Briggle Beck Pipeline, Cumbria



Rapid Desk-Based Research and Walkover Survey

Oxford Archaeology North



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SUMMARY

Following proposals by United Utilities for the construction of a *c* 1.5km long pipeline from Langwathby (NGR NY 56483 34255) to Winskill (NGR NY 57822 34865), with a *c* 4km stretch of pipeline heading south-eastwards from it (NGR NY 57115 34357 to NY 60702 32628), the Cumbria County Council Planning Archaeologist recommended that rapid archaeological desk-based research and a walkover survey of the proposed pipeline route be undertaken. Oxford Archaeology North (OA North) was subsequently commissioned by United Utilities to undertake this work.

In total, nine sites of archaeological interest were identified within the study area from the rapid desk-based research, of which seven had been previously recorded in the Cumbria HER, (Sites **01-07**). Sites **08** and **09** were identified by inspection of historic maps.

The nine identified sites comprised Neolithic axe finds (Site 02); a Roman temporary camp (Site 06); the medieval origins of Langwathby village (Site 03); a Grade II listed post-medieval farmhouse and barn (Site 07); a post-medieval milestone (Site 08); a post-medieval quarry and gravel pit (Sites 09 and 04); and a modern mill (Site 05). An area of undated cropmarks (Site 01) was also identified within the study area. Of these sites, two (Sites 01 and 03) were located within the proposed pipeline route and were considered to be potentially impacted by it.

The walkover survey carried out in August 2008 aimed to determine both the survival of above ground remains of sites recorded and to identify previously unrecorded sites. A further seven sites (Sites 10-16) were identified during the walkover survey, these comprised an oxbow lake (Site 11), undated but possibly fairly recent earthworks (Site 14), and post-medieval agrarian features, such as ridge and furrow (Sites 13, 15 and 16) and clearance cairns (Sites 10 and 12).

Recommendations were made for an initial topographic survey of Site **01** followed by a programme of evaluation trenching, which should target the known sites that will potentially be impacted on by the proposed pipeline route (Sites **01**, **03** and **06**).

Due to the potential for further remains along the route, specifically at the western end toward Winskill where prehistoric finds (Site 02) have been recovered, it is suggested that a permanent presence watching brief is undertaken for the entire length of the easement. The proposed route of the pipeline may impact on the undated earthworks (Site 14) identified during the walkover survey. These earthworks are thought to be fairly recent in date and should be investigated and recorded as part of the watching brief.

ACKNOWLEDGEMENTS

Oxford Archaeology North (OA North) would like to thank United Utilities for commissioning the project. Thanks are also due to Jo Mackintosh at Cumbria County Council Historic Environment Record (CCCHER) and the staff at Cumbria County Record Office in Carlisle.

Kathryn Blythe undertook the rapid desk-based research and Will Gardner undertook the walkover survey. Mark Tidmarsh produced the drawings and Alison Plummer managed the project and also edited the report.

1. INTRODUCTION

1.1 CIRCUMSTANCES OF THE PROJECT

1.1.1 United Utilities proposed the construction of a pipeline in the vicinity of the villages of Langwathby and Winskill, approximately 8km to the north-east of Penrith (Fig 1). The total length of the proposed pipeline is approximately 5km. Following recommendations made by the Cumbria County Council Historic Environment Officer, United Utilities commissioned Oxford Archaeology North (OA North) to undertake rapid archaeological desk-based research and a walkover survey of the proposed pipeline route.

1.2 LOCATION, TOPOGRAPHY AND GEOLOGY

- 1.2.1 The proposed pipeline is 'T'-shaped, running for approximately 1.5km on a south-west/north-east alignment from north of Langwathby (NGR NY 56483 34255) to Winskill (NGR NY 57822 34865) and with an *c* 4km stretch of pipeline heading south-eastwards (NGR NY 57115 34357 to NY 60702 32628) from the approximate middle of the Langwathby to Winskill stretch (Fig 1). The Eden Valley is characterised by a mixture of undulating mixed farmland and sandstone hills, with woodland and lowland heath vegetation (Countryside Commission 1998, 38). The proposed route is located on land, which slopes from approximately 130m AOD at Winskill down to approximately 100m AOD along the Briggle Beck. On the south of the beck the land gently undulates between approximately 110m AOD just south of the beck to approximately 130m AOD at the southern edge of the study area (Ordnance Survey 2002).
- 1.2.2 The underlying solid geological deposits comprise mainly undifferentiated sandstones of Permo-Triassic age, including Bunter and Keuper, and Permian mudstones, including Middle and Upper Marls, Eden and St Bees shales (BGS 2007). Overlying this are typical stagnogley soils of the Clifton series and typical brown sands of the Bridgnorth series (Ordnance Survey 1983).

