

**PHASE 1 PREMINIARY RISK
ASSESSMENT**
LAND ADJ TO 2 BALDERSTONE ROCHDALE OL11 2AJ

HME
CIVIL ENGINEERING
CONSULTANTS

STRUCTURAL | ENVIRONMENTAL | GEOTECHNICAL



HME Civil Engineering Limited. Registered in England: **15684044**

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A handwritten signature in black ink, appearing to read 'H. Emsley', with a long horizontal stroke extending to the right.

Chartered Member of the Institute of Civil Engineers

Membership Number: 74046405

TABLE OF CONTENTS

1.	INTRODUCTION
1.1	Appointment
1.2	Proposed Development
1.3	Objective & Scope of Work
1.4	Limitations
2.	SITE DESCRIPTION
2.1	Site Location
2.2	Site Layout & Description
2.3	Surrounding Land Use
3.	SITE HISTORY
4.	ENVIRONMENTAL SETTING
4.1	Geology
4.2	Mining & Ground Stability
4.3	Hydrogeology
4.4	Hydrology
4.5	Contaminated Land & Landfill Activities
4.6	Sensitive Land Uses
4.7	Radon
4.8	Unexploded Ordnance
5.	POTENTIAL POLLUTANT LINKAGES
5.1	General
5.2	Potential Contaminants of Concern
5.3	Potential Pathways
5.4	Receptors
5.5	Preliminary Conceptual Model
5.6	Potentially Significant Pollutant Linkages
6.	RECOMMENDATIONS

APPENDICES	
Appendix A	Historical OS Maps
Appendix B	Enviro+GeoInsight Report
Appendix C	Preliminary Conceptual Model
Appendix D	Site Photographs
Appendix E	Drawings

DRAWINGS	
BEK Drawing No 24154-1	Site Location
BEK Drawing No 24154-2	Site Layout
James Cambell Associates Limited Drawing No: 23.3148.SC1.1B entitled 'Proposed Dwelling'	

1. INTRODUCTION

1.1 Appointment

- 1.1.1 HME Civil Engineering Consultants (HME) has been commissioned by Lee Martin to prepare a Phase 1 Preliminary Risk Assessment (PRA) for a parcel of land at 2 Balderstone Road, Rochdale (hereafter referred to as 'the site'). The PRA will assess the potential risks associated with contamination considering a change of use to residential (with homegrown produce).
- 1.1.2 The site location and layout are presented on BEK Drawing No 24154-1 and BEK Drawing No 24154-2, respectively. Copies of these drawings are presented in Appendix E.
- 1.1.3 This report is solely for the use of the named client and their professional advisers, no liability to other parties is accepted. Should the client not act upon specific, reasonable advice contained in the report, no responsibility is accepted for the consequences.

1.2 Proposed Development

- 1.2.1 This report has been prepared to support a planning application for the construction of a residential dwelling together with access, parking and private garden areas.
- 1.2.2 The proposed development layout for the site is presented on 'Proposed Site Plan' by James Cambell Associates Limited Drawing No: 23.3148.SC1.1B, a copy of which is presented in Appendix E.

1.3 Objective & Scope of Work

- 1.3.1 The objective of this report is to provide a qualitative assessment of the potential risks from contamination and ground with consideration to the proposed end use residential (with homegrown produce).
- 1.3.2 To achieve the objective HME will undertake the following:
- Carry out a site inspection and collect photographs
 - Review the available relevant background information for the site, including:
 - Recent Ordnance Survey Maps
 - Site Specific GroundSure Reports
 - Site Specific Historical Maps
 - Coal Authority Website
 - Drawings provided by James Cambell Associates Ltd
 - Zetica UXO Information
 - Develop a preliminary conceptual site model in accordance with guidance to identify potentially significant pollutant linkages specific to the proposed development
 - Establish areas of potential concern based on identified risks and/or potential risks

- Identify any actions required to assess or reduce the risks identified

1.4 Limitations

- 1.4.1 The conclusions and recommendations presented in this report are the result of our professional interpretation of the information currently available. HME reserves the right to amend the conclusions and recommendations if further information becomes available.
- 1.4.2 However, it should be noted that much of the information has been derived from reports written by others and HME takes no responsibility for the accuracy of that information. Notwithstanding the above, the reports reviewed have all been written by professional environmental consultants with a duty of care to provide relevant and accurate information.
- 1.4.3 This report does not include an invasive plant species assessment.

2. SITE DESCRIPTION

2.1 Site Location

- 2.1.1 The site occupies a parcel of land located to the north-west of Balderstone Road and south-west of Oldham Road. The site is accessed via Wasp Avenue which leads north off Balderstone Road. The site is approximately 1.4 km south of Rochdale and some 5.3 km east of Heywood.
- 2.1.2 The National Grid Reference for the centre of the site is 390463, 411186. The site location is shown on BEK Drawing No 24154-1, a copy of which is presented in Appendix E.

2.2 Site Layout & Description

- 2.2.1 A walkover/inspection was conducted by an engineer from HME during November 2024. The site occupies an irregular shaped plot of land of approximately 600 m².
- 2.2.2 The site is occupied by a single residential dwelling with an associated driveway and partial landscaped areas. The residential building in the south is of brick built construction with a slate roof. A hardstanding tarmacadam driveway was located in the north of the site leading off Wasp Lane.
- 2.2.3 The north/north-east of the site where the proposed new development is to be located is characterised by a poorly vegetated landscaped areas with sparse short grasses and exposed soils. A large metal skip filled with household waste was located in the east of the site with a small stockpile of soil material located in the very south-east corner of the site. The majority of the site boundaries are lined with brick-built walls.
- 2.2.4 There was no visual or olfactory evidence for the presence of contamination during the site walkover.
- 2.2.5 The general site layout is shown on BEK Drawing No 24154-2, a copy of which is presented in Appendix E and a selection of photographs taken during the walkover are presented in Appendix D.

2.3 Surrounding Land Use

- 2.3.1 A residential dwelling is located immediately south of the site. A number of residential dwellings are located adjacent to Oldham Road some 10 m east of the site. Balderstone Park is located some 30 m north-west of the site at its closest point.

3. SITE HISTORY

- 3.1 The history of the site has been established using historical OS maps supplied by Groundsure. A selection of historical OS maps reviewed is presented in Appendix A.

1851

- 3.2 The earliest available maps show the site to be vacant and part of open fields that dominate the surrounding area. A row of terrace residential dwellings are present immediately north-east of the site beyond which Buersill Village is located. A unmarked road is located some 5 m east of the site. A number of residential dwellings and a farm complex are located some 50 m south of the site. Balderstone Mill (woollen) is located some 100 m south of the site. A number of large reservoirs are located some 120 m and 240 m south of the site respectively (see Figure 1).



Figure 1: Extract From 1851 Map.

1890 – 1938

- 3.3 These maps show the site to remain relatively unchanged. The residential dwelling located immediately north of the site is marked as Dog & Partridge (Public House). The road some 5 m east of the site is now marked as Oldham Road beyond which a number of residential dwellings are now located. Further residential development has taken place some 50 m south of the site. Balderstone Mil is now located some 120 m south in the location of a historic reservoir. A large pond is located some 120 m north-west of the site. Widespread residential development has taken place beyond 100 m north at Buersill (see Figure 2).

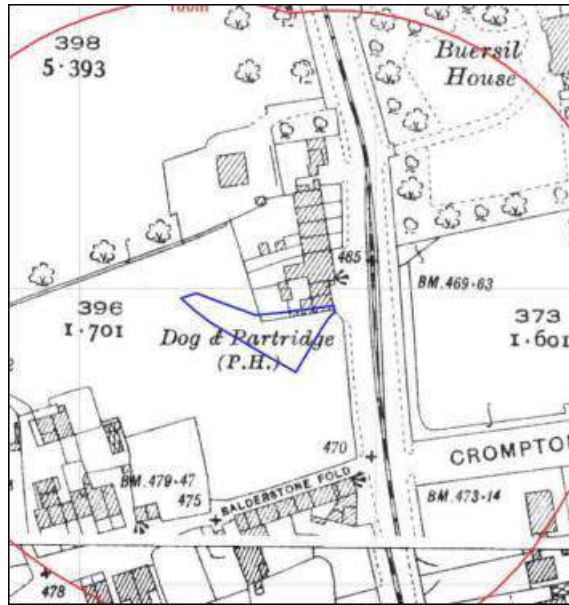


Figure 2: Extract From 1930 Map.

1955 - 2003

- 3.4 These maps show a semi-detached residential building with adjoined out building located in the south of the site circa 1955. A small outbuilding is located in the western section of the site circa 1963. The residential dwelling on site attaches to the adjacent property south off-site which is also adjoined by a Police Station some 30 m south of the site. Widespread residential development has taken place immediately west of the site. A number of residential dwellings some 50 m south of the site have been replaced by Balderston Road which is orientated west to east and intersects with Oldham Road. The pond located some 120 m north-west of the site is no longer mapped (presumably infilled). Further residential development has taken place to the east and south east of the site (see Figure 3).



Figure 3: Extract From 1963 – 1971 Map.

2010-2023

- 3.5 The more recent maps shows the small out building located in the west of the site is no longer present on the maps. An aerial image taken from Google Earth of the site from 2023 confirms the residential building is still present on site. The rest of the site appears sparse of any vegetation (see Figure 4).



Figure 4: Extract from Google Map Aerial Photograph dated 2023

4. ENVIRONMENTAL SETTING

- 4.0.1 An Enviro+GeoInsight Report has been obtained from Groundsure and information provided in these reports has been used within this section. A copy of the report is presented in Appendix B.

4.1 Geology

- 4.1.1 The site geology is illustrated in the Enviro+GeoInsight Report which has sourced data from several sources including British Geological Society (BGS), BRITPITS database and the Coal Authority.

- 4.1.2 In addition, HME has sought site investigation information from the BGS website. However, there were no exploratory locations available to view within 250 m of the site.

Made Ground

- 4.1.3 According to the Enviro+GeoInsight Report there is no record of made ground on site, however the site walkover confirmed the presence of made ground across the majority of the site in the form of tarmacadam. There are two recorded areas of made ground within 250 m of the site. The closest refers to a 'Made Ground (Undivided) – Artificial Deposit' located some 130 m east of the site.

Superficial Geology

- 4.1.4 The Enviro+GeoInsight Insight Report indicates that the underlying superficial geology comprises of Devensian Hummocky (moundy) Glacial Deposits dominated by 'Diamicton'.

Bedrock

- 4.1.5 The Enviro+GeoInsight Report indicates that the underlying solid geology comprises of the Pennine 'Lower Coal Measures Formation' which is dominated by mudstone, siltstone and sandstone. This strata has a low to moderate permeability.

Faults/Linear Features

- 4.1.6 There is one inferred, normal bedrock fault located some 136 m north-east of the site.

4.2 Mining & Ground Stability

- 4.2.1 Information in the Enviro+GeoInsight Report indicates that the site is located in a Coal Mining Consultation Zone, however, a review of Coal Authority Interactive Map confirms that the site is located within a Development Low Risk Area and in accordance with the Coal Authority 'Risk Based Approach to Development Management' the risks from coal mining are not considered further.

4.2.2 The Enviro+GeoInsight Report indicates there are 5 records of surface ground workings located within 250 m of the site. The closest refers to an 'Unspecified Heap' located some 115 m south of the site mapped circa 1907.

4.2.3 The Enviro+GeoInsight Report provides hazard ratings associated with ground subsidence at the site, as summarised below:

Shrink-Swell Clay:	Low
Landslides:	Very Low
Dissolution of Soluble Rocks:	Negligible
Compressible Deposits:	Negligible
Collapsible Deposits:	Very Low
Running Sands:	Very Low

4.2.4 It can be seen from the above that the site is unlikely to be affected by natural ground instability issues.

4.2.5 However, consideration should be given to the 'low' rating for shrink-swell clays for superficial deposits across the site as the Enviro+GeoInsight Report states that ground conditions for the site are 'Predominantly medium plasticity'

4.3 Hydrogeology

4.3.1 The superficial deposits beneath the site are classified by the EA as 'Secondary A' which are described as 'permeable layers capable of supporting water supplies at a local rather than strategic scale, and in some cases forming an important source of base flow to rivers.'

4.3.2 The underlying bedrock is also classified by the EA as a 'Secondary A' aquifer.

4.3.3 The Enviro+GeoInsight Report indicates the site is not located within a groundwater source protection zone.

4.3.4 There are no groundwater abstractions located within 250 m of the site.

4.3.5 The site is considered to be at low risk from groundwater flooding.

4.4 Hydrology

4.4.1 The no recorded surface water features on site, however there are eight recorded features within 250 m of the site. The closest water feature is located some 32 m north-west of the site, although it is not clear as to whether this feature is present at the ground surface or culverted. The most significant feature within 250 m is Sudden Brook, which is located some 33 m east of the site at its closest point.

4.4.2 There are no registered licensed discharge within 250 m of the site.

4.4.3 The site is located within an EA designated Flood Zone 1.

4.5 Contaminated Land & Landfill Activities

- 4.5.1 Information provided in the Enviro+GeoInsight Report indicates that there are no historic/current landfill or waste management facilities located on or within 250 m of the site.
- 4.5.2 There are no recorded waste exceptions located within 250 m of the site.
- 4.5.3 There has been no EA recorded pollution incidents within 250 m of the site.
- 4.5.4 There are no NIHHS or COMAH sites, recorded Part A(1), Part A(2), Part B or IPPC Authorised Activities within 250 m of the site.
- 4.5.5 The Enviro+GeoInsight Report states that there are 9 potentially contaminative historical industrial sites located within 250 m of the site. HME has chosen it prudent to review those closest, within 100 m of the site (See Table 1 below).

Location	Company	Date
4 m South	Police Station	1967 - 1976
35 m North-east	Pump	1851
54 m South	Unspecified Mill	1891
83 m South	Unspecified Mill	1954 - 1976
96 m South	Unspecified Mill/Woolen Mill	1907 - 1938
96 m South	Woollen Mill	1851
115 m South	Unspecified Heap	1907
199 m South	Unspecified Mill	1891
223 m South-west	Unspecified Heap	1976

Table 1: Potentially Contaminative Historical Land Uses on or Within 250 m.

- 4.5.6 The information presented in the Enviro+GeoInsight Report indicates that there are two historical energy features located within 250 m of the site. The closest refers to an 'Electricity Substation' some 98 m south of the site present circa 1990.
- 4.5.7 According to the Enviro+GeoInsight Report there are 5 potentially contaminative current industrial sites located within 250 m of the site. The closest of which is a packaging service located some 78 m east of the site. These features are unlikely to have impacted on the site.

4.6 Sensitive Land Uses

- 4.6.1 The site is not affected by any of the ecological systems identified as a statutory receptor in the DETR Circular 01/2006.
- 4.6.2 The site is not located within a designated nitrate vulnerable zone.

4.7 Radon

- 4.7.1 The Enviro+GeoInsight Report states that 'the property is not in a Radon Affected Area, as less than 1% of properties are above the Action Level'. Therefore, 'no radon protective measures are necessary'.

4.8 Unexploded Ordnance

- 4.8.1 The regional unexploded bomb risk map from Zetica indicates that the site is in an area of LOW risk from Unexploded Ordnance (UXO) resulting from the Second World War.
- 4.8.2 HME does not consider any further assessment to be required with respect to UXO.

5. POTENTIAL POLLUTANT LINKAGES

5.1 General

5.1.1 This section identifies the potential sources of contamination along with specific contaminants of concern, pathways and receptors that may be associated with the site based on its known history and the current condition and with respect to the re-development of the site for residential use (with homegrown produce).

5.1.2 This information is used to develop a preliminary conceptual model which is a qualitative description of potential sources of environmental pollutants, the pathways by which they are transported and the receptors:

- i) Potential sources of contamination: these include any actual or potentially contaminating materials and activities, located either on or in the vicinity of the site
- ii) Potential pathways for contamination migration: these comprise the routes or mechanisms by which contaminants may migrate from the source to the receptor including environmental migration pathways and human health exposure pathways
- iii) Potential receptors of contamination: these include future land users, ecological systems, water resources and property.

5.2 Potential Sources of Contamination

5.2.1 Based on the earliest available maps dating from 1851, the site was vacant forming part of open fields. The 1955 maps shows a semi-detached residential building with an adjoined out building located in the south of the site. The residential building is attached to the adjacent property off-site to the south. A small detached outbuilding was noted to be present in western most part of the site circa 1963. The site remains in the same configuration until circa 2010 where the small out building in west of the site is no longer present on the maps. Aerial imagery from 2023 confirms the site remains in this configuration with the residential building still present on site. The remainder of the site appears sparse of vegetation or structures.

5.2.2 The site walkover proved the presence of made ground across the majority of the site in the form of tarmacadam which is likely to be underlain by granular made ground imported to level the site/as sub-base. The nature, source and extent of any made ground is currently unknown and may contain potential contaminants of concern.

5.2.3 The potential contaminants of concern that may be present at the site are summarised below:

Potentially Significant Contaminants of Concern	
Arsenic	Zinc
Cadmium	Sulphate
Chromium	Cyanide
Copper	Phenols
Lead	Polycyclic Aromatic Hydrocarbons (PAHs)
Mercury	Total Petroleum Hydrocarbons (TPH-CWG)
Nickel	Asbestos
Selenium	pH

Table 2: Potential Contaminants of Concern

5.2.4 It should be noted that the above list represents a broad range of potential contaminants of concern. Additional contaminants of concern may be present if ground conditions differ from those anticipated.

5.2.5 Consideration has been given to the potential risks from ground gas, associated with the reservoir located some 120 m south of the site infilled circa 1930, and the pond located some 120 m north-west of the site presumably infilled circa 1988-1992. With consideration to the infilled features, they are considered to be a significant distance from the site to not represent a significant risk and the clay rich superficial deposits will inhibit the lateral migration of ground gas. Notwithstanding, if a significant thickness of made ground (>3 m) is present on site or ground conditions contain a high level of organic matter then risks from ground gas should be considered.

5.2.6 In addition, coal measures are noted to be present below the site which can represent a significant source of ground gas. However, the is located within a Coal Authority defined 'low' risk area and as the coal measures have not been worked, the ground gas level is considered to be very low. If superficial clay is proven to be present beneath the site (in accordance with BGS data), this will likely inhibit vertical migration of ground gas from the underlying coal measures and issues from gas associated with the coal measures will not need to be considered further.

5.3 Potential Pathways

5.3.1 The pathways through which contaminants may reach receptors are in part dependent by the nature and behaviour of the contaminant and the intended end use of the site (residential with homegrown produce).

5.3.2 The following potential pathways have been identified with respect to the existing site condition, historical use of the site, the environmental setting and the re-development of the site to residential (with homegrown produce) which are assessed in the conceptual model:

- Dermal contact of contaminated soil
- Ingestion of contaminated soil/home grown vegetables
- Inhalation of contamination dust

- Dissolution or suspension (leaching) of contaminants into pore waters affecting plant growth
- Indoor inhalation of ground gas/organic vapours
- Dissolution or suspension (leaching) of contaminants from site soils leading to contamination of groundwater
- Dissolution or suspension (leaching) of contaminants from site soils leading to lateral migration within perched waters to on-site and off-site receptors. Potential significant pathways include more permeable layers within the made ground/natural strata, underground services and piles/foundations.
- Contamination affecting the integrity of service pipelines by direct contact
- Buildings affected by direct contact with elevated concentrations of sulphate and/or extreme pH

5.4 Receptors

5.4.1 Potential site-specific receptors that may be affected by contamination at the site are listed below:

Future Site Users

5.4.2 Future residents of the site could be at risk from contamination present at the site.

5.4.3 Potential risks are associated with ingestion of soils and home grown vegetables as well as inhalation of contaminated dust/vapours (including asbestos fibres) and dermal contact with contaminants of concern. These risks are all associated with the garden areas, or any open spaces of the proposed development.

5.4.4 In addition, risks associated with indoor inhalation of ground gas/organic vapours need to be assessed.

Construction Workers

5.4.5 The primary risks to construction workers are associated with shallow excavations as asbestos could be present. Asbestos fibers (if present) can be released into the atmosphere during earthworks.

5.4.6 Standard personal protective equipment and site specific risk assessments and method statements should reduce risks associated with other contaminants of concern due to short exposure duration.

Off Site Receptors

- 5.4.7 Off site receptors include residents to the south and west of the site. Human health could be at risk if asbestos fibres are released during the development.

Flora

- 5.4.8 Heavy metals can be phytotoxic and if present can represent a potential risk to flora in the landscaped areas.

Buildings & Services

- 5.4.9 The integrity of service pipes can be affected by concentrations of organic contamination.

Controlled Waters

- 5.4.10 There are no recorded surface water features on-site, however there are eight recorded features within 250 m of the site. The closest water feature is located some 32 m north-west of the site. The level at which the river is located has not been provided. The most significant feature within 250 m is Sudden Brook located some 33 m east of the site. All represent potential receptors.

- 5.4.11 The superficial strata and bedrock are both classified as a Secondary A Aquifers and are therefore considered sensitive receptors.

5.5 Preliminary Conceptual Model

- 5.5.1 The identified potential sources of contaminants, pathways and receptors have been assessed to establish plausible pollutant linkages. All potentially significant pollutant linkages are detailed in Appendix C.

5.6 Potentially Significant Pollutant Linkages

- 5.6.1 A number of possible 'significant pollutant linkages' have been identified associated with the site.
- 5.6.2 Potential risks relating to the potential harm to the health of humans and/or domestic pets both on and off site due to the potential for direct contact with contaminants in the made ground and the ingestion of contaminated soil/dust (**Link 1**).
- 5.6.3 There is also the possibility of windblown particulates being inhaled by people/animals both on site and off site (**Link 2**).
- 5.6.4 Home grown produce could be affected by ground contamination (**Link 3**) and human health could be at risk by the ingestion of home grown produce affected by contamination (**Link 4**).

- 5.6.5 Human health could be at risk by the inhalation of ground gases ([Link 5](#)) and/or volatile contamination migrating into properties on site ([Link 6](#)).
- 5.6.6 Property (including services, flora and fauna) could be affected by direct contact to high concentrations of contaminants ([Link 7](#)).
- 5.6.7 Dissolution or suspension (leaching) of contaminants from site soils leading to lateral migration within perched waters to on and off-site receptors (surface waters). Potential significant pathways include more permeable layers within the made ground/natural strata, underground services and piles/foundations ([Link 8](#)).
- 5.6.8 Dissolution or suspension (leaching) of contaminants from site soils leading to impact on the underlying Secondary A within the bedrock. Potential pathways include areas where Boulder Clay is absent, locations of deep piles/foundations ([Link 9](#)).
- 5.6.9 Site investigation is required to identify site specific conditions and assess the risks associated with each identified plausible pollutant linkage.

6. RECOMMENDATIONS

- 6.1 Based on the findings of the Preliminary Risk Assessment herein, the potential risks associated with contamination have been identified to human health, controlled waters, flora and property (including services). The risks are associated with the presence of made ground and any contamination associated with other former activities.
- 6.2 HME recommends that the following site investigation works are carried out to characterise the shallow ground conditions and quantify the potential risks identified. The site investigation will also provide sufficient information to support a geotechnical assessment to inform foundation design options.

Site Investigation

- 6.3 The investigation should comprise the drilling of a series of boreholes to confirm ground conditions across the site, in particular to characterise the nature and extent of the made ground. This will identify any possibly significant risks associated with contamination and ground gas.
- 6.4 In-situ strength testing will be carried out and samples recovered for chemical and geotechnical testing. All samples for chemical testing will be collected in appropriate sampling vessels, stored in a precooled cool box and dispatched to the laboratory within 24 hours.
- 6.5 The site investigation should be supervised by an experienced engineer who will be responsible for recording ground conditions encountered.
- 6.6 If natural superficial clay is absent, made ground on site in excess of 3 m thick or there is organic strata present (ie peat) then risks from ground gas will need to be further assessed.

Laboratory Testing

- 6.7 Following a review of ground conditions encountered, a selection of samples will be tested for the contaminants of concern listed in Table 2 of this report. If visual or olfactory evidence of contamination is encountered (including any made ground) during the site investigation then it may be necessary to undertake additional testing.
- 6.8 Depending on ground conditions encountered, samples will be submitted for geotechnical testing to inform foundation design options.
- 6.9 All testing will be carried out by a UKAS accredited laboratory to MCERTS standard (where applicable).

Data Assessment

- 6.10 The investigation findings will be assessed as part of a quantitative risk assessment to amend the conceptual site model and identify any potential significant

pollutant linkages.

- 6.11 Analysis of laboratory test results determine a geotechnical assessment to inform foundation design.
- 6.12 The assessments will be undertaken in accordance with current UK guidance and policy.

Reporting

- 6.13 The works undertaken will be detailed in a Site Investigation & Ground Assessment report along with full justifications for the assessment and the conclusions and any recommendations.

Other Considerations

- 6.14 It may be necessary to carry out soakaway testing to BRE365 to inform surface water drainage options.
- 6.15 We would also recommend that consideration is given to the requirements of the water supply service provider and the completion of the UKWIR risk assessment for water pipe selection.

APPENDIX A

Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: County Series

Map date: 1890-1891

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1891
Revised 1891
Edition N/A
Copyright N/A
Levelled N/A

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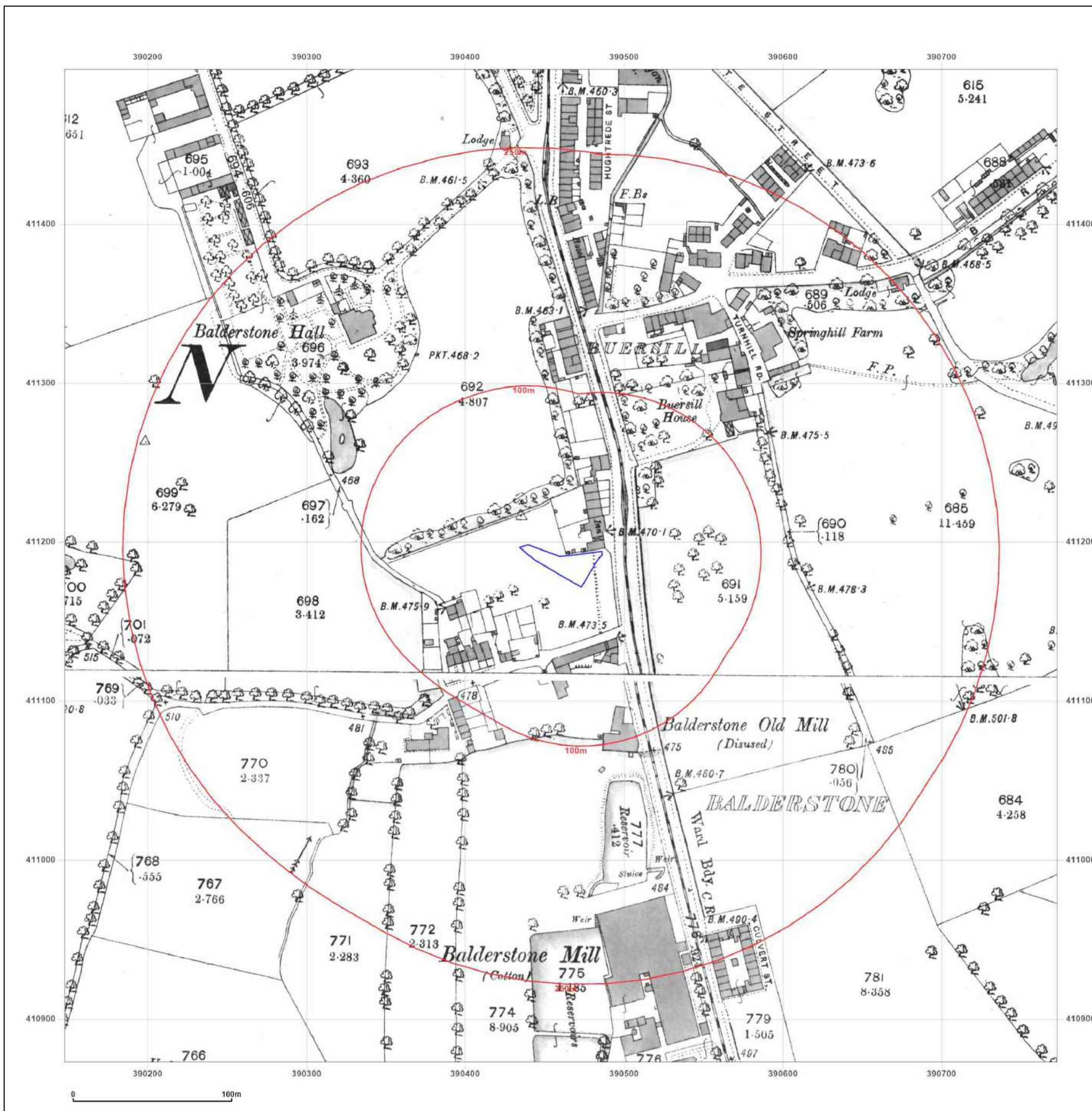


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Production date: 11 November 2024

Map legend available at:
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ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: County Series Town Plan

Map date: 1892

Scale: 1:500

Printed at: 1:1,000



Surveyed 1892
Revised N/A
Edition N/A
Copyright N/A
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Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: County Series

Map date: 1910

Scale: 1:2,500

Printed at: 1:2,500



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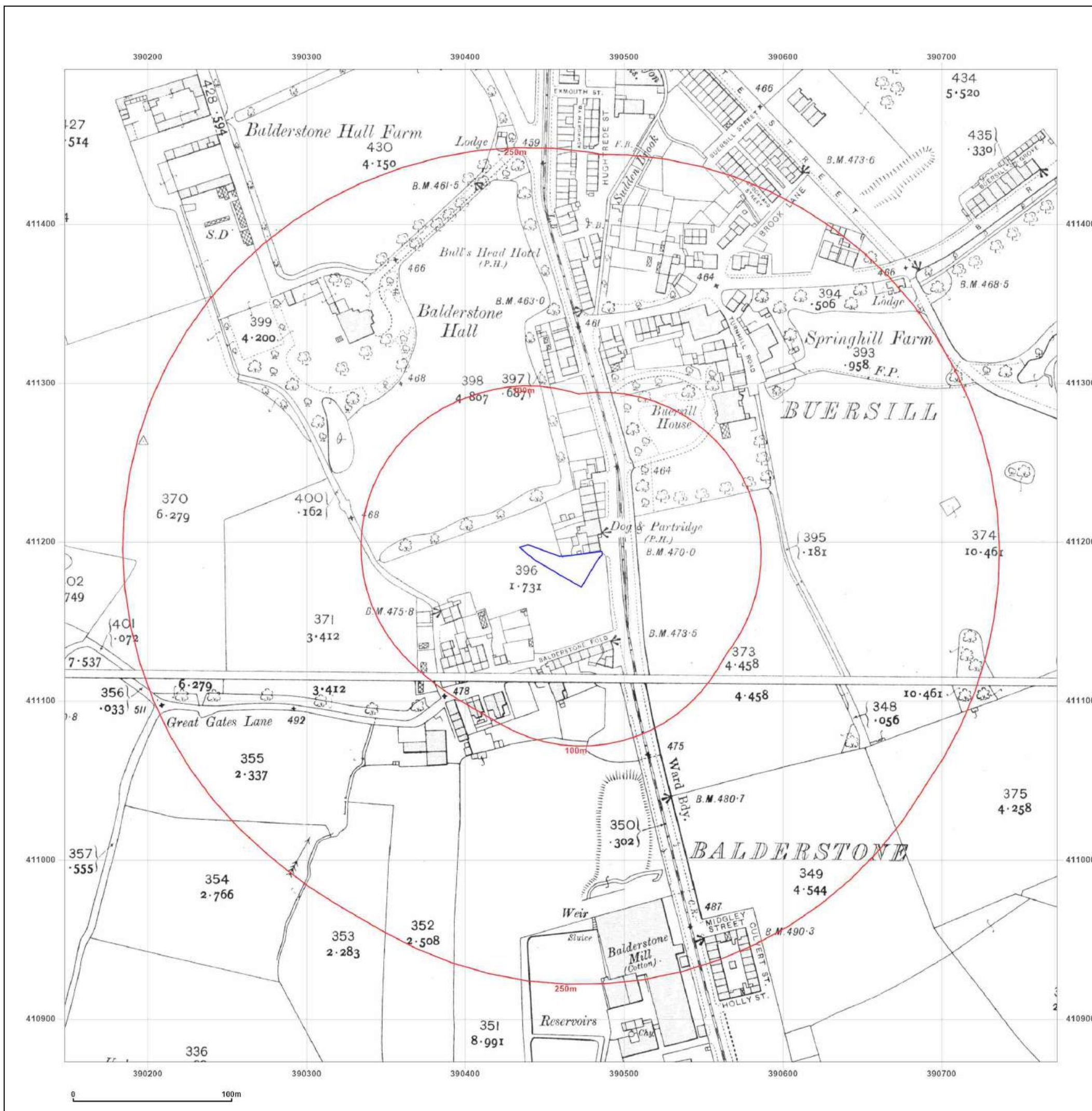


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Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: County Series

