

Libby Morris

Ecologist



Ecological Appraisal

Site Name

Cobham House Vineyard, Gold Street

Client

Cobham House Vineyard Ltd

Date of Issue

16th June 2025

Author

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Report Summary

1. Libby Morris was commissioned by Cobham House Vineyard Ltd to provide a Preliminary Ecological Appraisal regarding the potential for any protected/notable species and/or habitats to be present at the land at Cobham House Vineyard, along with an assessment of the potential ecological constraints and opportunities in relation to the application for the construction of a winery building with associated soft and hard landscaping. This was required under condition 3 to an application for prior approval ref. 20240544 dated 30 April 2025 by Gravesham Borough Council.
2. The site currently comprises arable land used as a vineyard with native boundary hedgerows to the east and west, and a broadleaved native tree line to the south.
3. The proposed works comprise the construction of a winery building with associated soft and hard landscaping.
4. There are no ponds suitable to support breeding Great Crested Newt and other amphibians within 500m of the site. No Badger setts were identified within the application site. No further surveys for notable species are required.
5. Recommendations for enhancements to the site have been laid out in Section 5. These include the implementation of hibernacula and enhancement of terrestrial habitat for amphibians and reptiles, as well as the implementation of bat and bird boxes.

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About the Author

This report has been prepared by Libby Morris, BSc (Hons), an ecologist with eight years' experience undertaking bird surveys as well as being a FISC level 4 accredited botanist and a MoRPH licenced river surveyor. She is experienced in habitat and PEA surveys as well as specialising in statutory Biodiversity Net Gain and habitat assessments.

1. Introduction

1.1 Purpose of the Report

Libby Morris has been commissioned to undertake a Preliminary Ecological Appraisal on land at Cobham House Vineyard by Cobham House Vineyard Ltd. This report summarises the findings of a walkover of the site by Libby Morris, BSc (Hons) on the 20th of May 2025. An assessment of the site was undertaken to assess the potential for any protected habitats or species to be present at the site. This report also includes an assessment of any potential ecological constraints and opportunities presented within the site.

Recommendations for further surveys that may be required and Ecological Impact Assessment (EclA) of the proposal are provided where necessary, and measures to avoid, mitigate and/or compensate for significant adverse effects are summarised. The potential to incorporate ecological enhancement measures as part of the scheme is discussed.

In order to achieve this aim the mitigation hierarchy should be adopted so that the following applies:

- **Avoidance** - Ecological features of importance should be avoided in the first instance through the design process by either designing around them, alternative design or even an alternative location.
- **Mitigation** - Adverse impacts that cannot be avoided should be adequately mitigated for to minimise negative impacts on the ecological features. Mitigation measures can either be implemented during the design process or construction phase.
- **Compensation** - This should only be used in exceptional circumstances or as a last resort, after all options for avoidance and mitigation have been fully considered. Compensation therefore can be applied to any residual impacts that cannot be avoided or mitigated.
- **Enhancements** - Seek to provide net benefits for biodiversity over and above requirements for avoidance, mitigation or compensation.

This ecological appraisal was conducted to comply with condition 3 of the prior approval notification 20240544 issued by notice dated 30 April 2025. It aims to inform the client and

Gravesham Borough Council about the key findings of the site survey, as well as the results of desk study research concerning the site's context, taking into account both its current condition and its condition post-works.

1.2 Site Background

The site is located in a semi-rural location south of Gravesend in Cobham, DA12 3AA. The grid reference of the site is TQ 66358 67580. Agricultural land lies to the north and south and further agricultural land separated by small parcels of woodland to the east. Urban development lies to the west. The site within the wider landscape is shown in Figure 1.



Figure 1. An aerial image showing the location of the application site within the wider landscape. Images produced courtesy of Google maps (Map data ©2025 Google Earth Pro).

The proposed works comprise the erection of an agricultural building to be used as a winery with associated soft and hard landscaping within the north westerly aspect of the site. The plans for these are shown in Figure 2.

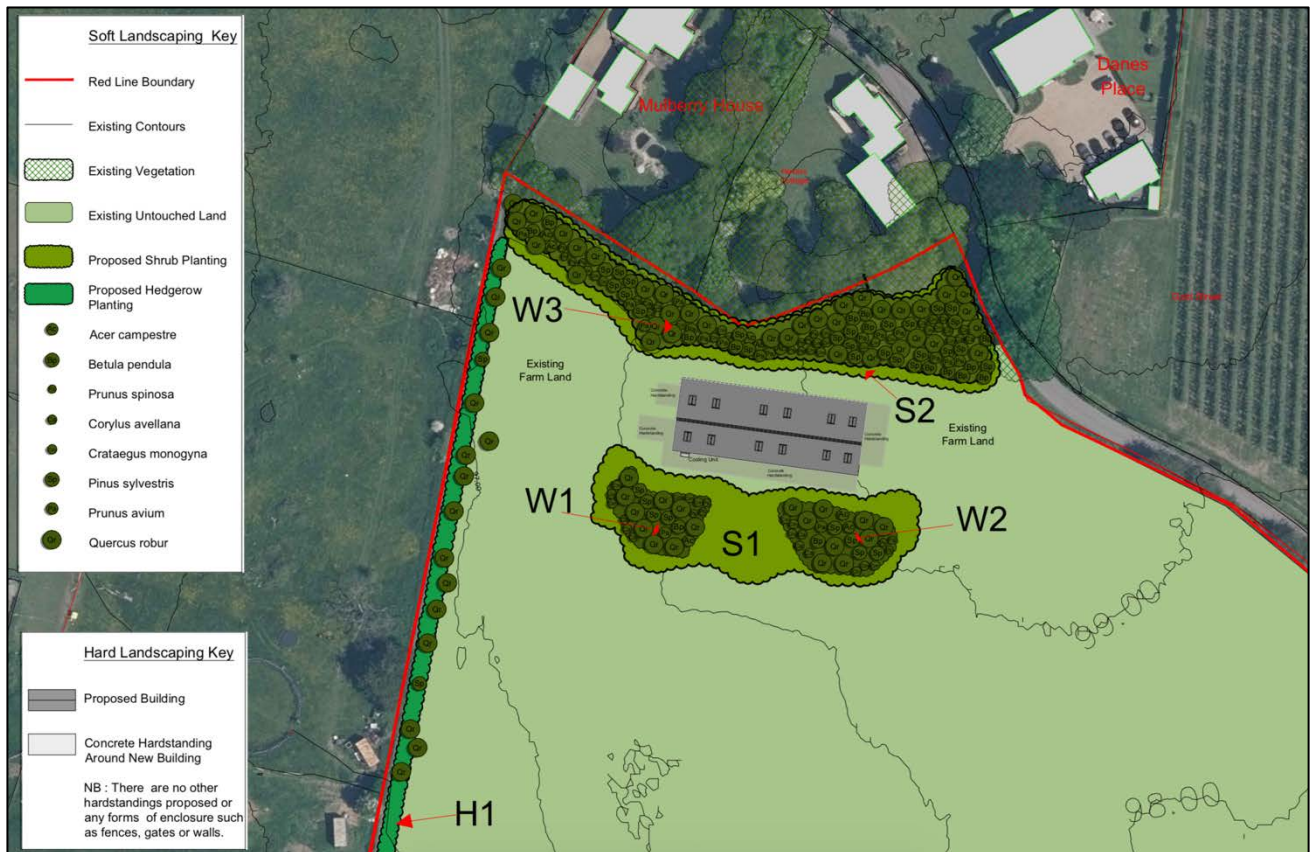


Figure 2. Plans for the application site courtesy of Weller Designs Ltd.

2. Methodology

2.1 Desk Study

A desk study was undertaken using online mapping tool Magic (www.magic.gov.uk) to identify the following, either within the site itself or within a 2km radius of the site:

- A search for granted EPS licences within 2km of the site
- Designated sites within a 2km radius of the site
- Priority Habitats within a 2km radius of the site
- A review of current and historical ecological reports for the study site and sites within a 2km radius of the site
- Ponds within 500m of the site which may hold populations of Great Crested Newt (*Triturus cristatus*)

2.1.1 Zone of Influence

The assessment conducted for this report has considered the area in which ecological features could be subject to significant effects from the proposed development. The area of the potential effects is often wider than the actual perimeter of the development site and is known as the Zone of Influence.

The Zone of Influence varies for different impacts and each designated site, habitat and species has been considered in relation to their sensitivity to the proposed development.

- 5km for statutory designated sites, extended to 10km for Special Areas of Conservation (SAC) for bats
- 2 km for non-statutory designated sites
- 250 m for Great Crested Newt
- 30 m for Badger (*Meles meles*) setts
- 50 m from bat roosts
- 100 m from Otter (*Lutra lutra*) holts
- 5 m for watercourses suitable for Water Vole (*Arvicola amphibius*)

2.2 Field Based Studies

A site walkover was undertaken on the 20th of May 2025 by Libby Morris, BSc (Hons) to assess the habitats and ecological features on site and their suitability to hold populations of European Protected Species (EPS) and other legally protected species including bats, reptiles, Common Dormouse (*Muscardinus avellanarius*) and amphibians. Habitats were classified based on UKHAB version 2.01¹, with a full plant species list recorded. Habitat types were classified using both UKHAB and the National Vegetation Classification (NVC)². The survey was undertaken in accordance with CIEEM guidelines.

