

# The Mount, Terwick Lane, Dumpford, W.Sussex. GU31 5JN.

## Phase 1 Daytime Bat Assessment



**S.G. Dodd MSc MCIEEM MRES**

[Class Licence Registration Number 2020-48628-CLS-CLS]

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**Prepared for:** Lady Haddon-Cave, The Mount, Terwick Lane, Dumpford, W.Sussex, GU31 5JN

## Quality Control

The information and data which has been prepared and provided is true and has been prepared and provided in accordance with the *Code of Professional Conduct issued by the Chartered Institute of Ecology and Environmental Management (CIEEM)*. We confirm that the opinions expressed are our true and professional bona fide opinions.

		Date
Survey Ecologist	Scotty Dodd MSc MCIEEM MRES  [Class Licence Registration Number 2020-48628-CLS-CLS]	Survey date: 05/08/2021
Report Author	Scotty Dodd MSc MCIEEM MRES  [Class Licence Registration Number 2020-48628-CLS-CLS]	Submission date: 10/08/2021

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## Executive Summary

Consultant Ecologist S.G.Dodd MSc MCIEEM MRES was commissioned by Lady Haddon-Cave (Owner) to undertake a Phase 1 Daytime Bat Assessment of The Mount, Terwick Lane, Dumpford, W.Sussex, GU31 5JN. This is required to support a planning application seeking to:

1. Two storey extension to eastern elevation keying into existing roof void at gable end.
2. Two storey extension to western corner of southern elevation of main house, emerging from existing catslide roof and keying in to ridge of south-facing roof pitch.
3. Single storey infill extension between western elevation of main house and southern elevation of north-west wing.
4. Single storey extension to southern elevation existing porch and sun room.
5. A wooden outbuilding with a corrugated tin roof will be converted into temporary habitable accommodation. The existing door will be replaced with a glass French doors.

The Daytime Bat Assessment / Phase 1 Bat Survey was undertaken on the 5<sup>th</sup> August 2021 in accordance with the Bat Conservation Trust Guidelines (Collins, 2016).

The Mount has a **confirmed roost** of Brown Long-eared bats *Plecotus auritus* in the roof void of the main house. A social cluster of approximately ten bats was noted. Further colony members may be present in inaccessible areas of the roof void. At a time of year when bats gather to produce their young, this is likely to be a small **maternity roost**. Most, if not all, of this year's bat pups would by now be developed juveniles and indistinguishable from adults without close examination, which would be disturbing to the bats at a highly sensitive time of year. Brown Long-eared bats are also using the roof void of the north-west wing, as evidenced by numerous droppings, but no bats being observed. However, this void will not be affected by the proposed works.

In general the building has a high suitability for roosting bats with external features such as tile gaps present, particularly in association with the older parts of the building where a two storey extension is proposed for the southern elevation that will result in the loss of the existing catslide roof and concealed void beneath and will key into the ridge of the south-facing pitch, which is connected to the area of roof void where the bats were observed to be roosting. A further two storey extension will key into the gable end at the eastern elevation, extremely close to where the maternity colony is situated. These external potential roost

features have high suitability for external crevice dwelling species, such as *Pipistrellus* species. Therefore, a sequence of **Phase 2 dusk emergence / dawn return surveys is required to further characterise the roost and inform a licence application to undertake the proposed works.**

The outbuilding has negligible potential to support roosting bats.

The wider area is rural with arable and pasture. There is high suitability for bats with foraging opportunities in gardens and nearby heathland and woodland, also along hedgerows, lines of trees and river corridor. However, these features will not be affected by the works provided that any recommendations are followed.

### **Recommendations**

Recommendations and ecological enhancements to be provided after conclusion of Phase 2 surveys.

## 1.0 INTRODUCTION

### 1.1 Background

I was contracted by the Client to undertake a Phase 1 Daytime Bat assessment of The Mount, Terwick Lane, Dumpford, W.Sussex, GU31 5JN. This report presents the findings of the survey undertaken on the 5<sup>th</sup> August 2021.

### 1.2 Site Setting and Description

The Mount is a detached two storey dwelling situated along a private track spurring off of Terwick Lane, Dumpford in a rural location to the west of Midhurst and within the boundary of the South Downs National Park.

