



Project: 22_PEA_02_29
Site: Greentree Farm, High Street, Haywards Heath, RH17 6JZ
Client: Andrew Lambor



Project Number:	22_PEA_02_29
Report Type:	Preliminary Ecological Appraisal Report (PEAR)
Site Address:	Greentree Farm, High Street, RH17 6JZ

Surveyor/Author.

Name / Role:	Qualifications:	Professional Bodies:
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Reviewer.

Approved by:	Signature	Date:	Version:
Ffion Maguire	FM	15/03/2022	1.0

Date: 15th March 2022

FAO: Andrew Lambor

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Summary:

- i. We were appointed by Andrew Lambor to undertake an appraisal of Greentree Farm, High Street, RH17 6JZ, in order to assess the potential ecological constraints to a planning proposal.
- ii. It is proposed to redevelop the site with the construction of a folly and additional hard landscaping leading from the residential housing to the north of the site and towards the main road to the south of the site.
- iii. Before visiting the site, a thorough desk study was undertaken, in order to determine historical records of designated sites, habitats and protected species within a 2km zone of influence. Data was sourced from Natural England via the Department for Environment, Food and Rural Affairs Multi-Agency Geographic Information for the Countryside (DEFRA MAGIC).
- iv. A site survey was carried out by Margarita Smoldareva on 28th February 2022 under the guidance provided within CIEEM's 'Guidelines for Preliminary Ecological Appraisal (CIEEM, 2017) and JNCC's 'Handbook for Phase 1 Habitat Survey' (JNCC, 2010).
- v. It is recommended that the existing amenity grassland is maintained at a short sward prior to initial vegetation clearance to discourage current habitat from becoming more favourable for reptiles, Great Crested Newts and other amphibians. It is also recommended that initial vegetation clearance is undertaken under Ecological Clerk of Works (ECoW) by an experienced ecologist.
- vi. The proposed development should avoid any additional lighting during the construction and post-development phases to limit habitat fragmentation for foraging and commuting bats.
- vii. Habitat enhancements should be encouraged during the development design by incorporating the provision of nesting/roosting habitat, such as the installation of faunal boxes to accommodate nesting birds, bats and hedgehogs. The creation of deadwood habitat for invertebrate species such as stag beetles is also encouraged. Additional planting of nectar-rich species to attract bees and butterflies will add further value to the site.
- viii. Terrestrial mammals including Badgers and Hedgehogs: Excavations that need to be left overnight should be covered or fitted with mammal ramps to ensure that any animals that enter can safely escape. Any open pipework with an outside diameter of greater than 120 mm must be covered at the end of each work day to prevent animals from entering/becoming trapped.

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Acknowledgements:

Data referred to within this report was sourced from Natural England Department for Environment, Food and Rural Affairs Multi-Agency Geographic Information for the Countryside (DEFRA MAGIC) database.

1 Introduction

- 1.1 ROAVR Group were commissioned to undertake a Preliminary Ecological Appraisal Report (PEAR) at Greentree Farm, High Street, RH17 6JZ.
- 1.2 The survey was comprised of a desktop study, which was undertaken in February 2022 and a site survey, which was carried out by Margarita Smoldareva on 28/02/2022.
- 1.3 The methodology and results are outlined within the report. Where applicable, recommendations for suitable mitigation and ecological enhancements are provided.
- 1.4 The report is to be submitted to support a planning application to redevelop the site.
- 1.5 The information and recommendations within this report have been prepared and provided in accordance with CIEEM's Code of Professional Conduct.

SITE DESCRIPTION

- 1.6 The survey site covers an area of approximately 14.7 acres and is centred on 'TQ29663267'.
- 1.7 The site is situated in Haywards Heath in the Mid Sussex District Council control area. The site is located on the north side of the town and is accessed via B2110 High Street and a single track leading to the Greentrees Farm.
- 1.8 The site is home to agricultural fields, standing waterbodies and residential dwellings.

DEVELOPMENT PROPOSALS

- 1.9 The site is to be redeveloped with the construction of a folly and additional hard landscaping leading from the residential housing to the north of the site and towards the main road to the south of the site.

KEY OBJECTIVES

- 1.10 The aims of this assessment were to:
 - identify the likely ecological constraints associated with the proposed development;
 - identify suitable mitigation measures (if required);
 - determine whether further surveys are necessary;
 - identify opportunities for ecological enhancement.

2 Methodology

DESKTOP STUDY

- 2.1 Site-specific information in relation to land designations, protected species and protected habitats within a 2km zone of influence was sourced from Natural England, via the Department for Environment, Food and Rural Affairs Multi-Agency Geographic Information for the Countryside (DEFRA MAGIC) database.
- 2.2 Results of the desktop study should be considered to be indicative only.

PHASE 1 HABITAT SURVEY

- 2.4 A Preliminary Ecological Appraisal, comprised of a site walkover was undertaken by Margarita Smoldareva on the 28th February 2022. The PEA was undertaken in line with CIEEM's 'Guidelines for Preliminary Ecological Appraisal (CIEEM, 2017).
- 2.5 The survey was conducted from the ground.
- 2.6 A site habitat map was produced in accordance with the JNCC Phase 1 Survey methodology (JNCC, 2010).