2.3 Great Crested Newt

Great Crested Newts require aquatic habitats such as ponds for breeding (although less often ditches are occasionally used), where eggs are laid on aquatic vegetation in spring. Juveniles

¹ UKHab. The UK Habitat Classification Version 2.01. 2023

² Rodwell, J. 1991. National Vegetation Classification, British Plant Communities Volumes 1-5. Cambridge University Press.

spend most of their time on land and terrestrial phases range a considerable distance from the original breeding site. The terrestrial habitat utilised by newts varies greatly, with the most frequent being pastoral and arable farmland, woodland, scrub and grassland. Great Crested Newt populations are less able to succeed in areas with a high degree of landscape fragmentation, since they often occur in metapopulations which help ensure the survival of overall populations should a single breeding habitat be negatively impacted.

2.4 Common Dormouse

Common Dormouse are found in deciduous woodland and hedgerows, particularly coppiced woodland with an established understorey. They have low population densities and dispersal rates, making them vulnerable to fragmentation of the surrounding landscape.

The site was broadly assessed for its potential to support dormice. This included use of on-line mapping resources to assess the surrounding area for connectivity to woodland, scrub and hedgerows to the wider landscape as well as recording species often used by Common Dormouse such as Hazel (*Corylus avellana*) and Hawthorn (*Crataegus monogyna*).

2.5 Bats

Bats use a wide range of both urban and rural features for roosting and hibernation, including loft spaces, cavity walls and loose tiles, mortice joints as well as gaps in weatherboarding in built structures. They can also be found in trees with ecological niches such as holes, loose bark and ivy. There are a few key habitat characteristics that make good bat foraging habitats, primarily a suitable habitat structure including linear features such as hedgerows which provide foraging and commuting opportunities, allowing bats to move freely across the landscape. The habitats around the site were assessed both on-site and through the desk study for connectivity to assess suitability for foraging and commuting bats.

Trees abutting the site were assessed from within the client's land ownership for potential roosting and hibernation opportunities, with evidence confirming the presence of bats recorded as appropriate.

2.6 Reptiles

Reptiles are found in a variety of habitats, primarily rough/rank grassland, gardens, areas of scrub, wetlands, woodland edges and hedgerows. All six native British reptile species are considered to have declined dramatically in the last century, largely due to loss, degradation and fragmentation of habitat.

The habitats on the site were broadly assessed for their potential to support reptiles, particularly Common Lizard (*Zootoca vivipara*), Slow-worm (*Anguis fragilis*) and Grass Snake (*Natrix Helvetica*). Particular attention was paid to areas of rough grassland and woodland edges that offered refuge opportunities and features suitable for basking, hibernation sites such as banks, piles of organic matter and opportunities for foraging (rough grassland and scrub).

2.7 Badgers

Badgers (*Meles meles*) occupy a wide range of habitats including woodland, scrub, hedgerows, open fields and urban areas. Food supply is one of the most important factors influencing habitat selection. Population density and territory size are all influenced mainly by food availability, with an abundance of earthworms being particularly important. Sett sizes can reach up to 150ha, comprising main setts as well as annexe, subsidiary and outlying setts.

On-site habitats were assessed for their potential to support badgers, with connectivity to the wider landscape and any potential for badger presence around the site also assessed. Any signs of badger activity, such as setts, footprints, latrines, and pathways, were recorded.

2.8 Breeding, Wintering and Migratory Birds

Birds use a wide range of habitats across the year for breeding, feeding and roosting as well as when migrating. Woodlands, gardens, hedgerows, arable fields and buildings all offer valuable habitat.

The site was assessed for habitats which offered opportunities for the above, with any species seen or heard during the survey recorded. Particular attention was paid to species

red-listed Birds of Conservation Concern and those on Schedule 1 of the Wildlife and Countryside Act 1981 ([Appendix 1](#)).

2.9 Other species

Habitats on site were assessed for their potential to support species of principal importance for nature conservation (Section 41 NERC Act 2006, [Appendix 1](#)) and other notable species. This includes mammals such as Hedgehog (*Erinaceus europaeus*), Brown Hare (*Lepus europaeus*), and invertebrates. Particular attention was paid to habitats with standing dead wood and botanically diverse habitats.

2.10 Invasive Species

Invasive Non-Native Species (INNS) are plant species which are not native to Britain and pose a conservation threat to native biodiversity and habitats. Those listed on Schedule 9 of the Wildlife and Countryside Act (1981). Any incidental sightings of INNS were recorded during the survey walkover.

3. Desk and Field Study Results

3.1 Statutory Designated Sites and Priority Habitats

The site lies within the Kent Downs National Landscape. Additionally, there are three further statutory designated sites located within 2km of the site, divided into ten parcels (Figure 3). These are listed in Table 1.

Ecological Appraisal for Land at Cobham House Vineyard

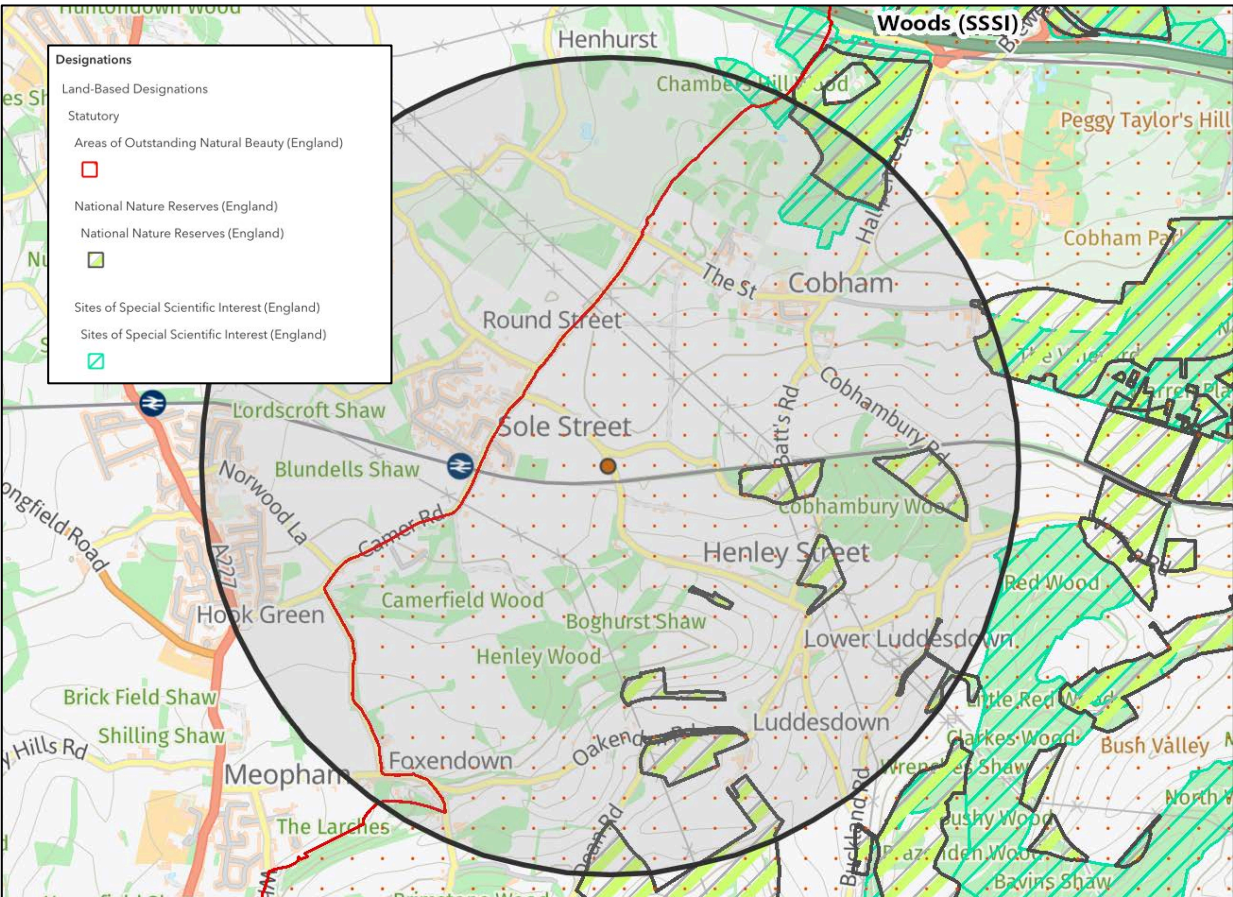


Figure 3. Designated sites within 2km of application site. Image courtesy of Kent & Medway Biological Records Centre

Table 1. Designated sites within 2km of site

Site Name	Designation	Description	Distance
North Kent Woods and Downs	National Nature Reserve (NNR)	Comprises a range of habitats including ancient woodlands, chalk grasslands, and historic parklands	Numerous parcels, the nearest being 640m east of centroid point of site
Shorne and Ashenbank Woods	Site of Scientific Interest (SSSI)	A complex of ancient and plantation Woodland. The site supports an important and diverse invertebrate fauna, especially its Coleoptera (beetles), Hemiptera (true bugs), and Odonata (dragonflies).	1.5km north east from centroid point of application site

Ecological Appraisal for Land at Cobham House Vineyard

Cobham Woods	SSSI	This woodland and old parkland is representative of woods in North Kent which occur in part on acidic Thanet Sands and in part on chalk soils. One nationally rare plant species occurs in the arable land close to the wood. An outstanding assemblage of plants is present at this site which is also of importance for its breeding birds.	1.8km south east from centroid point of the site
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There are four Priority Habitat types within 2km of the centre of the application site (Figure 4). These are listed in Table 2.

