

Bats and wildlife corridors

Some bats fly fixed routes from roosts to foraging areas which need to be identified and maintained. For Countryside staff, Regional Nature Conservation Advisers.

Key points

- Bats regularly use the same route to and from the roost to foraging areas following clearly defined landscape features.
- These routes should be identified and conserved. Their disturbance or modification can be detrimental to bats.

1. BACKGROUND

- The National Trust has an important number of bat species roosting in its buildings and woodland, some of which are nationally rare.
- All the UK bats feed on insects. These change during the year as some insect species die off and new ones begin to emerge in other habitats.
- Bats need to find their way from the roost site to the different feeding areas in the dark. They use a combination of eyesight and echolocation, and possibly other senses such as sounds and smells.
- Some bats are traditional in their use of foraging sites, others are more opportunistic. However, many exit their roosts and use the flight lines in the same way each night.
- Detailed survey work has shown that generally bats follow fixed flight lines to their feeding areas and night roosts and that any disruption to these routes causes the bats to stop and turn round, then try to find another route.
- Bats are long-lived (20+ years) and these routes have been followed for many years.

2. POSITION

A general policy is to encourage wildlife and manage the landscape to make it better for different species and their habitats.

The National Trust Act 1907.

The National Trust was established in 1895 for the “permanent preservation for the benefit of the nation of lands and tenements (including buildings) of beauty or scientific interest and as regards lands for the preservation...of their natural aspect features and animal and plant life”.

A position statement of the Agricultural department states it wishes to “reduce environmental impact of agriculture and realise the environmental potential of its farmland.”

3. ACTION

Flight lines used by bats vary with species. Many prefer to follow obvious linear features that are easily detected in the dark – roads, hedges, rivers, paths, ditches, woodland edge.

- Some, such as horseshoe bats, prefer to follow routes that are covered with vegetation, especially beneath the canopy of overhanging trees, along a sunken lane or along a narrow path in dense woodland.
- Others such as Daubenton's bats follow quite low hedges and also fly along rivers and streams to their feeding areas. They do not fly completely out in the open until it is quite dark.
- Some, such as long-eared bats follow taller hedgerows and tree-lines, flying close to the vegetation.

It is believed that tall, obvious landscape features such as prominent trees, church spires and telegraph poles act as signposts, so the bats can confirm their position.

Once roost sites are located it is important to ensure that suitable linear features are available leading the bats from the roost to good feeding areas in the neighbourhood, such as woodland, meadows and water sites. Once established their continued existence should be written in to management plans if it is hoped to maintain them.

- Hedgerows and other linear features that are used by bats should not be removed – even a gap of 10m can deter bats using hedgerows as a flight line.
- In woodland any tree-felling or scrub-clearance should take into account the possible use of the site as a route-way by bats. Clear-felling large areas for instance could seriously affect the ability of the bats to locate their feeding areas.
- Changes to roads such as additional street lighting can have a negative effect on bats trying to find their way safely through the landscape, or white lighting could attract insects which then attract bats into a dangerous location. Similarly building new roads across flight-paths can seriously affect the movement of bats. In some cases new roads cutting across flight lines have caused many bat deaths due to collisions with cars and lorries. Green bridges and tunnels can be an answer.

European regulations which we have incorporated into our laws give protection not just to bats, but to the landscape in which some species move or forage. In particular, the horseshoe bats are very reliant on their route-ways to feeding areas, and these can be many kilometres long.

It is important, therefore, that any changes to the landscape surrounding horseshoe roost sites take into account the routes used by these bats. Surveys may be required to carefully map their whereabouts so that they are not interrupted. This is important for barbastelles and Bechstein's bats, too. However, as a point of principle, it is good practice not to interfere with the flight paths of any bat species.

Further information

Biodiversity Action Plans for UK bat species (from Bat Conservation Trust or National Trust Biodiversity Officer).

Guidance Note Feeding areas for bats.

Conservation Directorate Guidance Note Information

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