

PHASE 1 PRELIMINARY GEO-ENVIRONMENTAL AND GEOTECHNICAL RISK ASSESSMENT

Land off Welcomb St, Openshaw, Manchester M11 2NJ



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EXECUTIVE SUMMARY

Section	Summary
Background	RPS Consulting Services Ltd (RPS) was commissioned by Network Space to undertake a Phase 1 Preliminary Geo-Environmental and Geotechnical Risk Assessment of Land off Welcomb Street, Openshaw, Manchester, M112NJ. The report has been commissioned prior to the proposed redevelopment of the site.
Site Details	<p>Site area: 1.53 ha</p> <p>National Grid Reference: 387914 397225</p> <p>Current site use: The site currently comprises an area of vacant land within a business/light industrial park. The site is currently comprises two adjoining light industrial units in the eastern portion of the site, and a row of smaller workshop and light industrial units across the southern portion of the site, with smaller auxiliary building located in the centre and west of the site.</p> <p>Proposed site use: The proposed development comprises demolition of the existing structures and the construction of four light industrial units, which will potential be subdivided into several smaller units. Each unit will have a loading bay and associated car parking.</p> <p>Surrounding land use: The site is located in an area of mixed industrial, commercial and residential land use.</p>
Site Inspection	<p>A site inspection was undertaken on 17th May 2022.</p> <p>This identified two white propane tanks (approximately 1000 litres) present in the west of the site as well as multiple empty oil drums, gas cages and jerry cans.</p> <p>An electricity substation was present adjacent to the car park in the north-east of the site.</p>
Site History	<p>A review of historical maps indicates the site was part of the large adjacent engineering works, with auxiliary buildings, railway networks and tanks present from the late 1800s until 1938. There was a period of vacancy from 1938 to approximately 1950 after which the site played a similar role in associated buildings and railway sidings for the adjacent foundry. Due to its complex history a number of inorganic and organic contaminants may be present within the Made Ground.</p> <p>Off-site historical potential sources of contaminants of concern include the adjacent heavy industry linked to the adjacent extensive railway network and the engineering works turned foundry and to the north of the site. The infrastructure associated with the railway network dominated the land to the south of the site from the late 1800s to the early 2000s with Ashburys sidings adjacent to the site boundary from 1906 to 2010. In the place of Ashburys sidings now resides an asphalt plant, an aggregate supplier and a sand and gravel supplier. Various other smaller works were present for shorter periods of time in the wider vicinity including a chemical works (1893 to 1985) approximately 230m south, bleach works (1848 to 1891) approximately 245m south and an instrument works (1950 to 2001) approximately 130m west. Outside of the 250m radius are a gas plant works and a gas and oil engine works which have been included due to the widespread nature of their potential contamination.</p>
Environmental Setting	<p>The site is indicated to be underlain by a Secondary Undifferentiated Aquifer relating to the Devensian Glacial Till which itself is underlain by a Principal Aquifer relating to the Chester Formation. The site is not indicated to be located in a groundwater Source Protection Zone (SPZ) and there are no sensitive groundwater abstractions in the vicinity of the site.</p> <p>The nearest surface water feature is Corn Brook which is located 200m south-west.</p>
Regulatory Consultation	RPS is currently awaiting response from Manchester City Council.
Preliminary Risk Assessment	<p>An outline conceptual site model (CSM) has been derived on the basis of the desktop study and site reconnaissance.</p> <p>There is potential for contamination to be present associated with the site's historical use however post development risks are minimised by the buildings, hardstanding and manged landscaping in the proposed development and use. There will be a residual risk in areas of existing soft landscaping, if soils are exposed or disturbed.</p> <p>There is potential for soil leaching and vertical and lateral migration of contaminants (if present) in shallow groundwater to impact the Secondary Undifferentiated Aquifer, however limited potential for the sensitive Principal Aquifer to be impacted due to the cohesive</p>

Section	Summary
	<p>nature of the superficial deposits which may potentially act as a aquitard reducing the lateral and vertical migration of contaminants.</p> <p>There is potential for Made Ground and infilled land associated with the site's historical uses. Where present there is potential for ingress and build-up of gas within indoor areas</p>
Conclusions and Recommendations	<p>There is potential for contamination to be present across the site associated with the present and historical use of the site. Made Ground is mapped as being present in the south of the site and therefore may be present at significant thicknesses.</p> <p>The outline CSM produced upon completion of the desk study assessment has identified a number of potential pollutant linkages that may be active upon completion of the proposed redevelopment. It is therefore recommended that the potential for these linkages to be active is assessed through a basic intrusive Phase 2 Site Investigation.</p> <p>Retaining walls form the southern site boundary. These show sign of movement and cracking which may potentially indicate movement of the slope. Further assessment into the stability of the retaining structures is recommended.</p> <p>It is often cost efficient to combine any site investigation undertaken for geo-environmental purposes with geotechnical testing, to facilitate preliminary foundation and pavement design.</p> <p>Given the age of the buildings on site, it is possible that asbestos containing material is present within the building fabric, and as such a demolition asbestos survey will also be required as part of the planned redevelopment of the site.</p>

1 INTRODUCTION

1.1 Preamble

- 1.1.1 RPS Consulting Services Ltd (RPS) was commissioned by Network Space to undertake a Phase 1 Preliminary Environmental Risk Assessment of Land off Welcomb Street, Openshaw, Manchester, M11 2NJ. The report has been commissioned prior to the proposed redevelopment of the site.
- 1.1.2 The site covers approximately 1.53 hectares and currently comprises an area of land within a business/light industrial park. The site is currently vacant with two adjoining light industrial units in the eastern portion of the site, and a row of smaller workshops and light industrial units across the southern portion of the site, with smaller auxiliary buildings located in the centre and west of the site. A site location plan is presented as Figure 1.
- 1.1.3 The proposed development comprises the demolition of existing buildings and construction of four light industrial units, which will potentially be subdivided into several smaller units. Each unit will have a loading bay and associated car parking.
- 1.1.4 The Desk Study assessment is based upon a review of published information available from local, regional, and national agencies. The desk study information is derived from Groundsure Enviro +Geo Insight Reports provided by Groundsure, Reference GS-8755308 which is presented as Appendix D. Please note the terms and conditions attached to the supply of data from Groundsure.

1.2 Objectives

- 1.2.1 The principal objectives of this assessment were as follows:
- To assess potential sources of contamination at the site, associated with historical and current land uses both on site and in the surrounding area;
 - To review the environmental setting to assess the sensitivity of the surrounding area to contamination/pollution;
 - To produce an outline Conceptual Site Model (CSM) detailing how any contamination may impact the identified receptors via pollutant linkages; and
 - To produce a preliminary geotechnical risk assessment to summarise potential geotechnical constraints associated with the development.

1.3 Legislation and Guidance

- 1.3.1 The assessment has been undertaken in general accordance with British Standard BS EN ISO 21365:2020 and is considered suitable to meet the initial requirements of planning as outlined within the National Planning Policy Framework (NPPF). The assessment also reflects the recommendations of Environmental Agency guidance, Land Contamination: Risk management, (LCRM 2020).
- 1.3.2 This report has been produced in general accordance with:
- Contaminated Land (England) Regulations 2006 (as amended);
 - DEFRA Environmental Protection Act 1990: Part 2A - *Contaminated Land Statutory Guidance* (2012);
 - Environment Agency (2020) Land Contaminated: Risk Management (LCRM 2020);
 - National Planning Policy Framework (2021);
 - CIRIA Document C665: *Assessing Risks Posed by Hazardous Ground Gases to Buildings*;

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- British Standard requirements for the '*Investigation of potentially contaminated sites - Code of practice*' (ref. BS10175:2011+A1:2017);
 - British Standard requirements for the '*Code of practice for ground investigations*' (ref. BS5930:2015+A1:2020);
 - British Standard requirements for the '*Code of practice for the design of protective measures for methane and carbon dioxide ground gases for new buildings*' (ref BS8485:2015+A1:2019).
 - EN 1997-1 (2004): Eurocode 7: Geotechnical design - Part 1: General rules; and
 - EN 1997-2 (2007): Eurocode 7: Geotechnical design - Part 2: Ground investigation and testing.

1.3.3 Details of the limitations of this type of assessment are described in Appendix E.

2 SITE RECONNAISSANCE AND DESK STUDY

2.1 Site Reconnaissance

- 2.1.1 This section of the report is based upon observations made during a site visit carried out on 17th May 2022. A site boundary plan is provided as Figure 2. Selected photographs are shown in Appendix B.

The Site

Table 2-1 – Summary of on-site activities

Section	Description
Background:	The site is located to the south of Ashton Old Road in Openshaw, immediately east of Manchester city centre, at National Grid Reference SJ879972. The site is located within a wider commercial/light industrial business park. It is irregularly shaped and occupies an area of approximately 1.67 ha.
Site Layout:	<p>The site is accessible from a vehicle and pedestrian entrance on Welcomb Street in the north of the site. From the entrance, an access road extends around the east of the site to the rear of the property in the south.</p> <p>A second vehicle entrance is present on Welcomb Street, allowing access to a car park in the centre of the site.</p> <p>A car park is also located in the north-east of the site. This car park is accessible via a gate on the City Works business park to the east of the site.</p> <p>The site is occupied by two adjoining light industrial units in the eastern portion of the site, and a row of smaller workshops and light industrial units across the southern portion of the site, with smaller auxiliary buildings located in the centre and west of the site.</p> <p>The site is generally level, at an approximate elevation of 62m AOD but features a slight downward slope to the west. There is also a slight depression at the entrance to the central car park, and a slight ramp up to the south within the car park.</p> <p>A large embankment on the southern perimeter slopes steeply downward toward the site. Brick retaining walls are present at the boundary with the lower wall approximately 1.50m in height and the upper wall approximately 2.50m in height.</p> <p>A small portion of the west of the site includes an area of car parking servicing the business park at the end of Welcomb Street.</p>
Activity / Operations:	<p>At the time of the walkover, the site was entirely vacant, with the exception of the small area of car parking located within the north west of the site servicing the existing business park to north of the site boundary</p> <p>The site was formerly occupied by the Manchester School of Building, a Manchester College campus for training skills including plumbing, electrical, carpentry, joinery, brickwork and plastering.</p> <p>A large ventilation or fume extraction system was present in the central yard, with ducts to the main building.</p> <p>Many of the buildings were not accessible at the time of the walkover. Accessible buildings included workshops, classrooms, offices, and welfare facilities.</p> <p>The car park in the north-east of the site appeared to be leased by Nationwide Specialist Services, for the storage of vans, cherry pickers and other mobile elevated platforms and lifting equipment.</p>
Building Structure(s):	<p>The two main adjoining former college buildings in the east of the site were steel frame structures with brick and cladding. Smaller steel frame clad workshop units were present in the south and west.</p> <p>An older brick and concrete building was present in the central southern portion. A small brick auxiliary building containing toilets was located opposite the larger brick unit. Steel framed canopies were present adjoining two units in the west and adjoining a unit in the east of the site. Portacabin style units adjoined the eastern face of the main eastern college building.</p>
Surface Cover:	Buildings covered approximately 25% of the site. Hardstanding, including car parking, yard area, pavements and roadways occupied approximately 70% of the

Section	Description
	site. The remainder of the site was covered by areas of soft landscaping and overgrown vegetated areas.
Drainage:	<p>Provided drainage plans indicated that a 30" combined sewer runs across the centre of the site in an east-west direction.</p> <p>Surface water drains were observed on hardstanding across all areas of the site. Many of the drains were silted up and blocked. Manhole covers adjacent to the propane tanks in the west of the site were lifted and featured deep chambers, possibly carrying foul sewage from the adjacent toilet building.</p>
Bulk Storage / Tanks:	<p>Two red empty oil drums were located on the yard in the south-east of the site.</p> <p>A red steel locker containing three empty jerry cans was located on the yard in the south-east of the site.</p> <p>Two white propane tanks (each with approximately 1000 litre capacity) were present in the west of the site.</p> <p>Empty gas cages were present in the south-west and south-east of the site.</p>
Waste:	<p>A skip storage area was located in the south-eastern corner of the site. Skips were no longer present however small piles of building waste including tiles and cement were present.</p> <p>Building materials and abandoned light machinery were present to the sides and rear of the units in the south.</p> <p>Small general waste and recycling bins were present around the college buildings.</p>
Electricity Sub-Stations /Transformers:	An electricity substation was present adjacent to the car park in the north-east of the site.
Visual Evidence of Contamination:	<p>There was no visual or olfactory evidence of contamination observed during the walkover.</p> <p>A strong bitumen odour was noted emitting from the asphalt plant immediately south of the site. This may limit the potential for low level detection of other contaminants on site.</p>
Statutory Nuisance:	<p>The strong bitumen odour from the south of the site is noticeable on site.</p> <p>RPS have not been made aware of any statutory nuisances.</p>
Other Geo-Environmental Issues:	<p>The retaining wall in the along the southern boundary was in poor condition, with movement of the structure noted. There were visible cracks and the upper part of the wall was leaning into site. Some additional support appears to have been added to the wall, in the way of steel support, however these are in poor condition.</p> <p>No Japanese Knotweed or Giant Hogweed (invasive plant species) were readily identified on the site at the time of the survey. (It should be noted that the identification can be limited by the seasons and in areas of dense vegetation growth). This does not constitute a formal survey and specialist advice should be sort.</p> <p>Although no asbestos containing materials were identified during the site walkover, a formal survey should be carried out prior to any demolition works.</p>

The Surrounding Area

2.1.2 The site is located in an area of mixed industrial, commercial and residential land use. At the time of the site inspection, neighbouring land consisted of the following:

Table 2-2 – Neighbouring Land Uses

Direction	Description
North:	Welcomb Street, commercial units containing plumbing and building supplies.
East:	City Works Business Park, commercial units.
South:	Ashbury asphalt plant, aggregate supplier. Railway.
West:	Bus graveyard, asphalt plant.

2.2 Proposed Development

- 2.2.1 The proposed development is to comprise the demilition of existing buildings and construction of four light industrial units, which will potential be subdivided into several smaller units. Each unit will have a loading bay and associated car parking.
- 2.2.2 The proposed units are predominantly located within the south of the site. Proposed vehicle access to the proposed units within the south-west of the site is via the existing units in the north. Access to the remaining proposed units will be via the existing access from Welcomb street.
- 2.2.3 No structural loads or settlement criteria is available at this time. A proposed development plan is provided as Appendix A.

2.3 Site History

Historical Map Review

- 2.3.1 The following review is based on past editions of readily available Ordnance Survey (OS) maps. These include scales of 1:1,250, 1:2,500 and 1:10,000 dated 1848 to 2022. Extracts from selected historical maps are given as Appendix C.

Table 2-3 – Historical Site Uses

On-site Land Use and Features	Dates
Undeveloped land with two small ponds in the east.	1848 to 1891
Buildings associated with the engineering works are present in the north and west of the site. A travelling crane is marked in the centre of the site with tracks from east to west. In 1908 more structures are present in the south of the site including a row of tanks along the site boundary.	1891 to 1933
The engineering works is marked as disused and only the building in the north of the site is still present within the site boundary. Some crane tracks are also still annotated.	1933 to 1938
Land is predominantly vacant with small structure related to the Ashburys railway sidings present in the south-east corner.	1938 to 1950
Buildings and railway lines associated with Crossley New Foundry are present across the whole of the site. A tank is present in the east of the site and the tracks of a travelling crane are present in the north-west.	1950 to 1991
Railway lines are absent from mapping, smaller structures in the north and south-west and the tank are also absent.	1991 to 2009
All buildings are present throughout the site as in the current configuration with the education facility marked on mapping. From 2015, the building in the south is demolished and aerial mapping indicates the site remains unchanged until present day.	2010 to present

- 2.3.2 The site was undeveloped land from earliest mapping until the late 1800s after which the site was part of the large adjacent industry, with auxiliary buildings and railway networks present associated with the engineering works until 1938. There was a period of vacancy from 1938 to approximately 1950 after which the site played a similar role in associated buildings and railway sidings for the adjacent foundry. From 1991 the adjacent foundry is absent from mapping and the site appears to shift into its current configuration of commercial/light industry from 2015 appearing as it is presently.

Table 2-4 – Historical Neighbouring Site Uses

Surrounding Land Uses (250m radius)	Orientation	Distance	Dates	
			From	To
Engineering works - Marked as disused from 1933	NW	On site – 250m	1891	1938
Crossley New Foundry	NW	On site – 250m	1950	1991
Ashburys railway sidings - Reduced in size in 1991	S	0-100m	1906	2010
Corn Brook - Tributary close to site appears to be infilled from 1891. Closet point is now 200m SW	S	5m	1848	Present
Inspection Pits	S	5 – 20m	1950	1982
Clay pit	NW	50m	1893	1906
Railway	S	80m	1848	Present
Brick kilns	NW	110m	1893	1908
Engine shed - Marked as depot from 1982 and now exists as an industrial equipment supplier and a clothes and fabric manufacturer	S	120m	1893	1985
Instrument works	N	130m	1950	2001
Gorton Yard - Painting shed and carriage repair shed appear on mapping in 1906	W	145m	1891	1981
Pond	NW	150m	1950	1982
Engineering works - Becomes garage in 1967	N	165m	1950	1986
Corporation Yard	SW	200m	1906	1938
Chemical works - Becomes motor works in 1923 - Becomes cotton warehouse in 1956	S	230m	1893	1985
Bleach works	NW	245m	1848	1891
Gas plant works - Becomes cotton warehouse in 1956	S	300m	1905	1985
Gas and oil engine works - Labelled as works from 1968 to 2021	W	355m	1905	1968

2.3.3 The site has historically resided within an area of heavy industry linked to the adjacent extensive railway network and the engineering works turned foundry on site and to the north of the site. The infrastructure associated with the railway network dominated the land to the south of the site from the late 1800s to the early 2000s with Ashburys sidings adjacent to the site boundary from 1906 to 2010. In the place of Ashburys sidings now resides an asphalt plant, an aggregate supplier and a sand and gravel supplier. Various other smaller works were present for shorter periods of time in the wider vicinity including a chemical works (1893 to 1985) approximately 230m south, bleach works (1848 to 1891) approximately 245m south and an instrument works (1950 to 2001) approximately 130m west. Outside of the 250m radius are a gas plant works and a gas and oil engine works which have been included due to the widespread nature of their potential contamination.

Site Planning History

- 2.3.4 Relevant and readily available planning records for the site, as obtained from Manchester City Council planning website are summarised as follows:
- 067484/FO/NORTH2/03 | New reception entrance, and 13 metal storage cabins, two training rooms, three portable teaching classrooms and canteen/dining room and common room | M/Cr School of Construction, Welcomb St. off Ashton Old Rd, Openshaw
 - 070278/FO/2003/N2 | The construction of 2 new single storey workshops and a two storey extension to an existing workshop building | Mancat Welcomb Street Openshaw
- 2.3.5 Planning application ref: 124268/FO/2019 relating to a development approximately 150m from the site boundary contained a Phase 2 geoenvironmental investigation that found no exceedances in concentrations of contaminants within the soil or groundwater, however asbestos was detected in a number of soil samples.
- 2.3.6 No documents relating to any existing contamination beneath the site were associated with the above planning permissions.

2.4 Environmental Setting

Geology

- 2.4.1 Based on British Geological Survey (BGS) mapping (1:50,000-scale) and the Environment Agency (EA) Groundwater Vulnerability mapping (1:100,000-scale), the stratigraphic sequence and aquifer classifications beneath the site are indicated to be as follows:

Table 2-5 – Descriptions of Geological Strata

Strata	Description	Aquifer Classification
Devensian Till	Heterogenous mixture of clay, sand, gravel, and boulders varying widely in size and shape.	Secondary Undifferentiated Aquifer
Chester Formation	The formation comprises conglomerates and reddish brown, cross-bedded, pebbly sandstones with subordinate beds of red-brown mudstone. The conglomerates have a reddish brown sandy matrix and consist mainly of pebbles of brown or purple quartzite, with quartz conglomerate and vein quartz.	Principal Aquifer

- 2.4.2 Made Ground is mapped in the southern portion of the site, as well as to the south and east. Therefore, Made Ground at significant thickness may be present in this area of the site. Made Ground is likely to be present across the remaining site as a result of past construction and demolition activities. No site investigation reports have been reviewed to verify this.
- 2.4.3 There are no records held in the BGS archive for boreholes either on site or within close proximity.

Hydrogeology

- 2.4.4 The site is located above a Secondary Undifferentiated Aquifer relating to the Devensian Till. These formations have varying characteristics in different locations. Underlying this is a Principal Aquifer relating to the Chester Formation. These formations provide a high level of water storage and may support water supply and / or river base flow on a strategic scale.
- 2.4.5 According to EA data, the site is not located in a groundwater Source Protection Zone (SPZ).
- 2.4.6 Under the Water Framework Directive, the Environment Agency's local River Basin Management Plan classifies groundwater chemical quality beneath the site relating to the Manchester and East Cheshire Permo-Triassic Sandstone Aquifers Water Body as poor.

2.4.7 Information provided by the EA indicates that there are records of three active licensed groundwater abstractions within 2km of the site. These are detailed in the table below:

Table 2-6 – Licensed Groundwater Abstractions

Licence Holder	Distance and Direction	Source	Use
Cemex UK Materials Limited Licence No: NW/069/0004/012	307m south	Ground Water - North West Region Borehole at Preston Sheet, Manchester	Process Water Annual Volume (m ³): 7,500 Max Daily Volume (m ³): 72r
Manchester City Football Club Ltd Licence No: NW/069/0006/005/R01	786m north	Ground Water - North West Region Borehole at Openshaw, West Ashton	Spray Irrigation – Direct and General Use Relating To Secondary Category (Medium Loss) Annual Volume (m ³): 221,650 Max Daily Volume (m ³): 1,000
Evonik Chemicals Ltd Licence No: 2569006036	976m north	Ground Water - North West Region Borehole on premises at Clayton, Manchester	Non-Evaporative Cooling Annual Volume (m ³): 372,772 Max Daily Volume (m ³): 3,600.50

Surface Water

2.4.8 There are no watercourses within 1km of the site which are classified within a River Basin Management Plan published by the EA under the European Water Framework Directive (2000). A list of readily identifiable nearby watercourses and water bodies is as follows:

Table 2-7 – Nearby Watercourses and Water Bodies

Watercourse / Body	Quality Classification	Approx. Distance and Direction from Site
Corn Brook	N/A	200m south-west

2.4.9 Information provided by the EA indicates that there are records of one active licensed surface water abstraction within 2km of the site. The details of this are as follows:

Table 2-8 – Licensed Surface Water Abstractions

Licence Holder	Use	Approx. Distance and Direction from Site
Canal and River Trust Licence No: 2569006997	Process Water Annual Volume (m ³): 3,500,420 Max Daily Volume (m ³): 3,500,420	1,112m north Ashton Canal, Manchester

Ecologically Sensitive Sites

2.4.10 Natural England data indicates that there are no ecologically sensitive sites, that constitute environmental receptors as defined within Table 1 of the DEFRA Environmental Protection Act 1990: Part 2A - Contaminated Land Statutory Guidance (2012), located within a 1km radius of the site.

Radon

- 2.4.11 According to the Indicative Atlas of Radon in England and Wales published by the Health Protection Agency (part of Public Health England) and the British Geological Survey, the site is estimated to be in a low probability radon area (where less than 1% of homes are estimated to be at or above the Action Level). The data source indicates that no radon protection measures are typically necessary in this area.

Coal Authority

- 2.4.12 The Interactive Map Viewer on the Coal Authority website indicates that the site is located within the Coalfield Consultation Area (coal mining reporting area), however the site is located not within a Development High Risk Area. The site is located in an area where underground workings are known, however, these are at potentially significant depth beneath the site. There are no known or probably shallow mine workings.

Non-Coal Mining

- 2.4.13 Evidence from the Groundsure Insight Report sourced from BGS indicate sporadic underground mining of restricted extent may have occurred in the vicinity. This relates to a vein mineral site located approximately 282m west. Two historical brick works were also identified 394m and 428m north.

BGS Ground Stability Hazard Ratings

- 2.4.14 British Geological Survey Ground Stability Hazard ratings for the site are summarised as follows

Table 2-9 – BGS Ground Stability Hazard Ratings

Ground Stability Hazard	BGS Risk rating
Collapsible ground	Very Low
Compressible ground	Very low in the south of the site associated with the potentially deep mapped Made Ground Negligible, associated with the superficial deposits across the site.
Ground dissolution	Negligible
Landslide	Very Low
Running sand	Very Low
Shrinking or swelling clay	Very Low

2.5 Authorised Processes and Pollution Incidents

Landfills and Waste Sites

- 2.5.1 Information provided by a number of sources (detailed below) shows that there is one recorded licensed or known historical landfill site, one historical licensed waste site and four active licensed waste sites recorded within 250m of the site. These are described within the following table.

Table 2-10 – Landfill / Waste Transfer / Waste Treatment Sites

Source of Record	Approx. Distance and Direction	Licence Details	Waste Type and Details
Landfill Sites			
Historic Landfill (Environment Agency)	99m south Preston Street, Gorton, Greater Manchester	Site Reference: F057	N/A
Licensed Waste Sites			
Historic planning application (October 2000) however no proof of building has been found	77m south Ashbury Woodyard, Bessemer Street, Manchester, Greater Manchester, M11 2MW	Planning application reference: 59815	Type of Site: Recycling Facility Scheme comprises development of an inert material recycling facility for manufacture, storage and distribution of secondary aggregates. The project also includes site offices, weighbridge, wheel cleaning facilities, mobile plant and stockpiles.
Environment Agency	58m south Ashbury Yard, Bessemer Street, Gorton, Manchester, M11 2NW	Operator: Hope Construction Materials Limited Environmental Permitting Regulations (Waste) Licence Number: HCM002 EPR reference: EA/EPR/DB3305TE/T001 Waste Management licence No:104076	Type of Site: 75kte HCI Waste TS +treatment Size: 25000 tonnes Annual Tonnage: 74999
Environment Agency	81m north Unit A7, The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE	Operator: L Wynne & Co Ltd Environmental Permitting Regulations (Waste) Licence Number: LWC001 Waste Management licence No: 53947	Type of Site: Special Waste Transfer Station Size: 25000 tonnes Annual Tonnage: 30.416
Environment Agency	171m south Delta Containers, Preston Street, West Gorton, Manchester, M18 8DB	Operator: Delta Containers (Manchester) Ltd Environmental Permitting Regulations (Waste) Licence Number: DEL036 Waste Management licence No:53491	Type of Site: Material Recycling Treatment Facility Size: 25000 tonnes Annual Tonnage: 4999
Environment Agency	184m north 134, South Street, Openshaw, Manchester, M11 2FY	Operator: Steven Smith And Bernard Smith Environmental Permitting Regulations (Waste) Licence Number: JAX002 Waste Management licence No: 50244	Type of Site: ELV Facility Size: 25000 tonnes

Environmental Permits

- 2.5.2 EA and Local Authority data indicates that there are five processes regulated by an Environmental Permit (under the Environmental Permitting Regulations 2010) within 500m of the subject site. These are outlined in the table below:

Table 2-11 – Environmental Permits

Licence Holder	Distance and Direction	Permitted Activity
Part A(1)		
Urban Reserve (ASSETCO) Limited Installation Name: Whitworth Power EPR/ZP3807PL Part A(1)	57m west	Process: New medium combustion plant. Permit Number: ZP3807PL Original Permit Number: ZP3807PL
Part B		
Tarmac Aggregates Limited	48m south	Process: Roadstone Coating Processes
Breedon Southern Ltd	49m south	Process: Use of Bulk Cement
Cemex Operations	288m south	Process: Use of Bulk Cement
Cascade Ltd	432m north	Process: Coating Processes

COMAH Sites

- 2.5.3 There are no records of any operations under the Control of Major Accident Hazards (COMAH) Regulations 1999, located within 500m of the site.

Pollution Incidents

- 2.5.4 Environment Agency data indicates that there are no records of 'major' or 'significant' pollution incidents within 500m of the site.

2.6 Unexploded Ordnance

- 2.6.1 CIRIA Report C681 (stone et al 2009) outlines recommendations for dealing with the potential risk associated with the legacy of Unexploded Ordnance Risk, largely relating the WWII bombing and military sites.
- 2.6.2 Reference to the Zetica Unexploded Bomb Risk mapping indicates that the site is in an area of moderate potential risk from Unexploded Bombs and is located between two Luftwaffe targets relating to the historical train depots.
- 2.6.3 A detailed UXO risk assessment was undertaken by RPS (Ref: EES1361), which concluded that the UXO risk is low to negligible.

2.7 Regulatory Consultations

- 2.7.1 The Environmental Health Department at Manchester City Council was consulted regarding any known contamination issues at the site, however at the time of writing this report a response was yet to be received. The relevant information will be forwarded when provided.

3 OUTLINE CONCEPTUAL SITE MODEL

3.1 Background

- 3.1.1 An outline conceptual site model (CSM) consists of an appraisal of the *source-pathway-receptor* 'contaminant linkages' which is central to the approach used to determine the existence of 'contaminated land' according to the definition set out under Part 2A of the Environmental Protection Act 1990. For a risk to exist (under Part 2A), all three of the following components must be present to facilitate a potential 'pollutant linkage'.
- **Source** referring to the source of contamination (Hazard).
 - **Pathway** for the contaminant to move/migrate to receptor(s).
 - **Receptor** (Target) that could be affected by the contaminant(s).
- 3.1.2 Receptors include human beings, controlled waters and buildings / structures. The National Planning Policy Framework, used to address contaminated land through the planning process, follows the same principles as those set out under Part 2A. Further details on the Part 2A regime are presented within Appendix E.
- 3.1.3 As part of the assessment the potential risks to receptors for potential source is given one of the following classification:
- **Low risk** - it is considered unlikely that issues within the category will give rise to significant harm to identified receptors
 - **Moderate risk** - it is possible, but not certain that issues within the category will give rise to significant harm to receptors
 - **High risk** - there is a high potential that issues within the category will give rise to significant harm to identified receptors

3.2 Potential Pollutant Linkages

- 3.2.1 Each stage of the potential pollutant linkage sequence has been assessed individually on the basis of information obtained during the site reconnaissance and desk study exercise and are discussed in the following section.

Potential Contaminant Sources

On Site – Current

- 3.2.2 Made Ground associated with previous construction and demolition and infilled ground associated with small ponds may be present beneath the site, where present this could represent a potential source of contaminants of concern and / or ground gas.
- 3.2.3 The empty oil drums and jerry cans located on the yard in the south-east of the site indicate historical refuelling activities that may represent a potential source of hydrocarbons if spillages occurred.
- 3.2.4 An electricity substation is present adjacent to the car park in the north-east of the site which may represent a potential source of PCB's.

On Site – Historical

- 3.2.5 Historical maps indicate the presence of railway sidings and various auxiliary buildings and tanks related to the adjacent industries formerly present on site. From the late 1800s until 1938 the auxiliary buildings on site were associated with the adjacent engineering works and from 1908 a

row of tanks along the southern site boundary are present. After this followed a period of vacancy lasting until 1950 where the buildings were demolished, after which more buildings were present related to the foundry until 1991.

- 3.2.6 There is the potential for ground and groundwater contamination to be present associated with historic construction and demolition activities on site.

Off-site – Current

- 3.2.7 Current off-site potential sources of contaminants of concern include the asphalt plant located approximately 125m south-west of the site, which from the site walkover has reported to emanate a strong bitumen odour.
- 3.2.8 Other off site potential sources include Made Ground relating to the historical Ashburys sidings in the south and east and potentially infilled ground, relating to the inspection pits and clay pits to the south and north-east of the site, which may represent a potential source of contaminants of concern and / or ground gas.

Off-Site – Historical

- 3.2.9 Historical maps indicate several industries in the immediate vicinity of the site including a bleach works, an instrument works and chemical works. A historic landfill was also reported by the EA to be present 100m south of site although waste type is unknown. In the wider vicinity a gas plant works and a gas and oil engine works were also present to the south and west respectively
- 3.2.10 There were also many structures associated with Gorton Yard to the east and the Ashburys sidings to the south.
- 3.2.11 Consequently, there is potential for historical off-site sources, which may include a range of inorganic and organic contaminants.

Potential Pathways

- 3.2.12 In areas of the site covered by buildings or hardstanding the risks to future on site human health receptors via the pathways of dermal contact and ingestion will be mitigated. However, in areas of soft landscaping, the pathways of dermal contact and ingestion could still be active. In addition, there would be potential for the airborne migration of soil/dust from these areas.
- 3.2.13 There is the potential for ground gas and volatile contaminants of concern in soil and/or groundwater (if present) beneath the site to impact future site users via the inhalation pathway in indoor areas.
- 3.2.14 There is the potential for contaminants of concern (if present) beneath the site to migrate on or off-site via granular horizons of the Made Ground (if present). These may impact controlled waters receptors or on/off-site human health receptors via the dermal contact, ingestion and vapour inhalation pathways. However due to the largely cohesive nature of the Devensian Glacial Till, migration is considered to be limited.

Potential Receptors

- 3.2.15 Potential post development human health receptors include future site users and off-site human health receptors.
- 3.2.16 The Principal Aquifer beneath the site represents a sensitive receptor however, the site is not located within a SPZ and there are no active licenced potable groundwater abstractions within 2km of the site. The cohesive nature of the superficial deposits above the bedrock will potentially act as an aquitard reducing the lateral and vertical migration of contaminants.

-
- 3.2.17 The nearest surface water feature is Corn Brook, which is located approximately 200m to the south-west of the site. Given the distance to the brook and the low permeability of the near surface soils, it is not considered that there is no active linkage between the site and the brook. r.
- 3.2.18 The assessment does not consider the risk to construction/demolition workers during redevelopment. These risks will be managed through appropriate H&S legislation include H&S At Work Act and CDM regs.

3.3 Outline Conceptual Site Model

- 3.3.1 An outline CSM has been developed on the basis of the site reconnaissance and desk study. The CSM is used to identify potential sources, pathways and receptors (i.e. potential pollutant linkages) on site post development and is summarised in the table below.

Table 3-1 – Outline Conceptual Site Model

Potential Source	Contaminants of Concern	Via	Potential Pathways	Linkage Potentially Active?	Receptors	Qualitative Risk Rating	Notes
On site – current: Made Ground, electrical substation, infilled ground On site – historical: Railway sidings and auxiliary building to former engineering works, tanks	Metals, hydrocarbons, solvents, asbestos and Polychlorinated biphenyls (PCBs)	Soil	Direct contact/ingestion	✓	Future site users	Low to moderate	There is potential for contamination to be present associated with the sites historical use. Post development risks minimised by the buildings, hardstanding and manged landscaping. Residual risk in areas of existing soft landscaping, if soils are exposed or disturbed.
			Inhalation of volatiles	✓		Low	
			Airborne migration of soil or dust	✓	Off-site users	Low	
			Leaching of mobile contaminants	✓	Principal Aquifer	Low	
		Groundwater	Direct contact/ingestion	✓	Future site users Off-site users	Low	Limited potential for shallow groundwater to be present.
			Inhalation of volatiles	✓ ✓			
			Vertical and lateral migration in permeable strata	✓ ✗ ✗	Secondary Undifferentiated Aquifer Principal Aquifer Corn brook	Low to moderate	There is potential for vertical and lateral migration of contaminants (if present) in shallow groundwater to impact the controlled water receptors. It is envisaged that the cohesive nature of the superficial deposits will creating a relatively impermeable barrier, affording some protection to the underlying Principal Aquifer.

Potential Source	Contaminants of Concern	Via	Potential Pathways	Linkage Potentially Active?	Receptors	Qualitative Risk Rating	Notes
Off-site – current: Made ground, asphalt plant Off site – historical: Bleach works, garage, instrument works, engineering works	Metals, hydrocarbons, solvent and Polychlorinated biphenyls (PCBs)	Groundwater	Direct contact/ingestion	*	Future site users	Low	There is a potential for contaminants to migrate beneath the site from off-site sources in any shallow groundwater present in the Made Ground or granular soils within the superficial deposits.
			Inhalation of volatiles	✓	Future site users	Low	
On and off-site – Made Ground / natural strata, landfills, mine gas or bio-degradation of contamination	Carbon dioxide and methane	Ground Gas	Inhalation of ground gas	✓ ✓	Future site users Off-site users	Low to moderate	There is potential for contamination and infilled land associated with the site's historical uses. Where present however, there is potential for ingress and build-up within indoor areas.
			Explosive risks	✓ ✓	Future site users Off-site users Future and off-site Structures	Low to moderate	

Note The Qualitative Risk Rating does not consider the potential for the pathway to be active. In the event that a Moderate or High Qualitative Risk Rating is identified further assessment is recommended.

3.3.2 Based on the identified potential sources and the site setting there is not considered to be a significant risk to ecological receptors, crops/vegetation or archaeological receptors.

4 PRELIMINARY GEOTECHNICAL RISK REGISTER

4.1 Introduction

- 4.1.1 It is understood that the proposed development comprises the demolition of existing buildings and construction of four light industrial units, which will potential be subdivided into several smaller units. Each unit will have a loading bay and associated car parking. A proposed development plan is provided as Appendix A.

4.2 Preliminary Geotechnical Risk Register

- 4.2.1 The following table summarises the potential geotechnical hazards associated with the proposed development based on freely available published information. Preliminary information relating to the hazard and associated engineering considerations are provided.

Table 4-1 - Preliminary Geotechnical Risk Register

Hazard Description	Potential for Hazard	Comments / Possible Engineering Requirements
Sudden lateral / vertical changes in ground conditions	Moderate	<p>The available BGS information indicates that the ground conditions across the site are likely to be variable. Made Ground is mapped in the south of the site, which is shown to be underlain by Glacial Till.</p> <p>The Made Ground anticipated across the site may vary in composition and thickness.</p> <p>Variation in the nature and distribution of soils may result in excessive differential and total settlement.</p> <p>Site investigation works will be required to confirm the ground conditions across the site, identifying any potential changes in strata and softer zones. A good conceptual model of the ground conditions will allow for foundations to be designed to account for any onerous differential or total settlement.</p>
Deeper Pockets of Made Ground	Moderate	<p>Made Ground is mapped as present in the south. Given the development history of the site a layer of Made Ground is anticipated across the whole site area. There is the potential for deeper pockets of Made Ground to be present, in particularly associated with the landfills along the access road.</p> <p>Made Ground on site has the potential for uncontrolled settlement which could results in excessive creep and differential and total settlement of buildings and infrastructure.</p> <p>Made Ground is unlikely to be a suitable founding stratum and any foundations will be required to penetrate the full thickness and found in competent underlying natural strata.</p> <p>There is a potential for buried obstructions to be present within any Made Ground associated with the historical land uses in particular the engine shed in the north of the site and the former aluminium foundry in the south.</p> <p>Site investigation works will be designed to determine the extent and nature of the Made Ground present across the site.</p>
Highly compressible / low bearing capacity soils, (including peat and soft clay)	Low	<p>The presence of low strength strata could result in excessive differential and total settlement of buildings and infrastructure.</p> <p>Site investigation works comprising in-situ and ex-situ testing will be required to determine the presence of any compressible materials, the extent of such materials and assist foundation design.</p>
Ground dissolution features / natural cavities	Low	<p>Ground conditions beneath the site are not consistent with these conditions.</p>
Shrinking and swelling clays	Moderate	<p>Clays within the near surface have to the potential to be of moderate volume change potential (this should be confirmed via geotechnical</p>

Hazard Description	Potential for Hazard	Comments / Possible Engineering Requirements
		<p>laboratory testing), which could result in settlement / heave of foundations and earthworks in particular when located within the influence of trees and vegetation.</p> <p>To mitigate the effects of potential heave or shrinkage, formation levels within these strata should be protected and their exposure time kept to a minimum prior to casting any buried concrete.</p> <p>Mature trees have been identified adjacent to the site. The potential effect of these on the depth required for the foundation should be assessed in accordance with the NHBC Manual guidelines.</p>
Slope stability issues	Moderate	<p>Retaining walls form the southern site boundary. These show sign of movement and cracking which may potentially indicate movement of the slope.</p> <p>A detailed assessment of the stability of the retaining walls should be undertaken.</p>
High groundwater table (including waterlogged ground)	Low to Moderate	<p>Based on the anticipated ground conditions, there is the potential for shallow perched groundwater to be present within any granular Made Ground or granular superficial deposits. However, it is not anticipated that this groundwater would be widespread.</p> <p>Groundwater control/exclusion measures may be required to enable formation of any excavations required at the site depending on localised conditions. This may include sump and pumping, dewatering or sheet piled cofferdams in extreme circumstances. However, requirements for this should be confirmed via intrusive investigation and subsequent groundwater level monitoring.</p>
Obstructions (including foundations, services, basements, tunnels and adjacent sub-structures)	Moderate	<p>Given the presence of buildings currently on site and the varied development history, former structures and obstruction are likely to be encountered. Depending on their size, specialist construction plant may be required to remove these obstructions which should be programmed for and their location recorded and allowed for during substructure design.</p>
Underground mining	Low	<p>Ground conditions beneath the site are not consistent with these conditions.</p>
Radon	Low	<p>According to the Indicative Atlas of Radon in England and Wales the site is not in an area affected by Radon and no radon protection measures are required.</p>
Concrete classification	Low to moderate	<p>The superficial deposits and the Made Ground may contain sulphate bearing soils.</p> <p>Chemical laboratory analysis should be undertaken on soil samples collected from each stratum encountered beneath the site to determine a Design Sulphate Class and an Aggressive Chemical Environment for Concrete (ACEC) Classification for proposed buried structures as part of the development.</p>

4.2.2 The potential risks are given one of the following classifications:

- **Low risk** - it is considered unlikely that issues within the category will give rise to significant damage in relation to the proposed development.
- **Moderate risk** - it is possible, but not certain that issues within the category will give rise to significant damage in relation to the proposed development.
- **High risk** - there is a high potential that issues within the category will give rise to significant damage in relation to the proposed development.
- **N/A** - The anticipated ground conditions are not consistent with this hazard.

