

ANGLIAN ECOLOGY

PROTECTED SPECIES AND HABITAT SURVEYS



PRELIMINARY ECOLOGICAL APPRAISAL OF:

Kiln Farm,
Chimers Lane
Hoo
Woodbridge
Suffolk

REPORT FOR:

Mr & Mrs C. Dearling & Agents.

DATE OF FIELD SURVEY:

27.02.2023

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Preliminary Ecological Appraisal and Bat Scoping Survey of land and outbuilding at Kiln Farm, Hoo, Woodbridge

Recipients: Mr & Mrs C Dearling & Agents

Relevant LPA: East Suffolk

Please note:

Records form a vital part of conservation work and potentially inform decisions within the wider area. In line with good practice, all recordings of protected species found during this site survey will be given to the relevant county recording service within one week of report issue, unless specific instructions to the contrary are received within this timeframe from the client.

Ecosystems and wildlife species are constantly changing and moving and can be dependent on surrounding impacts and climate conditions. Therefore, any field survey, no matter how thoroughly undertaken, can only represent a 'snapshot' of conditions at the time of visit.

If in doubt as to wildlife or protected species issues, seek advice from a suitably qualified ecologist, as the legislature will not accept ignorance as defence. All site owners and contractors should make themselves aware of their legal obligations concerning species and habitats.

A précis of the current legislation as it may apply to this site is contained within the Appendix of this report, but whilst every effort has been made to include relevant legislation the information is not fully comprehensive. For full details of legislation regarding protected species and sites clients should visit: <https://www.gov.uk/topic/planning-development/protected-sites-species> <http://www.legislation.gov.uk/> Natural England is the government's advisor on the natural environment and provides a range of information including regional contact details on their website: <https://www.gov.uk/government/organisations/natural-england/services-information>

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The information that I have prepared and provided is true and has been prepared in accordance with the guidance of my professional institutes.

I therefore confirm that the opinions expressed are my true and professional opinions.



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The approximate area surveyed is outlined in red on the photograph below, the actual site area is within this, please see accompanying architect's plans.



SUMMARY

Mr & Mrs. C. Dearling commissioned Anglian Ecology to conduct a Preliminary Ecological Appraisal (PEA) of land belonging to Kiln Farm, Chimers Lane, Hoo, in relation to proposals which include the conversion and part demolition of an existing 'L' shaped stable block (formerly adjoined) into an eco-friendly residential unit. In addition to the PEA the stable block was subject to a Bat and Bird Scoping Survey.

The purpose of the PEA was to determine any potential impacts on protected species and habitats of the proposed works on the proposed site area and its immediate surroundings, and to identify any constraints, opportunities, and requirements for further survey. Enclosed recommendations relate to information provided by the client, or the clients agent, at the time of survey; any subsequent changes may alter recommendations and the proposed mitigation or enhancement measures.

The PEA included a desktop survey, analysis of all species and sites records within a 2 km radius, Phase 1¹ field survey of the proposed site area, and an on-site walkover search for signs of protected species and habitats using appropriate guidelines² It was conducted by qualified surveyor Sue Morgan on Monday 27th February 2023, in appropriate seasonal and weather conditions.

The nearest specific records are for hedgehog dated 2015 from approximately 250 m to the south in a garden on Chimer's Lane, (but shown to the north on the map). The next nearest being for two bird species; a nest of stock dove (*Columba oenas*), dated 2014 and barn owl (*Tyto alba*) dated 2016, both from approximately 440 m to the southeast of the site area.

No records pertain to the site itself, and no species with European protection status were identified during the field survey. There was evidence of nesting swallows (*Hirundo rustica*) in the barn section of the building and this species must be protected if nesting as well as ensuring the future nesting potential for this species in the immediate vicinity in some form.

The many mature hedgerow trees bordering the site and lower hedgerows provide habitat for feeding and nesting birds, invertebrates, amphibians, reptiles, and small mammals. Given the sites proximity and ecological continuity with the wider landscape, many species are likely to be present on the wider surveyed area, at least at times. None of the hedgerows or trees on site are to be affected by works except for the removal of the twisted willow (*Salix matsudana*) located to the southeast corner of the barn which has no potential for roosting bats. All other trees near the site which may be affected by plant will need protection from construction works in accordance with BS 5837:2012 'Trees in Relation to Design, Demolition, and Construction'.

The surveyed site is largely comprised of building, hardstanding, small paddock and menage area with the occasional scattered tree. Approximately 20 m southeast of the stables is a pond surrounded by improved grassland, tree, and shrubs. To inform the client further this pond should be tested for the presence/absence of GCN hormones prior to any works. There is a ditch (partially wet at the time of survey) to the south of the pond across the tarmac access track which runs to the west of the entrance drive. Other boundaries across the wider area have the remains of shallow dry ditches.

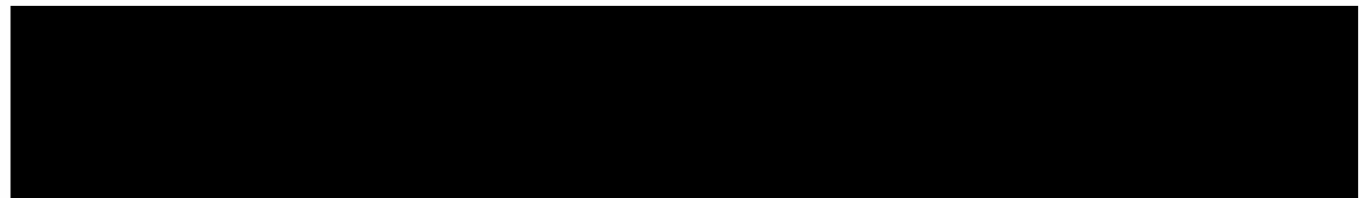
¹ The Phase One Survey followed the standard Phase I Survey methodology (JNCC, 1993, 2010).

² Guidelines published for individual species surveys by specialist organisations such as The Bat Conservation Trust, The Mammal Society, and Natural England.

³ All birds are protected under the 1981 Wildlife and Countryside Act (as amended) Some birds, known as 'schedule 1 birds', e.g. barn owls, (*Tyto alba*) have extra legal protection.

There was no evidence of bat presence in the stables surveyed. However, bats will be present in the mature trees on site and will be using the well treed boundaries as both a commuting, roosting and foraging habitat. No works should impact on these trees and hedgerows without the requirement for further survey first.

If any trees, hedgerows are to be removed or pruned then further surveys for bat and bird species should be undertaken,



All mature trees which could be affected by plant movements should be given root protection during works in line with BS5837:2012 Trees in relation to design, demolition, and construction which site contractors must follow.

Due to the high quality habitat for bat species immediately adjoining the site, care should be taken to maintain low lux levels both before, during, and after works.

The site lies within the SSSI Impact Zones⁵ of three SSSI's: High House Meadows Monweden, 1.3 km to the northwest, Monweden Meadows 1.2 km to the west, and Moat Farm Meadows Otley, just over 2 km to the southwest. The proposals will not affect these protected sites.

For the development to proceed without risk of committing an offence the following is required:

1. The pond on site should be tested for the presence/absence of GCN prior to works.
2. Any planned tree removal must be preceded by a potential bat roost assessment to ensure no offence is inadvertently committed.
3. An ECoW⁶ must be appointed to ensure the correct compensatory swallow nesting habitat has been installed prior to the development on this site. If works are planned between late February to September prior to the commencement of works an EcoW must search the stables for the potential presence of nesting bird species.
4. All trees likely to be affected by plant will require root protection during works and contractors must follow the guidelines in BS 5837:2012 'Trees in Relation to Design, Demolition, and Construction'.
5. The site should remain a 'dark' site to minimise any disturbance to bat species within the locality.
6. Best working practice recommendations (contained within) for any clearance of small areas of vegetation and scrub must be followed.
7. In the event of a protected species being discovered, works must stop and the appointed ECoW or Natural England should be contacted for advice.
8. No works should disturb nesting birds in season, in particular nesting swallows of which there is evidence of previous nesting. New nesting provision must be installed on or close to the site.

Further recommendations about best working practise, together with legislation regarding protected species and sites is given within.

⁵ SSSI (Site of Special Scientific Interest) Impact Risk Zones - to assess planning applications for likely impacts on SSSIs/SACs/SPAs & Ramsar sites (England)

⁶ Ecological Clerk of Works

SUMMARY OF FURTHER ACTIONS/SURVEY REQUIREMENTS

Habitat/Species	Action	Enhancement Opportunity
Bats	No building contained evidence of bat usage. However, The adjoining surrounding habitat are of a high quality for bats. Lighting must be kept to the existing low lux levels both before, during and after works.	<p>New landscaping with native pollinating plants would benefit bat species.</p> <p>Two bat boxes installed within the site area for occupation by either Pipistrelle species or brown long eared bat, both recorded within a 2 km radius, would be an enhancement for the site.</p> <p>The site must remain at the current low-lux levels to avoid potentially disturbing adjoining commuting and foraging bat habitats.</p>
Reptiles/ small mammals	Reptiles have been recorded within 2 km and will almost certainly be present within the wider site area at times. Best practice should be observed on site during works.	The areas adjoining the site contain good reptile and small mammal habitat, however more log piles would be beneficial.
Birds	The areas surrounding the site contain good habitat for bird species with mature and semi-mature trees and hedgerows, all of which are to remain. The EcoW must search all buildings for nesting birds immediately prior to any works if they are timed between late February – September.	<p>Two species-specific nest boxes could be installed on site for the UK BAP⁷ species, song thrush (<i>Turdus philomelos</i>) and house sparrow (<i>Passer domesticus</i>).</p> <p>Appropriate swallow compensation nests must be in situ either prior to works commencing (if there is no suitable site on the new development or after works are completed and the seasons birds have fledged.</p>
Invertebrates	The hedgerows, trees and patches of longer vegetation across the site provide habitat for invertebrates, most of which will be retained. Enhancement for invertebrate habitat must be incorporated into any landscaping design.	Dead wood piles and at least one ‘bug hotel’ should be incorporated into the proposals. New landscaping must use invertebrate-friendly native plant species. Examples of these are given in the appendix of this report.
Amphibians Toad/ frog/ smooth newt/great crested newt	It is possible that amphibians will be utilising the pond within the southeast garden area. Due to its proximity to areas of proposed works as a precaution this pond should be surveyed using eDNA testing for the presence/absence of great crested newt species prior to works.	
Hedgerows	All hedgerows are to be retained. Any subsequent removal of hedgerow boundary would trigger the need for further surveys and must be undertaken outside the breeding bird season or under close supervision after a check for bird presence/nests has been made by the ECoW.	
Trees	Any trees within close proximity to plant movement or excavations need root protection during works in accordance with BS5837:2012 Trees in relation to design, demolition, and construction which site contractors must follow. The EcoW must check that all tree protection is in place immediately prior to works.	

⁷ Biodiversity Action Plan species

1 INTRODUCTION

1.1 PURPOSE OF PEA

Anglian Ecology was commissioned by Mr. and Mrs C. Dearling to conduct a Preliminary Ecological Appraisal (PEA) and Bat Scoping Survey of land and stables at Kiln Farm Hoo in connection with proposals to convert and part demolish the stables building into a residential dwelling.

The purpose of the PEA and Bat Scoping Survey was to assess the potential impact of the development on protected species and habitats within the site area or with ecological continuity to it, and to identify constraints, opportunities, and requirements for further survey prior to planning submission. Where appropriate to the remit of this report and where sufficient information is available, recommendations for minimising impacts using avoidance, mitigation, compensation and enhancement proposals are also given.

1.2 PERSONNEL

Sue Morgan is a Chartered Ecologist and Chartered Environmentalist and qualified botanical surveyor, with 22 years' experience of surveying similar sites, structures and protected species habitats.

She works on projects for the Church of England, the National Trust, County and District Councils, the Suffolk Wildlife Trust, multi-national engineering consultancies, and private landowners. She is a Natural England licenced Volunteer Bat Roost Visitor and holds Natural England licenses to survey for protected species.

She is a qualified teacher and delivers training courses for adults on ecological surveying, woodland management, and protected species, please visit: www.anglianecology.co.uk for more information.

She is a Chartered Member of the Institute of Ecology & Environmental Management (MCIEEM) and a past Convener of its East of England Section, and a Chartered member of the Institute of Environmental Management (MIEMA).

NATURAL ENGLAND LICENCES:

Natural England Licence Holder for the Surveying of Barn Owls Number CL29/00106.

Natural England Licence holder Class Licence CL18 Registration number: 2015-11320-CLS-CLS for the surveying & handling of bats in all counties of England.

Natural England Survey Class Licence WML-CL08 Registration number 2015-19101-CLS-CLS. (great crested newts).

Natural England Survey Class Licence holder 2016-21569-CLS-CLS (dormice).

Natural England licence Holder for the Surveying and Disturbance of Schedule I birds: Natural England Registration Numbers; 2022-61354-SCI-SCI-1, (stone curlew), 2022-61478-SCI-SCI (woodlark).

BIOLOGICAL SURVEYING:

Advanced Certificate in Biological Surveying from The University of East Anglia and The Field Studies Council.

2 SITE DESCRIPTION

2.1 GRID REFERENCE

The grid reference at site centre is: NGR: TM 24178 57622

2.2 ADDRESS AND LOCATION MAP

Kiln Farm, Chimers Lane, Hoo, Woodbridge, Suffolk IP13 7QF



2.3 PROPOSALS

The proposals are to convert the existing stables into a 3-bedroom dwelling as per accompanying architects plans.

Plans and information used to inform this survey were:

Location Plan, OWL Architects, October 2022

Kiln Farm Block Plan Survey November 2022 Drwg No: 2223 110.02 OWL Architects.

Site for Planning (architects mark-up) OWL Architects.

Site Layout Survey November 2022 Drwg No: 2223 110 03 OWL Architects.

Site Layout Survey November 2022 Drwg No: 2223 110 04 OWL Architects

Site Layout Survey November 2022 Drwg No: 2223 110 05 OWL Architects

Indicative Proposal (undated and unsigned)

Convert Existing Stables to a 3 Bedroom Dwelling Prepared for: Council Prepared by: Chris Dearling, August 2020 Proposal Number :1

Information on areas of proposed works

The location of the proposed works is an existing 'L' shaped stables building formerly joined but now slightly separated. As photographed below. The building is surrounded by a mixture of hardstanding and tarmac to the west and south with a small area of improved grassland to the south. To the north and east are areas of grazing meadow.

Please see photographs below.

Figure 1 The stables looking from a distance to the west (left) and south (right)



2.4 SITE CONTEXT

The site is located at the end of a farm track north off Chimers Lane, amidst arable farmland approximately 2 km to the south west of the small village of Hoo, Suffolk, 4.8 km northwest of the town of Wickham Market.