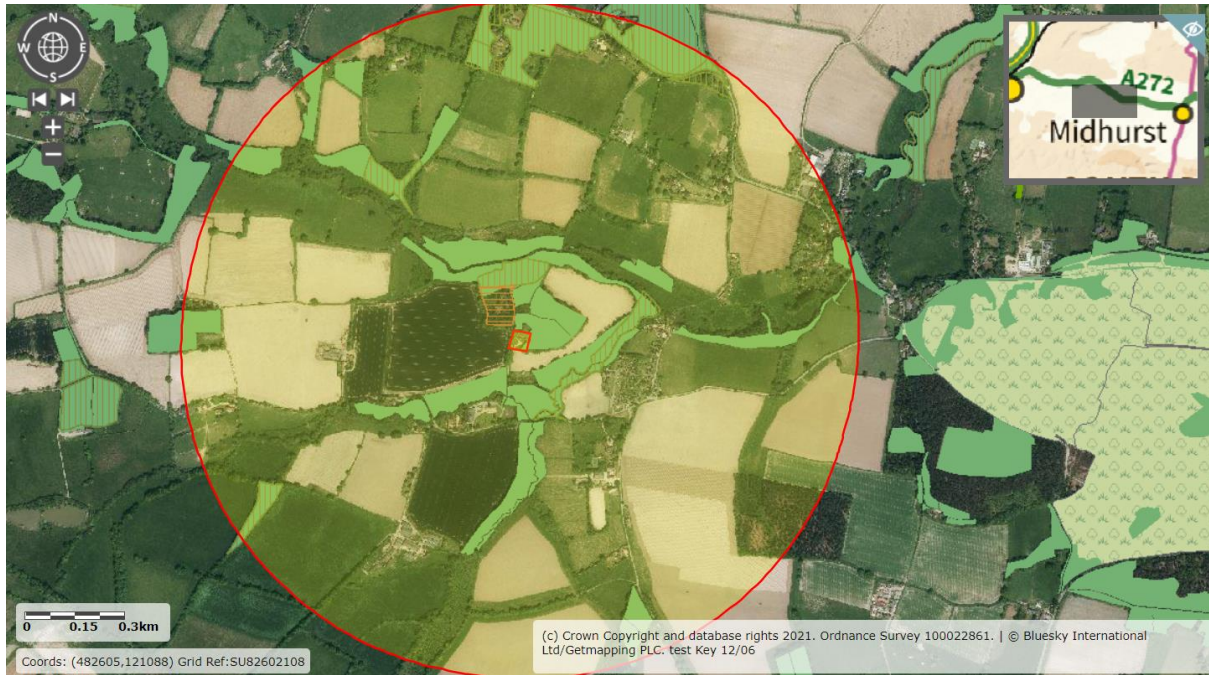
The wider area is rural with arable and pasture. There is high suitability for bats with foraging opportunities in gardens and nearby heathland and woodland, also along hedgerows, lines of trees and river corridor. The River Rother lies approximately 250m to the north.

The property is situated at OSGR SU 8263 2210.



**Figure 1:** Site location within 1km search area (red outlines). Image produced courtesy of Magic maps (<http://www.magic.gov.uk/>, contains public sector information licensed under the Open Government Licence v3.0)





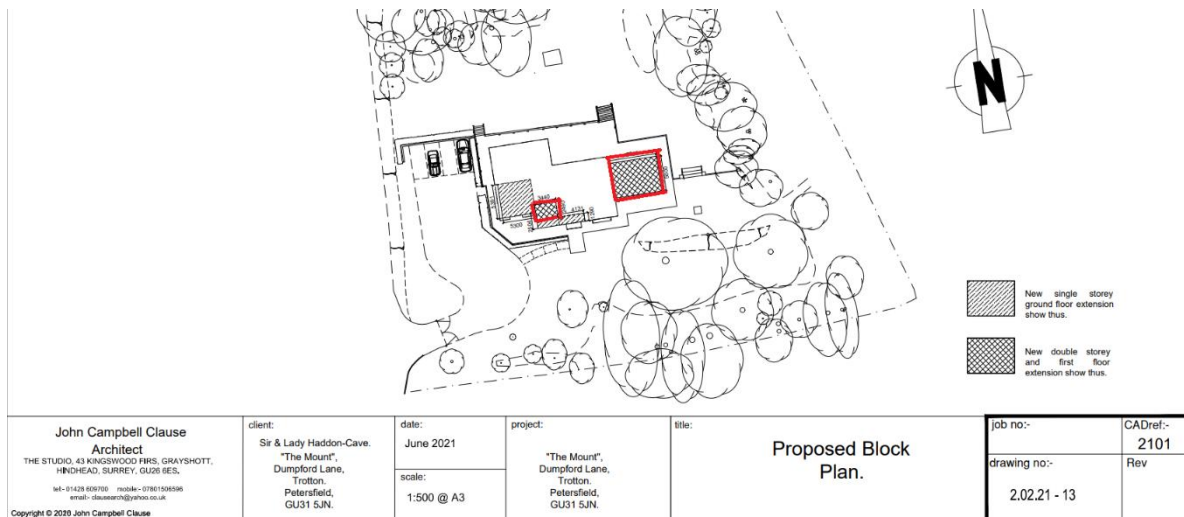
**Figure 2:** Aerial image showing surrounding habitats and woodland highlighted in green, hatched areas represent ancient woodland, within 1km search area (red outline). Image produced courtesy of Magic maps (<http://www.magic.gov.uk/>, contains public sector information licensed under the Open Government Licence v3.0)

