

GROUND ENGINEERING

Newark Road, Peterborough PE1 5UA
Tel: 01733 566566
Email: admin@groundengineering.co.uk

REPORT ON A PHASE 1 DESK STUDY
AT
SPRINGWELL NURSERY
WALDEN ROAD
LITTLE CHESTERFORD

Report Reference C15347

On behalf of:

BBR Architects
12 Melbourn Road
Royston
Hertfordshire
SG8 7DE

June 2021

C15347 Springwell Nursery, Walden Road, Little Chesterford

CONTENTS

Introduction	Page 1
Location, Topography and Geology of the Site	Page 2
History of the Site	Page 3
Summary of Environmental Data	Page 6
Preliminary Risk Assessment	Page 9
Conclusions	Page 12

FIGURES & PHOTOGRAPHS

Site Location Plan	Figure 1
Site Plan	Figure 2
Site Photographs (1 to 10)	

APPENDICES

Historical Map Extracts	Appendix 1
Environmental Database Information	Appendix 2
Natural Cavities Risk Assessment	Appendix 3

BBR ARCHITECTS

REPORT ON A PHASE 1 DESK STUDY

AT

SPRINGWELL NURSERY

WALDEN ROAD

LITTLE CHESTERFORD

Report Reference No. C15347

June 2021

INTRODUCTION

Ground Engineering Limited was instructed by the client, BBR Architects, to carry out a Phase 1 desk study to establish the site history and likely ground conditions beneath a plot of land at Springwell Nursery, Walden Road, Little Chesterford. These works were scheduled, by the client, in advance of proposed residential development of the site.

The study has been compiled from historical map research and reference to geological and environmental database information.

This report summarises the findings of the desk study and develops a conceptual model with an evaluation relating to the likelihood of ground contamination being present together with comments relating to the ground conditions anticipated beneath the site.

LOCATION, TOPOGRAPHY AND GEOLOGY OF THE SITE

The site comprises a garden centre called Springwell Nursery, which lies on the eastern side of Walden Road (B184) within a rural area, situated about 0.75km to the south of Little Chesterford and 3km to the north-west of Saffron Walden as shown in Figure 1. The approximate National Grid Reference at the centre of the site is TL 5212 4113.

The site of the garden centre comprised a 65m wide and 125m long plot which contained six large retail glass and polytunnel greenhouses, and outdoor plant sales area. Gravel surfaced parking areas and a driveway are located along the northern site margin. A paved covered walkway is located in front of the main Springwell Nursery greenhouse building, which occupies the south-western corner of the site. Paved footways link the greenhouses and outdoor plant sales area. The general site layout is presented in Figure 2, which also shows the position of three large LPG gas tanks situated on the northern side of the car park.

The flat and level site stands at about 45mOD and lies within a small valley, where a stream runs along the southern site boundary and feeds into the River Cam some 450m to the west. The banks of the River Cam lie at about 40mOD and the land to the north-east of the site rises to 80mOD over a distance of about 360m.

The geological map at 1:50,000 scale, Sheet 205, and BGS Geology of Britain Viewer, indicates the site to directly underlain by the solid geology of the New Pit Chalk Formation. The higher ground immediately to the north-east of the site comprises the younger Lewes Nodular Chalk Formation and Seaford Chalk Formation, which overlies the New Pit Chalk Formation. The boundary between the latter strata is marked by a layer called the Chalk Rock Member, which is located directly to the east of the site and corresponds to a spring line.

HISTORY OF THE SITE

Research into the site history involved reference to historical maps and plans, and information obtained from the internet. The map extracts studied are presented in the desk study map section, Appendix 1, and are described below:

<i>Map Extract Studied</i>	<i>Description</i>
<p>1877 Ordnance Survey County Series Scale: 1:2500 Figure A</p> <p>1880 Ordnance Survey County Series Scale: 1:10,560 Figure B</p>	<p>The irregularly shaped site lies within two fields situated directly to the east of a farm called Springwell, which lies about 750m to the south-east of a village called Little Chesterford. The field along the southern site margin is occupied by an orchard, which is bounded to the south by a track. An orchard and mixed woodland are respectively located to the north-west and north of the site. A road leading to Little Chesterford divides the farm from buildings or a second farm to the west.</p> <p>A well is shown directly to the north of the eastern farm buildings and a westward-flowing stream is shown directly to the north of the farm buildings to the west of the road. This stream is fed by a ditch which flanks the southern site boundary. To the north of the stream there is an orchard.</p>
<p>1897 Ordnance Survey County Series Scale: 1:2500 Figure C</p>	<p>The site and immediate surroundings remain as shown in the previous map. The orchard to the north-west is no longer denoted.</p>
<p>1921 Ordnance Survey County Series Scale: 1:2500 Figure D</p>	<p>The site and immediate surroundings remain as shown in the previous map.</p>
<p>1938 Ordnance Survey County Series Scale: 1:10,560 Figure E</p>	<p>The site and immediate surroundings remain as shown in the previous map.</p>
<p>1947 Ordnance Survey County Series Scale: 1:10,560 Figure F</p>	<p>The site and immediate surroundings remain as shown in the previous map.</p>
<p>1960 Ordnance Survey TL54SW Scale: 1:10,560 Figure G</p>	<p>The site and immediate surroundings remain as shown in the previous map.</p>

<i>Map Extract Studied</i>	<i>Description</i>
1971 Ordnance Survey TL54SW Scale: 1:10,560 Figure H	The site and immediate surroundings remain as shown in the previous map.
1981 Ordnance Survey TL5241 Scale: 1:2500 Figure I	The site remains undeveloped within a field. The farm buildings on the eastern side of Walden Road (A130) are denoted as Joseph Farm and Springwell Farm is located on the western side. Farm buildings are shown on the opposite side of the track and stream to the south of the site. The spring issues about 20m to the south-east of the site.
1994 Ordnance Survey TL5241 Scale: 1:2500 Figure J	The site has been developed with two rectangular horticultural Nursery buildings. Joseph Farm remains as shown previously and to the south of the track and stream the farm buildings are denoted as Springwell Farm, with Springwell Old Farm located to the west of Walden Road.
1999 Groundsure Aerial Photograph Dated 18/07/1999 Appendix 2 Page 12	There are four additional Nursery buildings making a total of six across the site. There is a car park situated within the north-western part of the site.
2003 Ordnance Survey TL5241SW Scale: 1:1250 Figure K	There are six Nursery buildings across the site as shown in the 1999 aerial photograph.
2007 Groundsure Aerial Photograph Dated 26/03/2007 Appendix 2 Page 11	Whilst the site appears as shown in the 1999 aerial photograph, the car park has been extended into the field to the north.
2010 Ordnance Survey TL54SW Scale: 1:10,000 Figure L	The site and immediate surroundings remain as shown in the previous map.
2013 Groundsure Aerial Photograph Dated 01/05/2013 Appendix 2 Page 10	The site remains as shown in the previous map. There is a white rectangular cover across the field directly to the north of the site.
2017 Groundsure Aerial Photograph Dated 09/04/2017 Appendix 2 Page 9	The site remains as shown in the previous map. The white rectangular cover has been removed and the field directly to the north of the site is now bare earth.

<i>Map Extract Studied</i>	<i>Description</i>
<p>2020 Ordnance Survey TQ54SW Scale: 1:10,000 Figure M</p> <p>2020 Groundsure Aerial Photograph Dated 05/04/2020 Appendix 2 Page 8</p>	<p>The site and immediate surroundings remain as shown in the previous map and aerial photograph.</p>

In 1877 the rural site was undeveloped and situated within fields to the east of a farm called Springwell. At this time the field along the southern site margin was occupied by an orchard, which was bounded to the south by a track.

The site remained undeveloped until about 1988 when Springwell Nursery was established initially with two large greenhouses, expanding to six between 1994 and 2003. The site has remained as a family run business through to 2021 providing a full range of gardening products.

SUMMARY OF ENVIRONMENTAL DATA

Appendix 2 contains information derived from Environmental Databases for a radius of up to 2000m from the site. The information covers datasets held by the Groundsure with contributors including the local authority, the Environment Agency, British Geological Survey, Ordnance Survey and the Coal Authority and the results, within a radius of 250m, are summarised below:

Historical Industrial Sites	On Site	0-50m	51 - 250m
Historical Industrial Land Uses	0	0	0
Historical Tanks	0	0	0
Historical Energy Features Database	0	0	0
Historical Petrol and Fuel Site Database	0	0	0
Historical Garages	0	0	0
Historical Military Land	0	0	0
Landfill and Other Waste Sites	On Site	0-50m	51 - 250m
Landfill Sites	0	0	0
Waste Sites	0	0	0
Waste exemptions	2	16	0
Current Industrial Land Uses	On Site	0-50m	51 - 250m
Recent Industrial Land Uses	0	0	0
Current or Recent Petrol Stations	0	0	0
Electricity Cables	0	0	0
Gas Pipelines	0	0	0
Sites Determined as Contaminated Land	0	0	0
Permits/Authorisations	0	0	0
Pollution Discharge	0	1	0
Dangerous Substances	0	0	0
Pollution Incidents	0	0	0
Pollutions Inventories	0	0	0
Hydrogeology	On Site	0-50m	51 - 250m
Superficial Aquifer	Identified (within 500m)		
Bedrock Aquifer	Identified (within 500m)		
Groundwater Vulnerability	Identified (within 50m)		
Groundwater Vulnerability – soluble rock risk	Identified (within 0m)		
Groundwater Abstractions	0	6	3
Surface Water Abstractions	0	0	0
Potable Abstractions	0	0	1
Source Protection Zones	1	0	2

Hydrology	On Site	0-50m	51 - 250m
Water Network (OS MasterMap)	0	7	22
Surface Water Features	0	3	14
WFD Water Bodies	1	-	-
River and Coastal Flooding	On Site	0-50m	51 - 250m
Risk of Flooding from Rivers and Sea	Medium (within 50m)		
Historical Flood Events	0	0	0
Flood Defences	0	0	0
Areas Benefiting from Flood Defences	0	0	0
Flood storage areas	0	0	0
Flood Zone 2	Identified (within 50m)		
Flood Zone 3	Identified (within 50m)		
Surface Water Flooding			
Surface Water Flooding	1 in 30 year, 0.3m - 1.0m (within 50m)		
Groundwater Flooding			
Groundwater Flooding	Moderate-High (within 50m)		
Designated Environmentally Sensitive Sites	On Site	0-50m	51 - 250m
Environmentally sensitive sites	3	0	0
Natural Hazards			
Hazard			
Shrinking or Swelling Clay	Very Low (within 50m)		
Running Sand	Low (within 50m)		
Compressible Ground	Moderate (within 50m)		
Collapsible Deposits	Very Low (within 50m)		
Landslides	Very Low (within 50m)		
Ground Dissolution of Soluble Rocks	Very Low (within 50m)		
Mining, Ground Workings & Natural Cavities	On Site	0-50m	51 - 250m
Natural Cavities	0	0	0
Surface Ground Workings	0	0	0
Underground Mining	0	0	0
Radon			
The property is not in a Radon Affected Area, as between less than 1% of properties are above the action level. The site lies within an area where No radon protection measures are necessary.			

Database Summary

There are no historical or current industrial land uses recorded within 250m of the site.

There are two waste exemptions registered for the site relating to the burning of farm waste in the open. There are a further farm or agricultural waste exemptions located within a 250m radius of the site. Springwell Farm historically had a licensed discharge consent, which

was revoked in 1992. There are no other environmental permits, incidents, registers, landfills or waste sites within 250m of the site.

The solid geology of the Lewes Nodular Chalk Formation and Seaford Chalk Formation and New Pit Chalk Formation are Principal Aquifers and the site lies within a Source Protection Zone 1 (inner catchment). There are 6 licensed groundwater abstractions registered for Springwell Nursery (the site) and a further three located within 50m and 250m of the site.

A stream is recorded along the southern boundary of the site.

The southern part of the site adjacent the stream is indicated to have a medium risk of being affected by flooding and moderate risk of groundwater flooding.

The property is not in a Radon Affected Area, as less than 1% of properties are above the action level. The site lies within an area where no radon protection measures are necessary.

PRELIMINARY RISK ASSESSMENT

Potential sources of contamination present on or beneath the site would relate primarily to; the historical use of the site; possible damaged drainage; the presence of contaminated soil; and the potential presence of soil gas beneath the site.

In order to assess the risks associated with the presence of ground contamination the linkages between the sources and potential receptors to contamination need to be established and evaluated. This is in accordance with the Environmental Protection Act 1990, which provides a statutory definition of Contaminated Land. To fall within this definition it is necessary that, as a result of the condition of the land, substances may be present on or under the land such that

- *Significant harm is being caused or there is a significant possibility of such harm being caused; or*
- *Pollution of controlled waters is being, or is likely to be, caused*

There are three principal factors that are assessed whilst undertaking a qualitative risk assessment for any site. These are the presence of a contamination source, the existence of migration pathways and the presence of a sensitive target(s). It should be noted that it is necessary for each element of source, pathway and target to be present in order for exposure of a human or environmental receptor to occur.

UK Government guidance on the assessment of contaminated land, requires risk to human health and the environment to be reviewed using source – pathway – target relationships. If each of these elements is present, the linkage provides a potential risk to the identified targets.

Contaminants or ***potential pollutants*** identified as ***sources*** in relation to the identified previous uses are listed overleaf in Table 1.

Table 1: Identified Potential Contaminant Sources

<i>Contaminant Source</i>	<i>Comments</i>
Horticultural Chemicals	Garden chemicals (pesticides & herbicides) and fertilisers sold/used within the Springwell Nursery garden centre.
Drainage Beneath Site	Effluent from leaking drains would provide a contaminant source.
Soil Beneath Site	Contamination may be present within any made ground materials imported on the site or from historical spillage at surface or drain leakage.
Soil Gas	Potential soil gas generated from any made ground present.
Ground Contamination Outside Site Boundary	Ground contamination migrating from adjoining sites.

A **Pathway** is defined as one or more routes through which a receptor is being, or could be, exposed to, or affected by, a given contaminant.

Potential **Target or Receptors** fall within the categories of Human Health, Water Environment, Flora and Fauna, and Building Materials.

There are a number of possible pathways for the contaminants identified on the site to impact human and/or environmental receptors and these are summarised in Tables 2 and 3.

Table 2: Human Receptors and Pathways

<i>Human Receptor-Mechanism</i>	<i>Typical Exposure Pathway</i>
Human Inhalation	Breathing Dust and Fumes Breathing Gas emissions
Human Ingestion	Eating -contaminated soil, for example by small children -produce grown on contaminated soil Ingesting dust or soil on vegetables Drinking contaminated water
Human Contact	Direct skin contact with contamination Direct skin contact with contaminated liquids

Table 3: Water Receptors and Pathways

<i>Receptor-Water Environment</i>	<i>Typical Exposure Pathway</i>
The solid geology of the Lewes Nodular Chalk Formation and Seaford Chalk Formation and New Pit Chalk Formation are Principal Aquifers and the site lies within a Source Protection Zone 1 (inner catchment). There are 6 licensed groundwater abstractions registered for Springwell Nursery (the site).	Surface infiltration of atmospheric waters into the soils beneath the site could wash or dissolve potential contaminants and migrate to underlying groundwater. Contamination leads to restriction/prevention of use as a resource, for example, drinking water, and can have secondary impacts on other resources, which depend on it.
A stream is recorded along the southern boundary of the site.	Surface infiltration of atmospheric waters into the soils beneath the site could wash or dissolve potential contaminants and laterally migrate. Contamination leads to a restriction/prevention of use: -as drinking water resource -for amenity use Effects on aquatic life

Preliminary Conceptual Model

Assessment of the potential linkage between ground contamination sources, human and environmental receptors have been assessed based on the desk study research documented in the preceding sections of this report.

A generalised preliminary conceptual model is presented below in Table 4.

Table 4: Preliminary Conceptual Model Relative to Residential Development

Receptors	Pathway	Estimated Potential for Linkage with Contaminant Sources				
		Horticultural Chemicals	Drainage Beneath Site	Soil Beneath Site	Soil Gas	Ground Contamination from Outside Site Boundary
Human Health – ground/site workers	Ingestion and Inhalation of contaminated Soil, Dust and Vapour	Low likelihood	Low likelihood	Low likelihood	Low likelihood	Unlikely
Human Health – users of completed development	Ingestion and Inhalation of contaminated Soil, Dust and Vapour	Low likelihood	Low likelihood	Low likelihood	Low likelihood	Unlikely
Water Environment	Migration through ground into surface water or surrounding groundwater	Low likelihood	Low likelihood	Low likelihood	Low likelihood	Unlikely
Flora	Vegetation on site growing on contaminated soil	Low likelihood	Low likelihood	Low likelihood	Unlikely	Unlikely
Building Materials	Contact with contaminated soil	Low likelihood	Low likelihood	Low likelihood	Unlikely	Unlikely
Key to Table 4 Estimated Potential for Linkage with Contaminant Source		Definition				
High likelihood		There is a pollution linkage and an event that either appears very likely in the short term and almost inevitable over the long term, or there is evidence at the receptor of harm or pollution.				
Likely		There is a pollution linkage and all the elements are present and in the right place, which means that it is probable that an event will occur. Circumstances are such that an event is not inevitable, but possible in the short term and likely over the long term.				
Low likelihood		There is a pollution linkage and circumstances are possible under which an event could occur. However, it is by no means certain that even over a longer period such an event would take place, and is less likely in the shorter term.				
Unlikely		There is a pollution linkage but circumstances are such that it is improbable that an event would occur even in the very long term.				
NA		Not Applicable				

CONCLUSIONS

The rural site was undeveloped and situated within fields to the east of a farm called Springwell up until about 1988 when Springwell Nursery was established initially with two large greenhouses, expanding to six between 1994 and 2003. The site has remained as a family run business through to 2021 providing a full range of gardening products.

Anticipated Ground Conditions and Bearing Properties

The site is expected to be underlain by a thin cover of made ground over the solid geology of the New Pit Chalk Formation.

The higher ground immediately to the north-east of the site comprises the younger Lewes Nodular Chalk Formation and Seaford Chalk Formation, which overlies the New Pit Chalk Formation. The boundary between the latter strata is marked by a layer called the Chalk Rock Member located directly the east of the site and corresponds to a spring line.

It is likely that the bearing properties of the chalk would be adequate for the placement of traditional strip or trench fill foundations.

The risk of solution features in the New Pit Chalk Formation (formerly Middle Chalk) is indicated to be very low according to the Groundsure report in Appendix 2. An assessment following the predictive model devised by C.N. Edmonds (1987), presented in Appendix 3, does not anticipate that solution features are a hazard for the site.

Likelihood of Contamination – Horticultural Chemicals

It is considered that there is a low likelihood of pollution caused by garden chemicals (pesticides & herbicides) and fertilisers sold/used within the Springwell Nursery garden centre.

Likelihood of Contamination - Drainage

When preparing for redevelopment redundant foul and surface water drain runs should be removed from beneath the site and precautions implemented to ensure that any remaining effluent is directly disposed of off-site. The integrity of existing drainage should be checked, and damaged sections replaced prior to re-use within the development. The latter measures should reduce the future likelihood of contaminants affecting human health and water environment to very low.

Likelihood of Contamination - Soil beneath the Site

Any contaminated soil present beneath the site would be expected within the made ground, which is likely to have a thickness of less than 1m.

Overall it is believed that there is a low likelihood that the cover layer of made ground could contain contaminants with concentrations considered unsuitable if exposed at the surface within a residential development.

Likelihood of Contamination - Soil outside the Site

It is unlikely that soils outside the site could detrimentally affect future development of the site.

Likelihood of Contamination - Water Environment

It is anticipated that contaminants, if present within the made ground, would be able to migrate into the underlying Chalk solid geology, which is a Principal Aquifer and highly sensitive water abstraction source.

Likelihood of Contamination - Soil Gas

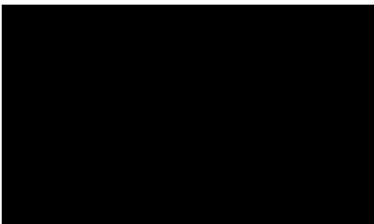
According to the findings of this investigation there are no landfills within 250m of the site, which is underlain by Chalk. These factors would suggest a low hazard potential for methane or carbon dioxide soil gasses affecting the proposed development.

Further Works

It would be prudent to carry out a ground investigation, which should determine the thickness and nature of made ground across the site, and check the near surface soil and water for potential contaminants.

The investigation should also determine the geotechnical properties of the natural soil beneath the site and be sufficient to facilitate foundation design.

GROUND ENGINEERING LIMITED



J. H. GIBB

B.Sc.(Hons.), M.Sc.(Eng.), C.Geol., F.G.S.

Senior Geo-Environmental Engineer



S. J. FLEMING

M.Sc., M.C.S.M., C.Geol., F.G.S.

Director

Figures

Figure 1: Site Location Plan

Figure 2: Site Plan

Site Photographs 1 to 10

Site Location Plan

Figure 1

Reproduced from the Ordnance Survey sheet reproduced at **1:50,000** scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

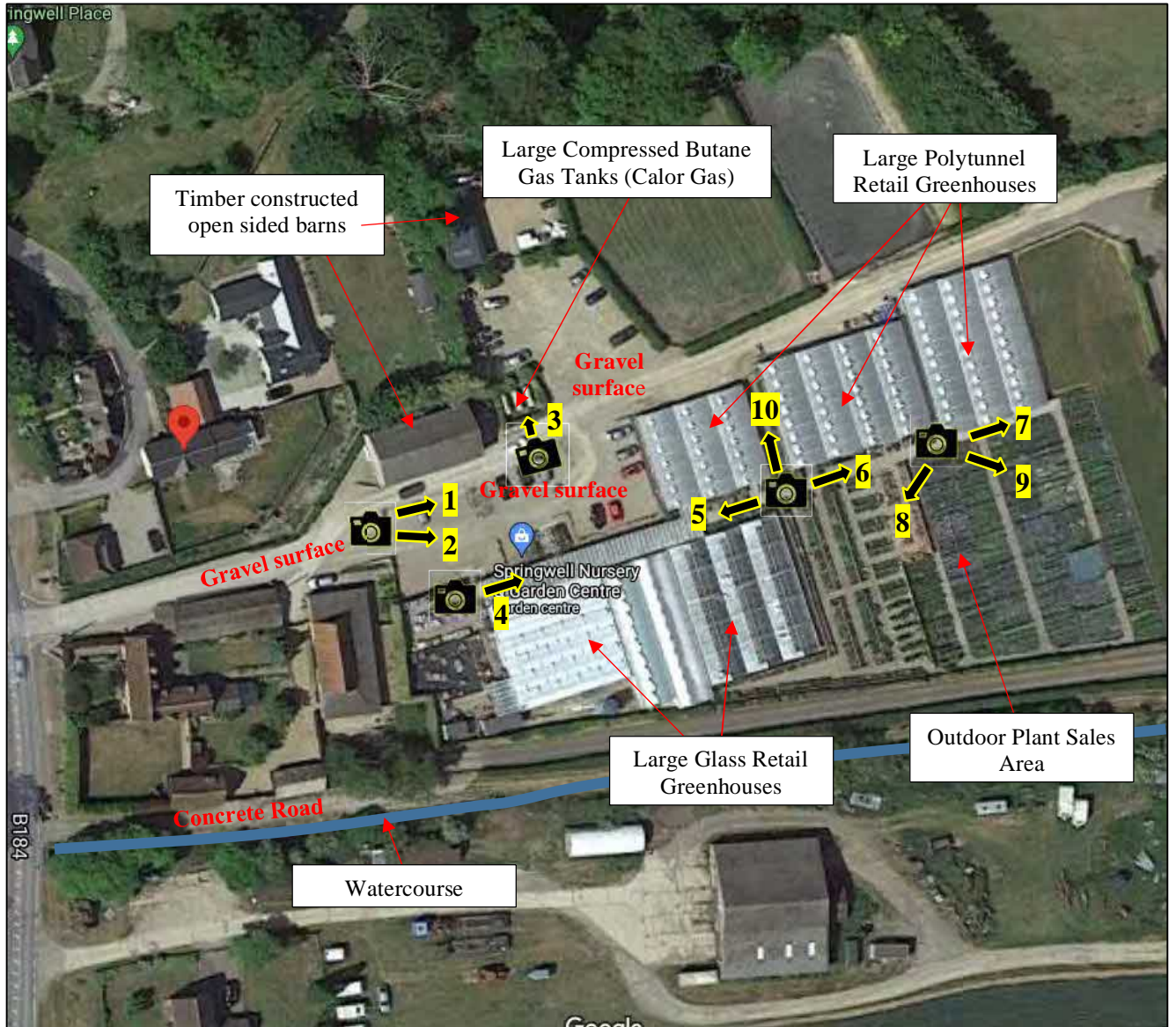
Peterborough Tel : 01733 566566

Project No.

C15347

Site Plan

Figure 2



Scale
60m

Project : Springwell Nursery, Walden Road,
Little Chesterford

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

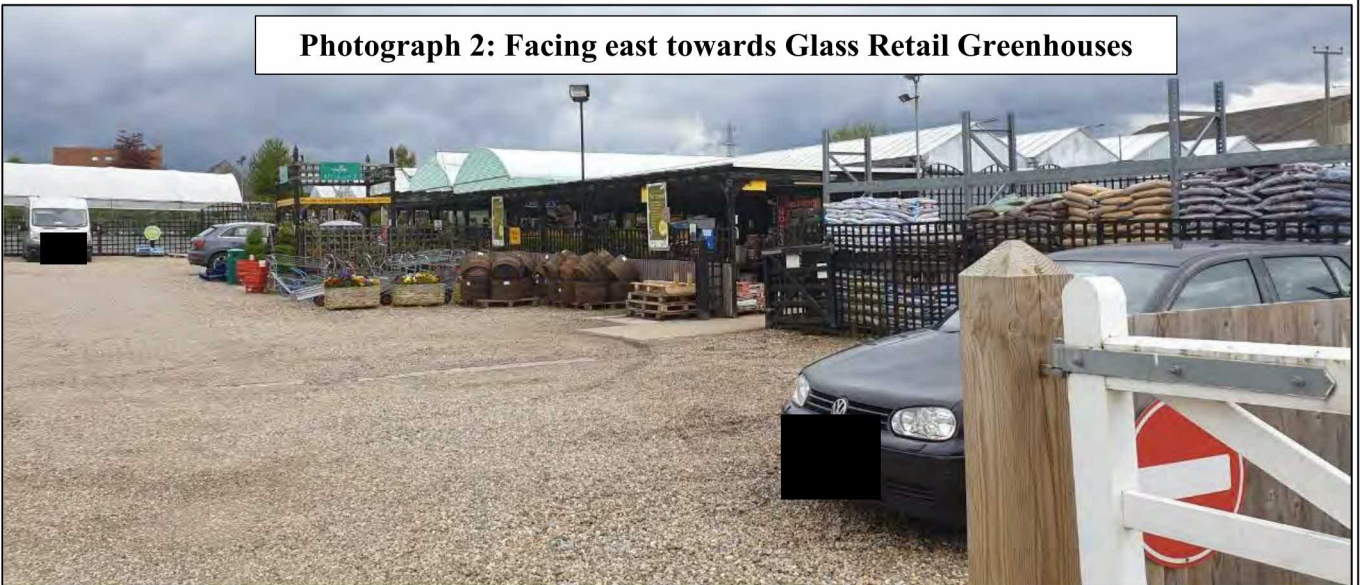
C15347

Site Photographs

Photograph 1: Facing east across car park



Photograph 2: Facing east towards Glass Retail Greenhouses



Photograph 3: Facing north across Butane Gas Tanks



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Site Photographs

Photograph 4: Facing east beneath covered walkway



Photograph 5: Facing west towards covered walkway



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Site Photographs

Photograph 6: Facing east between polytunnels to north and outdoor plant sales area to



Photograph 7: Facing east between polytunnels to north and outdoor plant sales area to



Project : Springwell Nursery, Walden Road,
Little Chesterford

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Site Photographs

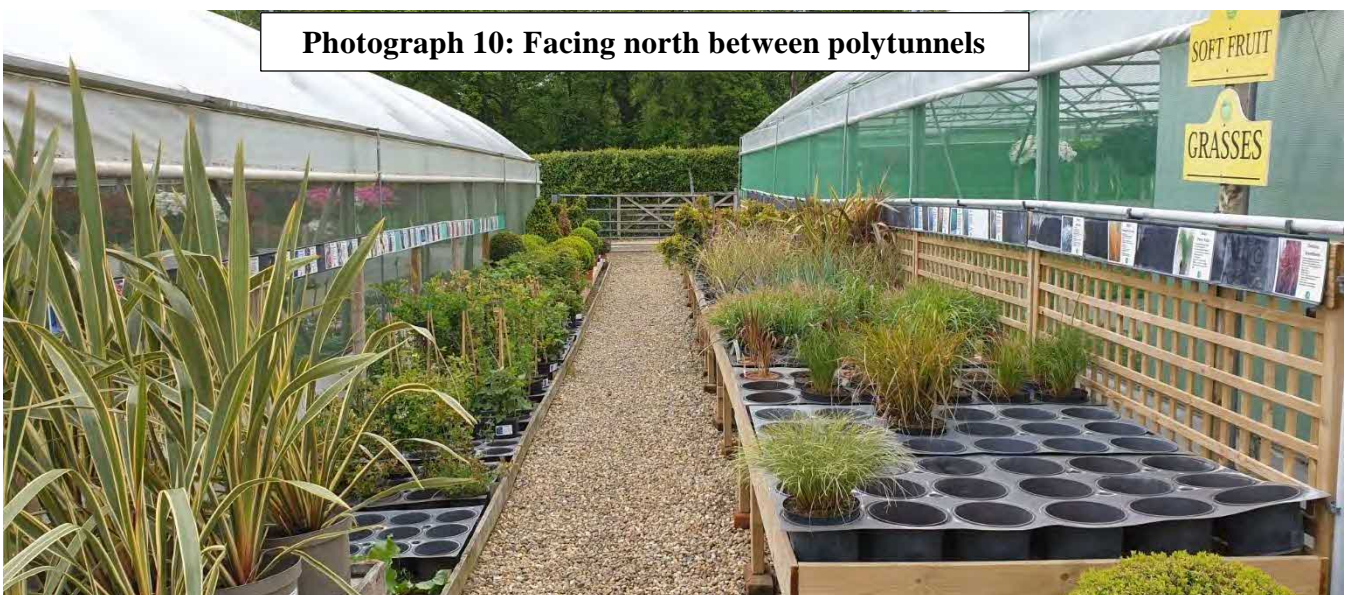
Photograph 8: Facing south-west across outdoor plant sales area



