A1-A192 LINK ROAD, SOUTH EAST NORTHUMBERLAND

ARCHAEOLOGICAL EVALUATION

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Frontispiece: Trench 3 looking NNW

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This report describes a programme of archaeological evaluation trenching conducted to further inform a proposal by Northumberland County Council for the construction of a Link Road between the A1 and the A192 to the north east of Morpeth in south-east Northumberland. An archaeological assessment carried out in 2002 had provided contextual information regarding the archaeological and historical development of the area, demonstrating that it has been the focus of intensive human activity since later prehistory. The trenching was devised to determine the precise impact of the proposed scheme on the area's cultural heritage remains, and was focussed on the investigation of features previously identified by a programme of geophysical survey.

The most prevalent archaeological remains revealed by assessment and geophysical survey within the corridor of easement comprise extensive areas of ridge and furrow cultivation features, along with associated land divisions and settlement remains. Traces of late prehistoric and Romano-British settlements are also represented, along with post-medieval industrial and modern military sites.

The assessment of the area concluded that two fields of significantly upstanding ridge and furrow earthworks (Sites 1, 4), both catalogued during the previous phases of assessment work, will be directly and substantially impacted by construction of the A1-A192 Link. It further concluded that several possible features identified by the geophysical investigation would be impacted by the construction of the link road, including areas of levelled ridge and furrow, possible ditched features or drains f1/14-15, f1/18, f2/9-10 and f2/14, headland feature f2/6-7, 'kiln' f1/19 and arcuate feature f2/15.

The investigation of these features by archaeological trenching revealed little archaeological evidence of any significance, other than features indicative of widespread medieval and later farming practices. Most of the trenches revealed evidence of modern field drains, which represented the most widespread class of features discovered by excavation and along with plough furrows can be linked to the majority of linear anomalies identified on the geophysical plot. Plough furrows, field lynchets and a possible township boundary ditch were also recorded.

Episodes of intensive agricultural activity during the medieval and post-medieval periods have probably been responsible for removing most traces of earlier activity in the area, while the ridge and furrow earthworks have themselves been levelled by modern ploughing.

Trenches 5 & 6 provide the only potentially significant archaeological evidence in the form of patches of charcoal and associated deposits intruding into the subsoil which may reflect agricultural clearance activity at some stage in the past, on the basis of similar examples revealed in the vicinity of Pegswood, which proved to be of Iron Age date. The tentative nature of this interpretation should be emphasised, however, and, although their presence is of some contextual interest, these features are not considered to merit preservation in situ or further mitigation by record.

Accordingly, no further archaeological evaluation or mitigation measures are recommended with respect to the features investigated by the excavations. However, recommendations made during the assessment phase, for the mitigation of the road's impact upon upstanding ridge and furrow earthworks by means of a topographical survey record and for the archaeological monitoring of construction operations for the proposed roundabout on the A192 (the former Great North Road), remain valid.

1.1 Purpose of Evaluation

The following is a report on a programme of archaeological evaluation trenching carried out at West Lane End farm, on the north side of Morpeth, by the Archaeological Practice Ltd. on behalf of Northumberland County Council. The programme was designed to further inform the proposal by the County Council to construct a new link road between the A1 and the A197, near Morpeth in south-east Northumberland, specifically the western stretch of the route, between the A1 and the A192. The trenching investigated features previously identified by a programme of geophysical evaluation.

The proposed link road traverses an area of rolling farmland to the north of Morpeth, typical of the coastal lowlands of south-east Northumberland. The solid geology of the area is overlain by up to 20m thickness of glacial drift, comprising clays, silts, sands and gravels. The course of the proposed link road route is predominantly under pasture.

1.2 Cultural Heritage Background

A review of cultural heritage issues for the whole of the A1-SE Northumberland Link Road corridor was carried out by the Archaeological Practice (see Reference 1), in order to assess the continuing validity of conclusions reached in the previous Stage 2 and Stage 3 environmental assessment reports (References 2 & 3). This concluded that the road corridor is an area of significant archaeological interest with the potential to contain remains which do not lend themselves to identification through aerial photographs.

1.2.1 Cultural Heritage Assessment

The full assessment of both discrete and more extensive historical landscape components, conducted subsequently by The Archaeological Practice (Reference 4), revealed that the area of the A1-A192 corridor and its immediate environs, north west of Morpeth, has witnessed intensive human activity, including both settlement and agricultural cultivation, since later prehistory.

The most prevalent archaeological features revealed within the corridor comprise extensive areas of ridge and furrow field systems, which survive either as upstanding earthworks (e.g. Sites 1, 4,, 7, 10-12, 15-17) or as infilled furrows in the subsoil (e.g. Sites 3, 5-6, 14). These field systems bear witness to the successive phases of intensive agricultural cultivation carried out during the medieval and early modern periods.

In the wider environs, traces of late prehistoric and Romano-British settlements are well-represented as cropmarks visible through aerial photography (Sites 18-19, 27-29), and in some cases clearly constitute sites of some complexity.

Evidence of post-medieval, brick, tile and perhaps pottery production, including clay extraction (Sites 12 and 21) also exist immediately to the south of the corridor, whilst the well-preserved pillboxes of the Wansbeck defence line (Sites 22 and 26) testify to the impact of 20th-century conflict.

Of the present-day settlements immediately adjacent to the Link Road corridor, East Lane End (Site 8) represents a very long-established farmstead, probably originating as one of the granges (Highley Grange) set up by Newminster Abbey to organise the exploitation of its lands. By contrast, West Lane End Farm (Site 9) is a much more recent creation, being a farmstead of the early 19th century, and the houses at Butley Ben are of 20th-century origin.

