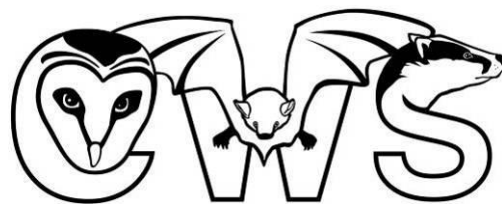


Bat Survey Report for The Old Blacksmiths, Todenham, Moreton-in-Marsh, GL56 9PF



Cotswold Wildlife Surveys

7th April 2023

QUALITY CONTROL

Date	Version	Name
07.04.23	Daytime inspection	Andy Warren – BSc (Hons), MA (LM), Tech Cert (Arbor A), MCIEEM, TechArborA Director
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The information in this report has been prepared in accordance with the Chartered Institute of Ecology and Environmental Management’s (CIEEM) Code of Professional Conduct. The conclusions and recommendations expressed are reasoned judgements based on the evidence.

Every reasonable attempt has been made to comply with BS42020:2013 *Biodiversity – Code of practice for planning and development*, CIEEM *Guidelines for Ecological Report Writing* (CIEEM, 2017) and Bat Conservation Trust’s *Bat Surveys for Professional Ecologists: Good Practice Guidelines* (3rd edition, Collins, 2016). If there has been deviation from recognised practice, justification/explanation has been given.

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SUMMARY

At The Old Blacksmiths in Todenham near Moreton-in-Marsh, a diurnal inspection was undertaken on 7th April 2023 to assess the building for signs of bat occupation.

All the external and internal structures, especially those associated with the roof and walls of the building were examined.

No signs of bat activity or occupation were found, and the suitability for roosting pipistrelles *Pipistrellus sp* or other bat species was considered to be negligible. Indeed, the roof was largely all missing and the structure was completely exposed to the weather.

At the time of the survey The Old Blacksmiths was not identified as a bat roost, and as such no further surveys or mitigation measures are required.

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No old or in-use birds' nests were noted inside or outside the building.

1. INTRODUCTION

In April 2023, Cotswold Wildlife Surveys was instructed by Buildcore Ltd, to undertake a bat survey of The Old Blacksmiths in Todenham near Moreton-in-Marsh. On 7th April 2023, a visit was made to the property to carry out a diurnal inspection of the building to check for signs of bat occupation.

The result of the survey is contained in this report.

In England, Scotland and Wales, all bat species are fully protected under the Wildlife and Countryside Act 1981 (WCA) (as amended), through inclusion in Schedule 5. In England and Wales this Act has been amended by the Countryside and Rights of Way Act 2000 (CRoW) and the Natural Environment and Rural Communities Act 2006 (NERC), which add an extra offence, makes species offences arrestable, increases the time limits for some prosecutions, and increases penalties.

All bats are also included in Schedule 2 of the Conservation (Natural Habitats, & c.) Regulations (the Habitats Regulations), which defines 'European protected species of animals'. In England this is the Conservation of Habitats and Species Regulations 2010, in Scotland the Habitat Regulations 1994 (as amended), and in Northern Ireland the Conservation Regulations 1995.

All bats are also protected under the Bern Convention Appendix II, the Bonn Convention Appendix II, and the Wild Mammals (Protection) Act 1996.

The above legislation can be summarised thus (Mitchell-Jones and McLeish, 2004):

- *Intentionally or deliberately kill, injure or capture (or take) bats;*
- *Deliberately disturb bats (whether in a roost or not);*
- *Recklessly disturb roosting bats or obstruct access to their roosts;*
- *Damage or destroy roosts;*
- *Possess or transport a bat or any part of a part of a bat, unless acquired legally;*
- *Sell (or offer for sale) or exchange bats, or parts of bats.*

The word 'roost' is not used in the legislation, but is used here for simplicity. The actual wording is 'any structure or place which any wild animal...uses for shelter or protection' (WCA), or 'breeding site or resting place' (Habitats Regulations).

As bats generally have both a winter and a summer roost, the legislation is clear that all roosts are protected whether bats are in residence at the time or not.

2. METHODOLOGY

In order to fully assess bat occupation of a particular site, the Bat Conservation Trust (2016) recommends that information gathered from a desk study of known bat records, and a daytime site walkover, is used to inform the type and extent of future bat survey work, potentially including nocturnal surveys.