2. METHODOLOGY

2.1 INTRODUCTION

2.1.1 The rapid desk-based research was carried out in accordance with the relevant IFA and English Heritage guidelines (Institute of Field Archaeologists 1999, *Standard and guidance for archaeological Desk-based Assessments*; English Heritage 2006, *Management of Research Projects in the Historic Environment* (MoRPHE).

2.2 RAPID DESK-BASED RESEARCH

- 2.2.1 A study area that extended 0.25km to each side of the proposed pipeline, to form a corridor 0.5km wide, was examined. All known archaeological sites identified have been integrated into the Historical and Archaeological Background (*Sections 3.2 and 3.3*) in order to assess the impact of the proposed pipeline. The location of these sites is shown in Figure 2.
- 2.2.2 Several sources of information were consulted as part of the research, which have provided a good understanding of the developmental history of the study area. Archive sources that were consulted include:
 - *Cumbria County Council Historic Environment Record (CCCHER)*: the Historic Environment Record held in Kendal was consulted to establish the presence of sites of cultural heritage interest already known within a 0.25km radius centred on the proposed pipeline route. Secondary sources for the area were limited, but 'grey literature' and published sources were studied where available.
 - *Cumbria County Record Office, Carlisle*: the Record Office holds Ordnance Survey (OS) maps and other cartographic and documentary sources relating to the study area.
 - **OA North Library**: OA North has an extensive archive of secondary sources relevant to the study area, as well as numerous unpublished client reports on work carried out both as OA North and in its former guise of Lancaster University Archaeological Unit (LUAU). These were consulted where necessary.

2.3 WALKOVER SURVEY

2.3.1 Following the rapid desk-based research, a level I-type survey (*Section 4*) was undertaken to relate the existing landscape to research findings. This encompassed a one hundred metre corridor along either side of the pipeline, walked in a systematic fashion. Archaeological features identified within the landscape were recorded using the relevant OA North *pro forma*, and the features located using differential GPS survey, which can achieve an accuracy of +- 5m with respect to the OS national grid.

2.4 ARCHIVE

2.4.1 A full professional archive has been compiled in accordance with current IFA and English Heritage guidelines (English Heritage 2006). The paper and digital archive will be deposited in the Cumbria Record Office in Carlisle on completion of the project. A copy of the report will be deposited with the CCCHER.

3. ARCHAEOLOGICAL AND HISTORICAL BACKGROUND

3.1 INTRODUCTION

3.1.1 The following section presents a summary of the historical and archaeological background of the general area. This is presented by historical period, and has been compiled in order to place the study area into a wider archaeological context.

Period	Date Range
Palaeolithic	30,000 – 10,000 BC
Mesolithic	10,000 – 3,500 BC
Neolithic	3,500 – 2,200 BC
Bronze Age	2,200 – 700 BC
Iron Age	700 BC – AD 43
Romano-British	AD 43 – AD 410
Early Medieval	AD 410 – AD 1066
Late Medieval	AD 1066 – AD 1540
Post-medieval	AD 1540 – <i>c</i> 1750
Industrial Period	cAD1750 - 1901
Modern	Post-1901

Table 1: Summary of British archaeological periods and date ranges

3.2 THE PREHISTORIC PERIOD

3.2.1 **Prehistoric:** Cumbria has only a few remains of the Late Upper Palaeolithic period, which are largely in the south-west of the county (Hodgkinson et al 2000, 32-33), although these are sparsely represented. During the Mesolithic period the inhabitants of the British Isles employed a subsistence strategy traditionally viewed as the exploitation of natural resources by activities based on hunting, gathering, and fishing. The Mesolithic period is represented in Cumbria by numerous sites along the west coast (summarised in Rollinson 1988), as well as the limestone uplands of east Cumbria (Cherry and Cherry 1987). During the prehistoric period the upper reaches of the River Eden provided an important natural route from the north-east of England to the North West, with the area around Penrith seemingly acting as a focal point for activity. The fertile lands of the Eden valley have attracted settlement since the Neolithic period, and the location of monuments from this period within Cumbria appears to suggest a shift in the emphasis of Neolithic activity from the coastal plain to the edge of the Lake District hills and the Eden valley (Hodgkinson et al 2000, 37). Fieldwork has indicated that the majority of Neolithic long barrows in the region are located within the Eden Valley, such as the long cairn at Crosby Garret (Waterhouse 1985, 7). The main prehistoric monuments in the area are the two henges just south of Penrith, known as Mayburgh and King Arthur's Round Table, with the traces of a third enclosure named Little Round Table to the south, and Long Meg and Her Daughters stone circle (SM 22663) near Langwathby, approximately 2.5km to the north of the proposed pipeline route (Waterhouse 1985, 7; Hodgson and Brennand 2006, 39). A possible Bronze Age enclosure is located at Throstle Brow, close to Long Meg (SM 23664). A round cairn (SM 23771) is located c 5km to the north of the study area, to the north-west of Glassonby.