1.2.2 National Cultural Heritage Significance

The group of four pillboxes between Mitford and Spital Hill (Site 22) is a scheduled ancient monument and, in consequence, is regarded as of national significance. The other pillboxes of the Wansbeck line (e.g. Site 26: Kater Dene pillbox) were self-evidently also associated with national defence, but have not been accorded statutory protection and therefore have lesser significance.

The Great North Road, represented by the course of the present A192, was one of the principal highways of the medieval and early modern English state, and may conceivably be Roman in origin. It retained this significance up to the construction of the present A1 dual carriageway in 1970. It is, however, uncertain to what extent archaeological deposits associated with the earlier phases of the Great North Road still survive.

1.2.3 Regional and Local Cultural Heritage Significance

The Iron Age/Romano-British settlement sites (18-19, 27-29) are regionally significant.

The medieval hospital site at Spital Hill (20) may also be of regional significance, although no extant medieval remains have been identified so the precise location of the hospital is uncertain and the state of preservation of any buried medieval archaeological structures and deposits is unknown.

East Lane End (Site 8), which may have originated as a medieval grange, could have regional cultural heritage significance if buried structures and deposits associated with the grange survive. However, no extant medieval remains have yet been identified.

West Lane End (Site 9), a farm complex newly established in the early 19th century, is of local significance only. The well shown just to the south of the farm on the 6 in Ordnance Survey 1st edition (1866) need be no older than the farm itself.

The ridge and furrow field systems have only local significance. Their integrity has already been impacted by combination of modern ploughing and reseeding operations, which have levelled the earthworks in several fields, and by the construction of the A1 dual carriageway, which has bisected the fields between West Lane End and St Leonard's Lane. The remaining sites, such as brick and tile works, are of local significance only.

The interpretation and date of the features revealed only as geomagnetic anomalies remain uncertain and consequently their significance cannot yet be precisely determined. The discovery by excavation of structures, finds or deposits enabling the character, date and state of preservation of such features to be determined would increase the significance of such sites.

Although the A1-A192 Link Road corridor is now under pasture, the long history of arable cultivation in the area north of Morpeth is evinced by the extensive ridge and furrow field systems and the more recent ploughing and reseeding. It is likely that this has had a significant impact on the archaeological remains of earlier periods, removing any shallow features or deposits, and resulting in the survival only of features cut more deeply into the subsoil.

1.3 Results of the Geophysical Investigation

An initial geophysical survey was undertaken by GeoQuest Associates in March 2002, during which an 80m wide corridor of easement of the proposed bypass, encompassing a total area of 9 hectares, was mapped using a fluxgate gradiometer. Following realignment of the proposed junction of the link road with the A1 trunk road, a further programme of geophysical investigation was undertaken which extended the survey area southwards by a distance of about 300m on either side of the A1. The full results are set out in two reports by GeoQuest Associates (References 5 and 6).

No.	Archaeological Features	Confidence limit
f1/8	Ridge and furrow	75%
f1/9	Ridge and furrow	85%
f1/10	Ridge and furrow	70%
f1/11	Old field boundary	60%
f1/12	Ridge and furrow	30%
f1/13	Ridge and furrow	80%
f1/14	Ditch/field boundary	65%
f1/15	Ditch/field boundary	65%
f1/16	Pit/pond	60%
f1/17	Ridge and furrow	80%
f1/18	Track/boundary ditch	80%
f1/19	Fired structure	40%
f1/20	Drainage ditches/disturbance	60%
f1/21	Headland/stony bank/ditch	60%

A total of 14 possible archaeological features were identified by the initial survey.

The majority of these appear to represent ridge and furrow cultivation features (f1/8-13, f1/17, f1/21) and associated field boundaries, some of which correspond with sites CH 29-30, already identified, and which relate to the medieval and early modern cultivation of this area. The geophysical survey provides a useful record of this field system, by tracing the alternate rows of soil-filled furrows and truncated ridges left in the subsoil. Similarly, a group of lobate positive magnetic anomalies (f1/16), plotted in the field (1) immediately west of West Lane End Farm, corresponded in their location to a waterlogged hollow in that field, and can therefore confidently be interpreted as a filled-up pond.

In addition, four features were identified which could not immediately be conclusively related to the ridge and furrow cultivation patterns: f1/14-15, f1/18 and f1/19. Although these were interpreted by the geophysical investigator as earlier field boundaries or trackways with side ditches, information provided by the farmer at West Lane End, Mr Brown, suggested that f1/14-15 and f1/18 should probably be interpreted as pairs of stone-built drains. One of the drains corresponding to f1/18 can be seen to emerge at SE corner of the field (2) to the north of West Lane End. One remaining feature, a geomagnetic anomaly indicative of a fired structure (f1/19), such as a kiln or hearth, could not be related to any features recorded in that area, either through the farmer's personal recollection or the historic map evidence.

In consultation with the County Archaeologist, f1/19 was determined to be of sufficient potential significance to require further evaluation or recording. It was also determined that excavation of a trial trench targeted at f19 would additionally provide the opportunity to investigate f1/18, as a representative example of that group of probable drains discussed above.

In addition, in order to mitigate, by record, any possible damage to the system of upstanding ridge and furrow in field 1 (CH 29), it was decided that a trench should be cut through f1/21, a well-preserved headland lynchett, to record its profile and makeup, and a topographic survey undertaken of all the surviving earthworks in the field.

A further 14 possible archaeological features were identified by a second survey. These were located in five survey blocks labelled Areas 1-5.

