



Preliminary Ecological Appraisal and Bat Emergence and Re-entry Surveys

Far End, Chalkdock Lane, Itchenor, West Sussex PO20 7DE

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Executive summary

Arbtech were commissioned by Caroline Bark to undertake a Preliminary Ecological Appraisal and bat emergence and re-entry surveys at Far End, Chalkdock Lane, Itchenor, West Sussex PO20 7DE. The surveys were completed on 22nd August, 2nd September and 17th September 2020. The aim of the assessment was to confirm the presence/likely absence of a bat roost and to provide a current status on all survey features. This includes providing evidence for species, numbers and levels of activity, to identify any entrance and egress points, and to gain an understanding of the activity of bats using the site in the local landscape.

The development proposals are for extensions and alterations to the building. A planning application will be submitted to Chichester District Council.

Recommendations

Ref	Survey conclusions	Recommendations / Mitigation
B1	<p>The building contains a historic maternity roost of common or soprano pipistrelles (species to be confirmed following DNA analysis) a day roost of common pipistrelle (x1), a day roost of soprano pipistrelles (x2) and a serotine transitional roost probably used early on in the year (droppings will also be sent for DNA analysis to confirm species). The assessment of a historic maternity roost of pipistrelle species has been determined based on the large accumulation of droppings within the loft, without any emergences or re-entries from this location.</p>	<p>The removal of the roof and hanging tiles will need to be permitted by a European protected species mitigation licence which can be obtained once planning consent is granted and the works are starting within 3 months.</p> <p>Under licence - Three species and roost type appropriate bat boxes will be installed on trees on site prior to the start of the work and then ecological supervision of the removal of all hanging tiles and roof structures. Any bats found will be moved by hand by the ecologist into the appropriate bat box. In the newly refurbished building, replacement roosting provision will be provided in the form of at least four integrated bat boxes. Full specifications will be detailed in the licence method statement and figures.</p> <p>To inform the licence, bat records from within a 2km radius of the site will need to be obtained from Sussex Biodiversity Records Centre and the bat droppings samples will be sent for DNA analysis.</p> <p>Low impact lighting strategies will be adopted from the guidance outlined in the new Bats and Lighting Publication produced by the Institution of Lighting Professionals and the Bat Conservation Trust "Guidance Note 08/18 Bats and artificial lighting in the UK Bats and the Built Environment series publication:http://www.bats.org.uk/news.php/406/new_guidance_on_bats_and_lighting. The lighting on the site will:</p> <ul style="list-style-type: none"> • Use narrow spectrum light sources to lower the range of species affected by lighting • Use light sources that emit minimal ultra-violet light • Avoid white and blue wavelengths of the light spectrum to reduce insect attraction and where white light sources are required in order to manage the blue shortwave length content they should be of a warm / neutral colour temperature <4,200 kelvin. • Not use bare bulbs and any light pointing upwards. The spread of light will be kept in line with or below the horizontal.

		<p>Light spill will be reduced via the use of low level lighting used in conjunction with hoods, cowls, louvers and shields. Lights will also be directional to ensure that light is directed to the intended areas only.</p> <p>External lighting will be on PIR sensors that are sensitive to large objects only (so that they are not triggered by passing bats) and will be set to the shortest time duration to reduce the amount of time the lights are on.</p> <p>Wall lights and security lights will be 'dimmable' and set to the lowest light intensity settings. There are several products on the market that allow the control of the light intensity and the duration that the lights are on. All lighting on the developed site will make use of the most up to date technology available.</p>
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1.0 Introduction and Context

1.1 Background

Arbtech were commissioned by Caroline Bark to undertake a Preliminary Ecological Appraisal and bat emergence and re-entry surveys at Far End, Chalkdock Lane, Itchenor, West Sussex PO20 7DE. The surveys were completed on 22nd August, 2nd September and 17th September 2020. The assessment is informed by the Bat Conservation Trust publication *Bat Surveys for Professional Ecologists – Good Practice Guidelines* (Collins, J. (Ed) 2016).

1.2 Site Context

The site is located at National Grid Reference SU 7997 0028 and has an area of approximately 0.12ha.

1.3 Scope of the report

This report provides a description of the bat activity observed and recorded during each survey. The aim of the assessment was to characterise any roosts present including species, number of individuals, number and location of roost access points, and to gain an understanding of how bats use the site.

Robust data has been collected, following good practice guidelines, to inform an assessment of the potential impacts of the proposed development on bats, and inform mitigation and enhancements. This report provides information on constraints to the proposals as a result of roosting bats, and summarises any mitigation required to achieve planning permission, and statutory consent to comply with wildlife legislation.

To achieve the aims of the assessment, the following steps have been taken:

- A desk study has been carried out, including a request for information from the local bat group or records centre
- Field survey(s) has been undertaken, including an external survey and internal inspection.
- An outline of likely impacts on any known roosts has been provided, based on current development proposals.
- Recommendations for further survey and assessment have been made, along with advice on the requirements of a European protected species mitigation licence (EPSML) application if appropriate.

A survey plan is presented in Appendix 1 showing the location of each surveyor and the bat activity observed and recorded during each survey, proposed plans in Appendix 2 (where available), desk study results are provided in Appendix 3, and a summary of relevant legislation is presented in Appendix 4.

1.4 Project Description

The development proposals are for extensions and alterations to the building. A planning application will be submitted to Chichester District Council.