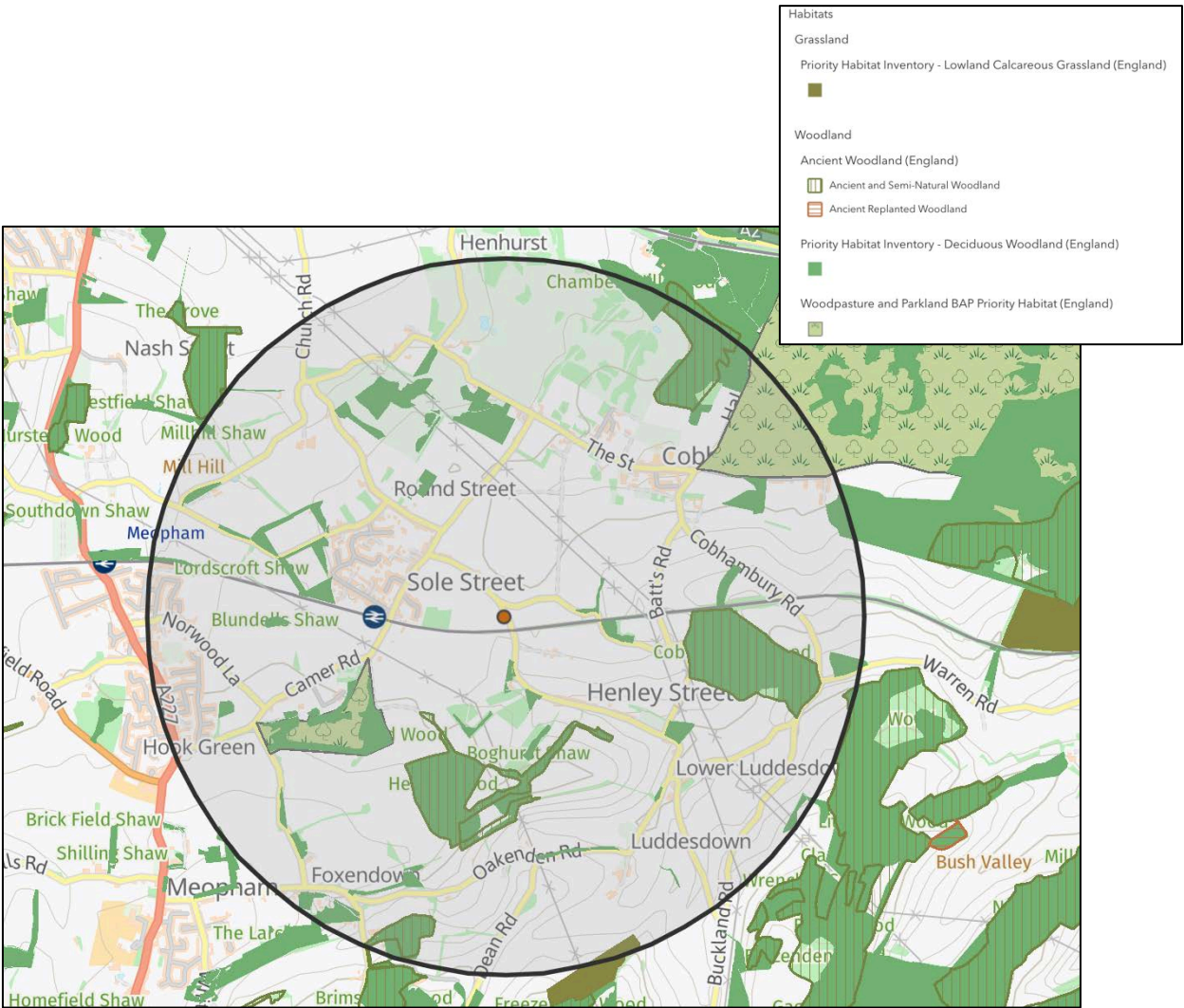


Figure 4. Priority Habitats within 2km of application site. Image courtesy of Magic Maps, 2025.

Ecological Appraisal for Land at Cobham House Vineyard

Table 2. Priority habitats within 2km of site, listed in order of proximity

Habitat	Designation	Description	Distance
Deciduous woodland	Priority Habitat under section 6 of the NERC act	There is great variety in the species composition of the canopy layer and the ground flora, and this is reflected in the range of associated NVC and Stand Types.	Numerous parcels, predominantly to the south with a few smaller patches north of the site. Nearest is 200m south, the next being 400m east of the site
Ancient woodland	Priority Habitat under section 6 of the NERC act	Many ancient woods are Local Wildlife Sited and are encompassed by the Biodiversity Action Plan list of priority habitats (NERC Act 2006)	Four parcels, the closest being Henley Wood & Pasture 600m south. A 1.27ha parcel of ancient woodland also lies 1km east of the site.
Lowland calcareous grassland	Priority Habitat under section 6 of the NERC act	A low nutrient, species-rich ecosystem based on chalk soils which depends on grazing to maintain good condition.	One parcel 1.8km south from centroid point of site
Wood pasture and parkland	Priority Habitat under section 6 of the NERC act	Mosaic habitats valued for their trees, particularly veteran and ancient trees along with the plants and animals they support.	Two parcels, the closest being 800m west of the site and the second 1.4km northeast of the site

3.2 Granted EPS Licences

There are no granted European Protected Species (EPS) licences within a 2km radius of the site (Figure 5).

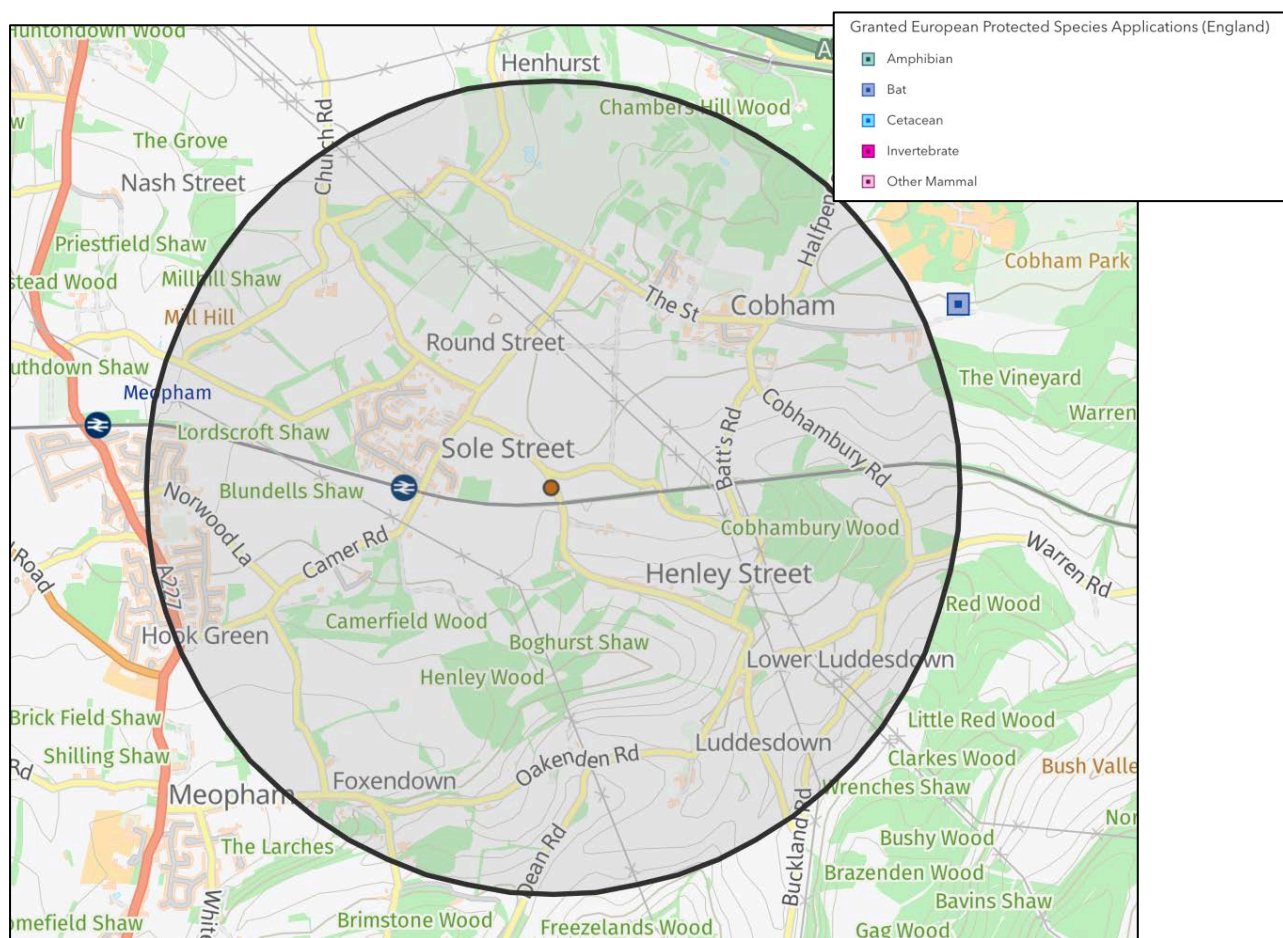


Figure 5. Aerial image showing locations of granted EPS licences within 2km of the application site. Images produced courtesy of Magic Maps, contains public sector information licensed under the Open Government Licence v3.

3.3 On-site Habitats

The application site comprises primarily arable land used as a vineyard, with species-poor modified grassland field margins. The site boundaries comprise native hedgerows and treelines. A small parcel of broadleaved woodland lies central to the site along the northern boundary. A summary of the habitats (according to UKHAB classification) on site along with parcel codes is shown in Figure 6 for the purposes of this section.

