS3, G40–G42; Thébaudeau and Harrison 2009, 6-7; 17).

The advance archaeological testing of Testing Area 4 (09E462), Sub-areas 9 and 10 (Belinstown and Lissenhall Little townlands), was carried out on 22nd September and 12th October 2009 by John Channing and William O. Frazer. Twenty-one test trenches were excavated within Testing Area 4, amounting to a total of 962.7 linear metres (1925.4m²). This comprised 10.5% of the entire testing area (18,252.5m²).

No archaeological features were identified during the course of testing. The features of archaeological potential noted in the geophysical survey were identified as the remains of late post-medieval and modern agricultural activity, namely plough

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin, RPA ref: (MN101) Belinstown to Fosterstown

furrows, field boundaries, land drains and stone sockets, and were not considered to be of archaeological significance.

This report outlines the results of the archaeological testing and assesses the impact of the proposed Metro North scheme on Testing Area 4. Areas tested immediately to the north and south of Testing Area 4 revealed an isolated pit (Testing Area 3, Sub-area 2, Belinstown 6, 09E449); a pit, two curvilinear features and a burnt spread (Testing Area 3, Sub-areas 2 and 7, Belinstown 7, 09E449); and a ringditch with a linear ditch extending from it and a cremation pit (Testing Area 5, Sub-area 12, Lissenhall Little 1, 09E463). The results from these testing areas form separate reports.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

1.0 INTRODUCTION

This document is submitted as an assessment report on the Advance Archaeological Testing of Metro North, Testing Area 4 Belinstown and Lissenhall Little townlands (MN101), Co. Dublin (09E462).

Metro North will be a combined underground and surface light rail service development, segregated from traffic using tunnel, road median and Greenfield construction environments. The Metro North route will run along a proposed 18km corridor, from Belinstown in North County Dublin, through Dublin Airport, to the City Centre at St. Stephen's Green.

The route of the Metro North is generally a north–south alignment. It will have stops at Belinstown (where its depot will be located), Lissenhall (provisional), Estuary, (provisional), Seatown, Swords, Fosterstown, Dublin Airport, Dardistown, Northwood, Ballymun, Dublin City University, Griffith Avenue, Drumcondra, Mater Hospital, Parnell Square, O' Connell Bridge and St. Stephen's Green. Testing Area 4 incorporates the footprint of the Metro North alignment and part of the Lissenhall (provisional) Stop.

The purpose of the advance testing was to determine the presence or absence of archaeological features, structures, deposits, artefacts or ecofacts along the route so as to inform the subsequent archaeological strategy in advance of construction. All areas of archaeological potential, sites and significant features recorded for the footprint of the proposed scheme in the Metro North EIS or subsequently identified by the Metro North geophysical survey were investigated as part of the testing programme.

For the purposes of design and construction the Metro North route has been broken into seven zones or section areas (MN101-MN107):

- Area 1 MN101 - Lissenhall to Fosterstown;
- Area 2 MN102 - South of Fosterstown to Dublin Airport Boundary (North);
- Area 3 MN103 - Dublin Airport;
- Area 4 MN104 - Dublin Airport Boundary (South) to M50 motorway;
- Area 5 MN105 - M50 (South) to Dublin City University (DCU);
- Area 6 MN106 - DCU to Mater Hospital; and
- Area 7 MN107 - Mater Hospital to St Stephen's Green

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

For management purposes, the Metro North route has been sub-divided into fourteen archaeological testing areas (TA1–14) by the RPA Project Archaeologist and each of these areas has been assigned an individual excavation licence number (see Table 1).

Testing Area	Excavation License No.
TA1	09E450
TA2	09E448
TA3	09E449
TA4	09E462
TA5	09E463
TA6	09E464
TA7	09E465
TA8	09E466
TA9	09E467
TA10	09E478
TA11	09E479
TA12	09E480
TA13	09E481
TA14	09E482

Table 1: Testing Areas and their assigned excavation licence numbers.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

2.0 SITE LOCATION AND DESCRIPTION

Testing Area 4, incorporating the footprint of the Metro North alignment and part of the Lissenhall (provisional) Stop, is located at NGR 318423/249381, in the townlands of Belinstown and Lissenhall Little (MN101), Barony of Nethercross, parish of Swords, Co. Dublin (Figure 1). It is situated approximately 1.5km to the north of Swords on land currently used for agriculture. The M1 motorway is located directly to the east. This is within RPA area MN101 – Lissenhall to Fosterstown.

The Testing Area measured 18,253m² and encompasses a 50m wide strip of land which extends across 3 fields and traverses the townland boundary between Belinstown and Lissenhall Little (CRDS Ltd. 2008; HC#413).

Testing Area 4 was situated on flat, stubble land over three large, roughly rectilinear fields (Sub-areas 9 and 10). Sub-area 9 contains the townland boundary between Belinstown and Lissenhall Little, consisting of an earthen bank with a parallel water filled ditch to east (HC#413; CRDS 2008, 451).

Soils specific to the region of North County Dublin are predominated by a highly consolidated, very stiff clay and silt matrix containing sand, gravel, cobbles and boulders. This clay is generally grey to black in colour. In Testing Area 4 of the proposed scheme, however, it varied to yellow brown. Pockets of glacial sands and gravels occur within this boulder clay. These sands and gravels are likely to have been deposited in glacial ponds or streams and are generally water-bearing. The underlying bedrock consists of a nodular and muddy argillaceous limestone with a relatively uniform bed thickness. It is interspersed with thin shale beds and contains major units of very distinctive, laminated fine limestone (ERM and Jacobs Engineering Ireland Ltd 2008).

3.0 PROJECT BACKGROUND

Several stages of non-invasive archaeological investigation were carried out on the route of Metro North prior to the archaeological testing, and the results of these investigations have had a direct influence on the strategy adopted for the testing programme.

3.1 Environmental Impact Statement

An Environmental Impact Assessment was carried out as part of the Railway Order Application for Metro North. Cultural Resource Development Services Limited (CRDS) on

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

behalf of ERM Environmental Resources Management Ireland Limited (ERM) completed the assessment for archaeology, architectural heritage and cultural heritage. The assessment consisted of a review of the published and unpublished documentary, aerial and cartographic sources, supported by a field inspection of the proposed alignment.