Map date: 1930

Scale: 1:2,500

Printed at: 1:2,500



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Revised 1930
Edition N/A
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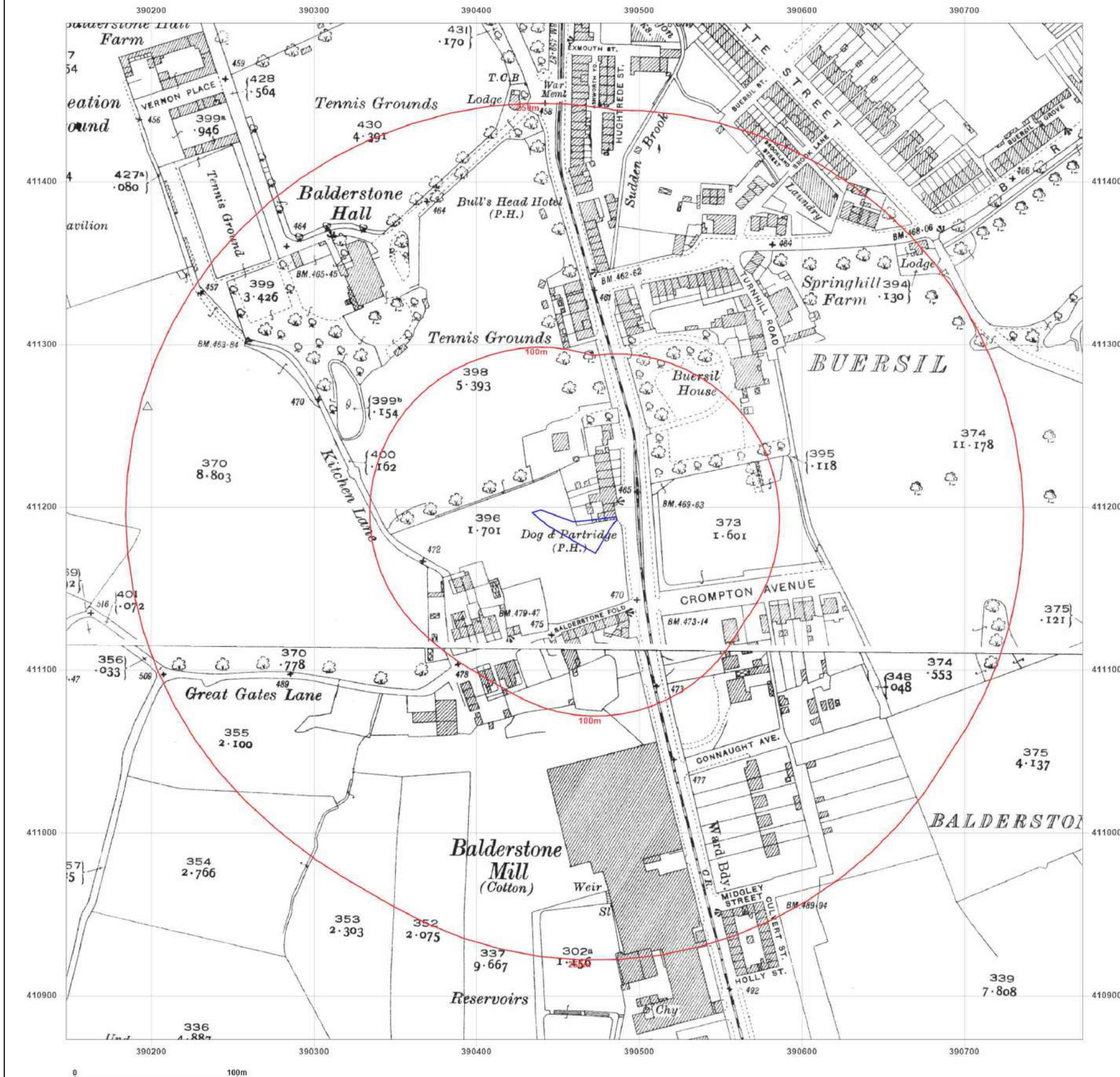


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Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: County Series

Map date: 1937

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1937
Revised 1937
Edition N/A
Copyright N/A
Levelled N/A

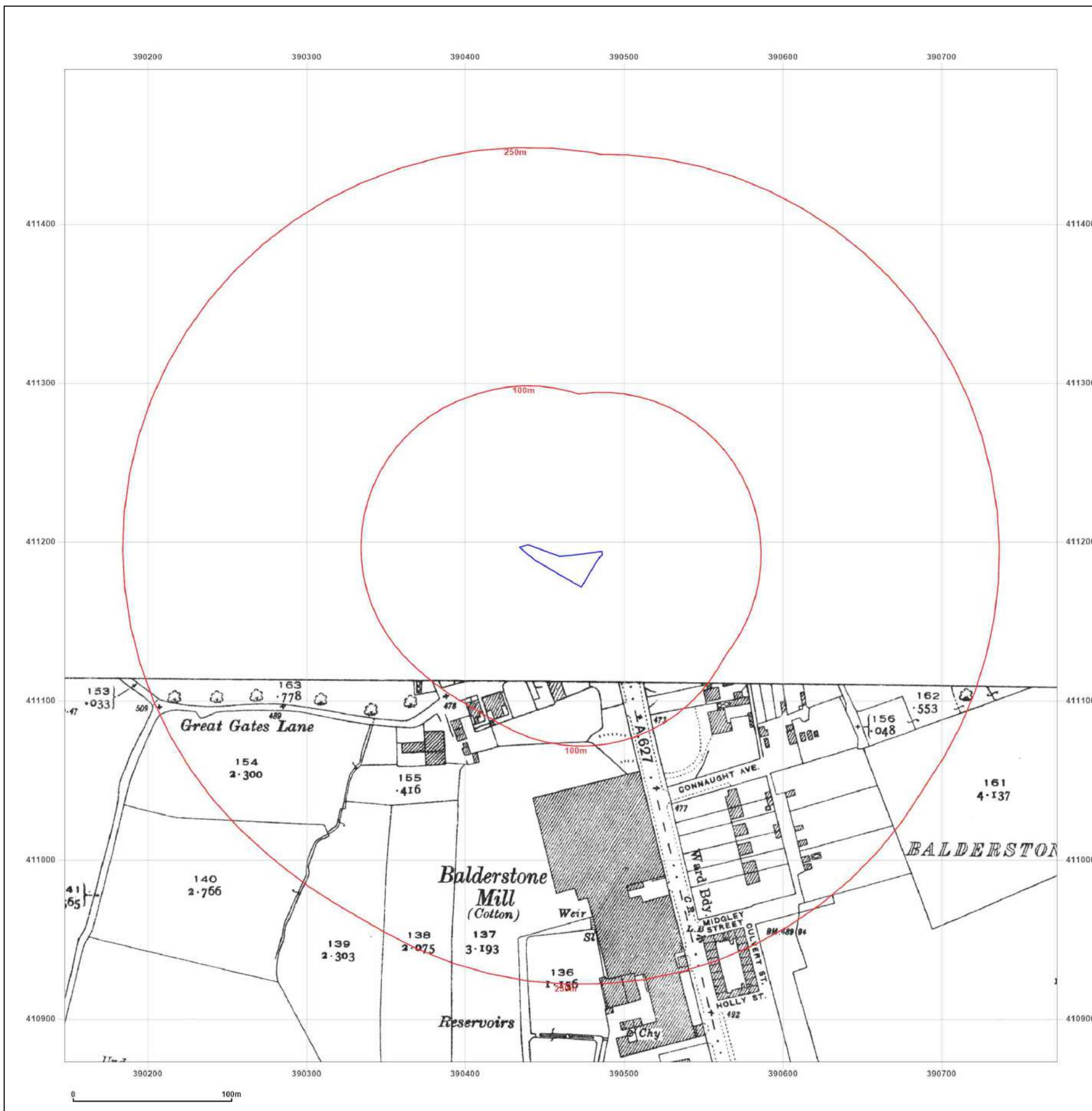


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Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1955

Scale: 1:1,250

Printed at: 1:2,000



Surveyed 1955
Revised 1955
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Surveyed 1955
Revised 1955
Edition N/A
Copyright N/A
Levelled 1928

Surveyed 1955
Revised 1955
Edition N/A
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Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1956

Scale: 1:1,250

Printed at: 1:2,000



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Site Details:

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ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1956

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1955
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Edition 1956
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Revised 1955
Edition 1956
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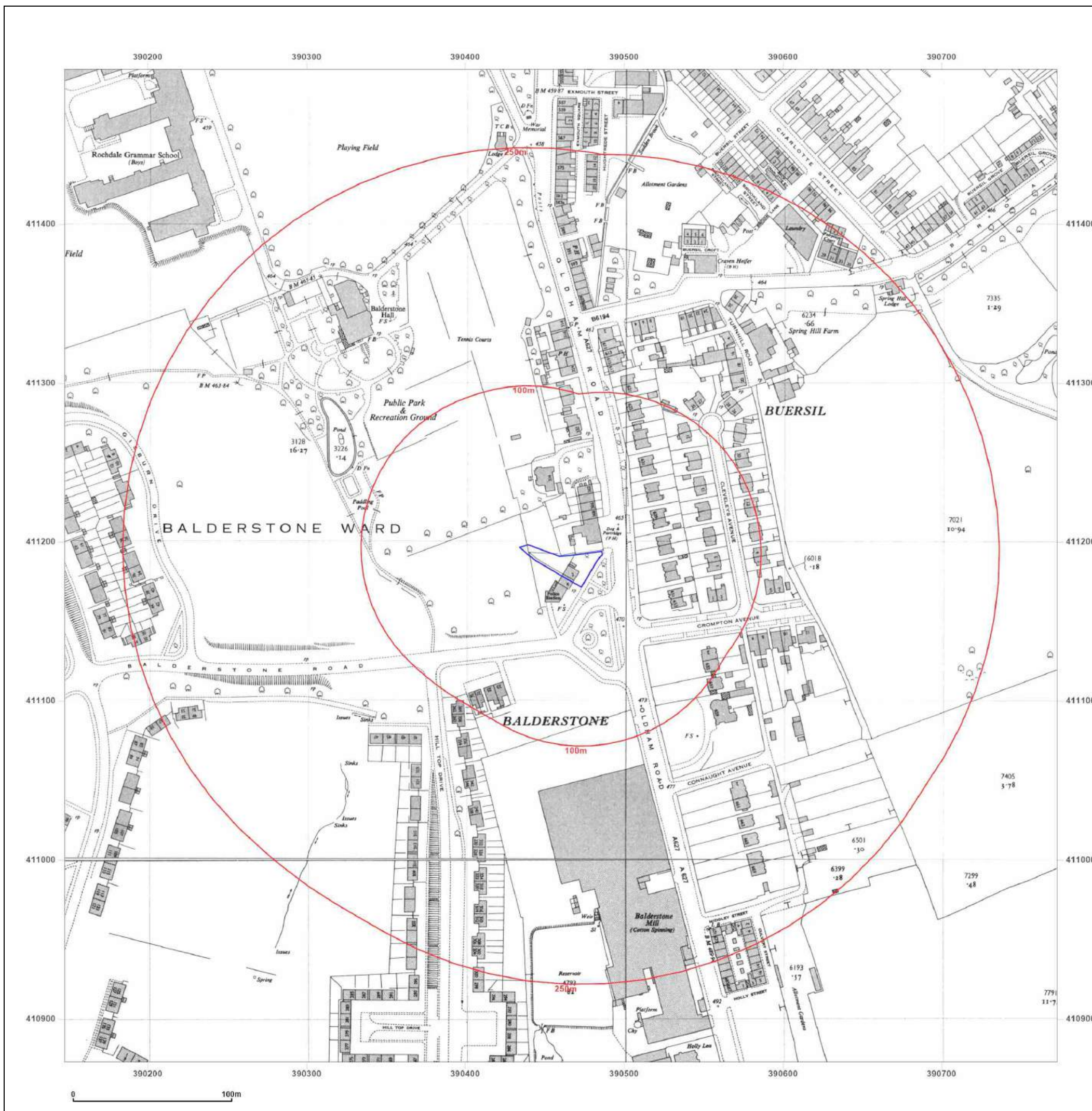


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Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1963-1971

Scale: 1:1,250

Printed at: 1:2,000



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Surveyed 1955
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Site Details:

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ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1974-1975

Scale: 1:1,250

Printed at: 1:2,000



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Revised N/A
Edition N/A
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Revised N/A
Edition N/A
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Site Details:

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Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1977-1980

Scale: 1:1,250

Printed at: 1:2,000



Surveyed N/A Revised N/A Edition N/A Copyright 1980 Levelled 1956	Surveyed 1955 Revised 1976 Edition N/A Copyright 1977 Levelled 1962
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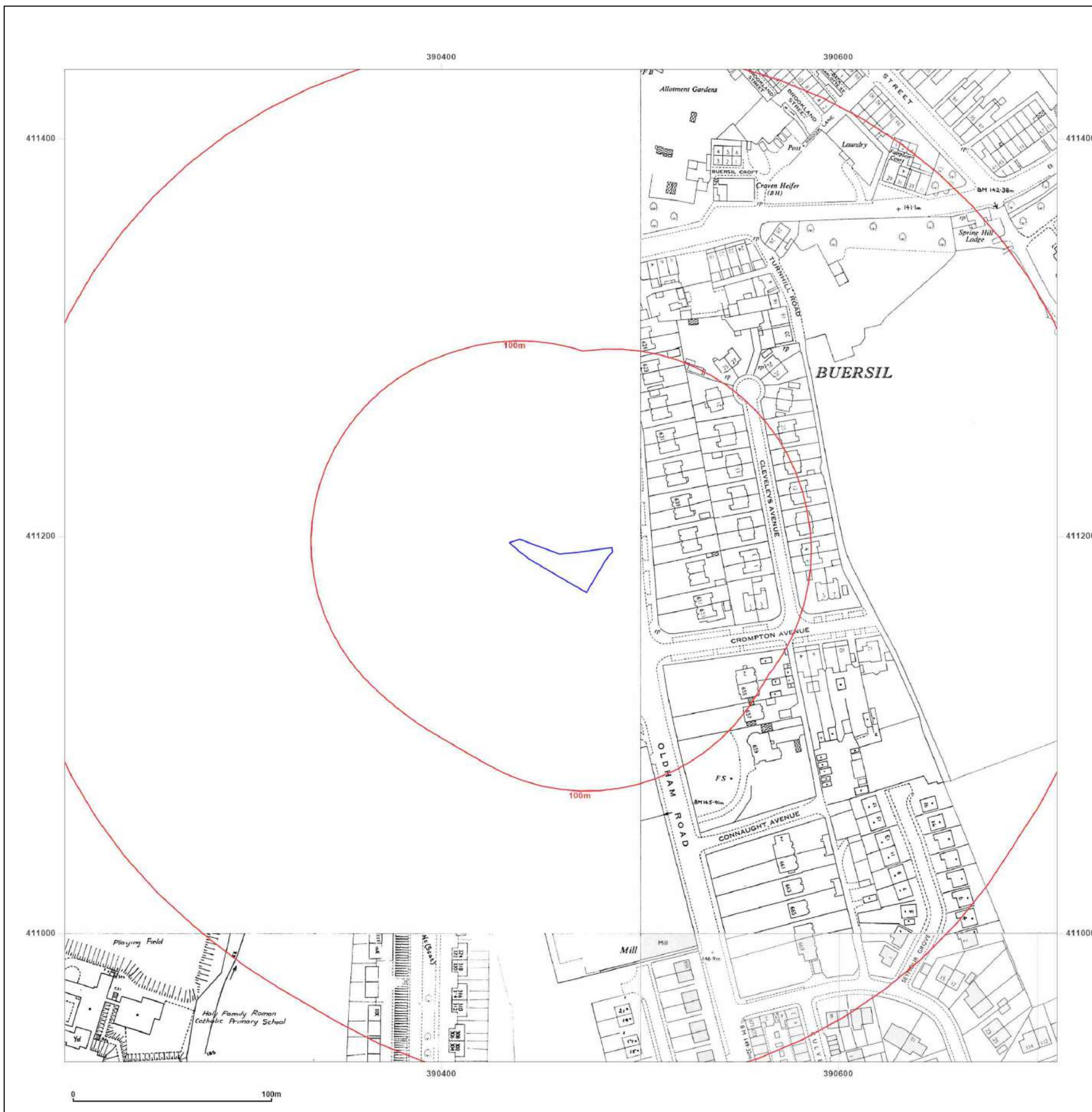


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Site Details:

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ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1988-1992

Scale: 1:1,250

Printed at: 1:2,000



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Edition N/A
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Surveyed 1990
Revised 1990
Edition N/A
Copyright 1990
Levelled N/A

Surveyed 1962
Revised 1988
Edition N/A
Copyright 1988
Levelled 1962

Surveyed 1992
Revised N/A
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Site Details:

2, BALDERSTONE ROAD,
ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: National Grid

Map date: 1992

Scale: 1:1,250

Printed at: 1:2,000



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Site Details:

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ROCHDALE, OL11 2AJ

Client Ref: 8486-24154-MLM
Report Ref: GS-TF3-EYA-IF4-T3M
Grid Ref: 390460, 411185

Map Name: LandLine

Map date: 2003

Scale: 1:1,250

Printed at: 1:1,250



2003



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APPENDIX B



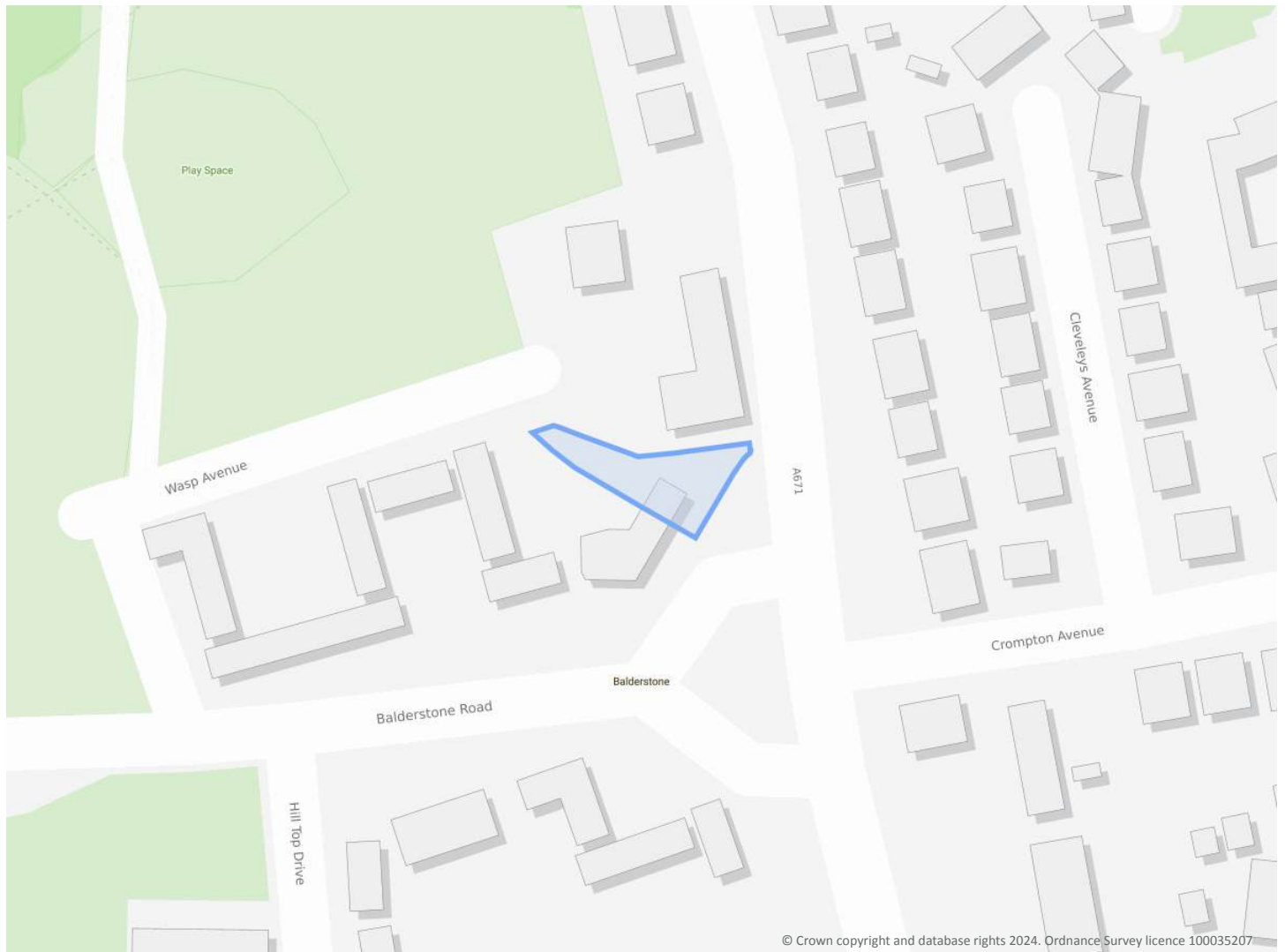
2, BALDERSTONE ROAD, ROCHDALE, OL11 2AJ

Order Details

Date: 11/11/2024
Your ref: 8486-24154-MLM
Our Ref: GS-AJZ-FRS-OTD-2JO

Site Details

Location: 390463 411186
Area: 0.06 ha
Authority: [Rochdale Metropolitan Borough Council](#) ↗



[Summary of findings](#)

[p. 2 >](#) [Aerial image](#)

[p. 9 >](#)

[OS MasterMap site plan](#)

[p.14 >](#) [Insight User Guide](#) ↗

Contact us with any questions at:

info@groundsure.com ↗

01273 257 755

Summary of findings

Page	Section	Past land use >	On site	0-50m	50-250m	250-500m	500-2000m
15 >	1.1 >	Historical industrial land uses >	0	2	8	17	-
17 >	1.2 >	Historical tanks >	0	0	0	8	-
17 >	1.3 >	Historical energy features >	0	0	2	10	-
18	1.4	Historical petrol stations	0	0	0	0	-
18 >	1.5 >	Historical garages >	0	0	0	6	-
19	1.6	Historical military land	0	0	0	0	-
Page	Section	Past land use - un-grouped >	On site	0-50m	50-250m	250-500m	500-2000m
20 >	2.1 >	Historical industrial land uses >	0	3	11	24	-
22 >	2.2 >	Historical tanks >	0	0	0	8	-
23 >	2.3 >	Historical energy features >	0	0	2	19	-
24	2.4	Historical petrol stations	0	0	0	0	-
24 >	2.5 >	Historical garages >	0	0	0	6	-
Page	Section	Waste and landfill >	On site	0-50m	50-250m	250-500m	500-2000m
25	3.1	Active or recent landfill	0	0	0	0	-
25	3.2	Historical landfill (BGS records)	0	0	0	0	-
26	3.3	Historical landfill (LA/mapping records)	0	0	0	0	-
26	3.4	Historical landfill (EA/NRW records)	0	0	0	0	-
26	3.5	Historical waste sites	0	0	0	0	-
26	3.6	Licensed waste sites	0	0	0	0	-
26 >	3.7 >	Waste exemptions >	0	0	0	3	-
Page	Section	Current industrial land use >	On site	0-50m	50-250m	250-500m	500-2000m
28 >	4.1 >	Recent industrial land uses >	0	0	5	-	-
29	4.2	Current or recent petrol stations	0	0	0	0	-
29	4.3	Electricity cables	0	0	0	0	-
29	4.4	Gas pipelines	0	0	0	0	-
29	4.5	Sites determined as Contaminated Land	0	0	0	0	-



30	4.6	Control of Major Accident Hazards (COMAH)	0	0	0	0	-
30	4.7	Regulated explosive sites	0	0	0	0	-
30	4.8	Hazardous substance storage/usage	0	0	0	0	-
30	4.9	Historical licensed industrial activities (IPC)	0	0	0	0	-
30	4.10	Licensed industrial activities (Part A(1))	0	0	0	0	-
31 >	4.11 >	Licensed pollutant release (Part A(2)/B) >	0	0	0	1	-
31	4.12	Radioactive Substance Authorisations	0	0	0	0	-
31 >	4.13 >	Licensed Discharges to controlled waters >	0	0	0	4	-
32	4.14	Pollutant release to surface waters (Red List)	0	0	0	0	-
32	4.15	Pollutant release to public sewer	0	0	0	0	-
32	4.16	List 1 Dangerous Substances	0	0	0	0	-
33	4.17	List 2 Dangerous Substances	0	0	0	0	-
33	4.18	Pollution Incidents (EA/NRW)	0	0	0	0	-
33	4.19	Pollution inventory substances	0	0	0	0	-
33	4.20	Pollution inventory waste transfers	0	0	0	0	-
33	4.21	Pollution inventory radioactive waste	0	0	0	0	-
Page	Section	Hydrogeology >	On site	0-50m	50-250m	250-500m	500-2000m
34 >	5.1 >	Superficial aquifer >	Identified (within 500m)				
36 >	5.2 >	Bedrock aquifer >	Identified (within 500m)				
38 >	5.3 >	Groundwater vulnerability >	Identified (within 50m)				
39	5.4	Groundwater vulnerability- soluble rock risk	None (within 0m)				
39	5.5	Groundwater vulnerability- local information	None (within 0m)				
40 >	5.6 >	Groundwater abstractions >	0	0	0	0	9
43 >	5.7 >	Surface water abstractions >	0	0	0	0	7
45	5.8	Potable abstractions	0	0	0	0	0
45	5.9	Source Protection Zones	0	0	0	0	-
45	5.10	Source Protection Zones (confined aquifer)	0	0	0	0	-
Page	Section	Hydrology >	On site	0-50m	50-250m	250-500m	500-2000m
46 >	6.1 >	Water Network (OS MasterMap) >	0	2	6	-	-



47 >	6.2 >	Surface water features >	0	0	3	-	-
47 >	6.3 >	WFD Surface water body catchments >	1	-	-	-	-
48 >	6.4 >	WFD Surface water bodies >	0	1	0	-	-
48 >	6.5 >	WFD Groundwater bodies >	1	-	-	-	-
Page	Section	River and coastal flooding >	On site	0-50m	50-250m	250-500m	500-2000m
49	7.1	Risk of flooding from rivers and the sea	None (within 50m)				
50 >	7.2 >	Historical Flood Events >	0	0	1	-	-
50	7.3	Flood Defences	0	0	0	-	-
50	7.4	Areas Benefiting from Flood Defences	0	0	0	-	-
50	7.5	Flood Storage Areas	0	0	0	-	-
51	7.6	Flood Zone 2	None (within 50m)				
51	7.7	Flood Zone 3	None (within 50m)				
Page	Section	Surface water flooding >					
52 >	8.1 >	Surface water flooding >	1 in 30 year, 0.1m - 0.3m (within 50m)				
Page	Section	Groundwater flooding >					
54 >	9.1 >	Groundwater flooding >	Low (within 50m)				
Page	Section	Environmental designations >	On site	0-50m	50-250m	250-500m	500-2000m
55 >	10.1 >	Sites of Special Scientific Interest (SSSI) >	0	0	0	0	4
56	10.2	Conserved wetland sites (Ramsar sites)	0	0	0	0	0
56 >	10.3 >	Special Areas of Conservation (SAC) >	0	0	0	0	4
57	10.4	Special Protection Areas (SPA)	0	0	0	0	0
57	10.5	National Nature Reserves (NNR)	0	0	0	0	0
57	10.6	Local Nature Reserves (LNR)	0	0	0	0	0
57	10.7	Designated Ancient Woodland	0	0	0	0	0
58	10.8	Biosphere Reserves	0	0	0	0	0
58	10.9	Forest Parks	0	0	0	0	0
58	10.10	Marine Conservation Zones	0	0	0	0	0
58 >	10.11 >	Green Belt >	0	0	0	0	3
59	10.12	Proposed Ramsar sites	0	0	0	0	0



59	10.13	Possible Special Areas of Conservation (pSAC)	0	0	0	0	0
59	10.14	Potential Special Protection Areas (pSPA)	0	0	0	0	0
59	10.15	Nitrate Sensitive Areas	0	0	0	0	0
60 >	10.16 >	<u>Nitrate Vulnerable Zones ></u>	0	0	0	0	1
61 >	10.17 >	<u>SSSI Impact Risk Zones ></u>	1	-	-	-	-
62 >	10.18 >	<u>SSSI Units ></u>	0	0	0	0	4
Page	Section	<u>Visual and cultural designations ></u>	On site	0-50m	50-250m	250-500m	500-2000m
64	11.1	World Heritage Sites	0	0	0	-	-
65	11.2	Area of Outstanding Natural Beauty	0	0	0	-	-
65	11.3	National Parks	0	0	0	-	-
65 >	11.4 >	<u>Listed Buildings ></u>	0	0	4	-	-
66	11.5	Conservation Areas	0	0	0	-	-
66	11.6	Scheduled Ancient Monuments	0	0	0	-	-
66	11.7	Registered Parks and Gardens	0	0	0	-	-
Page	Section	<u>Agricultural designations ></u>	On site	0-50m	50-250m	250-500m	500-2000m
67 >	12.1 >	<u>Agricultural Land Classification ></u>	Urban (within 250m)				
68	12.2	Open Access Land	0	0	0	-	-
68	12.3	Tree Felling Licences	0	0	0	-	-
68	12.4	Environmental Stewardship Schemes	0	0	0	-	-
68	12.5	Countryside Stewardship Schemes	0	0	0	-	-
Page	Section	<u>Habitat designations ></u>	On site	0-50m	50-250m	250-500m	500-2000m
69 >	13.1 >	<u>Priority Habitat Inventory ></u>	0	0	8	-	-
70	13.2	Habitat Networks	0	0	0	-	-
70	13.3	Open Mosaic Habitat	0	0	0	-	-
70	13.4	Limestone Pavement Orders	0	0	0	-	-
Page	Section	<u>Geology 1:10,000 scale ></u>	On site	0-50m	50-250m	250-500m	500-2000m
71 >	14.1 >	<u>10k Availability ></u>	Identified (within 500m)				
72 >	14.2 >	<u>Artificial and made ground (10k) ></u>	0	0	2	1	-
73 >	14.3 >	<u>Superficial geology (10k) ></u>	1	0	0	3	-

74	14.4	Landslip (10k)	0	0	0	0	-
75 >	14.5 >	Bedrock geology (10k) >	1	0	3	3	-
76 >	14.6 >	Bedrock faults and other linear features (10k) >	0	0	1	2	-
Page	Section	Geology 1:50,000 scale >	On site	0-50m	50-250m	250-500m	500-2000m
77 >	15.1 >	50k Availability >	Identified (within 500m)				
78	15.2	Artificial and made ground (50k)	0	0	0	0	-
78	15.3	Artificial ground permeability (50k)	0	0	-	-	-
79 >	15.4 >	Superficial geology (50k) >	1	0	0	1	-
80 >	15.5 >	Superficial permeability (50k) >	Identified (within 50m)				
80	15.6	Landslip (50k)	0	0	0	0	-
80	15.7	Landslip permeability (50k)	None (within 50m)				
81 >	15.8 >	Bedrock geology (50k) >	1	0	3	2	-
82 >	15.9 >	Bedrock permeability (50k) >	Identified (within 50m)				
82 >	15.10 >	Bedrock faults and other linear features (50k) >	0	0	1	2	-
Page	Section	Boreholes	On site	0-50m	50-250m	250-500m	500-2000m
83	16.1	BGS Boreholes	0	0	0	-	-
Page	Section	Natural ground subsidence >					
84 >	17.1 >	Shrink swell clays >	Low (within 50m)				
85 >	17.2 >	Running sands >	Very low (within 50m)				
86 >	17.3 >	Compressible deposits >	Negligible (within 50m)				
87 >	17.4 >	Collapsible deposits >	Very low (within 50m)				
88 >	17.5 >	Landslides >	Very low (within 50m)				
89 >	17.6 >	Ground dissolution of soluble rocks >	Negligible (within 50m)				
Page	Section	Mining and ground workings >	On site	0-50m	50-250m	250-500m	500-2000m
91	18.1	BritPits	0	0	0	0	-
92 >	18.2 >	Surface ground workings >	0	0	17	-	-
92	18.3	Underground workings	0	0	0	0	0
93	18.4	Underground mining extents	0	0	0	0	-
93	18.5	Historical Mineral Planning Areas	0	0	0	0	-