PRELIMINARY BAT ROOST ASSESSMENT (PRA)

- 2.7 A Preliminary Bat Roost Assessment (PRA), of the site was undertaken by Margarita Smoldareva during the site survey. The PRA was undertaken in line with the Bat Conservation Trust's 'Bat Surveys for Professional Ecologists: Best Practice Guidelines' (Collins, 2016).
- 2.8 The inspection involved searching for features of value to roosting bats. However, the site was lacking suitable roosting features as there were no buildings or trees on-site.

SPECIES POTENTIAL

- 2.9 Data collected from both the desktop study and site survey was used to determine the potential for protected species on-site. The potential for protected species was assigned a rank, as per Table 2.9.1.

Table 2.9.1: Ratings of potential suitability for protected species.

Rank	Comments
Negligible	While presence cannot be absolutely discounted, the site includes very limited or poor quality habitat for a particular species. The site may also be outside the known national range for a species.
Low	On-site habitat is of poor to moderate quality for a given species, with few or no information about their presence from the desktop study. However, the presence cannot be discounted due to the national distribution of the species or the nature of on-site and surrounding habitats.
Moderate	The on-site habitats are of moderate quality, providing most or all of the key requirements for a species. Several factors may limit the likelihood of occurrence, including habitat severance, habitat disturbance and small habitat area.
High	On-site habitat is of high quality for a given species. The site is within a regional or national stronghold for that particular species with good quality surroundings and good connectivity.
Present	Presence confirmed for the survey itself or recent, confirmed records from information gathered through desktop study.

ECOLOGICAL CONSTRAINTS AND MITIGATION

2.10 An evaluation of the potential ecological constraints to the proposed development and appropriate mitigation strategies was made following CIEEM's 'Guidelines for Ecological Impact Assessment in the UK and Ireland (CIEEM, 2018).

LIMITATIONS

- 2.11 Only one site visit was undertaken, therefore, a full evaluation of species present throughout the year could not be made. Furthermore, the site survey was undertaken in February. Therefore, there were seasonal constraints to species identification. However, the data collected during the site survey was sufficient to make an appropriate assessment of the site.
- 2.12 The site habitat map shown in Appendix 5 was produced from an Ordnance Survey Tile purchased from our mapping supplier. The site walkover was used to inform the location and extent of existing habitats shown on the appended mapping and is as accurate as possible but some error must be allowed for without a full topographical survey.

3 Policy and Legislative Context

- 3.1 This section includes the legislative context of those protected species or other notable species that are recorded on-site, or have the potential to be present on-site. Details on specific legislation for other protected or notable species that have not been identified as being present, or having the potential to be present, are not included below.

NATIONAL PLANNING POLICY

- 3.2 The introduction of the National Planning Policy Framework (NPPF) in March 2012 sets out the Government's planning policies for England and how these are expected to be applied in the presumption in favour of sustainable development. It sets out the Government's requirements for the planning system, only to the extent that it is relevant, proportionate and necessary to do so and is a material consideration for local planning authorities in determining applications.
- 3.3 Planning Practise Guidance is relevant covering the Natural Environment alongside the NPPF. Therefore features of ecological value should be considered in the context of conserving and enhancing the natural environment.
- 3.4 The Government's objectives for planning are to promote sustainable development, to conserve, enhance and restore the diversity of England's wildlife and geology and to contribute to rural renewal and urban renaissance.

LOCAL PLANNING POLICY

- 3.5 This report has been commissioned in order to comply with policy ERA2 of the West Sussex Structure Plan 2001-2016 which is still feasible.

NATIONAL AND INTERNATIONAL LEGISLATION

- 3.6 Bern Convention on the Conservation of European Wildlife and Natural Habitats (1982)
- 3.7 Convention on the Conservation of Migratory Species of Wild Animals (1983)
- 3.8 Countryside and Rights of Way Act (2000)
- 3.9 National Parks and Access to the Countryside Act (1949)
- 3.10 Natural Environment and Rural Communities Act (2006)
- 3.11 Protection of Badgers Act (1992)
- 3.12 The Conservation of Habitats and Species Regulations (2017)

- 3.13 The Convention of International Trade in Endangered Species of Wild Fauna and Flora (1975)
- 3.14 The Hedgerows Regulations (1997)
- 3.15 UK Biodiversity Action Plan (1994)
- 3.16 Wildlife and Countryside Act (1981)
- 3.17 Wild Mammals (Protection) Act (1996)

4 Desktop Study

SITE DESIGNATIONS

- 4.1 There were two designated sites within the 2km zone of influence, including one Site of Special Scientific Interest (SSSI) and one Area of Outstanding Natural Beauty (Tables 4.1.1 and 4.1.2 respectively).

Table 4.1.1: Sites of Special Scientific Interest (SSSI's) recorded within a 2km radius of the survey site.