2.0 Methodology

2.1 Desk Study methodology

The desk study included a 2km radius review of statutory and non-statutory designated sites, Biodiversity Action Plan (BAP) Priority Habitats and granted EPSML records for bats held on Magic database. An assessment of the surrounding landscape structure was also completed using aerial images from Google Earth and OS maps.

Existing bat records relating to the site and a surrounding 2km radius are required to conform to national guidelines. The data search is confidential information that is not suitable for public release and has been analysed and summarised in Appendix 3 of this report.

2.2 Site Survey methodology

The surveys involved surveyors positioned around the buildings ensuring that all elevations and roof sections with suitable roosting features could be clearly observed. Particular attention was paid to the areas of the buildings identified as providing suitable access points to bat roosts. The location of each surveyor during each survey is shown in Appendix 1. Each surveyor was assigned an area of the building to observe for the duration of the survey. Surveyors used heterodyne and frequency division bat detectors, and Wildlife Acoustics EM3+ and Echo Meter Touch detectors connected to iPads. Bat echolocation calls recorded during the surveys were analysed using Wildlife Acoustics sound analysis software Kaleidoscope V3.1.7 when required. The Echo Meter Touch includes an auto ID function for bat species, however this is not 100% accurate and further post-survey sound analysis is often required to confirm species that could not be identified by the auto ID software during the survey. Surveyors also used head torches, survey record sheets and pens/pencils for recording all activity observed during the surveys. Each surveyor was also provided with a handheld radio for communication between surveyors to assist with confirming ambiguous bat activity e.g. a bat emergence or a bat passing over the building.

In accordance with the latest bat survey guidelines (Collins, J. 2016) dusk emergence surveys commenced 15 minutes before sunset and continued for 1½ - 2 hours after sunset – depending upon bat activity and surveyor visibility. Dawn re-entry surveys commenced 2 hours before sunrise and continued until 15 minutes after sunrise.

Surveys were completed during optimal weather conditions i.e. when temperatures were above 10°C, with no rain or strong winds, as these adverse weather conditions can impact upon bat emergence and foraging behaviour.

2.3 Surveyors

The lead surveyor is Natalie Evans, (Natural England Bat Licence Number: 2018-37888-CLS-CLS) and was assisted by experienced surveyors with several years of bat survey experience. Four surveyors were used to provide sufficient cover of the building during each survey. The designated position of each surveyor during each survey is detailed in the tables in Section 3.1 below and shown on the plan in Appendix 1.

2.4 Limitations

These surveys follow best practice guidance to confirm presence/likely absence of roosting bats and where present, characterise the roost. However, this information is collected at finite dates and times, and provides an indication of the conditions on site only. The use of the buildings and the site as a whole by bats, at all times cannot be established based on this information.

3.0 Results and Evaluation

3.1 Survey Results

B1 Exterior

B1 – southern elevations

B1 is a detached dwelling of brick construction with a gabled, concrete tiled roof. There are two brick chimney stacks. The eaves are timber and overhanging in some places and timber soffit boxes present in others, and window and door frames are plastic. There are concrete hanging tiles covering the external walls and dormer windows on all elevations.



B1 – northern and western elevations

There is a large flat roofed dormer window on the northern elevation.



B1 – eastern elevation



B1 southern elevation

The hanging tiles throughout the building have many hundreds of suitable roosting gaps for crevice dwelling bats. These features are generally the preferred roosting habitat for common and soprano pipistrelles.



B1 – southern elevation

The roof tiles, while in generally good condition, have several raised examples which provides additional roosting habitat.



B1 northern elevation

There are gaps under the soffit boxes around the large dormer window which provides roosting access into the soffit box and onto wall tops.



B1 interior

The loft measures approx.. 8m long by 5m wide with a ridge height of approx. 2.5-3m. the roof is lined with bitumen felt and modern timber rafters, ridge and trusses are present. The concrete block gable ends are exposed with gaps around them onto the wall tops.

At the western gable end there was a pile of small bat droppings, likely of pipistrelle origin directly under the gable end apex. The droppings numbered into the thousands, but with most droppings appearing old and degraded and around 200 more recent droppings on top of the pile. Droppings were also stuck to the wall and in cobwebs. Droppings in this location indicate a roost around the wall tops. This indicates a long standing roost, possibly a historic maternity roost.



At the eastern gable end, also directly under the apex, was a cluster of around 200 larger bat droppings appearing to be from serotine origin. Again this indicates a roost around the wall tops. The droppings were mostly more recent (<2 years old) with no evidence of historic use.



J1.2 Amenity Grassland and J1.4 Introduced Shrub

The gardens are well maintained amenity grassland with shrub borders and some scattered fruit trees. The photograph opposite shows the front garden facing south.



The photograph opposite shows the rear garden facing north west.

There is a small ornamental pond which has been covered over.



Taking the desk study and site survey results into account, the following conclusions for ecological factors has been reached.