Photograph 9: Facing south-east across outdoor plant sales area



Photograph 10: Facing north between polytunnels



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

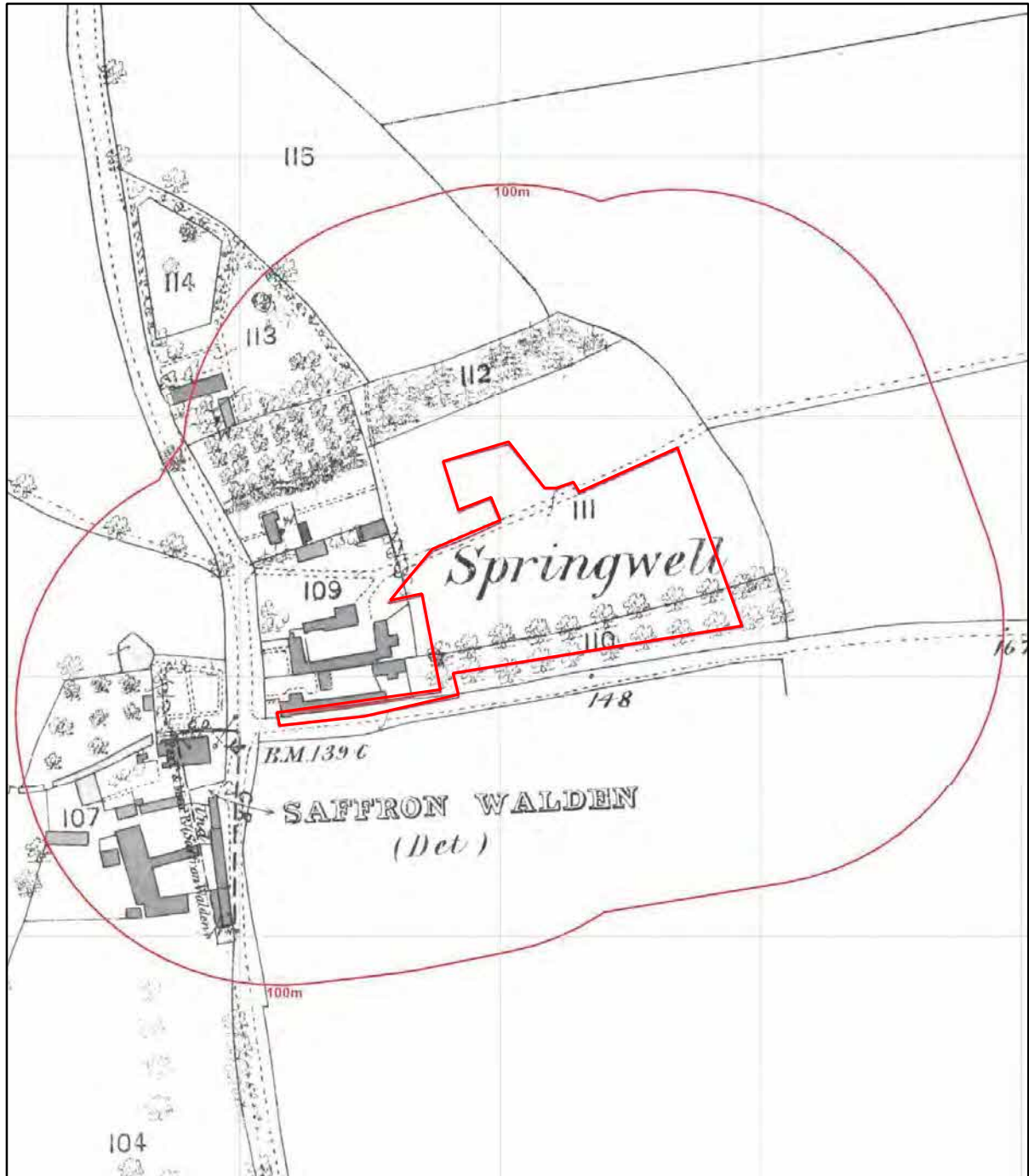
Appendix 1

Historical Map Extracts

Site History

Figure A

Reproduced from the 1877 edition Ordnance Survey sheet **County Series** at 1:2500 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

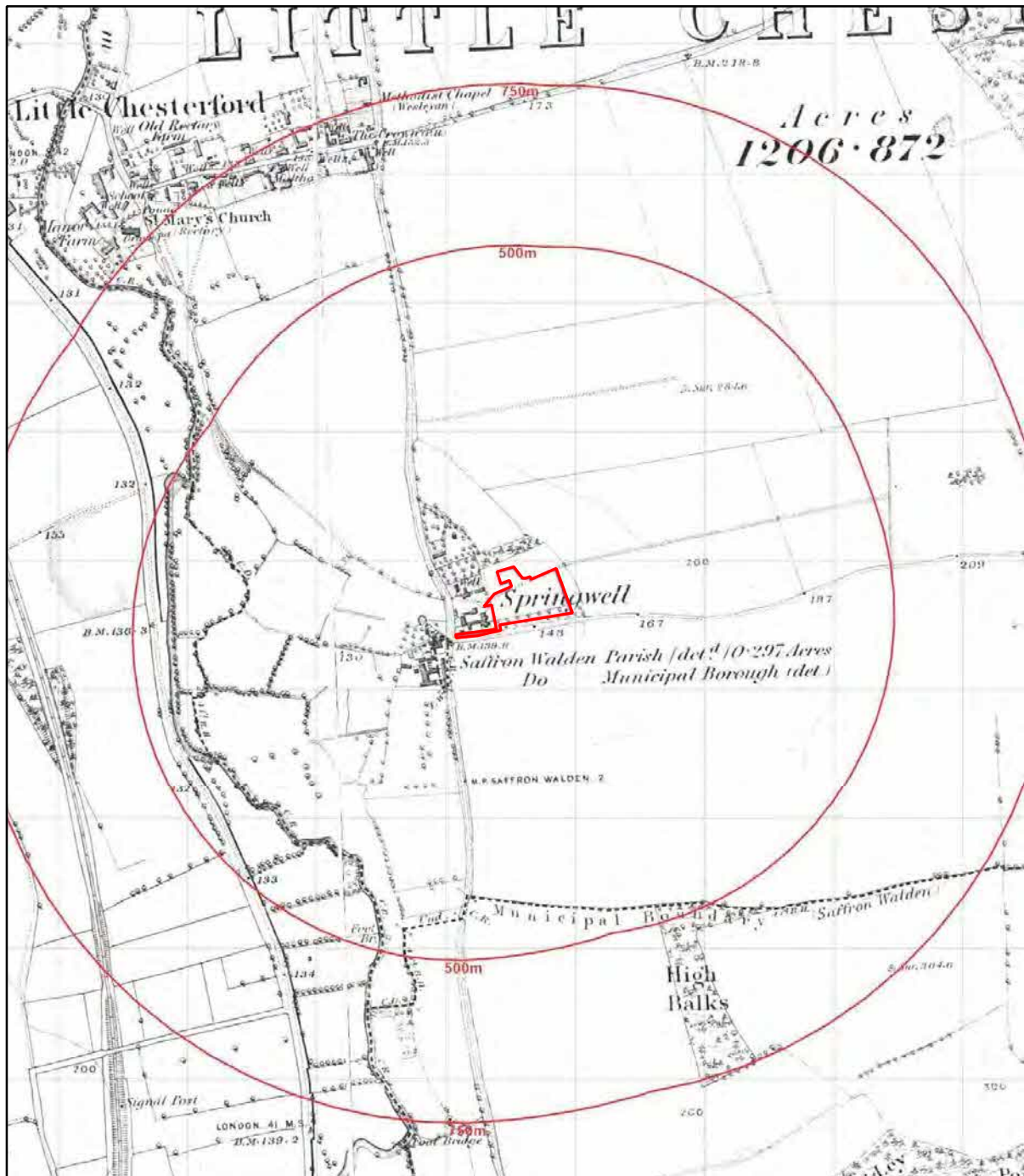
Project No.

C15347

Site History

Figure B

Reproduced from the 1880 edition Ordnance Survey sheet County Series at 1:10,560 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



Project : Springwell Nursery, Walden Road,
Little Chesterford

Client : BBR Architects

GROUND
ENGINEERING
LIMITED

Peterborough Tel : 01733 566566

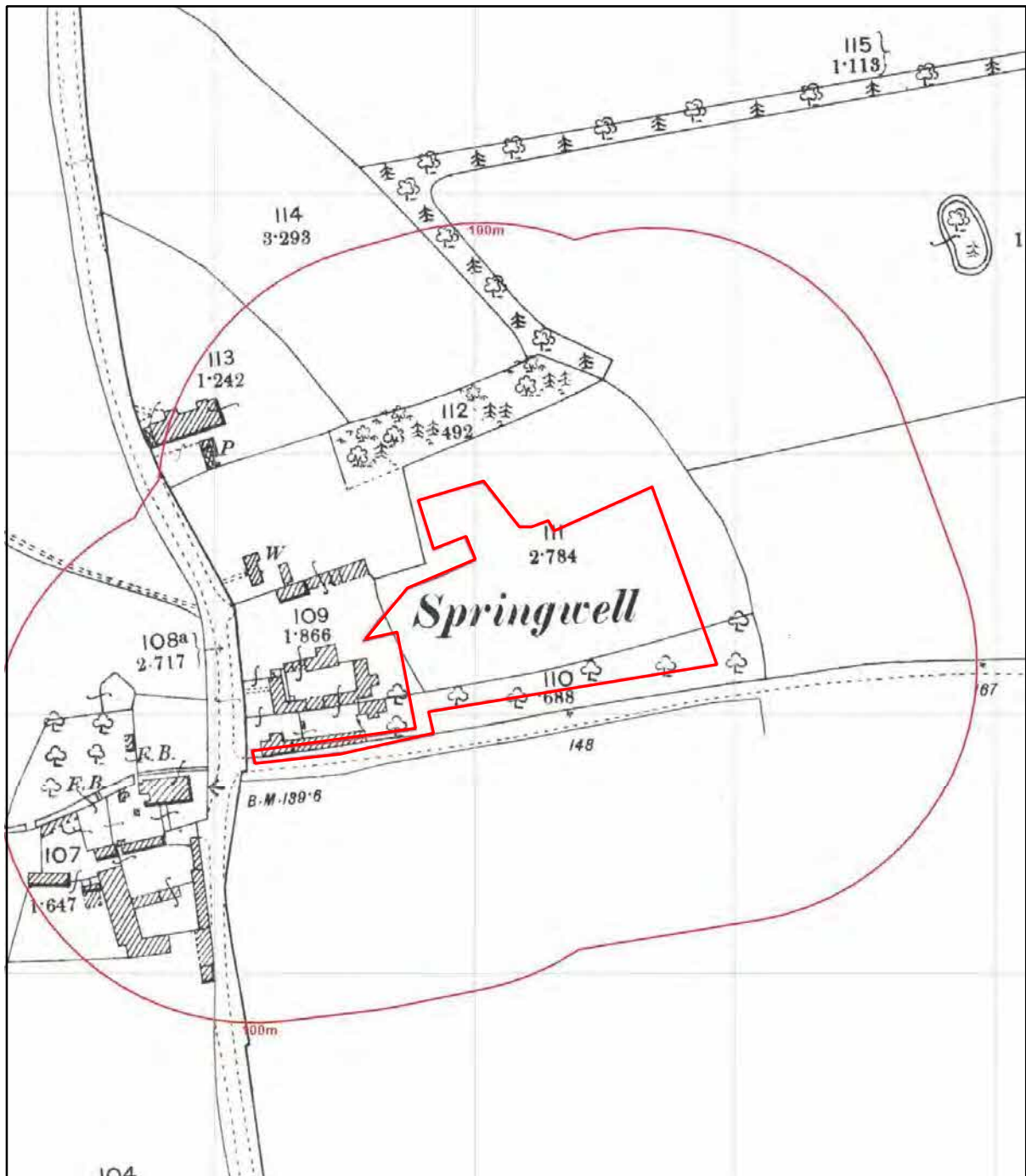
Project No.

C15347

Site History

Figure C

Reproduced from the 1897 edition Ordnance Survey sheet **County Series** at 1:2500 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

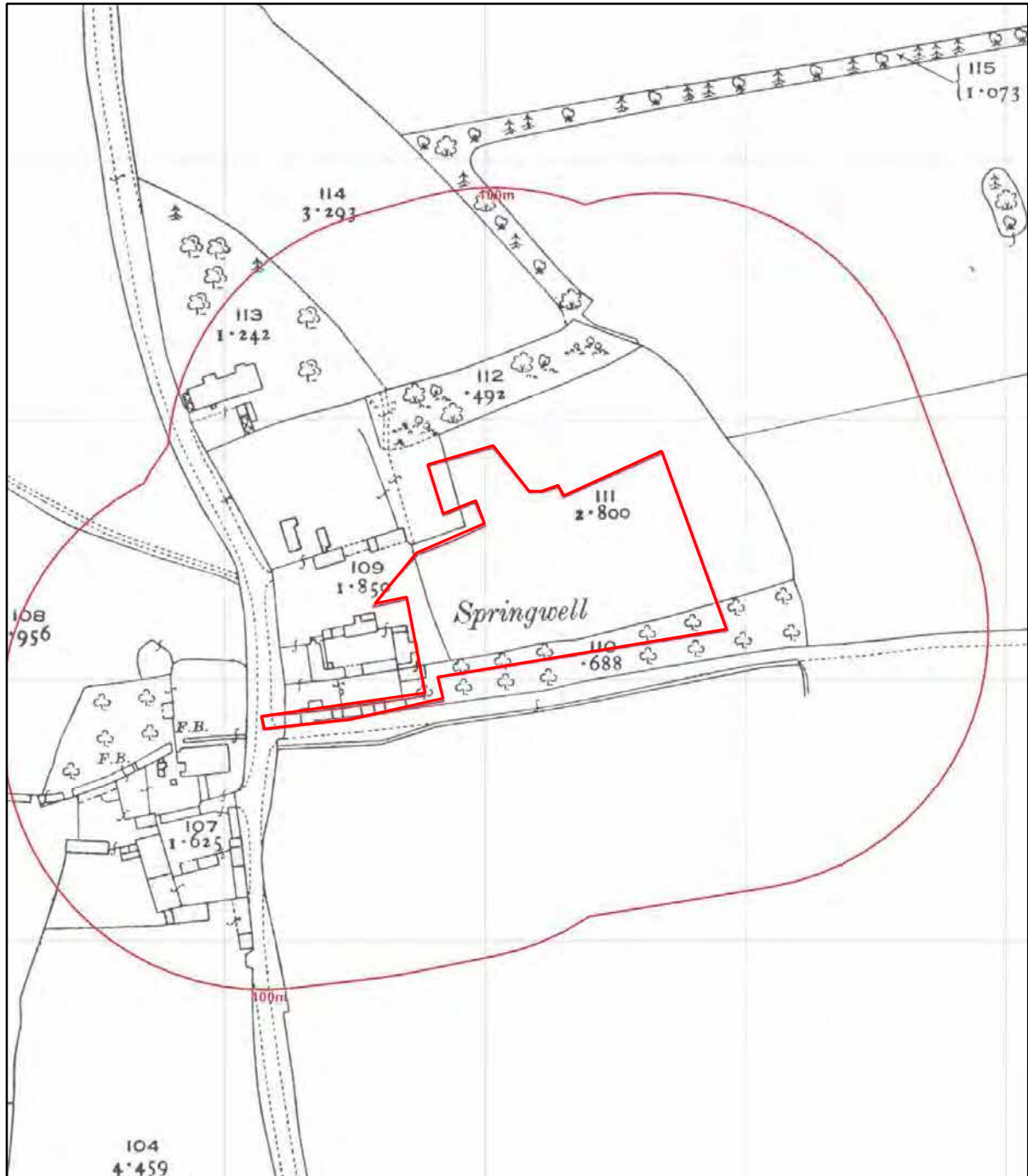
Project No.

C15347

Site History

Figure D

Reproduced from the 1921 edition Ordnance Survey sheet **County Series** at 1:2500 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

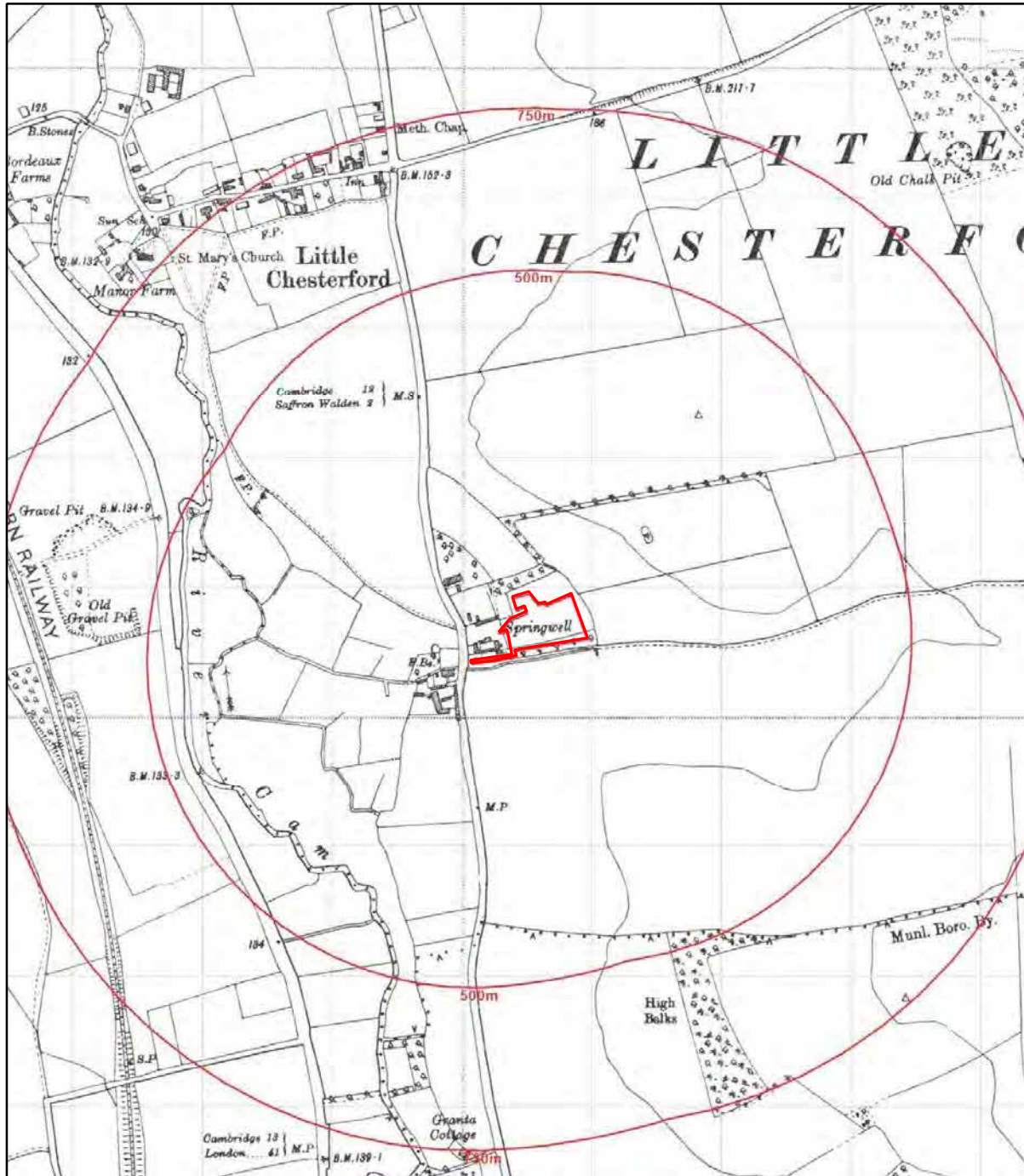
Project No.

C15347

Site History

Figure E

Reproduced from the 1938 edition Ordnance Survey sheet **County Series** at 1:10,560 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

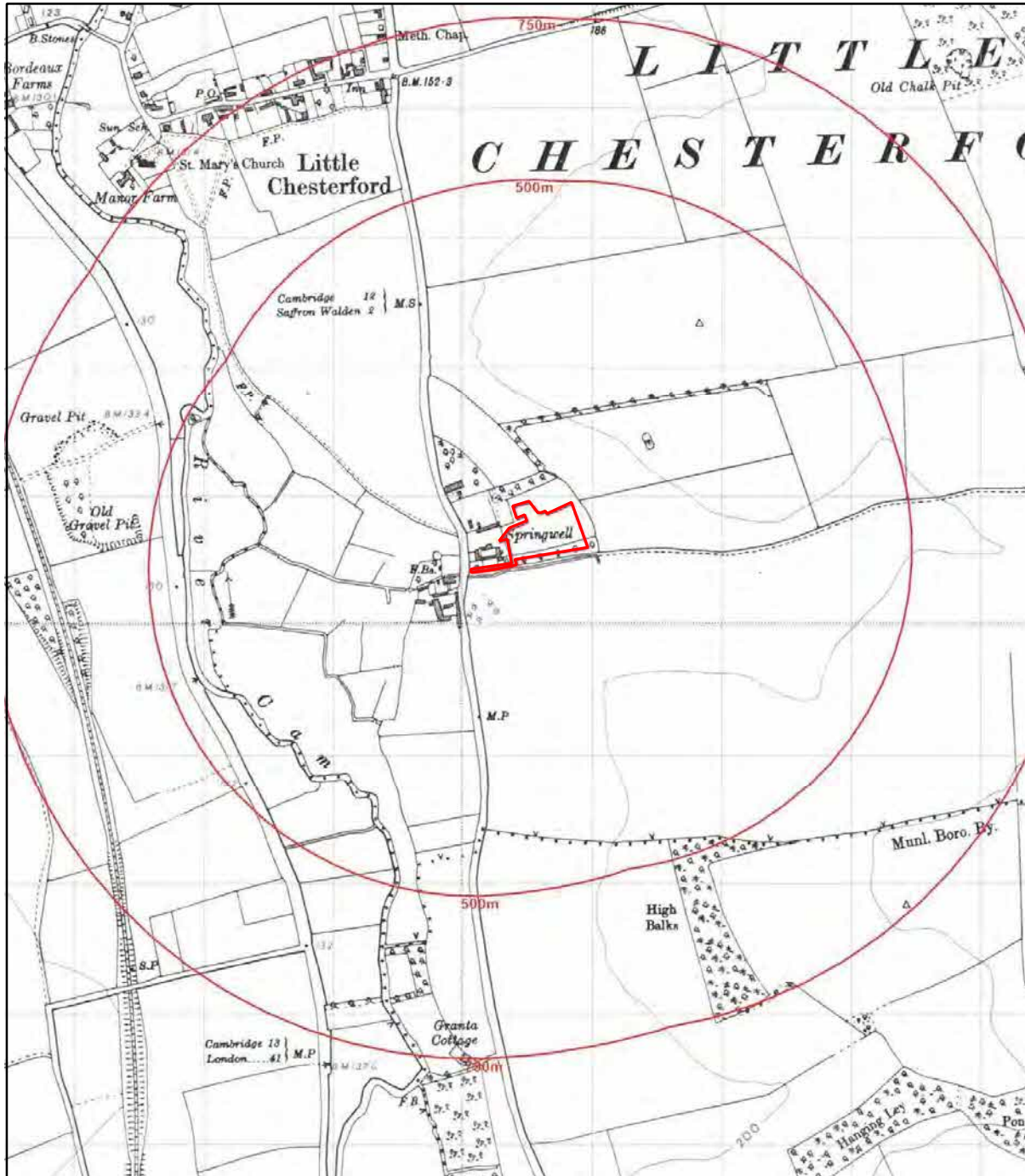
Project No.

C15347

Site History

Figure F

Reproduced from the 1947 edition Ordnance Survey sheet County Series at 1:10,560 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

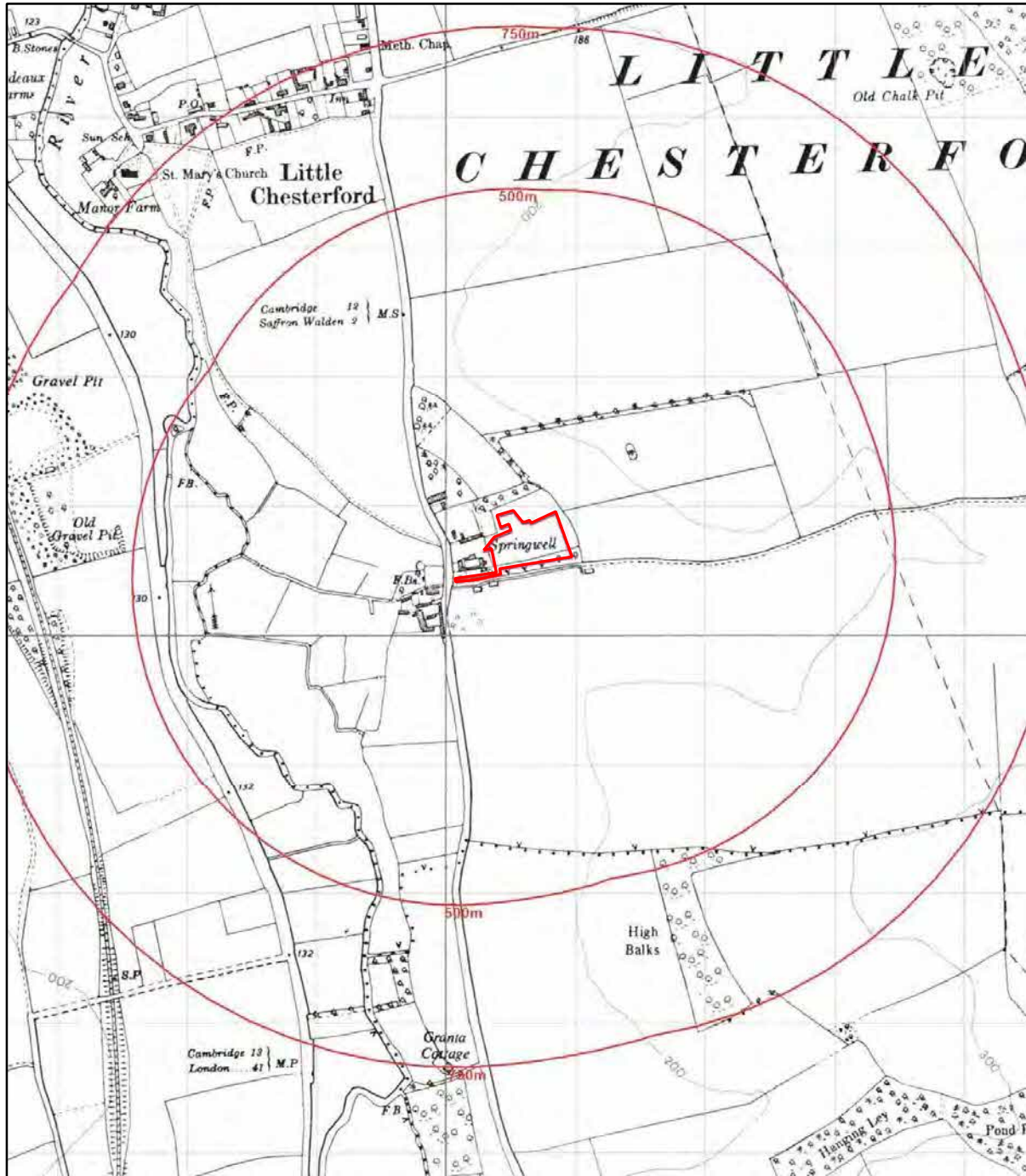
Project No.

C15347

Site History

Figure G

Reproduced from the 1960 edition Ordnance Survey sheet TL54SW at 1:10,560 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

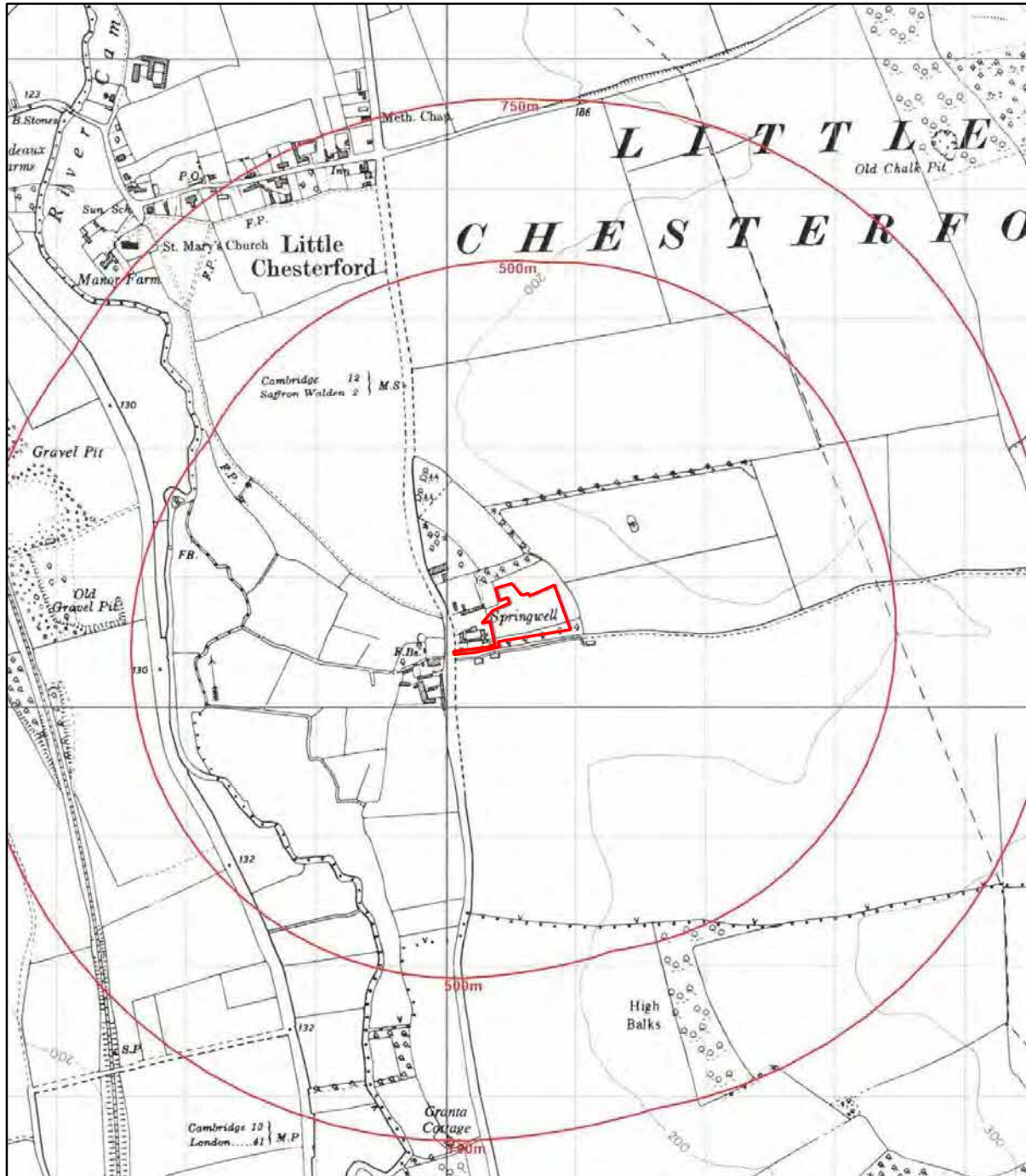
Project No.