It lies within the area administered by East Suffolk District Council and within National Character Area 83 South Norfolk and High Suffolk Claylands. The landscape typology⁸ is RCA

Typology R consists of intermediate rolling/undulating areas, below 1000 ft, including descriptive landform classes 'low hills - plateau' and 'rolling lowland' - associated mainly with Mesozoic (Cretaceous, Jurassic, Triassic & Permian) or Tertiary rocks of sedimentary origin and glacial till.

Typology C consists of Clayland Heavy, often poorly draining land associated with base-rich, clayey and loamy soils developed on soft (Mesozoic & Tertiary) clay and chalky till. Seasonal waterlogging is the main constraint to agricultural production and, although utilized extensively for cereal growing in Eastern England, this ground type is mainly under permanent grassland in central and western areas where neutral grassland is the characteristic associated habitat.

Typology A consists of Wooded - ancient woods Settled agricultural landscapes (dispersed or nucleated settlement) characterised by an assorted pattern of ancient woodlands which pre-date the surrounding enclosure pattern - in places associated with densely scattered hedgerow trees (typically oak).

The site also lies within Suffolk Landscape Typology⁹ 'Ancient Estate Claylands' a gently rolling heavy clay plateaux with ancient woodlands and parklands. It is a dissected Boulder Clay plateau with (in places) still an organic pattern of field enclosures, and straight boundaries where influence of privately owned estates is strongest.

The area contains enclosed former greens and commons, and Parklands, along with the remnants of WWII airfields

The villages are mainly small, with dispersed hamlets and farmsteads many with timber framed buildings, and there are distinctive estate cottages. Blocks of ancient semi-natural woodland are scattered throughout the area, made up of oak (*Quercus robur*), ash, (*Fraxinus excelsior*), field maple (*Acer campestre*), hornbeam (*Carpinus betulus*) and small-leaved lime (*Tilia cordata*). Hedgerow trees are ubiquitous and in many places this landscape can feel well wooded

The rivers draining east and south have divided the edge of the plateau into a series of 'fingers' and this landscape is found on those residual areas of plateau. These interfluves run in a series from the Hundred River and the River Brett. Some of the flatter, poorly-drained interfluves were used for large common pastures, eg Sotterley Common, Frostenden Green and Clay Common, Otley Green, Crowfield Green, Barham Green etc. Many of these were enclosed in the 18th and early 19th centuries and only their outlines survive as landscape features.

⁸ Landscape Typology as defined by MAGIC (Multi Agency Geographic Information for the Countryside)

⁹ Suffolk Landscape Character Areas, Suffolk County Council and District Councils, Phil Watson Landscape Officer, Suffolk County Council June 2011

2.5 SITE DESCRIPTION

All measurements are approximate.

The surveyed site consisted of the entrance drive and small paddock area along with the land immediately to the southeast of the stables building which contains the pond and the land adjoining the stables. The field to the north and hedgerow boundaries (including the hedgerow bordering the public footpath to the east) which have ecological continuity with the site were also walked over for signs of protected species and habitat.

Access

The site is accessed via a farm track which runs north off Chimers Lane. The track, which is part shingle, part tarmacked, and measures approximately 3 metres wide, leads north from a brick paved entrance splay. Immediately to the west of the trackway is a public footpath. To the east and west it is bordered by an improved grassland verge (1.5 m wide to the east, narrow to the west), through which daffodils (*Narcissus pseudonarcissus*) are now emerging.

The trackway is flanked by a predominantly beech (*Fagus sylvaticus*) hedgerow to the west, with trees to the east, in which species include blackthorn (*Prunus spinosa*) ivy (*Hedera helix*)- clad oak, and field maple, with bramble (*Rubus fruticosus* agg) and rose (*Rosa arvensis*) understorey. There are standard oaks here, to the east and west centrally and a ditch to the west. There are young beech trees to the east grass verge which widens out beyond a mature yew (*Taxus baccata*)

To the west, the hedgerow ends and the ditch and footpath are exposed over an improved 2 m wide grass verge. At the top of the trackway to the northeast is a small orchard area containing nine fruit trees in a triangular formation dotted between improved grassland sward. This small orchard area measures approximately 40 m by 28 m and is edged to the north by the post and rail timber fencing of a small paddock.

Leading from the northeast corner of the orchard area is a public footpath hedged to the east by mature trees at least 5 m high with thick thorn hedgerow to the fore and a former ditch, now shallow and dry. This mature treed hedgerow is doubled in thickness in parts, reaching 6 m wide in places, with arable farmland beyond. The species include blackthorn, rose, field maple, and bramble, and there is evidence of nesting birds. To the west, this footpath is boarded by post and rail fencing with wide gauge wire and native hedgerow 1 m to 1.5 m high with intermittent gaps and small patches of bramble and scrub concentrated generally to the northern end.

To the north the trackway curves to the west and branches into two either side of the pond area, the western section leads to Kiln Farmhouse and garden area and to the east a narrower section leads to the proposed site area. This east section measures 2.2 m wide with an improved grass verge to the east beyond which is a small paddock and menage area demarcated by timber post and rail fencing with wide gauge netting.

The paddock area is divided into two, the southernmost division made up of a rectangular area approx. 34 m x 11 m, with three mature silver birch (*Betula pendula*) trees to the south boundary and a small (2 m x 2 m) timber chicken hut with attached run. This hutch has a low-pitched flet roof and is in a state of disrepair. It is not to be affected by works and was not surveyed.

To the north this paddock has a line of post and rail fencing with open 3 m wide access to the east into the adjoining meadowland. The east boundary is post and rail fencing with occasional blackthorn hedging and to the north is a post and rail divide into the menage area.

The menage area measures approx. 18 m x 38 m and is surrounded by 1.25 m post and rail timber fencing with a 2 m strip of grass area to the north bordered by blackthorn at its eastern end. The five bar entrance gate to this menage is located to the west boundary.

This paddock area spreads northwest and is separated from the north section by 1.75 m high post and rail fencing with a five-bar gate and wide gauge netting. This north section, separated by post and rail fencing from the menage to the west, lies to the immediate fore of the stables building.

The post and rail fenceline to the west boundary of this northern paddock area adjoins the stables to the north. By the five bar entrance gate, immediately south of the stables is a mature twisted willow tree.

The meadow land to the north which border part of the north elevation of the stables has a continuous well-treed boundary to the west, species include oak, field maple, blackthorn, ash (*Fraxinus excelsior*), and has an integral ditch (dry at the time of survey), and some dilapidated post and rail fencing. It has fencing to the north and fencing with some small sections of native hedgerow to the east. To the northwest corner is an open 3 m access gap into adjoining meadowland and there is a timber pedestrian gate to the fencing at the northern end of the east boundary.

The pond 20 m to the south of the site lies centrally between two forks of tarmac driveway. It is surrounded by vegetation to the east and north which includes a 35 m long x 2 m high privet (*Ligustrum ovalifolium*) hedgerow to the east, *Rosa* sp, bramble, dogwood (*Cornus sanguinea*), a mature weeping willow (*Salix babylonica*), and ornamental shrubs etc.

Situated to the north is a small (7 m x 5 m) hardstanding barbeque area with open timber framework above. The pond surrounded by a graded -out long bank of mown improved grassland to the west and south, varying in width from 2 m – 9 m with the tarmac entrance trackway beyond. There is a mature blossom to the southeast corner.

The pond measures approx. 120 m² and is roughly oval, tapering to the east. The north bank of the pond is approximately 20 m from the stables building.

Please see photographs of wider site below. For photographs of the stables building please see the Bat Scoping Survey (Section 10).

Figure 2: Looking northwest along the access trackway (left) and northeast across the small orchard area (right).



Figure 3 Looking southeast down the drainage ditch adjacent to the trackway (left) and the hedgrow to the east boundary with public footpath adjacent (right and below right).



Figure 4 looking north along the east fork of the trackway with the small paddock on the right, the privet hedge enclosing the pond on the left, and the stables in the distance (left).



Figure 5 Looking west (left) across the paddock area and northwest (right) .



Figure 6 Looking southwest across towards the stable block from the adjoining meadowland to the north (left) and looking northwest along the west boundary of the meadowland (right).



Figure 7 Looking west across the menage and small paddock back toward the stables (left) and looking northwest across the pond 20 m south of the stables (right).



2.6 GEOLOGICAL INFORMATION

The soil association for the site is: 711r BECCLES 1 712 Ragdale: Chalky till, slowly permeable seasonally waterlogged, fine and coarse loamy over, associated with similar clayey soils.

Soilscape (England)

Reference: 18

Name: Slowly permeable seasonally wet slightly acid but base-rich loamy and clayey soils.

Main Surface Texture Class; Loamy

Natural Drainage Type: Impeded drainage

Natural Fertility: Moderate

Characteristic Semi-natural Habitats: Lowland and seasonally wet pastures and woodlands.

Main Land Cover Grassland and some arable woodland.

2.7 HYDROLOGICAL INFORMATION

The average rainfall is 600 millimetres.

Aquifer Designation Map (Bedrock) (England)

Typology: Principal

Aquifer Designation Map (Superficial Drift) (England)

Typology: Secondary (undifferentiated)

The total hardness in groundwater in the Chalk on this site is 400 and the Chloride ion concentration is 50 -100 mg/l.

3 LEGISLATION

This PEA has been undertaken with reference to relevant wildlife legislation and planning policy.

Relevant legislation considered within the scope of this document includes the following:

- The Wildlife and Countryside Act 1981 (as amended).
- The Conservation of Habitats and Species Regulations 2017 (as amended).
- The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019.
- Natural Environment and Rural Communities (NERC) Act 2006.
- The Countryside and Rights of Way (CROW) Act 2000.
- Wild Mammals (Protection) Act 1996.
- The Hedgerow Regulations (1997).
- The Protection of Badgers Act (1992)
- The Environment Act (2021)

In addition to obligations under wildlife legislation, a new version of the National Planning Policy Framework was published on 20 July 2021, this sets out the government's planning policies for England and how these are expected to be applied. Chapter 2 'Achieving sustainable development', members of the United Nations – including the United Kingdom – have agreed to pursue the 17 Global Goals for Sustainable Development in the period to 2030. These address social progress, economic well-being and environmental protection¹⁰

The environmental objective is to protect and enhance our natural, built and historic environment, including making effective use of land, improving biodiversity, using natural resources prudently, minimising waste and pollution, and mitigating and adapting to climate change, including moving to a low carbon economy. Chapter 15: 'Conserving and enhancing the natural environment' sets out how requires planning decisions must contribute to conserving and enhancing the local environment.

The 'UK Post-2010 Biodiversity Framework', published in July 2012, succeeded the UK BAP. The framework particularly set out the priorities for UK-level work to support the Convention on Biological Diversity's (CBD's) Strategic Plan for Biodiversity 2011-2020 and the EU Biodiversity Strategy (EUBS), launched in May 2011. Many of the outputs originally developed under the UK BAP remain valid and of use. Background information on UK Priority Habitats (HAPs) and species (BAPs) still inform biodiversity work at country level and are a point of reference for targeted conservation efforts.

¹⁰ Transforming our World: the 2030 Agenda for Sustainable Development

4 METHODS

This report is written with reference to:

The British Standard BS 42020:2013, Biodiversity a Code of Practice for Planning and Development (BSI¹¹ 2013).

As a full member of the Chartered Institute of Ecology & Environmental Management (CIEEM) and of the Institute of Environmental Management the author of this report followed the institutes Codes of Professional Conduct and Technical Guidelines, including CIEEM's Sources of Survey Methods, whilst conducting the field survey and compiling the accompanying written report of findings.

Species and habitats were assessed following guidance found within CIEEM's Guidelines for Ecological Impact Assessment in the United Kingdom (2006), The Bat and Bird Scoping Survey was undertaken in line with The Bat Conservation Trust: Bat Surveys - Good Practice Guidelines (3rd edition 2016), and Natural England Bat Mitigation Guidelines and the Barn Owl Trust (2010) Survey techniques. Leaflet no. 8.

The current (Standing Advice for bats can be found at:

<https://www.gov.uk/guidance/bats-protection-surveysand-licences>.

The current Standing Advice for breeding birds can be found at :

<https://www.gov.uk/guidance/wild-birds-surveys-and-mitigation-for-development-project>

Plant species nomenclature follows that of Stace¹² (2019).

4.1 DESKTOP SURVEY

The desktop survey searched for and analysed previous surveys, records of protected species and sites within a 2-km radius using DEFRA's MAGIC MAP, information supplied by the client, and information supplied from a 2 km search radius by Suffolk Biological Information Service (SBIS). An assessment of their relevance in relation to the impact of proposed development in the site area follows below.

4.2 PHASE ONE SURVEY

The Phase I Survey of the proposed site area for signs of protected species or their potential habitat followed the standard Phase I survey methodology (JNCC¹³, revised 2016).

4.3 RISK ASSESSMENT

A risk assessment was undertaken prior to the field survey. There were no risks other than those usually encountered when surveying agricultural buildings and surveying out of doors. Parking is available on site.

¹¹ British Standards Institute

¹² Stace; C. New Flora of the British Isles, C & M Floristics, 4th Ed, 2019

¹³ Joint Nature Conservation Council

5 SURVEY RESULTS

5.1 DESKTOP SURVEY

5.1.1 HISTORY

As far as the author of this report is aware there have been no previous surveys on this site.

5.1.2 PROTECTED SPECIES AND SITES, DATA SEARCH DETAILS

SBIS was requested to undertake a standard data search for all records of protected species and sites within a 2-km radius on 17/02/2023.

Ownership of the data used in this report remains with the original recorder and SBIS, all data use restrictions apply.

All protected sites, Priority Habitats, and areas of local or regional conservation importance within a 2 km radius have been assessed within the Geographic Frame of Reference¹⁴ which is comprised of seven levels:

- International;
- UK;
- National (i.e., England/Northern Ireland/Scotland/Wales);
- Regional/ County (or Metropolitan - e.g., in London);
- District/ (or Unitary Authority, City, or Borough);
- Local or Parish;
- within zone of influence only (which might be the project site or a larger area).

No sites of International, national, regional, county, or district importance will be affected by the proposed development of the site area.

All details of sites and Priority Habitats within a 2 km radius of the site are detailed below. Results of the MAGIC Map search and the SBIS protected species and sites map for a 2 km radius are included in the appendix.

¹⁴ Geographic Frame of Reference, Guidelines for Ecological Impact Assessment in the UK, CIEEM, 2006

5.1.2.1. PROTECTED OR NOTABLE SITES

1. SSSI Sites and SSSI Impact Zones

The site lies within the SSSI Impact Zone of Monewden Meadows /Martins Meadow SSSI 1.2 km to the northwest, High House Meadows, Monewden SSSI 1.3 km to the west, and Moat Farm Meadows Otley, just over 2 km to the southwest.

The proposals will not affect these protected sites.

2. Ramsars, AONB's SAC's, and SPA's and other sites with statutory protection

None

Other than the above, there are no sites with statutory protection within a 2 km radius.

3. Priority Habitat Inventory

The following Priority Habitats are within 2 km of the site, in each case the nearest example is given.