- 3.2.2 Approximately 11km to the north-west of the study area, at Low Plains Quarry, four cremations of probable Bronze Age date were discovered during archaeological excavations (OA North 2005). Remains of Neolithic and Bronze Age date have been discovered at Lazonby Fell, which is an area of unploughed heathland, lying approximately 7km to the north-west of the study area. These remains include cairns, and findspots of vessels and flints, as well as dense concentrations of prehistoric rock art (Lambert 1996).
- 3.2.3 To the immediate east of the study area, approximately 650m to the south of Winskill is the findspot of a Bronze Age cremation with a beaker (SMR 663 at NGR 357817 534575), found by a farmer in 1850 (Whellan 1860, 503).
- 3.2.4 Site **02** is the findspot of a polished blue whinstone axe with a white patina and a perforated stone axe hammer with a rounded butt found near Winskill, to the north-east of the study area.
- A comparative lack of material culture in the North West relating to the Iron 3.2.5 Age has historically made sites of this period difficult to identify in the archaeological record, particularly with reference to small-scale rural sites. Both the uplands and lowlands of Cumbria have produced evidence of enclosures that may date to the Iron Age, although a lack of dating evidence has made it difficult to assign these sites firmly to the Iron Age (Hodgson and Brennand 2006, 52). The study area lies within the territory suggested to have been controlled by the Carvetti at the time of the Roman Conquest (Shotter 2004, 4). It has been suggested that the tribal centre associated with the Carvetti during the Late Iron Age might have been in the locale of Brougham and possibly at Clifton Dykes (op cit, 16-17). The fertile agricultural land around Penrith means that there is a potential for Iron Age rural sites within this area. Evidence of Iron Age rural activity has been demonstrated at Lazonby Fell Plantation, c 7km to the north-west of the study area. Excavation revealed trackways, field boundaries, and a stone-walled hut, associated with a kidney-shaped enclosure (LUAU 1994, 53).

3.3 THE HISTORIC PERIOD

- 3.3.1 *The Romano-British Period:* the study area is located between two Roman roads: a north/south road, on the approximate line of the modern day A6, heading north from the fort at Brougham (*c* 6km to south-east of the study area, just outside Penrith), to Carlisle; and a west/east road which headed from the Pennines to join the north/south road (on the approximate line of the modern day A66).
- 3.3.2 In 1993 part of a Roman milestone was found in Langwathby parish (Edwards and Shotter 2005). The exact location of the milestone has not been disclosed as it was found on private land, but it was approximately 4.5km to the southwest of the study area on the west side of the river Eden (NGR NY 5430). The find comprised the top portion of a cylindrical sandstone milestone with an inscription dating to 223 AD, which translates:

'For the Emperor, Caesar, Marcus Aurelius Severus Alexander, Pious, Favoured by Fortune, Augustus, Chief Priest, in the second year of his Tribunician Power, Consul, Proconsul, Father of his country, the Community of the Carvetii (set this up). From Carlisle Nineteen Miles' (Edwards and Shotter 2005, 68).