C15347

Site History

Figure H

Reproduced from the 1971 edition Ordnance Survey sheet TL54SW at 1:10,000 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



Project : Springwell Nursery, Walden Road,
Little Chesterford

Client : BBR Architects

GROUND
ENGINEERING
LIMITED

Peterborough Tel : 01733 566566

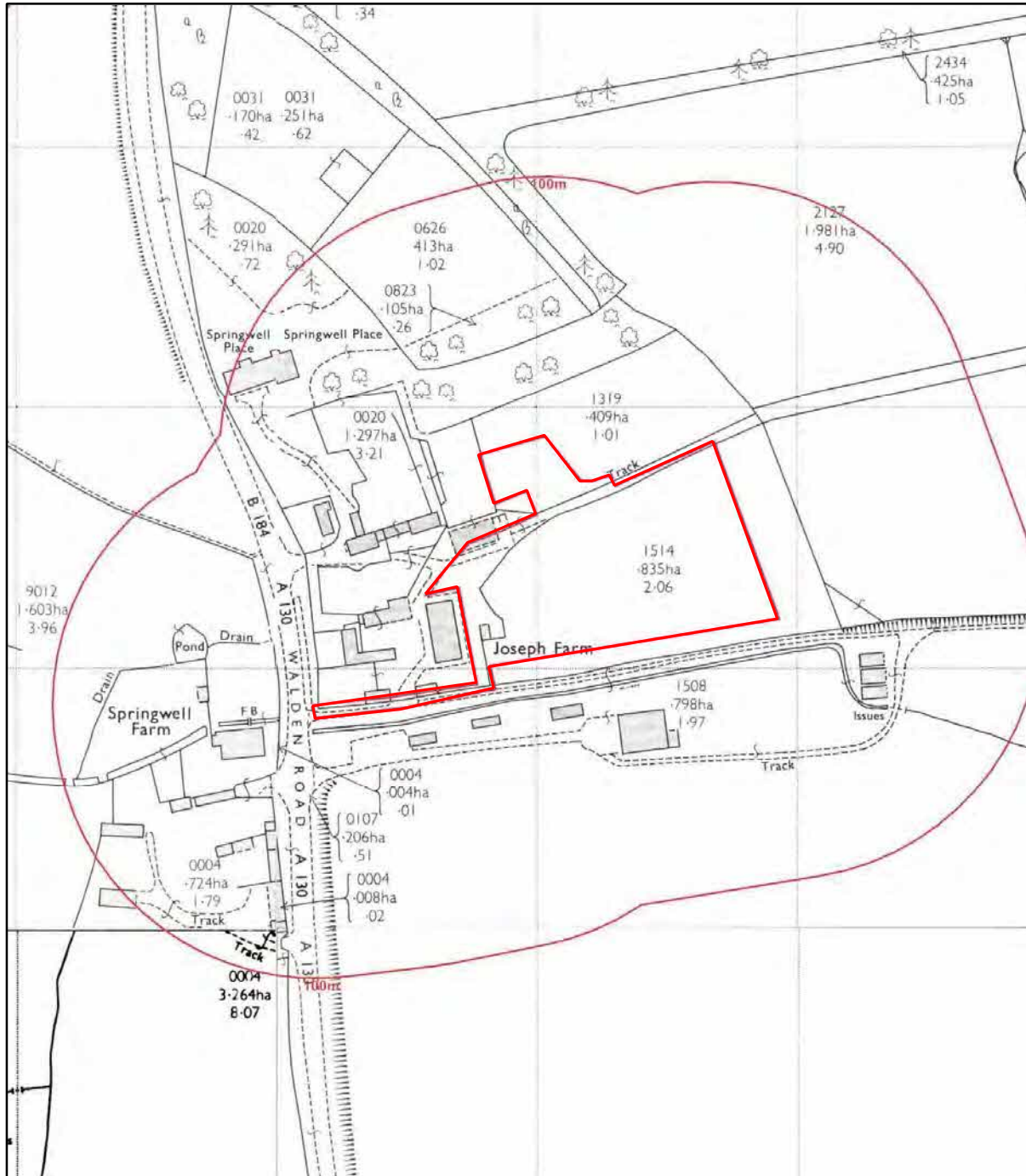
Project No.

C15347

Site History

Figure I

Reproduced from the 1981 edition Ordnance Survey sheet TL5241 at 1:2500 scale with the permission of the Controller of Her Majesty's Stationary Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Site History

Figure K

Reproduced from the 2003 edition Ordnance Survey sheet TL5241SW at 1:1250 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

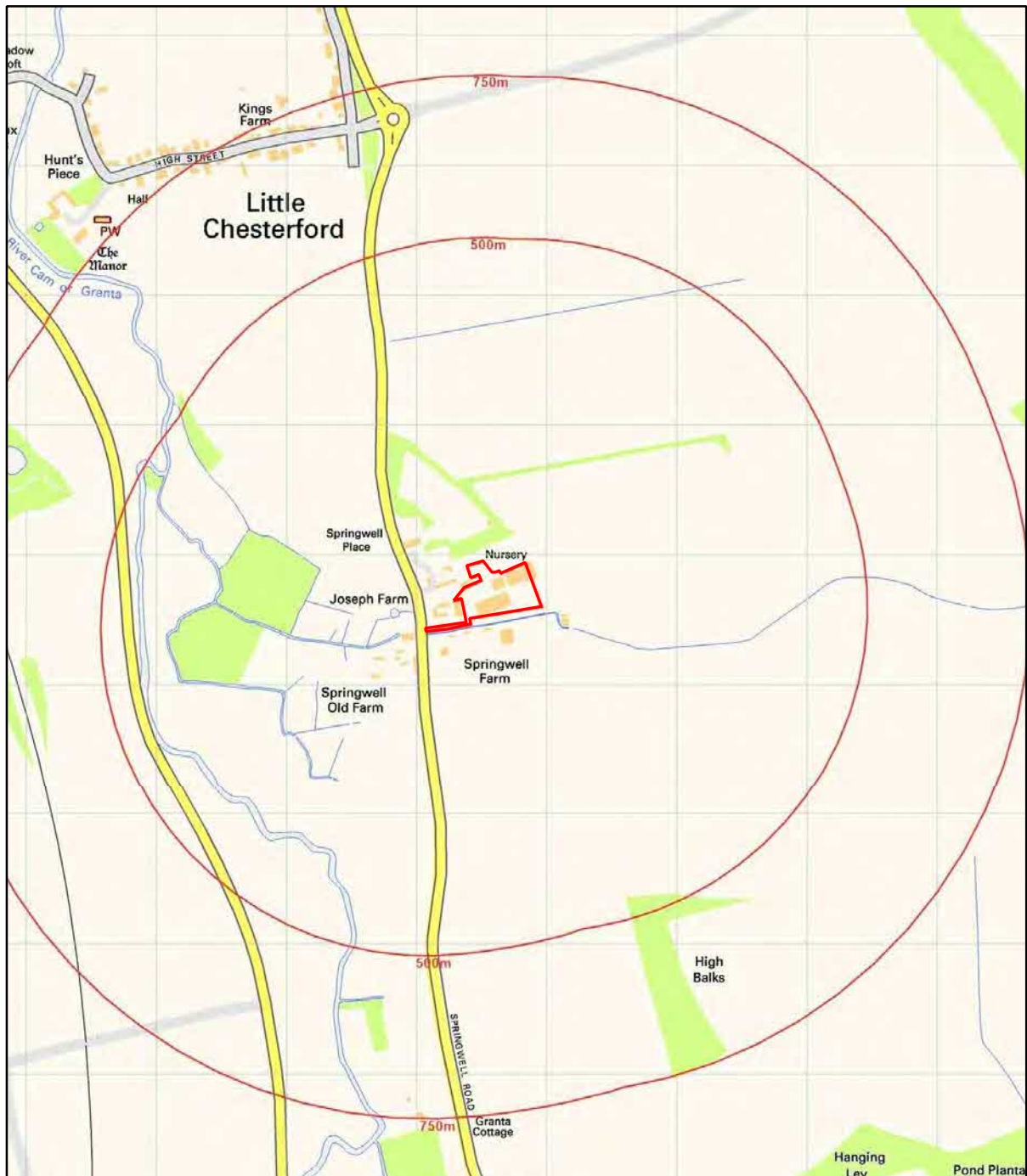
Project No.

C15347

Site History

Figure L

Reproduced from the 2010 edition Ordnance Survey sheet TL54SW at 1:10,000 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL100005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Site History

Figure M

Reproduced from the 2021 edition Ordnance Survey sheet TL54SW at 1:10,000 scale with the permission of the Controller of Her Majesty's Stationery Office, © Crown Copyright. All rights reserved. Licence number AL10005523



**Project : Springwell Nursery, Walden Road,
Little Chesterford**

Client : BBR Architects

**GROUND
ENGINEERING
LIMITED**

Peterborough Tel : 01733 566566

Project No.

C15347

Appendix 2

Environmental Database Information

SPRINGWELL NURSERY, WALDEN ROAD, LITTLE CHESTERFORD, CB10 1UE

Order Details

Date: 16/04/2021
Your ref: C15347
Our Ref: GS-7758998
Client: Ground Engineering Limited

Site Details

Location: 552128 241139
Area: 0.78 ha
Authority: [Uttlesford District Council](#)



Summary of findings

p. 2

Aerial image

p. 8

OS MasterMap site plan

p.13

groundsure.com/insightuserguide

Contact us with any questions at:

info@groundsure.com

08444 159 000

Summary of findings

Page	Section	Past land use	On site	0-50m	50-250m	250-500m	500-2000m
14	1.1	<u>Historical industrial land uses</u>	0	0	0	5	-
15	1.2	Historical tanks	0	0	0	0	-
15	1.3	Historical energy features	0	0	0	0	-
15	1.4	Historical petrol stations	0	0	0	0	-
16	1.5	Historical garages	0	0	0	0	-
16	1.6	Historical military land	0	0	0	0	-
Page	Section	Past land use - un-grouped	On site	0-50m	50-250m	250-500m	500-2000m
17	2.1	<u>Historical industrial land uses</u>	0	0	0	5	-
18	2.2	Historical tanks	0	0	0	0	-
18	2.3	Historical energy features	0	0	0	0	-
18	2.4	Historical petrol stations	0	0	0	0	-
18	2.5	Historical garages	0	0	0	0	-
Page	Section	Waste and landfill	On site	0-50m	50-250m	250-500m	500-2000m
19	3.1	Active or recent landfill	0	0	0	0	-
19	3.2	Historical landfill (BGS records)	0	0	0	0	-
20	3.3	Historical landfill (LA/mapping records)	0	0	0	0	-
20	3.4	<u>Historical landfill (EA/NRW records)</u>	0	0	0	1	-
20	3.5	Historical waste sites	0	0	0	0	-
20	3.6	Licensed waste sites	0	0	0	0	-
21	3.7	<u>Waste exemptions</u>	2	16	0	0	-
Page	Section	Current industrial land use	On site	0-50m	50-250m	250-500m	500-2000m
23	4.1	Recent industrial land uses	0	0	0	-	-
23	4.2	Current or recent petrol stations	0	0	0	0	-
24	4.3	Electricity cables	0	0	0	0	-
24	4.4	Gas pipelines	0	0	0	0	-
24	4.5	Sites determined as Contaminated Land	0	0	0	0	-



24	4.6	Control of Major Accident Hazards (COMAH)	0	0	0	0	-
24	4.7	Regulated explosive sites	0	0	0	0	-
25	4.8	Hazardous substance storage/usage	0	0	0	0	-
25	4.9	Historical licensed industrial activities (IPC)	0	0	0	0	-
25	4.10	Licensed industrial activities (Part A(1))	0	0	0	0	-
25	4.11	Licensed pollutant release (Part A(2)/B)	0	0	0	0	-
25	4.12	Radioactive Substance Authorisations	0	0	0	0	-
26	4.13	<u>Licensed Discharges to controlled waters</u>	0	1	0	0	-
26	4.14	Pollutant release to surface waters (Red List)	0	0	0	0	-
26	4.15	Pollutant release to public sewer	0	0	0	0	-
26	4.16	List 1 Dangerous Substances	0	0	0	0	-
27	4.17	List 2 Dangerous Substances	0	0	0	0	-
27	4.18	Pollution Incidents (EA/NRW)	0	0	0	0	-
27	4.19	Pollution inventory substances	0	0	0	0	-
27	4.20	Pollution inventory waste transfers	0	0	0	0	-
27	4.21	Pollution inventory radioactive waste	0	0	0	0	-

Page	Section	Hydrogeology	On site	0-50m	50-250m	250-500m	500-2000m
28	5.1	<u>Superficial aquifer</u>	Identified (within 500m)				
30	5.2	<u>Bedrock aquifer</u>	Identified (within 500m)				
31	5.3	<u>Groundwater vulnerability</u>	Identified (within 50m)				
32	5.4	<u>Groundwater vulnerability- soluble rock risk</u>	Identified (within 0m)				
32	5.5	Groundwater vulnerability- local information	None (within 0m)				
34	5.6	<u>Groundwater abstractions</u>	0	6	3	0	4
37	5.7	<u>Surface water abstractions</u>	0	0	0	3	5
39	5.8	<u>Potable abstractions</u>	0	0	1	0	0
40	5.9	<u>Source Protection Zones</u>	1	0	2	0	-
40	5.10	Source Protection Zones (confined aquifer)	0	0	0	0	-

Page	Section	Hydrology	On site	0-50m	50-250m	250-500m	500-2000m
41	6.1	<u>Water Network (OS MasterMap)</u>	0	7	22	-	-



44	<u>6.2</u>	<u>Surface water features</u>	0	3	14	-	-
44	<u>6.3</u>	<u>WFD Surface water body catchments</u>	1	-	-	-	-
45	<u>6.4</u>	<u>WFD Surface water bodies</u>	0	0	0	-	-
45	<u>6.5</u>	<u>WFD Groundwater bodies</u>	1	-	-	-	-
Page	Section	River and coastal flooding	On site	0-50m	50-250m	250-500m	500-2000m
46	<u>7.1</u>	<u>Risk of Flooding from Rivers and Sea (RoFRaS)</u>	Medium (within 50m)				
47	<u>7.2</u>	<u>Historical Flood Events</u>	0	0	1	-	-
47	7.3	Flood Defences	0	0	0	-	-
47	7.4	Areas Benefiting from Flood Defences	0	0	0	-	-
47	7.5	Flood Storage Areas	0	0	0	-	-
49	<u>7.6</u>	<u>Flood Zone 2</u>	Identified (within 50m)				
50	<u>7.7</u>	<u>Flood Zone 3</u>	Identified (within 50m)				
Page	Section	Surface water flooding					
51	<u>8.1</u>	<u>Surface water flooding</u>	1 in 30 year, 0.3m - 1.0m (within 50m)				
Page	Section	Groundwater flooding					
53	<u>9.1</u>	<u>Groundwater flooding</u>	Moderate-High (within 50m)				
Page	Section	Environmental designations	On site	0-50m	50-250m	250-500m	500-2000m
54	10.1	Sites of Special Scientific Interest (SSSI)	0	0	0	0	0
55	10.2	Conserved wetland sites (Ramsar sites)	0	0	0	0	0
55	10.3	Special Areas of Conservation (SAC)	0	0	0	0	0
55	10.4	Special Protection Areas (SPA)	0	0	0	0	0
55	10.5	National Nature Reserves (NNR)	0	0	0	0	0
56	10.6	Local Nature Reserves (LNR)	0	0	0	0	0
56	<u>10.7</u>	<u>Designated Ancient Woodland</u>	0	0	0	0	6
56	10.8	Biosphere Reserves	0	0	0	0	0
57	10.9	Forest Parks	0	0	0	0	0
57	10.10	Marine Conservation Zones	0	0	0	0	0
57	10.11	Green Belt	0	0	0	0	0
57	10.12	Proposed Ramsar sites	0	0	0	0	0



57	10.13	Possible Special Areas of Conservation (pSAC)	0	0	0	0	0
58	10.14	Potential Special Protection Areas (pSPA)	0	0	0	0	0
58	10.15	Nitrate Sensitive Areas	0	0	0	0	0
58	10.16	<u>Nitrate Vulnerable Zones</u>	2	0	0	0	2
59	10.17	<u>SSSI Impact Risk Zones</u>	1	-	-	-	-
60	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
61	11.1	World Heritage Sites	0	0	0	-	-
62	11.2	Area of Outstanding Natural Beauty	0	0	0	-	-
62	11.3	National Parks	0	0	0	-	-
62	11.4	<u>Listed Buildings</u>	0	3	0	-	-
63	11.5	Conservation Areas	0	0	0	-	-
63	11.6	Scheduled Ancient Monuments	0	0	0	-	-
63	11.7	Registered Parks and Gardens	0	0	0	-	-
Page	Section	Agricultural designations	On site	0-50m	50-250m	250-500m	500-2000m
64	12.1	<u>Agricultural Land Classification</u>	Grade 3 (within 250m)				
65	12.2	Open Access Land	0	0	0	-	-
65	12.3	Tree Felling Licences	0	0	0	-	-
65	12.4	Environmental Stewardship Schemes	0	0	0	-	-
66	12.5	Countryside Stewardship Schemes	0	0	0	-	-
Page	Section	Habitat designations	On site	0-50m	50-250m	250-500m	500-2000m
67	13.1	<u>Priority Habitat Inventory</u>	0	0	1	-	-
68	13.2	Habitat Networks	0	0	0	-	-
68	13.3	Open Mosaic Habitat	0	0	0	-	-
68	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
69	14.1	<u>10k Availability</u>	Identified (within 500m)				
70	14.2	Artificial and made ground (10k)	0	0	0	0	-
71	14.3	<u>Superficial geology (10k)</u>	0	1	1	3	-

72	14.4	Landslip (10k)	0	0	0	0	-
73	14.5	<u>Bedrock geology (10k)</u>	1	0	2	0	-
74	14.6	Bedrock faults and other linear features (10k)	0	0	0	0	-
Page	Section	Geology 1:50,000 scale	On site	0-50m	50-250m	250-500m	500-2000m
75	15.1	<u>50k Availability</u>	Identified (within 500m)				
76	15.2	Artificial and made ground (50k)	0	0	0	0	-
76	15.3	Artificial ground permeability (50k)	0	0	-	-	-
77	15.4	<u>Superficial geology (50k)</u>	0	1	1	3	-
78	15.5	<u>Superficial permeability (50k)</u>	Identified (within 50m)				
78	15.6	Landslip (50k)	0	0	0	0	-
78	15.7	Landslip permeability (50k)	None (within 50m)				
79	15.8	<u>Bedrock geology (50k)</u>	1	0	2	0	-
80	15.9	<u>Bedrock permeability (50k)</u>	Identified (within 50m)				
80	15.10	Bedrock faults and other linear features (50k)	0	0	0	0	-
Page	Section	Boreholes	On site	0-50m	50-250m	250-500m	500-2000m
81	16.1	BGS Boreholes	0	0	0	-	-
Page	Section	Natural ground subsidence					
82	17.1	<u>Shrink swell clays</u>	Very low (within 50m)				
83	17.2	<u>Running sands</u>	Low (within 50m)				
85	17.3	<u>Compressible deposits</u>	Moderate (within 50m)				
87	17.4	<u>Collapsible deposits</u>	Very low (within 50m)				
88	17.5	<u>Landslides</u>	Very low (within 50m)				
90	17.6	<u>Ground dissolution of soluble rocks</u>	Very low (within 50m)				
Page	Section	Mining, ground workings and natural cavities	On site	0-50m	50-250m	250-500m	500-2000m
92	18.1	Natural cavities	0	0	0	0	-
93	18.2	BritPits	0	0	0	0	-
93	18.3	Surface ground workings	0	0	0	-	-
93	18.4	Underground workings	0	0	0	0	0
93	18.5	Historical Mineral Planning Areas	0	0	0	0	-

93	18.6	<u>Non-coal mining</u>		1	0	0	1	0
94	18.7	Mining cavities		0	0	0	0	0
94	18.8	JPB mining areas		None (within 0m)				
94	18.9	Coal mining		None (within 0m)				
94	18.10	Brine areas		None (within 0m)				
95	18.11	Gypsum areas		None (within 0m)				
95	18.12	Tin mining		None (within 0m)				
95	18.13	Clay mining		None (within 0m)				
Page	Section	Radon						
96	19.1	<u>Radon</u>	Less than 1% (within 0m)					
Page	Section	Soil chemistry	On site	0-50m	50-250m	250-500m	500-2000m	
97	20.1	<u>BGS Estimated Background Soil Chemistry</u>	1	2	-	-	-	
97	20.2	BGS Estimated Urban Soil Chemistry	0	0	-	-	-	
97	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	
98	21.1	Underground railways (London)	0	0	0	-	-	
98	21.2	Underground railways (Non-London)	0	0	0	-	-	
98	21.3	Railway tunnels	0	0	0	-	-	
98	21.4	Historical railway and tunnel features	0	0	0	-	-	
98	21.5	Royal Mail tunnels	0	0	0	-	-	
99	21.6	Historical railways	0	0	0	-	-	
99	21.7	Railways	0	0	0	-	-	
99	21.8	Crossrail 1	0	0	0	0	-	
99	21.9	Crossrail 2	0	0	0	0	-	
99	21.10	HS2	0	0	0	0	-	

Recent aerial photograph

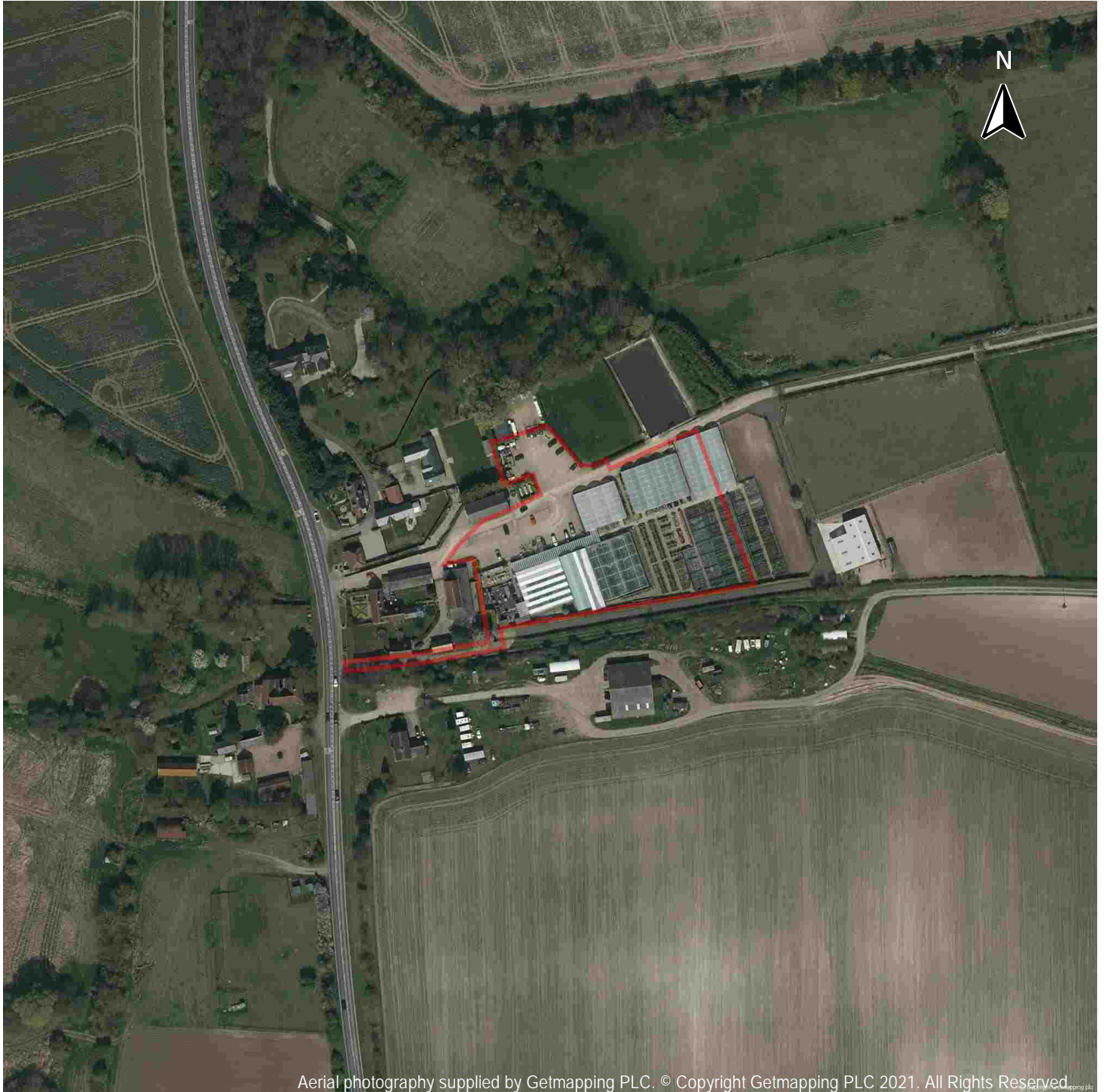


Capture Date: 05/04/2020

Site Area: 0.78ha



Recent site history - 2017 aerial photograph

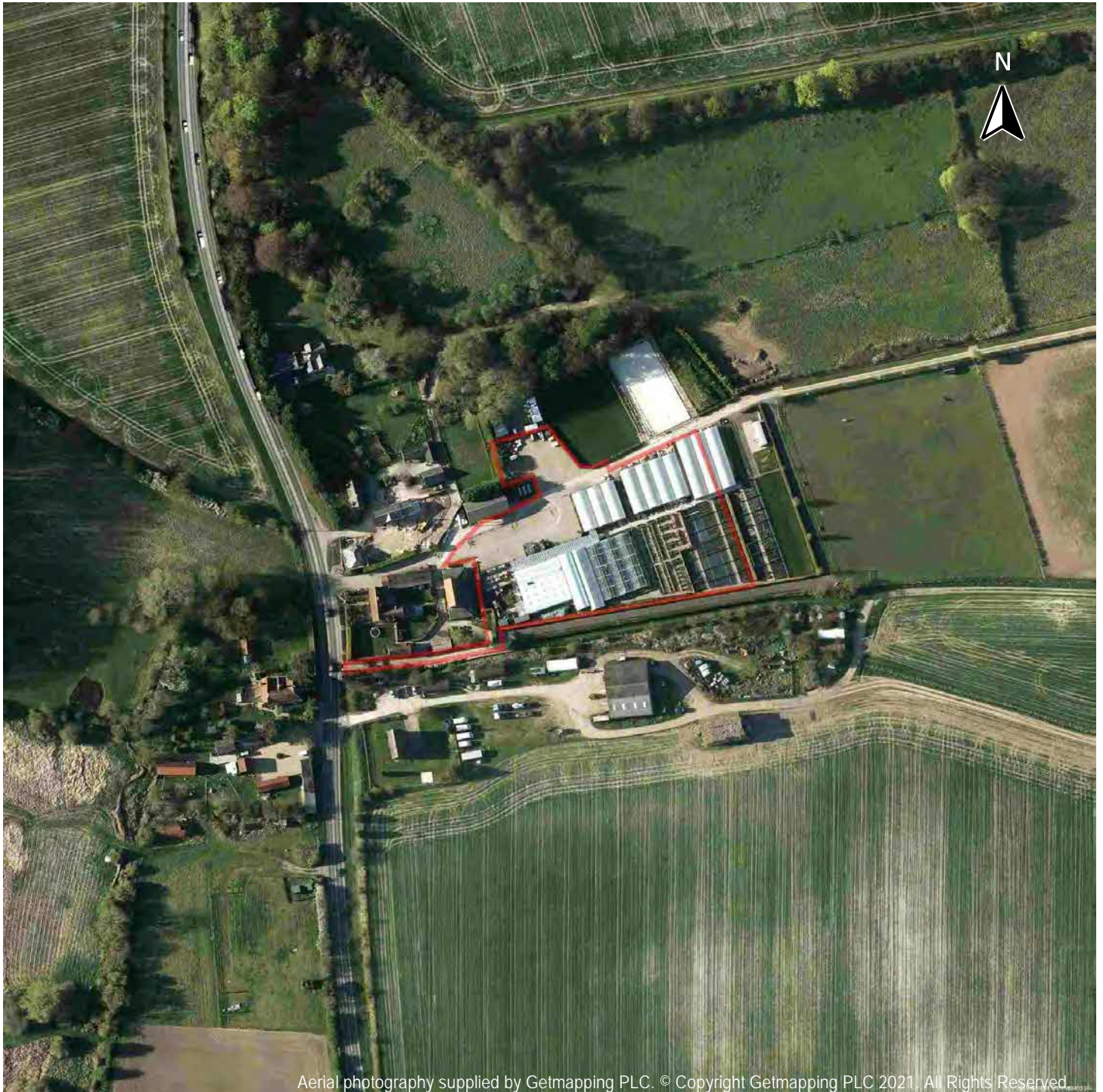


Capture Date: 09/04/2017

Site Area: 0.78ha



Recent site history - 2013 aerial photograph



Capture Date: 01/05/2013

Site Area: 0.78ha



Recent site history - 2007 aerial photograph

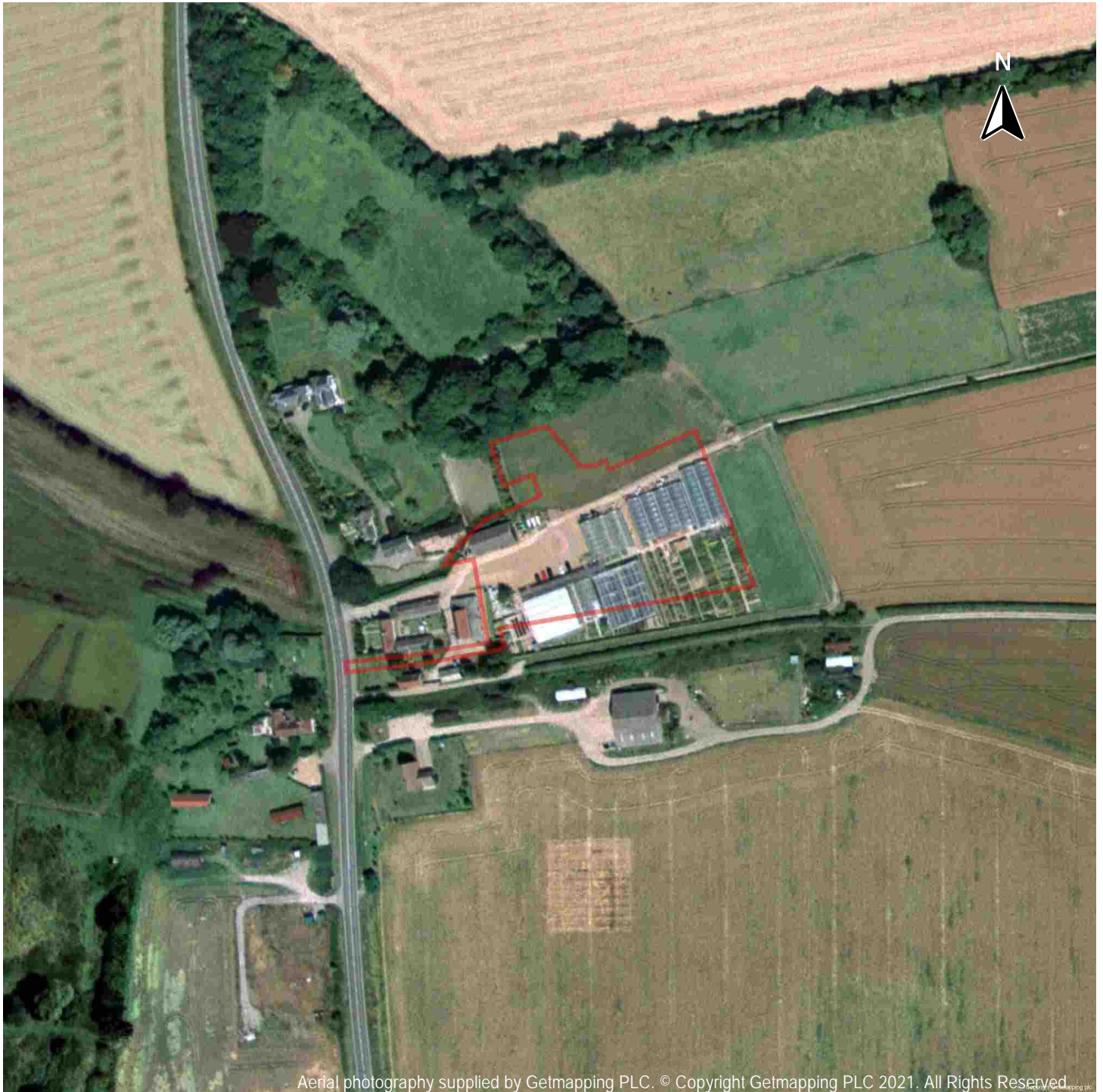


Capture Date: 26/03/2007

Site Area: 0.78ha



Recent site history - 1999 aerial photograph



Capture Date: 18/07/1999

Site Area: 0.78ha



OS MasterMap site plan




Site Area: 0.78ha



1 Past land use



- Site Outline
- Search buffers in metres (m)
-  Historical industrial land uses

© Crown copyright and database rights 2021. Ordnance Survey licence 100035207

1.1 Historical industrial land uses

Records within 500m **5**

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 14**

ID	Location	Land use	Dates present	Group ID
1	331m NW	Malthouse	1877	2053457

ID	Location	Land use	Dates present	Group ID
A	420m W	Unspecified Pit	1877	2041436
A	458m W	Unspecified Pit	1877	2041439
2	467m SW	Sand Pit	1877	2057212
A	481m W	Grave Yard	1877	2050790

This data is sourced from Ordnance Survey / Groundsure.

