Our Ref: KEH/ejf/PR

14th May 2008
Mr Gary Jennings Esq
152 Newbold Road,
Barlestone
Warwickshire
CV13 0DT

Dear Gary,

Re: Ecology Survey at 91 Bosworth Road, Barlestone.

Ecologists at FPCR have carried out an extended Phase 1 habitat survey at the above site covering areas affected by the proposed extension of the residential dwelling and associated wind turbine. Consideration was given to any potential habitats for or evidence of legally protected species. The methodology, results and conclusions are detailed below.

Current redevelopment proposals

The current redevelopment proposals for the residence comprise roof works including an extension to northern gable and installation of a gable end onto the south western corner. It is anticipated that these works will take 3-4 weeks to complete. In terms of the remaining land, some landscaping will be undertaken on the garden and a 9m tall wind turbine will be constructed in the south eastern corner of the garden.

Methodology

Flora
Habitats on site were surveyed using Extended Phase 1 Habitat Survey methodology as recommended by Natural England (Joint Nature Conservation Committee, 2004). The survey was conducted on the 7th May. Whilst the plant species list should not be regarded as a complete record, sufficient information was obtained to determine broad habitat types.

Fauna
Throughout the survey, consideration was given to the presence of species protected under the Wildlife and Countryside Act 1981 (as amended), the Protection of Badgers Act 1992 and the Conservation (Natural Habitats & c.) Regulations 1994 (as amended). Due to the type of habitat on site emphasis was placed on the potential presence of bat roosts (see below).

Bats
The exterior of the buildings were visually assessed for potential access points and evidence of bat activity. Features such as small gaps under barge/soffit/fascia boards, raised or missing roof/ridge tiles and gaps at gable ends, which have potential as access points, were sought. Evidence that bats actively used these potential access points would include staining within gaps and bat droppings or urine staining under gaps; a note being made wherever these were present. Indicators that potential access points had not recently been used includes, the presence of cobwebs and general detritus within the access. The visual assessment was carried out following periods of dry weather to maximize recording of visible evidence.

The interior of the buildings, including any present roof voids, were also visually assessed for evidence of bat activity and/or for the potential to be used by bats. Evidence of a roost would be determined by the presence of a dead or live bat, concentrated piles or scattered droppings, food remains such as insect wing fragments as well as scratch marks and/or staining.

Trees on site were checked for their potential to support roosting bats. Such features include cracks, fissures, cavities or loose bark. Presence of dense ivy also provides potential as this could conceal the aforementioned features.

The above mentioned surveys were undertaken with a licensed bat worker.

Results

Habitats

The majority of the site comprised of mown amenity grassland with species dominated by perennial rye grass *Lolium perenne,* and annual meadow grass *Poa annua*. Further species present include common ragwort *Senecio jacobaea,* daisy *Bellis perennis*, greater plantain *Plantago major,* dandelion *Taraxacum officinale agg.,* and common mouse-ear *Cerastium fontanum.* Areas of ornamental planting and young to semi-mature trees were also present throughout the site. Species present included hedge veronica *Hebe* sp., Christmas rose *Helleborus* spp., sweet pea *Lathyrus odoratus,* Camellia *Camellia* sp., apple *Malus domestica,* alder *Alnus glutinosa* and Scots pine *Pinus sylvestris.* A number of short lengths of hedgerow comprising hawthorn *Crataegus monogyna*, elder *Sambucus nigra*, holly *Ilex aquifolium*, blackthorn *Prunus spinosa* and wild privet *Ligustrum vulgare* were present around the site boundaries.

Pond

A small lined pond approximately 1.5 x 3m with some steep stone banks was present towards the south of the site. The water was largely inundated with green algae and Canadian pondweed *Elodia* sp., with occasional creeping buttercup *Ranunculus repens* and iris sp. *Iris sp.* The pond was not considered to provide suitable breeding habitats for great crested newts due to the nature of its construction. Furthermore, the directly adjacent habitats were intensively managed (regularly mown by new owner) or unsuitable (e.g. hardstanding) and are therefore highly unlikely to provide suitable terrestrial habitats for great crested newts. Furthermore the National Biodiversity Records (NBN) indicates the closest records of this species are in the Bagwoth approximately 3km to the north and near Sutton Cheney approximately 4km to the south.

Bats

The building on site, which is subject to proposed changes is a two storey, brick built residence, (now abandoned) with a pitched concrete tile roof. In addition there is a single storey, brick built flat felted roof garage adjoining the front (west of the buildings). Potential bat access points comprise very occasional gaps in the roof tiles, (although generally these are well sealed due to extensive moss cover), gaps in barge boarding and gaps between soffits /brickwork. The majority of the access points were recorded adjacent the southern gable end. No external evidence of occupation was observed.