Site Name	Grid Reference	Area (ha)	Approx. Closest Distance from Site (km)
Worth Forest	TQ294331	43.85	0.22 NW

*Data from Natural England.

Table 4.1.2: Areas of Outstanding Natural Beauty recorded within a 2km radius of the survey site.

Site Name	Grid Reference	Area (ha)	Approx. Closest Distance from Site (km)
High Weald	Unknown	146172.00	ONSITE

*Data from Natural England.

LOCAL HABITAT

- 4.2 Protected habitats were formerly mapped within the 2km zone of influence (Table 4.2.1)

Table 4.2.1: Formerly mapped habitats within a 2km radius of the survey site.

Habitat	Approx. Closest Distance from Site (km)
Deciduous woodland	BORDERS SITE
Ancient and semi-natural woodland	BORDERS SITE
Ancient replanted woodland	0.15 NNE
Coniferous woodland	0.31 E
No main habitat but additional habitat exists	0.44 NE
Mixed (mainly coniferous) woodland	0.48 E
Felled woodland	0.53 W
Low density woodland	1.13 ENE
Traditional orchards	1.24 SW
Young trees	1.31 SSE
Lowland heathland	1.33 NW
Woodpasture and parkland	1.64 SE
Mixed (mainly broadleaved) woodland	1.66 NE
Good quality semi-improved grassland	1.70 NW

*Data from Natural England.

WATER BODIES

4.3 There were five standing water bodies situated within a 500m radius of the survey site. WB3, WB4 and WB5 were disconnected from the site by a public highway (High Street). However, WB1 and WB2 were within close proximity to the site and were considered to have high connectivity (Appendix 3).

HISTORICAL SPECIES RECORDS

4.4 Protected species records relating to the site and 2km zone of influence were obtained from DEFRA MAGIC as part of the desktop study.

4.5 On the client's request, data was not obtained from the local ecological records centre. However, A full list of identified species recorded within the 2km zone of influence can be requested from Sussex Biodiversity Record Centre (SxBRC).

4.6 The absence of identified records does not discount the presence of a species. An absence of identified records is primarily a result of a lack of survey or the non-submission of records. Furthermore, historical records of species do not confirm their current presence within an area.

5 Site Survey

- 5.1 The site survey was undertaken by Margarita Smoldareva on the 28th of February 2022.

Table 5.1.1: Weather conditions at the time of survey.

Date of site survey: 28/02/2022	
Temperature	6°C
Wind	25- 30mph
Precipitation	0%

HABITATS ON-SITE

- 5.2 The habitats presented consist of the following JNCC Phase 1 Habitat categories:

- Scattered Trees (A3)
- Amenity Grassland (J1.2)
- Semi-Improved Grassland (B6)

- 5.3 The habitat map in Appendix 5 was produced to illustrate the results.

SCATTERED TREES

- 5.4 Scattered mature Oak (*Quercus robur*) trees were noted along the western, southern and mid-section of the site. All the trees were mature and in good condition, however, some were subject to recent storm damage (Target Note 2). Further tree species included Holly (*Ilex sp.*) and Silver Birch (*Betula pendula*). No hedgerows were present within the site boundary as identified in the site habitat map (Appendix 5).

AMENITY GRASSLAND

- 5.5 Open fields dominated the survey area and the proposed development will impact this habitat the most. Species recorded include Cleavers (*Galium aparine*), Annual Rye Grass (*Lolium multiflorum*), Perennial Rye Grass (*Lolium perenne*), Dandelion (*Taraxacum sp.*) and Nettles (*Urtica dioica*). This habitat is managed by cutting the grass three times on annual basis, therefore, maintaining the sward short. Target Note 1 – the site directly connects to Worth Forest SSSI/Ancient Woodland.

SEMI-IMPROVED GRASSLAND

- 5.6 On the edges of the amenity grassland and underneath the mature trees, semi-improved grassland was recorded. These edges were left unmanaged for a longer time, therefore, allowing the grassland to become longer and some scattered scrub, Bramble (*Rubus fruticosus*), to start developing in some places.

6 Evaluation and Assessment

- 6.1 Results from the desktop study and site survey were evaluated to assess species potential (as per Table 2.9.1). An evaluation of potential ecological constraints to the proposed development and recommendations for appropriate mitigation strategies are provided in Table 6.1.1.

Table 6.1.1: Potential ecological constraints to the proposed development and appropriate mitigation strategies.

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Protected sites	Worth Forest SSSI is noted 22m northeast from the site boundary which is also ancient woodland.	None.	It is believed that the proposed development of the folly will not cause any negative impacts on the designated sites as amenity grassland habitat is due to be lost that are easily replaceable.	None.
Protected habitats	Ancient Woodland borders the site.	It is believed that the proposed development of the folly will not cause any negative impacts on the designated sites.	None.	None.
Protected plant species	Negligible.	It is very unlikely that amenity grassland will have protected plant species.	None.	None.
Amphibians (excl. Great Crested Newts)	Low.	The site and the surrounding landscape provide commuting and foraging grounds for amphibians therefore these species might be impacted during the initial phase of construction.	Potential harm/injury is anticipated due to the potential presence of amphibians on-site commuting between the waterbodies.	It is recommended that the topsoil strip is undertaken under direct supervision of the Ecological Clerk of Works (ECoW).

