

PHASE 1 ENVIRONMENTAL ASSESSMENT FOR LAND ADJACENT LIDGETT LANE, PILLEY

CONTENTS

- 1.0 INTRODUCTION
- 2.0 LOCATION, TOPOGRAPHY & CURRENT CONDITION
- 3.0 HISTORIC SITE USAGE
- 4.0 GEOLOGY & HYDROGEOLOGY
- 5.0 POLLUTION CONTROLS & WASTE
- 6.0 IDENTIFIED POSSIBLE SOURCES OF CONTAMINATION
- 7.0 RISK ASSESSMENT
- 8.0 DISCUSSION
- 9.0 INVESTIGATION WORKS REQUIRED
- 10.0 SUMMARY
- 11.0 CAVEATS

APPENDICES

- APPENDIX A - LIST OF DOCUMENTS REFERRED TO
- APPENDIX B - SITE LOCATION PLAN – (FIG. 1)
- APPENDIX C - SITE TOPOGRAPHICAL SURVEY AND SITE
CONCEPTIONAL SECTION – (FIG. 2)
- APPENDIX D - SITE PHOTOGRAPHS
- APPENDIX E - HISTORIC ORDNANCE SURVEY PLANS
- APPENDIX F - MINING REPORT

1.0 INTRODUCTION

- 1.01 Following instructions from JVH Planning on behalf of the Jaguar Estates Ltd and Wortley Construction Ltd on 07 March 2013, CoDA Structures have undertaken an appraisal of a proposed residential development site adjacent Lidgett Lane, Pilley.
- 1.02 The application site is currently farmland.
- 1.03 It is proposed to develop the site with approximately 35 houses.
- 1.04 Sections 2.0 – 7.0 of this report undertake a desk based assessment to determine the environmental quality of the land at the site and to identify the potential for any environmental risks as follows:-
- to establish the likely extent of any potential contamination at the site as a result of its current and previous use;
 - to establish the sensitivity of the site in relation to the site's geology, hydrogeology and hydrology;
 - to assess the significance of any potential contamination at the site with respect to possible harm to the surrounding environment and site end users;
 - to provide recommendations for further works as appropriate.
- 1.05 The interpretation provided in this report is based upon information gathered from public data sources.
- 1.06 The local authority is Barnsley Metropolitan District Council (BMDC).

2.0 LOCATION, TOPOGRAPHY & CURRENT CONDITION

- 2.01 The site is located to the south of Lidgett Lane and lies approximately 7.0 miles to the south of Barnsley Town Centre. A site location plan (Fig. 1) is attached in Appendix B.
- 2.02 The Ordnance Survey co-ordinates for the centre of the site are 433700mE, 400400mN.
- 2.03 The site is approximately 2.4 hectares in area.
- 2.04 The boundaries of the site are defined as follows:-
- Northern boundary : Hedgerow to edge of Lidgett Lane;
 - Southern boundary : Timber period fence to residential properties beyond;
 - Western boundary : Stone wall to the back of verge to Pilley Green
 - Eastern boundary : Post and wire fence and hedgerow to adjacent land.
- 2.05 The site can be accessed from Lidgett Lane.
- 2.06 A site walk-over was undertaken in March 2012 and the following noted:-
- the site is farmland.
 - there are hedgerows and trees to the perimeter of the site.
 - there are no obvious visual signs of contamination on the site.
- 2.07 The general fall of the site is to the south. Site varies as follows:-
- north western corner 158.69m AOD
 - north eastern corner 150.50m AOD
 - south western corner 147.87m AOD
 - south eastern corner 139.88m AOD
- 2.08 A site topographical survey (Fig. 2) is attached in Appendix C.
- 2.09 Site photographs are attached in Appendix D.

3.0 HISTORIC SITE USAGE

3.01 Extracts from Ordnance Survey Sheets dating back to 1855 have been examined and the following constitutes a brief history of the entire site and the surrounding land:-

Map date & Scale	On-site Features	Features within 250m of site	Features within 1000m of site
1855 1:10,000	- the site appears to be farmland;	- the surrounding area appears to be predominantly undeveloped; - Village of Pilley to the northwest; - Village of Pilley Green to the south;	- the surrounding area is predominantly undeveloped; - Village of Birdwell to the northeast; - old coal pit to the north; - old quarries to the northeast and west; - Birdwell Dike to the northeast; - Pilley Hills Colliery to the northwest; - Wharnccliffe Silkstone Colliery to the southeast; - blacksmiths to the south; - quarry to the south; - ironstone pit to the northwest; - quarry to the east; - railway lines to the south; - clay pit to the southeast;
1893 1:2,500	- no significant change noted;	- edge of a spoil heap to the south;	- not applicable (N/A);
1893/94 sheet 1:10,000	- no significant change noted;	- no significant change made;	- reservoir to the west; - quarry to the northeast; - significant expansion of Wharnccliffe Silkstone Colliery to the south; - residential development to the northeast; - gas works to the east; - Silkstone Colliery No. 2 pit to the southwest;
1905 1:2,500	- no significant change noted;	- residential development to the west and south; - railway branch line to the north and sidings to the east;	- N/A
1906/07 sheets 1:10,000	- no significant change noted;	- no significant change noted;	- sewage works to the northeast. - expansion of Birdwell to the northeast; - brickworks to the south; - air shaft to the southwest;
1931 1:2,500	- no significant change noted;	- no significant change noted;	- N/A
1932 1:10,000	- no significant change noted;	- no significant change noted;	- further expansion of Birdwell to the northeast; - further expansion of Wharnccliffe Colliery to the south;

			- sludge and filter beds to the southeast;
1938 1:10,000	- no significant change noted;	- no significant change noted;	- no significant change noted;
1948 1:10,000	- no significant change noted;	- no significant change noted;	- no significant change noted;
1956 1:10,000	- no significant change noted;	- residential development to the north;	- residential development to the south; - opencast coal workings to the southwest;
1957 1:2,500	- no significant change noted;	- railway branch line to the north and sidings to the east no longer present; - small ponds to the south;	- N/A
1963 1:2,500	- no significant change noted;	- further residential development to the north	- N/A
1965/66 sheet 1:10,000	- no significant change noted;	- slag heap to the south;	- commercial development to the east; - further residential development to the east; - Wharnccliffe Silkstone Colliery no longer shown to the south except for spoil heaps to the south;
1978/80/82 1:10,000 map incomplete	- no significant change noted;	- no significant change noted;	- commercial development to the south;
1982 1:2,500	- no significant change noted;	- no significant change noted;	- N/A
1993 1:2,500	- no significant change noted;	- no significant change noted;	- no significant change noted;
2006 1:10,000	- no significant change noted;	- no significant change noted;	- further expansion of Birdwell to the northeast; - further residential development to the southwest; - industrial park development to the south; - depot and works to the east;
2012 1:10,000	- no significant change noted;	- no significant change noted;	- no significant change noted;

3.02 Historic Ordnance Survey plans are attached in Appendix E.

4.0 GEOLOGY AND HYDROGEOLOGY

4.01 GEOLOGY:

1:50,000 British Geological Survey (BGS) Geological Sheet 87 Barnsley indicates the following:-

- The site is underlain by Pennine Middle Coal Measures and sandstone may be

present in the northeastern sector of the site.

- Drift deposits are unlikely to be present at the surface.
- The Tankersley fault appears to traverse the site in a northwest to southeast direction. The Birdwell fault lies adjacent the northwest corner of the site.
- Two coal seams may outcrop on the site.
- The approximate position of the faults and the coal outcrops are indicated on Fig 2.

4.02 MINING & MINERALS:

A mining report has been obtained from D Bellis Consulting Surveyors and is summarised as follows:-

- The following seams have been worked below the site:-

Seam	Depth (m)	Section (cm)	Date	Remarks
Flockton Thick	52	50	Pre 1967	Subjacent
Top Fenton	104	83	Pre 1977	Subjacent
Low Fenton	107	120	Pre 1980	Adjacent
Parkgate	126	137	Pre 1930	Subjacent
Thorncliffe	155	120	Pre 1968	Subjacent
Silkstone	208	114	Pre 1922	Subjacent
Whinmoor	267	94	Pre 1968	Subjacent

- There is coal in reserve below the site but no workings are currently planned.
- The site is situated on or adjacent an area of a former opencast coal mine.
- There are 2 no. recorded mine entries to the east of the site.
- The site is situated adjacent an area of made ground that was a former colliery site.
- There are some indications that gas emissions have occurred at or adjacent to the site.
- The area in close proximity to adits to the east of the site which have been subject to remedial works under emergency surface hazard procedures.
- The site is in an area where there may be unrecorded shallow workings.
- The property or property adjacent the site has been subject to a claim for past coal mining subsidence.

The mining report is attached in Appendix F

It is recommended that a rotary borehole investigation should be undertaken to investigate the possible presence of shallow coals workings below the site. In addition 4 No. gas monitoring wells should be installed to investigate the possible emission of mine gases at the site. A minimum of six gas readings should be taken.

There are 2 No. recorded BGS mineral sites within 1000m of the site. Of these 4 No. are within 500m of the site and details are summarised as follows:-

Location: Pilley 400m to the east
Type: Opencast
Status: Ceased
Commodity: Sandstone

Location: Potter Holes Plantation, Tankersley 375m to the southeast
Type: Opencast
Status: Ceased
Commodity: Clay and Shale

Location: Tankersley 437m to the south
Type: Deep mine
Status: Ceased
Commodity: Coal

Location: Tankersley 500m to the south
Type: Opencast
Status: Ceased
Commodity: Clay and Shale

4.03 HYDROGEOLOGY

No watercourses are believed to run through the site or lie in the immediate vicinity of the site.

From the inspection of OS maps watercourses lie in the vicinity of the site (within 500m to the west.

- drainage ditches 250m to the south
- un-named watercourse 250m to the west
- Birdwell Dike 360m to the west

There are other water features in the vicinity of the site (within 500m) as follows:-

- small pond 200m to the south
- groundwater issues 350m to the southeast
- groundwater sinks 400m to the southwest

The site is not believed to be prone to flooding and the Environment Agency flood map indicates that the site is in Flood Zone 1. Potential flooding issues are assessed further in CoDA Structures Flooding and Drainage Assessment report for the site.

The site is underlain by a bedrock aquifer designated as a Secondary Aquifer A which is strata with permeable layers capable of supporting water supplies at a local rather than strategic level and in some cases can form an important source of base flow to rivers.

There is no superficial aquifer designation for the site.

The overlying soils are classified as having a high leaching potential.

There are 10 No. discharge consents within 1000m of the site. Of these 1 No. is within 500m of the site and details are summarised as follows:-

- trade effluent 450m to the southeast

There have been 6 No. pollution incidents within 1000m of the site but none have been within 500m of the site.

There are no water abstraction licenses held within 1000m of the site.

The site does not lie within a Source Protection Zone.

There have been no prosecutions relating to controlled waters within 1000m of the site.

5.0 POLLUTION CONTROLS & WASTE

5.01 Pollution Controls:

There are no Integrated Pollution Control Permits held within 1000m of the site.

There are 3 No. Integrated Pollution Prevention and Control Permits held within 1000m of the site.

There are no Local Authority Pollution Prevention and Control Permits held within 1000m of the site.

There are no Local Authority Integrated Pollution Prevention and Control Permits held within 1000m of the site.

There are no registered radio active substance licences held within 1000m of the site.

There have been no prosecution relating to authorised processes within 1000m of the site.

There are 2 No. Control of Major Accidents Hazards Site (COMAH) within 1000m of the site and details are summarised as follows:-

Location: Wentworth Industrial Estate, Tankersley 602m to the south
Type: Lower tier
Status: Record ceased to be supplied under COMAH Regulations

Location: Wentworth Way, Tankersley 621m to the south
Type: Lower tier
Status: Record ceased to be supplied under COMAH Regulations

5.02 Waste:

There is 1 No. registered landfill sites within 1000m of the site but it is not within 500m of the site.

There are no British Geological Survey recorded landfill sites within 1000m of the site.

There are 2 No. Local Authority recorded landfill sites within 1000m of the site but neither are within 500m of the site.

There are 2 No. historic landfill sites within 1000m of the site but neither are within 500m of the site.

There is 1 No. waste treatment/disposal sites within 1000m of the site but it is not within 500m of the site.

There are 3 No. waste management facilities within 1000m of the site.

There is 1 No. waste transfer sites within 1000m of the site.

6.0 IDENTIFIED POSSIBLE SOURCES OF CONTAMINATION

The past history of the site would indicate no obvious sources of contamination.

6.01 Soil Contamination:

It does not appear that the site has been filled or artificially raised in level. However, the area adjacent the eastern boundary of the site is recorded as being an area of made ground and has been part of a colliery site. In addition open cast mining has taken place to the south of the site and the site is recorded as being on or adjacent to an area of open cast mining. Therefore any fill that may have been imported onto the site may have elevated levels of contamination, depending upon the source and nature of the material used.

Historic OS plans indicate the site has not been developed and appears to be have only been used as farmland.

The farmland use is considered to be a very low risk contaminative activity.

Potentially contaminative activities in the near vicinity (within 250m) of the site have included the following:-

- railway lines, sidings
- spoil heaps

Potentially contaminative activities in the surrounding area have included the following:-

- coal pits
- blacksmiths
- 'works'
- open cast coal mine
- quarries
- ironstone pits
- gas works
- brickworks
- clay pit
- colliery
- depots
- sludge & filter beds
- sewage works
- industrial park

In view of past activities adjacent the site it is possible the site has been at risk from the uncontrolled tipping of waste materials, residues or chemicals from surrounding past industries/activities particularly if made ground is present on the site.

Contemporary Trade Directory entries in the vicinity of the site (within 250m) are as follows:-

- Air Conditioning Equipment (inactive) 215m to the northwest of the site

There are no fuel station entries in the vicinity of the site (within 500m).

It is recommended that a ground investigation is undertaken on the site and if made ground is encountered or suspected contamination is encountered soil sampling should be undertaken for contamination testing.

6.02 Pollution of Controlled Waters:

The possibility of leachate contamination from any uncontrolled filling that has taken place on the site may need to be investigated to assess the potential for pollution to controlled waters (the underlying secondary aquifer - A and Birdwell Dike).

6.03 Gas Contamination:

The development does not appear to be at risk from the migration of landfill gas onto the site from known landfill sites in the surrounding area as none are within 250m of the development.

The development does not appear to be at risk from landfill gases from a backfilled clay pit and/or quarry and/or sludge and filter beds in the surrounding area to the site as these features are in excess of 250m from the site.

The development may be at risk from mines gases if shallow coal seams/workings are present below the site. In addition there are particular records that gas emissions from mine workings have occurred at the site.

Therefore it is recommended that gas monitoring should be undertaken on the site.

Database information indicates that the site is in an area where Radon protection measures are not required.

7.0 RISK ASSESSMENT

70.1 The following contaminated land risk assessment methodology is based on CIRIA C552 (2001) Contaminated Land Risk Assessment – ‘A Guide to Good Practice’, in order to quantify potential risk via risk estimation and risk evaluation, which can be adopted at the Phase 1 stage. This will then determine an overall risk category which can be used to identify likely actions. This methodology uses qualitative descriptors and is therefore a qualitative approach.

The methodology requires the classification of:

- the magnitude of the consequence (severity of risk occurring), and
- the magnitude of the probability (likelihood) of a risk occurring.

7.02 The potential consequences of contamination risks occurring at this site are classified in accordance with table 7.1, which is adapted from the CIRIA guidance.

Table 7.1 - Classification of Consequences:

Classification:	Definition of Consequence:
Severe	Short term (acute risks to human health). Short term risk of pollution of sensitive water resource or ecosystem. Catastrophic damage crops/buildings/property/infrastructure, including off-site soils.
Medium	Medium/long term (chronic) risks to human health. Medium/long term risk of pollution of sensitive water resource or ecosystem. Significant damage to crops/buildings/property/infrastructure (on or off-site). Contamination of off-site soils.
Mild	Easily preventable, permanent health effects on humans. Pollution of non-sensitive water resources. Localised damage to crops/buildings/property/infrastructure (on or off site).
Minor	Easily preventable non-permanent health effects on humans, or no effects. Minor, low level and localised contamination of on-site soils. Easily repairable damage to crops, buildings/property/infrastructure.

7.03 The probability of contamination risks occurring at this site will be classified in accordance with Table 7.2, which is also adapted from the CIRIA guidance. Note that for each category it is assumed that a pollution linkage exists. Where a pollution linkage does not exist the likelihood is zero, as is the risk.

Table 7.2 – Classification of Probability:

Classification:	Definition of Probability:
High Likelihood	Circumstances are such that an event appears very likely in the short term, or almost inevitable in the longterm; or there is already evidence that such an event has occurred.
Likely	Circumstances are such that an event is not inevitable, but is possible in the short term, and is likely over the longterm.
Low Likelihood	Circumstances are such that it is by no means certain that an event will occur even over along period, and it is less likely in the short term.
Unlikely	Circumstances are such that it is improbable that an event would occur even in the longterm.

- 7.04 For each possible pollution linkage (source-pathway-receptor) identified the potential risk can be evaluated. Based upon this CIRIA C552 presents definitions of the risk categories, together with the investigatory and remedial actions that are likely to be necessary in each case, as indicated in Table 7.3. These risk categories apply to each pollutant linkage, not simply to each hazard or receptor.

Table 7.3 – Definition of Risk Categories and Likely Actions required:

Risk Category:	Definition of Likely Actions Required:
Very high	Severe harm to a defined receptor is very likely, or has already occurred. The risk is likely to result in a substantial liability. Urgent investigation (if not already undertaken) is likely to be required. Urgent remediation is likely to be required.
High	Harm to a defined receptor is likely. The risk, if realised, may result in a substantial liability. Urgent investigation (if not already undertaken) is likely to be required. Remediation is likely to be required in the long term, possibly sooner.
Moderate	Harm to a defined receptor is possible, but severe harm is unlikely. Investigation is likely to be required to clarify the level of potential liability and risk. Some remediation may be required in the long term.
Low	Harm to a defined receptor is possible, but is likely to be mild at worst. Liabilities could theoretically arise, but are unlikely. Further investigation is not required at this stage. Remediation is unlikely to be required.
Very low	Harm to a defined receptor is unlikely and would be minor at worst. No liabilities are likely to arise. Further investigation is not required at this stage. Remediation is unlikely to be required.

- 7.05 This relationship can also be represented as a matrix, as indicated in Table 7.4.

Table 7.4 – Probability / Consequence Matrix:

Probability	Consequence			
	Severe	Medium	Mild	Minor
High Likelihood	Very High Risk	High Risk	Moderate Risk	Low Risk
Likely	High Risk	Moderate Risk	Moderate Risk	Low Risk
Low Likelihood	Moderate Risk	Moderate Risk	Low Risk	Very Low Risk

Unlikely	Low Risk	Low Risk	Very Low Risk	Very Low Risk
----------	----------	----------	---------------	---------------

7.06 The following potential contamination pathways have been identified on the site:-

Horizontal and vertical migration pathways of leachate through the potentially permeable soils and geological formations.

Human Uptake Pathways (derived from CLEA model and LQA for residential use with plant uptake):

- Ingestion of soil
- Ingestion of indoor dust
- Dermal contact with soil
- Contact with indoor dust
- Inhalation of vapours outside
- Inhalation of vapours inside
- Vertical and lateral migration of volatile vapours and ground gas
- Indirect ingestion
- Airborne hazardous fibres
- Plant root uptake.

7.07 The following environmental receptors have been identified on site:-

- Groundwater residing in the underlying secondary aquifer – A
- Birdwell Dike
- Buildings / structures
- Flora / Fauna
- Underground services
- Third party land.

7.08 The following human receptors have been identified on the site:-

- Construction.
- Maintenance Workers.
- End users.

**PHASE 1 ENVIRONMENTAL ASSESSMENT
FOR LAND ADJACENT LIDGETT LANE, PILLEY**

7.09 Summary – Earthworks and Construction Phase:

A Risk Assessment of the site is summarised in the table below:-

Source	Receptor	Pathway	Consequence	Probability	Risk Category	Comments
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R1: Groundwater (secondary aquifer – A). R2: Birdwell Dike	P1: Horizontal and Vertical migration of leachate through potentially permeable soils and service trenches.	Medium	Likely	Moderate	Low permeability soils if present below the site, will prevent the migration of contaminants. Some types of contamination is likely to be localised. Site remediation works and measures can reduce risk.
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R3: Buildings and structures.	P1: Horizontal and Vertical migration of leachate through potentially permeable soils and service trenches.	Medium	Likely	Moderate	Made ground if present on the site may contain elevated sulphate levels which could result in corrosion of buried concrete structures. However, sulphate resisting cement can be used in concrete.
S1: Contamination in made ground used to fill the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R4: Construction workers.	P2: Human uptake pathways (see 7.06). P3: Vertical migration of volatile vapours and ground gas.	Severe	Likely	High	Some types of contamination is likely to be localised. Site remediation works and measures can reduce risk. The risk to workers who do not use the appropriate PPE is likely to be significant.
S3 Gas Generation in landfill sites S4 Backfilled quarries, sludge/filter beds and/or clay pit within 250m of the site.	R4: Construction workers.	P2: Human uptake pathways (see 7.06). P3: Vertical migration of volatile vapours and ground gas.	Severe	Unlikely	Low	No known such features within 250m of the site.