Table 1:

Ecological Factor	Survey assessment conclusions (with justification)	Foreseen impacts	Recommendations	Enhancements The Local Planning Authority has a duty to ask for enhancements under the NPPF
Designated sites	The site lies within Chichester Harbour AONB, within 1km of Chichester and Langstone Harbours Ramsar, SSSI, SPA and Solent Maritime SAC.	The development area is far enough away from the designated sites to not cause any primary or secondary impacts.	No further work required.	None.
Notable habitats and plants	None.	None.	None.	None.
Invasive / Non-native species	None	None	None	None.
Bats B1	B1 has high habitat value for bats with numerous gaps present around the outside of the building under hanging tiles and roof tiles and in soffit boxes. There is also evidence of two separate species roosting on the wall tops assessed from evidence within the loft. The excellent quality of the surrounding habitat increases the likelihood of bat roosting, and also increases the possibility of higher conservation value roosts.	Any bat roosts within the building will be destroyed when the building is extended and refurbished.	In order to proceed with the development following best practice and in line with planning policy, a suite of dusk emergence and dawn re-entry surveys will need to be carried out between May and September. Three surveys are required; two at dusk and one at dawn with at least 2-3 weeks between them. At least 2 of the surveys should be within the optimal survey season which is mid-May-August. Three surveyors are required to provide full coverage of all elevations. If bat roosts are confirmed, the development will need to be permitted by a European protected species mitigation licence which can be obtained once planning permission has been granted.	To be confirmed following further surveys.

Birds	Trees and shrubs on site provide suitable nesting habitats.	Any vegetation removal could destroy active nests.	All tree and shrub removal should be undertaken outside of the nesting season (March-August). If the nesting season cannot be avoided, then a nesting bird check will need to be carried out immediately prior to the start of work (within 48 hours) by a suitably qualified ecologist. Any active nests will be left in situ and undisturbed until the young have fledged.	Nest boxes for swifts and house sparrows will be built into the walls of the new extensions.
Reptiles	No suitable habitat present.	None.	None.	None.
Amphibians	No suitable habitat present.	None.	None.	None.
Other Terrestrial Mammals	Hedgehogs may be present on and around the site.	Animals could become trapped in pits and trenches during building work.	<p>The following recommendations are given in order to mitigate against potential harm to terrestrial mammals during the development works.</p> <ul style="list-style-type: none"> • Any trenches dug should either be covered at night or have a rough sawn plank placed in them to act as a ramp for any wildlife which may fall in. • Security lighting to be directed away from the undergrowth. • Any chemicals or pollutants used or created by the development should be stored and disposed of correctly according to COSHH regulations 	Gaps must be left in fences to ensure connectivity of green space. A hedgehog box should be added on site.

Bat emergence and re-entry surveys:

The results of each survey are provided in the tables below.

Table 2: Survey results

Date		22/08/20
Start and End Times		19:45 – 21:45 Sunset: 20:08
Weather Conditions		<div> Start: Temp: 17.4°C Relative Humidity: 68% Cloud Cover: 75% Wind: 15mph Rain: None </div> <div> End: Temp: 16.7°C Relative Humidity: 72% Cloud Cover: 50% Wind: 13mph Rain: None </div>
Surveyor (position) As shown in Appendix 1		Natalie Evans - Natural England Bat Licence Number: 2018-37888-CLS-CLS (Position 1 – observing the southern and eastern elevations and roof structures of B1) Jonathan Kewell – 5 years' survey experience (Position 2 – observing the northern and western elevations and roof structures of B1)
Building Reference	Surveyor Position	Notes/observations:
B1	1	<p>From 20:35 onwards there was frequent passing and feeding by common and soprano pipistrelles around and gardens. Up to three bats were seen at any one time. The bats were flying to and from the garden western garden of the property. At 20:36 a common pipistrelle emerged from the corner hanging tiles on the southern elevation and flew south. See below for location:</p> 

B1	2	<p>From 20:15 onwards there was frequent passing and feeding by common and soprano pipistrelles around and gardens. Up to four bats were seen at any one time. The bats were flying to and from the adjacent field to the west and feeding around the gardens with periods of constant activity. At 20:33 2 x soprano pipistrelles emerged from beneath the soffit box on the dormer window on the northern elevation with loud social calls and chased each other off south down the driveway. See below for location:</p> 
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Table 3: survey results

Date	02/09/20	
Start and End Times	05:00 – 06:30 Sunrise 06:19	
Weather Conditions	Start: Temp: 14°C Relative Humidity: 58% Cloud Cover: 20% Wind: 3mph Rain: none	End: Temp: 8.3°C Relative Humidity: 92% Cloud Cover: 10% Wind: 3mph Rain: none

Surveyor (position) As shown in Appendix 1		Natalie Evans - Natural England Bat Licence Number: 2018-37888-CLS-CLS (Position 1 – observing the southern and eastern elevations and roof structures of B1) Jonathan Kewell – 5 years’ survey experience (Position 2 – observing the northern and western elevations and roof structures of B1)
Building Reference	Surveyor Position	Notes/observations:
B1	1	A common pipistrelle passed distantly at 05:10 and 05:23.
B1	2	Infrequent common pipistrelle passes many unseen or to and from the adjacent field and around the garden.