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Bats (Chiroptera)	Roosting bats			
	Negligible.	Trees are retained as part of the development. The folly will be designed away from trees to avoid root compaction areas.	None.	None.
	Foraging/Commuting bats			
	High.	The site and surrounding landscape provide bats with ideal commuting and foraging habitat therefore any increase in artificial lighting will have a negative impact on foraging/commuting bats.	Additional lighting causes fragmentation to the foraging/commuting ground.	Avoid additional lighting during the construction and operational phase.
Birds	Negligible.	Amenity grassland is managed by undergoing cutting three times on an annual basis, and, due to the lack of enclosure in the form of rough grass, it is very unlikely that ground-nesting birds will occupy a patch of grassland on which development is due to take place.	None.	None.

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Great Crested Newts (<i>Triturus cristatus</i>)	High.	Due to five waterbodies present within 500m of the site boundary, it is likely that the Great Crested Newts are present within the surrounding landscape and that the amenity grassland might be used for commuting and foraging.	Potential harm/injury is anticipated due to the potential presence of Great Crested Newts on-site commuting between the waterbodies.	It is recommended that the topsoil strip is undertaken under direct supervision of the Ecological Clerk of Works (ECoW). Amenity grassland to be maintained prior to development to discourage habitat becoming more favourable.
Invertebrates	Negligible.	Given the lack of suitable larval habitat for these species on site, such as herbaceous vegetation, it is deemed unlikely that these species would be impacted by the proposed development.	None.	Habitat enhancement suggestions are in Section 7.
Reptiles	Low.	Amenity grassland is managed and is maintained as a short sward, therefore it provides low suitability for reptiles. Further surrounding landscape offsite offers opportunities for reptiles.	Potential harm/injury is anticipated if reptiles are present on-site.	It is recommended that the topsoil strip is undertaken under direct supervision of the Ecological Clerk of Works (ECoW).

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Other terrestrial mammals (excl. bats).	Badgers (<i>Meles meles</i>)			
	Present,	The site provides ample habitat for Badgers, including undisturbed woodland. Furthermore, the site is well connected with the wider locality and other high-value habitats such as open grassland. The owner confirmed the presence of badgers off-site within 500m of the site boundary.	Due to small scale development and absence of Badger setts within the site boundary, the proposed development is unlikely to have a negative impact on Badgers.	None as the site was checked for Badger setts and other possible Badger evidence during the site visit. No evidence of badgers such as latrines and Badger setts were recorded within 30m of the proposed development.
	Dormice (<i>Gliridae</i>)			
	High (offsite)	Due to the absence of understorey growth on site and presence of ancient woodland 22m north-east of the site, Dormice are likely to be present within the area. However very unlikely to be using the site boundary for foraging or communing due to open habitat.	Due to small scale development, the proposed development is unlikely to have a negative impact on Dormice.	None.

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Other terrestrial mammals (excl. bats).	Hedgehogs (<i>Erinaceus europaeus</i>)			
	High.	The site provides some potential habitats for Hedgehogs, including woodland. Preferred habitats for the species, such as open grassland offer good commuting/foraging habitat.	Due to small scale development, no negative impact is anticipated.	Enhancements off-site.
	Otters (<i>Lutra lutra</i>)			
	Negligible.	None.	None	None.
	Pine Martens (<i>Martes martes</i>)			
	Negligible.	No suitable habitat within site boundary.	None.	None.
	Polecats (<i>Mustela putorius</i>)			
	Negligible.	No suitable habitat within site boundary.	None.	None.
	Water Voles (<i>Arvicola amphibius</i>)			
	Negligible.	No suitable habitat within site boundary.	None.	None.

Species / Sites / Habitats	Presence/Potential	Further Comments	Potential Impacts	Recommendations for Mitigation
Invasive plant species	Negligible.	None recorded during the survey.	None.	None.

7 Biodiversity Net Gain

- 7.1 The development should be used as an opportunity for biodiversity net gain, by creating new opportunities for wildlife.

BATS

- 7.2 It is recommended that bat boxes are installed onto the existing mature Oaks within the site as it is believed that foraging and commuting bats use the site and will benefit from additional roosting/resting places.

BIRDS

- 7.3 Nest boxes are also encouraged to be installed onto the existing trees on-site to benefit birds.

HEDGEHOGS

- 7.4 The inclusion of Hedgehog's domes will benefit Hedgehogs using the site for nesting, foraging, and commuting.

INVERTEBRATES

- 7.5 The creation of deadwood habitat, as well as planting nectar-rich floral species will add value to existing invertebrates using the site and surrounding landscapes.