5 CONCLUSIONS AND RECOMMENDATIONS

5.1 Conclusions

- 5.1.1 There is potential for contamination to be present across the site associated with the present of historical use of the site. Made Ground is mapped as being present in the south of the site and therefore may be present at significant thicknesses.
- 5.1.2 The outline CSM produced upon completion of the desk study assessment has identified a number of potential pollutant linkages that may be active upon completion of the proposed redevelopment. It is therefore recommended that the potential for these linkages to be active is assessed through a basic intrusive Phase 2 Site Investigation.
- 5.1.3 If the site investigation identifies the presence of potentially significant contamination or ground gases further investigation, monitoring, risk assessment and remediation may be necessary.
- 5.1.4 It is likely that the pollutant linkages will be such that they could be mitigated by the use of typical measures such as a surface cover system, gas protection measures and 'barrier' water supply pipe. There may however be a requirement for a degree of remediation and increased soil/groundwater disposal cost may be realised. If excavated materials are to be reused on site a Materials Management Plan may be required and appropriate licenses/exemptions will be required.
- 5.1.5 Retaining walls form the southern site boundary. These show sign of movement and cracking which may potentially indicate movement of the slope. Further assessment into the stability of the retaining structures is recommended.
- 5.1.6 It is often cost efficient to combine any site investigation undertaken for geo-environmental purposes with geotechnical testing, to facilitate preliminary foundation and pavement design.

5.2 Other Considerations

- 5.2.1 Given the age of the buildings on site, it is possible that asbestos containing material is present within the building fabric. A refurbishment / demolition asbestos survey will also be required as part of the planned redevelopment of the site.

REFERENCES

BGS. British Geological Survey Onshore GeoIndex. [online] Available at: <http://www.bgs.ac.uk/geoindex/> [Accessed 22nd June 2020].

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British Standards Institution (2019): Soil quality — Conceptual site models for potentially contaminated sites. BS EN ISO 21365:2019.

Environment Agency 2020): Land Contamination: Risk Management (LCRM 2020).

<https://magic.defra.gov.uk/>

<https://zeticauxo.com/downloads-and-resources/risk-maps/>

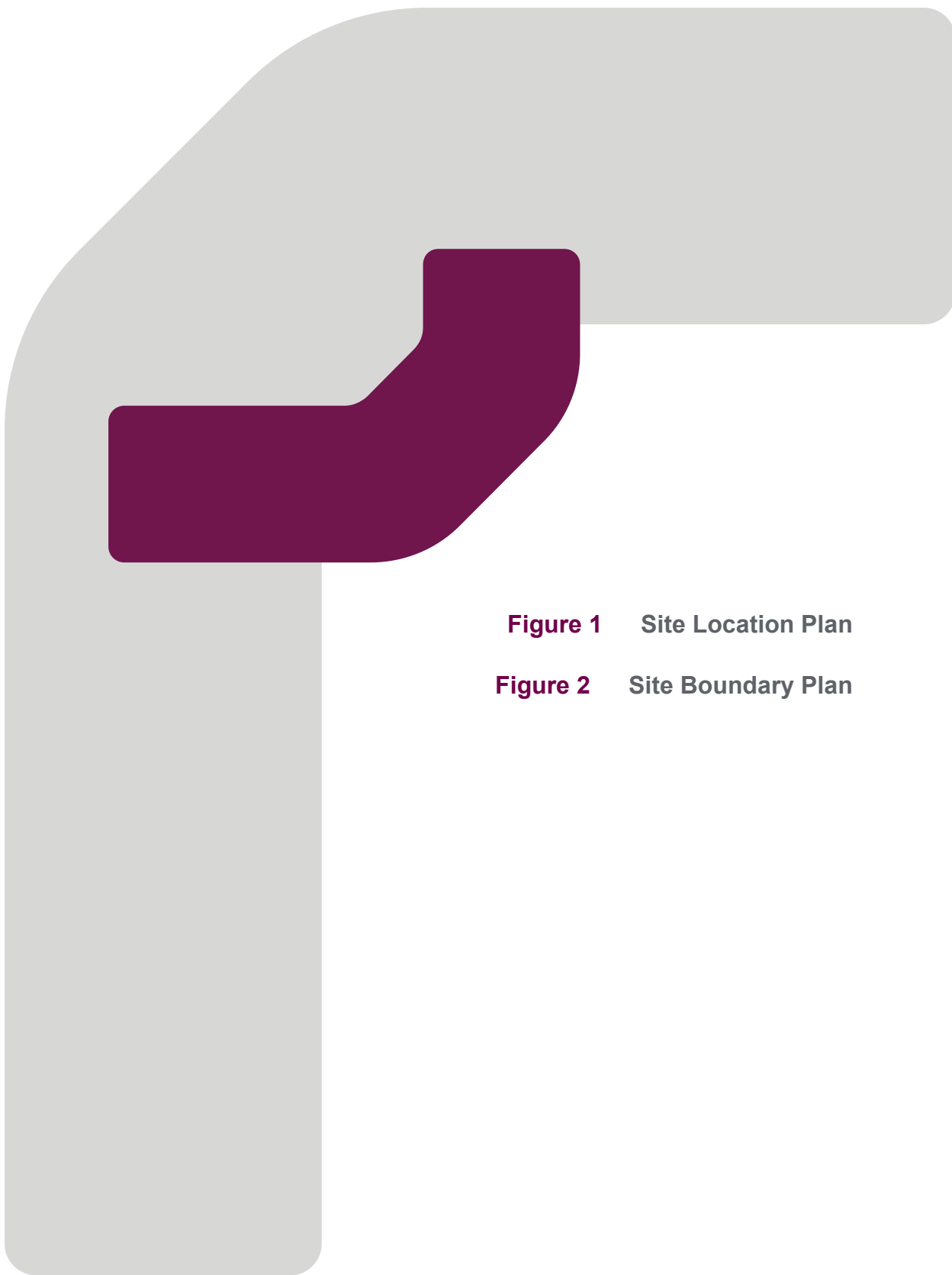
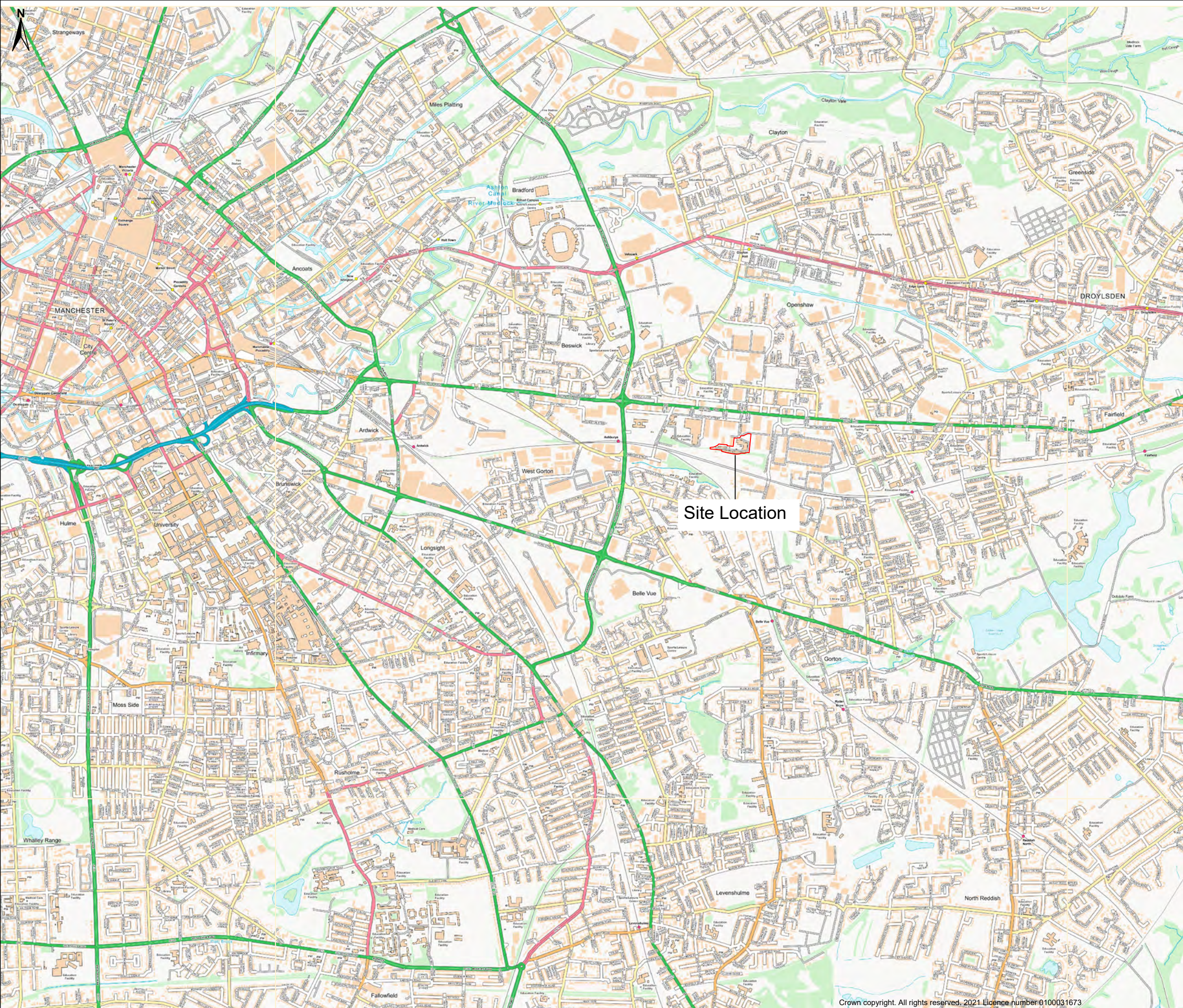


Figure 1 Site Location Plan

Figure 2 Site Boundary Plan



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 Site boundary



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Client Network Space

Project Welcomb Street

Title Site Location Plan

Status	Drawn By	PM/Checked by
Draft	SD	KD
Job Ref	Scale @ A3	Date Created
JER9536	NTS	MAY 2022

Figure Number	Rev
1	00

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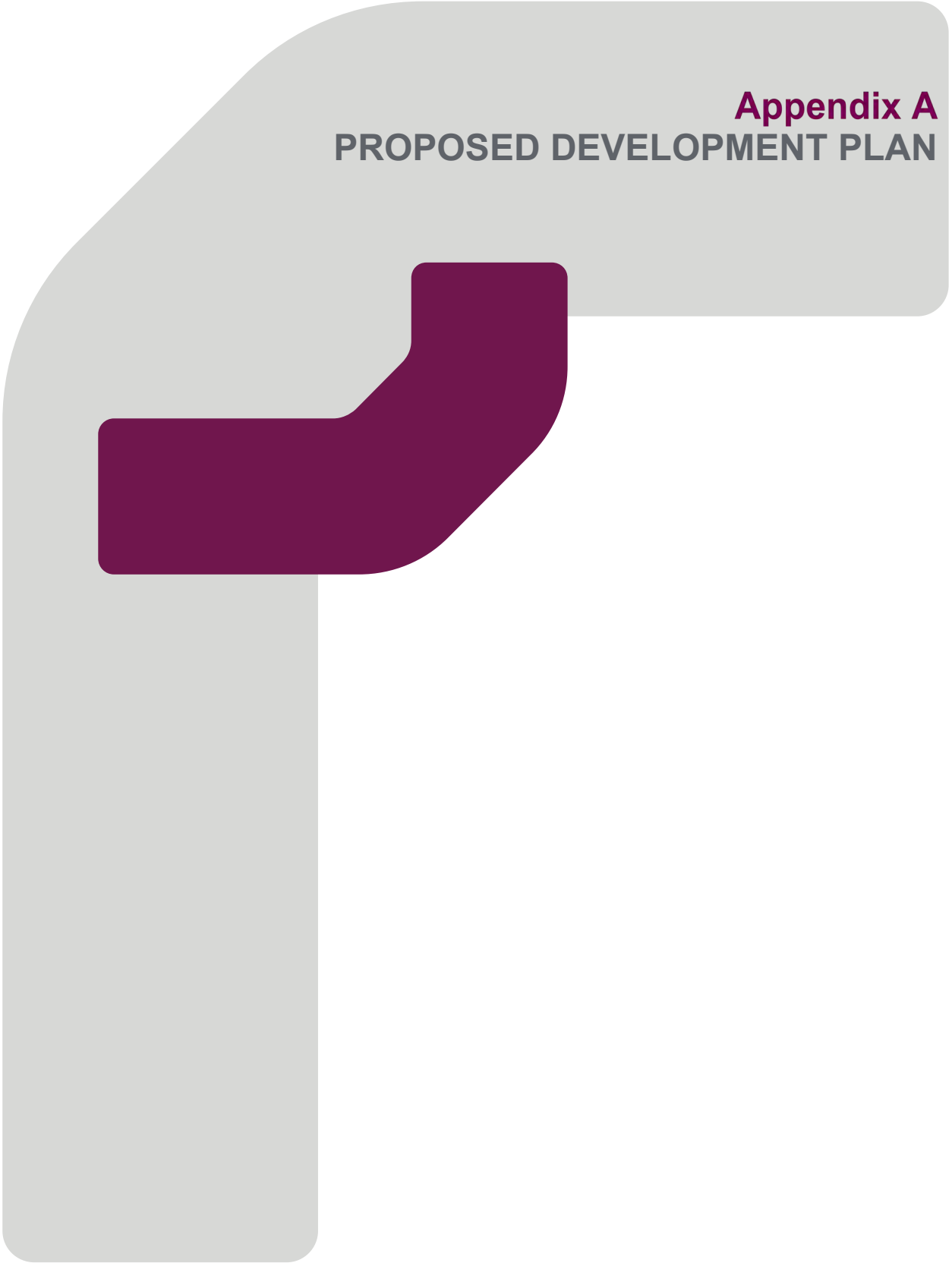
Client Network Space

Project Welcomb Street

Title Site Boundary Plan

Status	Drawn By	PM/Checked by
Draft	SD	KD
Job Ref	Scale @ A3	Date Created
JER9536	NTS	MAY 2022
Figure Number		Rev
2		00

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Appendix A

PROPOSED DEVELOPMENT PLAN

Schedule of Accommodation							
Unit	Ground Floor GIA	First Floor GIA	TOTAL UNIT GIA	TOTAL UNIT GEA	Total Parking Inc. (Acc.) [EV]	Parking Ratio (m²)	Height to underside of Haunch
Unit 1	616m² / 6,630ft²	97 m² / 1,044ft²	713m² / 7,674ft²	777m² / 8,363ft²	11 (2) [2]	1:70	8.0m
Unit 2	989m² / 10,645ft²	110m² / 1,184ft²	1,099m² / 11,829ft²	1,182m² / 12,722ft²	18 (2) [3]	1:66	8.0m
Unit 3	2,460m² / 26,479 ft²	275m² / 2,960ft²	2,735m² / 29,439ft²	2,869m² / 30,881ft²	35 (3) [5]	1:82	10m
Unit 4	2,175m² / 23,411.5ft²	262m² / 2,820ft²	2,437m² / 26,231ft²	2,579m² / 27,760ft²	34 (4) [7]	1:76	10m
TOTAL GIA			6,984m² / 75,175ft²	7,407m² / 79,728ft²	98 (11) [17]	1:76	

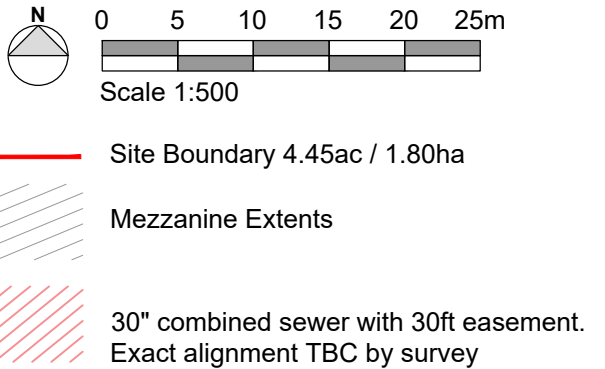


NOTES

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- Any discrepancies are to be reported to the architect before any work commences
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- This drawing shall not be reproduced without express written permission from AEW.
- Title overlay drawings and ownership boundaries are produced using all reasonable endeavors. AEW cannot be responsible for the accuracy or scale discrepancy of base plans supplied to them.
- All works are to be undertaken in accordance with Building Regulations and the latest British Standards.
- All proprietary materials and products are to be used strictly in accordance with the manufacturers recommendations.

CDM 2015

Client notified of duties: 07/04/21
Principal Designer: Client
Unless noted below, all known hazards have been highlighted on the drawing:



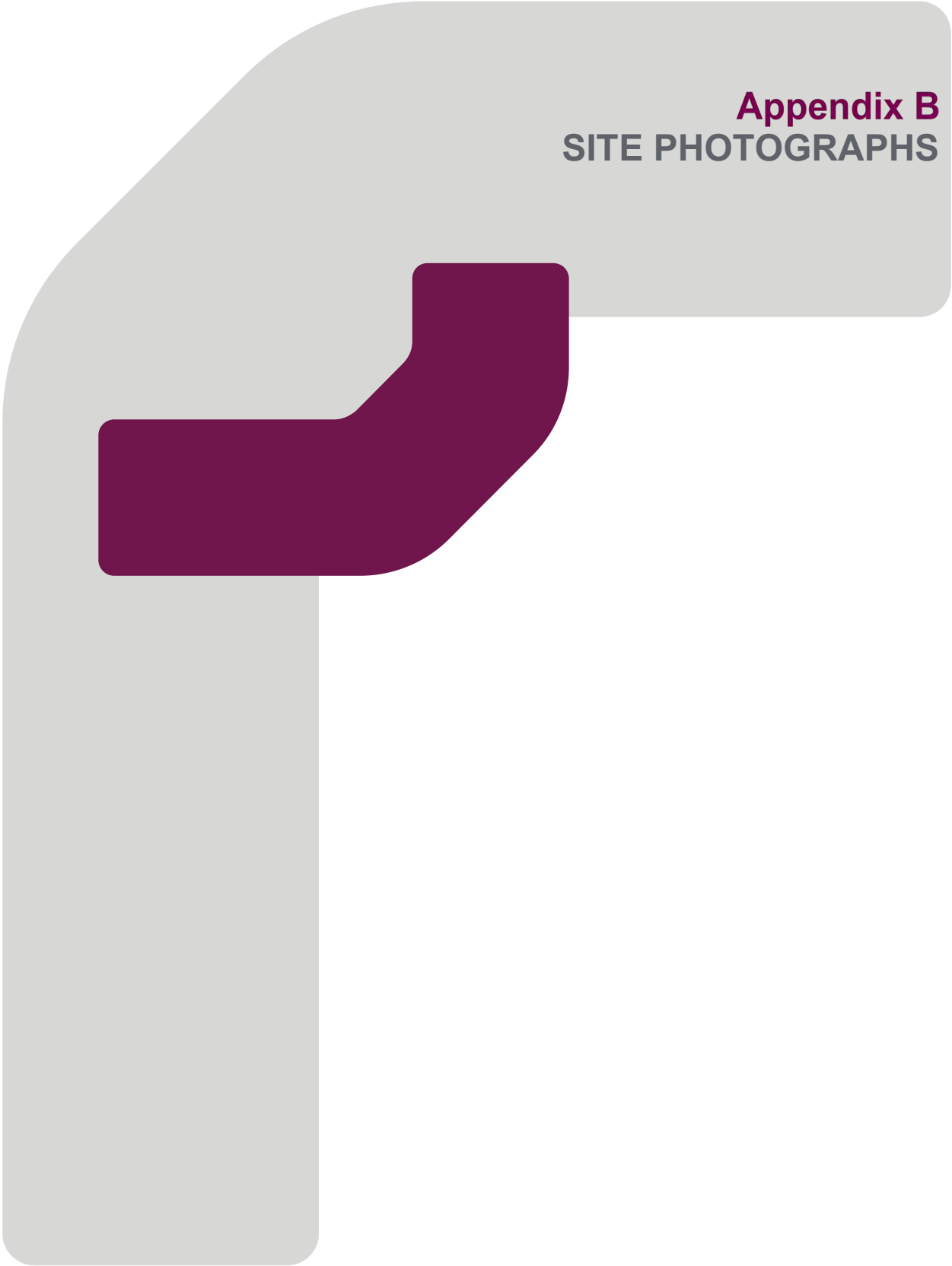
- Footprint of existing Zone A + B
- Landscape Planting to Landscape Architect Specification. Existing trees and shrubs to be retained where possible.
- Existing trees to be retained
- Proposed tree planting
- Manchester City Council Maximum parking standards:
B2 = 1:45 sq.m
B8 = 1:100 sq.m
- Proposed Bin store
- Pedestrian gate with panic hardware
- Electrical Vehicle Charging spaces
- Future provision Electrical Vehicle Charging spaces with cable routes

NOTES

HGV circulation subject to tracking analysis

P12	16/04/24	MW	DRS
Planning Issue			
REV	Date	Drawn by: -	Checked by: -
Status	Purpose of Issue		
S4	For Planning		
drawing stage	Stage 3		
client	Network Space		

project	Welcomb Street Openshaw		
drawing title	Proposed Site Plan		
date	Apr 2024	drawn	MW
scale@A1	1:500	checked	DRS



Appendix B

SITE PHOTOGRAPHS



Photo 01: Ventilation or fume extraction system in central yard



Photo 02: View of the Manchester School of Building from the north



Photo 03: Entrance to Manchester School of Building and a view of the business park to the east of site

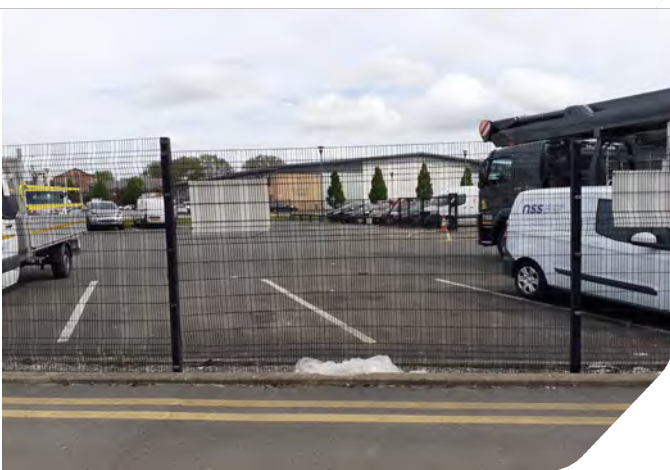


Photo 04: Car park for adjacent business park to the west



Photo 05: Skip area in the south east of the site

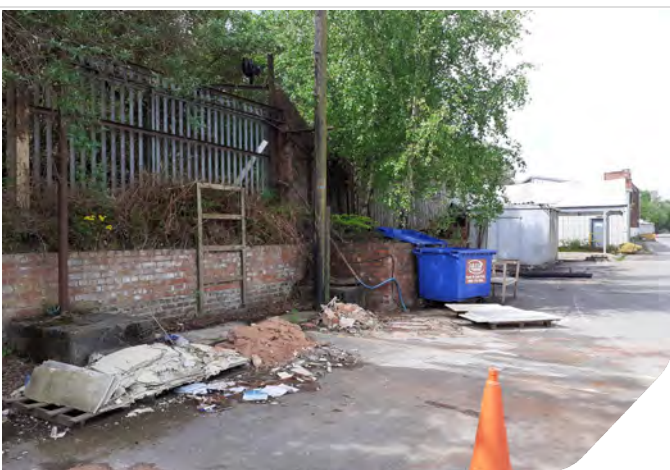


Photo 06: Southern boundary of site with retaining wall



Photo 07: Empty propane tanks



Photo 08: Electricity substation on site



Photo 09: Empty oil drums in the yard in the south east of the site



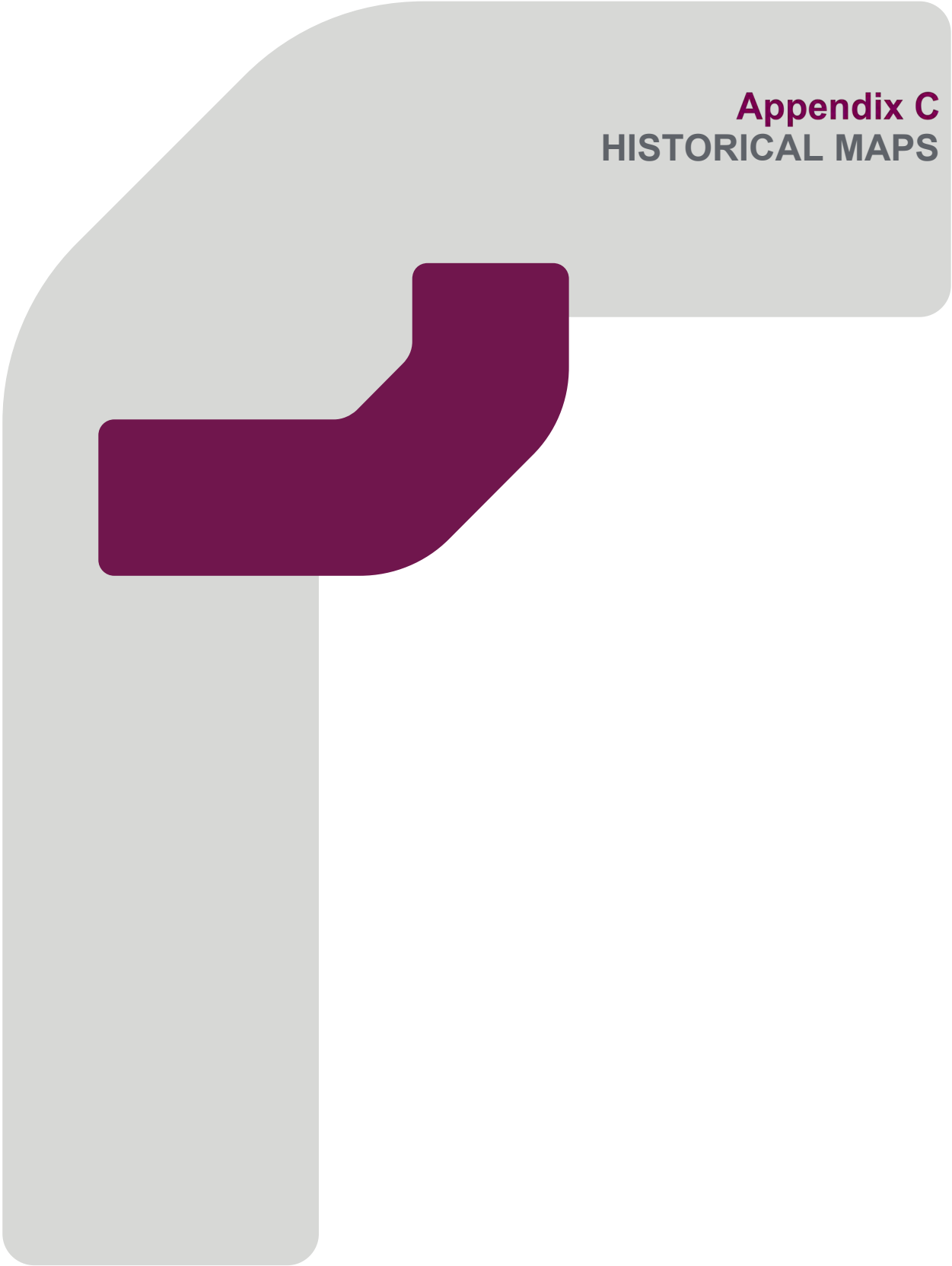
Photo 10: Disused workshop in the south of the site



Photo 11: Mature trees in the landscaped softstanding in the north east of the site



Photo 12: Disused workshop in the south of the site



Appendix C **HISTORICAL MAPS**

Site Details:

LAND BETWEEN WHITWORTH STREET AND ASHTON OLD ROAD UPTO REBY STREET, WELCOMB STREET, MANCHESTER, M11 2NJ

Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: County Series

Map date: 1893

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1893
 Revised N/A
 Edition 1893
 Copyright N/A
 Levelled N/A

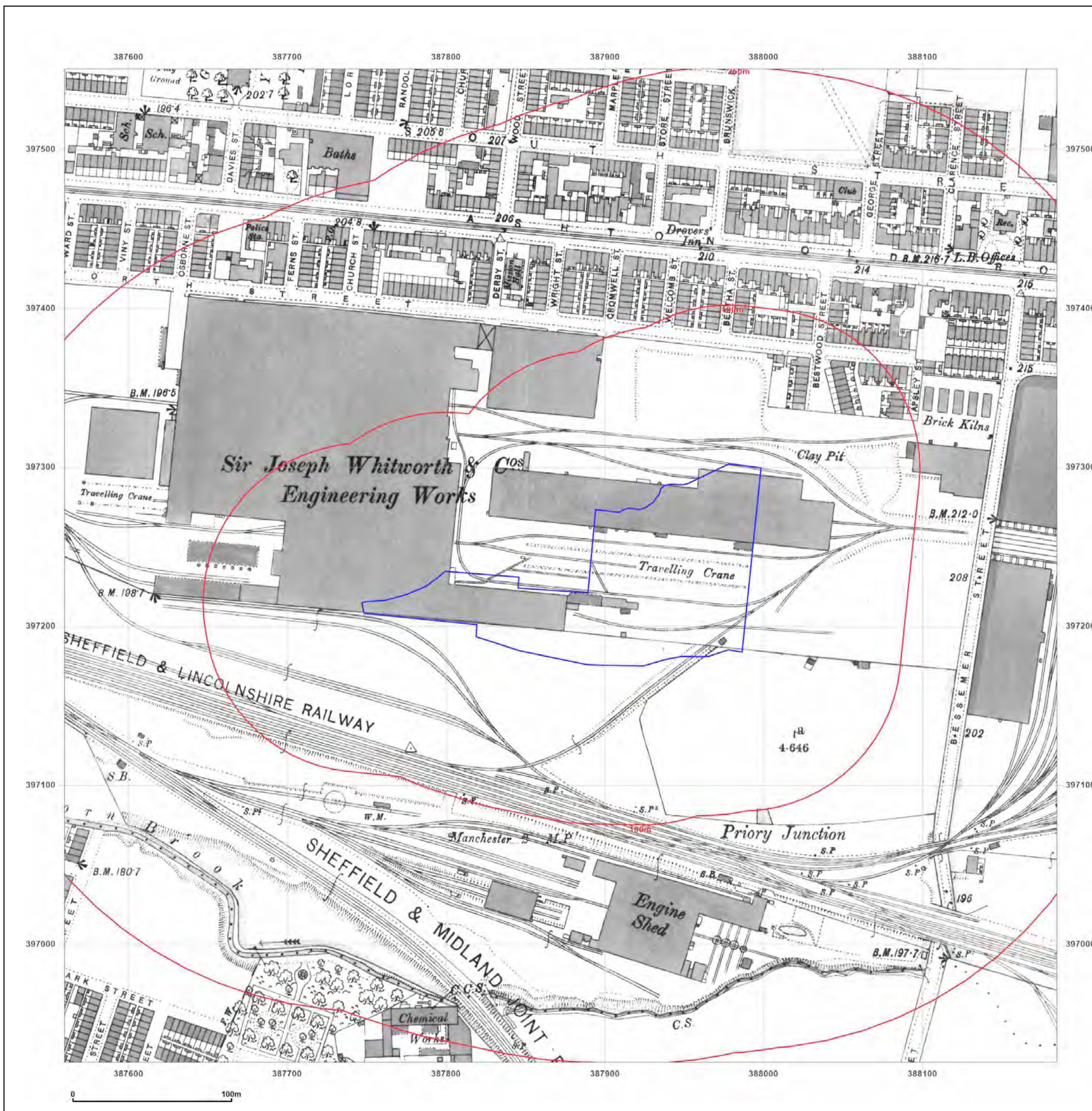


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Map legend available at:
www.groundsure.com/sites/default/files/groundsure_legend.pdf



Site Details:

LAND BETWEEN WHITWORTH STREET AND ASHTON OLD ROAD UPTO REBY STREET, WELCOMB STREET, MANCHESTER, M11 2NJ

Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: County Series

Map date: 1908

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1891
 Revised 1905
 Edition 1908
 Copyright N/A
 Levelled N/A

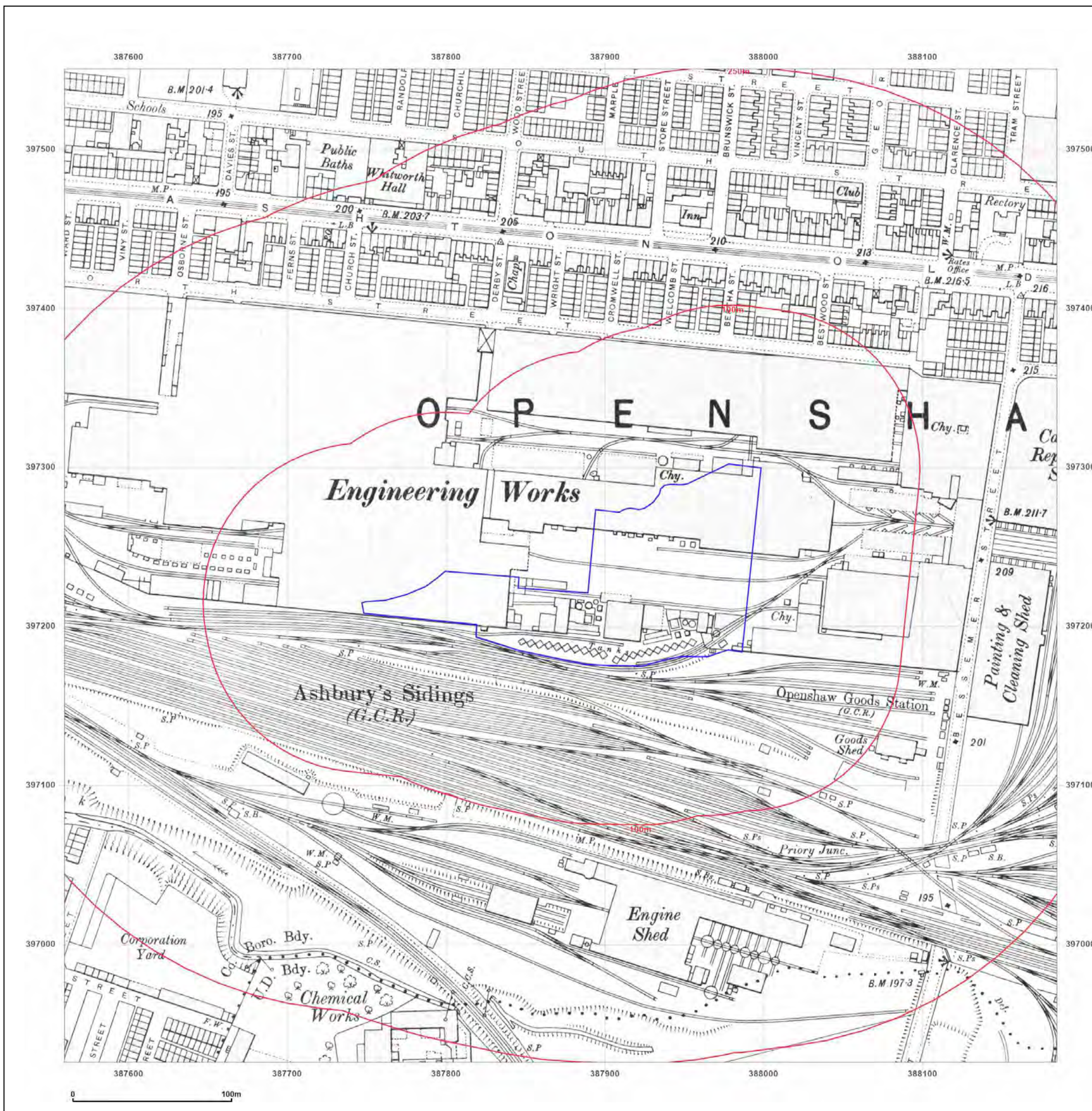


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Map legend available at:
www.groundsure.com/sites/default/files/groundsure_legend.pdf



Site Details:

LAND BETWEEN WHITWORTH STREET AND ASHTON OLD ROAD UPTO REBY STREET, WELCOMB STREET, MANCHESTER, M11 2NJ

Client Ref: JER9536 - PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: County Series

Map date: 1922

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1922
Revised 1916
Edition 1922
Copyright N/A
Levelled 1915

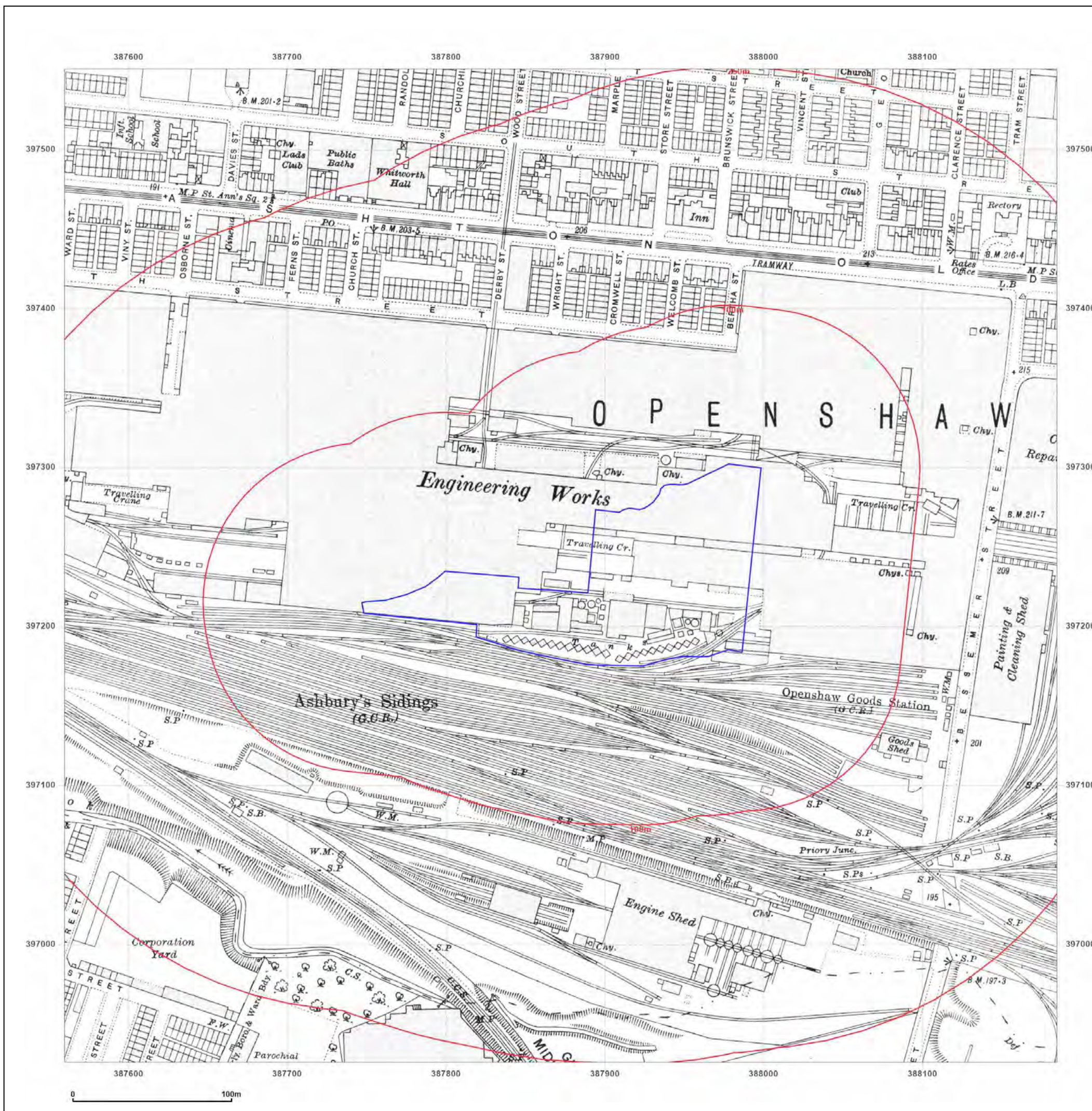


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Site Details:

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Client Ref: JER9536 - PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: County Series

Map date: 1933

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1873
 Revised 1933
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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1949-1950

Scale: 1:1,250

Printed at: 1:2,000



Surveyed 1949
 Revised 1949
 Edition N/A
 Copyright 1949
 Levelled 1929

Surveyed 1949
 Revised 1949
 Edition N/A
 Copyright 1949
 Levelled 1929

Surveyed 1949
 Revised 1949
 Edition N/A
 Copyright 1949
 Levelled 1949

Surveyed 1950
 Revised 1950
 Edition N/A
 Copyright 1950
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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1951