Table 4: survey results

Date		17/09/20
Start and End Times		18:50 – 21:00 Sunset 19:10
Weather Conditions		<div> Start: Temp: 17°C Relative Humidity: 40% Cloud Cover: 0% Wind: 4mph Rain: none </div> <div> End: Temp: 15.4°C Relative Humidity: 50% Cloud Cover: 0% Wind: 5mph Rain: none </div>
Surveyor (position) As shown in Appendix 1		Natalie Evans - Natural England Bat Licence Number: 2018-37888-CLS-CLS (Position 1 – observing the southern and eastern elevations and roof structures of B1) Jonathan Kewell – 5 years’ survey experience (Position 2 – observing the northern and western elevations and roof structures of B1)
Building Reference	Surveyor Position	Notes/observations:
B1	1	From 19:30 onwards there were regular common and soprano pipistrelle passes, mostly to and from the western garden area, around the front garden and up and down the driveway. The bats were feeding and social calling. At 19:35 a soprano pipistrelle emerged from the hanging tiles on the southern elevation and flew south. See below for location:

			
B1	2	From 19:30 onwards there were frequent common and soprano pipistrelle passes, mostly flying around the garden feeding and social calling, and passing to and from surveyor 1 or the adjacent field.	

4.0 Conclusions, Impacts and Recommendations

4.1 Informative guidelines

When bat roosts are present, the bat surveys undertaken at a site facilitate the characterisation of the roost type. This allows for appropriate mitigation and compensation to be designed to inform a European Protected Species Mitigation Licence (EPSML) application to Natural England.

The definitions of bat roost types are provided below, taken from the *Bat Mitigation Guidelines* (English Nature, 2004) and the Bat Conservation Trust publication *Bat Surveys for Professional Ecologists – Good Practice Guidelines* (Collins, J. (Ed) 2016).

Day roost: a place where individual bats, or small groups of males, rest or shelter in the day but are rarely found by night in the summer.

Night roost: a place where bats rest or shelter in the night but are rarely found in the day. May be used by a single individual on occasion or it could be used regularly by the whole colony.

Feeding roost: a place where individual bats or a few individuals rest or feed during the night but are rarely present by day.

Transitional / occasional roost: used by a few individuals or occasionally small groups for generally short periods of time on waking from hibernation or in the period prior to hibernation.

Swarming site: where large numbers of males and females gather during late summer to autumn. Appear to be important mating sites

Mating sites: sites where mating takes place from later summer and can continue through winter.

Maternity roost: where female bats give birth and raise their young to independence.

Hibernation roost: where bats may be found individually or together during winter. They have a constant cool temperature and high humidity. Sites where hibernating bats have been confirmed by appropriate survey effort should be classed as 'hibernation confirmed'.

Satellite roost: an alternative roost found in close proximity to the main nursery colony used by a few individual breeding females to small groups of breeding females throughout the breeding season.

Other: roost types are interchangeable and not always easy to classify according to the nuances of certain species.

The surveys undertaken to date in and around B1 provide sufficient information to inform a European Protected Species Mitigation Licence (EPSML). An EPSML **will be required** to enable the proposed works to be lawfully undertaken, whilst ensuring the favourable conservation status of the species concerned in their natural range; detailed mitigation will be described in the EPSML Method Statement. Appropriate justification for this assessment is provided in Section 3 of this report.

Natural England issues licences under Regulation 55 of the Habitats Regulations to allow you to work within the law. Licences are issued for specific purposes stated in the Regulations, if the following three tests are met:

- The purpose of the work meets one of those listed in the Habitats Regulations (see below);
- That there is no satisfactory alternative;
- That the action authorised will not be detrimental to the maintenance of the population of the species concerned at a favourable conservation status (FCS) in their natural range

The Habitats Regulations permits licences to be issued for a specific set of purposes including:

- 1. include preserving public health or public safety or other imperative reasons of over-riding public interest including those of a social or economic nature and beneficial consequences of primary importance for the environment;***
2. scientific and educational purposes,
3. ringing or marking
4. conserving wild animals

Development works fall under the first purpose and Natural England issues bat mitigation licences for developments.

4.2 Evaluation

The following recommendations are provided taking the desk-based assessment and site survey results into account.