8 Conclusions

- 8.1 The site at Greentree Farm, High Street, RH17 6JZ is to be redeveloped with a folly and additional hard landscaping leading from the residential housing to the north of the site and towards the main road to the south of the site.
- 8.2 The site consists of scattered mature trees with semi-improved grassland as understorey and amenity grassland fields which have undergone cutting regime three times a year during several years. The site is well connected to the wider locality, which predominantly consists of ancient woodlands, standing water bodies and agricultural fields with pockets of residential housing.
- 8.3 No further surveys beyond the desk study and site survey are considered to be necessary to determine the potential ecological constraints to development and advice on appropriate mitigation strategies.'

POTENTIAL IMPACTS

- 8.4 As the site is predominantly comprised of amenity grassland, new development is set to result in limited habitat loss as this habitat can be easily recreated with minimal effort. The surrounding landscape offers wildlife many opportunities, therefore it is recommended that habitat enhancement should be created to compensate for loss of existing habitat.

RECOMMENDATIONS

- 8.5 It is recommended that the existing amenity grassland is maintained at a short sward prior to initial vegetation clearance to discourage current habitat from becoming more favourable for reptiles, Great Crested Newts and other amphibians. It is also recommended that initial vegetation clearance is undertaken under Ecological Clerk of Works (ECoW) by an experienced ecologist.
- 8.6 The proposed development should avoid any additional lighting during the construction and post-development phase to limit habitat fragmentation for foraging and commuting bats.
- 8.7 Habitat enhancements should be encouraged during the development design by incorporating the provision of nesting/roosting habitat, such as the installation of faunal boxes to accommodate nesting birds, bats and Hedgehogs. The creation of deadwood habitat for invertebrate species such as Stag Beetles is also encouraged. Additional planting of nectar-rich species to attract bees and butterflies will add further value to the site.

- 8.8 Terrestrial Mammals Including Badgers and Hedgehogs: Excavations that need to be left overnight should be covered or fitted with mammal ramps to ensure that any animals that enter can safely escape. Any open pipework with an outside diameter of greater than 120 mm must be covered at the end of each work day to prevent animals from entering/becoming trapped.

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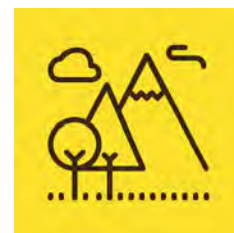
10 Limitations

- 10.1 ROAVR Group has prepared this Report for the sole use of the above named Client/Agent in accordance with our terms of business, under which our services were performed. No other warranty, expressed or implied, is made as to the professional advice included in this Report or any other services provided by us.
- 10.2 This Report may not be relied upon by any other party without the prior and express written agreement of ROAVR Group. The assessments made assume that the land use will continue for its current purpose without significant change. ROAVR Group has not independently verified information obtained from third parties.
- 10.3 This report, data tables and raw data remain the copyright of ROAVR until such time as any monies owed are settled in full and the report may be withdrawn at any time.
- 10.4 The ultimate decision to do/not do any work on any structure/tree/feature and any legal consequences of any action taken/not taken lies solely with yourselves and/or your employees/subcontractors. ROAVR Group accepts no liability or responsibility in any way for any actions taken/not taken by you and/or your employees and/or any other person/organisation engaged in carrying out/not carrying out any of the proposed work.

Should you require any further information, please do not hesitate to contact us at any time.

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Miss Margarita Smoldareva



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Appendix 1: Site Location and Assessment Boundary