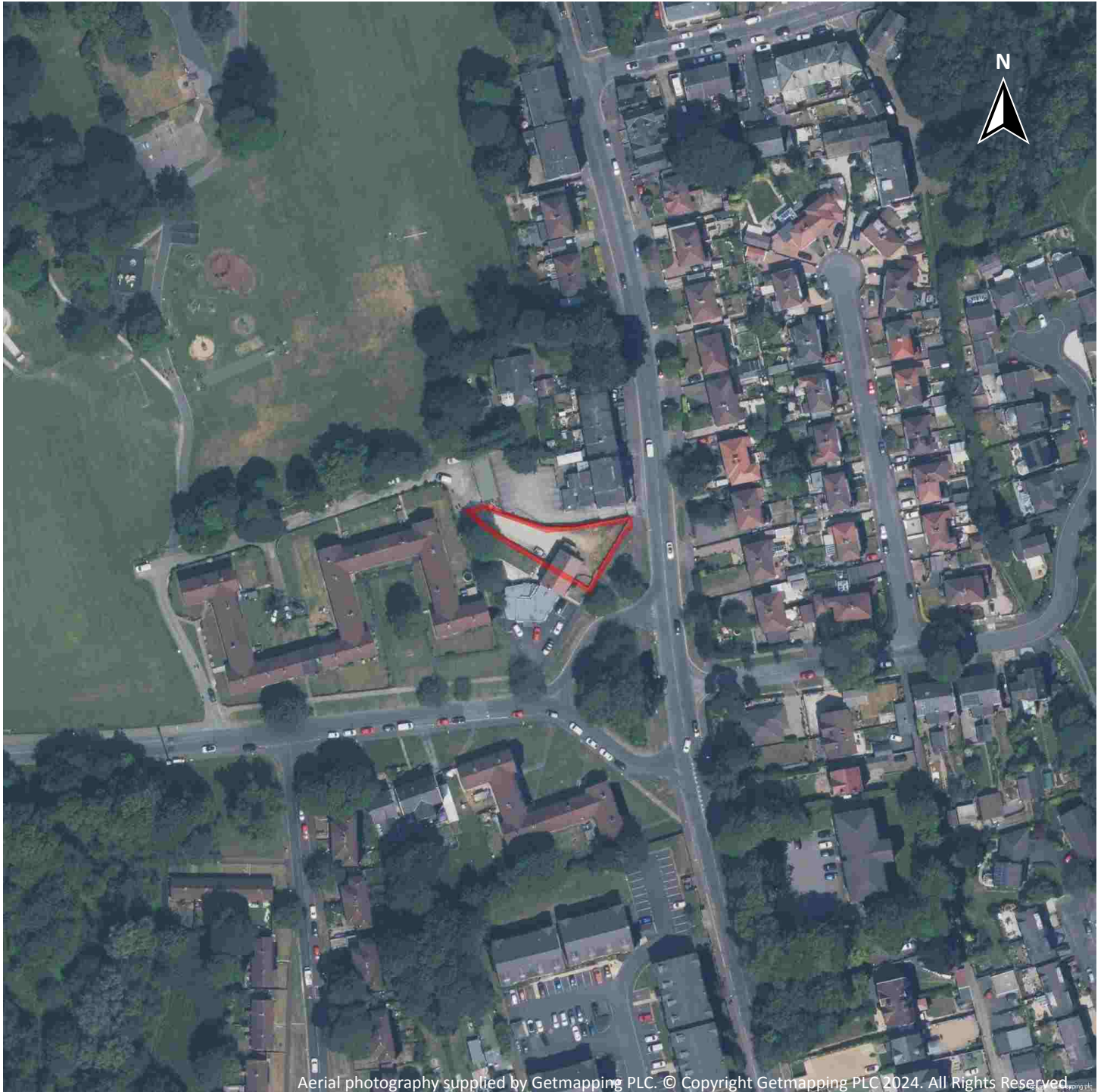


93	18.6	Non-coal mining	0	0	0	0	0
93	18.7	JPB mining areas	None (within 0m)				
93	18.8	The Coal Authority non-coal mining	0	0	0	0	-
94	18.9	Researched mining	0	0	0	0	-
94	18.10	Mining record office plans	0	0	0	0	-
94	18.11	BGS mine plans	0	0	0	0	-
94 >	18.12 >	Coal mining >	Identified (within 0m)				
95	18.13	Brine areas	None (within 0m)				
95	18.14	Gypsum areas	None (within 0m)				
95	18.15	Tin mining	None (within 0m)				
95	18.16	Clay mining	None (within 0m)				
Page	Section	Ground cavities and sinkholes	On site	0-50m	50-250m	250-500m	500-2000m
96	19.1	Natural cavities	0	0	0	0	-
96	19.2	Mining cavities	0	0	0	0	0
96	19.3	Reported recent incidents	0	0	0	0	-
96	19.4	Historical incidents	0	0	0	0	-
97	19.5	National karst database	0	0	0	0	-
Page	Section	Radon >					
98 >	20.1 >	Radon >	Less than 1% (within 0m)				
Page	Section	Soil chemistry >	On site	0-50m	50-250m	250-500m	500-2000m
100 >	21.1 >	BGS Estimated Background Soil Chemistry >	1	1	-	-	-
100	21.2	BGS Estimated Urban Soil Chemistry	0	0	-	-	-
100	21.3	BGS Measured Urban Soil Chemistry	0	0	-	-	-
Page	Section	Railway infrastructure and projects	On site	0-50m	50-250m	250-500m	500-2000m
101	22.1	Underground railways (London)	0	0	0	-	-
101	22.2	Underground railways (Non-London)	0	0	0	-	-
101	22.3	Railway tunnels	0	0	0	-	-
101	22.4	Historical railway and tunnel features	0	0	0	-	-
101	22.5	Royal Mail tunnels	0	0	0	-	-



102	22.6	Historical railways	0	0	0	-	-
102	22.7	Railways	0	0	0	-	-
102	22.8	Crossrail 2	0	0	0	0	-
102	22.9	HS2	0	0	0	0	-

Recent aerial photograph



Capture Date: 27/05/2023

Site Area: 0.06ha



Recent site history - 2019 aerial photograph



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Capture Date: 23/05/2019

Site Area: 0.06ha



Recent site history - 2012 aerial photograph



Capture Date: 26/03/2012

Site Area: 0.06ha



Recent site history - 2011 aerial photograph



Capture Date: 02/05/2011

Site Area: 0.06ha



Recent site history - 2000 aerial photograph



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Capture Date: 19/06/2000

Site Area: 0.06ha



OS MasterMap site plan

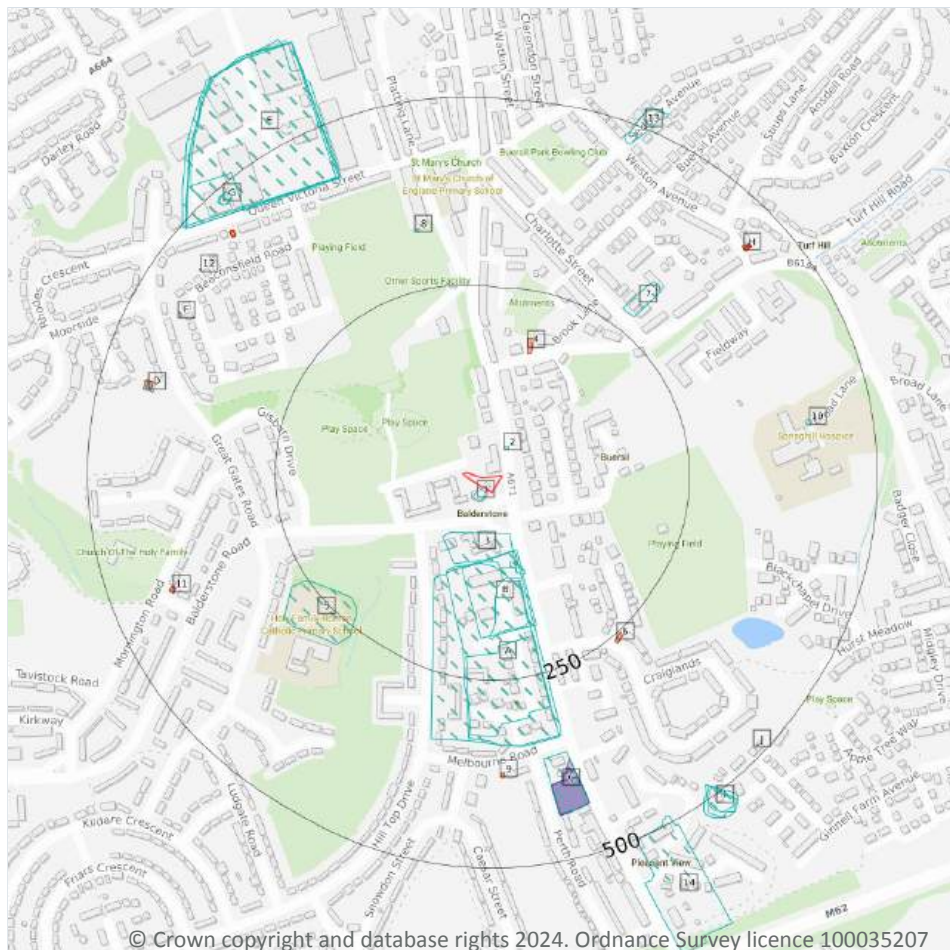


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Site Area: 0.06ha



1 Past land use



- Site Outline
- Search buffers in metres (m)
- Historical industrial land uses
- Historical tanks
- Historical energy features
- Historical garages

1.1 Historical industrial land uses

Records within 500m

27

Potentially contaminative land use features digitised from historical Ordnance Survey mapping at 1:10,000 and 1:10,560 scale, intelligently grouped into contiguous features. To prevent misrepresentation of the size of historical features at any given time, features are only grouped if they have similar geometries within immediately preceding or succeeding map editions. See section 2 for a breakdown of grouping if required. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use map on [page 15](#) >

ID	Location	Land use	Dates present	Group ID
1	4m S	Police Station	1967 - 1976	787658



ID	Location	Land use	Dates present	Group ID
2	35m NE	Pump	1851	682635
3	54m S	Unspecified Mill	1891	786555
A	83m S	Unspecified Mill	1954 - 1967	789612
B	83m S	Unspecified Mill	1976	744488
A	96m S	Unspecified Mill	1907 - 1938	732207
B	96m S	Woollen Mill	1851	657572
B	115m S	Unspecified Heap	1907	689056
A	199m S	Unspecified Mill	1891	767382
5	223m SW	Unspecified Heap	1976	688985
7	274m NE	Unspecified Pit	1908	676536
8	327m N	Pump	1851	682636
C	359m S	Garage	1967	673810
10	411m E	Pump	1851	682637
D	427m W	Electric Substation	1976	667161
E	427m NW	Unspecified Mill	1891	796985
E	428m NW	Unspecified Mill	1954	723481
F	428m NW	Unspecified Tank	1928 - 1938	750530
E	428m NW	Unspecified Mill	1967 - 1976	781619
E	429m NW	Unspecified Mill	1908 - 1938	773404
13	473m NE	Unspecified Pit	1928	676535
G	477m NW	Unspecified Heap	1928 - 1938	712462
G	478m NW	Unspecified Heap	1954	715443
I	482m SE	Unspecified Heap	1967	689057
I	486m SE	Refuse Heap	1928 - 1938	777368
I	489m SE	Refuse Heap	1954	798868
14	489m SE	Unspecified Mill	1954 - 1967	803636

This data is sourced from Ordnance Survey / Groundsure.



1.2 Historical tanks

Records within 500m

8

Tank features digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale, intelligently grouped into contiguous features. To prevent misrepresentation of the size of historical features at any given time, features are only grouped if they have similar geometries within immediately preceding or succeeding map editions. See section 2 for a breakdown of grouping if required. Grouped and the original ungrouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use map on [page 15 >](#)

ID	Location	Land use	Dates present	Group ID
A	280m S	Unspecified Tank	1890	84759
F	433m NW	Unspecified Tank	1930	87649
12	442m NW	Unspecified Tank	1930	87648
J	487m SE	Unspecified Tank	1956	97090
J	487m SE	Unspecified Tank	1970	97574
J	487m SE	Unspecified Tank	1966	95306
J	487m SE	Unspecified Tank	1955	96693
J	487m SE	Unspecified Tank	1977	100122

This data is sourced from Ordnance Survey / Groundsure.

1.3 Historical energy features

Records within 500m

12

Energy features digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale, intelligently grouped into contiguous features. To prevent misrepresentation of the size of historical features at any given time, features are only grouped if they have similar geometries within immediately preceding or succeeding map editions. See section 2 for a breakdown of grouping if required. Grouped and the original ungrouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use map on [page 15 >](#)

ID	Location	Land use	Dates present	Group ID
B	98m S	Electricity Substation	1990	47983
4	165m N	Electricity Substation	1990	47697
6	253m SE	Electricity Substation	1996	47977



ID	Location	Land use	Dates present	Group ID
9	373m S	Electricity Substation	1978 - 1988	56423
11	412m W	Electricity Substation	1955 - 1992	63623
D	430m W	Electricity Substation	1971 - 1992	63862
G	438m NW	Electricity Substation	1973 - 1988	55046
G	438m NW	Electricity Substation	1994 - 1996	50304
H	441m NE	Electricity Substation	1980	62226
H	443m NE	Electricity Substation	1956	57486
H	446m NE	Electricity Substation	1990	61229
H	446m NE	Electricity Substation	1955	63369

This data is sourced from Ordnance Survey / Groundsure.

1.4 Historical petrol stations

Records within 500m

0

Petrol stations digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale, intelligently grouped into contiguous features. To prevent misrepresentation of the size of historical features at any given time, features are only grouped if they have similar geometries within immediately preceding or succeeding map editions. See section 2 for a breakdown of grouping if required. Grouped and the original ungrouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

This data is sourced from Ordnance Survey / Groundsure.

1.5 Historical garages

Records within 500m

6

Garages digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale, intelligently grouped into contiguous features. To prevent misrepresentation of the size of historical features at any given time, features are only grouped if they have similar geometries within immediately preceding or succeeding map editions. See section 2 for a breakdown of grouping if required. Grouped and the original ungrouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use map on [page 15 >](#)

ID	Location	Land use	Dates present	Group ID
C	371m S	Garage	1996	20761
C	380m S	Garage	1955	17341



ID	Location	Land use	Dates present	Group ID
C	381m S	Garage	1966	21165
C	384m S	Garage	1977	20079
C	395m S	Garage	1970	16689
C	395m S	Garage	1956	18799

This data is sourced from Ordnance Survey / Groundsure.

1.6 Historical military land

Records within 500m

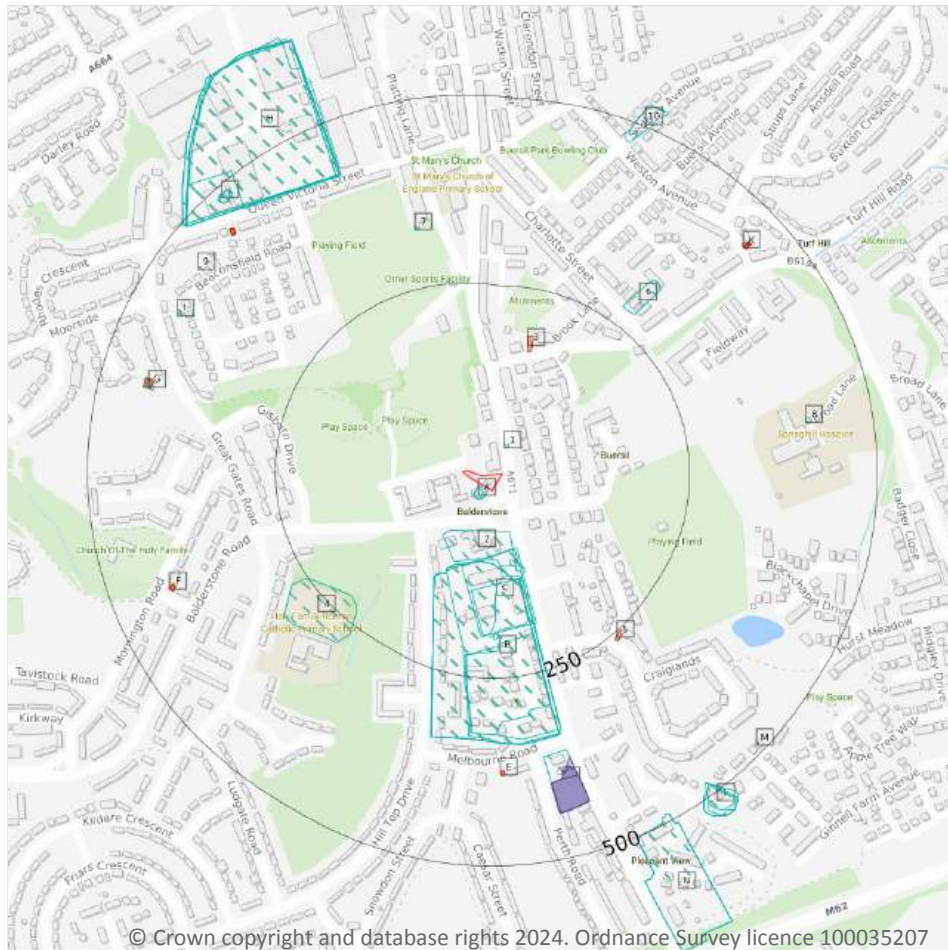
0

Areas of military land digitised from multiple sources including the National Archives, local records, MOD records and verified other sources, intelligently grouped into contiguous features.

This data is sourced from Ordnance Survey / Groundsure / other sources.



2 Past land use - un-grouped



- Site Outline
- Search buffers in metres (m)
- Historical industrial land uses
- Historical tanks
- Historical energy features
- Historical garages

2.1 Historical industrial land uses

Records within 500m

38

Potentially contaminative land use features digitised from historical Ordnance Survey mapping at 1:10,000 and 10,560 scale. Any records shown are available intelligently grouped in section 1. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use - un-grouped map on [page 20](#) >

ID	Location	Land Use	Date	Group ID
A	4m S	Police Station	1976	787658
A	7m SW	Police Station	1967	787658
1	35m NE	Pump	1851	682635



ID	Location	Land Use	Date	Group ID
2	54m S	Unspecified Mill	1891	786555
B	83m S	Unspecified Mill	1967	789612
C	83m S	Unspecified Mill	1976	744488
B	96m S	Unspecified Mill	1938	732207
B	96m S	Unspecified Mill	1928	732207
B	96m S	Unspecified Mill	1907	732207
C	96m S	Woollen Mill	1851	657572
C	115m S	Unspecified Heap	1907	689056
B	122m S	Unspecified Mill	1954	789612
B	199m S	Unspecified Mill	1891	767382
4	223m SW	Unspecified Heap	1976	688985
6	274m NE	Unspecified Pit	1908	676536
7	327m N	Pump	1851	682636
D	359m S	Garage	1967	673810
8	411m E	Pump	1851	682637
G	427m W	Electric Substation	1976	667161
H	427m NW	Unspecified Mill	1891	796985
H	428m NW	Unspecified Mill	1954	723481
I	428m NW	Unspecified Tank	1938	750530
I	428m NW	Unspecified Tank	1928	750530
H	428m NW	Unspecified Mill	1976	781619
H	428m NW	Unspecified Mill	1967	781619
H	429m NW	Unspecified Mill	1938	773404
H	429m NW	Unspecified Mill	1928	773404
H	429m NW	Unspecified Mill	1908	773404
10	473m NE	Unspecified Pit	1928	676535
J	477m NW	Unspecified Heap	1938	712462
J	477m NW	Unspecified Heap	1928	712462



ID	Location	Land Use	Date	Group ID
J	478m NW	Unspecified Heap	1954	715443
L	482m SE	Unspecified Heap	1967	689057
L	486m SE	Refuse Heap	1938	777368
L	486m SE	Refuse Heap	1928	777368
L	489m SE	Refuse Heap	1954	798868
N	489m SE	Unspecified Mill	1967	803636
N	489m SE	Unspecified Mill	1954	803636

This data is sourced from Ordnance Survey / Groundsure.

2.2 Historical tanks

Records within 500m

8

Tank features digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale. Any records shown are available intelligently grouped in section 1. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use - un-grouped map on [page 20 >](#)

ID	Location	Land Use	Date	Group ID
B	280m S	Unspecified Tank	1890	84759
I	433m NW	Unspecified Tank	1930	87649
9	442m NW	Unspecified Tank	1930	87648
M	487m SE	Unspecified Tank	1956	97090
M	487m SE	Unspecified Tank	1970	97574
M	487m SE	Unspecified Tank	1977	100122
M	487m SE	Unspecified Tank	1955	96693
M	487m SE	Unspecified Tank	1966	95306

This data is sourced from Ordnance Survey / Groundsure.



2.3 Historical energy features

Records within 500m

21

Energy features digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale. Any records shown are available intelligently grouped in section 1. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use - un-grouped map on [page 20](#) >

ID	Location	Land Use	Date	Group ID
C	98m S	Electricity Substation	1990	47983
3	165m N	Electricity Substation	1990	47697
5	253m SE	Electricity Substation	1996	47977
E	373m S	Electricity Substation	1978	56423
E	373m S	Electricity Substation	1988	56423
F	412m W	Electricity Substation	1956	63623
F	412m W	Electricity Substation	1992	63623
F	412m W	Electricity Substation	1971	63623
F	412m W	Electricity Substation	1955	63623
G	430m W	Electricity Substation	1971	63862
G	430m W	Electricity Substation	1992	63862
J	438m NW	Electricity Substation	1985	55046
J	438m NW	Electricity Substation	1988	55046
J	438m NW	Electricity Substation	1996	50304
J	438m NW	Electricity Substation	1994	50304
J	439m NW	Electricity Substation	1973	55046
K	441m NE	Electricity Substation	1980	62226
K	443m NE	Electricity Substation	1956	57486
K	446m NE	Electricity Substation	1990	61229
K	446m NE	Electricity Substation	1955	63369
K	448m NE	Electricity Substation	1955	63369

This data is sourced from Ordnance Survey / Groundsure.



2.4 Historical petrol stations

Records within 500m**0**

Petrol stations digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale. Any records shown are available intelligently grouped in section 1. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

This data is sourced from Ordnance Survey / Groundsure.

2.5 Historical garages

Records within 500m**6**

Garages digitised from historical Ordnance Survey mapping at high-detail 1:1,250 and 1:2,500 scale. Any records shown are available intelligently grouped in section 1. Grouped and the original un-grouped features can be cross-referenced across sections 1 and 2 using the 'Group ID'.

Features are displayed on the Past land use - un-grouped map on [page 20 >](#)

ID	Location	Land Use	Date	Group ID
D	371m S	Garage	1996	20761
D	380m S	Garage	1955	17341
D	381m S	Garage	1966	21165
D	384m S	Garage	1977	20079
D	395m S	Garage	1956	18799
D	395m S	Garage	1970	16689

This data is sourced from Ordnance Survey / Groundsure.



3 Waste and landfill



- Site Outline
- Search buffers in metres (m)
- Waste exemptions

3.1 Active or recent landfill

Records within 500m

0

Active or recently closed landfill sites under Environment Agency/Natural Resources Wales regulation.

This data is sourced from the Environment Agency and Natural Resources Wales.

3.2 Historical landfill (BGS records)

Records within 500m

0

Landfill sites identified on a survey carried out on behalf of the DoE in 1973. These sites may have been closed or operational at this time.

This data is sourced from the British Geological Survey.



3.3 Historical landfill (LA/mapping records)

Records within 500m

0

Landfill sites identified from Local Authority records and high detail historical mapping.

This data is sourced from the Ordnance Survey/Groundsure and Local Authority records.

3.4 Historical landfill (EA/NRW records)

Records within 500m

0

Known historical (closed) landfill sites (e.g. sites where there is no PPC permit or waste management licence currently in force). This includes sites that existed before the waste licensing regime and sites that have been licensed in the past but where a licence has been revoked, ceased to exist or surrendered and a certificate of completion has been issued.

This data is sourced from the Environment Agency and Natural Resources Wales.

3.5 Historical waste sites

Records within 500m

0

Waste site records derived from Local Authority planning records and high detail historical mapping.

This data is sourced from Ordnance Survey/Groundsure and Local Authority records.

3.6 Licensed waste sites

Records within 500m

0

Active or recently closed waste sites under Environment Agency/Natural Resources Wales regulation.

This data is sourced from the Environment Agency and Natural Resources Wales.

3.7 Waste exemptions

Records within 500m

3

Activities involving the storage, treatment, use or disposal of waste that are exempt from needing a permit. Exemptions have specific limits and conditions that must be adhered to.

Features are displayed on the Waste and landfill map on [page 25 >](#)

ID	Location	Site	Reference	Category	Sub-Category	Description
1	393m E	Broad Lane, Rochdale, OL16 4pz	WEX383696	Treating waste exemption	Not on a farm	Sorting and de-naturing of controlled drugs for disposal

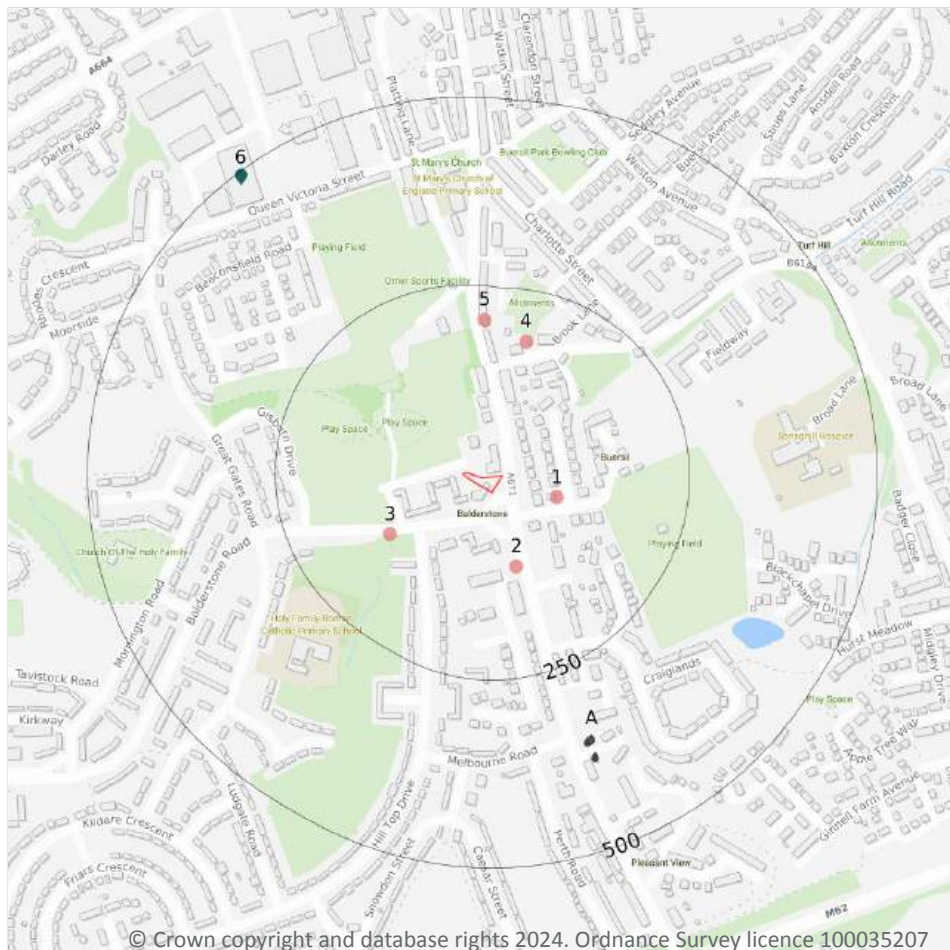


ID	Location	Site	Reference	Category	Sub-Category	Description
2	467m N	497, Oldham Road, Rochdale, OL16 4tf	WEX298871	Treating waste exemption	Not on a farm	Sorting and de-naturing of controlled drugs for disposal
3	487m SE	Dean Farm, Badger Lane, Rochdale, OL16 4rq	WEX134175	Using waste exemption	Not on a farm	Use of waste in construction

This data is sourced from the Environment Agency and Natural Resources Wales.



4 Current industrial land use



- Site Outline
- Search buffers in metres (m)
- Recent industrial land uses
- Licensed pollutant release (Part A(2)/B)
- Licensed Discharges to controlled waters

4.1 Recent industrial land uses

Records within 250m

5

Current potentially contaminative industrial sites.

Features are displayed on the Current industrial land use map on [page 28 >](#)

ID	Location	Company	Address	Activity	Category
1	78m E	Diamond Packaging	3, Crompton Avenue, Rochdale, Greater Manchester, OL16 4PB	Packaging	Industrial Products
2	104m S	Electricity Sub Station	Greater Manchester, OL11	Electrical Features	Infrastructure and Facilities



ID	Location	Company	Address	Activity	Category
3	126m SW	Mast (Telecommu nication)	Greater Manchester, OL11	Telecommunications Features	Infrastructure and Facilities
4	182m N	Electricity Sub Station	Greater Manchester, OL16	Electrical Features	Infrastructure and Facilities
5	205m N	Air Quality Control	Rochdale Merit 585, Oldham Road, Rochdale, Greater Manchester, OL16 4SU	Construction Completion Services	Construction Services

This data is sourced from Ordnance Survey.

4.2 Current or recent petrol stations

Records within 500m	0
----------------------------	----------

Open, closed, under development and obsolete petrol stations.

This data is sourced from Experian.

4.3 Electricity cables

Records within 500m	0
----------------------------	----------

High voltage underground electricity transmission cables.

This data is sourced from National Grid.

4.4 Gas pipelines

Records within 500m	0
----------------------------	----------

High pressure underground gas transmission pipelines.

This data is sourced from National Grid.

4.5 Sites determined as Contaminated Land

Records within 500m	0
----------------------------	----------

Contaminated Land Register of sites designated under Part 2a of the Environmental Protection Act 1990.

This data is sourced from Local Authority records.

4.6 Control of Major Accident Hazards (COMAH)

Records within 500m**0**

Control of Major Accident Hazards (COMAH) sites. This data includes upper and lower tier sites, and includes a historical archive of COMAH sites and Notification of Installations Handling Hazardous Substances (NIHHS) records.

This data is sourced from the Health and Safety Executive.

4.7 Regulated explosive sites

Records within 500m**0**

Sites registered and licensed by the Health and Safety Executive under the Manufacture and Storage of Explosives Regulations 2005 (MSER). The last update to this data was in April 2011.

This data is sourced from the Health and Safety Executive.

4.8 Hazardous substance storage/usage

Records within 500m**0**

Consents granted for a site to hold certain quantities of hazardous substances at or above defined limits in accordance with the Planning (Hazardous Substances) Regulations 2015.

This data is sourced from Local Authority records.

4.9 Historical licensed industrial activities (IPC)

Records within 500m**0**

Integrated Pollution Control (IPC) records of substance releases to air, land and water. This data represents a historical archive as the IPC regime has been superseded.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.10 Licensed industrial activities (Part A(1))

Records within 500m**0**

Records of Part A(1) installations regulated under the Environmental Permitting (England and Wales) Regulations 2016 for the release of substances to the environment.

This data is sourced from the Environment Agency and Natural Resources Wales.



4.11 Licensed pollutant release (Part A(2)/B)

Records within 500m

1

Records of Part A(2) and Part B installations regulated under the Environmental Permitting (England and Wales) Regulations 2016 for the release of substances to the environment.

Features are displayed on the Current industrial land use map on [page 28 >](#)

ID	Location	Address	Details	
6	493m NW	Commercial Contract Engineers, Eagle Technology Park, Eagle Way, Queensway, Rochdale, Lancashire, OL11 1TQ	Process: Respraying of Road Vehicles Status: Current Permit Permit Type: Part B	Enforcement: No Enforcements Notified Date of enforcement: No Enforcements Notified Comment: No Enforcements Notified

This data is sourced from Local Authority records.

4.12 Radioactive Substance Authorisations

Records within 500m

0

Records of the storage, use, accumulation and disposal of radioactive substances regulated under the Radioactive Substances Act 1993.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.13 Licensed Discharges to controlled waters

Records within 500m

4

Discharges of treated or untreated effluent to controlled waters under the Water Resources Act 1991.

Features are displayed on the Current industrial land use map on [page 28 >](#)

ID	Location	Address	Details	
A	353m S	OLDHAM ROAD CSO 35027, 705 OLDHAM ROAD, ROCHDALE, GREATER MANCHESTER, OL16 4RH	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01ROC0093 Permit Version: 4 Receiving Water: CLVRT SEC OF SUDDEN BROOK	Status: VARIED UNDER EPR 2010 Issue date: 29/05/2018 Effective Date: 29/05/2018 Revocation Date: -



ID	Location	Address	Details	
A	355m S	OLDHAM ROAD CSO 35027, 705 OLDHAM ROAD, ROCHDALE, GREATER MANCHESTER, OL16 4RH	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01ROC0093 Permit Version: 3 Receiving Water: CULVERTED SECTION OF SUDDEN BR	Status: MODIFIED - (WRA 91 SCHED 10 - AS AMENDED BY ENV ACT 1995) Issue date: 23/06/2004 Effective Date: 23/06/2004 Revocation Date: 28/05/2018
A	378m S	OLDHAM ROAD CSO 35027, 705 OLDHAM ROAD, ROCHDALE, GREATER MANCHESTER, OL16 4RH	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01ROC0093 Permit Version: 1 Receiving Water: -	Status: REVOKED - UNSPECIFIED Issue date: - Effective Date: 01/04/1991 Revocation Date: 31/12/1994
A	378m S	OLDHAM ROAD CSO 35027, 705 OLDHAM ROAD, ROCHDALE, GREATER MANCHESTER, OL16 4RH	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01ROC0093 Permit Version: 2 Receiving Water: SUDDEN BROOK	Status: CONSENT REVOKED OR REVISED - NEW CONSENT ISSUED (37(1)) Issue date: - Effective Date: 01/01/1995 Revocation Date: 22/06/2004

This data is sourced from the Environment Agency and Natural Resources Wales.

4.14 Pollutant release to surface waters (Red List)

Records within 500m	0
----------------------------	----------

Discharges of specified substances under the Environmental Protection (Prescribed Processes and Substances) Regulations 1991.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.15 Pollutant release to public sewer

Records within 500m	0
----------------------------	----------

Discharges of Special Category Effluents to the public sewer.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.16 List 1 Dangerous Substances

Records within 500m	0
----------------------------	----------

Discharges of substances identified on List I of European Directive E 2006/11/EC, and regulated under the Environmental Damage (Prevention and Remediation) Regulations 2015.