- 3.3.3 The milestone inscription confirms Carlisle as the *civitas* capital of the *Carvetti* in the Roman period, although the extent of the *Carvetti* territory remains unknown (*op cit*, 70). The position of the stone, not thought to have moved far due to its accurate distance from Carlisle, brings in to question the location of Roman roads in this area. The north/south road from Penrith and the east/west trans-Pennine road are known to have converged at some point close to the confluence of the rivers Eamont and Eden, but the location of the milestone either puts the road further east than previously thought, or suggests that an additional road linked the trans-Pennine road with the north/south road (*op cit*, 72).
- 3.3.4 The Roman fort at Old Penrith, identified as *Voreda*, is located approximately 9km to the north-west of the study area. The fort at Kirkby Thore is located approximately 7km to the south-east of the study area. Work on the site undertaken by OA North, in its former guise as the Lancaster University Archaeological Unit (LUAU), and others, is summarised in LUAU 2001. Evidence from several sources, including the *Antonine Itinerary* of the early third century AD, and the *Notitia Dignitatum* of the later fourth century AD (Shotter 2004), suggests that the fort at Kirkby Thore can be equated with the Roman site of *Bravoniacum* (Salway 1981).
- 3.3.5 Several Romano-British rural sites are also known from the wider areas around these forts, and several cluster around the Brougham area (Shotter 2004, 138). It has been suggested that the high agricultural quality of the land in this area would have made this an attractive area for settlement, and that such land may have been appropriated by the authorities for use by discharged Roman soldiers (*op cit*, 139).
- 3.3.6 Site **06** is Langwathby Moor Marching Camp, a Roman temporary camp identified from aerial photographs in 1992. The camp is situated at 132m AOD and occupies a vantage point at the top of a low north-west/south-east ridge, which separates the Eden valley to the west-south-west, with the valley of the Briggle Beck to the north-east. The cropmarks comprise two complete sides (south-east and south-west) and most of a third (north-east), and a causeway for a gate is visible in each of these sides. The enclosure measures about 98m in length from north-west to south-east by about 86m in width, and therefore is approximately rectangular. The western corner has a much larger radius than the other corners. Both the north-east and the south-east sides coincide with slight crests, which suggests that the camp may have faced in one of these directions (RCHME 1995, 41).
- 3.3.7 *Early Medieval (AD 410 1066)*: little is known about the history of the area following the end of Roman administration c 410 AD, although by the seventh-century the area is likely to have been subsumed by the Anglian kingdom of Northumbria. There is little settlement evidence pertaining to this period, although a sunken floored building, which are characteristic elements of Anglian and Anglo-Scandinavian settlements, has been identified at

Fremington, near Brougham (Oliver *et al* 1996, 127-169). Evidence for timber buildings, probably predating AD 800, has also been found at Whinfell Forest and at Shap (Heawood and Howard-Davis 2002). Artefactual evidence from these sites has been limited, as is often the case in this period, but has included loom weights from Fremington and Shap and pottery from Fremington (*ibid*).

- 3.3.8 Finds of stone sculpture in the parish of Lowther, to the south of Penrith, further support the hypothesis that the landscape remained settled in the pre-Viking period, then came under Scandinavian influence from the tenth century. Two cross-shafts of later eighth- to early ninth-century date were formerly present inside Lowther Castle, and may have originated from nearby St Michael's Church (LUAU 1997, 23; Bailey and Cramp 1988, 127-129); they suggest the presence of a contemporary church or monastic institution, with access to an agricultural surplus. Three rather later Anglo-Scandinavian hog-back stones are still present within the church porch (Bailey and Cramp 1988, 130-1), and imply some degree of Scandinavian influence by the late tenth or early eleventh century.
- 3.3.9 Within Penrith, are a number of examples of Anglo-Scandinavian sculpture, including hog-backed tombstones and cross shafts within the parish church. Scandinavian influence is also attested in the wider area by placename elements, such as *-by*, meaning village, which is present in Langwathby and Hunsonby, *-thwaite*, meaning clearing, which occurs in Calthwaite, and *-thorpe*, meaning settlement, which is present in Melkinthorpe (Mills 1998).
- 3.3.10 There are no known early medieval sites within the study area.
- 3.3.11 *Medieval (AD 1066 1540)*: the placename Langwathby is thought to mean a habitation or village near a long or wide ford (Hutchinson 1797, 256). Henry I (1100-1135) gave the manor of Langwathby (together with Edenhall) to Henry Son of Swene, but it was not his for long, as it was shortly after recorded as demesne land and was then in the possession of King John (1199-1216) (*ibid*). Henry III (1216-1272) gave Langwathby to Alexander, King of Scotland, as part of 200 *librates* of land granted to Scotland in 1237 as compensation for the release of Cumberland and Westmorland. Langwathby continued to be held by the Scottish monarchs until the defection of John Baliol. Langwathby then became English crown land, and was granted by Richard II (1377-1399) to Ralph Neville and then passed to the Duke of Gloucester and on to his brother, Richard III (1483-1485) (Hutchinson 1797, 256; Whellan 1860, 574). Langwathby continued to be crown land until William III (1689-1702) granted it to the Duke of Devonshire (Hutchinson 1797, 257).
- 3.3.12 The settlement morphology, and surviving earthworks, of many villages in the Eden Valley have been interpreted as representing evidence of medieval origins (Newman 2006, 118). Many show a rectangular plan, sometimes around a green, but often based around a narrow street, with the village fields often laid out at right angles to the street (Roberts 1993, 131-3). Both Winskill and Langwathby appear to fit with this form. Winskill is a small village, with housing located on both sides of an east/west aligned road. Narrow strip fields can be seen at the rear of the housing plots, aligned approximately north/south to the north of the village and north-east/south-west to the south of the village.