Scale: 1:2,500

Printed at: 1:2,500



Surveyed N/A
 Revised N/A
 Edition N/A
 Copyright 1951
 Levelled N/A

Surveyed 1949
 Revised N/A
 Edition 1951
 Copyright N/A
 Levelled 1929

Surveyed N/A
 Revised N/A
 Edition N/A
 Copyright 1951
 Levelled N/A

Surveyed 1950
 Revised 1950
 Edition N/A
 Copyright 1951
 Levelled 1949

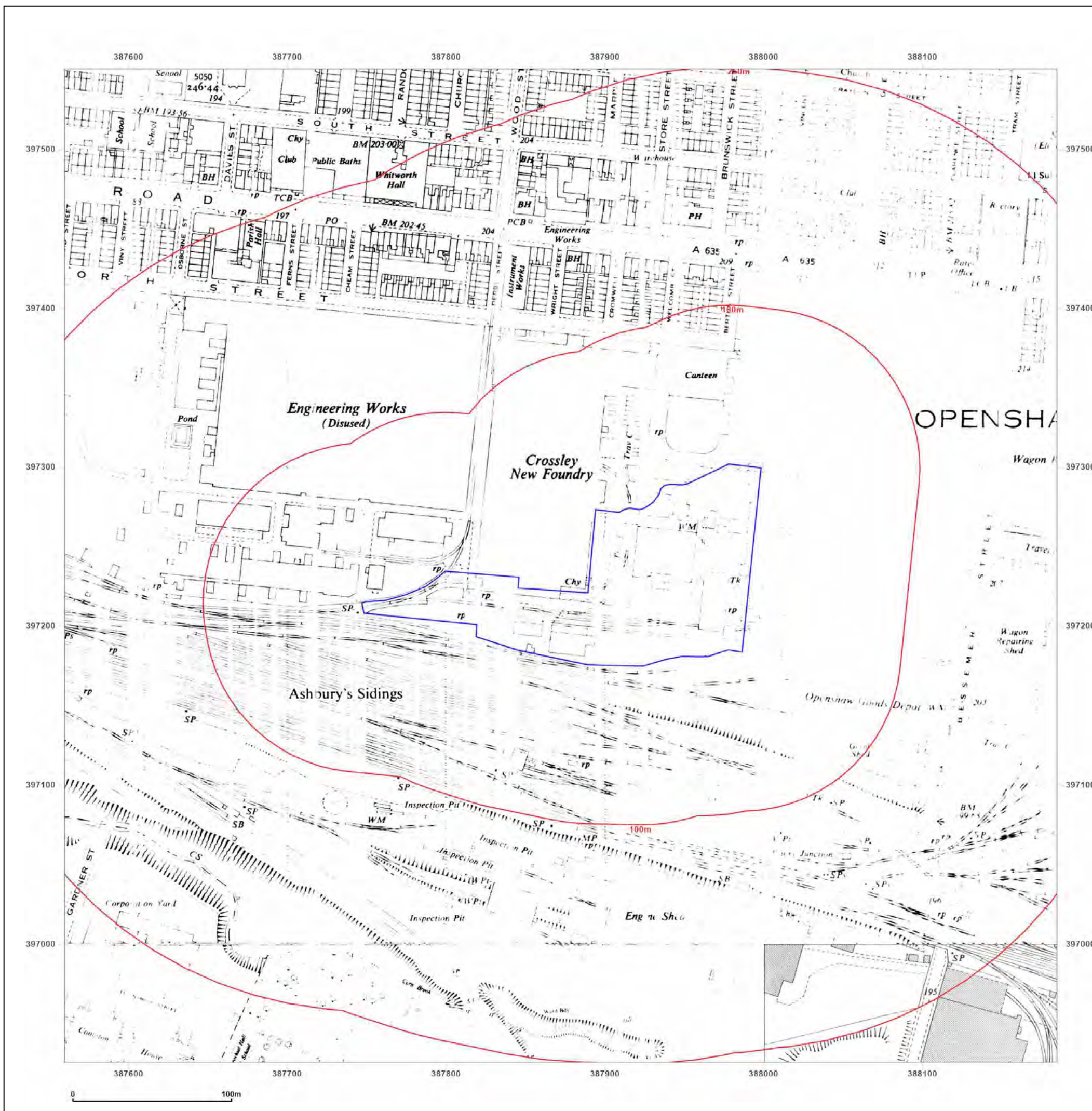


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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

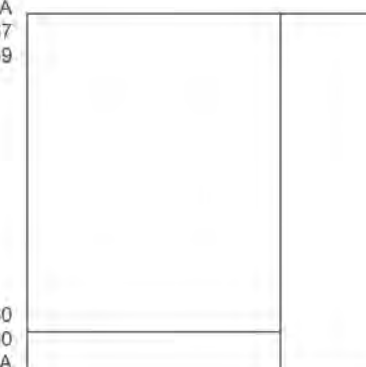
Map date: 1964-1967

Scale: 1:2,500

Printed at: 1:2,500



Surveyed 1963
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 Edition N/A
 Copyright 1967
 Levelled 1959



Surveyed 1960
 Revised 1960
 Edition N/A
 Copyright 1964
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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1963-1968

Scale: 1:1,250

Printed at: 1:2,000



Surveyed 1949
 Revised 1963
 Edition N/A
 Copyright 1963
 Levelled 1959

Surveyed 1949
 Revised 1967
 Edition N/A
 Copyright 1968
 Levelled 1964



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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1978-1982

Scale: 1:1,250

Printed at: 1:2,000



Surveyed N/A
 Revised N/A
 Edition N/A
 Copyright 1980
 Levelled 1964

Surveyed 1949
 Revised 1975
 Edition N/A
 Copyright 1978
 Levelled 1964

Surveyed 1949
 Revised 1981
 Edition N/A
 Copyright 1982
 Levelled 1964

Surveyed 1950
 Revised 1979
 Edition N/A
 Copyright 1980
 Levelled 1964

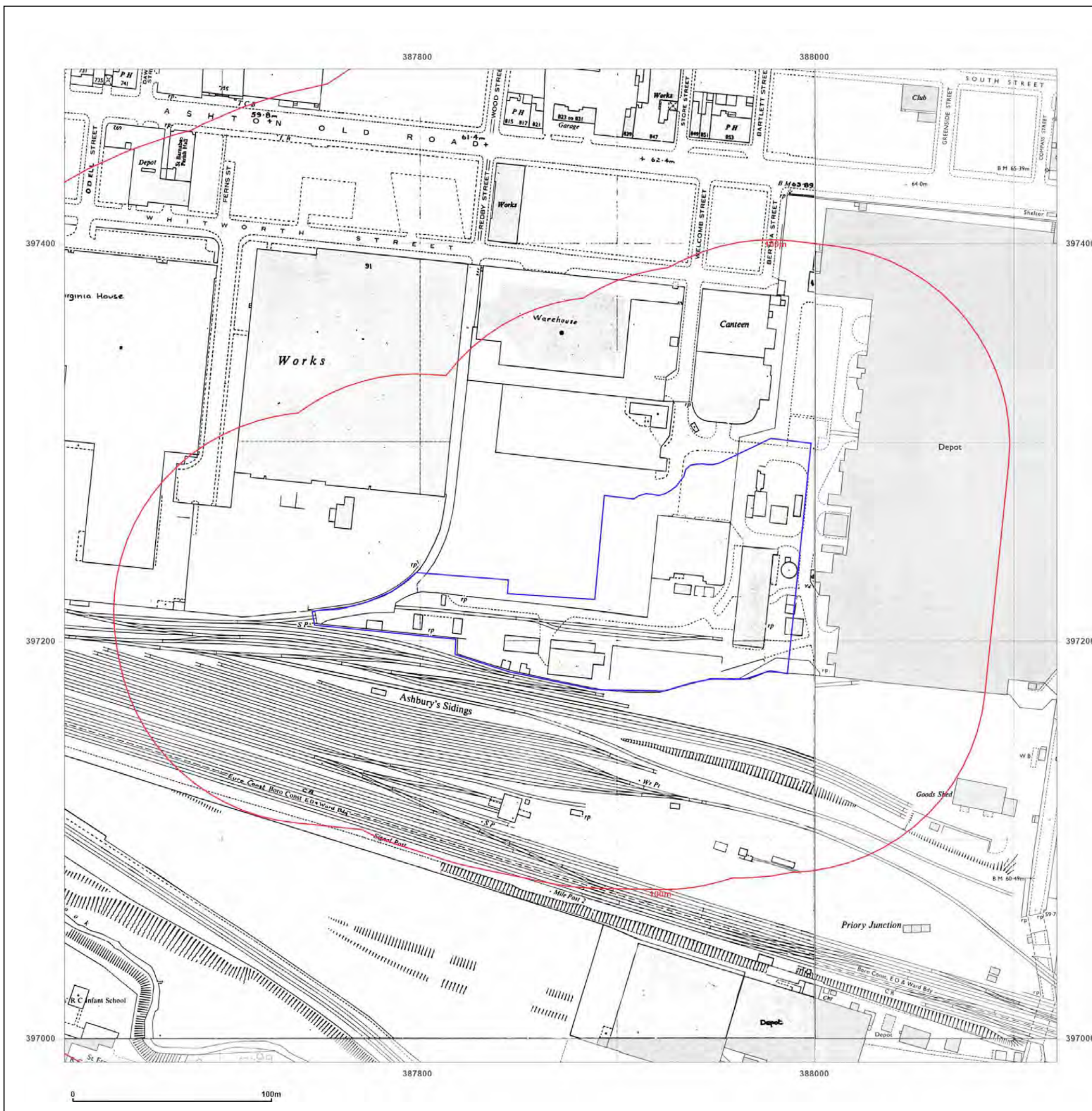


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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1986-1991

Scale: 1:1,250

Printed at: 1:2,000



Surveyed 1964
 Revised 1991
 Edition N/A
 Copyright 1991
 Levelled 1964

Surveyed 1964
 Revised 1991
 Edition N/A
 Copyright 1991
 Levelled 1964

Surveyed 1964
 Revised 1986
 Edition N/A
 Copyright 1986
 Levelled 1964

Surveyed 1991
 Revised 1991
 Edition N/A
 Copyright 1991
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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: National Grid

Map date: 1991-1992

Scale: 1:1,250

Printed at: 1:2,000



Surveyed 1992
 Revised 1992
 Edition N/A
 Copyright 1992
 Levelled N/A

Surveyed 1964
 Revised 1991
 Edition N/A
 Copyright 1991
 Levelled 1964

Surveyed 1964
 Revised 1991
 Edition N/A
 Copyright 1991
 Levelled 1964

Surveyed 1992
 Revised 1992
 Edition N/A
 Copyright 1992
 Levelled N/A



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Site Details:

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Client Ref: JER9536_-_PO22-680
Report Ref: GS-8755307
Grid Ref: 387872, 397238

Map Name: LandLine

Map date: 2003

Scale: 1:1,250

Printed at: 1:1,250



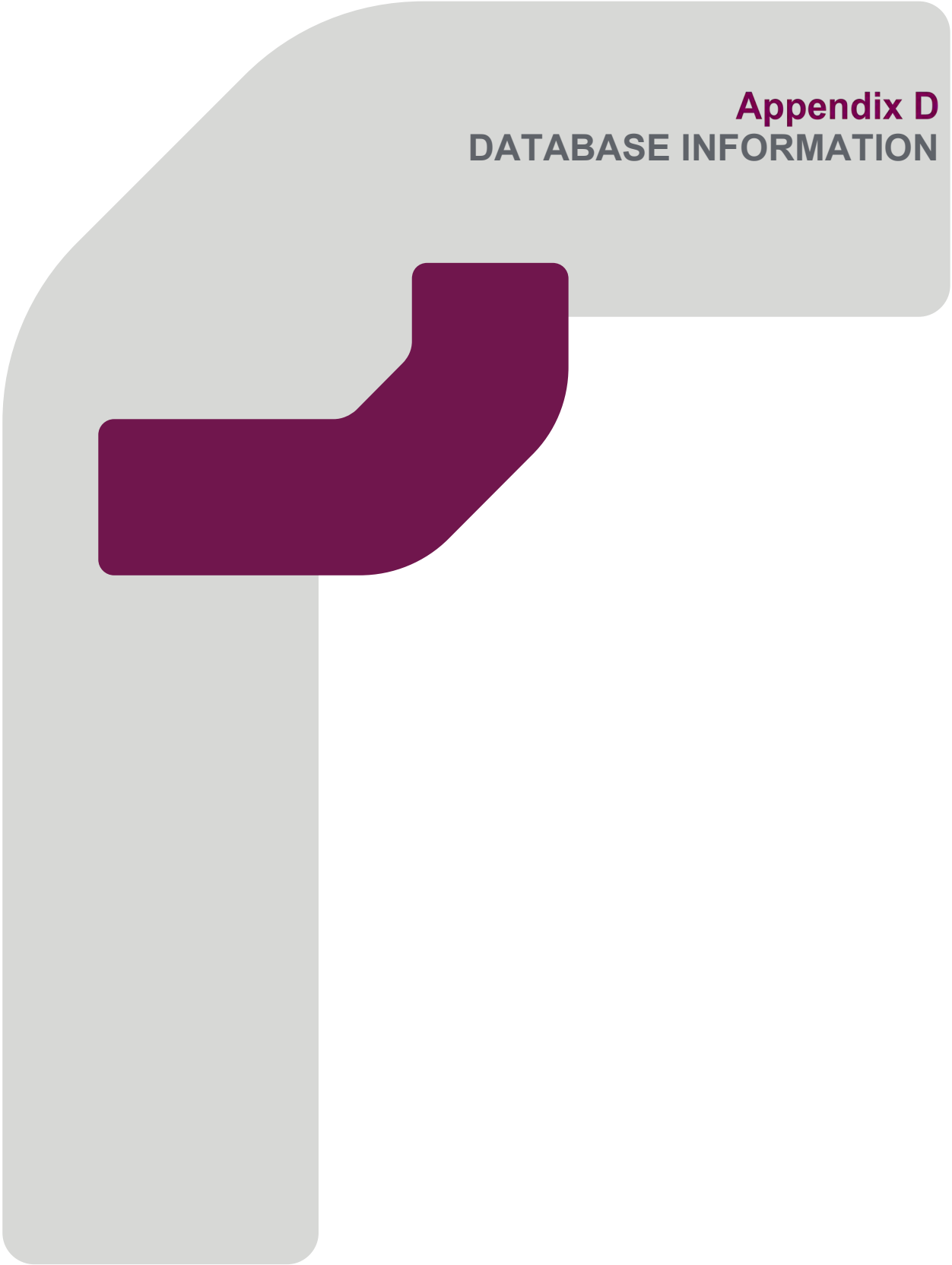
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Production date: 18 May 2022

Map legend available at:
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Appendix D

DATABASE INFORMATION

62	4.6	Control of Major Accident Hazards (COMAH)	0	0	0	0	-
63	4.7	Regulated explosive sites	0	0	0	0	-
63	4.8	Hazardous substance storage/usage	0	0	0	0	-
63	4.9	Historical licensed industrial activities (IPC)	0	0	0	0	-
63	4.10	<u>Licensed industrial activities (Part A(1))</u>	0	0	2	0	-
64	4.11	<u>Licensed pollutant release (Part A(2)/B)</u>	0	2	5	6	-
66	4.12	Radioactive Substance Authorisations	0	0	0	0	-
66	4.13	<u>Licensed Discharges to controlled waters</u>	0	0	0	7	-
67	4.14	Pollutant release to surface waters (Red List)	0	0	0	0	-
67	4.15	Pollutant release to public sewer	0	0	0	0	-
67	4.16	List 1 Dangerous Substances	0	0	0	0	-
68	4.17	List 2 Dangerous Substances	0	0	0	0	-
68	4.18	<u>Pollution Incidents (EA/NRW)</u>	0	0	1	1	-
68	4.19	Pollution inventory substances	0	0	0	0	-
69	4.20	Pollution inventory waste transfers	0	0	0	0	-
69	4.21	Pollution inventory radioactive waste	0	0	0	0	-
Page	Section	Hydrogeology	On site	0-50m	50-250m	250-500m	500-2000m
70	5.1	<u>Superficial aquifer</u>	Identified (within 500m)				
72	5.2	<u>Bedrock aquifer</u>	Identified (within 500m)				
74	5.3	<u>Groundwater vulnerability</u>	Identified (within 50m)				
75	5.4	Groundwater vulnerability- soluble rock risk	None (within 0m)				
75	5.5	Groundwater vulnerability- local information	None (within 0m)				
76	5.6	<u>Groundwater abstractions</u>	0	0	0	2	25
83	5.7	<u>Surface water abstractions</u>	0	0	0	0	6
85	5.8	Potable abstractions	0	0	0	0	0
85	5.9	Source Protection Zones	0	0	0	0	-
85	5.10	Source Protection Zones (confined aquifer)	0	0	0	0	-
Page	Section	Hydrology	On site	0-50m	50-250m	250-500m	500-2000m
86	6.1	<u>Water Network (OS MasterMap)</u>	0	0	4	-	-



87	6.2	<u>Surface water features</u>	0	0	1	-	-
87	6.3	<u>WFD Surface water body catchments</u>	1	-	-	-	-
88	6.4	<u>WFD Surface water bodies</u>	0	0	0	-	-
88	6.5	<u>WFD Groundwater bodies</u>	1	-	-	-	-
Page	Section	River and coastal flooding	On site	0-50m	50-250m	250-500m	500-2000m
89	7.1	Risk of flooding from rivers and the sea	None (within 50m)				
89	7.2	Historical Flood Events	0	0	0	-	-
89	7.3	Flood Defences	0	0	0	-	-
90	7.4	Areas Benefiting from Flood Defences	0	0	0	-	-
90	7.5	Flood Storage Areas	0	0	0	-	-
91	7.6	Flood Zone 2	None (within 50m)				
91	7.7	Flood Zone 3	None (within 50m)				
Page	Section	Surface water flooding					
92	8.1	<u>Surface water flooding</u>	1 in 30 year, 0.3m - 1.0m (within 50m)				
Page	Section	Groundwater flooding					
94	9.1	<u>Groundwater flooding</u>	High (within 50m)				
Page	Section	Environmental designations	On site	0-50m	50-250m	250-500m	500-2000m
95	10.1	Sites of Special Scientific Interest (SSSI)	0	0	0	0	0
96	10.2	Conserved wetland sites (Ramsar sites)	0	0	0	0	0
96	10.3	Special Areas of Conservation (SAC)	0	0	0	0	0
96	10.4	Special Protection Areas (SPA)	0	0	0	0	0
96	10.5	National Nature Reserves (NNR)	0	0	0	0	0
97	10.6	<u>Local Nature Reserves (LNR)</u>	0	0	0	0	1
97	10.7	Designated Ancient Woodland	0	0	0	0	0
97	10.8	Biosphere Reserves	0	0	0	0	0
97	10.9	Forest Parks	0	0	0	0	0
98	10.10	Marine Conservation Zones	0	0	0	0	0
98	10.11	<u>Green Belt</u>	0	0	0	0	1
98	10.12	Proposed Ramsar sites	0	0	0	0	0

98	10.13	Possible Special Areas of Conservation (pSAC)	0	0	0	0	0
99	10.14	Potential Special Protection Areas (pSPA)	0	0	0	0	0
99	10.15	Nitrate Sensitive Areas	0	0	0	0	0
99	10.16	Nitrate Vulnerable Zones	0	0	0	0	0
100	10.17	<u>SSSI Impact Risk Zones</u>	1	-	-	-	-
101	10.18	SSSI Units	0	0	0	0	0
Page	Section	Visual and cultural designations	On site	0-50m	50-250m	250-500m	500-2000m
102	11.1	World Heritage Sites	0	0	0	-	-
102	11.2	Area of Outstanding Natural Beauty	0	0	0	-	-
102	11.3	National Parks	0	0	0	-	-
102	11.4	Listed Buildings	0	0	0	-	-
103	11.5	Conservation Areas	0	0	0	-	-
103	11.6	Scheduled Ancient Monuments	0	0	0	-	-
103	11.7	Registered Parks and Gardens	0	0	0	-	-
Page	Section	Agricultural designations	On site	0-50m	50-250m	250-500m	500-2000m
104	12.1	<u>Agricultural Land Classification</u>	Urban (within 250m)				
105	12.2	Open Access Land	0	0	0	-	-
105	12.3	Tree Felling Licences	0	0	0	-	-
105	12.4	Environmental Stewardship Schemes	0	0	0	-	-
105	12.5	Countryside Stewardship Schemes	0	0	0	-	-
Page	Section	Habitat designations	On site	0-50m	50-250m	250-500m	500-2000m
106	13.1	Priority Habitat Inventory	0	0	0	-	-
106	13.2	Habitat Networks	0	0	0	-	-
107	13.3	<u>Open Mosaic Habitat</u>	0	0	3	-	-
107	13.4	Limestone Pavement Orders	0	0	0	-	-
Page	Section	Geology 1:10,000 scale	On site	0-50m	50-250m	250-500m	500-2000m
108	14.1	<u>10k Availability</u>	Identified (within 500m)				
109	14.2	<u>Artificial and made ground (10k)</u>	1	0	0	4	-
111	14.3	<u>Superficial geology (10k)</u>	1	0	0	0	-

112	14.4	Landslip (10k)	0	0	0	0	-
113	14.5	<u>Bedrock geology (10k)</u>	1	0	0	2	-
114	14.6	<u>Bedrock faults and other linear features (10k)</u>	0	0	0	1	-
Page	Section	Geology 1:50,000 scale	On site	0-50m	50-250m	250-500m	500-2000m
115	15.1	<u>50k Availability</u>	Identified (within 500m)				
116	15.2	<u>Artificial and made ground (50k)</u>	1	0	0	0	-
117	15.3	<u>Artificial ground permeability (50k)</u>	1	0	-	-	-
118	15.4	<u>Superficial geology (50k)</u>	1	0	0	0	-
119	15.5	<u>Superficial permeability (50k)</u>	Identified (within 50m)				
119	15.6	Landslip (50k)	0	0	0	0	-
119	15.7	Landslip permeability (50k)	None (within 50m)				
120	15.8	<u>Bedrock geology (50k)</u>	1	0	0	2	-
121	15.9	<u>Bedrock permeability (50k)</u>	Identified (within 50m)				
121	15.10	<u>Bedrock faults and other linear features (50k)</u>	0	0	0	1	-
Page	Section	Boreholes	On site	0-50m	50-250m	250-500m	500-2000m
122	16.1	<u>BGS Boreholes</u>	0	0	13	-	-
Page	Section	Natural ground subsidence					
124	17.1	<u>Shrink swell clays</u>	Very low (within 50m)				
125	17.2	<u>Running sands</u>	Very low (within 50m)				
126	17.3	<u>Compressible deposits</u>	Very low (within 50m)				
128	17.4	<u>Collapsible deposits</u>	Very low (within 50m)				
129	17.5	<u>Landslides</u>	Very low (within 50m)				
130	17.6	<u>Ground dissolution of soluble rocks</u>	Negligible (within 50m)				
Page	Section	Mining, ground workings and natural cavities	On site	0-50m	50-250m	250-500m	500-2000m
132	18.1	Natural cavities	0	0	0	0	-
133	18.2	<u>BritPits</u>	0	2	0	2	-
133	18.3	<u>Surface ground workings</u>	0	1	13	-	-
134	18.4	Underground workings	0	0	0	0	0
134	18.5	Historical Mineral Planning Areas	0	0	0	0	-



135	18.6	<u>Non-coal mining</u>	0	0	0	1	0
135	18.7	Mining cavities	0	0	0	0	0
135	18.8	<u>JPB mining areas</u>	Identified (within 0m)				
136	18.9	<u>Coal mining</u>	Identified (within 0m)				
136	18.10	Brine areas	None (within 0m)				
136	18.11	Gypsum areas	None (within 0m)				
136	18.12	Tin mining	None (within 0m)				
136	18.13	Clay mining	None (within 0m)				
Page	Section	Radon					
137	19.1	<u>Radon</u>	Less than 1% (within 0m)				
Page	Section	Soil chemistry	On site	0-50m	50-250m	250-500m	500-2000m
138	20.1	<u>BGS Estimated Background Soil Chemistry</u>	1	2	-	-	-
138	20.2	<u>BGS Estimated Urban Soil Chemistry</u>	6	7	-	-	-
139	20.3	BGS Measured Urban Soil Chemistry	0	0	-	-	-
Page	Section	Railway infrastructure and projects	On site	0-50m	50-250m	250-500m	500-2000m
140	21.1	Underground railways (London)	0	0	0	-	-
140	21.2	Underground railways (Non-London)	0	0	0	-	-
141	21.3	Railway tunnels	0	0	0	-	-
141	21.4	<u>Historical railway and tunnel features</u>	21	14	42	-	-
144	21.5	Royal Mail tunnels	0	0	0	-	-
144	21.6	Historical railways	0	0	0	-	-
144	21.7	<u>Railways</u>	0	0	11	-	-
145	21.8	Crossrail 1	0	0	0	0	-
145	21.9	Crossrail 2	0	0	0	0	-
145	21.10	HS2	0	0	0	0	-

Recent aerial photograph



Capture Date: 22/04/2019

Site Area: 1.53ha



Recent site history - 2015 aerial photograph



Capture Date: 11/06/2015

Site Area: 1.53ha



Recent site history - 2009 aerial photograph

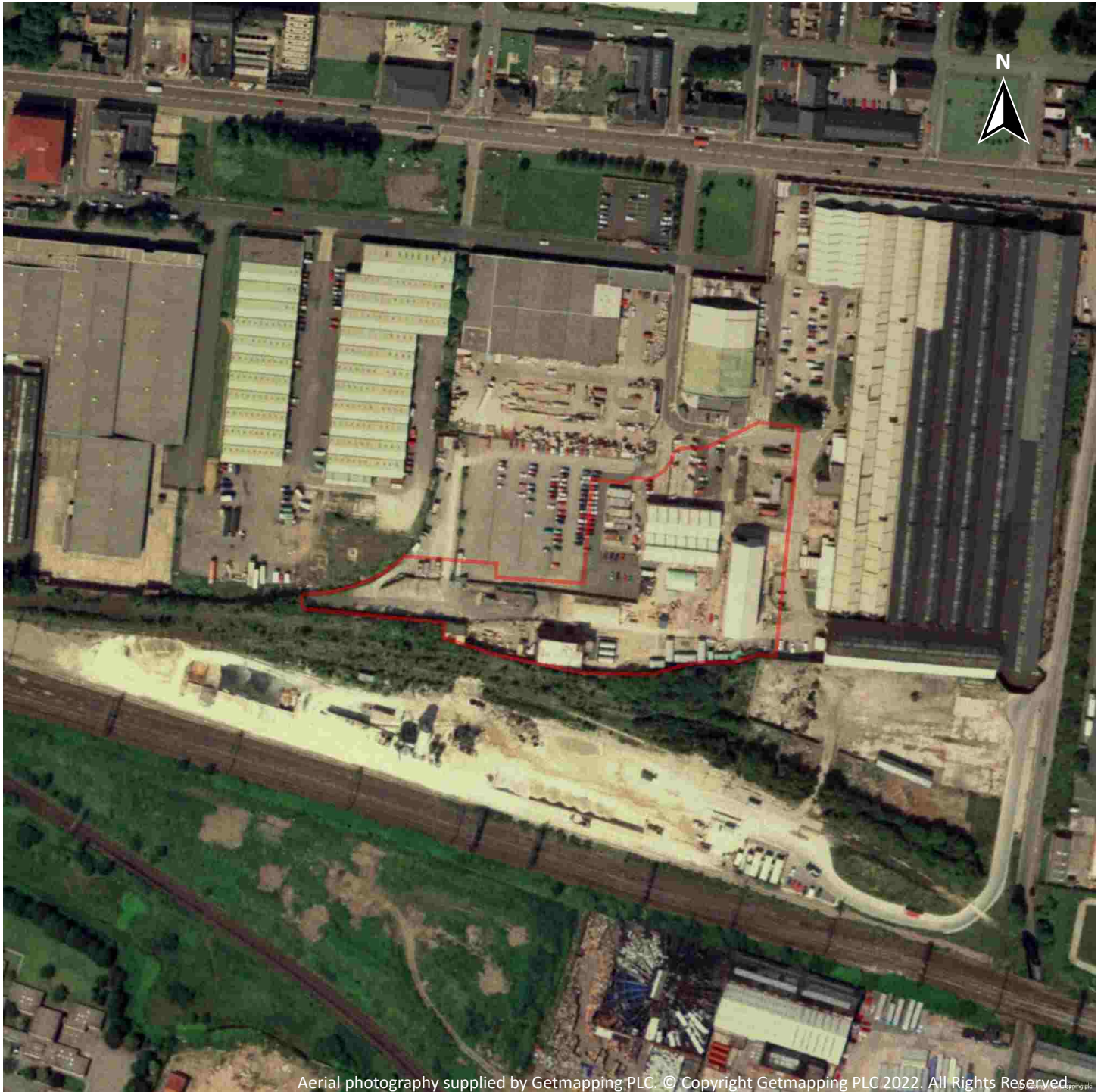


Capture Date: 02/06/2009

Site Area: 1.53ha



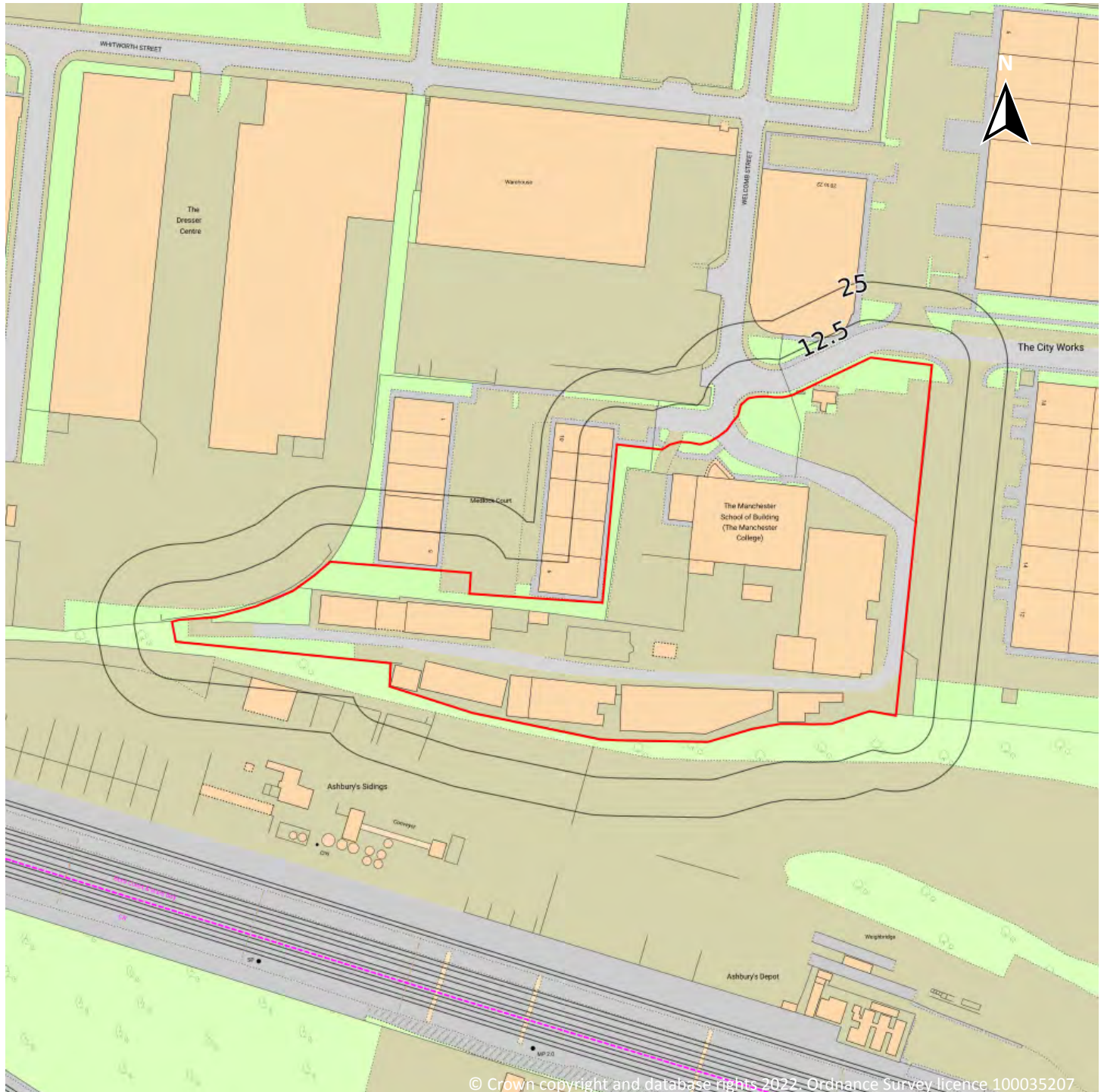
Recent site history - 2000 aerial photograph



Capture Date: 19/06/2000

Site Area: 1.53ha

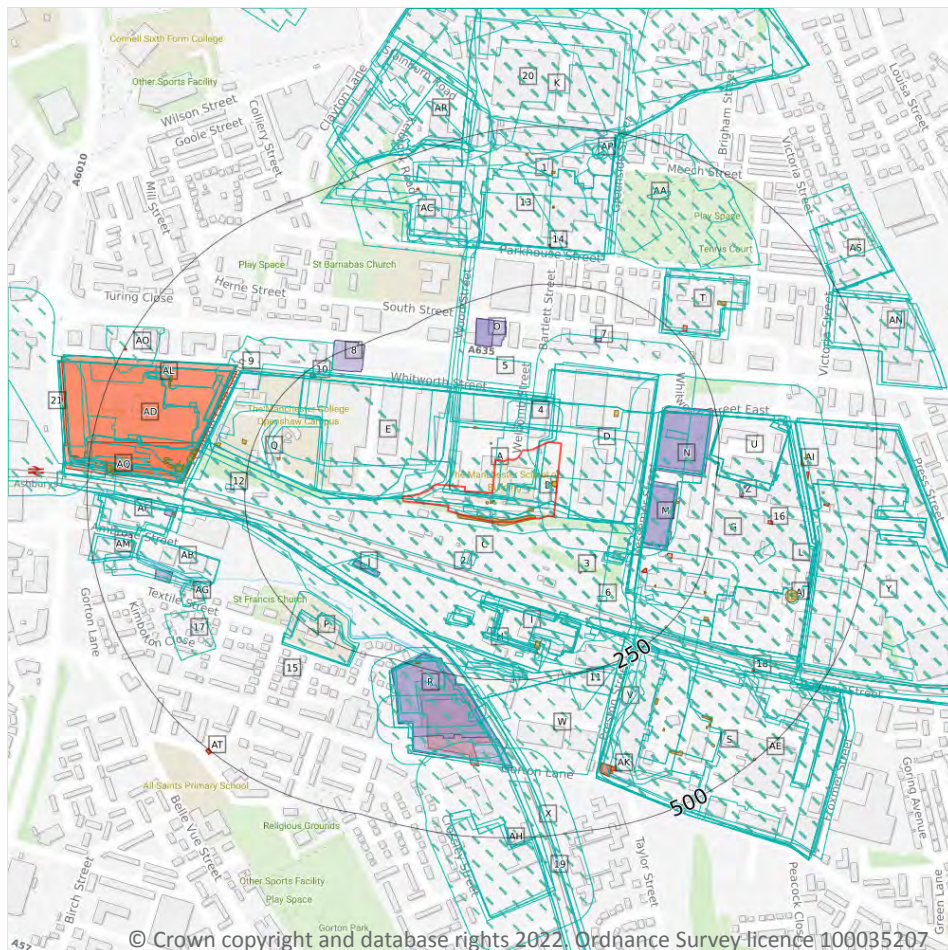
OS MasterMap site plan



Site Area: 1.53ha



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

215

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 13**

ID	Location	Land use	Dates present	Group ID
1	On site	Steel Works	1956	810023



ID	Location	Land use	Dates present	Group ID
2	On site	Railway Sidings	1978	875920
3	On site	Railway Sidings	1934 - 1991	975939
A	On site	Unspecified Commercial/Industrial	1991	796812
A	On site	Engineering Works	1923	849347
A	On site	Engineering Works	1934	865117
A	On site	Unspecified Works	1978	879413
A	On site	Engineering Works	1915	946576
A	On site	Unspecified Works	1968	965665
A	On site	Unspecified Works	1985	988157
B	On site	Unspecified Foundry	1956	809978
B	On site	Unspecified Tanks	1923	815406
B	On site	Unspecified Tanks	1923	815407
B	On site	Railway Building	1978	891665
B	On site	Railway Building	1956	900610
B	On site	Railway Sidings	1915	926600
B	On site	Railway Building	1978	943561
B	On site	Engineering Works	1890 - 1905	949713
C	On site	Railway Sidings	1934	886032
C	On site	Railway Sidings	1968	901995
C	On site	Railway Sidings	1923	902553
C	On site	Railway Sidings	1915	954027
C	On site	Railway Sidings	1905	954032
C	On site	Railway Sidings	1890	974704
C	On site	Railway Sidings	1938	975550
D	On site	Unspecified Depot	1968 - 1978	928299
D	On site	Unspecified Depot	1985	966409
E	On site	Unspecified Commercial/Industrial	1985	796814
E	6m NW	Unspecified Works	1968	942426



ID	Location	Land use	Dates present	Group ID
4	19m N	Unspecified Pit	1890	840549
A	30m N	Unspecified Warehouse	1985	883064
A	38m N	Unspecified Warehouse	1978	937864
D	50m E	Unspecified Pit	1890	840548
F	52m S	Railway Building	1968 - 1978	961659
F	56m S	Railway Building	1985	922524
5	92m N	Unspecified Works	1985 - 1991	886185
G	95m E	Unspecified Yard	1956	908731
H	96m S	Unspecified Commercial/Industrial	1934	886856
C	98m SE	Goods Depot	1968	827990
C	98m SE	Railway Building	1978	894505
C	99m SE	Goods Station	1923	821666
C	99m SE	Railway Building	1934 - 1938	906662
C	99m SE	Railway Building	1915	919495
C	110m SE	Railway Building	1985 - 1991	968681
I	115m S	Engine Shed	1978	865821
I	115m S	Engine Shed	1968	903096
J	117m SW	Railway Building	1934 - 1938	892505
J	117m SW	Railway Building	1915	950552
I	118m S	Railway Engine Shed	1956	834848
I	119m S	Unspecified Commercial/Industrial	1985	969122
J	121m SW	Railway Building	1923	962409
K	124m NW	Railway Sidings	1934 - 1938	882010
C	124m E	Goods Station	1915 - 1923	938037
C	125m E	Railway Building	1934 - 1938	948168
I	126m S	Engine Shed	1915	887339
I	126m S	Engine Shed	1934 - 1938	945706
I	127m S	Engine Shed	1923	910089

ID	Location	Land use	Dates present	Group ID
I	127m S	Engine Shed	1890 - 1905	863914
C	133m SE	Unspecified Warehouse	1978	870856
H	141m S	Railway Building	1968 - 1978	933919
L	142m E	Unspecified Yard	1890	849060
6	144m SE	Railway Building	1985 - 1991	898691
G	145m E	Unspecified Yard	1905	952348
G	145m E	Unspecified Yard	1923	954037
M	145m E	Painting Shed	1915 - 1923	936124
G	145m E	Unspecified Yard	1934 - 1938	955837
G	145m E	Unspecified Yard	1915	973521
H	146m S	Engine Shed	1956	817791
G	147m E	Unspecified Yard	1968	920516
N	147m E	Railway Building	1968	820510
N	150m E	Carriage Repairing Shed	1923	934639
N	150m E	Carriage Repairing Shed	1905	973552
N	151m E	Wagon Repair Shed	1934	815796
N	151m E	Wagon Repairing Shed	1938	837405
N	151m E	Carriage Repairing Shed	1915	939780
H	153m S	Railway Building	1915	927482
H	153m S	Railway Building	1934 - 1938	955947
H	155m S	Railway Building	1923	883353
N	167m E	Unspecified Depot	1991	876027
C	172m SE	Unspecified Warehouse	1985 - 1991	986527
I	179m S	Unspecified Tanks	1923	815409
I	184m S	Railway Building	1968 - 1978	973049
I	192m S	Railway Building	1923	820457
C	192m SE	Railway Building	1915	820463
P	203m SW	Corporation Yard	1905	845352

ID	Location	Land use	Dates present	Group ID
Q	204m W	Refuse Heap	1956	829129
I	205m S	Railway Building	1923	820456
I	206m S	Unspecified Pit	1968 - 1978	964743
I	208m S	Unspecified Pit	1956	916918
I	211m S	Unspecified Tank	1923	825243
R	213m S	Motor Works	1923	984606
P	216m SW	Corporation Yard	1934	886699
P	216m SW	Corporation Yard	1915	895526
P	220m SW	Corporation Yard	1923	941411
I	221m S	Unspecified Ground Workings	1923	800656
I	225m S	Cuttings	1934	795824
R	225m S	Unspecified Warehouse	1956 - 1968	875610
S	227m SE	Unspecified Foundry	1890	870484
R	228m S	Unspecified Works	1978	830426
S	228m SE	Unspecified Foundry	1915 - 1956	857333
9	229m NW	Bleach Works	1851	810798
T	234m NE	Engineering Works	1890	931550
U	234m E	Engine Shed	1905	869312
U	234m E	Engine Shed	1923	880833
I	234m S	Unspecified Pit	1934	982246
R	234m S	Chemical Works	1905	834553
R	234m S	Motor Works	1934 - 1938	912346
R	234m S	Motor Works	1915	991006
U	235m E	Engine Shed	1915	850687
U	235m E	Engine Shed	1934 - 1938	883429
T	237m NE	Engineering Works	1923	877806
S	237m SE	Unspecified Foundry	1968	958959
S	238m SE	Unspecified Foundry	1923	891421



ID	Location	Land use	Dates present	Group ID
S	238m SE	Unspecified Foundry	1905	931610
V	238m SE	Unspecified Ground Workings	1923	917140
U	238m E	Engine Shed	1956	894658
U	238m E	Engine Shed	1968	927617
T	241m NE	Engineering Works	1915	904653
T	241m NE	Engineering Works	1934 - 1938	941769
V	244m SE	Unspecified Ground Workings	1905	911971
11	246m S	Unspecified Heap	1956 - 1968	942480
T	248m NE	Unspecified Works	1968	830427
V	249m SE	Unspecified Depot	1985 - 1991	938595
W	251m S	Gas Plant Works	1915 - 1923	846100
X	260m S	Cuttings	1956 - 1968	907697
12	268m W	Railway Building	1978	820511
C	271m SE	Railway Building	1923	820462
W	271m S	Unspecified Heap	1956	804171
R	280m S	Gas Plant Works	1905	896993
Y	287m SE	Carriage, Wagon and Locomotive Works	1915 - 1923	937994
Y	287m SE	Locomotive Works	1905	946681
X	287m S	Cuttings	1915 - 1938	896941
X	287m S	Cuttings	1905	906344
X	287m S	Cuttings	1890	984695
K	295m N	Engineering Works	1923	951144
K	296m N	Engineering Works	1934	912693
AA	296m N	Brick Works	1890	818779
K	305m N	Unspecified Commercial/Industrial	1968	796802
AB	305m W	Corn Mill	1890	823149
K	306m N	Unspecified Works	1985	985355
AB	306m W	Unspecified Mill	1915 - 1923	940601

ID	Location	Land use	Dates present	Group ID
K	306m N	Railway Sidings	1956	877918
W	307m S	Cuttings	1923	908033
13	308m N	Unspecified Works	1978	847210
AC	315m N	Brick Works	1890	818771
AA	321m N	Unspecified Pit	1890	840559
L	323m E	Railway Building	1923 - 1934	868639
AE	324m SE	Industrial Estate	1985 - 1991	923135
K	327m N	Railway Sidings	1923	924696
AD	327m NW	Gas and Oil Engine Works	1956	847552
AD	328m NW	Unspecified Commercial/Industrial	1890	796813
AD	328m NW	Unspecified Works	1968 - 1978	870737
AD	328m NW	Unspecified Works	1985 - 1991	991605
K	328m N	Railway Sidings	1915	870808
AD	328m NW	Gas and Oil Engine Works	1923	856729
AB	328m SW	Unspecified Works	1985 - 1991	867318
AD	329m NW	Gas Engine Works	1905	815785
AD	329m NW	Gas and Oil Engine Works	1934 - 1938	897879
AD	329m NW	Gas and Oil Engine Works	1915	958721
Q	335m W	Railway Sidings	1956	923194
AC	337m N	Unspecified Pit	1890	840557
AB	338m W	Unspecified Works	1978	860446
AF	347m W	Unspecified Works	1985 - 1991	849212
AG	347m SW	Unspecified Works	1923	931099
AG	348m W	Starch Works	1915	833825
AH	351m S	Unspecified Depot	1985 - 1991	854448
Q	354m W	Unspecified Tank	1915	902345
Q	354m W	Unspecified Tank	1934	925968
Q	355m W	Gasometer	1905	863027

ID	Location	Land use	Dates present	Group ID
Q	355m W	Gasometer	1923	977288
AF	356m W	Unspecified Works	1968 - 1978	852698
AF	361m W	Iron Works	1923	850659
17	362m SW	Iron Works	1915 - 1923	893003
AF	364m W	Iron Works	1915	928103
AF	364m W	Iron Works	1934 - 1938	991749
Y	373m E	Locomotive Works	1938 - 1956	867135
Y	373m E	Locomotive Works	1934	885991
Y	378m E	Locomotive Works	1968	924954
AJ	392m E	Unspecified Tank	1890	825242
Y	403m E	Railway Sidings	1915	926340
K	405m N	Engineering Works	1938	884631
Y	409m E	Railway Sidings	1956	912703
Y	409m E	Railway Sidings	1968	966235
19	410m S	Cuttings	1923	903234
AL	410m NW	Railway Sidings	1923	908994
AM	428m W	Brewery	1923	937099
AM	430m W	Brewery	1934 - 1938	916008
AM	430m W	Brewery	1915	952159
AN	444m E	Steam Hammer Works	1923	975783
AO	449m NW	Fire Brick Works	1851	793923
AN	450m E	Steam Hammer Works	1915	867081
AN	450m E	Steam Hammer Works	1934 - 1938	928039
AP	455m N	Unspecified Tank	1968	875915
AP	455m N	Unspecified Tank	1985	902693
20	457m N	Dye Works	1851	870141
AH	457m S	Unspecified Works	1968	830425
AH	457m S	Unspecified Commercial/Industrial	1978	874913

ID	Location	Land use	Dates present	Group ID
AP	460m N	Unspecified Tank	1978	912306
K	460m N	Unspecified Works	1978	878377
AN	461m E	Unspecified Works	1968	875188
AH	468m S	Unspecified Commercial/Industrial	1956	903585
AR	468m N	Dye Works	1923	920128
AH	471m S	Motor Works	1934 - 1938	863611
AR	476m N	Dye Works	1890 - 1905	987882
AR	487m N	Dye Works	1915	866564
AR	487m N	Dye Works	1934 - 1938	959572
AS	487m NE	Unspecified Mill	1923	991657
AS	488m NE	Unspecified Works	1915 - 1923	856423
AR	489m N	Unspecified Works	1985	862949
AR	491m N	Unspecified Works	1968	922875
AS	493m NE	Unspecified Mill	1890 - 1905	857504
21	493m W	Goods Depot	1956	976388
AS	495m NE	Steel Works	1934 - 1938	931825
AS	495m NE	Unspecified Mill	1915	940481
K	497m N	Railway Sidings	1968	862695

This data is sourced from Ordnance Survey / Groundsure.