The diurnal walkover provides an opportunity to check for signs of occupancy, such as droppings, scratch marks, feeding remains, carcasses, or even animals in residence, whilst nocturnal surveys (if required) allow numbers and species of bats to be confirmed. The latter are also used to determine the presence or absence of bats, where signs of bat activity are indeterminate or absent but suitability of roosting is considered to be medium to high.

Roosting places vary depending on the species. Pipistrelles usually inhabit narrow cracks or cavities around the outside of buildings, but they will roost in similar niches inside larger barns. Typical sites include soffit spaces, gaps behind fascia boards and end rafters, crevices around the ends of projecting purlins, under warped or lifted roof and ridge tiles, or in gaps in stone and brickwork where mortar has dropped out.

Larger species such as Brown Long-eared Bats *Plecotus auritus*, Myotis bats (Natterer's *Myotis nattereri* and Whiskered/Brandt's *M. mystacinus*/*M. brandtii*), and Lesser Horseshoes *Rhinolophus hipposideros*, like to roost in the roof voids of buildings, and can often be found hanging singly or in small groups from ridge boards or roof timbers, especially where these butt up against gable walls or chimney breasts. They especially favour older structures with timber frames. Here they squeeze into tight crevices making them difficult to observe.

Diurnal walkovers can be carried out at any time of the year, but nocturnal surveys should only be undertaken when bats are out of hibernation and in their summer roosts. The recommended period is from May to September inclusive, with May to August optimum and September sub-optimum. The season can be extended into October, although particularly cold weather will render this inadvisable. Indeed, the air temperature at the start of each survey must be at least 10°C or above.

Visits will be a minimum of two weeks apart, and the number of surveys is dependent on the evidence found or the suitability of the site to bats.

Where bats are found, or there is evidence of bat occupation or activity, i.e. that bat use is confirmed, the number and timing of visits will be decided by the ecologist, and will be appropriate for the type of roost. In general at least two nocturnal surveys will be carried out, both of which can be emergence surveys, or one emergence and one dawn re-entry.

Where there is no evidence of bat presence, and no suitability for roosting, no nocturnal surveys will be needed.

For a site with no evidence but low suitability, just one nocturnal emergence survey is required, this to be in the optimum period.

For medium suitability a minimum of two visits are needed, of which one must be in the optimum period, and one must be a dawn re-entry survey. With high suitability, three visits will be necessary, of which two must be in the optimum period. At least one of these must be a dawn re-entry survey, with the third visit either an emergence or a dawn re-entry.

For sites < 5 ha in size, and/or regularly shaped structures, at least two surveyors must be present, with more surveyors at larger sites and more complex buildings, e.g. those with multiple elevations and/or roof structures.

On 7th April 2023 a thorough inspection of The Old Blacksmiths was made by Andy Warren (Natural England bat licence No. CL18-2015-16489-CLS-CLS), including the exterior and interior walls, roof covering, roof void, eaves, gables, window casements and door frames.

10x42 binoculars and a Fenix TK75 torch were used for the inaccessible/unreachable areas. On this occasion an endoscope was not used, as there were no crevices and cavities that could not be inspected with a torch or by use of binoculars from a ladder.

The result of the survey is detailed in Section 3.

3. RESULTS

3.1 Desk Study

In view of the small scale of the proposed works, the likely low impact on bats, and in line with current guidance on accessing and using biodiversity data (CIEEM, 2016), a background data search was not carried out in this case.

3.2 Location

Todenham is a village located approximately 4.25 km northeast of Moreton-in-Marsh. The Old Blacksmiths lies next to the former Farriers Arms at the eastern end of the village. The Ordnance Survey Grid Reference of the building is SP 24308 36293 (Appendix 1).

3.3 Site Description

The survey site comprised a small, derelict, brick building with no roof covering (Figs. 1 and 2).



Figs. 1 & 2 Front and rear views of The Old Blacksmiths

The building was constructed against raised ground on which lay the village church and churchyard (Fig. 3). At the eastern end it adjoined the former Farriers Arms public house, and faced the main road through the village, with just a small area of gravelled hardstanding at the front (Fig. 4).



Figs. 3 & 4 Churchyard to rear (L) and road through village (R)

The layout of the site is shown in the aerial photograph in Appendix 2.

3.4 Building Survey

3.4.1 Bats

The daytime inspection was carried out on 7th April 2023 commencing at 15:30. The weather conditions during the time of the survey were recorded and are presented in Table 1 below.