Langwathby, a larger village than Winskill, is located on both sides of a northnorth-west/south-south-east aligned road. The river Eden is located to the immediate south-west of the village, which is likely to have dictated some of the layout of the village and agricultural use of the surrounding land. The village has also seen more recent development with the Midland Railway which runs to the east of the village, and the High Mill complex (Site **05**), also on the east side of the village. Nevertheless, it is still possible to see strip-type fields to the rear of the village, both to the east and west, and the church and village green are still central features of the village. Langwathby is listed in the SMR as a medieval village (Site **03**), the northern extent of which is crossed by the proposed pipeline route.

- 3.3.13 *Post-medieval (AD 1540 present)*: Winskill is a small village with medieval origins, which historically shared a joint township with Hunsonby. In 1801 it had a population of 117 and in 1851 it had a population of 200 (Whellan 1860, 503). Similarly Langwathby, although a larger village and with its own church, was linked with the parish of Edenhall in the medieval period, but later became a distinct parish. In 1801 the population of Langwathby was 226 and in 1851 it had a population of 292 (*op cit*, 574). In 1801 Skirwith (located to the east of the study area) had a population of 189 and in 1851 it had a population of 288 (*op cit*, 567).
- 3.3.14 Site **07** is Wy farmhouse and barn, a grade II listed pair of buildings dating from the late seventeenth century and located towards the west end of Winskill.
- 3.3.15 Site **04** is a gravel pit marked on the first edition 25": 1 mile OS map of 1868 and described on the 1978 OS map as a 'Disused Pit' (CCCHER 11153).
- 3.3.16 Site **05** is the High Mill complex. The Mill is no older than 1901 and occupies quite a large area on the east side of Langwathby. The mill is used for processing cattle feed (CCCHER 11169).

3.4 PREVIOUS ARCHAEOLOGICAL WORK

3.4.1 No previous archaeological work has been recorded within the study area.

3.5 MAP REGRESSION ANALYSIS

3.5.1 *Kitchen's map of 1777 (Fig 3):* this map is large-scale and as such contains no detail of the study area. Both Langwathby and Winskill are marked on the map. Langwathby is marked with a sign for a church, but Winskill (named Windscales on the map) has no church. The river Eden is depicted running to the west of Langwathby and a road heading east from Langwathby and to the south of Winskill is also shown (the modern day A686). The Briggle Beck is depicted running to the east of Winskill, under the west/east road from Langwathby and heading to Skirwith. No other detail of the study area is depicted.

- 3.5.2 *Winskill Tithe:* there was no tithe map available for Winskill township, the area to the north of the Briggle Beck at the west end of the pipeline.
- 3.5.3 *Langwathby Tithe 1839:* this tithe map covers Langwathby township, located south of the Briggle Beck at the west end of the study area and bounded to the north-east by the approximate line of the Williekeld Sike towards the eastern end of the study area. This map is very similar to the first edition map of 1867 (Fig 4), with the layout of long narrow fields. This layout of regular fields is indicative of large-scale enclosure of the area at a relatively late date. This is also reflected in the names of the fields listed in the tithe schedule, where names such as Nether Moor, Moor Top, Moor End and High Moor are frequently repeated. In contrast to this are the slightly more irregular fields to the north of Langwathby through which the pipeline route crosses (west of the present day railway), which are named Sandy Sike and Stony Flat. These were possibly enclosed earlier than the majority of the fields in the study area. The use of the fields is divided between arable and pasture.
- 3.5.4 *Skirwith Tithe 1851:* the Skirwith township tithe covered only the eastern extent of the proposed pipeline route. The southern boundary of this township is just south of the Briggle Beck, where several fairly large fields, also shown on the first edition map of 1867 (Fig 4), are depicted. To the south of this, the area was marked as 'common', indicating that it had not been enclosed by this time.
- 3.5.5 Ordnance Survey First Edition 6": 1 mile map of 1867 (Fig 4): at the western end of the route a footpath is shown heading south from Winskill and crossing the Briggle Beck. A footbridge is marked at this point, but a ford is also marked, indicating that this part of the beck had been used as a crossing place prior to the construction of the bridge. 'Low well' is also marked just north of the beck presumably naming a current or former well. To the south of the beck, on the junction of the road which heads north-east from Langwathby' a milestone (Site 08) is marked, where the road meets a road heading eastwards towards Skirwith. The milestone is marked 'Alston 14 Penrith 5'. The route of the pipeline runs parallel with, and to the south of, the road to Skirwith. At the western end of the pipeline route, open fields are marked on either side of the road, however further east there are more areas of plantations and also some areas of un-enclosed moors. A bridge named Sowyersteps Bridge is marked where the road crosses Sowyers Beck. Just east of this, the pipeline route crosses the road and continues to run parallel with it. Skirwith Hall is marked just to the east of the study area and a gravel pit is marked just to the south of the east end of the study area, south of two properties named Newtown.
- 3.5.6 Ordnance Survey Second Edition 6": 1 mile map of 1900 (Fig 5): this mapping is very similar to the first edition, with the most striking difference being the addition of the Midland Railway, which runs north-west/south-east on the east side of Langwathby. Towards the east end of the study area some of the plantations are now named. The area to the immediate west of Sowyersteps bridge is named Hope Hill, and to the north of the road to Skirwith the wood is named Hopehill Woods. On the east side of the bridge, to the north of the road is Pinglemoor Plantation and on the south side of the road