This data is sourced from the Environment Agency and Natural Resources Wales.



4.17 List 2 Dangerous Substances

Records within 500m**0**

Discharges of substances identified on List II of European Directive E 2006/11/EC, and regulated under the Environmental Damage (Prevention and Remediation) Regulations 2015.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.18 Pollution Incidents (EA/NRW)

Records within 500m**0**

Records of substantiated pollution incidents. Since 2006 this data has only included category 1 (major) and 2 (significant) pollution incidents.

This data is sourced from the Environment Agency and Natural Resources Wales.

4.19 Pollution inventory substances

Records within 500m**0**

The pollution inventory (substances) includes reporting on annual emissions of certain regulated substances to air, controlled waters and land. A reporting threshold for each substance is also included. Where emissions fall below the reporting threshold, no value will be given. The data is given for the most recent complete year available.

This data is sourced from the Environment Agency and the Scottish Environment Protection Agency.

4.20 Pollution inventory waste transfers

Records within 500m**0**

The pollution inventory (waste transfers) includes reporting on annual transfers and recovery/disposal of controlled wastes from a site. A reporting threshold for each waste type is also included. Where releases fall below the reporting threshold, no value will be given. The data is given for the most recent complete year available.

This data is sourced from the Environment Agency and the Scottish Environment Protection Agency.

4.21 Pollution inventory radioactive waste

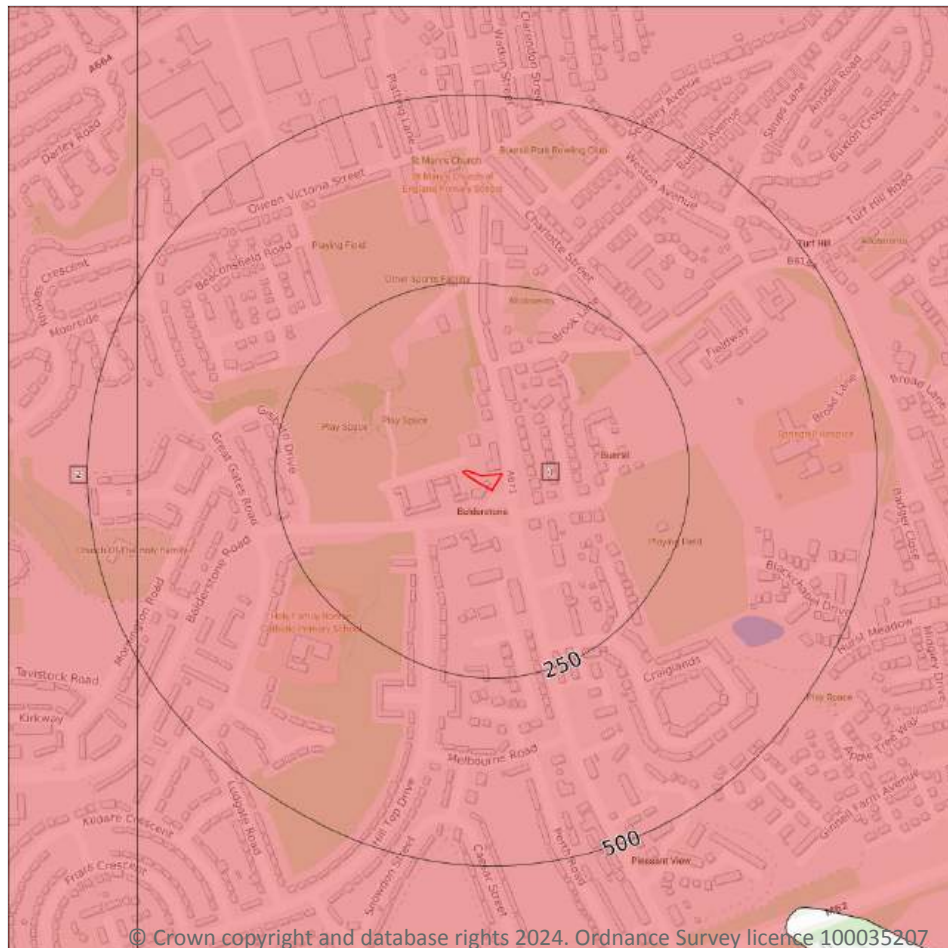
Records within 500m**0**

The pollution inventory (radioactive wastes) includes reporting on annual releases of radioactive substances from a site, including the means of release. Where releases fall below the reporting threshold, no value will be given. The data is given for the most recent complete year available.

This data is sourced from the Environment Agency and the Scottish Environment Protection Agency.



5 Hydrogeology - Superficial aquifer



- Site Outline
- Search buffers in metres (m)
- Principal
 - Secondary A
 - Secondary B
 - Secondary Undifferentiated
 - Unproductive
 - Unknown

5.1 Superficial aquifer

Records within 500m

2

Aquifer status of groundwater held within superficial geology.

Features are displayed on the Hydrogeology map on [page 34](#) >

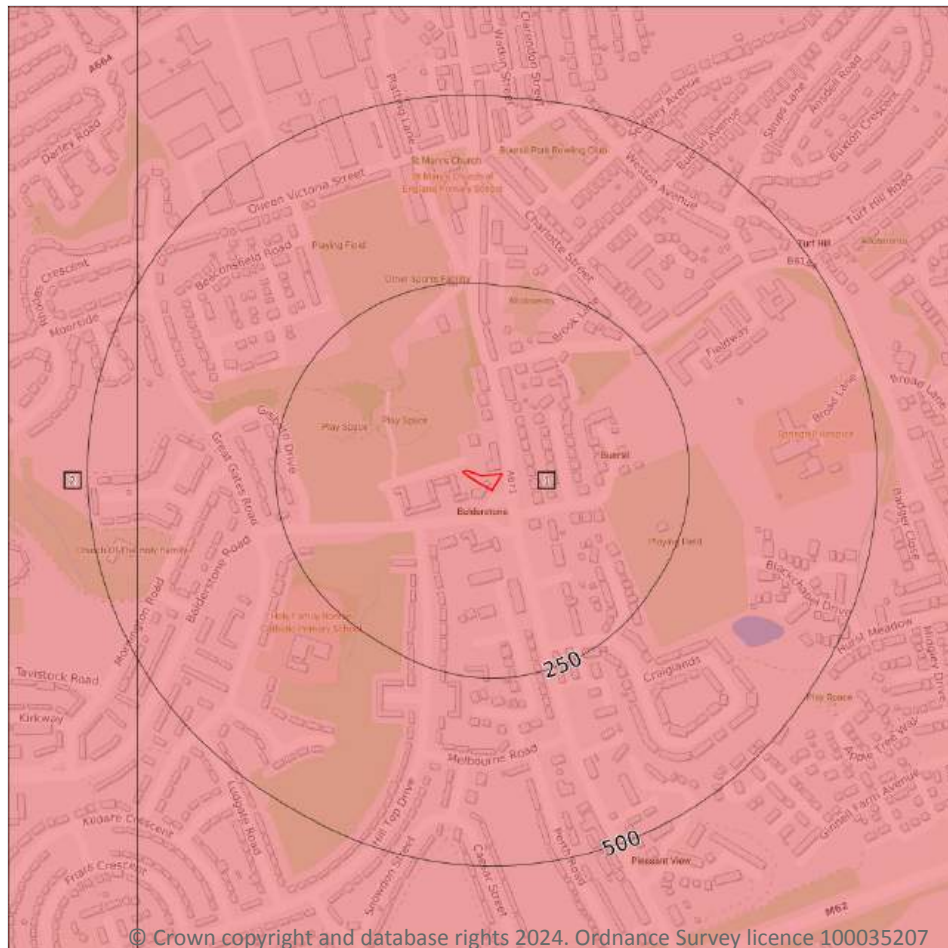
ID	Location	Designation	Description
1	On site	Secondary A	Permeable layers capable of supporting water supplies at a local rather than strategic scale, and in some cases forming an important source of base flow to rivers. These are generally aquifers formerly classified as minor aquifers
2	434m W	Secondary A	Permeable layers capable of supporting water supplies at a local rather than strategic scale, and in some cases forming an important source of base flow to rivers. These are generally aquifers formerly classified as minor aquifers



This data is sourced from the British Geological Survey, the Environment Agency and Natural Resources Wales.



Bedrock aquifer



- Site Outline
- Search buffers in metres (m)
- Principal
 - Secondary A
 - Secondary B
 - Secondary Undifferentiated
 - Unproductive

5.2 Bedrock aquifer

Records within 500m

2

Aquifer status of groundwater held within bedrock geology.

Features are displayed on the Bedrock aquifer map on [page 36](#) >

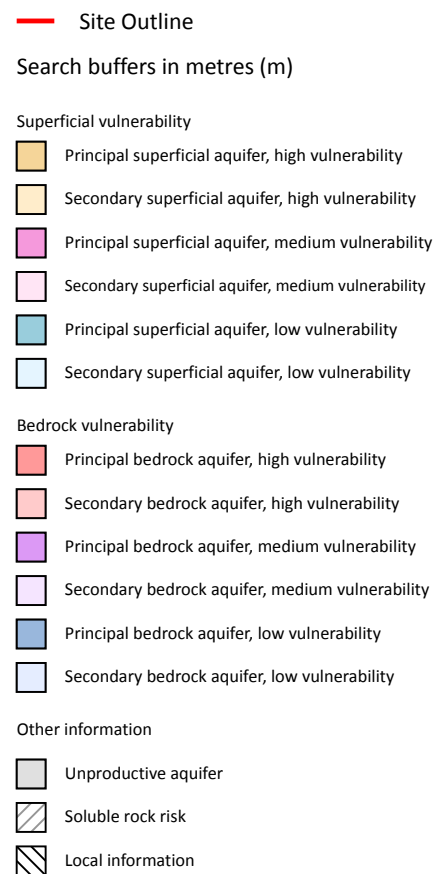
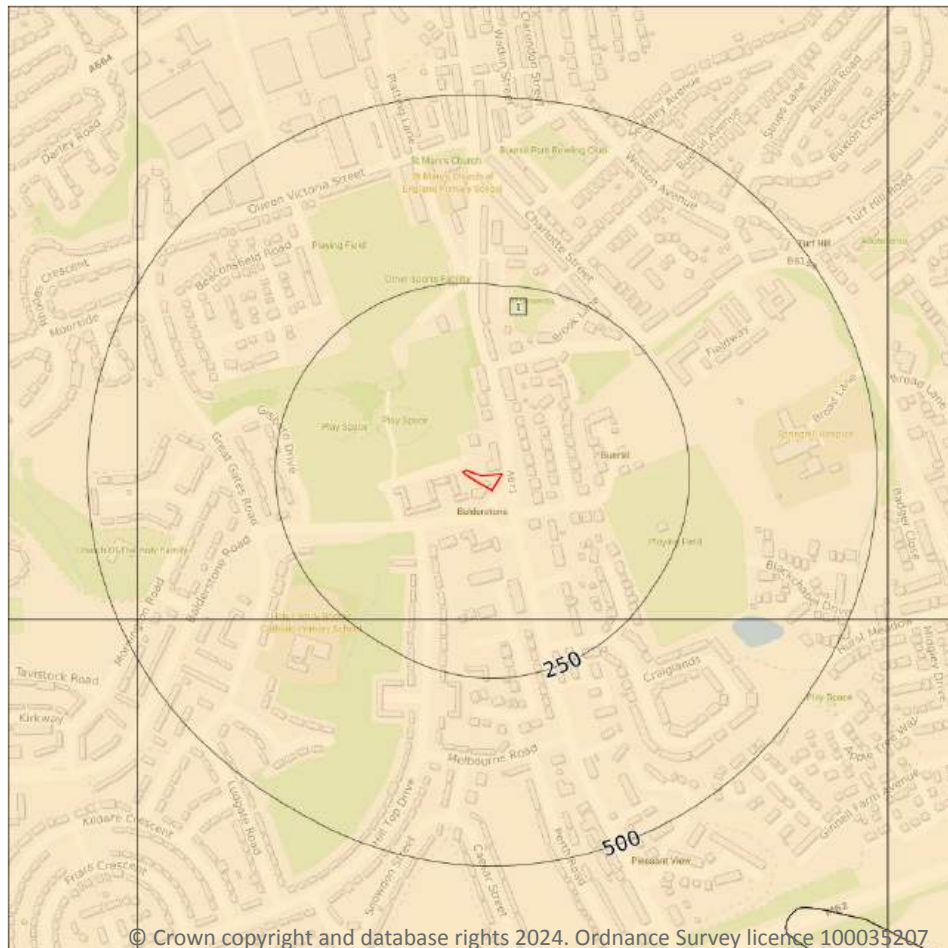
ID	Location	Designation	Description
1	On site	Secondary A	Permeable layers capable of supporting water supplies at a local rather than strategic scale, and in some cases forming an important source of base flow to rivers. These are generally aquifers formerly classified as minor aquifers
2	434m W	Secondary A	Permeable layers capable of supporting water supplies at a local rather than strategic scale, and in some cases forming an important source of base flow to rivers. These are generally aquifers formerly classified as minor aquifers



This data is sourced from the British Geological Survey, the Environment Agency and Natural Resources Wales.



Groundwater vulnerability



5.3 Groundwater vulnerability

Records within 50m

1

An assessment of the vulnerability of groundwater to a pollutant discharged at ground level based on the hydrological, geological, hydrogeological and soil properties within a one kilometre square grid. Groundwater vulnerability is described as High, Medium or Low as follows:

- High - Areas able to easily transmit pollution to groundwater. They are likely to be characterised by high leaching soils and the absence of low permeability superficial deposits.
- Medium - Intermediate between high and low vulnerability.
- Low - Areas that provide the greatest protection from pollution. They are likely to be characterised by low leaching soils and/or the presence of superficial deposits characterised by a low permeability.

Features are displayed on the Groundwater vulnerability map on [page 38](#) >



ID	Location	Summary	Soil / surface	Superficial geology	Bedrock geology
1	On site	Summary Classification: Secondary superficial aquifer - High Vulnerability Combined classification: Productive Bedrock Aquifer, Productive Superficial Aquifer	Leaching class: High Infiltration value: >70% Dilution value: >550mm/year	Vulnerability: High Aquifer type: Secondary Thickness: >10m Patchiness value: >90% Recharge potential: High	Vulnerability: Low Aquifer type: Secondary Flow mechanism: Well connected fractures

This data is sourced from the British Geological Survey, the Environment Agency and Natural Resources Wales.

5.4 Groundwater vulnerability- soluble rock risk

Records on site

0

This dataset identifies areas where solution features that enable rapid movement of a pollutant may be present within a 1km grid square.

This data is sourced from the British Geological Survey and the Environment Agency.

5.5 Groundwater vulnerability- local information

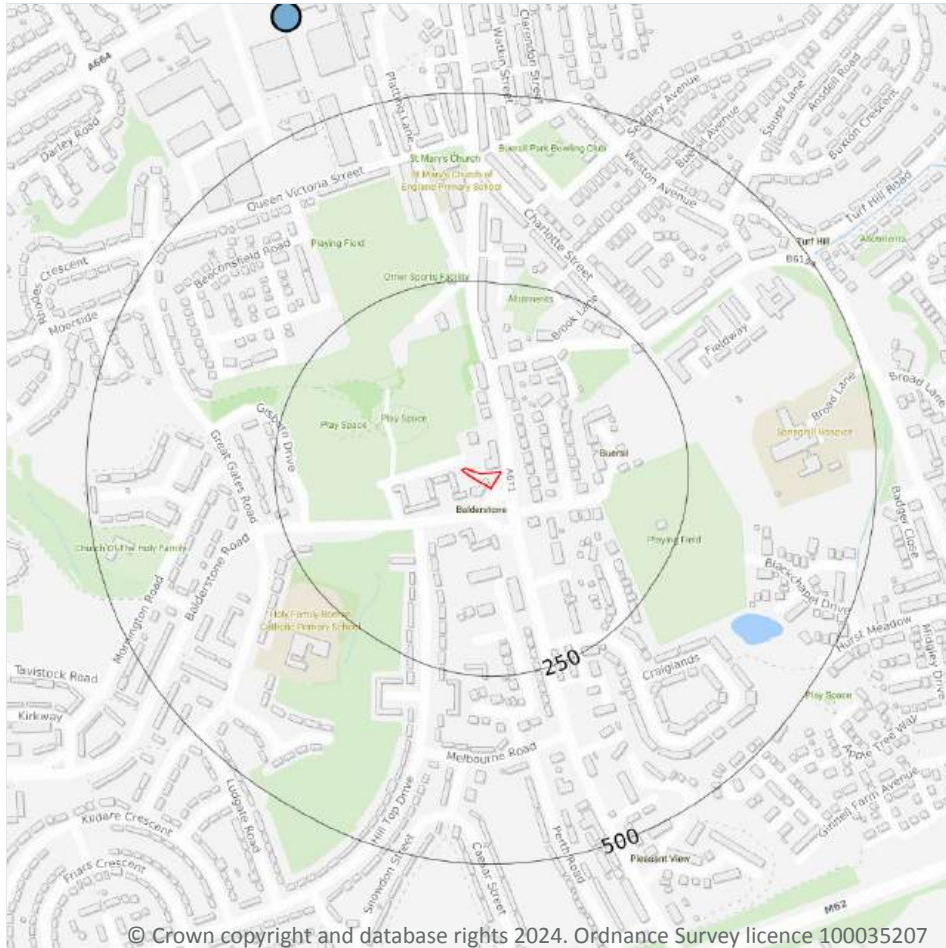
Records on site

0

This dataset identifies areas where additional local information affecting vulnerability is held by the Environment Agency. Further information can be obtained by contacting the Environment Agency local Area groundwater team through the Environment Agency National Customer Call Centre on 03798 506 506 or by email on enquiries@environment-agency.gov.uk ↗.

This data is sourced from the British Geological Survey and the Environment Agency.

Abstractions and Source Protection Zones



- Site Outline
- Search buffers in metres (m)**
- Source Protection Zone 1
Inner catchment
- Source Protection Zone 2
Outer catchment
- Source Protection Zone 3
Total catchment
- Source Protection Zone 4
Zone of Special Interest
- Source Protection Zone 1c
Inner catchment - confined aquifer
- Source Protection Zone 2c
Outer catchment - confined aquifer
- Source Protection Zone 3c
Total catchment - confined aquifer
- Drinking water abstraction licences
Polygon features
- Drinking water abstraction licences
Linear features
- Groundwater abstraction licence (point)
- Groundwater abstraction licence (area)
- Groundwater abstraction licence (linear)
- Surface Water Abstractions (point)
- Surface Water Abstractions (area)
- Surface Water Abstractions (linear)

5.6 Groundwater abstractions

Records within 2000m

9

Licensed groundwater abstractions for sites extracting more than 20 cubic metres of water a day and includes active and historical records. The data may be for a single abstraction point, between two points (line data) or a larger area.

Features are displayed on the Abstractions and Source Protection Zones map on [page 40 >](#)



ID	Location	Details	
-	964m E	Status: Historical Licence No: 2569002060 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: "WELL AT CASTLE FARM, LOWER LANE, MILNROW" Data Type: Point Name: SANDERSON Easting: 391400 Northing: 411500	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 11/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 11/02/1966 Version End Date: -
-	964m E	Status: Historical Licence No: 2569002060 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: WELL AT CASTLE FARM, LOWER LANE, MILNROW Data Type: Point Name: SANDERSON Easting: 391400 Northing: 411500	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 11/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 11/02/1966 Version End Date: -
-	1000m NE	Status: Historical Licence No: 2569002159 Details: General Farming & Domestic Direct Source: Ground Water - North West Region Point: "WELL AT FARM, LOWER LANE, MILNROW, ROCHDALE" Data Type: Point Name: HARTLE Easting: 391400 Northing: 411600	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/02/1966 Version End Date: -
-	1000m NE	Status: Historical Licence No: 2569002159 Details: General Farming & Domestic Direct Source: Ground Water - North West Region Point: WELL AT FARM, LOWER LANE, MILNROW, ROCHDALE Data Type: Point Name: HARTLE Easting: 391400 Northing: 411600	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/02/1966 Version End Date: -



ID	Location	Details	
-	1000m NE	Status: Historical Licence No: 2569002159 Details: General Farming & Domestic Direct Source: Ground Water - North West Region Point: WELL AT FARM LOWER LANE MILNROW ROCHDALE Data Type: Point Name: HARTLE Easting: 391400 Northing: 411600	Annual Volume (m ³): 5123.34 Max Daily Volume (m ³): 31.822 Original Application No: - Original Start Date: 01/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/04/2007 Version End Date: -
-	1317m E	Status: Historical Licence No: 2569002086 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: "WELL AT BROADSHAW FARM, MILNROW, ROCHDALE" Data Type: Point Name: CROSTON Easting: 391800 Northing: 411100	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 02/02/1966 Version End Date: -
-	1317m E	Status: Historical Licence No: 2569002086 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: WELL AT BROADSHAW FARM, MILNROW, ROCHDALE Data Type: Point Name: CROSTON Easting: 391800 Northing: 411100	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 02/02/1966 Version End Date: -
-	1813m E	Status: Historical Licence No: 2569002204 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: "BOREHOLE AT PREMISES, OLD BARN FARM,BURNEDGE, ROCHDALE" Data Type: Point Name: CRYER Easting: 392200 Northing: 410600	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 24/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 24/04/1969 Version End Date: -



ID	Location	Details	
-	1813m E	Status: Historical Licence No: 2569002204 Details: General use relating to Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE AT PREMISES, OLD BARN FARM, BURNEDGE, ROCHDALE Data Type: Point Name: CRYER Easting: 392200 Northing: 410600	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 24/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 24/04/1969 Version End Date: -

This data is sourced from the Environment Agency and Natural Resources Wales.

5.7 Surface water abstractions

Records within 2000m

7

Licensed surface water abstractions for sites extracting more than 20 cubic metres of water a day and includes active and historical records. The data may be for a single abstraction point, a stretch of watercourse or a larger area.

Features are displayed on the Abstractions and Source Protection Zones map on [page 40 >](#)

ID	Location	Details	
A	647m NW	Status: Historical Licence No: 2569002178 Details: Boiler Feed Direct Source: "Surface, Non-Tidal - North West Region" Point: "CATCHPIT FED BY SURFACE DRAINAGE AT PREMISES, ROCHDALE" Data Type: Point Name: DUNPHY COMBUSTION LTD. Easting: 390200 Northing: 411800	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 18/02/1966 Expiry Date: - Issue No: 101 Version Start Date: 12/02/1991 Version End Date: -
A	647m NW	Status: Historical Licence No: 2569002178 Details: Boiler Feed Direct Source: Surface, Non-Tidal - North West Region Point: CATCHPIT FED BY SURFACE DRAINAGE AT PREMISES, ROCHDALE Data Type: Point Name: DUNPHY COMBUSTION LTD Easting: 390200 Northing: 411800	Annual Volume (m ³): 2318.46 Max Daily Volume (m ³): 34.09 Original Application No: CW 1093 Original Start Date: 18/02/1966 Expiry Date: - Issue No: 101 Version Start Date: 12/02/1991 Version End Date: -



ID	Location	Details	
-	846m NW	Status: Historical Licence No: 2569002107 Details: Boiler Feed Direct Source: "Surface, Non-Tidal - North West Region" Point: "ROCHDALE CANAL AT QUEENSWAY,ROCHDALE" Data Type: Point Name: SEALOCRETE PLA LTD Easting: 390070 Northing: 411960	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 20/12/1993 Version End Date: -
-	846m NW	Status: Historical Licence No: 2569002107 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: "Surface, Non-Tidal - North West Region" Point: "ROCHDALE CANAL AT QUEENSWAY,ROCHDALE" Data Type: Point Name: SEALOCRETE PLA LTD Easting: 390070 Northing: 411960	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 20/12/1993 Version End Date: -
-	846m NW	Status: Historical Licence No: 2569002107 Details: Boiler Feed Direct Source: Surface, Non-Tidal - North West Region Point: ROCHDALE CANAL AT QUEENSWAY,ROCHDALE Data Type: Point Name: SEALOCRETE PLA LTD Easting: 390070 Northing: 411960	Annual Volume (m ³): 10455.8 Max Daily Volume (m ³): 45.46 Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/04/2008 Version End Date: -
-	846m NW	Status: Historical Licence No: 2569002107 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Surface, Non-Tidal - North West Region Point: ROCHDALE CANAL AT QUEENSWAY,ROCHDALE Data Type: Point Name: SEALOCRETE PLA LTD Easting: 390070 Northing: 411960	Annual Volume (m ³): 10455.8 Max Daily Volume (m ³): 45.46 Original Application No: - Original Start Date: 02/02/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/04/2008 Version End Date: -



ID	Location	Details	
-	1110m N	Status: Historical Licence No: 2569002076 Details: Boiler Feed Direct Source: Surface, Non-Tidal - North West Region Point: ROCHDALE CANAL AT ROCHDALE, LANCS Data Type: Point Name: J & J MAKIN CONVERTORS LTD Easting: 390300 Northing: 412300	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 18/01/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1993 Version End Date: -

This data is sourced from the Environment Agency and Natural Resources Wales.

5.8 Potable abstractions

Records within 2000m	0
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Licensed potable water abstractions for sites extracting more than 20 cubic metres of water a day and includes active and historical records. The data may be for a single abstraction point, a stretch of watercourse or a larger area.

This data is sourced from the Environment Agency and Natural Resources Wales.

5.9 Source Protection Zones

Records within 500m	0
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Source Protection Zones define the sensitivity of an area around a potable abstraction site to contamination.

This data is sourced from the Environment Agency and Natural Resources Wales.

5.10 Source Protection Zones (confined aquifer)

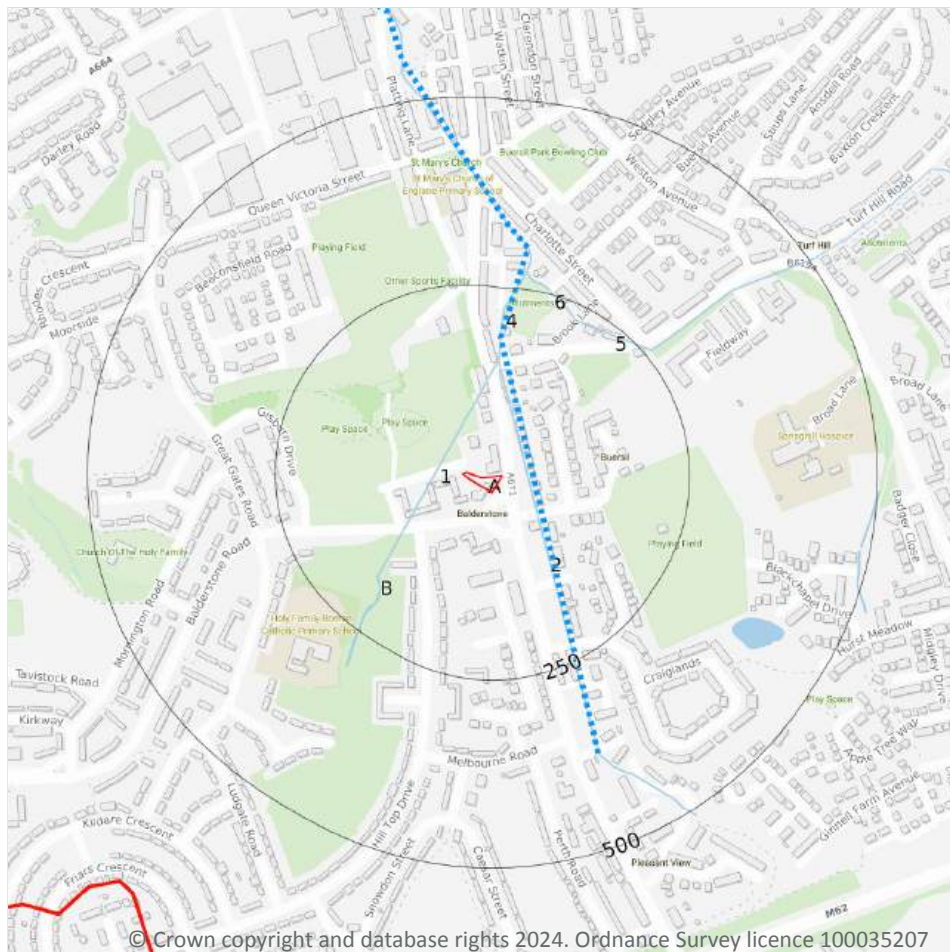
Records within 500m	0
----------------------------	----------

Source Protection Zones in the confined aquifer define the sensitivity around a deep groundwater abstraction to contamination. A confined aquifer would normally be protected from contamination by overlying geology and is only considered a sensitive resource if deep excavation/drilling is taking place.

This data is sourced from the Environment Agency and Natural Resources Wales.



6 Hydrology



- Site Outline
- Search buffers in metres (m)
- Water Network (OS MasterMap)
- Surface water features (wider than 5m)
- Surface water features (narrower than 5m)
- ⋯ WFD River, canal and surface water transfer water bodies
- WFD Lake water bodies
- WFD Transitional and coastal water bodies
- WFD Surface water body catchments boundaries
- WFD Groundwater body boundaries

6.1 Water Network (OS MasterMap)

Records within 250m

8

Detailed water network of Great Britain showing the flow and precise central course of every river, stream, lake and canal.

Features are displayed on the Hydrology map on [page 46 >](#)

ID	Location	Type of water feature	Ground level	Permanence	Name
1	32m NW	Inland river not influenced by normal tidal action.	Not provided	Watercourse contains water year round (in normal circumstances)	-



ID	Location	Type of water feature	Ground level	Permanence	Name
2	33m E	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Sudden Brook
4	153m N	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Sudden Brook
B	178m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	183m SW	Lake, loch or reservoir.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	189m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
5	229m NE	Inland river not influenced by normal tidal action.	Not provided	Watercourse contains water year round (in normal circumstances)	-
6	229m NE	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-

This data is sourced from the Ordnance Survey.

6.2 Surface water features

Records within 250m

3

Covering rivers, streams and lakes (some overlap with OS MasterMap Water Network data in previous section) but additionally covers smaller features such as ponds. Rivers and streams narrower than 5m are represented as a single line. Lakes, ponds and rivers or streams wider than 5m are represented as polygons.

Features are displayed on the Hydrology map on [page 46 >](#)

This data is sourced from the Ordnance Survey.

6.3 WFD Surface water body catchments

Records on site

1

The Water Framework Directive is an EU-led framework for the protection of inland surface waters, estuaries, coastal waters and groundwater through river basin-level management planning. In terms of surface water, these basins are broken down into smaller units known as management, operational and water body catchments.



Features are displayed on the Hydrology map on [page 46 >](#)

ID	Location	Type	Water body catchment	Water body ID	Operational catchment	Management catchment
A	On site	River	Roch (Spodden to Irwell)	GB112069064600	Roch Irk Medlock	Irwell

This data is sourced from the Environment Agency and Natural Resources Wales.

6.4 WFD Surface water bodies

Records identified	1
---------------------------	----------

Surface water bodies under the Directive may be rivers, lakes, estuary or coastal. To achieve the purpose of the Directive, environmental objectives have been set and are reported on for each water body. The progress towards delivery of the objectives is then reported on by the relevant competent authorities at the end of each six-year cycle. The river water body directly associated with the catchment listed in the previous section is detailed below, along with any lake, canal, coastal or artificial water body within 250m of the site. Click on the water body ID in the table to visit the EA Catchment Explorer to find out more about each water body listed.

Features are displayed on the Hydrology map on [page 46 >](#)

ID	Location	Type	Name	Water body ID	Overall rating	Chemical rating	Ecological rating	Year
3	41m E	River	Roch (Spodden to Irwell)	GB112069064600 ↗	Moderate	Fail	Moderate	2019

This data is sourced from the Environment Agency and Natural Resources Wales.

6.5 WFD Groundwater bodies

Records on site	1
------------------------	----------

Groundwater bodies are also covered by the Directive and the same regime of objectives and reporting detailed in the previous section is in place. Click on the water body ID in the table to visit the EA Catchment Explorer to find out more about each groundwater body listed.