3.2 *Archaeological Strategy Document*

In addition to the EIS chapter, an Archaeological Strategy document was prepared for Metro North by Margaret Gowen Limited ("MGL") in 2007. The strategy supplements the provisions outlined in the EIS for the mitigation of impacts on archaeological heritage arising from the project. The strategy is a live document and is managed by the RPA Project Archaeologist and will continue to evolve on a phased basis to ensure that it remains appropriate and effective in managing archaeological risk throughout the project up to construction commencement (MGL & FitzGerald 2009).

The EIS and the Metro North Archaeological Strategy recommended that a programme of geophysical survey followed by a programme of testing should be carried out in the Greenfield areas of the route in advance of construction.

3.3 *Geophysical Survey*

A programme of geophysical survey was carried out by MGL between May and September 2008 with further investigations in 2009 (G40-G42; Thébaudeau and Harrison 2009, 16-17). The methodology included a scanning gradiometry survey and a detailed magnetometry survey of approximately twenty-eight areas along the route of Metro North. The southern field of Sub-area 9 was not suitable for geophysical testing due crop presence.

4.0 **ARCHAEOLOGICAL AND HISTORICAL BACKGROUND**

This historical and archaeological background for Testing Area 4 has been compiled using the Archaeology, Architectural Heritage and Cultural Heritage chapter of the EIS (CRDS Ltd 2008), the aforementioned Archaeology Strategy (MGL & FitzGerald 2009) and Geophysical Survey (G40-G42; Thebaudeau and Harrison 2009, 16-17) in addition to available literary and cartographic sources.

'Evidence for prehistoric activity in north county Dublin comes from the Record of Monuments, which includes prehistoric sites, previous development-led investigations and surveys and from stray finds. In the early historical period the area through which the route

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

is aligned formed part of the geographical region of Brega with a range of sites of this period including ringforts, dispersed settlement sites and Early Christian ecclesiastical sites. There are relatively few surviving ringforts in north County Dublin due to the intensive cultivation and agricultural activity in this part of the county, which levelled many earthwork sites. These tend to survive as cropmarks, as illustrated in the archaeological desk study undertaken for the EIS.

After the conquest by Anglo-Normans in the twelfth century social structures, agrarian development and settlement centres of religious and secular origin followed. Throughout the medieval period monastic foundations and individual lordships held large tracts of lands in north Dublin. A period of great flux occasioned by warfare, confiscation and transfer of ownership occurred during the Tudor, Cromwellian and Jacobite wars and the development of demesne properties in subsequent years all influences the character and layout of rural north Dublin in their own ways, but as part of a continuum in a landscape that was influenced by and changed over time in equal measure by economic and associated agricultural development' (Gowen & Fitzgerald 2009, 4–5)

Two sites of archaeological potential were identified in the environs of Testing Area 4 HC#413 and HC#8 comprising a townland boundary and a curving cropmark respectively. Testing Area 4 directly impacts upon HC#413 the townland boundary between Belinstown and Lissenhall Little (CRDS Ltd. 2008; 416). HC#8, a curving cropmark identified from aerial photography, was located approximately 135m to the west of the Testing Area and was not impacted upon by these works.

Recorded Archaeological Sites

Due to activities associated with modern development and progress, such as agriculture, industry and infrastructural improvements in the second half of the 20th century, many archaeological sites have been levelled. The present day archaeological landscape is not therefore fully representative of the human occupation of this island which has spanned some nine thousand years. Nonetheless, archaeological sites survive today as upstanding structures, earthwork monuments or sub-surface remains.

A number of Recorded Monuments (RMPs) lie in the vicinity of the Testing Area, however none are impacted directly by it (Figure 2; Table 2).

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

HC #	RMP #	Site Type	NGR	Distance
7	DU012-003	Ring-ditch	319167/249681	670m to the northeast
-	DU011-017	Enclosure	317780/249000	650m to the southwest
-	DU011-078	Enclosure	317680/248720	850m to the southwest
-	DU012-011	Ritual Site/Holy Well	319050/248880	550m to the southeast

Table 2: RMP's located within the vicinity of Testing Area 4

Townlands and Townland Boundaries

The Irish landscape is divided into approximately 60,000 townlands and the system of landholding is unique in Western Europe for its scale and antiquity. Many townlands predate the arrival of the Anglo-Normans, and Irish historical documents consistently use townland names throughout the historic period to describe areas and locate events accurately in their geographical context. The townland names and boundaries were standardised in the nineteenth century when the Ordnance Survey began to produce large-scale maps of the country. The original Irish names were eventually anglicised to varying degrees, depending in part upon the linguistic skills of the surveyors and recorders. A study of the townland names can provide information on aspects of cultural heritage including descriptions of the use of the landscape by man.

Testing Area 4 contains the townland boundary between Belinstown and Lissenhall Little, the route of which is marked on the 1st edition Ordnance Survey map (1843). According to the EIS (CRDS Ltd 2008), Belinstown is an English place name which incorporates the family name of Belin or Belyn, the landowners in the fourteenth century. Lissenhall Little derived from the Irish *Lisín*, meaning 'little fort' with the 'hall' element possibly being a later addition referring to a particular building within the townland.

The Belinstown/Lissenhall Little townland boundary consists of an earthen bank and parallel U-shaped ditch (HC#413; CRDS 2008). A survey of the townland boundary (detailed in

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Section 7.0) indicated that it has been significantly modified in the recent past by agricultural activity.

Previous Archaeological Excavations

The archaeological 'Excavations Bulletin' (1970-2005) was checked for a record of any licensed archaeological investigations carried out within the townlands of Belinstown and Lissenhall Little since 1970. Two investigations were listed in Belinstown however both are pertaining to license number 99E0545 excavated by Patricia Lynch (Lynch 2000). A series of test trenches were excavated however nothing of archaeological significance was recovered. Two such investigations were listed in the townland of Lissenhall Little (00E0953 and 01E1074), both of which were carried out by Valerie J. Keeley Ltd. prior to the Northern Motorway/Airport–Balbriggan bypass construction. No features of archaeological significance were identified during the testing of 00E0953 (Lynch 2000), however an early Neolithic habitation site was identified at site 01E1074 (Reilly 2001). This site is located approximately 800m to the north of Testing Area 4.