Table 5: Evaluation of buildings on site

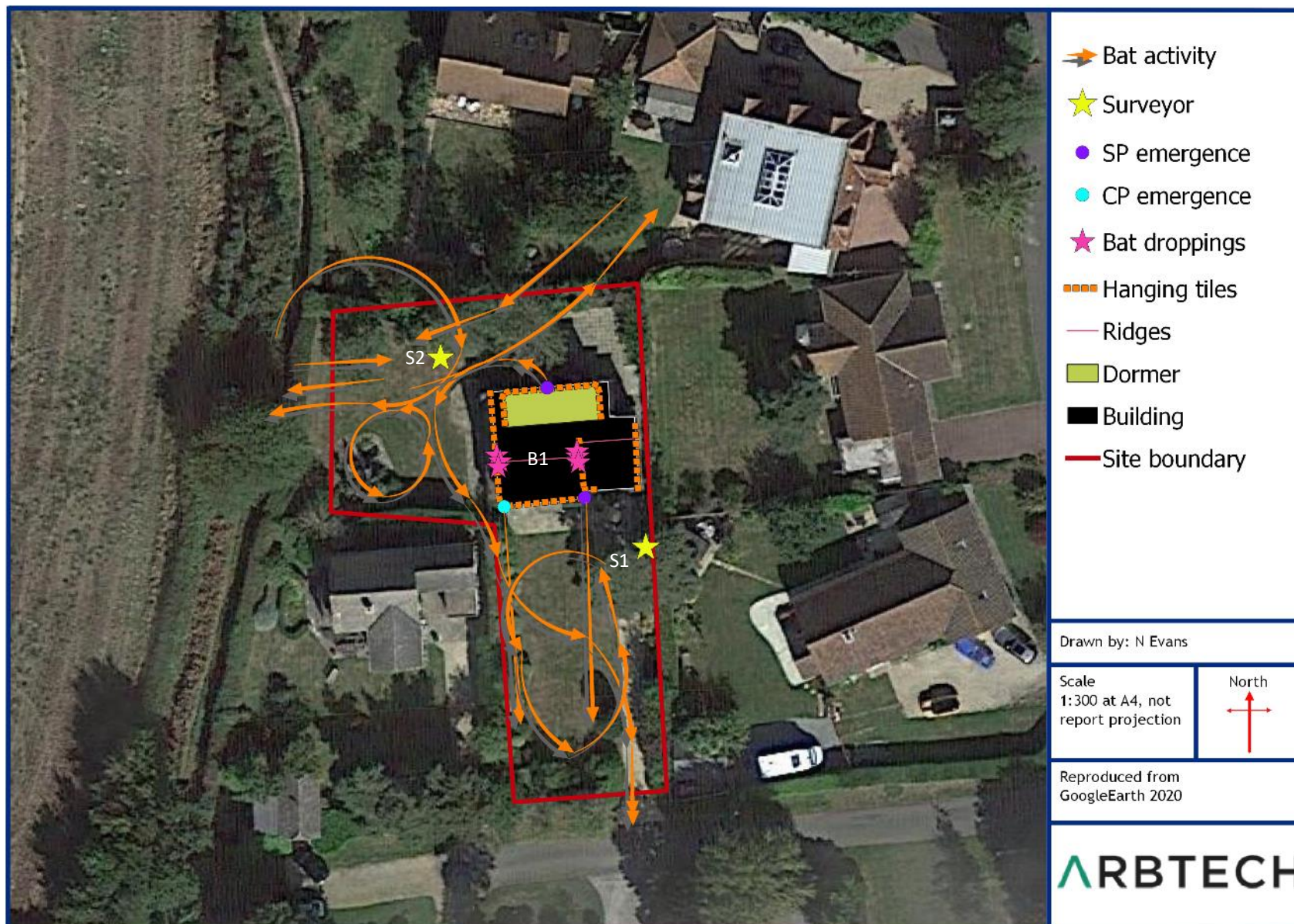
Ref	Survey conclusions	Foreseen impacts	Recommendations / Mitigation
B1	<p>The building contains a historic maternity roost of common or soprano pipistrelles (species to be confirmed following DNA analysis) a day roost of common pipistrelle (x1), a day roost of soprano pipistrelles (x2) and a serotine transitional roost probably used early on in the year (droppings will also be sent for DNA analysis to confirm species).</p> <p>The assessment of a historic maternity roost of pipistrelle species has been determined based on the large accumulation of droppings within the loft, without any emergences or re-entries from this location.</p>	<p>All bat roosts will be destroyed when the exterior of the building undergoes complete renovation and extension as this will involve a replacement of the roof and removal of hanging tiles to be replaced with timber cladding. Bats could be injured or killed during the works.</p>	<p>The removal of the roof and hanging tiles will need to be permitted by a European protected species mitigation licence which can be obtained once planning consent is granted and the works are starting within 3 months.</p> <p>Under licence - Three species and roost type appropriate bat boxes will be installed on trees on site prior to the start of the work and then ecological supervision of the removal of all hanging tiles and roof structures. Any bats found will be moved by hand by the ecologist into the appropriate bat box. In the newly refurbished building, replacement roosting provision will be provided in the form of at least four integrated bat boxes. Full specifications will be detailed in the licence method statement and figures.</p> <p>To inform the licence, bat records from within a 2km radius of the site will need to be obtained from Sussex Biodiversity Records Centre and the bat droppings samples will be sent for DNA analysis.</p> <p>Low impact lighting strategies will be adopted from the guidance outlined in the new Bats and Lighting Publication produced by the Institution of Lighting Professionals and the Bat Conservation Trust "Guidance Note 08/18 Bats and artificial lighting in the UK Bats and the Built Environment series publication:http://www.bats.org.uk/news.php/406/new_guidance_on_bats_and_lighting. The lighting on the site will:</p> <ul style="list-style-type: none"> • Use narrow spectrum light sources to lower the range of species affected by lighting • Use light sources that emit minimal ultra-violet light • Avoid white and blue wavelengths of the light spectrum to reduce insect attraction and where white light sources are required in order to manage the blue shortwave length content they should be of a warm / neutral colour temperature <4,200 kelvin. • Not use bare bulbs and any light pointing upwards. The spread of light will be kept in line with or below the horizontal. <p>Light spill will be reduced via the use of low level lighting used in conjunction with hoods, cowls, louvers and shields. Lights will also be directional to ensure that light is directed to the intended areas only.</p>