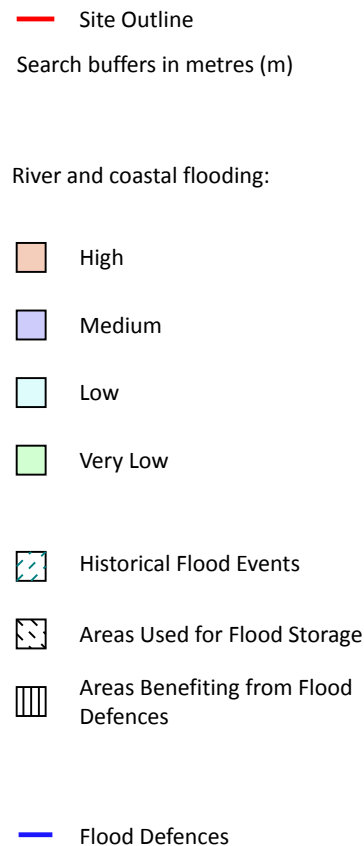
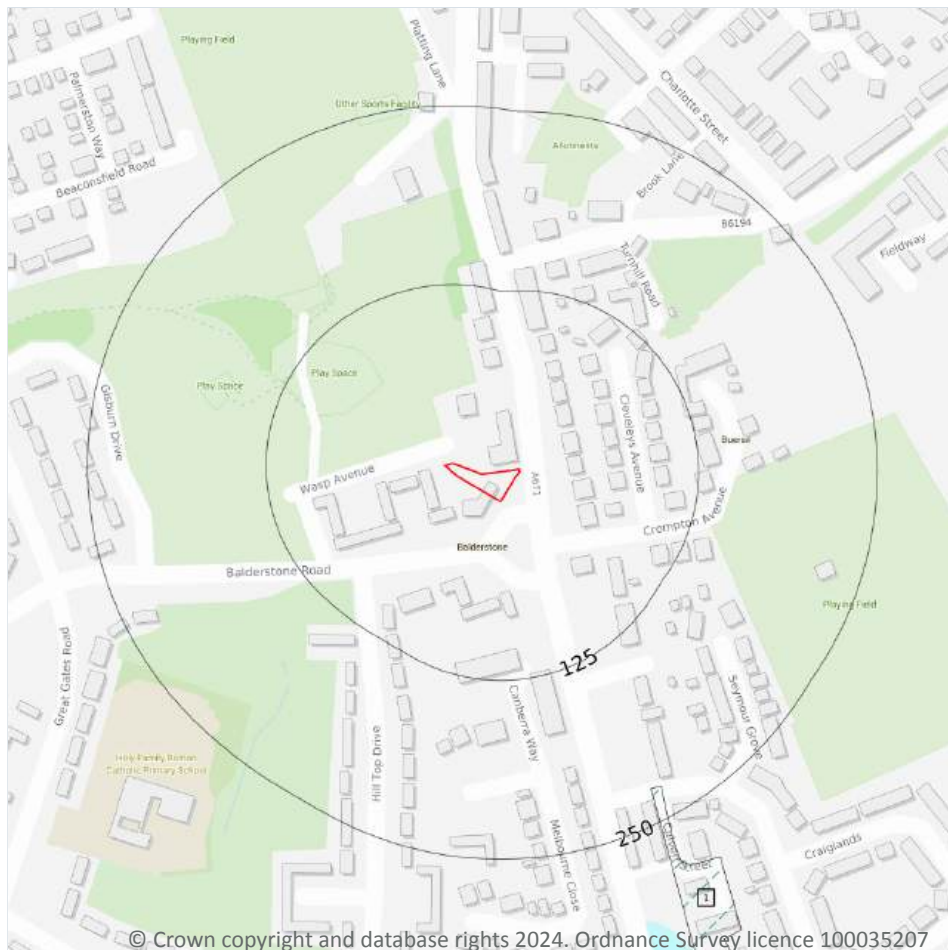
Features are displayed on the Hydrology map on [page 46 >](#)

ID	Location	Name	Water body ID	Overall rating	Chemical rating	Quantitative	Year
A	On site	Northern Manchester Carboniferous Aquifers	GB41202G101800 ↗	Poor	Poor	Good	2019

This data is sourced from the Environment Agency and Natural Resources Wales.



7 River and coastal flooding



7.1 Risk of flooding from rivers and the sea

Records within 50m

0

The chance of flooding from rivers and/or the sea in any given year, based on cells of 50m within the Risk of Flooding from Rivers and Sea (RoFRaS)/Flood Risk Assessment Wales (FRAW) models. Each cell is allocated one of four flood risk categories, taking into account flood defences and their condition. The risk categories for RoFRaS for rivers and the sea and FRAW for rivers are; Very low (less than 1 in 1000 chance in any given year), Low (less than 1 in 100 but greater than or equal to 1 in 1000 chance), Medium (less than 1 in 30 but greater than or equal to 1 in 100 chance) or High (greater than or equal to 1 in 30 chance). The risk categories for FRAW for the sea are; Very low (less than 1 in 1000 chance in any given year), Low (less than 1 in 200 but greater than or equal to 1 in 1000 chance), Medium (less than 1 in 30 but greater than or equal to 1 in 200 chance) or High (greater than or equal to 1 in 30 chance).

This data is sourced from the Environment Agency and Natural Resources Wales.



7.2 Historical Flood Events

Records within 250m

1

Records of historic flooding from rivers, the sea, groundwater and surface water. Records began in 1946 when predecessor bodies started collecting detailed information about flooding incidents, although limited details may be included on flooding incidents prior to this date. Takes into account the presence of defences, structures, and other infrastructure where they existed at the time of flooding, and includes flood extents that may have been affected by overtopping, breaches or blockages.

Features are displayed on the River and coastal flooding map on [page 49](#) >

ID	Location	Event name	Date of flood	Flood source	Flood cause	Type of flood
1	226m SE	Ea013_Culvert Street, Rochdale	2016-11-21 2016-11-21	Ordinary watercourse	Obstruction/blockage - debris screen	Fluvial

This data is sourced from the Environment Agency and Natural Resources Wales.

7.3 Flood Defences

Records within 250m

0

Records of flood defences owned, managed or inspected by the Environment Agency and Natural Resources Wales. Flood defences can be structures, buildings or parts of buildings. Typically these are earth banks, stone and concrete walls, or sheet-piling that is used to prevent or control the extent of flooding.

This data is sourced from the Environment Agency and Natural Resources Wales.

7.4 Areas Benefiting from Flood Defences

Records within 250m

0

Areas that would benefit from the presence of flood defences in a 1 in 100 (1%) chance of flooding each year from rivers or 1 in 200 (0.5%) chance of flooding each year from the sea.

This data is sourced from the Environment Agency and Natural Resources Wales.

7.5 Flood Storage Areas

Records within 250m

0

Areas that act as a balancing reservoir, storage basin or balancing pond to attenuate an incoming flood peak to a flow level that can be accepted by the downstream channel or to delay the timing of a flood peak so that its volume is discharged over a longer period.

This data is sourced from the Environment Agency and Natural Resources Wales.



River and coastal flooding - Flood Zones

7.6 Flood Zone 2

Records within 50m	0
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Areas of land at risk of flooding, when the presence of flood defences are ignored. Covering land between Flood Zone 3 (see next section) and the extent of the flooding from rivers or the sea with a 1 in 1000 (0.1%) chance of flooding each year.

This data is sourced from the Environment Agency and Natural Resources Wales.

7.7 Flood Zone 3

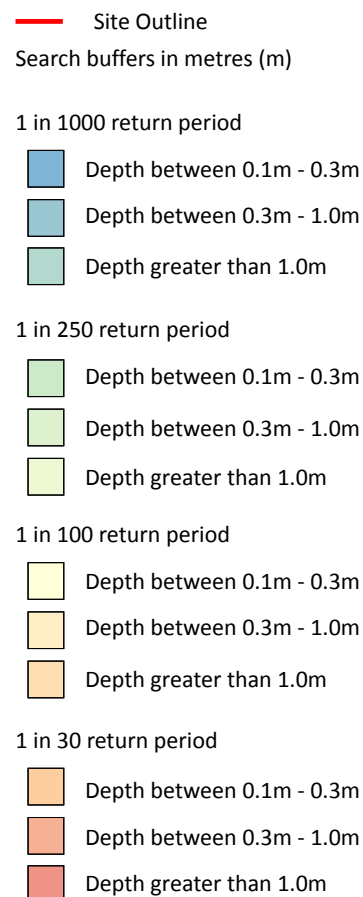
Records within 50m	0
--------------------	---

Areas of land at risk of flooding, when the presence of flood defences are ignored. Covering land with a 1 in 100 (1%) or greater chance of flooding each year from rivers or a 1 in 200 (0.5%) or greater chance of flooding each year from the sea.

This data is sourced from the Environment Agency and Natural Resources Wales.



8 Surface water flooding



8.1 Surface water flooding

Highest risk on site

1 in 1000 year, 0.1m - 0.3m

Highest risk within 50m

1 in 30 year, 0.1m - 0.3m

Ambiental Risk Analytics surface water (pluvial) FloodMap identifies areas likely to flood as a result of extreme rainfall events, i.e. land naturally vulnerable to surface water ponding or flooding. This data set was produced by simulating 1 in 30 year, 1 in 100 year, 1 in 250 year and 1 in 1,000 year rainfall events. Modern urban drainage systems are typically built to cope with rainfall events between 1 in 20 and 1 in 30 years, though some older ones may flood in a 1 in 5 year rainfall event.

Features are displayed on the Surface water flooding map on [page 52 >](#)

The data shown on the map and in the table above shows the highest likelihood of flood events happening at the site. Lower likelihood events may have greater flood depths and hence a greater potential impact on a site.

The table below shows the maximum flood depths for a range of return periods for the site.

Return period	Maximum modelled depth
1 in 1000 year	Between 0.1m and 0.3m
1 in 250 year	Negligible
1 in 100 year	Negligible
1 in 30 year	Negligible

This data is sourced from Ambiantal Risk Analytics.



9 Groundwater flooding



— Site Outline
Search buffers in metres (m)

- High
- Moderate - High
- Moderate
- Low
- Negligible

9.1 Groundwater flooding

Highest risk on site

Low

Highest risk within 50m

Low

Groundwater flooding is caused by unusually high groundwater levels. It occurs when the water table rises above the ground surface or within underground structures such as basements or cellars. Groundwater flooding tends to exhibit a longer duration than surface water flooding, possibly lasting for weeks or months, and as a result it can cause significant damage to property. This risk assessment is based on a 1 in 100 year return period and a 5m Digital Terrain Model (DTM).

Features are displayed on the Groundwater flooding map on [page 54](#) >

This data is sourced from Ambiantal Risk Analytics.

10 Environmental designations



- Site Outline
- Search buffers in metres (m)
- Sites of Special Scientific Interest (SSSI)
- + Special Areas of Conservation (SAC)
- Green Belt

10.1 Sites of Special Scientific Interest (SSSI)

Records within 2000m

4

Sites providing statutory protection for the best examples of UK flora, fauna, or geological or physiographical features. Originally notified under the National Parks and Access to the Countryside Act 1949, SSSIs were re-notified under the Wildlife and Countryside Act 1981. Improved provisions for the protection and management of SSSIs were introduced by the Countryside and Rights of Way Act 2000 (in England and Wales) and (in Scotland) by the Nature Conservation (Scotland) Act 2004 and the Wildlife and Natural Environment (Scotland) Act 2010.

Features are displayed on the Environmental designations map on [page 55 >](#)

ID	Location	Name	Data source
A	846m NW	Rochdale Canal	Natural England



ID	Location	Name	Data source
B	967m NW	Rochdale Canal	Natural England
C	1151m W	Rochdale Canal	Natural England
-	1433m W	Rochdale Canal	Natural England

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.2 Conserved wetland sites (Ramsar sites)

Records within 2000m

0

Ramsar sites are designated under the Convention on Wetlands of International Importance, agreed in Ramsar, Iran, in 1971. They cover all aspects of wetland conservation and wise use, recognizing wetlands as ecosystems that are extremely important for biodiversity conservation in general and for the well-being of human communities. These sites cover a broad definition of wetland; marsh, fen, peatland or water, whether natural or artificial, permanent or temporary, with water that is static or flowing, fresh, brackish or salt, and even some marine areas.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.3 Special Areas of Conservation (SAC)

Records within 2000m

4

Areas which have been identified as best representing the range and variety within the European Union of habitats and (non-bird) species listed on Annexes I and II to the Directive. SACs are designated under the EC Habitats Directive.

Features are displayed on the Environmental designations map on [page 55 >](#)

ID	Location	Name	Features of interest	Habitat description	Data source
A	846m NW	Rochdale Canal	Floating water-plantain.	Other land (including Towns, Villages, Roads, Waste places, Mines, Industrial sites); Inland water bodies (Standing water, Running water)	Natural England
B	967m NW	Rochdale Canal	Floating water-plantain.	Other land (including Towns, Villages, Roads, Waste places, Mines, Industrial sites); Inland water bodies (Standing water, Running water)	Natural England
C	1151m W	Rochdale Canal	Floating water-plantain.	Other land (including Towns, Villages, Roads, Waste places, Mines, Industrial sites); Inland water bodies (Standing water, Running water)	Natural England

ID	Location	Name	Features of interest	Habitat description	Data source
-	1433m W	Rochdale Canal	Floating water-plantain.	Other land (including Towns, Villages, Roads, Waste places, Mines, Industrial sites); Inland water bodies (Standing water, Running water)	Natural England

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.4 Special Protection Areas (SPA)

Records within 2000m

0

Sites classified by the UK Government under the EC Birds Directive, SPAs are areas of the most important habitat for rare (listed on Annex I to the Directive) and migratory birds within the European Union.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.5 National Nature Reserves (NNR)

Records within 2000m

0

Sites containing examples of some of the most important natural and semi-natural terrestrial and coastal ecosystems in Great Britain. They are managed to conserve their habitats, provide special opportunities for scientific study or to provide public recreation compatible with natural heritage interests.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.6 Local Nature Reserves (LNR)

Records within 2000m

0

Sites managed for nature conservation, and to provide opportunities for research and education, or simply enjoying and having contact with nature. They are declared by local authorities under the National Parks and Access to the Countryside Act 1949 after consultation with the relevant statutory nature conservation agency.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.7 Designated Ancient Woodland

Records within 2000m

0

Ancient woodlands are classified as areas which have been wooded continuously since at least 1600 AD. This includes semi-natural woodland and plantations on ancient woodland sites. 'Wooded continuously' does not mean there is or has previously been continuous tree cover across the whole site, and not all trees within the woodland have to be old.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.



10.8 Biosphere Reserves

Records within 2000m**0**

Biosphere Reserves are internationally recognised by UNESCO as sites of excellence to balance conservation and socioeconomic development between nature and people. They are recognised under the Man and the Biosphere (MAB) Programme with the aim of promoting sustainable development founded on the work of the local community.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.9 Forest Parks

Records within 2000m**0**

These are areas managed by the Forestry Commission designated on the basis of recreational, conservation or scenic interest.

This data is sourced from the Forestry Commission.

10.10 Marine Conservation Zones

Records within 2000m**0**

A type of marine nature reserve in UK waters established under the Marine and Coastal Access Act (2009). They are designated with the aim to protect nationally important, rare or threatened habitats and species.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

10.11 Green Belt

Records within 2000m**3**

Areas designated to prevent urban sprawl by keeping land permanently open.

Features are displayed on the Environmental designations map on [page 55 >](#)

ID	Location	Name	Local Authority name
1	733m S	Merseyside and Greater Manchester Green Belt	Rochdale
2	742m SE	Merseyside and Greater Manchester Green Belt	Rochdale
-	1482m S	Merseyside and Greater Manchester Green Belt	Oldham

This data is sourced from the Ministry of Housing, Communities and Local Government.



10.12 Proposed Ramsar sites

Records within 2000m**0**

Ramsar sites are areas listed as a Wetland of International Importance under the Convention on Wetlands of International Importance especially as Waterfowl Habitat (the Ramsar Convention) 1971. The sites here supplied have a status of 'Proposed' having been identified for potential adoption under the framework.

This data is sourced from Natural England.

10.13 Possible Special Areas of Conservation (pSAC)

Records within 2000m**0**

Special Areas of Conservation are areas which have been identified as best representing the range and variety within the European Union of habitats and (non-bird) species listed on Annexes I and II to the Directive. SACs are designated under the EC Habitats Directive. Those sites supplied here are those with a status of 'Possible' having been identified for potential adoption under the framework.

This data is sourced from Natural England and Natural Resources Wales.

10.14 Potential Special Protection Areas (pSPA)

Records within 2000m**0**

Special Protection Areas (SPAs) are areas designated (or 'classified') under the European Union Wild Birds Directive for the protection of nationally and internationally important populations of wild birds. Those sites supplied here are those with a status of 'Potential' having been identified for potential adoption under the framework.

This data is sourced from Natural England.

10.15 Nitrate Sensitive Areas

Records within 2000m**0**

Areas where nitrate concentrations in drinking water sources exceeded or was at risk of exceeding the limit of 50 mg/l set by the 1980 EC Drinking Water Directive. Voluntary agricultural measures as a means of reducing the levels of nitrate were introduced by DEFRA as MAFF, with payments being made to farmers who complied. The scheme was started as a pilot in 1990 in ten areas, later implemented within 32 areas. The scheme was closed to further new entrants in 1998, although existing agreements continued for their full term. All Nitrate Sensitive Areas fell within the areas designated as Nitrate Vulnerable Zones (NVZs) in 1996 under the EC Nitrate Directive (91/676/EEC).

This data is sourced from Natural England.



10.16 Nitrate Vulnerable Zones

Records within 2000m

1

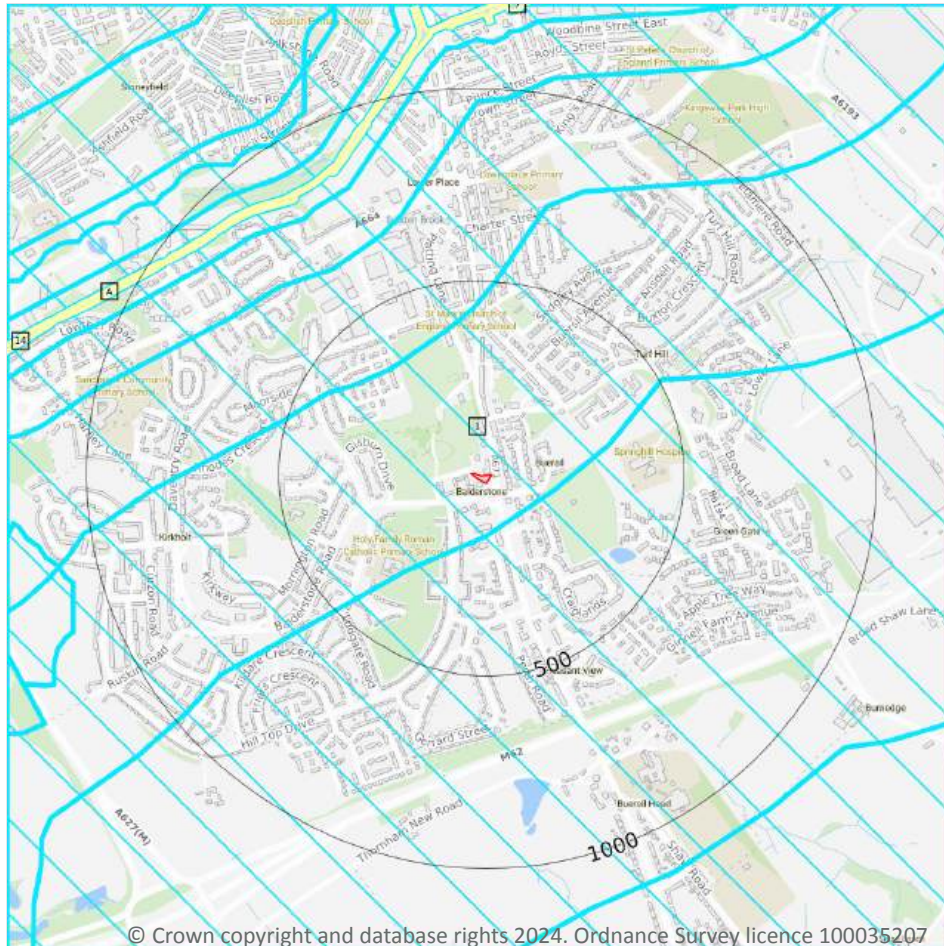
Areas at risk from agricultural nitrate pollution designated under the EC Nitrate Directive (91/676/EEC). These are areas of land that drain into waters polluted by nitrates. Farmers operating within these areas have to follow mandatory rules to tackle nitrate loss from agriculture.

Location	Name	Type	NVZ ID	Status
902m SW	River Irk (Moston Brook to River Irwell) NVZ	Surface Water	638	Existing

This data is sourced from Natural England and Natural Resources Wales.



SSSI Impact Zones and Units



- Site Outline
- Search buffers in metres (m)
- SSSI Impact Risk Zones
- SSSI Units
- Not recorded
- Favourable
- Unfavourable - Recovering
- Unfavourable - No change
- Unfavourable - Declining
- Partially destroyed
- Destroyed

10.17 SSSI Impact Risk Zones

Records on site

1

Developed to allow rapid initial assessment of the potential risks to SSSIs posed by development proposals. They define zones around each SSSI which reflect the particular sensitivities of the features for which it is notified and indicate the types of development proposal which could potentially have adverse impacts.

Features are displayed on the SSSI Impact Zones and Units map on [page 61](#) >

ID	Location	Type of developments requiring consultation
1	On site	Infrastructure - Pipelines and underground cables, pylons and overhead cables. Any transport proposal including road, rail and by water (excluding routine maintenance). Airports, helipads and other aviation proposals. Minerals, Oil and Gas - Planning applications for quarries, including: new proposals, Review of Minerals Permissions (ROMP), extensions, variations to conditions etc. Oil & gas exploration/extraction. Rural non-residential - Large non residential developments outside existing settlements/urban areas where net additional gross internal floorspace is > 1,000m² or footprint exceeds 0.2ha. Residential - Residential development of 100 units or more. Rural residential - Any residential development of 50 or more houses outside existing settlements/urban areas. Air pollution - Any industrial/agricultural development that could cause AIR POLLUTION (incl: industrial processes, livestock & poultry units with floorspace > 500m², slurry lagoons & digestate stores > 200m², manure stores > 250t). Combustion - General combustion processes >20MW energy input. Incl: energy from waste incineration, other incineration, landfill gas generation plant, pyrolysis/gasification, anaerobic digestion, sewage treatment works, other incineration/ combustion. Waste - Landfill. Incl: inert landfill, non-hazardous landfill, hazardous landfill. Composting - Any composting proposal with more than 500 tonnes maximum annual operational throughput. Incl: open windrow composting, in-vessel composting, anaerobic digestion, other waste management. Discharges - Any discharge of water or liquid waste of more than 2m³/day to ground (ie to seep away) or to surface water, such as a beck or stream. Water supply - Large infrastructure such as warehousing / industry where net additional gross internal floorspace is > 1,000m² or any development needing its own water supply .

This data is sourced from Natural England.

10.18 SSSI Units

Records within 2000m

4

Divisions of SSSIs used to record management and condition details. Units are the smallest areas for which Natural England gives a condition assessment, however, the size of units varies greatly depending on the types of management and the conservation interest.

Features are displayed on the SSSI Impact Zones and Units map on [page 61](#) >

ID: 7
 Location: 846m NW
 SSSI name: Rochdale Canal
 Unit name: Failsworth
 Broad habitat: Standing Open Water And Canals
 Condition: Unfavourable - Recovering
 Reportable features:



Feature name	Feature condition	Date of assessment
Population of Schedule 8 plant - Luronium natans, Floating Water-plantain	Unfavourable - Recovering	25/11/2010

ID: A
Location: 967m NW
SSSI name: Rochdale Canal
Unit name: Failsworth
Broad habitat: Standing Open Water And Canals
Condition: Unfavourable - Recovering
Reportable features:

Feature name	Feature condition	Date of assessment
Population of Schedule 8 plant - Luronium natans, Floating Water-plantain	Unfavourable - Recovering	25/11/2010

ID: 14
Location: 1151m W
SSSI name: Rochdale Canal
Unit name: Failsworth
Broad habitat: Standing Open Water And Canals
Condition: Unfavourable - Recovering
Reportable features:

Feature name	Feature condition	Date of assessment
Population of Schedule 8 plant - Luronium natans, Floating Water-plantain	Unfavourable - Recovering	25/11/2010

ID: -
Location: 1433m W
SSSI name: Rochdale Canal
Unit name: Failsworth
Broad habitat: Standing Open Water And Canals
Condition: Unfavourable - Recovering
Reportable features:

Feature name	Feature condition	Date of assessment
Population of Schedule 8 plant - Luronium natans, Floating Water-plantain	Unfavourable - Recovering	25/11/2010

This data is sourced from Natural England and Natural Resources Wales.



11 Visual and cultural designations



- Site Outline
- Search buffers in metres (m)
- Listed buildings
- Conservation areas
- Conservation areas - no data
- National Parks
- Areas of Outstanding Natural Beauty
- Registered parks and gardens
- Scheduled Monuments
- World Heritage Sites

11.1 World Heritage Sites

Records within 250m

0

Sites designated for their globally important cultural or natural interest requiring appropriate management and protection measures. World Heritage Sites are designated to meet the UK's commitments under the World Heritage Convention.

This data is sourced from Historic England, Cadw and Historic Environment Scotland.



11.2 Area of Outstanding Natural Beauty

Records within 250m

0

Areas of Outstanding Natural Beauty (AONB) are conservation areas, chosen because they represent 18% of the finest countryside. Each AONB has been designated for special attention because of the quality of their flora, fauna, historical and cultural associations, and/or scenic views. The National Parks and Access to the Countryside Act of 1949 created AONBs and the Countryside and Rights of Way Act, 2000 added further regulation and protection. There are likely to be restrictions to some developments within these areas.

This data is sourced from Natural England, Natural Resources Wales and Scottish Natural Heritage.

11.3 National Parks

Records within 250m

0

In England and Wales, the purpose of National Parks is to conserve and enhance landscapes within the countryside whilst promoting public enjoyment of them and having regard for the social and economic well-being of those living within them. In Scotland National Parks have the additional purpose of promoting the sustainable use of the natural resources of the area and the sustainable social and economic development of its communities. The National Parks and Access to the Countryside Act 1949 established the National Park designation in England and Wales, and The National Parks (Scotland) Act 2000 in Scotland.

This data is sourced from Natural England, Natural Resources Wales and the Scottish Government.

11.4 Listed Buildings

Records within 250m

4

Buildings listed for their special architectural or historical interest. Building control in the form of 'listed building consent' is required in order to make any changes to that building which might affect its special interest. Listed buildings are graded to indicate their relative importance, however building controls apply to all buildings equally, irrespective of their grade, and apply to the interior and exterior of the building in its entirety, together with any curtilage structures.

Features are displayed on the Visual and cultural designations map on [page 64 >](#)

ID	Location	Name	Grade	Reference Number	Listed date
1	115m E	Flagstone Wall On East Side Of Footpath From Turnhill Road/Crompton Avenue	II	1253201	24/08/1993
A	212m NE	Flagstone Boundary Wall To The West Of No 42	II	1084240	24/08/1993
A	236m NE	31, Broad Lane	II	1084265	12/02/1985
A	239m NE	33 And 35, Broad Lane	II	1346243	12/02/1985

This data is sourced from Historic England, Cadw and Historic Environment Scotland.



11.5 Conservation Areas

Records within 250m

0

Local planning authorities are obliged to designate as conservation areas any parts of their own area that are of special architectural or historic interest, the character and appearance of which it is desirable to preserve or enhance. Designation of a conservation area gives broader protection than the listing of individual buildings. All the features within the area, listed or otherwise, are recognised as part of its character. Conservation area designation is the means of recognising the importance of all factors and of ensuring that planning decisions address the quality of the landscape in its broadest sense.

This data is sourced from Historic England, Cadw and Historic Environment Scotland.

11.6 Scheduled Ancient Monuments

Records within 250m

0

A scheduled monument is an historic building or site that is included in the Schedule of Monuments kept by the Secretary of State for Digital, Culture, Media and Sport. The regime is set out in the Ancient Monuments and Archaeological Areas Act 1979. The Schedule of Monuments has c.20,000 entries and includes sites such as Roman remains, burial mounds, castles, bridges, earthworks, the remains of deserted villages and industrial sites. Monuments are not graded, but all are, by definition, considered to be of national importance.

This data is sourced from Historic England, Cadw and Historic Environment Scotland.

11.7 Registered Parks and Gardens

Records within 250m

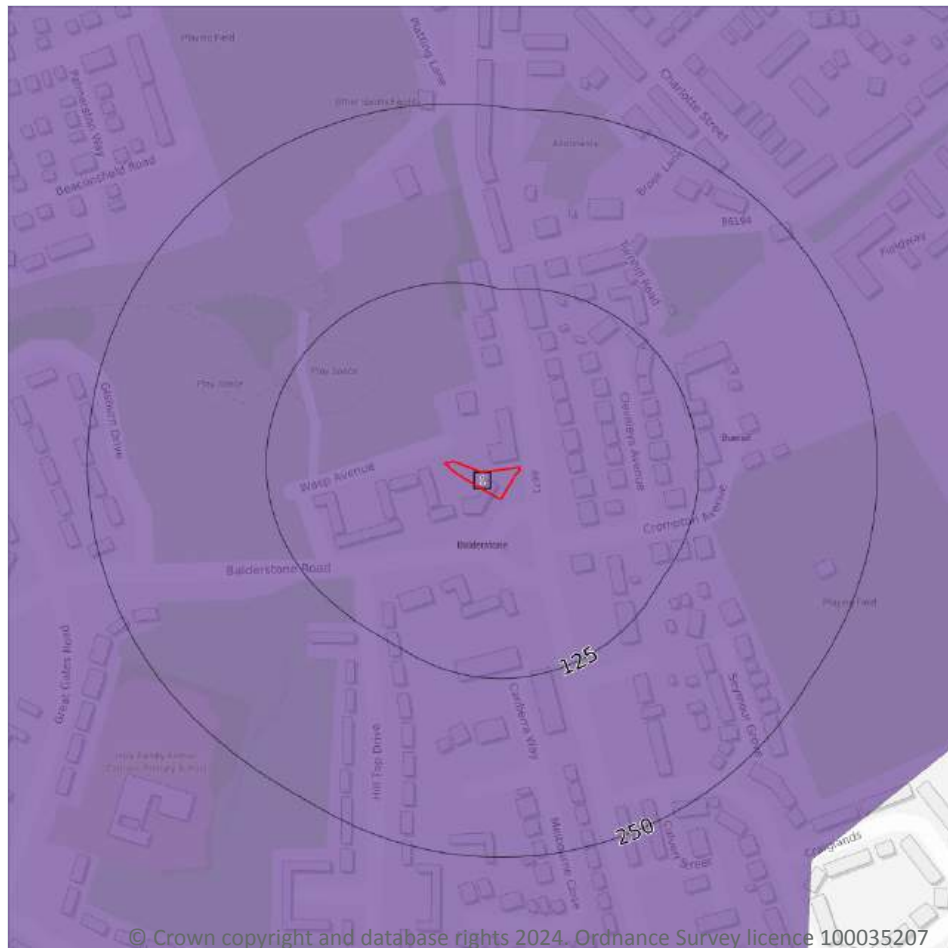
0

Parks and gardens assessed to be of particular interest and of special historic interest. The emphasis being on 'designed' landscapes, rather than on planting or botanical importance. Registration is a 'material consideration' in the planning process, meaning that planning authorities must consider the impact of any proposed development on the special character of the landscape.

This data is sourced from Historic England, Cadw and Historic Environment Scotland.



12 Agricultural designations



- Site Outline
- Search buffers in metres (m)
- Grade 1 - excellent quality
- Grade 2 - very good quality
- Grade 3 - good to moderate quality
- Grade 3a - good quality
- Grade 3b - moderate quality
- Grade 4 - poor quality
- Grade 5 - very poor quality
- Non-agricultural land
- Urban land
- Exclusion land
- Tree felling licences
- Open Access land

12.1 Agricultural Land Classification

Records within 250m

1

Classification of the quality of agricultural land taking into consideration multiple factors including climate, physical geography and soil properties. It should be noted that the categories for the grading of agricultural land are not consistent across England, Wales and Scotland.

Features are displayed on the Agricultural designations map on [page 67](#) >

ID	Location	Classification	Description
1	On site	Urban	Non-agricultural/no quality assigned

This data is sourced from Natural England.



12.2 Open Access Land

Records within 250m

0

The Countryside and Rights of Way Act 2000 (CROW Act) gives a public right of access to land without having to use paths. Access land includes mountains, moors, heaths and downs that are privately owned. It also includes common land registered with the local council and some land around the England Coast Path. Generally permitted activities on access land are walking, running, watching wildlife and climbing.

This data is sourced from Natural England and Natural Resources Wales.

12.3 Tree Felling Licences

Records within 250m

0

Felling Licence Application (FLA) areas approved by Forestry Commission England. Anyone wishing to fell trees must ensure that a licence or permission under a grant scheme has been issued by the Forestry Commission before any felling is carried out or that one of the exceptions apply.

This data is sourced from the Forestry Commission.

12.4 Environmental Stewardship Schemes

Records within 250m

0

Environmental Stewardship covers a range of schemes that provide financial incentives to farmers, foresters and land managers to look after and improve the environment. The schemes identified may be historical schemes that have now expired, or may still be active.

This data is sourced from Natural England.

12.5 Countryside Stewardship Schemes

Records within 250m

0

Countryside Stewardship covers a range of schemes that provide financial incentives to farmers, foresters and land managers to look after and improve the environment. Main objectives are to improve the farmed environment for wildlife and to reduce diffuse water pollution.

This data is sourced from Natural England.

13 Habitat designations



- Site Outline
- Search buffers in metres (m)
- Priority Habitat Inventory
- Open Mosaic Habitat
- Limestone Pavement Orders
- Habitat Networks
- Primary Habitat
- Restorable Habitat
- Associated Habitats
- Habitat Restoration-Creation
- Network Enhancement Zone 1
- Network Enhancement Zone 2

13.1 Priority Habitat Inventory

Records within 250m

8

Habitats of principal importance as named under Natural Environment and Rural Communities Act (2006) Section 41.