1.2 Historical tanks

Records within 500m

71

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 13**



ID	Location	Land use	Dates present	Group ID
B	On site	Unspecified Tank	1949 - 1980	123094
B	On site	Unspecified Tank	1908 - 1922	123543
B	On site	Unspecified Tank	1908 - 1922	126920
B	On site	Tanks	1908 - 1922	128476
B	On site	Unspecified Tank	1963	131627
B	On site	Tanks	1908 - 1922	136114
B	On site	Unspecified Tank	1908 - 1922	139108
A	26m N	Unspecified Tank	1908	116440
A	58m NW	Unspecified Tank	1933	116439
D	94m NE	Unspecified Tank	1933	116441
C	97m SE	Unspecified Tank	1949	116450
M	191m E	Unspecified Tank	1949	116451
I	191m S	Unspecified Tank	1968 - 1991	136961
C	193m SE	Unspecified Tank	1978	116449
Q	203m W	Unspecified Tank	1933	115841
I	209m S	Unspecified Tank	1891	116453
R	242m S	Unspecified Tank	1891	116452
R	254m S	Unspecified Tank	1891	116454
Q	262m W	Unspecified Tank	1933	115842
C	267m SE	Unspecified Tank	1991	131640
C	267m SE	Unspecified Tank	1980	127022
C	267m SE	Unspecified Tank	1991	139042
C	267m SE	Unspecified Tank	1980	143200
C	268m SE	Unspecified Tank	1978	143471
C	286m SE	Tanks	1949	107109
Q	300m W	Unspecified Tank	1891	115843
14	310m N	Unspecified Tank	1956 - 1963	146158
V	331m SE	Tanks	1980 - 1994	141773

ID	Location	Land use	Dates present	Group ID
T	331m NE	Unspecified Tank	1986 - 1997	143917
15	332m SW	Unspecified Tank	1891	115834
Q	333m W	Unspecified Tank	1948	115845
Q	334m W	Unspecified Tank	1948	115844
Q	336m W	Tanks	1933	107121
Q	349m W	Tanks	1948	107122
Q	351m W	Unspecified Tank	1891 - 1933	131487
Q	357m W	Tanks	1891	107123
Q	361m W	Tanks	1891	107124
AF	362m W	Unspecified Tank	1908	115837
Q	367m W	Tanks	1908 - 1922	122471
K	370m N	Unspecified Tank	1956	133706
K	371m N	Unspecified Tank	1981	136611
Q	371m W	Unspecified Tank	1891	115840
K	371m N	Unspecified Tank	1963	134291
S	371m SE	Unspecified Tank	1893	116459
Q	374m W	Unspecified Tank	1893	115847
Q	374m W	Tanks	1922	127338
Q	375m W	Tanks	1908 - 1922	146590
Q	376m W	Tanks	1908	131269
V	378m SE	Unspecified Tank	1980	116458
AI	381m E	Unspecified Tank	1893	116464
AJ	387m E	Unspecified Tank	1893	116448
AI	387m E	Unspecified Tank	1933	116465
S	393m SE	Tanks	1950	107110
Q	405m W	Tanks	1891	107127
S	405m SE	Tanks	1950	107117
AL	407m NW	Unspecified Tank	1933	134387

ID	Location	Land use	Dates present	Group ID
AK	408m S	Unspecified Tank	1950 - 1973	139836
AL	409m NW	Unspecified Tank	1948	130531
S	410m SE	Tanks	1950	149221
S	411m SE	Unspecified Tank	1933	116460
AK	414m S	Unspecified Tank	1933	116456
V	415m SE	Tanks	1950	123535
AI	419m E	Unspecified Tank	1949	116466
K	425m N	Unspecified Tank	1933	116161
S	440m SE	Unspecified Tank	1893	116457
K	455m N	Unspecified Tank	1933	116162
AQ	458m W	Tanks	1891	138626
AQ	460m W	Tanks	1893	128408
AQ	464m W	Unspecified Tank	1933	115848
AQ	471m W	Unspecified Tank	1891	115849
AE	497m SE	Unspecified Tank	1893	116461

This data is sourced from Ordnance Survey / Groundsure.

1.3 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, 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 13**

ID	Location	Land use	Dates present	Group ID
C	164m SE	Electricity Substation	1978 - 1994	69147
C	165m SE	Electricity Substation	1980 - 1991	66832
C	190m E	Electricity Substation	1978 - 1994	85302



ID	Location	Land use	Dates present	Group ID
10	235m NW	Electricity Substation	1991 - 1996	72499
R	246m S	Gas Plant Works	1908 - 1922	81535
T	262m NE	Electricity Substation	1949 - 1994	82799
AD	323m NW	Gas and Oil Engine Works	1922 - 1933	79856
AD	326m NW	Gas and Oil Engine Works	1948	74572
Q	332m W	Otto Gas Engine Works	1891	82038
16	339m E	Electricity Substation	1978 - 1994	83339
AI	391m E	Electricity Substation	1949	62173
18	396m SE	Electricity Substation	1991 - 1994	81707
AK	397m S	Electricity Substation	1950 - 1994	82847
AK	398m S	Electricity Sub-Station	1973	63502
AK	406m S	Electricity Substation	1980	75752
AI	424m E	Electricity Substation	1978 - 1991	70199
AI	425m E	Electricity Substation	1994	74682
AC	444m N	Electricity Substation	1995	62208
AO	495m NW	Electricity Substation	1994 - 1996	79069
AT	498m SW	Electricity Substation	1979	77212
AT	499m SW	Electricity Substation	1985 - 1996	69025

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

14

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 13**

ID	Location	Land use	Dates present	Group ID
J	117m SW	Engine Repairing Shed	1933	20649
M	145m E	Wagon Repairing Shed	1933	20793
N	147m E	Wagon Repairing Shed	1949	20710
N	152m E	Wagon Repairing Shed	1933	22391
O	169m N	Garage	1980	21121
7	171m N	Garage	1991 - 1994	25488
O	171m N	Garage	1963	25462
8	209m N	Garage	1991 - 1996	25092
R	228m S	Garage	1986 - 1991	25321
R	228m S	Garage	1982	21240
Z	292m E	Repair Pits	1949	20551
Z	295m E	Repair Pits	1949	20552
AF	356m W	Garage	1948	20311
AB	382m W	Garage	1948	20310

This data is sourced from Ordnance Survey / Groundsure.

1.6 Historical military land

Records within 500m

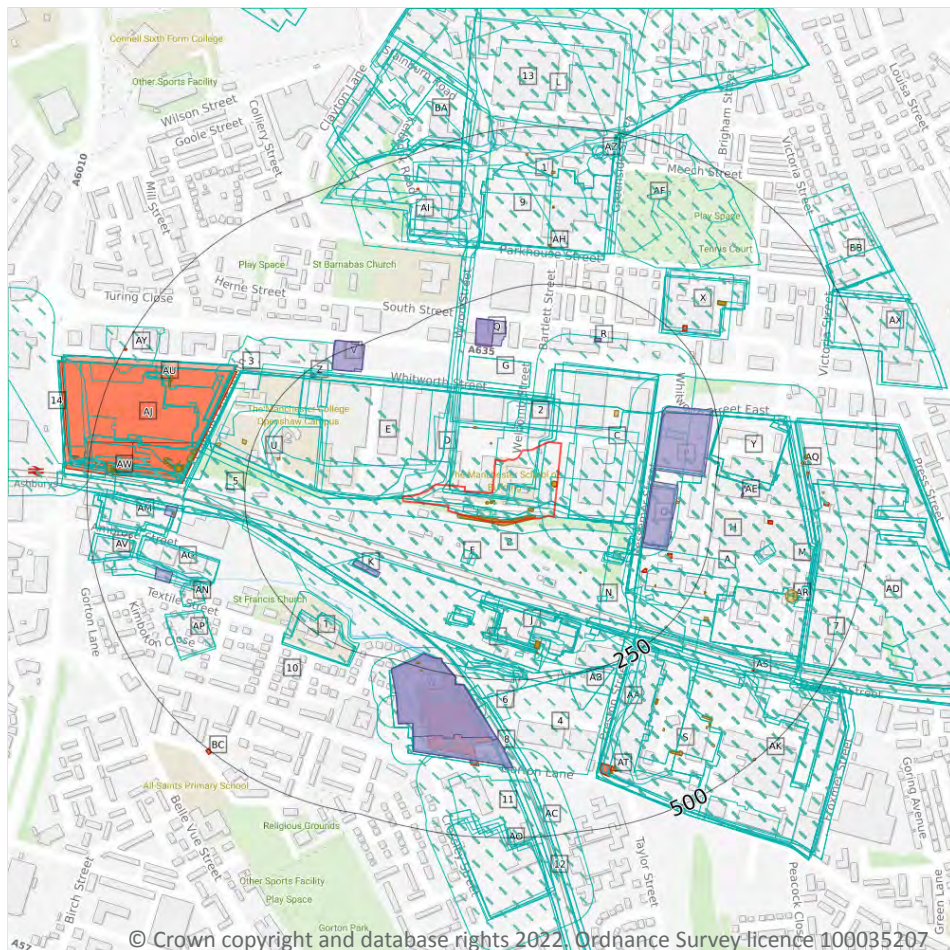
0

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

272

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 27**

ID	Location	Land Use	Date	Group ID
1	On site	Steel Works	1956	810023
A	On site	Railway Sidings	1938	975550
A	On site	Railway Sidings	1934	886032



ID	Location	Land Use	Date	Group ID
A	On site	Railway Sidings	1915	954027
A	On site	Railway Sidings	1905	954032
A	On site	Railway Sidings	1890	974704
A	On site	Railway Sidings	1968	901995
A	On site	Railway Sidings	1923	902553
B	On site	Railway Sidings	1915	926600
B	On site	Engineering Works	1905	949713
B	On site	Engineering Works	1890	949713
B	On site	Railway Building	1956	900610
B	On site	Unspecified Foundry	1956	809978
B	On site	Railway Sidings	1985	975939
B	On site	Railway Sidings	1978	875920
B	On site	Railway Building	1978	891665
B	On site	Railway Building	1978	943561
B	On site	Railway Sidings	1991	975939
B	On site	Unspecified Tanks	1923	815407
B	On site	Unspecified Tanks	1923	815406
C	On site	Unspecified Depot	1985	966409
C	On site	Unspecified Depot	1968	928299
D	On site	Engineering Works	1934	865117
D	On site	Engineering Works	1915	946576
D	On site	Unspecified Works	1985	988157
D	On site	Unspecified Works	1978	879413
D	On site	Unspecified Commercial/Industrial	1991	796812
D	On site	Unspecified Works	1968	965665
D	On site	Engineering Works	1923	849347
E	On site	Unspecified Commercial/Industrial	1985	796814
E	6m NW	Unspecified Works	1968	942426



ID	Location	Land Use	Date	Group ID
C	10m E	Unspecified Depot	1978	928299
2	19m N	Unspecified Pit	1890	840549
D	30m N	Unspecified Warehouse	1985	883064
D	38m N	Unspecified Warehouse	1978	937864
C	50m E	Unspecified Pit	1890	840548
F	52m S	Railway Building	1978	961659
F	52m S	Railway Building	1968	961659
F	56m S	Railway Building	1985	922524
G	92m N	Unspecified Works	1985	886185
G	92m N	Unspecified Works	1991	886185
H	95m E	Unspecified Yard	1956	908731
I	96m S	Unspecified Commercial/Industrial	1934	886856
A	98m SE	Railway Building	1978	894505
A	98m SE	Goods Depot	1968	827990
A	99m SE	Goods Station	1923	821666
A	99m SE	Railway Building	1938	906662
A	99m SE	Railway Building	1934	906662
A	99m SE	Railway Building	1915	919495
A	110m SE	Railway Building	1985	968681
A	110m SE	Railway Building	1991	968681
J	115m S	Engine Shed	1978	865821
J	115m S	Engine Shed	1968	903096
K	117m SW	Railway Building	1938	892505
K	117m SW	Railway Building	1934	892505
K	117m SW	Railway Building	1915	950552
J	118m S	Railway Engine Shed	1956	834848
J	119m S	Unspecified Commercial/Industrial	1985	969122
K	121m SW	Railway Building	1923	962409

ID	Location	Land Use	Date	Group ID
L	124m NW	Railway Sidings	1938	882010
L	124m NW	Railway Sidings	1938	882010
A	124m E	Goods Station	1923	938037
A	125m E	Railway Building	1934	948168
A	125m E	Railway Building	1938	948168
A	125m E	Goods Station	1915	938037
J	126m S	Engine Shed	1938	945706
J	126m S	Engine Shed	1934	945706
J	126m S	Engine Shed	1915	887339
J	127m S	Engine Shed	1905	863914
J	127m S	Engine Shed	1923	910089
J	128m S	Engine Shed	1890	863914
A	133m SE	Unspecified Warehouse	1978	870856
I	141m S	Railway Building	1978	933919
I	141m S	Railway Building	1968	933919
M	142m E	Unspecified Yard	1890	849060
N	144m SE	Railway Building	1985	898691
N	144m SE	Railway Building	1991	898691
H	145m E	Unspecified Yard	1905	952348
H	145m E	Unspecified Yard	1923	954037
O	145m E	Painting Shed	1923	936124
H	145m E	Unspecified Yard	1938	955837
H	145m E	Unspecified Yard	1934	955837
H	145m E	Unspecified Yard	1915	973521
O	145m E	Painting Shed	1915	936124
I	146m S	Engine Shed	1956	817791
H	147m E	Unspecified Yard	1968	920516
P	147m E	Railway Building	1968	820510

ID	Location	Land Use	Date	Group ID
P	150m E	Carriage Repairing Shed	1905	973552
P	150m E	Carriage Repairing Shed	1923	934639
P	151m E	Wagon Repairing Shed	1938	837405
P	151m E	Wagon Repair Shed	1934	815796
P	151m E	Carriage Repairing Shed	1915	939780
I	153m S	Railway Building	1938	955947
I	153m S	Railway Building	1934	955947
I	153m S	Railway Building	1915	927482
I	155m S	Railway Building	1923	883353
P	167m E	Unspecified Depot	1991	876027
A	172m SE	Unspecified Warehouse	1985	986527
A	172m SE	Unspecified Warehouse	1991	986527
S	174m S	Railway Sidings	1938	975939
S	174m S	Railway Sidings	1934	975939
J	179m S	Unspecified Tanks	1923	815409
J	184m S	Railway Building	1978	973049
J	184m S	Railway Building	1968	973049
J	192m S	Railway Building	1923	820457
A	192m SE	Railway Building	1915	820463
T	203m SW	Corporation Yard	1905	845352
U	204m W	Refuse Heap	1956	829129
J	205m S	Railway Building	1923	820456
J	206m S	Unspecified Pit	1978	964743
J	206m S	Unspecified Pit	1968	964743
J	208m S	Unspecified Pit	1956	916918
J	211m S	Unspecified Tank	1923	825243
W	213m S	Motor Works	1923	984606
T	216m SW	Corporation Yard	1934	886699



ID	Location	Land Use	Date	Group ID
T	216m SW	Corporation Yard	1915	895526
T	220m SW	Corporation Yard	1923	941411
J	221m S	Unspecified Ground Workings	1923	800656
J	225m S	Cuttings	1934	795824
W	225m S	Unspecified Warehouse	1956	875610
S	227m SE	Unspecified Foundry	1890	870484
W	228m S	Unspecified Works	1978	830426
W	228m S	Unspecified Warehouse	1968	875610
S	228m SE	Unspecified Foundry	1956	857333
S	229m SE	Unspecified Foundry	1938	857333
S	229m SE	Unspecified Foundry	1934	857333
S	229m SE	Unspecified Foundry	1915	857333
3	229m NW	Bleach Works	1851	810798
X	234m NE	Engineering Works	1890	931550
Y	234m E	Engine Shed	1905	869312
Y	234m E	Engine Shed	1923	880833
J	234m S	Unspecified Pit	1934	982246
W	234m S	Chemical Works	1905	834553
W	234m S	Motor Works	1938	912346
W	234m S	Motor Works	1934	912346
W	234m S	Motor Works	1915	991006
Y	235m E	Engine Shed	1938	883429
Y	235m E	Engine Shed	1934	883429
Y	235m E	Engine Shed	1915	850687
X	237m NE	Engineering Works	1923	877806
S	237m SE	Unspecified Foundry	1968	958959
S	238m SE	Unspecified Foundry	1905	931610
S	238m SE	Unspecified Foundry	1923	891421

ID	Location	Land Use	Date	Group ID
AA	238m SE	Unspecified Ground Workings	1923	917140
Y	238m E	Engine Shed	1956	894658
Y	238m E	Engine Shed	1968	927617
X	241m NE	Engineering Works	1938	941769
X	241m NE	Engineering Works	1934	941769
X	241m NE	Engineering Works	1915	904653
AA	244m SE	Unspecified Ground Workings	1905	911971
AB	246m S	Unspecified Heap	1956	942480
AB	246m S	Unspecified Heap	1968	942480
X	248m NE	Unspecified Works	1968	830427
AA	249m SE	Unspecified Depot	1985	938595
AA	249m SE	Unspecified Depot	1991	938595
4	251m S	Gas Plant Works	1915	846100
AC	260m S	Cuttings	1956	907697
AC	260m S	Cuttings	1968	907697
5	268m W	Railway Building	1978	820511
A	271m SE	Railway Building	1923	820462
6	271m S	Unspecified Heap	1956	804171
W	276m S	Gas Plant Works	1923	846100
W	280m S	Gas Plant Works	1905	896993
AD	287m SE	Locomotive Works	1905	946681
AD	287m SE	Carriage, Wagon and Locomotive Works	1923	937994
AC	287m S	Cuttings	1938	896941
AC	287m S	Cuttings	1934	896941
AC	287m S	Cuttings	1915	896941
AC	287m S	Cuttings	1905	906344
AC	287m S	Cuttings	1890	984695
7	289m SE	Carriage, Wagon and Locomotive Works	1915	937994



ID	Location	Land Use	Date	Group ID
L	295m N	Engineering Works	1923	951144
L	296m N	Engineering Works	1934	912693
AF	296m N	Brick Works	1890	818779
L	305m N	Unspecified Commercial/Industrial	1968	796802
AG	305m W	Corn Mill	1890	823149
L	306m N	Unspecified Works	1985	985355
AG	306m W	Unspecified Mill	1915	940601
L	306m N	Railway Sidings	1956	877918
8	307m S	Cuttings	1923	908033
AG	307m W	Unspecified Mill	1923	940601
9	308m N	Unspecified Works	1978	847210
AI	315m N	Brick Works	1890	818771
AF	321m N	Unspecified Pit	1890	840559
M	323m E	Railway Building	1923	868639
M	324m E	Railway Building	1934	868639
AK	324m SE	Industrial Estate	1985	923135
AK	324m SE	Industrial Estate	1991	923135
L	327m N	Railway Sidings	1923	924696
AJ	327m NW	Gas and Oil Engine Works	1956	847552
AJ	328m NW	Unspecified Commercial/Industrial	1890	796813
AJ	328m NW	Unspecified Works	1985	991605
AJ	328m NW	Unspecified Works	1978	870737
AJ	328m NW	Unspecified Works	1991	991605
AJ	328m NW	Unspecified Works	1968	870737
AJ	328m NW	Gas and Oil Engine Works	1923	856729
AL	328m N	Railway Sidings	1934	882010
AL	328m N	Railway Sidings	1915	870808
AG	328m SW	Unspecified Works	1985	867318



ID	Location	Land Use	Date	Group ID
AG	328m SW	Unspecified Works	1991	867318
AJ	329m NW	Gas Engine Works	1905	815785
AJ	329m NW	Gas and Oil Engine Works	1938	897879
AJ	329m NW	Gas and Oil Engine Works	1934	897879
AJ	329m NW	Gas and Oil Engine Works	1915	958721
U	335m W	Railway Sidings	1956	923194
AI	337m N	Unspecified Pit	1890	840557
AG	338m W	Unspecified Works	1978	860446
AM	347m W	Unspecified Works	1985	849212
AM	347m W	Unspecified Works	1991	849212
AN	347m SW	Unspecified Works	1923	931099
AN	348m W	Starch Works	1915	833825
AO	351m S	Unspecified Depot	1985	854448
U	354m W	Unspecified Tank	1934	925968
U	354m W	Unspecified Tank	1915	902345
U	355m W	Gasometer	1905	863027
U	355m W	Gasometer	1923	977288
AM	356m W	Unspecified Works	1978	852698
AM	356m W	Unspecified Works	1968	852698
AM	361m W	Iron Works	1923	850659
AP	362m SW	Iron Works	1915	893003
AP	362m SW	Iron Works	1923	893003
AM	364m W	Iron Works	1938	991749
AM	364m W	Iron Works	1934	991749
AM	364m W	Iron Works	1915	928103
AD	373m E	Locomotive Works	1938	867135
AD	373m E	Locomotive Works	1934	885991
AD	376m E	Locomotive Works	1956	867135



ID	Location	Land Use	Date	Group ID
AD	378m E	Locomotive Works	1968	924954
AR	392m E	Unspecified Tank	1890	825242
11	401m S	Unspecified Depot	1991	854448
AD	403m E	Railway Sidings	1915	926340
L	405m N	Engineering Works	1938	884631
AD	409m E	Railway Sidings	1956	912703
AD	409m E	Railway Sidings	1968	966235
12	410m S	Cuttings	1923	903234
AU	410m NW	Railway Sidings	1923	908994
AV	428m W	Brewery	1923	937099
AV	430m W	Brewery	1938	916008
AV	430m W	Brewery	1934	916008
AV	430m W	Brewery	1915	952159
AX	444m E	Steam Hammer Works	1923	975783
AY	449m NW	Fire Brick Works	1851	793923
AX	450m E	Steam Hammer Works	1938	928039
AX	450m E	Steam Hammer Works	1934	928039
AX	450m E	Steam Hammer Works	1915	867081
AZ	455m N	Unspecified Tank	1985	902693
AZ	455m N	Unspecified Tank	1968	875915
13	457m N	Dye Works	1851	870141
AO	457m S	Unspecified Commercial/Industrial	1978	874913
AO	457m S	Unspecified Works	1968	830425
AZ	460m N	Unspecified Tank	1978	912306
L	460m N	Unspecified Works	1978	878377
AX	461m E	Unspecified Works	1968	875188
AO	468m S	Unspecified Commercial/Industrial	1956	903585
BA	468m N	Dye Works	1923	920128

ID	Location	Land Use	Date	Group ID
AO	471m S	Motor Works	1938	863611
AO	475m S	Motor Works	1934	863611
BA	476m N	Dye Works	1905	987882
BA	487m N	Dye Works	1938	959572
BA	487m N	Dye Works	1934	959572
BA	487m N	Dye Works	1915	866564
BB	487m NE	Unspecified Mill	1923	991657
BB	488m NE	Unspecified Works	1923	856423
BA	489m N	Unspecified Works	1985	862949
BA	491m N	Unspecified Works	1968	922875
BB	493m NE	Unspecified Mill	1905	857504
BB	493m NE	Unspecified Mill	1890	857504
14	493m W	Goods Depot	1956	976388
BB	495m NE	Steel Works	1934	931825
BB	495m NE	Unspecified Mill	1915	940481
AL	497m N	Railway Sidings	1968	862695
BB	498m NE	Unspecified Works	1915	856423

This data is sourced from Ordnance Survey / Groundsure.

2.2 Historical tanks

Records within 500m

101

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 27**

ID	Location	Land Use	Date	Group ID
B	On site	Unspecified Tank	1908	139108
B	On site	Unspecified Tank	1908	126920
B	On site	Unspecified Tank	1908	123543



ID	Location	Land Use	Date	Group ID
B	On site	Tanks	1908	128476
B	On site	Tanks	1908	136114
B	On site	Unspecified Tank	1922	123543
B	On site	Unspecified Tank	1922	139108
B	On site	Unspecified Tank	1922	126920
B	On site	Tanks	1922	136114
B	On site	Tanks	1922	128476
B	On site	Unspecified Tank	1949	123094
B	On site	Unspecified Tank	1963	123094
B	On site	Unspecified Tank	1963	131627
B	On site	Unspecified Tank	1980	123094
D	26m N	Unspecified Tank	1908	116440
D	58m NW	Unspecified Tank	1933	116439
C	94m NE	Unspecified Tank	1933	116441
A	97m SE	Unspecified Tank	1949	116450
O	191m E	Unspecified Tank	1949	116451
J	191m S	Unspecified Tank	1986	136961
J	191m S	Unspecified Tank	1991	136961
J	191m S	Unspecified Tank	1982	136961
J	191m S	Unspecified Tank	1968	136961
A	193m SE	Unspecified Tank	1978	116449
U	203m W	Unspecified Tank	1933	115841
J	209m S	Unspecified Tank	1891	116453
W	242m S	Unspecified Tank	1891	116452
W	254m S	Unspecified Tank	1891	116454
U	262m W	Unspecified Tank	1933	115842
A	267m SE	Unspecified Tank	1980	127022
A	267m SE	Unspecified Tank	1980	143200



ID	Location	Land Use	Date	Group ID
A	267m SE	Unspecified Tank	1991	139042
A	267m SE	Unspecified Tank	1991	131640
A	268m SE	Unspecified Tank	1978	143471
A	286m SE	Tanks	1949	107109
U	300m W	Unspecified Tank	1891	115843
AH	310m N	Unspecified Tank	1956	146158
AH	310m N	Unspecified Tank	1963	146158
AA	331m SE	Tanks	1994	141773
X	331m NE	Unspecified Tank	1988	143917
X	332m NE	Unspecified Tank	1997	143917
X	332m NE	Unspecified Tank	1997	143917
X	332m NE	Unspecified Tank	1996	143917
X	332m NE	Unspecified Tank	1996	143917
X	332m NE	Unspecified Tank	1995	143917
X	332m NE	Unspecified Tank	1997	143917
X	332m NE	Unspecified Tank	1986	143917
AA	332m SE	Tanks	1991	141773
10	332m SW	Unspecified Tank	1891	115834
AA	332m SE	Tanks	1980	141773
U	333m W	Unspecified Tank	1948	115845
U	334m W	Unspecified Tank	1948	115844
U	336m W	Tanks	1933	107121
U	349m W	Tanks	1948	107122
U	351m W	Unspecified Tank	1922	131487
U	351m W	Unspecified Tank	1933	131487
U	353m W	Unspecified Tank	1893	131487
U	353m W	Unspecified Tank	1908	131487
U	353m W	Unspecified Tank	1891	131487

ID	Location	Land Use	Date	Group ID
U	357m W	Tanks	1891	107123
U	361m W	Tanks	1891	107124
AM	362m W	Unspecified Tank	1908	115837
U	367m W	Tanks	1922	122471
U	368m W	Tanks	1908	122471
L	370m N	Unspecified Tank	1956	133706
L	371m N	Unspecified Tank	1981	136611
U	371m W	Unspecified Tank	1891	115840
L	371m N	Unspecified Tank	1963	134291
S	371m SE	Unspecified Tank	1893	116459
U	374m W	Unspecified Tank	1893	115847
U	374m W	Tanks	1922	127338
U	375m W	Tanks	1922	146590
U	376m W	Tanks	1908	131269
U	377m W	Tanks	1908	146590
AA	378m SE	Unspecified Tank	1980	116458
AQ	381m E	Unspecified Tank	1893	116464
AR	387m E	Unspecified Tank	1893	116448
AQ	387m E	Unspecified Tank	1933	116465
S	393m SE	Tanks	1950	107110
S	405m SE	Tanks	1950	107117
U	405m W	Tanks	1891	107127
AU	407m NW	Unspecified Tank	1933	134387
AT	408m S	Unspecified Tank	1950	139836
AT	408m S	Unspecified Tank	1973	139836
AU	409m NW	Unspecified Tank	1948	130531
AT	409m S	Unspecified Tank	1950	139836
S	410m SE	Tanks	1950	149221

ID	Location	Land Use	Date	Group ID
S	410m SE	Tanks	1950	149221
S	411m SE	Unspecified Tank	1933	116460
AT	414m S	Unspecified Tank	1933	116456
AA	415m SE	Tanks	1950	123535
AA	415m SE	Tanks	1950	123535
AQ	419m E	Unspecified Tank	1949	116466
L	425m N	Unspecified Tank	1933	116161
S	440m SE	Unspecified Tank	1893	116457
L	455m N	Unspecified Tank	1933	116162
AW	458m W	Tanks	1891	138626
AW	460m W	Tanks	1893	128408
AW	464m W	Unspecified Tank	1933	115848
AW	471m W	Unspecified Tank	1891	115849
AK	497m SE	Unspecified Tank	1893	116461

This data is sourced from Ordnance Survey / Groundsure.

2.3 Historical energy features

Records within 500m

57

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 27**

ID	Location	Land Use	Date	Group ID
A	164m SE	Electricity Substation	1978	69147
A	164m SE	Electricity Substation	1994	69147
A	165m SE	Electricity Substation	1980	66832
A	165m SE	Electricity Substation	1980	66832
A	165m SE	Electricity Substation	1991	66832
A	165m SE	Electricity Substation	1991	66832



ID	Location	Land Use	Date	Group ID
A	190m E	Electricity Substation	1980	85302
A	190m E	Electricity Substation	1980	85302
A	190m E	Electricity Substation	1991	85302
A	190m E	Electricity Substation	1991	85302
A	190m E	Electricity Substation	1994	85302
A	190m E	Electricity Substation	1978	85302
Z	235m NW	Electricity Substation	1996	72499
Z	236m NW	Electricity Substation	1991	72499
W	246m S	Gas Plant Works	1908	81535
X	262m NE	Electricity Substation	1980	82799
X	262m NE	Electricity Substation	1980	82799
X	262m NE	Electricity Substation	1991	82799
X	262m NE	Electricity Substation	1991	82799
X	263m NE	Electricity Substation	1949	82799
X	263m NE	Electricity Substation	1978	82799
X	263m NE	Electricity Substation	1994	82799
W	286m S	Gas Plant Works	1922	81535
AJ	323m NW	Gas and Oil Engine Works	1922	79856
AJ	323m NW	Gas and Oil Engine Works	1933	79856
AJ	326m NW	Gas and Oil Engine Works	1948	74572
U	332m W	Otto Gas Engine Works	1891	82038
M	339m E	Electricity Substation	1980	83339
M	339m E	Electricity Substation	1980	83339
M	339m E	Electricity Substation	1991	83339
M	339m E	Electricity Substation	1991	83339
M	339m E	Electricity Substation	1978	83339
M	340m E	Electricity Substation	1994	83339
AQ	391m E	Electricity Substation	1949	62173

ID	Location	Land Use	Date	Group ID
AS	396m SE	Electricity Substation	1991	81707
AS	397m SE	Electricity Substation	1994	81707
AT	397m S	Electricity Substation	1991	82847
AT	398m S	Electricity Substation	1950	82847
AT	398m S	Electricity Sub-Station	1973	63502
AT	399m S	Electricity Substation	1950	82847
AT	399m S	Electricity Substation	1994	82847
AT	406m S	Electricity Substation	1980	75752
AQ	424m E	Electricity Substation	1980	70199
AQ	424m E	Electricity Substation	1980	70199
AQ	424m E	Electricity Substation	1991	70199
AQ	424m E	Electricity Substation	1991	70199
AQ	425m E	Electricity Substation	1994	74682
AQ	425m E	Electricity Substation	1978	70199
AW	430m W	Otto Gas Engine Works	1891	82038
AI	444m N	Electricity Substation	1995	62208
AY	495m NW	Electricity Substation	1994	79069
AY	495m NW	Electricity Substation	1996	79069
AY	495m NW	Electricity Substation	1995	79069
BC	498m SW	Electricity Substation	1979	77212
BC	499m SW	Electricity Substation	1993	69025
BC	499m SW	Electricity Substation	1996	69025
BC	499m SW	Electricity Substation	1985	69025

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

19

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 27**

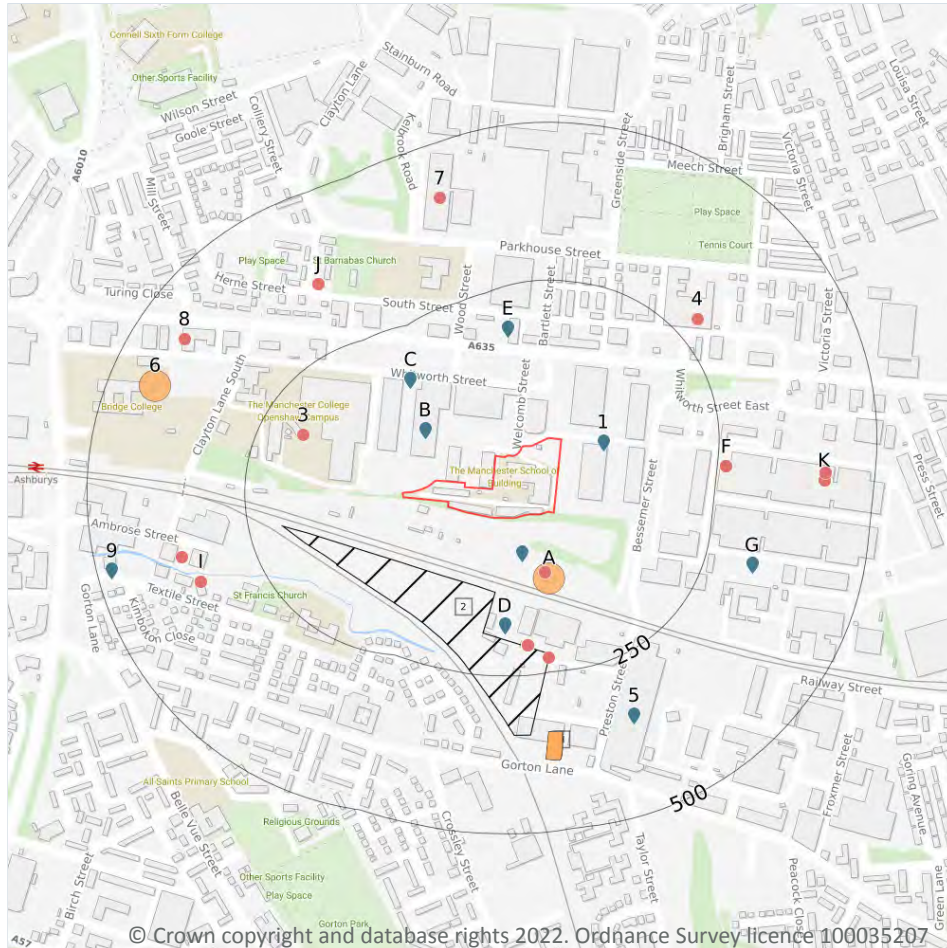
ID	Location	Land Use	Date	Group ID
K	117m SW	Engine Repairing Shed	1933	20649
O	145m E	Wagon Repairing Shed	1933	20793
P	147m E	Wagon Repairing Shed	1949	20710
P	152m E	Wagon Repairing Shed	1933	22391
Q	169m N	Garage	1980	21121
R	171m N	Garage	1991	25488
R	171m N	Garage	1991	25488
R	171m N	Garage	1994	25488
Q	171m N	Garage	1963	25462
Q	173m N	Garage	1963	25462
V	209m N	Garage	1991	25092
V	212m N	Garage	1996	25092
W	228m S	Garage	1986	25321
W	228m S	Garage	1991	25321
W	228m S	Garage	1982	21240
AE	292m E	Repair Pits	1949	20551

ID	Location	Land Use	Date	Group ID
AE	295m E	Repair Pits	1949	20552
AM	356m W	Garage	1948	20311
AG	382m W	Garage	1948	20310

This data is sourced from Ordnance Survey / Groundsure.



3 Waste and landfill



- Site Outline
- Search buffers in metres (m)
- Historical landfill (EA/NRW)
- Historical waste sites
- Licensed waste sites
- 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

1

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.