S5: Mine gases	R4: Construction workers.	P3: Vertical migration of volatile vapours and ground gas.	Severe	Likely	High	Due to the potential for exposure to gases, the risk to workers who do not use the appropriate PPE is likely to be significant.
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R5: Neighbouring Sites.	P1: Horizontal and Vertical migration of leachate through potentially permeable soils and service trenches.	Medium	Likely	Moderate	Low permeability soils if present below the site, will prevent the migration of contaminants. Some types of contamination is likely to be localised. Site remediation works and measures can reduce risk.

7.10 Site Risk Assessment Summary Post Development:

Source	Receptor	Pathway	Consequence	Probability	Risk Category	Comments
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R6: Maintenance Workers.	P2: Human uptake pathways. P3: Vertical migration of volatile vapours and ground gas.	Severe	Likely	High	Site remediation works such as hot spot removal will reduce risk to low. The risk to maintenance workers who do not use the appropriate PPE is likely to be significant.
S3: Gas generation in landfill sites. S4 Backfilled quarries, sludge/filter beds and/or clay pit within 250m	R6: Maintenance Workers.	P2: Human uptake pathways. P3: Vertical migration of volatile vapours and ground gas.	Severe	Unlikely	Low	No known such features within 250m of the site.
S5: Mine gases from shallow coal seam.	R6: Maintenance Workers	P3: Vertical migration of volatile vapours and ground gas.	Severe	Likely	High	Due to the potential for exposure to gases, the risk to workers who do not use the appropriate PPE is likely to be significant.
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of	R7: Site end users.	P2: Human uptake pathways. P3: Vertical migration	Severe	Likely	Moderate	Hardcover areas will act as a barrier between contamination and end users. Remediation works such as

**PHASE 1 ENVIRONMENTAL ASSESSMENT
FOR LAND ADJACENT LIDGETT LANE, PILLEY**

waste products and residues from adjacent industries/activities.		of volatile vapours and ground gas.					contamination hot spot removal and provision of an inert capping layer to garden areas will reduce risk to Low.
S3: Gas generation in landfill sites. S4 Backfilled quarries, sludge/filter beds and/or clay pit within 250m. S6: Radon generation in underlying geology.	R7: Site end users.	P2: Human uptake pathways. P3: Vertical migration of volatile vapours and ground gas.	Severe	Unlikely	Low		
S5: Mine gases from shallow coal seam.	R6: Site end users	P3: Vertical migration of volatile vapours and ground gas.	Severe	Likely	High	Gas protection measures can be incorporated into buildings to reduce the risk to Low.	
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R7: Flora and Fauna.	P4: Plant root uptake.	Medium	Likely	Moderate	Remediation works such as contamination hot spot removal and provision of an inert capping layer will reduce risk to Low.	
S1: Contamination in made ground if present on the site. S2: Uncontrolled tipping of waste products and residues from adjacent industries/activities.	R8: Services	P1: Horizontal and Vertical migration of leachate through potentially permeable soils and service trenches.	Severe	Likely	High	Site remediation works such as hot spot removal will reduce risk to Low. Service trenches to be back filled with inert material. 'Protector line' water pipes can be used if necessary.	

8.0 DISCUSSION

8.01 Contamination:

It is considered very unlikely that contamination is present on the site due to past known activities on the site. However, it is possible that contamination may be present on the site due to past activities on and in the immediate vicinity of the site. If made ground is present it may contain elevated levels of contamination, depending on the source and nature of any fill materials used. It is recommended that a ground investigation is undertaken on the site with soil sampling for contamination testing and risk assessment if made ground or suspected contamination is encountered.

Due to the risk for contamination to be present on this site, the following 'standard' suite should be adopted if made ground is encountered:-

arsenic	boron (ws)	copper	sulphate (ws)
cadmium	nickel	lead	pH
chromium	zinc	mercury	PAH speciated

If hydrocarbon contamination is present on the site from visual and/or olfactory evidence, testing for speciated TPH, and BTEX should be undertaken on selected samples.

It is possible that remediation works will may be required on the site.

8.02 Mining:

The site may be underlain by shallow coal workings which will need to be investigated by rotary drilling.

The site does not appear to be affected by mine entries.

8.03 Flooding:

The site is not believed to be prone to flooding and the Environment Agency flood map indicates that the site is in Flood Zone 1. Potential flooding issues are assessed further in CoDA Structures Flooding and Drainage Assessment report for the site.

8.04 Gas:

The development does not appear to be at risk from the migration of landfill gas onto the site from known landfill sites in the surrounding area as none are within 250m of the development.

The development does not appear to be at risk from landfill gases from a backfilled clay pit and/or quarry and/or sludge and filter beds in the surrounding area to the site as these features are in excess of 250m from the site.

The development may be at risk from mine gases.

Therefore it is recommended that gas monitoring is undertaken on the site.

Database information indicates that the site is in an area where Radon protection measures are not required.

9.0 INVESTIGATION WORKS REQUIRED

9.01 Ground Investigation:

- A trial pit ground investigation should be undertaken with soil sampling for contamination testing if made ground or suspected contamination is encountered.
- A rotary borehole investigation should be undertaken on the site together with the installation of 4 No. gas monitoring well. A minimum of six gas readings should be taken.

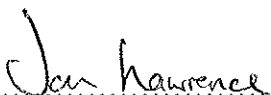
10.0 SUMMARY

Site Name & Location	Lidgett Lane, Pilley
Proposal	Approximately 35 houses
Local Authority	Barnsley Metropolitan District Council
Site History	Historic OS plans indicate that the site has not been developed. However, the area adjacent the eastern boundary of the site is recorded as being on an area of made ground and a colliery site. In addition open cast mining has occurred to the south of the site and the site is recorded as being on or adjacent to an area of open cast mining. Potentially contaminative activities in the near vicinity (within 250m) of the site have included a quarry, railway lines and sidings and spoil heaps. Potentially contaminative activities in the surrounding area have included coal pits, quarries, a blacksmiths, ironstone pits, a colliery, a sewage works, a clay pit, sludge and filter beds, a 'works', a gas works, depots, an industrial park, an open cast mine and a brickworks.
Geology	1:50,000 British Geological Survey (BGS) Geological Sheet 87 Barnsley indicates the following:- - The site is underlain by Pennine Middle Coal Measures and sandstone may be present in the northeastern sector of the site. - Drift deposits are unlikely to be present at the surface. - The Tankersley fault appears to traverse the site in a northwest to southeast direction. The Birdwell fault lies adjacent the northwest corner of the site. - Two coal seams may outcrop on the site.
Hydrogeology	The site is in a high sensitivity hydrogeological area as there is a water course within 10m of the site and the site is underlain by a Secondary Aquifer – A. However the site is not within a Source Protection Zone and there are no groundwater abstractions within 1000m of the site.
Flooding	The site is not believed to be prone to flooding and the Environment Agency flood map indicates that the site is in Flood Zone 1. Potential flooding issues are assessed further in CoDA Structures Flooding and Drainage Assessment report for the site.
Coal Mining	The site may be underlain by shallow coal workings. The site does not appear to be affected by mine entries.
Gas Contamination	The development does not appear to be at risk from the migration of landfill gas onto the site from known landfill sites in the surrounding area as none are within 250m of the development. The development does not appear to be at risk from landfill gases from a backfilled clay pit and/or quarry and/or sludge and filter beds in the surrounding area to the site as these features are in excess of 250m from the site. The development may be at risk from mines gases. Therefore gas monitoring should be undertaken on the site.
Radon	No protection measures required.
Ground Conditions	Subject to ground investigation but it is possible that made ground may be present on the site.
Contamination Assessment	It is possible that contamination may be present on the site.
Remediation	It is possible that remediation works may be required on the site
Further Investigation Work	Ground Investigation: A trial pit ground investigation should be undertaken with soil sampling for contamination testing if made ground or suspected contamination is encountered on the site. A rotary borehole investigation should be undertaken on the site together with the installation of 4No. gas monitoring wells. A minimum of six gas readings should be taken.

11.0 CAVEATS

- 11.01 The comments given in this report and recommendations made are based on the information that could be obtained from reasonably accessible sources. Discussions have not yet been held with statutory bodies and the local authority.
- 11.02 This report has been prepared for the sole use of Jaguar Estates Ltd and Wortley Construction Ltd and their development funders, unless agreed otherwise in writing by CoDA Structures.

Signed:

..........
J Lawrence B Eng C Eng M I Struct E

APPENDIX 'A'

LIST OF DOCUMENTS REFERRED TO:

- 1:50,000 BGS Geological Sheet 87 Barnsley
- Ordnance Survey Sheets:

1855	1:10,000	1932	1:10,000	1974	1:2,500
1893	1:2,500	1938	1:10,000	1978/80/82	1:10,000
1893/94	1:10,000	1948	1:10,000	1993	1:2,500
1905	1:2,500	1956	1:10,000	1998	1:2,500
1906/07	1:10,000	1957	1:2,500	2006	1:10,000
1931	1:2,500	1965/66	1:10,000	2012	1:10,000

- Envirocheck Report.
- CIRIA C552 (2001) Contaminated Land Risk Assessment
- Mining report prepared by D. Bellis Consulting Surveyors

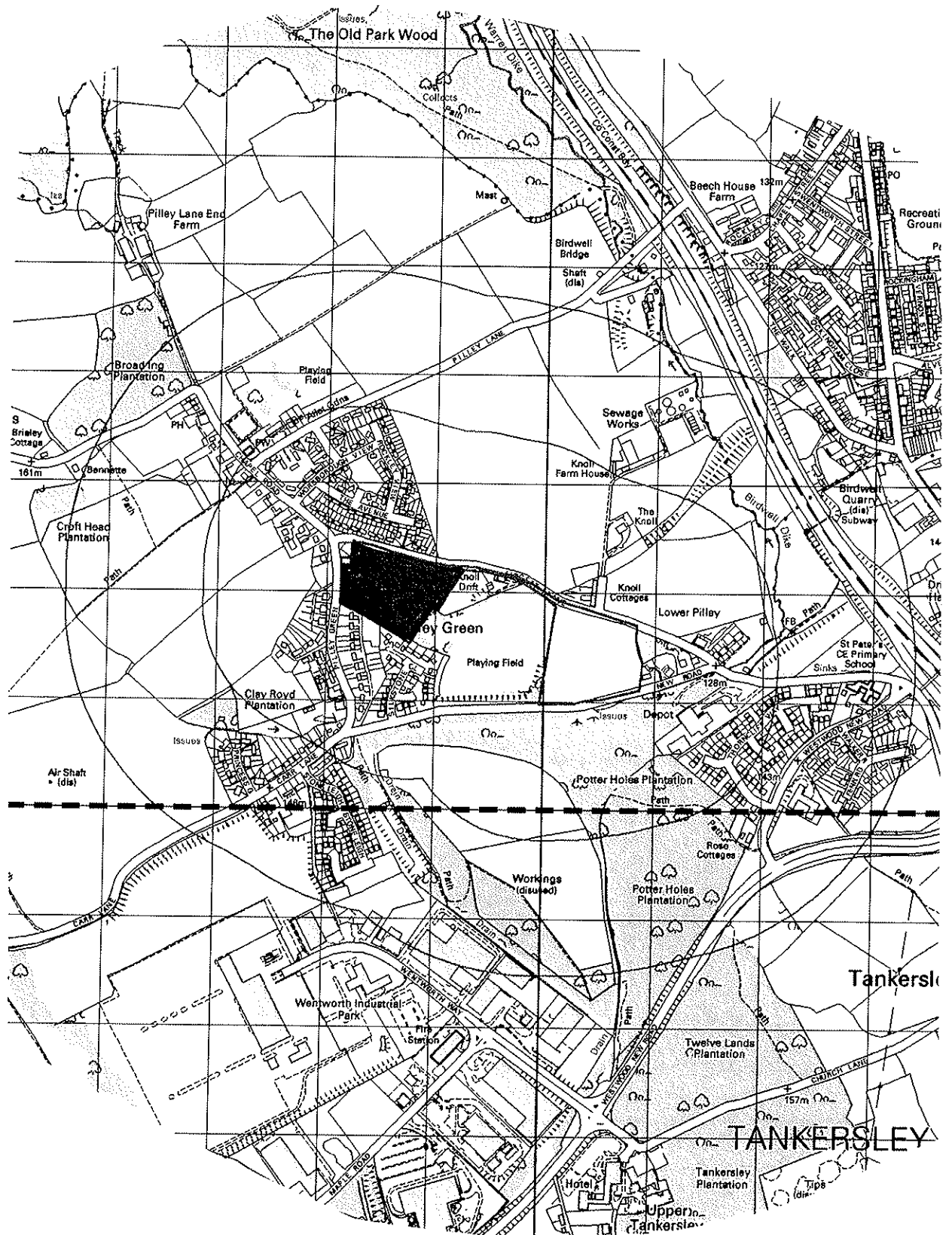
APPENDIX B

SITE LOCATION PLAN - FIG. 1

CoDa+ Structures

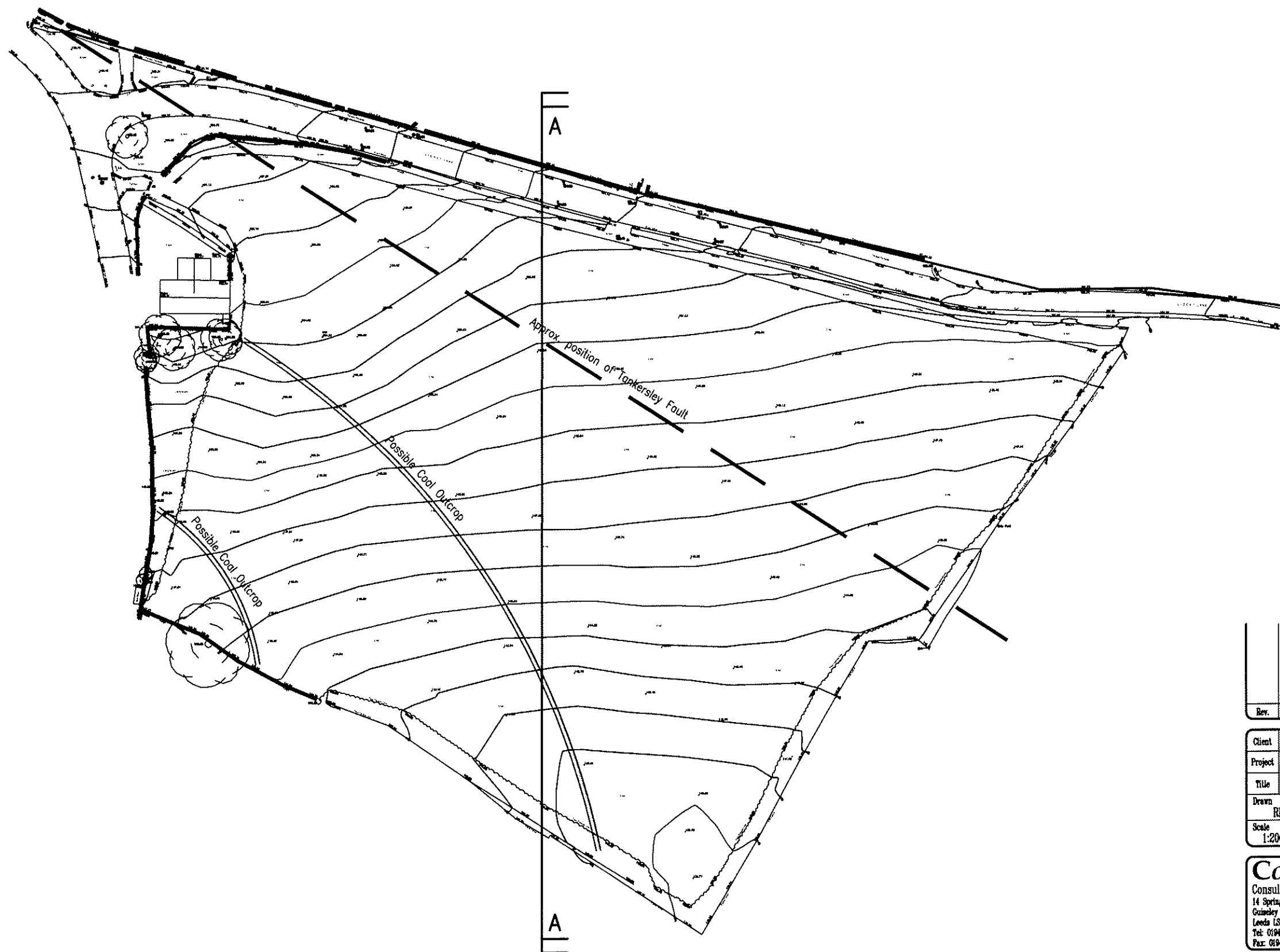
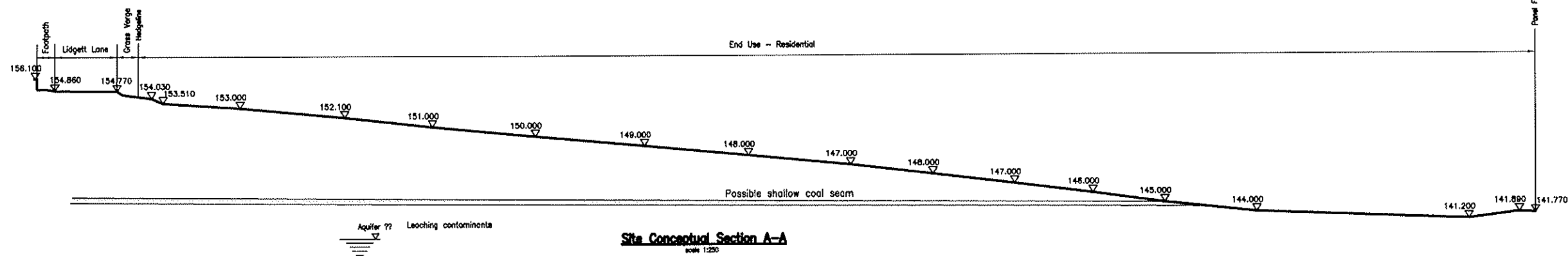
Consulting Civil & Structural Engineers
No 2 Harewood Yard
Harewood
Leeds LS17 9LF
Tel: 0113 288 6766
Fax: 0113 288 6765

Project	Lidgett Lane Piley		
Title	Site Location Plan		
Drawn	JL	Date	08.13
Scale	1:10000	Checked	JL
Drg. No.			7217/Fig1
Rev.			-



APPENDIX C

SITE TOPOGRAPHICAL AND SITE CONCEPTIONAL SECTION SURVEY – FIG. 2



Rev.	Content	Date

Client	Wortley Group		
Project	Lidgett Lane, Pilley		
Title	Site Topographical Survey		
Drawn	RD	Date	14.05.13
Scale	1:200 @ A1	Checked	JL
Dwg. No.	7217/Fig2		Rev.