Features are displayed on the Habitat designations map on [page 69 >](#)

ID	Location	Main Habitat	Other habitats
1	115m SW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
2	127m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
3	135m SW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
4	165m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)



ID	Location	Main Habitat	Other habitats
A	170m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
5	183m SW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
6	191m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)
A	196m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)

This data is sourced from Natural England.

13.2 Habitat Networks

Records within 250m	0
----------------------------	----------

Habitat networks for 18 priority habitat networks (based primarily, but not exclusively, on the priority habitat inventory) and areas suitable for the expansion of networks through restoration and habitat creation.

This data is sourced from Natural England.

13.3 Open Mosaic Habitat

Records within 250m	0
----------------------------	----------

Sites verified as Open Mosaic Habitat. Mosaic habitats are brownfield sites that are identified under the UK Biodiversity Action Plan as a priority habitat due to the habitat variation within a single site, supporting an array of invertebrates.

This data is sourced from Natural England.

13.4 Limestone Pavement Orders

Records within 250m	0
----------------------------	----------

Limestone pavements are outcrops of limestone where the surface has been worn away by natural means over millennia. These rocks have the appearance of paving blocks, hence their name. Not only do they have geological interest, they also provide valuable habitats for wildlife. These habitats are threatened due to their removal for use in gardens and water features. Many limestone pavements have been designated as SSSIs which affords them some protection. In addition, Section 34 of the Wildlife and Countryside Act 1981 gave them additional protection via the creation of Limestone Pavement Orders, which made it a criminal offence to remove any part of the outcrop. The associated Limestone Pavement Priority Habitat is part of the UK Biodiversity Action Plan priority habitat in England.

This data is sourced from Natural England.



14 Geology 1:10,000 scale - Availability



- Site Outline**
- Search buffers in metres (m)
- Full coverage
 - Partial coverage
 - No coverage

14.1 10k Availability

Records within 500m

2

An indication on the coverage of 1:10,000 scale geology data for the site, the most detailed dataset provided by the British Geological Survey. Either 'Full', 'Partial' or 'No coverage' for each geological theme.

Features are displayed on the Geology 1:10,000 scale - Availability map on [page 71](#) >

ID	Location	Artificial	Superficial	Bedrock	Mass movement	Sheet No.
1	On site	Full	Full	Full	Full	SD91SW
2	434m W	Full	Full	Full	Full	SD81SE

This data is sourced from the British Geological Survey.



Geology 1:10,000 scale - Artificial and made ground



— Site Outline
Search buffers in metres (m)

- Reclaimed ground
- Made ground
- Worked ground
- Infilled ground
- Disturbed ground
- Landscaped ground

14.2 Artificial and made ground (10k)

Records within 500m

3

Details of made, worked, infilled, disturbed and landscaped ground at 1:10,000 scale. Artificial ground can be associated with potentially contaminated material, unpredictable engineering conditions and instability.

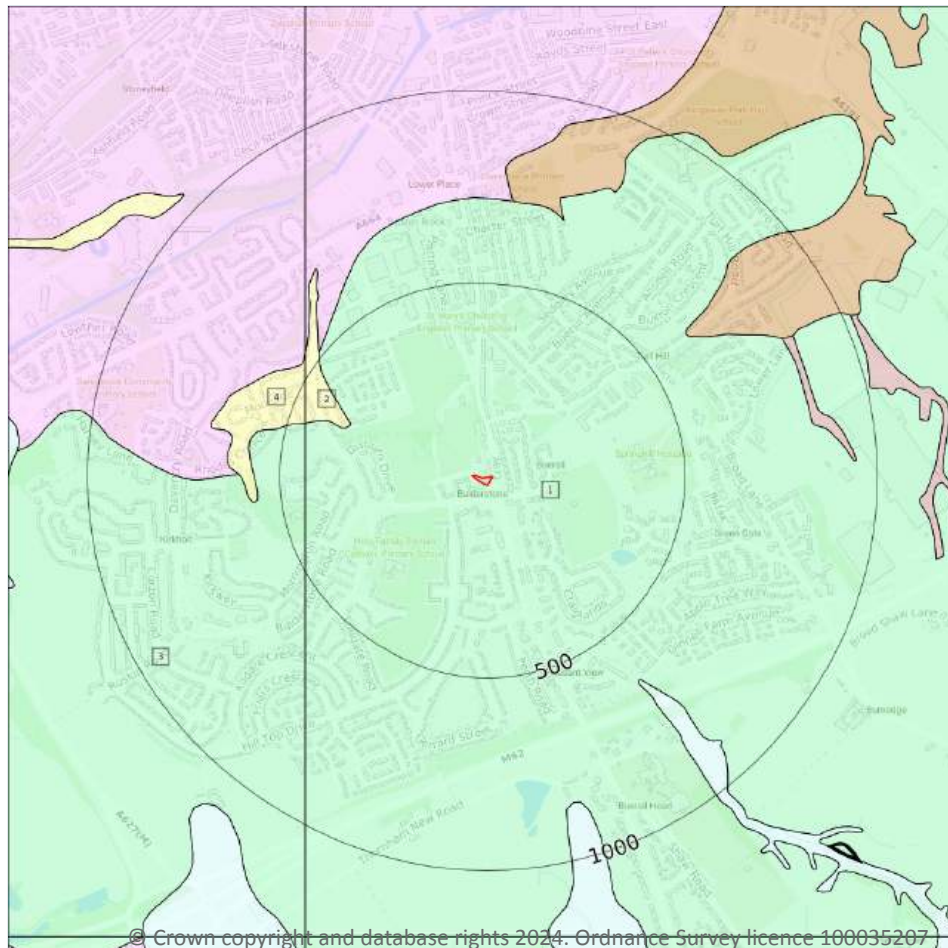
Features are displayed on the Geology 1:10,000 scale - Artificial and made ground map on [page 72](#) >

ID	Location	LEX Code	Description	Rock description
1	130m E	MGR-ARTDP	Made Ground (Undivided)	Artificial Deposit
2	220m SW	MGR-ARTDP	Made Ground (Undivided)	Artificial Deposit
3	304m NW	MGR-ARTDP	Made Ground (Undivided)	Artificial Deposit

This data is sourced from the British Geological Survey.



Geology 1:10,000 scale - Superficial



Site Outline

Search buffers in metres (m)

Landslip (10k)

Superficial geology (10k)
Please see table for more details.

14.3 Superficial geology (10k)

Records within 500m

4

Superficial geological deposits at 1:10,000 scale. Also known as 'drift', these are the youngest geological deposits, formed during the Quaternary. They rest on older deposits or rocks referred to as bedrock.

Features are displayed on the Geology 1:10,000 scale - Superficial map on [page 73](#) >

ID	Location	LEX Code	Description	Rock description
1	On site	HMGDD-DMTN	Hummocky (moundy) Glacial Deposits, Devensian - Diamicton	Diamicton
2	344m W	ALV-XCZSV	Alluvium - Clay, Silt, Sand And Gravel	Clay, Silt, Sand And Gravel
3	434m W	HMGDD-DMTN	Hummocky (moundy) Glacial Deposits, Devensian - Diamicton	Diamicton



ID	Location	LEX Code	Description	Rock description
4	455m W	ALV-XCZSV	Alluvium - Clay, Silt, Sand And Gravel	Clay, Silt, Sand And Gravel

This data is sourced from the British Geological Survey.

14.4 Landslip (10k)

Records within 500m

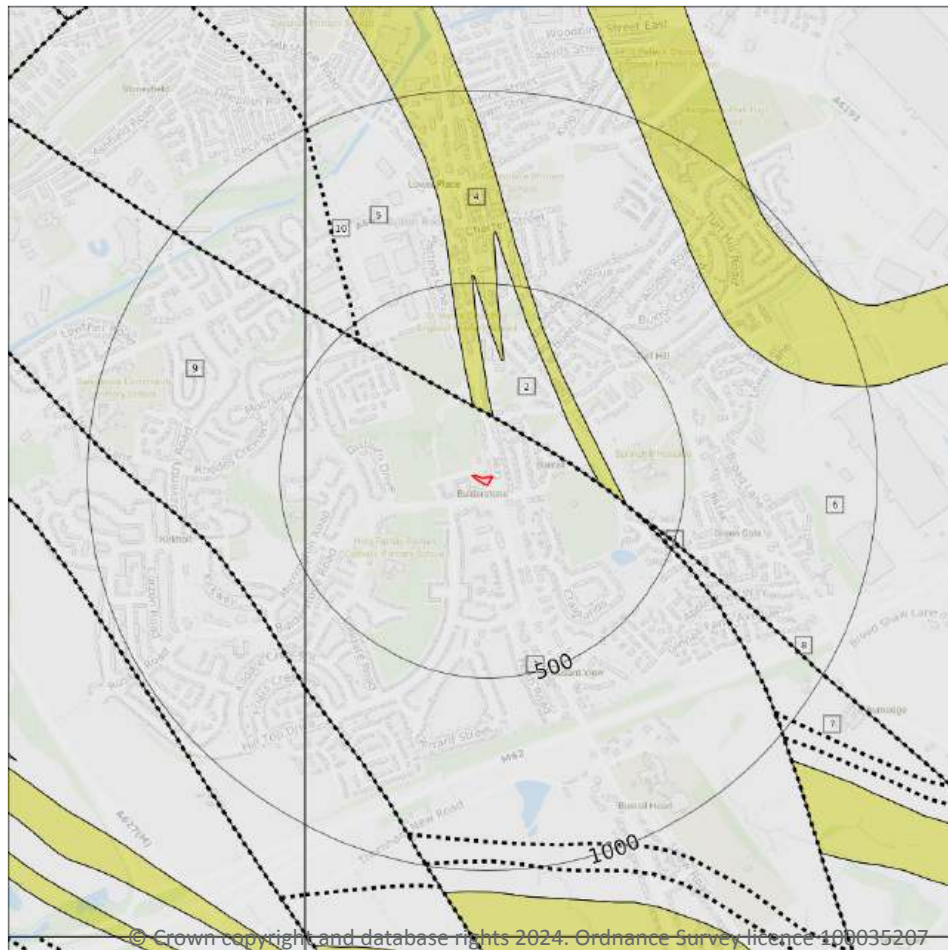
0

Mass movement deposits on BGS geological maps at 1:10,000 scale. Primarily superficial deposits that have moved down slope under gravity to form landslips. These affect bedrock, other superficial deposits and artificial ground.

This data is sourced from the British Geological Survey.



Geology 1:10,000 scale - Bedrock



Site Outline

Search buffers in metres (m)

..... Bedrock faults and other linear features (10k)

Bedrock geology (10k)
Please see table for more details.

14.5 Bedrock geology (10k)

Records within 500m

7

Bedrock geology at 1:10,000 scale. The main mass of rocks forming the Earth and present everywhere, whether exposed at the surface in outcrops or concealed beneath superficial deposits or water.

Features are displayed on the Geology 1:10,000 scale - Bedrock map on [page 75 >](#)

ID	Location	LEX Code	Description	Rock age
1	On site	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age
2	135m NE	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age
4	155m N	OL-SDST	Old Lawrence Rock - Sandstone	Langsettian Sub-age



ID	Location	LEX Code	Description	Rock age
5	180m N	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age
6	280m NE	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age
7	390m E	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age
9	434m W	PLCM-MDSS	Pennine Lower Coal Measures Formation - Mudstone, Siltstone And Sandstone	Langsettian Sub-age

This data is sourced from the British Geological Survey.

14.6 Bedrock faults and other linear features (10k)

Records within 500m

3

Linear features at the ground or bedrock surface at 1:10,000 scale of six main types; rock, fault, fold axis, mineral vein, alteration area or landform. Features are either observed or inferred, and relate primarily to bedrock.

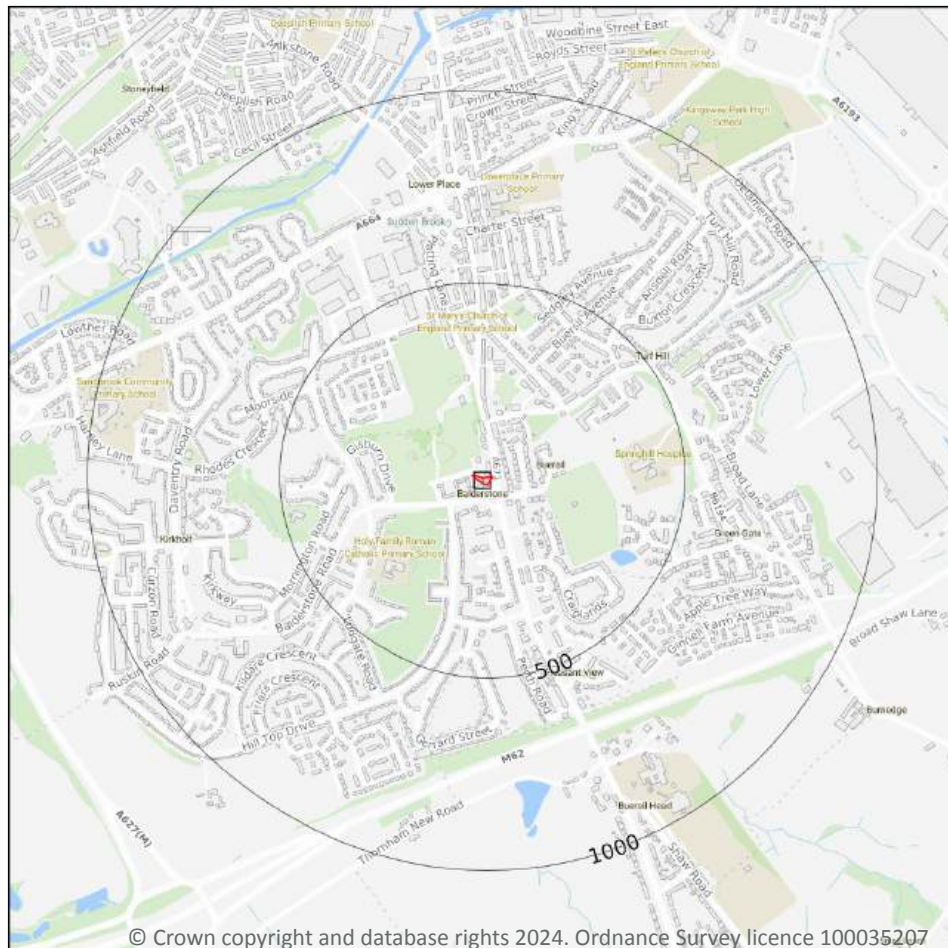
Features are displayed on the Geology 1:10,000 scale - Bedrock map on [page 75 >](#)

ID	Location	Category	Description
3	135m NE	FAULT	Normal fault, inferred; crossmarks on downthrow side
8	390m E	FAULT	Normal fault, inferred; crossmarks on downthrow side
10	450m NW	ROCK	Coal seam, inferred

This data is sourced from the British Geological Survey.



15 Geology 1:50,000 scale - Availability



— Site Outline

Search buffers in metres (m)

□ Geological map tile

15.1 50k Availability

Records within 500m

1

An indication on the coverage of 1:50,000 scale geology data for the site. Either 'Full' or 'No coverage' for each geological theme.

Features are displayed on the Geology 1:50,000 scale - Availability map on [page 77](#) >

ID	Location	Artificial	Superficial	Bedrock	Mass movement	Sheet No.
1	On site	No coverage	Full	Full	No coverage	EW085_manchester_v4

This data is sourced from the British Geological Survey.



Geology 1:50,000 scale - Artificial and made ground

15.2 Artificial and made ground (50k)

Records within 500m

0

Details of made, worked, infilled, disturbed and landscaped ground at 1:50,000 scale. Artificial ground can be associated with potentially contaminated material, unpredictable engineering conditions and instability.

This data is sourced from the British Geological Survey.

15.3 Artificial ground permeability (50k)

Records within 50m

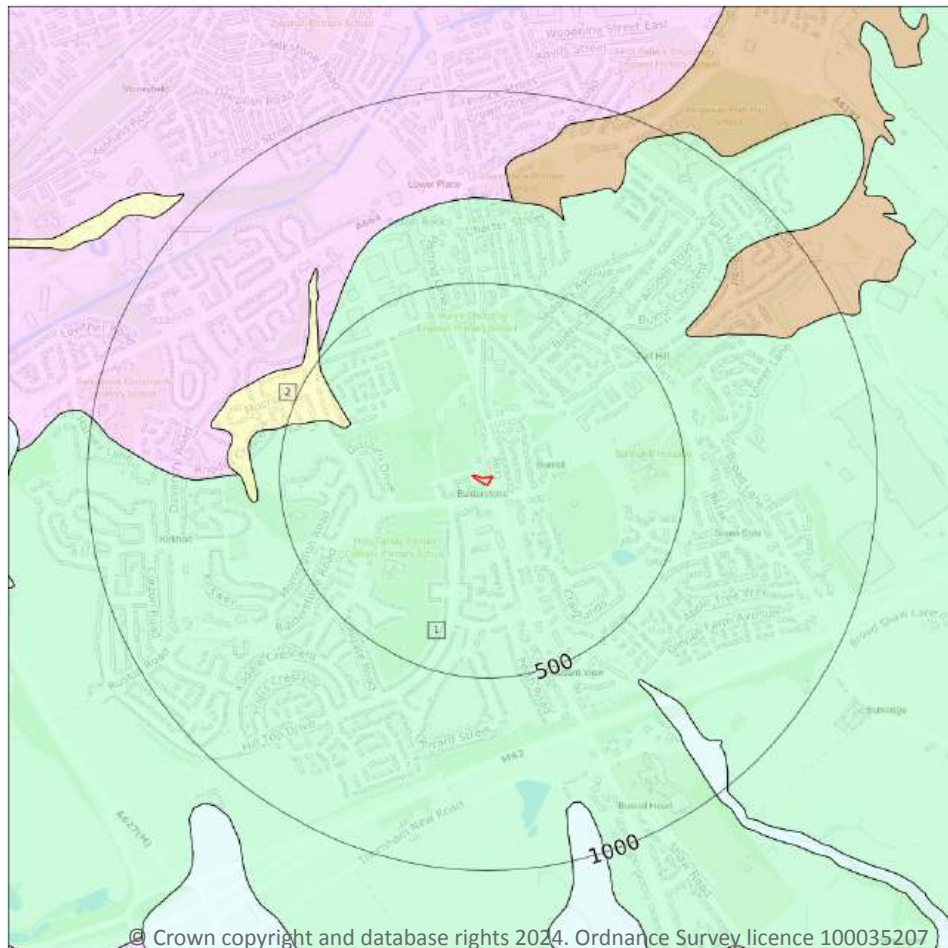
0

A qualitative classification of estimated rates of vertical movement of water from the ground surface through the unsaturated zone of any artificial deposits (the zone between the land surface and the water table).

This data is sourced from the British Geological Survey.



Geology 1:50,000 scale - Superficial



Site Outline

Search buffers in metres (m)

Landslip (50k)

Superficial geology (50k)
Please see table for more details.

15.4 Superficial geology (50k)

Records within 500m

2

Superficial geological deposits at 1:50,000 scale. Also known as 'drift', these are the youngest geological deposits, formed during the Quaternary. They rest on older deposits or rocks referred to as bedrock.

Features are displayed on the Geology 1:50,000 scale - Superficial map on [page 79 >](#)

ID	Location	LEX Code	Description	Rock description
1	On site	HMGDD-DMTN	HUMMOCKY (MOUNDY) GLACIAL DEPOSITS, DEVENSIAN	DIAMICTON
2	344m W	ALV-XCZSV	ALLUVIUM	CLAY, SILT, SAND AND GRAVEL

This data is sourced from the British Geological Survey.



15.5 Superficial permeability (50k)

Records within 50m

1

A qualitative classification of estimated rates of vertical movement of water from the ground surface through the unsaturated zone of any superficial deposits (the zone between the land surface and the water table).

Location	Flow type	Maximum permeability	Minimum permeability
On site	Mixed	High	Low

This data is sourced from the British Geological Survey.

15.6 Landslip (50k)

Records within 500m

0

Mass movement deposits on BGS geological maps at 1:50,000 scale. Primarily superficial deposits that have moved down slope under gravity to form landslips. These affect bedrock, other superficial deposits and artificial ground.

This data is sourced from the British Geological Survey.

15.7 Landslip permeability (50k)

Records within 50m

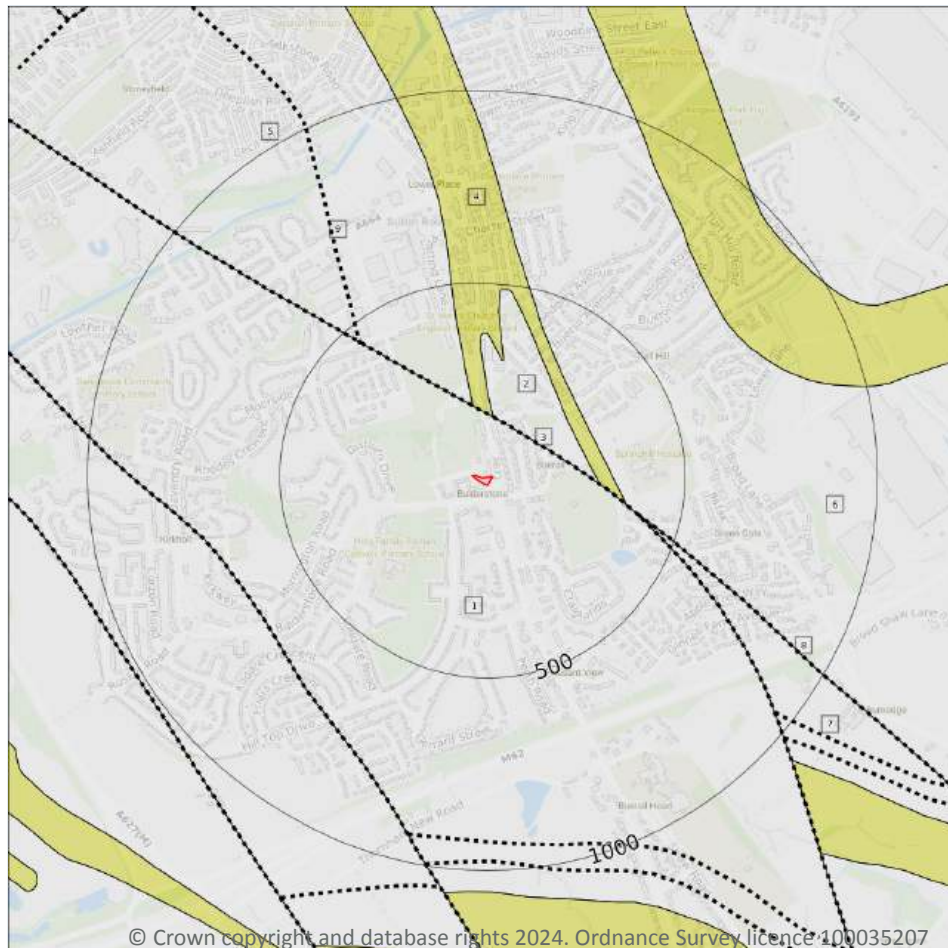
0

A qualitative classification of estimated rates of vertical movement of water from the ground surface through the unsaturated zone of any landslip deposits (the zone between the land surface and the water table).

This data is sourced from the British Geological Survey.



Geology 1:50,000 scale - Bedrock



Site Outline

Search buffers in metres (m)

..... Bedrock faults and other linear features (50k)

Bedrock geology (50k)
Please see table for more details.

15.8 Bedrock geology (50k)

Records within 500m

6

Bedrock geology at 1:50,000 scale. The main mass of rocks forming the Earth and present everywhere, whether exposed at the surface in outcrops or concealed beneath superficial deposits or water.

Features are displayed on the Geology 1:50,000 scale - Bedrock map on [page 81](#) >

ID	Location	LEX Code	Description	Rock age
1	On site	PLCM-MDSS	PENNINE LOWER COAL MEASURES FORMATION - MUDSTONE, SILTSTONE AND SANDSTONE	WESTPHALIAN
2	136m NE	PLCM-MDSS	PENNINE LOWER COAL MEASURES FORMATION - MUDSTONE, SILTSTONE AND SANDSTONE	WESTPHALIAN
4	156m N	OL-SDST	OLD LAWRENCE ROCK - SANDSTONE	WESTPHALIAN



ID	Location	LEX Code	Description	Rock age
5	181m N	PLCM-MDSS	PENNINE LOWER COAL MEASURES FORMATION - MUDSTONE, SILTSTONE AND SANDSTONE	WESTPHALIAN
6	280m NE	PLCM-MDSS	PENNINE LOWER COAL MEASURES FORMATION - MUDSTONE, SILTSTONE AND SANDSTONE	WESTPHALIAN
7	390m E	PLCM-MDSS	PENNINE LOWER COAL MEASURES FORMATION - MUDSTONE, SILTSTONE AND SANDSTONE	WESTPHALIAN

This data is sourced from the British Geological Survey.

15.9 Bedrock permeability (50k)

Records within 50m **1**

A qualitative classification of estimated rates of vertical movement of water from the ground surface through the unsaturated zone of bedrock (the zone between the land surface and the water table).

Location	Flow type	Maximum permeability	Minimum permeability
On site	Fracture	Moderate	Low

This data is sourced from the British Geological Survey.

15.10 Bedrock faults and other linear features (50k)

Records within 500m **3**

Linear features at the ground or bedrock surface at 1:50,000 scale of six main types; rock, fault, fold axis, mineral vein, alteration area or landform. Features are either observed or inferred, and relate primarily to bedrock.

Features are displayed on the Geology 1:50,000 scale - Bedrock map on [page 81](#) >

ID	Location	Category	Description
3	136m NE	FAULT	Fault, inferred
8	390m E	FAULT	Fault, inferred
9	449m NW	ROCK	Coal seam, inferred

This data is sourced from the British Geological Survey.



16 Boreholes

16.1 BGS Boreholes

Records within 250m

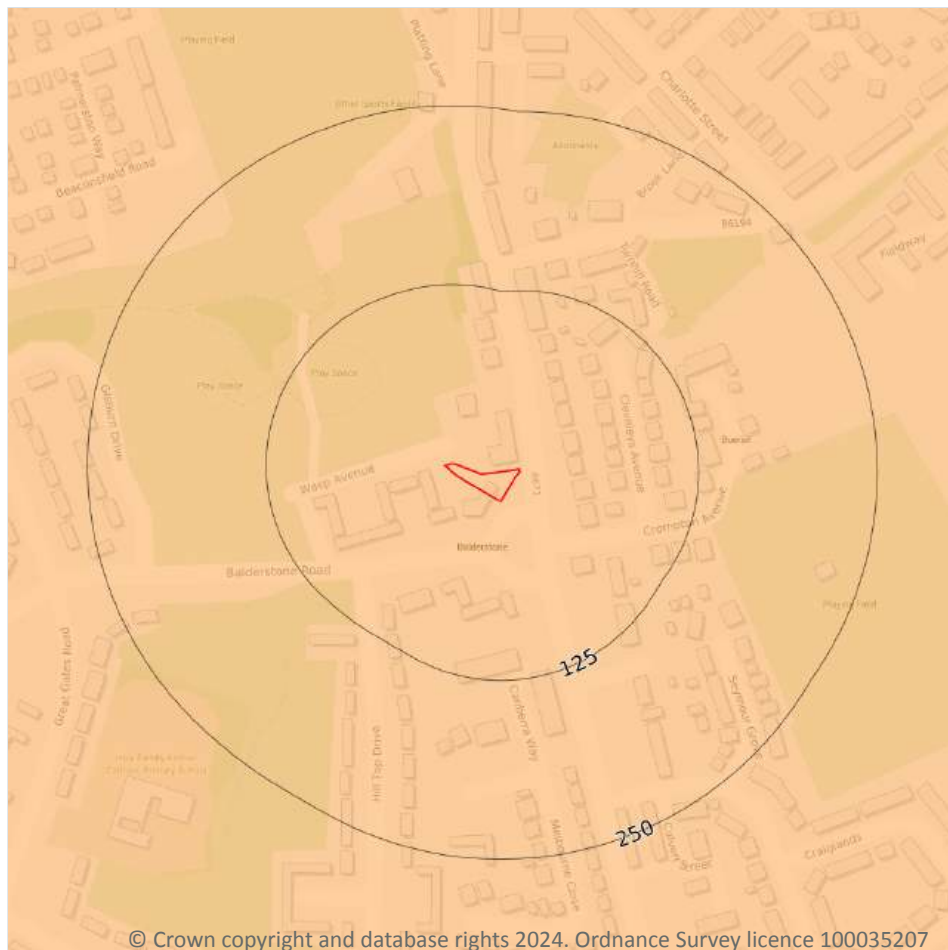
0

The Single Onshore Boreholes Index (SOBI); an index of over one million records of boreholes, shafts and wells from all forms of drilling and site investigation work held by the British Geological Survey. Covering onshore and nearshore boreholes dating back to at least 1790 and ranging from one to several thousand metres deep.

This data is sourced from the British Geological Survey.



17 Natural ground subsidence - Shrink swell clays



- Site Outline
- Search buffers in metres (m)
- ☐ No data
 - ☐ Negligible
 - ☐ Very low
 - ☐ Low
 - ☐ Moderate
 - ☐ High

17.1 Shrink swell clays

Records within 50m

1

The potential hazard presented by soils that absorb water when wet (making them swell), and lose water as they dry (making them shrink). This shrink-swell behaviour is controlled by the type and amount of clay in the soil, and by seasonal changes in the soil moisture content (related to rainfall and local drainage).

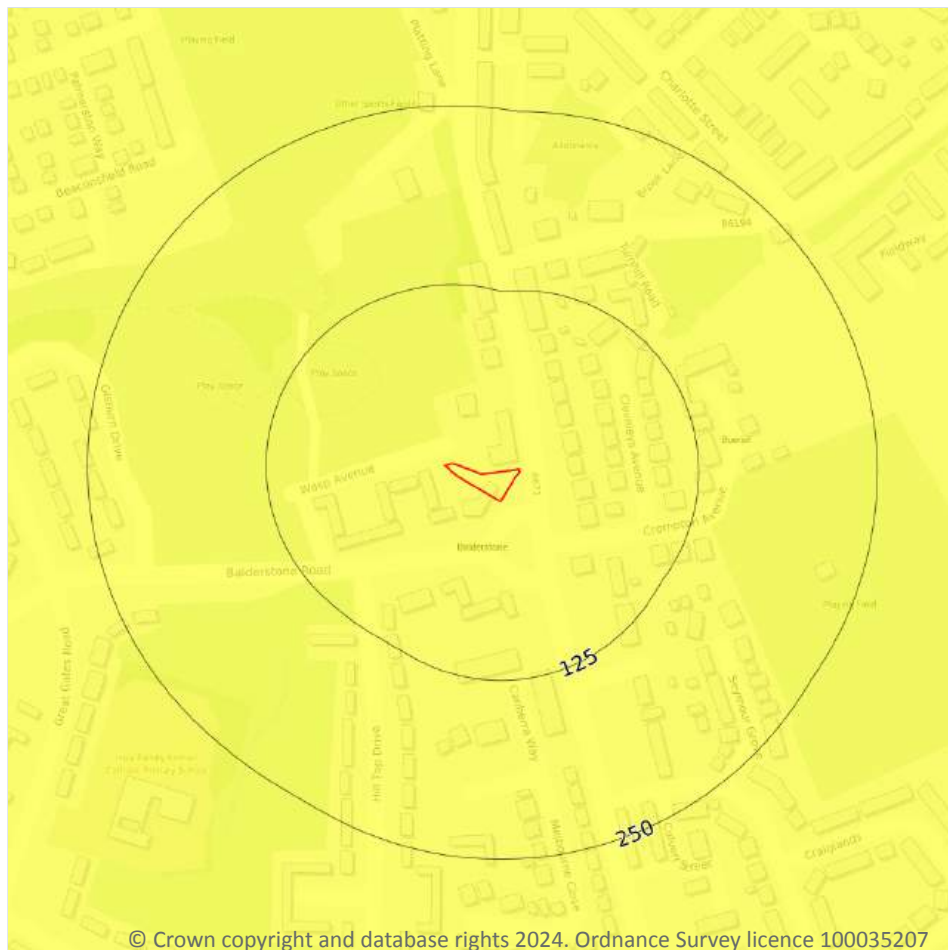
Features are displayed on the Natural ground subsidence - Shrink swell clays map on [page 84](#) >

Location	Hazard rating	Details
On site	Low	Ground conditions predominantly medium plasticity.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Running sands



- Site Outline
- Search buffers in metres (m)
- ☐ No data
 - ☐ Negligible
 - ☒ Very low
 - ☐ Low
 - ☐ Moderate
 - ☐ High

17.2 Running sands

Records within 50m

1

The potential hazard presented by rocks that can contain loosely-packed sandy layers that can become fluidised by water flowing through them. Such sands can 'run', removing support from overlying buildings and causing potential damage.

