Outbuildings at Fooden Hall

Bat Report

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Version	Date	Prepared by	Technical Reviewer	Approved by
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Executive Summary

This report presents the findings of a Preliminary Roost Assessment (PRA) and suite of bat emergence surveys undertaken on various outbuildings at Fooden Hall, situated in Bolton by Bowland, which was commissioned by Willcock Consulting, to inform proposals for the conversion of the buildings into residential housing. Works include the demolition of the smaller outbuildings and conversion of the largest.

It is based on information collected from a desk study and a PRA carried out in April 2024, a suite of bat surveys was carried out from May-August 2024. Relevant legislation and planning guidance are also taken into account.

Key ecological features, potential impacts, further survey requirements and outline mitigation measures are summarised below.

Key findings and recommendations

Recommendations
Bats 1. Emergence surveys confirmed that buildings 1 and 2 comprise of three occasional / transitional / opportunistic / non-breeding day roosts for at minimum six soprano pipistrelles and one common pipistrelle. 2. A licence from Natural England will be required and Reasonable Avoidance Measures adopted to avoid negative impacts to roosting bats. 3. Incorporate compensatory roost provision within the renovated building. 4. Any additional lighting should be designed in accordance with the appropriate guidance.
Barn Owl 1. A nesting bird check for barn owl on buildings 1 and 2 will be required immediately prior to works commencing. If evidence of barn owl nesting is identified, further mitigation will be required. 2. Compensatory nesting provision for barn owl.
Nesting Birds 1. Appropriate timing of works to all buildings excluding building 5, and vegetation to avoid impacting swallows and other nesting birds. 2. Compensatory nesting provision for swallows, starling and house sparrow.
Watercourse 1. A pre-works otter and water vole check on the watercourse will be required prior to works commencing. 2. Pollution control measures to be used to avoid impacts to Fooden Gill**.**

Introduction

1.1 Bowland Ecology Ltd was commissioned by Willcock Consulting to undertake a Preliminary Roost Assessment and suite of bat emergence surveys of six buildings associated with Fooden Hall, in Bolton by Bowland (NGR: SD 80016 48970). This is in relation to a planning application for the conversion of the large barns (buildings 1 and 2) to create residential dwellings, and the demolition of the smaller buildings.

1.2 The buildings are located within a farmyard, to the north of Fooden Hall (Grade II Listed building). The buildings comprise two connected large stone barns (buildings 1 and 2) with a small single-story extension (building 3), an adjacent semi-derelict smaller breezeblock shed (building 4), a semi-derelict concrete/asbestos shed (building 5) and a corrugated metal shed (building 6). The buildings are infrequently used to house livestock, and border private roads used by the farm. A small brook (Fooden Gill) is located to the west of building 6 and the east of buildings 1, 2 and 4. The wider area comprises of scattered houses and buildings, with predominantly farmed pasture grassland and some scattered woodland and trees.

1.3 The appraisal follows the Guidelines for Ecological Report Writing (CIEEM, 2017b), and is in line with the British Standard BS42020:2013 'Biodiversity – Code of practice for planning and development'. It is based on information from a desk study, preliminary roost inspection of the internal and external building features and three bat emergence surveys.

1.4 The aim of the appraisal is to:

1) assess the value of the buildings for bats (Appendix A), with particular reference to legal requirements (Appendix F);

2) identify potential impacts and provide recommendations pertaining to the proposed works; and

3) identify any other potential constraints in relation to protected or invasive species.

1.5 This report includes a description of survey methods, results, and outlines recommendations to provide protection and enhancements for bats.

2. Methodology

Desk Study

2.1 The aim of the desk study was to identify the presence of bats and suitable foraging/commuting habitat in the area. Ordnance Survey (OS) maps and aerial photographs (http://maps.google.co.uk/maps) were reviewed to identify potential bat foraging and roosting areas, potential flight lines and important commuting corridors.

2.2 The Multi-Agency Geographic Information for the Countryside (MAGIC) website (www.magic.gov.uk) was reviewed for information on granted European Protected Species (EPS) licences in relation to bats within 1 km of the buildings. A search radius of 1 km was considered sufficient in this instance due to the scale-scale nature of the works.

2.3 Local records of bat roosts and activity within 1 km of the buildings were obtained from a data search with the Lancashire Environment Record Network (LERN).

Roost assessment

2.4 The survey was carried out by Jodie Marks MSc, BSc (Hons) *ACIEEM* and Felicity Davies BSc (Hons) on the 16th April 2024. The weather was dry and mild with a temperature of approximately 10°C. It was partly cloudy (60% cloud cover) with a light breeze (Beaufort Scale 2, easterly).

2.5 The external inspection involved checking for field signs of bats on external features of the building with particular attention being paid to ledges, walls, doors, and the surrounding ground. An assessment of the potential of the building to support bats was also made during the survey i.e. searching for suitable roosting crevices.

2.6 The internal inspection involved a search of loft voids for field signs such as: bats, bat droppings, urine stains, bat feeding remains (moth wings, insect cases), bat staining, a distinctive smell of bats, scratch marks, and smoothing of surfaces, which would indicate a roosting site. Ladders, binoculars, and high-power torches (LED Lenser 7.2) were used to aid the survey.

2.7 Natural England's Bat Mitigation Guidelines (2004) states that a significant bat roost can normally be determined on a single visit at any time of the year, provided that the entire structure is accessible and that signs of bats have not been removed by others.

2.8 Using the information collected during the external and internal assessment, a 'roost potential' score was given to the building according to the criteria shown in Appendix A (Collins, 2023).

Emergence Survey

2.9 The preliminary roost assessment identified buildings 1 and 2 as **moderate potential** for roosting bats and buildings 3, 4, 5 and 6 as **low potential**. Therefore, two pre-works emergence surveys were performed in line with Collins (2023). Following confirmed bat emergences from buildings 1 and 2 during the second survey, a further survey was deemed necessary to confirm roost characteristics. The surveys were undertaken on the 12th June, 3rd July and 24th July 2024, under optimal weather conditions (Survey

details outlined in Table 1 below). Time expansion and heterodyne detectors (Echo Meter Touch 2) were used during the survey to aid experienced surveyors with species identification. Four to five surveyors and four Infrared cameras were positioned to give the best coverage of all potential roosting features as highlighted in the initial building inspection (see Appendix B for details).

Table 1: Bat emergence survey details

Date	Type of survey	Timing	Sunset	Weather	Surveyors
12/06/2024	Dusk emergence	Survey start: 21:26 Survey end: 23:11	21:41	Mild (9°C) and dry, with little breeze (Beaufort 1) and 50% cloud cover.	Caspar Sloan Cameron Wilson (Msc, Bsc Hons) Felicity Davies (BSc Hons) Gemma Mcmullan (BSc Hons) Lauren Fairfax (BSc Hons)
03/07/2024	Dusk emergence	Survey start: 21:28 Survey end: 23:13	21:43	Mild (13°C) and mostly dry, with a light shower at 22:53. With a southerly breeze (Beaufort 4)	Rachel Platt (MSc, BSc Hons) Caspar Sloan Gemma Mcmullan (BSc Hons) Chris Burdock (BSc Hons)
24/07/2024	Dusk emergence	Survey start: 20:53 Survey end: 22:38	21:08	Warm (17°C) with little breeze (Beaufort 1). Clear skies (0% cloud cover)	Felicity Davies (BSc Hons) Helena Davies (BSc Hons) Cameron Wilson (MSc, BSc Hons) Chris Burdock (BSc Hons)

					Rachel Platt (MSc, BSc Hons)

[All experienced bat surveyors, acting as agents under licence numbers: 2015- 12106-CLS-CLS and 2016-20858-CLS-CLS]

Limitations

2.10 Desk study data should not be treated as a comprehensive list of species present within a search area. Many species are under-recorded and low numbers of records can indicate a lack of survey effort in some areas, rather than confirm the absence of a species.

2.11 The height of barns 1 and 2 prevented a thorough survey of the roof beams, fascia and barge boards. The second floor of the southernmost (small) barn were inaccessible due to floor safety concerns. This report has therefore taken these restrictions into account.

3. Results

Desk Study

Habitats

3.1 Based on a review of aerial imagery and OS maps, there is suitable habitat for foraging and commuting bats immediately surrounding the buildings and within the wider area. 14 m to the east of buildings 1, 2 and 4 and immediately to the west of building 6, there is a small riparian watercourse (Fooden Gill) which leads into a larger woodland by the River Ribble to the south. Also immediately surrounding the buildings are grassland and grazed fields lined with trees and hedgerows, leading to woodland to the northwest and riparian woodland to the east. Some country roads intersect these fields, the closest, a private road, which accommodates traffic for the farm and several houses on the road and is unlikely to see traffic at night.

3.2 Overall, the local area is considered to be high value bat foraging and commuting habitat to multiple bat species. This includes species which prefer 'edge' habitats such as common pipistrelle (*Pipistrellus pipistrellus)* and soprano pipistrelle (*Pipistrellus pygmaeus)*, as well as larger species such as noctule (*Nyctalus noctule)* that are associated with more open habitats. The adjacent woodland, including riparian woodland, could provide habitat for species such as brown long-eared bats (*Plecotus auratus)* and natterer's bat (*Myotis nattereri)*, which are associated with sheltered habitats and soprano pipistrelle and Daubenton bats (*Myotis daubentoni*) which prefer to forage over water.