is Sowyersteps Wood. The areas at this eastern end of the study area, which were formerly depicted as areas of open moor, have now been enclosed into large fields. At the east end of the study area, old quarries (Site **09**) are marked on the north side of the Briggle Beck.

3.5.7 *Ordnance Survey 6": 1 mile map 1926 (Fig 6):* this mapping is very similar to the OS map from 1900, with no significant changes within the study area.

4. WALKOVER SURVEY

4.1 INTRODUCTION

- 4.1.1 The walkover survey carried out in August 2008 aimed to determine both the survival of above ground remains of sites recorded during the rapid desk-based research and also to identify previously unrecorded sites along the proposed pipeline route. The visit also provided an understanding of the impact of the proposed pipeline and the presence of any immediately visible constraints to the undertaking of intrusive investigation works.
- 4.1.2 All of the fields adjacent to the proposed pipeline route were walked systematically and the ground conditions were generally good for identifying sites by walkover survey, although a few fields contained mature crop. However, the majority of the fields inspected were under pasture and had a covering of short grass. Generally the field boundaries were dry-stone walls, although hedgerows with post-and-wire fences were noted. The fields were numbered from 1 to 28 to aid identification.

4.2 **RESULTS**

4.2.1 The walkover survey identified a further seven sites (Table 2) which have been added to the gazetteer (*Section 5*). These sites were mostly post-medieval agrarian features, such as ridge and furrow (Sites **13**, **15** and **16**) and clearance cairns (Sites **10** and **12**). The walkover also identified an earthwork of an unknown date (Site **14**) and a probable oxbow lake (Site **11**).

Site no	Site Type	Field Number
Agrarian features		
13	Ridge and Furrow	F3
15	Ridge and Furrow	F22
16	Ridge and Furrow	F25
10	Clearance Cairn	F5
12	Clearance Cairn	F6
Topographical features		
11	Oxbow Lake	F6
Features of indeterminate function		
14	Earthwork	F16

Table 2: Sites identified during the walkover survey

- 4.2.2 The most numerous sites identified in the walkover were those of an agrarian nature, with three instances of ridge and furrow (13, 15, 16; Plates 1, 2 and 3) and two cairns (10 and 12; Plates 4 and 5). The ridge and furrow in each instance measured less than 2m wide and was raised by less than 0.2m.
- 4.2.3 The two cairn sites identified (10 and 12; Plates 4 and 5) look to relate to the removal, and rebuilding of, dry-stone walls. Site 10 is the larger of the two measuring 4m north to south by 2m east to west and standing 0.4m high, and relates to the removal of a field boundary 5m north. Site 12 comprises two sub-circular cairns roughly 1m by 1m raised by 0.4m. This site is located immediately east of a current dry-stone wall.

- 4.2.4 One noteworthy topographical feature was identified along the route (Site 11; Plates 6 and 7), an oxbow lake comprising a series of earth and stone banks enclosing a wet marshland lush in emergent vegetation. This feature has been enclosed by a post-and-wire fence presumably for the protection of livestock.
- 4.2.5 There was only one new site identified of an indeterminate function, Site 14 (Plates 8 and 9), a subtle earthwork located in the south-easternmost corner of Field 16. This comprised an earth and stone mound measuring 3m by 4m and 0.25m high, enclosed by a shallow ditch 0.2m deep. This site is located within 5m of a current field gate, suggesting it may be the location of a recent feeding point.
- 4.2.6 Of the sites noted in the rapid desk-based research, only one was identified as being within the pipeline easement during the walkover survey. Site **01**, (Plates 10 and 11) cropmarks and faint earthworks, is located within the route and is likely to be affected by the pipeline.
- 4.2.7 No earthworks associated with Langwathby Medieval Village, (Site **03**) as identified during the rapid desk-based research, were identified during the walkover survey. No boundaries, banks or ditches were identified during the walkover survey in any of the fields on the western extent of the route; although it is possible that below-ground remains of such features may survive. Site **08**, the site of a milestone, could not be located in the walkover survey.