1.2 Historical tanks

Records within 500m **0**

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'.

This data is sourced from Ordnance Survey / Groundsure.

1.3 Historical energy features

Records within 500m **0**

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'.

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

0

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'.

This data is sourced from Ordnance Survey / Groundsure.

1.6 Historical military land

Records within 500m

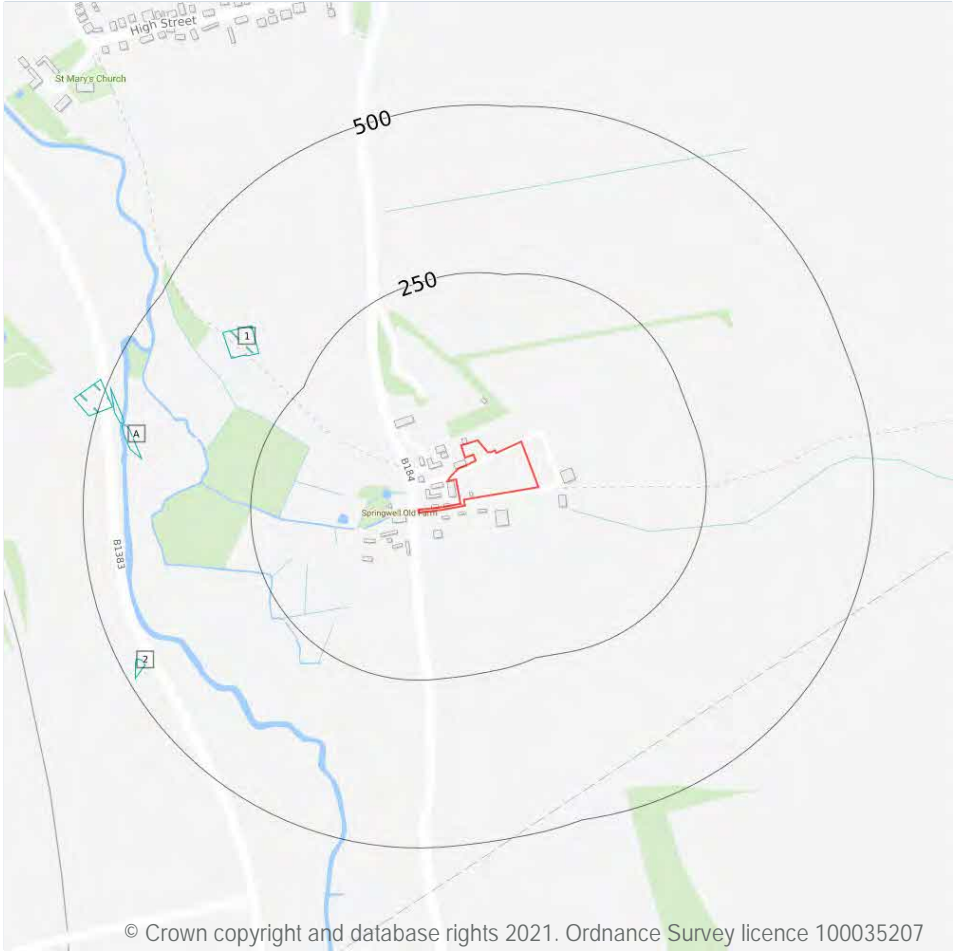
0

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

2.1 Historical industrial land uses

Records within 500m **5**

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 17**

ID	Location	Land Use	Date	Group ID
1	331m NW	Malthouse	1877	2053457
A	420m W	Unspecified Pit	1877	2041436
A	458m W	Unspecified Pit	1877	2041439

ID	Location	Land Use	Date	Group ID
2	467m SW	Sand Pit	1877	2057212
A	481m W	Grave Yard	1877	2050790

This data is sourced from Ordnance Survey / Groundsure.

2.2 Historical tanks

Records within 500m **0**

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'.

This data is sourced from Ordnance Survey / Groundsure.

2.3 Historical energy features

Records within 500m **0**

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'.

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.

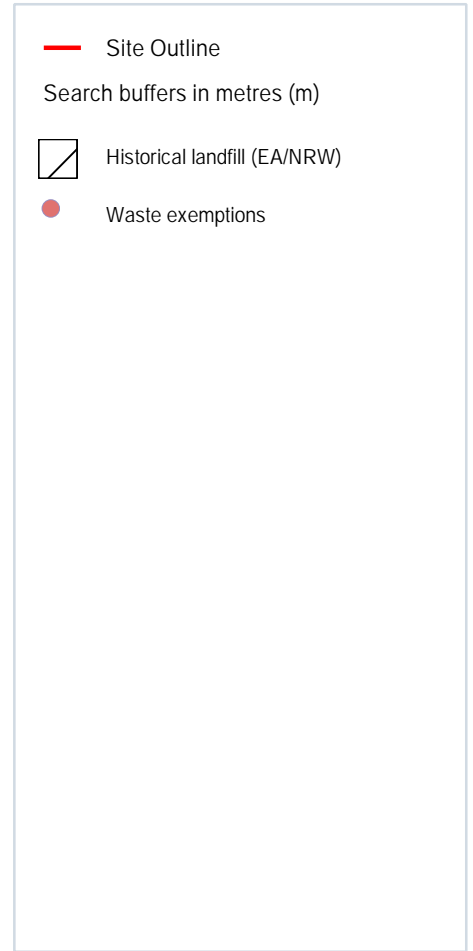
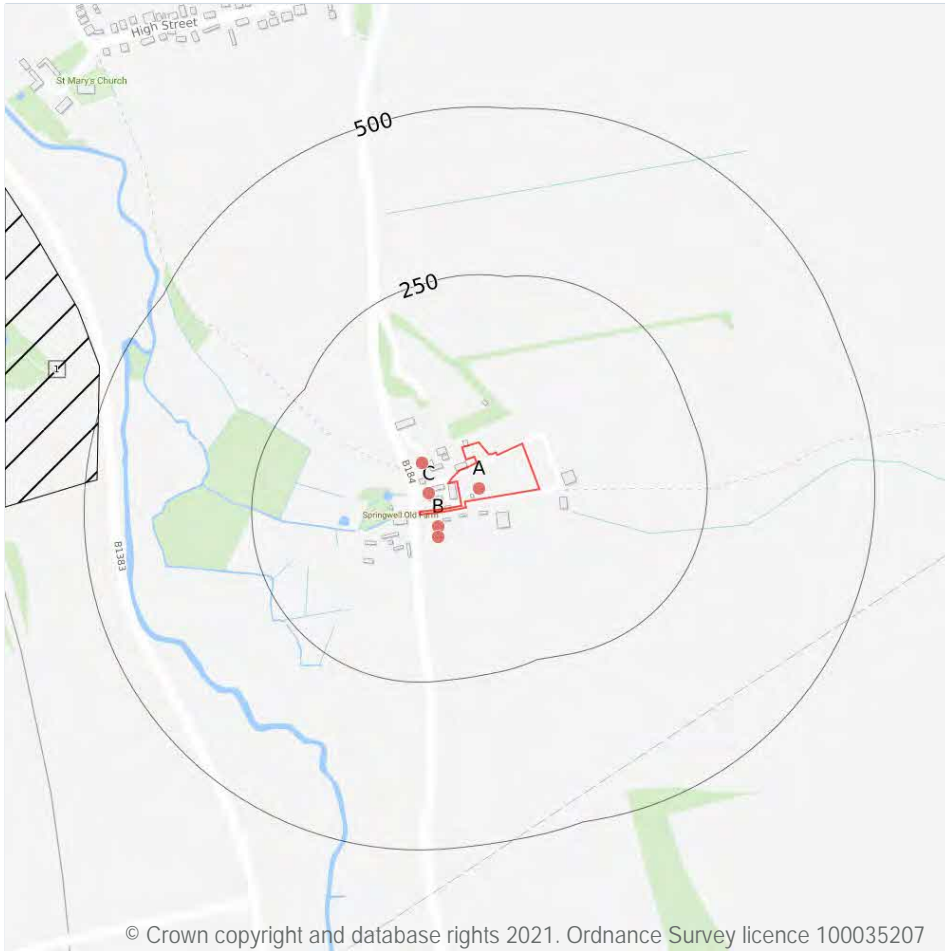
2.5 Historical garages

Records within 500m **0**

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'.

This data is sourced from Ordnance Survey / Groundsure.

3 Waste and landfill



© Crown copyright and database rights 2021. Ordnance Survey licence 100035207

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 19**

ID	Location	Details		
1	482m W	Site Address: Bordeaux Farm, London Road, Little Chesterford Licence Holder Address: -	Waste Licence: - Site Reference: UTT015 Waste Type: Inert, Commercial, Household Environmental Permitting Regulations (Waste) Reference: - Licence Issue: - Licence Surrender: -	Operator: Saffron Walden Rural District Council Licence Holder: - First Recorded: - Last Recorded: -

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

3.5 Historical waste sites

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

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

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

3.6 Licensed waste sites

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

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

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

3.7 Waste exemptions

Records within 500m	18
---------------------	-----------

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 19**

ID	Location	Site	Reference	Category	Sub-Category	Description
A	On site	WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX211477	Disposing of waste exemption	On a Farm	Burning waste in the open
A	On site	WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX066532	Disposing of waste exemption	On a farm	Burning waste in the open
B	21m S	Springwell Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/HH0774P Z/A001	Disposing of waste exemption	Agricultural Waste Only	Deposit of waste from dredging of inland waters
B	21m S	Springwell Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/HH0774P Z/A001	Disposing of waste exemption	Agricultural Waste Only	Burning waste in the open
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX210909	Using waste exemption	On a Farm	Spreading waste on agricultural land to confer benefit
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX210909	Disposing of waste exemption	On a Farm	Deposit of waste from dredging of inland waters
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX210909	Disposing of waste exemption	On a Farm	Burning waste in the open
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX066536	Disposing of waste exemption	On a farm	Deposit of waste from dredging of inland waters
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX066536	Disposing of waste exemption	On a farm	Burning waste in the open





ID	Location	Site	Reference	Category	Sub-Category	Description
C	25m N	JOSEPH FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX066536	Using waste exemption	On a farm	Spreading waste on agricultural land to confer benefit
B	37m S	SPRINGWELL FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX010133	Disposing of waste exemption	On a farm	Deposit of waste from dredging of inland waters
B	37m S	SPRINGWELL FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX010133	Disposing of waste exemption	On a farm	Deposit of agricultural waste consisting of plant tissue under a Plant Health notice
B	37m S	SPRINGWELL FARM, WALDEN ROAD, LITTLE CHESTERFORD, SAFFRON WALDEN, CB10 1UE	WEX010133	Storing waste exemption	On a farm	Storage of waste in a secure place
C	49m NW	npa - Nursery 27m From Springwell Nursery & Garden Centre, Walden CB10 1UE	EPR/QF0739K R/A001	Disposing of waste exemption	Both agricultural and non-agricultural waste	Burning waste in the open
C	49m NW	Joseph Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/KF0637KG /A001	Disposing of waste exemption	Agricultural Waste Only	Deposit of waste from dredging of inland waters
C	49m NW	Joseph Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/KF0637KG /A001	Disposing of waste exemption	Agricultural Waste Only	Burning waste in the open
C	49m NW	Joseph Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/KF0637KG /A001	Using waste exemption	Agricultural Waste Only	Spreading waste on agricultural land to confer benefit
C	49m NW	Joseph Farm Walden Road SAFFRON WALDEN Essex CB10 1UE	EPR/KF0637KG /A001	Using waste exemption	Agricultural Waste Only	Spreading of plant matter to confer benefit

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



4 Current industrial land use



-  Site Outline
- Search buffers in metres (m)
-  Licensed Discharges to controlled waters

4.1 Recent industrial land uses

Records within 250m

0

Current potentially contaminative industrial sites.

This data is sourced from Ordnance Survey.

4.2 Current or recent petrol stations

Records within 500m

0

Open, closed, under development and obsolete petrol stations.

This data is sourced from Experian.

4.3 Electricity cables

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

High voltage underground electricity transmission cables.

This data is sourced from National Grid.

4.4 Gas pipelines

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

High pressure underground gas transmission pipelines.

This data is sourced from National Grid.

4.5 Sites determined as Contaminated Land

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

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

This data is sourced from Local Authority records.

4.6 Control of Major Accident Hazards (COMAH)

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

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

This data is sourced from the Health and Safety Executive.

4.7 Regulated explosive sites

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

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

This data is sourced from the Health and Safety Executive.

4.8 Hazardous substance storage/usage

Records within 500m

0

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

This data is sourced from Local Authority records.

4.9 Historical licensed industrial activities (IPC)

Records within 500m

0

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

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

4.10 Licensed industrial activities (Part A(1))

Records within 500m

0

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

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

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

Records within 500m

0

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.

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

1

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 23**

ID	Location	Address	Details	
1	12m S	SPRINGWELL FARM, LITTLE CHESTERFORD, SAFFRON WALDEN, ESSEX	Effluent Type: SEWAGE DISCHARGES - FINAL/TREATED EFFLUENT - NOT WATER COMPANY Permit Number: PR1NF2393 Permit Version: 1 Receiving Water: Trib River Cam	Status: PRE NRA LEGISLATION WHERE ISSUE DATE 01-SEP-89 (HISTORIC ONLY) Issue date: 19/08/1986 Effective Date: 19/08/1986 Revocation Date: 02/03/1992

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

4.14 Pollutant release to surface waters (Red List)

Records within 500m

0

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

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

4.15 Pollutant release to public sewer

Records within 500m

0

Discharges of Special Category Effluents to the public sewer.

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

4.16 List 1 Dangerous Substances

Records within 500m

0

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

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



4.17 List 2 Dangerous Substances

Records within 500m

0

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

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

4.18 Pollution Incidents (EA/NRW)

Records within 500m

0

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

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

4.19 Pollution inventory substances

Records within 500m

0

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

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

4.20 Pollution inventory waste transfers

Records within 500m

0

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

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

4.21 Pollution inventory radioactive waste

Records within 500m

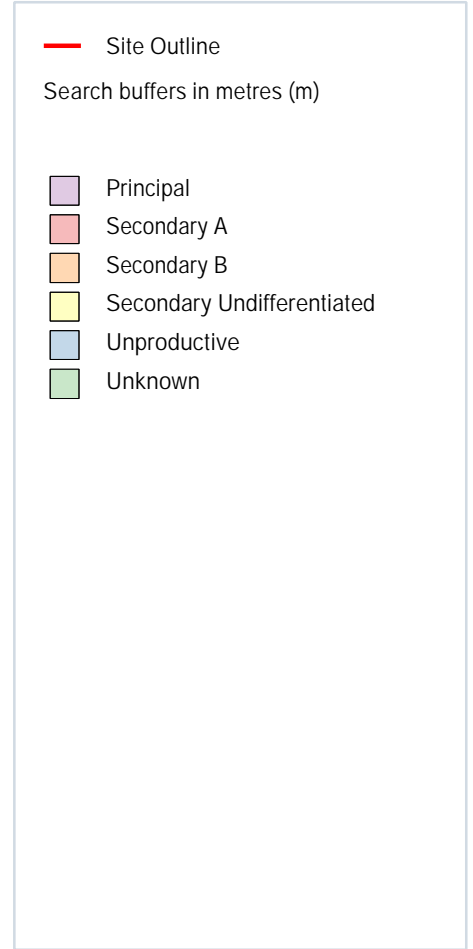
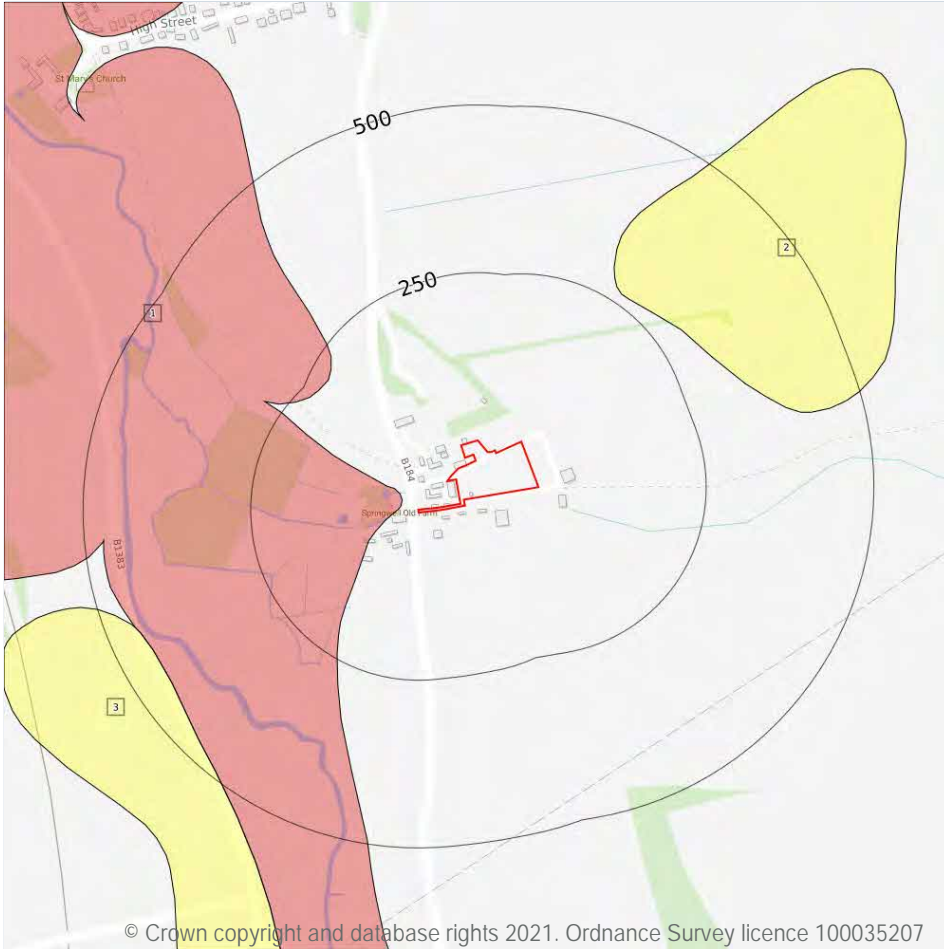
0

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

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



5 Hydrogeology - Superficial aquifer



5.1 Superficial aquifer

Records within 500m

3

Aquifer status of groundwater held within superficial geology.

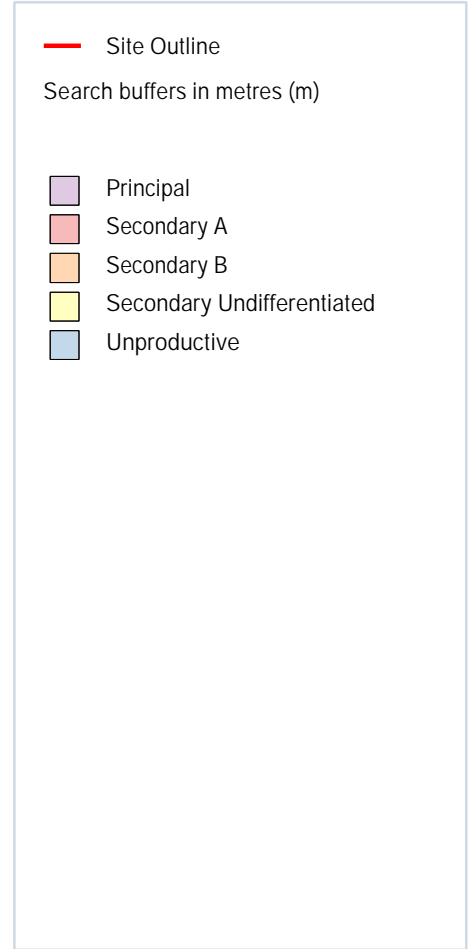
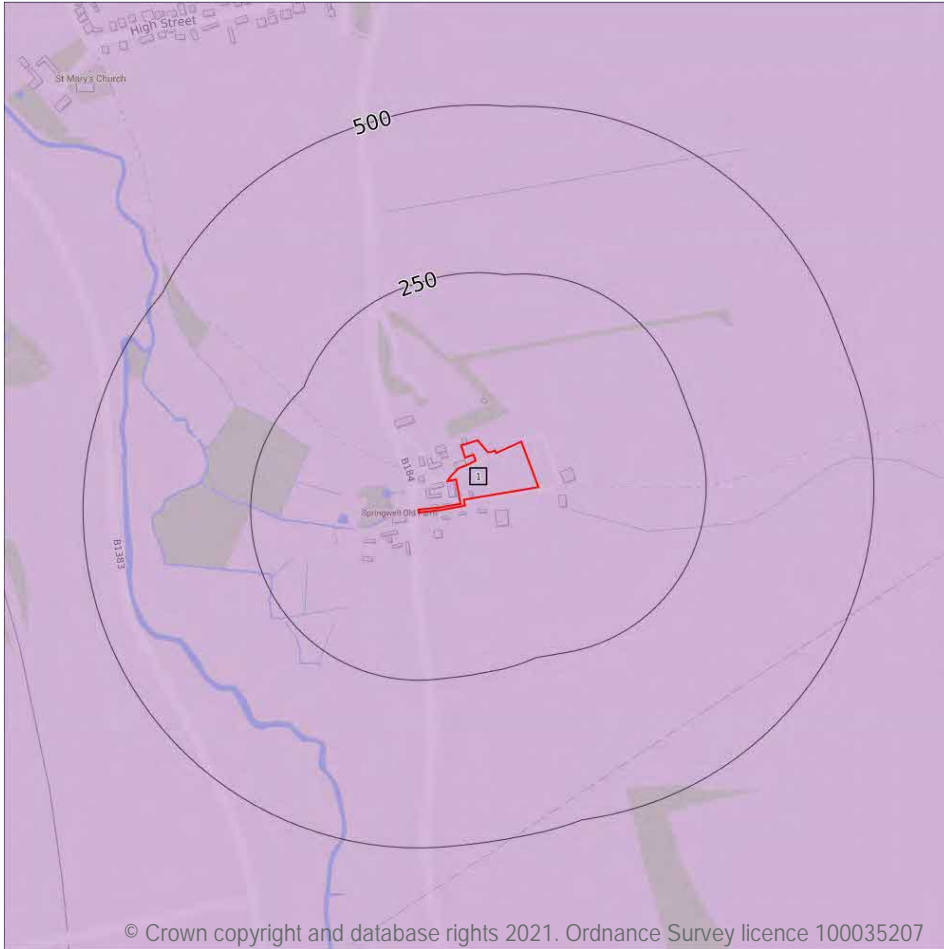
Features are displayed on the Hydrogeology map on **page 28**

ID	Location	Designation	Description
1	27m 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
2	266m NE	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

ID	Location	Designation	Description
3	445m SW	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

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

Bedrock aquifer



5.2 Bedrock aquifer

Records within 500m

1

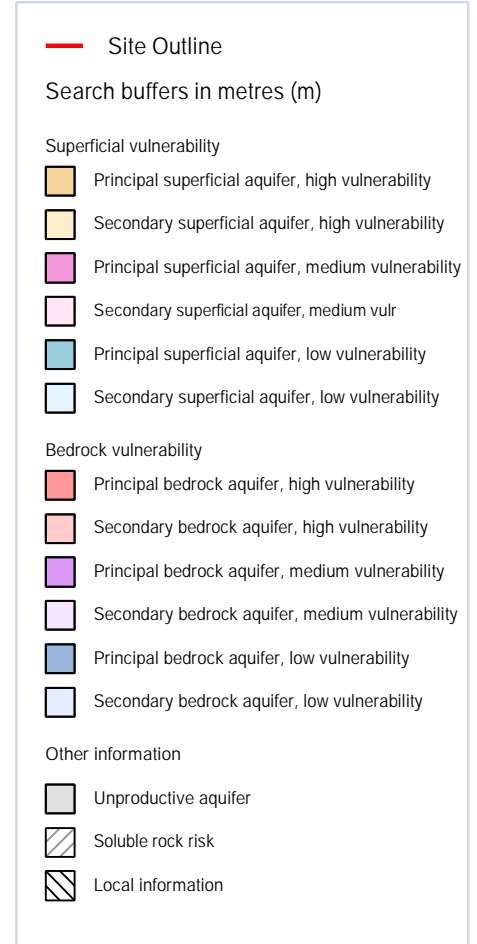
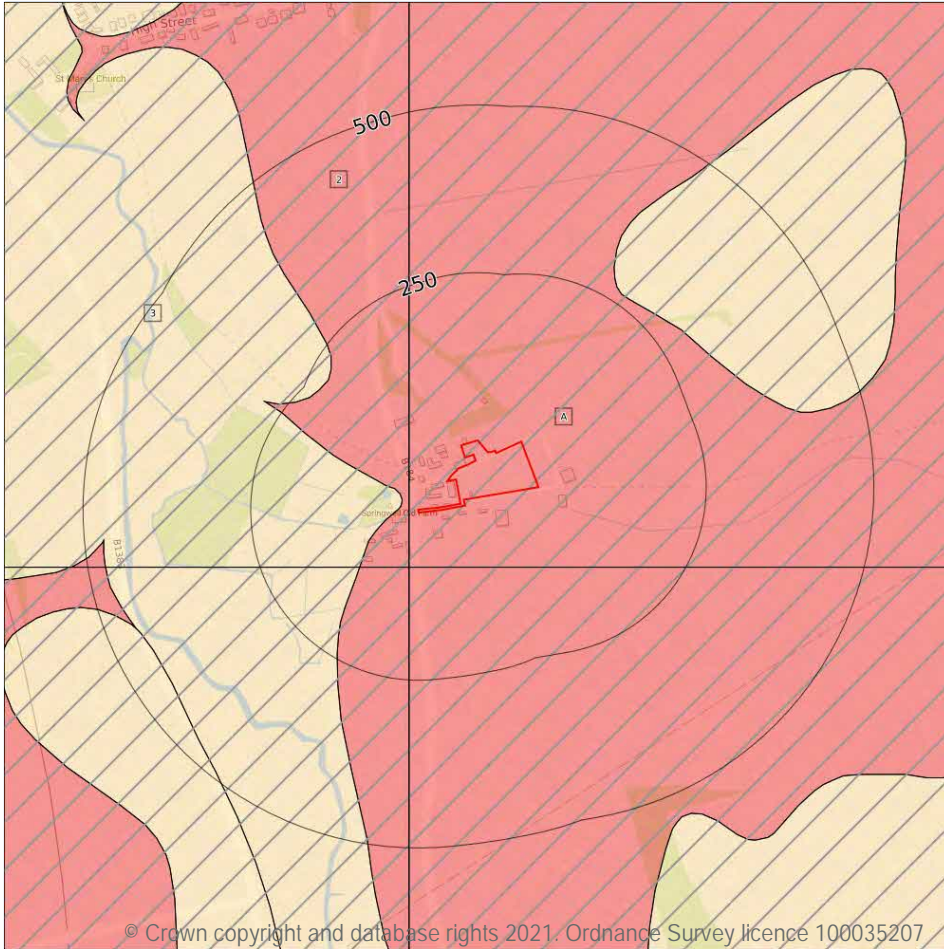
Aquifer status of groundwater held within bedrock geology.

Features are displayed on the Bedrock aquifer map on [page 30](#)

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

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

3

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 31**

ID	Location	Summary	Soil / surface	Superficial geology	Bedrock geology
A	On site	Summary Classification: Principal bedrock aquifer - High Vulnerability Combined classification: Productive Bedrock Aquifer, No Superficial Aquifer	Leaching class: High Infiltration value: >70% Dilution value: <300mm/year	Vulnerability: - Aquifer type: - Thickness: <3m Patchiness value: <90% Recharge potential: Low	Vulnerability: High Aquifer type: Principal Flow mechanism: Well connected fractures
2	14m W	Summary Classification: Principal bedrock aquifer - High Vulnerability Combined classification: Productive Bedrock Aquifer, No Superficial Aquifer	Leaching class: Intermediate Infiltration value: >70% Dilution value: <300mm/year	Vulnerability: - Aquifer type: - Thickness: 3-10m Patchiness value: <90% Recharge potential: No Data	Vulnerability: High Aquifer type: Principal Flow mechanism: Well connected fractures
3	26m W	Summary Classification: Secondary superficial aquifer - High Vulnerability Combined classification: Productive Bedrock Aquifer, Productive Superficial Aquifer	Leaching class: Intermediate Infiltration value: >70% Dilution value: <300mm/year	Vulnerability: High Aquifer type: Secondary Thickness: 3-10m Patchiness value: <90% Recharge potential: No Data	Vulnerability: High 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

1

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

ID	Maximum soluble risk category	Percentage of grid square covered by maximum risk
A	Significant soluble rocks are likely to be present. Low possibility of localised subsidence or dissolution-related degradation of bedrock occurring naturally, but may be possible in adverse conditions such as high surface or subsurface water flow.	6.0%

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

5.5 Groundwater vulnerability- local information

Records on site

0

This dataset identifies areas where additional local information affecting vulnerability is held by the Environment Agency. Further information can be obtained by contacting the Environment Agency local Area groundwater team through the Environment Agency National Customer Call Centre on 03798 506 506 or by

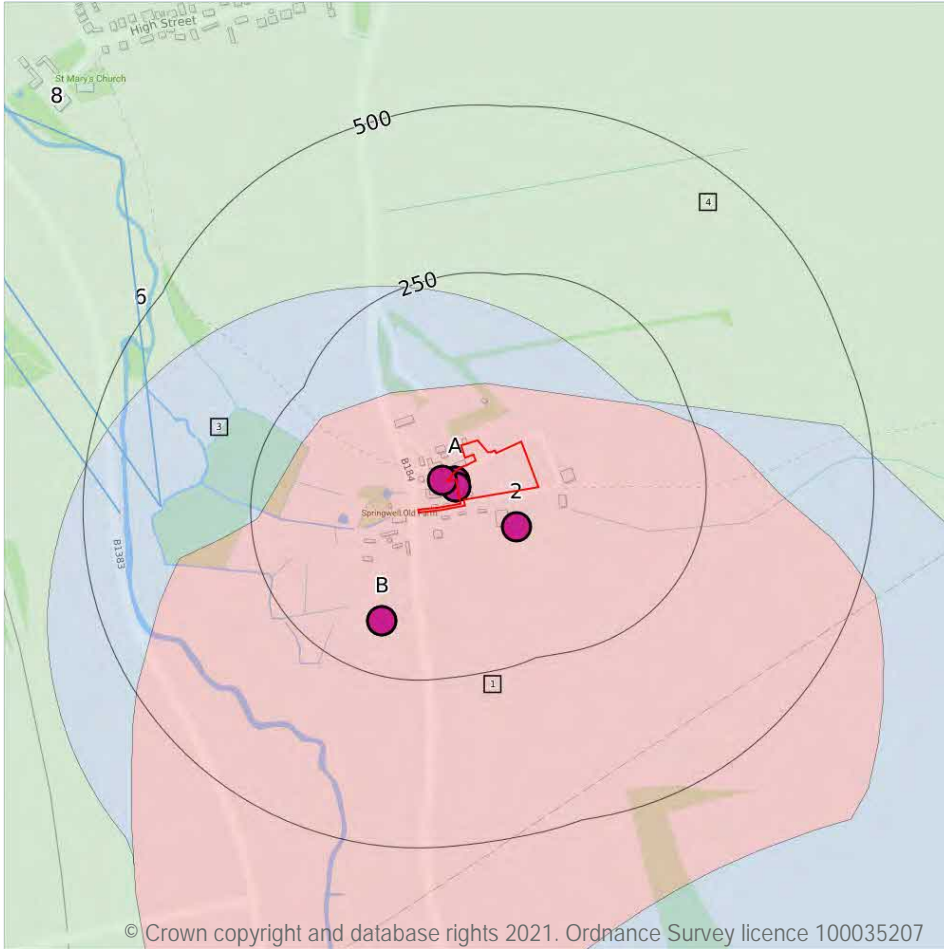


email on enquiries@environment-agency.gov.uk.

