

BAT SCOPING ASSESSMENT

Project: Proposed Conversion of Partially
Derelict Agricultural Building to Residential with
Parking and Amenity Space

Address: Land off Brund Lane, Cheddleton

Client: Mr K A Carr

IMPORTANT NOTE: PLEASE SEE PAGE 16 – All potential roosting features destroyed during storm Darragh following site survey – additional surveys recommended in this report are no longer required.

Contents

- 1.0 Context
- 2.0 Site Context
- 3.0 Methodology
- 4.0 Legislation
- 5.0 Environmental Conditions
- 6.0 Site Inspection
- 7.0 Conclusion
- 8.0 References

1.0 Context

Hewitt&Carr Services was commissioned by Mr K A Carr to conduct a bat scoping assessment at a barn situated in land off Brund Lane, Cheddleton (Grid reference: SJ 96445 51500).

2.0 Site Context

The site is situated to the west of Cheddleton off Brund lane and surrounded immediately by modified pasture with hedgerows with trees bordering fields. The site has linear habitat connectivity to Deep Hayes Country Park via tree lines and hedgerows. The site itself consists of a small derelict agricultural building previously inundated with vegetation growth which has been cleared to grant access.

Figure 1.
Site in context to the surrounding area



A: DaisyBank House | 17-19 Leek Road | Cheddle | ST10 1JE
T: 01538 711777
E: hello@hc-services.uk
W: www./hc-services.uk

Legend

 Site

Google Satellite

Client : MR K A CARR

Project : PROPOSED CONVERSION OF DERELICT
AGRICULTURAL BUILDING TO RESIDENTIAL

Title : SITE CONTEXT

Date : 30/10/24

Project No. Drawing No.
24_402 01

Rev :

3.0 Methodology

Prior to the site inspection, a desk study was conducted of the site to search for viable habitats on or near to the site that could support a significant bat population. Staffordshire Ecological Records (SER) records were examined to find records of bat species near to or on the site. The nighttime luminosity of the area was also sourced to determine the likelihood of light averse bat species being present on the site.

The site inspection was conducted on 15/08/24 by Thomas Egerton (BSc), a qualified ecologist. The inspection consisted of an exterior examination for signs of bat activity such as droppings, grease marks, urine, feeding remains or dead. An interior examination was not possible due to areas being inaccessible as a result of collapsed floors. Consequently, binoculars were used to examine the condition of the roof.

4.0 Legislation

In accordance with the 1981 Wildlife and Countryside Act (as amended) and the 2017 Conservation of Habitats and Species Regulations (as amended), it is an offence to:

- Deliberately take, injure or kill a wild bat
- Intentionally or recklessly disturb a bat in its roost or deliberately disturb a group of bats.
- Damage or destroy a place used by bats for breeding or resting (roosts) (even if bats are not occupying the roost at the time)
- Possess or advertise/sell/exchange a bat of a species found in the wild in the EU (dead or alive) or any part of a bat.
- Intentionally or recklessly obstruct access to a bat roost.

5.0 Environmental Conditions

The site is located within a National Habitat network expansion zone and within 1km of 4 non-statutory sites with the largest site being Deep Hayes Country Park. There are also 3 sites of ancient woodland within 1km of the site with the closest site being The Rookery which consists of a semi-natural, ancient broad-leaved woodland along a stream valley and its tributaries. The site retains ecological connectivity to these areas via extensive hedgerows and treelines in the area which can sustain bat commuting and foraging between the sites. The abundance of ancient and semi-ancient woodland in the area should provide ample roosting opportunities to support a notable local population further supported by a plethora of habitats with streams, ponds, hedgerows, woodland and meadows which would provide foraging opportunities for all UK bat species.

The site contains little light pollution with Brund lane not being illuminated by street lighting the closest major light source is Ostlers Lane 400m west of the site with street lighting and residential areas. Historic data also shows that light pollution levels on the site have reduced ~6% year on year since 2014.

Most bat recordings of common pipistrelle and brown long eared bats have occurred to the west in residential areas within Cheddleton with little to no data from other areas around the site, but this may be due to the increased likelihood of bats being recorded in populous areas over rural regions and not indicative of rural bat populations that may be present.