Geophysical Survey

The geophysical survey (Thébaudeau and Harrison 2009) noted several features and trends of archaeological potential, as well as a number of ferrous anomalies and several increased magnetic responses (Figure 2). The features noted in the survey included:

- 'isolated pit-type responses and short curvilinear trends' in AS2 (G41–42) throughout the Testing Area 'which may represent plough-damaged or ephemeral' archaeology, but 'may relate to... ferrous material... in the topsoil' (Thébaudeau and Harrison 2009, 25);
- 'occasional amorphous positive [magnetic] responses' in G40–42 that were 'ill-defined and thought to represent localised pedological variations' (Thébaudeau and Harrison 2009, 25).

Cartographic Sources

Testing Area 4 comprises two Sub-areas. Sub-area 9 occupies the northeast section of two fields which are separated by the townland boundary. Sub-area 10 comprises the central area of one roughly rectilinear field to the south of Sub-area 9. When the extant present-day field systems are compared to those present on the 1st edition Ordnance Survey map (1843) it is apparent that these fields have been enlarged through the removal of internal field

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

boundaries. The southern and western boundaries of the field containing Sub-area 10 have been removed since the 2nd edition of the Ordnance Survey map (1871-1875).

5.0 OBJECTIVES

The objective of the testing was to determine the presence or absence of archaeological features, structures, deposits, artefacts or ecofacts along the route so as to inform the subsequent archaeological strategy in advance of construction. All areas of archaeological potential, sites and significant features identified in the EIS and by the geophysical survey were investigated during the testing programme.

As part of the advance archaeological testing of Metro North, all townland boundaries directly impacted by the proposed scheme were investigated and surveyed. One of these townland boundaries (Belinstown/Lissenhall Little; HC#413) was located within Testing Area 4, Sub-area 9. This boundary was investigated and recorded during the test trenching and the results of this investigation are detailed in Section 7.0 below.

6.0 METHODOLOGY AND CONSTRAINTS

The archaeological excavation licence number 09E462 was granted to John Channing of Headland Archaeology (Ireland) Ltd by the Department of the Environment, Heritage and Local Government (DoEHLG) in consultation with the National Museum of Ireland (NMI). This licence pertained to the excavation of test trenches as per the trench layout plan for Testing Area 4, which was submitted together with the licence application method statement (Figure 2).

The works were carried out by Headland Archaeology (Ireland) Ltd on behalf of the RPA on 22nd September 2009 and 12th October 2009. The methodology of the investigation complied with the Policy and Guidelines on Archaeological Excavation (Dúchas 1999) and the specification, terms and conditions of the Contract between the RPA and Headland Archaeology (Ireland) Ltd. The work was undertaken in accordance with the Code of Practice agreed between the DoEHLG and the Railway Procurement Agency.

Testing Area 4 encompassed approximately 1.82525 hectares. A total of 962.7 linear metres was excavated (1925.4m²), comprising 10.5% of the Testing Area (Appendices 1 and 2). Testing was in the form of mechanically excavated test trenches. These were excavated using a mechanical tracked excavator (generally 13.5–18 tonne) with a toothless

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

ditching/grading bucket under the direct and continuous supervision of John Channing, William O. Frazer and their supervisors. This work was overseen by the Headland Archaeology Senior Archaeologists Patricia Long and Angus Stephenson. An archaeological assistant was employed to assist the licensed director and supervisor with the recording of the trenches and the features identified within them.

The layout of the test trenches was designed to test the features of archaeological potential identified in the geophysical survey. A total of 21 trenches, generally set approximately 10m apart, were excavated throughout the Sub-areas that comprise Testing Area 4. Three trenches included in the method statement for Sub-area 9 (T2–T4) were omitted due to the presence of northeast–southwest and north northeast–south southwest overhead power lines. A third trench in Sub-area 9 (T8) was shortened at its western end for the same reason.

Where features of archaeological potential were identified, the features were cleaned back and investigated further. The purpose of the testing was to establish the nature and extent of the archaeological deposits and features present. With this in mind, partial excavation and half-sectioning of features was undertaken where appropriate but every effort was made to preserve the stratigraphical integrity of archaeological sites/features. Features of archaeological potential were sectioned to ascertain their significance. If a feature was deemed to be non-archaeological due to its character or the presence of modern datable material no detailed recording was undertaken, but notes were made on the trench sheets contained within the site archive.

Recording

Unique numbers were given to all contexts of archaeological potential and small finds identified during archaeological test trenching. Prefixes were not used by Headland Archaeology (Ireland) Ltd but context numbers are illustrated throughout the report in brackets e.g. (001). Digital photographs were taken of each field, trench and feature. All trenches were surveyed using Trimble GPS surveying equipment with accuracy levels within 3mm. All recording was undertaken on Headland Archaeology (Ireland) Ltd *pro forma* record cards. All archaeologically significant features have been related to Ordnance Datum and the Irish National Grid as per RPA Project Control.

Environmental Samples

No environmental samples were taken during the course of archaeological test trenching at Testing Area 4.

Finds Retrieval

No finds were retrieved during the course of archaeological test trenching at Testing Area 4.

6.1 Methodology for recording townland boundaries

The recording of the townland boundary consisted of a photographic survey of the length of the boundary that would be impacted by the Metro North Scheme (Plates 1, 6–10). Measurements were taken at a series of locations along the boundary and a written description was compiled. In accordance with the method statement submitted for the excavation licence a single test trench (Sub-area 9 T13) was also excavated through a section of the townland boundary (Figure 3). This was cleaned back and further investigated by hand to provide more detailed information on the nature, composition and profile of the townland boundary.

7.0 RESULTS

A total of 21 test trenches were mechanically excavated in three fields (Sub-areas 9 and 10) at Testing Area 4 (Figure 2; Plate 4), totalling approximately 962.7 linear metres of 2m-wide trenches; an area of 1925.4m². This comprised 10.5% of Testing Area 4 and an area of 18,252.5 m².

The test trenches were excavated to an average depth of 0.35–0.50m, exposing the underlying mid-yellowish brown silty clay subsoil (Plates 2, 3). This subsoil contained bands of grey yellow coarse grained silty-clay and blackish grey silty-clay. Features identified within Testing Area 4 consisted of late post-medieval–modern linear agricultural furrows orientated east–west. Two lintelled-stone ‘French’ land drains (005; 006) and one earthen land drain were also identified in Testing Area 4 (Plate 4).

No features of archaeological significance were identified in any of these trenches. A full description of all trenches is included in Appendix 2.