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



Abstractions and Source Protection Zones



5.6 Groundwater abstractions

Records within 2000m

13

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 34**

ID	Location	Details	
A	1m W	Status: Historical Licence No: 6/33/27/*G/0138 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT LITTLE CHESTERFORD Data Type: Point Name: SPRINGWELL NURSERY LTD Easting: 552069 Northing: 241128	Annual Volume (m ³): 5000 Max Daily Volume (m ³): 40 Original Application No: - Original Start Date: 12/09/2007 Expiry Date: 31/03/2015 Issue No: 1 Version Start Date: 01/04/2008 Version End Date: -
A	1m W	Status: Historical Licence No: 6/33/27/*G/0138/R01 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT LITTLE CHESTERFORD Data Type: Point Name: SPRINGWELL NURSERY LTD Easting: 552069 Northing: 241128	Annual Volume (m ³): 5000 Max Daily Volume (m ³): 40 Original Application No: - Original Start Date: 01/04/2015 Expiry Date: 31/03/2018 Issue No: 1 Version Start Date: 01/04/2015 Version End Date: -
A	1m W	Status: Active Licence No: 6/33/27/*G/0138/R02 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT LITTLE CHESTERFORD Data Type: Point Name: SPRINGWELL NURSERY LTD Easting: 552069 Northing: 241128	Annual Volume (m ³): 4,000 Max Daily Volume (m ³): 40 Original Application No: - Original Start Date: 01/04/2018 Expiry Date: 31/03/2024 Issue No: 1 Version Start Date: 01/04/2018 Version End Date: -
A	2m W	Status: Historical Licence No: 6/33/27/*G/0127 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT LITTLE CHESTERFORD Data Type: Point Name: SPRINGWELL NURSERY LTD Easting: 552070 Northing: 241120	Annual Volume (m ³): 5000 Max Daily Volume (m ³): 40 Original Application No: - Original Start Date: 10/07/1998 Expiry Date: 31/12/2007 Issue No: 102 Version Start Date: 01/03/2003 Version End Date: -
A	2m W	Status: Historical Licence No: 6/33/27/*G/0138 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT LITTLE CHESTERFORD Data Type: Point Name: SPRINGWELL NURSERY LTD Easting: 552070 Northing: 241120	Annual Volume (m ³): 5000 Max Daily Volume (m ³): 40 Original Application No: - Original Start Date: 12/09/2007 Expiry Date: 31/03/2015 Issue No: 1 Version Start Date: 01/04/2008 Version End Date: -



ID	Location	Details	
A	7m W	Status: Historical Licence No: 6/33/27/*G/0126 Details: General Farming & Domestic Direct Source: GROUND WATER SOURCE OF SUPPLY Point: WELL AT LITTLE CHESTERFORD Data Type: Point Name: RICHARDSON Easting: 552050 Northing: 241130	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/02/1998 Expiry Date: - Issue No: 100 Version Start Date: 01/02/1998 Version End Date: -
2	53m S	Status: Historical Licence No: 6/33/27/*G/0017 Details: General Farming & Domestic Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE AT SPRINGWELL FARM Data Type: Point Name: PUMFREY Easting: 552160 Northing: 241060	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/06/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/12/1996 Version End Date: -
B	170m S	Status: Active Licence No: 6/33/27/*G/0082 Details: Potable Water Supply - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: SPRINGWELL SOURCE Data Type: Point Name: Affinity Water Limited Easting: 551960 Northing: 240920	Annual Volume (m ³): 6,655,344 Max Daily Volume (m ³): 27,276 Original Application No: - Original Start Date: 01/06/1968 Expiry Date: - Issue No: 102 Version Start Date: 14/11/2012 Version End Date: -
B	170m S	Status: Active Licence No: 6/33/27/*G/0082 Details: Transfer Between Sources (Pre Water Act 2003) Direct Source: GROUND WATER SOURCE OF SUPPLY Point: SPRINGWELL SOURCE Data Type: Point Name: Affinity Water Limited Easting: 551960 Northing: 240920	Annual Volume (m ³): 6,655,344 Max Daily Volume (m ³): 27,276 Original Application No: - Original Start Date: 01/06/1968 Expiry Date: - Issue No: 102 Version Start Date: 14/11/2012 Version End Date: -
-	1157m NE	Status: Active Licence No: 6/33/27/*G/0099 Details: General Use Relating To Secondary Category (Medium Loss) Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE E OF LT CHESTERFORD Data Type: Point Name: Chesterford Park (General Partner) Limited Easting: 553200 Northing: 241710	Annual Volume (m ³): 136,400 Max Daily Volume (m ³): 454.50 Original Application No: - Original Start Date: 22/12/1978 Expiry Date: - Issue No: 104 Version Start Date: 26/07/2017 Version End Date: -



ID	Location	Details	
-	1179m NE	Status: Active Licence No: 6/33/27/*G/0099 Details: General Use Relating To Secondary Category (Medium Loss) Direct Source: GROUND WATER SOURCE OF SUPPLY Point: BOREHOLE E OF LITTLE CHESTERFD Data Type: Point Name: Chesterford Park (General Partner) Limited Easting: 553230 Northing: 241700	Annual Volume (m ³): 136,400 Max Daily Volume (m ³): 454.50 Original Application No: - Original Start Date: 22/12/1978 Expiry Date: - Issue No: 104 Version Start Date: 26/07/2017 Version End Date: -
-	1231m S	Status: Historical Licence No: 6/33/27/*G/0060 Details: General Farming & Domestic Direct Source: GROUND WATER SOURCE OF SUPPLY Point: 2 WELLS AT LITTLEBURY Data Type: Point Name: MCLAREN Easting: 551860 Northing: 239860	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/12/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/09/1990 Version End Date: -
-	1323m NW	Status: Active Licence No: AN/033/0027/007 Details: Spray Irrigation - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: MOAT NEAR GT CHESTERFORD Data Type: Point Name: T G FAIRHEAD FARMS LTD Easting: 550900 Northing: 241800	Annual Volume (m ³): 65,464 Max Daily Volume (m ³): 1,818 Original Application No: - Original Start Date: 01/04/2015 Expiry Date: - Issue No: 1 Version Start Date: 01/04/2015 Version End Date: -

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

5.7 Surface water abstractions

Records within 2000m

8

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 34**



ID	Location	Details	
5	384m W	Status: Active Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: RIVER CAM AT GREAT CHESTERFORD Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551630 Northing: 241090	Annual Volume (m ³): 65,464 Max Daily Volume (m ³): 1,818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 102 Version Start Date: 01/04/2015 Version End Date: -
6	384m W	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: POINT ON RIVER CAM Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551630 Northing: 241090	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -
7	444m W	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: RIVER CAM S OF GT CHESTERFORD Data Type: Line Name: THOS G FAIRHEAD FARMS LTD Easting: 550460 Northing: 242660	Annual Volume (m ³): - Max Daily Volume (m ³): - Original Application No: - Original Start Date: 01/05/1966 Expiry Date: - Issue No: 100 Version Start Date: 01/05/1966 Version End Date: -
8	664m NW	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: POINT ON RIVER CAM Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551570 Northing: 241610	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -
-	863m NW	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: POINT ON RIVER CAM Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551380 Northing: 241690	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -



ID	Location	Details	
-	1223m NW	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: POINT ON RIVER CAM Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551400 Northing: 242200	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -
-	1323m NW	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: MOAT S OF GT CHESTERFORD Data Type: Point Name: T G FAIRHEAD FARMS LTD Easting: 550900 Northing: 241800	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -
-	1643m NW	Status: Historical Licence No: 6/33/27/*S/0031 Details: Spray Irrigation - Direct Direct Source: SURFACE WATER SOURCE OF SUPPLY Point: POINT ON RIVER CAM Data Type: Line Name: T G FAIRHEAD FARMS LTD Easting: 551020 Northing: 242440	Annual Volume (m ³): 65464 Max Daily Volume (m ³): 1818 Original Application No: - Original Start Date: 21/05/1966 Expiry Date: - Issue No: 101 Version Start Date: 21/11/2003 Version End Date: -

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

5.8 Potable abstractions

Records within 2000m

1

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.

Features are displayed on the Abstractions and Source Protection Zones map on **page 34**



ID	Location	Details	
B	170m S	Status: Active Licence No: 6/33/27/*G/0082 Details: Potable Water Supply - Direct Direct Source: GROUND WATER SOURCE OF SUPPLY Point: SPRINGWELL SOURCE Data Type: Point Name: Affinity Water Limited Easting: 551960 Northing: 240920	Annual Volume (m ³): 6,655,344 Max Daily Volume (m ³): 27,276 Original Application No: - Original Start Date: 01/06/1968 Expiry Date: - Issue No: 102 Version Start Date: 14/11/2012 Version End Date: -

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

5.9 Source Protection Zones

Records within 500m

3

Source Protection Zones define the sensitivity of an area around a potable abstraction site to contamination. Features are displayed on the Abstractions and Source Protection Zones map on [page 34](#)

ID	Location	Type	Description
1	On site	1	Inner catchment
3	79m N	2	Outer catchment
4	161m NE	3	Total catchment

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

5.10 Source Protection Zones (confined aquifer)

Records within 500m

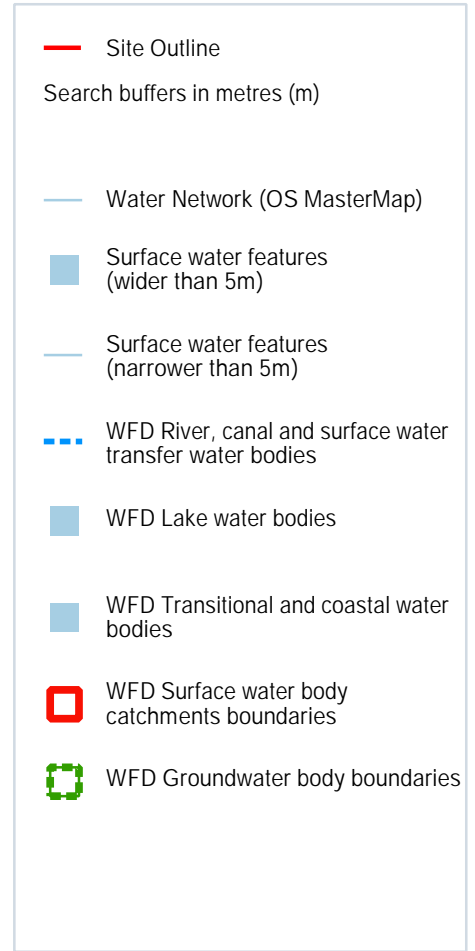
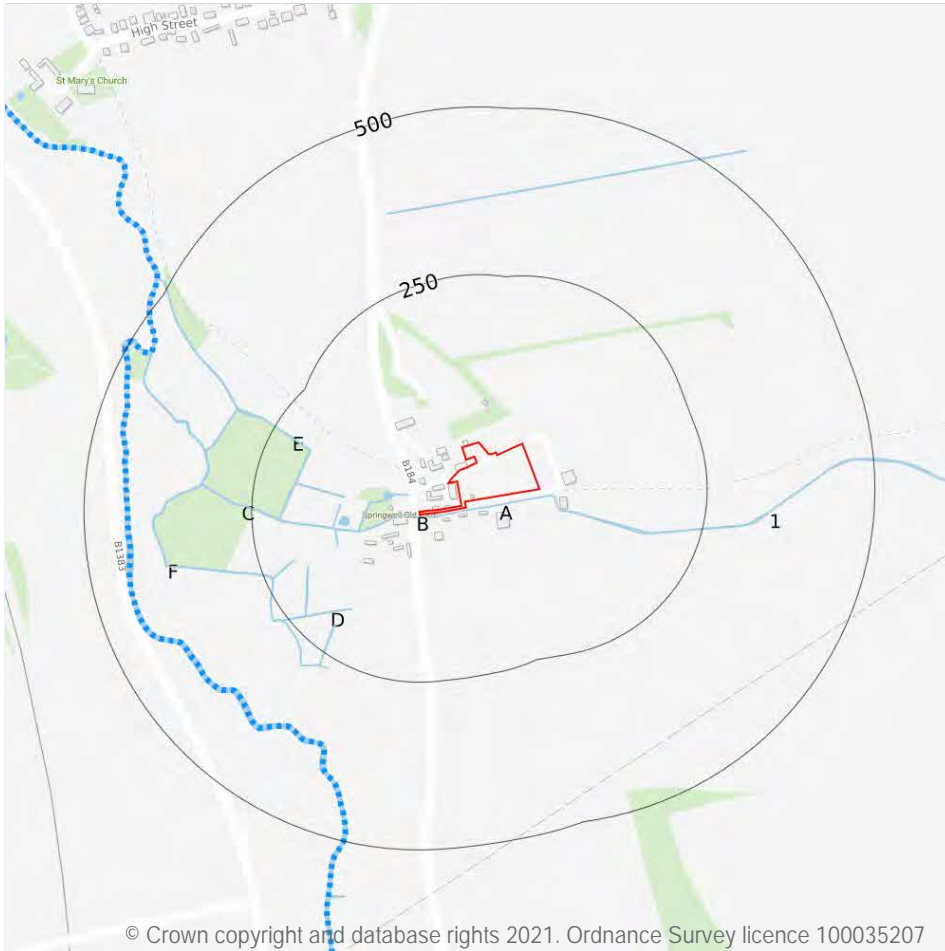
0

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



© Crown copyright and database rights 2021. Ordnance Survey licence 100035207

6.1 Water Network (OS MasterMap)

Records within 250m

29

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 41](#)

ID	Location	Type of water feature	Ground level	Permanence	Name
A	3m S	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-

ID	Location	Type of water feature	Ground level	Permanence	Name
B	5m S	Inland river not influenced by normal tidal action.	Underground	Watercourse contains water year round (in normal circumstances)	-
B	13m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	30m NW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	36m W	Inland river not influenced by normal tidal action.	Underground	Watercourse contains water year round (in normal circumstances)	-
B	41m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	46m NW	Lake, loch or reservoir.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
1	52m SE	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	54m W	Inland river not influenced by normal tidal action.	Underground	Watercourse contains water year round (in normal circumstances)	-
B	57m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	83m W	Inland river not influenced by normal tidal action.	Underground	Watercourse contains water year round (in normal circumstances)	-
B	86m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	95m W	Inland river not influenced by normal tidal action.	Underground	Watercourse contains water year round (in normal circumstances)	-
B	98m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-



ID	Location	Type of water feature	Ground level	Permanence	Name
B	113m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	118m W	Inland river not influenced by normal tidal action.	Not provided	Watercourse contains water year round (in normal circumstances)	-
B	126m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	126m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	131m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
D	173m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
D	183m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
E	185m NW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
B	189m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
D	199m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
D	207m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
C	208m W	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
D	227m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-



ID	Location	Type of water feature	Ground level	Permanence	Name
D	239m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-
F	239m SW	Inland river not influenced by normal tidal action.	On ground surface	Watercourse contains water year round (in normal circumstances)	-

This data is sourced from the Ordnance Survey.

6.2 Surface water features

Records within 250m

17

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 41**

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 41**

ID	Location	Type	Water body catchment	Water body ID	Operational catchment	Management catchment
A	On site	River WB catchment	Cam (Audley End to Stapleford)	GB105033037590	Cam, Rhee and Granta	Cam and Ely Ouse

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 41**

ID	Location	Type	Name	Water body ID	Overall rating	Chemical rating	Ecological rating	Year
6	371m SW	River	Cam (Audley End to Stapleford)	GB105033037590	Poor	Good	Poor	2016

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.

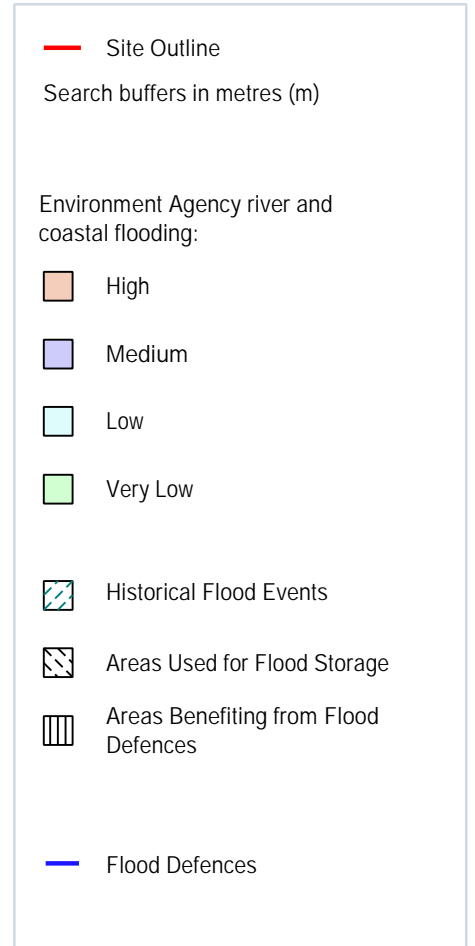
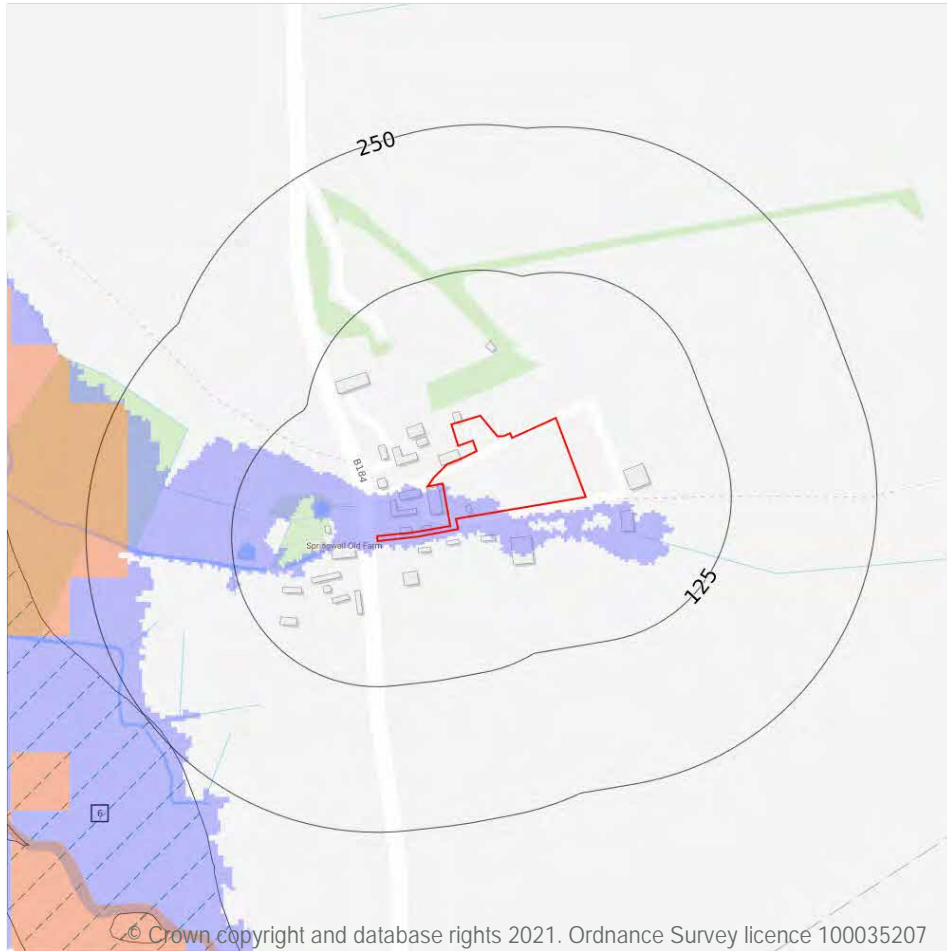
Features are displayed on the Hydrology map on **page 41**

ID	Location	Name	Water body ID	Overall rating	Chemical rating	Quantitative	Year
A	On site	Cam and Ely Ouse Chalk	GB40501G400500	Poor	Poor	Poor	2015

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 Sea (RoFRaS)

Records within 50m

1

The chance of flooding from rivers and/or the sea in any given year, based on cells of 50m. Each cell is allocated one of four flood risk categories, taking into account flood defences and their condition; 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).

Features are displayed on the River and coastal flooding map on **page 46**

Distance	RoFRaS flood risk
On site	Medium
0 - 50m	Medium

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

7.2 Historical Flood Events

Records within 250m

1

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

Features are displayed on the River and coastal flooding map on **page 46**

ID	Location	Event name	Date of flood	Flood source	Flood cause	Type of flood
6	247m SW	March 1947	1947-01-01 1947-12-31	Unknown	Unknown	Fluvial

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

7.3 Flood Defences

Records within 250m

0

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

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

7.4 Areas Benefiting from Flood Defences

Records within 250m

0

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

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

7.5 Flood Storage Areas

Records within 250m

0

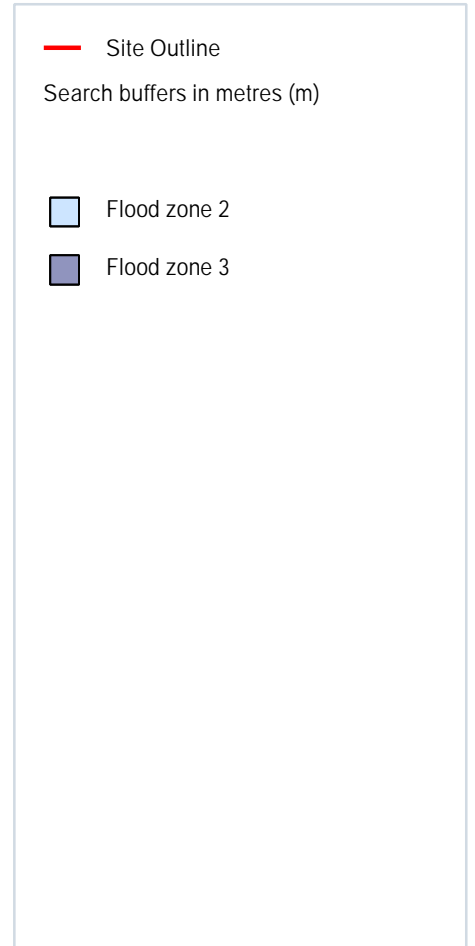
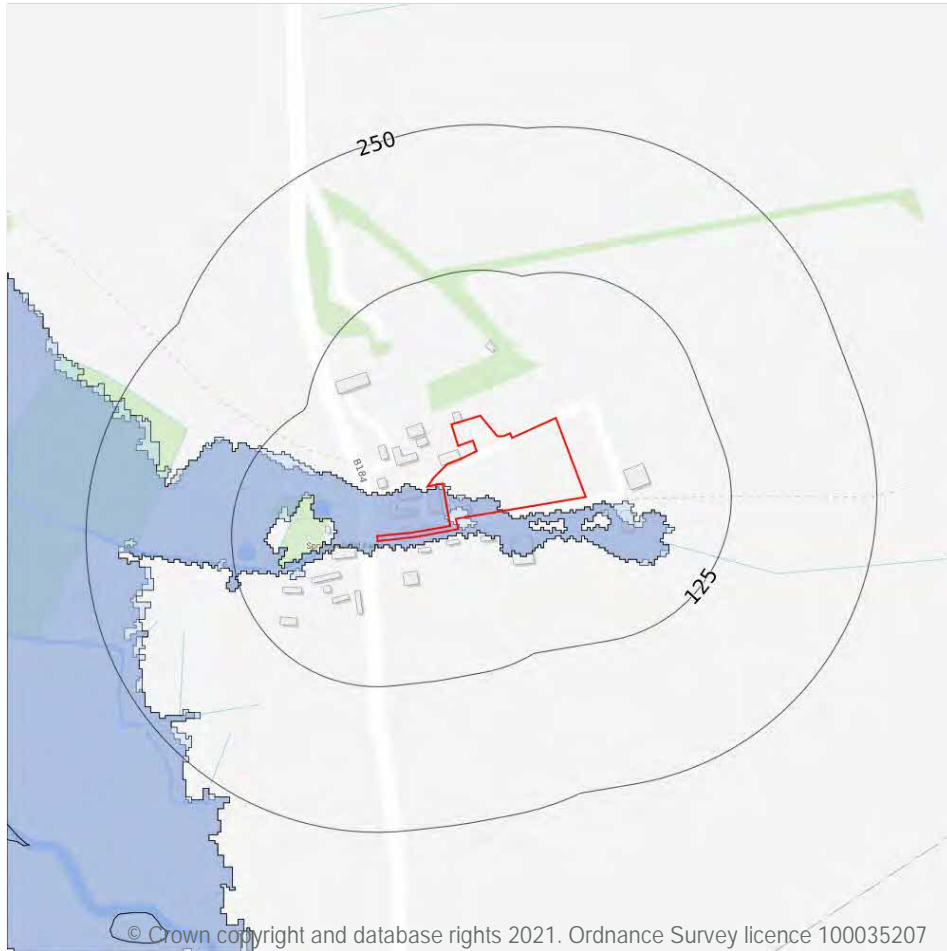
Areas that act as a balancing reservoir, storage basin or balancing pond to attenuate an incoming flood peak to a flow level that can be accepted by the downstream channel or to delay the timing of a flood peak so that its volume is discharged over a longer period.



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



River and coastal flooding - Flood Zones



7.6 Flood Zone 2

Records within 50m

1

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.

Features are displayed on the River and coastal flooding map on **page 46**

Location	Type
On site	Zone 2 - (Fluvial /Tidal Models)

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

7.7 Flood Zone 3

Records within 50m

1

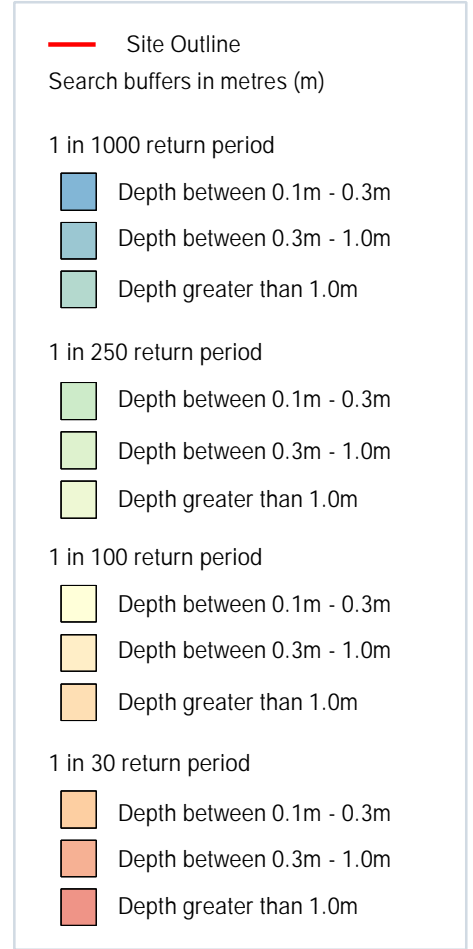
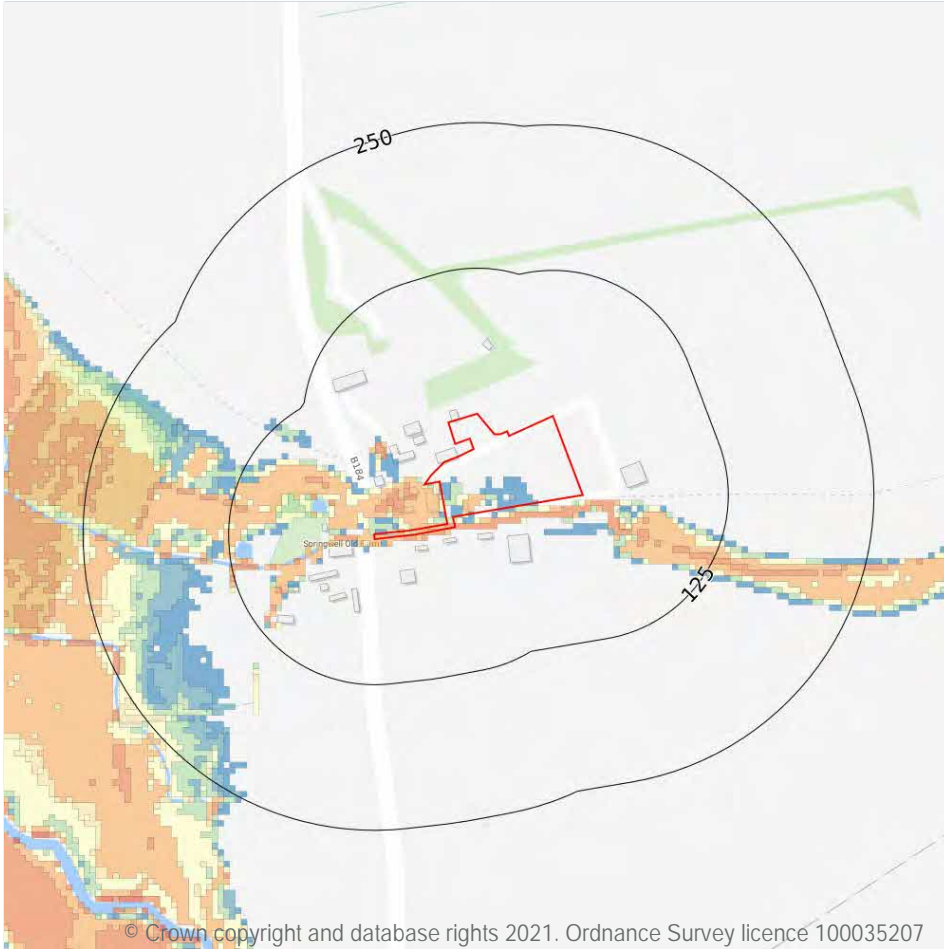
Areas of land at risk of flooding, when the presence of flood defences are ignored. Covering land with a 1 in 100 (1%) or greater chance of flooding each year from rivers or a 1 in 200 (0.5%) or greater chance of flooding each year from the sea.