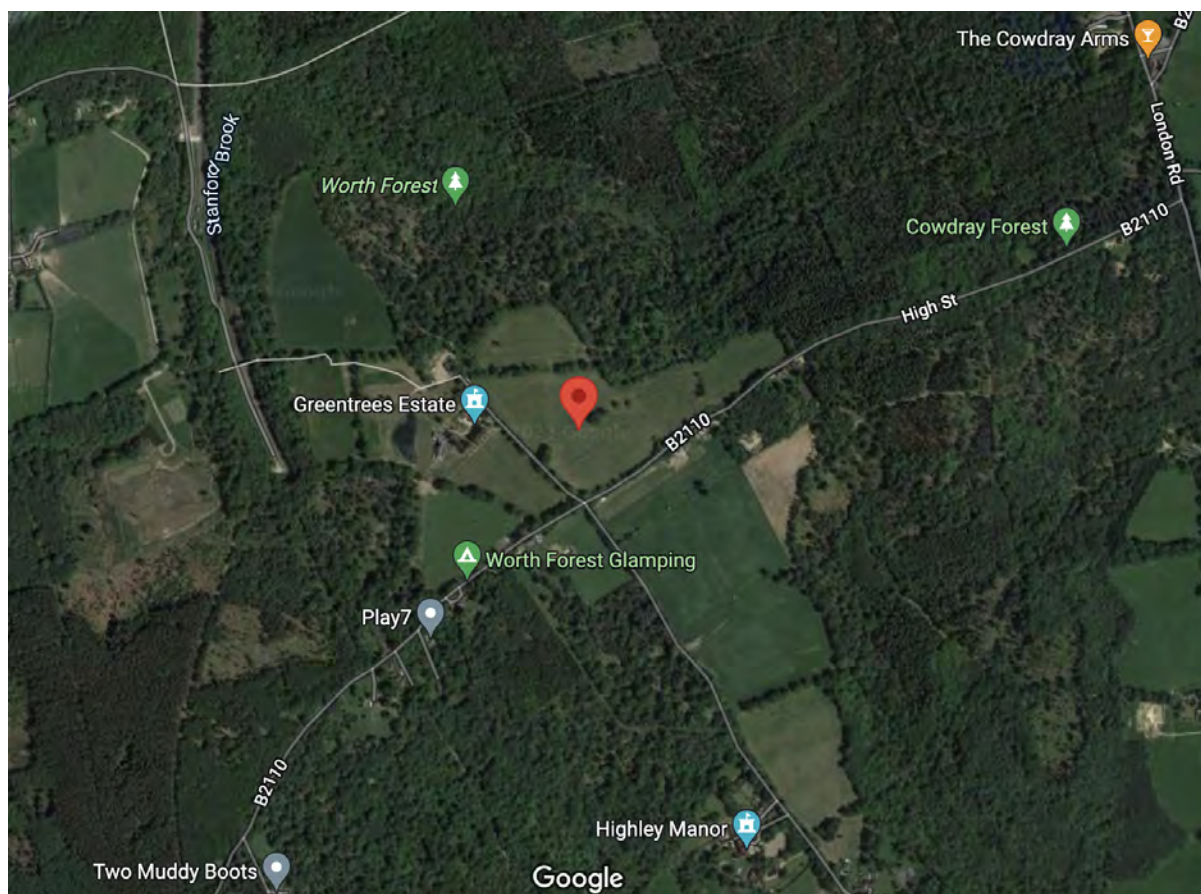


Figure A1.1: Extract from Google Maps showing the site location.

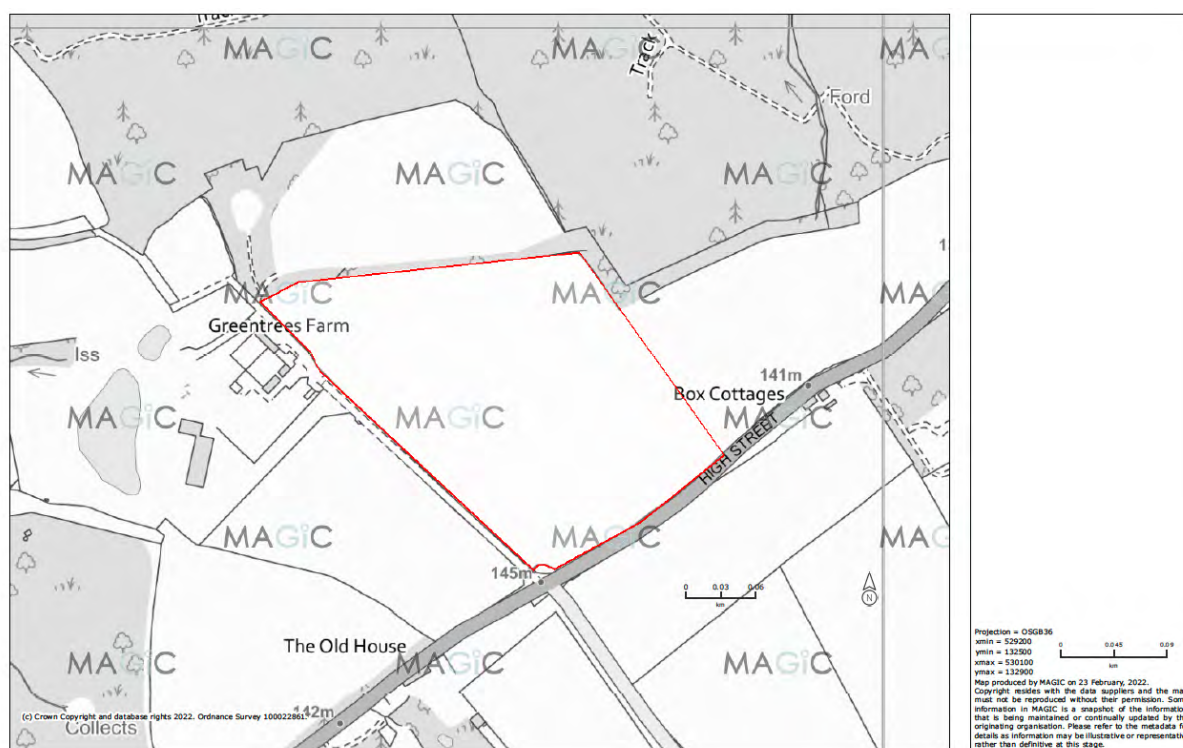


Figure A1.2: Extract from DEFRA MAGIC showing the assessment boundary.