A survey of 105m of the townland boundary between Belinstown and Lissenhall Little (HC#413) was carried out in Testing Area 4 (Plates 1, 6–10). The boundary consisted of a

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

low earthen bank (108) measuring 0.20–0.28m in height (or 1.4–1.76m from bank top to ditch base), with a parallel water-filled U-shaped ditch (107) on the eastern side varying from 2.13 to 3.74m in width.

The bank (108) appeared to have been graded by modern machinery on its western side, with vegetation occupying its top, and both sides of the ditch. No gaps were present in the boundary. It was lined with a variety of taxa including (in descending order of frequency, with secondary colonisers listed last): mature blackthorns (*Prunus spinosa*), sporadically located along the bank; mature ash (*Fraxinus excelsior*), located towards its southern end; brambles (*Rubus fruticosus*), a likely coloniser that had overgrown much of the ditch and ivy (*Hedera helix*), also a likely coloniser rather than a deliberate cultivar.

A series of measurements (Figure 2; Plates 7-9) were taken along the length of the boundary which are representative of the minimum and maximum dimensions:

Measurement 1: ditch 3.74m wide, bank 0.20m high, depth from top of bank to base
of ditch 1.76m;

Measurement 2: ditch 3.60m wide, bank 0.28m high, depth from top of bank to base
of ditch 1.48m;

Measurement 3: ditch 2.13m wide, bank 0.20m high, depth from top of bank to base
of ditch 1.40m.

A north-facing section (Figure 3; Plate 6) was drawn following the excavation of Sub-area 9 T13 through the boundary.

7.1 Interpretative assessment of the geophysical survey anomalies in Testing Area 4

The features of archaeological potential and the ferrous anomalies noted in the geophysical survey were identified during the course of archaeological test trenching as the remains of agricultural activity, namely land clearance, land improvement (drainage) and cultivation. Specifically, the linear trends were the result of numerous plough furrows and land drains, and an occasional stone socket resulting from field clearance. Such linear agricultural features were aligned in a manner that coincided with the surviving upstanding fields and/or with the field systems represented on nineteenth-century Ordnance Survey maps. Most demonstrated physical characteristics (degree of straightness, spacing, etc.) clearly indicative of a mechanised origin and post-agricultural improvement (i.e. post c.AD1750)

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

process. In some instances, materials observed in the fills of the features confirmed a late post-medieval or modern origin (e.g. late transfer-printed ceramic, kiln-fired brick fragments, ceramic drain pipes, plastic sheeting, iron/steel fragments from modern farm machinery, etc.), and no finds indicated a date prior to the end of the eighteenth century at the earliest.

The geophysical anomalies resulting from elevated magnetic responses proved to be the result of variation in the natural subsoil, namely: pockets of more water-‘transmissive’ glacial sands and gravels; more impermeable clays in poorly drained locations where the soils had begun to gley and/or mineral pan (Fe and Mg) had begun to form. In limited instances this type of geophysical anomaly also partly correlated to the aforementioned late post-medieval/modern agricultural features described above.

In this landscape history context, late post-medieval and modern agricultural features are not considered to be archaeologically significant.

8.0 IMPACT ASSESSMENT

As Testing Area 4 incorporates the proposed footprint of the Metro North alignment and Lissenhall (provisional) Stop, any sub-surface archaeology would be subject to direct negative impact by the site preparation works (including removal of sod and topsoil) and any sub-structure associated with the lines. According to the Environmental Protection Agency’s Significance Impacts (2003, 139), this impact is likely to be significant to profound in each case. However, no significant archaeological features were identified during the course of archaeological test trenching at Testing Area 4.

Approximately 105m of the townland boundary between Belinstown and Lissenhall Little (HC#413; CRDS 2008), outlined in the results section above, will be directly impacted upon by the proposed scheme as the main train line corridor will extend through where this part of the boundary now stands. The boundary will be completely removed. According to EIA guidelines, the negative impact on the boundary will therefore be profound.

9.0 PROPOSED MITIGATION

In order to mitigate the predicted impact of the proposed scheme on Testing Area 4 a detailed mitigation strategy is presented here.

Test trenching did not reveal any finds or features of archaeological significance and no further mitigation is recommended in the areas tested.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

The part of the Belinstown/Lissenhall Little townland boundary within Testing Area 4 that will be impacted upon by the proposed depot has been fully recorded. No further archaeological work is therefore recommended in relation to it.

These recommendations are provisional and subject to review/approval by the RPA Archaeologists and the National Monuments Service, Department of the Environment, Heritage and Local Government.

REFERENCES

Literary sources

Barnes, G. and T Williamson (2006) *Hedgerow History: Ecology, history and landscape character*. Macclesfield, Windgather Press.

Department of the Environment, Heritage and Local Government and the Railway Procurement Agency (2007) *Code of Practice between the Department of the Environment, Heritage and Local Government and the Railway Procurement Agency*. Dublin: Government Publications Office.

CRDS Ltd. (2008) Material Assets: Archaeology, architectural heritage and cultural heritage, In Environmental Resources Management Ireland Limited (ed.) *Environmental Impact Statement—Metro North: Belinstown To St. Stephen's Green*, Volume 1, Book 1, Chapter 23, 399–451.

Dúchas (1999) *Policy and Guidelines on Archaeological Excavation*. Department of Arts, Heritage, Gaeltacht and the Islands, Dublin, The Stationary Office.

Environmental Protection Agency (2003) *Advice Notes on Current Practice in the Preparation of Environmental Impact Statements*.

ERM (2008) *Environmental Impact Statement – Metro North: Belinstown to St. Stephen's Green*, Volume 1, Book 1, Chapter 6, 71–96.

ERM and Jacobs Engineering Ireland Ltd (2008) "Soil and Geology". In Environmental Resources Management Ireland Limited (ed.) *Environmental Impact Statement—Metro North: Belinstown to St. Stephen's Green*, Volume 1, Book 1, Chapter 17, 311–317.

Lynch, P (2000) *Lissenhall Little: 00E0953*. Available from: www.excavations.ie [Accessed 31-07-09]

MGL and Fitzgerald, M, (2009) *Metro North Dublin City Centre to Lissenhall; Archaeological Strategy (Preliminary)* Margaret Gowen & Co Ltd and RPA (Unpublished Report for RPA) Rev.04.