3.3 The presence of livestock within and adjacent to the buildings may encourage invertebrate population, enhancing feeding opportunities for foraging bats.

Figure 1: Location of outbuildings

Data Search

3.4 No statutory designated wildlife sites were identified within 1 km of the buildings, however all the buildings fall within the Impact Risk Zone (IRZ) of New Ing Meadow Site of Special Scientific Interest SSSI, located 1.9 km to the northwest. The proposed development does not fall within the listed categories that require the Local Planning Authority to consult with Natural England. Therefore, IRZ's are not considered further within this report.

3.5 It also identified no non statutory sites within 1 km of the buildings.

3.6 It also identified the following areas of habitat within 1 km of the buildings which potentially qualify as HPI:

Table 2: Potential areas of HPI

Description
• Four areas of Ancient woodland, including Fooden High Wood and Park House Beck Wood. The closest of which is located 0.1 km to the south.
• 13 areas of deciduous woodland, the closest of which is located 0.1 km to the south.
• Four areas of good quality semi-improved grassland, the closest of which is located 0.3 km to the south
• One area of Lowland Meadow, located 1 km to the east

3.7 A search of the Ancient Tree Inventory returned no evidence of Ancient trees within 1 km of the buildings.

Species

Bats

3.8 No active/inactive European Protected Species (EPS) Licences for bats were identified by the Magic.gov website within 1 km of the buildings. The closest granted EPS licence was located 1.4 km in Bolton-by-Bowland to the west. The licence was for the destruction of a resting place for common and soprano pipistrelle and brown Long eared bats and was valid from 2013 until 2015.

3.9 The LERN data search returned no records of bats within 1 km of the buildings since 2005.

Building Descriptions

3.10 A map of the buildings can be found in Appendix B. Further notes with photographs from the survey are provided in Appendix D.

External

3.11 Buildings 1 and 2 consist of two adjoining stone barns, dating to 1833. The northernmost barn (building 2) is constructed of stone, with a newer pitched corrugated metal roof. There is evidence of another building previously attached to its northern aspect, which remains as a foundation and some walls. The southernmost barn (building 1) is smaller, with a lower pitched roof constructed of stone tile, and two

chimney pots. The roof is in disrepair, with lifted tiles present. There is a small breeze block extension (building 3) across both buildings on the western elevation, with an angled corrugated metal roof. All buildings are fully open to the outside, with uncovered windows and entrances.

3.12 The detached buildings consist of a breeze block shed with a flat corrugated metal roof to the northeast (building 4) a derelict concrete and asbestos, wooden felted flat-roofed shed to the north-west (building 5) and a functioning flat-roofed corrugated metal cattle shed to the north (building 6). All these buildings are open to the environment. There are also the foundations of some small buildings which have been demolished.

Internal

3.13 Building 1 consists of two rooms. Inside, they are mostly dry and sheltered, with some signs of damp around windows. They are unheated, with open access to outside. The ground floor room has a concrete floor and rendered walls, with some peeling render exposing the stone of the walls. There are concrete livestock dividers within the room, and a wooden plank ceiling with signs of rot, supported by wooden beams. The windows have wood and stone lintels, with large gaps but obvious signs of damp. The first floor is open to the roof, which is of stone tile and wooden beams. There are skylights in the roof and lifted tiles. The floor is wooden planking, with stone walls.

3.14 Building 2 consists of two rooms. Inside, they are mostly dry and sheltered, with some signs of damp around windows. They are unheated, with open access to outside. There are no enclosed roof voids. The upper room is of bare stone walls and open to the corrugated metal roof, which is supported by wooden beams. It has two levels, the lower level consisting of a dirt floor and the upper level a wooden floor, the ceiling of the room below. The wooden beams are dry and in good condition. There are stone alcoves and window frames, which are open to the outside, and two large wooden barn doors with stone lintels, left open. The lower room is sunk just under ground-level. It has concrete walls, a concrete floor and concrete livestock divides and a wooden ceiling supported by wooden beams. The windows are glass-paned but left open, and the frames are stone. There is a doorway leading out of the building to the north, with a wooden lintel with gaps between the wooden beams and the walls.

3.15 Building 3 has two small rooms. Both have smooth concrete walls and floor and are open to the roof, which is of corrugated metal, supported by wooden beams. There are gaps between the beams and the roof and the roof and the walls.

3.16 Building 4 consists of one internal room. This has signs of being used to hold livestock, with animal excrement on the floor. Three of the internal walls are breezeblock, with a third brick wall on the southern aspect. This has a large hole about 1.5 m high. There are concrete animal stalls within the shed. The internal space is open to the roof, which is corrugated metal supported by wooden beams. There are missing bricks throughout and gaps beneath the roof and walls.

3.17 Building 5 is mostly derelict. It is missing several walls and parts of the roof, and is light and exposed to the elements. The structure is of concrete, with an asbestos/concrete roof which has gaps between the concrete slabs. The floor is overgrown with mosses and grass. The walls consist of riveted panels. There are concrete-framed windows, some of which are paned.

3.18 Building 6 is timber-framed, with a breezeblock wall holding a water tank in the centre of the shed. The shed is open on the east and north elevations.

Building Inspection

External

3.19 The stonework of buildings 1 and 2 is in largely good repair, with potential roosting features (PRFs) confined to areas of missing mortar or stones, particularly on the eastern elevation. Additional PRFs are present behind the wood of the doors and lintels on the eastern elevation. The eaves support multiple swallows' nests (*Hirundo rustica*) on all elevations. The fascia and barge boards of the larger barn and eaves the eaves of both buildings also form PRFs, however the inspection of these were limited due to the height of the building. The stone tile roof of building 1 provides multiple PRFs beneath slipped and lifted tiles and access to the room below.

3.20 Building 3 is largely in good repair, with PRFs beneath the lifted wooden barge board and where there is some missing mortar. Internal access for bats is possible into the barns and extension through the eaves, open windows and doors on all elevations.

3.21 Building 4 has some PRFs where the roof and walls meet. Internal access for bats is possible through the eaves, open doorways and through large holes in the walls where multiple bricks and breezeblocks are missing.

3.22 Building 5 is largely unsuitable for roosting bats. There are some small PRFs potentially beneath lifted roof felt and wooden boards, however these are quite small and exposed.

3.23 Building 6 has no external PRFs.

Internal

3.24 There are multiple PRFs present within the gaps left by missing mortar between stones on all elevations within buildings 1 and 2, and between some of the wooden lintels and window frames. These would be suitable for crevice-dwelling bat species. The wooden beams provide multiple PRFs for crevice and void-dwelling bat species. Given the lack of heating and insulation, the buildings are cold and likely unsuitable for maternity roosts, however could be utilised by smaller non-maternity roosts, and/or by individual bats for shelter or a feeding perch and hibernation roosts in winter. There are multiple swallows' nests within the buildings, particularly on the wooden beams of the lower levels. Two European hare (*Lepus europeaus*) carcasses were found in the two lower rooms.

3.25 Building 3 is devoid of crevices, however the beams may provide PRFs for void dwelling species. There are swallows' nests inside the building.

3.26 There are limited PRFs within building 4. There is some potential for void-dwelling bat species on the internal beams, however the building is quite exposed and cold so unsuitable for maternity roosts. There is potential for crevice-dwelling bats behind the beams, however the temperature instability of corrugated metal roof may deter bats. Swallow nests are present on the beams within the building.

3.27 Building 5 is very exposed and unsuitable for bats, however there are small PRFs between the concrete blocks of the ceiling for opportunistic species.

3.28 Building 6 has PRF's between and behind the wooden timbers and beams, where crevice-dwelling species may shelter. The shed is very exposed, and so unlikely to attract any void-dwelling species or be utilised for maternity roosts.

Overall value

3.29 Buildings 1 and 2 were considered to possess **moderate** potential value for roosting bats (See Appendix A) but likely unsuitable for large maternity roosts owing to cold conditions.

3.30 Buildings 3, 4, 5 and 6 were considered to possess **low** potential value for roosting bats (See Appendix A), with roosting bats unlikely due to the exposed nature of the buildings but given the quality of the surrounding habitat, there is potential for individual bats to utilise them for individual roosting or perching whilst feeding.

Incidental observations

3.31 All the buildings excluding building 5 are utilised by nesting swallow. Nests and fresh excrement are present beneath the eaves of the barns and on the beams in the lower rooms of the buildings 1 and 2, and utilising beams and ledges within building 3, 4 and 6.

3.32 Two dead European Hare, Biodiversity Action Plan (BAP) species, were observed within the buildings 1 and 2. A live European Hare was seen on the private road to the farm.

3.33 Buildings 1, 2, 3, 4 and 6 present further sheltered locations suitable for nesting birds such as starling (*Sturnus vulgaris*) and house sparrow (*Passer domesticus*).

3.34 A grassy area to the east of the barns could be utilised by ground-nesting birds.

3.35 There is a ash tree to the north of the buildings with bat potential.

3.36 There is a small watercourse to the east of buildings 1, 2 and 4 and west of building 6 (Fooden Gill).

3.37 A barn owl (*Tyto alba*) was seen exiting the arched window above the door of building 1 on the second survey. Prior to the commencement of the third survey, a check was done of building 1 which confirmed that a barn owl was roosting in the space left by the chimney above the rafters on the upper level. The floor was littered with barn owl feathers and droppings, and the owl could be seen.