Internally the building has a roof void approximately 2.2m in height, with well sealed underfelt. The northern half of the void had undergone partial conversion in the last 10 years. Evidence of bat occupation was observed in the southern half of the void in the form of approximately 30 bat droppings (see figure 2 for distribution of droppings). The evidence recorded suggests that the droppings are common pipistrelle *Pipistrellus pipistrellus.* The majority of the droppings were recorded directly adjacent the southern gable end, with small collections of other droppings in other sections of the void. The evidence was considered to vary in age from droppings deposited in 2008 to droppings deposited approximately five years ago.

In addition, there are two other shed/greenhouse buildings on the site but neither of these have any features suitable for potential bat roosts.

During the survey, no trees with the potential to support roosting bats were recorded.

Other Protected Species
No further evidence or potential habitat for protected species was recorded on site. Furthermore no evidence of any potential habitats capable of supporting protected species were observed.

Conclusions

Habitats
The amenity grassland and areas of ornamental planting offer limited botanical species diversity and are of low ecological value. The trees and scrub on site offer foraging and nesting sites for birds, however, these areas are unlikely to be affected by the proposed developments. If vegetation needs to be removed, this should be done outside the bird breeding season (March – August inclusive). Therefore there are no constraints to redevelopment from any habitats present on site.

Bats
During the survey, evidence of roosting bats was recorded in association with the property, in the form of approximately 30 common pipistrelle bat droppings, which vary in age from 2008 to approximately five years ago. The well sealed nature of the underfelt present, suggests that these droppings had not fallen through from the area between the tiles and the underfelt. At this stage it is not possible to determine the exact nature of the bat presence within the building. However the current evidence is consistent with a small number (1-5) of bats utilising the building for a summer roost, accessing the building via the soffit on the southern gable and roosting adjacent the southern gable cavity wall or in the soffit in this area.

Therefore to determine the status of the roost on site, it is recommended that two nocturnal emergence surveys are completed. Exact details of the recommendations cannot be given until these further surveys have been completed. However depending on the results of the surveys, it is likely that one of the following two recommendations will be will be implemented:

Option 1 - Good Practice Method Statement
If a no / small number of bats (up to five) of recorded during the survey then it is considered that completing works under a good practice method statement is the preferable option.

Typically, a Natural England licence is required to facilitate redevelopment of a site containing a bat roost. However in the above circumstances, it is considered that a Natural licence would not be required under the following rationale:

- The works do not involve complete removal of all bat friendly features (roof tiles, soffits).
- Most of the works are concentrated in areas away from the recorded bat evidence.
- Any works which would be likely to affect bats will take 3-4 weeks to complete, therefore the roost would only suffer temporary disturbance.
- The status of the roost would be consistent with a small number of common species of bats using the site in summer months only. It is likely that such a roost is used in conjunction with many others in the local area. Therefore, in a worse case scenario of complete loss of the roost (which is not anticipated at this stage), it is unlikely that the loss of such a site would have a detrimental impact on the status of the species. However if works are undertaken in accordance with a good practice method statement (see below) these impacts could be negated.

The good practice method statement would take the form of supervision by a licensed bat worker of any works which could affect bats. The works would take place in September 2008 to early-April 2009 to avoid the peak activity season. In addition, any potential access points affected by works would be retained/reinstated and if necessary temporary mitigation in the form of bat boxes could be placed on surrounding trees. It should be noted that this approach would only be implemented upon approval from Natural England.

Option 2 – Natural England Licence Application
If more than five bats are recorded during the further surveys, or a bat of uncommon species is recorded roosting in the property then it will be considered that a Natural England licence is required to legitimise development. This would take the form of supervised works, reinstallation of access and provision of mitigation as per option 1. However works could be undertaken before September 2008, provided that the licence has been granted, which requires discharge of all ecology related planning conditions. Realistic time scales for successful return of the licence application after the completion of further survey work / completion of all relevant documents is early August 2008.

Other bat issues
The two shed/green house buildings have no potential for roosting bats therefore there are no constraints to redevelopment of these buildings from the presence of bats.

During the survey, no trees were identified with the potential for roosting bats. Therefore there are no constraints to redevelopment of the site from the presence of bats in trees.

The position of the proposed wind turbine is directly adjacent the south eastern hedge line, which runs along side the southern gable of the site. Therefore, further survey work is required to inform further on recommendations. The area will be surveyed during the nocturnal surveys which are being undertaken on the residence. If bats are found to be heavily utilising this hedge line, then allowances will have to be made in the scheme for bats in respect to the wind turbine.

Other Protected Species
The pond and managed/unsuitable surrounding habitats were considered to be unsuitable for great crested newts and therefore it is considered that there are no constraints to redevelopment from the presence of great crested newts. In the highly unlikely great crested newts are recorded during works, please contact FPCR immediately for further advice.

No evidence or suitable habitats for any other protected species were recorded within or directly adjacent to the site. Therefore there are no constraints to redevelopment from the presence of any other protected species.

It should also be noted that this document is a summary only, intended to inform on planning at this initial stage. Further details and recommendations will follow in respect to bats when the additional surveys have been completed.

Yours sincerely

Ed Feetham
Ecologist

Encl: Figure 1 - Phase 1 Plan