			<p>External lighting will be on PIR sensors that are sensitive to large objects only (so that they are not triggered by passing bats) and will be set to the shortest time duration to reduce the amount of time the lights are on.</p> <p>Wall lights and security lights will be 'dimmable' and set to the lowest light intensity settings. There are several products on the market that allow the control of the light intensity and the duration that the lights are on. All lighting on the developed site will make use of the most up to date technology available.</p>
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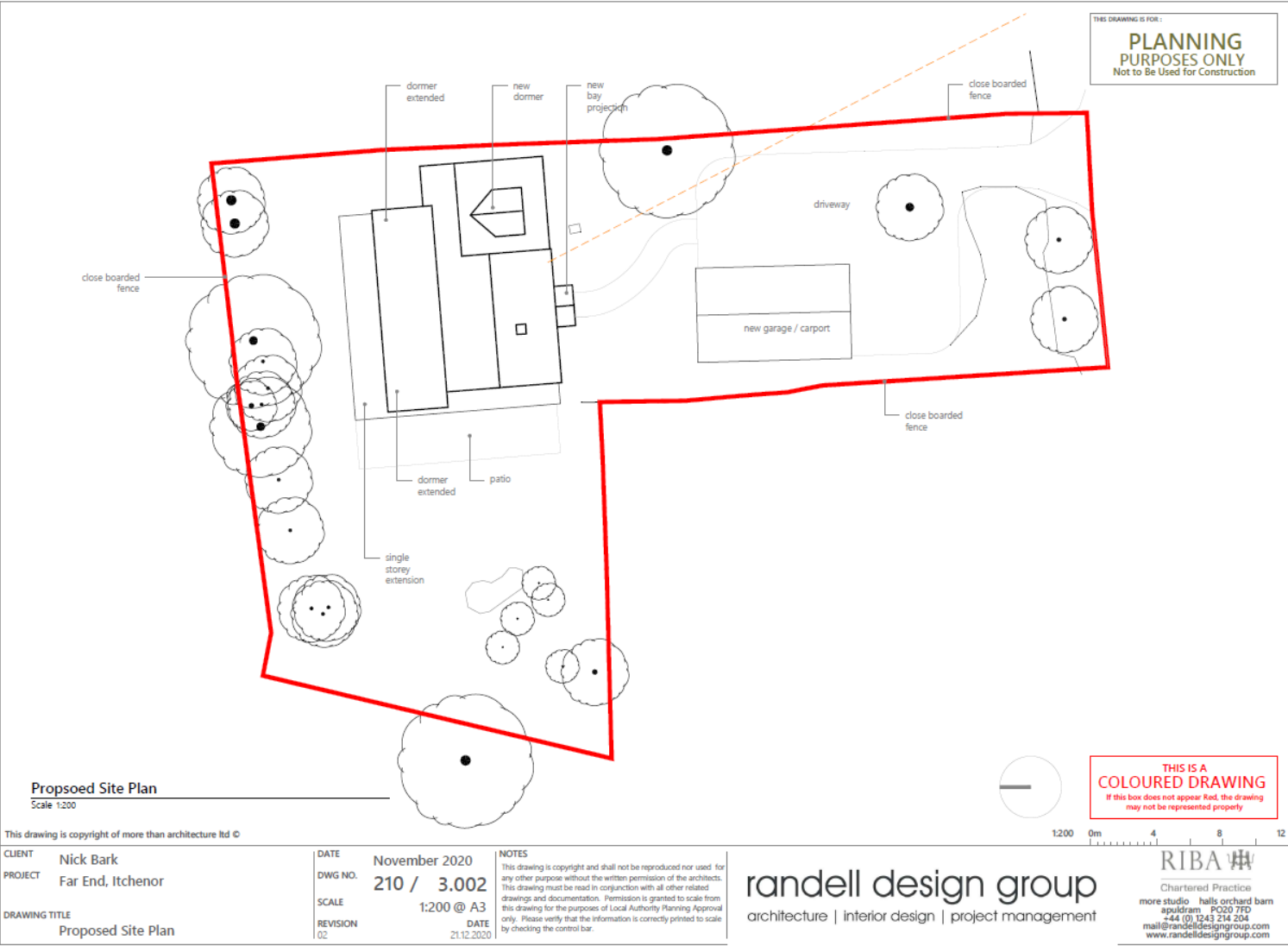
5.0 Bibliography

- Collins, J. (ed.) (2016). Bat Surveys for Professional Ecologists —Good Practice Guidelines, 3rd edition, Bat Conservation Trust, London.
- Garland & Markham (2008) Is important bat foraging and commuting habitat legally protected?
- Google Earth (2020)
- Magic database (2020) <http://www.magic.gov.uk/MagicMap.aspx>
- Mitchell-Jones, A.J. (2004). Bat Mitigation Guidelines. English Nature, Peterborough.

Appendix 1: Survey Plan



Appendix 2: Proposed Plans







Appendix 3: Desk Study Information

Full historical records can be provided on request.

Desk Study Results

A summary of desk study results are provided below.

Designated sites

Details of any statutory and non-statutory designated sites within a 1km radius of the survey site, including their reasons for notification, are provided in the table below.

Designated sites within 1km radius of the site

Designated Name	Site	Distance from Site (approx.)	Reasons for Notification from Natural England and/or BRD or LPA policy maps
Statutory Sites			
The site lies within Chichester Harbour AONB and within 1km of Chichester and Langstone Harbours Ramsar, SSSI, SPA and Solent Maritime SAC.	800m north east		Chichester Harbour is a large estuarine basin in which at low water extensive mud and sandflats are exposed, drained by channels which unite to make a common exit to the sea. The site is of particular significance for wintering wildfowl and waders and also breeding birds both within the Harbour and in the surrounding permanent pasture fields and woodlands. There is a wide range of habitats which have important plant communities
Non-statutory Sites			
None known			

Landscape

A review of the designated sites, aerial photographs (Figure 1), the Magic database and OS maps has been undertaken. Collated together, the site's local bat habitat is described below:

The site is in an area that provides excellent resources for bats, including adjacent ancient woodland and aquatic habitats.