### 1.3 Site Proposals

The project is seeking planning approval to make the following changes to the property:

1. Two storey extension to eastern elevation keying into existing roof void at gable end.
2. Two storey extension to western corner of southern elevation of main house, emerging from existing catslide roof and keying in to ridge of south-facing roof pitch.
3. Single storey infill extension between western elevation of main house and southern elevation of north-west wing.
4. Single storey extension to southern elevation existing porch and sun room.
5. A wooden outbuilding with a corrugated tin roof will be converted into temporary habitable accommodation. The existing door will be replaced with a glass French doors.

Detailed plans were available at the time of survey and the Client was available on site to point out the scope of the works



**Figure 3:** Architect’s drawings showing proposed changes to main house. The proposal will result in the temporary disturbance of a roof void currently used by bats and disturbance to an area of roof covering with the potential to support roosting bats.

## 2.0 METHODS

### 2.1 Desk Study

A desk top study 1Km search was completed using MAGiC, an internet-based mapping service ([www.magic.gov.uk](http://www.magic.gov.uk)). This identifies:

- Current and past European Protected Species mitigation licences.
- Designated sites (e.g. SPAs, SACs, RAMSAR, NNRs, SSSIs, LNRs)

Measuring tools can also be used to measure distances / areas etc.

### 2.2 Phase 1 Bat Survey Methods

The Daytime Bat Assessment / Phase 1 Bat Survey was undertaken in accordance with the Bat Conservation Trust Guidelines (Collins, 2016).

The Phase 1 Bat Survey was carried out on the 5<sup>th</sup> August 2021 and comprised of an internal and external examination of the building to record any evidence of bats or potential for bats to use the building. Details of the survey methods are given below:

The building was investigated externally to identify potential bat access/egress locations and roosting areas such as slipped/broken tiles/slates, gaps or holes in fascias and soffits and to record direct evidence of bat presence such as droppings and urine staining. This was followed by a detailed investigation of all accessible internal spaces to record evidence of

bat roosting activity such as droppings, feeding remains, live animals, corpses, urine staining and fur staining. The buildings were assessed as to their suitability to support roosting bats.

The details of the assessment criteria used to determine the ecological value of on-site attributes is outlined below. During the Phase 1 survey the assessment criteria are based on the potential for the site to support the species considered. However, in many cases Phase 2 surveys will be required to confirm presence / absence of any bat species, and hence the importance of a population at the site, therefore the assessment of value should be considered as provisional.

If a bat roost is not confirmed during the preliminary roost assessment, then, where possible, a provisional assessment of potential will be made; although this may well require Phase 2 surveys to confirm status.

***Confirmed roost-*** Confirmed roosts are those where bats are present or, in the absence of actual bats, there is strong evidence to suggest that bats have roosted in the building, such as droppings. Further Phase 2 surveys will be required to characterise the roost, identify access points, species present and numbers present.

***High Potential-*** High potential buildings are those that have features highly suitable for use by roosting bats, including gaps around soffits, hanging tiles, extensive roof spaces etc. High potential buildings are often, but not always, buildings of more historic construction. Further Phase 2 surveys will be required to confirm the presence/absence of bats.

***Medium Potential-*** Medium potential buildings have a moderate number of features that may be utilised by bats for roosting, these may include loose fascias, roof spaces etc. Further Phase 2 surveys are likely to be required to confirm the presence/absence of bats.