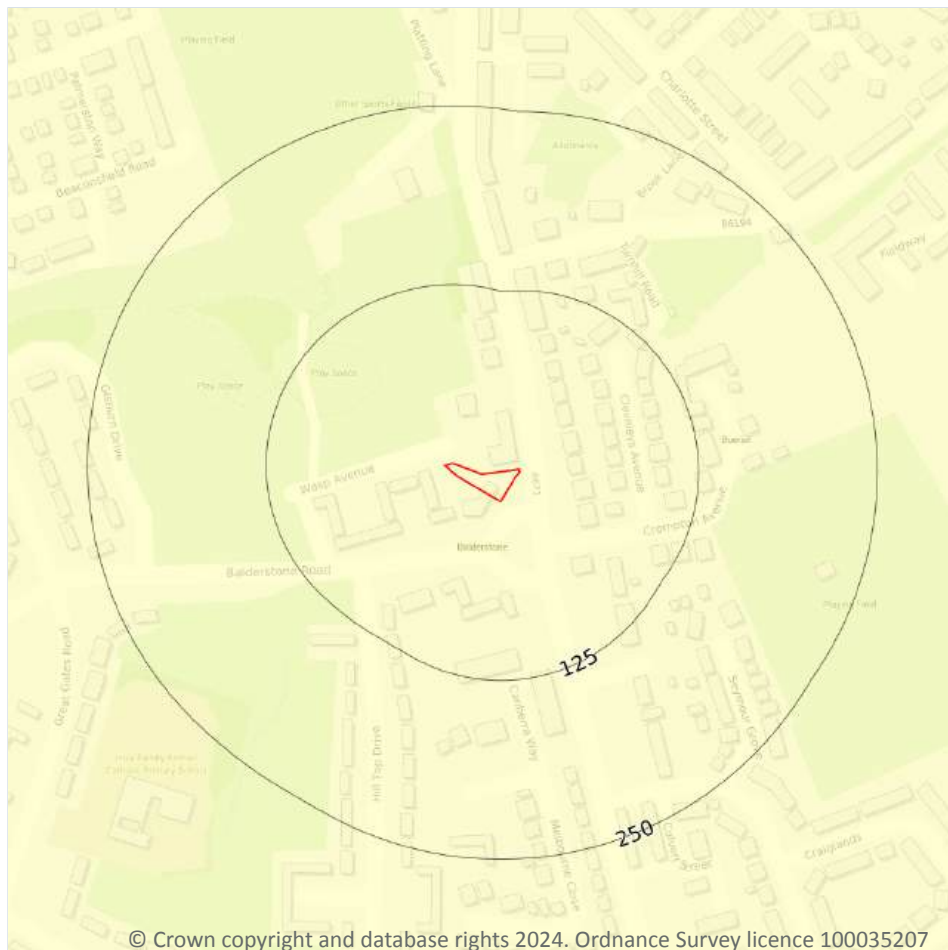
Features are displayed on the Natural ground subsidence - Running sands map on [page 85 >](#)

Location	Hazard rating	Details
On site	Very low	Running sand conditions are unlikely. No identified constraints on land use due to running conditions unless water table rises rapidly.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Compressible deposits



- Site Outline**
- Search buffers in metres (m)**
- ☐ No data
 - ☐ Negligible
 - ☐ Very low
 - ☐ Low
 - ☐ Moderate
 - ☐ High

17.3 Compressible deposits

Records within 50m

1

The potential hazard presented by types of ground that may contain layers of very soft materials like clay or peat and may compress if loaded by overlying structures, or if the groundwater level changes, potentially resulting in depression of the ground and disturbance of foundations.

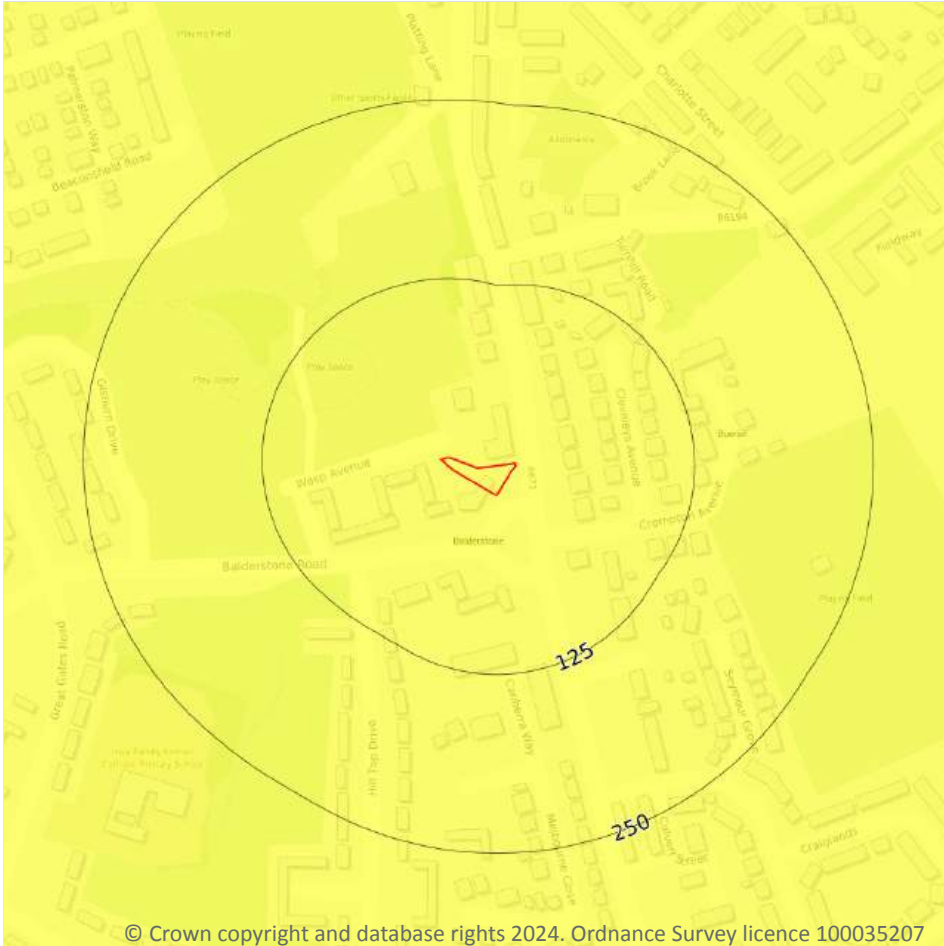
Features are displayed on the Natural ground subsidence - Compressible deposits map on [page 86 >](#)

Location	Hazard rating	Details
On site	Negligible	Compressible strata are not thought to occur.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Collapsible deposits



— Site Outline
Search buffers in metres (m)

- ☐ No data
- ☐ Negligible
- ☐ Very low
- ☐ Low
- ☐ Moderate
- ☐ High

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17.4 Collapsible deposits

Records within 50m

1

The potential hazard presented by natural deposits that could collapse when a load (such as a building) is placed on them or they become saturated with water.

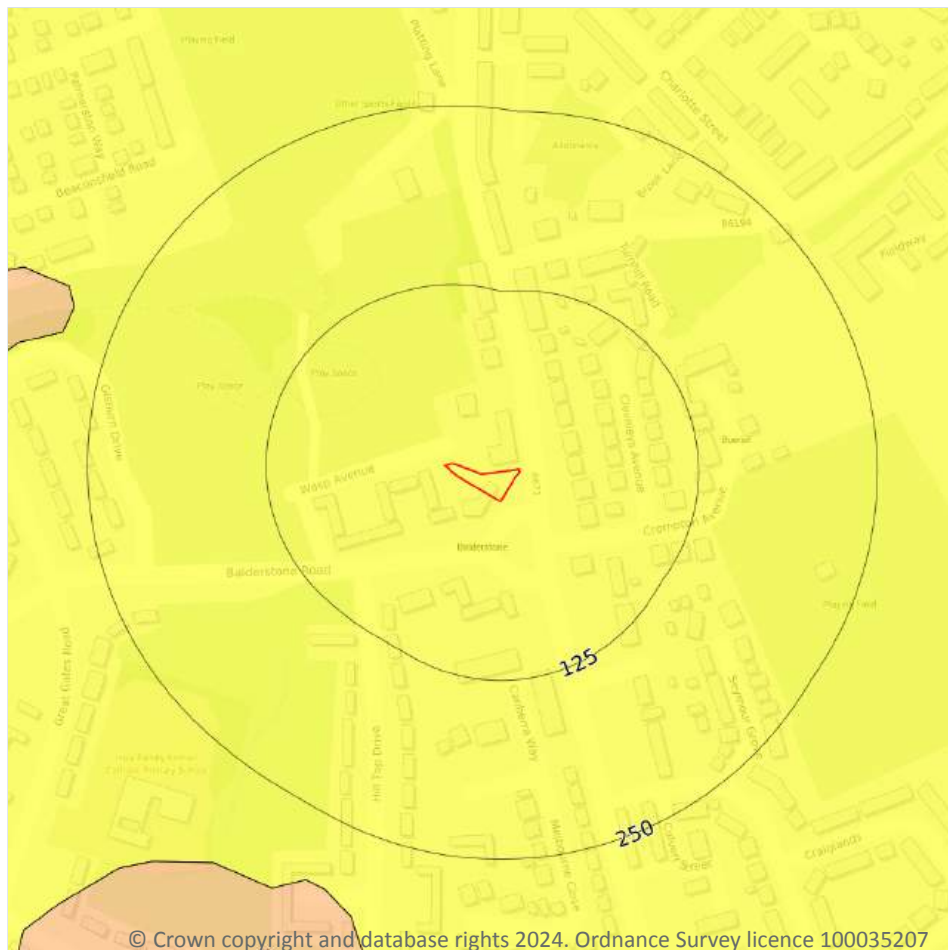
Features are displayed on the Natural ground subsidence - Collapsible deposits map on [page 87 >](#)

Location	Hazard rating	Details
On site	Very low	Deposits with potential to collapse when loaded and saturated are unlikely to be present.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Landslides



- Site Outline
- Search buffers in metres (m)
- ☐ No data
 - ☐ Negligible
 - ☐ Very low
 - ☐ Low
 - ☐ Moderate
 - ☐ High

17.5 Landslides

Records within 50m

1

The potential for landsliding (slope instability) to be a hazard assessed using 1:50,000 scale digital maps of superficial and bedrock deposits, combined with information from the BGS National Landslide Database and scientific and engineering reports.

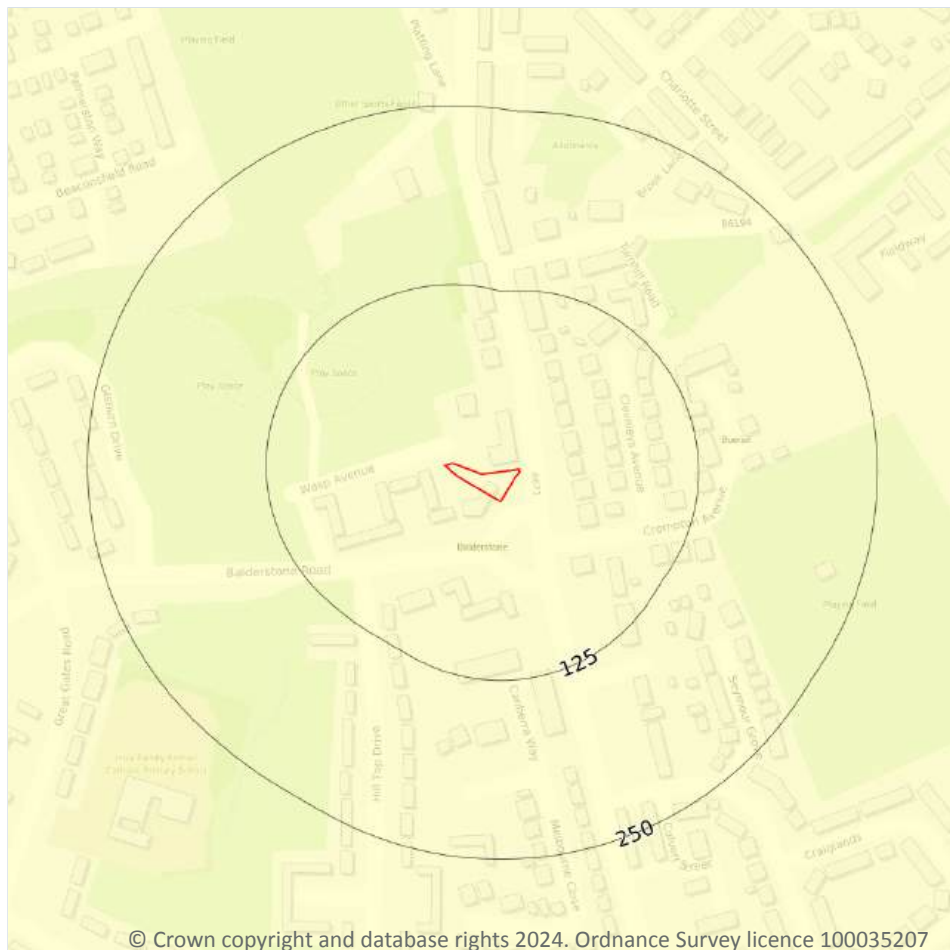
Features are displayed on the Natural ground subsidence - Landslides map on [page 88](#) >

Location	Hazard rating	Details
On site	Very low	Slope instability problems are not likely to occur but consideration to potential problems of adjacent areas impacting on the site should always be considered.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Ground dissolution of soluble rocks



- Site Outline
- Search buffers in metres (m)
- ☐ No data
 - ☐ Negligible
 - ☐ Very low
 - ☐ Low
 - ☐ Moderate
 - ☐ High

17.6 Ground dissolution of soluble rocks

Records within 50m

1

The potential hazard presented by ground dissolution, which occurs when water passing through soluble rocks produces underground cavities and cave systems. These cavities reduce support to the ground above and can cause localised collapse of the overlying rocks and deposits.

Features are displayed on the Natural ground subsidence - Ground dissolution of soluble rocks map on [page 89](#)

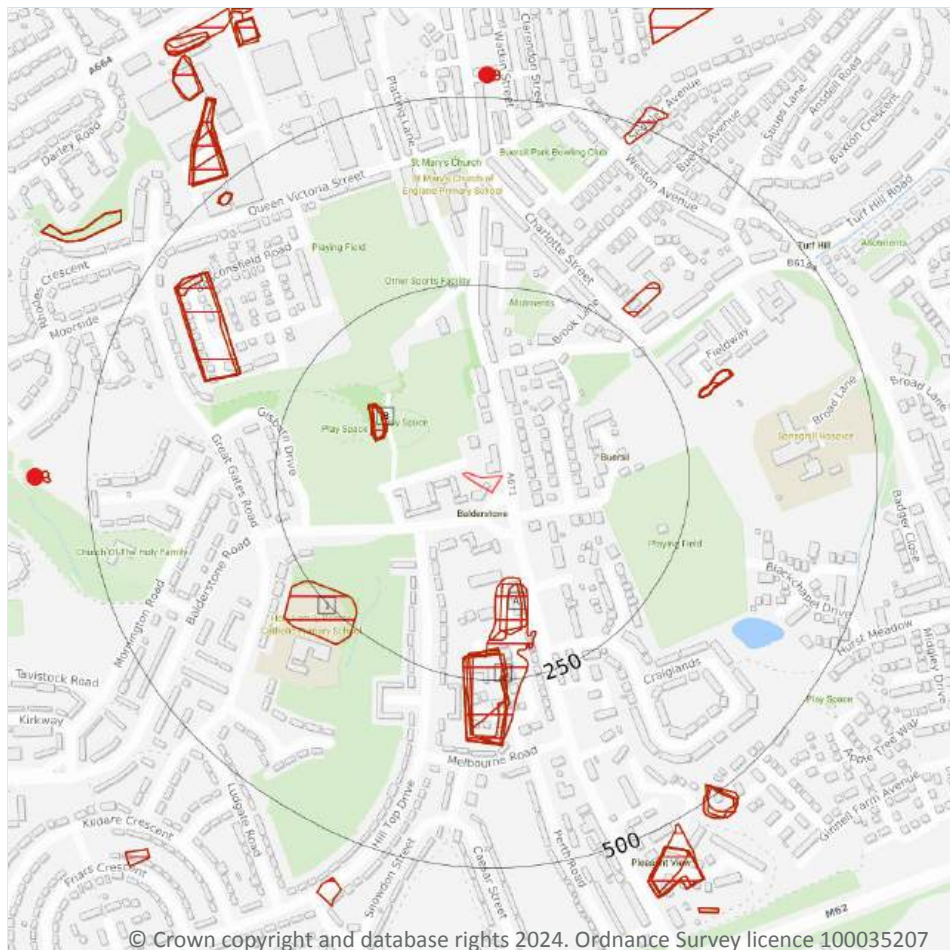
Location	Hazard rating	Details
On site	Negligible	Soluble rocks are either not thought to be present within the ground, or not prone to dissolution. Dissolution features are unlikely to be present.



This data is sourced from the British Geological Survey.



18 Mining and ground workings



- Site Outline
- Search buffers in metres (m)
- BritPits
- Surface ground workings
- Underground workings
- Underground mining extents
- Historical mineral planning areas
- TCA non-coal mining
- Non Coal Mining
 - Sporadic underground mining of restricted extent possible
 - Localised small scale underground mining possible
 - Small scale mining possible
 - Underground mining known or likely within or in close proximity
 - Underground mining known within or in very close proximity

18.1 BritPits

Records within 500m

0

BritPits (an abbreviation of British Pits) is a database maintained by the British Geological Survey of currently active and closed surface and underground mineral workings. Details of major mineral handling sites, such as wharfs and rail depots are also held in the database.

This data is sourced from the British Geological Survey.

18.2 Surface ground workings

Records within 250m

17

Historical land uses identified from Ordnance Survey mapping that involved ground excavation at the surface. These features may or may not have been subsequently backfilled.

Features are displayed on the Mining and ground workings map on [page 91](#) >

ID	Location	Land Use	Year of mapping	Mapping scale
A	115m S	Unspecified Heap	1907	1:10560
B	116m NW	Pond	1938	1:10560
B	116m NW	Pond	1928	1:10560
B	116m NW	Pond	1908	1:10560
B	116m NW	Pond	1891	1:10560
B	117m NW	Pond	1967	1:10560
B	117m NW	Pond	1954	1:10560
B	118m NW	Pond	1976	1:10000
A	122m S	Reservoir	1891	1:10560
C	125m S	Ponds	1851	1:10560
C	207m S	Reservoirs	1928	1:10560
C	207m S	Reservoirs	1938	1:10560
C	207m S	Reservoirs	1907	1:10560
C	210m S	Ponds	1967	1:10560
C	214m S	Reservoirs	1891	1:10560
C	216m S	Reservoirs	1954	1:10560
1	223m SW	Unspecified Heap	1976	1:10000

This data is sourced from Ordnance Survey/Groundsure.

18.3 Underground workings

Records within 1000m

0

Historical land uses identified from Ordnance Survey mapping that indicate the presence of underground workings e.g. mine shafts.

This data is sourced from Ordnance Survey/Groundsure.



18.4 Underground mining extents

Records within 500m

0

This data identifies underground mine workings that could present a potential risk, including adits and seam workings. These features have been identified from BGS Geological mapping and mine plans sourced from the BGS and various collections and sources.

This data is sourced from Groundsure.

18.5 Historical Mineral Planning Areas

Records within 500m

0

Boundaries of mineral planning permissions for England and Wales. This data was collated between the 1940s (and retrospectively to the 1930s) and the mid 1980s. The data includes permitted, withdrawn and refused permissions.

This data is sourced from the British Geological Survey.

18.6 Non-coal mining

Records within 1000m

0

The potential for historical non-coal mining to have affected an area. The assessment is drawn from expert knowledge and literature in addition to the digital geological map of Britain. Mineral commodities may be divided into seven general categories - vein minerals, chalk, oil shale, building stone, bedded ores, evaporites and 'other' commodities (including ball clay, jet, black marble, graphite and chert).

This data is sourced from the British Geological Survey.

18.7 JPB mining areas

Records on site

0

Areas which could be affected by former coal and other mining. This data includes some mine plans unavailable to the Coal Authority.

This data is sourced from Johnson Poole and Bloomer.

18.8 The Coal Authority non-coal mining

Records within 500m

0

This data provides an indication of the potential zone of influence of recorded underground non-coal mining workings. Any and all analysis and interpretation of Coal Authority Data in this report is made by Groundsure, and is in no way supported, endorsed or authorised by the Coal Authority. The use of the data is restricted to the terms and provisions contained in this report. Data reproduced in this report may be the copyright of the



Coal Authority and permission should be sought from Groundsure prior to any re-use.

This data is sourced from The Coal Authority.

18.9 Researched mining

Records within 500m

0

This data indicates areas of potential mining identified from alternative or archival sources, including; BGS Geological paper maps, Lidar data, aerial photographs (from World War II onwards), archaeological data services, websites, Tithe maps, and various text/plans from collected books and reports. Some of this data is approximate and Groundsure have interpreted the resultant risk area and, where possible, specific areas of risk have been captured.

This data is sourced from Groundsure.

18.10 Mining record office plans

Records within 500m

0

This dataset is representative of Mining Record Office and/or plan extents held by Groundsure and should be considered approximate. Where possible, plans have been located and any specific areas of risk they depict have been captured.

This data is sourced from Groundsure.

18.11 BGS mine plans

Records within 500m

0

This dataset is representative of BGS mine plans held by Groundsure and should be considered approximate. Where possible, plans have been located and any specific areas of risk they depict have been captured.

This data is sourced from Groundsure.

18.12 Coal mining

Records on site

1

Areas which could be affected by past, current or future coal mining.

Location	Details
On site	The site is located within a coal mining area as defined by the Coal Authority. A Consultants Coal Mining Report is recommended to further assess coal mining issues at the site. This can be ordered directly through Groundsure or your preferred search provider.

This data is sourced from the Coal Authority.



18.13 Brine areas

Records on site	0
-----------------	---

The Cheshire Brine Compensation District indicates areas that may be affected by salt and brine extraction in Cheshire and where compensation would be available where damage from this mining has occurred. Damage from salt and brine mining can still occur outside this district, but no compensation will be available.

This data is sourced from the Cheshire Brine Subsidence Compensation Board.

18.14 Gypsum areas

Records on site	0
-----------------	---

Generalised areas that may be affected by gypsum extraction.

This data is sourced from British Gypsum.

18.15 Tin mining

Records on site	0
-----------------	---

Generalised areas that may be affected by historical tin mining.

This data is sourced from Groundsure.

18.16 Clay mining

Records on site	0
-----------------	---

Generalised areas that may be affected by kaolin and ball clay extraction.

This data is sourced from the Kaolin and Ball Clay Association (UK).

19 Ground cavities and sinkholes

19.1 Natural cavities

Records within 500m

0

Industry recognised national database of natural cavities. Sinkholes and caves are formed by the dissolution of soluble rock, such as chalk and limestone, gulls and fissures by cambering. Ground instability can result from movement of loose material contained within these cavities, often triggered by water.

This data is sourced from Stantec UK Ltd.

19.2 Mining cavities

Records within 1000m

0

Industry recognised national database of mining cavities. Degraded mines may result in hazardous subsidence (crown holes). Climatic conditions and water escape can also trigger subsidence over mine entrances and workings.

This data is sourced from Stantec UK Ltd.

19.3 Reported recent incidents

Records within 500m

0

This data identifies sinkhole information gathered from media reports and Groundsure's own records. This data goes back to 2014 and includes relative accuracy ratings for each event and links to the original data sources. The data is updated on a regular basis and should not be considered a comprehensive catalogue of all sinkhole events. The absence of data in this database does not mean a sinkhole definitely has not occurred during this time.

This data is sourced from Groundsure.

19.4 Historical incidents

Records within 500m

0

This dataset comprises an extract of 1:10,560, 1:10,000, 1:2,500 and 1:1,250 scale historical Ordnance Survey maps held by Groundsure, dating back to the 1840s. It shows shakeholes, deneholes and other 'holes' as noted on these maps. Dene holes are medieval chalk extraction pits, usually comprising a narrow shaft with a number of chambers at the base of the shaft. Shakeholes are an alternative name for suffusion sinkholes, most commonly found in the limestone landscapes of North Yorkshire but also extensively noted around the Brecon Beacons National Park.

Not all 'holes' noted on Ordnance Survey mapping will necessarily be present within this dataset.



This data is sourced from Groundsure.

19.5 National karst database

Records within 500m

0

This is a comprehensive database of national karst information gathered from a wide range of sources. BGS have collected data on five main types of karst feature: Sinkholes, stream links, caves, springs, and incidences of associated damage to buildings, roads, bridges and other engineered works.

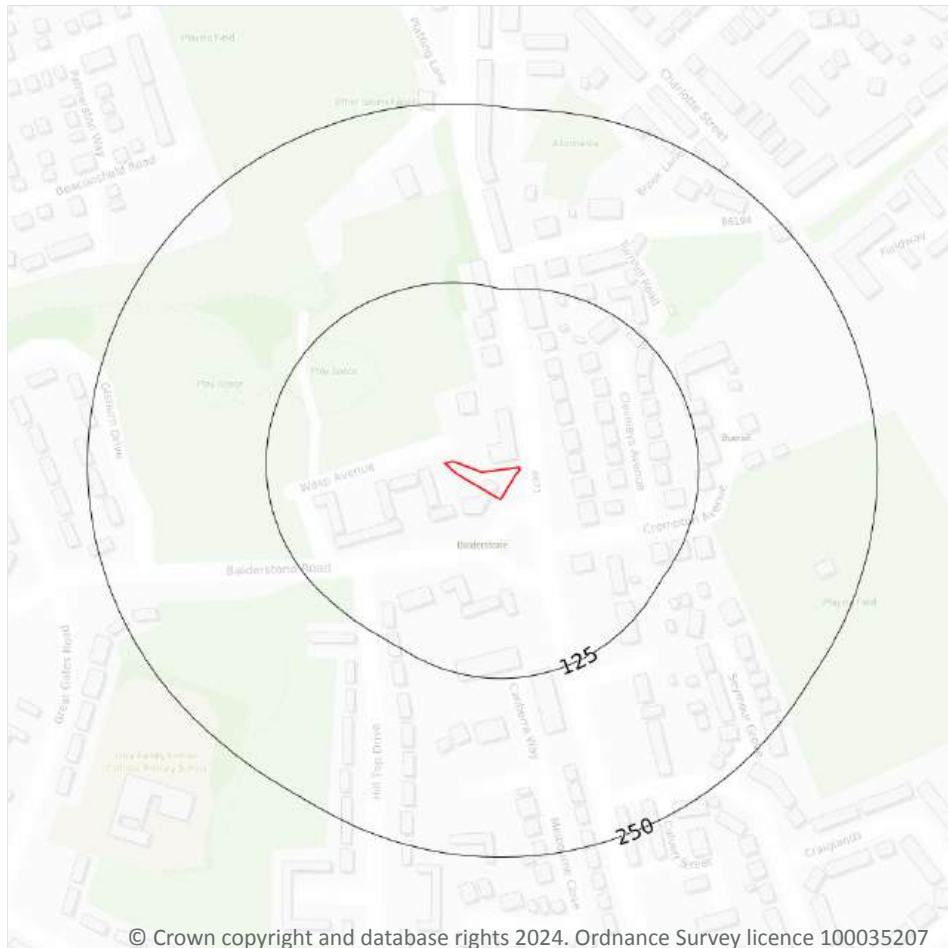
Since the database was set up in 2002 data covering most of the evaporite karst areas of the UK have now been added, along with data covering about 60% of the Chalk, and 35% of the Carboniferous Limestone outcrops. Many of the classic upland karst areas have yet to be included. Recorded so far are: Over 800 caves, 1300 stream sinks, 5600 springs, 10,000 sinkholes.

The database is not yet complete, and not all records have been verified. The absence of data does not mean that karst features are not present at a site. A reliability rating is included with each record.

This data is sourced from the British Geological Survey.



20 Radon



— Site Outline
Search buffers in metres (m)

- Greater than 30%
- Between 10% and 30%
- Between 5% and 10%
- Between 3% and 5%
- Between 1% and 3%
- Less than 1%

20.1 Radon

Records on site

1

The Radon Potential data classifies areas based on their likelihood of a property having a radon level at or above the Action Level in Great Britain. The dataset is intended for use at 1:50,000 scale and was derived from both geological assessments and indoor radon measurements (more than 560,000 records). A minimum 50m buffer should be considered when searching the maps, as the smallest detectable feature at this scale is 50m. The findings of this section should supersede any estimations derived from the Indicative Atlas of Radon in Great Britain (1:100,000 scale).

Features are displayed on the Radon map on [page 98](#) >

Location	Estimated properties affected	Radon Protection Measures required
On site	Less than 1%	None



This data is sourced from the British Geological Survey and UK Health Security Agency.



21 Soil chemistry

21.1 BGS Estimated Background Soil Chemistry

Records within 50m

2

The estimated values provide the likely background concentration of the potentially harmful elements Arsenic, Cadmium, Chromium, Lead and Nickel in topsoil. The values are estimated primarily from rural topsoil data collected at a sample density of approximately 1 per 2 km². In areas where rural soil samples are not available, estimation is based on stream sediment data collected from small streams at a sampling density of 1 per 2.5 km²; this is the case for most of Scotland, Wales and southern England. The stream sediment data are converted to soil-equivalent concentrations prior to the estimation.

Location	Arsenic	Bioaccessible Arsenic	Lead	Bioaccessible Lead	Cadmium	Chromium	Nickel
On site	15 - 25 mg/kg	No data	100 - 200 mg/kg	60 - 120 mg/kg	1.8 mg/kg	60 - 90 mg/kg	15 - 30 mg/kg
14m E	15 - 25 mg/kg	No data	100 - 200 mg/kg	60 - 120 mg/kg	1.8 mg/kg	60 - 90 mg/kg	15 - 30 mg/kg

This data is sourced from the British Geological Survey.

21.2 BGS Estimated Urban Soil Chemistry

Records within 50m

0

Estimated topsoil chemistry of Arsenic, Cadmium, Chromium, Copper, Nickel, Lead, Tin and Zinc and bioaccessible Arsenic and Lead in 23 urban centres across Great Britain. These estimates are derived from interpolation of the measured urban topsoil data referred to above and provide information across each city between the measured sample locations (4 per km²).

This data is sourced from the British Geological Survey.

21.3 BGS Measured Urban Soil Chemistry

Records within 50m

0

The locations and measured total concentrations (mg/kg) of Arsenic, Cadmium, Chromium, Copper, Nickel, Lead, Tin and Zinc in urban topsoil samples from 23 urban centres across Great Britain. These are collected at a sample density of 4 per km².

This data is sourced from the British Geological Survey.



22 Railway infrastructure and projects

22.1 Underground railways (London)

Records within 250m**0**

Details of all active London Underground lines, including approximate tunnel roof depth and operational hours.

This data is sourced from publicly available information by Groundsure.

22.2 Underground railways (Non-London)

Records within 250m**0**

Details of the Merseyrail system, the Tyne and Wear Metro and the Glasgow Subway. Not all parts of all systems are located underground. The data contains location information only and does not include a depth assessment.

This data is sourced from publicly available information by Groundsure.

22.3 Railway tunnels

Records within 250m**0**

Railway tunnels taken from contemporary Ordnance Survey mapping.

This data is sourced from the Ordnance Survey.

22.4 Historical railway and tunnel features

Records within 250m**0**

Railways and tunnels digitised from historical Ordnance Survey mapping as scales of 1:1,250, 1:2,500, 1:10,000 and 1:10,560.

This data is sourced from Ordnance Survey/Groundsure.

22.5 Royal Mail tunnels

Records within 250m**0**

The Post Office Railway, otherwise known as the Mail Rail, is an underground railway running through Central London from Paddington Head District Sorting Office to Whitechapel Eastern Head Sorting Office. The line is 10.5km long. The data includes details of the full extent of the tunnels, the depth of the tunnel, and the depth to track level.



This data is sourced from Groundsure/the Postal Museum.

22.6 Historical railways

Records within 250m

0

Former railway lines, including dismantled lines, abandoned lines, disused lines, historic railways and razed lines.

This data is sourced from OpenStreetMap.

22.7 Railways

Records within 250m

0

Currently existing railway lines, including standard railways, narrow gauge, funicular, trams and light railways.

This data is sourced from Ordnance Survey and OpenStreetMap.

22.8 Crossrail 2

Records within 500m

0

Crossrail 2 is a proposed railway linking the national rail networks in Surrey and Hertfordshire via an underground tunnel through London.

This data is sourced from publicly available information by Groundsure.

22.9 HS2

Records within 500m

0

HS2 is a proposed high speed rail network running from London to Manchester and Leeds via Birmingham. Main civils construction on Phase 1 (London to Birmingham) of the project began in 2019, and it is currently anticipated that this phase will be fully operational by 2026. Construction on Phase 2a (Birmingham to Crewe) is anticipated to commence in 2021, with the service fully operational by 2027. Construction on Phase 2b (Crewe to Manchester and Birmingham to Leeds) is scheduled to begin in 2023 and be operational by 2033.

This data is sourced from HS2 Ltd.



Data providers

Groundsure works with respected data providers to bring you the most relevant and accurate information. To find out who they are and their areas of expertise see <https://www.groundsure.com/sources-reference> ↗.

Terms and conditions

Groundsure's Terms and Conditions can be accessed at this link: www.groundsure.com/terms-and-conditions-april-2023/ ↗.