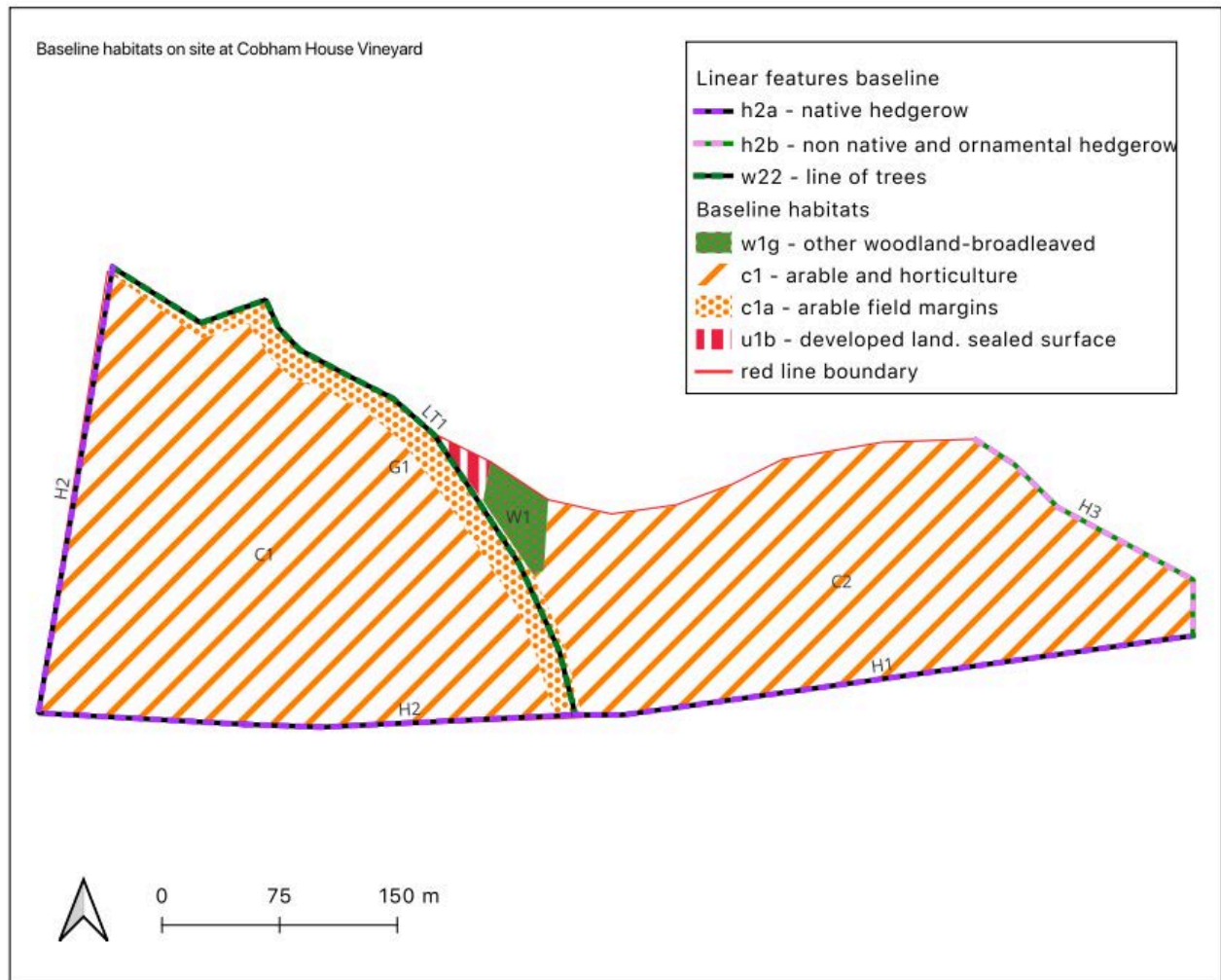


Figure 6. Baseline habitats on site at Cobham House Vineyard according to UKHAB classification

The arable land within the site (labelled 'C1' and 'C2' in Figure 6) is used as a vineyard, with vines being the dominant plant species. The grassland habitat beneath comprises plant species associated with nutrient-enriched grassland (Photographs 1 & 2), dominated by Perennial Ryegrass (*Lolium perenne*), with Annual Meadow-grass (*Poa annua*), Greater Plantain (*Plantago major*), Bristly Oxtongue (*Helminthotheca echinodes*) and Prickly Sow-thistle (*Sonchus asper*) being recorded frequently within the habitat. Field Madder (*Sherardia arvensis*) was recorded along the margins to the south of the site. The field margins beneath the boundary hedges comprised ruderal plant species such as Nettle (*Urtica dioica*) and Broad-leaved Dock (*Rumex obtusifolius*) along with Barren Brome (*Bromus sterilis*). Bare ground occurred frequently within the cropland and the grassland to the north of the site. The grass margins (labelled 'G1' in Figure 6) held the same vegetation associated with nutrient enrichment and was in poor condition at the time of the survey (Photographs 3 & 4).

Ecological Appraisal for Land at Cobham House Vineyard



Photograph 1 (left): Vineyard with vegetative community indicative of nutrient-enrichment at ground level

Photograph 2 (right): Ruderal vegetation beneath northern boundary treeline



Photograph 3 (left): Modified grassland in poor condition in the north-western area of the site

Photograph 4 (right): Modified grassland in poor condition in the north-western area of the site

The treeline (labelled 'LT1' in Figure 6) was dominated by Blackthorn (*Prunus spinosa*) and other *Prunus* species. Wych Elm (*Ulmus glabra*), Wayfaring Tree (*Viburnum lantana*), Hazel (*Corylus avellana*), Beech (*Fagus sylvatica*), Field Maple (*Acer campestre*) and Oak (*Quercus Robur*) were also recorded within the treeline. The treeline was in good condition, with a continuous canopy and a variety of age classes present (Photographs 5 & 6).



Photograph 5 (left): Broadleaved treeline along northern boundary of site



Photograph 6 (right): Broadleaved treeline along northern boundary of site

The hedgerows along the western and southern boundaries ('H1' and 'H2' in Figure 6) were dominated by Wayfaring Tree, Hawthorn (*Crataegus monogyna*) and Oak. Ash (*Fraxinus excelsior*), Dog Rose (*Rosa canina*) and Traveller's Joy (*Clematis alba*) were also recorded within the hedgerow, which was subject to minimal management at the time of the survey (Photographs 7 & 8). The hedgerows along the southern boundary are adjacent to steeply sloping land leading to a trainline.



Photograph 7 (left): Hedgerow along southern boundary of site



Photograph 8 (right): Hedgerow along southern boundary of site

The woodland within the site ('W1' in Figure 6) was dominated by Horse Chestnut (*Aesculus hippocastanum*) and Sycamore (*Acer pseudoplatanus*). The woodland held both semi-mature and newly established age classes. Only two layers were present within the woodland, with no shrub layer recorded. The understorey comprised Dog's Mercury (*Mercurialis perennis*) and some log piles from felling activity were present (Photographs 9 & 10).



Photograph 9 (left): Woodland within site



Photograph 10 (right): Woodland within site

3.4 Great Crested Newt and other Amphibians

No ponds were identified within 500m of the site, with urban development being the primary habitat to the west of the site and arable fields to the north and east. The trainline running adjacent to the southern boundary of the site creates a significant barrier between any populations of Great Crested Newt extending south beyond the site boundary and the site itself.

The application site itself does not hold any suitable habitat within the arable land, however the treelines and hedgerows offer commuting and refuge habitat. The wider landscape also holds low value habitat for amphibians. The woodland held log piles which provide refugia for hibernating amphibians.

Eleven records of Great Crested Newt were returned from the Kent & Medway Biological Records Centre (KMBRC). The majority of records returned were made in Ashenbank Wood,

Ecological Appraisal for Land at Cobham House Vineyard

2km north east of the site, with the most recent being made in 2019. Seven further records of Common Toad (*Bufo bufo*), seven records of Palmate Newt (*Lissotriton helveticus*), 27 records of Smooth Newt (*Lissotriton vulgaris*) and 25 records of Common Frog (*Rana temporaria*) were returned within 2km of the site. The closest record was made in 2019, being a Smooth Newt in Cobhambury Wood 600m from the eastern boundary of the site.

Great Crested Newt Class Survey Licence Return results obtained show no results within 2km of the site boundary.

3.5 Common Dormouse

The site comprises mostly arable land. The woodland parcel within the site holds no shrub layer or species favourable to Dormouse such as Honeysuckle or Hazel. There is no woodland or hedgerow habitat suitable for Common Dormouse present within the site itself and there is no suitable habitat connected to the site within the wider landscape.

207 records for dormice were returned from KMBRC within 2km of the site. The majority of these records pertain to parcels of woodland within Jeskyn's Community Woodland which lies 980m south of the application site. The nearest records were made in Henley Wood, 1km south of the site in 2013. Two further records of Common Dormouse were made 2km north of the site in 2018.

3.6 Roosting and Foraging Bats

There is valuable foraging and commuting habitat for bats within the hedgerows and treelines along the site and field boundaries. The woodland also holds moderate foraging habitat, although no trees with potential roosting features were observed during the site walkover. The site itself holds moderate connectivity to the wider landscape which is primarily arable land and, as such, holds little value to bats, however the occasional woodland habitat within the wider landscape does hold moderate value.