O'Reilly, F. (2001) *Airport/Balbriggan Bypass, Site 2, Lissenhall Little: 01E1074*, Available from: www.excavations.ie [Accessed 31-07-09]

Pollard, E., Hooper, M.D. and Moore, N.W. (1974) *Hedges*. London.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Thébaudeau, B. and Harrison, D. (2009) *Metro North Dublin City Centre to Lissenhall, County Dublin: Geophysical Survey Report: Licence No. 08R0117*. Margaret Gowen & Co Ltd (Unpublished Report for the RPA).

Cartographic sources

6" Ordnance Survey maps, 1st Edition 1843, 2nd Edition 1871-5

25" Ordnance Survey Map, Dublin, 1906–1908

Record of Monuments and Places Constraint Map, Dublin

Websites

www.excavations.ie

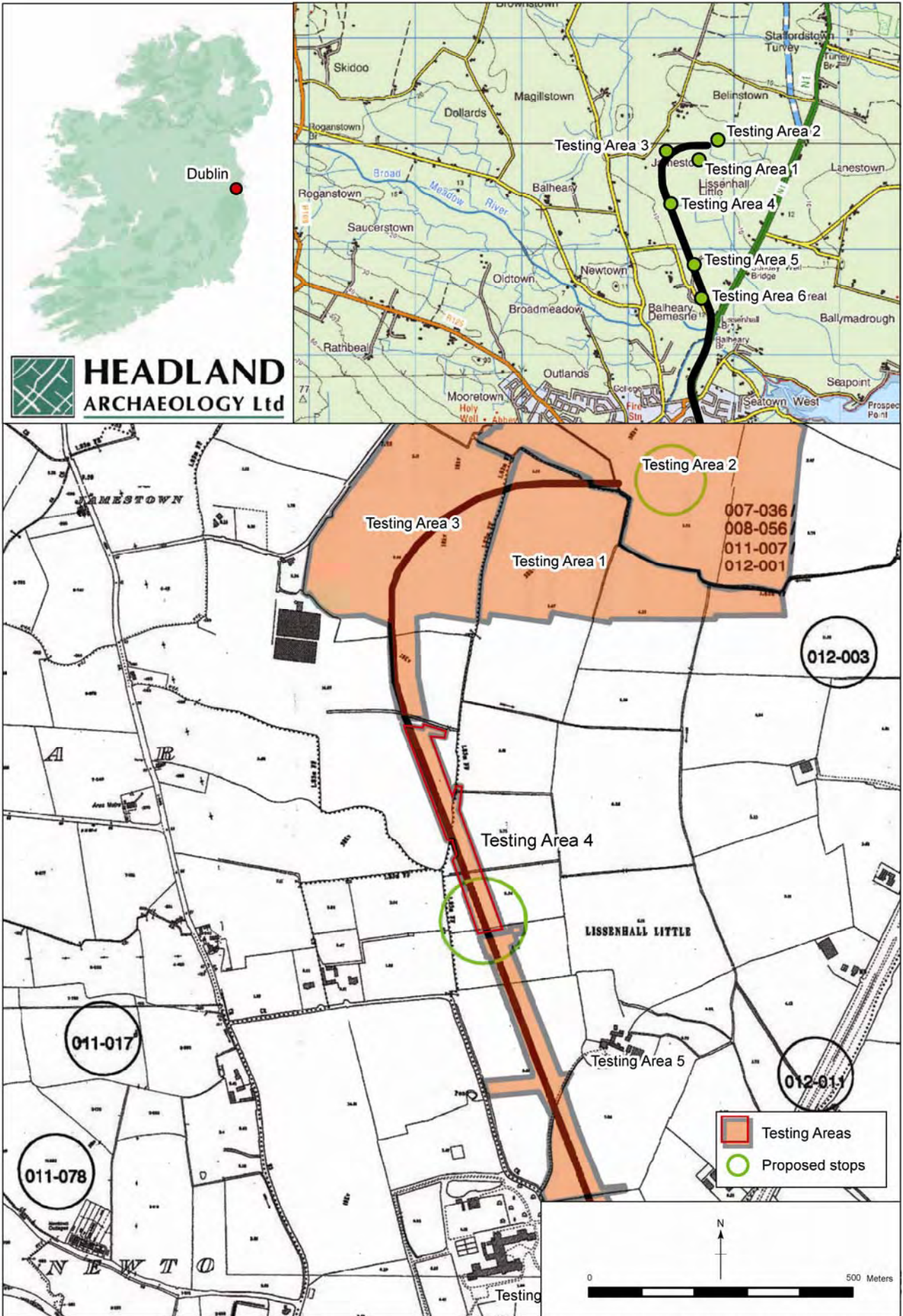


Figure 1 - Advanced Archaeological Testing of Metro North: Testing Area 4, RPA Ref: MN101 Belinstown to Fosterstown.