APPENDIX C

POTENTIAL RECEPTOR	COMMENTS	Include in PCM
PROPERTY: Other		
On Site		
Crops	None intended on site	✗
Domestic Produce	May be grown in residential gardens	✓
Livestock	None anticipated on site	✗
Domestic Animals	May be owned by residents	✓
Game	None on site	✗
Off Site		
Crops	Not Applicable	✓
Domestic Produce	Possibly in houses in vicinity of the site	✓
Livestock	Not Applicable	✓
Domestic Animals	May belong to adjacent residents	✓
Game	Unlikely	✗
PROPERTY: Buildings		
On Site		
	Residential Properties, services, flora	✓
Off Site		
	Residential Properties, services, flora	✓
HUMANS		
On Site		
Residents	Future Residents	✓
Construction workers	During ground excavations	✓
Employees	Landscape Gardeners	✓
Surface water users	No current surface water abstractions located on site	✗
Off Site		
Residents	Residents adjacent to the site	✓
Recreational users	Recreational walkers	✓
Groundwater users	No groundwater abstractions within 250 m.	✗
Controlled Waters		
On Site		
Surface Waters	There are no surface water features on site	✗
Groundwater	The underlying superficial geology and bedrock Aquifer are classified as a Secondary A Aquifer. These both represent significant potential receptor.	✓
Off Site		
Controlled Waters	There are 8 surface water features within 250 m of the site. The closest water feature is located some 32 m north-west of the site. However there level at which the river is located has not been provided. The most significant feature within 250 m is Sudden Brook located some 33 m east of the site. All represent potential receptors	✓
Ecological Systems		
On/Off Site		
SSSIs, national nature reserves, SACs etc	None on site or located within 250 m of the site	✗

Table A: Potential Receptors to be Considered in the Preliminary Conceptual Mode

Link	Source	Hazard	Transport Mechanism	Pathway	Medium of Exposure	Receptor	Risk Summary*
1	Contaminated soils	Direct contact /ingestion of soil or dust	Direct contact with contaminated soil	Dermal contact/ingestion of soil at surface	Soil	Humans (on-site/off-site), domestic pets	Low
2	Contaminated soils	Particulate inhalation	Wind blown particulates	Inhalation of particulates	Air	Humans (on-site/off-site), domestic pets	Low
3	Contaminated Soils	Impaired produce growth	Uptake of contaminants by homegrown produce resulting in loss	Uptake during growth	Vegetable produce	Property (domestic produce)	Low
4	Contaminated Soils	Ingestion of Contaminants	Uptake of contaminants by homegrown produce	Consumption of homegrown produce	Vegetable produce	Humans	Low
5	Contaminated Soils/coal measures	Inhalation of Ground Gas	Degradation of contaminants generating ground gas through unsaturated zone to soil leading to inhalation	Inhalation of Gases	Air	Humans (on-site/off-site, domestic pets)	Medium
6	Contaminated Soils	Vapour Inhalation	Volatilisation of organic compounds through unsaturated zone of soil leading to inhalation	Inhalation of Vapours	Air	Humans (on-site/off-site, domestic pets)	Low
7	Contaminated Soils	Damage to structure/services	Direct contact of contaminants with building structures/services	Direct contact	Soil/Water	Flora, services	Low
8	Contaminated Soils	Degradation of perched water quality	Dissolution or suspension of contaminants into perched waters and migration to on-site and off-site receptors	Dissolution or Suspension	Water	Perched Waters, surface waters	Low
9	Contaminated Soils	Pollution of underlying groundwater	Dissolution or suspension of contaminants into groundwaters	Dissolution or Suspension	Water	Groundwaters	Low

Table B: Preliminary Conceptual Model

***Relative Risk Screening and Prioritisation for further Investigation & or Assessment**

High	Higher probability of occurrence and identification of primary sources of contamination with respect to most sensitive receptors.
Medium	Pollutant linkage generally dependent on the presence of other primary pollutant linkages and/or where pollutant linkage generally associated with less sensitive receptors.
Low	Lower probability of occurrence such as based on requirement for significant migration pathway or where pollutant linkage requires the presence of source contaminants at concentration likely to be much higher than other identified pollutant linkages.

APPENDIX D



P1: A view looking east across the site



P2: A metal skip filled with household waste and a soil stockpile in the eastern corner of the site.



P3: Sparse areas of short grasses and exposed soils across the site



P4: Tarmacadam driveway leading off Wasp Lane in the west of the site.



P5: A view looking south across the southern section of the site



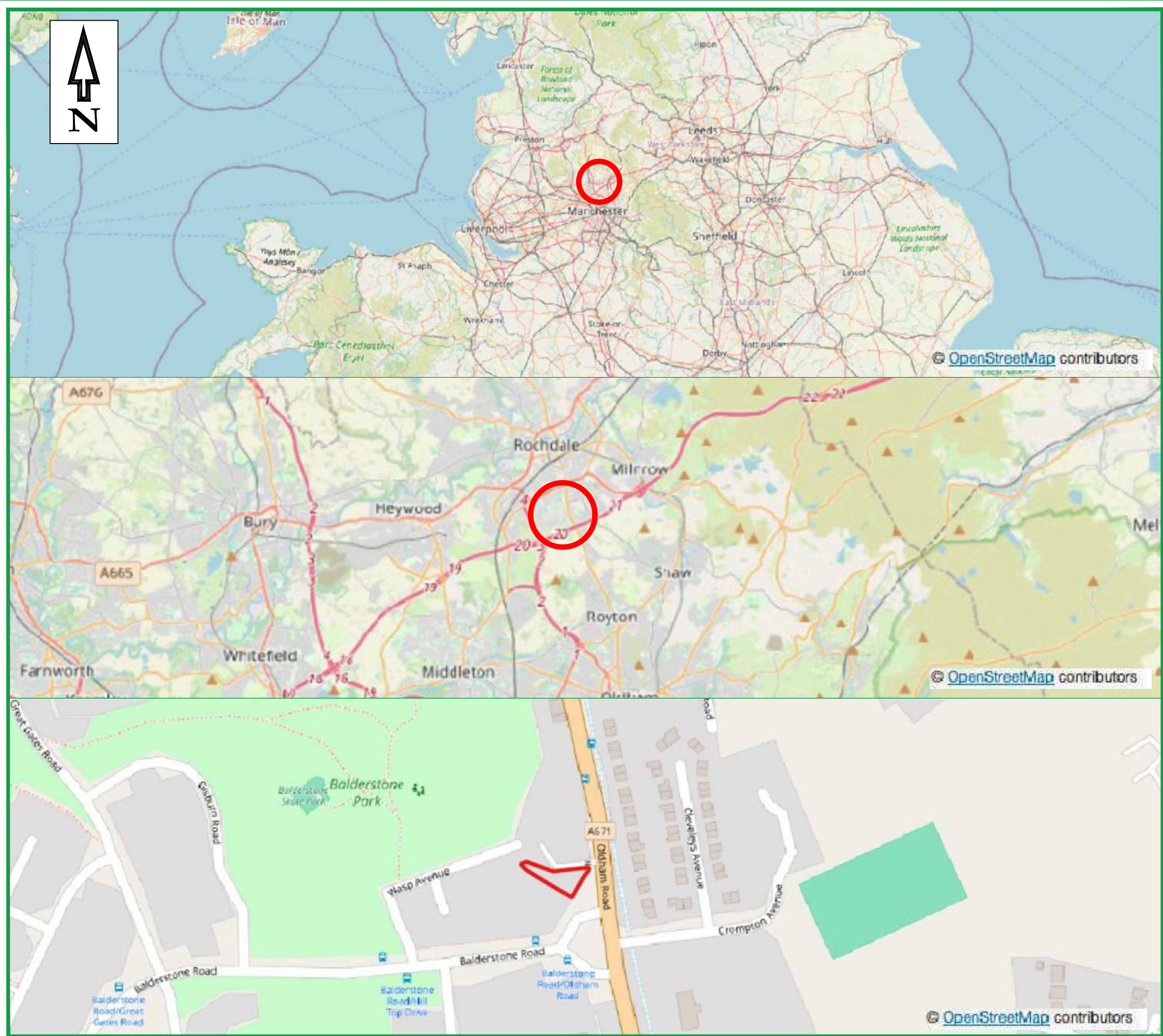
P6: A view looking north-west across the site.

Comments:



		Photographs 1 to 6		
This appendix is for illustrative purposes only and is for use only in conjunction with associated reports relating to the project	Site: Land at 2 Balderstone Road, Rochdale	Project No: 019	Created By: MLM	Date: November 2024
	Title: Appendix D - Site Photographs	Client: Lee Martin		

APPENDIX E



LEGEND

— SITE LOCATION

REV	DESCRIPTION	DATE	BY



No 2 Landwick Court, Metcalf Drive, Altham Business Park, Lancashire, BB5 5GY
Tel: 01254 377622 Mob: 07906753583
Email: mbuckley@bekenviro.co.uk
Web: www.bekenviro.co.uk

CLIENT.	HME CIVIL ENGINEERING CONSULTANTS
---------	-----------------------------------

JOB TITLE.	LAND AT 2 BALDERSTONE ROAD, ROCHDALE
------------	--------------------------------------

DRAWING TITLE.	SITE LOCATION PLAN
----------------	--------------------

SCALE © A3. N'TS	DRAWN BY. D.E.	APPROVED BY. M.B.	DATE. 18/11/24
DRAWING No.	24154-1	REV.	-



Aerial photography supplied by Getmapping PLC. © Copyright Getmapping PLC 2024. All Rights Reserved.

LEGEND

— SITE FOOTPRINT

REV	DESCRIPTION	DATE	BY



GEO-ENVIRONMENTAL CONSULTING
No 2 Landwick Court, Metcalf Drive, Altham Business
Park, Lancashire, BB5 5GY
Tel: 01254 377622 Mob: 07906753583
Email: mbuckley@bekenviro.co.uk
Web: www.bekenviro.co.uk

CLIENT.	HME CIVIL ENGINEERING CONSULTANTS
---------	--------------------------------------

JOB TITLE.	LAND AT 2 BALDERSTONE ROAD, ROCHDALE
------------	---

DRAWING TITLE.	SITE LAYOUT PLAN
----------------	------------------

SCALE © A3. NTS	DRAWN BY. D.E.	APPROVED BY. M.B.	DATE. 18/11/24
DRAWING No.	24154-2	REV.	-

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The contract for the works is between the client and his / her contractor. Contractor to visit site, study the details provided within the drawing and be familiar with both the work to be carried out in accordance with the details provided. Any stated dimension must be checked prior to any form of construction. All works and materials to comply with all relevant British Standards and carry a genuine BBA certificate. The materials specified within this drawing are a guide for the contractor as they are recognised materials with genuine BBA certificates etc. Any contractor who decides to use any different materials than that noted on the drawing must inform James Campbell Associates Ltd.

Any discrepancies discovered or items found that were not visible at the time of the initial survey should be reported to James Campbell Associates Ltd for consultation with our client.

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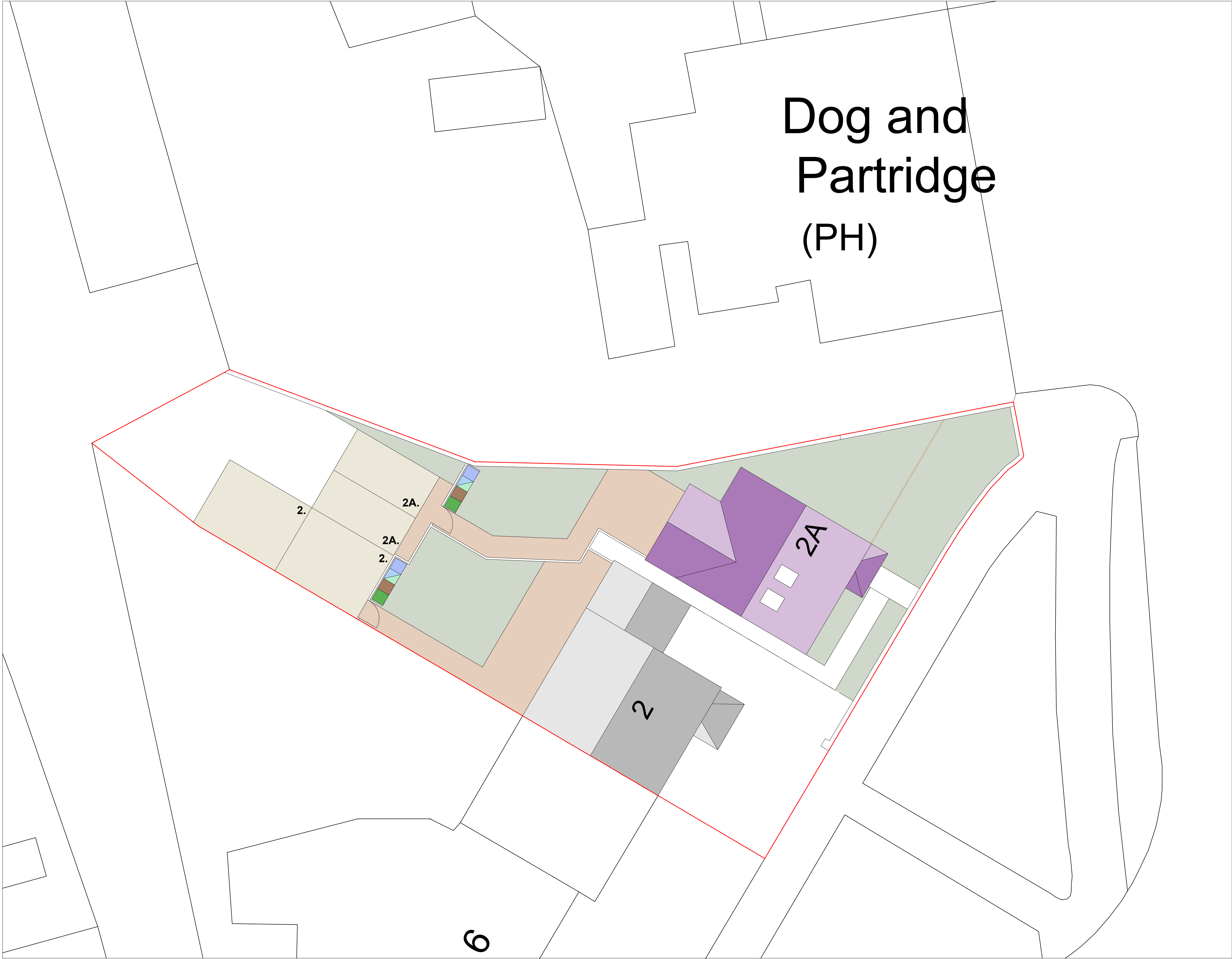
EXISTING SITE PLAN

EXISTING SITE PLAN

PROPOSED NEW DWELLING

**Land @ 2 Balderstone Road
Rochdale**

DRAWING NUMBER:-
23.3148.1



PROPOSED SITE PLAN

This drawing is provided as a document to gain either Planning Permission or Building Regulation approval purposes only. It is not a guarantee that Planning Permission will be granted.

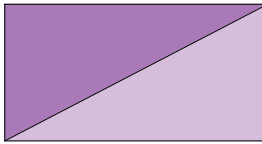
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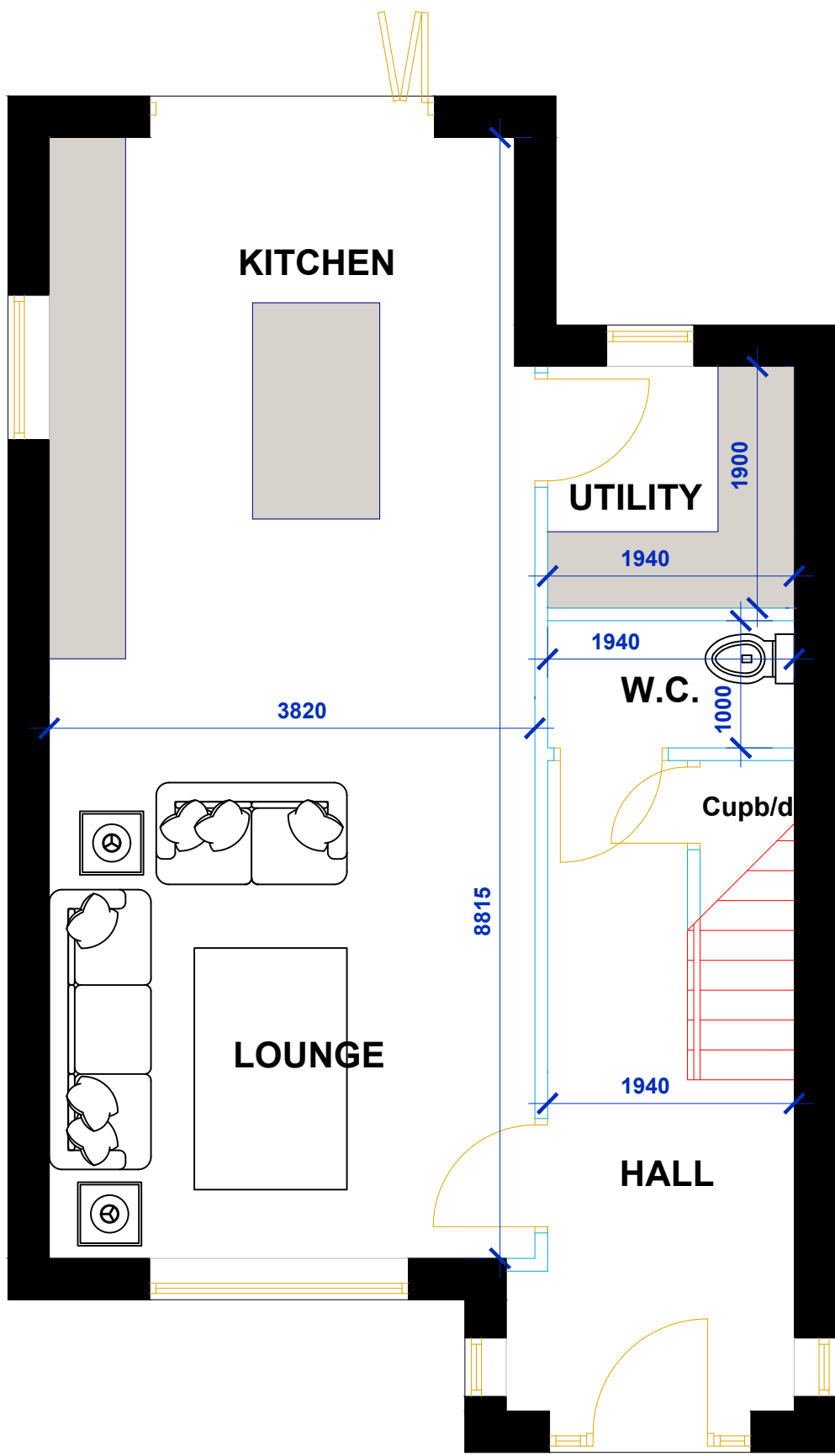
Any discrepancies discovered or items found that where not visible at the time of the initial survey should be reported to James Campbell Associates Ltd for consultation with our client.

CONSTRUCTION NOTES:-

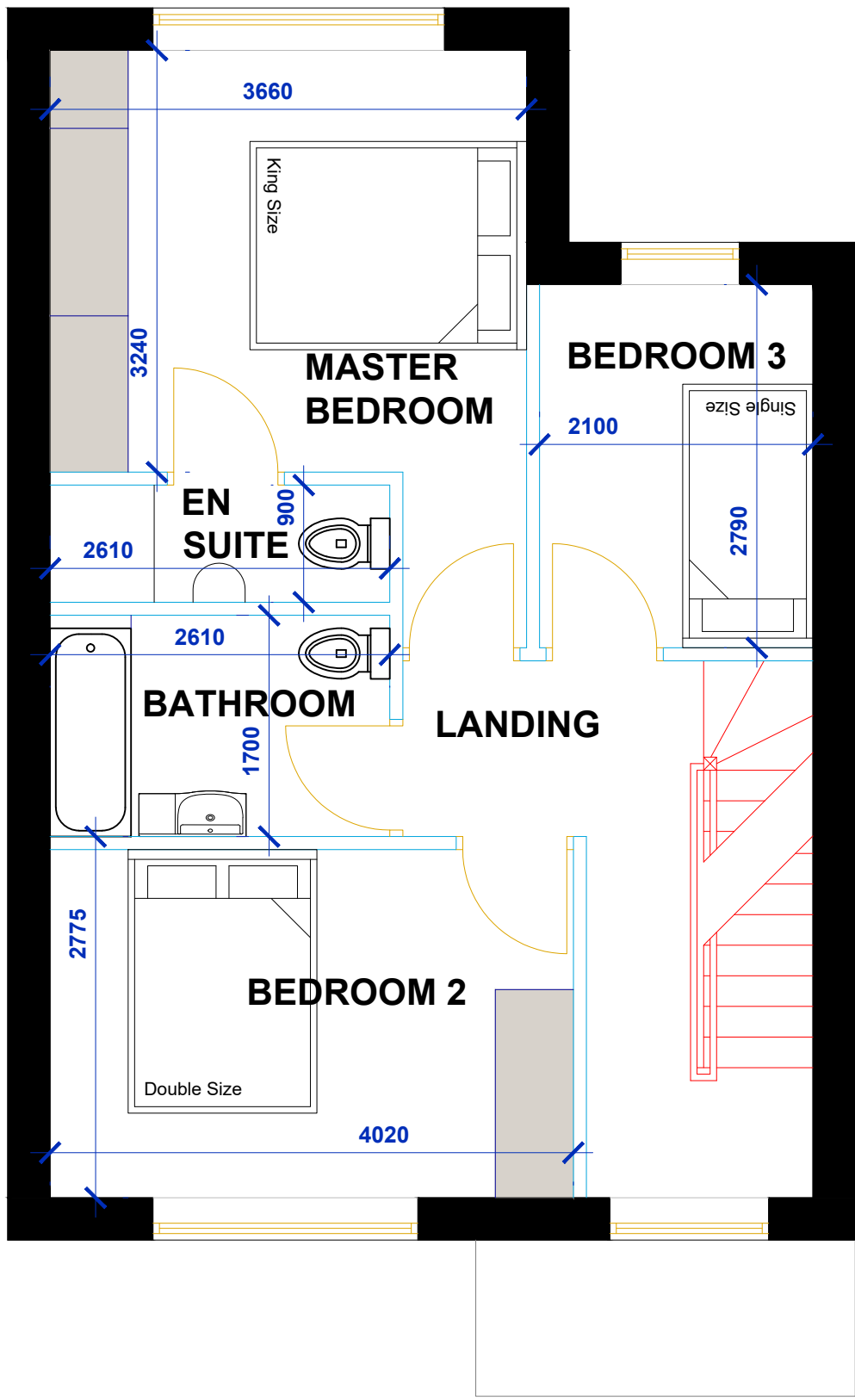
Key

-  Proposed Dwelling
-  Proposed Landscaping
-  Proposed Patio & Paths
-  Proposed Patio & Paths

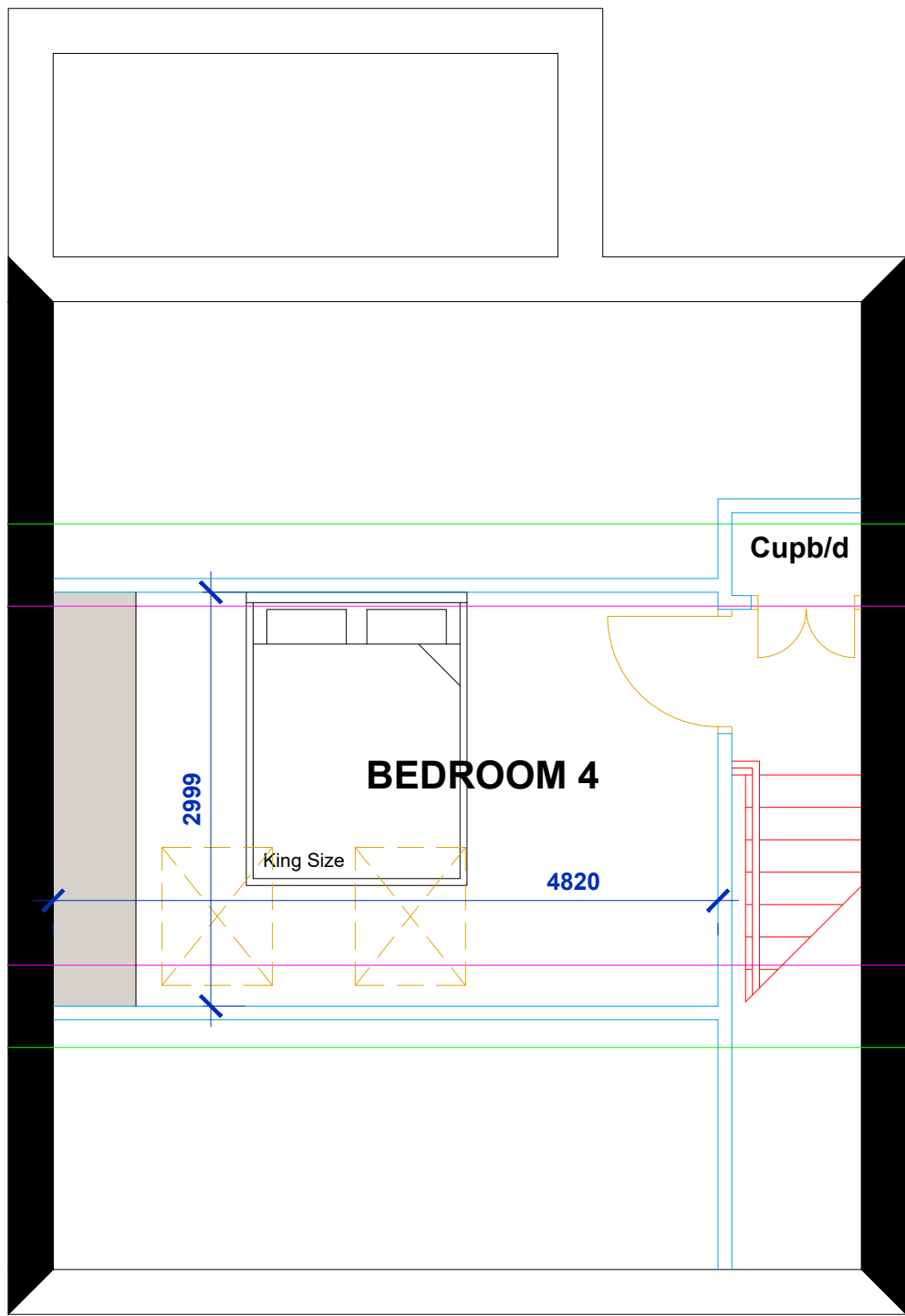
DRAWING TITLE		
PROPOSED SITE PLAN		
 JAMES CAMPBELL ASSOCIATES LTD CHARTERED ARCHITECTURAL SERVICES  Campbell House 173 Rochdale Road Firgrove Rochdale OL16 3BN Tel: 01706 354888 Mob: 07817 623183 Email: admin@jamescampbellassociates.co.uk Web: www.jamescampbellassociates.co.uk		
PROJECT		
PROPOSED NEW DWELLING		
LOCATION		
Land @ 2 Balderstone Road Rochdale		
DRAWN:-	Aiden Phillips-Whalley	DRAWING NUMBER:-
DATE:-	October 2023	23.3148.SC1.1 B
SCALE:-	1:100 @ A1	
ISSUE:-	B	



PROPOSED GROUND FLOOR PLAN



PROPOSED FIRST FLOOR PLAN



PROPOSED SECOND FLOOR PLAN

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CONSTRUCTION NOTES:-

AREA SCHEDULE

Ground Floor

Hall 9.4m²
Cupboard 0.9m²
W.C. 1.9m²
Lounge & Kitchen 33.6m²
Utility 3.6m²

First Floor

Master Bedroom 13.14m²
En Suite 2.34m²
Landing 9m²
Bathroom 4.4m²
Bedroom 2 11m²
Bedroom 3 5.8m²

Second Floor

Landing 1.1m²
Cupboard 0.6m²
Bedroom 4 14m²

Total Internal Floor Space = 116.5m²

National Space Standards - 5p, 4b dwelling = 90m²

DRAWING TITLE

SCHEME 1 - PROPOSED DETAILS

JCA

JAMES CAMPBELL ASSOCIATES LTD

CHARTERED ARCHITECTURAL SERVICES

Campbell House
173 Rochdale Road
Firgrove
Rochdale
OL16 3BN

Tel: 01706 354888
Mob: 07817 623183
Email: admin@jamescampbellassociates.co.uk
Web: www.jamescampbellassociates.co.uk

PROJECT

PROPOSED NEW DWELLING

LOCATION

Land @ 2 Balderstone Road
Rochdale

DRAWN:-	Aiden Phillips-Whalley	DRAWING NUMBER:-
DATE:-	January 2024	23.3148.SC1.2B
SCALE:-	1:50 @ A1	
ISSUE:-	B	



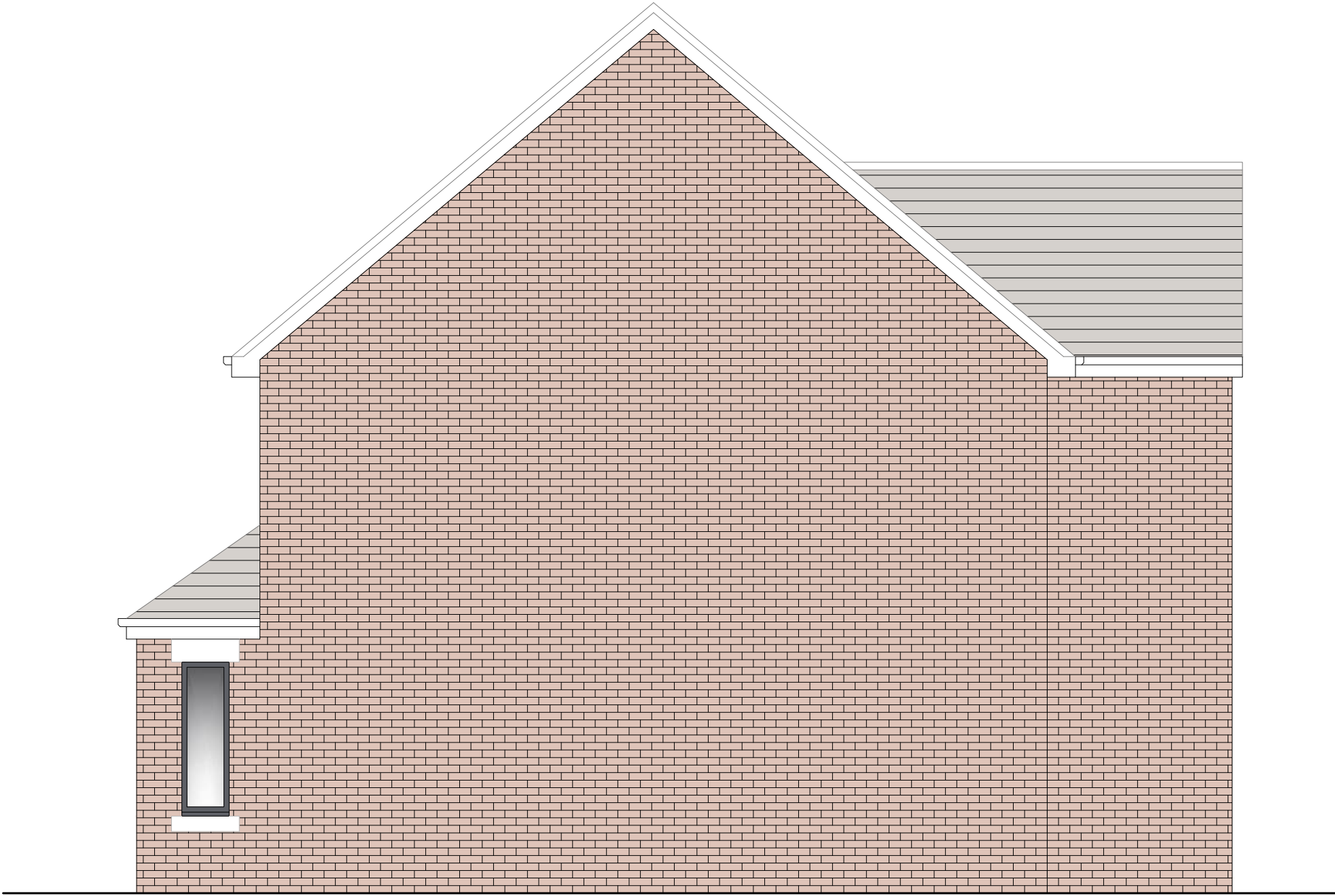
PROPOSED FRONT ELEVATION



PROPOSED SIDE ELEVATION 1



PROPOSED REAR ELEVATION



PROPOSED SIDE ELEVATION 2

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CONSTRUCTION NOTES:-

DRAWING TITLE		
SCHEME 1 - PROPOSED ELEVATIONS		
 JAMES CAMPBELL ASSOCIATES LTD CHARTERED ARCHITECTURAL SERVICES  Campbell House 173 Rochdale Road Firgrove Rochdale OL16 3BN Tel: 01706 354888 Mob: 07817 623183 Email: admin@jamescampbellassociates.co.uk Web: www.jamescampbellassociates.co.uk		
PROJECT		
PROPOSED NEW DWELLING		
LOCATION		
Land @ 2 Balderstone Road Rochdale		
DRAWN:-	Aiden Phillips-Whalley	DRAWING NUMBER:-
DATE:-	January 2024	23.3148.SC1.3
SCALE:-	1:50 @ A1	
ISSUE:-		