Records returned from the KMBRC show 60 records of ten bat species: Serotine bat (*Eptesicus serotinus*), Whiskered bat (*Myotis mystacinus*), Natterer's Bat (*Myotis nattereri*), Noctule (*Nyctalus noctula*), Common Pipistrelle (*Pipistrellus pipistrellus*), Soprano Pipistrelle

(*Pipistrellus pygmaeus*), Brown Long-eared Bat (*Plecotus auritus*), Leisler's Bat (*Nyctalus leisleri*), Nathusius' Pipistrelle (*Pipistrellus nathusii*) and Daubenton's Bat (*Myotis daubentonii*) within 2km of the application site. The closest record was of a Common Pipistrelle 600m west of the site made in 2011. A record of a Noctule bat was made in 2016, 800m north east of the site. Figure 7 shows records of bat species made within 2km of the site.

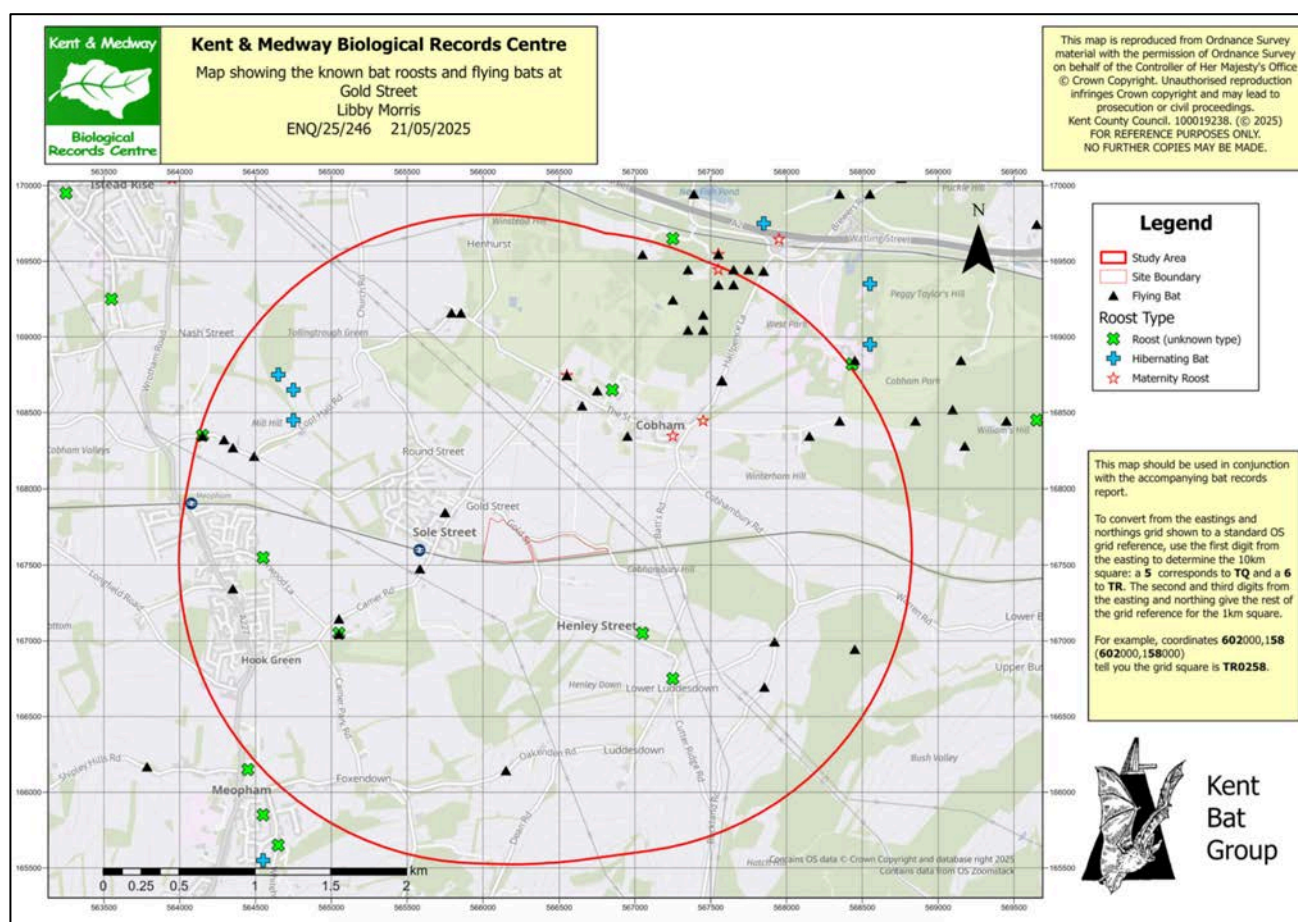


Figure 7: Bat roost records within 2km of the site, courtesy and copyright of KMBRC

3.8 Reptiles

The habitats present within the application site offer limited opportunities for reptiles. The woodland adjacent to the northern boundary and the hedgerows and treelines along the site boundaries act as 'wildlife corridors', offering refuge, commuting and foraging opportunities for reptiles to the wider landscape. There are log piles within the woodland which provide hibernacula for reptiles on the site. Overall, the site is of low value for reptiles and acts primarily as a corridor to the wider landscape.

Records obtained from the KMBRC show 57 records of Slow Worm (*Anguis fragilis*), 31 records of Common Lizard (*Zootoca vivipara*), 12 records of Grass Snake (*Natrix Helvetica*) and one of Adder (*Vipera berus*) made within 2km of the site. The majority of these records were made at Luddesdown Vineyard which lies south of the site and is separated by a trainline and therefore fragmented from the application site.

The nearest record of a reptile to the application site pertains to a Grass Snake 1km north east of the site, made in 2018. The next records in close proximity of the site are Slow Worm and Common Lizard which were made in 2018, 1.8km east of the site in a parcel of woodland east of Cobham.

3.9 Badgers

No signs of any badger activity were seen within the application site during the survey assessment, and although there are habitats of value for sett building, foraging and connectivity to the wider landscape within the parcel of woodland and hedgerow habitat, the arable land offers minimal value to Badger, although they may commute through the site.

27 records of Badger were returned within 2km of the site from the KMBRC, the closest being 1km north east of the site in Cobham in 2008. A further record was made 1.2km south east of the site in 2010.

3.10 Breeding, Wintering and Migratory Birds

The arable land within the application site holds limited opportunities foraging birds due to the lack of vegetative structure. The hedgerows and treelines around the site boundaries hold breeding bird potential, however none was recorded during the site walkover. The woodland, hedgerow and large mature trees adjacent to the site boundaries have the potential to support a variety of breeding birds; primarily Cuckoo (*Cuculus canorus*) and Nightingale (*Luscinia megarhynchos*). The birds recorded at the time of the survey within the site are shown in Table 3.

Table 3. Birds recorded at the time of the survey within the application site

Species	Common name	Designation (BoCC5)
<i>Parus major</i>	Great Tit	Green listed
<i>Sylvia atricapilla</i>	Blackcap	Green listed
<i>Erithacus rubecula</i>	Robin	Green listed
<i>Troglodytes troglodytes</i>	Wren	Green listed
<i>Turdus merula</i>	Blackbird	Green listed
<i>Parus columba</i>	Wood pigeon	Green listed
<i>Carduelis carduelis</i>	Goldfinch	Green listed
<i>Turdus philomelos</i>	Song Thrush	Amber listed
<i>Fringilla coelebs</i>	Chaffinch	Amber listed

The KMBRC returned records of 131 species of conservation concern within 2km of the site boundary. These include most notably Grey Partridge (*Perdix perdix*), Nightingale, Dunnock (*Prunella modularis*), Cuckoo, Barn Swallow (*Hirunda rustica*), Yellowhammer (*Emberiza citrinella*) and Bullfinch (*Pyrrhula pyrrhula*); all of which would be suited to the habitats on and adjacent to the site.

3.11 Other Species

The application site holds foraging and refuge opportunities for notable species such as Toad and Hedgehog; with the woodland, treeline and hedges all being valuable habitat for a number of different species. 19 records of Hedgehog have been made within 2km of the application site according to records from the KMBRC. Other notable species recorded within a 2km radius include Weasel (*Mustela nivalis*), Stoat (*Mustela erminea*) and Stag Beetle (*Lucanus cervus*).

Ground Pine (*Ajuga chamaepitys*), a Schedule 8 arable weed species has been recorded in Cobham Park, 1.5km north east of the site. Other notable plant species within 2km of the site radius include Jersey Cudweed (*Gnaphalium luteoalbum*), Broad-leaved Cudweed (*Filago pyramidata*), Rough Marsh Mallow (*Malva setigera*) and Early Gentian (*gentianella anglica*) as

well as orchid species Man Orchid (*Orchis anthropophora*), Greater Butterfly-orchid (*Platanthera chlorantha*), Bird's-nest Orchid (*Neottia nidus-avis*) and Fly Orchid (*Ophrys insectifera*).

No direct evidence of any protected invertebrates was found, though the short seasonal nature of many invertebrates (such as butterflies) means that they are only visible for brief periods.

3.12 Invasive Species

No INNS were recorded on site at the time of the survey.

Records obtained from the KMBRC show a total of 14 INNS species within 2km of the site. Relevant species to the application site are Japanese Knotweed (*Fallopia japonica*) and Winter Heliotrope (*Petasites fragrans*).

3.13 Survey Limitations

A site assessment such as this is only able to act like a 'snapshot' to record the presence of any flora or fauna at the time of the survey. It is therefore possible that some species may not have been present during the survey, but may be evident at other times of the year. For this reason, habitats are assessed for their potential to support some species, even where no direct evidence has been found.