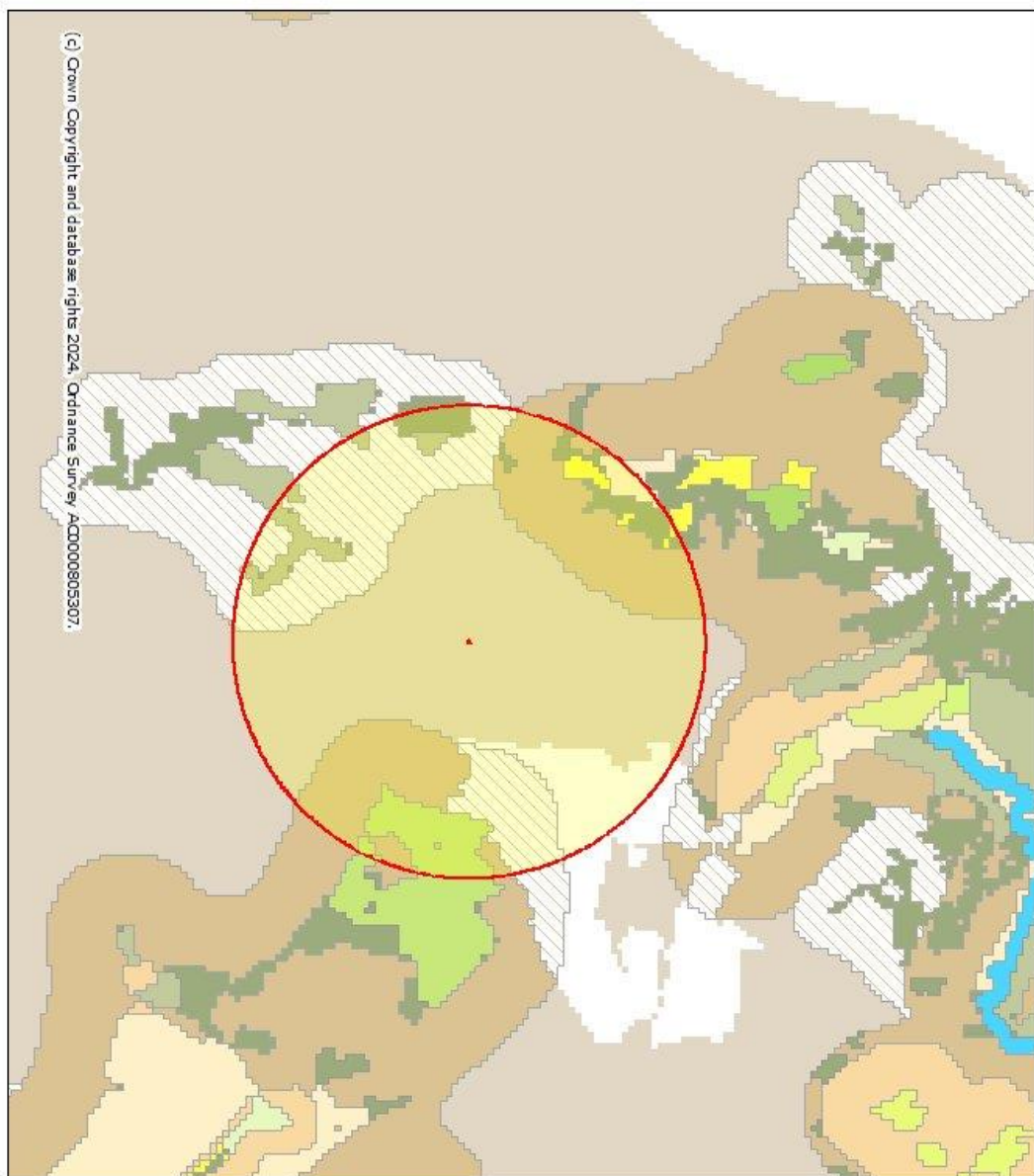


Figure 3.
Light pollution heat map of the surrounding area with site location pinned