Priority habitats within 1km of the site are listed in the table below.

Priority Habitat Inventory within 1km (Magic.gov.uk):

Habitat	Closest distance from site
Deciduous Woodland	Adjacent to the north
Ancient woodland	675m north west
Coastal saltmarsh	830m north east
Mudflats	830m north east
Coastal and floodplain grazing marsh	360m north

Traditional orchards

560m south west

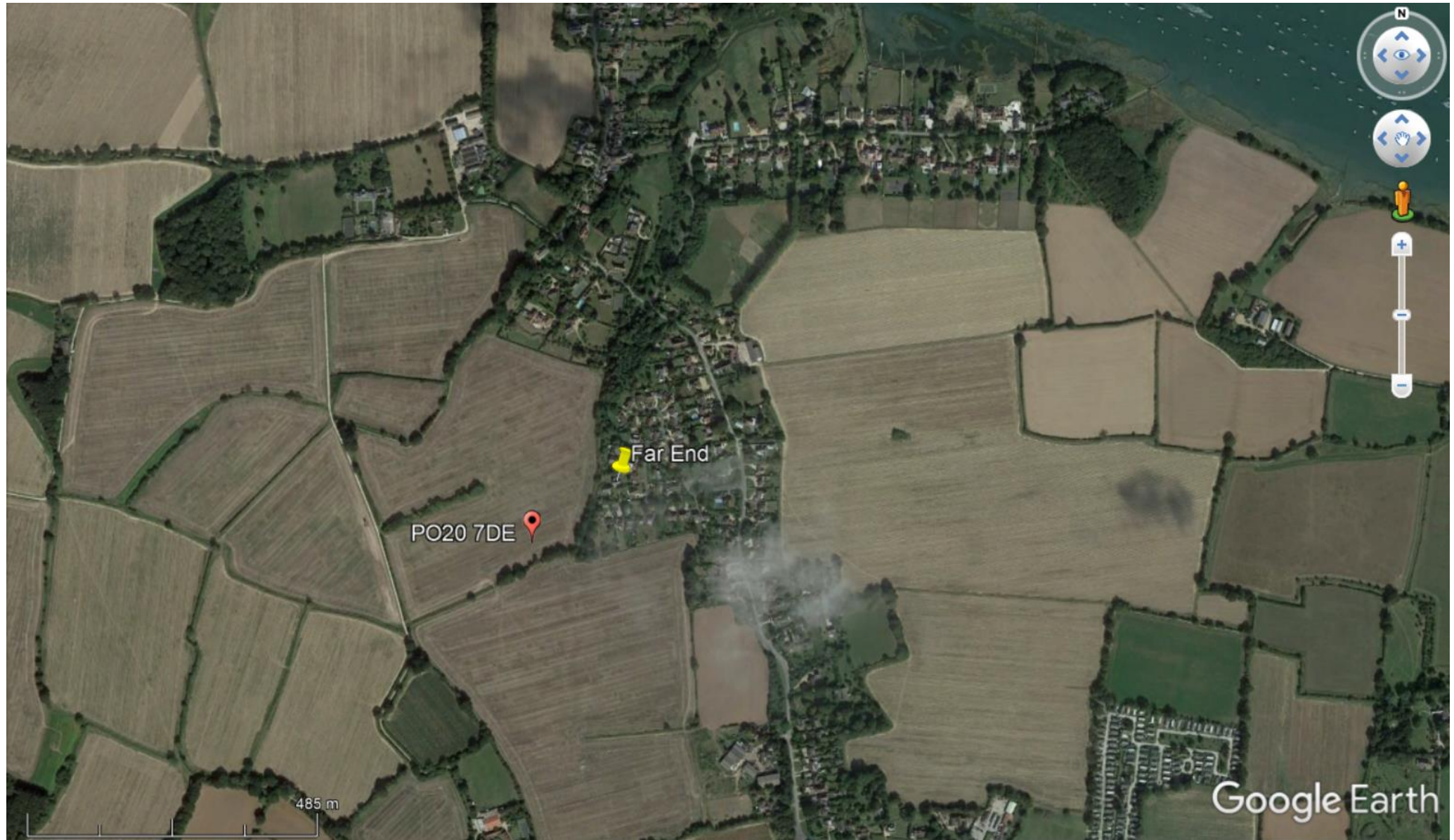


Figure 1: Aerial photo of site, showing landscape structure

Historical records

Sussex Biodiversity Records Centre will need to be commissioned to provide bat records within a 2km radius of the site. These can be provided on request and will be analysed and summarised in the table below once received.

Historical records of bats within 2km of the site

Common name	Scientific binomial	Number of records	Roost records	Maternity roost records
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A search of the Magic database for granted European Protected Species Mitigation Licences (EPSMLs) for bats within a 1km radius of the site has been completed. Displaced bats from recently destroyed bat roosts >1km away from the survey site will find alternative roosting sites either within the mitigation measures implemented as part of the licence or will relocate to other known roost sites in close proximity to the Licenced site.