4. Assessment of Impact

4.1 Designated Sites and Priority Habitats

The site lies within the Kent Downs National Landscape. In line with the advice of Natural England, planning authorities should be satisfied that measures to further the conservation and enhancement of natural beauty are incorporated in proposals, and that these go beyond simply avoiding or mitigating harm to on-site biodiversity.

Given the localised scale of the proposed works and the proposed soft landscaping and enhancements for biodiversity, along with the low value of the current habitats on site, it is considered that the impact will be at site level only and will not impact any designated sites. The nearest Priority Habitat to the site is lowland deciduous woodland lying 200m east. Given the small scale of the works, it is considered that the proposed application will not impact on any Priority Habitats.

4.2 Habitats

The site comprises primarily arable land with low value modified grassland margins. This offers negligible value for biodiversity and will benefit from the proposed enhancements as part of the proposals. The habitats within the site itself due to be impacted are of low value for biodiversity and the proposed works will have low impact on biodiversity at a site level only. The woodland, hedgerow and trees adjacent to the site boundaries however, offer valuable nesting habitat for breeding birds, commuting reptiles and amphibians, bats and mammals including Badgers. Given that these areas are to be retained and, where possible, enhanced, the proposed works will impact at a site level only.

4.3 Great Crested Newts and Amphibians

No ponds were identified within 500m of the application site and no records of amphibians were returned within the same radius. The arable land within the site offers negligible value to amphibians, although the woodland and hedgerow boundaries offer refuge and commuting opportunities. As these are not set to be impacted by the proposed works, no further surveys are required.

Enhancements to the terrestrial habitat for amphibians are laid out in Section 5.

4.4 Common Dormouse

There are no hedgerows or woodland suitable for Common Dormouse present within the application site. The only habitat which is likely to be impacted is arable land which provides negligible potential to support Common Dormouse. No further surveys are required.

4.5 Roosting and Foraging Bats

No trees or buildings are set to be impacted by the proposed works, and the arable land offers limited foraging habitat for foraging bats. No further surveys are required. However, given that there are woodland boundaries and treelines valuable for commuting bats adjacent to the site, a bat-sensitive lighting scheme is advised post-works as set out in the Alan Tulla Lighting Assessment dated 14 June 2024³. Bat Conservation Trust guidelines for sensitive lighting schemes are laid out in Appendix 2 of this document.

4.6 Reptiles

The arable habitat offers negligible opportunities for reptiles, however the hedgerows and treelines offer commuting opportunities to valuable habitats for reptiles within the wider landscape. No further surveys are required across the site to check for the presence of reptiles.

Enhancement recommendations for reptiles are laid out in Section 5.

4.7 Badgers

No signs of badger activity were identified within the application site during the assessment and no badger setts were recorded on or near to the zone of impact. However, due to the under-recording of Badger populations and the proximity of Badger records to the application site, precautionary works are advised during the works as follows:

- To prevent harm to Badgers potentially utilising or travelling through the site, Heras fencing or similar will be constructed around the zone of impact (Figure 8).

³ Alan Tulla Lighting. Lighting Design at Gold Street Winery. 2024.

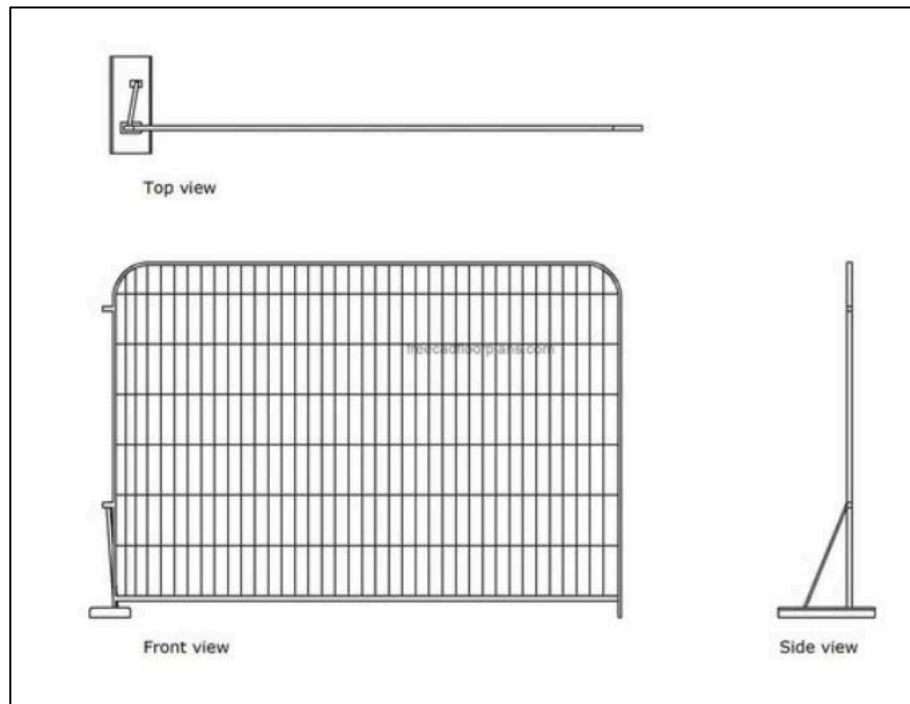


Figure 8. Example of Heras fencing to be used as an exclusion zone between the construction site and active Badger set

- No personnel, stored items, including plant or machinery will be permitted to be left outside of the construction zone during the construction period overnight.
- Contractors must remain vigilant for any signs of badger activity within the construction zone. If any signs of badger activity are observed (latrines, foraging or sett building) a suitably qualified ecologist must be notified, and all work must stop until an updated site assessment has been carried out and the impacts to badgers has been reassessed.
- As badgers are likely to be in the area, it is also recommended that any trenches or holes are either covered overnight or fitted with ramps to prevent any animals getting trapped.

4.8 Breeding, Wintering and Migratory Birds

Given the close proximity to trees and hedges which hold valuable habitat for breeding birds, works should be limited to outside of the breeding bird season (March–July inclusive) where possible to ensure that no nesting birds are impacted due to construction. No trees or other suitable nesting habitat is proposed to be removed within the area of the application site or the zone of impact. No further surveys are required. Enhancements for breeding birds are laid out in Section 5.

4.9 Other Species

The impact on any other notable species such as Hedgehog is considered to be low, given that there is minimal habitat of value for foraging Hedgehog within the site. The lack of floristic species within the short grassland habitat makes this habitat unsuitable for many invertebrate species. Enhancements to the arable field margins post-works to improve the site for invertebrates and plant species are laid out in Section 5.

4.10 Invasive Species

No invasive species were recorded during the site walkover and no further surveys are required. Enhancement recommendations to the site include the planting of native floristic species to benefit pollinating invertebrates. These are laid out in Section 5.

5. Enhancement Opportunities

The site currently does not hold high value for biodiversity, with species-poor grassland and arable land comprising the majority of the site. The habitats of value within the site are the boundary hedges and treelines. Incorporating the below enhancements will enhance the site for invertebrates, amphibians, small mammals and birds.

Improving suitable habitat for amphibians and reptiles within the site, particularly along the site boundaries will improve connectivity between this site and suitable habitat within the wider landscape. Recommendations for doing so include:

- Improvement of terrestrial habitat quality through introducing longer, unmanaged grassland and scrubby areas around site boundaries (particularly within the trees) to enhance the 'wildlife corridors' around the site.

- To ensure the presence of some dense cover throughout the year through the creation of log piles and dead wood hibernacula to create hibernation and refuge opportunities.

The implementation of bird boxes into the proposed development during the construction will enhance the site for breeding birds. Putting bat boxes up in three of the mature trees within the northern boundary of the site will further enhance this as a linear feature for bats. Equally, as best practice, any lighting scheme should be designed to minimise light spill around any potential commuting routes for commuting bats, particularly to the south of the site. See [Appendix 2](#) for full lighting guidelines.

Any planting incorporated into the landscaping post-construction is recommended to comprise only native species. These should include flowering herbs, creeping flowering species and hedges to offer valuable habitat for pollinating invertebrates. Avoiding nutrient enrichment, incorporating nutrient-removal management techniques and encouraging wider field margins across the rest of the arable land will encourage the growth of 'arable weed' species such as Ground Pine and Field Pansy, a vulnerable group of plants due to nutrient enrichment and the expansion of arable fields to the site boundaries.

6. Conclusion

The species-poor arable and modified grassland within the site offers low ecological value for herptiles, breeding birds, bats or mammals and the works will impact biodiversity at site level only. The nature of the works will not result in significant habitat loss.

No further surveys are required, although precautionary measures for breeding birds and a post-works sensitive lighting scheme are recommended. It is considered that the species-poor arable land can reach net gain in biodiversity by incorporating enhancements laid out in Section 5 and that the value of the site for biodiversity can be improved, both within the zone of impact and across the wider site.

If any protected species are found during any works undertaken on the site, work should be stopped immediately and an ecologist must be contacted for advice.