5. GAZETTEER OF SITES

Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description	Skirwith Low Moor Unclassified cropmarks, Culgaith 01 359800 532900 6082 Cropmark Unknown - HER A gently sloping field cleared of stone and levelled. Some faint bumps can be seen along the ridge, but these could be natural. The south end of the field is marshy and uncultivated. An aerial photograph shows a large area of indeterminate sub-circular features. The site is crossed by the proposed pipeline route and may be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Axe Finds, Winskill, Hunsonby 02 358000 535000 960 Findspot Neolithic - HER A polished blue whinstone axe with a white patina and a perforated stone axe hammer with a rounded butt found at Winskill. Both are now at the Tullie House Museum in Carlisle (nos 27.26.317 and 27.26.326). The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Langwathby Medieval Village 03 357000 533700 6786 Earthwork Medieval - HER An attractive village of red sandstone houses set around a village green. Mixed architecture; few open areas with surviving earthworks. The surrounding fields are mainly improved pasture. The parish church has a medieval core (see SMR 3844). The northern part of the site is crossed by the proposed pipeline route and may be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation	Powley Farm Gravel Pit, Langwathby 04 356690 534520 11153 Gravel Pit Post-medieval

Source	HER
Description	The gravel pit is marked on the first edition OS 25" (1868), and described on the
	1978 OS map as a 'Disused Pit'.
Assessment	The site lies outside of the proposed pipeline route and will not be affected by the
	works.

Site Name	High Mill Feed Processing Plant
Site number	05
NGR	357310 533820
HER no	11169
Site Type	Mill
Period	Post-medieval
Statutory	
Designation	•
Source	HER
Description	'High Mill' complex. The Mill is no older than 1901 and occupies quite a large area.
	The mill is still in existence and is used for processing cattle feed. Most of the
	buildings are modern.
Assessment	The site lies outside of the proposed pipeline route and will not be affected by the
	works.

Site Name Site number NGR HER no Site Type Period Statutory Designation	Langwathby Moor Roman Camp 06 357650 533420 17816 Cropmark Roman
Source Description	HER A Roman temporary camp, identified from the air by RCHME York in 1992. The camp is situated at 132m AOD and occupies the top of a low north-west/south-east ridge, which separates the Eden valley to the west-south-west, with the valley of the Briggle Beck to the north-east. There are excellent views from the camp, which is located 6km to the north-east of the fort at Brougham. The cropmarks comprise two complete sides (south-east and south-west) and most of a third (north-east), and a causeway for a gate is visible in each of these sides. The enclosure measures about 98m in length from north-west to south-east by about 86m in width, and therefore is approximately rectangular. The western corner has a much larger radius than the other corners. Both the north-east and the south-east sides coincide with slight crests, which suggests that the camp may have faced in one of these directions (RCHME 1995, 41).
Assessment	The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR	Wy House and barn adjoining 07 357910 534945

Site number	07
NGR	357910 534945
HER no	25105
Site Type	Farmhouse and barn
Period	Post-medieval
Statutory	
Designation	Grade II Listed Building: 74283
Source	HER
Description	Farmhouse and barn. Late seventeenth century with nineteenth century alterations.
Assessment	The site lies outside of the proposed pipeline route and will not be affected by the works.

Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description	 Milestone, east of Langwathby 08 357624 533685 Milestone (site of) Post-medieval Map regression A milestone shown at the junction of the road which heads north-east from Langwathby with the road heading east to Skirwith on the OS map of 1867. The milestone is marked 'Alston 14 Penrith 5'. On the current map the road heading north-eastwards from Langwathby appears to have been widened at this junction, to incorporate the area formerly occupied by the milestone. The milestone is not marked on the current mapping. The site of the former milestone is located close to the proposed pipeline route, however as the milestone is thought to be no longer extant it will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Old quarries 09 360810 532655 - Quarries Post-medieval - Map regression Old quarries are marked on the north side of the Briggle Beck on the OS map of 1900. The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Clearance Cairn, Penglemoor Plantation 10 359480 532950 - Post-medieval - Walkover Sub-rounded clearance cairn measuring 3m north to south by 2m east to west and raised 0.5m, probably associated with the removal of the dry-stone wall field boundary to the immediate north. The site lies within of the proposed pipeline route and will be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source	Oxbow lake, south west of Penglemoor Plantation 11 359414 532730 - Topographic Unknown - Walkover