No.	Archaeological Features	Confidence limit		
	Area 1			
f2/2	Ridge and furrow	95%		
	Area 2			
f2/4	Land drains, ridge and furrow	50%		
f2/6	Headland feature	50%		
f2/7	Headland feature	50%		
	Area 3			
f2/8	Ridge and furrow	50%		
f2/9	Ditches or drains	65%		
f2/10	Ditch or drain	70%		
Area 4				
f2/11	Land drains, ridge and furrow	70%		
f2/12	Ditch or drain	40%		
Area 5				
f2/13	Ridge and furrow	90%		
f2/14	Possible linear ditch	25%		
f2/15	Possible circular ditch	20%		
f2/16	Ditch or drain	40%		
f2/17	Ditch or drain	40%		

Again, the geophysical survey recorded extensive areas of levelled ridge and furrow (f2/2, f2/4, f2/8, f2/11, f2/13), with evidence in some cases (f2/4, f2/11) that much later systems of field drains had been laid in the furrows. A linked pair of positive and negative magnetic lineations (f2/6-7), were identified in Area 2 about 5m south of and parallel to the present field boundary (formerly the boundary between Benridge and Spital Hill townships). These were interpreted as rubble and soil headlands created by ploughing, or minor ditches or wall footings along an earlier course of the field boundary.

In Area 3 a series of minor positive magnetic lineations following two slightly different orientations (f2/9-10) was identified. The more northerly set (f2/10) probably correspond to f1/7 (interpreted as 'evidence for a set of tile land drains') in the initial survey area. Both sets/f2/9 and f2/10 most likely represent a system of tile land drains, but could also be interpreted as soil-filled wheel ruts or minor silted ditches.

Several weak positive linear anomalies were detected within the dominant anomaly patterns arising from the land drains and ridge and furrow in Areas 4 (f2/12) and 5 (f2/14, f2/16-17). The linear anomalies were orientated roughly N-S and E-W and were tentatively interpreted as either minor soil-filled ditches or, alternatively, tile drains.

An extremely weak arcuate anomaly (f2/15) was recorded in the centre of the area. This was plotted as a circular feature but its exact form is uncertain. Moreover, it is noteworthy that the pattern of ridge and furrow, so clear in the rest of the field, is much less distinct here (see Reference 6, figure 2), which suggests there has been significant post-medieval ground disturbance in this part of the field, perhaps associated with construction operations for the A1 trunk road. Feature f2/15 may simply be a further reflection of such disturbance.

Two features located in Areas 3 and 4 were interpreted as possible spreads of brick, tile or iron debris (f2/1). However consultation of aerial photographs and discussion with Mr Brown, the tenant farmer at West Lane End has convincingly demonstrated that these two spreads relate to spoil dumping during construction of the adjacent A1 route in 1970. The small spread in Area 3 was a site of a temporary spoil dump whilst the extensive spread at the north end of Area 4 represents an area of infilling where the spoil was used to fill a depression in the field. This infilling can be seen to

continue into the area of the first survey as feature (f1/1). A third similar spread (f2/1), at the south end of Area 5, relates to the diversion of St Leonard's Lane (C148) as part of the A1 construction works. There a sharp right-angled bend in the lane was realigned to become a somewhat gentler curve, the previous course being removed and turned to pasture.

In consultation with the County Archaeologist, f2/6-7, f2/9, f2/14-15 were determined to be of sufficient potential significance to require further evaluation or recording.

2.1 Aims

The aims of the programme of evaluation trenching were to investigate the range of potentially significant magnetic anomalies identified through geophysical survey, to confirm their character and determine, as far as possible, their date, function and state of preservation, as outlined in the evaluation project design (Reference 7).

2.2 Methods

The trenches were all set out at 90° to the anomaly they were intended to investigate and were also targeted, where suggested by the geophysics, at the intersection of features. In all the trenches the turf and topsoil overburden was removed by machine excavator and the surfaces revealed, including any archaeologically significant features thus identified, further investigated by hand.

2.3 Trench Location and Extent

The location and extent of evaluation trenching is shown on Figures 1 and 2 and is tabulated below.

Trenches	Anomaly no.	Suggested interpretation
T1 : 1 x 1.5m by 10m	f1/21	Headland/stony bank/ditch
T2 : 1 x 2m by 20m	f1/18	Drain
	f1/19	Fired structure
T3 : 1 x 2m by 15m	f2/6-7	Headland feature
T4 : 1 x 1.5m by 15m	f2/9	Ditches or drains
T5 : 1 x 2m by 14m	f2/15	Possible arcuate ditch
T6 : 1 x 2m by 11m	f2/14	Possible linear ditch

Trench 1 (f1/21)

Anomaly description: With the geomagnetic characteristics of a stony bank, anomaly f1/21 represents a former field boundary and headland, still visible as a bank and lynchet, at the southern edge of the road corridor, in the field immediately to the west of West Lane End Farm (field 1). It forms part of the system of ridge and furrow earthworks visible in this field.

Trench description: Feature f1/21 is located at the southern edge of the Link Road corridor and may be impacted by construction works. Accordingly, a single 1.5m x 10m trench was cut across the lynchett to provide a record of its structure and profile. The trench was orientated NW-SE, at 90° to line of the lynchett.

Trench 2 (f1/18-19)

Anomaly descriptions: Two positive magnetic lineations (f1/18) bisect the field immediately to the north of West Lane End Farm (field 2), heading from the SE corner of the field towards its NW corner. Information provided by the farmer at West Lane End, Mr Brown, suggests that f1/18 should probably be associated with a drain which can be seen to emerge, in the form of a concrete culvert pipe, at the SE corner of the field. F1/18 does not respect and therefore appear to be contemporary with the principal pattern of NW-SE orientated ridge and furrow identified in this field. It may, however, be related to a fainter, fragmentary pattern of east-west orientated lineations - perhaps field drains - in the southern corner of the field, which run roughly parallel to f1/18 (Reference 5: figures 3 & 4). A geomagnetic anomaly (f1/19) 'consistent with thermoremanent magnetism residing in an *in situ* fired structure, such as a kiln' (Reference 5), was also identified in field 2, on the line of the southernmost of the parallel lineations of f1/18.

Trench description - These anomalies were investigated by means of a single 2m by 20m trench. This was laid out on a NNE-SSW orientation, at 90 degrees to the course of the f1/18, to include f1/19 and determine the relationship between these various features.