1. Good quality semi improved grassland 1 km to the northwest.
2. Lowland meadows Monewden Meadows, as above
3. Ancient & Semi-Natural Woodland 1.3 km to the northeast, with other examples with 2 km.
4. Deciduous woodland 120 m to the southwest, with other examples with 2 km.
5. National Forest Inventory (broadleaved) 130 m to the southwest, with other examples with 2 km
6. Traditional orchard 370 m to the east.
7. Wood-pasture and Parkland 408 to the southwest
8. Priority Habitat Inventory - No main habitat but additional habitat exists (England) Traditional orchards just over 2 km to the south.

4. Local /County Wildlife Sites

There are four County Wildlife Sites within a 2 km radius of the site. The sites are:

1. Suffolk Coastal 128: Jope Cottage Meadow 1.3 km to the northwest.
2. Suffolk Coastal 129: Monweden Green as above.
3. Suffolk Coastal 130 Tabies Wood 2 km to the northwest.
4. Suffolk Coastal 93: Hoo Wood 1.7 km to the northeast.

None of the above sites will be affected by the proposals. Please see relevant maps in the appendix.

5.1.2.2. PROTECTED SPECIES RECORDS AND PROTECTED SPECIES SCOPING SURVEY

The SBIS search returned 606 records of protected or notable species within a 2-km radius of the site of which 373 are for birds covering 60 species, of which eight are Schedule 1.

The nearest specific records are for hedgehog dated 2015 from approximately 250 m to the south in a garden on Chimer's Lane, (but shown to the north on the map).

These records have been analysed in terms of their relevance to the site area and any possible impact the proposed works may have upon the species and this information is contained with the field survey results in 5.2 below.

The site habitats and those with ecological continuity to it were evaluated for the potential or actual presence of or signs of protected species. All existing protected species data for within a 2 km radius was used to make an evaluation as to the likely constraints to works and to inform any requirement for further survey, mitigation, compensation or enhancement.

Where there is negligible likelihood of a protected species being present, such as in the case of marine or freshwater species on a site with no aquatic habitats, then these species have been omitted from consideration. In each case the designation for each species is given in an abbreviated form in brackets after the name. A key to these designation abbreviations is given in the appendix.

Records are only a small indicator of what may or may not be present within an area depending on the knowledge of the recorder and the amount of survey effort undertaken. A species may be present on the site or within a 2 km radius even though there are no records.

On this site, the species listed below were searched for and/ or present within the recorded data for a 2 km radius.

No records of protected species pertained directly to the development site, although in many cases records are to grid square accuracy only and it is impossible to discern their precise location.

Special note

'Absence of evidence is not evidence of absence' a field survey is only a reflection of a short visit and data records are not comprehensive.

1. Invertebrates

There are 38 records for invertebrates covering 34 species, the majority being for with three records for butterflies, and one for true bug. The nearest records are for small square spot (*Diarsia rubi*), ScotBL, Sect.41, UKBAP, and white ermine (*Spilosoma lubricipeda*), ScotBL, Sect.41, UKBAP, both moths, 1.2 km to the southwest dated 2015.

The wider site contains areas of unmown tall ruderals, and the trees, pond, woods, and hedging on site will attract invertebrates; leaving areas of grass unmown would also be of benefit to these species. Enhancement could take the form of invertebrate friendly planting and a bug hotel.

2. Reptiles

There are 96 records for reptiles within a 2 km search radius covering two species, 69 for slow worm, (*Anguis fragilis*), (Bern3, ScotBL, Sect.41, UKBAP, WCA5/9.1k/I, WCA5/9.5a), and 27 for grass snake (*Natrix helvetica*), (Bern3, Sect.41, UKBAP, WCA5/9.1k/I, WCA5/9.5a). The nearest record is from 1.8 km to the northeast for grass snake dated 2009.

All reptiles are protected under the Wildlife and Countryside Act 1981 (as amended), making it illegal to intentionally kill or injure a common reptile. Rare reptiles (the smooth snake and sand lizard), also receive legal protection under the Conservation of Habitats and Species Regulations 2010.

It is illegal to deliberately injure, kill, capture or disturb a rare reptile, or to damage or obstruct any place used for shelter or protection. Rare reptiles may only be handled by licensed ecologists. All reptile species are species of principle importance under the Natural Environment Rural Communities (NERC) Act 2006, and local authorities and other public bodies have a legal duty to take their conservation into account. Because of this, they are a material consideration in the planning process.

The site area itself has no reptile habitat. The wider bordering areas have good habitat for reptiles. As a precaution any areas of works on meadow or vegetation should be searched by an SQE prior to any removal by mechanical means in order to avoid inadvertent injury to these species if present.

3. Birds

The search returned 373 records for birds covering 60 species, eight of which are Schedule 1. All breeding birds are protected under the Wildlife and Countryside Act 1981 (as amended) with Schedule 1 birds receiving special year-round protection.

The nearest record is for a nest of stock dove, BAmb, BD2.2, dated 2014 and barn owl, Bern2, CITESA, ScotBL, WCA1i, dated 2016, both from approximately 440 m to the southeast of the site area.

No records pertain to the site itself, and no species with European protection status were identified during the field survey. There was evidence of nesting swallows (*Hirundo rustica*) in the barn section of the building and this species must be protected if nesting as well as ensuring the future nesting potential for this species in the immediate vicinity in some form.

Priority Species for CS Targeting

Lapwing (*Vanellus vanellus*), BD2.2, BRed, CMS_A2, CMS_AEWA-A2, ScotBL, Sect.41, UKBAP, turtle dove (*Streptopelia turtur*), BD2.2, BRed, CITESA, ScotBL, Sect.41, UKBAP). These birds are BRed ¹⁵species and Priority Species in the UK Biodiversity Action Plan: and are subject to special habitat management initiatives.

Data Collation Period

2005-2009 (plus any 2010 data available).

The site has habitats for breeding birds within the trees and hedgerows. The stables would need re-checking by an EcoW immediately prior to work. Bird species must be taken into consideration between February to October and an EcoW must search all areas of surrounding scrub for the presence of breeding birds prior to any works which are likely to disturb them.

Robin (*Erithacus rubecula*), blackbird (*Turdus merula*), great tit (*Parus major*), and wren (*Troglodytes troglodytes*), were seen and heard utilizing the sites boundary hedgerows.

4. Bat species

There are 20 records for bats covering six species: common pipistrelle (*Pipistrellus pipistrellus*), (CMS_A2, CMS_EUROBATS-A1, HabRegs2, HSD4, WCA5/9.4b, WCA5/9.4c, WCA5/9.5a), brown long-eared bat (*Plecotus auritus*) (HabRegs2, HSD4, Sect.41, UKBAP, WCA5), and soprano pipistrelle (*Pipistrellus pygmaeus*), (HabRegs2, HSD4, Sect.41, UKBAP, WCA5), Natterer's bat (*Myotis nattereri*), Bern2, CMS_A2, CMS_EUROBATS-A1, HabRegs2, HSD4, ScotBL, WCA5/9.4b, WCA5/9.4c, WCA5/9.5a, serotine (*Eptesicus serotinus*), Bern2, CMS_A2, CMS_EUROBATS-A1, HabRegs2, HSD4, RLG.B.VU, WCA5/9.4b, WCA5/9.4c, WCA5/9.5a, and barbastelle (*Barbastella barbastellus*) Bern2, CMS_A2, CMS_EUROBATS-A1, HabRegs2, HSD2p, HSD4, RLG.B.VU, Sect.41, UKBAP, WCA5/9.4b, WCA5/9.4c, WCA5/9.5a.

The nearest record is for Natterer's bat and brown long-eared bat (roost sites) from approximately 600 m to the north dated 2011. No records pertain to the site area, although bats will be utilising the wider site's trees, woodland and hedgerows.

There is one record of a European Protected Species Licence for bats being issued close to the site 1.8 km to the north the details of which are given below:

Granted European Protected Species Applications (England)

2019-43471-EPS-MIT-1

Species group to which licence relates: Bat 1.8 km to the north.

Species on the licence: BLE,C-PIP,NATT,S-PIP

Site county of licence: Suffolk

Licence Start Date: 14/04/2020

Licence End Date: 01/09/2026

Does licence impact on a breeding site: N

Does licence allow damage of breeding site: N

¹⁵ Bred species: Using standardised criteria, experts from a range of bird NGOs, including BTO, assessments are made of 245 species with breeding, passage or wintering populations in the UK and assigned each to the Red, Amber or Green Lists of conservation concern, red being the highest.

Does licence allow damage of a resting place: N

Does licence allow destruction of breeding site: N

Does licence allow destruction of a resting place: Y

Does licence impact on a hibernation site: Unknown

NERC agreement reference: Unknown

All bats are protected under UK and European legislation under the Wildlife and Countryside Act 1981 (as amended) and Schedule 2 of the Conservation of Habitats and Species regulations 2017 (as amended), and all subsequent Brexit legislation.

No bat species were observed on site during the daytime walkover. Please see the Bat Scoping Survey section of this report. The site should remain a dark site to ensure bat species are not disturbed.

6. Hedgehog

(Bern Convention: Appendix 3, Biodiversity Action Plan UK list of priority species: Priority Species, Biodiversity Lists - England: England NERC S.41, Red listing based on 2001 IUCN guidelines (from 2018): Vulnerable)

There are 21 records for hedgehog within a 2 km radius of the site, the nearest being approx. 250 m to the south in a garden on Chimer's Lane, (but shown to the north on the map) dated 2015.

The wider site does contain suitable habitat for this species within the hedgerows, wooded areas and to the margins. Hedgehogs are protected under Schedule 6 of the Wildlife and Countryside act (as amended) and is listed as a Priority Species under the UK Biodiversity Action Plan. No hedgehogs were observed during the site survey. It is probable that hedgehogs are present on the wider site and could therefore be encountered during the development. The welfare of this species must be taken into consideration before works, please see recommendations.

7. Brown hare

(Biodiversity Action Plan UK list of priority species: Priority Species, Biodiversity Lists - England: England NERC S.41, EBAP, Red listing based on 2001 IUCN guidelines (from 2018): Not Evaluated). Protected in the UK under the Wildlife and Countryside Act, 1981. Priority Species under the UK Post-2010 Biodiversity Framework.

There is one record of brown hare within a 2 km radius of the site from 2 km to the northwest dated 2007. The wider site does contain suitable habitat for this species, in the meadow and there is ecological continuity into the site from the surrounding fields which increases the likelihood of at least occasional species presence. The welfare of this species must be taken into consideration before works; excavations and plant movement must not pose a threat to any individuals, in particular leverets, recommendations are made below.

8. Amphibians

The four widespread species of amphibian, the smooth and palmate newts, the common frog and common toad, are protected only by Section 9(5) of the Wildlife and Countryside Act 1981. This section prohibits sale, barter, exchange, transporting for sale and advertising to sell or to buy. Collection and keeping of these widespread amphibian species is not an offence.

The UK's populations of the great crested newt are internationally important. They're under threat from habitat loss and intensification of farming practices. GCN are a European Protected Species (EPS) and is afforded protection under Schedule 5 of the Wildlife and Countryside Act, and the Conservation of Habitats and Species Regulations 2017 (As amended) and all subsequent Brexit legislation.

It is an absolute offence to kill, injure or capture a GCN, disturb a great crested newt in its place of shelter or breeding, obstruct, damage or destroy the places where great crested newts live, or possess, control, transport, sell, exchange or offer for sale/exchange any live or dead GCN or any part of a GCN without a licence to do so.

There are eight records of great crested newts (Bern2, FEP7/2, HabRegs2, HSD2p, HSD4, ScotBL, Sect.41, UKBAP, WCA5/9.4b, WCA5/9.4c, WCA5/9.5a) one Natural England Mitigation Licences issued for this species, and one positive Natural England license return within a 2 km radius. The nearest record is from the licence return 700 m to the northwest dated 2017.

The details of the Natural England Mitigation Licensing and survey return are reproduced below.

1. Granted European Protected Species Applications (England)

Case reference of granted application: 2019-40991-EPS-MIT

Species group to which licence relates: Amphibian

Species on the licence: Great crested newt 1.6 km to the northwest.

Site county of licence: Suffolk

Licence Start Date: 07/08/2019

Licence End Date: 31/12/2022

Does licence impact on a breeding site: N

Does licence allow damage of breeding site: N

Does licence allow damage of a resting place: Y

Does licence allow destruction of breeding site: N

Does licence allow destruction of a resting place: Y

Does licence impact on a hibernation site: Unknown

NERC agreement reference: Unknown.

2. Positive presence Great Crested Newt Class Survey Licence Return

GCN Present: Y

Survey Date: 18/04/2017

OS Grid Ref: TM236580

There is a pond on site, 20 m to the south of the stables building. The pond should be tested for the presence/ absence of GCN hormones using eDNA testing between April 15th and June 30th 2023 to inform the client of their legal obligations should this species be present.

Common Toad is a priority species in England under Biodiversity 2020: A strategy for England's wildlife and ecosystem services and under section 41 of The Natural Environment and Rural Communities (NERC) Act 2006 an offence would be committed under the law. If prosecuted a conviction can be 6 months imprisonment and/or a fine.

There are four records for common toad, (Bern3, ScotBL, Sect.41, UKBAP, WCA5/9.5a), the nearest being 1.7 km to the southeast dated 2018. There is one record each for common frog, (Bern3, HSD5, WCA5/9.5a,) and smooth newt, (Bern3, WCA5/9.5a), within the search radius, at 1.3 km to the southwest and 1.9 km to the southeast respectively, dated 2014 and 2019.

The nearest record for amphibian is for great crested newt 700 m to the northwest.

9. Flowering plant

There are 40 records for flowering plants. The site did not contain any species of note. The nearest records are from Monweden Churchyard 900 m to the north all dated from 2018. They are for Pyramidal Orchid (*Anacamptis pyramidalis*) CITESB, Quaking-grass (*Briza media*) RLENG.Lr(NT), wild strawberry (*Fragaria vesca*), RLENG.Lr(NT), and hoary plantain (*Plantago media*), RLENG.Lr(NT), ScotBL.

There are also two records for fungi, both for Colchicum Smut (*Urocystis colchici*), Sect.41, UKBAP, the nearest being 1.3 km to the southwest dated 2019.

10. Evidence of other species

Evidence of rabbit (*Oryctolagus cuniculus*) was observed within the site boundary, as well as bird and invertebrate species. No species-specific surveys were carried out.

No species with European Protection status were identified during the field survey.

5.2 FIELD SURVEY

5.2.1 TIMING AND WEATHER

The site was surveyed on Monday February 27th 2023 during daylight hours.

5.2.2 SURVEY CONDITIONS

Temp / and Relative Humidity (average)	Wind direction	Wind speed	Cloud cover	Visibility
6° C / 76%	NE	9 mph gusts	60%	Good

5.2.3 PHASE 1 SCOPING SURVEY

The proposed development area of the site was examined for any signs of a protected species or their potential habitat (please also see Bat Scoping Survey section of this report), none was found. The wider surveyed site was also examined for and protected species habitats and again none were found, though no species – specific (Stage II Surveys) were undertaken. The wider site area including the meadow is to remain untouched by current proposals.