Emergence Surveys

3.38 Three emergence surveys were necessary to determine the status of the roosts and inform required mitigation. Results from the three surveys is provided in the table below.

Table 3: Bat emergence survey results

12/06/2024 Sunset: 22:26	***Survey Location 1 (FD)***	***Survey Location 2 (GM)***	***Survey Location 6 (CS)***	***Survey Location 4 (LF)***	***Survey Location 5 (CW)***
Time of first bat	21:44	21:33	22:09	21:40	22:10
Details of emergences	0 (Around 20 SP from Fooden Hall roost adjacent)	0	0	0	0
General activity levels	High (Mostly constant due to swarming bats)	Moderate	Low	Moderate	Low
No. of bats foraging	0	0	1	0	0
No. of social calls	3	0	0	0	0
Species observed	SP, N, BLE	SP, N, UB	CP, N, M	SP, CP, N, M	SP, N, BLE
03/07/2024 Sunset: 21:43	***Survey Location 1 (RP)***	***Survey Location 2 (GM)***	***Survey Location 3 (CB)***	***Survey Location 4 (CS)***	***Survey Location 5***
Time of first bat	22:07	21:51	22:04	22:00	
Details of emergences	0	**5** from points: 1 (SP), 2 (CP), 3 (SP), 4 (SP) and 5 (SP)	0	0	
General activity levels	Low	Moderate	Moderate	Low	
No. of bats foraging	0	0	0	1	
No. of social calls	1	0	0	0	
Species observed	CP, SP, N, D, M	SP, CP, M, N	SP, CP, M, N, BLE	SP, CP, M, N, BLE	
24/07/2024 Sunset: 21:08	***Survey Location 1 (HD)***	***Survey Location 2 (FD)***	***Survey Location 3 (RP)***	***Survey Location 4 (CB)***	***Survey Location 5 (CW)***
Time of first bat	21:18	21:14	21:21	21:35	21:28
Details of emergences	0	**6** SP from points 1, 3, 4 (2), 5 and 6	0	0	0
General activity levels	High	High	Moderate	Moderate	High
No. of bats foraging	5	4	3	2	7
No. of social calls	0	3	0	0	0
Species observed	SP, CP, M, N, BLE	SP, CP, M, N, BLE	SP, CP, N, BLE	SP, CP, M, N	SP, CP, N, BLE

Key: CP: Common pipistrelle, SP: Soprano pipistrelle, N: Noctule, BLE: Brown Long Eared, D: Daubenton's, M: Myotis Sp., UB: Unknown Bat

3.39 In summary, bats were observed emerging from six points overall, three points on building 1 and three points on building 2. The locations are highlighted on the plan in Appendix B and a photograph with emergence points highlighted is provided in Appendix C. A summary of the six emergence points is provided below:

- Emergence point 1: Under the eaves of the southeast aspect of building 1. One soprano pipistrelle emerged from here during the second survey.
- Emergence point 2: Under the eaves of the southeast aspect of building 1. One common pipistrelle emerged from here during the second survey.
- Emergence point 3: Under the eaves of the southeast aspect of building 1. One soprano pipistrelle emerged from here during the second survey and one soprano pipistrelle emerged from here during the third survey.
- Emergence point 4: Under the barge board on the southern gable of building 2, on the eastern side. One soprano pipistrelle emerged from here during the second survey and two soprano pipistrelle emerged from here during the third survey.
- Emergence point 5: From the fascia board on the southeast aspect of building 2. One soprano pipistrelle emerged from here during the second survey and one soprano pipistrelle emerged from here during the third survey.
- Emergence point 6: From the fascia board on the southeast aspect of building 2. One soprano pipistrelle emerged from here during the second survey and one soprano pipistrelle emerged from here during the third survey.

3.40 Overall bat activity levels varied across all three surveys, although surveyors in location two always had moderate-high activity. The lowest activity levels were recorded in the second survey, with low-moderate activity. The majority of activity was soprano pipistrelle, with frequent common pipistrelle, together with occasional noctule, Daubenton's, non-identified Myotis (likely also Daubenton's foraging over the watercourse), and Brown Long-eared bats commuting. Social calling was recorded at surveyor location point 1 during the first and second surveys and location 2 during the third survey.

4. Evaluation and Recommendations

4.1 An evaluation and assessment of potential impacts on bats is presented below. This is based on the information available on the proposed development (see below) and the professional judgement of the ecologists that prepared this report. It considers legal requirements (see Appendix F) and relevant national and local planning policies. If the proposals are changed significantly, the assessment will need to be reviewed.

Work Proposals

4.2 The proposed development includes the conversion of the existing barns (buildings 1 and 2) into housing including external and internal alterations and the demolition of the other buildings. Given the state of repair of the buildings, it is anticipated that all of the buildings will be disturbed, including the roofs, and traffic to the area will increase.

Importance of recorded roost

4.3 The buildings 1 and 2 are a confirmed roost, with PRFs including unsealed eaves and fascia / barge boards which may provide access to crevices and / or small cavities. In-depth surveys of the buildings indicate that it is used by a small number of commonly occurring bat species (common and soprano pipistrelles) for roosting. Given the low number of bats recorded emerging (maximum of two from an individual emergence point and six from the buildings as a whole on one survey) and no further evidence such as droppings, the building is considered to comprise occasional / transitional / opportunistic / non-breeding day roosts. However, considering that sporadic social calling was recorded during all surveys, the presence of a very small-scale mating site cannot be entirely ruled out. As the building is uninsulated and has large openings to the outside, it is cold and thereby has a decreased suitability for a significant nursery roost, however may be used as a hibernation roost. In accordance with Reason and Wray (2023) the building is considered to be important at a **site level,** as outlined in Table 4.

Table 4: Roost importance

	Roost category		
Conservation status/ distribution	***Feeding perches; night-roosts; Individual or very small occasional/ transitional/ opportunistic roosts***	***Non-breeding day roosts (small numbers of species***	***Mating sites (excluding individual trees and larger swarming sites); small numbers of hibernating bats***
Widespread all geographies (Pipistrelle species)	Importance: Site	Importance: Site	Importance: Site

4.4 Despite six emergence points being observed, due to most of these being close and comprising the same functional and qualitative characteristics for the same species (soprano pipistrelle), for the purpose of assessment and licensing the building can be considered to comprise three roosts (Natural England / Reason and Wray, 2023); for

small numbers of soprano and common pipistrelle in building 1 and soprano pipistrelle in building 2.

Bat impact assessment

4.5 Works will involve impacting the whole of buildings 1 and 2, including internal and external works, structural, roofing and a change of use, meaning impacts will be permanent.

4.6 In the absence of mitigation, proposals have the potential for direct harm / injury to roosting bats during works on the roof and walls, which would constitute an offence (Appendix F).

4.7 Despite the low importance of the recorded roosts, in the absence of compensation, the proposals will result in the permanent blocking / loss of confirmed roosts, which would constitute an offence (Appendix F) and impact local bat populations.

4.8 The use of artificial lighting has the potential to impact roosting, foraging or commuting bats by deterring them from using certain areas or preventing their movement through the wider landscape. The soprano pipistrelle roost in Fooden Hall adjacent to the buildings is particularly vulnerable to this.

4.9 In summary, there is potential for works to cause an offence and have a small-scale impact on bat populations in the immediate area, through injury to bats, loss of roosting locations and artificial lighting.

Recommendations

4.10 The project should consider the mitigation hierarchy (avoid > mitigate > compensate / off-set) from the outset.

4.11 To avoid causing an offence, derogation in the form of a protected species licence will be required prior to commencing works. A European Protected Species (EPS) mitigation licence application will be made to Natural England, including an appropriate package of mitigation and compensation, to allow the works to proceed without resulting in an offence.

4.12 EPS licences are usually only issued following granting of full planning permission and discharge of all relevant planning conditions. Applications take a minimum of 30 working days to process following receipt of all required documentation. Information on the licensing process can be found in Natural England's European Protected Species: Mitigation Licensing - How to get a licence document (Natural England, 2010). The licence application involves a method statement detailing mitigation and compensation measures, a reasoned statement to justify the proposals and meet the 'no satisfactory alternative' test, and an application form.

4.13 The project ecologist will be involved during the design stage to advise on incorporation of roosting provision within the new roof. This may involve features such as retaining gaps in soffits, bat access tiles and bat boxes within or affixed to appropriate walls.

4.14 It is first advised that works are scheduled outside of the active season, when bats are less likely to be within the building (November – March). Given that the barns may also be used as a hibernation roost, all potential roosting features are to be blocked or

removed before the hibernation period begins (October), to prevent bats entering the barns during works.

4.15 Work must comply with a Method Statement, to be approved by Natural England as part of the licence application process, which will centre around the following key measures:

- Prior to any potential disturbance / works, all contractors and operatives involved will be given a toolbox talk by the scheme ecologist to make them aware of the presence of roosting bats, their legal duties with regards to bats and the bat licence conditions. A Contractor Information Sheet (Appendix E) and copy of the bat licence will also need to be displayed on site.
- Any dismantling of known or potential roost sites (including wooden beams, fascia / barge boards, roof tiles etc) will be conducted sensitively by hand under the supervision of an ecologist licenced to handle bats. The ecologist will first inspect relevant areas of the buildings for bats before works commence. Any bats found will be captured by the bat-licenced ecologist by hand (using gloves) or a static net, placed into a cloth bag and relocated to a pre-installed bat box.
- In the highly unlikely event there are any observations that indicate the works pose a higher level of risk than anticipated, works must cease until further guidance has been provided by the project ecologist.