APPENDIX 1 – Legislation and Best Practice

- **The Conservation of Habitats and Species Regulations 2017**

These regulations, referred hereafter as “the Habitats Regulations”, represent the primary method by which Council Directive 92/43/EEC on the Conservation of Natural Habitats and of Wild Fauna and Flora (the “Habitats Directive”) is transposed for England and Wales and their territorial seas. The Habitats Directive, in conjunction with the Birds Directive (Council Directive 2009/147/EEC) forms the basis for implementation of Europe’s nature conservation policy through both habitat and species level protection. The Habitats Directive requires the designation of strictly protected European sites known as Special Areas of Conservation (SACs). Together with the Special Protection Areas (SPAs) established by the Birds Directive, these collectively form the Natura 2000 Network of protected sites. The Habitats Directive also requires the strict protection of animals and plants of Community Interest listed under Annex IV. Habitat types requiring strict protection as SACs are listed under Annex I. The conservation of animals and plants listed under Annex II requires the designation of SACs. The Habitats Regulations require that public bodies must exercise their nature conservation responsibilities to ensure compliance with the Habitats Directive. These regulations also require the conservation of natural habitats and habitats of species through the selection, designation and notification of marine and terrestrial ‘European Sites’ to be afforded

protection under the Habitats Directive. The habitats and species of European Importance are listed under Annexes I and II of the Habitats Directive. The regulations also contain provision for the appropriate management of these European Sites including the control of damaging operations, special nature conservation orders and restoration orders, for example. The Habitats Regulations afford strict protection to European Protected Species of animals under Schedule 2 and plants under Schedule 5. Offences (subject to certain exceptions) include the deliberate capture, killing, disturbance or trade in these animals. Similarly plants listed under Schedule 5 are protected (subject to exceptions) from picking, collection, cutting, destruction or trade.

- **The Wildlife and Countryside Act 1981 (as amended)**

The Wildlife and Countryside Act 1981 (as amended) (WaCA) is still a leading mechanism for the legislative protection of wildlife and national parks across the United Kingdom. The WaCA draws on elements of pre-existing legislation and supports the Habitats Regulations in implementing the Bern Convention (1979) and Directive 2009/147/EC on the conservation of wild birds. Schedules within the WaCA provide a list of protected species and habitats, in addition to prohibited actions. It also contains measures for controlling invasive non-native species and amendments to a number of laws. Most notably within the scope of this report are Schedule 9 of the WaCA which lists non-native species that are already established in the wild and continue to pose a conservation threat to native biodiversity and habitats and stipulates that further releases should be regulated. Schedule 9 also includes some native species (for example, Barn Owl (*Tyto alba*)) in order to provide a level of control to ensure that releases, in particular re-introduction programmes, are carried out in an appropriate manner and biodiversity is properly safeguarded; and Schedule 14, which prohibits the introduction into the wild of any animal of a kind which is not ordinarily resident in, and is not a regular visitor to, Great Britain in a wild state, or any species of animal or plant listed in Schedule 9 of the WaCA.

- **The Natural Environment and Rural Communities (NERC) Act 2006**

The Natural Environment and Rural Communities Act imposes a Biodiversity Duty (S.40) on all public bodies to conserve biodiversity at both species and habitat levels (S40);

“Every public authority must, in exercising its functions, have regard, so far as is consistent with the proper exercise of those functions, to the purpose of conserving biodiversity.”

Section 41 of the Act requires the publication of a list of

“living organisms and types of habitat which in the Secretary of State’s opinion are of principal importance for the purpose of conserving biodiversity.”

The list generated under Section 41 of the Act contains a number of types of habitats and species of animal and plant that have the potential to be affected by development projects of a range of sizes and impacts including lowland deciduous woodland, floodplains and calcareous grassland habitats.

The Act also establishes Natural England as the independent body to:

“ensure that the natural environment is conserved, enhanced and managed for the benefit of present and future generations, thereby contributing to sustainable development”.

943 species and 56 habitats of principal importance are included on the S41 list as guidance for public bodies on decisions that affect biodiversity.

- **The Hedgerow Regulations 1997**

On 1 June 1997, the Hedgerow Regulations came into force under section 97 of the Environment Act 1995 to address the dramatic decline in UK hedgerows. The regulations protect important hedgerows by limiting removal through a system of notification via local planning authorities. The regulations are aimed at countryside hedgerows in England and Wales;

Section 3.6: *“on or adjoining, common land, village greens, Site of Special Scientific Interest (which include National Nature Reserves, Special Protection Areas under the Birds Directive and Special Areas of Conservation under the Habitats Directive), Local Nature Reserves, or land used for agriculture, forestry or the breeding or keeping of horses, ponies or donkeys”*

Written permission is required from the local planning authority before the removal of any hedgerow over 20 metres and more than 30 years old. Hedgerows less than 20 metres long may also be considered if they form part of a continuous network of hedges.

The LPA will then either issue a Hedgerow Retention or Hedgerow Removal Notice within 42 days depending on whether they define the hedgerow as important or not based on the following criteria:

- “They have been in existence 30 years or more; and”
- “They satisfy at least one of the criteria set out in Part II of Schedule 1 of the Regulations.”

Exemptions to the Regulations fall into three categories:

- “small scale works;”
- “works approved under other procedures which ensure careful assessment and consideration of the impact on the local environment; and”
- “works authorised under other legislation which justify the removal of a hedgerow without first establishing its importance.”

It is an offence to remove a hedgerow subject to a retention notice, or to remove a hedgerow protected under the Hedgerow Regulations without first obtaining the required removal notice.

Updated regulations as part of the Hedgerow Regulations due in 2024 regulations will include a two metre ‘buffer strip’ from the centre of hedgerows with no cultivation or application of pesticides or fertilisers, and a hedge cutting ban between 1 March and 31 August to protect nesting birds. These updates are also to include over 90,000km of hedgerows being managed through 16,000 agreements in the government’s Countryside Stewardship and Sustainable Farming Incentive schemes, and more than 13,000km of hedgerows created or restored using Countryside Stewardship grants.

- **The UK Post-2010 Biodiversity Framework**

The UK Post-2010 Biodiversity Framework was published on 17 July 2012. It was produced by JNCC and Defra, on behalf of the Four Countries’ Biodiversity Group (4CBG), through which the environment departments of all four governments in the UK work together. It covers the period from 2011 to 2020, and was developed in response to two main drivers: the Convention on Biological Diversity’s (CBD’s) Strategic Plan for Biodiversity 2011-2020 and its five strategic goals and 20 ‘Aichi Targets’, published in October 2010; and the EU Biodiversity Strategy (EUBS), released in May 2011. The framework shows how the work of the four UK countries joins up with work at a UK level to achieve the ‘Aichi Targets’ and the aims of the EU Biodiversity Strategy. It identifies the activities required to complement the country biodiversity strategies, and where work in the country strategies contributes to international obligations. In total, 23 areas of work were identified where all the countries agreed that they wanted to contribute to, and benefit from, a continued UK focus.

The development of the framework reflects a revised direction for nature conservation, towards an approach which aims to consider the management of the environment as a whole, and to acknowledge and take into account the value of nature in decision-making. The framework sets out the common purpose and shared priorities of the UK and the four countries, and, as such, is a hugely important document, which is to be owned, governed, and implemented by the four countries.

- **National Planning Policy Framework (NPPF)**

This framework acts as guidance for planning authorities (LPAs) in England to form Local Plan policies in favour of sustainable development as part of the government's reforms to increase the accessibility of the planning system and promote long term sustainable growth.

The framework states that "planning policies and decisions should contribute to and enhance the local environment" (paragraph 170).

Chapter 15 of the framework focusses on habitats and biodiversity. Specifically, paragraph 175 states:

"...when determining planning applications, local planning authorities should apply the following principles:

- *if significant harm to biodiversity resulting from a development cannot be avoided (through locating on an alternative site with less harmful impacts), adequately mitigated, or, as a last resort, compensated for, then planning permission should be refused'*
- *development on land within or outside a Site of Special Scientific Interest, and which is likely to have an adverse effect on it (either individually or in combination with other developments) should not normally be permitted. The only exception is where the benefits of the development in the location proposed clearly outweigh both its likely impact on the features of the site that make it of special scientific interest, and any broader impacts on the national network of Sites of Scientific Interest (SSSI);*
- *development proposals whose primary objective is to conserve or enhance biodiversity should be supported;*
- *opportunities to incorporate biodiversity improvements in and around developments should be encouraged;*
- *development resulting in the loss or deterioration of irreplaceable habitats (such as ancient*

woodland and ancient or veteran trees) should be refused, unless there are wholly exceptional reasons and a suitable compensation strategy exists"

The NPPF also states section 185 in regard to planning applications:

"To protect and enhance biodiversity and geodiversity, plans should:

a) Identify, map and safeguard components of local wildlife-rich habitats and wider ecological networks, including the hierarchy of international, national and locally designated sites of importance for biodiversity; wildlife corridors and stepping stones that connect them; and areas identified by national and local partnerships for habitat management, enhancement, restoration or creation; and

b) promote the conservation, restoration and enhancement of priority habitats, ecological networks and the protection and recovery of priority species; and identify and pursue opportunities for securing measurable net gains for biodiversity."

- **Circular 06/2005: Biodiversity and Geological Conservation**

The Circular 06/2005 complements the NPPF by advising on how the law relates to planning and nature conservation in England, with particular reference to designated sites and protected species;

"It is essential that the presence or otherwise of protected species, and the extent that they may be affected by the proposed development, is established before the planning permission is granted, otherwise all relevant material considerations may not have been addressed in making the decision"(Paragraph 99).

However;

"developers should not be required to undertake surveys for protected species unless there is a reasonable likelihood of the species being present and affected by the development."

Part IV also reminds LPAs and developers that licences and mitigation measures may be required in addition to planning permissions if protected species are to be affected by the development

"The breach of protected species legislation can often give rise to a criminal offence"
(Paragraph 101).