1. Improved grassland (B4)

This habitat is present along the verges of the trackway, to the paddock area and around the pond and in small patches bordering the domestic garden. It is dominated by perennial ryegrass (*Lolium perenne*), and rough stalked meadow-grass, (*Poa annua*) with some common bent (*Agrostis capillaris*), arable escapees, bulbous buttercup (*Ranunculus bulbosus*), daisy (*Bellis perennis*), dandelion (*Taraxacum officinale*) and other low common forbes.

2. Species -rich hedge and trees (J2.3.1)

This habitat is found bordering the meadow to the north on the western boundary and the trackway and public footpath to the east. It is found in small patches along the fenceline of the small paddock area south of the menage and curving round the pond area. species across the site include oak, ash, beech, hawthorn, blackthorn, field maple, and privet.

3. Species – poor hedgerow (J2. 1.2)

This is found to the west of the trackway and consists of a continuous line of predominantly beech hedging.

4. Scattered trees, (broadleaved) (A3.1)

These are found along the driveway, to the orchard, and to the paddock area. Species as above, with silver birch, apple, and twisted willow.

5. Standing water (G1)

There is one pond to the southeast garden area.

6. Scrub (A2.2.)

There are small pockets of scrub around the paddock and driveway as well as to the boundaries of the north meadow and the public footpath to the east. This is dominated by bramble and blackthorn.

7. Ephemeral /short perennial (J.1*3)

This habitat is found around areas of hardstanding and entrances and consists of low common forbes such as pineapple weed, (*Matricaria discoidea*), chickweed, (*Stellaria media*), scentless mayweed (*Tripleurospermum inodorum*), greater plantain (*Plantago major*), lesser plantain (*Plantago lanceolata*) and arable escapes.

8. Bare earth /hardstanding/other (J4)

This is found to the menage, the trackways, and to the fore of gates and buildings.

9. Buildings

This consists of the stables; please see Bat Scoping Survey section of this report for full details.

10. Wet ditch (G.2)

This habitat is found to the west of the entrance trackway.

11. Dry ditch (J2.6)

This is found to the east public footpath boundary treeline, and to the west boundary of the north meadowland.

12. Perennial flowerbeds (J1.1)

This habitat is found to the borders of the pond area around the decking and consists of ornamental shrubs.

13. Fencing (J. 2. 5)

There is a mixture of predominantly timber post and rail fencing with in places, wide gauge chicken defining the meadow and paddock areas and the routes surrounding them.

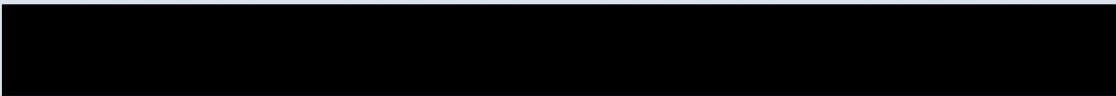
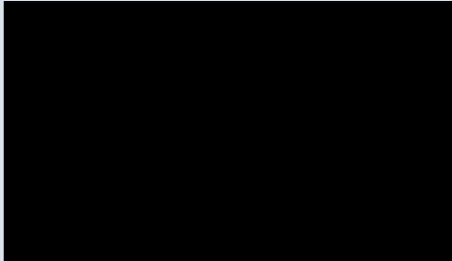
6 EVALUATION

An evaluation of the sites ecological features regarding species and habitats following the Guidelines for Ecological Impact Assessment (CIEEM 2006) and using the recommended geographic frame of reference is presented in Table 2 below.

6.1 EVALUATION OF ECOLOGICAL VALUE OF THE SITE

Level of Ecological Value of habitats on site or within a 2 km radius	Description and discussion	Level of impact
<p>International</p> <p>Features of international value are sites with international protection or designations, e.g. sites designated under the 2010 Habitats Directive, these include Ramsars, Special Protection Areas and Special Areas of Conservation</p>	<p>There are no sites international importance within a 2-km radius.</p> <p>It is possible that species (such as bats and birds) with European and UK protection are present within the site area, but they are unlikely to be in a sufficient assemblage, or rarity value to be of international importance.</p>	<p>None</p> <p>None</p>
<p>National</p> <p>Features of national value are sites with statutory protection e.g. Sites of Special Scientific Interest, or sites designated as being of national importance for nature conservation either for their habitat or the species assemblage present, or possibly present, such as National Nature Reserves.</p>	<p>There are two SSSI within the 2 km search radius: Monewden Meadows /Martins Meadow SSSI 1.2 km to the northwest, High House Meadows, Monewden SSSI 1.3 km to the west and the site lies within the SSSI Impact Zones of both these sites as well as within the SSSI Impact Zone of Moat Farm Meadows Otley, just over 2 km to the southwest.</p> <p>However, the works will not affect these protected sites.</p>	<p>None</p>

<p>County/District</p> <p>Local authorities and The Wildlife Trusts have designated sites that are recognised as of importance at regional/county, district/borough levels. A variety of names are used to identify these sites, e.g. County Wildlife Sites, Local Nature Reserves, Roadside Nature Reserves, Local Sites</p>	<p>The following Priority Habitats are within 2 km of the site, in each case the nearest example is given.</p> <ol style="list-style-type: none"> 1. Good quality semi improved grassland 1 km to the northwest. 2. Lowland meadows Monweden Meadows, as above 3. Ancient & Semi-Natural Woodland 1.3 km to the northeast, with other examples with 2 km. 4. Deciduous woodland 120 m to the southwest, with other examples with 2 km. 5. National Forest Inventory (broadleaved) 130 m to the southwest, with other examples with 2 km 6. Traditional orchard 370 m to the east. 7. Wood-pasture and Parkland 408 to the southwest 8. Priority Habitat Inventory - No main habitat but additional habitat exists (England) Traditional orchards just over 2 km to the south. <p>There are four County/Local Wildlife Sites within a 2 km radius of the site.</p> <ol style="list-style-type: none"> 1. Suffolk Coastal 128: Jope Cottage Meadow 1.3 km to the northwest. 2. Suffolk Coastal 129: Monweden Green as above. 3. Suffolk Coastal 130 Tabies Wood 2 km to the northwest. 4. Suffolk Coastal 93: Hoo Wood 1.7 km to the northeast. <p>None of the above sites will be directly affected by the proposed development.</p> <p>Bat species may be utilising the trees and areas of tall ruderals for foraging. There are roosting opportunities for bats and nesting birds within the trees and hedgerows. These species should not be affected by the proposals so long as the site remains a low lux level area.</p> <p>Swallows have been nesting within the stables.</p>	<p>None</p> <p>None but lighting levels must be kept to current low lux.</p> <p>The swallows could be potentially affected by work and avoidance during the nesting season, together with alternative nest provision should be employed.</p>
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	<p>There was no evidence of bat usage of any buildings to be subject to works or demolition. Please see Bat Scoping Survey section of this report.</p>  <p>The wider site contains habitat for invertebrate species. There are records for moth species within a 2 km radius and invertebrate habitats are present in the wider area in the form of trees and hedgerows.</p> <p>It is possible that the pond on site may be suitable for GCN to breed in. Testing for the presence/absence of GCN hormone should be undertaken during the correct survey window to inform the client further.</p>	<p>Lux levels must remain low across the site at all times.</p>  <p>None</p> <p>Potentially high if GCN present.</p>
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<p>Local/Parish</p> <p>Impacts within the immediate local area and surroundings, such as village greens, parks, small wildlife areas, spinneys, verges, local habitat connectivity including streams, brooks, and ditches, as well as local or potential species assemblages or habitats e.g. bat roosts, GCN or water vole presence.</p>	<p>On site the areas likely to be affected by works consist predominantly of small areas of improved grassland, building and hardstanding</p>	<p>Low to None.</p>
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7 ECOLOGICAL CONSTRAINT AND RECOMMENDATIONS

The Legislation referred to in this section is not fully comprehensive and does not take account of all possibilities of infringement or detail every possible application. It is the responsibility of the client to ensure that they are familiar with all relevant legislation prior to any works.

7.1 ON-SITE HABITATS

7.1.1 IMPROVED GRASSLAND, BUILDING, HARDSTANDING, EPHEMERAL/SHORT PERENNIAL.

The habitats to be affected by works (building, improved grassland, hardstanding,) would not be significant within the International, National, County or Local level unless the buildings were a habitat for a protected species. As the stables do not contain any evidence of protected species this habitat does not constitute a constraint to development of this site area.

The building to be subject to work was examined for the presence/absence of bat species and no evidence of bat usage was found. No new lighting should affect this building or its surroundings as a result of the proposals.

There was evidence of swallows nesting in the building and the proposals must not disturb nesting swallows or any breeding bird which would be an offence. Works should either be timed outside the breeding bird season (late February – September) or an EcoW must check for the presence/absence of swallow in the building prior to a start date within these months. If the EcoW found evidence of currently nesting swallows or any breeding bird, then works should be scheduled to avoid disturbance.

The EcoW must check that the correct swallow nesting mitigation has been installed on this site prior to the commencing of the nesting season.

7.1.2 EPHEMERAL/SHORT PERENNIAL/BARE EARTH

The majority of this existing habitat will not be affected by works. It is possible that small will be lost but this is not significant and does not constitute a constraint to development.

7.2 WIDER SITE HABITATS

7.2.1 MATURE AND SEMI-MATURE SCATTERED TREES AND HEDGEROWS (SPECIAL REFERENCE TO BREEDING BIRDS, BATS)

This is an important habitat for breeding birds and potentially bat species which are known to be present locally. No trees or hedgerow are currently scheduled for removal.

Breeding birds will be using the trees and hedgerows on this site for nesting during the season.

The trees and hedgerows on site are likely to be used by bat species for foraging, commuting.

It is an offence to disturb/injure breeding birds and their nests during the breeding bird season which runs from March to September, some species of birds listed under Schedule 1 of the Wildlife and Countryside Act 1981 (as amended) are protected at all times, Schedule 1 birds have been recorded within 2km of this site.

It is an offence to disturb/injure bats of all species at any time. Both bats and their roosting sites are fully protected at all times under UK and European legislation, roosting sites are protected whether the bat is present or not.

All trees and hedgerow should be retained. These are an important wildlife resource.

No external lighting should be directed towards trees; lighting should be of a low lux level and directed away from any potential bat commuting habitat.

Any tree likely to be impacted by plant movement will require root protection in accordance with BS 5837:2012 Trees in relation to design, demolition, and construction which site contractors must follow.

7.2.2 PADDOCK OF IMPROVED GRASSLAND AND MEADOW WITHIN THE WIDER SITE AREA.

This habitat will not be affected by works and therefore does not constitute a constraint to development.

7.2.3 PONDS AND WET DITCH

These habitats will not be lost because of the proposals and therefore do not constitute a constraint to development, however, please see the species section (7.3) below.

7.2.4 PERENNIAL ORNAMENTAL SHRUB BEDS

This habitat will not be affected by works and does not constitute a constraint to development.

7.3 SPECIES

7.3.1. BADGER/ HEDGEHOG/BROWN HARE

These species have been recorded locally and as the site has ecological continuity with the surrounding farmland this increases the likelihood of species presence. No badger sett or evidence of any of the above species was identified within the site area or the wider site area, although no species-specific survey was undertaken. Best practice, as detailed below, should be observed for this species, especially concerning excavation works which should not be left uncovered or without an escape route for this species. All areas of vegetation should be hand searched before any removal by mechanical means.

7.3.2 BATS

Light levels must not be significantly increased on the site or the wider site area before, during, or after works. No works should be undertaken to any tree without a prior bat survey being undertaken to ascertain presence/absence of this species.

7.3.3 BIRDS

All trees and hedgerows are currently to be retained. The likelihood of the site area or its immediate environs containing ground nesting birds is extremely low due to the current habitat conditions on site. However, there is evidence that swallows have been using the stables building for nesting during previous summers. Please see requirements detailed in 7.1.1 above.

7.3.4 INVERTEBRATES

There are records for invertebrates within a 2 km radius, some of which are locally or nationally endangered or rare. Enhancements for invertebrates should be incorporated into the landscape design.

7.3.5 REPTILES

There are records for reptiles within the search radius. The site provides a habitat for this species, albeit on a small pocket scale. Best practice should be observed, and all areas of works should be hand searched prior to any clearance by mechanical means.

7.3.6 AMPHIBIANS (ESPECIALLY GREAT CRESTED NEWT)

There are records of frog, toad, and smooth newt, within the 2 km data search. The pond on site may contain GCN in season. GCN are a European Protected Species and the potential for their presence on site currently presents a constraint to works until such a time as either their absence has been confirmed (as far as is reasonable) or the appropriate mitigation is in place to ensure the species is not harmed as a result of the works.

An eDNA survey is required to establish the likelihood of this species presence within the pond on site. Regardless of the results of these surveys, the EcoW should refer to the possible presence of amphibians during a toolbox Talk to contractors and provide identification photographs. These species may well be using earth spoil and stored items as a refugia and a search of the area should be undertaken prior to works.

7.4 ECOLOGICAL CLERK OF WORKS (ECOW)

Due to the potential presence of nesting swallows and other nesting birds, if works are scheduled to take place between late February and September an EcoW must first check the stables building to ensure absence.

The EcoW must also check that the correct compensatory nesting habitat for swallows has been installed either on the new development or close by.

7.5 BEST PRACTICE

Best practice for works is outlined below; this should be followed at all times.

- Direct mortality to many species during the construction phase can be avoided through implementation of best practice, details of which should be followed by all site personnel.
- Scrub should be hand searched prior to mechanical vegetation removal and cutting operations as they may potentially support reptiles and hedgehogs.
- Care should also be taken to ensure that no trenches or ground excavations are left open without a means of brown hares, small mammals, and reptiles being able to find their way out. Any dug pits or unfilled deep foundation work should either be covered or have mammal ramps positioned in them to allow any trapped animals to escape.
- All piles of spoil, timber, or rubble should be kept clear of the ground, by removal either to a skip, or by being elevated, to ensure that potential refugia sites are not inadvertently created.
- There should be no lighting of bonfires. Any brash and log piles on site should be searched by hand before removal/skipping and if hedgehogs or other small mammals are discovered that they should be translocated to a suitable location.
- All chemicals and plant machinery should be stored in allocated areas away from trees and possible wildlife corridors and kept to hardstanding areas.