If roost sites / potential roost sites will not be dismantled but will be blocked:

- Endoscope inspection of any known or potential roost sites will be undertaken before works commence. This is to be undertaken by a suitably licenced and experienced ecologist.
- If the feature(s) can be thoroughly searched and no roosting bats or evidence of roosting bats is recorded, the features are to be sealed immediately to ensure no bats enter the feature(s).
- If any feature(s) cannot be thoroughly searched or the absence of bats cannot be confirmed, bat excluders will be fitted to all bat access points. As bats do not always leave the roost every night to feed (e.g. due to cold temperatures, heavy rain or winds) the bat excluders will be left in place for at least 14 days of suitable weather to be confident that all bats have left the roost before access points are sealed. Features will need to be sealed immediately after the excluder(s) are removed.
- If any bats are discovered during this process, works will stop until the bat(s) vacate the building, or the licenced bat handler removes the bat(s) and relocates them to a pre-installed bat box.

Bats discovered unexpectedly during non-supervised works (under licence):

- Works must stop immediately. If the named ecologist or an accredited agent is not present, they must be contacted immediately to attend site.
- The bat must not be exposed or 'encouraged' to fly out of the roost of its own accord. It should be left undisturbed unless this would be unsafe.
- Unless it is in immediate danger, the bat must only be handled by the named ecologist or accredited agent. If there is a suitable alternative roosting location on site then, assuming the bat is checked and in good health, it should be placed

there to minimise stress and holding time. If not, it must be carefully placed in a lidded ventilated box with a piece of clean cloth and a small shallow container with some wetted cotton wool. The box must be kept in a safe, quiet location.

- The named ecologist must re-assess the location where the bat was found and determine whether works can continue under the licence in force, whether further survey is required, and/or whether a modification to the licence is required before works re-commence. A written record must be kept of this decision and made available on request. This incident must also be reported on the licence return form.

4.16 It is unlikely that post-development population monitoring will be required for roosts supporting small numbers of common and widespread bats. However, the named ecologist will visit the site, post-development, to check that compensatory roosts have been provided and submit information to Natural England via a licence return.

4.17 Light spillage onto the building and surrounding habitats such as the watercourse and woodland will be avoided to negate impacts on roosting, foraging, and commuting bats. If a new lighting scheme needs to be incorporated into the development, this will take best practice guidance (ILP, 2023) into account.

4.18 In addition to compensation for the potential loss of roosts, consideration regarding enhancement of the buildings for bats should be considered. Considering the surrounding habitats are of high value for bats, there is potential for extra roost provision to have a significant contribution to bat conservation within the local area.

Recommendations – Barn Owl

4.19 A pre-works check of buildings 1 and 2 will be necessary to confirm the presence or absence of barn owl. If barn owl are using the buildings, to avoid impacts to nesting barn owl and retain roosting potential for them within the barns, a Schedule 1 listed species, any works which will impact the barn internally or externally will be subject to the following RAMS:

- Any internal and external works to the building will be subject to a pre-works check for barn owl, as barn owl have been recorded with eggs and chicks every month of the year. The inspection must be conducted a suitably experienced and licenced ecologist to avoid disturbance to nesting barn owl, which would likely constitute and offence;

- If no evidence of breeding barn owl is recorded, then exclusion measures may proceed under the guidance of a suitably experienced and licenced ecologist. Key measures include the provision of an alternative permanent, long-term nesting/roosting site within 1 km of the barn. The site will be located at least 200 m from the barn and installed at least 30 days prior to a planned exclusion event. The barn owl nesting/roosting feature design and installation must meet the requirements and specifications outlined by the Barn Owl Trust (Barn Owl Trust, 2020). This may be a barn owl nest box on a mature tree close to the buildings.

- The entrance to the barn should not be blocked at any point during or after the works, allowing continued access to the nesting site by barn owl; and

- If any active nests are recorded, these must be protected until chicks have fledged and/or the nest is abandoned naturally.

- The potential value of the barn for roosting/breeding barn owl will be lost post-works. As such, a barn owl box will be erected within the roof structure of the barn or nearby, post-works. Advice in relation to this is available at: https://www.barnowltrust.org.uk/barn-owl-nestbox/barn-owl-nestboxes/

Recommendations – Other Nesting Birds

4.20 Any works to the building should commence outside of nesting bird season, including the demolition of outbuildings and/or any removal of vegetation. The nesting bird season is weather dependent, but usually extends from March to August inclusive.

4.21 If this is not possible, a pre-works nesting bird check will be required immediately prior to works commencing to check of the status of any nests present. If any active nests are recorded, these must be protected, with no works carried out within 5 m of the nest until chicks have fledged and/or the nest is abandoned naturally. Works will only be undertaken once a scheme ecologist has declared the nest to be no longer in use.

4.22 Nesting provision for swallows should be considered within designs for the building. This could include installation of swallow nest bowls within any retained outbuildings or beneath the eaves of the barns, for example:

- https://www.nhbs.com/no-10-schwegler-swallow-nest

4.23 The installation of starling and sparrow bird boxes should be considered as part of proposals, at suitable locations. For example:

- https://www.nhbs.com/vivara-pro-woodstone-starling-nest-box
- https://www.nhbs.com/1sp-schwegler-sparrow-terrace

Recommendations - Watercourse

4.24 In the absence of mitigation, works have the potential for direct harm / injury to otters or water vole or destroy / block their places of shelter during works, which would constitute an offence (Appendix F).

4.25 A pre-works otter and water vole check is to be carried out by a suitably qualified person to confirm absence. In addition:

- Prior to any potential disturbance, all contractors and operatives involved will be made aware of the potential of otter and water vole. Information regarding otter and water vole can be found in Appendix E.

- Any disturbance of the watercourse will be kept to the minimum and will be short-term.

- In the highly unlikely event there are any observations that indicate the works pose a higher level of risk than anticipated, works must cease until further guidance has been provided by the project ecologist.

4.26 Pollution control measures must be utilised throughout works where necessary to prevent pollution to the watercourse. A buffer of 10 m should be retained between the watercourse and works where possible. Where the watercourse passes alongside

building 6 and the buffer can't be maintained, care must be taken to prevent pollution or obstruction to the watercourse and riparian zone.

4.27 The Scottish Environmental Protection Agency (SEPA) and Northern Ireland Environment Agency (NIEA) have published guidance on the NetRegs website (NetRegs, 2018). In the absence of any guidance in England it is advised that the information published on the NetRegs website is adhered to during the works. The information provided is considered recognised good practice and the most up to date guidance currently provided.

4.28 Examples of suitable measures that can be adopted during works includes (but not limited to):

- Vehicle refuelling in designated compounds/areas and fuel stored in double bunded containers;
- Drip trays or plant nappies to be used when refuelling and left under stationary machinery;
- Oil spill kits to be kept on site and within all machines;
- Installation of silt control measures, including silt fencing, straw bales or similar as required. If works are likely to create significant erosion, matting will be used to protect the ground within the working area to avoid run off;
- Any materials removed from the site, must be stored in a bunded area, protected from potential rainfall and runoff and replaced upon completion of the works;
- Dampening down of work surfaces during works likely to create dust; and
- High standards of housekeeping maintained throughout the duration of the works.

Re-survey of the site

4.29 If works have not commenced within 12 months of this survey, or if any changes to the proposals are made, a further ecological survey may be necessary.

References

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CIEEM (2017b) Guidelines for Preliminary Ecological Appraisal 2nd Edition. Chartered Institute of Ecology and Environmental Management, Winchester.

Collins, J. (ed.) (2023) Bat Surveys for Professional Ecologists: Good Practice Guidelines (4th Edition). The Bat Conservation Trust, London.

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Institute of Lighting Professionals (2018) Bats and artificial lighting in the UK. The Bat Conservation Trust, London.

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Appendix A – Bat Roost Potential and Habitat Suitability Categories

Table 1 - Guidelines for assessing the potential suitability (structures and foraging habitats) of proposed development sites for bats, based on the presence of habitat features within the landscape (Collins, 2023).

Suitability	Description of Roosting Habitat	Commuting & Foraging Habitats
None	No obvious features on site likely to be used by any roosting bats at any time of the year (i.e. a complete absence of crevices/suitable shelter at all ground/underground levels)	No habitat features on site likely to be used by any commuting or foraging bats at any time of the year (i.e. no habitats that provide continuous lines of shade/protection for flight lines, or generate/shelter insect populations available to foraging bats).
Negligible	No obvious habitat features on site likely to be used by roosting bats, however, a small element of uncertainty remains as bats can use small and apparently unsuitable features on occasion.	No obvious habitat features on site likely to be used as flight-paths or by foraging bats, however, a small element of uncertainty remains in order to account for non-standard behaviour.
Low	A structure with one or more potential roost sites that could be used by individual bats opportunistically at any time of the year. However, these potential roost sites do not provide enough space, shelter, protection, appropriate conditions and/or suitable surrounding habitats to be used on a regular basis or by a larger number of bats (i.e. unlikely to be suitable maternity and not a classic cool/stable hibernation site but could be used by individual hibernating bats).	Habitat that could be used by small numbers of commuting bats such as a gappy hedgerow or unvegetated stream, but isolated i.e. not very well connected to the surrounding landscape by other habitat. Suitable, but isolated habitat that could be used by small numbers of foraging bats such as a lone tree (not in a parkland situation) or a patch of scrub.
Moderate	A structure or tree with one or more potential roost sites that could be used by bats due to their size, shelter, protection, conditions, and surrounding habitat but unlikely to support a roost of high conservation status (with respect to roost type only, such as maternity and hibernation – the categorisation described in this table is made irrespective of species conservation status, which is established after presence is confirmed).	Continuous habitat connected to the wider landscape that could be used by bats for flight-paths, such as lines of trees and scrub or linked back gardens. Habitat that is connected to the wider landscape that could be used by bats for foraging, such as trees, scrub, grassland or water.
High	A structure or tree with one or more potential roost sites that are obviously suitable for use by larger numbers of bats on a more regular basis, and potentially for longer periods of time due to their size, shelter, protection, conditions and surrounding habitat. These structures have the potential to support high conservation status roosts, e.g. maternity or classic cool/stable hibernation site.	Continuous high quality habitat that is well connected to the wider landscape that is likely to be used regularly by bats for flight-paths such as river valleys, streams, hedgerows, lines of trees and woodland edge. High quality habitat that is well connected to the wider landscape that is likely to be used regularly by foraging bats, such as broadleaved woodland, tree-lined watercourses and grazed parkland. Site is close and connected to known roosts.

