Bats and People



Introduction

This booklet aims to provide you with some essential information about bats and what you need to know if you find them in your home. More information and guidance is available on the NatureScot website at nature.scot/professional-advice/protected-areas-and-species/licensing/species-licensing-z-guide/bats/bats-advice-homeowners

Bats are highly specialised animals with some remarkable features. They are the only true flying mammals. Like us, bats are warm-blooded, give birth and suckle their young. They are also long-lived, intelligent, and have complex social lives. In Scotland there are nine or ten species of bats, of which five are generally widespread over the mainland.

In many parts of the world, including Scotland, the number of bats declined significantly in the latter half of the 20th century, although more recently there is evidence of a reverse in this trend for some, but not all, species. Although we don't have much historical information, it's clear that many of our bat populations are still under threat, with some species much less common than in the past.



The brown long-eared bat is widespread, favouring older houses with big attics.



The Leisler's bat is a scarce species restricted to southwest Scotland.

Bat biology

Scottish bats eat only insects, which they catch in flight or pick off water, the ground or foliage. They use their highly sophisticated echolocation to detect these, even feeding in complete darkness. Some specialise in catching large insects such as beetles or moths while others eat thousands of very small insects, such as small moths and the biting midge; a single bat may consume over 3000 midges in a night.

Bats feed where there are lots of insects, so favour areas such as traditional pasture, woodland, marshes, ponds, and slow moving rivers. Typically, bats will feed for two or three hours around dusk and dawn when insects are most active.

There are very few insects around in winter, so bats hibernate from around late November to March. However, they don't necessarily sleep right through and may go out either to feed and drink on mild evenings when some insects are around, or to move to more sheltered locations on very cold nights. Flying in the winter uses up energy that bats can't easily replace and so any movement may affect their chances of survival.

Most bats form social groups for at least part of the year. Adult females gather together in warm maternity roosts in late May to early June to give birth and rear their babies. (A female has usually only one baby each year.) As soon as the young start to fly (at 3-4 weeks) these maternity colonies begin to break up and the bats move elsewhere.



Natterer's bats in a maternity roost.

In contrast, males typically live alone, or in small groups, in cooler sites. During late summer male bats set up territories around a mating roost to attract females.

Bats have well-established traditions and tend to return to the same sites, at the same time, year after year. Their roosts can be found in:

- Buildings such as houses, churches, farms, bridges, ancient monuments, fortifications, schools, hospitals and all sorts of industrial buildings. These are most important in summer, though some are used throughout the year.
- Underground places such as caves, mines, cellars, ice-houses and tunnels. These are most important for hibernation as they give the sheltered and stable conditions that bats need during winter.
- Tree holes are used by bats throughout the year.

It is often possible to see bats fly out at dusk. You may also hear them inside the roost on hot days or before they emerge in the evening. Frequently, though, you will see only their signs, rather than the animals themselves.

The most characteristic sign is their droppings, which are the indigestible remains of their insect prey. These are roughly the size and shape of mouse droppings but will crumble to a powder when dry. They are usually found stuck to walls or in small piles below roosting bats or the roost exit. Because bats come back to the same roost year after year, their roost is legally protected even when the bats are not there.



Pipistrelle mother and baby.

Bats and the law

All bats and their roosts are protected in Scotland by the Conservation (Natural Habitats, &c.) Regulations 1994 (as amended in Scotland).

This means that it is an offence to:

- deliberately or recklessly kill, injure or capture a bat
- deliberately or recklessly disturb* or harass a bat
- damage or destroy a bat roost
- deliberately or recklessly obstruct access to a bat roost or otherwise deny a bat the use of its roost
- possess or transport a bat or any part of a bat
- sell or exchange (or offer as such) a bat, or any part of a bat.
- * There are several specific offences of deliberate or reckless disturbance. Please see nature.scot/professional-advice/protected-areas-and-species/protected-species/protected-species-z-guide/protected-species-bats for details.

Some activities affecting bats or their roosts may need to be done under, and in accordance with, the terms of a licence. Licences are issued by NatureScot and are free. Licences allow certain illegal actions to be undertaken legitimately.



Pipistrelle bat catching a moth.

Such activities might include:

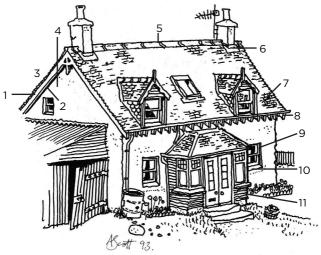
- blocking, filling, or installing grilles over old mines or tunnels
- building, alteration or maintenance work
- getting rid of unwanted bat colonies
- removing hollow trees
- re-roofing
- remedial timber treatment
- rewiring or plumbing in roofs
- treatment of wasps, bees or cluster flies
- demolition.

Without a licence, you may:

- tend a disabled bat and humanely dispatch a seriously injured one
- remove bats from within the living area of a house
 the living area means the rooms and any other
 parts of the house that are in continual occupation
 and excludes lofts/attic space (unless converted into habitable rooms), wall cavities and cellars.

We recommend that you contact NatureScot before taking any action that may affect bats or their roosts. For more information visit www.nature.scot/professional-advice/protected-areas-and-species/licensing/species-licensing-z-guide/bats-and-licensing

The parts of a house commonly used by bats for roosting



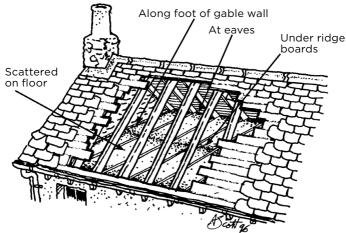
- 1 Barge boards
- 2 Soffits
- 3 End slates
- 4 Gable ends
- 5 Ridge tiles
- 6 Lead flashing

- 7 Broken slates/tiles
- 8 Eaves
- 9 Sash window frames
- 10 Window sills
- 11 Wood cladding



The noctule is the largest bat in Scotland, restricted to the south of the country.