Features are displayed on the Waste and landfill map on **page 46**

ID	Location	Details		
2	99m S	Site Address: Preston Street, Gorton, Greater Manchester Licence Holder Address: -	Waste Licence: - Site Reference: F057 Waste Type: - Environmental Permitting Regulations (Waste) Reference: - Licence Issue: - Licence Surrender: -	Operator: - Licence Holder: - First Recorded 31/12/1985 Last Recorded: 31/12/1994

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

3.5 Historical waste sites

Records within 500m

6

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

Features are displayed on the Waste and landfill map on **page 46**

ID	Location	Address	Further Details	Date
A	77m S	Site Address: Ashbury Woodyard, Bessemer Street, MANCHESTER, Greater Manchester, M11 2MW	Type of Site: Recycling Facility Planning application reference: 59815 Description: Scheme comprises development of an inert material recycling facility for manufacture, storage and distribution of secondary aggregates. The project also includes site offices, weighbridge, wheel cleaning facilities, mobile plant and stockpiles. (Floor area is an indication only.) Construction - internal partitions walls; insitu concrete floor; fire doors; fire alarm system fittings. An application (ref: 59815) for Detailed Planning permission was granted by Manchester C.C. on 26th October 2000. We are presently unable to confirm tender details. We are unable to confirm a building programme at this stage. (27/10/2000) Data source: Historic Planning Application Data Type: Point	-
H	341m S	Site Address: N/A	Type of Site: Scrap Metal Yard Planning application reference: N/A Description: N/A Data source: Historic Mapping Data Type: Polygon	1976
H	342m S	Site Address: N/A	Type of Site: Scrap Metal Yard Planning application reference: N/A Description: N/A Data source: Historic Mapping Data Type: Polygon	1981
H	342m S	Site Address: N/A	Type of Site: Scrap Metal Yard Planning application reference: N/A Description: N/A Data source: Historic Mapping Data Type: Polygon	1967
H	342m S	Site Address: N/A	Type of Site: Scrap Metal Yard Planning application reference: N/A Description: N/A Data source: Historic Mapping Data Type: Polygon	1986



ID	Location	Address	Further Details	Date
6	402m NW	Site Address: Whitworth Street, & Clayton Lane, South, MANCHESTER, Greater Manchester, M1	Type of Site: Recycling Centre Planning application reference: 088718/FO/2008/N2 Description: Scheme comprises change of use of land from scrap yard to temporary builders compound and recycling centre for material and waste away from construction works and associated storage of bins and skips involving boundary treatments. Construction - fencing lighting columns site works. An application (ref: 088718/FO/2008/N2) for detailed planning permission was refused by Manchester C.C. A detailed planning application has been refused. Data source: Historic Planning Application Data Type: Point	01/11/2010

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

3.6 Licensed waste sites

Records within 500m	16
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Active or recently closed waste sites under Environment Agency/Natural Resources Wales regulation.

Features are displayed on the Waste and landfill map on **page 46**

ID	Location	Details		
A	58m S	Site Name: Ashbury Yard Site Address: Ashbury Yard, Bessemer Street, Gorton, Manchester, M11 2NW Correspondence Address: -	Type of Site: 75kte HCI Waste TS + treatment Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: HCM002 EPR reference: EA/EPR/DB3305TE/T001 Operator: Hope Construction Materials Limited Waste Management licence No: 104076 Annual Tonnage: 74999	Issue Date: 30/04/2012 Effective Date: 03/09/2015 Modified: 21/12/2012 Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred



ID	Location	Details		
1	66m E	Site Name: City Council Workshops Site Address: Bessemer Street, Manchester, M11 2NP Correspondence Address: -	Type of Site: Special Waste Transfer Station Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: MOM001 EPR reference: EA/EPR/EP3092CP/S002 Operator: Manchester City Council City Works Waste Management licence No: 53551 Annual Tonnage: 250	Issue Date: 07/04/1997 Effective Date: - Modified: - Surrendered Date: Jul 12 2005 12:00AM Expiry Date: - Cancelled Date: - Status: Surrendered
B	81m N	Site Name: L Wynne & Co Ltd Site Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE Correspondence Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE	Type of Site: Special Waste Transfer Station Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: LWC001 EPR reference: - Operator: L Wynne & Co Ltd Waste Management licence No: 53947 Annual Tonnage: 30.416	Issue Date: 05/07/1989 Effective Date: - Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Issued
B	81m N	Site Name: A7 The Dresser Centre Site Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE Correspondence Address: -	Type of Site: Special Waste Transfer Station Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: LWY001 EPR reference: EA/EPR/LP3491CZ/T001 Operator: Winsulate (U K) Ltd Waste Management licence No: 53947 Annual Tonnage: 30.416	Issue Date: 05/07/1989 Effective Date: 14/12/2007 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred

ID	Location	Details		
C	164m N	Site Name: A7 The Dresser Centre Site Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE Correspondence Address: -	Type of Site: Household, Commercial & Industrial Waste T Stn Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: ABE017 EPR reference: EA/EPR/PB3937RD/T001 Operator: Asbestos Clearance And Disposal Services Limited Waste Management licence No: 53947 Annual Tonnage: 30.416	Issue Date: 05/07/1989 Effective Date: 22/05/2013 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred
C	164m N	Site Name: A7 The Dresser Centre Site Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE Correspondence Address: -	Type of Site: Household, Commercial & Industrial Waste T Stn Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: WIN006 EPR reference: EA/EPR/HB3703CX/T001 Operator: Winsulate Limited Waste Management licence No: 53947 Annual Tonnage: 30.416	Issue Date: 05/07/1989 Effective Date: 18/12/2019 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred
C	164m N	Site Name: Unit A7, The Dresser Centre Site Address: A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, M11 2NE Correspondence Address: -	Type of Site: Household, Commercial & Industrial Waste T Stn Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: INT005 EPR reference: EA/EPR/JB3505FF/T001 Operator: Intelligent Environmental Services Ltd Waste Management licence No: 53947 Annual Tonnage: 30	Issue Date: 05/07/1989 Effective Date: 20/11/2020 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred



ID	Location	Details		
D	171m S	Site Name: Delta Containers Site Address: Delta Containers, Preston Street, West Gorton, Manchester, M18 8DB Correspondence Address: -	Type of Site: Material Recycling Treatment Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: DEL036 EPR reference: EA/EPR/AB3731AD/T001 Operator: Delta Containers (Manchester) Ltd Waste Management licence No: 53491 Annual Tonnage: 4999	Issue Date: 28/07/1998 Effective Date: 03/08/2011 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred
D	171m S	Site Name: Delta Containers Site Address: Delta Containers, Preston Street, West Gorton, Manchester, M18 8DB Correspondence Address: -	Type of Site: Material Recycling Treatment Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: DEL036 EPR reference: EA/EPR/AB3731AD/T001 Operator: Delta Containers (Manchester) Ltd Waste Management licence No: 53491 Annual Tonnage: 4999	Issue Date: 28/07/1998 Effective Date: 03/08/2011 Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Transferred
E	184m N	Site Name: Jax Spares Of Openshaw Site Address: 134, South Street, Openshaw, Manchester, Lancs, M11 2FY Correspondence Address: 134, South Street, Openshaw, Manchester, M11 2FY	Type of Site: ELV Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: JAX002 EPR reference: - Operator: Steven Smith And Bernard Smith Waste Management licence No: 50244 Annual Tonnage: 0	Issue Date: 20/10/2004 Effective Date: - Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Issued
E	184m N	Site Name: Jax Spares Of Openshaw Site Address: 134, South Street, Openshaw, Manchester, M11 2FY Correspondence Address: -	Type of Site: ELV Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: JAX002 EPR reference: EA/EPR/LP3394CW/S002 Operator: Steven Smith And Bernard Smith Waste Management licence No: 50244 Annual Tonnage: 2499	Issue Date: 20/10/2004 Effective Date: - Modified: - Surrendered Date: Aug 18 2006 12:00AM Expiry Date: - Cancelled Date: - Status: Surrendered



ID	Location	Details		
G	324m E	Site Name: Fairfield Materials Management Limited Site Address: Unit E1, New Smithfield Market, Whitworth Street East, Manchester, G M, M11 2WJ Correspondence Address: Unit E1, New Smithfield Market, Whitworth Street East, Manchester, M11 2WJ	Type of Site: Composting Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: FAR003 EPR reference: - Operator: Fairfield Materials Management Limited Waste Management licence No: 50161 Annual Tonnage: 0	Issue Date: 01/07/2003 Effective Date: - Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Issued
G	324m E	Site Name: Fairfield Materials Management Limited Site Address: H22, New Smithfield Market, Whitworth Street East, Manchester, M11 2WP Correspondence Address: -	Type of Site: Composting Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: FAR003 EPR reference: EA/EPR/QP3098CP/V002 Operator: Fairfield Materials Management Limited Waste Management licence No: 50161 Annual Tonnage: 5500	Issue Date: 01/07/2003 Effective Date: - Modified: 10/11/2005 Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Modified
G	324m E	Site Name: Fairfield Materials Management Ltd Site Address: H22, New Smithfield Market, Whitworth Street East, Manchester, M11 2WP Correspondence Address: -	Type of Site: Composting Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: FAR003 EPR reference: EA/EPR/QP3098CP/V002 Operator: Fairfield Materials Management Ltd Waste Management licence No: 50161 Annual Tonnage: 5500	Issue Date: 01/07/2003 Effective Date: - Modified: 10/11/2005 Surrendered Date: Dec 3 2012 12:00AM Expiry Date: - Cancelled Date: - Status: Surrendered
5	345m S	Site Name: Delta Containers Ltd Site Address: Land/premises At, Preston Street, West Gorton, Manchester, M18 8DB Correspondence Address: -	Type of Site: Material Recycling Treatment Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: DCL001 EPR reference: EA/EPR/HP3392CT/A001 Operator: Delta Containers Ltd Waste Management licence No: 53491 Annual Tonnage: 416.667	Issue Date: 28/07/1998 Effective Date: - Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Issued



ID	Location	Details		
9	476m W	Site Name: Birch Lane Garage Ltd Site Address: 21, Textile Street, West Gorton, Manchester, M12 5DJ Correspondence Address: -	Type of Site: ELV Facility Size: 25000 tonnes Environmental Permitting Regulations (Waste) Licence Number: BIR004 EPR reference: EA/EPR/SP3194CD/A001 Operator: Birch Lane Garage Limited Waste Management licence No: 50242 Annual Tonnage: 2500	Issue Date: 16/07/2004 Effective Date: - Modified: - Surrendered Date: - Expiry Date: - Cancelled Date: - Status: Issued

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

3.7 Waste exemptions

Records within 500m	49
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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 46**

ID	Location	Site	Reference	Category	Sub-Category	Description
A	92m S	Ashbury Bessemer Street M11 2NW	EPR/VE5580W J/A001	Storing waste exemption	Both agricultural and non- agricultural waste	Storage of waste in a secure place
A	92m S	Ashbury Bessemer Street M11 2NW	EPR/VE5580W J/A001	Treating waste exemption	Both agricultural and non- agricultural waste	Screening and blending of waste
3	182m NW	-	WEX259086	Using waste exemption	Not on a farm	Use of waste in construction
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX221206	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX221206	Treating waste exemption	Not on a farm	Manual treatment of waste
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX221206	Storing waste exemption	Not on a farm	Storage of waste in a secure place



ID	Location	Site	Reference	Category	Sub-Category	Description
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX166701	Storing waste exemption	Not on a farm	Storage of waste in a secure place
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX166701	Treating waste exemption	Not on a farm	Manual treatment of waste
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX166701	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX075888	Storing waste exemption	Not on a farm	Storage of waste in a secure place
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX075888	Treating waste exemption	Not on a farm	Manual treatment of waste
D	203m S	PRESTON STREET, MANCHESTER, M18 8DB	WEX075888	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
D	203m S	PRESTON STREET MANCHESTER M18 8DB	WEX000277	Storing waste exemption	Not on a farm	Storage of waste in a secure place
D	229m S	Universal Pallets Services Ltd Preston Street Manchester Lancashire M18 8DB	EPR/QE5157V R/A001	Treating waste exemption	Non- Agricultural Waste Only	Manual treatment of waste
F	264m E	Units E1 to E4, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX215819	Treating waste exemption	Not on a farm	Manual treatment of waste
F	264m E	Units E1 to E4, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX215819	Using waste exemption	Not on a farm	Use of waste for a specified purpose
F	264m E	Units E1-4, 6-7, New Smithfield Market, Openshaw, Manchester, M11 2WJ	WEX215971	Storing waste exemption	Not on a farm	Storage of waste in a secure place
F	264m E	Units E1-4, 6-7, New Smithfield Market, Openshaw, Manchester, M11 2WJ	WEX215971	Treating waste exemption	Not on a farm	Manual treatment of waste
F	264m E	Units E1-4, 6-7, New Smithfield Market, Openshaw, Manchester, M11 2WJ	WEX215971	Treating waste exemption	Not on a farm	Treatment of waste wood and waste plant matter by chipping, shredding, cutting or pulverising
F	264m E	Units E1-4, 6-7, New Smithfield Market, Openshaw, Manchester, M11 2WJ	WEX215971	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods



ID	Location	Site	Reference	Category	Sub-Category	Description
F	264m E	Units E1-4, 6-7, New Smithfield Market, Openshaw, Manchester, M11 2WJ	WEX215971	Using waste exemption	Not on a farm	Use of waste for a specified purpose
F	264m E	-	WEX264126	Using waste exemption	Not on a farm	Use of waste in the construction of entertainment or educational installations etc
F	264m E	-	WEX264126	Using waste exemption	Not on a farm	Burning of waste as a fuel in a small appliance
F	264m E	-	WEX264126	Using waste exemption	Not on a farm	Use of waste for a specified purpose
F	264m E	-	WEX264126	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
F	264m E	-	WEX264126	Treating waste exemption	Not on a farm	Treatment of waste wood and waste plant matter by chipping, shredding, cutting or pulverising
F	264m E	-	WEX264126	Treating waste exemption	Not on a farm	Manual treatment of waste
F	264m E	-	WEX264126	Storing waste exemption	Not on a farm	Storage of waste in a secure place
4	287m NE	SAXON WORKS, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2FY	WEX224519	Disposing of waste exemption	Not on a farm	Depositing samples of waste for the purposes of testing or analysing them
I	348m SW	Oak Chemical Works, Textile Street, West Gorton, Manchester, M12 5DL	WEX279009	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
I	348m SW	Oak Chemical Works, Textile Street, West Gorton, Manchester, M12 5DL	WEX139962	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Treating waste exemption	Not on a farm	Treatment of kitchen waste in a wormery
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Use of waste in construction



ID	Location	Site	Reference	Category	Sub-Category	Description
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Spreading waste on non- agricultural land to confer benefit
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Use of mulch
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Spreading of plant matter to confer benefit
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Use of waste in the construction of entertainment or educational installations etc
J	356m N	ST. BARNABAS RECTORY, SOUTH STREET, OPENSHAW, MANCHESTER, M11 2EY	WEX000405	Using waste exemption	Not on a farm	Use of waste for a specified purpose
I	365m W	Wellington Rubber Company Ltd Textile Street MANCHESTER M12 5DL	EPR/AF0002FE /A001	Using waste exemption	Non- Agricultural Waste Only	Use of waste to manufacture finished goods
I	365m W	J Allcock & Sons Ltd Textile Street MANCHESTER M12 5DL	EPR/AF0302FY /A001	Using waste exemption	Non- Agricultural Waste Only	Use of waste to manufacture finished goods
7	414m N	3, KELBROOK ROAD, MANCHESTER, M11 2DD	WEX067284	Storing waste exemption	Not on a farm	Storage of waste in a secure place
K	420m E	Units E1-5 & A36-37, New Smithfield Market, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX142651	Storing waste exemption	Not on a farm	Storage of waste in secure containers
K	420m E	Units E1-5 & A36-37, New Smithfield Market, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX142651	Storing waste exemption	Not on a farm	Storage of waste in a secure place
K	420m E	Units E1-5 & A36-37, New Smithfield Market, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX142651	Treating waste exemption	Not on a farm	Preparatory treatments (baling, sorting, shredding etc)

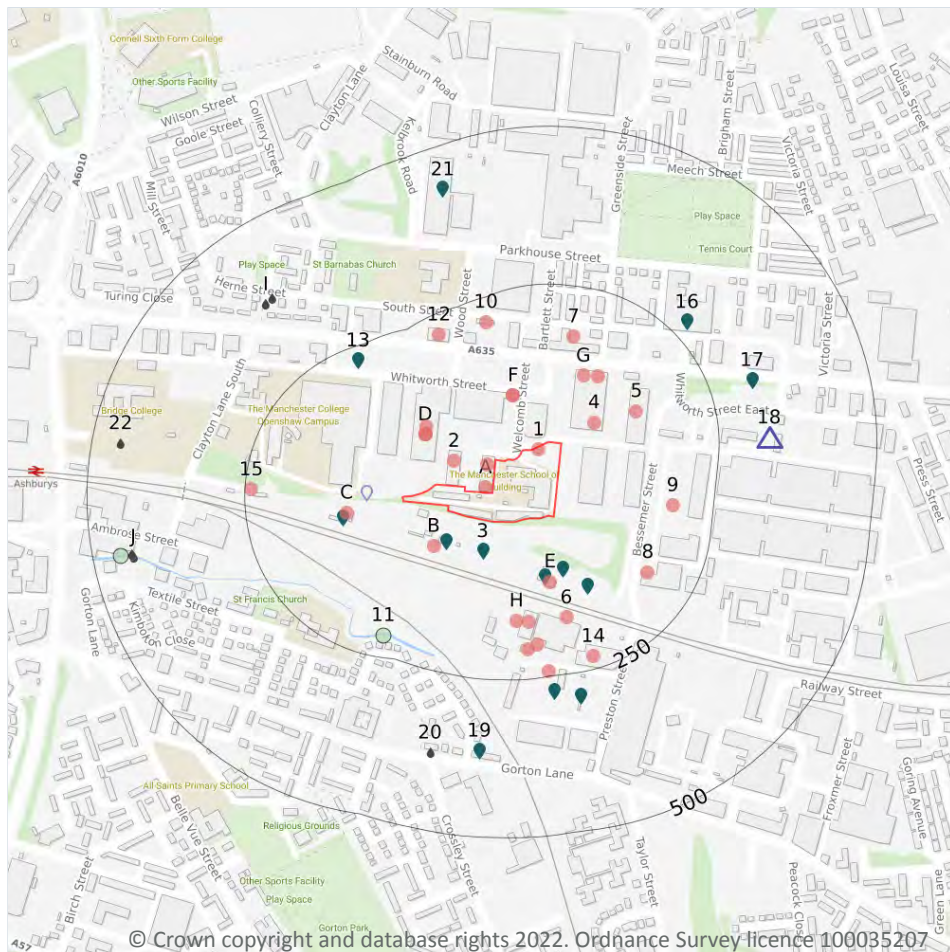


ID	Location	Site	Reference	Category	Sub-Category	Description
K	420m E	Units E1-5 & A36-37, New Smithfield Market, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX142651	Using waste exemption	Not on a farm	Use of waste to manufacture finished goods
K	420m E	Units E1-5 & A36-37, New Smithfield Market, Whitworth Street East, Openshaw, Manchester, M11 2WJ	WEX142651	Treating waste exemption	Not on a farm	Treatment of waste wood and waste plant matter by chipping, shredding, cutting or pulverising
K	421m E	E1-8, New Smithfield Market, Manchester, M11 2WJ	WEX010626	Treating waste exemption	Not on a farm	Treatment of waste wood and waste plant matter by chipping, shredding, cutting or pulverising
K	421m E	The Cabin, Adj. Unit E22, New Smithfield Market, Openshaw, MANCHESTER, M11 2WJ	WEX000109	Treating waste exemption	Not on a farm	Preparatory treatments (baling, sorting, shredding etc)
8	423m NW	Chartrange, Whitworth St, Openshaw, Manchester, M11 2DW	WEX063702	Treating waste exemption	Not on a farm	Recovery of scrap metal

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
- △ Current or recent petrol stations
- Part A(1) industrial activities
- Licensed pollutant release (Part A(2)/B)
- Licensed Discharges to controlled waters
- Pollution Incidents (EA/NRW)

4.1 Recent industrial land uses

Records within 250m

31

Current potentially contaminative industrial sites.

Features are displayed on the Current industrial land use map on **page 59**

ID	Location	Company	Address	Activity	Category
1	On site	Electricity Sub Station	Greater Manchester, M11	Electrical Features	Infrastructure and Facilities
A	8m N	Survey & Laser	Unit 6 Medlock Court, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Construction and Tool Hire	Hire Services
A	13m W	A G Flooring Ltd	Unit 9 Medlock Court, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Construction Completion Services	Construction Services



ID	Location	Company	Address	Activity	Category
2	39m N	Wendys Broadcastin g Services Ltd	Unit 2 Medlock Court, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Radar and Telecommunications Equipment	Industrial Products
B	61m S	Chimney	Greater Manchester, M11	Chimneys	Industrial Features
4	62m NE	A J Engineering Services Ltd	Unit 11-12 Clayton Court 5, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Vehicle Repair, Testing and Servicing	Repair and Servicing
D	81m N	Lee Floorstok	Unit B1 The Dresser Centre, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NE	Carpets, Flooring, Rugs and Soft Furnishings	Consumer Products
D	81m N	Intelligent Environmen tal Services Ltd	Unit A7 The Dresser Centre, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NE	Recycling, Reclamation and Disposal	Recycling Services
D	81m N	Malacrino Ltd	Unit B6 The Dresser Centre, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NE	Fireplaces and Mantelpieces	Consumer Products
D	81m N	Manchester Paperbox	Unit B5 The Dresser Centre, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NE	Packaging	Industrial Products
F	88m N	Minster	18, Whitworth Street, Openshaw, Bradford, Manchester, Greater Manchester, M11 2NJ	General Construction Supplies	Industrial Products
F	88m N	Hambaker Pipelines	18, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NJ	General Construction Supplies	Industrial Products
C	92m W	Silo	Greater Manchester, M11	Hoppers and Silos	Farming
D	93m N	Proprint Biz Ltd	Unit B2-B3 The Dresser Centre, Whitworth Street, Openshaw, Manchester, Greater Manchester, M11 2NE	Published Goods	Industrial Products
E	101m S	Tarmac	Bessemer Street, Manchester, Greater Manchester, M11 2NP	Road Maintenance Equipment	Industrial Products
G	113m N	Hatov	Unit 6 Clayton Court 5, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Catering and Non Specific Food Products	Foodstuffs
G	122m NE	The Wheel Specialist	Unit 7 Clayton Court 5, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Vehicle Repair, Testing and Servicing	Repair and Servicing
5	130m NE	Spot Promotions	Unit 16 Clayton Court 5, Welcomb Street, Manchester, Greater Manchester, M11 2NB	Radar and Telecommunications Equipment	Industrial Products



ID	Location	Company	Address	Activity	Category
H	156m S	Works	Greater Manchester, M18	Unspecified Works Or Factories	Industrial Features
H	160m S	A A A Poly UK Ltd	Unit 1b, And C Preston Street, Manchester, Greater Manchester, M18 8DB	Packaging	Industrial Products
6	161m S	Chimney	Greater Manchester, M18	Chimneys	Industrial Features
7	171m N	Cuthbert Business Centre	Greater Manchester, M11	Business Parks and Industrial Estates	Industrial Features
8	173m SE	Electricity Sub Station	Greater Manchester, M11	Electrical Features	Infrastructure and Facilities
9	186m E	J & B Wilde	H1-H4, New Smithfield Market, Manchester, Greater Manchester, M11 2WP	Fish, Meat and Poultry Products	Foodstuffs
H	198m S	Tank	Greater Manchester, M18	Tanks (Generic)	Industrial Features
H	203m S	Universal Pallet Services	Preston Street, Manchester, Greater Manchester, M18 8DB	Shelving, Storage, Safes and Vaults	Industrial Products
10	212m N	J Hempstock & Co Ltd	116-118, South Street, Openshaw, Manchester, Greater Manchester, M11 2FY	Construction Completion Services	Construction Services
12	218m NW	Smiths Hire	5, Wood Street, Manchester, Greater Manchester, M11 2FB	Construction and Tool Hire	Hire Services
14	230m S	Mac Processing	Preston Street, Manchester, Greater Manchester, M18 8DB	Clothing, Components and Accessories	Consumer Products
15	240m W	Mast (Telecommunication)	Greater Manchester, M11	Telecommunications Features	Infrastructure and Facilities
H	242m S	Electricity Sub Station	Greater Manchester, M18	Electrical Features	Infrastructure and Facilities

This data is sourced from Ordnance Survey.

4.2 Current or recent petrol stations

Records within 500m

1

Open, closed, under development and obsolete petrol stations.

Features are displayed on the Current industrial land use map on **page 59**



ID	Location	Company	Address	LPG	Status
18	329m E	OBSOLETE	949, Ashton Old Road, South Street, Openshaw, Manchester, Greater Manchester, M11 3LW	Not Applicable	Obsolete

This data is sourced from Experian.

4.3 Electricity cables

Records within 500m	0
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High voltage underground electricity transmission cables.

This data is sourced from National Grid.

4.4 Gas pipelines

Records within 500m	0
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High pressure underground gas transmission pipelines.

This data is sourced from National Grid.

4.5 Sites determined as Contaminated Land

Records within 500m	0
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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
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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

2

Records of Part A(1) 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 59**

ID	Location	Details	
C	57m W	Operator: URBAN RESERVE (ASSETCO) LIMITED Installation Name: WHITWORTH POWER EPR/ZP3807PL Process: TRANCHE B SG PERMITTING DATE 1ST JANUARY 2019 Permit Number: ZP3807PL Original Permit Number: ZP3807PL	EPR Reference: - Issue Date: 24/01/2020 Effective Date: 24/01/2020 Last date noted as effective: 01/01/2022 Status: EFFECTIVE

ID	Location	Details	
C	57m W	Operator: URBAN RESERVE (ASSETCO) LIMITED Installation Name: WHITWORTH POWER EPR/ZP3807PL Process: NEW MEDIUM COMBUSTION PLANT Permit Number: ZP3807PL Original Permit Number: ZP3807PL	EPR Reference: - Issue Date: 24/01/2020 Effective Date: 24/01/2020 Last date noted as effective: 01/01/2022 Status: EFFECTIVE

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

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

Records within 500m	13
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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 59**

ID	Location	Address	Details	
B	48m S	Tarmac Aggregates Limited, Ashburys Railway Sidings, Off Bessemer Street, Gorton, Manchester, M11 2NW	Process: Roadstone Coating Processes Status: Current Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
3	49m S	Breedon Southern LTD., Bessemer Street, Gorton, M11 2NW	Process: Use of Bulk Cement Status: Current Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
E	85m S	Lomax Joinery Ltd, Highbank Trad Est, M11 2LJ	Process: Timber Manufacture Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
E	92m S	Lafarge Aggregates Ltd, Ashburys Railway Sidings, Off Bessemer Street, Gorton, M11 2NW	Process: Roadstone Coating Processes Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
C	99m W	Lafarge Aggregates Ltd, Ashburys Railway Sidings, Off Bessemer Street, Gorton, M11 2NW	Process: Use of Bulk Cement; Other Mineral Processes Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified

ID	Location	Address	Details	
E	122m SE	Director Of Works Mcc, Bessemer St Workshops, Openshaw, M11 2NW	Process: Timber Manufacture Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
13	227m N	Mancat-Openshaw Campus, Whitworth Street, Openshaw, M11 2WH	Process: Respraying of Road Vehicles Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
H	274m S	RMC Northern, Preston Street, Gorton, M18 8DB	Process: Use of Bulk Cement Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
16	276m NE	Benson Compomnents Ltd, Saxon Works, South St, Openshaw, M11 2HR	Process: Coating Processes Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
H	288m S	Cemex Operations, Preston Street, Gorton, M18 8DB	Process: Use of Bulk Cement Status: Current Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
17	318m E	Openshaw Serv Stn, South St, Ashton Old Rd, M11 3LW	Process: Petrol Vapour Recovery Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
19	363m S	Sanderson Ford, Gorton Lane, Gorton, M18 8BT	Process: Respraying of Road Vehicles Status: Historical Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement Notified
21	432m N	Cascade Ltd, 3 Kelbrook Road, Parkhouse Industrial Estate, Openshaw, M11 2DD	Process: Coating Processes Status: Current Permit Permit Type: Part B	Enforcement: No Enforcement Notified Date of enforcement: No Enforcement Notified Comment: No Enforcement 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

7

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 59**

ID	Location	Address	Details	
I	374m NW	GEORGE STREET/CLAYTON LANE, MANCHESTER, GREATER MANCHESTER	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01MAN0374 Permit Version: 1 Receiving Water: -	Status: SURRENDERED UNDER EPR 2010 Issue date: - Effective Date: 01/01/1995 Revocation Date: 12/12/2014
I	376m NW	SOUTH ST/NR CLAYTON LANE, MANCHESTER, GREATER MANCHESTER	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01MAN0375 Permit Version: 1 Receiving Water: UNKNOWN	Status: POST NRA LEGISLATION WHERE ISSUE DATE > 31-AUG-89 (HISTORIC ONLY) Issue date: - Effective Date: 01/01/1995 Revocation Date: 08/08/2017
20	378m S	GORTON LN/CROSSLEY ST, MANCHESTER, GREATER MANCHESTER	Effluent Type: SEWAGE DISCHARGES - FINAL/TREATED EFFLUENT - WATER COMPANY Permit Number: 01MAN0214 Permit Version: 1 Receiving Water: CORN BROOK	Status: REVOKED - UNSPECIFIED Issue date: - Effective Date: 15/09/1993 Revocation Date: 15/09/1993
J	437m W	JUNCTION OF ASHTON NEW ROAD CSO, ECCLESHALL STREET / ESWICK ST, OPENSHAW, MANCHESTER, GREATER MANCHESTER, M11 4GL	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 016982734 Permit Version: 3 Receiving Water: CORN BROOK VIA SWS	Status: VARIED UNDER EPR 2010 Issue date: 20/12/2019 Effective Date: 20/12/2019 Revocation Date: -

ID	Location	Address	Details	
J	437m W	JUNCTION OF ASHTON NEW ROAD CSO, ECCLESHALL STREET / ESWICK ST, OPENSHAW, MANCHESTER, GREATER MANCHESTER, M11 4GL	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 016982734 Permit Version: 2 Receiving Water: CORN BROOK	Status: VARIED BY APPLICATION - (WRA 91 SCHED 10 - AS AMENDED BY ENV ACT 1995) Issue date: 02/08/2005 Effective Date: 02/08/2005 Revocation Date: 19/12/2019
J	439m W	PARROTT STREET/BROMLOW STREET CSO, PARROTT ST/BROMLOW ST JUNCTION, OPENSHAW, MANCHESTER, GREATER MANCHESTER, M11 4QW	Effluent Type: SEWAGE DISCHARGES - SEWER STORM OVERFLOW - WATER COMPANY Permit Number: 01MAN0107 Permit Version: 4 Receiving Water: CORN BROOK VIA SWS	Status: VARIED UNDER EPR 2010 Issue date: 06/11/2019 Effective Date: 06/11/2019 Revocation Date: -
22	454m W	POTTERY LANE, MANCHESTER, GREATER MANCHESTER	Effluent Type: TRADE DISCHARGES - COOLING WATER Permit Number: 016992566 Permit Version: 2 Receiving Water: CORN BROOK	Status: LAPSED UNDER SCHEDULE 23 ENVIRONMENT ACT 1995 Issue date: - Effective Date: 04/10/1994 Revocation Date: 31/03/1996

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
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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
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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
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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**2**

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

Features are displayed on the Current industrial land use map on **page 59**

ID	Location	Details	
11	214m S	Incident Date: 29/08/2001 Incident Identification: 27562 Pollutant: Sewage Materials Pollutant Description: Crude Sewage	Water Impact: Category 3 (Minor) Land Impact: Category 4 (No Impact) Air Impact: Category 4 (No Impact)
J	456m W	Incident Date: 15/05/2003 Incident Identification: 158481 Pollutant: Oils and Fuel Pollutant Description: Diesel	Water Impact: Category 3 (Minor) Land Impact: Category 4 (No Impact) Air Impact: Category 3 (Minor)

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.

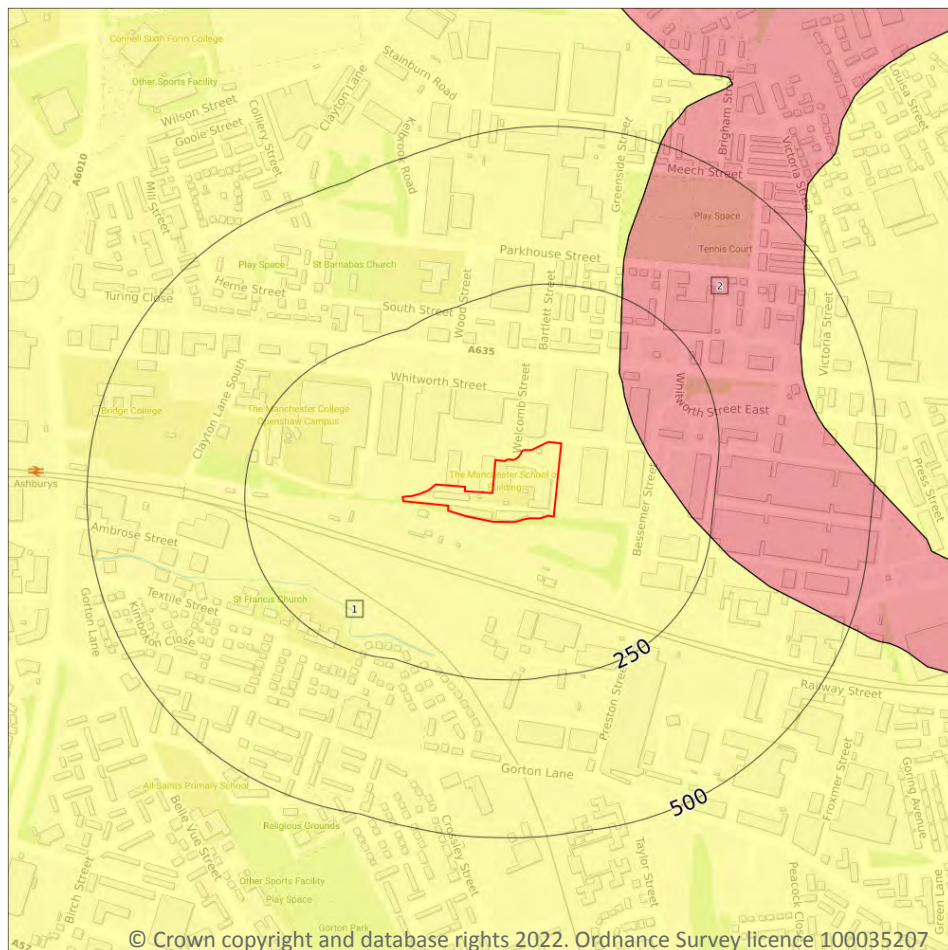
4.21 Pollution inventory radioactive waste

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 70**

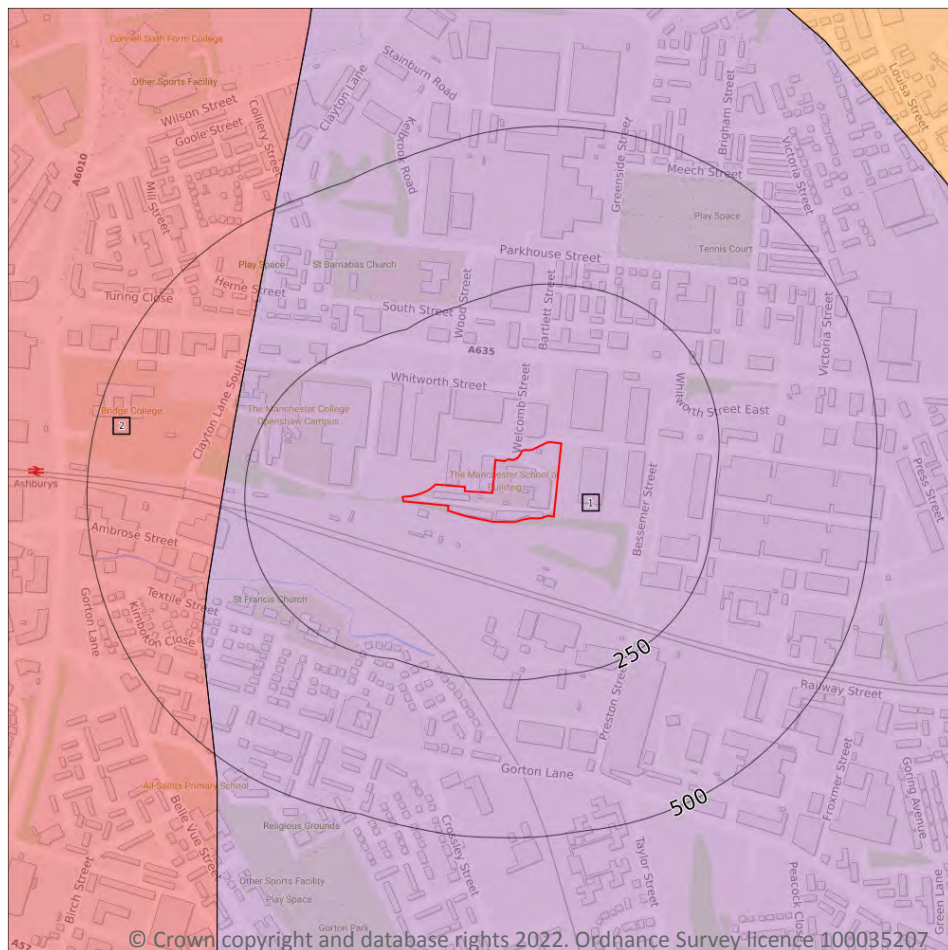
ID	Location	Designation	Description
1	On site	Secondary Undifferentiated	Assigned where it is not possible to attribute either category A or B to a rock type. In general these layers have previously been designated as both minor and non-aquifer in different locations due to the variable characteristics of the rock type
2	118m E	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.

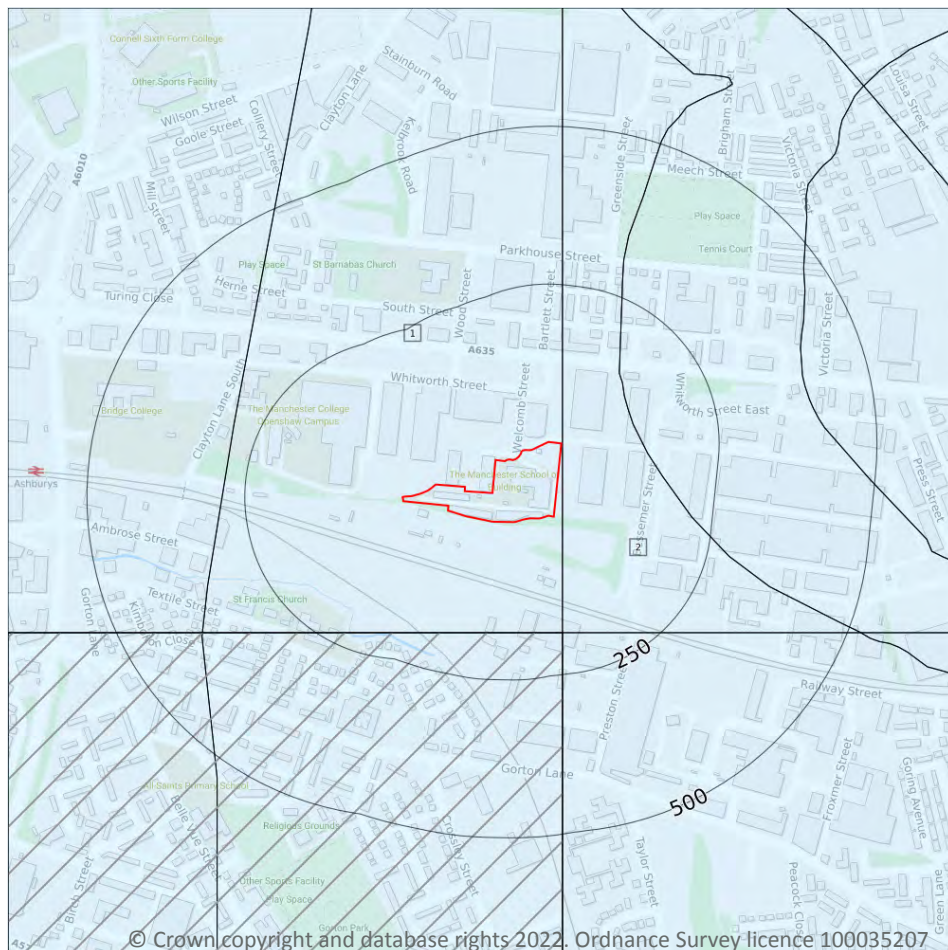
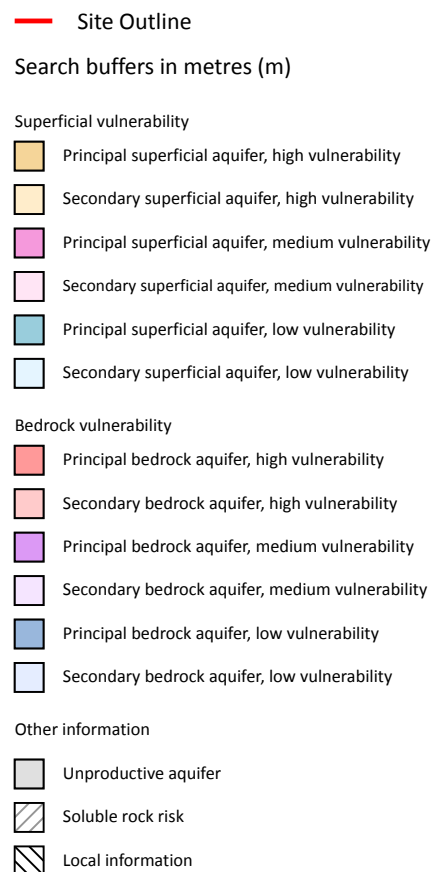
Features are displayed on the Bedrock aquifer map on **page 72**

ID	Location	Designation	Description
1	On site	Principal	Geology of high intergranular and/or fracture permeability, usually providing a high level of water storage and may support water supply/river base flow on a strategic scale. Generally principal aquifers were previously major aquifers
2	282m 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

2

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 74**

ID	Location	Summary	Soil / surface	Superficial geology	Bedrock geology
1	On site	Summary Classification: Secondary superficial aquifer - Low Vulnerability Combined classification: Productive Bedrock Aquifer, Productive Superficial Aquifer	Leaching class: Low Infiltration value: <40% Dilution value: 300- 550mm/year	Vulnerability: Low Aquifer type: Secondary Thickness: >10m Patchiness value: >90% Recharge potential: Low	Vulnerability: Low Aquifer type: Principal Flow mechanism: Well connected fractures
2	1m E	Summary Classification: Secondary superficial aquifer - Low Vulnerability Combined classification: Productive Bedrock Aquifer, Productive Superficial Aquifer	Leaching class: Low Infiltration value: <40% Dilution value: 300- 550mm/year	Vulnerability: Low Aquifer type: Secondary Thickness: >10m Patchiness value: >90% Recharge potential: Low	Vulnerability: Low Aquifer type: Principal 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
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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.