Trench 3 (F2/6-7)

Anomaly description: A linked pair of positive and negative magnetic lineations ($f^{2/6-7}$) were identified in Area 2 about 5m south of, and parallel to, the present field boundary (formerly the boundary between Benridge and Spital Hill townships).

Trench description: A 2m by 10m trench was laid out on a NNW-SSE orientation at 90 degrees to f2/6-7, to establish whether these anomalies represent rubble and soil headlands created by ploughing or perhaps minor ditches or wall footings along an earlier course of the field boundary.

Trench 4 (f2/9)

Anomaly description: A series of minor positive magnetic lineations following two slightly different orientations (f2/9-10) was identified in Area 3.

Trench description: A single 1.5m by 15m trench was positioned to intersect at 90° two of the positive magnetic lineations forming part of f2/9.

Trench 5 (f2/15)

Anomaly description: An extremely weak arcuate anomaly (f2/15) was detected in the centre of Area 5. This was plotted as a circular feature (see Reference 6, figures 3-4), although its exact form was admitted to be uncertain (Reference 6, 6).

Trench description: The arcuate anomaly f2/15 was investigated by means of a single 2m by 14m trench laid out on a N-S orientation. The trench was also positioned to cross the end of a further, weak positive linear anomaly (no feature number assigned), aligned E-W and provisionally interpreted as a minor soil-filled ditch or land drain.

Trench 6 (f2/14)

Anomaly description: A weak positive linear anomaly was detected in Area 5 (f2/14) which differed from other such linear anomalies recognised in Areas 4 and 5 (e.g. f2/12 and f2/16-17) in following a sinuous, curving course rather than a very straight alignment.

Trench description: The 2m by 11m trench was laid out on a N-S orientation to cross the linear anomaly f2/14 at 90°.

3.1 Trench 1

Trench 1, measuring 10m x 1.5m, was cut across the distinct NE– SW oriented lynchet in the field immediately to the west of West Lane End Farm, with the aim of providing a record of the feature's structure and profile. The lynchet sloped downward from south to north and coincided with a pair of closely-spaced linear anomalies identified by the geophysical survey (f1/f21).

Underlying the turf and topsoil was a heavy orange/brown silty clay (102). This deposit overlay the natural subsoil composed of cleaner yellow-orange clay (105). The surface of the natural was seen to step down abruptly at the south end of the trench. Cutting through all these layers, midway along the trench, was a narrow slot (104) containing a terracotta field drain. This was set at a depth of 1m in a fill of brown silty clay (103).

Interpretation

Fired material like the terracotta pipe of the field drain produces a strong signature in a magnetometry survey and probably accounted for the principal geomagnetic anomaly. The second geomagnetic lineation probably reflects the sudden drop in the level of the underlying natural subsoil at the southern edge of the trench presumably caused by transition between one former ploughfield and another. Deposit 103 may be interpreted as a buried ploughsoil formed by the gradual build up of material at this edge of the southern field as a result of prolonged ridge-and-furrow cultivation, whilst, conversely, in the field to the north, the same process continually cut into the accumulated bank of ploughsoil and the underlying natural, dragging soil northward down the slope into the dip in the centre of the field.

3.2 Trench 2

Trench 2 was aligned NNE-SSW and measured 20m x 2m. It was positioned to overlie linear anomalies, f1/f18, and f1/19, a putative fired structure suggested by the geophysical survey. Removal of the turf and topsoil revealed a subsoil of orange brown/grey silty clay (202). Approximately half way along the trench, a narrow band of orange gritty clay (203) was evident crossing the trench. Investigation revealed this to be the fill of a cut (204) containing a relatively modern terracotta field drain.

Interpretation

Pipe trench and drain evidently represent the more southerly of the two parallel linear anomalies identified by the geophysical survey. The second lineation, which had weaker signatures than the field drain in the geophysical survey, was not revealed.

3.3 Trench 3

The geophysical survey for the area of trench 3 showed a linear anomaly running ENE-WSW across the field (f2/6-7). Trench 3, measuring 2m x 15m, was aligned NNW-SSE to bisect this anomaly at 90°. Removal of the topsoil revealed a yellow/orange silty clay sub-soil (302). Cutting across this was a narrow band of darker clay (303) which, upon excavation, proved to be a pipe trench (304) occupied by a modern field drain like those encountered in trenches 1 & 2. Towards the north end of the trench, the surface of the subsoil dipped downward as it approached the hedgeline, reaching a depth of 0.75m, pointing to the existence of an infilled ditch running beneath the present hedge.

Interpretation

Excavation demonstrated that anomaly f2/7 shown on the geophysical survey plot was a field drain, rather than a masonry feature, such as a stone wall footing, as previously inferred. The hedge immediately north of the trench formerly marked the boundary between Spital Hill and Benridge

townships. The excavation results indicate this boundary was previously marked by a ditch instead of the current hedge.

3.4 Trench 4

This trench, measuring 15.2m x 1.5m, was laid out on a NNE-SSW axis at 90° to the series of linear anomalies labelled f2/9. Excavation of the trench revealed three features within a yellow/grey silty clay subsoil (402). At the north end of the trench a linear feature (404), lying at 45° to the long axis, was marked by a 0.20m wide strip of darker clay fill (404). On investigation this was found to contain a modern, blue plastic field drain (408) at a depth of 1.04m. Between 1.8m-2.8m further south, a second 0.2m wide strip of darker clay fill (405) indicated the position of another field drain, which crossed at 90° to the trench's main axis. The cut for this drain (406) was only 0.45m deep and held an older clay drainpipe (409). At a distance of 2.7m from the south end of the trench, a 0.8m wide band of darker clay fill (407) marked the position of another linear feature, which again intersected the trench at an angle of 90°. Investigation revealed this feature (411) contained yet another field drain, a terracotta pipe (410) at just over 1m in depth.