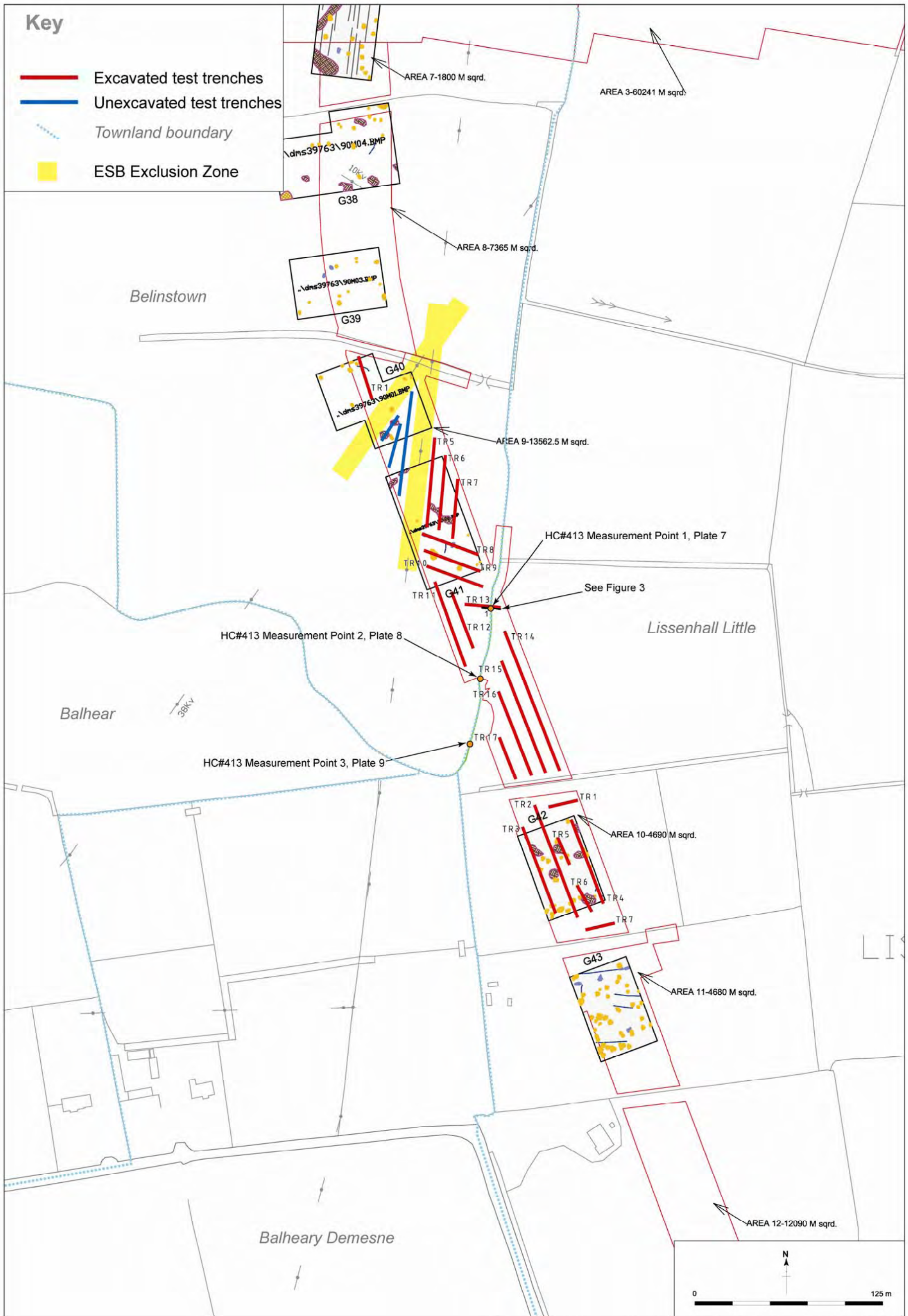


Figure 2 - Advanced Archaeological Testing of Metro North: Testing Area 4 (Sub Areas 9 & 10), Belinstown & Lissenhall Little Townland, RPA Ref: MN101 Belinstown to Fosterstown.

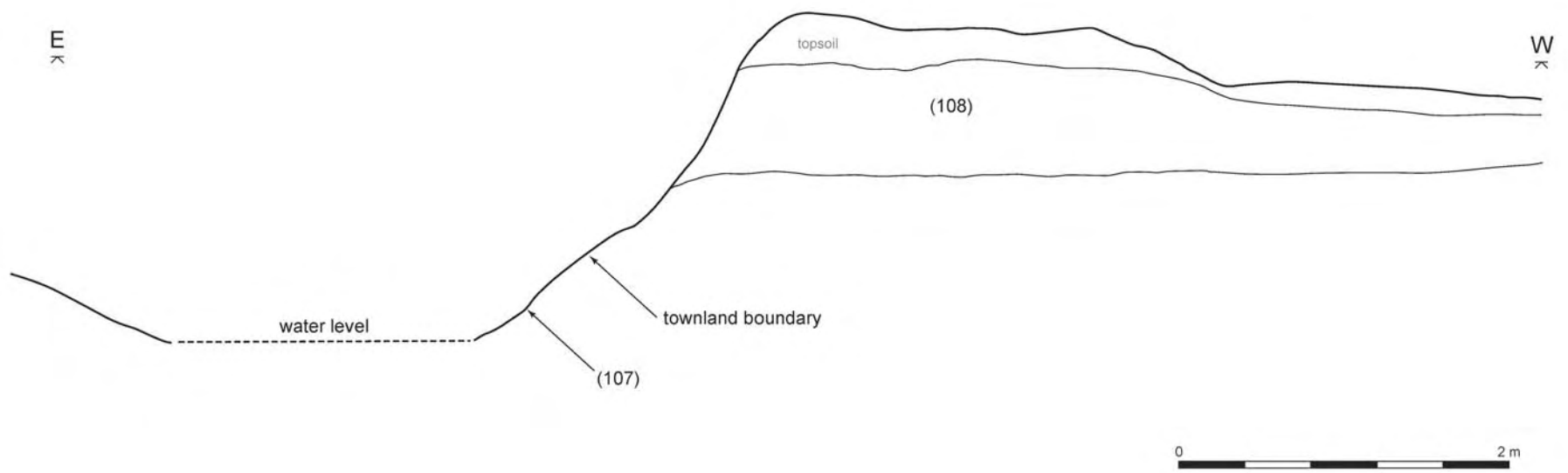


Figure 3 - Advanced Archaeological Testing of Metro North:
Testing Area 4 (Sub Areas 9 & 10), Belinstown & Lissenhall Little Townland, RPA Ref: MN101 Belinstown to Fosterstown.
North-facing section through Belinstown/Lissenhall Little townland boundary (HC#413).



Plate 1 - General view of Sub-area 9, Test trench 5



Plate 2 - General view of Sub-area 9, Test trench 14



Plate 3 - General view of Sub-area 10, Test trench 2



Plate 4 - View of Sub-area 10, Test trench 5, Drain (005)



Plate 5 - View of section excavated through townland boundary HC#413 in Sub-area 9, Test trench 13, facing southeast



Plate 6 - Eastern side of Townland Boundary (HC#413) facing northwest



Plate 7 - Measurement point 1, east side of Townland Boundary (HC#413).



Plate 8 - Measurement point 2, east side of Townland Boundary (HC#413).



Plate 9 - Measurement point 3, east side of Townland Boundary (HC#413).