Features are displayed on the River and coastal flooding map on **page 46**

Location	Type
On site	Zone 3 - (Fluvial Models)

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

8 Surface water flooding



8.1 Surface water flooding

Highest risk on site

1 in 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 51**

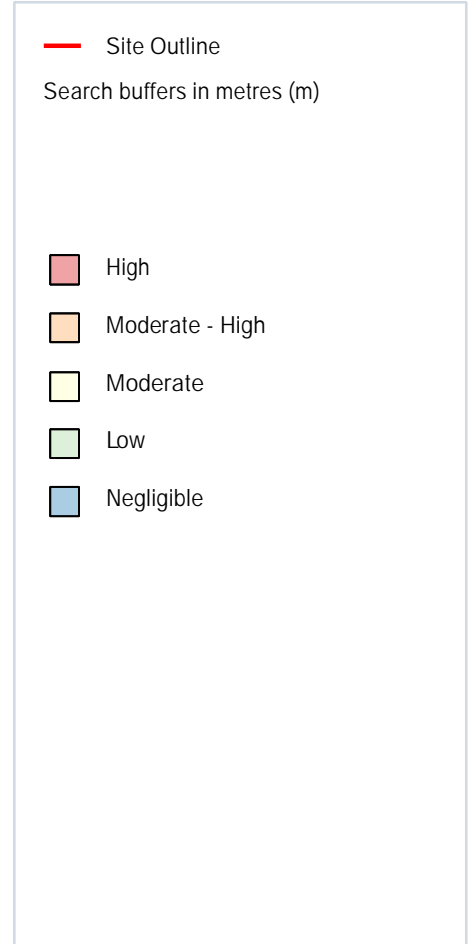
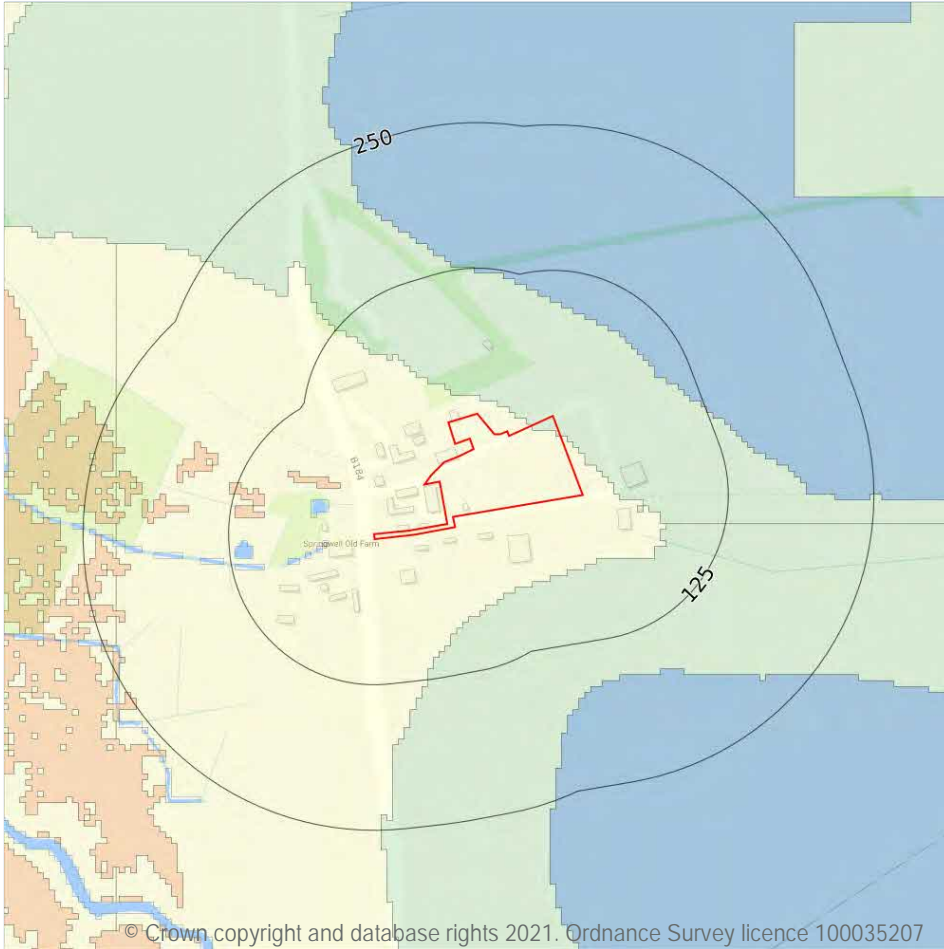
The data shown on the map and in the table above shows the highest likelihood of flood events happening at the site. Lower likelihood events may have greater flood depths and hence a greater potential impact on a site.

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 Ambienta Risk Analytics.

9 Groundwater flooding



9.1 Groundwater flooding

Highest risk on site

Moderate

Highest risk within 50m

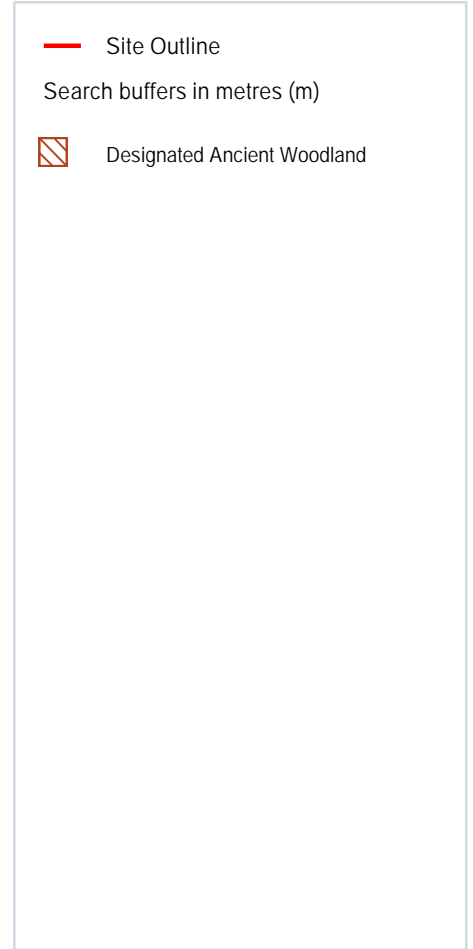
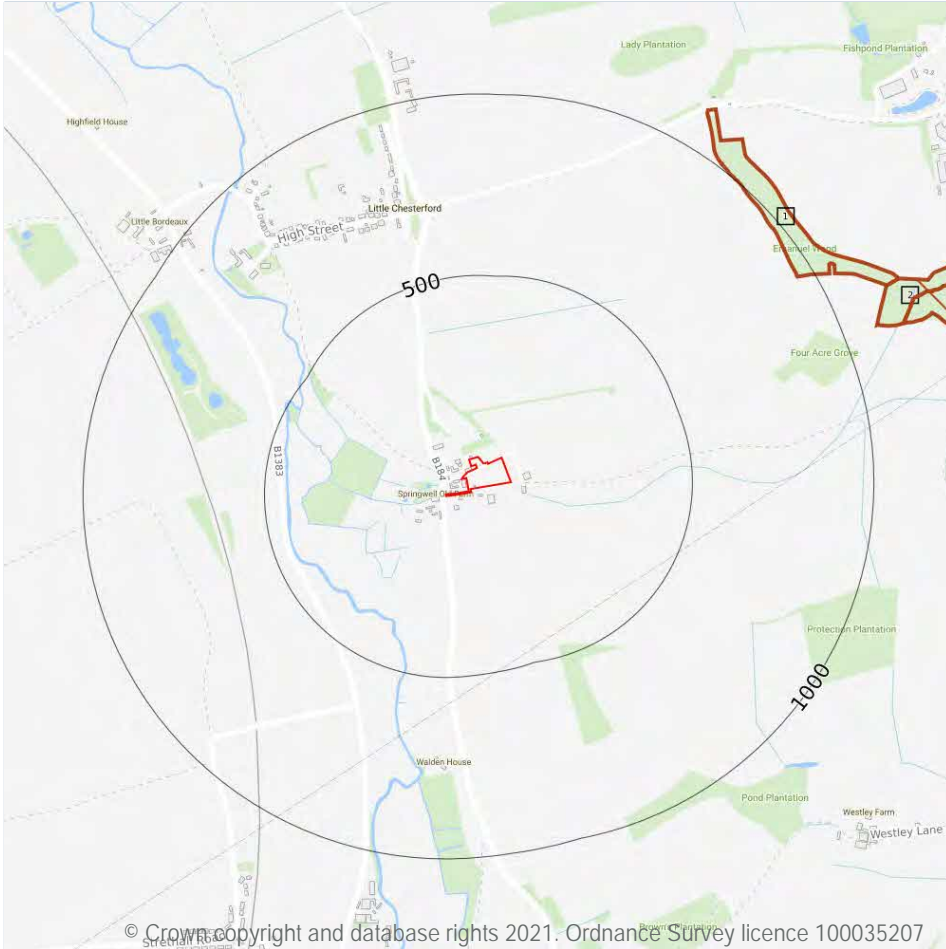
Moderate-High

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 53**

This data is sourced from Ambient Risk Analytics.

10 Environmental designations



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

0

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

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

10.7 Designated Ancient Woodland

Records within 2000m

6

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.

Features are displayed on the Environmental designations map on **page 54**

ID	Location	Name	Woodland Type
1	955m NE	Unknown	Ancient & Semi-Natural Woodland
2	1096m E	Unknown	Ancient Replanted Woodland
3	1166m E	Unknown	Ancient & Semi-Natural Woodland
-	1510m SE	Westley Wood	Ancient & Semi-Natural Woodland
-	1528m S	Spring Wood	Ancient & Semi-Natural Woodland
-	1578m SE	Westley Wood	Ancient Replanted Woodland

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	0
----------------------	---

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

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

4

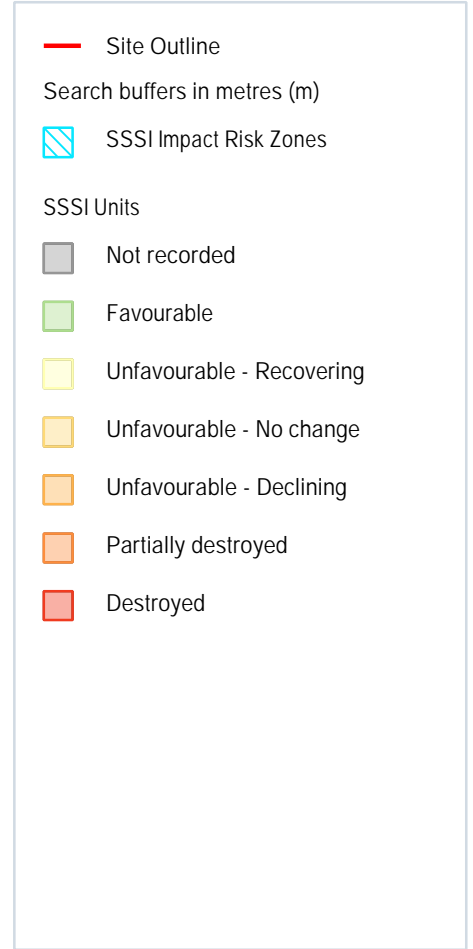
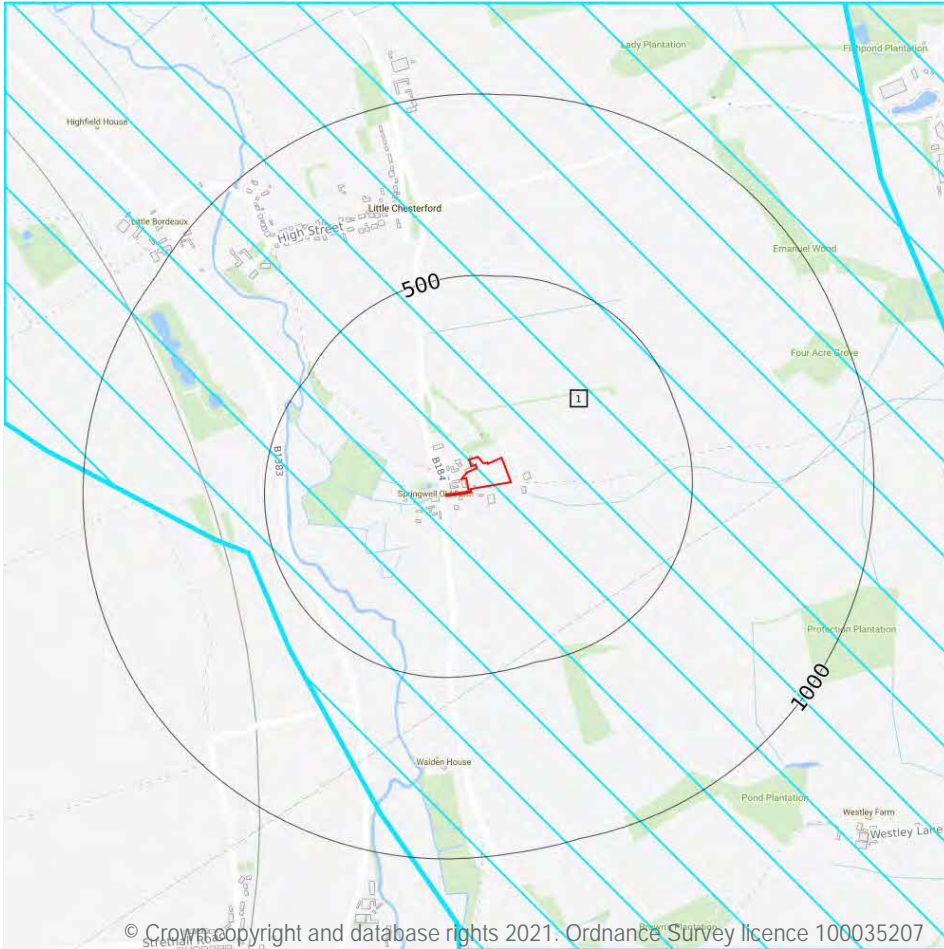
Areas at risk from agricultural nitrate pollution designated under the EC Nitrate Directive (91/676/EEC). These are areas of land that drain into waters polluted by nitrates. Farmers operating within these areas have to follow mandatory rules to tackle nitrate loss from agriculture.

Location	Name	Type	NVZ ID	Status
On site	Ely Ouse and Cut-off channel NVZ	Surface Water	S390	Existing
On site	Anglian Chalk	Groundwater	G71	Existing
1899m E	Ely Ouse and Cut-off channel NVZ	Surface Water	S390	Existing
1899m E	Anglian Chalk	Groundwater	G71	Existing

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



SSSI Impact Zones and Units



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 59**

ID	Location	Type of developments requiring consultation
1	On site	Infrastructure - Airports, helipads and other aviation proposals. Air pollution - Livestock & poultry units with floorspace > 500m ² , slurry lagoons > 750m ² & manure stores > 3500t.

This data is sourced from Natural England.

10.18 SSSI Units

Records within 2000m

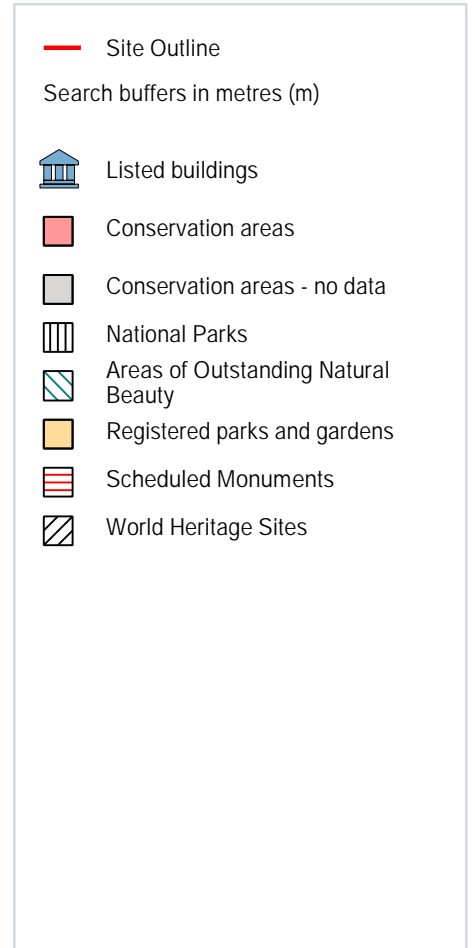
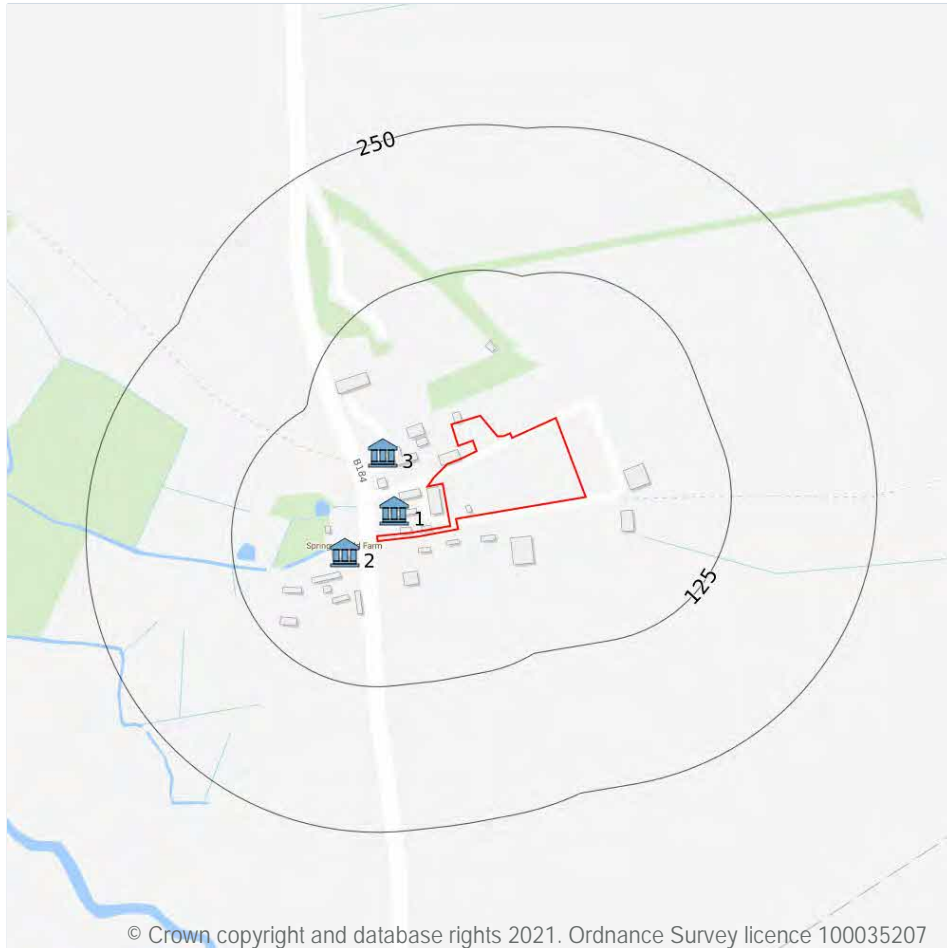
0

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

3

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

Features are displayed on the Visual and cultural designations map on **page 61**

ID	Location	Name	Grade	Reference Number	Listed date
1	20m N	Joseph's Farmhouse, Little Chesterford, Uttlesford, Essex, CB10	II	1277396	22/02/1980
2	30m W	Springwell Farmhouse, Little Chesterford, Uttlesford, Essex, CB10	II	1277397	21/02/1967
3	48m NW	Springwell Cottage, Little Chesterford, Uttlesford, Essex, CB10	II	1231800	22/02/1980

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

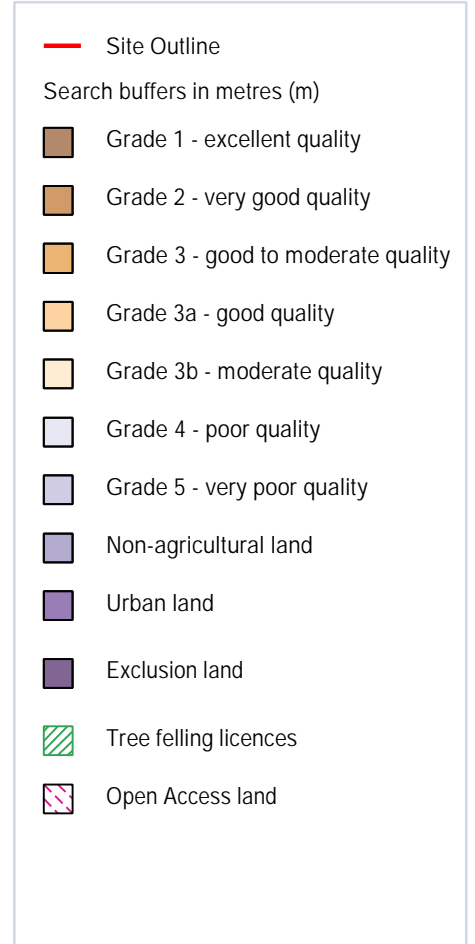
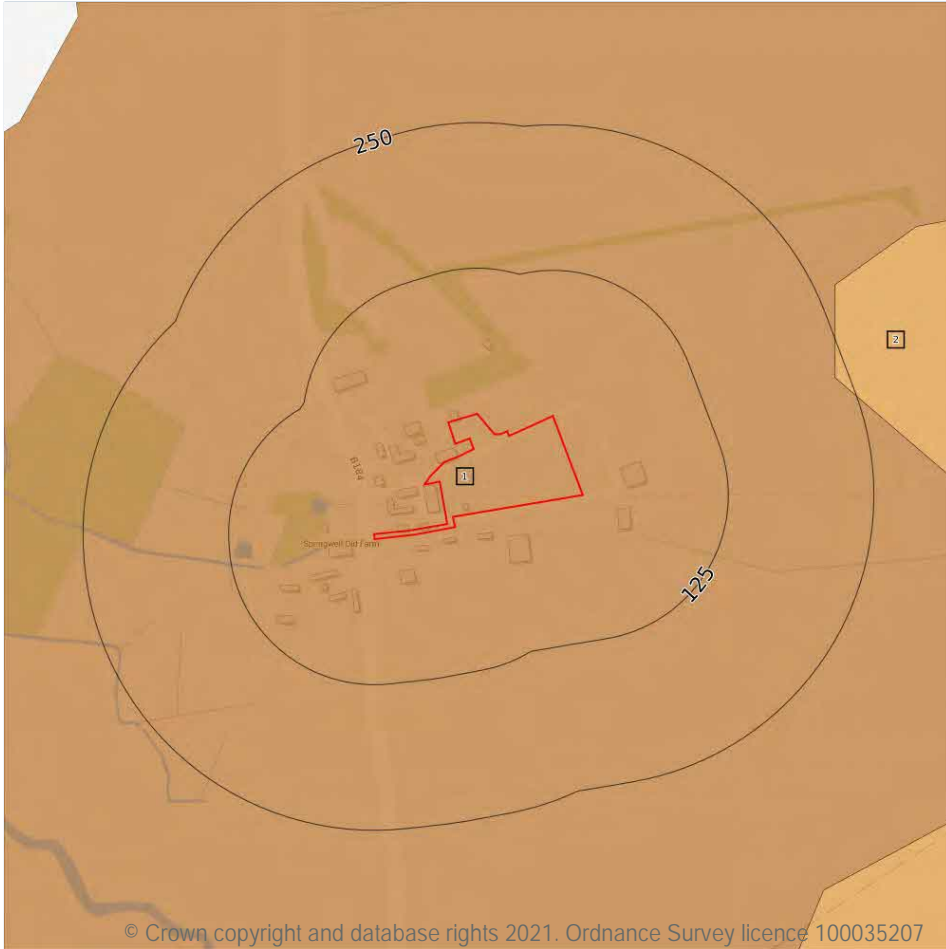
Records within 250m

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



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 64**

ID	Location	Classification	Description
1	On site	Grade 2	Very good quality agricultural land. Land with minor limitations which affect crop yield, cultivations or harvesting. A wide range of agricultural and horticultural crops can usually be grown but on some land in the grade there may be reduced flexibility due to difficulties with the production of the more demanding crops such as winter harvested vegetables and arable root crops. The level of yield is generally high but may be lower or more variable than Grade 1.
2	238m E	Grade 3	Good to moderate quality agricultural land. Land with moderate limitations which affect the choice of crops, timing and type of cultivation, harvesting or the level of yield. Where more demanding crops are grown yields are generally lower or more variable than on land in Grades 1 and 2.

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

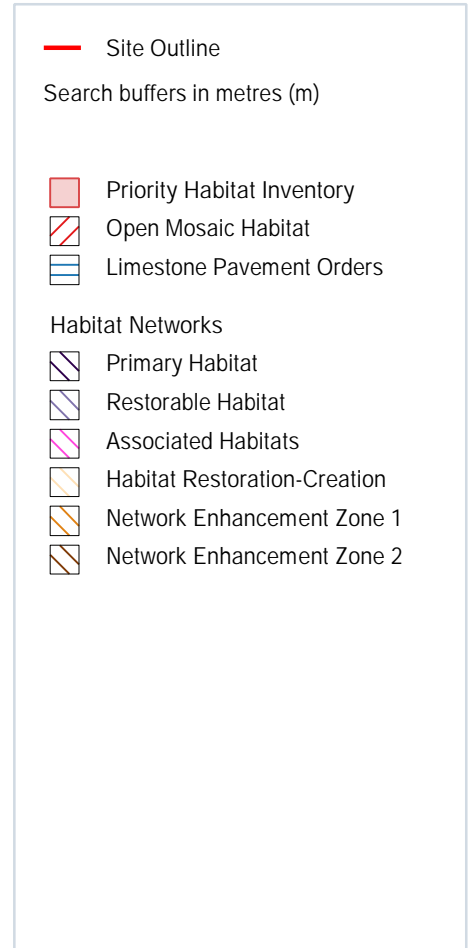
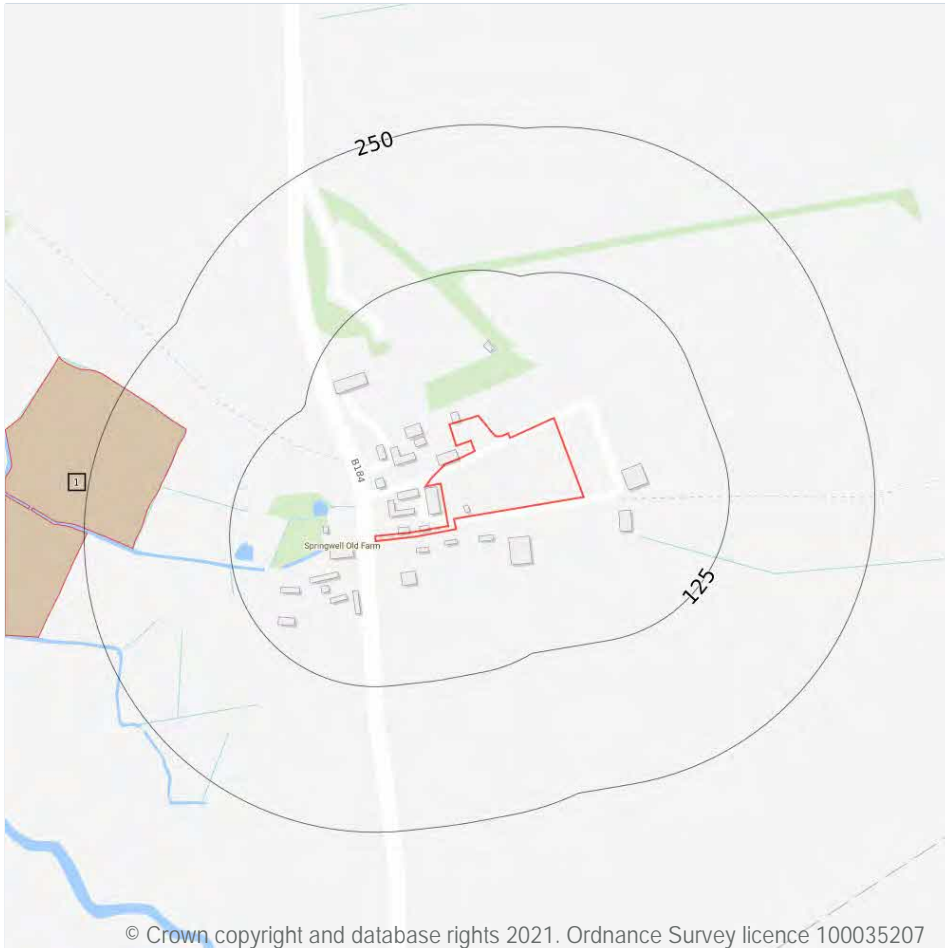
0

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



13.1 Priority Habitat Inventory

Records within 250m

1

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

Features are displayed on the Habitat designations map on **page 67**

ID	Location	Main Habitat	Other habitats
1	185m NW	Deciduous woodland	Main habitat: DWOOD (INV > 50%)

This data is sourced from Natural England.

13.2 Habitat Networks

Records within 250m

0

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

This data is sourced from Natural England.

13.3 Open Mosaic Habitat

Records within 250m

0

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

This data is sourced from Natural England.

13.4 Limestone Pavement Orders

Records within 250m

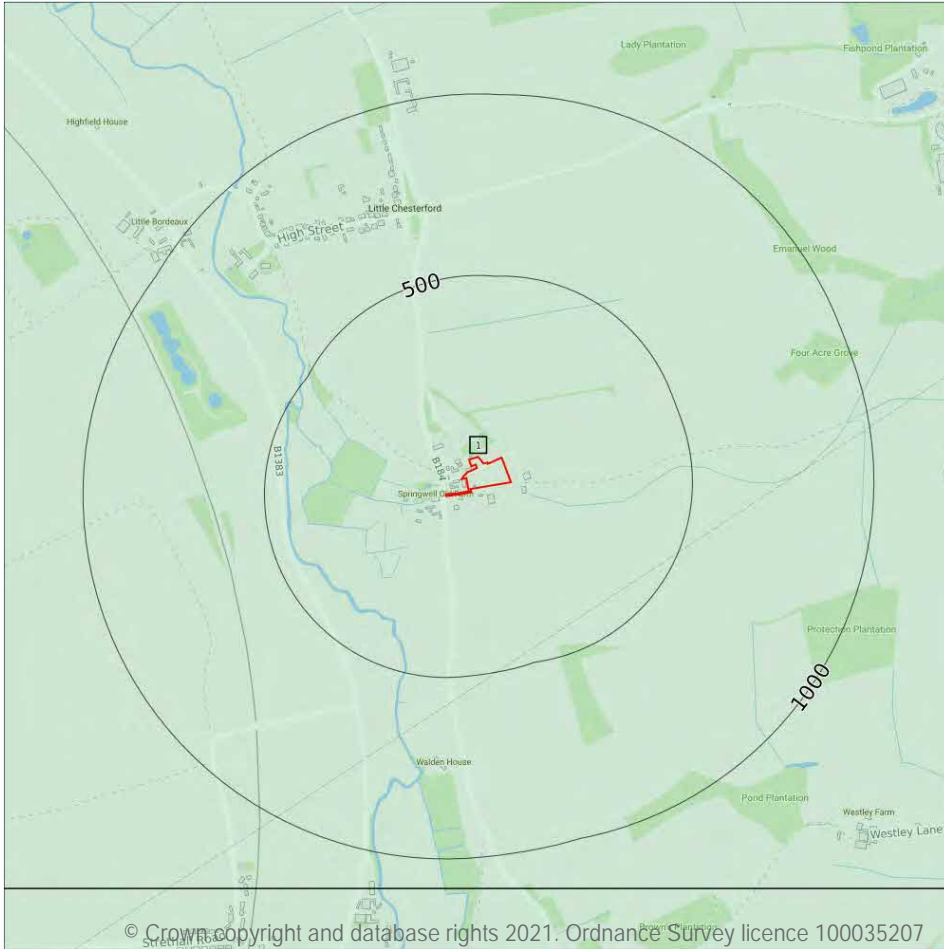
0

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

This data is sourced from Natural England.