Interpretation

The position and alignment of features 406 and 411 correspond to two of the linear anomalies revealed by the geophysical survey and designated f2/9. This strongly suggests that all three parallel lineations labelled f2/9 form part of a system of terracotta land drains. Although feature 411 was unusually wide for an ordinary field drain, no differences in the composition of its fill (407) were noted to suggest that the drain represents a later insertion into an earlier backfilled ditch. A more likely explanation for the increased width of the trench at this point is localised trench collapse during initial excavation, necessitating re-excavation of the trench including its slumped sides. It is noteworthy that the southern lineation of geomagnetic anomaly f2/9 is similarly prominent at the point where trench 4 intersects it, but rapidly reduces in strength as it continues further north east and south west, where it is no more conspicuous than the more northerly lineation, which can be firmly identified with a land drain trench of normal width. The third field drain (408) was not traced on the geophysical survey results, but other lineations (designated f2/10 and f1/7), following the same orientation, are evident on the survey plot further to the north in the same field, suggesting that this drain too forms part of a more extensive system. Both these systems cut across the pre-existing ridge and furrow in this field, which although now levelled, was traced by the geophysical survey as anomaly groups f1/9 and f2/8.

3.5 Trench 5

The geophysical survey results show a linear feature approximately 10m in length on an E-W alignment, bisecting a tentatively identified circular feature (f2/15) in Area 5 of the geophysical investigation. Trench 5 was positioned so that it overlay the linear feature and part of the supposed circular feature. It was aligned N-S with dimensions of 14m x 2m. Removal of the topsoil revealed a heavy orange/brown clay subsoil (502) within which two features were apparent, neither of which clearly relate to the features suggested by the geophysical survey. The first feature, a small patch of charcoal (503), was revealed 2m from the south end of the trench. Subsequent excavation revealed a very shallow deposit of charcoal extending to a depth of approximately 10cm, overlying a pocket of light grey clay (507) extending to a depth of 40cm. The second feature, a band of orange/grey clay (505) approximately 20cm in width, crossed the trench at 45° in a NW – SE direction. This was excavated to reveal another modern terracotta field drain (506). No evidence of a circular feature was uncovered.

Interpretation

Deposits 503 and 507 appear to fill an irregular cut or depression (504). The feature is most convincingly explained as the residue of 'slash-and-burn' clearance activity - cut 504 probably represents the site of a tree uprooted after the vegetation had been burnt off, whilst the fills (503, 507) comprise soil enriched by that burning process and redeposited in the tree bowls by subsequent

cultivation processes. Similar features discovered recently in the vicinity of Pegswood were subjected to close analysis and found to be of Iron Age date (Reference 8).

3.6 Trench 6

Trench 6 was laid out to intersect a linear geomagnetic anomaly (f2/14), which was plotted as running W-E before curving gently SE. Trench 6 was aligned N-S with dimensions 2m x 11m. Excavation revealed a subsoil of yellow/grey silty clay (602) beneath the topsoil. Three features were apparent. Towards the south end of the trench, a patch of gritty, sandy dark-brown soil, which included some yellow grey clay and burnt inclusions (607), was noted. This deposit filled a shallow cut or depression (608), only c. 0.05m deep. Adjacent to this was a broad linear band of sticky grey-yellow clay (605) running across the trench at an angle of c. 45°. Excavation revealed this feature (606) was no more than 0.3m deep. Cutting across the centre of the trench, again at an angle of 45°, was a third feature (604), marked by a narrow strip of darker clay (603) approximately 20cm in width. This cut was found to contain a terracotta field drain (609) similar to those found elsewhere on the site.

Interpretation

The shallow deposit of dark material with burnt inclusions (607) can be compared to feature 503 from trench 5, interpreted as representing a burnt out tree root relating to a clearance episode. The adjacent linear feature was clearly a plough furrow. Its NW-SE orientation is precisely that of the pattern of ridge and furrow recorded by the geophysical survey (as anomaly f2/13) and still visible on the surface as rows of very shallow linear depressions which retained noticeably more moisture than the adjacent flattened 'ridges'. This moisture retention accounted for the sticky quality of the clay fill (605). The pattern of land drains in the field - exemplified by 609 recorded here - evidently followed the alignment of the ridge and furrow, as was commonly the case.

The evaluation excavations at West Lane End farm, Morpeth, revealed little archaeological evidence of any significance. The evidence is mainly diagnostic of medieval and post-medieval agricultural land use and division, with ridge and furrow evident across the site in the form of either surviving earthworks or infilled furrows, with associated field lynchets also apparent in some areas. The division of the landscape by surrounding rural communities is represented by longstanding township boundaries which survive as hedges of varying quality, and fences. The evaluation suggested that in some cases these may have been preceded by boundary ditches.

Episodes of intensive agricultural activity during the medieval and post-medieval periods have probably been responsible for removing most traces of earlier activity in the area, whilst in most fields the ridge and furrow earthworks have themselves been levelled or very substantially eroded by modern ploughing.

The features most commonly found in all the excavated trenches were modern field drains. These drains were either terracotta, thus producing a strong signal in the geophysical results and accounting for the anomalies therein, or still more recent plastic drains, which produce a weaker signal in the geophysical results, their presence being detectable by the narrow ditches in which they are laid.

Patches of charcoal and associated deposits intruding into the subsoil in trenches 5 & 6 may reflect agricultural clearance activity at some stage in the past, on the basis of similar examples revealed in the vicinity of Pegswood, which proved to be of Iron Age date. The tentative nature of this interpretation should be emphasised, however, and, although their presence is of some contextual interest, these features are not considered to merit preservation *in situ* or further mitigation by record.

No further archaeological work is considered necessary with respect to the sub-surface features investigated by trenching in the area bisected by the A1 adjacent to West Lane End farm.