CoDa+ Structures
Consulting Civil & Structural Engineers
14 Springfield Court
Guisborough
Leeds LS20 8PD
Tel: 01943 872587
Fax: 01943 870824

APPENDIX D

SITE PHOTOGRAPHS

1. Site aerial photograph.



2. View towards the southeast corner of the site



3. View towards the northeast corner of the site



4. View along the southern boundary to the east



5. View along the northern boundary to the east



APPENDIX E

HISTORIC ORDNANCE SURVEY PLANS

Historical Mapping Legends

Ordnance Survey County Series 1:10,560

	Gravel Pit		Sand Pit		Other Pits
	Quarry		Shingle		Orchard
	Osiers		Reeds		Marsh
	Mixed Wood		Deciduous		Brushwood
	Fir		Furze		Rough Pasture
	Arrow denotes flow of water		Trigonometrical Station		
	Site of Antiquities		Bench Mark		
	Pump, Guide Post, Signal Post		Well, Spring, Boundary Post		
	285 Surface Level				
	Sketched Contour		Instrumental Contour		
	Main Roads		Minor Roads		
	Sunken Road		Raised Road		
	Road over Railway		Railway over River		
	Railway over Road		Level Crossing		
	Road over River or Canal		Road over Stream		
	Road over Stream				
	County Boundary (Geographical)				
	County & Civil Parish Boundary				
	Administrative County & Civil Parish Boundary				
	County Borough Boundary (England)				
	County Burgh Boundary (Scotland)				
	Rural District Boundary				
	Civil Parish Boundary				

Ordnance Survey Plan 1:10,000

	Chalk Pit, Clay Pit or Quarry		Gravel Pit
	Sand Pit		Disused Pit or Quarry
	Refuse or Slag Heap		Lake, Loch or Pond
	Dunes		Boulders
	Coniferous Trees		Non-Coniferous Trees
	Orchard		Scrub
	Bracken		Heath
	Marsh		Reeds
	Building		Glasshouse
	Sloping Masonry		Pylon
	Electricity Transmission Line		Pole
	Cutting		Embankment
	Road Under		Road Over
	Level Crossing		Foot Bridge
	Standard Gauge Multiple Track		Standard Gauge Single Track
	Siding, Tramway or Mineral Line		Narrow Gauge
	Geographical County		
	Administrative County, County Borough or County of City		
	Municipal Borough, Urban or Rural District, Burgh or District Council		
	Borough, Burgh or County Constituency		
	Civil Parish		
	Boundary Post or Stone		Police Station
	Church		Post Office
	Club House		Public Convenience
	Fire Engine Station		Public House
	Foot Bridge		Signal Box
	Fountain		Spring
	Guide Post		Telephone Call Box
	Mile Post		Telephone Call Post
	Mile Stone		Well

1:10,000 Raster Mapping

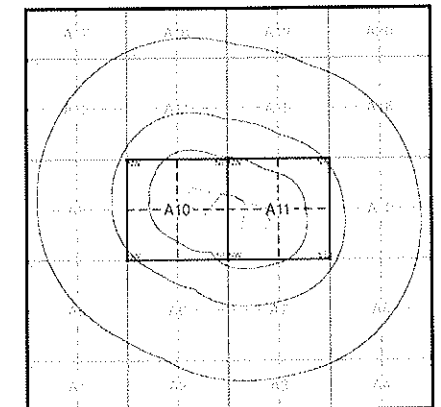
	Gravel Pit		Refuse tip or slag heap
	Rock		Rock (scattered)
	Boulders		Boulders (scattered)
	Shingle		Mud
	Sand		Sand Pit
	Slopes		Top of cliff
	General detail		Underground detail
	Overhead detail		Narrow gauge railway
	Multi-track railway		Single track railway
	County boundary (England only)		Civil, parish or community boundary
	District, Unitary, Metropolitan, London Borough boundary		Constituency boundary
	Area of wooded vegetation		Non-coniferous trees
	Non-coniferous trees (scattered)		Coniferous trees
	Coniferous trees (scattered)		Positioned tree
	Orchard		Coppice or Osiers
	Rough Grassland		Heath
	Scrub		Marsh, Salt Marsh or Reeds
	Water feature		Flow arrows
	Mean high water (springs)		Mean low water (springs)
	Telephone line (where shown)		Electricity transmission line (with poles)
	Bench mark (where shown)		Triangulation station
	Point feature (e.g. Guide Post or Mile Stone)		Pylon, flare stack or lighting tower
	Site of (antiquity)		Glasshouse
	General Building		Important Building



Historical Mapping & Photography included:

Mapping Type	Scale	Date	Pg
Yorkshire	1:10,560	1855	2
Yorkshire	1:10,560	1893 - 1894	3
Yorkshire	1:10,560	1906 - 1907	4
Yorkshire	1:10,560	1932	5
Yorkshire	1:10,560	1938	6
Yorkshire	1:10,560	1948	7
Ordnance Survey Plan	1:10,000	1956	8
Ordnance Survey Plan	1:10,000	1965 - 1966	9
Ordnance Survey Plan	1:10,000	1978	10
Ordnance Survey Plan	1:10,000	1980 - 1982	11
Ordnance Survey Plan	1:10,000	1989	12
Ordnance Survey Plan	1:10,000	1991 - 1992	13
10K Raster Mapping	1:10,000	2006	14
10K Raster Mapping	1:10,000	2012	15

Historical Map - Slice A



Order Details

Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

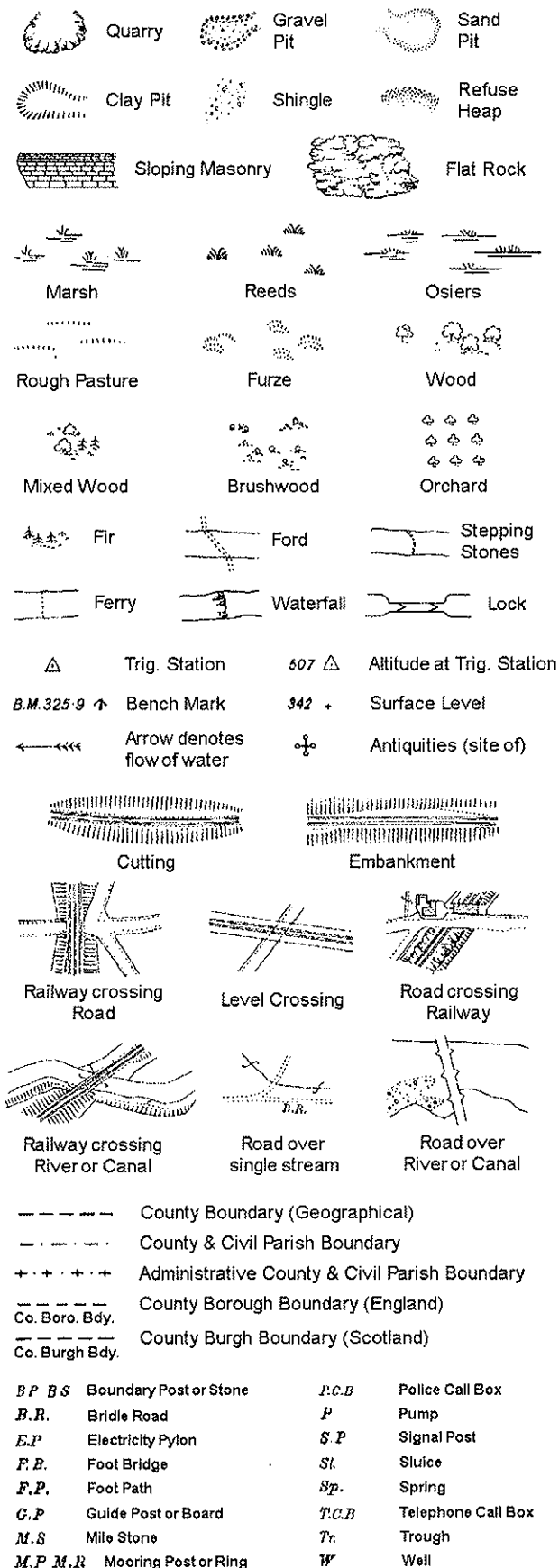
Site at, Pilley, Barnsley



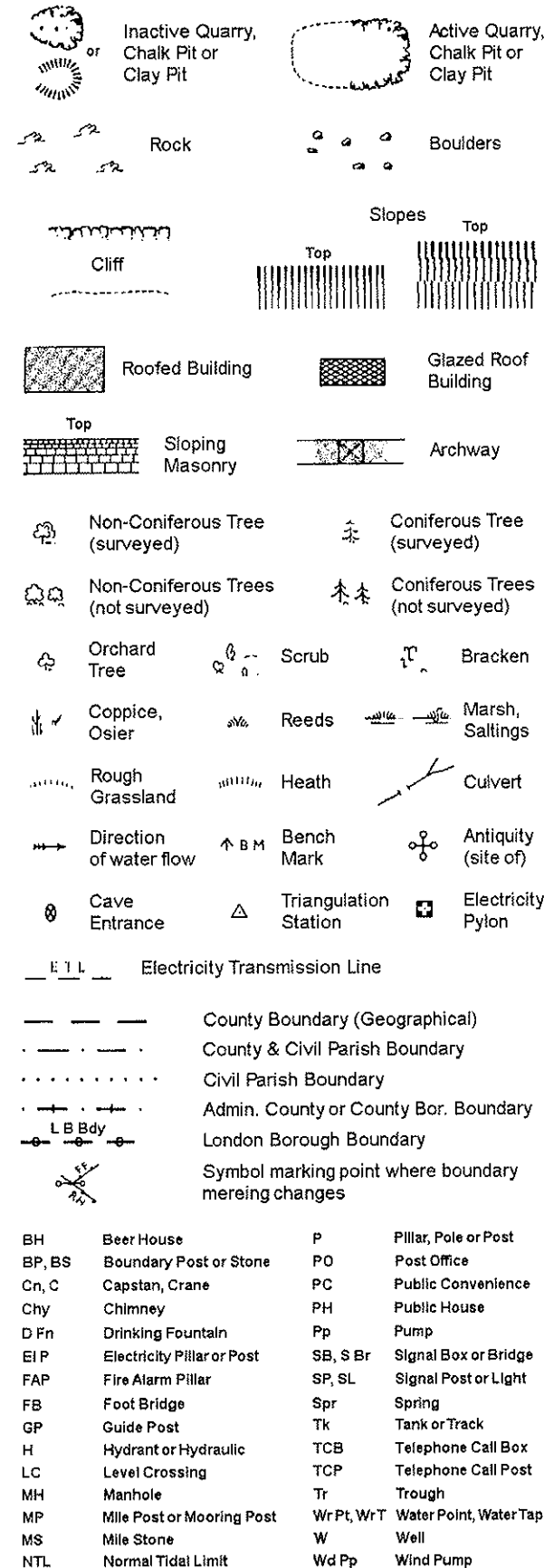
Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk

Historical Mapping Legends

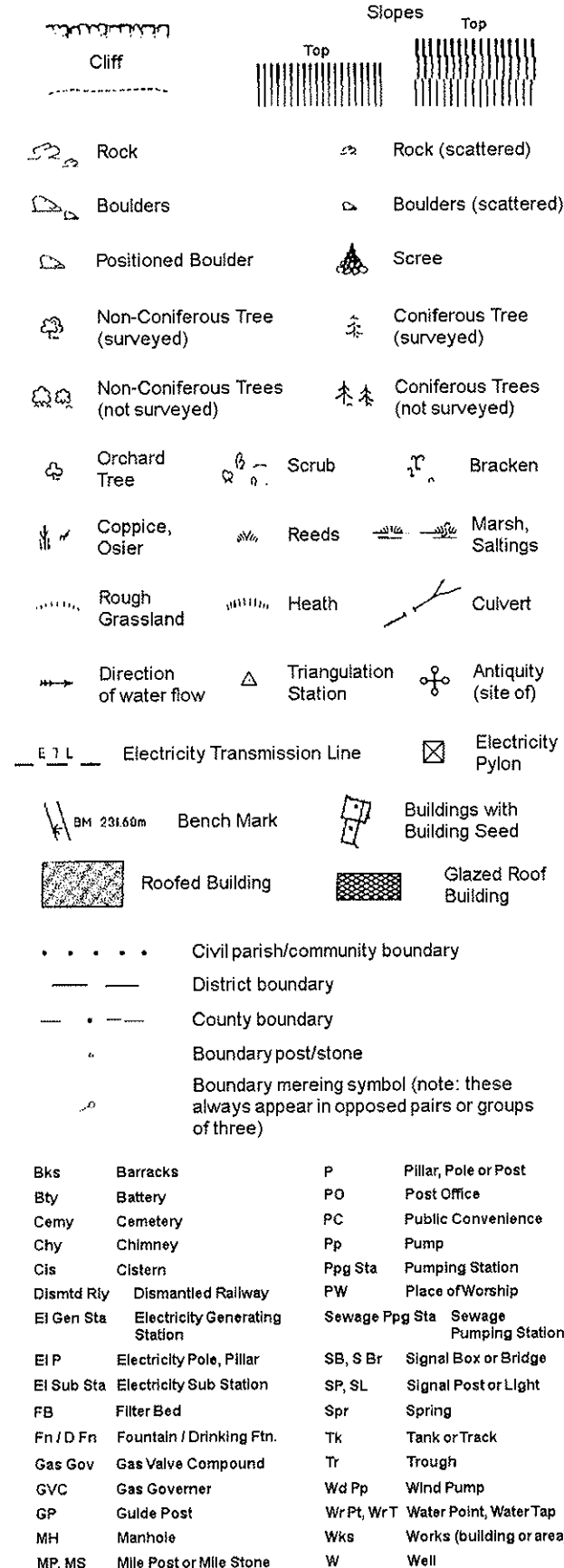
Ordnance Survey County Series and Ordnance Survey Plan 1:2,500



Ordnance Survey Plan, Additional SIMs and Supply of Unpublished Survey Information 1:2,500 and 1:1,250



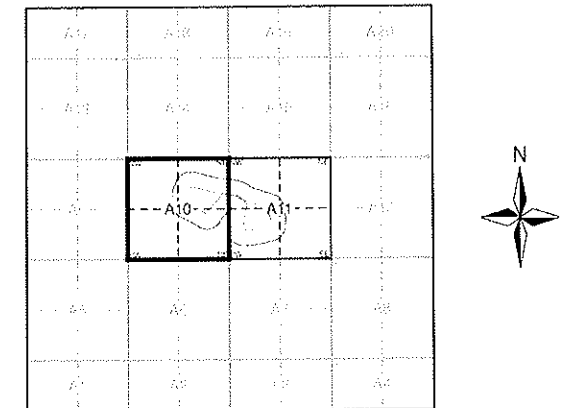
Large-Scale National Grid Data 1:2,500 and 1:1,250



Historical Mapping & Photography included:

Mapping Type	Scale	Date	Pg
Yorkshire	1:2,500	1893	2
Yorkshire	1:2,500	1905	3
Yorkshire	1:2,500	1931	4
Ordnance Survey Plan	1:2,500	1957	5
Ordnance Survey Plan	1:2,500	1963	6
Additional SIMs	1:2,500	1963	7
Additional SIMs	1:2,500	1982	8
Large-Scale National Grid Data	1:2,500	1993	9

Historical Map - Segment A10



Order Details

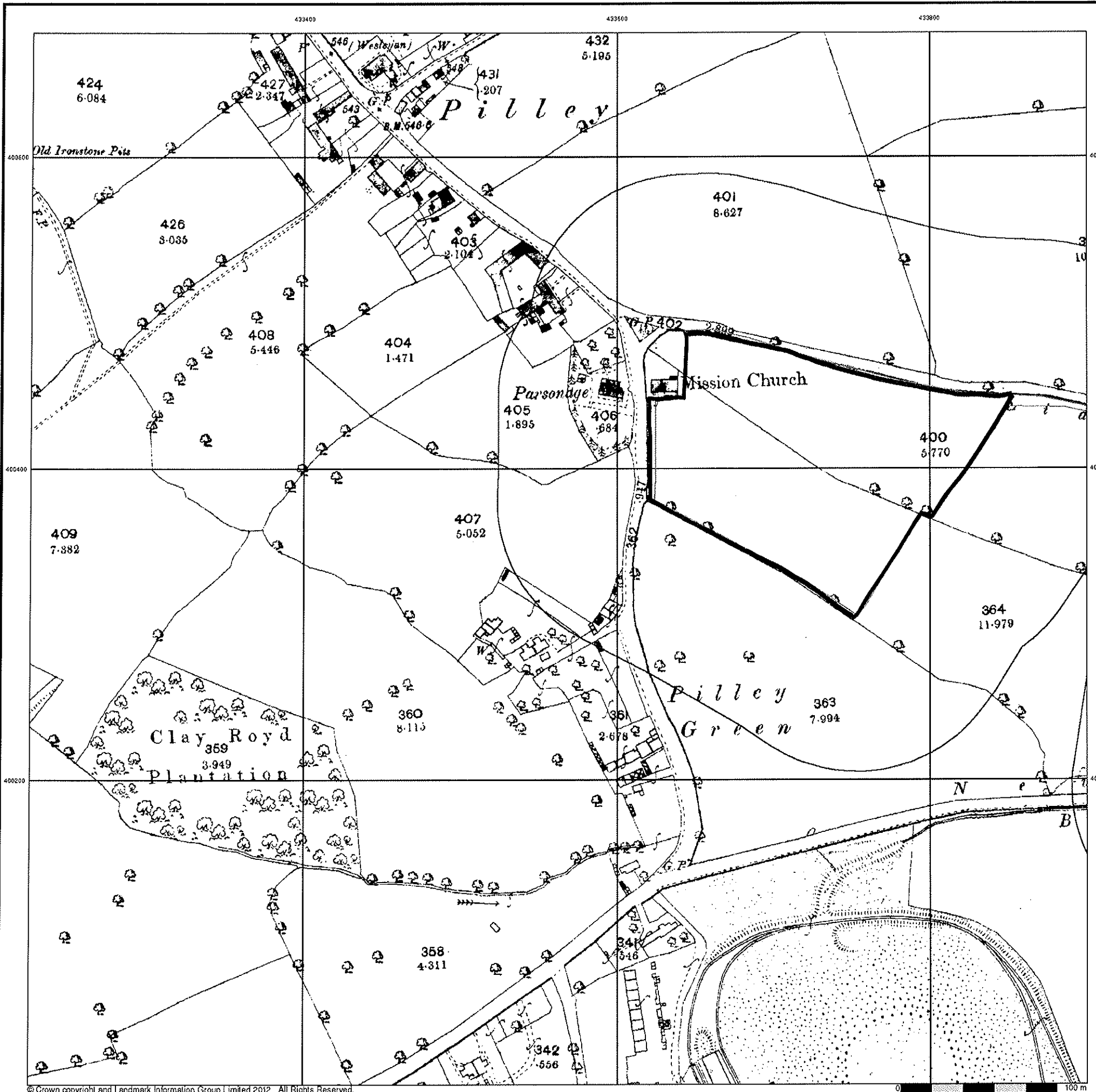
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



© Crown copyright and Landmark Information Group Limited 2012. All Rights Reserved.



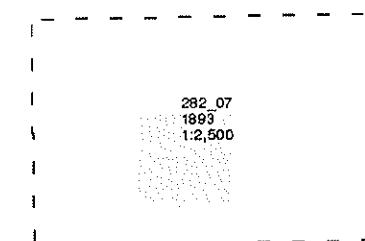
Yorkshire

Published 1893

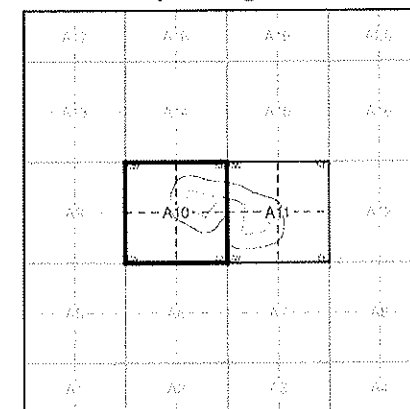
Source map scale - 1:2,500

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas and by 1896 it covered the whole of what were considered to be the cultivated parts of Great Britain. The published date given below is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

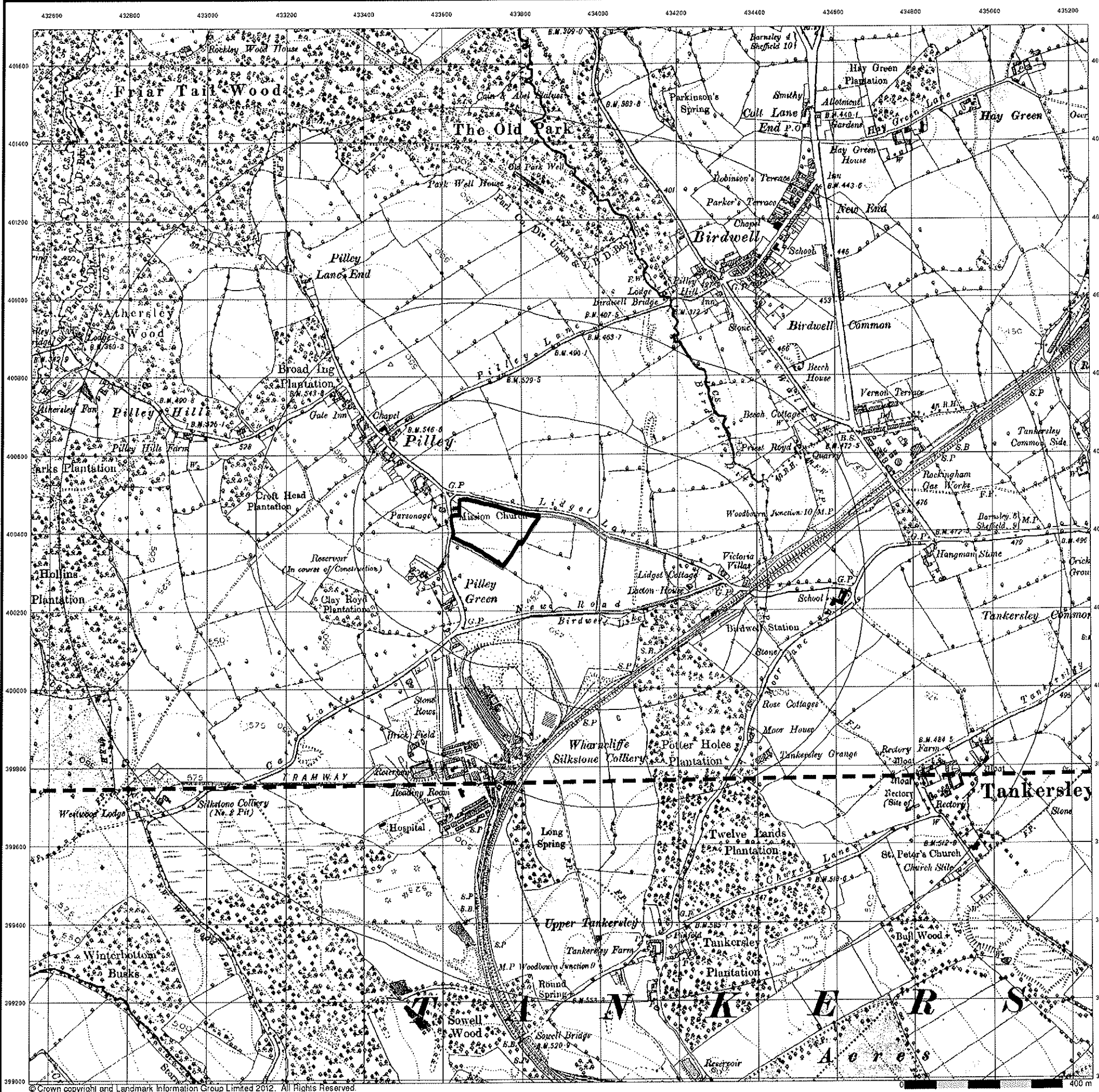
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 100