Typical locations for finding bat droppings



Also on wall below access points



The whiskered bat is a scarce species of southern Scotland.



The most abundant bats in Scotland are the very similar common and soprano pipistrelles.

Bats in buildings

Many bat species have adapted to living in buildings and now rely so heavily on these for roosting, that their conservation depends on our tolerance and good-will.

Bats are usually seasonal visitors to houses, being present for only four or five months of the year. They form maternity colonies during May and June and then leave during August and early September once the young bats are independent. The colonies are often most obvious during July, when the young are starting to fly; soon after this the adults will start to leave, followed by the young. Although this seasonal pattern usually applies, different species have slightly different habits, notably brown longeared bats, which can sometimes occupy the same building throughout the year. This can have implications for roof maintenance work, as the associated disturbance may necessitate a licence. Such work would normally be scheduled for periods when the bats are not present, in order to avoid disturbance.

To maximise warmth, maternity roosts are often located on the south and west of houses or close to sources of heat such as chimneys and boilers. Most species prefer to roost in quite small spaces and are not usually found in open draughty areas. The common and soprano pipistrelles, our smallest and most common bat species, are generally found in the inaccessible parts of the roof structure and



Remedial timber treatment with permission.

around its edges. They rarely enter the loft space but both species colonise new buildings quite readily and frequently roost in houses built since the 1960s.

Where bats are seen in buildings during the winter, they tend to be alone or in small scattered groups, hidden in crevices or under slates and away from sources of heat.

What to do if you need advice about bats in your property

Bat colonies usually live happily with their human landlords, but occasionally problems or concerns arise. NatureScot and the Bat Conservation Trust are happy to provide advice on how to deal with any problems, the most common of which are outlined below.

Occasionally bats may turn up in the living space of a house. If you find a bat flying inside a room, open doors or windows to allow it to escape. If more than one bat turns up inside, it's likely that they are crawling through from a nursery roost; this can be prevented by blocking up any holes around pipes or gaps around ceilings or floors from the inside of the house.

It is very rare for bats to cause any damage to houses, but sometimes there may be signs that you do not like, for example noise, an accumulation of droppings or a smell.

If you have concerns about bats in your property, and would like advice on dealing with any issues, you can contact your local NatureScot office.

If you think you have a bat roost and want to carry out work such as re-roofing, roof repairs, alterations in the loft, wall re-pointing, remedial timber treatment or repairs to eaves or cladding that



Brown long-eared bat foraging in dense foliage.

might affect the bats, please seek our advice first. In most cases, it is just a matter of organising the work to avoid the time when the bats are present and leaving their access points for them to return the following year. In other cases a licence may be required, but a little forethought and careful timing can often avoid the need for this. If remedial timber treatment is required, tell your timber treatment company about the bats, and we can advise on the type of chemicals to use and when to apply them. See webarchive.nationalarchives.gov.uk/ukgwa/20150902191829/http://publications.naturalengland.org.uk/publication/31005 for a list of approved chemicals.

Disease

Bats rarely come into contact with people, but if you are bitten or scratched by a bat, you should wash the wound thoroughly with soap and running water for at least five minutes. British bats have few diseases that can affect humans and, although problems are very rare, you should seek immediate medical advice if you are bitten or scratched by a bat. Studies in Scotland have found that a small number of Daubenton's bats carry signs of a rabies-like virus (European bat lyssavirus) which can infect humans.

The risk to you is minimal, provided you do not handle them. An effective post-exposure rabies treatment is available but, for this reason, you should avoid handling the animals or coming into contact with their saliva.

Useful contacts

NatureScot

Great Glen House, Leachkin Road, Inverness IV3 8NW

Tel: 01463 725000

Website: www.nature.scot

For queries relating to bats in houses contact: NatureScot Bats in Houses Helpline: 01463 725165

batsinhouses@nature.scot

For queries relating to bats and development contact: 01463 725364 or licensing@nature.scot

The Bat Conservation Trust

5th floor, Quadrant House, 250 Kennington Lane, London SE11 5RD

Website: www.bats.org.uk

For injured or grounded bats contact:

The Bat Conservation Trust Bat Helpline: 0845 1300 228 or enquiries@bats.org.uk

If it is necessary to remove a bat from a room, vou should avoid skin contact with it due to the small risk of a rabies type virus. You should wear protective gloves or use a towel to contain the bat. Place a box or container over the bat and gently slide a piece of cardboard underneath. Ensure the box or container has air holes, and add a shallow dish with water (e.g. lid from a jam jar or milk bottle) and a small towel for the bat to hide in. At dusk, place the box outside on a wall or windowsill and partially open it. Ensure it is placed out of the reach of cats. If the bat will not fly or is behaving aggressively (for example, it is making unprovoked attempts to bite at objects around it) you should contact the Bat Helpline 0845 1300 228 or NatureScot for further advice.

Front cover image: Daubenton's bat Photography: Frank Greenaway front cover, 1, 2, 5, 10; Dr R E Stebbings 3, 4, 6, 9; Laurie Campbell 8; NHPA 7.