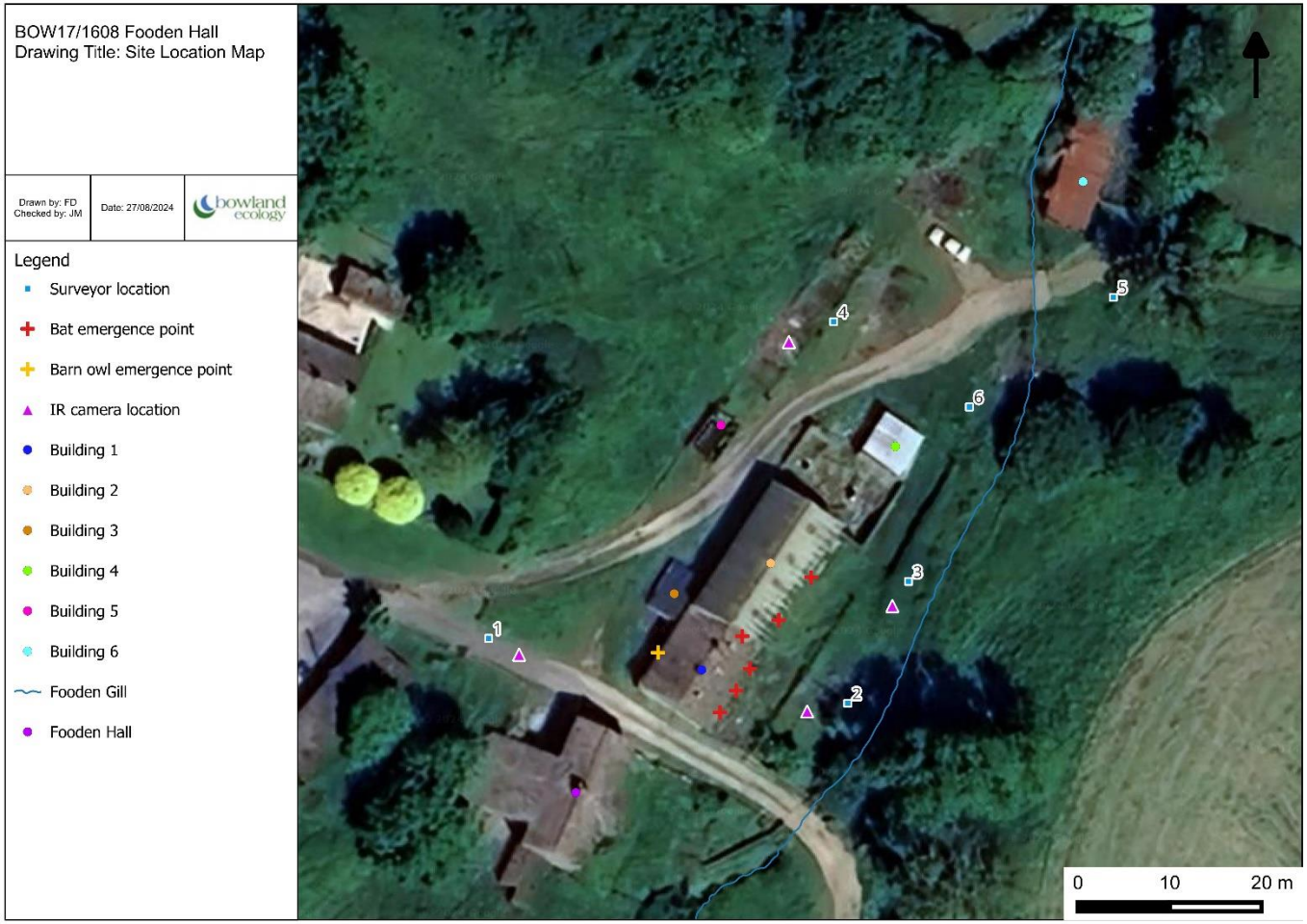
Table 2 - Guidelines for assessing the suitability of trees on (proposed development sites for bats

Suitability	Description
NONE	Either no PRFs in the tree or highly unlikely to be any
FAR	Further Assessment Required
PRF	A tree with at least one PRF Present

Table 3 - Guidelines for categorising the potential suitability of PRFs on trees on proposed development site for bats

Suitability	Description
NONE	Either no PRFs in the tree or highly unlikely to be any
PRF-I	Tree with PRF only suitable for individual bats or very small numbers of bats either due to size or lack of suitable surrounding habitats
PRF-M	Tree with PRF suitable for multiple bats and may therefore be used by a maternity colony
CONFIRMED	Confirmed bat roost identified

Appendix B – Site Location Map



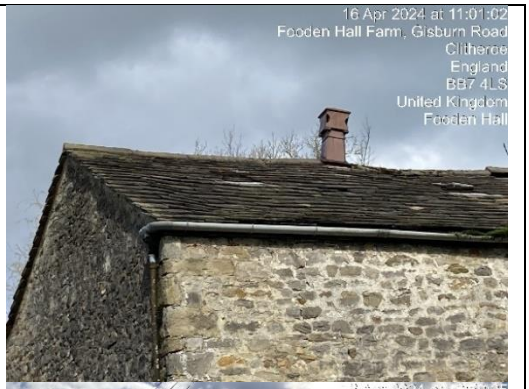
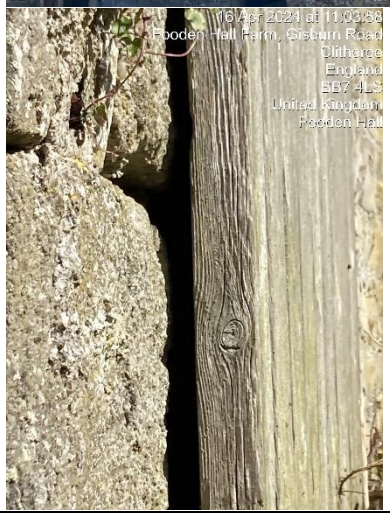
Appendix C – Roost Plan

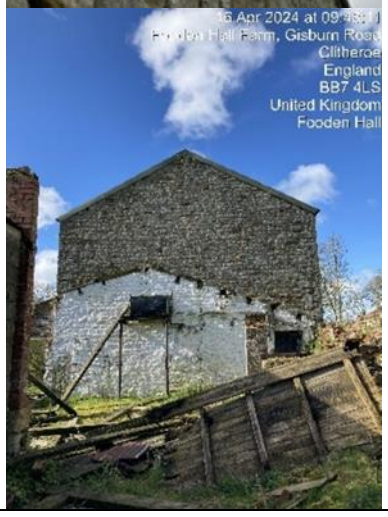
Emergence Point

Appendix D – PRA Notes

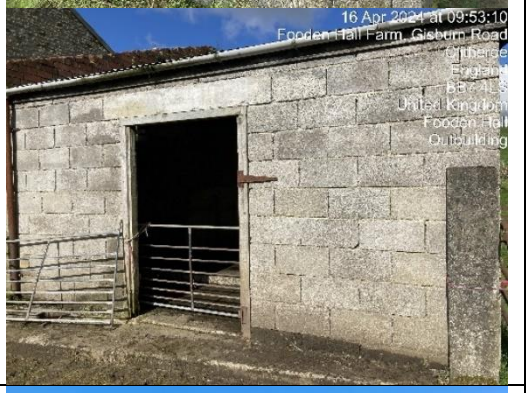
See the Surveyor Location Plan for location of each building.

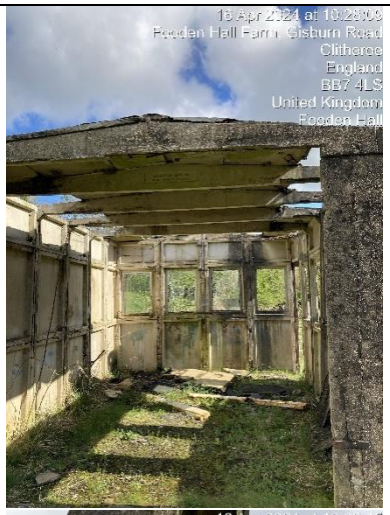
Feature	Description	Photograph
Small Barn (external)	The main barn is made up of two buildings. The smaller of the two is joined to the larger on its northeastern aspect. It is a stone two-story building with a tile roof. There are no barge boards/soffits, however there are gutters on the southeast and northwest aspects. There are unsealed windows and doors into the building, as well as some sealed with wood. PRF's include lifted tiles, gaps behind wooden fittings and gaps between the walls and roof. The building was assessed to be of moderate potential for bats. During the emergence surveys, bats were seen emerging from beneath the eaves on the southeast aspect, and a barn owl was seen emerging from the open arched window on the northwestern aspect.	  