However, there remain a number of archaeological issues, all concerning areas of upstanding ridge and furrow cultivation features brought to light during the assessment phase, for which archaeological recording remains the recommended mitigation measure. The following statements summarise the impact of the construction of the A1-A192 Link road upon them:

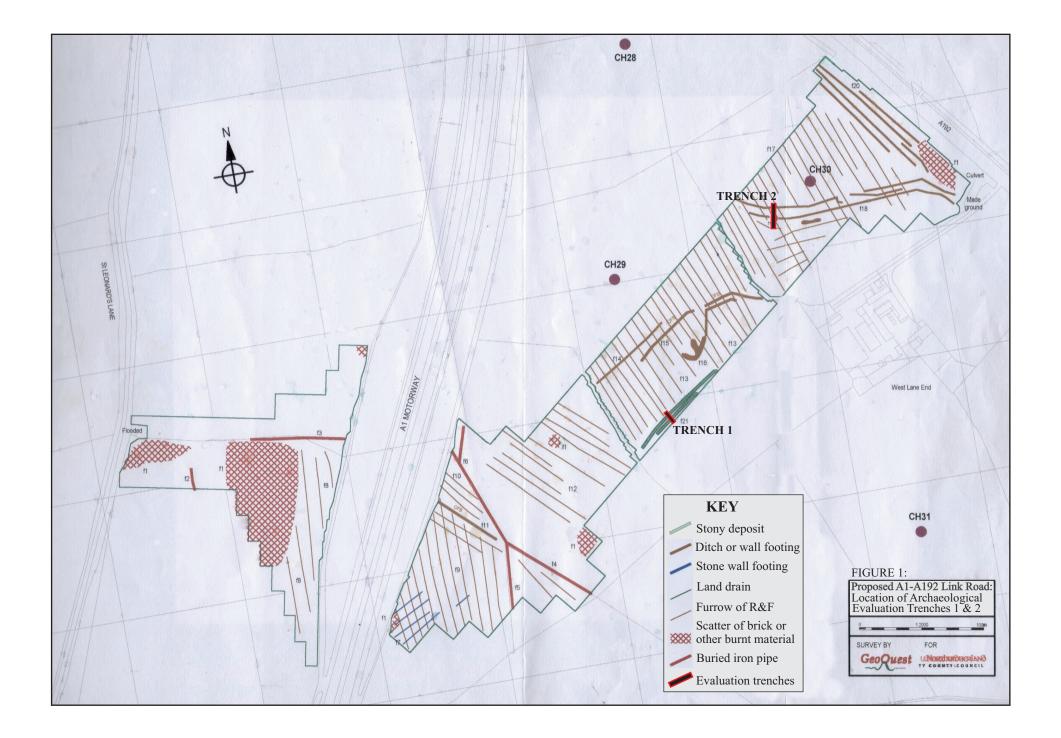
- 1. Two fields of significantly upstanding ridge and furrow earthworks (Sites 1, 4), both catalogued during the previous phases of assessment work, will be directly and substantially impacted by construction of the A1-A192 Link.
 - i. The ridge and furrow (Site 1) in the southern part of the field at Butley Ben will be truncated by the proposed roundabout on the A192 and by associated planting to screen Butley Ben house.
 - ii. The field to the west of West Lane End, containing two differently aligned patterns of ridge and furrow (Site 4), will be cut in two by the course of the Link Road.
 - iii. Two fields of less well-preserved ridge and furrow earthworks (Site 7) at the south end of the proposed scheme will slightly impinged on by the southern slip roads. A sufficient record of Site 7 has been provided by the geophysical survey.

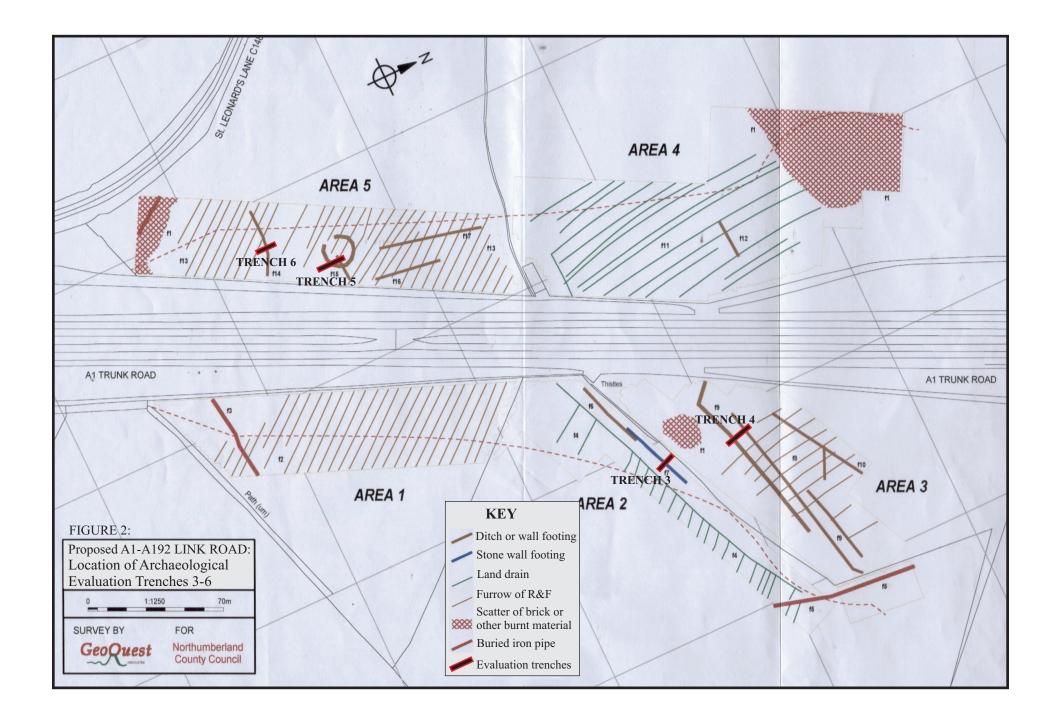
It is recommended that topographical survey of sites 1, 4 & 7 be carried out to record the earthworks prior to the construction of the road.