14 Geology 1:10,000 scale - Availability



— Site Outline
 Search buffers in metres (m)

- Full coverage
- Partial coverage
- No coverage

© Crown copyright and database rights 2021. Ordnance Survey licence 100035207

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 69](#)

ID	Location	Artificial	Superficial	Bedrock	Mass movement	Sheet No.
1	On site	Full	Full	Full	No coverage	TL54SW

This data is sourced from the British Geological Survey.

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

14.2 Artificial and made ground (10k)

Records within 500m

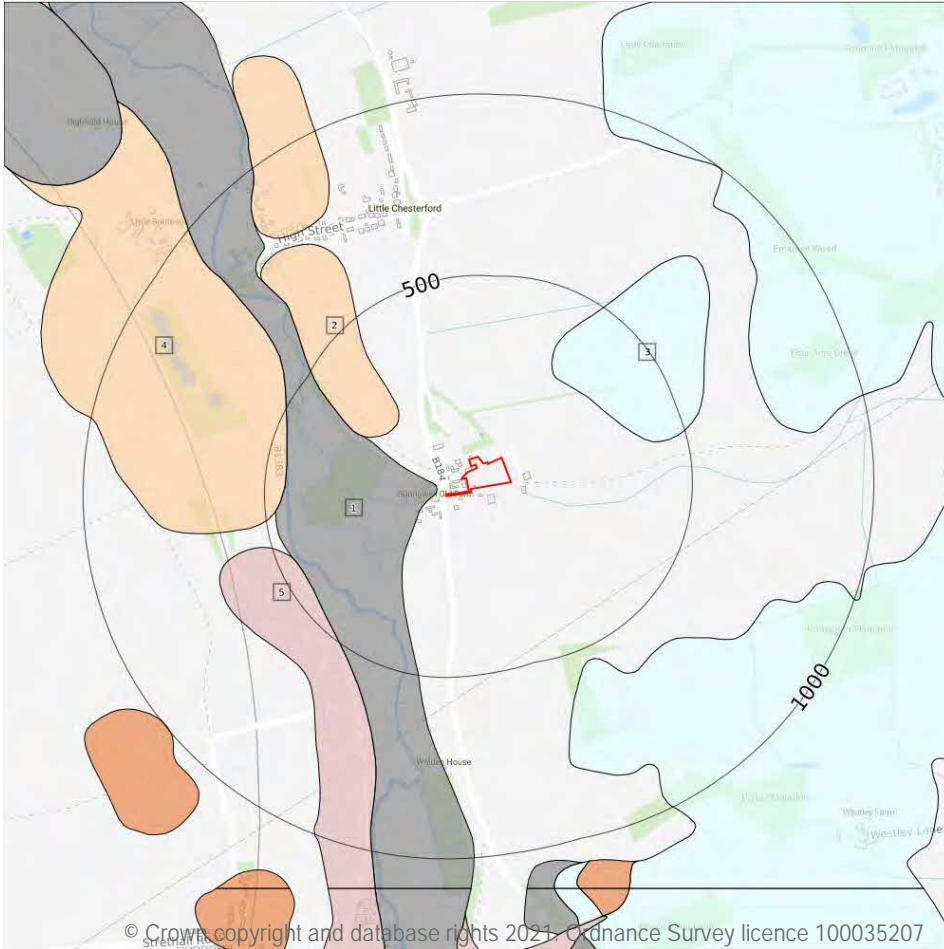
0


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.

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

5

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 71](#)

ID	Location	LEX Code	Description	Rock description
1	27m W	ALV-CZ	Alluvium - Silty Clay	Clay, Silty
2	221m NW	RTD3-XSV	River Terrace Deposits, 3 - Sand And Gravel	Sand And Gravel
3	266m NE	LOFT-DMTN	Lowestoft Formation - Diamicton	Diamicton
4	444m W	RTD3-XSV	River Terrace Deposits, 3 - Sand And Gravel	Sand And Gravel

ID	Location	LEX Code	Description	Rock description
5	445m SW	HEAD-DMTN	Head - Diamicton	Diamicton

This data is sourced from the British Geological Survey.

14.4 Landslip (10k)

Records within 500m

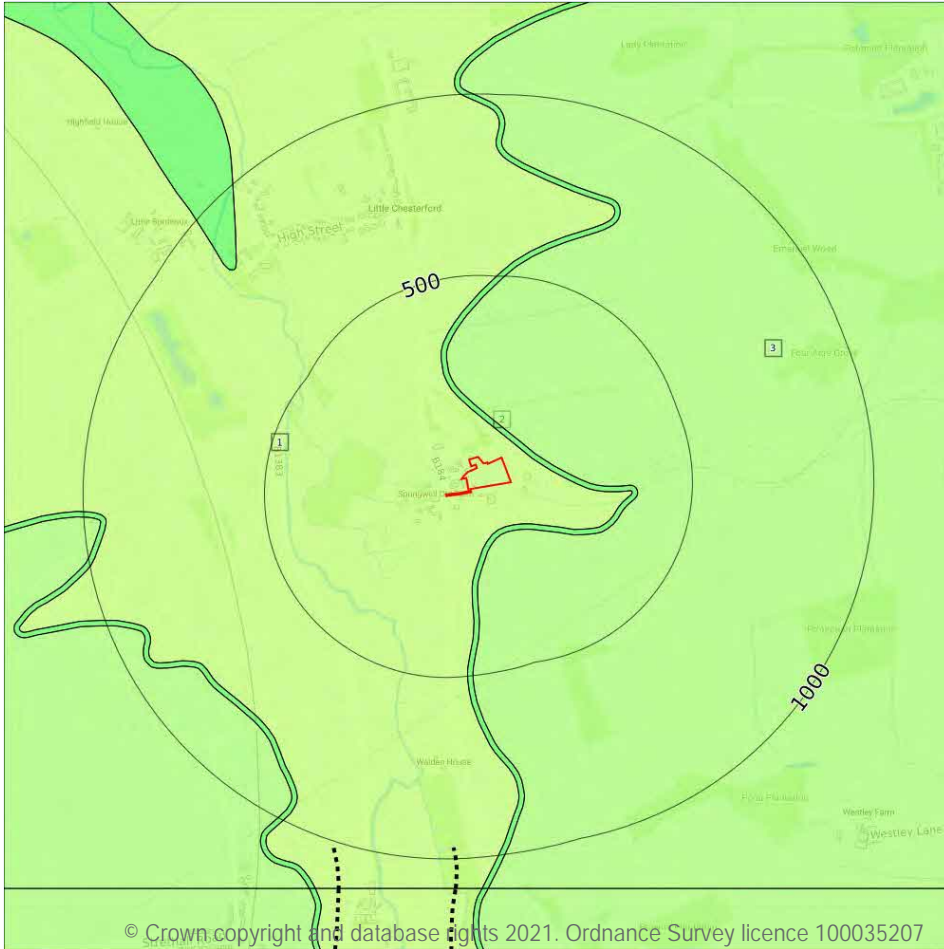
0

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)
- 3 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 73](#)

ID	Location	LEX Code	Description	Rock age
1	On site	NPCH-CHLK	New Pit Chalk Formation - Chalk	Turonian Age
2	52m NE	CKR-CHLK	Chalk Rock Member - Chalk	Turonian Age
3	67m NE	LESE-CHLK	Lewes Nodular Chalk Formation And Seaford Chalk Formation (undifferentiated) - Chalk	Santonian Age - Turonian Age

This data is sourced from the British Geological Survey.

14.6 Bedrock faults and other linear features (10k)

Records within 500m

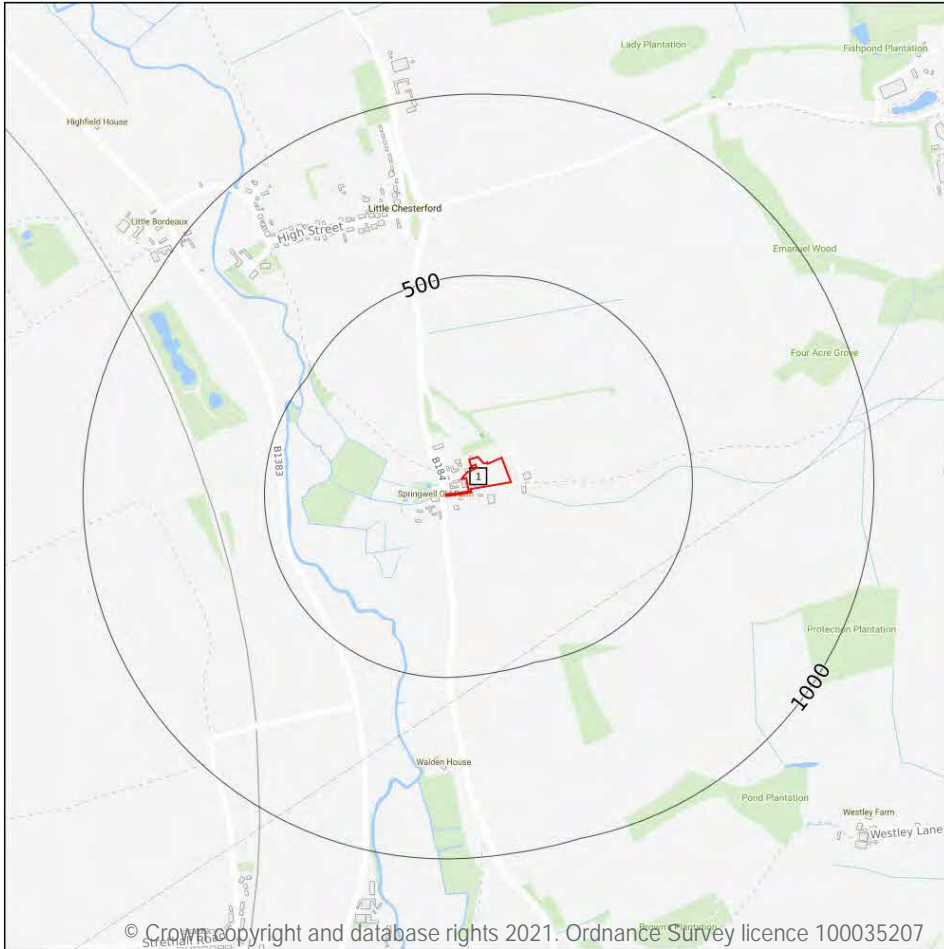
0

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.

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 75](#)

ID	Location	Artificial	Superficial	Bedrock	Mass movement	Sheet No.
1	On site	Full	Full	Full	No coverage	EW205_saffron_walden_v4

This data is sourced from the British Geological Survey.

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

15.2 Artificial and made ground (50k)

Records within 500m

0

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

This data is sourced from the British Geological Survey.

15.3 Artificial ground permeability (50k)

Records within 50m

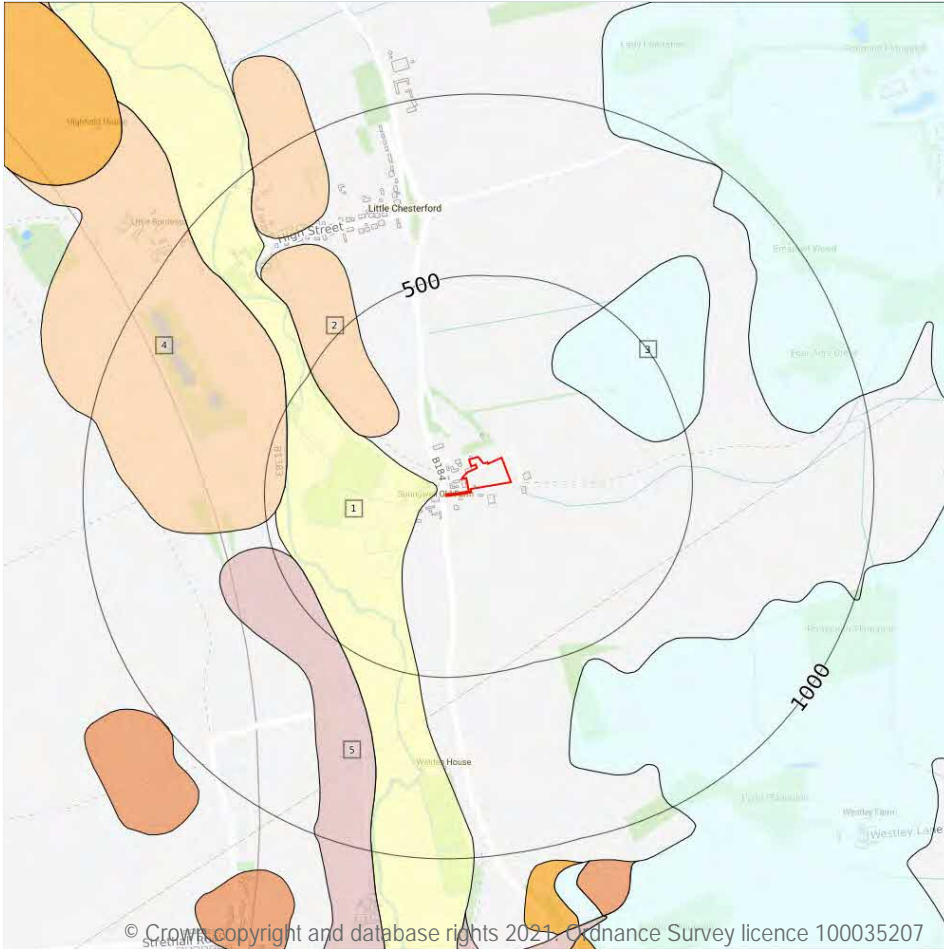
0


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

This data is sourced from the British Geological Survey.



Geology 1:50,000 scale - Superficial



- Site Outline
- Search buffers in metres (m)
-  Landslip (50k)
- Superficial geology (50k)
Please see table for more details.

15.4 Superficial geology (50k)

Records within 500m

5

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 77](#)

ID	Location	LEX Code	Description	Rock description
1	27m W	ALV-XC ZSV	ALLUVIUM	CLAY, SILT, SAND AND GRAVEL
2	221m NW	RTD3-XSV	RIVER TERRACE DEPOSITS, 3	SAND AND GRAVEL
3	266m NE	LOFT-DMTN	LOWESTOFT FORMATION	DIAMICTON
4	444m W	RTD3-XSV	RIVER TERRACE DEPOSITS, 3	SAND AND GRAVEL

ID	Location	LEX Code	Description	Rock description
5	445m SW	HEAD- XCZSV	HEAD	CLAY, SILT, SAND AND GRAVEL

This data is sourced from the British Geological Survey.

15.5 Superficial permeability (50k)

Records within 50m	1
--------------------	---

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

Location	Flow type	Maximum permeability	Minimum permeability
27m NW	Intergranular	High	Very 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.

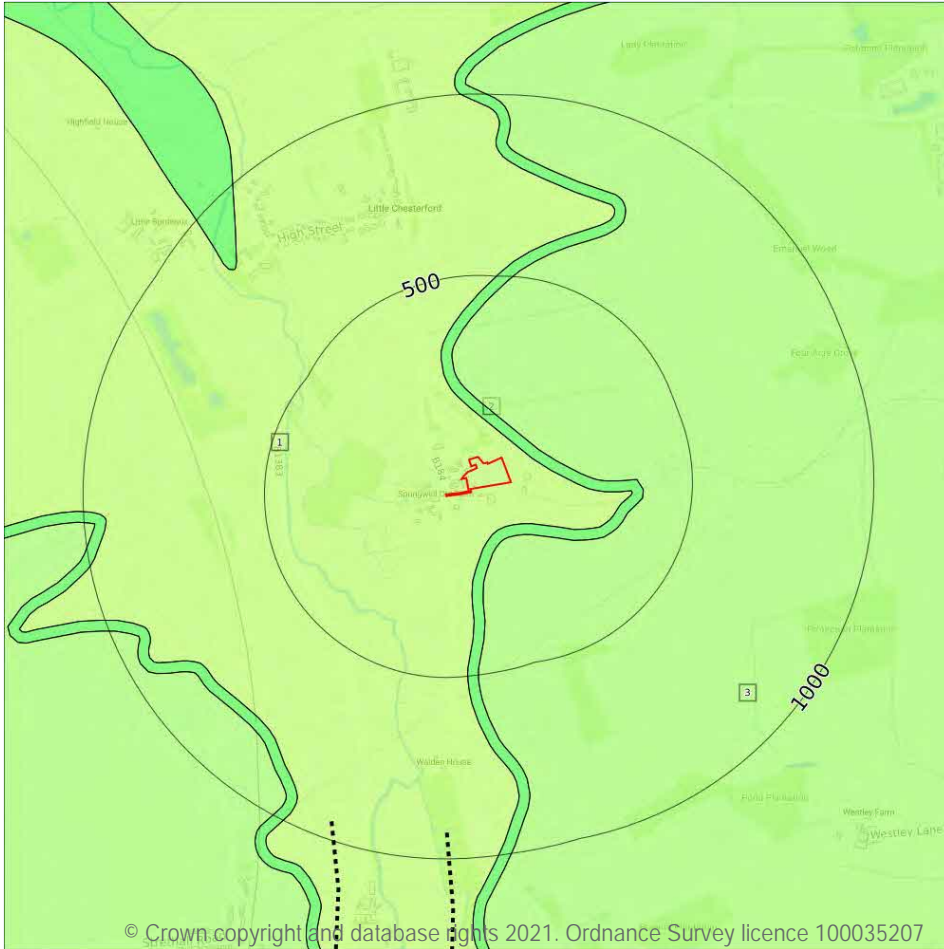
15.7 Landslip permeability (50k)

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 79](#)

ID	Location	LEX Code	Description	Rock age
1	On site	NPCH-CHLK	NEW PIT CHALK FORMATION - CHALK	TURONIAN
2	52m NE	CKR-CHLK	CHALK ROCK MEMBER - CHALK	TURONIAN
3	82m NE	LESE-CHLK	LEWES NODULAR CHALK FORMATION AND SEAFORD CHALK FORMATION (UNDIFFERENTIATED) - CHALK	TURONIAN

This data is sourced from the British Geological Survey.

15.9 Bedrock permeability (50k)

Records within 50m 1

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

Location	Flow type	Maximum permeability	Minimum permeability
On site	Fracture	Very High	Very High

This data is sourced from the British Geological Survey.

15.10 Bedrock faults and other linear features (50k)

Records within 500m 0

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.

This data is sourced from the British Geological Survey.

16 Boreholes

16.1 BGS Boreholes

Records within 250m

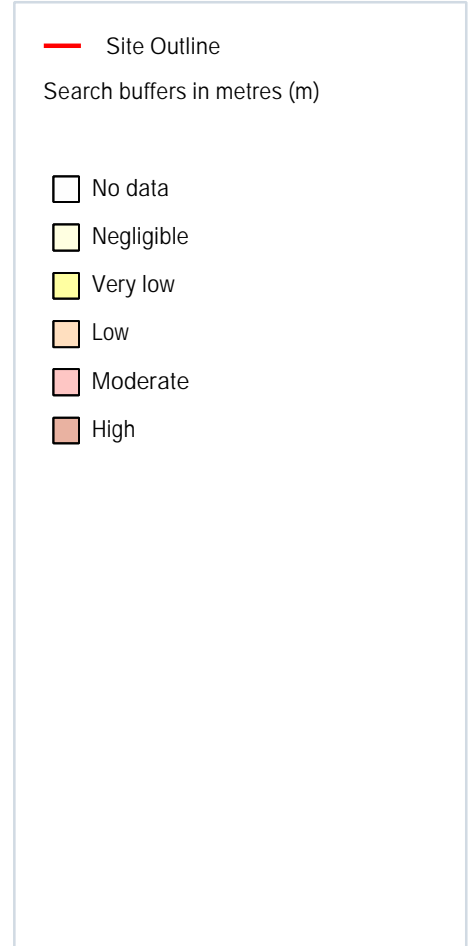
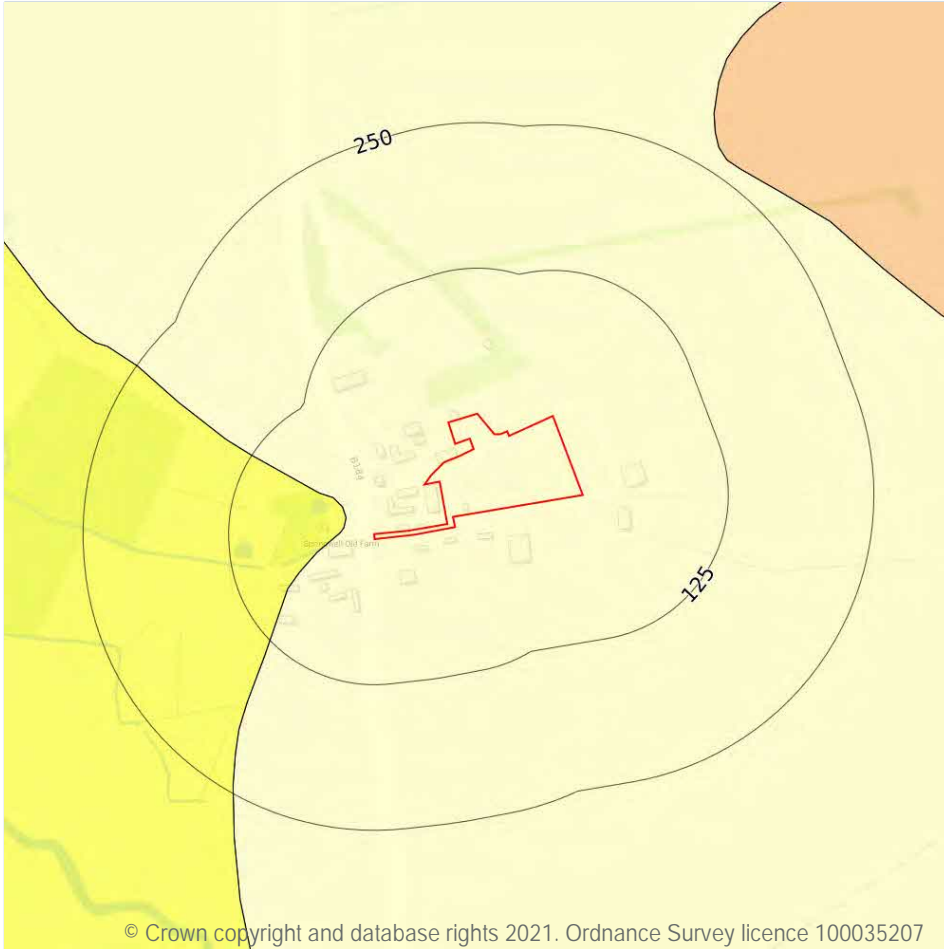
0

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

This data is sourced from the British Geological Survey.



17 Natural ground subsidence - Shrink swell clays



17.1 Shrink swell clays

Records within 50m

2

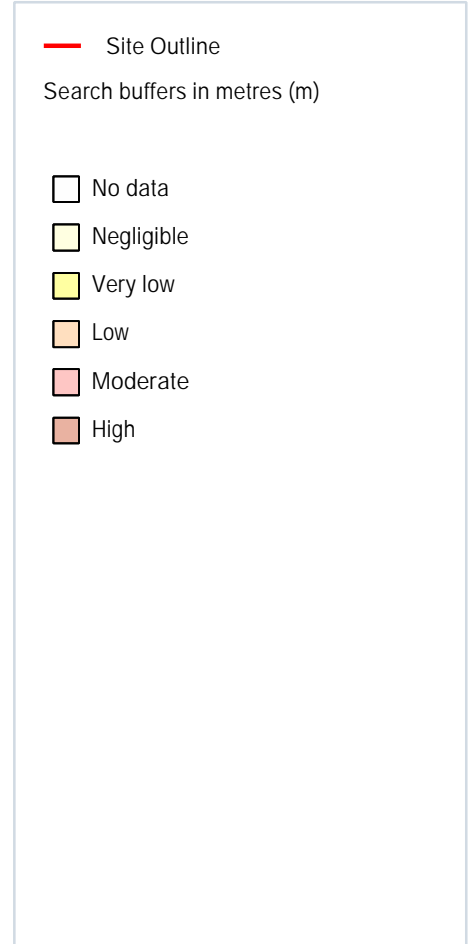
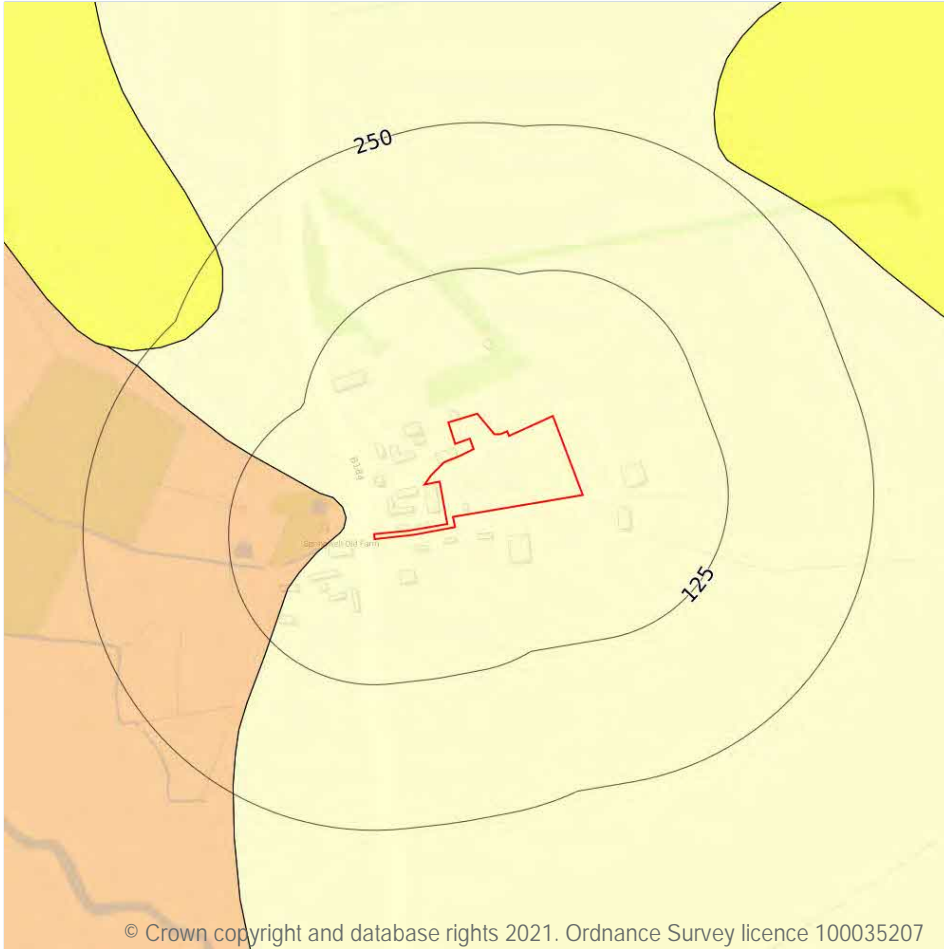
The potential hazard presented by soils that absorb water when wet (making them swell), and lose water as they dry (making them shrink). This shrink-swell behaviour is controlled by the type and amount of clay in the soil, and by seasonal changes in the soil moisture content (related to rainfall and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

Features are displayed on the Natural ground subsidence - Shrink swell clays map on [page 82](#)

Location	Hazard rating	Details
On site	Negligible	Ground conditions predominantly non-plastic.
27m W	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

2

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.

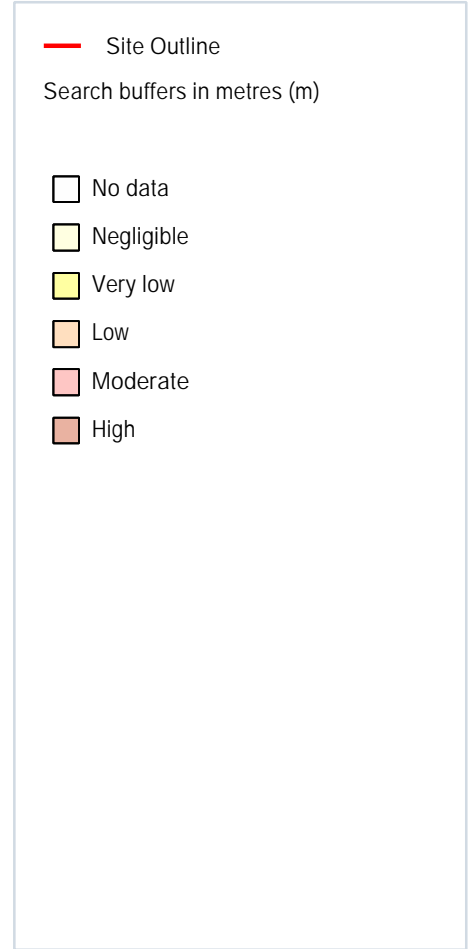
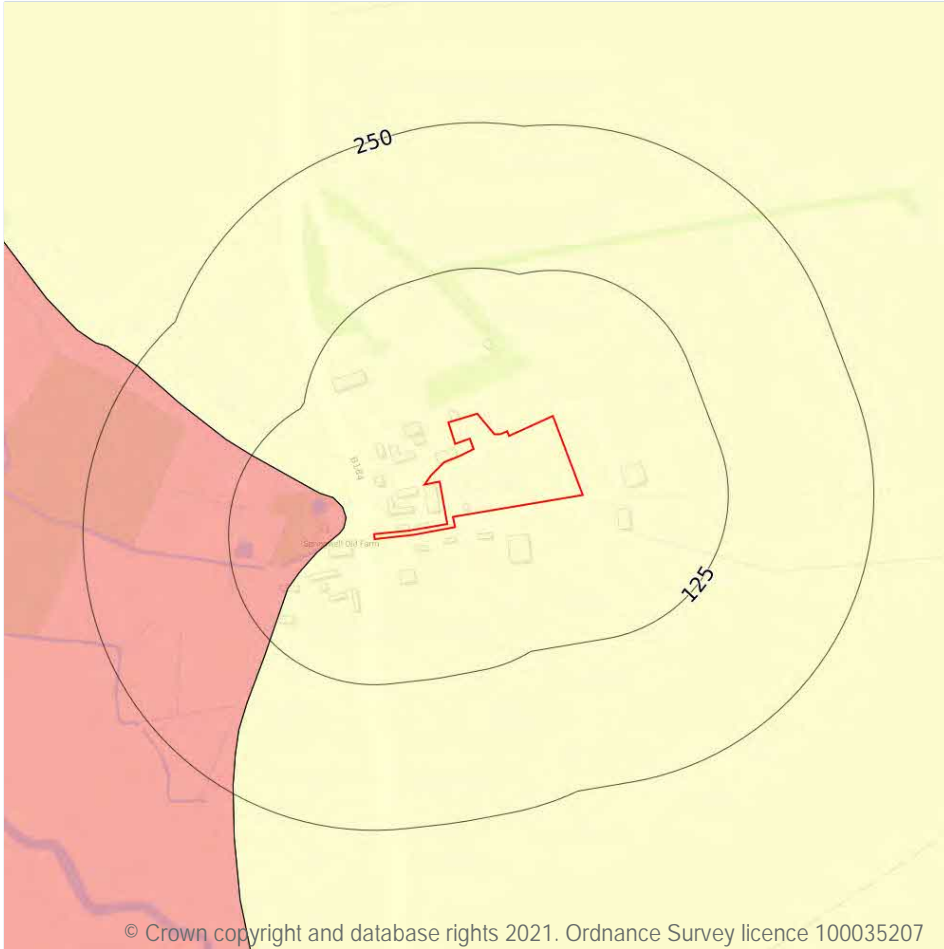
Features are displayed on the Natural ground subsidence - Running sands map on **page 83**

Location	Hazard rating	Details
On site	Negligible	Running sand conditions are not thought to occur whatever the position of the water table. No identified constraints on lands use due to running conditions.