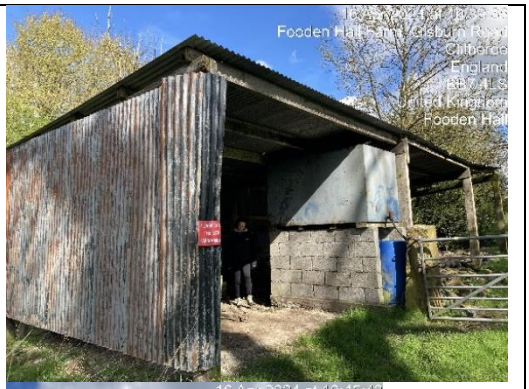
		 16 Apr 2024 at 11:01:02 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall  Fooden Hall Farm, Gisburn Road Clitheroe England United Kingdom Fooden Hall  16 Apr 2024 at 11:03:38 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall

Large Barn	The larger barn is similar construction to the smaller barn, however the roof has been replaced with a corrugated metal roof. There are also barge boards along the roof. PRF's include the barge boards, unsealed roof, missing mortar and gaps behind wooden fittings. The building was assessed to be of moderate potential for bats. During the surveys there were emergence from beneath the barge boards/the gap between walls and roof. Swallow nests were noted in the eaves.	   

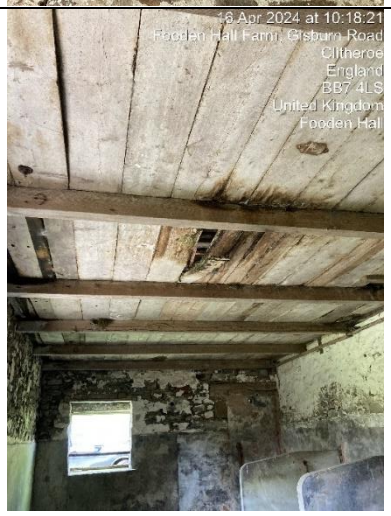
Extension	There is a small extension on the northwest aspect of the barns. The extension is constructed from breeze blocks, with a corrugated iron roof. PRFs are limited to beneath the lifted wooden barge board and where there is some missing mortar. The extension was assessed of low potential for bats. Ingress is possible into the barns and extension through the eaves, open windows and doors on all elevations. During the survey, one bat was seen briefly foraging within the extension. Swallow nests were noted within the extension.	  
Breeze block shed	A breeze block shed to the north of the barns. Multiple ingress points are noted but PRFs are limited to gaps beneath the corrugated metal roof and the walls. The shed was assessed as low potential for bats. Swallow nests were found inside the shed. No bats were noted using the building during the survey.	

		 
Concrete shed	A concrete shed is present to the northwest of the barns. The shed is semi-derelict, with PRFs limited to small gaps between concrete blocks and behind barge boards. No bats were seen using this building during the survey.	

		 16 Apr 2024 at 10:28:09 Fooden Hall Farm, Sistum Road Clitheroe England BB7 4LS United Kingdom Fooden Hall  16 Apr 2024 at 10:30:13 Fooden Lane, Bolton By Bowland Clitheroe England BB7 United Kingdom Fooden Hall

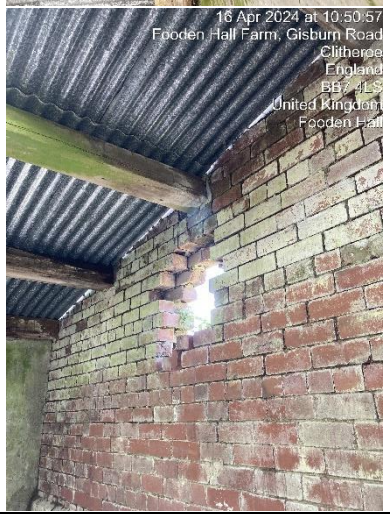
Metal shed (external)	The northernmost outbuilding is a corrugated metal shed. The shed is open on two sides and quite exposed, with no external PRFs. The shed was assessed as low potential for bats. No bats were seen using the building during any of the surveys.	 
Large barn (internal)	PRFs included wooden beams, gaps between beams and the ceiling/ roof and small cracks in the inner walls. No evidence of roosting bats was identified during the PRA. Swallow nests were identified in the lower room of the barn.	 

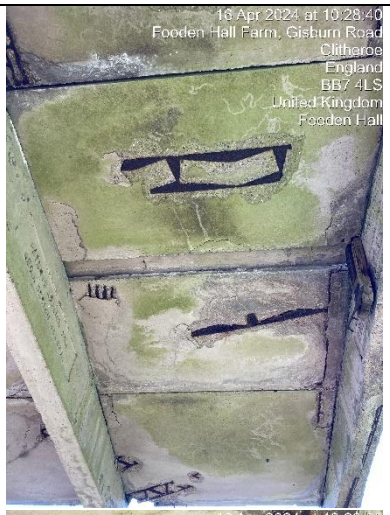
		  16 Apr 2024 at 10:07:18 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall  16 Apr 2024 at 10:13:29 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall

		 
Small barn (internal)	PRFs included wooden beams and gaps between beams and the ceiling/roof tiles. There was evidence of rot/damp in the wood of the barn, however the barn was mostly dry. No evidence of bats was identified during the PRA, however a barn owl was seen using the gap above the middle a-frame of the roof supports as a day roost. Owl droppings and barn owl feather were also noted here. Swallow nests were present within the lower room of the barn.	

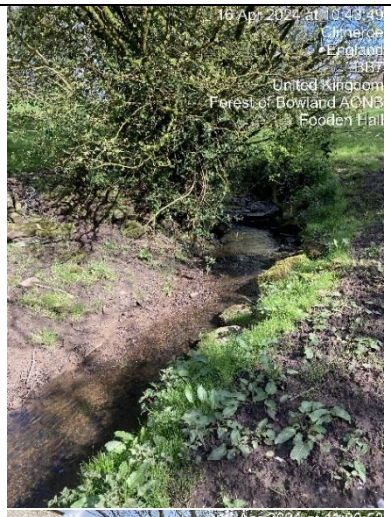
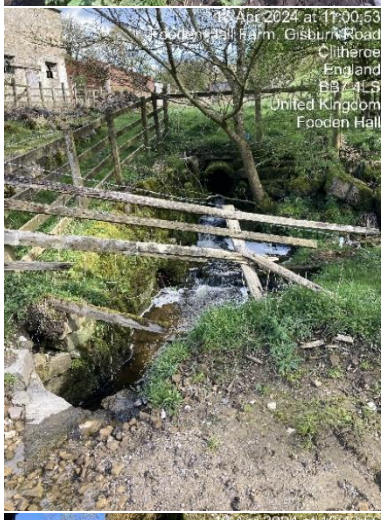
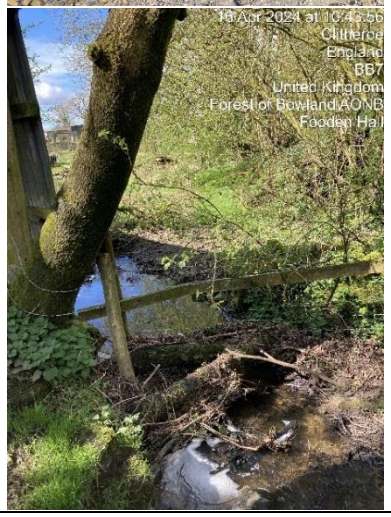
		 16 Apr 2024 at 10:14:52 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall  16 Apr 2024 at 10:20:54 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall  16 Apr 2024 at 10:24:58 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall

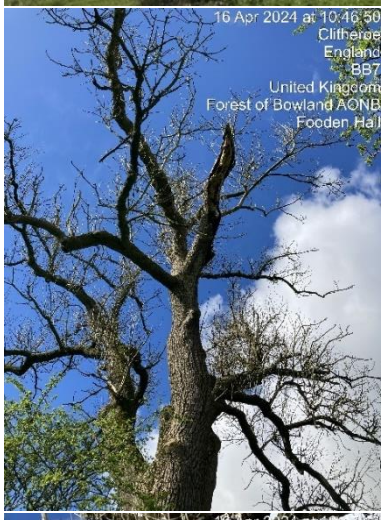
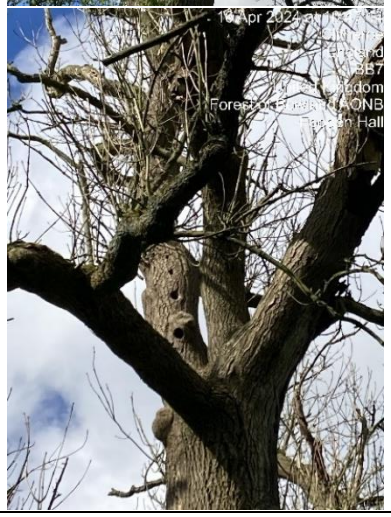
Extension (internal)	PRFs were limited to gaps behind the wooden beams. Swallow nests were identified.	 