7.6 SUMMARY OF FURTHER ACTIONS/SURVEY REQUIREMENTS

Habitat/Species	Action	Enhancement Opportunity
Bats	No building contained evidence of bat usage. However, The adjoining surrounding habitat are of a high quality for bats. Lighting must be kept to the existing low lux levels both before, during and after works.	<p>New landscaping with native pollinating plants would benefit bat species.</p> <p>Two bat boxes installed within the site area for occupation by either Pipistrelle species or brown long eared bat, both recorded within a 2 km radius, would be an enhancement for the site.</p> <p>The site must remain at the current low-lux levels to avoid potentially disturbing adjoining commuting and foraging bat habitats.</p>
Reptiles/ small mammals	Reptiles have been recorded within 2 km and will almost certainly be present within the wider site area at times. Best practice should be observed on site during works.	The areas adjoining the site contain good reptile and small mammal habitat, however more log piles would be beneficial.
Birds	The areas surrounding the site contain good habitat for bird species with mature and semi-mature trees and hedgerows, all of which are to remain. The EcoW must search all buildings for nesting birds immediately prior to any works if they are timed between late February – September.	<p>Two species-specific nest boxes could be installed on site for the UK BAP¹⁶ species, song thrush (<i>Turdus philomelos</i>) and house sparrow (<i>Passer domesticus</i>).</p> <p>Appropriate swallow compensation nests must be in situ either prior to works commencing (if there is no suitable site on the new development or after works are completed and the seasons birds have fledged.</p>
Invertebrates	The hedgerows, trees and patches of longer vegetation across the site provide habitat for invertebrates, most of which will be retained. Enhancement for invertebrate habitat must be incorporated into any landscaping design.	Dead wood piles and at least one ‘bug hotel’ should be incorporated into the proposals. New landscaping must use invertebrate-friendly native plant species. Examples of these are given in the appendix of this report.
Amphibians Toad/ frog/ smooth newt/great crested newt	It is possible that amphibians will be utilising the pond within the southeast garden area. Due to its proximity to areas of proposed works as a precaution this pond should be surveyed using eDNA testing for the presence/absence of great crested newt species prior to works.	
Hedgerows	All hedgerows are to be retained. Any subsequent removal of hedgerow boundary would trigger the need for further surveys and must be undertaken outside the breeding bird season or under close supervision after a check for bird presence/nests has been made by the ECoW.	
Trees	Any trees within close proximity to plant movement or excavations need root protection during works in accordance with BS5837:2012 Trees in relation to design, demolition, and construction which site contractors must follow. The ECoW must check that all tree protection is in place immediately prior to works.	

¹⁶ Biodiversity Action Plan species

8 ENHANCEMENT/OPPORTUNITIES

The following are suggested enhancements for this site.

1. Although currently use as grazing, a potential enhancement to the wider site area would be the creation of fenced off field margins or wildflower planting to the north meadow area and the seeding of these areas with a more varied higher-value species rich grassland and or wildflower planting. There are many varieties of grass and wildflower seed mix on the market, some of the following species should be included:

Grass species could include Crested dogstail, (*Cynosurus cristatus*), Meadowgrass, (*Poa annua*), Meadow foxtail, (*Alopecurus pratensis*), Cocksfoot (*Dactylis glomerata*), Festuca sp (*Fescue* sp), Timothy (*Phleum* sp.), Yorkshire fog (*Holcus lanatus*), Quaking grass ,soft brome (*Bromus mollis*).

Wildflower species could include yellow rattle (*Rhinanthus minor*), Viper's bugloss (*Echium vulgare*), Comfrey (*Symphytum officinale*), Meadow crane's-bill (*Geranium pratense*), Catmint (*Nepeta* sp.), Wild marjoram (*Origanum vulgare*), Field scabious (*Knautia arvensis*), and Bird's-foot trefoil (*Lotus corniculatus*).

2. New landscaping should also utilise the opportunity of creating additional log-piles and 'bug hotels' to provide habitat for invertebrates.

3. Two bat boxes could be installed within the site area suitable for occupation by either pipistrelle species or brown long eared bat, both recorded within a 2 km radius.

4. Two species-specific nest boxes for the UK BAP species, song thrush) and house sparrow would be a site enhancement and could be placed on the mature trees.

Please see below for a list of other useful links to facilitate the above:

1. <https://www.wildlifetrusts.org/actions/how-build-bug-mansion>
2. Bat boxes http://www.bats.org.uk/pages/bat_boxes.html
3. Bird boxes <https://www.birdfood.co.uk/about-our-nest-boxes>

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10. BAT SCOPING SURVEY REPORT

The 'L' shaped stable building was examined for the presence of bat species on Monday February 27th, 2023, by qualified and licenced bat surveyor Sue Morgan. There was no evidence of bat usage of any of these buildings. Please see details below.

The stables building was formerly an adjoined 'inverted L' shape running east west and north south which has now become separated due to deterioration. The north/ south section comprises a modern -timber barn like structure on a concrete plinth with pitched pan tiled roof and weatherboarded and rendered walls measuring approx. 16 m x 6 m x 6.5 m to the apex.

The east/west section is a more traditional stable structure and is of timber construction on a concrete plinth with a low pitched felted roof measuring approx. 16 m x 2.5 m x 3 m to the apex. For ease of reference the building is referred to below as these sections.

10.1 BARN SECTION

Exterior

West elevation



This elevation has an enclosed timber overhang with inset spotlights and plastic guttering. There are five timber stable doors (2 m x 1 m) all well sealed. The roof is in reasonably good condition save for a missing pantile to the extreme northwest corner and a few lifted ridge tiles with gaps beneath all of which create potential bat access points. A

To the fore is an area of hardstanding (14 m x 11 m) with a spur into the adjoining meadow. There is also a small area of scrub (10 m x 9 m) to the southeast containing some semi-mature beech, dogwood, cherry laurel (*Prunus laurocerasus*), and other ornamental shrubs.

South elevation



This elevation is weatherboarded with an enclosed and well-sealed timber soffit and barge boarding, though beginning to show some signs of deterioration to the western end. It contains a stable door (2 m x 1 m) and is fronted by an area of tarmac approx. 15 m², beyond which to the southeast is the pond with surrounding shrubbery and barbeque area. The tarmac area divides to form the east trackway and the west farmhouse drive and parking area with associated buildings and garaging. There is a semi-mature twisted willow to the southeast corner of this elevation.

East elevation



This elevation has a heavily mossed pan tiled roof with tiles largely intact. It has plastic guttering. It has open eaves allowing for potential bat access into the interior and two intact metal framed windows (1 m x 0.25 m) which were both open slightly allowing further potential bat access. To the fore of this elevation is a paddock area.

North elevation



This elevation is weatherboarded with timber barge boarding which is deteriorating to the west and eastern ends. It has a well-sealed timber soffit. There is an oil tank on a plinth to the northwest corner.

It is fronted by an area of hardstanding (16 m x 22 m) on which farm machinery, pantiles, and timbers are currently stored, with a manure heap to the northwest corner.

No evidence of bat presence was found from the external survey of the barn section. It has several potential bat access points but no evidence of usage.

Interior

Figure 8 interiors of barn section: Top: Looking north along passageway along the east interior of the barn (left), interior of the south apex (right). Middle: The open void of the west overhang (left) looking through the barn above the breezeblock stable divisions (right). Bottom: examples of a stable (left) and access from a stable into the rear (east) passageway (right).



The interior of the barn section is divided up into six breeze block walled stable compartments (five accessed through timber stable doors from the west and one accessed from the south). The breezeblock divisions are approximately 2 m high with an open fly-through area to the rafters above. To the east of the barn is a walkway (2 m x 1.4 m) with a concrete floor used to store livery etc, running from the south stable area the length of the building and access is possible to and from this walkway into, the individual stables running north to south.

The stables all have concrete floors and the rafters are machine sawn with all internal weatherboarding also exposed. It was possible to examine the interior of the west external overhang which is open internally.

There was no evidence of bat usage of any part of the barn structure from the internal inspection.

Swallows

There was evidence of previously nesting swallows in the barn section with several swallow nests to the interior rafters. Swallows when breeding are protected under the Wildlife and Countryside Act and must not be disturbed.

It is essential that the requirements above in this report are complied with regard to the potential development of this building. Please see photographs below.

Figure 9 Swallow nests to the rafters of the barn section (below left and right)



10. 2 STABLES SECTION

Exterior

South elevation



This elevation contains five timber stable doors all of which are intact and well-sealed and three intact double-paned windows (1,25 m x 0.5 m) with reinforced wire internally, together with a single pane intact window (0.5 m²) to the eastern end and a further double paned window with glass missing but with wire mesh. The flet roof is largely intact.

It is fronted by a strip of hard standing 2(2 m wide x 16 m long) running the length of an overhang above which has no void. There is a kennel cage (3m x 2 m) attached to the eastern end. Adjacent to this elevation is the small paddock area. The barn section (to which this stable section was formerly attached), is situated 2 m to the west.

West elevation



This elevation is weatherboarded with a small (1 m x 0.25 m) double-paned window. It has thin intact barge boarding with no soffit.

East elevation



This elevation is weatherboard and contains a window as above. It is fronted by an area of hardstanding (1 m x 3 m).

North elevation



This elevation is weatherboarded with many gaps , especially to the central area and at lower levels with an opening (2 m x 1 m) to the extreme western end. providing potential bat access into the interior. The roof felting has deteriorated. This elevation is fronted by the meadowland to the north.

Interior

The building is divided into five stable sections. Each stable has a concrete floor base.

Stable one to the west is panelled to waist height to the north, south, and west with dividing panelling the east with flyover space above. There are gaps into the interior in the roof boarding along the ridge and open access at the base and through the open doorway.

Stable two to the west is boarded to waist height to the north and south and there are gaps to the base to the north and in the boarding of the roof. It has a fly through area above.

Stable three (central) is used as a timber store and is boarded as before. It contains old feed bags, kindling, and timber.

Stable four to the east houses an old mattress and is boarded to the north and south to waist height with fly through area above to the east and west. There is some bramble infestation to the north and the roof boards are exposed.

Stable five to the east is boarded to waist height with gaps to the floor and some of the weatherboarding and flythrough area above.

Figure 10. Interior of stable section. Top: gaps to internal ridge timbers (left) fly through areas above board divides (right). Bottom: Interior of stable used as log store (left), boarding and machine sawn timbers of empty stable (right).



10.3 CONCLUSION AND REQUIREMENTS OF THE SCOPING SURVEY

There was no evidence of bat species or breeding birds, other than swallow from this scoping survey.

The swallows within the barn building (if they return in the summer of 2023) must not be disturbed whilst breeding and ledging young. If works proceed between late February to September then stables should be re-checked for the presence of breeding birds by an EcoW beforehand.

The correct compensation for the loss of swallow nesting habitat must be installed and checked by an ECoW.

There was no evidence of any roosting site either in the present or recent past. No further surveys for bat or bird species are required for the current proposals to be undertaken within the law.

Whilst bat species are often found in such structures, given the amount of more suitable habitats immediately available within the locale, the stables building is not an important or useful habitat for bat species.

However, due to the potential roost suitability of the pantiles as a precaution the requirements below should be followed.

The client is advised to appraise themselves of the current legislation with respect to bat species which is précised within.

In the unlikely event that a bat is found during the proposed works all works must stop and advice from a suitably qualified and licenced ecologist should be sought.

The immediate site environs are very likely to support bat species; it is good roosting, foraging, and commuting habitat. Present proposals do not necessitate any removal or destruction of this potential bat roosting, commuting, or foraging habitat and care should be taken to ensure this predominantly unlit area continues to remain so both during and after works.

Breeding birds were observed within the sider site area within the trees and hedgerows, but all these are to remain.

11 APPENDICES

Regarding this site and the species likely to be present within it or within habitats linked to it, the following legislation and planning policies may apply. Below represents a summary only, it is the client's responsibility to ensure they are aware of the details of legislation and planning policy regarding this site.

11.1 LEGISLATION AND PLANNING POLICY

11.1.1 LEGISLATION

The Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019

Coming into force in accordance with regulation 1 The Secretary of State for the Environment, Food and Rural Affairs and Welsh Ministers have made changes to parts of the 2017 Regulations so that they operate effectively.

Most of these changes involved transferring functions from the European Commission to the appropriate authorities in England and Wales. All other processes or terms in the 2017 Regulations remain unchanged and existing guidance is still relevant.

The Conservation of Habitats and Species Regulations 2017

The Conservation of Habitats and Species Regulations 2017 came into force on 30th November 2017. The Regulations consolidate and update the Conservation of Habitats and Species Regulations 2010, which have been updated a total of 10 times since they were last consolidated in 2010. As such, the new set of Regulations seeks to improve clarity and accessibility to the legislation. On this site, this legislation may be particularly applicable for bat and bird species.

The Regulations make it an offence (subject to exceptions) to deliberately capture, kill, disturb, or trade in the animals listed in Schedule 2, or pick, collect, cut, uproot, destroy, or trade in the plants listed in Schedule 4. However, these actions can be made lawful through the granting of licenses by the appropriate authorities.

Licenses may be granted for several purposes (such as science and education, conservation, preserving public health and safety), but only after the appropriate authority is satisfied that there are no satisfactory alternatives and that such actions will have no detrimental effect on wild population of the species concerned.

It is a criminal offence, liable to prosecution, which could result in imprisonment or fine, if these regulations are contravened without one of the detailed defences outlined within the regulations.

With reference to this survey: It is an offence for anyone intentionally to kill, injure or handle a bat, to possess a bat (whether live or dead), disturb a roosting bat, or sell or offer a bat for sale without a licence. It is also an offence to damage, destroy or obstruct access to any place used by bats for shelter, whether they are present or not.

Please refer to the actual legislation for the precise wording, which can be found at:

http://www.legislation.gov.uk/uksi/2010/490/pdfs/uksi_20100490_en.pdf

Natural England SNCO full guidelines can be found at:

<https://www.gov.uk/protected-species-and-sites-how-to-review-planning-proposal>The Conservation of Habitats and Species Regulations 2017

The Wildlife and Countryside Act 1981 (as amended)

The Wildlife and Countryside Act protects wild birds, from being killed, injured or captured, and in addition, their nests and eggs are protected from being damaged, destroyed, or taken. Certain reptiles and amphibians also receive protection under this act.

Some breeding birds, (such as some of those recorded within the 2-km search radius for the site), receive additional protection through being listed on Schedule 1 of the Act, which also makes it an offence to intentionally or recklessly disturb this species whilst it is nest-building, is at or near a nest with eggs or young, or to disturb dependent young.

The Natural Environment and Rural Communities Act (2006)

Part III, (40): Duty to conserve biodiversity.

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.

Conserving biodiversity includes, in relation to a living organism or type of habitat, restoring or enhancing a population or habitat. Section 41 of The NERC Act lists all species which list of habitats and species that are of principal importance for the conservation of biodiversity in England. The list covers 56 habitats and 943 species and is based on the UK Biodiversity Action Plan (BAP) List of Priority Species and Habitats Action Plans (HAPs).

In addition to the above:

'The presence of a protected species is a material consideration when a planning authority is considering a development proposal (para 98, ODPM circular 06/2005). It is essential that the presence or otherwise of a 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'. (para 99, ODPM¹⁷ circular 06/2005).