In addition, the assessment established that the A192 represents the line of the historic Great North Road.

It is therefore recommended that archaeological monitoring should be undertaken during construction operations for the proposed roundabout on the A192 (the former Great North Road - Site 2) to determine whether significant deposits associated with the earlier, medieval or earlier highway survive and provide a record of their character and extent in mitigation.

- 1. Proposed A1 to South-East Northumberland Link Road, Desk Study Review, Northumberland County Council, May 2001.
- 2. *A1-South East Northumberland Link Road, Stage 3 Environmental Assessment*, The Landmark Partnership, August 1997.
- 3. *A1-South East Northumberland Link Road, Stage 2 Environmental Assessment*, Anthony Walker and Partners, February 1997.
- 4. *A1-A192 Link Road, South-east Northumberland: Cultural Heritage Assessment*, The Archaeological Practice Ltd, December 2002.
- 5. Geophysical Surveys on the route of the proposed A1-A192 Link Road, Northumberland, GeoQuest Associates, 2002.
- 6. Further Geophysical Surveys on the route of the proposed A1-A192 Link Road, Northumberland, GeoQuest Associates, 2002.
- 7. A1-A192 Link, Archaeological Evaluation: Project Design, The Archaeological Practice Ltd, 2002.
- 8. *Pegswood Bypass, Northumberland: Archaeological Evaluation*, The Archaeological Practice Ltd, December 2002.





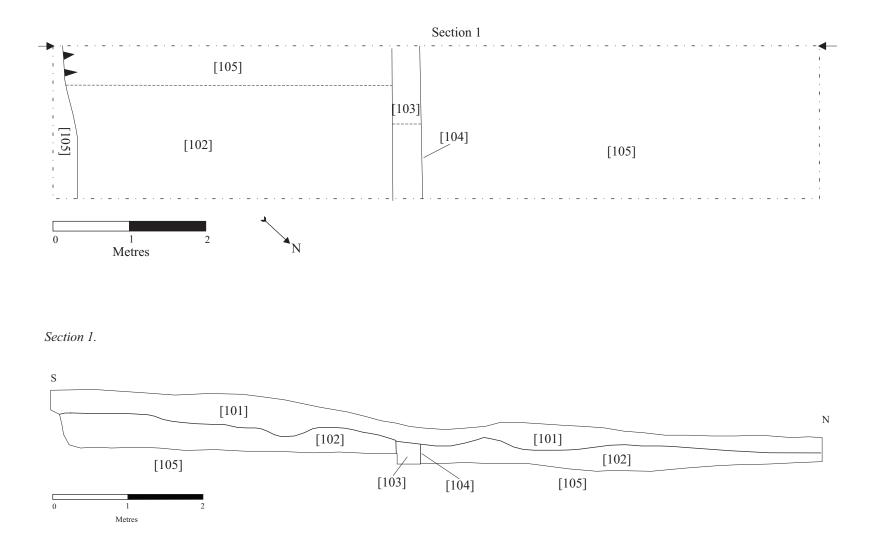


Figure 3: Plan & Northeast facing Section of Trench 1.