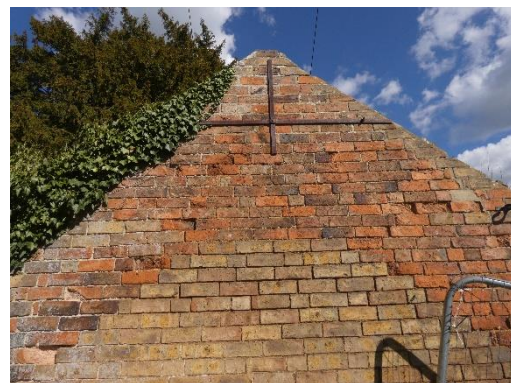
Parameter	Value
Temperature (°C)	14.5
Cloud cover (%)	0
Precipitation	None
Wind speed (Beaufort scale)	0

Table 1 Weather conditions during the diurnal survey

The roof of the building was in very poor condition, with no tiles or slates on either roof slope and all the timbers were exposed (Figs. 5-7). In places there were the remnants of a tiled felt lining, but most of this was missing. There were no eaves and no roof verge (Fig. 8).



Figs. 5 & 6 Untiled roof at front



Figs. 7 & 8 Untiled roof at rear and gable end

The brick walls were also in poor condition, with a large hole in the rear wall.

The windows were only partially glazed, but the casements were tightly fitting. There were gaps around the doors.

No signs of bat activity were found around the outside of the building.

Internally the building was scaffolded, this extending into the open roof space (Figs. 9 and 10).



Figs. 9 & 10 Interior of building

The roof was partially lined with the aforementioned tarred felt, and Ivy *Hedera helix* was penetrating from the churchyard (Figs. 11 and 12).



Figs. 11 & 12 Underside of roof of building

The building was separated into two rooms with a full height dividing wall. This contained a wide crack and was in imminent danger of collapse (Fig. 13).

The whole interior was very brightly illuminated by the missing roof covering and through the windows (Fig. 14).

No evidence of bat occupation was discovered inside the building, and it was considered unsuitable for roosting bats.



Figs. 13 & 14 Crack in internal wall (L) and windows (R)

3.4.2 Other species

Apart from spiders and insects, there were no signs of other species using the building. There were no old or in-use birds' nests.

4. CONCLUSIONS AND RECOMMENDATIONS

Bats tend to be seasonal visitors to properties, and are not usually in occupation all year round. The females normally form maternity colonies during May or June and then leave for adjacent trees and/or woodland during July or August once the young bats are able to fly and become independent. Here they will spend the winter months in hibernation before returning to the house or barn the following spring.

Male bats generally live alone and have a number of favoured roosts. During the summer they visit each of these for a few days at a time, before moving to their chosen hibernation site in mid-late October. Different species have different habits, but this seasonal movement is common to all.

Bats choose their roosts carefully. During the summer they look for sites which are warmed by the sun, and as a result are most often found on the south and western side of buildings.

Pipistrelles, our smallest and commonest bats, prefer to roost in very confined spaces around the outside of buildings, typical places being behind hanging tiles, weather boarding, soffit, barge and eave boarding, between roof felt and roof tiles or in cavity walls.

As such they can be difficult to find, so the suitability for roosting was also assessed.

This was considered to be negligible, as there were no suitable gaps for roosting.

Another bat frequently encountered in buildings is the Brown Long-eared. This is also a common species, but unlike pipistrelles, they prefer the dry, warm space of the loft or roof void, and can often be found hanging from roof timbers, especially rafters and the ridge board next to chimney breasts.

No signs of Brown Long-eared Bat activity were found, nor indeed signs of other species which are commonly found in roof spaces, and the building was considered unsuitable for void dwelling bats.

At the time of the survey The Old Blacksmiths not identified as a bat roost, and as such no further surveys or mitigation measures are required.

*

There were no old or in-use birds' nests in or on the building.

5. REFERENCES

Collins, J. (ed.) (2016). *Bat Surveys for Professional Ecologists: Good Practice Guidelines. (3rd edn).* Bat Conservation Trust, London.

English Nature, 2004. *Bat mitigation guidelines.* English Nature, Peterborough.

Mitchell-Jones A. J. & McLeish, 2004. *Bat Workers' Manual.* Joint Nature Conservation Committee, Peterborough.

Stebbins R.E., 1986. *Which bat is it?* The Mammal Society and The Vincent Wildlife Trust, London.

The Vincent Wildlife Trust, 2003. *The Bats of Britain and Ireland.* The Vincent Wildlife Trust, Ledbury.

APPENDICES

Appendix 1: Location plan

Appendix 2: Site layout

Appendix 1: Location plan



The Old Blacksmiths, Todenham

Appendix 2: Site layout



The Old Blacksmiths

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