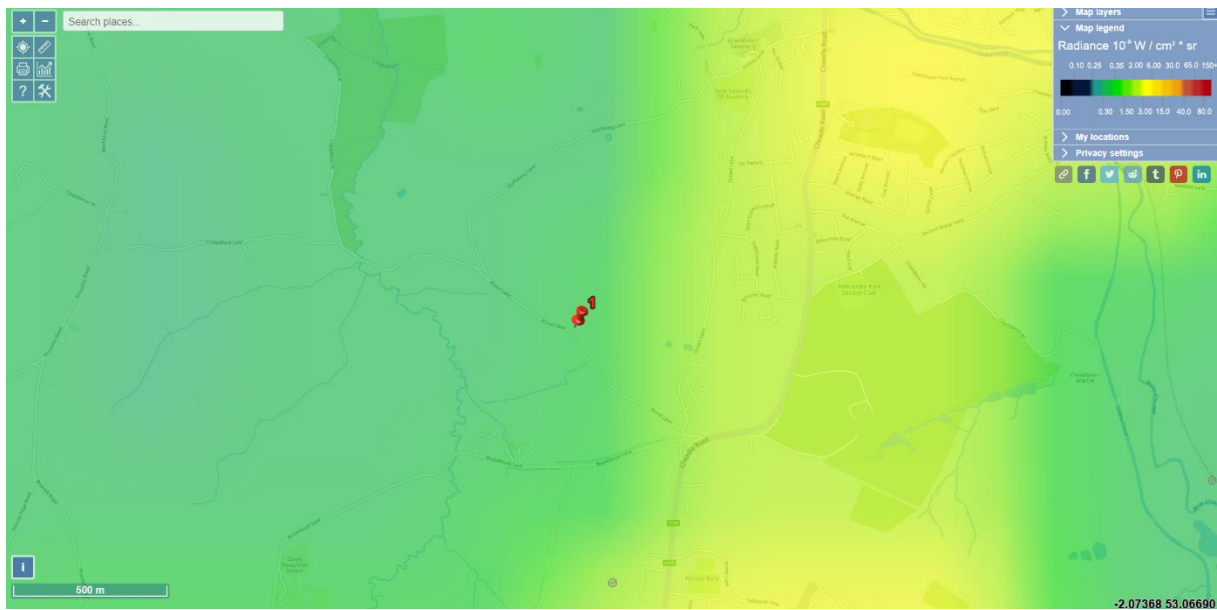


Figure 4.
Site nighttime luminosity levels over 10 years