Site Details

Site at, Pilly, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



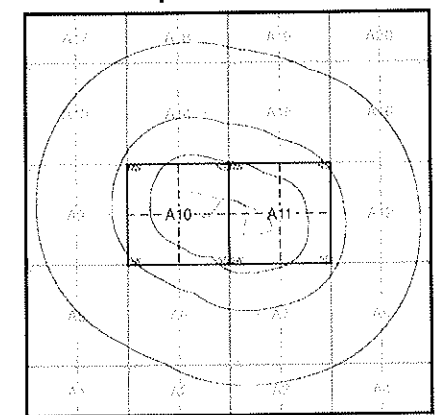
Yorkshire
Published 1893 - 1894
Source map scale - 1:10,560

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

282NE
1893
1:10,560
282SE
1894
1:10,560

Historical Map - Slice A



Order Details

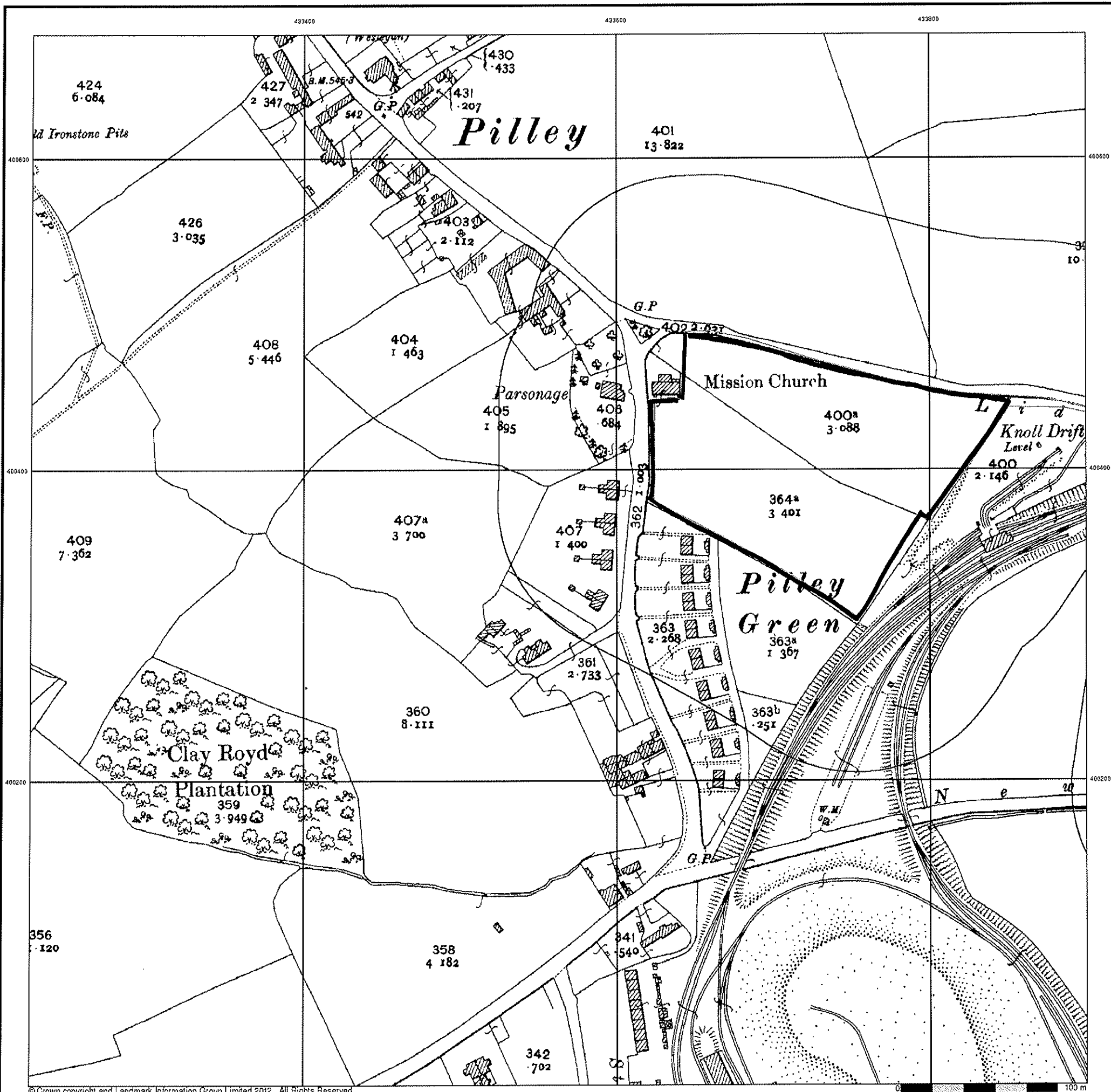
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 8952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



© Crown copyright and Landmark Information Group Limited 2012. All Rights Reserved.



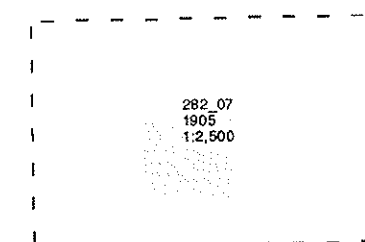
Yorkshire

Published 1905

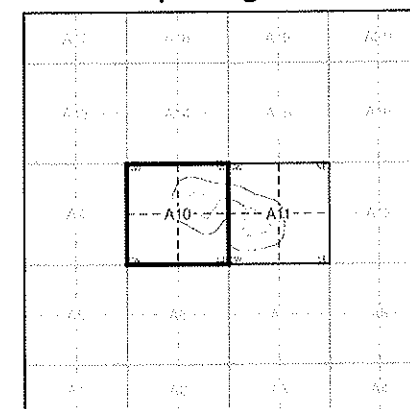
Source map scale - 1:2,500

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas and by 1896 it covered the whole of what were considered to be the cultivated parts of Great Britain. The published date given below is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

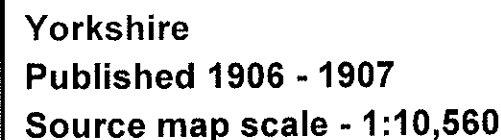
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



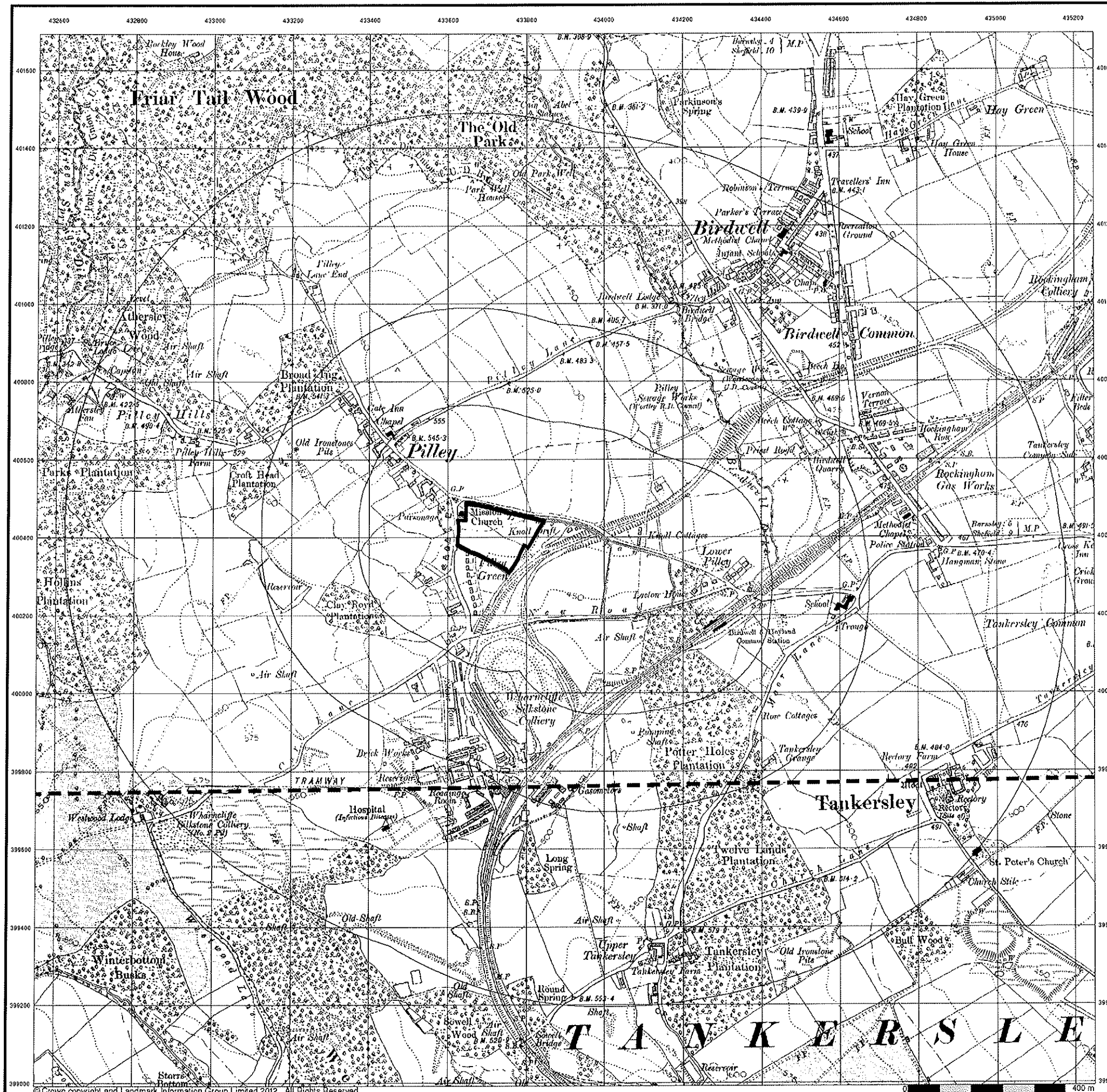
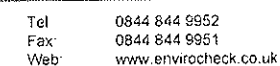
The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

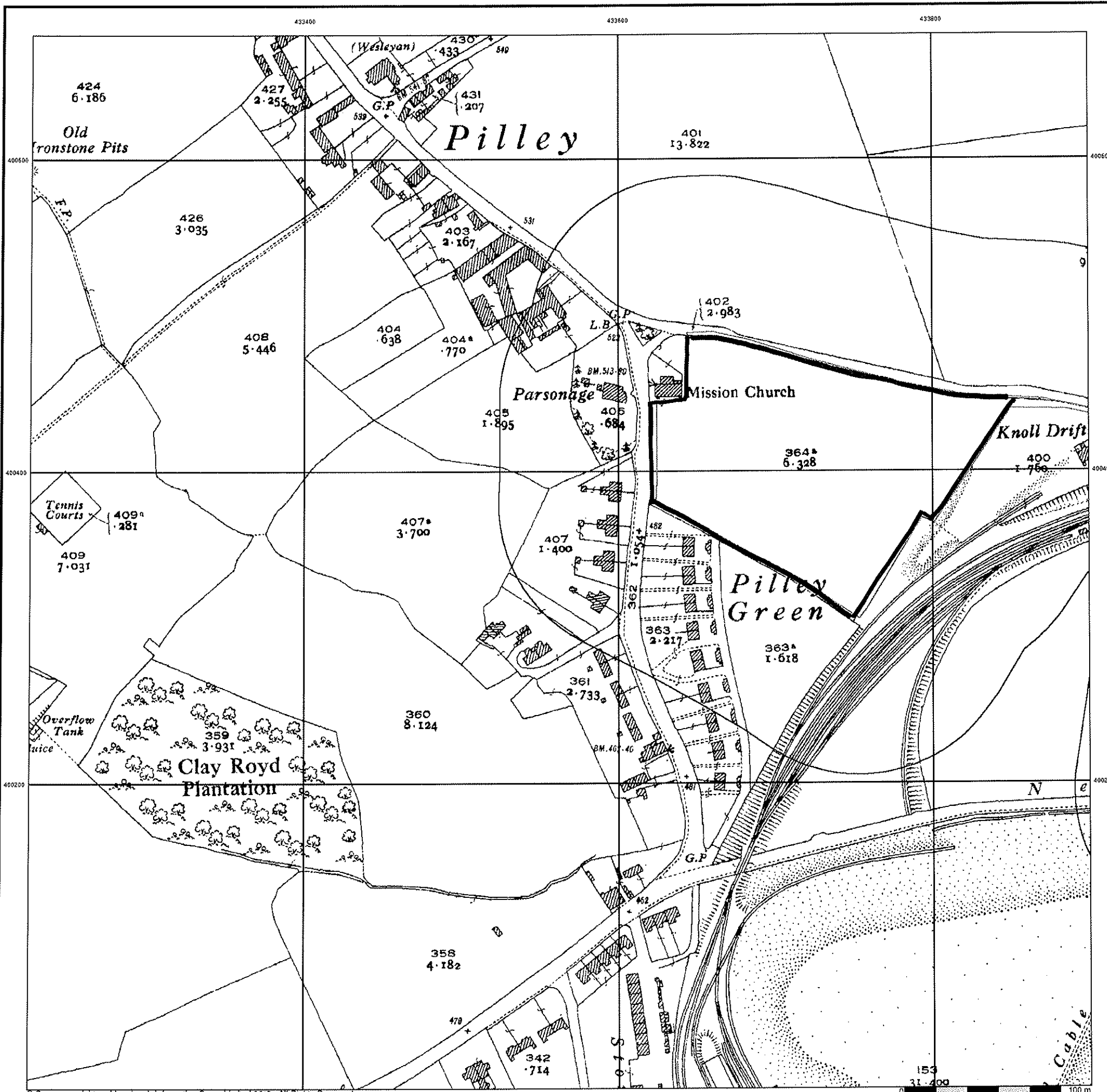
282NE
1907
1:10,560

282SE
1906
1:10,560

Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site at, Pilley, Barnsley

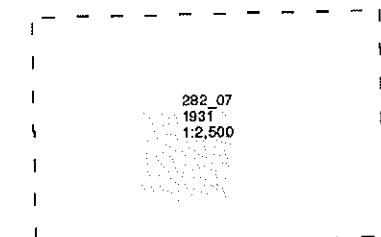




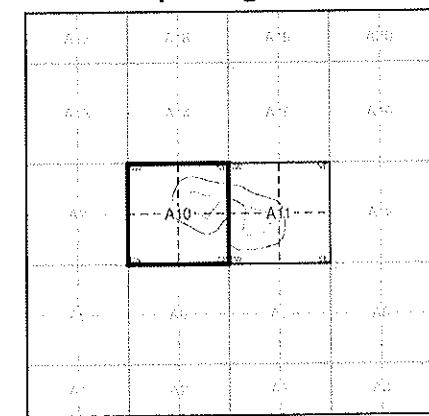
Yorkshire
Published 1931
Source map scale - 1:2,500

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas and by 1896 it covered the whole of what were considered to be the cultivated parts of Great Britain. The published date given below is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

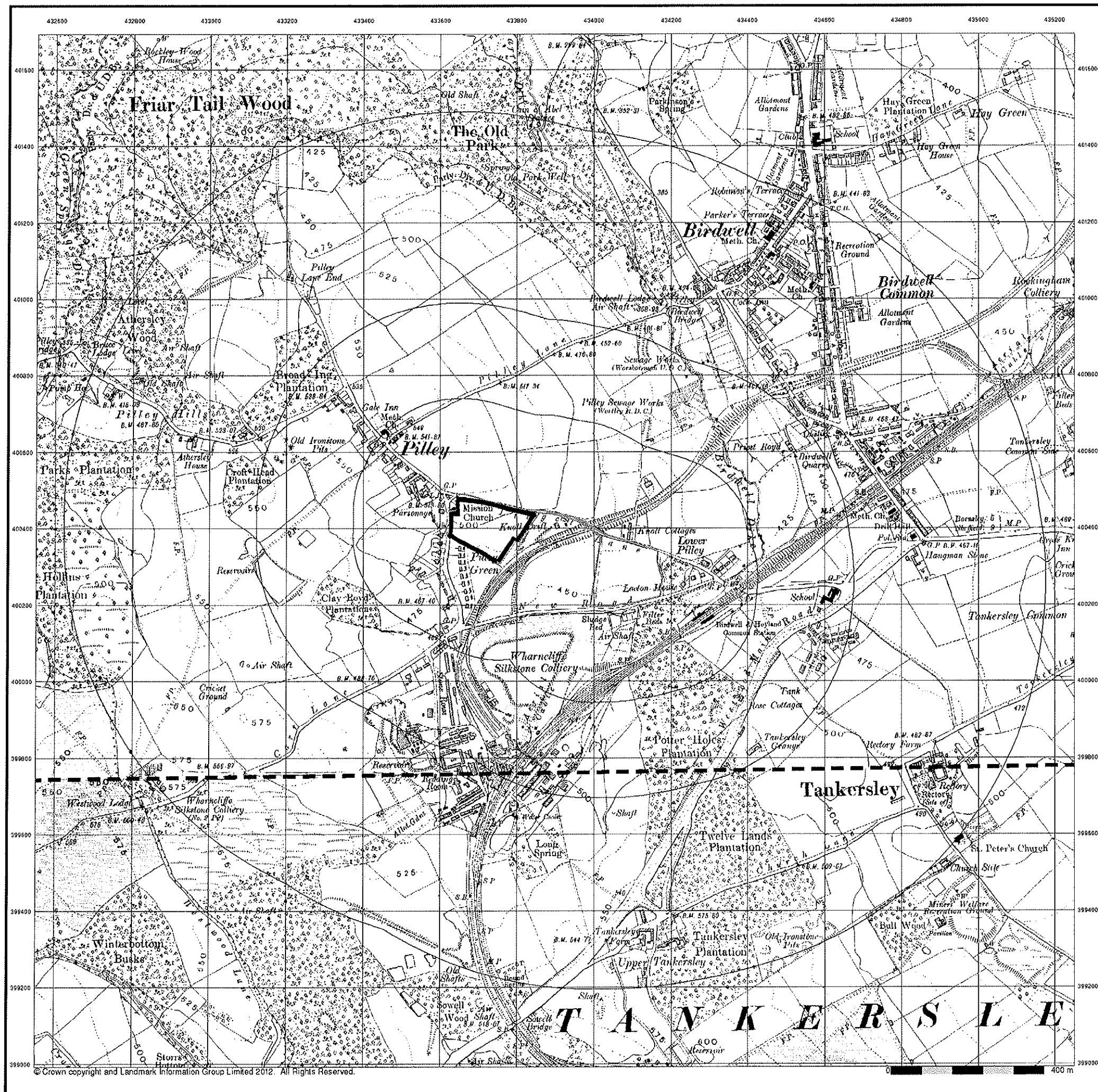
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