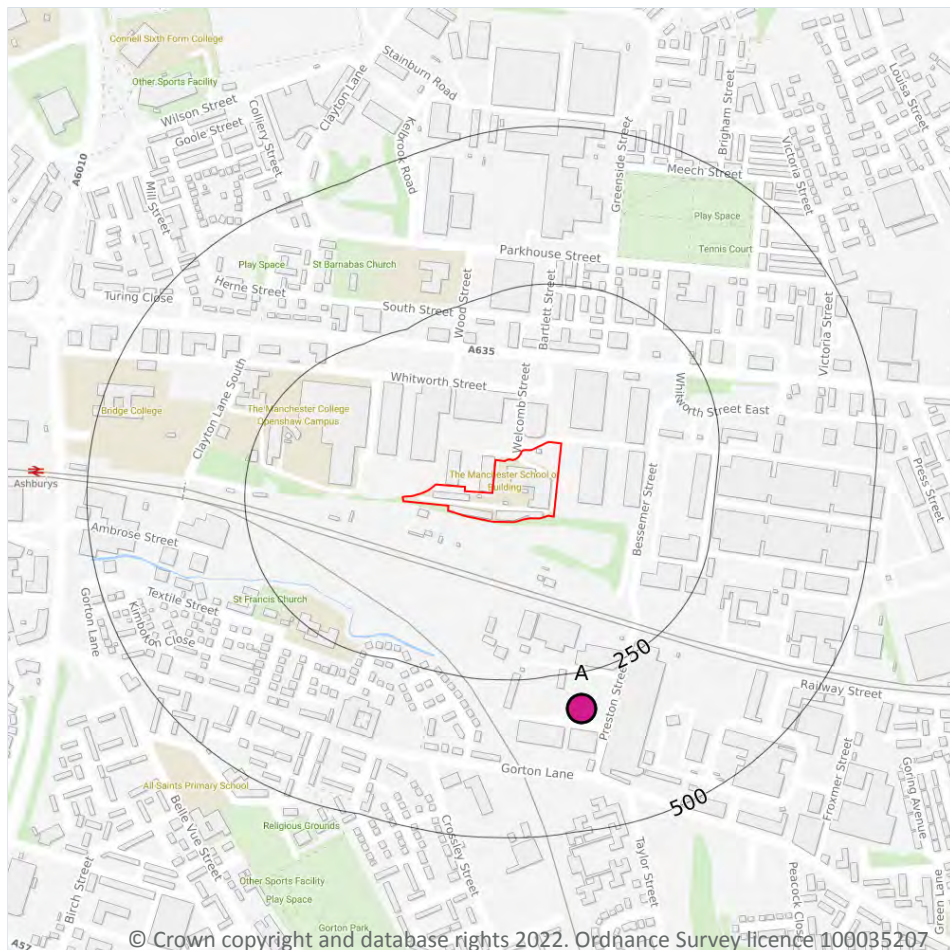
5.5 Groundwater vulnerability- local information

Records on site	0
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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

27

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 76**

ID	Location	Details	
A	307m S	Status: Historical Licence No: 2569006044 Details: Process Water Direct Source: Ground Water - North West Region Point: BOREHOLE AT PRESTON STREET, GORTON, MANCHESTER Data Type: Point Name: CEMEX UK MATERIALS LTD Easting: 388030 Northing: 396880	Annual Volume (m ³): 15000 Max Daily Volume (m ³): 115 Original Application No: - Original Start Date: 23/10/2003 Expiry Date: 31/03/2014 Issue No: 3 Version Start Date: 15/10/2007 Version End Date: -
A	307m S	Status: Active Licence No: NW/069/0004/012 Details: Process Water Direct Source: Ground Water - North West Region Point: BOREHOLE AT PRESTON STREET, MANCHESTER Data Type: Point Name: Cemex UK Materials Limited Easting: 388030 Northing: 396880	Annual Volume (m ³): 7,500 Max Daily Volume (m ³): 72 Original Application No: NPS/WR/030760A Original Start Date: 19/06/2014 Expiry Date: 31/03/2027 Issue No: 2 Version Start Date: 21/12/2018 Version End Date: -
-	786m N	Status: Historical Licence No: NW/069/0006/005 Details: General Use Relating To Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE AT OPENSHAW, WEST ASHTON Data Type: Point Name: MANCHESTER CITY FOOTBALL CLUB LIMITED Easting: 387681 Northing: 398032	Annual Volume (m ³): 266113 Max Daily Volume (m ³): 1000 Original Application No: - Original Start Date: 14/11/2012 Expiry Date: 31/03/2018 Issue No: 1 Version Start Date: 14/11/2012 Version End Date: -
-	786m N	Status: Historical Licence No: NW/069/0006/005 Details: Horticultural Watering Direct Source: Ground Water - North West Region Point: BOREHOLE AT OPENSHAW, WEST ASHTON Data Type: Point Name: MANCHESTER CITY FOOTBALL CLUB LIMITED Easting: 387681 Northing: 398032	Annual Volume (m ³): 266113 Max Daily Volume (m ³): 1000 Original Application No: - Original Start Date: 14/11/2012 Expiry Date: 31/03/2018 Issue No: 1 Version Start Date: 14/11/2012 Version End Date: -
-	786m N	Status: Historical Licence No: NW/069/0006/005 Details: Spray Irrigation - Direct Direct Source: Ground Water - North West Region Point: BOREHOLE AT OPENSHAW, WEST ASHTON Data Type: Point Name: MANCHESTER CITY FOOTBALL CLUB LIMITED Easting: 387681 Northing: 398032	Annual Volume (m ³): 266113 Max Daily Volume (m ³): 1000 Original Application No: - Original Start Date: 14/11/2012 Expiry Date: 31/03/2018 Issue No: 1 Version Start Date: 14/11/2012 Version End Date: -



ID	Location	Details	
-	786m N	Status: Active Licence No: NW/069/0006/005/R01 Details: General Use Relating To Secondary Category (Medium Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE AT OPENSHAW, WEST ASHTON Data Type: Point Name: MANCHESTER CITY FOOTBALL CLUB LIMITED Easting: 387681 Northing: 398032	Annual Volume (m ³): 221,650 Max Daily Volume (m ³): 1,000 Original Application No: NPS/WR/024168 Original Start Date: 01/04/2018 Expiry Date: 31/03/2024 Issue No: 1 Version Start Date: 01/04/2018 Version End Date: -
-	786m N	Status: Active Licence No: NW/069/0006/005/R01 Details: Spray Irrigation - Direct Direct Source: Ground Water - North West Region Point: BOREHOLE AT OPENSHAW, WEST ASHTON Data Type: Point Name: MANCHESTER CITY FOOTBALL CLUB LIMITED Easting: 387681 Northing: 398032	Annual Volume (m ³): 221,650 Max Daily Volume (m ³): 1,000 Original Application No: NPS/WR/024168 Original Start Date: 01/04/2018 Expiry Date: 31/03/2024 Issue No: 1 Version Start Date: 01/04/2018 Version End Date: -
-	844m N	Status: Historical Licence No: 2569006026 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: "BOREHOLE AT PREMISES, CLAYTON, MANCHESTER" Data Type: Point Name: CIBA SPECIALTY CHEMICALS PLC Easting: 387700 Northing: 398100	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 24/03/1966 Expiry Date: - Issue No: 101 Version Start Date: 25/07/2000 Version End Date: -
-	844m N	Status: Historical Licence No: 2569006026 Details: Process water Direct Source: Ground Water - North West Region Point: "BOREHOLE AT PREMISES, CLAYTON, MANCHESTER" Data Type: Point Name: CIBA SPECIALTY CHEMICALS PLC Easting: 387700 Northing: 398100	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 24/03/1966 Expiry Date: - Issue No: 101 Version Start Date: 25/07/2000 Version End Date: -

ID	Location	Details	
-	844m N	Status: Historical Licence No: 2569006026 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE AT PREMISES, CLAYTON, MANCHESTER Data Type: Point Name: CIBA SPECIALTY CHEMICALS PLC Easting: 387700 Northing: 398100	Annual Volume (m ³): 633962 Max Daily Volume (m ³): 2837 Original Application No: - Original Start Date: 24/03/1966 Expiry Date: - Issue No: 101 Version Start Date: 25/07/2000 Version End Date: -
-	844m N	Status: Historical Licence No: 2569006026 Details: Process water Direct Source: Ground Water - North West Region Point: BOREHOLE AT PREMISES, CLAYTON, MANCHESTER Data Type: Point Name: CIBA SPECIALTY CHEMICALS PLC Easting: 387700 Northing: 398100	Annual Volume (m ³): 633962 Max Daily Volume (m ³): 2837 Original Application No: - Original Start Date: 24/03/1966 Expiry Date: - Issue No: 101 Version Start Date: 25/07/2000 Version End Date: -
-	898m N	Status: Historical Licence No: 2569006036 Details: Process water Direct Source: Ground Water - North West Region Point: "BOREHOLE ON PREMISES AT CLAYTON, MANCHESTER" Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	898m N	Status: Historical Licence No: 2569006036 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: "BOREHOLE ON PREMISES AT CLAYTON, MANCHESTER" Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -

ID	Location	Details	
-	898m N	Status: Historical Licence No: 2569006036 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE ON PREMISES AT CLAYTON, MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	898m N	Status: Historical Licence No: 2569006036 Details: Process water Direct Source: Ground Water - North West Region Point: BOREHOLE ON PREMISES AT CLAYTON, MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	898m N	Status: Historical Licence No: 2569006036 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: BOREHOLE ON PREMISES AT CLAYTON MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): 372772 Max Daily Volume (m ³): 3600.5 Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	898m N	Status: Historical Licence No: 2569006036 Details: Process Water Direct Source: Ground Water - North West Region Point: BOREHOLE ON PREMISES AT CLAYTON MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 388000 Northing: 398200	Annual Volume (m ³): 372772 Max Daily Volume (m ³): 3600.5 Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -

ID	Location	Details	
-	976m N	Status: Active Licence No: 2569006036 Details: Non-Evaporative Cooling Direct Source: Ground Water - North West Region Point: BOREHOLE ON PREMISES AT CLAYTON, MANCHESTER Data Type: Point Name: Evonik Chemicals Ltd Easting: 388027 Northing: 398277	Annual Volume (m ³): 372,772 Max Daily Volume (m ³): 3,600.50 Original Application No: NPS/WR/035265 Original Start Date: 21/05/1985 Expiry Date: - Issue No: 104 Version Start Date: 19/04/2021 Version End Date: -
-	1075m S	Status: Historical Licence No: 2569006043 Details: Dust Suppression Direct Source: Ground Water - North West Region Point: PERMO-TRIASSIC SANDSTONE AT BELLE VUE, MANCHESTER Data Type: Point Name: G R A LIMITED Easting: 387950 Northing: 396100	Annual Volume (m ³): 4000 Max Daily Volume (m ³): 22 Original Application No: - Original Start Date: 20/06/2003 Expiry Date: 31/03/2014 Issue No: 2 Version Start Date: 01/04/2008 Version End Date: -
-	1079m N	Status: Active Licence No: 2569006037 Details: Non-Evaporative Cooling Direct Source: Ground Water - North West Region Point: BOREHOLE 2 ON PREMISES AT CROFT STREET, CLAYTON, MANCHESTER Data Type: Point Name: Evonik Chemicals Ltd Easting: 387859 Northing: 398375	Annual Volume (m ³): 111,831.60 Max Daily Volume (m ³): 654.62 Original Application No: NPS/WR/035267 Original Start Date: 21/05/1985 Expiry Date: - Issue No: 104 Version Start Date: 19/04/2021 Version End Date: -
-	1083m N	Status: Active Licence No: 2569006037 Details: Non-Evaporative Cooling Direct Source: Ground Water - North West Region Point: BOREHOLE 1 ON PREMISES AT CROFT STREET, CLAYTON, MANCHESTER Data Type: Point Name: Evonik Chemicals Ltd Easting: 387860 Northing: 398379	Annual Volume (m ³): 111,831.60 Max Daily Volume (m ³): 654.62 Original Application No: NPS/WR/035267 Original Start Date: 21/05/1985 Expiry Date: - Issue No: 104 Version Start Date: 19/04/2021 Version End Date: -

ID	Location	Details	
-	1100m N	Status: Historical Licence No: 2569006037 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: "BOREHOLES (2) ON PREMISES AT CROFT ST, CLAYTON, MANCHESTER" Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 387900 Northing: 398400	Annual Volume (m³): - Max Daily Volume (m³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	1100m N	Status: Historical Licence No: 2569006037 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: BOREHOLES (2) ON PREMISES AT CROFT ST, CLAYTON, MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 387900 Northing: 398400	Annual Volume (m³): - Max Daily Volume (m³): - Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	1100m N	Status: Historical Licence No: 2569006037 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Ground Water - North West Region Point: BOREHOLES X 2 ON PREMISES AT CROFT STREET CLAYTON MANCHESTER Data Type: Point Name: AIR PRODUCTS CHEMICALS LTD Easting: 387900 Northing: 398400	Annual Volume (m³): 111832 Max Daily Volume (m³): 654.624 Original Application No: - Original Start Date: 21/05/1985 Expiry Date: - Issue No: 100 Version Start Date: 01/07/1996 Version End Date: -
-	1318m S	Status: Historical Licence No: 2569006042 Details: Spray Irrigation - Direct Direct Source: Ground Water - North West Region Point: PERMO-TRIASSIC SANDSTONE AT BELLE VUE LEISURE CENTRE Data Type: Point Name: CLIVE BACK Easting: 387591 Northing: 395891	Annual Volume (m³): 10000 Max Daily Volume (m³): 276 Original Application No: - Original Start Date: 11/07/2002 Expiry Date: 31/03/2014 Issue No: 4 Version Start Date: 29/02/2012 Version End Date: -

ID	Location	Details	
-	1318m S	Status: Historical Licence No: NW/069/0006/006 Details: Spray Irrigation - Direct Direct Source: Ground Water - North West Region Point: PERMO-TRIASSIC SANDSTONE AT BELLE VUE LEISURE CENTRE Data Type: Point Name: The Chief Operating Officer of the Eastlands Trust Easting: 387591 Northing: 395891	Annual Volume (m ³): 8000 Max Daily Volume (m ³): 276 Original Application No: - Original Start Date: 16/05/2014 Expiry Date: 31/03/2016 Issue No: 1 Version Start Date: 16/05/2014 Version End Date: -
-	1319m S	Status: Historical Licence No: 2569006042 Details: Spray Irrigation - Direct Direct Source: Ground Water - North West Region Point: PERMO-TRIASSIC SANDSTONE AT BELLE VUE LEISURE CENTRE Data Type: Point Name: CLIVE BACK Easting: 387590 Northing: 395890	Annual Volume (m ³): 15000 Max Daily Volume (m ³): 276 Original Application No: - Original Start Date: 11/07/2002 Expiry Date: 31/03/2014 Issue No: 3 Version Start Date: 04/02/2009 Version End Date: -

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

5.7 Surface water abstractions

Records within 2000m	6
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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 76**

ID	Location	Details	
-	1005m N	Status: Historical Licence No: 2569006995 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: "Surface, Non-Tidal - North West Region" Point: "ASHTON CANAL, MANCHESTER" Data Type: Point Name: BRITISH WATERWAYS Easting: 388100 Northing: 398300	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 Version End Date: -

ID	Location	Details	
-	1005m N	Status: Historical Licence No: 2569006995 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Surface, Non-Tidal - North West Region Point: ASHTON CANAL, MANCHESTER Data Type: Point Name: Canal and River Trust Easting: 388100 Northing: 398300	Annual Volume (m ³): 68,190 Max Daily Volume (m ³): 68,190 Original Application No: - Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 Version End Date: -
-	1112m N	Status: Historical Licence No: 2569006997 Details: Process water Direct Source: "Surface, Non-Tidal - North West Region" Point: "ASHTON CANAL, MANCHESTER [CLAYTON ANALINE]" Data Type: Point Name: BRITISH WATERWAYS Easting: 387800 Northing: 398400	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 Version End Date: -
-	1112m N	Status: Historical Licence No: 2569006997 Details: Process water Direct Source: Surface, Non-Tidal - North West Region Point: ASHTON CANAL, MANCHESTER [CLAYTON ANALINE] Data Type: Point Name: BRITISH WATERWAYS BOARD Easting: 387800 Northing: 398400	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 Version End Date: -
-	1112m N	Status: Active Licence No: 2569006997 Details: Process Water Direct Source: Surface, Non-Tidal - North West Region Point: ASHTON CANAL MANCHESTER CLAYTON ANALINE Data Type: Point Name: Canal and River Trust Easting: 387800 Northing: 398400	Annual Volume (m ³): 3,500,420 Max Daily Volume (m ³): 3,500,420 Original Application No: 1470 Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 Version End Date: -

ID	Location	Details	
-	1161m N	Status: Historical Licence No: 2569006996 Details: General Cooling (Existing Licences Only) (Low Loss) Direct Source: Surface, Non-Tidal - North West Region Point: ASHTON CANAL, MANCHESTER [VITACOM] Data Type: Point Name: BRITISH WATERWAYS Easting: 387600 Northing: 398400	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/04/1969 Expiry Date: - Issue No: 100 Version Start Date: 01/04/1969 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

4

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 86**

ID	Location	Type of water feature	Ground level	Permanence	Name
B	189m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Corn Brook

ID	Location	Type of water feature	Ground level	Permanence	Name
C	216m S	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Corn Brook
C	216m S	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Corn Brook
1	234m S	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	Corn Brook

This data is sourced from the Ordnance Survey.

6.2 Surface water features

Records within 250m

1

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 86**

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 86**

ID	Location	Type	Water body catchment	Water body ID	Operational catchment	Management catchment
A	On site	River	Irwell / Manchester Ship Canal (Irk to confluence with Upper Mers	GB112069061452	Croal Irwell	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 86**

ID	Location	Type	Name	Water body ID	Overall rating	Chemical rating	Ecological rating	Year
-	4237m W	River	Irwell / Manchester Ship Canal (Irk to confluence with Upper Mers	GB112069061452	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 86**

ID	Location	Name	Water body ID	Overall rating	Chemical rating	Quantitative	Year
A	On site	Manchester and East Cheshire Permo-Triassic Sandstone Aquifers	GB41201G101100	Poor	Poor	Poor	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**0**

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.

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

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

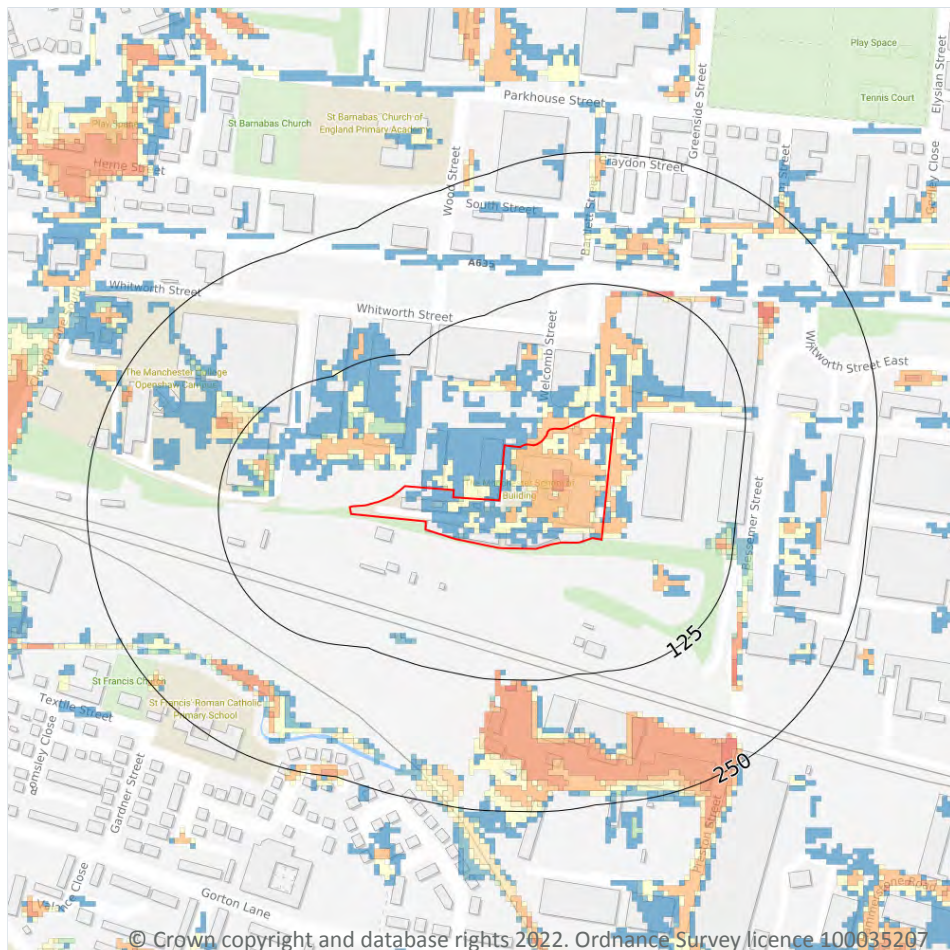
Records within 50m

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



— Site Outline

Search buffers in metres (m)

1 in 1000 return period

- Depth between 0.1m - 0.3m
- Depth between 0.3m - 1.0m
- Depth greater than 1.0m

1 in 250 return period

- Depth between 0.1m - 0.3m
- Depth between 0.3m - 1.0m
- Depth greater than 1.0m

1 in 100 return period

- Depth between 0.1m - 0.3m
- Depth between 0.3m - 1.0m
- Depth greater than 1.0m

1 in 30 return period

- Depth between 0.1m - 0.3m
- Depth between 0.3m - 1.0m
- Depth greater than 1.0m

8.1 Surface water flooding

Highest risk on site

1 in 30 year, 0.3m - 1.0m

Highest risk within 50m

1 in 30 year, 0.3m - 1.0m

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 92**

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.

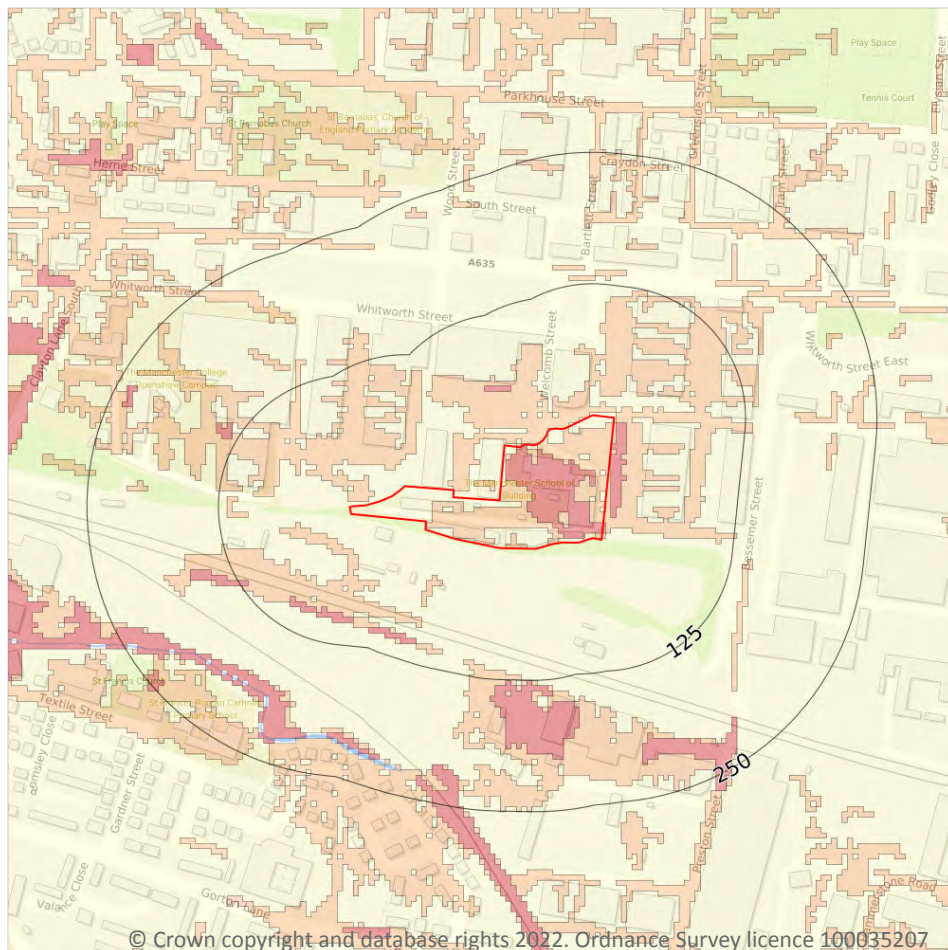
The table below shows the maximum flood depths for a range of return periods for the site.

Return period	Maximum modelled depth
1 in 1000 year	Between 0.3m and 1.0m
1 in 250 year	Between 0.3m and 1.0m
1 in 100 year	Between 0.3m and 1.0m
1 in 30 year	Between 0.3m and 1.0m

This data is sourced from Ambiental 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

High

Highest risk within 50m

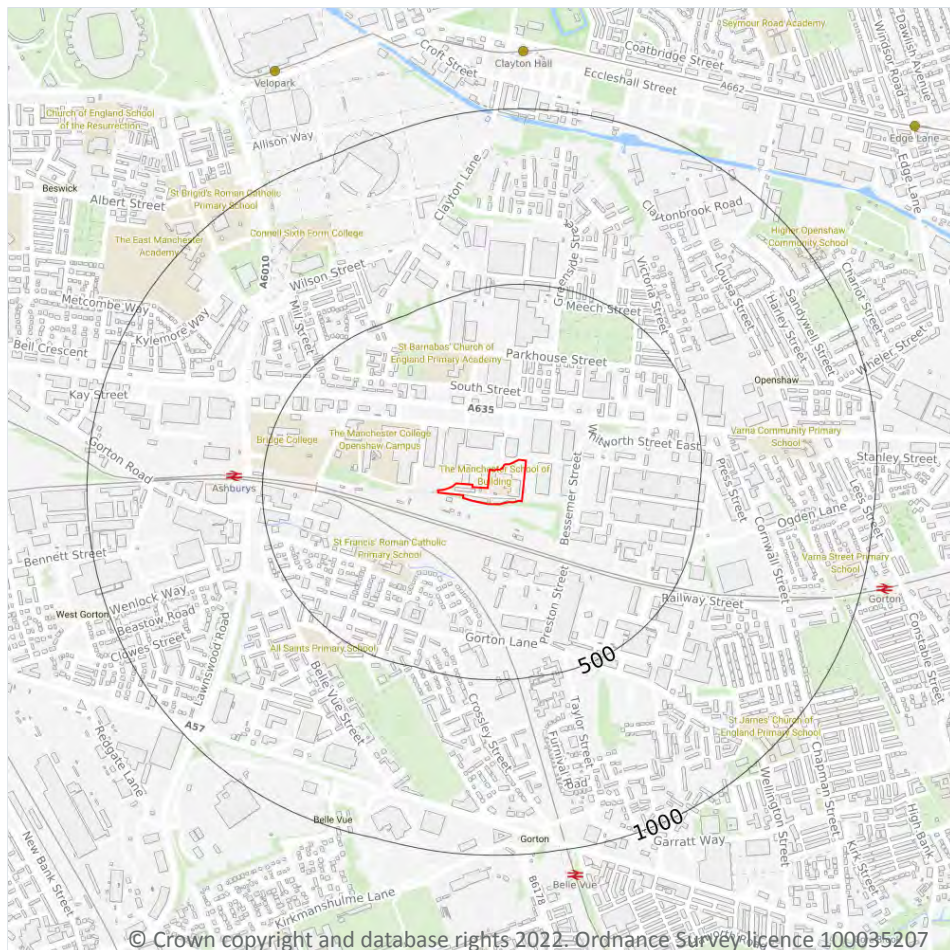
High

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 94**

This data is sourced from Ambiantal Risk Analytics.

10 Environmental designations



- Site Outline
- Search buffers in metres (m)
- + Local Nature Reserves (LNR)
- / Green Belt

10.1 Sites of Special Scientific Interest (SSSI)

Records within 2000m

0

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.

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**0**

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.

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**1**

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.

Features are displayed on the Environmental designations map on **page 95**

ID	Location	Name	Data source
-	1764m N	Clayton Vale	Natural England

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

1

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

Features are displayed on the Environmental designations map on **page 95**

ID	Location	Name	Local Authority name
-	1773m N	Merseyside and Greater Manchester	Manchester

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.

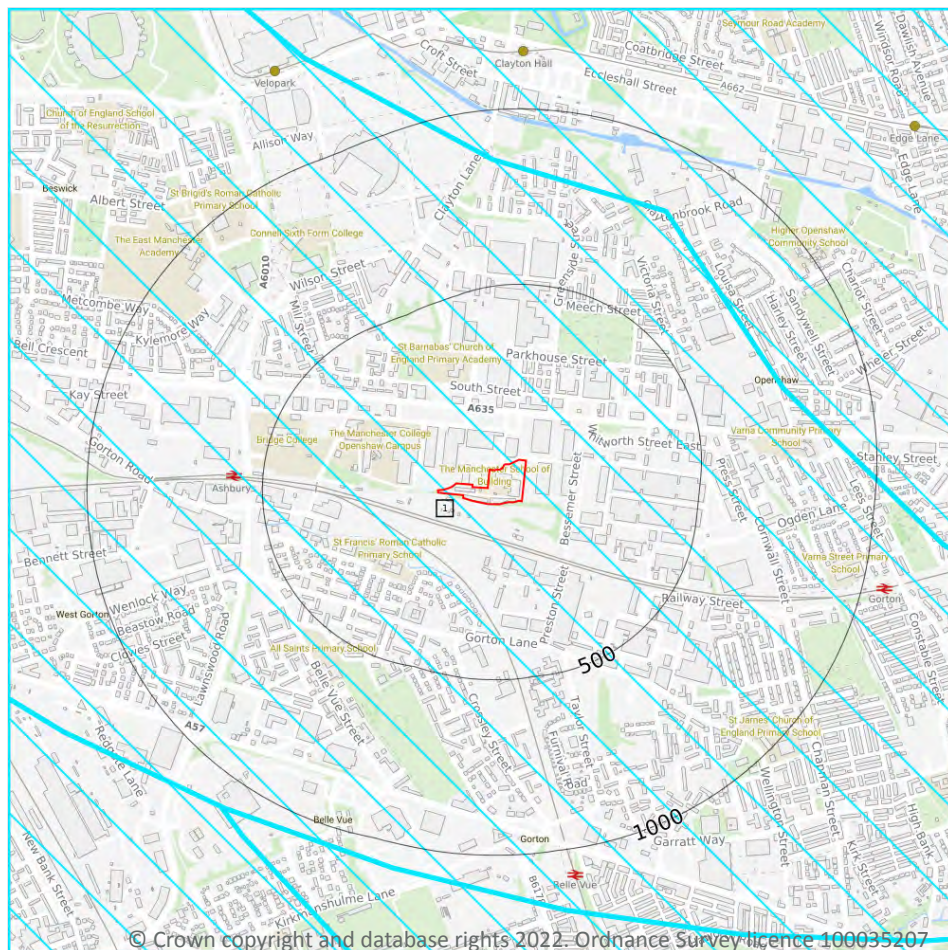
10.16 Nitrate Vulnerable Zones

Records within 2000m**0**

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.

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 100**

ID	Location	Type of developments requiring consultation
1	On site	<p>Infrastructure - Airports, helipads and other aviation proposals.</p> <p>Air pollution - Any industrial/agricultural development that could cause air pollution (incl: industrial processes, livestock & poultry units with floorspace > 500m², slurry lagoons & digestate stores > 750m², manure stores > 3500t).</p> <p>Combustion - General combustion processes >50mw energy input. incl: energy from waste incineration, other incineration, landfill gas generation plant, pyrolysis/gasification, anaerobic digestion, sewage treatment works, other incineration/ combustion.</p>

This data is sourced from Natural England.

10.18 SSSI Units

Records within 2000m	0
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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.

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

11 Visual and cultural designations

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

0

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.

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

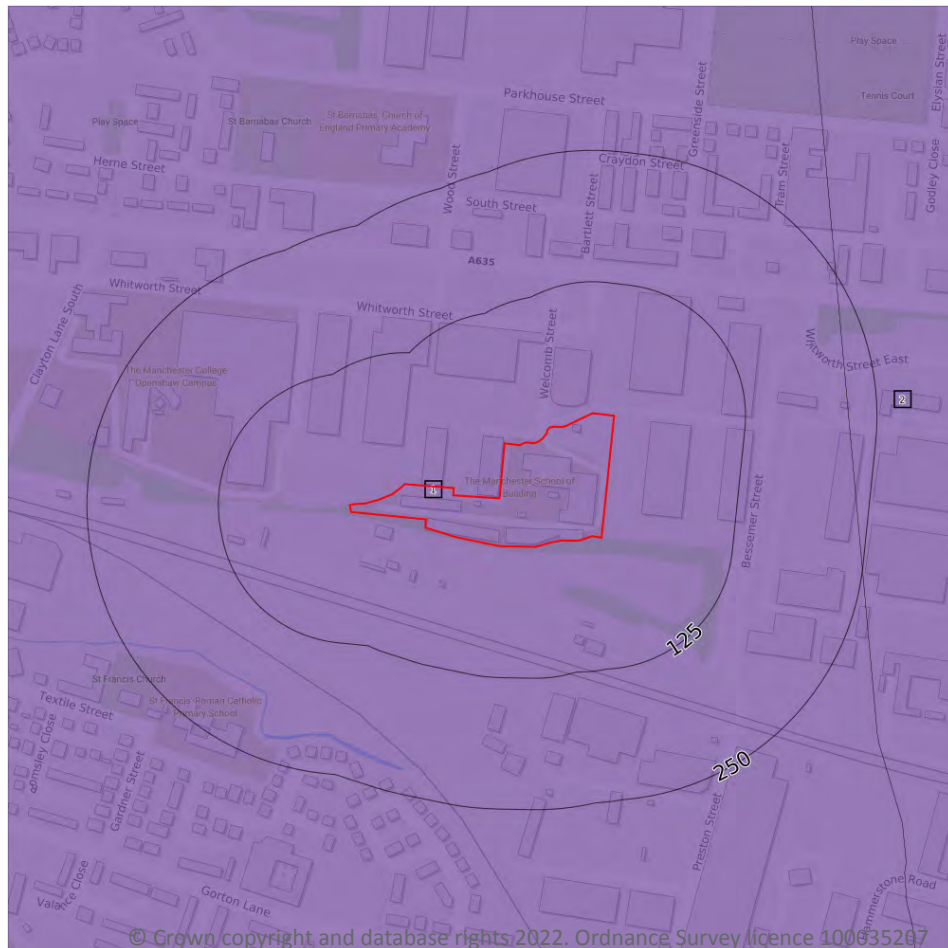
Records within 250m

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

2

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 104**

ID	Location	Classification	Description
1	On site	Urban	-
2	222m E	Urban	-

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

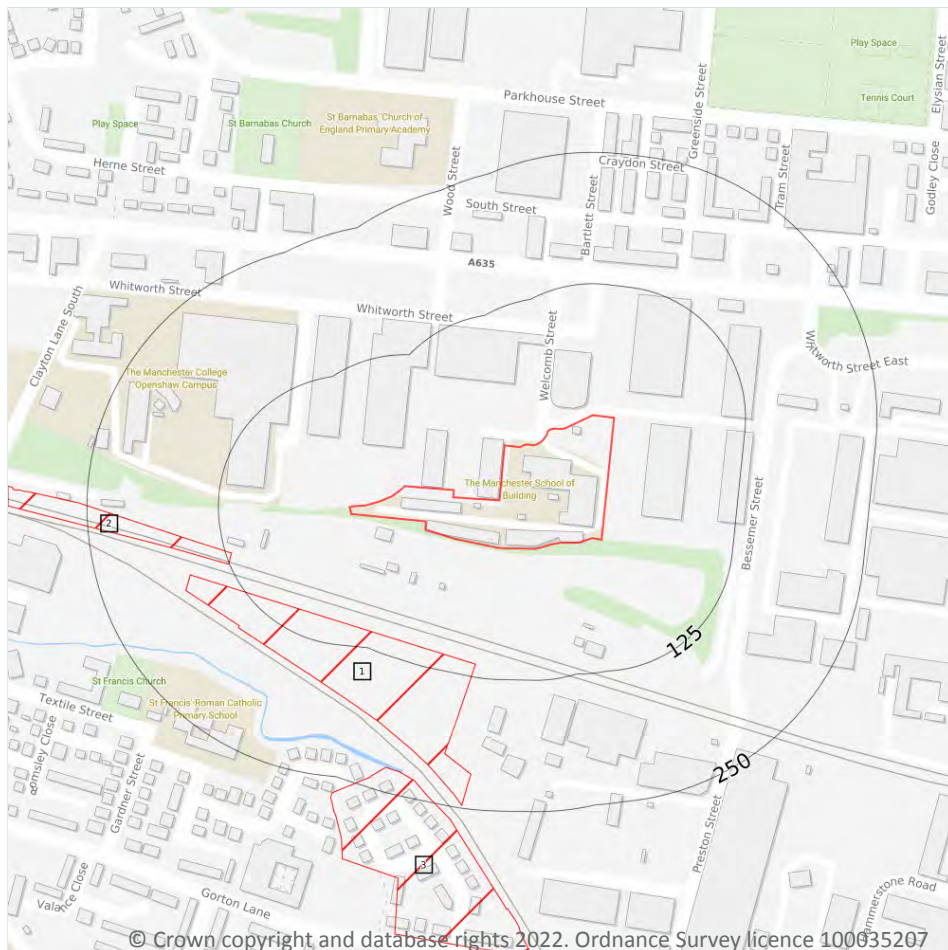
Records within 250m

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

0

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

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

3

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.

Features are displayed on the Habitat designations map on **page 106**

ID	Location	Site reference	Identification confidence	Primary source	Secondary source	Tertiary source
1	101m S	HLD_refs: EAHLD1655 2	Low	Environment Agency Historic Landfill Sites	UK Perspectives Aerial Photography	-
2	120m W	NLUD Ref: 421500611	Low	National Land Use Database - Previously Developed Land	UK Perspectives Aerial Photography	-
3	227m S	NLUD Ref: 421501613	Low	National Land Use Database - Previously Developed Land	UK Perspectives Aerial Photography	-

This data is sourced from Natural England.

13.4 Limestone Pavement Orders

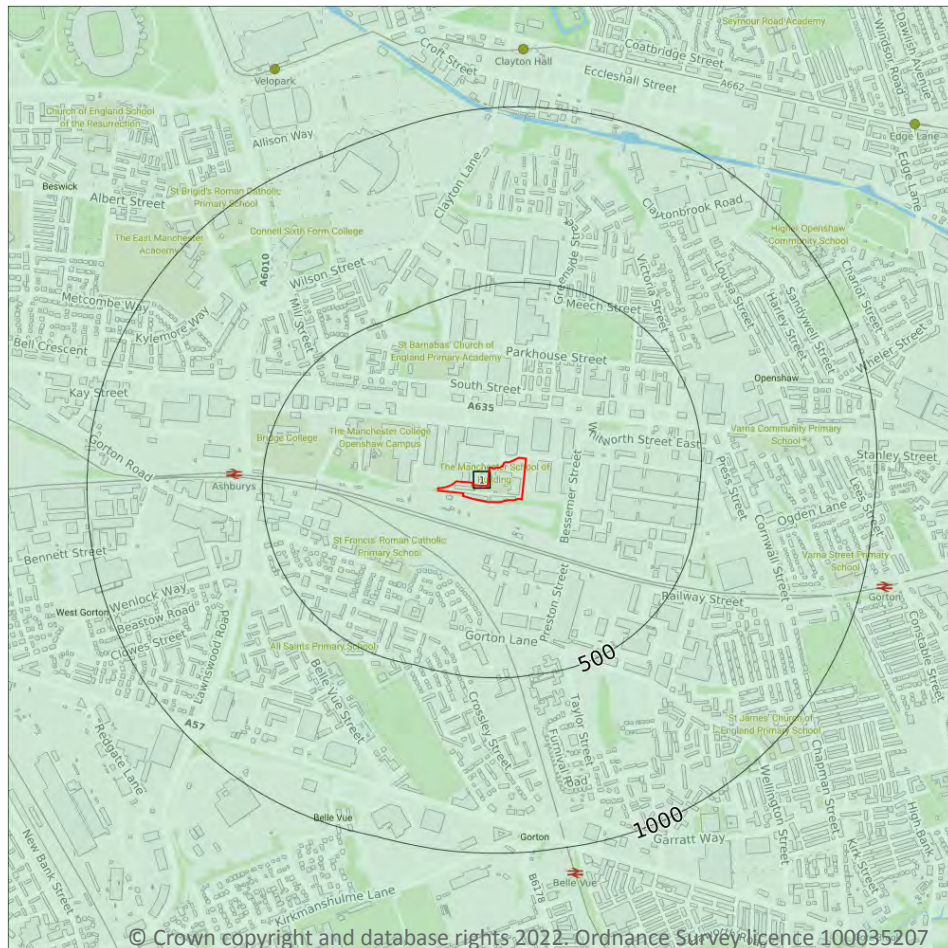
Records within 250m

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

1

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.