***Low Potential-*** Low potential buildings are those that provide limited bat roosting potential although some features that may be utilised by bats may be present. Further Phase 2 surveys are likely to be required to confirm the presence/absence of bats.

***No/Negligible Potential*** – These are buildings that are extremely unlikely to support roosting bats due to the absence of suitable features. Further Phase 2 surveys are unlikely to be required for buildings with negligible potential.

### **2.3 Phase 1 Survey Timing and Weather Conditions**

The Phase 1 bat survey was undertaken within the main bat active season. The weather was overcast with rain showers, there have been regular rain showers within the past few days.



## **2.4 Phase 1 Survey Equipment**

During the Phase 1 bat survey the surveyor was equipped with a Canon XA20 infrared camera with additional infrared illuminators, a standard camera, notebook, 10x42 close focus binoculars, ladders and a high-powered torch.

## **2.5 Phase 1 Bat Survey Limitations**

Recent rainy weather may have washed away or accelerated the deterioration of external signs of bats, such as droppings.

Rain during the survey led to rain drops on the camera lens potentially obscuring the features being photographed.

## **3.0 RESULTS**

### **3.1 Legislation**

*Bats are fully protected under the Wildlife and Countryside Act 1981, as amended, and also receive additional protection via The Conservation of Species and Habitats Regulations (2017) from intentional killing and injury and from intentional damage, destruction or obstruction of access to a place of shelter. It is an offence to kill or injure a bat or interfere with any roosting or resting site. A bat roost is interpreted as "any structure or place used for shelter or protection" whether or not bats are present at the time or not. Barbastelle Bats, Bechstein's Bat, Noctule, Soprano Pipistrelle, Brown Long-eared Bat, Greater Horseshoe Bat and Lesser Horseshoe Bat are also UK BAP Priority Species and SPI.*

#### **3.1.1 Desk Study**

There are no designated sites within the 1km search area. Iping Common SSSI / LNR is just outside the 1km search area, approximately 1.1km to the east.

The property is adjacent to of an area of broadleaved woodland, with some areas of the woodland regarded as ancient semi-natural woodland, to the north, east and south. The River Rother is approximately 250m to the north.

No current or historic European Protected Species (EPS) licenses for bats are recorded for the property. There is a single issued licence within the search area:

- Common Pipistrelle *Pipistrellus pipistrellus*
- Soprano Pipistrelle *Pipistrellus pygmaeus*

In the general area further bat species have been recorded:

Brown Long-eared Bat *Plecotus auritus*

Barbastelle *Barbastella barbastellus*

Serotine *Eptesicus serotinus*

Daubenton's Bat *Myotis daubentonii*

Noctule *Nyctalus noctula*

Sussex Bat Group may hold records of further species in the area.

### 3.1.2 Bats – Building Assessment

#### Interior assessment - House:

There are two roof voids, with one being a low void over the main house that links to the larger void of the east wing extension and the other being a separate void over the northwest wing. The second void will not be affected by the proposed works. However, it is noted that both roof voids are used by Brown Long-eared bats *Plecotus auritus*, with the main roof void and east wing currently hosting a small maternity colony. Approximately ten bats were observed in a cluster at the ridge, but further individuals or clusters may be located elsewhere in the less accessible parts of the void. The void is insulated but largely unboarded and insulation covers ceiling joists making a thorough inspection unsafe. The roof is lined with 1F bitumen felt in good condition and no obvious access points were noted. Temperatures in the void at the time of survey (approx. 1430hrs) were 20.9°C with a relative humidity of 69.6%. There is also a small, inaccessible void beneath a catslide roof on the southern elevation.



**Figures 4 & 5.** Main roof void. Numerous bat droppings were scattered on the roof insulation and a small maternity cluster of Brown Long-eared bats was observed at the ridge. Figure 5 is looking west along an inaccessible part of the void above the main body of the house towards a stone-built gable end.



**Figures 6 & 7.** Small maternity cluster of Brown Long-eared bats at ridge. Approximately ten bats were noted.

**Exterior assessment - House:**

The original house, constructed of local stone and mortar with red brick quoining and traditional clay tile roof, is thought to have been built in 1870. The building has since been much extended, with two brick & block wings being added in 1978/79. The roof coverings over the modern extensions are tightly fitted factory made tiles with very few discernible gaps. The roof covering of the original part of the house, including the catslide roof, is hand-made tiles with numerous gaps.