Granted EPSMLs (bats) within 1km of the site

Case reference of granted application	Approx. distance from site	Bat Species Effected	Licence Start Date:	Licence End Date:	Impacts allowed by licence
EPSM2010-1702	830m north east	C-PIP;BLE	08/03/2010	30/09/2010	Destruction of a resting place
EPSM2011-2829	830m north east	C-PIP	11/03/2011	28/02/2013	Destruction of a resting place
EPSM2011-3494	200m south east	BLE	13/10/2011	31/08/2013	Destruction of a resting place
EPSM2013-6206	75m south west	C-PIP;S-PIP	16/09/2013	30/04/2015	Destruction of a resting place
2014-3583-EPS-MIT and MIT-1	870m north	BLE,C-PIP	06/10/2014	03/10/2019	Destruction of a resting place
2016-24378-EPS-MIT	1km north	C-PIP,SER	19/07/2016	19/07/2021	Destruction of a resting place

The records show that six bat roosts involving common pipistrelle, soprano pipistrelle, brown long eared bat and serotine have been destroyed within 1km, including two roosts in very close proximity. This increases the likelihood of these species finding roosting habitat on site.

Appendix 4: Legislation and Planning Policy related to bats

LEGAL PROTECTION

All species of bat are fully protected under *The Conservation of Habitats and Species Regulations 2017* through their inclusion on Schedule 2.

Regulation 43: Protection of certain wild animals - offences

(1) A person is guilty of an offence if they:

- (a) Deliberately captures, injures or kills any wild animal of a European protected species,
- (b) Deliberately disturbs wild animals of any such species,
- (c) Deliberately takes or destroys the eggs of such an animal, or
- (d) Damages or destroys a breeding site or resting place of such an animal,

(2) For the purposes of paragraph (1) (b), disturbance of animals includes in particular any disturbance which is likely—

- (a) To impair their ability:
 - (i) To survive, to breed or reproduce, or to rear or nurture their young; or
 - (ii) In the case of animals of a hibernating or migratory species, to hibernate or migrate; or
- (b) To affect significantly the local distribution or abundance of the species to which they belong.

Bats are also protected under the *Wildlife and Countryside Act 1981 (as amended 01.04.1996)* through their inclusion on **Schedule 5**. Under this Act, they are additionally protected from:

- Intentional or reckless disturbance (at any level)
- Intentional or reckless obstruction of access to any place of shelter or protection
- Selling, offering or exposing for sale, possession or transporting for purpose of sale

NATIONAL PLANNING POLICY (ENGLAND)

National Planning Policy Framework 2017

The National Planning Policy Framework promotes sustainable development. The Framework specifies the need for protection of designated sites and priority habitats and species. An emphasis is also made on the need for ecological infrastructure through protection, restoration and re-creation. The protection and recovery of priority species (considered likely to be those listed as UK Biodiversity Action Plan priority species) is also listed as a requirement of planning policy.

In determining a planning application, planning authorities should aim to conserve and enhance biodiversity by ensuring that: designated sites are protected from harm; there is appropriate mitigation or compensation where significant harm cannot be avoided; opportunities to incorporate biodiversity in and around developments are encouraged; and planning permission is refused for development resulting in the loss or deterioration of irreplaceable habitats including aged or veteran trees and also ancient woodland.

The Natural Environment and Rural Communities Act 2006 and the Biodiversity Duty

Section 40 of the Natural Environment and Rural Communities (NERC) Act 2006, requires all public bodies to have regard to biodiversity conservation when carrying out their functions. This is commonly referred to as the 'biodiversity duty'.

Section 41 of the Act requires the Secretary of State to publish a list of habitats and species which are of 'principal importance for the conservation of biodiversity'. This list is intended to assist decision makers such as public bodies in implementing their duty under Section 40 of the Act. Under the Act these habitats and species are regarded as a material consideration in determining planning applications. A developer must show that their protection has been adequately addressed within a development proposal.

Effect on development works:

A European Protected Species Mitigation (EPSM) Licence issued by Natural England will be required for works likely to affect a bat roost or for operations likely to result in a level of disturbance which might impair their ability to undertake those activities mentioned above (e.g. survive, breed, rear young and hibernate). The licence is to allow derogation from the relevant legislation but also to enable appropriate mitigation measures to be put in place and their efficiency/success to be monitored. The legislation may also be interpreted such that, in certain circumstances, important foraging areas and/or commuting routes can be regarded as being afforded *de facto* protection, for example, where it can be proven that the continued usage of such areas is crucial to maintaining the integrity and long-term viability of a bat roost (Garland & Markham, 2008).

There are 17 species of bat breeding in England and Natural England issues licences under Regulation 55 of the Habitats Regulations to allow you to work within the law.

Licences are issued for specific purposes stated in the Regulations, if the following three tests are met:

- The purpose of the work meets one of those listed in the Habitats Regulations (see below);
- That there is no satisfactory alternative;
- That the action authorised will not be detrimental to the maintenance of the population of the species concerned at a favourable conservation status (FCS) in their natural range

The Habitats Regulations permits licences to be issued for a specific set of purposes including:

- ***include preserving public health or public safety or other imperative reasons of over-riding public interest including those of a social or economic nature and beneficial consequences of primary importance for the environment;***
- scientific and educational purposes,
- ringing or marking
- conserving wild animals

Development works fall under the first purpose and Natural England issues bat mitigation licences for developments.