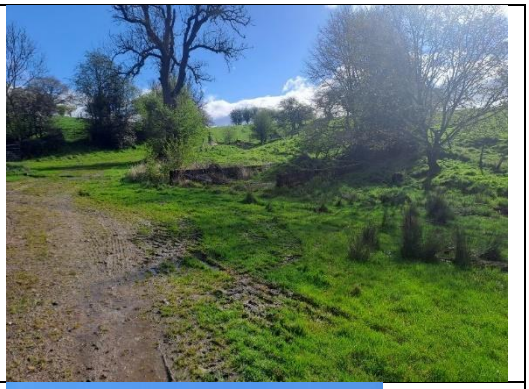
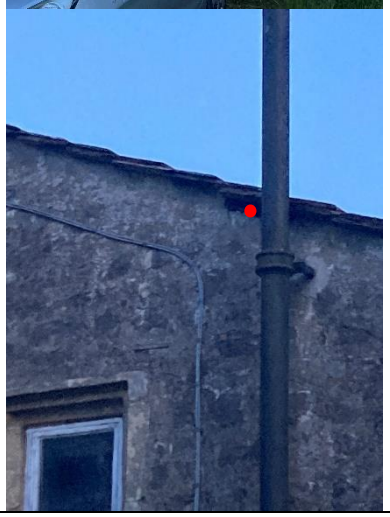
Breeze block shed (internal)	PRFs were limited to PRF-i in the gap behind the wooden ceiling beams. The shed is largely exposed and of low suitability for bats. No evidence of bats was seen during the PRA. Swallows nests were seen inside the shed.	 

Concrete shed (internal)	The shed internally was very exposed and largely unsuitable for bats. Potential PRF-i were present between gaps in the concrete blocks.	 
Metal shed (internal)	The metal shed is exposed and largely unsuitable for bats, with PRFs limited to gaps behind the wooden frame. Swallows nests were identified inside the shed.	

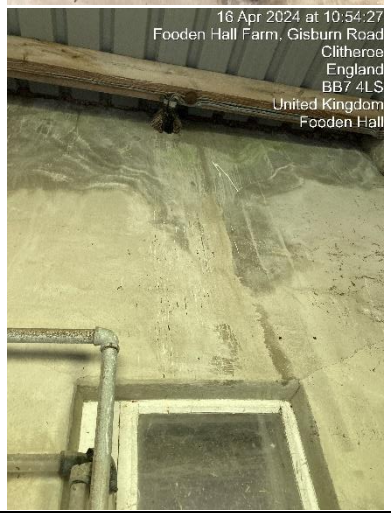
		
Demolished building	The remains of a brick building was present top the north of the barns. There were gaps present where there was missing mortar, however given the low value of this for roosting bats and the better value roosting habitat available nearby, this was assessed as having negligible value for bats.	 

Watercourse	Fooden Gill runs from the north to the south to the east of the outbuildings. This was lined with trees and vegetation, and was found to provide a commuting corridor for various bat species during the surveys.	  

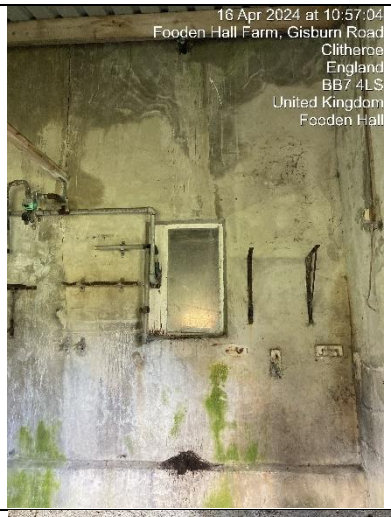
Tree	A large ash with deadwood was identified close to the site. Any impacts to this tree would require further surveys for bats.	  

Vegetation on-site	Vegetation on-site was largely ephemeral ruderal and modified grassland, however to the east of the barns along Fooden Gill there is a strip of grassland with a high sward, which would require a nesting bird check if vegetation clearance is carried out within nesting bird season.	
Fooden Hall	A pipistrelle roost was identified at Fooden Hall, adjacent to the barns.	 

Barn Owl	No evidence of barn owl was found during the PRA. A barn owl was seen exiting the building through the arched window above the door on the northwest aspect of the barn during the second bat survey. An inspection of the barn during the third bat survey found the barn owl using it as a day roost. The owl was perched in the chimney gap above the A-shaped roof frame (pictured right). Owl droppings and feathers show the owl has been using the barn for some time.	  

Swallows nests	Multiple unoccupied swallows nests were found within both barns, the metal shed and the breezeblock shed.	  

		 16 Apr 2024 at 10:17:49 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall   16 Apr 2024 at 10:18:09 Fooden Hall Farm, Gisburn Road Clitheroe England BB7 4LS United Kingdom Fooden Hall

		
European hare carcasses	Two dead European hare were found in the basement rooms of buildings 1 and 2.	 

Appendix E – Information Sheets for Contractors

BATS

Information, legal responsibilities and best practice for the construction industry

bowland ecology

Legal Protection

All UK Bat species are protected by European and UK law, in practical terms this means it is an offence to:

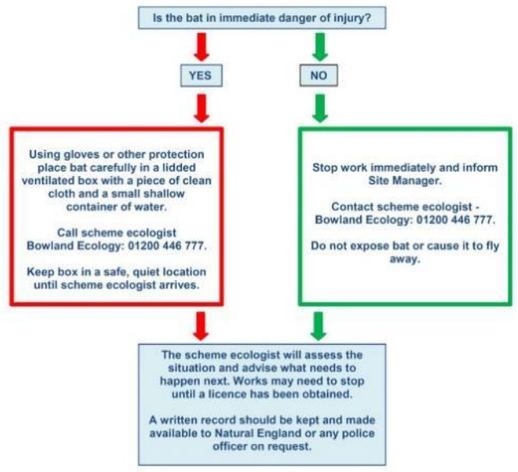
- Deliberately capture, injure or kill a bat;
- Deliberately disturb bats;
- Damage or destroy a breeding site or resting place (even if bats are not occupying the roost at the time);
- Intentionally or recklessly obstruct access to any structure or place used for shelter or protection or disturb a bat in such a place;
- Possess or advertise/sell/exchange a bat (dead or alive) or any part of a bat.

Penalties on conviction: the maximum fine is £5,000 per incident or per bat (some roosts contain several hundred bats), up to six months in prison, and forfeiture of items used to commit the offence, e.g. vehicles, plant, machinery.

Defences include:

1. Tending/caring for a bat solely for the purpose of restoring it to health and subsequent release.
2. Mercy killing where there is no reasonable hope of recovery (provided that person did not cause the injury in the first place – in which case the illegal act has already taken place).

Found a bat during unsupervised works?



Field signs of bat presence:

- Live or dead bats: the smallest UK bat species, the pipistrelle is only 3.5-4.5cm long.
- Droppings: bat droppings look like mouse droppings but will crumble between your fingers (they are dry and made entirely of insects).
- Feeding remains: piles of butterfly/moth wings are often left below bat feeding perches.

Schematic from www.bats.org.uk

Bats can roost in the following places:

- The top of gable end or dividing wall;
- The top of chimney breasts;
- Ridge and hip beams and other roof beams;
- Mortise and tension joints;
- All beams/ceilings/pipework (free hanging bats);
- The junction of roof timbers, especially where ridge and hip beams meet;
- Behind purlins;
- Between tiles and the roof lining;
- Under flat felt roofs;
- Under barge boards;
- In cavity walls;
- In cracks in stone or concrete;
- Behind peeling paint/wall coverings;
- Gaps behind window and door frames;
- Between window panes and timber boarding.
- In trees (cracks/holes/ivy cladding).

Why wear gloves?

There is a small risk that some bats carry a rabies virus – European Bat Lyssavirus. The purpose of wearing gloves is to reduce the chance of being bitten, as the virus is transmitted via bat saliva. Thick leather gloves are appropriate for removing a bat from imminent danger but these should be clean.

In the event that you are bitten, wash the wound, gently but thoroughly, with soap and water. Speak to a health professional immediately, advising them that you have been bitten by a bat.

References:
Bat Conservation Trust. August 2016. Why wear gloves when handling bats?
BCT Bat Surveys for Professional Ecologists, Good Practice Guidelines, 3rd Edition, 2016

version 1 August 2017

Water Voles

Information, legal responsibilities and best practice for the construction industry

Legal Information

Water Voles receives protection under Schedule 5 of the Wildlife and Countryside Act 1981 European and UK law, in practical terms this means it is an offence to;

- Deliberately capture, injure or kill a water vole
- Deliberately damage, destroy or block access to a water vole place of shelter or protection
- Deliberately disturb a water vole in a place of shelter or protection
- Possess, sell, control or transport live or dead water vole, or parts of water vole

Penalties on conviction: the maximum fine is £5,000, up to six months in prison, per offence and forfeiture of items used to commit the offence, e.g. vehicles, plant, machinery.

Under new legislations of Schedule 16 of the Wildlife and Countryside Act 1981 disturbance licenses are able to be obtained.

Activities that can affect water vole include:

- Destroying or disturbing their habitat
- Destroying or disturbing places used for shelter or protection
- Changing water quality

Procedure if water vole are found:

If you find a water vole or suspect water vole to be present you must **stop works immediately** and contact the **project manager**. Contractors should avoid handling water vole. If handling is absolutely essential to move water vole away from harm, gloves must be worn.