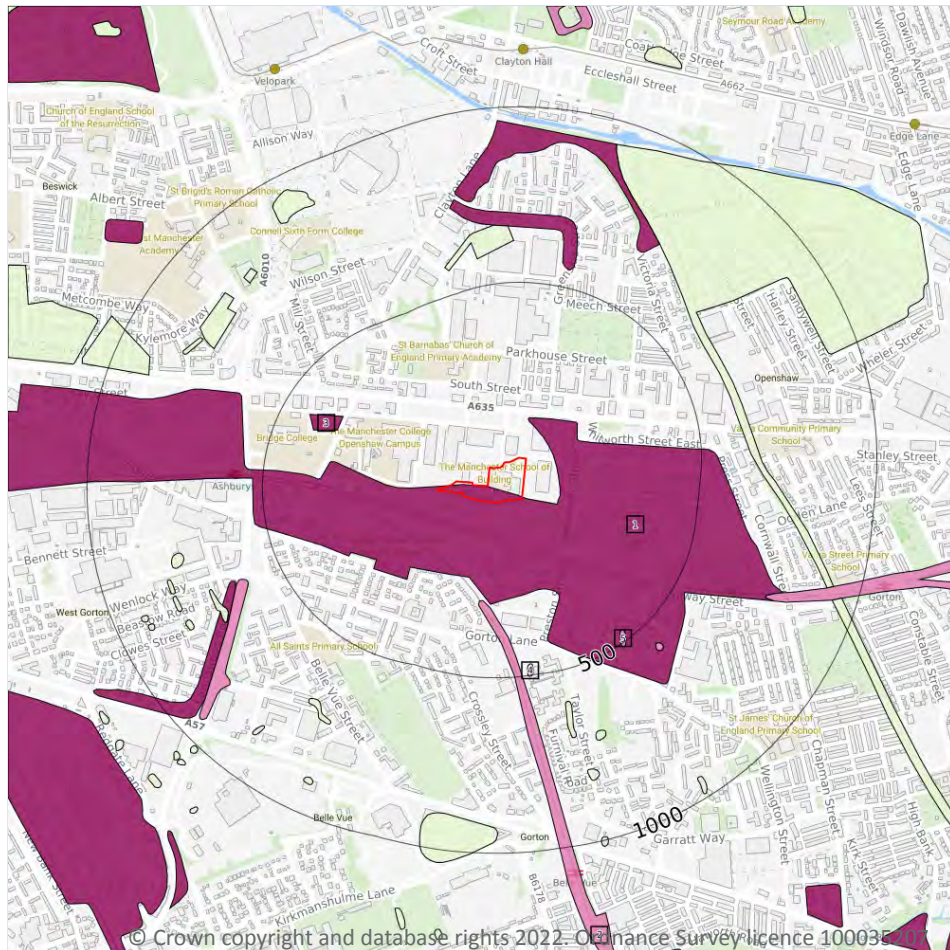
Features are displayed on the Geology 1:10,000 scale - Availability map on **page 108**

ID	Location	Artificial	Superficial	Bedrock	Mass movement	Sheet No.
1	On site	Full	Full	Full	Full	SJ89NE

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

5

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 109**

ID	Location	LEX Code	Description	Rock description
1	On site	MGR-ARTDP	Made Ground (Undivided)	Artificial Deposit
2	281m S	WGR-VOID	Worked Ground (Undivided)	Void
3	331m NW	MGR-ARTDP	Made Ground (Undivided)	Artificial Deposit
4	468m S	WMGR-ARTDP	Infilled Ground	Artificial Deposit

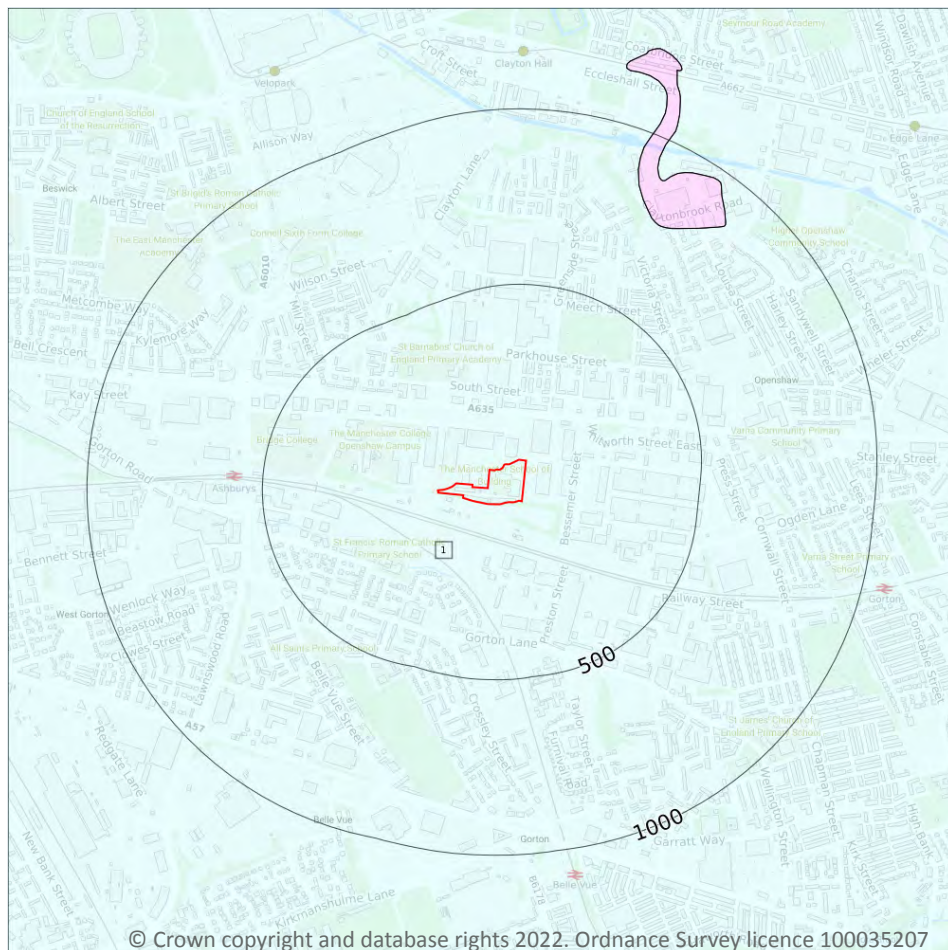


ID	Location	LEX Code	Description	Rock description
5	469m SE	WGR-VOID	Worked Ground (Undivided)	Void

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

1

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 111**

ID	Location	LEX Code	Description	Rock description
1	On site	TILLD-DMTN	Till, Devensian - Diamicton	Diamicton

This data is sourced from the British Geological Survey.



14.4 Landslip (10k)

Records within 500m

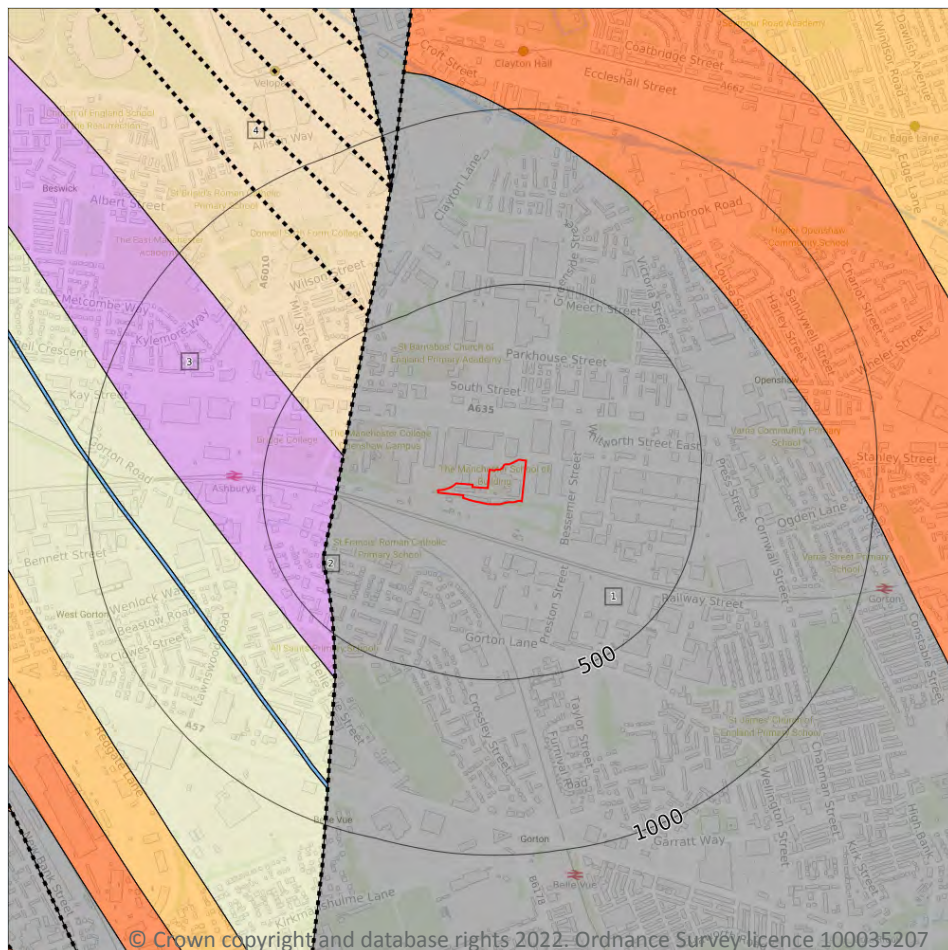
0

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

3

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 113**

ID	Location	LEX Code	Description	Rock age
1	On site	CPB-SDST	Chester Pebble Beds Formation - Sandstone	Early Triassic Epoch
3	283m W	ETM-STMD	Etruria Formation - Sandstone And Mudstone	Westphalian Age
4	287m W	PUCM-MDSS	Pennine Upper Coal Measures Formation - Mudstone, Siltstone And Sandstone	Westphalian D Sub-age - Bolssovian Sub-age

This data is sourced from the British Geological Survey.

14.6 Bedrock faults and other linear features (10k)

Records within 500m

1

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.

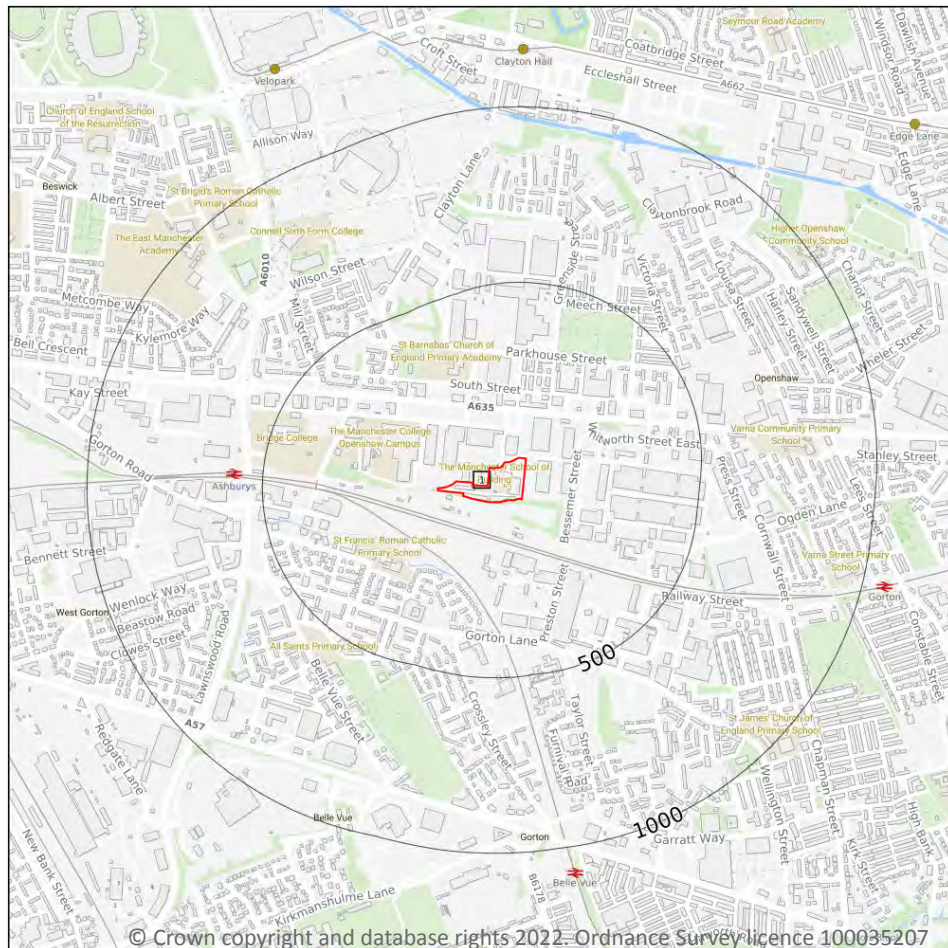
Features are displayed on the Geology 1:10,000 scale - Bedrock map on **page 113**

ID	Location	Category	Description
2	283m W	FAULT	Normal fault, inferred; crossmarks on downthrow side

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.

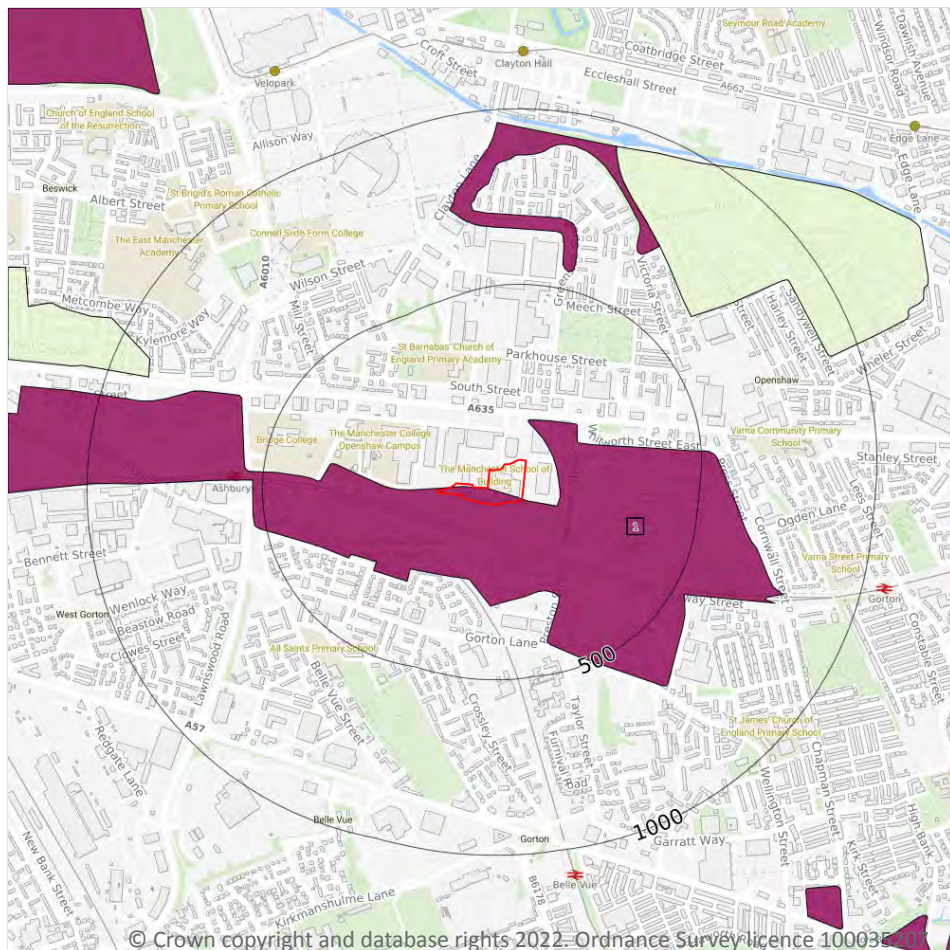
Features are displayed on the Geology 1:50,000 scale - Availability map on **page 115**

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



- Site Outline
- Search buffers in metres (m)
- Made ground
 - Worked ground
 - Infilled ground
 - Disturbed ground
 - Landscaped ground

15.2 Artificial and made ground (50k)

Records within 500m

1

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.

Features are displayed on the Geology 1:50,000 scale - Artificial and made ground map on **page 116**

ID	Location	LEX Code	Description	Rock description
1	On site	MGR-ARTDP	MADE GROUND (UNDIVIDED)	ARTIFICIAL DEPOSIT

This data is sourced from the British Geological Survey.

15.3 Artificial ground permeability (50k)

Records within 50m**1**

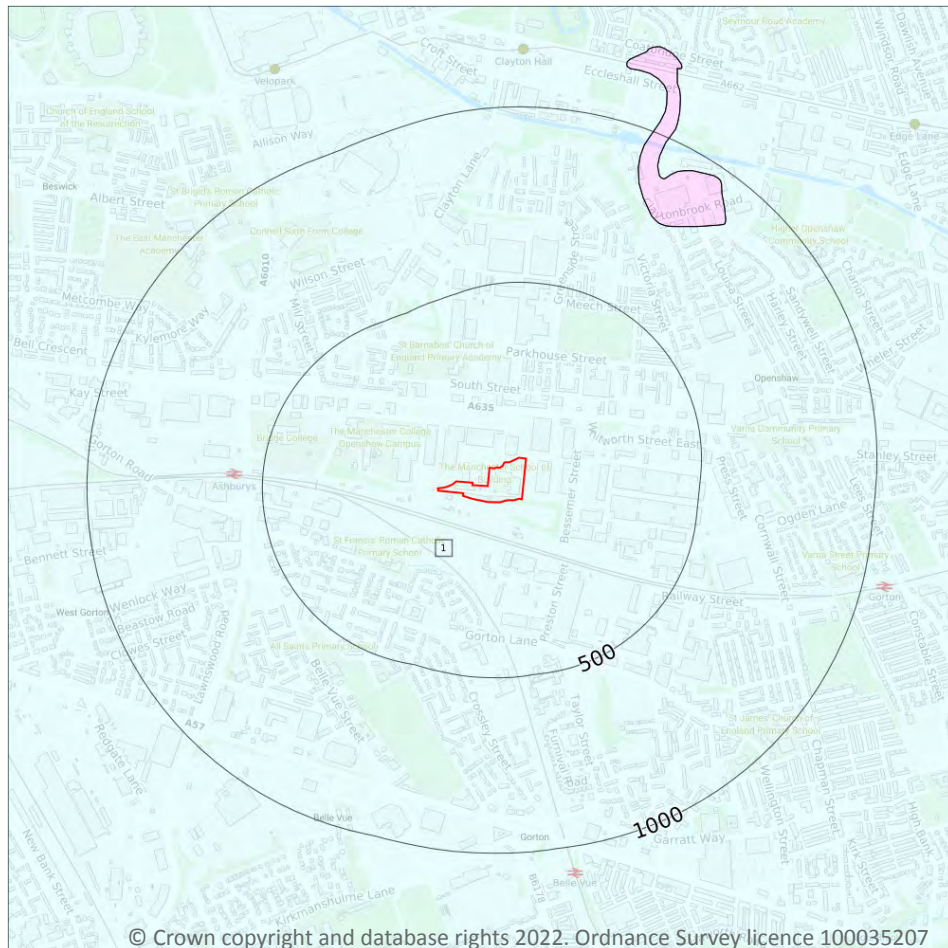
A qualitative classification of estimated rates of vertical movement of water from the ground surface through the unsaturated zone of any artificial deposits (the zone between the land surface and the water table).

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

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

1

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 118**

ID	Location	LEX Code	Description	Rock description
1	On site	TILLD-DMTN	TILL, DEVANSIAN	DIAMICTON

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.

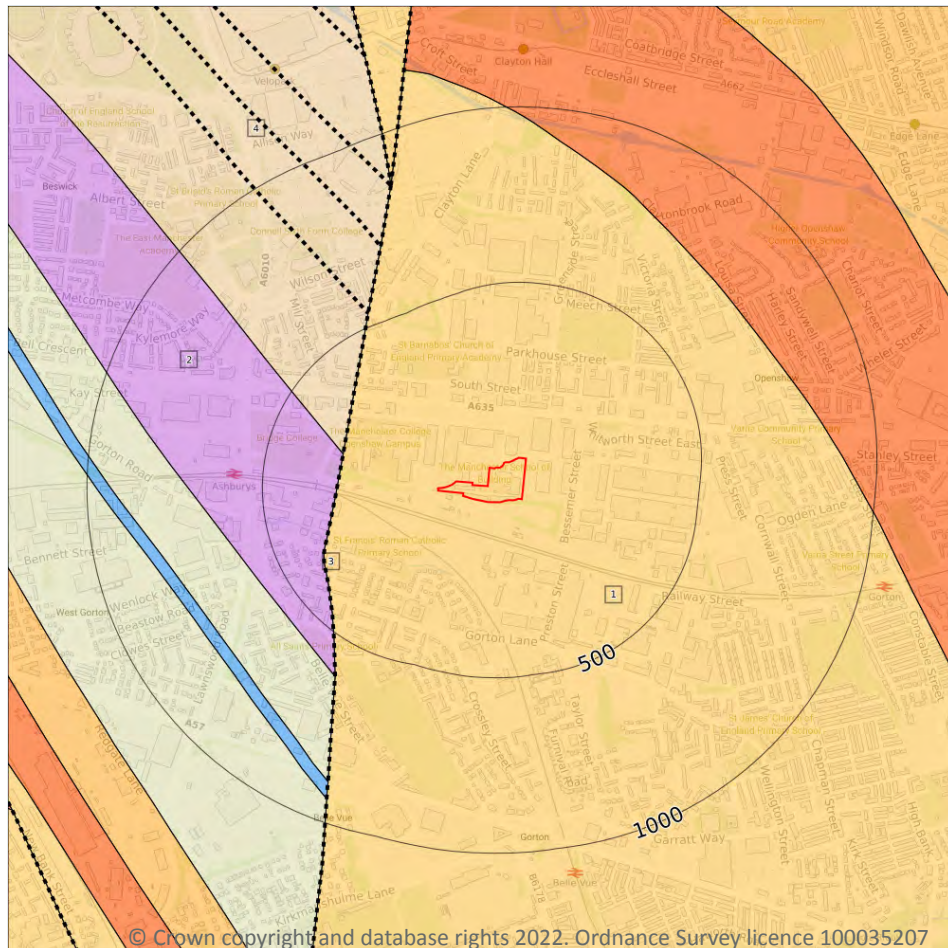
15.7 Landslip permeability (50k)

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

3

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 120**

ID	Location	LEX Code	Description	Rock age
1	On site	CHES-SDST	CHESTER FORMATION - SANDSTONE	OLENEKIAN
2	283m W	ETM-STMD	ETRURIA FORMATION - SANDSTONE AND MUDSTONE	WESTPHALIAN
4	287m W	PUCM-MDSS	PENNINE UPPER 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	Mixed	High	Moderate

This data is sourced from the British Geological Survey.

15.10 Bedrock faults and other linear features (50k)

Records within 500m

1

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.

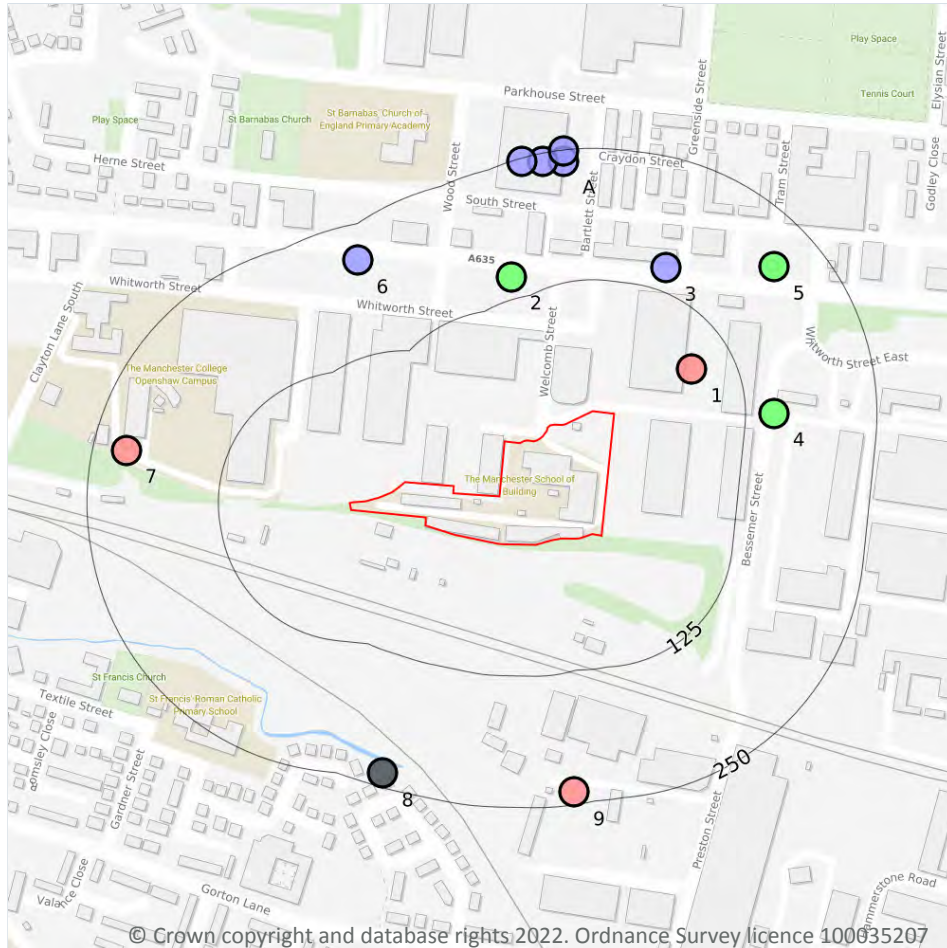
Features are displayed on the Geology 1:50,000 scale - Bedrock map on **page 120**

ID	Location	Category	Description
3	283m W	FAULT	Fault, inferred

This data is sourced from the British Geological Survey.



16 Boreholes



— Site Outline
Search buffers in metres (m)

- Confidential
- 0 - 10m
- 10 - 30m
- 30m+
- Unknown

16.1 BGS Boreholes

Records within 250m

13

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.

Features are displayed on the Boreholes map on **page 122**

ID	Location	Grid reference	Name	Length	Confidential	Web link
1	85m NE	388072 397342	ARMSTRONG WHITWORTH & CO.	76.2	N	936443
2	146m N	387900 397430	MANCHESTER 6	15.24	N	937537
3	148m N	388047 397439	MANCHESTER CORP. ASHTON OLD ROAD	7.32	N	936446

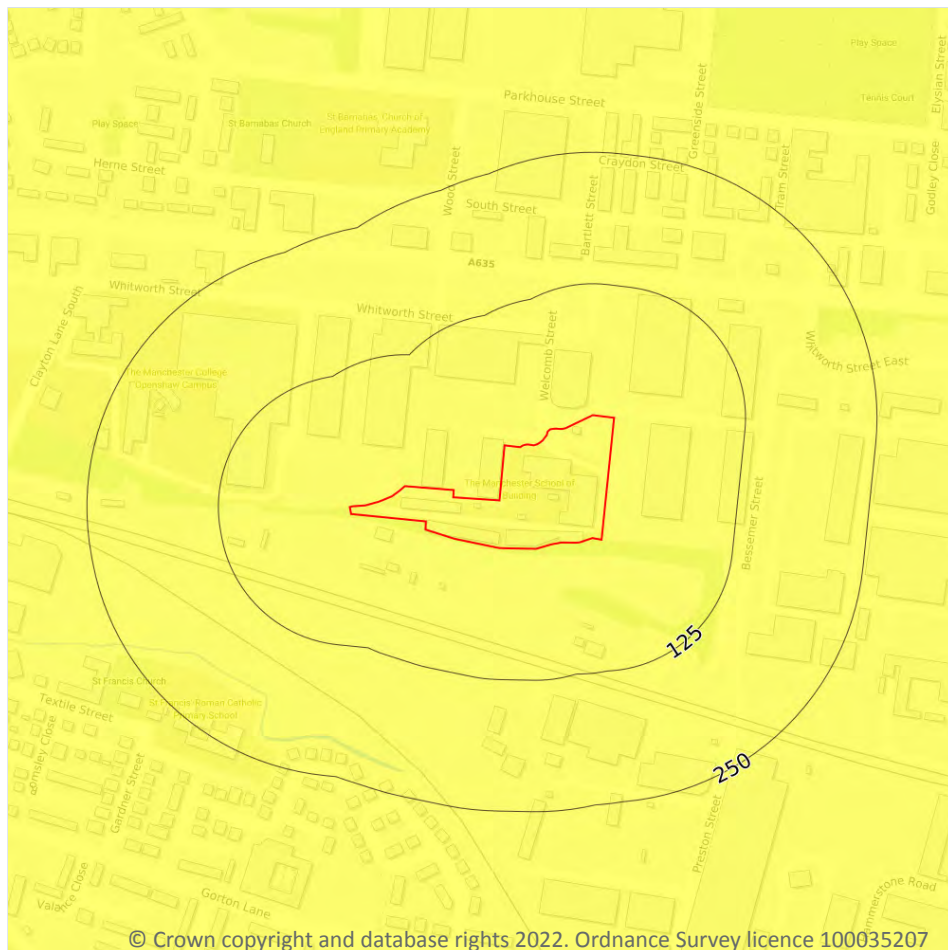


ID	Location	Grid reference	Name	Length	Confidential	Web link
4	152m E	388150 397300	MANCHESTER 8	10.82	N	937539
5	207m NE	388150 397440	MANCHESTER 7	16.3	N	937538
6	216m N	387754 397446	BORING AT CHURCH STREET, OPENSHAW	-2.0	N	936550
7	219m W	387534 397265	ARMSTRONG WHITWORTH & CO.	33.53	N	936444
8	237m S	387778 396958	GORTON LANE DEMOLITIONS 1	-	Y	N/A
9	238m S	387960 396940	R M C READYMIX, GORTON	54.0	N	12830926
A	239m N	387950 397540	PARKHOUSE STREET TP 15	2.7	N	937171
A	243m N	387930 397540	PARKHOUSE STREET TP 14	2.2	N	937170
A	247m N	387910 397540	PARKHOUSE STREET TP 13	2.65	N	937169
A	249m N	387950 397550	PARKHOUSE STREET TP 10	1.9	N	937166

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).

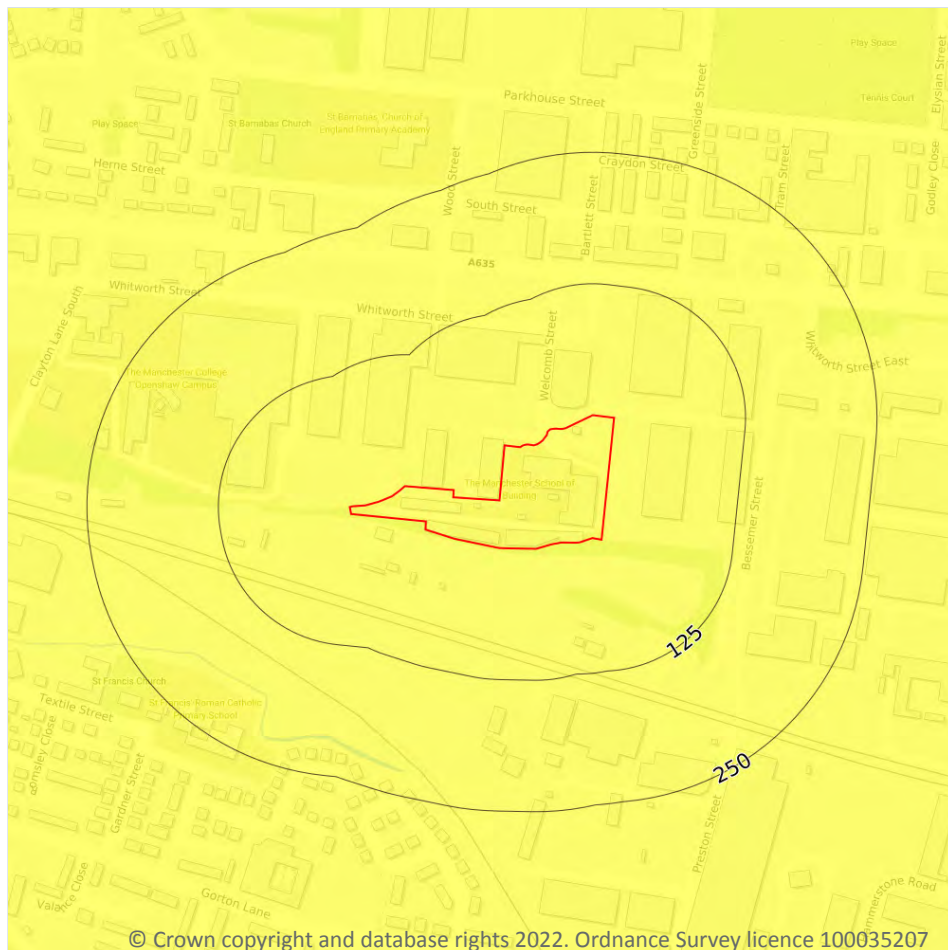
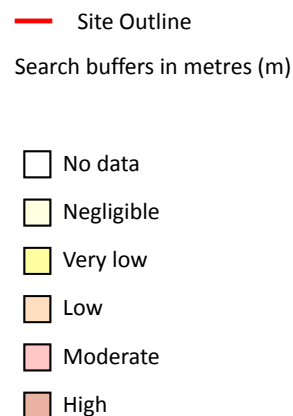
Features are displayed on the Natural ground subsidence - Shrink swell clays map on **page 124**

Location	Hazard rating	Details
On site	Very low	Ground conditions predominantly low plasticity.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Running sands



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.

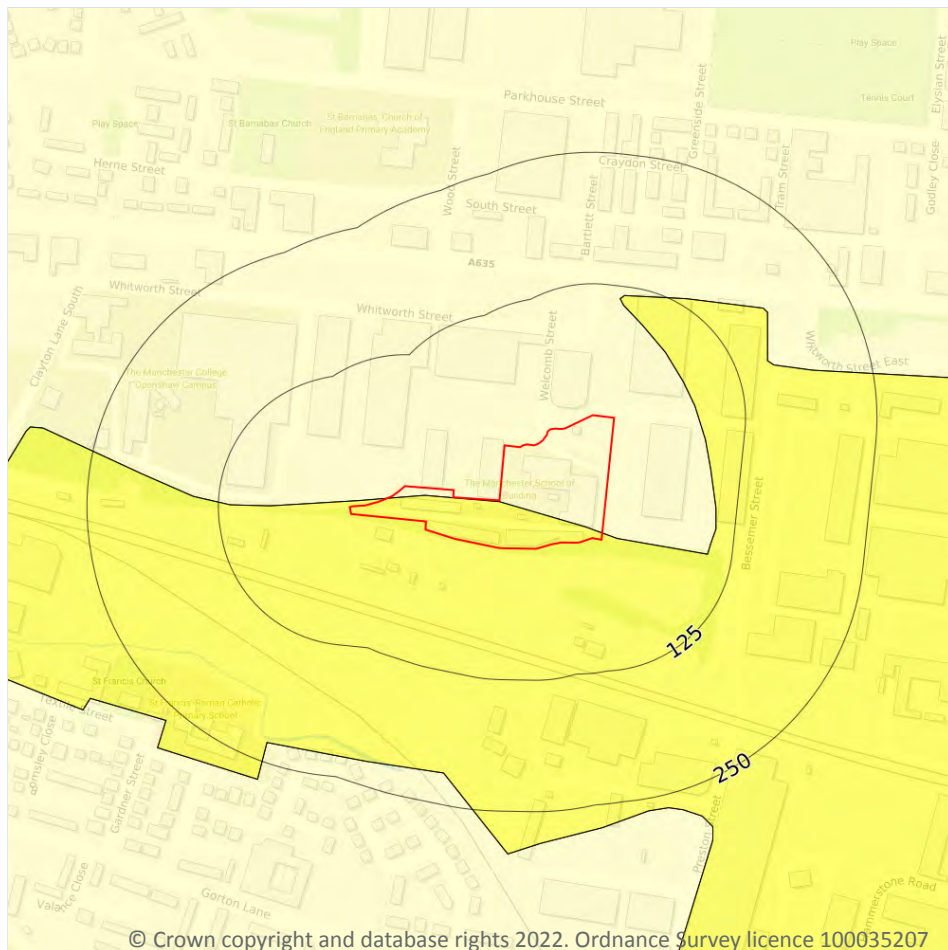
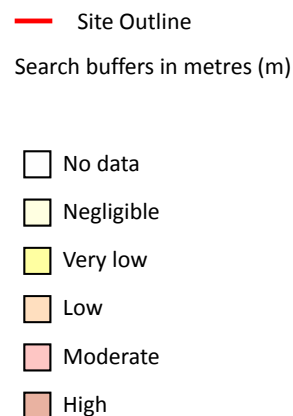
Features are displayed on the Natural ground subsidence - Running sands map on **page 125**

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



17.3 Compressible deposits

Records within 50m

2

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.

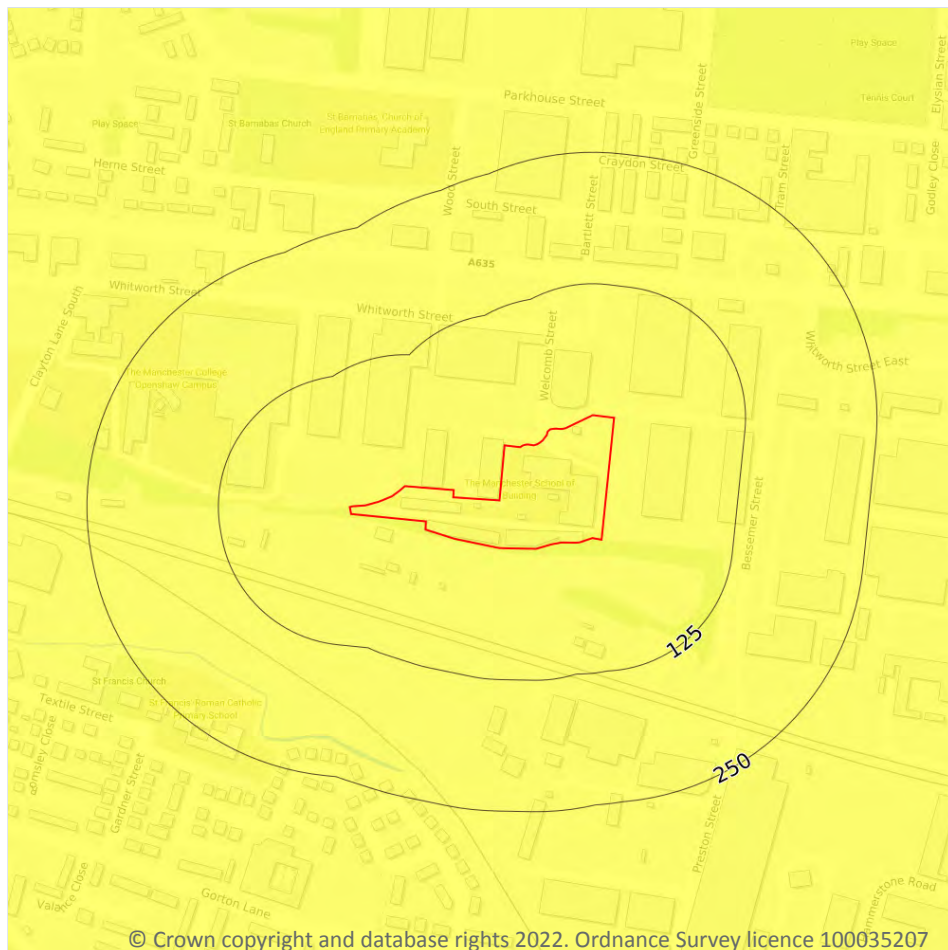
Features are displayed on the Natural ground subsidence - Compressible deposits map on **page 126**

Location	Hazard rating	Details
On site	Negligible	Compressible strata are not thought to occur.
On site	Very low	Compressibility and uneven settlement problems are not likely to be significant on the site for most land uses.

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

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.