Countryside and Rights of Way Act 2000

This act places a duty on Government Departments to have regard for the conservation of biodiversity and maintain lists of species and habitats for which conservation steps should be taken or promoted, in accordance with the Convention on Biological Diversity.

Schedule 9 of the Act amends SSSI provisions of the Wildlife and Countryside Act 1981, including provisions to change SSSIs and providing increased powers for their protection and management.

Schedule 12 of the Act amends the species provisions of the Wildlife and Countryside Act 1981, strengthening the legal protection for threatened species. The provisions make certain offences 'arrestable', create a new offence of reckless disturbance, confer greater powers to police and wildlife inspectors and enables heavier penalties on conviction of wildlife offences.

¹⁷ Office of the Deputy Prime Minister

Wild Mammals (Protection) Act 1996

This Act makes it an offence for any person to mutilate, kick, beat, nail or otherwise impale, stab, burn, stone, crush, drown, drag or asphyxiate any wild mammal with intent to inflict unnecessary suffering.

The Protection of Badgers Act 1992,

In England and Wales (the law is different in Scotland) it is an offence to:

Willfully kill, injure, or take a badger, (or attempt to do so), cruelly treat a badger, dig for a badger, intentionally or recklessly damage or destroy a badger sett or obstruct access to it, cause a dog to enter a badger sett, or disturb a badger when it is occupying a sett.

The Environment Act (2021)

This aims to improve air and water quality, protect wildlife, increase recycling and reduce plastic waste. The Act is part of a new legal framework for environmental protection, given the UK no longer comes under EU law post-Brexit. The Act contains provision for a new Office for Environmental Protection (OEP) watchdog and creates a framework for legally binding targets, such as to reduce particulate pollution. It gives people a greater say in the management of local street trees and enshrines in law the idea of biodiversity offsetting, and includes the mandating of biodiversity net gain in relation to development. Please see <https://www.legislation.gov.uk/ukpga/2021/30/enacte>

11.1.2 PLANNING POLICIES

Much of the pressure on biodiversity is related to development and land use. Consequently, the planning and development process has a fundamental role to play in controlling and relieving this pressure. Failure to address biodiversity issues may cause a planning application to be refused.

This important role for the planning system has been recognised in legislation and the Government's planning guidance. The principle is continued through the draft Regional Planning Guidance for the East of England to 2021 (RPG14) and applied at local level through development plans for Norfolk i.e. the relevant policies in the Mid Suffolk District Plan). Within the Local Government Act 2000 (Part 1, Section 2.1.c), local authorities are given powers to improve the environmental well-being of their area, of which biodiversity is a key element.

Restoration and enhancement may be necessary to rebuild what has been lost as well as maintain what we have at present. It is also important that monitoring post development is undertaken through the land-use planning system. The loss of biodiversity and the subsequent negative environmental impact runs contrary to the aims and objectives of sustainable development. In principle, sustainable development should not lead to a 'net loss' in biodiversity or natural resources.

National Planning Policy Framework (NPPF) July 2021

National Planning Policy Framework was published on 20 July 2021, this sets out the government's planning policies for England and how these are expected to be applied. Chapter 2 'Achieving sustainable development', members of the United Nations – including the United Kingdom – have agreed to pursue the 17 Global Goals for Sustainable Development in the period to 2030. Planning law requires that applications for planning permission must be determined in accordance with the development plan, unless material considerations indicate otherwise.

The National Planning Policy Framework must be considered in the preparation of local and neighbourhood plans and is a material consideration in planning decisions.

Planning policies and decisions must reflect and where appropriate promote relevant EU obligations and statutory requirements.

Policy Framework constitutes guidance for local planning authorities and decision-takers both in drawing up plans and as a material consideration in determining applications.

The NPPF covers a wide range of topics including housing, business, economic development, transport and the natural environment. The NPPF introduced the presumption in favour of sustainable development which means that development which is sustainable should be approved without delay. There are three pillars of sustainability (social, economic and environmental) and the Framework contains a number of sections which, taken as a whole, constitute the Government's view of what sustainable development means in practice.

The Natural Choice- securing the value of nature, Natural Environment White Paper (Implementation Update Report October 2014).

In 2011 this White Paper set out how the value of nature could be mainstreamed across our society. It set out 92 specific commitments for action. commitment 90 promised to “develop a set of key indicators...to track progress on the ambitions of this White Paper”. These are now in place and are entitled the England Natural Environment Indicators (ENEIs).

Of relevance to proposed development in communities are commitments 4-7' Local Nature Partnerships', Commitments 8-13 'Nature Improvement Areas', Commitment 14 'Protecting Natural Value Through the Planning System' Commitment 15 'Offsetting the Impact of Development on Biodiversity' Commitments 20-22 'Protecting and improving our woodland and forests' (Commitments and commitments 23-24 'Diverse and living landscapes'.

11.2 Phase I Map

Land at kiln Farm, Chimers Lane, Hoo, Woodbridge, Suffolk, IP13 7QF Survey date: 27/02/2023 NGR: TM 24178 57622.

Do not scale from this drawing. To be used in conjunction with architect's plans. Phase I Map.



11.3 Target Notes

The site has two Target Notes.

1. The pond to the southeast will require testing for the presence/absence of GCN prior to any works. This is to inform the client as to the likely presence or absence of a protected species prior to any excavations which may impact upon this species if present.
2. If works proceed between late February and September the stables should be re-checked for the presence/absence of breeding birds prior to commencement. At the correct opportunity the EcoW should ensure that alternative swallow nesting has been provided. Please see below.

11.4 SWALLOW COMPENSATION

MITIGATION FOR SWALLOWS

Swallows are country birds nesting in barns, stables or even garages. They build an open nest, usually on rafters. Erect suitable artificial nests and you may well attract them into adjacent or new buildings before the barns are developed.

The natural nests of both species often fall down during spells of dry weather. This doesn't happen with artificial nests so if you provide them with nest boxes you will be helping a remarkable species that is under increasing pressure in the 21st century.

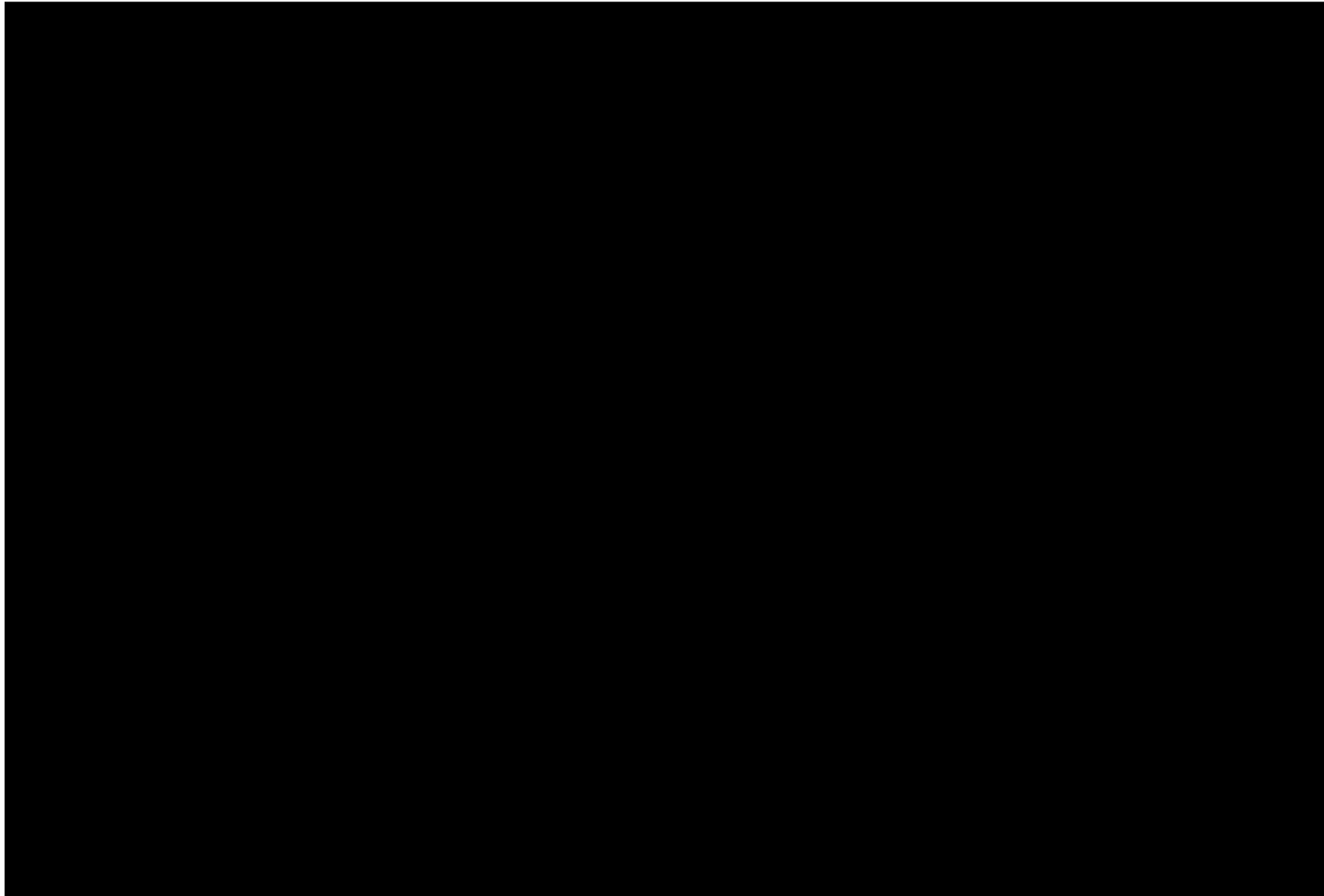


Nest cups can be placed at anytime when the swallows are present. By late July or early August, it is too late for swallows to begin a second or third brood, but young unmated birds may check out new sites during summer and return to them the following year. It is not uncommon for a few swallows to begin a nest or add mud to an artificial nest cup near the end of the breeding season.

Emptying Nest Cups

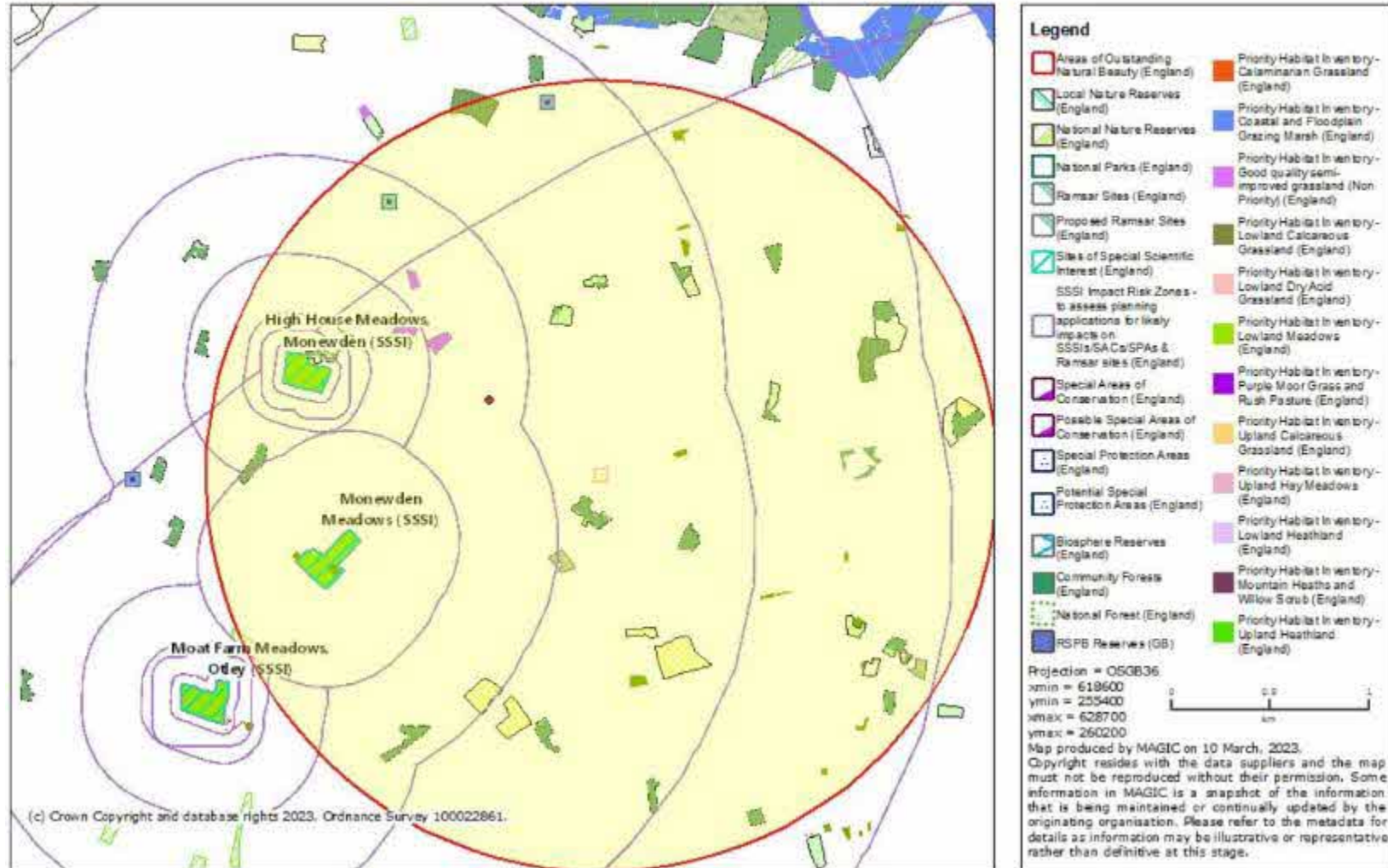
Emptying the nest cup as soon as the first brood fledge will likely increase the chances of its immediate reuse for a second brood. Empty nests are rather frequently visited by adults, so it is quite likely that the cleaned nest will be accepted by a pair for the second brood. Interestingly, this also almost assures that the emptied nest will be reused by one or more of the visiting adults or by one of the fledglings returning to roost there one more night.