Legend

- Sites of Special Scientific Interest (England)

Projection = OSGCR36
 xmin = 529000
 ymin = 530500
 xmax = 534300
 ymax = 535000

Map produced by MAGIC on 28 February, 2022.
 Copyright: reader with the data suppliers and the map must not be reproduced without their permission. Some information in MAGIC is a snapshot of the information that is being maintained or continually updated by its originating organisation. Please refer to the metadata for details as information may be illustrative or representative rather than definitive at this stage.

Figure A2.1: Location of Sites of Special Scientific Interest (SSSI's) situated within a 2km search radius of the site.

*Data from Natural England.

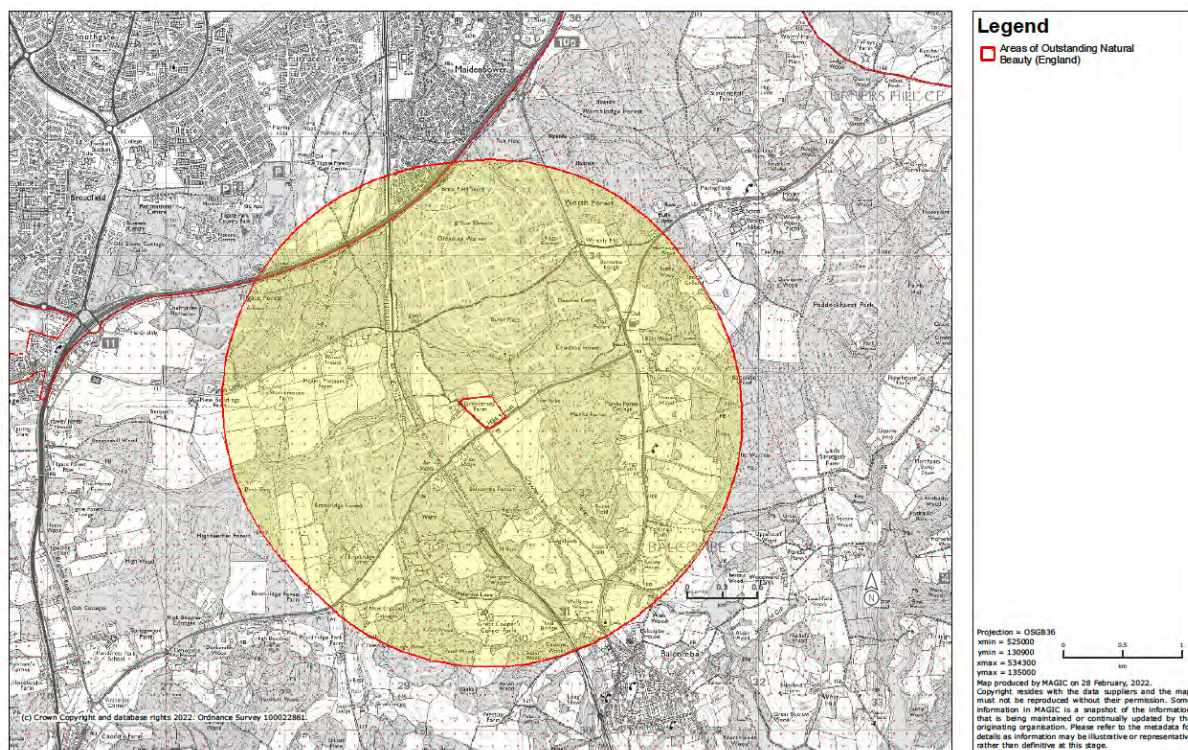


Figure A2.2: Location of Areas of Outstanding Natural Beauty situated within a 2km search radius of the site.

Appendix 3: Local Habitats

*Data from Natural England.