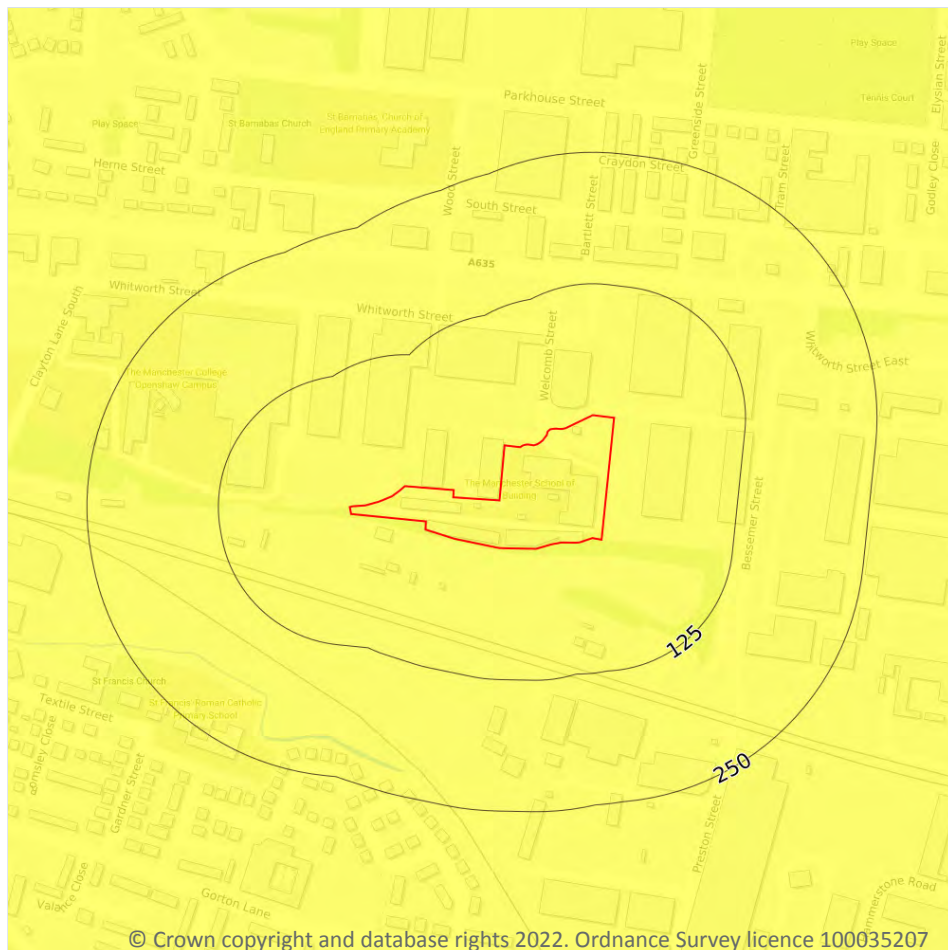
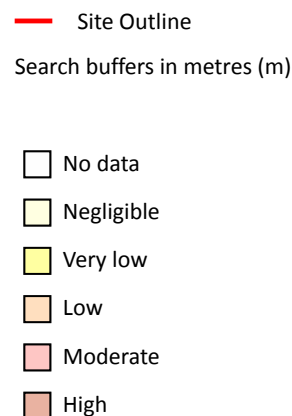
Features are displayed on the Natural ground subsidence - Collapsible deposits map on **page 128**

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



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.

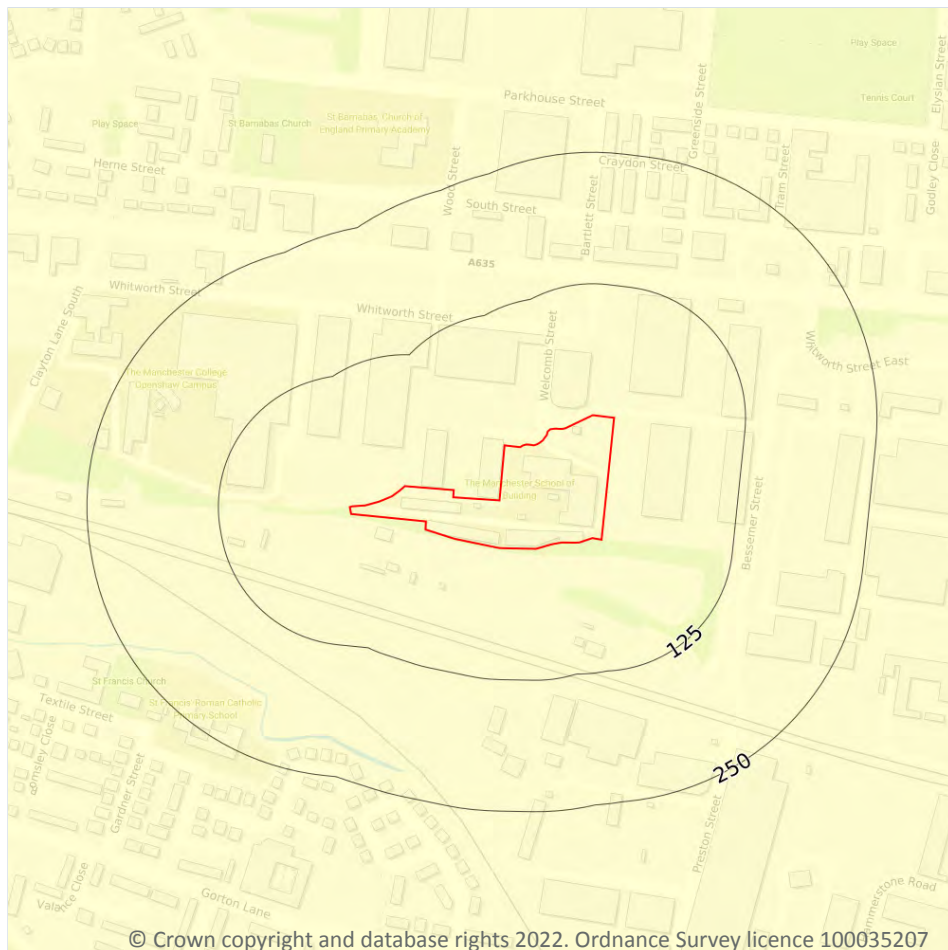
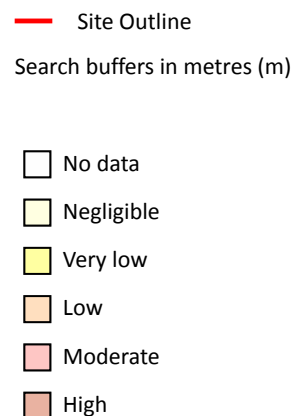
Features are displayed on the Natural ground subsidence - Landslides map on **page 129**

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



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.

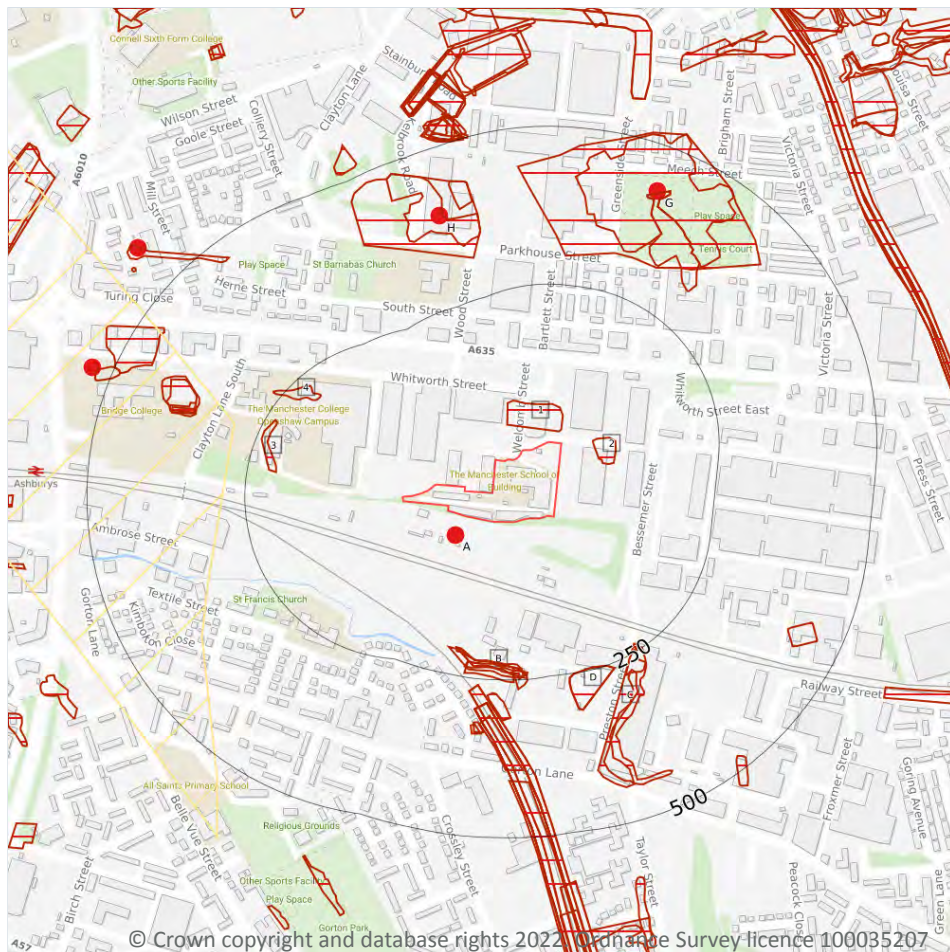
Features are displayed on the Natural ground subsidence - Ground dissolution of soluble rocks map on **page 130**

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, ground workings and natural cavities



- Site Outline
- Search buffers in metres (m)
- Natural cavities (Area)
- Natural cavities (Point)
- BritPits
- Surface ground workings
- Underground workings
- Historical Mineral Planning Areas
- Mining Cavities
- 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 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.

18.2 BritPits

Records within 500m

4

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.

Features are displayed on the Mining, ground workings and natural cavities map on **page 132**

ID	Location	Details	Description
A	33m S	Name: Ashbury Rail Depot Address: West Gorton, MANCHESTER, Lancashire Commodity: Crushed Rock Status: Active	Type: A site where mineral commodities are unloaded from rail trucks and stored Status description: Site which is actively extracting mineral products, or in the case of wharfs and rail depots, is actively handing minerals
A	33m S	Name: Ashbury Rail Depot Address: West Gorton, MANCHESTER, Lancashire Commodity: Secondary Status: Active	Type: Recycled material, construction and demolition materials recovered for use as secondary aggregates Status description: Site which is actively extracting mineral products, or in the case of wharfs and rail depots, is actively handing minerals
H	394m N	Name: North Street Brick Works Address: Openshaw, MANCHESTER, Lancashire Commodity: Clay & Shale Status: Ceased	Type: A surface mineral working. It may be termed Quarry, Sand Pit, Clay Pit or Opencast Coal Site Status description: Site which, at date of entry, has ceased to extract minerals. May be considered as Closed by operator. May be considered to have Active, Dormant or Expired planning permissions by Mineral Planning Authority
G	428m N	Name: Openshaw Brick Works Address: Openshaw, MANCHESTER, Lancashire Commodity: Clay & Shale Status: Ceased	Type: A surface mineral working. It may be termed Quarry, Sand Pit, Clay Pit or Opencast Coal Site Status description: Site which, at date of entry, has ceased to extract minerals. May be considered as Closed by operator. May be considered to have Active, Dormant or Expired planning permissions by Mineral Planning Authority

This data is sourced from the British Geological Survey.

18.3 Surface ground workings

Records within 250m

14

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, ground workings and natural cavities map on **page 132**



ID	Location	Land Use	Year of mapping	Mapping scale
1	19m N	Unspecified Pit	1890	1:10560
2	50m E	Unspecified Pit	1890	1:10560
3	204m W	Refuse Heap	1956	1:10560
4	205m NW	Pond	1851	1:10560
B	206m S	Unspecified Pit	1968	1:10560
B	206m S	Unspecified Pit	1978	1:10000
B	208m S	Unspecified Pit	1956	1:10560
B	221m S	Unspecified Ground Workings	1923	1:10560
B	225m S	Cuttings	1934	1:10560
B	234m S	Unspecified Pit	1934	1:10560
C	238m SE	Unspecified Ground Workings	1923	1:10560
C	244m SE	Unspecified Ground Workings	1905	1:10560
D	246m S	Unspecified Heap	1968	1:10560
D	246m S	Unspecified Heap	1956	1:10560

This is data is sourced from Ordnance Survey/Groundsure.

18.4 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 is data is sourced from Ordnance Survey/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

1

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).

Features are displayed on the Mining, ground workings and natural cavities map on **page 132**

ID	Location	Name	Commodity	Class	Likelihood
5	282m W	Not available	Vein Mineral	A	Sporadic underground mining of restricted extent may have occurred. Potential for difficult ground conditions are unlikely and localised and are at a level where they need not be considered

This data is sourced from the British Geological Survey.

18.7 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.

18.8 JPB mining areas

Records on site

1

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

Location	Details
On site	In addition to being located inside an area where The Coal Authority have information on coal mining activities, Johnson Poole & Bloomer (JPB) have information such as mining plans and maps held within their archive of mining activities that have occurred within 1km of this property which may supplement this information. Please note, the plans held by JPB may also relate to non-mining records. Further details and a quote for services (if appropriate) can be obtained by emailing this report to enquiries.gs@jpb.co.uk.

This data is sourced from Johnson Poole and Bloomer.



18.9 Coal mining

Records on site	1
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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.

18.10 Brine areas

Records on site	0
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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.

18.11 Gypsum areas

Records on site	0
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Generalised areas that may be affected by gypsum extraction.

This data is sourced from British Gypsum.

18.12 Tin mining

Records on site	0
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Generalised areas that may be affected by historical tin mining.

This data is sourced from Groundsure.

18.13 Clay mining

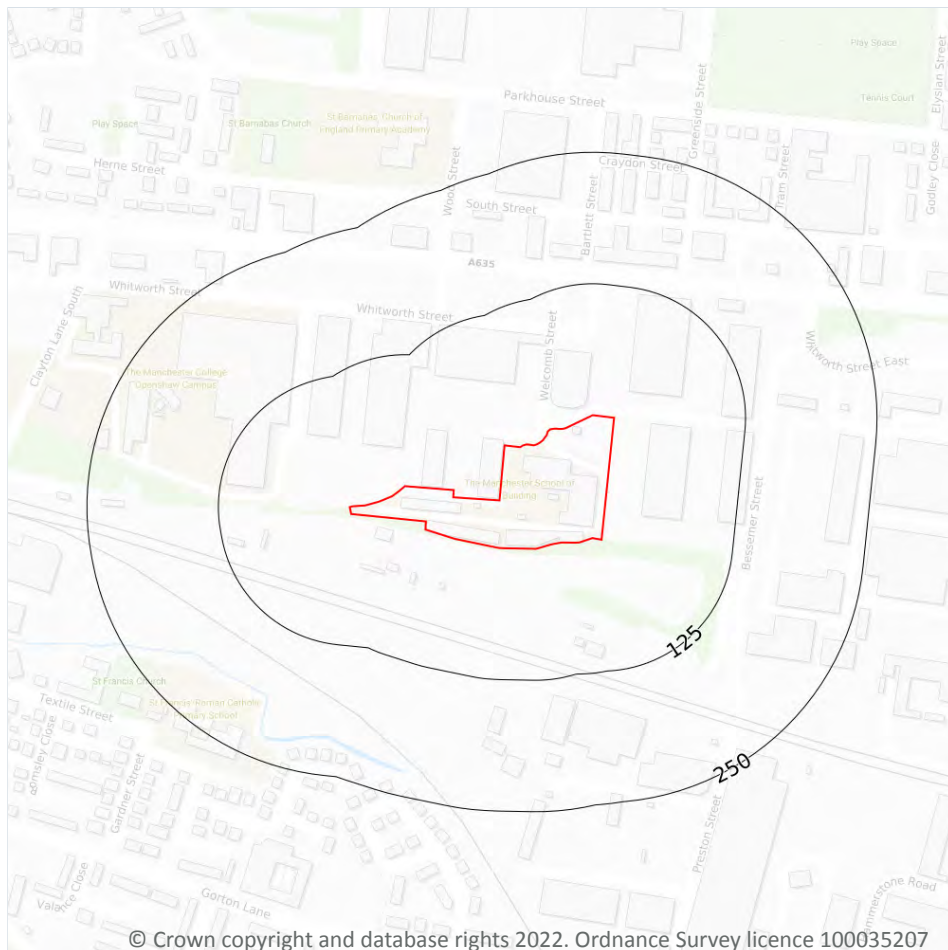
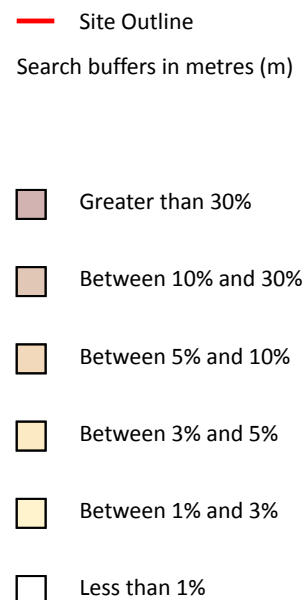
Records on site	0
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Generalised areas that may be affected by kaolin and ball clay extraction.

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



19 Radon



19.1 Radon

Records on site

1

Estimated percentage of dwellings exceeding the Radon Action Level. This data is the highest resolution radon dataset available for the UK and is produced to a 75m level of accuracy to allow for geological data accuracy and a 'residential property' buffer. The findings of this section should supersede any estimations derived from the Indicative Atlas of Radon in Great Britain. The data was derived from both geological assessments and long term measurements of radon in more than 479,000 households.

Features are displayed on the Radon map on **page 137**

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

This data is sourced from the British Geological Survey and Public Health England.



20 Soil chemistry

20.1 BGS Estimated Background Soil Chemistry

Records within 50m

3

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	200 - 300 mg/kg	120 - 240 mg/kg	1.8 mg/kg	60 - 90 mg/kg	30 - 45 mg/kg
2m E	15 - 25 mg/kg	No data	200 - 300 mg/kg	120 - 240 mg/kg	1.8 mg/kg	60 - 90 mg/kg	30 - 45 mg/kg
2m E	15 - 25 mg/kg	No data	200 - 300 mg/kg	120 - 240 mg/kg	1.8 mg/kg	60 - 90 mg/kg	30 - 45 mg/kg

This data is sourced from the British Geological Survey.

20.2 BGS Estimated Urban Soil Chemistry

Records within 50m

13

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).

Location	Arsenic (mg/kg)	Bioaccessible Arsenic (mg/kg)	Lead (mg/kg)	Bioaccessible Lead (mg/kg)	Cadmium (mg/kg)	Chromium (mg/kg)	Copper (mg/kg)	Nickel (mg/kg)	Tin (mg/kg)
On site	15	2.6	51	35	0.3	85	27	29	3
On site	15	2.6	54	37	0.3	98	22	31	6
On site	15	2.6	33	23	0.3	104	11	32	2
On site	16	2.8	61	42	0.3	85	30	27	4



Location	Arsenic (mg/kg)	Bioaccessible Arsenic (mg/kg)	Lead (mg/kg)	Bioaccessible Lead (mg/kg)	Cadmium (mg/kg)	Chromium (mg/kg)	Copper (mg/kg)	Nickel (mg/kg)	Tin (mg/kg)
On site	16	2.8	53	36	0.3	94	23	29	5
On site	17	3	54	37	0.3	88	27	30	3
2m E	18	3.2	111	76	0.3	71	44	24	9
2m NE	18	3.2	103	71	0.3	71	41	26	7
3m SW	16	2.8	36	25	0.3	94	12	30	2
12m SE	16	2.8	108	74	0.3	75	47	25	10
26m NW	15	2.6	54	37	0.3	106	22	32	6
47m W	14	2.5	35	24	0.3	100	20	33	3
49m W	15	2.6	39	27	0.3	95	12	34	3

This data is sourced from the British Geological Survey.

20.3 BGS Measured Urban Soil Chemistry

Records within 50m

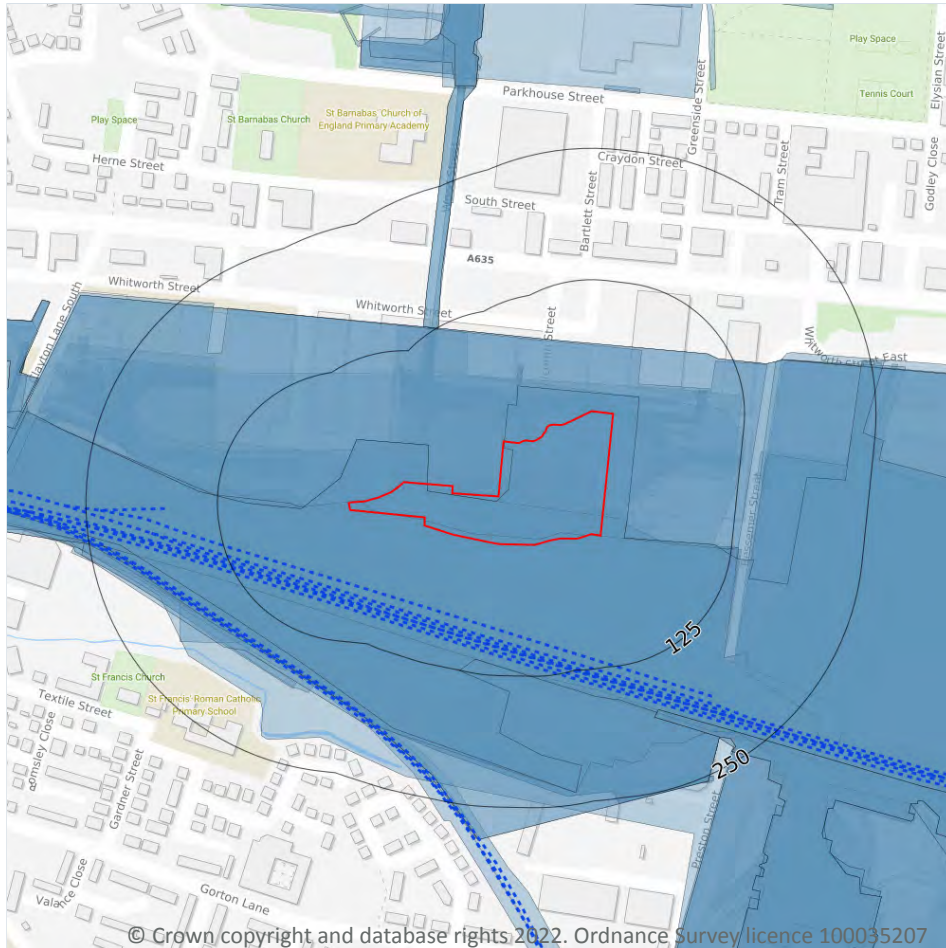
0

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.



21 Railway infrastructure and projects



- Site Outline
- Search buffers in metres (m)**
- C1 Crossrail 1 Stations
- Crossrail 1 Route
- Crossrail 1 Worksites
- C2 Crossrail 2 Stations
- Crossrail 2 Route
- Crossrail 2 Worksites
- Crossrail 2 Safeguarding
- Crossrail 2 Headhouses
- Railway stations
- Active railways
- Active tunnels
- Abandoned railways
- Historic railways
- Historic tunnels
- Underground stations
- Underground Lines
- Royal Mail tunnels
- HS2 optimised route
- HS2 Stations
- HS2 Depots
- HS2 Surface Safeguarding
- HS2 Subsurface Safeguarding

21.1 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.

21.2 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.

21.3 Railway tunnels

Records within 250m

0

Railway tunnels taken from contemporary Ordnance Survey mapping.

This data is sourced from the Ordnance Survey.

21.4 Historical railway and tunnel features

Records within 250m

77

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.

Features are displayed on the Railway infrastructure and projects map on **page 140**

Location	Land Use	Year of mapping	Mapping scale
On site	Railway Sidings	1893	2500
On site	Railway Sidings	1908	2500
On site	Railway Sidings	1922	2500
On site	Railway Sidings	1933	2500
On site	Railway Sidings	1949	1250
On site	Railway Sidings	1963	1250
On site	Railway Sidings	1963	2500
On site	Railway Sidings	1980	1250
On site	Tramway Sidings	1922	2500
On site	Tramway Sidings	1933	2500
On site	Railway	1908	-
On site	Railway Sidings	1938	10560
On site	Railway Sidings	1934	10560
On site	Railway Sidings	1915	10560
On site	Railway Sidings	1905	10560
On site	Railway Sidings	1890	10560
On site	Railway Sidings	1985	10000



Location	Land Use	Year of mapping	Mapping scale
On site	Railway Sidings	1978	10000
On site	Railway Sidings	1991	10000
On site	Railway Sidings	1923	10560
On site	Railway Sidings	1968	10560
2m S	Railway Sidings	1991	1250
3m S	Railway Sidings	1996	1250
3m NE	Railway Sidings	1949	1250
5m S	Railway	1893	-
6m E	Railway Sidings	1963	1250
9m S	Railway Sidings	1891	500
10m E	Railway Sidings	1949	1250
13m E	Railway Sidings	1949	1250
23m S	Railway Sidings	1949	1250
23m S	Railway Sidings	1963	1250
42m S	Railway Sidings	1994	1250
42m S	Railway Sidings	1978	1250
43m S	Railway Sidings	1980	1250
43m S	Railway Sidings	1991	1250
69m S	Railway Sidings	1978	1250
69m S	Railway Sidings	1980	1250
77m S	Railway Sidings	1978	1250
86m SW	Railway Sidings	1891	500
89m SW	Railway Sidings	1893	2500
89m S	Railway Sidings	1980	1250
110m S	Railway Sidings	1949	1250
110m S	Railway Sidings	1963	1250
116m S	Railway Sidings	1893	2500
116m S	Railway Sidings	1933	2500



Location	Land Use	Year of mapping	Mapping scale
121m S	Railway Sidings	1891	500
124m NW	Railway Sidings	1938	10560
131m S	Railway Sidings	1980	1250
136m W	Tramway Sidings	1891	500
139m NW	Tramway Sidings	1891	500
144m E	Railways	1908	-
146m E	Railway	1893	-
174m S	Railway Sidings	1938	10560
174m S	Railway Sidings	1934	10560
176m S	Railway Sidings	1960	2500
176m S	Railway Sidings	1893	2500
176m S	Railway Sidings	1949	1250
184m S	Railway Sidings	1949	1250
201m S	Railway Sidings	1891	500
205m S	Railway Sidings	1891	500
218m SE	Railway Sidings	1973	1250
219m SE	Railway Sidings	1950	1250
219m SE	Railway Sidings	1950	2500
231m NW	Railway Sidings	1956	1250
236m W	Railway Sidings	1891	500
246m W	Railway Sidings	1948	1250
246m W	Railway Sidings	1957	1250
247m W	Railway Sidings	1994	1250
247m W	Railway Sidings	1996	1250
247m W	Railway Sidings	1995	1250
247m W	Railway Sidings	1948	1250
247m W	Railway Sidings	1957	1250
247m W	Railway Sidings	1990	1250



Location	Land Use	Year of mapping	Mapping scale
247m W	Railway Sidings	1948	1250
247m W	Railway Sidings	1957	1250
248m W	Railway Sidings	1980	1250
248m W	Railway Sidings	1980	1250

This data is sourced from Ordnance Survey/Groundsure.

21.5 Royal Mail tunnels

Records within 250m	0
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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.

21.6 Historical railways

Records within 250m	0
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Former railway lines, including dismantled lines, abandoned lines, disused lines, historic railways and razed lines.

This data is sourced from OpenStreetMap.

21.7 Railways

Records within 250m	11
----------------------------	-----------

Currently existing railway lines, including standard railways, narrow gauge, funicular, trams and light railways. Features are displayed on the Railway infrastructure and projects map on **page 140**

Location	Name	Type
67m S		rail
76m S		rail
79m S		rail
83m S		rail
84m S	Not given	Multi Track

Location	Name	Type
86m S	Hadfield and Ardwick Junction Line	rail
90m S	Hadfield and Ardwick Junction Line	rail
154m SW	Hope Valley Line	rail
156m SW	Not given	Multi Track
158m SW	Hope Valley Line	rail
175m W		rail

This data is sourced from Ordnance Survey and OpenStreetMap.

21.8 Crossrail 1

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

The Crossrail railway project links 41 stations over 100 kilometres from Reading and Heathrow in the west, through underground sections in central London, to Shenfield and Abbey Wood in the east.

This data is sourced from publicly available information by Groundsure.

21.9 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.

21.10 HS2

Records within 500m	0
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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.

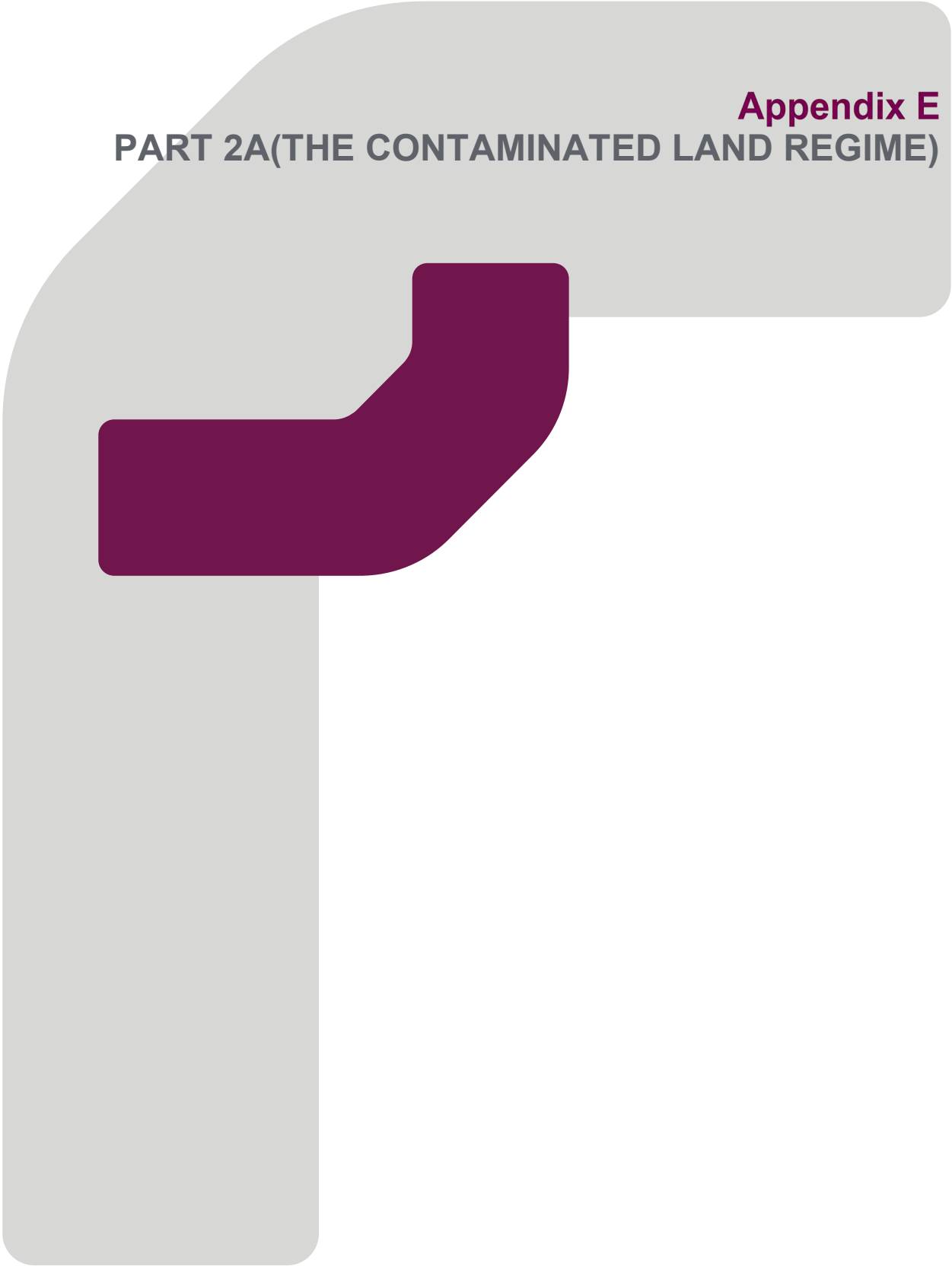
Data providers

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: <https://www.groundsure.com/terms-and-conditions-jan-2020/>.





Appendix E

PART 2A(THE CONTAMINATED LAND REGIME)

Contaminated Land Definition

Under Section 57 of the Environmental Act 1995, Part 2A was inserted into the Environmental Protection Act 1990 to include provisions for the management of contaminated land.

Subsequent regulations were first implemented in England in April 2000, Scotland in July 2000 and Wales in July 2001¹, providing a definition of 'contaminated land' and setting out the nature of liabilities that can be incurred by owners of contaminated land and groundwater.

According to the Act, contaminated land is defined as 'any land which appears to the local authority in whose area the land is situated to be in such a condition, by reason of substances in, on or under the land that:

- *significant harm* is being caused or there is a *significant possibility* of such harm being caused; or
- *significant pollution* of controlled waters² is being caused or there is a significant possibility of such pollution being caused³

The guidance on determining whether a particular possibility is significant is based on the principles of risk assessment and in particular on considerations of the magnitude or consequences of the different types of significant harm caused. The term 'possibility of significant harm being caused' should be taken, as referring to a measure of the probability, or frequency, of the occurrence of circumstances that could lead to significant harm being caused.

The following situations are defined where harm is to be regarded as significant:

- Chronic or acute toxic effect, serious injury or death to humans
- Irreversible or other adverse harm to the ecological system
- Substantial damage to, or failure of, buildings
- Disease, other physical damage or death of livestock or crops
- The pollution of controlled waters⁴.

With regard to radioactivity, contaminated land is defined as 'any land which appears to be in such a condition, by reason of substances in, on or under the land that harm is being caused, or there is a *significant possibility of such harm being caused*⁵'.

The Risk Assessment Methodology

Risk assessment is the process of collating known information on a hazard or set of hazards in order to estimate actual or potential risks to receptors. The receptor may be humans, a water resource, a sensitive local ecosystem or future construction materials. Receptors can be connected with the hazard via one or several exposure pathways (e.g. the pathway of direct contact). Risks are generally managed by isolating or removing the hazard, isolating the receptor, or by intercepting the exposure pathway. Without the three

¹ In England by The Contaminated Land (England) Regulations 2000, updated by The Contaminated Land (England) (Amendment) Regulations 2012; in Scotland by The Contaminated Land (Scotland) Regulations 2000, updated by the Contaminated Land (Scotland) Regulations 2005; and in Wales by The Contaminated Land (Wales) Regulations 2001, updated by the Contaminated Land (Wales) Regulations 2006.

² In Scotland the term "controlled water" has been updated to "water environment" under the Contaminated Land (Scotland) Regulations 2005 in line with the Water Environment and Water Services (Scotland) Act 2003.

³ The definition was amended in 2012 by implementation of the Water Act 2003.

⁴ Groundwater in this context does not include waters within underground strata but above the saturated zone.

⁵ The Radioactive Contaminated Land (Modification of Enactments) (England) Regulations 2006 and Contaminated Land (Wales) Regulations 2006.

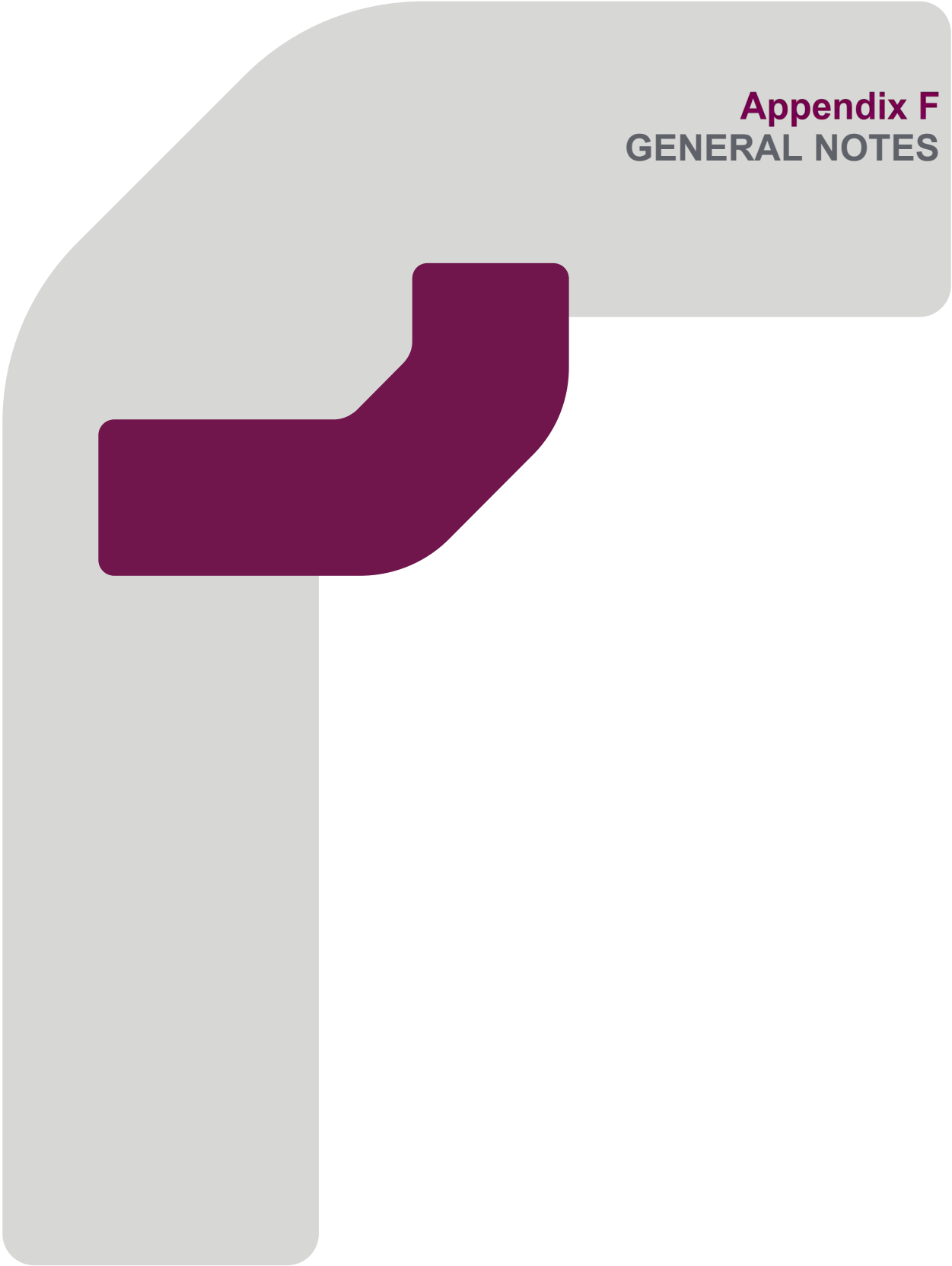
essential components of a source (hazard), pathway and receptor, there can be no risk. Thus, the mere presence of a hazard at a site does not mean that there will necessarily be attendant risks.

The Risk Assessment

By considering where a viable pathway exists which connects a source with a receptor, this assessment will identify where pollutant linkages may exist. A pollutant linkage is the term used by the DEFRA in their standard procedure on risk assessment. If there is no pollutant linkage, then there is no risk. Therefore, only where a viable pollutant linkage is established does this assessment go on to consider the level of risk. Risk should be based on a consideration of both:

- 6 The likelihood of an event (probability) - takes into account both the presence of the hazard and receptor and the integrity of the pathway.
- 7 The severity of the potential consequence - takes into account both the potential severity of the hazard and the sensitivity of the receptor.

For further information please see the Contaminated Land section on the DEFRA website (www.defra.gov.uk).



Appendix F

GENERAL NOTES

General Notes

RPS Consulting Services Ltd

Phase 1 - Environmental Risk Assessment / Desk Study Environmental Review

1. A "desk study" means that no site visits have been carried out as any part thereof, unless otherwise specified.
1. This report provides available factual data for the site obtained only from the sources described in the text and related to the site on the basis of the location information provided by the Client.
2. The desk study information is not necessarily exhaustive and further information relevant to the site may be available from other sources.
3. The accuracy of maps cannot be guaranteed and it should be recognised that different conditions on site may have existed between and subsequent to the various map surveys.
4. No sampling or analysis has been undertaken in relation to this desk study.
5. Any borehole data from British Geological Survey sources is included on the basis that: "The British Geological Survey accept no responsibility for omissions or misinterpretation of the data from their Data Bank as this may be old or obtained from non-BGS sources and may not represent current interpretation".
6. Where any data supplied by the Client or from other sources, including that from previous site investigations, have been used it has been assumed that the information is correct. No responsibility can be accepted by RPS for inaccuracies in the data supplied by any other party.
7. This report is prepared and written in the context of an agreed scope of work and should not be used in a different context. Furthermore, new information, improved practices and changes in legislation may necessitate a re-interpretation of the report in whole or in part after its original submission.
8. The copyright in the written materials shall remain the property of the RPS Company but with a royalty-free perpetual licence to the Client deemed to be granted on payment in full to the RPS Company by the Client of the outstanding amounts.
9. The report is provided for sole use by the Client and is confidential to them, their professional advisors, no responsibility whatsoever for the contents of the report will be accepted to any person other than the Client. [Unless otherwise agreed]
10. These terms apply in addition to the RPS "Standard Terms & Conditions" (or in addition to another written contract which may be in place instead thereof) unless specifically agreed in writing. (In the event of a conflict between these terms and the said Standard Terms & Conditions the said Standard Terms & Conditions shall prevail.) In the absence of such a written contract the Standard Terms & Conditions will apply.

PHASE 1 PRELIMINARY RISK ASSESSMENT

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2022-05-26

JER9536

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