If water vole is in imminent danger

Stop works ---------- > Gloves on ---------- > place water vole in a box/safe place ---------- > Call Bowland Ecology (Tel. 01200 446777)

Water vole is not in immediate danger

Stop works - - - - - > Call Bowland Ecology (Tel. 01200 446777)

Recognising water vole and water vole signs:

Water vole burrows are generally oval shaped, usually 5-8cm wide, often seen along the water's edge but with some under the waterline used as bolt holes. There is sometimes an obvious fan of mud around the burrow which may have feeding signs or a latrine on.

Water vole droppings are usually 8-10mm long, with virtually no odour and a very distinctive cylindrical shape with rounded, or blunt ends (similar in size and shape to a 'tic tac' mint). They can be various colours from green and brown to black or even purple depending on the fruit or vegetation eaten.

Water vole prints are usually about 15-25mm from toe to heel but are easily confused with brown rat prints. As with other rodents the fore print has four toes arranged in a star shape and the hind has five with the outer toes splayed.

Otters

Information, legal responsibilities and best practice for the construction industry

Legal Information

Otters are protected by European and UK law, in practical terms this means it is an offence to;

- Intentionally kill, injure, disturb or capture an otter
- Damage or destroy a breeding or resting place
- Obstruct access to their resting or sheltering places
- Possess, sell, control or transport live or dead otters, or parts of otters

Penalties on conviction: the maximum fine is £5,000, up to six months in prison, per offence and forfeiture of items used to commit the offence, e.g. vehicles, plant, machinery

Activities that can affect otters include:

- Habitat loss or degradation in or near water bodies
- Habitats being cut off and becoming fragmented
- Holts and resting places being removed
- Disturbance to resting and feeding places
- Disturbing their usual routes
- Changes to water quality which could affect food sources

Procedure if otters are found:

If you find an otter, holt, sign or suspect otter to be present you must **stop works immediately** and contact **the project manager**. Contractors should avoid disturbing otter or working within 30 m of an otter or holt.

Otter is (not) in immediate danger

Stop works - - - - - > Call Bowland Ecology (Tel. 01200 446777)

Recognising otters and otter signs:

Otters are large sleek mammals, with bodies (excluding tails) reaching up to 95cm long. They have brown fur on the tops of their bodies, with cream fur on their necks and bellies.

Otters are shy and may only be see in the water (only nose and eyes will be seen). They create holts (setts of holes), normally on slopes close to water such as river banks.

Another sign of otters is the presence of spraint. Otters usually deposit spraint on prominent. features near water, such as rocks/boulders within watercourses, fallen trees and bridge supports. Spraints help otters defend/mark territories and find mates.

Prey remains are clearly visible within spraint. These remains could include fur, fragments of feathers/insects and bones. If the spraint is fresh, black mucus will bind all the components together. Additionally it will emit a distinct 'sweet' odour when fresh. As it ages it will become more crumbly with a grey colouration.

Otter prints are often found in areas of mud and sand such as river/estuary banks. Otter prints have five toes extending around the top of a large pad. **Sometimes only four toes may visible which can confuse identification.** Otter prints do not usually exceed 7cm.

Appendix F – Legal Information

This report provides guidance of potential offences as part of the impact assessment. This report does not provide detailed legal advice and for full details of potential offences against protected species the relevant acts should be consulted in their original forms i.e. The Wildlife and Countryside Act, 1981, as amended, The Countryside and Rights of Way Act 2000, The Natural Environment and Rural Communities Act, 2006 and The Conservation of Habitats and Species Regulations 2017.

Species	Legislation	Offences	Notes on licensing procedures and further advice
Species that are protected by European and national legislation			
Bats *European protected species*	Conservation of Habitats and Species Regulations 2017 Reg 41	Deliberately[1] capture, injure or kill a bat; Deliberate disturbance[2] of bats; Damage or destroy a breeding site or resting place used by a bat. The protection of bat roosts is considered to apply regardless of whether bats are present.	An NE licence in respect of development is required in England. https://www.gov.uk/bats-protection-surveys-and-licences *European Protected Species: Mitigation Licensing- How to get a licence* (NE 2010) *Bat Mitigation Guidelines* (English Nature 2004) *Bat Workers Manual* (JNCC 2004) *BS8596:2015 Surveying for bats in trees and woodland* (BSI, 2015)
	Wildlife and Countryside Act 1981 (as amended)[4] S.9	Intentionally or recklessly[3] obstruct access to any structure or place used for shelter or protection or disturb a bat in such a place.	Licence from NE is required for surveys (scientific purposes) that would involve disturbance of bats or entering a known or suspected roost site.
Water vole	Wildlife and Countryside Act 1981 (as amended)[4] S.9 & S16	Intentionally kill, injure or take water voles; Intentionally or recklessly[3] damage, destroy or obstruct access to any structure or place used for shelter or protection; Disturb a water vole in such a place.	No licence is required for survey in England, unless you are likely to commit an action that is otherwise illegal. There are currently no licensing purposes that explicitly cover development activities or activities associated with the improvement or maintenance of waterways. However when a proposed lawful activity has no opportunity to retain water voles within a development site and their translocation would result in a conservation benefit then a licence from NE may be obtained. *The Water Vole Conservation Handbook* (R. Strachan, T. Moorhouse & M. Gelling, Wildlife Conservation Research Unit (WildCRU), 3rd Edition 2011). https://www.gov.uk/water-voles-protection-surveys-and-licences Water voles and development licensing policy - NE Technical Information Note TIN042 2008
Otter	Conservation of Habitats and Species	Deliberately[1] capture, injure or kill an otter; Deliberate disturbance[2] of otters;	Licences issued for development by NE. https://www.gov.uk/otters-protection-surveys-and-licences

Species	Legislation	Offences	Notes on licensing procedures and further advice
European protected species	Regulations 2017 Reg 41	Damage or destroy a breeding site or resting place used by an otter.	*European Protected Species: Mitigation Licensing- How to get a licence* (NE 2010)
	Wildlife and Countryside Act 1981 (as amended)[4] S.9	Intentionally or recklessly[3] obstruct access to any structure or place used for shelter or protection or disturb an otter in such a place.	No licence is required for survey in England. However, a licence would be required if the survey methodology involved disturbance.
Rabbits, foxes and other wild mammals **For BAP species and Species of Principal Importance, see below**	Wild Mammals (Protection) Act 1996	Intentionally inflict unnecessary suffering to any wild mammal.	Natural England provides guidance in relation to rabbits (Technical Information note TIN003, Rabbits- management options for preventing damage, July 2007) and foxes (which are also protected under the Wildlife and Countryside Act 1981 from live baits and decoys, see Species Information notes SIN003 (2011), *Urban foxes* and SIN004 (2011) *The red fox in rural areas* as well as other wild mammals. Lawful and humane pest control of these species is permitted.
Birds	Conservation of Habitats and Species (Amendment) Regulations 2012	N/A	Authorities are required to take steps to ensure the preservation, maintenance and re-establishment of a sufficient diversity and area of habitat for wild birds in the United Kingdom, including by means of the upkeep, management and creation of such habitat. This includes activities in relation to town and country planning functions.
	Wildlife and Countryside Act 1981 (as amended)[4] S.1	Intentionally kill, injure or take any wild bird; Intentionally take, damage or destroy the nest of any wild bird while that nest is in use or being built; Intentionally take or destroy the nest or eggs of any wild bird. **Schedule 1 species** Special penalties are liable for these offences involving birds on Schedule 1 (e.g. most birds of prey, kingfisher, barn owl, black redstart, little ringed plover). Intentionally or recklessly[3] disturb a Schedule 1 species while it is building a nest or is in, on or near a nest containing eggs or young; intentionally or recklessly disturb dependent young of such a species.	No licences are available to disturb any birds in regard to development. Licences are available in certain circumstances to damage or destroy nests, but these only apply to the list of licensable activities in the Act and do not cover development. General licences are available in respect of 'pest species' but only for certain very specific purposes e.g. public health, public safety, air safety. https://www.gov.uk/wild-birds-protection-surveys-and-licences https://www.gov.uk/prevent-wild-birds-damaging-your-land-farm-or-business
	Wildlife and Countryside Act 1981 (as amended)[4] S.9	Intentionally or recklessly[3] obstruct access to any structure or place used for shelter or protection or disturb a great crested newt in such a place.	Licences issued for science (survey), education and conservation by NE.

[1] Deliberate capture or killing is taken to include "accepting the possibility" of such capture or killing [2] Deliberate 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 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. Lower levels of disturbance not covered by the Conservation of Habitats and Species Regulations 2017 remain an offence under the Wildlife and Countryside Act 1981 although a defence is available where such actions are the incidental result of a lawful activity that could not reasonably be avoided. Thus deliberate disturbance that does not result in either (a) or (b) above would be classed as a lower level of disturbance. [3] The term 'reckless' is defined by the case of Regina versus Caldwell 1982. The prosecution has to show that a person deliberately took an unacceptable risk, or failed to notice or consider an obvious risk. [4] The Wildlife and Countryside Act (1981) has been updated by various amendments, including the Countryside and Rights of Way Act 2000 and the Natural Environment and Rural Communities Act 2006. A full list of amendments can be found at https://jncc.gov.uk/our-work/wildlife-countryside-act/