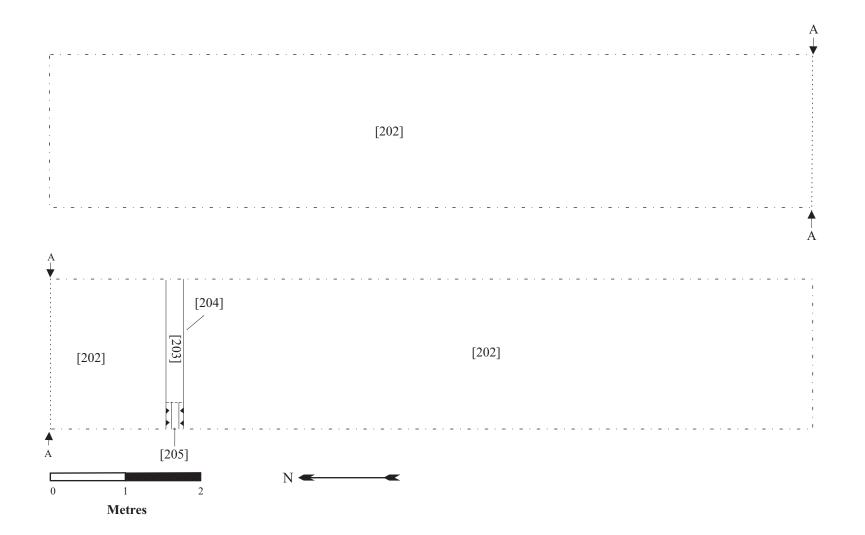


Figure 4: Plan of Trench 2

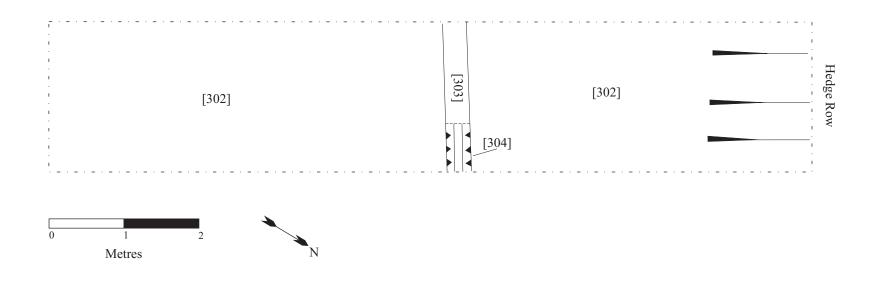


Figure 5: Plan of Trench 3

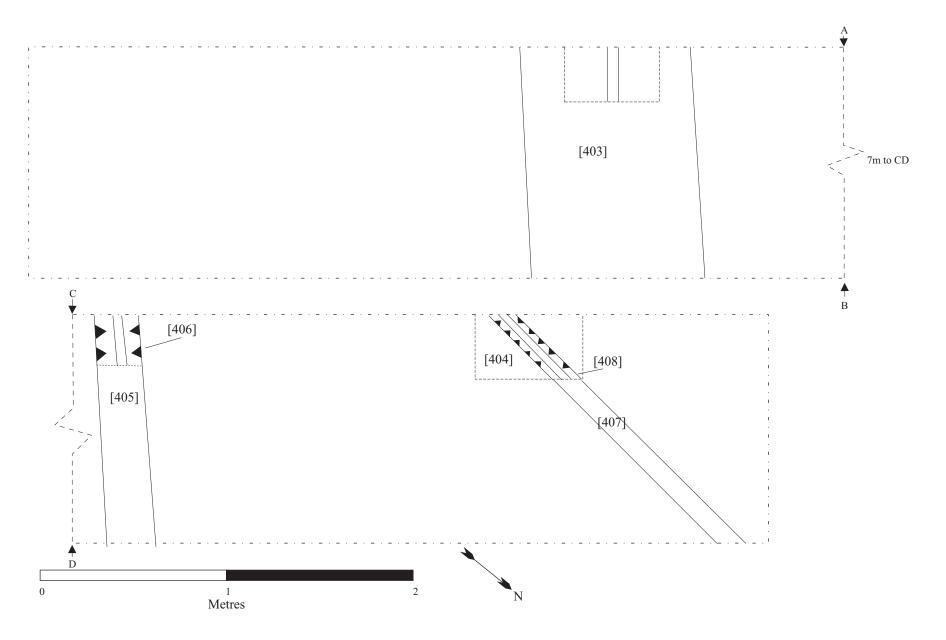
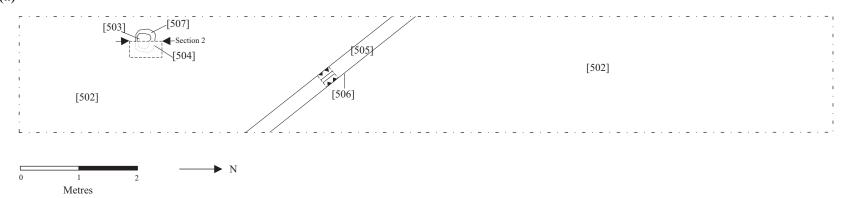


Figure 6: Plan of Trench 4





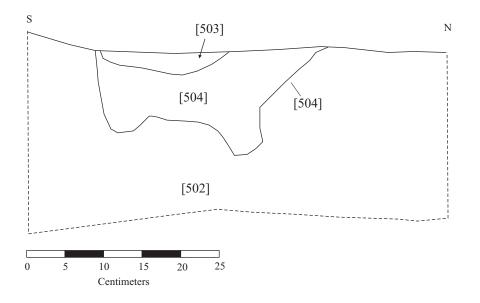


Figure 7: Plan of Trench 5 (a) with section through feature 504 (b).

(a)

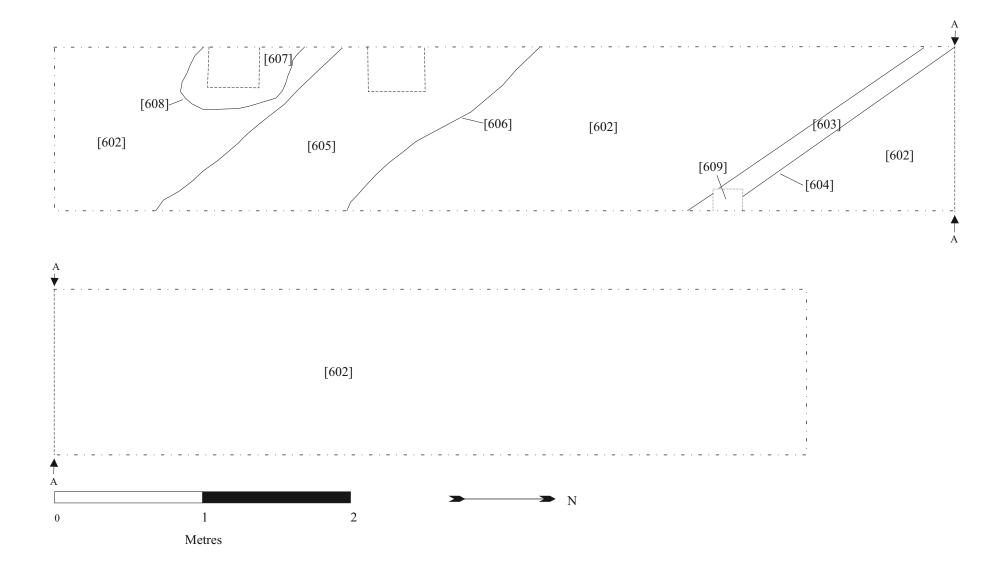


Figure 8: Plan of Trench 6



Plate 1: Trench 1 from the south with section cut down west side.



Plate 2: South end of trench 1 showing ploughsoil deposit 102 and lynchet scarp cut in the underlying clay subsoil (105).



Plate 3: North end of trench 3. Note subsoil 302 dipping downward beneath hedgerow, suggesting the boundary was previously formed by a ditch.



Plate 4: Trench 5 from the south, showing features 506 and 504 after sectioning.



Plate 5: Field drain 506 in Trench 5.



Plate 6: Deposits 503 and 507 in trench 5



Plate 7: 503 and 507 in section.