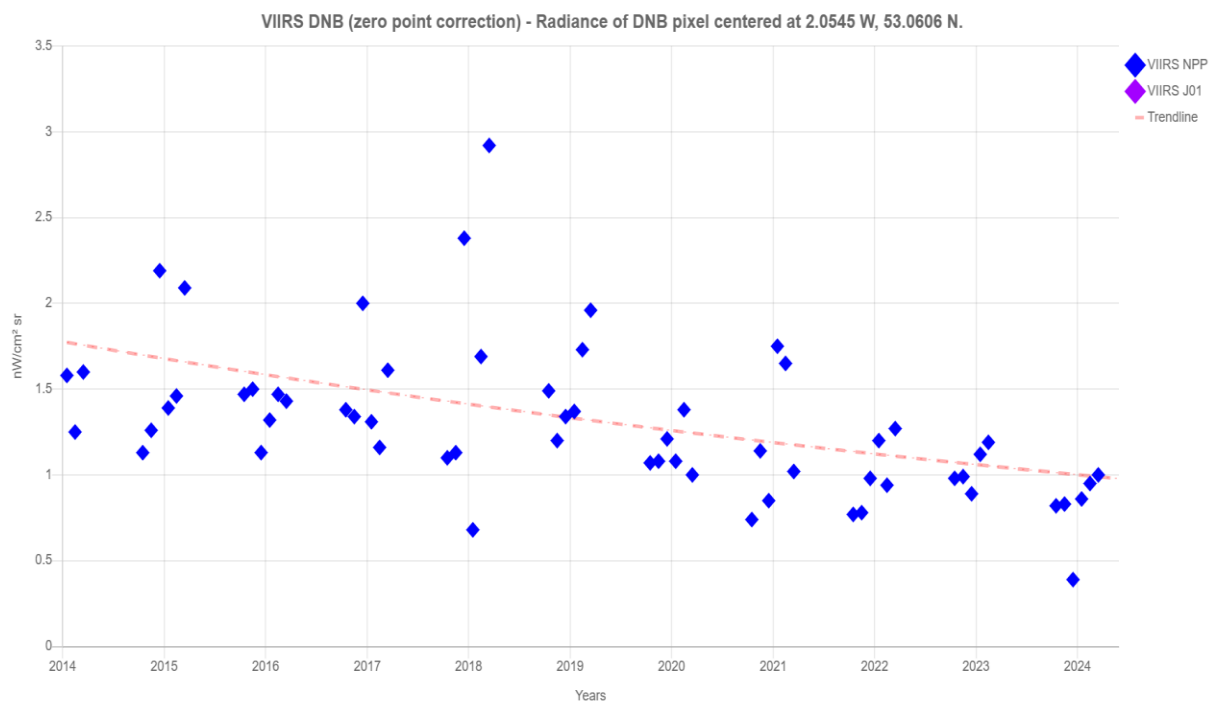
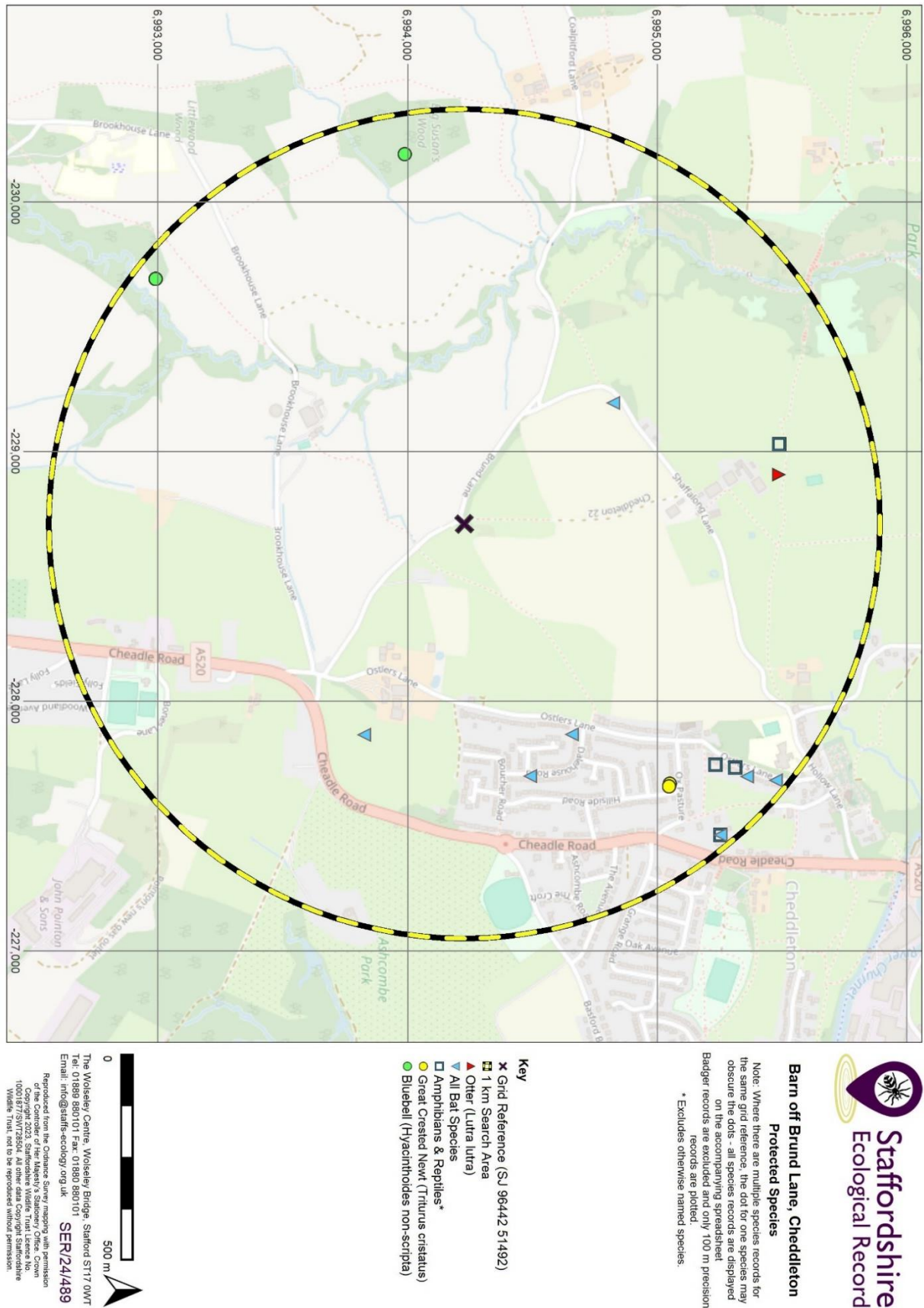