Location	Hazard rating	Details
27m W	Low	Running sand conditions may be present. Constraints may apply to land uses involving excavation or the addition or removal of water.

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.

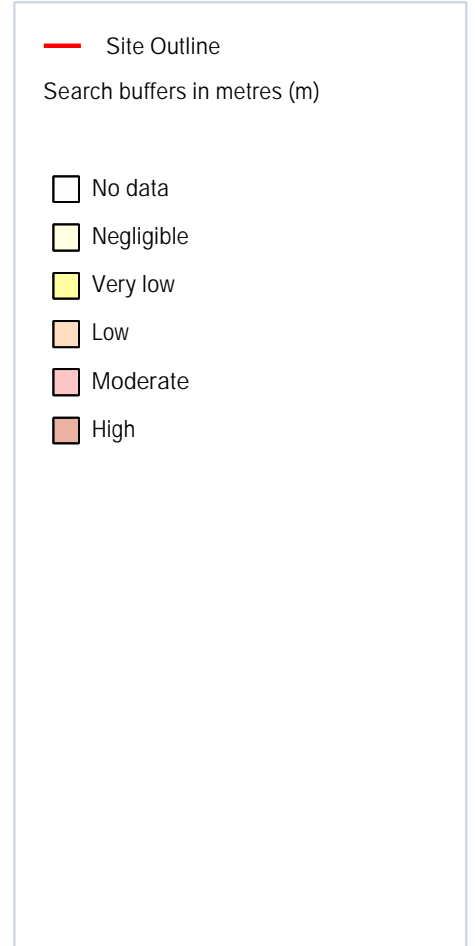
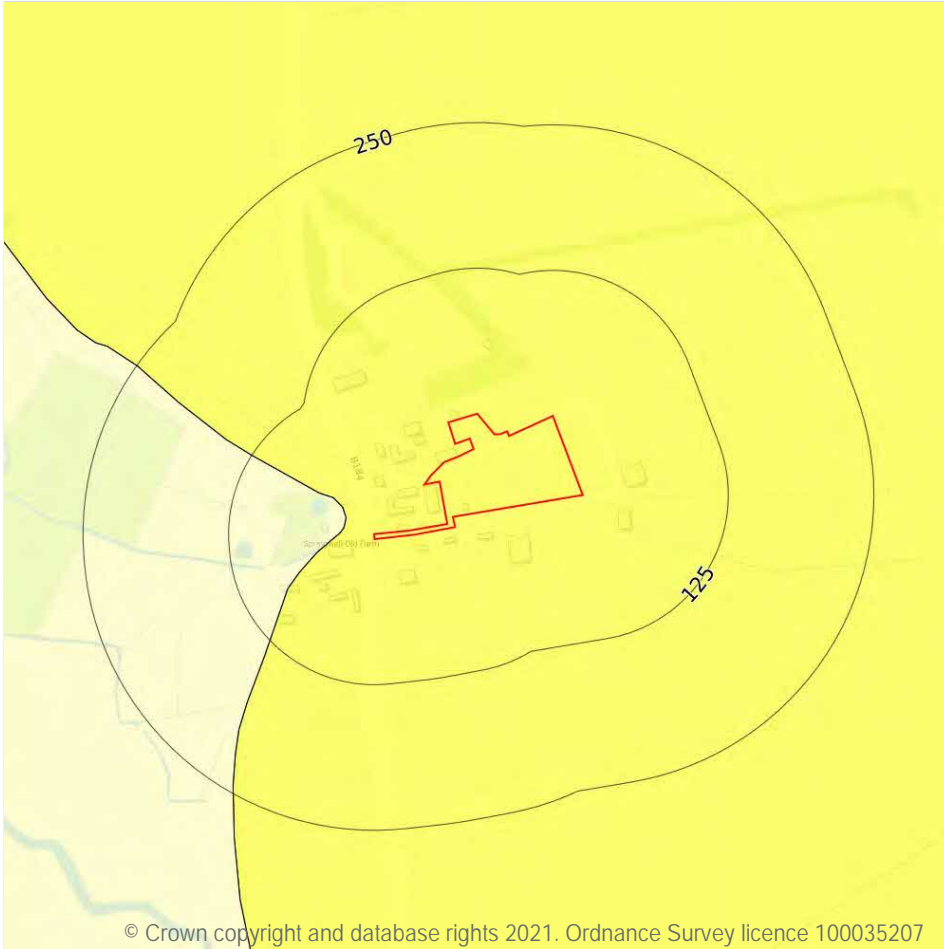
Features are displayed on the Natural ground subsidence - Compressible deposits map on **page 85**

Location	Hazard rating	Details
On site	Negligible	Compressible strata are not thought to occur.
27m W	Moderate	Compressibility and uneven settlement hazards are probably present. Land use should consider specifically the compressibility and variability of the site.

This data is sourced from the British Geological Survey.



Natural ground subsidence - Collapsible deposits



17.4 Collapsible deposits

Records within 50m

2

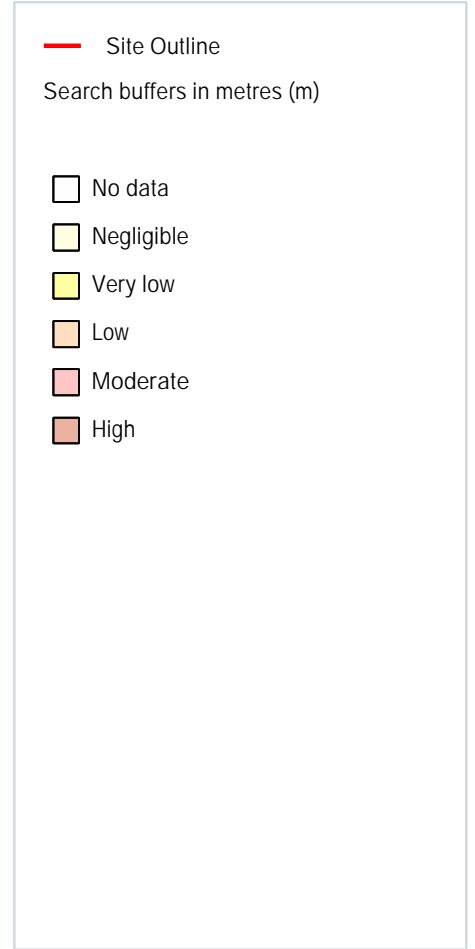
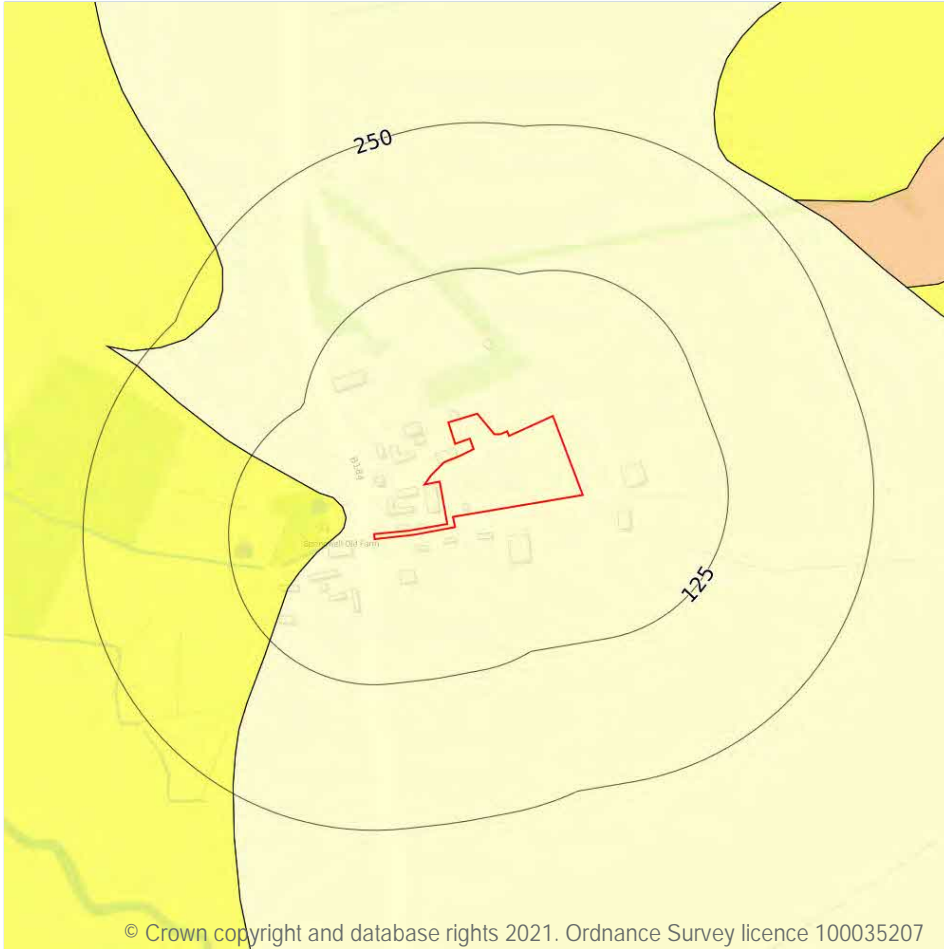
The potential hazard presented by natural deposits that could collapse when a load (such as a building) is placed on them or they become saturated with water.

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

Location	Hazard rating	Details
On site	Very low	Deposits with potential to collapse when loaded and saturated are unlikely to be present.
27m W	Negligible	Deposits with potential to collapse when loaded and saturated are believed not to be present.

This data is sourced from the British Geological Survey.

Natural ground subsidence - Landslides



17.5 Landslides

Records within 50m

2

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

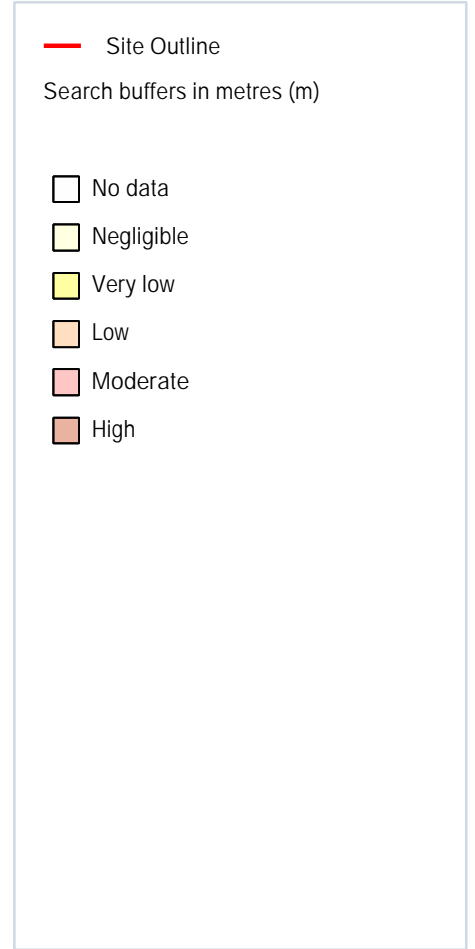
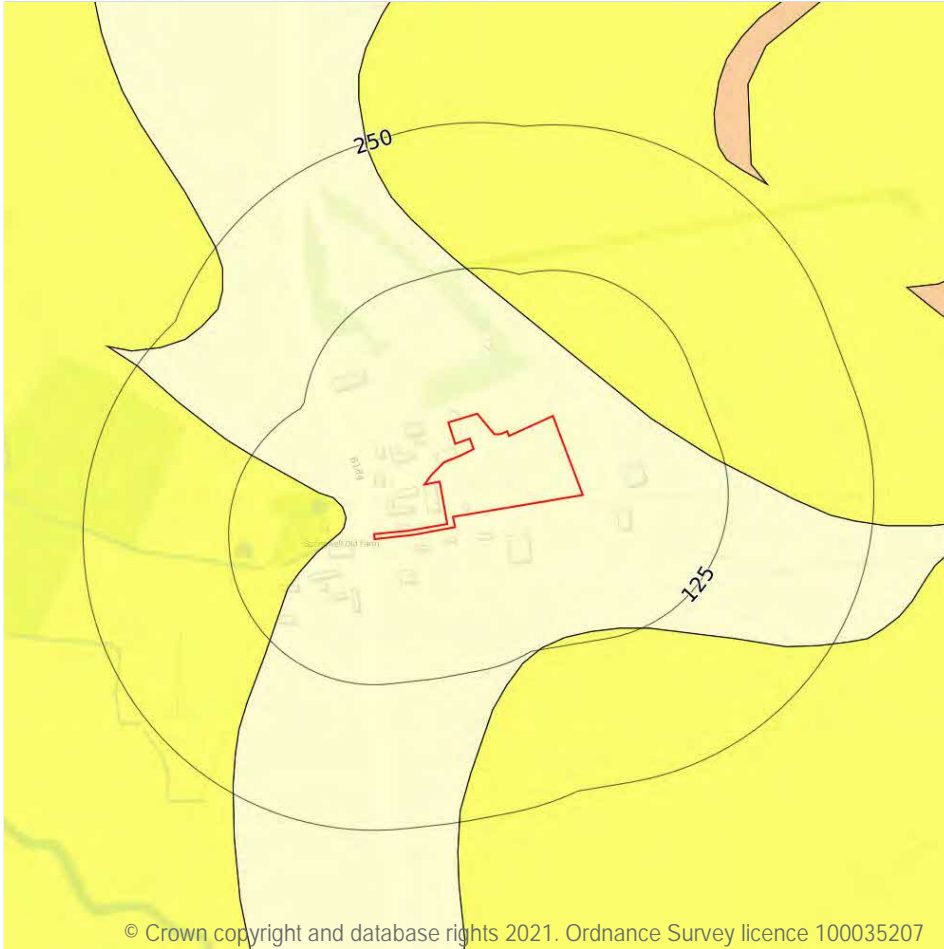
Features are displayed on the Natural ground subsidence - Landslides map on **page 88**

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

Location	Hazard rating	Details
27m W	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

2

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.

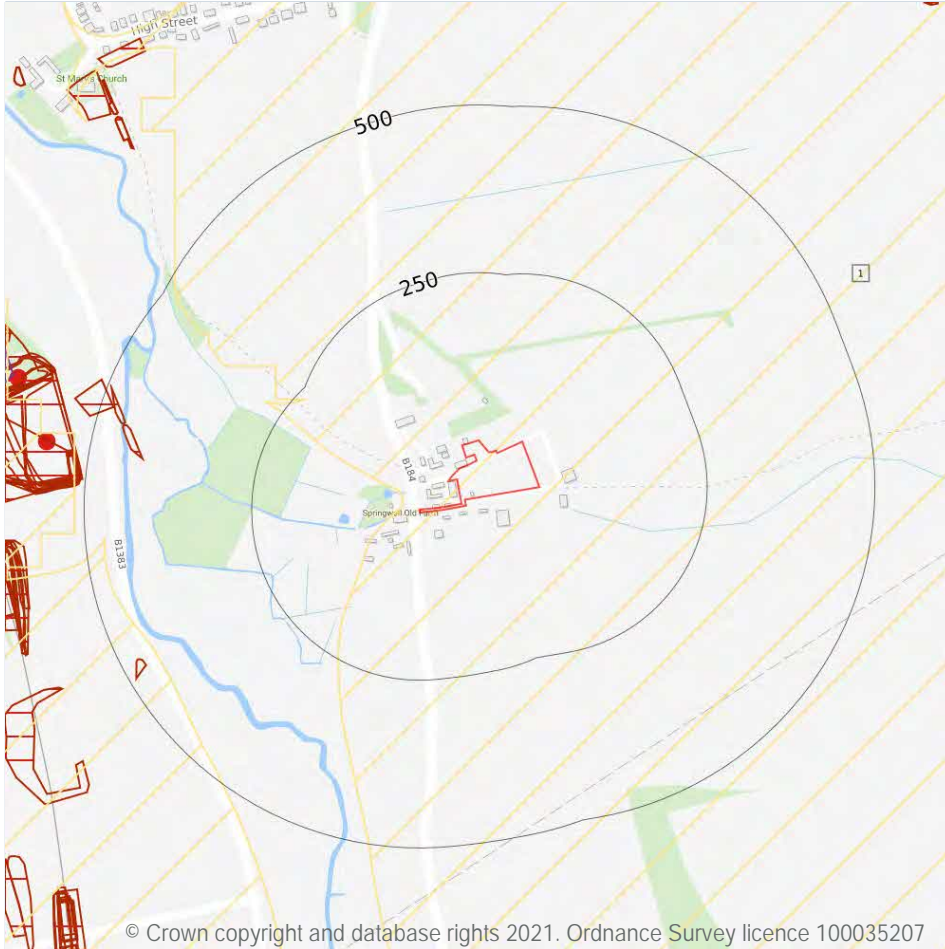
Features are displayed on the Natural ground subsidence - Ground dissolution of soluble rocks map on **page 90**

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.

Location	Hazard rating	Details
27m W	Very low	Soluble rocks are present within the ground. Few dissolution features are likely to be present. Potential for difficult ground conditions or localised subsidence are at a level where they need not be considered.

This data is sourced from the British Geological Survey.

18 Mining, ground workings and natural cavities



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

0

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

This data is sourced from the British Geological Survey.

18.3 Surface ground workings

Records within 250m

0

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.

This 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 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

2

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 92](#)



ID	Location	Name	Commodity	Class	Likelihood
1	On site	Not available	Chalk	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
2	445m SW	Not available	Chalk	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	0
-----------------	---

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

This data is sourced from Johnson Poole and Bloomer.

18.9 Coal mining

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

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

This data is sourced from the Coal Authority.

18.10 Brine areas

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

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

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

18.11 Gypsum areas

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

Generalised areas that may be affected by gypsum extraction.

This data is sourced from British Gypsum.

18.12 Tin mining

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

Generalised areas that may be affected by historical tin mining.

This data is sourced from Mining Searches UK.

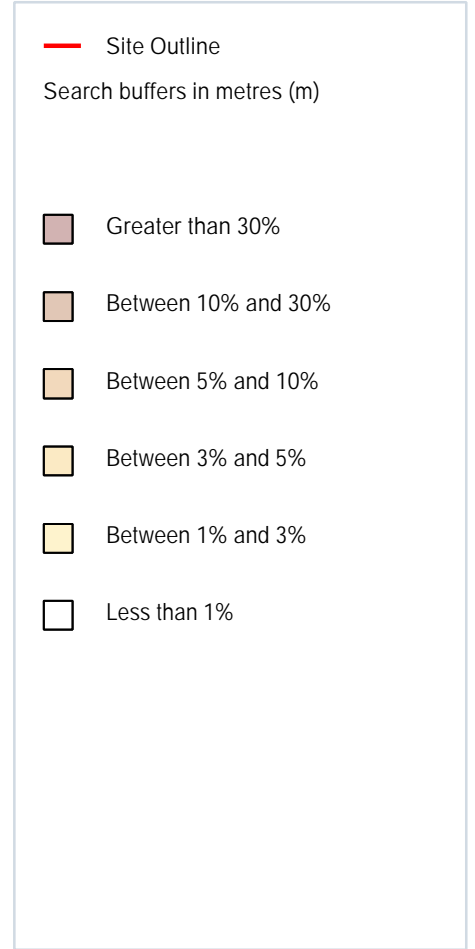
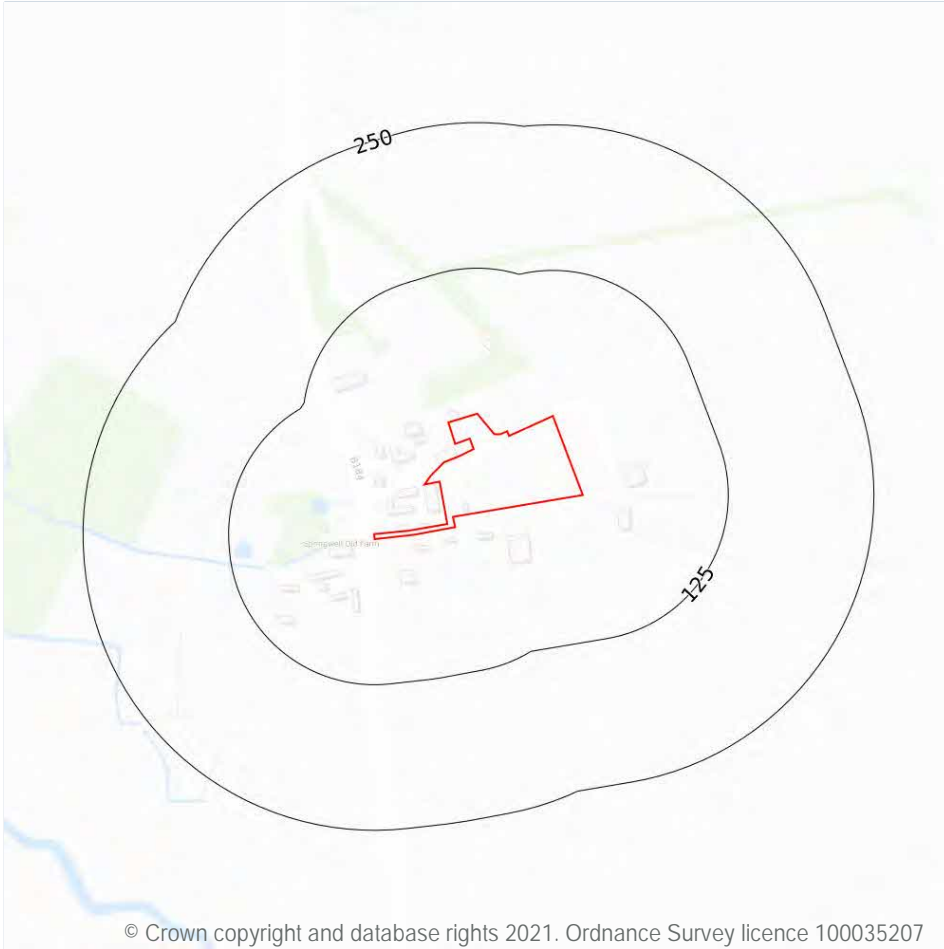
18.13 Clay mining

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

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

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

19 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 96](#)

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 mg/kg	No data	100 mg/kg	60 mg/kg	1.8 mg/kg	40 - 60 mg/kg	15 - 30 mg/kg
14m NW	15 mg/kg	No data	100 mg/kg	60 mg/kg	1.8 mg/kg	40 - 60 mg/kg	15 - 30 mg/kg
27m W	15 - 25 mg/kg	No data	100 mg/kg	60 mg/kg	1.8 mg/kg	40 - 60 mg/kg	15 - 30 mg/kg

This data is sourced from the British Geological Survey.

20.2 BGS Estimated Urban Soil Chemistry

Records within 50m

0

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

This data is sourced from the British Geological Survey.

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

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 0

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

This data is sourced from Ordnance Survey/Groundsure.

21.5 Royal Mail tunnels

Records within 250m 0

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



This data is sourced from Groundsure/the Postal Museum.

21.6 Historical railways

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

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

This data is sourced from OpenStreetMap.

21.7 Railways

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

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

This data is sourced from Ordnance Survey and OpenStreetMap.

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
---------------------	---

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 3

Natural Cavities Risk Assessment

C15347 Springwell Nursery, Walden Road, Little Chesterford

NATURAL CAVITIES RISK ASSESSMENT

(after *Protecting natural cavities in chalk*, C.N. Edmonds, published by The Geological Society of London, in *Engineering Geology Special Publications*, 18, 29-38, 2001)



Subsidence hazard summary

Subsidence Hazard Not Anticipated

Subsidence hazard components		Rating
G1	Chalk lithostratigraphic factor	2
G2	Post-Cretaceous cover deposit factor	1
H1	Water table level factor	10
H2	Topographic relief and surface drainage/subsurface infiltration factor	1
GM1	Former surface water drainage path factor	0
GM2	Glaciation factor	0

Subsidence Hazard Rating

$$SHR_N = (G1 + G2 + H1 + GM1 + GM2).H2$$

$$= (2 + 1 + 10 + 0 + 0).1$$

$$= 13$$

Subsidence Hazard Classification

SHR_N *Subsidence Hazard Category*

<55 Not anticipated

55 - 89 Very Low

90 - 136 Low

137 - 200 Moderately Low

201 - 300 Moderate

301 - 400 Moderately High

401 - 600 High

>600 Very High

See following pages for breakdown

Region abbreviations used;

Y Yorkshire

L Lincolnshire

EA East Anglia

CH Chiltern Hills

WND West North Downs

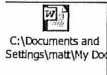
END East North Downs

DPD Dorset Purbeck Downs

C15347 Springwell Nursery, Walden Road, Little Chesterford

NATURAL CAVITIES RISK ASSESSMENT

(after *Protecting natural cavities in chalk*, C.N. Edmonds, published by The Geological Society of London, in *Engineering Geology Special Publications*, 18, 29-38, 2001)

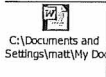


G1 <i>Chalk lithostratigraphic factor</i>			
<i>Choose one:</i>		<i>Value</i>	
Upper Chalk		20	
Middle Chalk		2	2
Lower Chalk		1	
			2
G2 <i>Post-Cretaceous cover deposit factor</i>			
(G2 = Gc + Gr + Gf)			
Gc			
<i>Choose one:</i>		<i>Value</i>	
Tertiary cover deposits present with or without superficial Quaternary cover		14	
Quaternary cover deposits only present		6	
No cover deposit present, but within 200m of a Tertiary or Quaternary cover margin deposit		2	
No cover deposit present, and more than 200m of a Tertiary or Quaternary cover margin deposit		1	1
Gr			
<i>Choose one:</i>		<i>Value</i>	
<i>Tertiary cover deposit present:</i>			
Reading Beds - Woolwich Beds (all regions)		20	
Thanet Beds (WND, END regions)		15	
Crag (EA region)		8	
Thicker Tertiary sequences involving Thanet Beds overlain by Woolwich-Reading Bed, and Blackheath Beds, and disturbed Blackheath Beds (WND region)		4	
Thicker Tertiary sequences involving Reading Beds overlain and overstepped by London and Bagshot Beds (DPD region)		2	
<i>Quaternary cover deposit present:</i>			
Proto-Thames and Proto-Solent terrace gravels (CH and DPD regions)		20	
Alluvial deposits (all regions) (only applicable to seasonal drainage directed across Chalk (Category 2) of topographic relief and surface drainage / sub-surface infiltration factor - H2)		13	
Alluvial deposits (all regions) (any topographic relief and surface drainage / sub-surface infiltration factor except as above)		1	
Glacial deposits (CH, EA, LY regions)		12	
Low-level fluvial terrace gravels or valley gravel (all regions)		6	
High-level fluvial terrace gravels or plateau gravels (all regions)		6	
Clay-with-flints (all regions)		3	
Brickearth (all regions)		1	
Solifluction deposit (all regions)		1	
No cover (topsoil only) (all regions)		0	0
Gf			
<i>Choose one:</i>		<i>Value</i>	
Reading Beds feathering margin		3	
Thanet Beds feathering margin		4	
Crag feathering margin		2	
Tertiary margins where thick Tertiary sequences occur (WND, DPD regions)		1	
Quaternary deposit feathering margin		2	
Quaternary alluvial deposits feathering margin where seasonal drainage is not directed across Chalk (Category 2) of topographic relief and surface drainage/subsurface infiltration factor - H2		0	
No cover (topsoil only)		0	
No feathering margins		0	0
			1

C15347 Springwell Nursery, Walden Road, Little Chesterford

NATURAL CAVITIES RISK ASSESSMENT

(after *Protecting natural cavities in chalk*, C.N. Edmonds, published by The Geological Society of London, in *Engineering Geology Special Publications*, 18, 29-38, 2001)



H1	<i>Water table level factor</i>		
	Choose one:		Value
	No cover deposit present, water table below Chalk surface level	10	10
	No cover deposit present, water table close to or at Chalk surface level	1	
	Cover deposit present, water table below Chalk/cover deposit interface	10	
	Cover deposit present, seasonal water table level fluctuations cause water table to rise above Chalk/cover deposit interface in wet season	5	
	Cover deposit present, water table level normally at or above Chalk/cover deposit interface	1	
	Cover deposit present, water table level normally at or above Chalk/cover deposit interface, but where artificial groundwater lowering is to take place	3	
	Artesian groundwater conditions present in cover deposit overlying Chalk	0	
			10
H2	<i>Topographic relief and surface drainage/subsurface infiltration factor</i>		
	Choose one:		Value
	Category 1 : Seasonal/permanent surface drainage and subsurface infiltration directed onto/into Chalk from cover deposit		
	Terrain Unit 1 (Hillside or valley-side)	6	
	Terrain Unit 2 (Minor channel to major valley floor)	10	
	Terrain Unit 3 (Hilltop or flatter relief areas)	4	
	Category 2 : Seasonal surface drainage and subsurface infiltration directed towards/onto cover deposit from Chalk		
	Terrain Unit 1 (Hillside or valley-side)	1	
	Terrain Unit 2 (Minor channel to major valley floor)	2	
	Terrain Unit 3 (Hilltop or flatter relief areas)	1	
	Category 3 : Seasonal/permanent surface drainage and subsurface infiltration directed across Chalk (may be covered by topsoil and/or solifluction deposits or alluvium in floors of seasonal/permanent Terrain Unit 1 (Hillside or valley-side)	1	1
	Terrain Unit 2 (Minor channel to major valley floor)	3	
	Terrain Unit 3 (Hilltop or flatter relief areas)	1	
			1
GM1	<i>Former surface water drainage path factor</i>		
	Choose one:		Value
	Proto-Solent corridor (DPD region)	10	
	Proto-Thames corridor (CH region) but not applicable to (i) or (ii) below:	10	
	(i) glacial deposits directly overlie the Chalk	0	
	(ii) surface drainage/sub-surface infiltration is directed off the Chalk towards/onto a Tertiary cover	0	
	Outside the above proto-river corridors	0	0
			0
GM2	<i>Glaciation factor</i>		
	Choose one:		Value
	Glacial deposits directly overlie the Chalk (CH, EA, L and Y regions)	5	
	Glacial deposits overlie Crag upon Chalk (EA region)	3	
	Glacial deposits overlie Reading Beds and/or proto-Thames terrace gravels upon Chalk (CH region)	0	
	Glacial Deposits absent (C, EA, L and Y regions)	0	0
	Extra-glacial areas	0	
			0