11.5 SBIS PROTECTED SPECIES & SITES DATA MAP (2 KM)



MAGIC

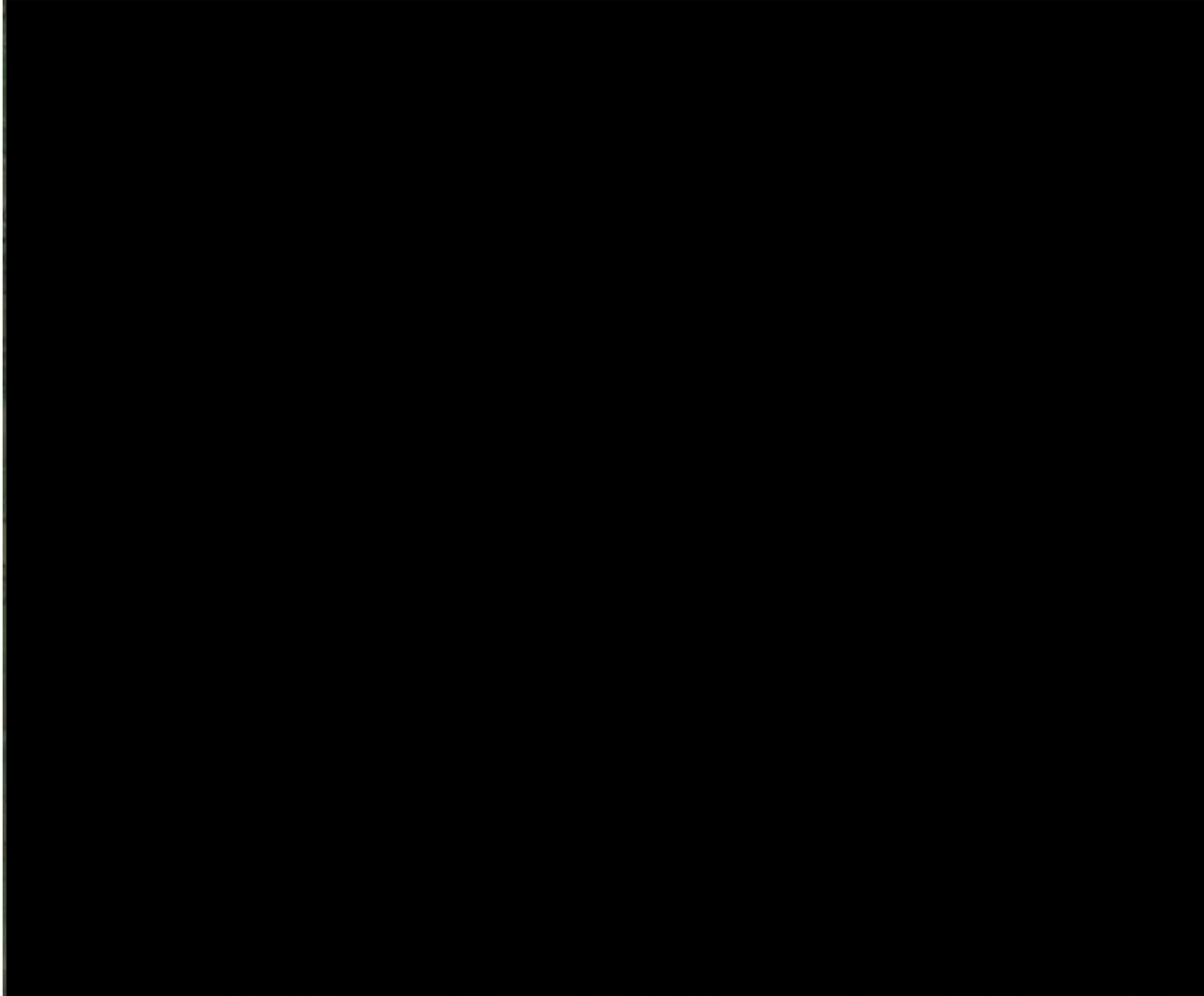
Kiln Farm 2 km search radius



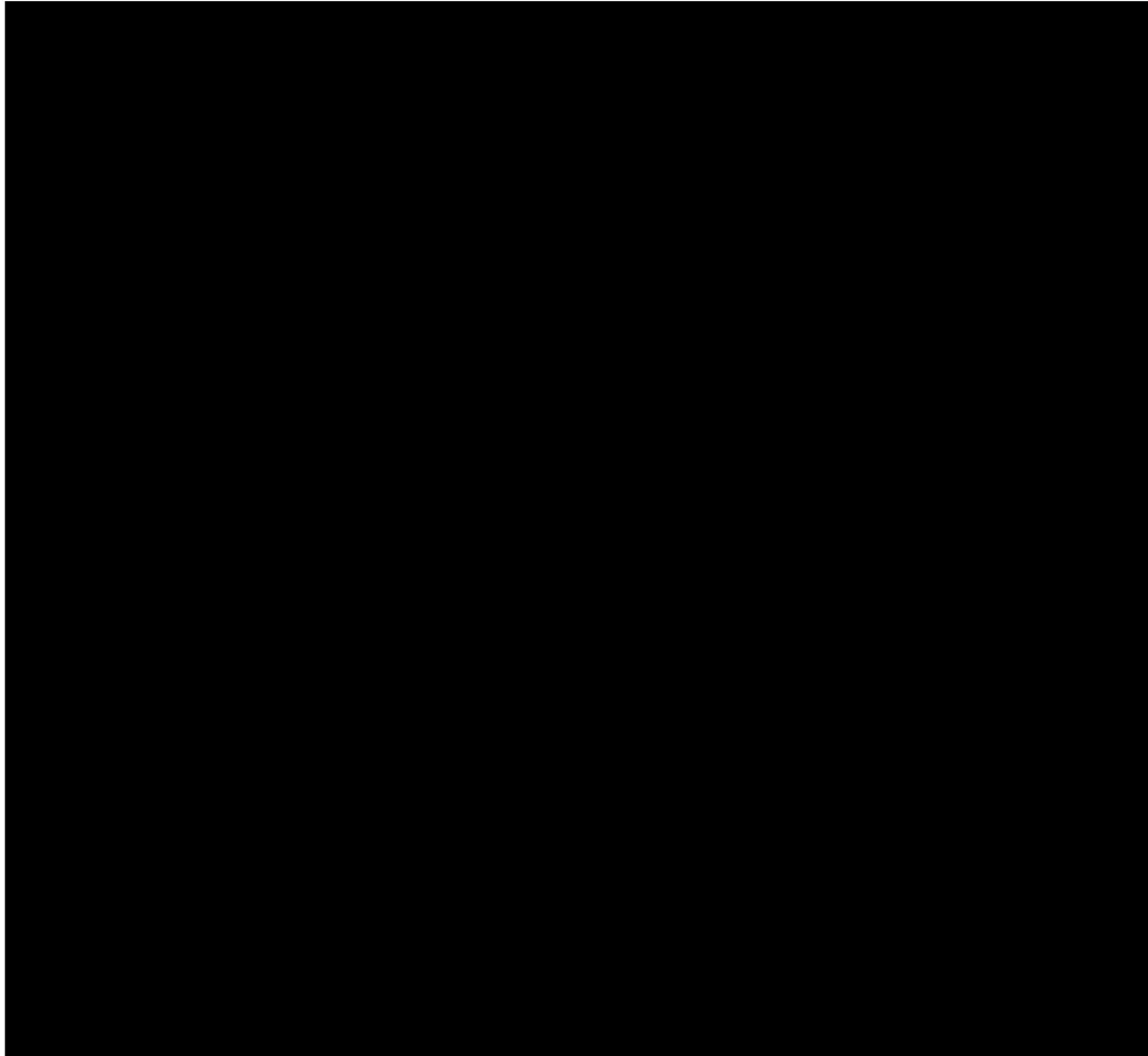
11.7 SPECIES RECORDS

11.7. 1 ALL RECORDS

QGIS generated map showing approximate locations of all protected species records (below) and those closest to the site (next page). The centre of the surveyed site is marked by a red asterisk.



11.7.2 CLOSEST RECORDS TO SITE (SBIS)



11.8 DESIGNATIONS KEY

	Abbreviated Designation	Full designation	Description
International	Bern1	Bern Convention Appendix 1	Special protection ('appropriate and necessary legislative and administrative measures') for the plant taxa listed, including prohibition of deliberate picking, collecting, cutting, uprooting and, as appropriate, possession or sale.
International	Bern2	Bern Convention Appendix 2	Special protection ('appropriate and necessary legislative and administrative measures') for the animal taxa listed, including all forms of deliberate capture and keeping and deliberate killing; the deliberate damage to or destruction of breeding or resting place
International	Bern3	Bern Convention Appendix 3	Special protection through 'appropriate and necessary legislative and administrative measures', of the listed wild fauna species.
International	BD1	Birds Directive Annex 1	Birds which are the subject of special conservation measures concerning their habitat in order to ensure their survival and reproduction in their area of distribution. As appropriate, Special Protection Areas to be established to assist conservation measures.
International	BD2.1	Birds Directive Annex 2.1	Birds which may potentially be hunted under national legislation within the geographical land and sea area to which the Directive applies. (Note that some species are protected by the national legislation of some Member States although hunting would potentially be a separate issue).
International	BD2.2	Birds Directive Annex 2.2	Birds which may potentially be hunted under national legislation only within certain specified Member States. (Note that some species are protected by the national legislation of some Member States although hunting would potentially be legal under the Dir
International	BD3.1	Birds Directive Annex 3.1	Birds (or parts / derivatives of) which may be sold, kept for sale or transported for sale provided they have been legally killed, captured or otherwise legally acquired (see Article 6.1).
International	BD3.2	Birds Directive Annex 3.2	Birds (or parts / derivatives of) which may be sold, kept for sale or transported for sale provided they have been legally killed, captured or otherwise legally acquired provided authorisation has been granted by the relevant Member State (see Article 6.2
International	BD3.3	Birds Directive Annex 3.3	Birds which, in 1979, the European Commission were charged under Article 6.4 with carrying out studies to assess the biological status of and the effects of marketing on such status. (Note this Annex is no longer operative, these studies having now been u
International	CMS_A1	Convention on Migratory Species, Appendix 1	Endangered migratory species in danger of extinction throughout all or a significant portion of their range, and for which Range States are obliged to prohibit taking and to take protective measures to conserve. (Note that taking may be permitted in some
International	CMS_A2	Convention on Migratory Species, Appendix 2	Migratory species having an unfavourable conservation status for which Range States are encouraged to conclude international agreements for their benefit.
International	CMS_AEWA-A2	Convention on Migratory Species, African-Eurasian Waterbirds	Conservation of migratory waterbirds, giving special attention to endangered species as well as to those with an unfavourable conservation status.

		Agreement - Annex II	
International	CMS_ASCOBANS	Convention on Migratory Species, Small Cetaceans Agreement, Baltic, NE.Atlantic, Irish, N Seas	Conservation of small cetacean species to achieve favourable conservation status, conscious that the management of threats to their existence, such as bycatch, habitat deterioration and other anthropogenic disturbance, requires concerted and coordinated r
International	CMS_EUROBATS-A1	Convention on Migratory Species, EUROBATS - Annex I	Protection and enhancement of species populations through legislation, education, conservation measures and international co-operation.
International	CITESA	EC CITES Annex A	All CITES Appendix I species. Some CITES Appendix II and III species, for which the EU has adopted stricter domestic measures. Some non-CITES species.
International	CITESB	EC CITES Annex B	All other CITES Appendix II species not listed in Annex A. Some CITES Appendix III species. Some non-CITES species.
International	CITESC	EC CITES Annex C	All other CITES Appendix III species not listed in Annex A or Annex B.
International	CITESD	EC CITES Annex D	Some CITES Appendix III species for which the EU holds a reservation (CITES reservations - English, French, Spanish). Some non-CITES species.
International	HSD2np	Habitats Directive Annex 2 - priority species	Species which are endangered, the conservation of which the Community has a particular responsibility in view of the proportion of their natural range which falls within the territory of the Community. They require the designation of special areas of cons
International	HSD2p	Habitats Directive Annex 2 - non-priority species	Animal and plant species of Community interest (i.e. endangered, vulnerable, rare or endemic in the European Community) whose conservation requires the designation of special areas of conservation. Note that the contents of this annex have been updated in
International	HSD4	Habitats Directive Annex 4	Animal and plant species of Community interest (i.e. endangered, vulnerable, rare or endemic in the European Community) in need of strict protection. They are protected from killing, disturbance or the destruction of them or their habitat. Note that the c
International	HSD5	Habitats Directive Annex 5	Animal and plant species of Community interest whose taking in the wild and exploitation may be subject to management measures.
International	OSPAR	OSPAR Convention	OSPAR Convention for the Protection of the Marine Environment of the North-East Atlantic. OSPAR List of Threatened and/or Declining Species and Habitats.
Nat Legislation	PBA	Protection of Badgers Act 1992	An Act to consolidate the Badgers Act 1973, the Badgers Act 1991 and the Badgers (Further Protection) Act 1991. Prohibits the wilful injuring, killing or taking of badgers, except as permitted by or under the Act.
Nat Legislation	Sect.41	Natural Environment and Rural Communities Act 2006 - Species of Principal Importance in England (sec	Species "of principal importance for the purpose of conserving biodiversity" covered under section 41 (England) of the NERC Act (2006) and therefore need to be taken into consideration by a public body when performing any of its functions with a view to c
Nat Legislation	HabRegs2	The Conservation (Natural Habitats, &c.) Regulations 2010 (Schedule 2)	Schedule 2- European protected species of animals.
Nat Legislation	HabRegs4	The Conservation (Natural Habitats, &c.) Regulations 2010 (Schedule 4)	Schedule 4- Animals which may not be taken or killed in certain ways

Nat Legislation	HabRegs5	The Conservation (Natural Habitats, &c.) Regulations 2010 (Schedule 5)	Schedule 5- European protected species of plants.
Nat Legislation	ScotBL	Scottish Biodiversity List of species of principal importance for biodiversity conservation	The Scottish Biodiversity List is a list of flora, fauna and habitats considered by the Scottish Ministers to be of principal importance for biodiversity conservation. The development of the list has been a collaborative effort involving a great many stakeholders.
Nat Legislation	WO1i	The Wildlife (Northern Ireland) Order 1985 (Schedule 1 Part 1)	Birds which are protected by special penalties at all times.
Nat Legislation	WO1ii	The Wildlife (Northern Ireland) Order 1985 (Schedule 1 Part 2)	Birds which are protected by special penalties during the close season.
Nat Legislation	WO2i	The Wildlife (Northern Ireland) Order 1985 (Schedule 2 Part 1)	Birds which may be killed or taken outside the close season.
Nat Legislation	WO2ii	The Wildlife (Northern Ireland) Order 1985 (Schedule 2 Part 2)	Birds which may be killed or taken by authorised persons at all times. This has now been deleted and no longer applies: the provision of this part is covered by General Licences issued annually.
Nat Legislation	WO3	The Wildlife (Northern Ireland) Order 1985 (Schedule 3)	Birds which may be sold dead at all times.
Nat Legislation	WO4	The Wildlife (Northern Ireland) Order 1985 (Schedule 4)	Birds which may be shown for competitive purposes.
Nat Legislation	WO5	The Wildlife (Northern Ireland) Order 1985 (Schedule 5)	Animals which are protected at all times.
Nat Legislation	WO6	The Wildlife (Northern Ireland) Order 1985 (Schedule 6)	Animals which may not be killed or taken by certain methods.
Nat Legislation	WO7	The Wildlife (Northern Ireland) Order 1985 (Schedule 7)	Animals which may be sold alive or dead at any time.
Nat Legislation	WO8i	The Wildlife (Northern Ireland) Order 1985 (Schedule 8 - Part 1)	Plants which are protected from intentional picking, removal or destruction and from selling (in whole or part) and from advertising for sale.
Nat Legislation	WO8ii	The Wildlife (Northern Ireland) Order 1985 (Schedule 8 - Part 2)	Plants which may not be sold.
Nat Legislation	WO9i	The Wildlife (Northern Ireland) Order 1985 (Schedule 9 - Part 1)	Animals which established in the wild but may not be released from captivity.
Nat Legislation	WO9ii	The Wildlife (Northern Ireland) Order 1985 (Schedule 9 - Part 2)	Plants which may not be caused to grow in the wild.
Nat Legislation	WCA1i	Wildlife and Countryside Act 1981 (Schedule 1 Part 1)	Birds which are protected by special penalties at all times.
Nat Legislation	WCA1ii	Wildlife and Countryside Act 1981 (Schedule 1 Part 2)	Birds which are protected by special penalties during the close season.