Figure 5.
Map of all bat records) in context to the site



6.0 Site Inspection

The site inspection took place on 10/09/24

The agricultural building is partially derelict with the roof partially collapsed from the centre outwards. The tiles remaining on the roof are loose and backed by felt creating access and a void between the tiles that could be used for roosting by crevice roosting species. Within the area of the structure still covered by the roof, bat droppings were searched for and none were found. Feeding waste was also absent from the site. The gable end features 3 vents that allow access to a small room on the eastern side of the structure.

A search of all crevices on the roof tiles found no signs of frequent use such as rubbing and scratch marks indicating along with the lack of droppings that the structure was not used frequently or used by a large bat population at the time of the survey, but this may be due to the time of the year the survey took place in being sub-optimal for bat activity and the structures internals being open to the elements which could have disturbed bat signs within the building.

Figure 6.
East elevation



Figure 7.
North elevation



Figure 8.
Interior southeast corner



Figure 9.
East elevation interior roof



Figure 10.
Western elevation interior roof condition



7.0 Conclusion

The site contains multiple potential roosting features on the eastern and western elevations where the roof remains standing, these elevations will require at least 2 emergence surveys at each end and take place within the optimal survey window for bat activity (May-August). These surveys will establish presence or absence of roosting bats within the structure prior to any works commencing on the site to prevent harm or disturbance to any potential bat roost.

The proposed surveys should be sited at the southwest corner of the building for survey 1 (SJ 96438 51492) and the northeast corner for survey 2 (SJ 96450 51507)

Figure 11.

Recommended surveyor positions for emergence/re-entry surveys on the site



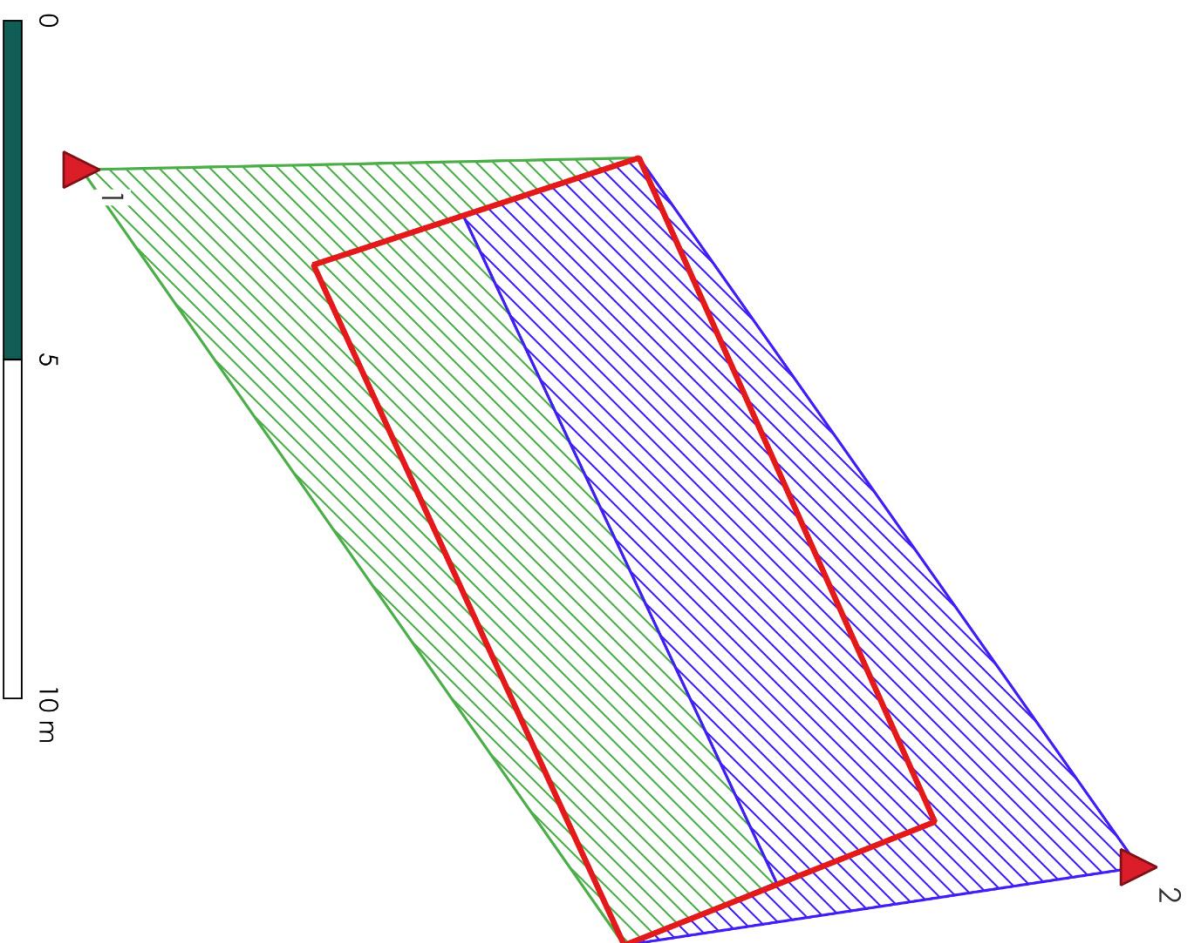
A: DaisyBank House | 17-19 Leek Road | Cheadle | ST10 1JE
T: 01538 711777
E: hello@hc-services.uk
W: www.hc-services.uk