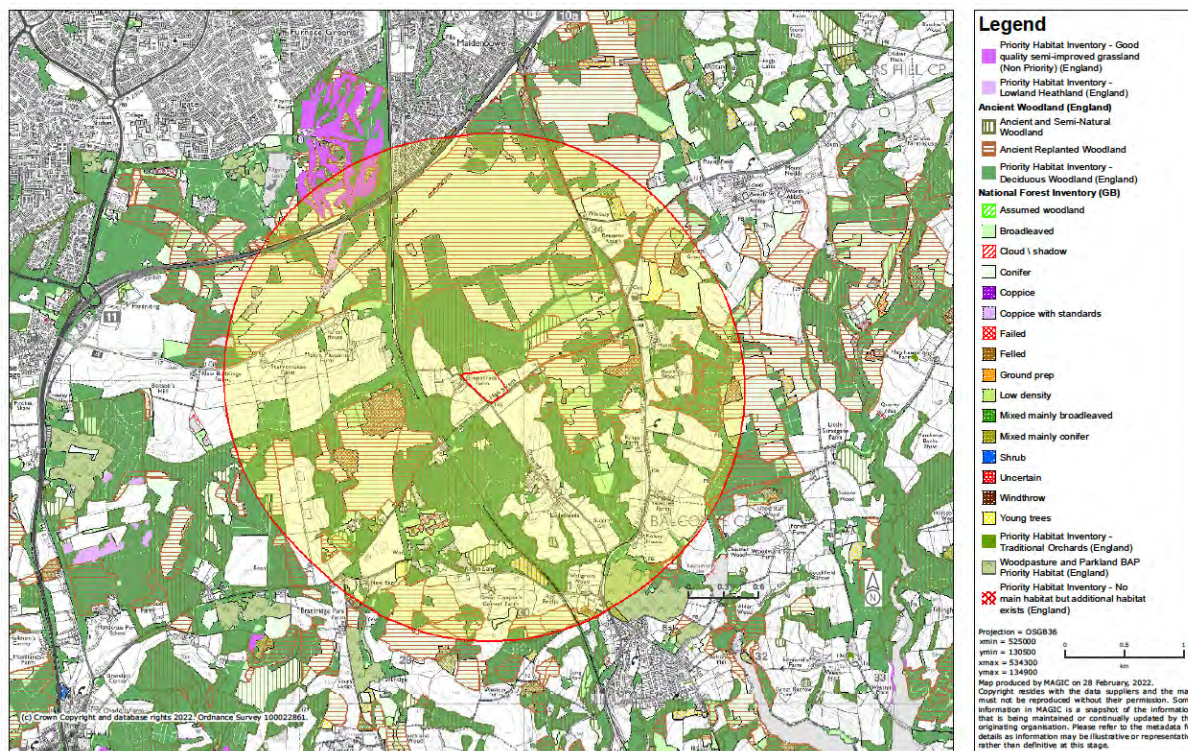


Figure A3.1: Formerly mapped habitats situated within a 2km search radius of the site..

*Data from Natural England.

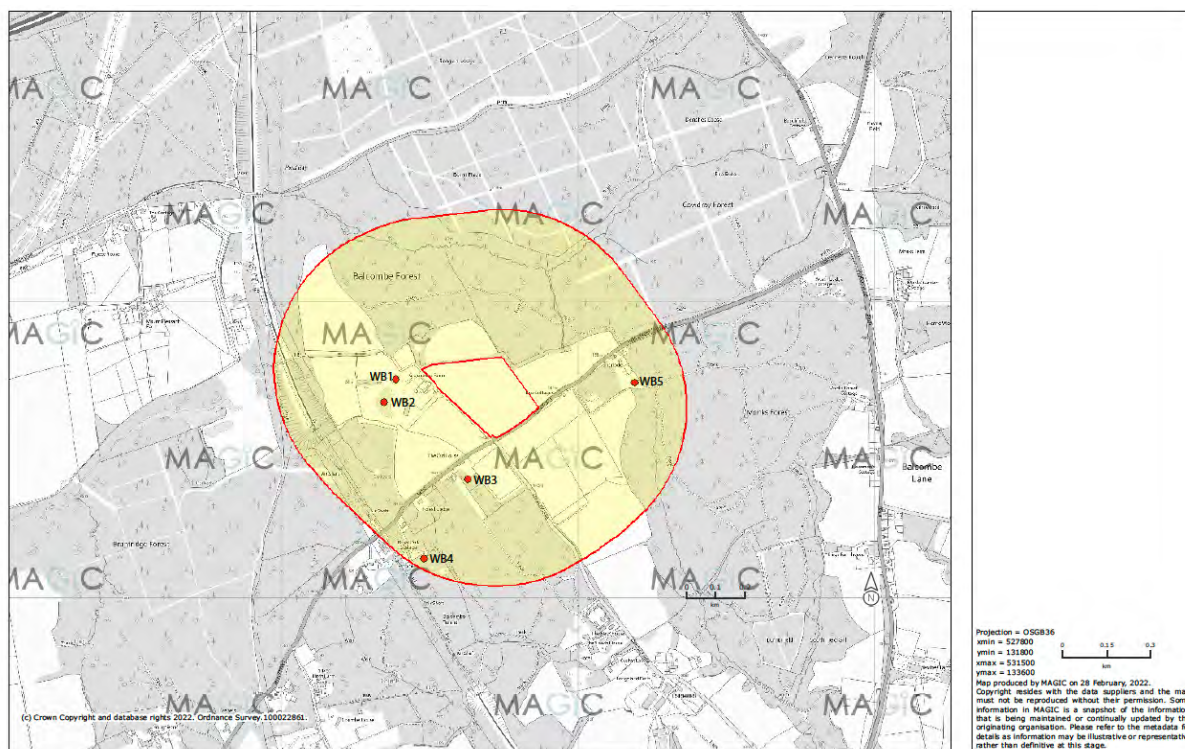


Figure A3.2: Formerly mapped standing water bodies situated within a 2km search radius of the site.

Appendix 4: Site Photographs

A4.1 The photographic images were taken by Margarita Smoldareva during the site survey on 28/02/2022.



Figure A4.1.1: Overview of the site.



Figure A4.1.2: Semi-improved grassland underneath the existing trees.



Figure A4.1.3: Amenity grassland.



Figure A4.1.4: Scattered trees along southern boundary.

Appendix 5: Site Habitat Map

A5.1 The site habitat map was produced in accordance with the JNCC's Phase 1 Survey methodology (JNCC, 2010).