Yorkshire

Published 1932

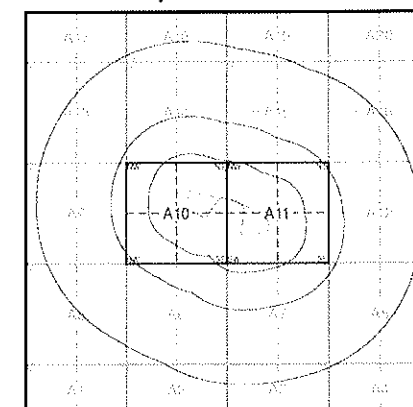
Source map scale - 1:10,560

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

282NE
1932
1:10,560
282SE
1932
1:10,560

Historical Map - Slice A



Order Details

Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk

Yorkshire

Published 1938

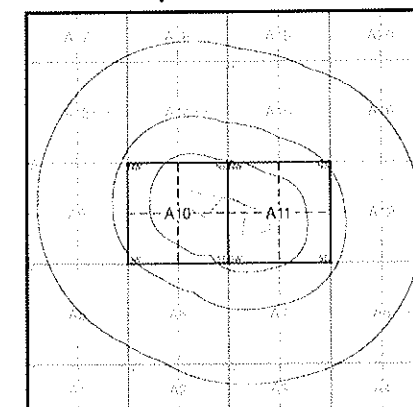
Source map scale - 1:10,560

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

262NE
1938
1:10,560
282SE
1938
1:10,560

Historical Map - Slice A

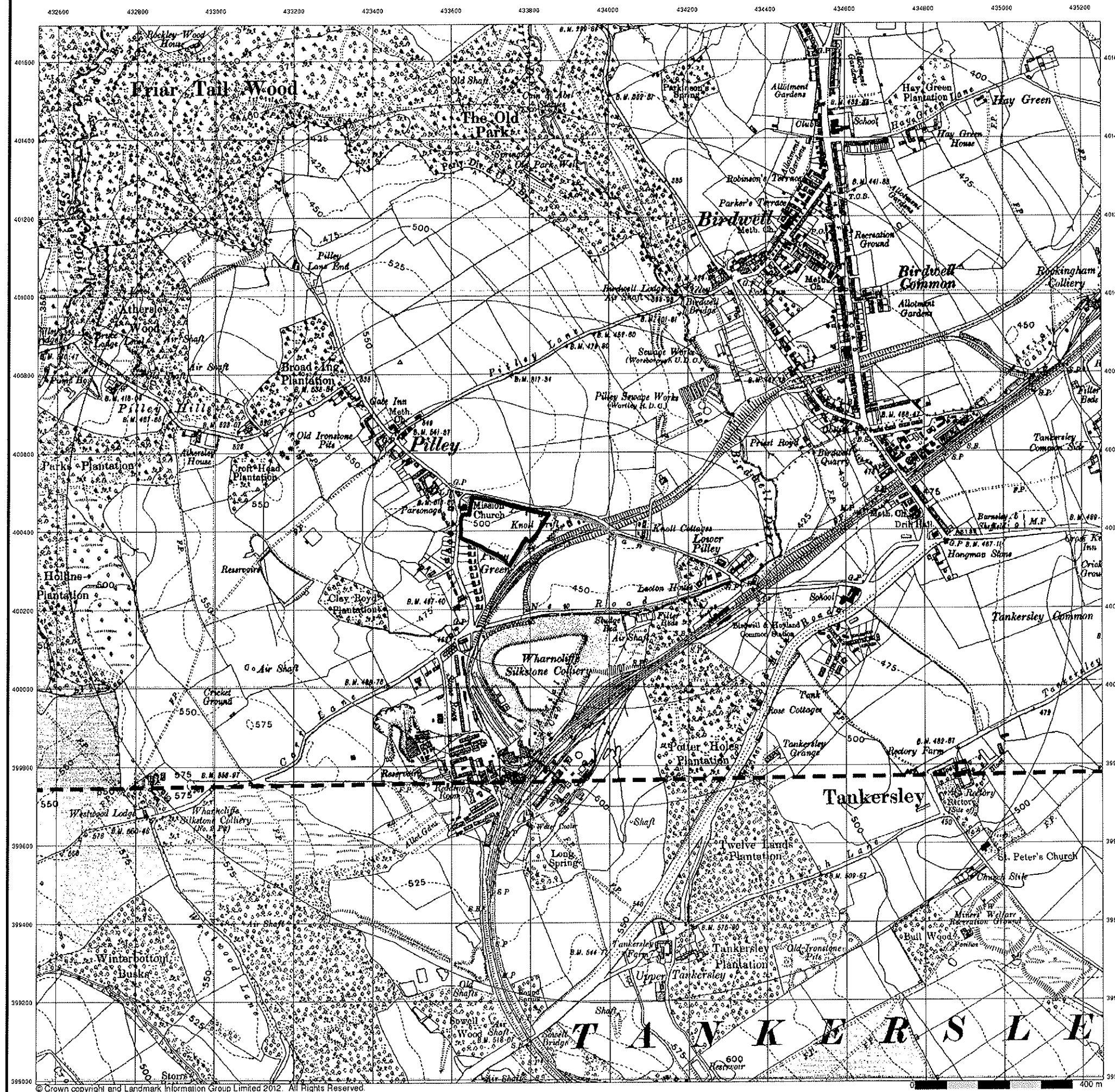


Order Details

Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Yorkshire

Published 1948

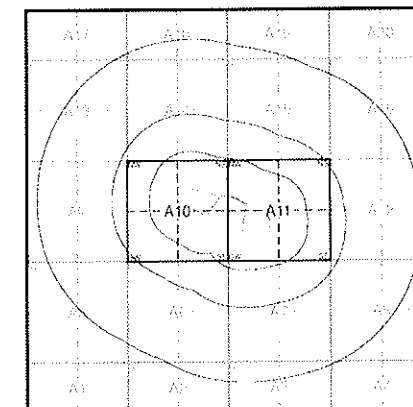
Source map scale - 1:10,560

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

282NE	1948	1:10,560
282SE	1948	1:10,560

Historical Map - Slice A

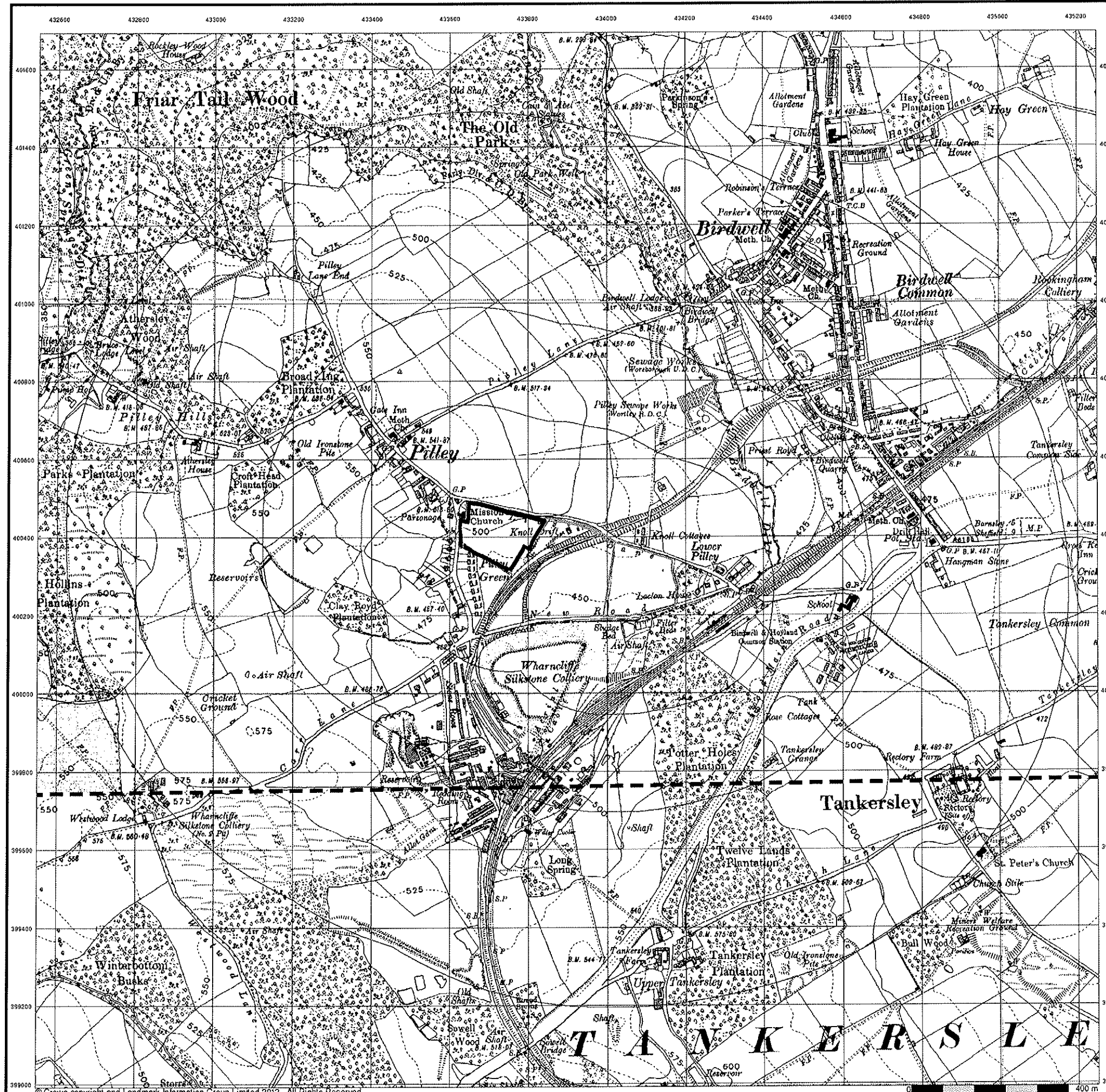


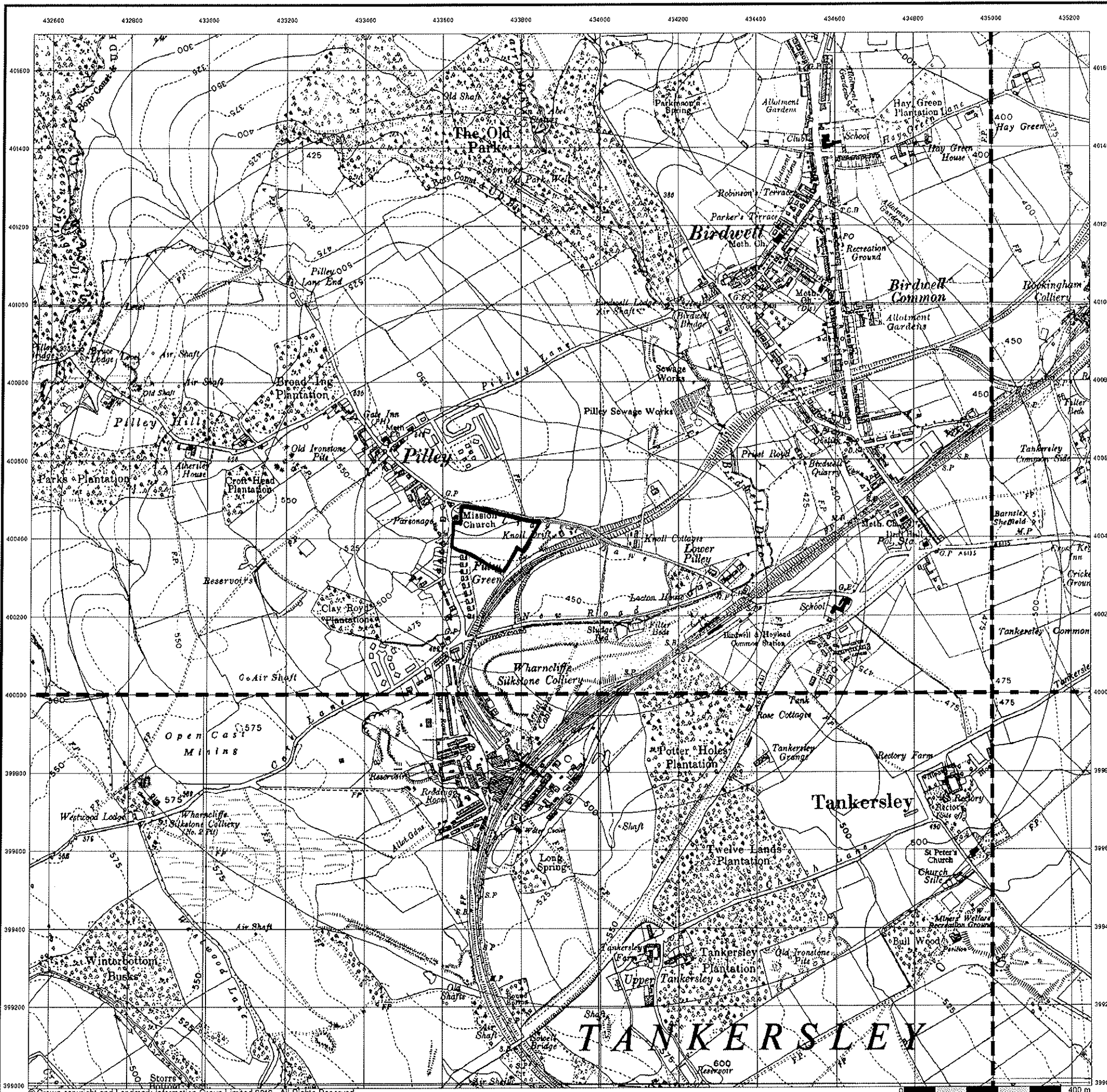
Order Details

Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley





© Crown copyright and Landmark Information Group Limited 2012. All Rights Reserved.



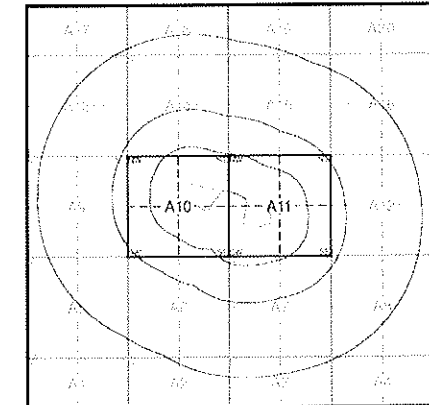
Ordnance Survey Plan
Published 1956
Source map scale - 1:10,000

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

SE30SW	SE30SE
1956	1956
1:10,560	1:10,560
SK39NW	SK39NE
1956	1956
1:10,560	1:10,560

Historical Map - Slice A



Order Details

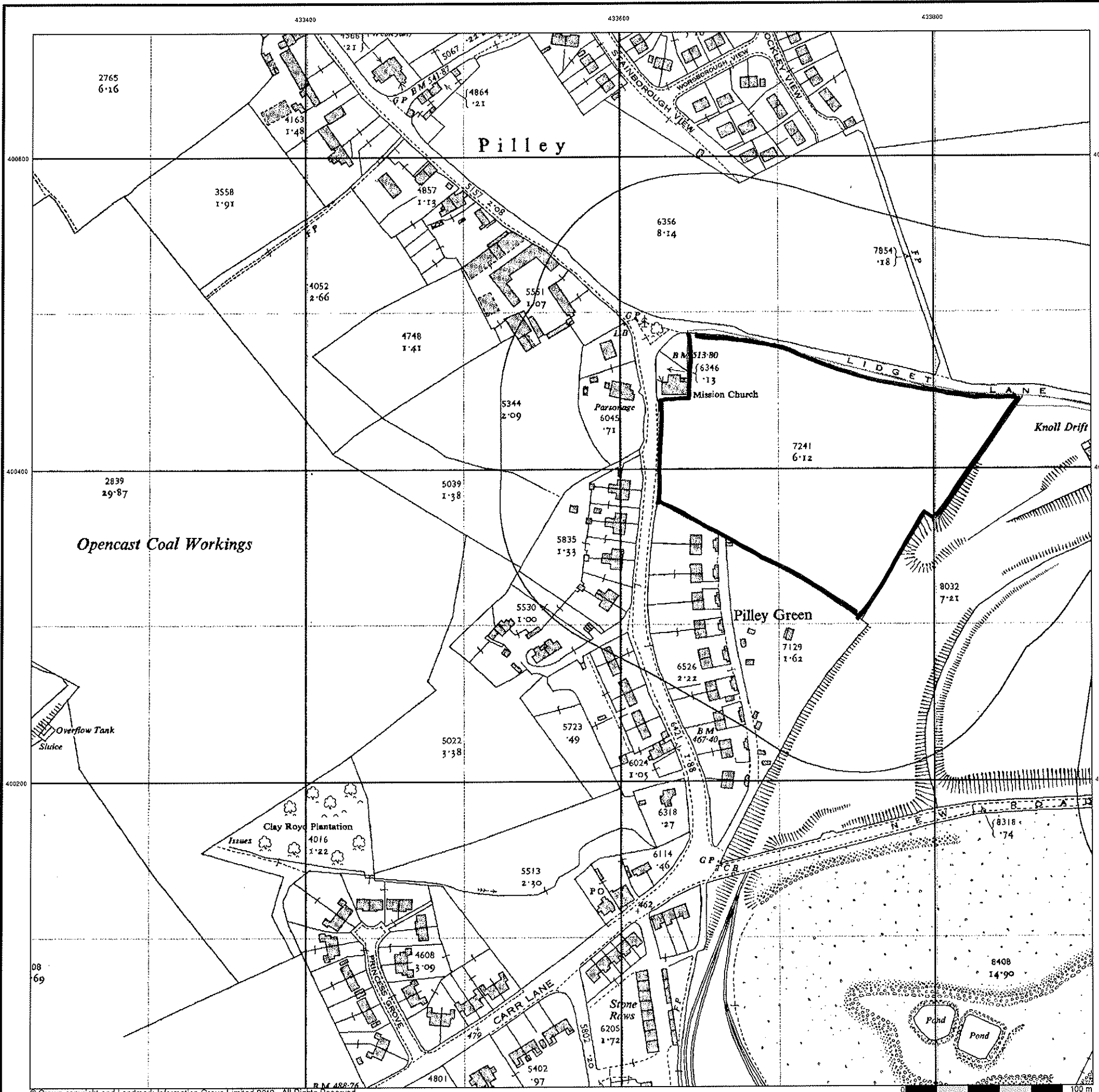
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



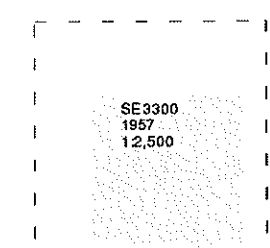
Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



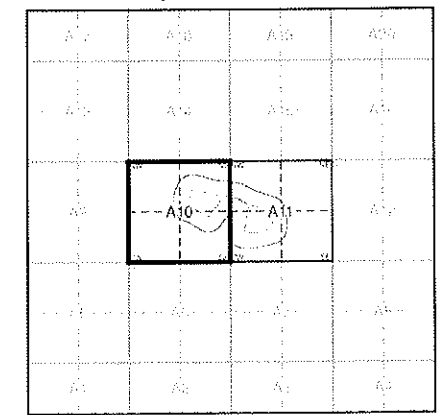
Ordnance Survey Plan
Published 1957
Source map scale - 1:2,500

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas and by 1896 it covered the whole of what were considered to be the cultivated parts of Great Britain. The published date given below is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

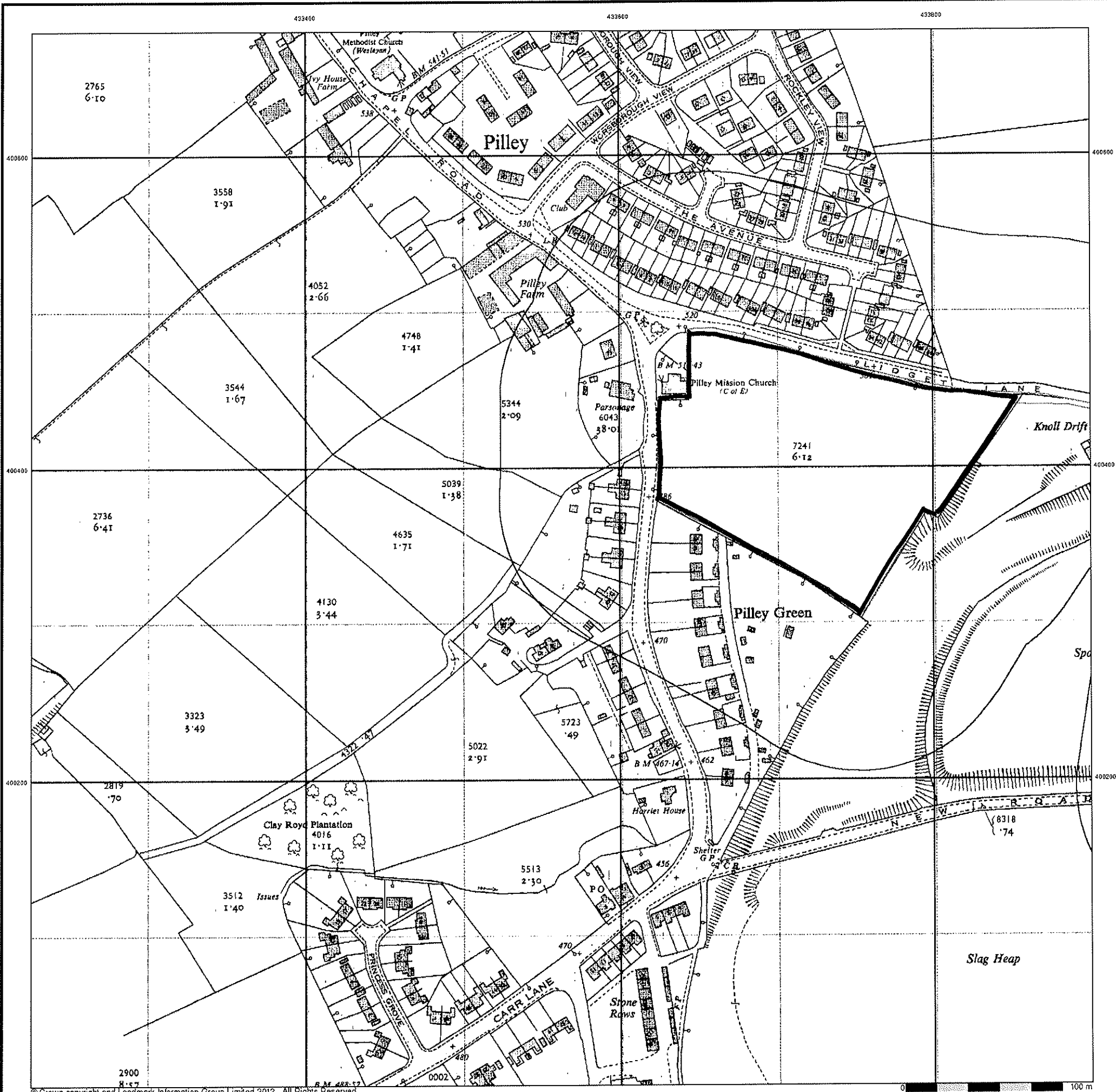
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



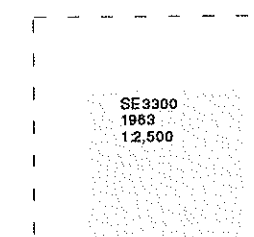
Ordnance Survey Plan

Published 1963

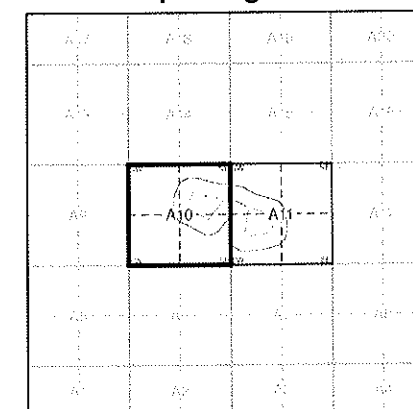
Source map scale - 1:2,500

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas and by 1896 it covered the whole of what were considered to be the cultivated parts of Great Britain. The published date given below is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