- **Bats**

All British bats are “European Protected Species” (EPS) and listed on Annex II and Annex IV of the EC Habitats Directive. The Directive is transposed into UK law through the Conservation of Habitats and Species Regulations 2017. The following actions affecting bats are prohibited under the legislation:

- deliberate capture, injury or killing of a bat;
- deliberate disturbance of a bat and in particular disturbance which is likely to impair their ability:
 - to survive, to breed or reproduce, or to rear or nurture their young, or
 - in the case of animals of a hibernating or migratory species, to hibernate or migrate;
 - or to affect significantly the local distribution or abundance of the species to which they belong.
- damage or destruction of a breeding site or resting place;
- possessing, controlling transporting, selling or exchanging, or offering for sale or exchange any bat or any part of a bat or anything derived from one.
-

Bats are also afforded protection from intentional or reckless ‘disturbance’ by the Wildlife and Countryside Act 1981 (as amended). The deliberate or reckless obstruction of access to a structure or place used by bats for shelter and protection is also an offence under the Act.

- **Birds**

All wild birds in the UK are afforded protection under the Wildlife and Countryside Act 1981 (as amended). This protection includes killing, injuring or taking wild birds as well as taking, damaging or destroying bird nests in use or being built, and taking or destroying eggs. Birds listed under Schedule 1 of the Act are afforded additional protection from disturbance during nesting and offences relating to these birds are subject to special penalties. The nest sites of birds listed under Schedule ZA1 of the act are afforded strict, year-round protection even when the nests are not in active use.

- **Reptiles**

All species of native reptiles are protected against killing or injury under Schedule 5 of the Wildlife and Countryside Act 1981 (as amended). The Sand Lizard (*Lacerta agilis*) and Smooth Snake (*Coronella austriaca*) are further protected under The Conservation of Habitats and Species Regulations 2017 and The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019 against capture or disturbance and the places they use for breeding, resting, shelter and protection are protected from being damaged or destroyed.

- **Great Crested Newts**

The Great Crested Newt and its habitat are protected under the Wildlife and Countryside Act 1981 (as amended) and The Conservation of Habitats and Species Regulations 2017 and The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019. This legislation makes it an offence to deliberately kill, injure or capture a Great Crested Newt; deliberately disturb a Great Crested Newt; damage, destroy or obstruct access to a structure used for shelter or protection by a Great Crested Newt; or possess or transport a Great Crested Newt. Great Crested Newts are also afforded protection from intentional or reckless 'disturbance' by the Wildlife and Countryside Act 1981 (as amended). The deliberate or reckless obstruction of access to a structure or place used by great crested newts for shelter and protection is also an offence under the Act. This applies to both aquatic and terrestrial habitat

- **Badgers**

Badgers and their setts are protected under the Protection of Badgers Act 1992 which makes it an offence to kill, injure or possess a badger; interfere with, damage or destroy a Badger sett including obstructing access to a badger sett; cruelly treat or harm a Badger; or disturb a Badger in a sett.

- **Otters**

Otters (*Lutra lutra*) and their resting places are protected under the Wildlife and Countryside Act 1981 (as amended) and the The Conservation of Habitats and Species Regulations 2017 and The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019. This legislation makes it an offence to deliberately kill, injure or capture an Otter; deliberately disturb an Otter in their breeding or resting places; damage, destroy or obstruct access to their resting or breeding places.

- **Water Voles**

Water Voles (*Arvicola amphibius*) are protected under the Wildlife and Countryside Act 1981 (as amended) from killing or taking by certain prohibited methods. Their breeding and resting places are fully protected from damage, destruction or obstruction; it is also an offence to disturb them in these places.

- **Common Dormouse**

Common dormice are protected under both The Conservation of Habitats and Species Regulations 2017 and The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019 and the Wildlife and Countryside Act 1981 (as amended). Dormice and their breeding sites and resting places are fully protected. Without a licence it is an offence for anyone to deliberately disturb, capture, injure or kill them. It is also an offence to damage or destroy their breeding or resting places, to disturb or obstruct access to any place used by them for shelter. It is also an offence to possess or sell a wild Dormouse.

- **White-clawed crayfish**

White-clawed Crayfish (*Austropotamobius pallipes*) are protected under Schedule 5 of the Wildlife and Countryside Act 1981 (as amended) protecting them from harm, disturbance and capture without an appropriate licence. It is illegal to buy or sell White-clawed Crayfish whether alive or dead.

- **Invertebrates**

Three UK invertebrate species are protected under The Conservation of Habitats and Species Regulations 2017 and The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019; the Large Blue butterfly (*Phengaris arion*), Fisher's Estuarine moth (*Gortyna borelii*) and Little Ramshorn Whirlpool snail (*Anisus vorticulus*). It is an offence for anyone to deliberately disturb, capture, injure or kill them. It is also an offence to damage or destroy their breeding or resting places, to disturb or obstruct access to any place used by them for shelter. It is also an offence to possess or sell these species. Approximately 400 further invertebrate species are listed as 'Species of Principle Importance' under Section 41 of the NERC Act.

- Invasive Plant Species**

It is prohibited to plant or otherwise cause to grow in the wild any species listed on Schedule 9 of the Wildlife and Countryside Act 1981 (as amended). The Environmental Protection Act 1990 also classifies certain invasive plants as controlled waste which must be disposed of safely at an appropriately licensed landfill site, in particular Japanese Knotweed (*Reynoutria japonica*). Under section 57 of the Anti-social Behaviour, Crime and Policing Act 2014, if an individual or an organisation fails to control an invasive plant species which is having a detrimental effect on the quality of life of those in the locality then a notice can be issued after a mandatory written warning has been served. Breach of this notice, without reasonable excuse, would be a criminal offence, subject to fixed penalty notice (a penalty of £100) or prosecution. On summary conviction an individual could be liable to a level 4 fine and an organisation could be liable to a fine not exceeding £20,000.

- Definitions of Statutory and Non-Statutory Sites**

Name	Statutory/Non-statutory	Definition
SAC – Special Area of Conservation	Statutory	Strictly protected sites designated under the EC Habitats Directive, that will make a significant contribution to conserving habitats or species identified in Annexe I and II of the Directive (as amended).
SPA – Special Protection Area	Statutory	Strictly protected sites classified in accordance with Article 4 of the EC Birds Directive. They are classified for rare and vulnerable birds (as listed on Annex I of the Directive).
SSSI – Site of Special Scientific Interest	Statutory	SSSIs provide statutory protection for the best examples of the UK's flora, fauna, or geological or physiographical features.
NNR – National Nature Reserve	Statutory	NNRs contain 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 or to provide opportunities for scientific study.
LNR – Local Nature Reserve	Statutory	LNRs are declared and managed for nature conservation, and provide opportunities for research and education, or simply enjoying and having contact with nature.

Ramsar – Ramsar Site	Statutory	Ramsar sites are wetlands of international importance designated under the Ramsar Convention.
LWS – Local Wildlife Site SINC – Site of Importance for Nature Conservation	Non-statutory	Areas of land with significant wildlife value for the local area.
CWS – County Wildlife Site	Non-statutory	Areas of land with significant wildlife value for the county

APPENDIX 2 – Reducing Impacts of Artificial Light

External lighting has been proven to have a negative impact on foraging and commuting bats, as well as impact other nocturnal species such as invertebrates, birds and mammals such as Badger and Hedgehog. The Bat Conservation Trust has guidelines⁴ which should be referred to when designing lighting schemes for proposed developments. In areas where the introduction of lighting will have a significant impact on the surrounding environment such as rural locations it is recommended that an ecologist is consulted prior to a lighting scheme being designed. The key measures recommended by the guidelines are as follows:

- Avoid unnecessary exterior lighting where possible
- Maintain a balance between appropriate lighting levels and the impact that exterior lighting will have on wildlife
- Comply with existing legislative buffers and avoid lighting key habitats and features altogether.
- Avoid lighting key habitats and features altogether
- Comply with guidance on illuminance levels and buffers

⁴ Bat Conservation Trust and Institute for Lighting Professionals (2023) Guidance note 8. Bats and Artificial Lighting. Available [online](#)

It may be necessary to demonstrate that the proposed lighting will comply with any agreed light-limitation or screening measures set as a result of your ecologist's recommendations and evaluation. This is especially likely to be requested if planning permission is required. Baseline, pre-development lighting surveys may be useful where existing on or off-site lighting is suspected to be acting on key habitats and features and so may prevent the agreed or modelled illuminance limits being achieved. As a condition of planning, post-completion lighting surveys by a suitably qualified person should be undertaken and a report produced for the local planning authority to confirm compliance. Any form of non-compliance must be clearly reported, and remedial measures outlined. Ongoing monitoring may be necessary, especially for systems with automated lighting/dimming or physical screening solutions.

The Bat Conservation Trust recommends the following specifications for lighting on developments to prevent disturbance:

- Lighting spectra: peak wavelength >550nm
- Colour temperature: <2700K (warm)
- Reduction in light intensity
- Minimal UV emitted
- Upward light ratio of 0% and good optical control

APPENDIX 3 – Conditions of use

This report has been prepared by Libby Morris, with all due diligence and care within the terms of the Contract with the client. This report only becomes the property of the client once payment for it has been received in full. The author disclaims any responsibility to the client and others in respect of any matters outside the scope of the above.

This report is confidential to the client, and the author accepts no responsibility to third parties to whom this report, or any part thereof, is made known. Any such party relies on the report at their own risk.

Report history

Name	Job	Date
Ella Scott (MRes)	Actions include adding desk study and magic map.	26/05/2025
Libby Morris (BSc)	Field survey and data collection and request from Biodiversity record centre	
Ella Scott (MRes)	Inputting biodiversity data from records centre	
Libby Morris (BSc)	Completing report and conducting BNG analysis	