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 1: Field Register

Testing Area	Sub-area	Townland(s)	Description	Total Linear Metres	Services Present
4	9	Lissenhall Little & Belinstown	Lissenhall Little: flat field in stubble (wheat); southwest part lies within Sub-area 9. Belinstown: in stubble (Queens potatoes); Low east-west ridge in centre west part of field, slopes down to north, south and east; The eastern part of the field lies within Sub-area 9.	684.5m (x 2.0m-wide trenches= 1369m ²)	Overhead power lines, obliging the omission of T2-T4 and the shortening of T8.
4	10	Lissenhall Little	Flat field in stubble	278.2m (x 2.0m-wide trenches= 556.4m ²)	None
Total				962.7m	

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 2: Trench Register

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	1	30.00	2.00	0.48	NW-SE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled orange clayey silt and light grey silty clay.</p> <p>No features of archaeological significance identified.</p>	Terminus of possible furrow (106) running E-W in south end of the test trench.
4	9	2	N/A	N/A	N/A	N/A	(not excavated due to overhead power lines)	N/A
4	9	3	N/A	N/A	N/A	N/A	(not excavated due to overhead power lines)	N/A
4	9	4	N/A	N/A	N/A	N/A	(not excavated due to overhead power lines)	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	5	60.00	2.00	0.37	NNW-SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled dark orange clayey silt and light grey silty clay with a band of dark grey gravely sand with decayed stone at the south end of trench.</p> <p>No features of archaeological significance identified.</p>	Possible furrow (104) running E-W in south end of the test trench.
4	9	6	50.00	2.00	0.42	NNW-SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled dark orange clayey silt and light grey silty clay with a band of dark grey gravely sand with decayed stone at the south end of trench.</p> <p>No features of archaeological significance identified.</p>	Possible furrow (105) running E-W in south end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	7	40.00	2.00	0.49	NNW-SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled dark orange clayey silt and light grey silty clay with narrow bands of dark grey gravelly sand with decayed stone at throughout the trench.</p> <p>No features of archaeological significance identified.</p>	Possible furrow (105) running E-W in south end of the test trench. Also recorded in Sub-area 9 Test Trench 6
4	9	8	33.50	2.00	0.35	NNW-SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact mid greyish brown silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled mid brownish yellow and mid brownish grey with inclusions of small-medium sub-angular stones.</p> <p>No features of archaeological significance identified.</p>	<p>No features present in the test trench.</p> <p>Trench shortened at W end due to overhead powerlines.</p>

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	9	40.00	2.00	0.40	ESE-WNW	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact mid greyish brown silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled mid brownish yellow and mid brownish grey with inclusions of small-medium sub-angular stones.</p> <p>No features of archaeological significance identified.</p>	N/A
4	9	10	40.00	2.00	0.35	ESE-WNW	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact mid greyish brown silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Mottled mid brownish yellow and mid brownish grey with inclusions of small-medium sub-angular stones.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	11	61.00	2.00	0.37	NW-SE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Light yellowish brown sandy clay.</p> <p>No features of archaeological significance identified.</p>	N/A
4	9	12	40.00	2.00	0.36	NW-SE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Light yellowish brown sandy clay.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	13	20.00	2.00	0.37	E-W	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact light brownish grey silty clay with humus and mineral elements.</p> <p>Natural subsoil (002): Light yellowish brown sandy clay.</p> <p>No features of archaeological significance identified.</p>	Townland boundary ditch (107) and bank (108) running N-S in western end of the test trench.
4	9	14	100.00	2.00	0.40	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	<p>E-W orientated land drain/furrow (008) located 32m from the southern end of the test trench.</p> <p>E-W orientated pair of furrows (009) located 64m and 68m from the southern end of the test trench respectively.</p>

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	15	80.00	2.00	0.60	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	E-W orientated series of ploughmarks (010) located approximately 40m from the southern end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	16	60.00	2.00	0.58	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay with occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	9	17	30.00	2.00	0.40	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay with occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	1	22.80	2.00	0.35	E/W	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	2	78.00	2.00	0.45	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	NE-SW orientated stone-filled field drain (003) located 24m from the southern end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	3	65.00	2.00	0.40	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	NW-SE orientated stone-filled field drain (004) located 21m from the southern end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	4	53.00	2.00	0.40	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	N/A

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	5	20.40	2.00	0.36	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay</p> <p>No features of archaeological significance identified.</p>	NW-SE orientated stone-filled field drain (005) located 7.5m from the western end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	6	19.00	2.00	0.35	NNW/SSE	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay and containing occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	N-S orientated stone-filled field drain (006) located 14m from the southern end of the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Testing Area	Sub-area	Trench No.	Length (m)	Width (m)	Depth (m)	Orientation	Description	Summary of Features
4	10	7	20.00	2.00	0.35	E/W	<p>Sod: Dark brown sod with humus and mineral elements.</p> <p>Topsoil (001): Over lower plough zone, moderately compact brown silty clay with moderate inclusions of small to medium sub-angular stones to mid-greyish brown loam.</p> <p>Natural subsoil (002): Alternating bands of clay, mid-yellowish brown silty clay mottled with mid to dark blackish grey silty clay with occasional stone inclusions and grey gravelly clay.</p> <p>No features of archaeological significance identified.</p>	NW-SE orientated series of ploughmarks (007) located spread out across the test trench.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 3: Context Register

Preparation of the context register included the compilation of numbers originally assigned according to the date on which fieldwork was undertaken: with numbers beginning from (001) for initial fieldwork (September, John Channing); and number beginning from 101 for later fieldwork (October, William O. Frazer).

Context No.	Testing Area	Sub-area	Trench No.	Type (cut/fill/deposit)	Length (m)	Width (m)	Depth (m)	Description	Interpretation
001	4	All	All	Deposit	-	-	0.4	Dark brown sod with humus and mineral elements. Overlying lower plough zone, moderately compact mid brown silty clay with moderate inclusions of small sub-angular stones to mid-greyish brown loam.	Topsoil including plough zone
002	4	All	All	Deposit	-	-	-	Alternating bands of clay. Mid-yellowish brown silty clay, pale yellowish grey silty clay and dark blackish grey silty clay. Moderate stone inclusions and occasional patches of gravel.	Natural subsoil