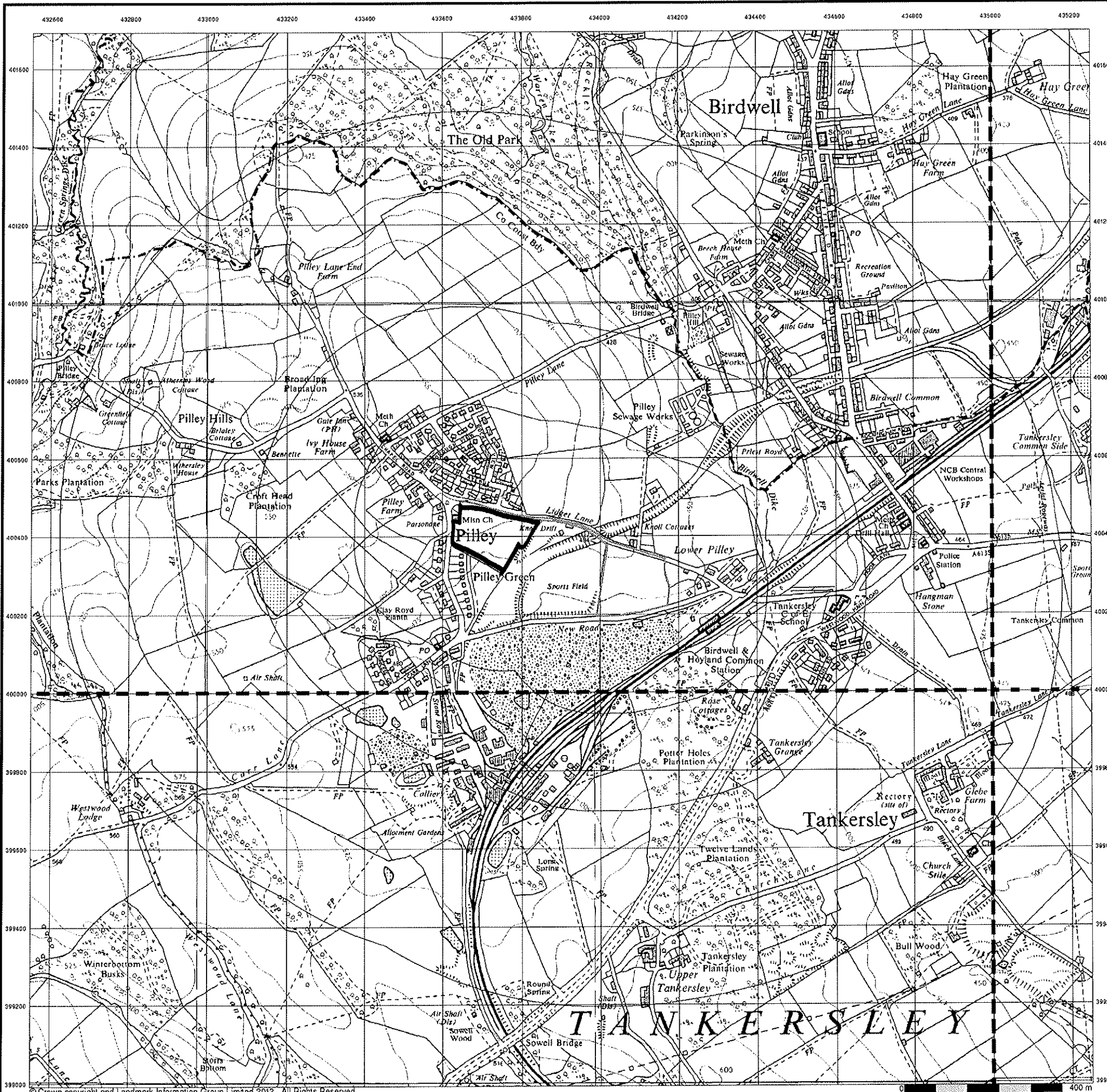
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



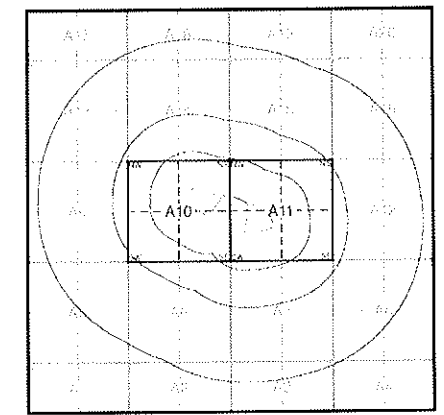
Ordnance Survey Plan
Published 1965 - 1966
Source map scale - 1:10,000

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

SE30SW	SE30SE
1965	1966
1:10,560	1:10,560
SK39NW	SK39NE
1966	1965
1:10,560	1:10,560

Historical Map - Slice A



Order Details

Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk

Ordnance Survey Plan

Published 1978

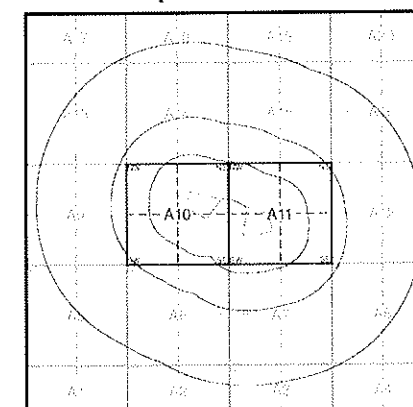
Source map scale - 1:10,000

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

SE30SW
1978
1:10,000

Historical Map - Slice A

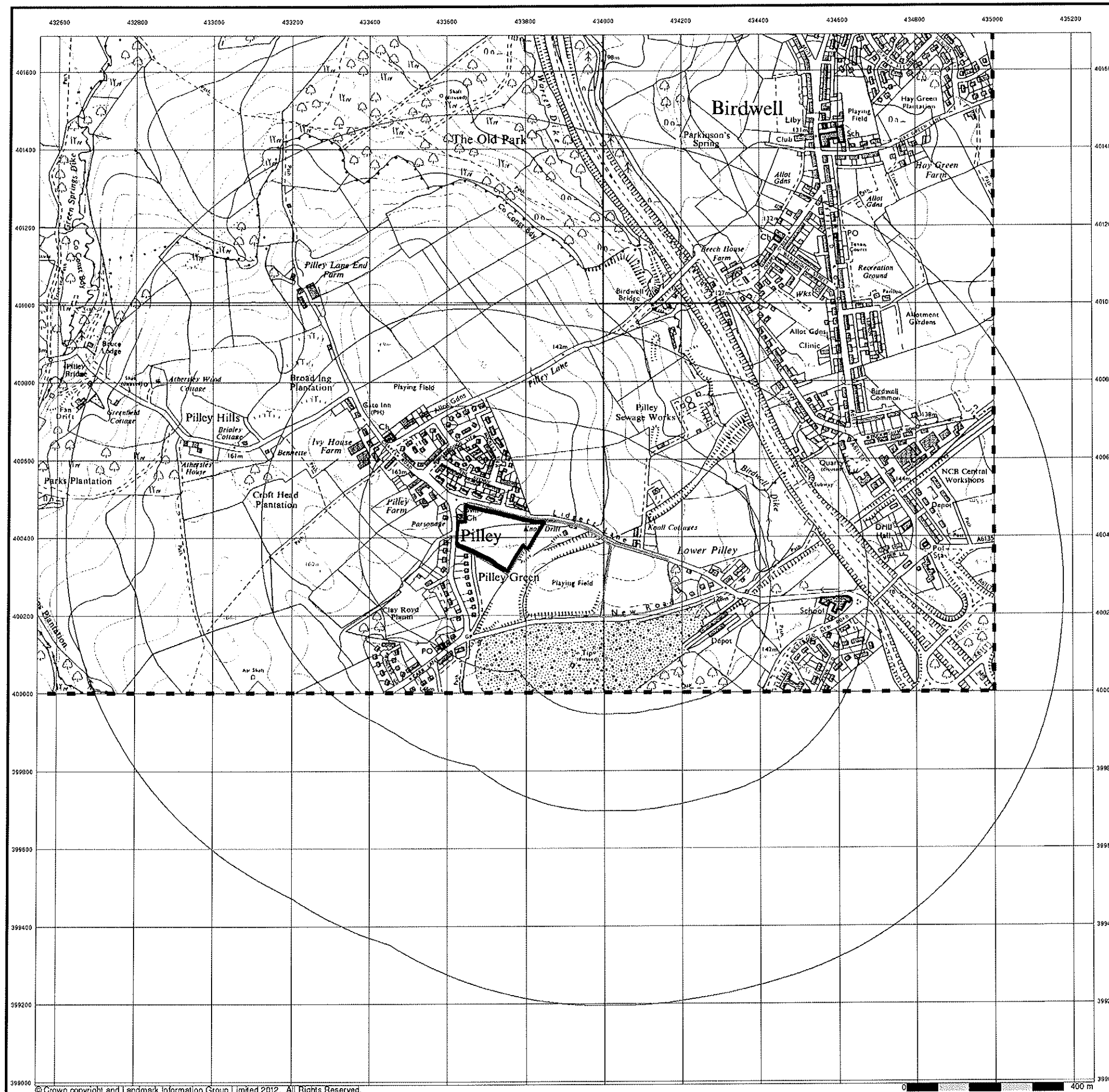


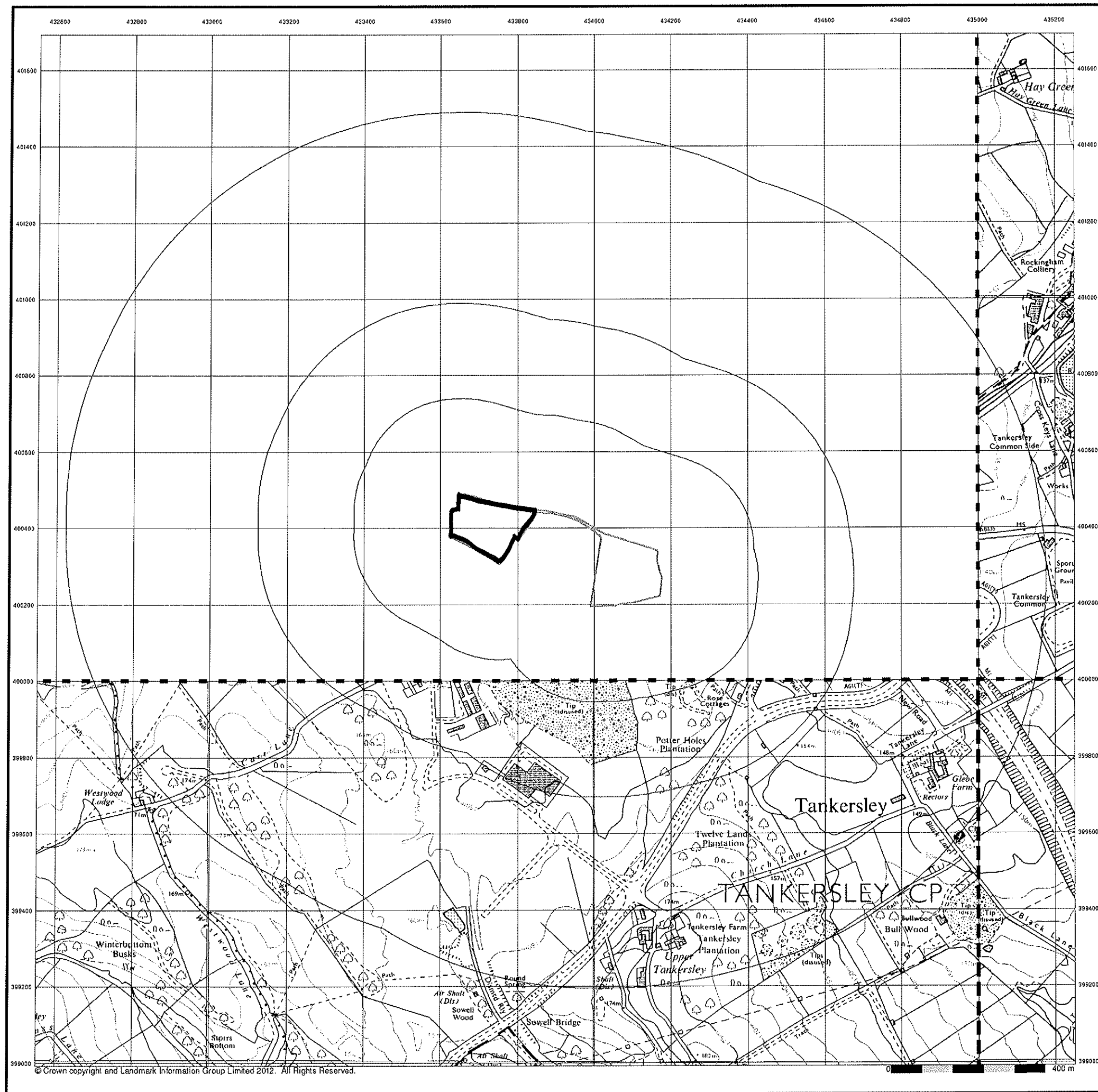
Order Details

Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley





Ordnance Survey Plan

Published 1980 - 1982

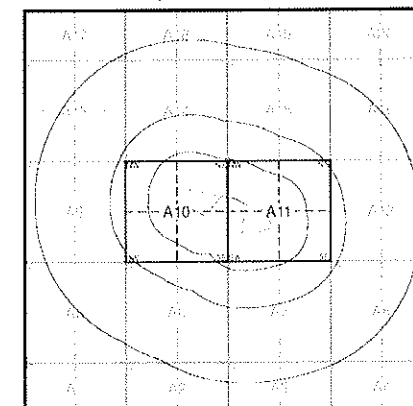
Source map scale - 1:10,000

The historical maps shown were reproduced from maps predominantly held at the scale adopted for England, Wales and Scotland in the 1840's. In 1854 the 1:2,500 scale was adopted for mapping urban areas; these maps were used to update the 1:10,560 maps. The published date given therefore is often some years later than the surveyed date. Before 1938, all OS maps were based on the Cassini Projection, with independent surveys of a single county or group of counties, giving rise to significant inaccuracies in outlying areas. In the late 1940's, a Provisional Edition was produced, which updated the 1:10,560 mapping from a number of sources. The maps appear unfinished - with all military camps and other strategic sites removed. These maps were initially overprinted with the National Grid. In 1970, the first 1:10,000 maps were produced using the Transverse Mercator Projection. The revision process continued until recently, with new editions appearing every 10 years or so for urban areas.

Map Name(s) and Date(s)

SE30SE	1980	1:10,000
SK39NW	1982	1:10,000
SK39NE	1982	1:10,000

Historical Map - Slice A



Order Details

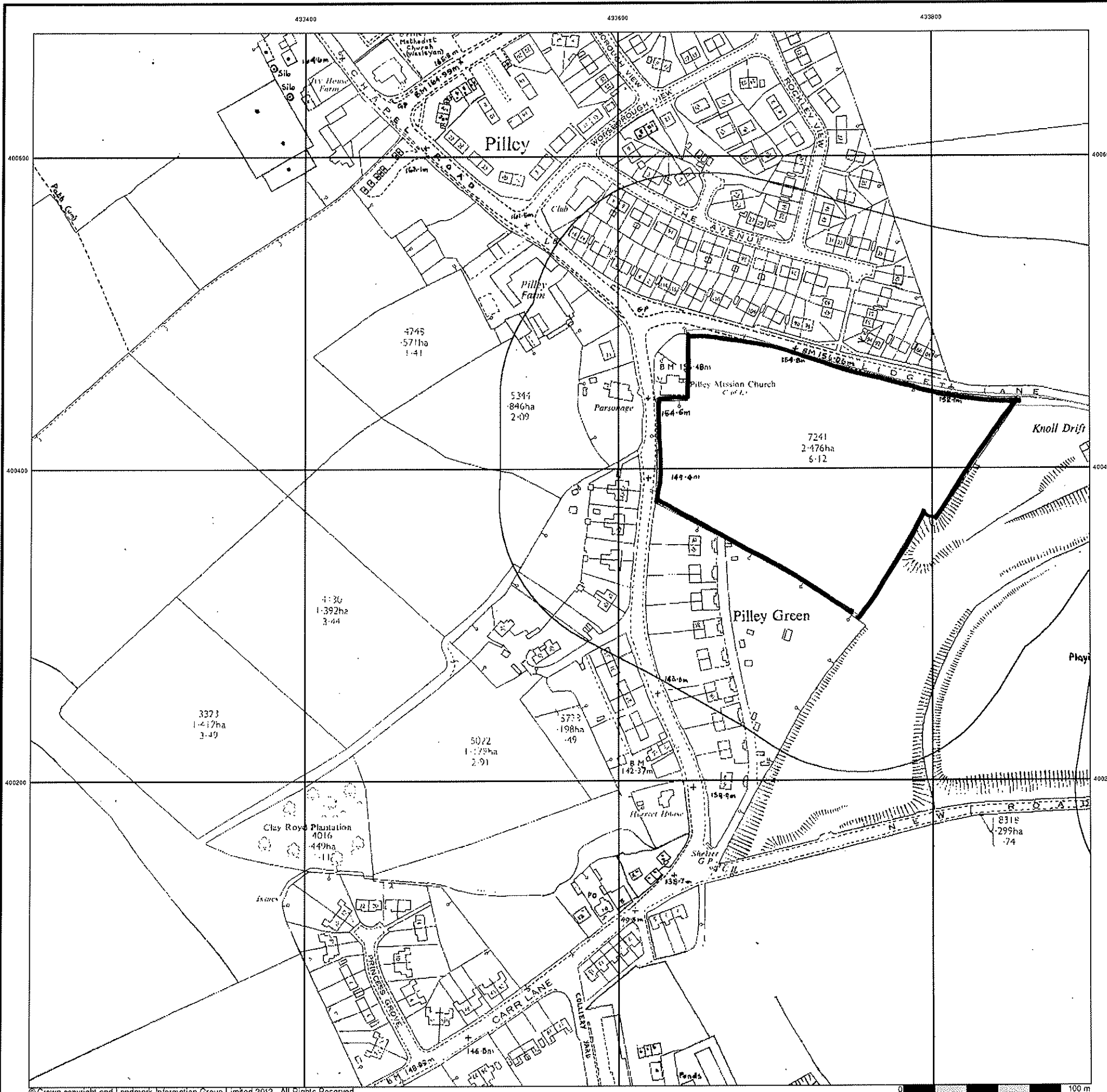
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



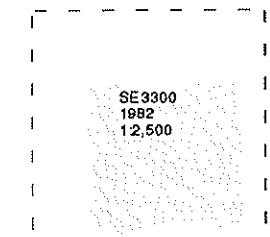
© Crown copyright and Landmark Information Group Limited 2012. All Rights Reserved.



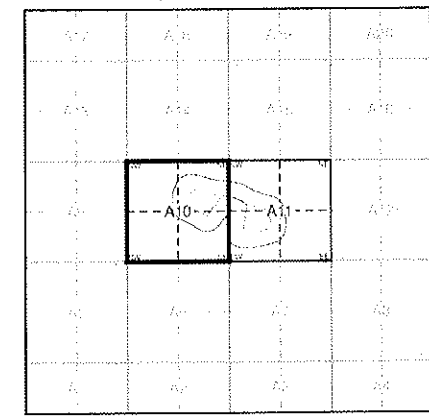
Additional SIMs
Published 1982
Source map scale - 1:2,500

The SIM cards (Ordnance Survey's 'Survey of Information on Microfilm') are further, minor editions of mapping which were produced and published in between the main editions as an area was updated. They date from 1947 to 1994, and contain detailed information on buildings, roads and land-use. These maps were produced at both 1:2,500 and 1:1,250 scales.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

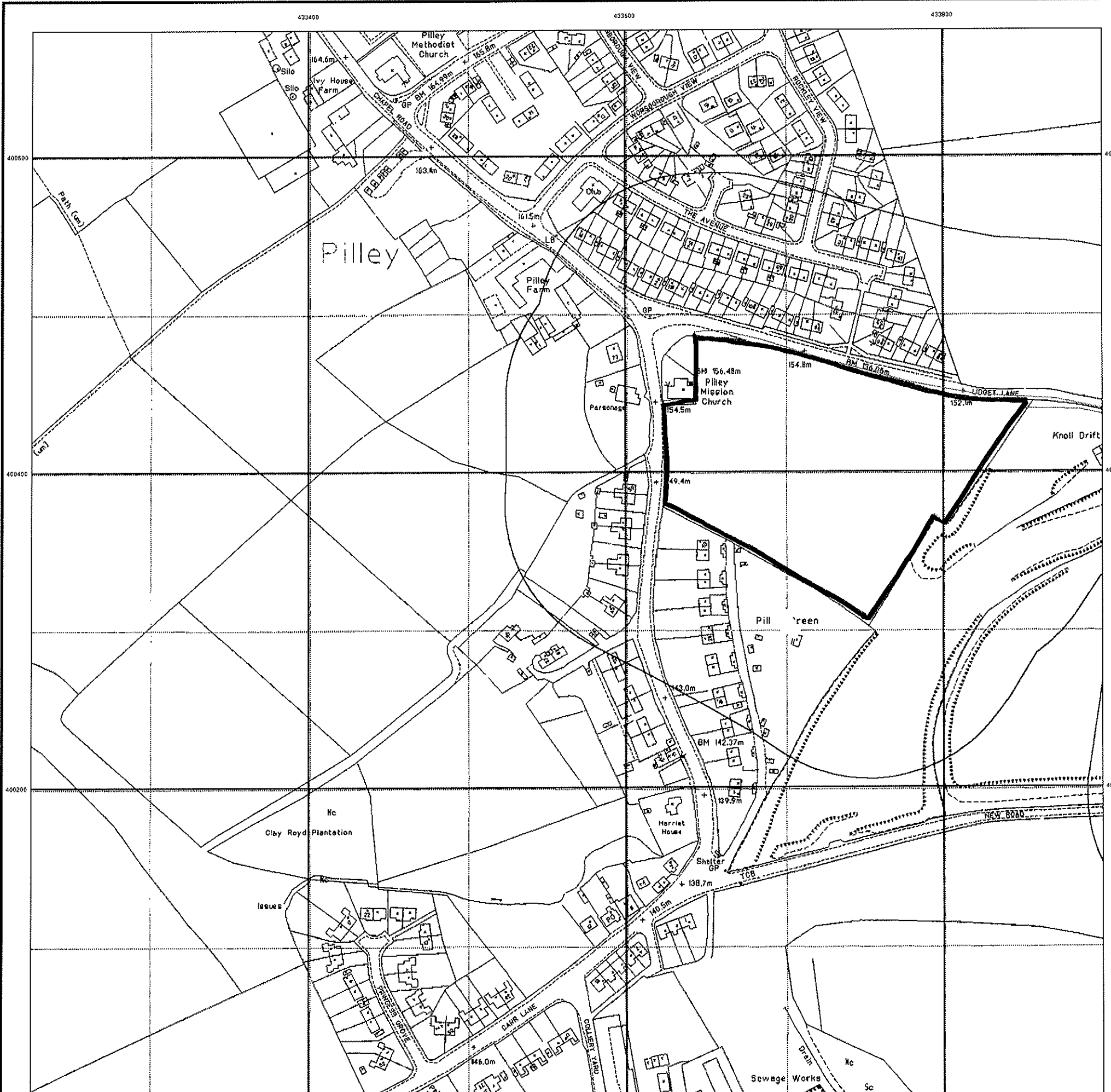
Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk



© Crown copyright and Landmark Information Group Limited 2012. All Rights Reserved.