Nat Legislation	WCA2i	Wildlife and Countryside Act 1981 (Schedule 2 Part 1)	Birds which may be killed or taken outside the close season.
Nat Legislation	WCA2ii	Wildlife and Countryside Act 1981 (Schedule 2 Part 2)	Birds which may be killed or taken by authorised persons at all times.
Nat Legislation	WCA3i	Wildlife and Countryside Act 1981 (Schedule 3 Part 1)	Birds which may be sold alive at all times if ringed and bred in captivity.
Nat Legislation	WCA3ii	Wildlife and Countryside Act 1981 (Schedule 3 Part 2)	Birds which may be sold dead at all times.
Nat Legislation	WCA3iii	Wildlife and Countryside Act 1981 (Schedule 3 Part 3)	Birds which may be sold dead from 1st September to 28th February.
Nat Legislation	WCA4	Wildlife and Countryside Act 1981 (Schedule 4)	Birds which must be registered and ringed if kept in captivity.
Nat Legislation	WCA5/9.1(kill/injuring)	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.1 (killing/injuring))	Section 9.1. Animals which are protected from intentional killing or injuring.
Nat Legislation	WCA5/9.1(taking)	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.1 (taking))	Section 9.1 Animals which are protected from taking.
Nat Legislation	WCA5/9.2	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.2)	Section 9.2 Animals which are protected from being possessed or controlled (live or dead).
Nat Legislation	WCA5/9.4a	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.4a)	Section 9.4 Animals which are protected from intentional damage or destruction to any structure or place used for shelter or protection.
Nat Legislation	WCA5/9.4b	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.4b)	Section 9.4 Animals which are protected from intentional disturbance while occupying a structure or place used for shelter or protection.
Nat Legislation	WCA5/9.5a	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.5a)	Section 9.5 Animals which are protected from being sold, offered for sale or being held or transported for sale either live or dead, whole or part.
Nat Legislation	WCA5/9.5b	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.5b)	Section 9.5 Animals which are protected from being published or advertised as being for sale.
Nat Legislation	WCA5/9.4A*	Wildlife and Countryside Act 1981 (Schedule 5)	Ceteaca/basking shark that are not allowed to be intentionally or recklessly disturbed.
Nat Legislation	WCA5/9.4c	Wildlife and Countryside Act 1981 (Schedule 5)	Animals which are protected from their access to any structure or place which they use for shelter or protection being obstructed.
Nat Legislation	WCA6	Wildlife and Countryside Act 1981 (Schedule 6)	Animals which may not be killed or taken by certain methods.
Nat Legislation	WCA8	Wildlife and Countryside Act 1981 (Schedule 8)	Plants which are protected from intentional picking, uprooting or destruction (Section 13 1a); selling, offering for sale, possessing or transporting for the purpose of sale (live or dead, part or derivative)

			(Section 13 2a); advertising (any of these) fo
Nat Legislation	WCA9i	Wildlife and Countryside Act 1981 (Schedule 9 Part 1)	Animals which may not be released or allowed to escape into the wild.
Nat Legislation	WCA9ii	Wildlife and Countryside Act 1981 (Schedule 9 Part 2)	Plants which may not be planted or caused to grow in the wild.
Nat Legislation	Sect.42	Natural Environment and Rural Communities Act 2006 - Species of Principal Importance in Wales (secti	Species "of principal importance for the purpose of conserving biodiversity" covered under Section 42 (Wales) of the NERC Act (2006) and therefore need to be taken into consideration by a public body when performing any of its functions with a view to con
New NBIS List	Breck_Special	Breckland Specialists	Species identified as Breckland specialits by the Breckland Biodiversity audit 2010
New NBIS List	NRPI	Norfolk Rare Plants	Norfolk rare plants as identified by BSBI County recorder Bob Ellis
Other rare/scarce	FEP1	Farm Environment Plan Guidance 001	Species is listed in the DEFRA document 'Environmental Stewardship Farm Environment Plan Guidance 001: Hedgerow Woody Species (from Schedule 3 of Hedgerow Regulations 1997)'.
Other rare/scarce	FEP7/2	Farm Environment Plan Guidance 007- Table 2	Species is listed in 'Table 2: Farm Environment Plan Species to be recorded in Part 2 of the FEP' of the DEFRA document 'Environmental Stewardship Farm Environment Plan Guidance 007: Plant & animal species in the Farm Environment Plan (FEP)'.
Other rare/scarce	FEP7/3	Farm Environment Plan Guidance 007- Table 3	Species is listed in 'Table 3: High Value Arable Margin Indicator Species' of the DEFRA document 'Environmental Stewardship Farm Environment Plan Guidance 007: Plant & animal species in the Farm Environment Plan (FEP)'.
Other rare/scarce	NRMAR	Nationally rare marine species	Species which occur in eight or fewer 10km X 10km grid squares containing sea (or water of marine saline influence) within the three mile territorial limit.
Other rare/scarce	NSMAR	Nationally scarce marine species	Species which occur in nine to 55 10km X 10km grid squares containing sea (or water of marine saline influence) within the three mile territorial limit.
Other rare/scarce	N	Nationally Notable	Species which are estimated to occur within the range of 16 to 100 10km squares. (subdivision into Notable A and Notable B is not always possible because there may be insufficient information available). Superseded by Nationally Scarce, and therefore no I
Other rare/scarce	NA	Nationally Notable A	Taxa which do not fall within RDB categories but which are none-the-less uncommon in Great Britain and thought to occur in 30 or fewer 10km squares of the National Grid or, for less well-recorded groups, within seven or fewer vice-counties. Superseded by
Other rare/scarce	NB	Nationally Notable B	Taxa which do not fall within RDB categories but which are none-the-less uncommon in Great Britain and thought to occur in between 31 and 100 10km squares of the National Grid or, for less-well recorded groups between eight and twenty vice-counties. Super
Other rare/scarce	NR-excludes	Nationally rare. Excludes Red Listed taxa	Occurring in 15 or fewer hectads in Great Britain. Excludes rare species qualifying under the main IUCN criteria.

Other rare/scarce	NS-excludes	Nationally scarce. Excludes Red Listed taxa	Occurring in 15 or fewer hectads in Great Britain. Excludes rare species qualifying under the main IUCN criteria.
Red Data List	BAmb	Bird Population Status - amber	Amber list species are those with an unfavourable conservation status in Europe; those whose population or range has declined moderately in recent years; those whose population has declined historically but made a substantial recent recovery; rare breeder
Red Data List	BRed	Bird Population Status - red	Red list species are those that are Globally Threatened according to IUCN criteria; those whose population or range has declined rapidly in recent years; and those that have declined historically and not shown a substantial recent recovery.
Red Data List	RLGB.CR	IUCN (2001) - Critically endangered	A taxon is Critically Endangered when it is facing an extremely high risk of extinction in the wild in the immediate future, as defined by any of the criteria A to E.
Red Data List	RLGB.DD	IUCN (2001) - Data Deficient	A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known
Red Data List	RLGB.EN	IUCN (2001) - Endangered	A taxon is Endangered when it is not Critically endangered but is facing a very high risk of extinction in the wild in the near future.
Red Data List	RLGB.EW	IUCN (2001) - Extinct in the wild	A taxon is Extinct in the wild in Great Britain when it is known to survive only in cultivation, in captivity or as a naturalised population (or populations) well outside the past range. A taxon is presumed extinct in the wild when exhaustive surveys in k
Red Data List	RLGB.EX	IUCN (2001) - Extinct	A taxon is Extinct in Great Britain when there is no reasonable doubt that the last individual in Great Britain has died. A taxon is presumed extinct when exhaustive surveys in known and/or expected habitat, at appropriate times (diurnal, seasonal, annual
Red Data List	RLGB.NT	IUCN (2001) - Lower risk - near threatened	Taxa which do not qualify for Lower Risk (conservation dependent), but which are close to qualifying for Vulnerable. In Britain, this category includes species which occur in 15 or fewer hectads but do not qualify as Critically Endangered, Endangered or V
Red Data List	RLGB.RE	IUCN (2001) - Regionally Extinct	Category for a taxon when there is no reasonable doubt that the last individual potentially capable of reproduction within the region has died or has disappeared from the wild in the region, or when, if it is a former visiting taxon, the last individual ha
Red Data List	RLGB.VU	IUCN (2001) - Vulnerable	A taxon is Vulnerable when it is not Critically Endangered or Endangered but is facing a high risk of extinction in the wild in the medium term future.
Red Data List	RLGB.CR	IUCN (1994) - Critically endangered	A taxon is Critically Endangered when it is facing an extremely high risk of extinction in the wild in the immediate future, as defined by any of the criteria A to E.
Red Data List	RLGB.DD	IUCN (1994) - Data Deficient	A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known
Red Data List	RLGB.EN	IUCN (1994) - Endangered	A taxon is Endangered when it is not Critically endangered but is facing a very high risk of extinction in the wild in the near future.

Red Data List	RLGB.EX	IUCN (1994) - Extinct	Taxa which are no longer known to exist in the wild after repeated searches of their localities and other known likely places. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
Red Data List	RLGB.Lr(NT)	IUCN (1994) - Lower risk - near threatened	Taxa which do not qualify for Lower Risk (conservation dependent), but which are close to qualifying for Vulnerable. In Britain, this category includes species which occur in 15 or fewer hectads but do not qualify as Critically Endangered, Endangered or V
Red Data List	RLGB.VU	IUCN (1994) - Vulnerable	A taxon is Vulnerable when it is not Critically Endangered or Endangered but is facing a high risk of extinction in the wild in the medium term future.
Red Data List	RDBGB.EN	IUCN (pre 1994) - Endangered	Taxa in danger of extinction and whose survival is unlikely if the causal factors continue operating. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
Red Data List	RDBGB.EX	IUCN (pre 1994) - Extinct	Taxa which are no longer known to exist in the wild after repeated searches of their localities and other known likely places. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
Red Data List	RDBGB.Inde	RDB - Indeterm	Taxa not seen since 1970 but require further survey before they can be declared extinct known to be Extinct, Endangered, Vulnerable or Rare, but where there is not enough information to say which of these categories is appropriate. Superseded by new IUCN c
Red Data List	RDBGB.Insu	RDB - Insuff known	Taxa that are suspected but not definitely known to belong to any of the above categories (i.e. Endangered, Vulnerable, Rare), because of the lack of information. Superseded by new IUCN categories in 1994, so no longer in use.
Red Data List	RDBGB.R	IUCN (pre 1994) - Rare	Taxa with small populations that are not at present Endangered or Vulnerable, but are at risk. (In GB, this was interpreted as species which exist in fifteen or fewer 10km squares). Superseded by new IUCN categories in 1994, but still applicable to lists
Red Data List	RDBGB.Thre	RDB - Threatened endemic	Taxa which are not known to occur naturally outside Britain. Taxa within this category may also be in any of the other RDB categories or not threatened at all.
Red Data List	RDBGB.VU	IUCN (pre 1994) - Vulnerable	Taxa believed likely to move into the Endangered category in the near future if the causal factors continue operating. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
Red Data List	RLGLB.CR	IUCN (2001) - Critically endangered	A taxon is Critically Endangered when the best available evidence indicates that it meets any of the criteria A to E for Critically Endangered (see Section V), and it is therefore considered to be facing an extremely high risk of extinction in the wild.
Red Data List	RLGLB.EN	IUCN (2001) - Endangered	A taxon is Endangered when the best available evidence indicates that it meets any of the criteria A to E for Endangered (see Section V), and it is therefore considered to be facing a very high risk of extinction in the wild.
Red Data List	RLGLB.VU	IUCN (2001) - Vulnerable	A taxon is Vulnerable when the best available evidence indicates that it meets any of the criteria A to E for Vulnerable (see Section V), and it is therefore considered to be facing a high risk of extinction in the wild.

Red Data List	RLGLB.DD	IUCN (2001) - Data Deficient	A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known
Red Data List	RLGLB.EX	IUCN (2001) - Extinct	A taxon is Extinct when there is no reasonable doubt that the last individual has died. A taxon is presumed Extinct when exhaustive surveys in known and/or expected habitat, at appropriate times (diurnal, seasonal, annual), throughout its historic range h
Red Data List	RLGLB.NT	IUCN (2001) - Lower risk - near threatened	A taxon is Near Threatened when it has been evaluated against the criteria but does not qualify for Critically Endangered, Endangered or Vulnerable now, but is close to qualifying for or is likely to qualify for a threatened category in the near future.
Red Data List	RLGLB.CR	IUCN (1994) - Critically endangered	A taxon is Critically Endangered when it is facing an extremely high risk of extinction in the wild in the immediate future, as defined by any of the criteria A to E.
Red Data List	RLGLB.DD	IUCN (1994) - Data Deficient	A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known
Red Data List	RLGLB.EN	IUCN (1994) - Endangered	Taxa in danger of extinction and whose survival is unlikely if the causal factors continue operating. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
Red Data List	RLGLB.LR(cd)	IUCN (1994) - Lower risk - conservation dependent	Taxa which are the focus of a continuing taxon-specific or habitat-specific conservation programme targeted towards the taxon in question, the cessation of which would result in the taxon qualifying for one of the threatened categories above within a peri
Red Data List	RLGLB.NT	IUCN (1994) - Lower risk - near threatened	Taxa which do not qualify for Lower Risk (conservation dependent), but which are close to qualifying for Vulnerable. In Britain, this category includes species which occur in 15 or fewer hectads but do not qualify as Critically Endangered, Endangered or V
Red Data List	RLGLB.VU	IUCN (1994) - Vulnerable	Taxa believed likely to move into the Endangered category in the near future if the causal factors continue operating. Superseded by new IUCN categories in 1994, but still applicable to lists that have not been reviewed since 1994.
UK BAP	UKBAP	UK Biodiversity Action Plan priority species	The UK List of Priority Species and Habitats contains 1150 species and 65 habitats that have been listed as priorities for conservation action under the UK Biodiversity Action Plan (UK BAP).

REPORT ENDS