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Context No.	Testing Area	Sub-area	Trench No.	Type (cut/fill/deposit)	Length (m)	Width (m)	Depth (m)	Description	Interpretation
003	4	10	2	Cut+ Fill	-	0.35	0.3	Linear feature orientated NE-SW filled with pale brown silty clay over medium sub-angular stones.	Cut of French (lintelled-stone) land drain
004	4	10	3	Cut+ Fill	-	0.20	-	Linear feature orientated NW-SE, filled with medium sub-angular stones.	Cut of French (lintelled-stone) land drain
005	4	10	5	Cut+ Fill	-	0.30	-	Linear feature orientated NW-SE, filled with medium sub-angular stones.	Cut of French (lintelled-stone) land drain
006	4	10	6	Cut + Fill	-	0.30	-	Linear feature orientated N-S, filled with medium sub-angular stones.	Cut of French (lintelled-stone) land drain
007	4	10	7	Cut	-	0.05	-	Series of narrow linear parallel features orientated NW-SE and regularly spaced 0.50m apart.	Series of three ploughmarks
008	4	9	14	Cut+ Fill	-	0.40	-	Linear feature orientated E-W, filled by greyish brown silty clay with frequent small angular stones.	Cut of land drain/furrow

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Context No.	Testing Area	Sub-area	Trench No.	Type (cut/fill/deposit)	Length (m)	Width (m)	Depth (m)	Description	Interpretation
009	4	9	14	Cut+ Fill	-	0.70	-	Pair of parallel E-W orientated linear features, 4m apart and filled with pale brown silty clay	Pair of furrows
010	4	9	15	Cut	-	0.05	-	Series of narrow, regularly spaced, parallel linear features, orientated E-W	Series of three ploughmarks
101	4	All	All	Deposit	-	-	0.38	Moderately compact mid grey silty clay with humus material and occasional small sub-angular stones.	Sod and topsoil in north field of Sub-area 9
102	4	All	All	Deposit	-	-	-	Mottled light grey silt clay and dark orange brown clay silt with bands of dark grey gravelly sand	Natural subsoil in north field of Sub-area 9
103	4	9	VOID	N/A	N/A	N/A	N/A	N/A	N/A
104	4	9	5	Cut+ Fill	-	0.49	0.10	Linear feature orientated E-W. Gradual sides and breaks of slope filled by light grey silt clay.	Cut and fill of possible furrow
105	4	9	6,7	Cut + Fill	-	0.49	0.10	Linear feature orientated E-W. Gradual sides and breaks of slope filled by light grey silt clay.	Cut and fill of possible furrow

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Context No.	Testing Area	Sub-area	Trench No.	Type (cut/fill/deposit)	Length (m)	Width (m)	Depth (m)	Description	Interpretation
106	4	9	1	Cut + Fill	0.50	0.49	0.08	Linear feature orientated E-W. Gradual sides and breaks of slope filled by light grey silt clay.	Cut and fill of possible furrow
107	4	9	13	Cut	170m	3.60	0.60	Curvilinear feature orientated N-S. Gradual breaks of slope on top, steep sides and unclear base due to water in the base of the ditch.	Cut of ditch of Townland Boundary
108	4	9	13	Deposit	170m	3.15	0.84	Curvilinear earthen bank orientated N-S. Firmly compacted light yellowish brown sandy clay with inclusions of small stones and roots.	Bank of Townland Boundary, gently sloping at the bottom to steep at the top.

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 4: Photo register

Photo No.	Camera No.	Sub-area	Trench No.	Townland	Direction Facing	Description
1024	Cas15C	10	7	Lissenhall Little	E	General Test Trench overview
1025	Cas15C	10	3	Lissenhall Little	N	General Test Trench overview
1026	Cas15C	10	3	Lissenhall Little	NW	French drain (004)
1027	Cas15C	10	3	Lissenhall Little	SE	General Test Trench overview
1028	Cas15C	10	2	Lissenhall Little	NE	French drain (003)
1029	Cas15C	10	2	Lissenhall Little	S	General Test Trench overview
1030	Cas15C	10	1	Lissenhall Little	E	General Test Trench overview
1031	Cas15C	10	1	Lissenhall Little	W	General Test Trench overview
1032	Cas15C	10	4	Lissenhall Little	S	General Test Trench overview
1033	Cas15C	10	5	Lissenhall Little	NW	French drain (005)
1034	Cas15C	10	5	Lissenhall Little	N	General Test Trench overview
1035	Cas15C	9	17	Lissenhall Little	N	General Test Trench overview
1036	Cas15C	9	16	Lissenhall Little	N	General Test Trench overview
1037	Cas15C	9	15	Lissenhall Little	N	General Test Trench overview
1038	Cas15C	9	14	Lissenhall Little	N	General Test Trench overview
1297	Casio 15	9	11	Belinstown	NW	General view of Test Trench 11

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Photo No.	Camera No.	Sub-area	Trench No.	Townland	Direction Facing	Description
1298	Casio 15	9	VOID	Belinstown	VOID	VOID
1299	Casio 15	9	12	Belinstown	NW	General view of Test Trench 12
1300	Casio 15	9	7	Belinstown	NNW	General view of Test Trench 7
1301	Casio 15	9	6	Belinstown	NNW	General view of Test Trench 6
1302	Casio 15	9	5	Belinstown	NNW	General view of Test Trench 5
1303	Casio 15	9	8	Belinstown	ESE	General view of Test Trench 8
1304	Casio 15	9	9	Belinstown	ESE	General view of Test Trench 9
1305	Casio 15	9	10	Belinstown	ESE	General view of Test Trench 10
1306	Casio 15	9	13	Belinstown	SE	General view of Test Trench 13
1307	Casio 15	9	13	Belinstown	SE	Details of Townland Boundary HC#413 in Test Trench 13
1308	Casio 15	9	13	Belinstown	SSE	Details of Townland Boundary HC#413 in Test Trench 13
1309	Casio 15	9	1	Belinstown	SE	General view of Test Trench 13

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 5: Drawing register

Drawing No.	Type	Scale	Trench No.	Townland	Description
001	Section	1:20	Sub-Area 9 Test Trench 13	Belinstown and Lissenhall Little	North-facing section through Townland Boundary HC#413

Headland Archaeology (Ireland) Ltd

Title: Metro North, Assessment Report on the Results of Advance Archaeological Test Trenching, Testing Area 4, Belinstown and Lissenhall Little townlands, Co. Dublin,

RPA ref: (MN101) Belinstown to Fosterstown

Appendix 6: Archive Quantities

Item	Quantity
Context Sheets	18
Trench Record Sheets	21
Field record sheets	3
Drawings	1
Photographs	27
Registers	5
Notebooks	0