Legend

-  Site
-  Proposed surveyor positions

Viewsheds

-  P1 viewshed
-  P2 viewshed



Client : MR K A CARR

Project : PROPOSED CONVERSION OF DERELICT
AGRICULTURAL BUILDING TO RESIDENTIAL

Title : FURTHER SURVEYS PROPOSED SITINGS

Date : 30/10/24

Project No. Drawing No.
24_402 01

Rev :

IMPORTANT NOTE:

Following the scoping survey conducted on 10/09/2024, Hewitt&Carr Services was informed by Mr K A Carr that all the roof tiles had fallen off during storm Darragh. Below are images provided by Mr K A Carr following storm Darragh:



As a result of this, all Potential Roosting Features (PRF's) identified during the survey have been destroyed. Consequently, further bat emergence/ re-entry surveys advised in this report are no longer required.

8.0 References

- N.D) *Magic Map Application*. Available at: <https://magic.defra.gov.uk/magicmap.aspx> (Accessed: 23 August 2024).
- (1982) *Wildlife and countryside act 1981*, *Legislation.gov.uk*. Available at: <https://www.legislation.gov.uk/ukpga/1981/69/contents> (Accessed: 23 August 2024).
- (2016) *Bat survey guidelines 2016*. Available at: https://cdn.bats.org.uk/uploads/pdf/Resources/Bat_Survey_Guidelines_2016_NO_N_PRINTABLE.pdf?v=1542281971 (Accessed: 23 August 2024).
- (N.D) *Light pollution map*. Available at: <https://www.lightpollutionmap.info/#zoom=16.76&lat=52.8074&lon=-2.1186&state=eyJiYXNlbWFWljoiTGZ5ZlJCZW5nUm9hZCIsIm92ZXJsYXkiOiJ3YV8yMDE1Iiwib3ZlcmxheWNvbG9yIjpmYWxzZSwib3ZlcmxheW9wYWNPdHkiOiJwLCJmZW50dXJlc29wYWNPdHkiOiJ1fQ==> (Accessed: 23 August 2024).
- (N.D) *Bortle dark sky scale*. Available at: <https://www.handprint.com/ASTRO/bortle.html> (Accessed: 23 August 2024).
- UK bat mitigation guidelines 2023 (2024) CIEEM. Available at: <https://cieem.net/resource/uk-bat-mitigation-guidelines-2023/> (Accessed: 23 August 2024).
- Voigt, C.C. et al. (2015) *Bats and buildings: The conservation of synanthropic bats*, *Bats in the Anthropocene: Conservation of Bats in a Changing World*. Edited by C.C. Voigt and T. Kingston. Available at: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC7123121/> (Accessed: 23 August 2024).