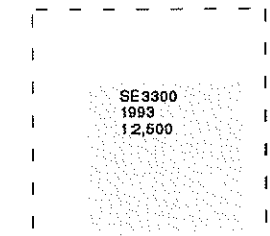


Large-Scale National Grid Data Published 1993

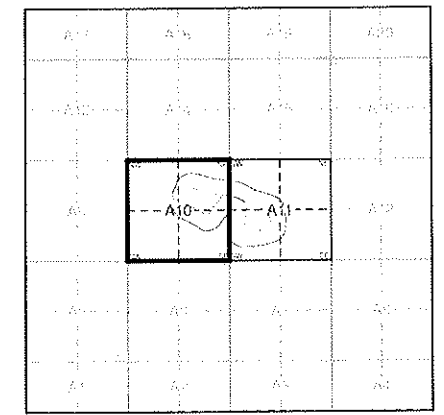
Source map scale - 1:2,500

'Large Scale National Grid Data' superseded SIM cards (Ordnance Survey's 'Survey of Information on Microfilm') in 1992, and continued to be produced until 1999. These maps were the fore-runners of digital mapping and so provide detailed information on houses and roads, but tend to show less topographic features such as vegetation. These maps were produced at both 1:2,500 and 1:1,250 scales.

Map Name(s) and Date(s)



Historical Map - Segment A10



Order Details

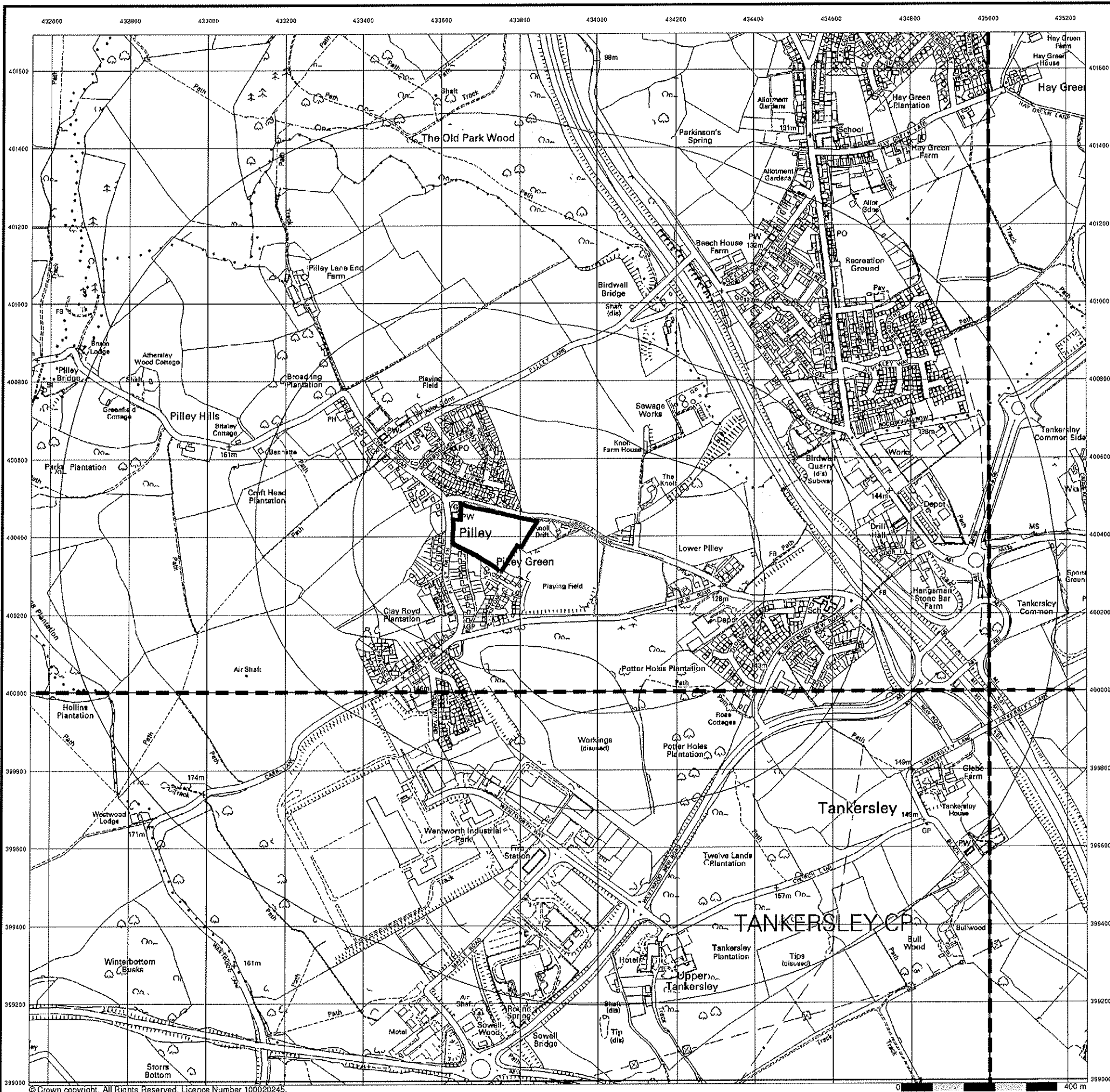
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 100

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



10k Raster Mapping

Published 2006

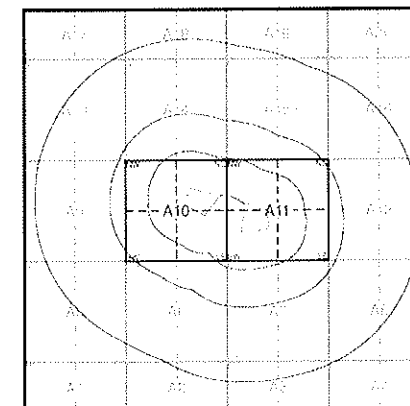
Source map scale - 1:10,000

The historical maps shown were produced from the Ordnance Survey's 1:10,000 colour raster mapping. These maps are derived from Landplan which replaced the old 1:10,000 maps originally published in 1970. The data is highly detailed showing buildings, fences and field boundaries as well as all roads, tracks and paths. Road names are also included together with the relevant road number and classification. Boundary information depiction includes county, unitary authority, district, civil parish and constituency.

Map Name(s) and Date(s)

SE30SW 2006 1:10,000	SE30SE 2006 1:10,000
SK39NW 2006 1:10,000	SK39NE 2006 1:10,000

Historical Map - Slice A



Order Details

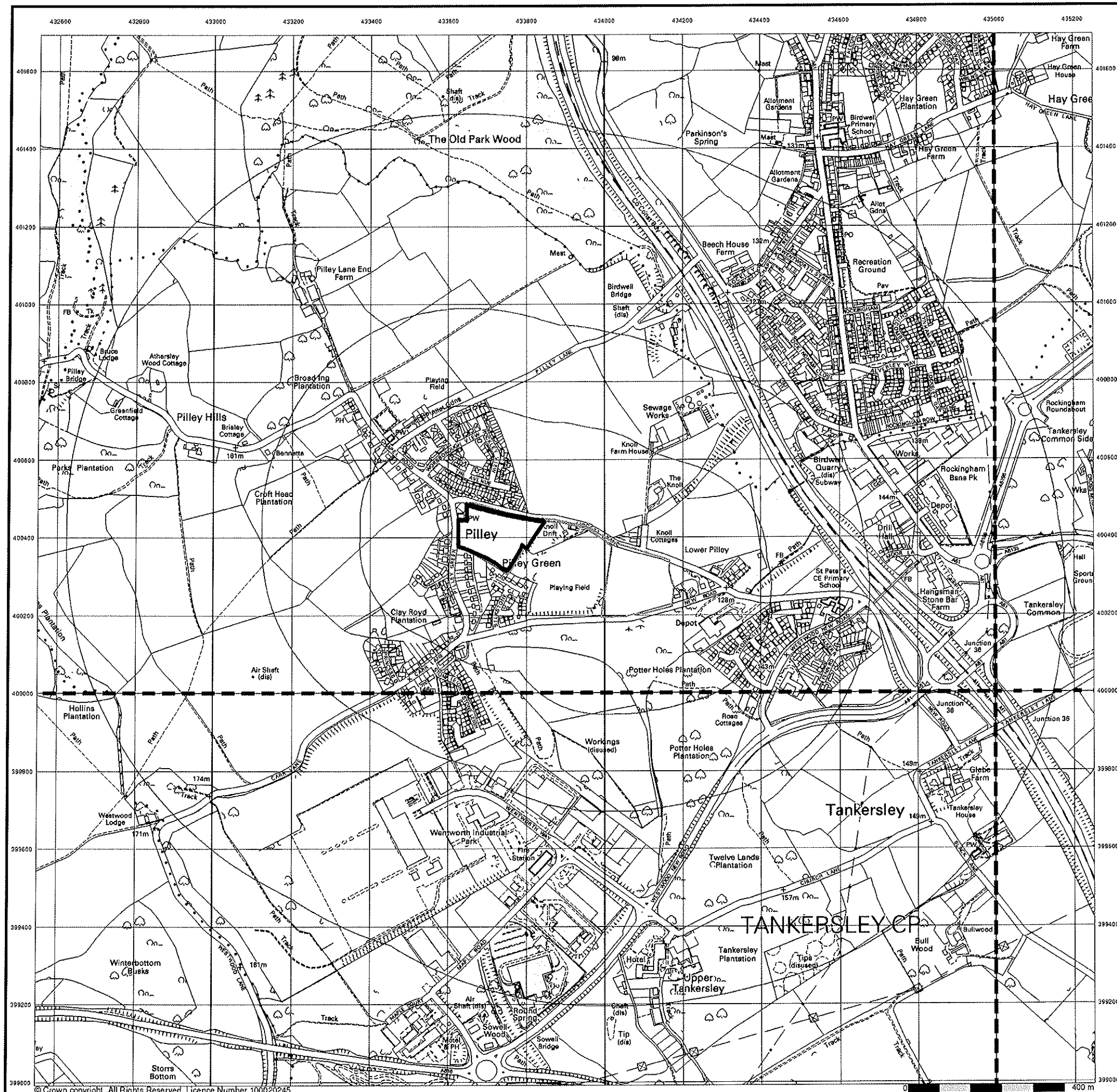
Order Number: 44869824_1_1
 Customer Ref: 7217
 National Grid Reference: 433900, 400350
 Slice: A
 Site Area (Ha): 5.23
 Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
 Fax: 0844 844 9951
 Web: www.envirocheck.co.uk



10k Raster Mapping

Published 2012

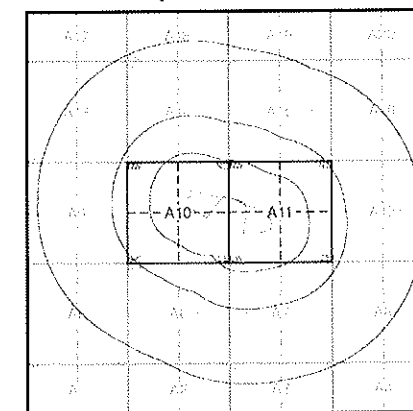
Source map scale - 1:10,000

The historical maps shown were produced from the Ordnance Survey's 1:10,000 colour raster mapping. These maps are derived from Landplan which replaced the old 1:10,000 maps originally published in 1970. The data is highly detailed showing buildings, fences and field boundaries as well as all roads, tracks and paths. Road names are also included together with the relevant road number and classification. Boundary information depiction includes county, unitary authority, district, civil parish and constituency.

Map Name(s) and Date(s)

SE30SW 2012 1:10,000	SE30SE 2012 1:10,000
SK39NW 2012 1:10,000	SK39NE 2012 1:10,000

Historical Map - Slice A



Order Details

Order Number: 44869824_1_1
Customer Ref: 7217
National Grid Reference: 433900, 400350
Slice: A
Site Area (Ha): 5.23
Search Buffer (m): 1000

Site Details

Site at, Pilley, Barnsley



Tel: 0844 844 9952
Fax: 0844 844 9951
Web: www.envirocheck.co.uk

APPENDIX F

MINING REPORT

David Bellis Consulting Surveyors Ltd
8, Mornington Terrace
Harrogate
North Yorkshire
HG1 5DH

(DX 720352 Harrogate)

T: 01423 529911 F: 01423 529922
E: contact@coalsearch.plus.com
W: www.coalsearch.plus.com



By

David Bellis
CONSULTING SURVEYORS

Coal Mining Search Report

Incorporating Cheshire Brine Enquiries



12 Jun 13

Coal Mining Search Report

Incorporating Cheshire Brine Enquiries

Page 1 / 8

Serial Number 275459

Client detail :

CoDa Structures
Civil & Structural Engineers
14 Springfield Court
Guisley
Leeds
LS20 8FD

CoalSearchPlus+ by David Bellis Consulting
Surveyors Ltd
8 Morningson Terrace
Harrogate
North Yorkshire
HG1 5DH
(DX 720352 Harrogate)

Tel 01423 529911
Fax 01423 529922

Search produced by M J Peace

Property details:

Site at
Lidget Lane
Pilly
South Yorkshire

Your ref : 7217

Purchaser :

Vendor :

In accordance with your instructions received 02 Apr 2013 we have inspected plans and records of coal mine workings and have made enquiries with respect to Cheshire brine extraction in relation to the above property and can report as follows :

1. SEAM DETAILS FOR PAST UNDERGROUND COAL MINING : In relation to the property the undermentioned seam(s) have been worked within the likely zone of physical influence on the surface.

Seam	Depth (m)	Sect (cm)	Date	Remarks
Flockton Thick	52	50	pre 1967	Subjacent
Top Fenton	104	83	pre 1977	Subjacent
Low Fenton	107	120	pre 1980	Adjacent
Parkgate	126	137	pre 1930	Subjacent
Thorncliffe	155	120	pre 1968	Subjacent
Silkstone	208	114	pre 1922	Subjacent
Whinmoor	267	94	pre 1968	Subjacent

2. SEAM DETAILS FOR CURRENT AND FUTURE UNDERGROUND COAL MINING : The undermentioned seam(s) are currently being worked, or licenses to work are being determined, or have been granted to work, within the likely zone of physical influence on the surface in relation to the property.

Seam	Depth (m)	Sect (cm)	Date	Remarks
				Coal in reserve - no workings currently planned.

3. UNDERLYING GEOLOGY :

Serial Number 275459

The property is situated in an area of Sandstone and Coal Measures.
Conjectured surface faulting.

4. OPENCAST COAL MINING :

Past Opencast Workings : The site is situated on or adjacent to an area of former o/c workings.

Present Opencast Workings : The property is not situated within 200m of the boundary of a currently operating opencast coal mining site.

Future Opencast Workings : The property is not situated within 800m of the boundary of an opencast site for which a license to extract coal by opencast methods has been granted or a license to do so is currently being determined.

5. SHAFTS, ADITS (MINE ENTRIES) AND ADDITIONAL INFORMATION :

Inspection of coal mining records indicates that 2 mine entries are located within 20 metres of the property or the boundary of the property. A plan is attached indicating the approximate position of the mine entries discovered.

There are no tips or lagoons in the vicinity of the property.

The site is situated on an area of made ground and is a former colliery site.

Possible unrecorded ancient shallow workings.

There are some indications in the records that gas emissions have occurred at the site.

The area of the site in close proximity to the adits on site has been subject to remedial works under emergency surface hazard procedures.

If additional information is required regarding a mine entry disclosed in a residential coal mining report, a CoalSearchPlus+ Mine Entry Assessment Report can be provided for an additional fee of £60 plus vat. This will include an assessment of the risk of subsidence damage occurring due to the presence of the mine entry/entries.

Please contact David Bellis Consulting Surveyors on 01423 529911 to order a Mine Entry Assessment Report and arrange payment.

Further information regarding mine entries revealed in commercial/development coal mining reports can also be provided and reports will be tailored to client requirements. Please contact David Bellis Consulting Surveyors, on 01423 529911, to discuss the data that can be provided and agree the fee.

6. NOTICES IN RELATION TO FUTURE COAL MINING ACTIVITY :

We have no knowledge of any intention to work coal by underground methods within influencing distance on the surface in the vicinity of the property for which notices have been issued under the Coal Mining Subsidence Act 1991.

7. PAST COAL MINING RELATED SUBSIDENCE :

The property has been subject to a claim for past coal mining subsidence.

Serial Number 275459

8. CONCLUSION (COAL MINING) : In the light of the above facts we conclude that in relation to coal mining :

Old workings are present but all settlement is likely to have completed long ago. In our opinion it is unlikely that coal will be worked in the foreseeable future.

COAL MINING RISK LEVEL : We recommend that the transaction is treated as :

Where this report is to be used for development purposes particular attention is drawn to the paragraphs below concerning the ownership of in situ coal, coal workings and the risks from mine gases.

Please note that the overall coal mining risk level above is based upon an assessment of the detailed information contained in the body of the report. The risk assessment must be used in conjunction with the detailed report.

If development of the property is being considered then all necessary enquiries and investigations should be completed prior to the commencement of works to ensure that proposals follow good engineering practice for development in mining areas. The Coal Authority has ownership of in situ coal, coal mines (both current and disused) and coal mine shafts and adits. Activities that intersect, enter or disturb any of the Coal Authority's interests require the written permission of the Authority.

Any development proposals should consider risks to the development, or adjacent property, of generating or displacing underground gases where coal seams or former mining works are disturbed. The need for effective measures to prevent gasses entering public properties should be assessed and properly addressed. These actions are necessary due to the public safety implications of development in these circumstances.

CHESHIRE BRINE EXTRACTION INFORMATION :

The property lies outside the Cheshire Brine Compensation District as prescribed by the Cheshire Brine Pumping (Compensation for Subsidence) Act 1952.

With respect to coal mining there is nothing to prevent a claim being made under the provisions of the Coal Mining Subsidence Act 1991 and subsequent legislation, but it must not be inferred that the Coal Authority or their licensees will necessarily accept that any damage has been caused as a result of mining subsidence.

If you require any further information or amplification please contact CoalSearchPlus+ on 01423 529911 or via our website www.coalsearch.plus.com.

This report is prepared in accordance with the CoalSearchPlus+ terms and conditions as published on the CoalSearchPlus+ website (www.coalsearch.plus.com) on the date of issue of this report.

This is a Coal Mining Search Report and is not to be interpreted as being part of an Environmental Assessment of the property.

We cannot be held responsible for the accuracy of the information provided to us by third party organisations.

The information and/or material supplied is composed from data based in many cases on measurements and records of various standards of reliability and age. We cannot be held responsible for the accuracy of such information.

Serial Number 275459

This search report is based upon the privately owned CoalSearchPlus+ mining record database and plans and records publicly available at the time of inspection from the Coal Authority, including British Geological Survey and Ordnance Survey data. Organisations reserve the right to vary their proposals and intentions as to their future mining operations without prior notice save as provided in the Coal Mining (subsidence) Act 1991 and the Coal Industry Act 1994.