Description Assessment	Comprising of a series of earth and stone banks enclosing a wet marshland lush in emergent vegetation. This feature has been enclosed by a post and wire fence presumably for the protection of livestock The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Clearance Cairn, Sowyersteps Bridge 12 359254 532764 - Clearance Cairns Post-medieval - Walkover Two sub-rounded stone cairns measuring 1m by 1m and raised 0.4m, probably associated with the removal / repair of the field boundary to the immediate west. The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Ridge and Furrow, west of White Keld Spring 13 359745 533037 - Ridge and Furrow Post-medieval - Walkover Roughly aligned north/east to south/west with <i>c</i> 2m wide ridges raised by at most 0.2m, this site is very faint. The site lies outside of the proposed pipeline route and will not be affected by the works.
Site Name Site number NGR HER no Site Type Period Statutory Designation Source Description Assessment	Earthworks, north east of High Mill 14 357381 534061 - Earthworks ?Post-medieval - Walkover Comprising of an earth and stone mound measuring 3m by 4m and 0.25m high enclosed by a shallow ditch 0.2m deep. This site is located within 5m of a current field gate, suggesting it may be the location of a recent feeding point. The site lies within the proposed pipeline route and will be affected by the works.
Site Name Site number NGR HER no Site Type Period	Ridge and Furrow, east of Langwathby 15 357222 534558 - Ridge and Furrow Post-medieval

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Statutory Designation

Source Description Assessment	Walkover Roughly aligned north/east to south/west with c 2m wide ridges raised by at most 0.2m, this site is very faint. The site lies within the proposed pipeline route and will be affected by the works.
Site Name	Ridge and Furrow, south west of Winskill
Site number	16
NGR	357597 534785
HER no	-
Site Type	Ridge and Furrow
Period	Post-medieval
Statutory	
Designation	
Source	Walkover
Description	Roughly aligned north/west to south/east with c 2m wide ridges raised by at most
-	0.2m, this site is very faint.
Assessment	The site lies within the proposed pipeline route and will be affected by the works.

6. RECOMMENDATIONS

6.1 INTRODUCTION

- 6.1.1 Rapid research of the available evidence from the Cumbria HER, historic maps held at the Record Office in Carlisle, and the OA North library as well as a walkover survey, has shown that there is some potential for archaeological remains along the proposed route of the pipeline.
- 6.1.2 Two Neolithic axes have been found in the vicinity of Winskill (Site **02**) and just outside of the study area, to the south of Winskill, a Bronze Age cremation with a beaker was found by a farmer in 1850. To the south-east of Langwathby and partially within the southern portion of the study area is a Roman temporary camp (Site **06**), identified from aerial photographs in 1992. Langwathby has its origins in the medieval period, and the pipeline crosses part of the area identified as the medieval village (Site **03**). In addition, an area of undated cropmarks (Site **01**), is crossed by the route of the proposed pipeline, towards its eastern extent.

6.2 **Recommendations**

- 6.2.1 Prior to the commencement of construction works the undated cropmarks (Site 01) should be subject to a topographic survey. The area of the cropmarks (Site 01), the medieval village area (Site 03) and the area to the north of the Roman camp (Site 06) should be subject to a programme of evaluation trenching.
- 6.2.2 Due to the potential for further remains along the route, ranging from the Neolithic to the post-medieval period, it is recommended that a permanent presence watching brief is undertaken for the entire length of the easement. Site 14, the location of undated earthworks, may be impacted by the proposed pipeline. These earthworks are thought to be fairly recent in date and should be investigated and recorded as part of the watching brief.

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8. ILLUSTRATIONS

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Figure 4: Extract from Ordnance Survey First Edition, 6 inch to 1 mile, 1867

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Plate 10: Site 01 Cropmarks, facing south

Plate 11: Site 01 Cropmarks, facing south-west



Figure 1: Site Location



Figure 2a: Plan of gazetteer sites (West)



Figure 2b: Plan of gazetteer sites (East)

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Figure 3: Extract from Kitchen's map of Cumberland, 1777







Figure 6: Extract from Ordnance Survey Edition of 1926, 6" to 1 mile



Plate 1: Site 13 Ridge and Furrow, facing north-east



Plate 2: Site 15 Ridge and Furrow, facing south



Plate 3: Site 16 Ridge and Furrow, facing north



Plate 4: Site 10 Clearance Cairn, facing south-west



Plate 5: Site 12 Clearance Cairn, facing south



Plate 6: Site 11 Oxbow lake, facing north



Plate 7: Site 11 Oxbow lake, facing south



Plate 8: Site 14 Earthwork, facing south



Plate 9: Site 14 Earthwork, facing north-west



Plate 10: Site 01 Cropmarks, facing south



Plate 11: Site **01** Cropmarks, facing south-west