**Figure 8.** Showing east wing built in 1978/79. The red star indicates approximate position of maternity cluster in roof void.



**Figures 9 & 10.** Showing northwest wing (roof void not affected by proposals) and stone built western elevation gable end of original house where a proposed single storey extension will be located. Also, apex of stone-built gable end with a gap to soffit that may be an access point for the resident bats.



**Figures 11 & 12.** The catslide roof on southern elevation where a new two storey extension is proposed. Example of general tile gaps in this area.

### **Outbuilding**

A large single-skin wooden outbuilding with a dual pitch corrugated steel roof will be converted internally to provide habitable accommodation for the duration of the works to the main house, after which it will be retained as habitable accommodation. Externally the existing roofing and cladding materials will remain unchanged, with the exception that the existing double doors will be replaced with glass doors or similar. Internally an insulated living space will be created beneath the level of the joists, creating a large roof void. There was no evidence that bats have accessed the building, such as droppings, poor thermal insulation due to corrugated tin sheet roofing material and single skin cladding.





Figures 13 & 15. The outbuilding external, internal and cobwebbed ridge.

## 4.0 EVALUATION, IMPACTS AND RECOMMENDATIONS

### 4.1 Phase 1 Bat Survey

The Mount has a **confirmed roost** of Brown Long-eared bats *Plecotus auritus* in the roof void of the main house. A social cluster of approximately ten bats was noted. Further colony members may be present in inaccessible areas of the roof void. At a time of year when bats gather to produce their young, this is likely to be a small **maternity roost**. Most, if not all, of this year's bat pups would by now be developed juveniles and indistinguishable from adults without close examination, which would be disturbing to the bats at a highly sensitive time of year. Brown Long-eared bats are also using the roof void of the north-west wing, as evidenced by numerous droppings, but no bats being observed. However, this void will not be affected by the proposed works.

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extremely close to where the maternity colony is situated. These external potential roost features have high suitability for external crevice dwelling species, such as *Pipistrellus* species. Therefore, a sequence of **Phase 2 dusk emergence / dawn return surveys is required to further characterise the roost and inform a licence application to undertake the proposed works.**

The outbuilding has negligible potential to support roosting bats.

The wider area is rural with arable and pasture. There is high suitability for bats with foraging opportunities in gardens and nearby heathland and woodland, also along hedgerows, lines of trees and river corridor. However, these features will not be affected by the works provided that any recommendations are followed.

#### **4.2 Phase 2 Bat Survey**

A sequence of Phase 2 dusk emergence / dawn return surveys (minimum of three surveys with two week intervals between surveys) is required to characterise the roost and inform a licence application to undertake the proposed works. The following guidelines apply to these surveys:

1. To be undertaken in the period 1<sup>st</sup> May to 30<sup>th</sup> September (with at least two surveys being undertaken between May and August).
2. Weather conditions must be mild with a low point temperature of at least seven degrees Celsius during the survey effort.

This would entail the structure being watched by surveyors and infra-red cameras such that all potential entrance/exit points are covered. The structure is then watched from either 15 minutes before sunset up to ninety minutes after, or ninety minutes before dawn to sunrise.

All emerging or re-entering bats are recorded along with their flight path, their species (where possible) and the time of flight.

An emergence survey would identify:

- Whether bats are present in a structure, the species and number involved
- Entrance and exit points for the roost
- The type of roost
- Actions needed to be taken to ensure legal compliance



## 4.2 Other Recommendations & Ecological Enhancements

*The National Planning Policy Framework (NPPF, 2019) maintains the emphasis of not only minimising impacts on biodiversity but also for local planning authorities to provide ‘net gains’ in biodiversity thereby ‘contributing to the Government’s commitment to halt the overall decline in biodiversity, including by establishing coherent ecological networks that are more resilient to current and future pressures’ (Para 109). Planning authorities should aim to ‘conserve and enhance biodiversity’ within and around development schemes.*

*The Natural Environment White Paper issued in June 2011 highlights the need to value nature not only as an economical asset but also just for itself, with this theme developed within the New England Biodiversity Strategy 2020: A strategy for England’s Wildlife and Ecosystem services (Defra). Therefore, any mitigation required for the scheme on site must consider these documents in its regard to data collection of the species on site, and maintaining biodiversity within the scheme.*

Recommendations and ecological enhancements to be provided after conclusion of Phase 2 surveys.

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