Coal Authority Address : The Coal Authority, 200 Lichfield Lane Berry Hill, Mansfield, Nottinghamshire, HG18 4RG

British Geological Survey Address : British Geological Survey, Kingsley Dunham Centre, Keyworth, Nottingham NG12 5GG

The information contained in this report relates to the property address given by the individual or organisation ordering the report. Where a plan indicating the property location and boundary is supplied with the instruction the report is based on that information. Where no plan is supplied the report is based on the property location as defined in publicly available mapping data. At all times it remains the responsibility of the instructing organisation or individual to define the boundary of the property.

Additional notes applicable to Residential Coal Mining Reports only :

David Bellis Consulting Surveyors Ltd is not aware of any personal or business relationship between the person conducting or preparing the search and any person involved in the sale of the property.

This report is a desk study of existing published geological and coal mining records and the CoalSearchPlus+ coal mining database. In order to compile this report enquiries have been made relating to the following :

Past Coal Mining – the existence of any previously worked seams of coal within influencing distance on the surface in relation to the property including an indication of the location, depth and age of the workings.

Present Coal Mining - the existence of any currently worked seams of coal within influencing distance on the surface in relation to the property including an indication of the location, depth and age of the workings. The existence of coal that could be worked at some time in the future will be enquired into and detail of any relevant licenses disclosed where available.

Underlying Geology - the underlying geology of the property will be reviewed and briefly described in relation to coal mining.

Opencast Coal Mining - the existence of past present and future opencast coal mining, specifically :

- if the property is situated within the boundary of a former opencast site. In the case of old opencast workings it must be understood that records are often unclear regarding the site boundary and/or worked areas. Published records will be reviewed to give our opinion of the existence of relevant former opencast coal workings.
- if the property is situated within 200m of the boundary of a currently operating opencast site.
- if the property is situated within 800m of the boundary of an opencast for which either a license to extract coal by opencast methods has been granted or a license to do so is currently being determined.

Shafts, Adits (Mine Entries) and Additional Information – the existence of any mine entries within 20m of the property or the boundary of the property and its associated land and buildings (the definition of the boundary of the property is the responsibility of the individual or organisation ordering this report). Where a mine entry is found to exist the approximate location of the mine entry will be indicated on a plan to be provided by the instructing organisation or individual. The existence of unworked coal will be enquired into and our opinion regarding the likelihood of it being worked at some time in the past will be given where relevant. Any other relevant coal mining related features discovered will be noted.

Notices in relation to future coal mining activity – the existence of notices indicating an intention to work coal by underground methods in the future.

Past coal mining related subsidence – if any publicly available records indicate coal mining related subsidence affecting the property in the past 10 years.

Coal Mining Risk Level – the opinion of David Bellis Consulting Surveyors of the risk posed to the property from coal mining given all the information contained in the report. The risk to the property is given in relation to the majority of the housing stock in the immediate area.

Cheshire Brine – the location of the property in relation to the Cheshire Brine Compensation District and any relevant information to the property regarding brine extraction.

Additional information, including answers to many frequently asked questions, can be found on the CoalSearchPlus+ website.
www.coalsearch.plus.com

Complaints Procedure

David Bellis Consulting Surveyors Ltd is registered with the Property Codes Compliance Board as a subscriber to the Search Code. A key commitment under the Code is that firms will handle any complaints both speedily and fairly.

If you want to make a complaint, we will:

- Acknowledge it within 5 working days of receipt.
- Normally deal with it fully and provide a final response, in writing, within 20 working days of receipt.
- Keep you informed by letter, telephone or e-mail, as you prefer, if we need more time.
- Provide a final response, in writing, at the latest within 40 working days of receipt.
- Liaise, at your request, with anyone acting formally on your behalf.

If you are not satisfied with our final response, or if we exceed the response timescales, you may refer the complaint to The Property Ombudsman scheme (TPOs):

12 Jun 13

Coal Mining Search Report
Incorporating Cheshire Brine Enquiries

Page 5 / 8

Serial Number 275459

Tel: 01722 333306, E-mail: admin@tpos.co.uk

We will co-operate fully with the Ombudsman during an investigation and comply with his final decision.

Complaints should be sent to:

Mr M. Peace, Director, David Bellis Consulting Surveyors Ltd, 8 Morningson Terrace, Harrogate, North Yorkshire, HG1 5DH
Tel : 01423 529911 Fax : 01423 529922 Email : contact@coalsearch.plus.com

Date : 12 Jun 2013

Signed :



© copyright David Bellis Consulting Surveyors Ltd – April 2012

Serial Number 275459

**Important Consumer Protection Information**

This search has been produced by David Bellis Consulting Surveyors Ltd, 8 Morningson Terrace, Harrogate, HG1 5DH (T: 01423 529911, F: 01423 529922, E: contact@coalsearch.plus.com) which is registered with the Property Codes Compliance Board (PCCB) as a subscriber to the Search Code. The PCCB independently monitors how registered firms maintain compliance with the Code.

The Search Code:

- provides protection for homebuyers, sellers, estate agents, conveyancers and mortgage lenders who rely on the information included in property search reports undertaken by subscribers on residential and commercial property within the United Kingdom
- sets out minimum standards which firms compiling and selling search reports have to meet
- promotes the best practice and quality standards within the industry for the benefit of consumers and property professionals
- enables consumers and property professionals to have confidence in firms which subscribe to the code, their products and services.

By giving you this information, the search firm is confirming that they keep to the principles of the Code. This provides important protection for you.

The Code's core principles**Firms which subscribe to the Search Code will:**

- Display the Code logo prominently on their search reports.
- Act with integrity and carry out work with due skill, care and diligence.
- At all times maintain adequate and appropriate insurance to protect consumers.
- Conduct business in an honest, fair and professional manner.
- Handle complaints speedily and fairly.
- Ensure that all search services comply with the law, registration rules and standards.
- Monitor their compliance with the Code.

Complaints

If you have a query or complaint about your search, you should raise it directly with the search firm, and if appropriate ask for any complaint to be considered under their formal internal complaints procedure. If you remain dissatisfied with the firm's final response, after your complaint has been formally considered, or if the firm has exceeded the response timescales, you may refer your complaint for consideration under The Property Ombudsman scheme (TPOs). The Ombudsman can award compensation of up to £5,000 to you if he finds that you have suffered actual loss as a result of your search provider failing to keep to the Code.

Please note that all queries or complaints regarding your search should be directed to your search provider in the first instance, not to TPOs or to the PCCB.

TPOs Contact Details:

The Property Ombudsman scheme
Milford House
45-53 Milford Street
Salisbury
Wiltshire SP1 2BP
Tel: 01722 333306
Fax: 01722 332296
Email: admin@tpos.co.uk

You can get more information about the PCCB from www.propertycodes.org.uk.

PLEASE ASK YOUR SEARCH PROVIDER IF YOU WOULD LIKE A COPY OF THE SEARCH CODE

Serial Number 275459

David Bellis Consulting Surveyors Ltd and CoalSearchPlus+ Terms and Conditions (Available in large print by request)

1. Definitions.
 - a) The Service Provider is David Bellis Consulting Surveyors Ltd, trading as CoalSearchPlus+.
 - b) The Applicant is the Individual, Organisation, or appointed officer of said Organisation placing a Request with the Service Provider.
 - c) The Third Party Provider is any Organisation from which the Service Provider obtains data and/or information on behalf of the Applicant in the normal course of fulfilling the Applicants Request.
 - d) The request is a formal Request by the Applicant with CoalSearchPlus+ to retrieve specific data and/or information.
2. CoalSearchPlus+ accept Requests only on the basis that the Applicant is acting as a principal and is directly liable for payment of our invoice or account.
3. It is the policy of CoalSearchPlus+ to observe confidentiality with regard to the identity and affairs of our customers to the extent permitted by law, but, in common with other service providers, we may be required exceptionally to disclose information to governmental and other public authorities.
4. The placing of a Request by the Applicant with CoalSearchPlus+ confirms acceptance of these terms and conditions.
5. Any Order Form produced by CoalSearchPlus+, either printed or published on the CoalSearchPlus+ website, is an invitation to treat. The Applicant makes an offer to buy from CoalSearchPlus+ by the submission of a Request, subject to clause 10. Acceptable modes of transmission for a Request are facsimile (fax), telephone, electronic mail(e-mail), online transmission via the CoalSearchPlus+ website only, Document Exchange (DX), Royal Mail or courier appointed by the Applicant.
6. Orders will be accepted on order forms other than CoalSearchPlus+ forms however these will be accepted under the standard CoalSearchPlus+ terms and conditions only, subject to Clause 10.
7. CoalSearchPlus+ reserves the right to refuse any Request.
8. CoalSearchPlus+ reserves the right to cancel any Request at any time.
9. Proof of transmission of a Request by the Applicant does not constitute proof of receipt by CoalSearchPlus+.
10. It is the responsibility of the Applicant to ensure the accuracy, legibility, clarity and completeness of all data and/or information provided to CoalSearchPlus+ as part of the Request, including but not limited to, names, numbers, addresses, location plans, and boundary plans. This applies whether the Request is submitted on CoalSearchPlus+ order forms either printed or published on the CoalSearchPlus+ website or on the Applicants own order form.
11. CoalSearchPlus+ may request additional relevant data and/or information from the Applicant in the course of fulfilling a Request, including, but not limited to, names, numbers, addresses, location plans, and boundary plans.
12. CoalSearchPlus+ may request clarification of data and/or information supplied by the Applicant.
13. If, subsequent to Clause 11. and/or Clause 12., requested data and/or information is not provided and/or clarified, CoalSearchPlus+ cannot be held responsible for any resultant loss or delay.
14. If, subsequent to Clause 11. and/or Clause 12., requested data and/or information is not provided and/or clarified within a reasonable period of time, CoalSearchPlus+ reserves the right to cancel the Request in whole or in part. The Applicant remains liable for all fees, Taxes and Disbursements accrued prior to the cancellation.
15. CoalSearchPlus+ reserves the right to subcontract data and/or information retrieval to selected Organisations and/or individuals. CoalSearchPlus+ is not required to reveal the identity of its Subcontractors.
16. CoalSearchPlus+ will, in the process of fulfilling the request, retrieve data and/or information from publicly and/or commercially available sources and the CoalSearchPlus+ mining database. The sources of data used will primarily be data held by The Coal Authority under an agreement with the Health and Safety Executive, data owned by the British Geological Survey and the CoalSearchPlus+ database.
17. A CoalSearchPlus+ mining report is a report of the interpretation of the data sources in 16. made by CoalSearchPlus+ staff.
18. CoalSearchPlus+ coal mining search reports are based upon the plans and records available from data sources detailed in 16. at the time the report was produced. It should be understood that third party organisations reserve the right to vary their proposals and intentions as to their future mining operations without prior notice save as provided in the Coal Mining Subsidence Act 1994. CoalSearchPlus+ cannot be held responsible for changes to the future proposals and intentions of Third Parties.
19. The information and/or material supplied in a CoalSearchPlus+ coal mining report is composed from data based, in many cases, on measurements and records of various standards of reliability and age. In some instances (usually relating to older records) it is necessary for CoalSearchPlus+ to make assumptions regarding the 'best plot' position of mining features. For these reasons users of CoalSearchPlus+ reports should take the position of mining features detailed in reports to be indicative only.
20. The data and/or information that a coal mining search report is based on is constantly being updated. A CoalSearchPlus+ coal mining search report is based on the most up to date information available at the time that the report is produced however it cannot be guaranteed that the information and/or data will not become obsolete at some time in the future. Responsibility for the supply of accurate and up to date information to CoalSearchPlus+ lies with the data supplying organisations listed in 16.
21. A CoalSearchPlus+ coal mining search report relates only to coal mining and minerals worked in relation to coal mining. Other reports may be required in relation to other minerals.
22. A CoalSearchPlus+ coal mining search report is not a substitute for site investigation or a mining survey. Depending on the content of a coal mining search report, or whether development is intended, the Applicant must decide whether a site investigation or mining survey is required.
23. CoalSearchPlus+ coal mining reports comply with the Search Code.

Serial Number 275459

24. All CoalSearchPlus+ reports are covered by professional indemnity insurance. The content of CoalSearchPlus+ coal mining search reports does not prevent any future claim being made by the Applicant against the Coal Authority in respect of coal mining related subsidence.
25. Any liability in the instance of negligence by CoalSearchPlus+ or its employees in the interpretation of coal mining data and/or the production and provision of coal mining reports will be limited to the extent of the CoalSearchPlus+ Professional Indemnity Insurance or the value of the loss caused by the negligence, whichever is the lower.
26. All CoalSearchPlus+ coal mining search reports give the information detailed in the services section of the CoalSearchPlus+ website and summarised in the report. Further explanation of this information is available in the Glossary and/or the Frequently Asked Questions areas of the CoalSearchPlus+ website. Alternatively contact CoalSearchPlus+ who will be happy to explain the content of a report.
27. The Request is fulfilled when all reports, data and/or information requested by the Applicant have been retrieved and/or compiled by CoalSearchPlus+ and delivered by electronic mail (e-mail) or fax or post or document exchange (DX) or a combination of these methods as required by the Applicant. Alternative delivery arrangements are at the discretion of CoalSearchPlus+.
28. If Requests for multiple reports, data and/or information relating to multiple addresses were made on a single order form these will be fulfilled individually by the delivery of the reports, data and/or information relating to each individual address being treated as an individual Request.
29. CoalSearchPlus+ is not responsible for any loss or misdelivery of retrieved data and/or information caused by failure of Document Exchange (DX), Royal Mail or internet service provider. Most retrieved data and/or information is archived by CoalSearchPlus+ and a copy may be requested by the Applicant. If the data and/or information could not be archived CoalSearchPlus+ reserves the right to treat the request as a new Request.
30. Delivery, by whatever agreed means, will be accompanied by an invoice. Delivery by electronic mail may be followed up with a paper invoice by post or DX. Where Applicants have agreed account facilities with CoalSearchPlus+ invoicing may be on a monthly basis. In all cases the Applicant agrees to provide CoalSearchPlus+ with remuneration for the full amount shown on the invoice, including all Fees, Taxes and Disbursements.
31. The Applicant will be liable for payment of the full invoice amount within 14 days from the date of receipt of the invoice. CoalSearchPlus+ reserve the right to charge for costs and expenses incurred in recovering late payments and to charge interest at the rate of 8% above the Bank of England base rate per annum for the full period that the payments are overdue.
32. Where full payment of the invoice is not made by the Applicant within 14 days from receipt of the invoice CoalSearchPlus+ reserve the right to withdraw account facilities from the Applicant and cancel any individual agreements concerning fees or other Terms and Conditions that may have been made between the Applicant and CoalSearchPlus+.
33. Where possible the Applicant will receive Advance Notice of the cost of the Request, including all Fees, Taxes and Disbursements, prior to receipt of the invoice. This advance notice will take the form of the price for the service requested as published on the CoalSearchPlus+ website, or the price as individually agreed between CoalSearchPlus+ and the Applicant.
34. Additional Fees, Taxes and Disbursements may arise during the course of data and/or information retrieval, over and above Advance Notice costs as in clause 33. The Applicant is liable for any such additional costs. Where possible, the Applicant is notified of additional costs prior to fulfilment of the Request.
35. If the Applicant shall pay in advance of receipt of the invoice, then the Applicant remains liable for any underpayment.
36. Any overpayment on the part of the Applicant will be refunded. Arrangements for refunds are agreed on a case-by-case basis, through discussion between CoalSearchPlus+ and the Applicant.
37. The Applicant may cancel the Request in whole or in part at any time prior to Clause 27.
38. If the Applicant cancels the Request in whole or in part prior to Clause 27, the Applicant remains liable for all Fees, Taxes and Disbursements already accrued prior to the Cancellation.
39. CoalSearchPlus+ accept no liability for any loss incurred by the Applicant or the Applicants client where the Applicant is acting as an agent for a client, due to late fulfilment and delivery of the Request.
40. CoalSearchPlus+ accept no liability for any loss to the Applicant, or the Applicant's client where the Applicant is acting as an agent for a client, due to any negative outcome of a report provided in the process of the correct and accurate fulfilment of the Request.
41. Any disputes relating to the provision of coal mining search reports should be addressed to the Practice Principal, CoalSearchPlus+ in the first instance. Disputes will be settled according to the CoalSearchPlus+ complaints procedure detailed in each report.
42. Third Party and subcontractor Terms and Conditions shall apply in addition to these clauses. Should any conflict arise between CoalSearchPlus+ Terms and Conditions and Third Party or Subcontractor Terms and Conditions, then CoalSearchPlus+ Terms and Conditions prevail unless and until CoalSearchPlus+ expressly states otherwise in writing and/or courts of England and Wales establish otherwise.
43. No variation to these Terms and Conditions is effective unless and until CoalSearchPlus+ expressly agrees in writing.
44. CoalSearchPlus+ reserves the right to alter these terms and conditions as appropriate, without notice, at any time. Such amended Terms and Conditions will become effective upon publication on the CoalSearchPlus+ website.
45. These Terms and conditions are subject to English Law and the exclusive jurisdiction of the courts of England and Wales.

David Bellis

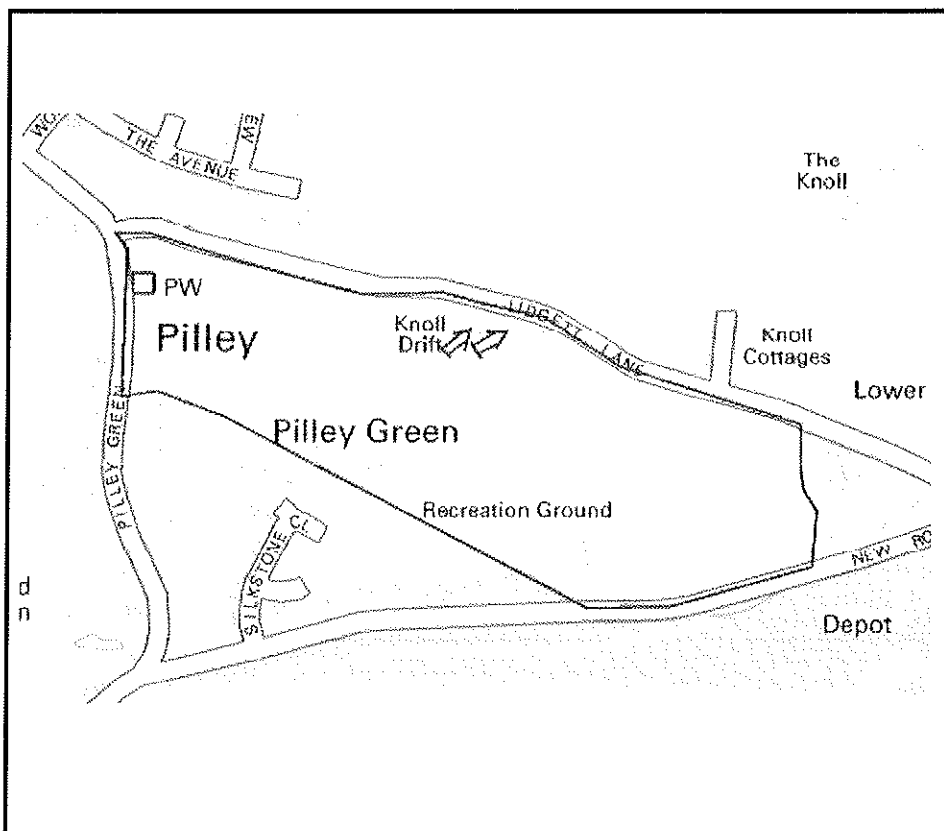
CONSULTING SURVEYORS



COAL SEARCH PLUS+
Protecting your investment

FEATURE REFERENCE PLAN FOR
SEARCH NUMBER: 275459

EXTRACT OF LOCATION PLAN PROVIDED
WITH SEARCH INSTRUCTION BY
APPLICANT
DATE 12/06/13 NOT TO SCALE



Ordnance Survey Copy License Number 100014904

Contains Ordnance Survey data © Crown copyright and database right 2011

Outline of property boundary



Disused mine shaft



Disused adit



This plan shows the approximate position of the disused shaft or adit referred to in the attached Mining Search Report. Symbols used on this plan are not drawn to scale.

Property owners have the benefit of the protection of the Coal Mining Subsidence Act 1991* in the event of the occurrence of damage from disused coal mine workings including disused coal mine entries. Prior permission from the owner of a mine entry (usually the Coal Authority) must be sought before any physical investigation entering or disturbing it is undertaken.

If you have any questions or queries regarding the content of this coal mining report please contact David Bellis Consulting Surveyors Ltd.

The Coal Authority, regardless of responsibility and in conjunction with other public bodies, provide an emergency call out facility in coalfield areas to assess the public safety implications of mining features (including disused shafts and adits). The emergency telephone numbers at all times is (01623) 646333.

* Note The Coal Mining Subsidence Act 1991 does not apply where coal was worked or gotten by virtue of the grant of a gale in the Forest of Dean, or any other part of the Hundred of St. Briavels in the county of Gloucester.

8, Morningson Terrace, Harrogate, North Yorkshire, HG1 5DH - DX 720352 Harrogate
T: 01423 529911 F: 01423 529922 E: contact@coalsearch.plus.com W: www.coalsearch.plus.com



COAL SEARCH PLUS+
Protecting your investment



David Bellis Consulting Surveyors Ltd. - Registered in England no. 5034580
Registered Address : 10 Bolton Street, Ramsbottom, Bury, BL0 9HX