

Magnificent UK bats - Kim Dawson

In the UK we have 17 breeding bat species, one poor 'loner', plus being on the coast we also get the occasional vagrant over from the continent. Here in Sussex we are very lucky to have recorded all of the above in the past - some being very rarely recorded once in a blue moon and others locally abundant but rare in other places of the country.

The most interesting Sussex claim to fame, although a slightly sad tale, is the aforementioned 'loner' which is the only Greater Mouse-eared (*Myotis myotis*) bat that is currently known to be in the UK. Sadly the largest of the UK species was declared extinct here in 1990 with the last known animals being recorded in Bognor Regis. In 2002 there was a slight glimmer of hope when a juvenile male Greater Mouse-eared was found in a Sussex hibernation monitoring site. He was ringed and has been found every year since on his tod in the same tunnel! It is not known whether he flies over to France each year and back, or whether he stays in the UK? Very intriguing.

*Photos of the Greater Mouse-eared taken below from Sussex Bat Group hibernation survey in January 2013.*



Bats live in roosts with each of the species choosing and favouring specific conditions to suit their needs. Habitats used include trees, buildings, caves, tunnels etc. They use a variety of roost sites throughout the year depending on environmental and seasonal requirements. Some prefer tucking up inconspicuously within crevices and other's favour hanging up in more conspicuous open areas.

Spot the bat.....



*Leisler's bat roost in a loft space of a house in Horsebridge – Kim Dawson*



*Brown long-eared bats in a loft space of a house in Lower Dicker – Kim Dawson*

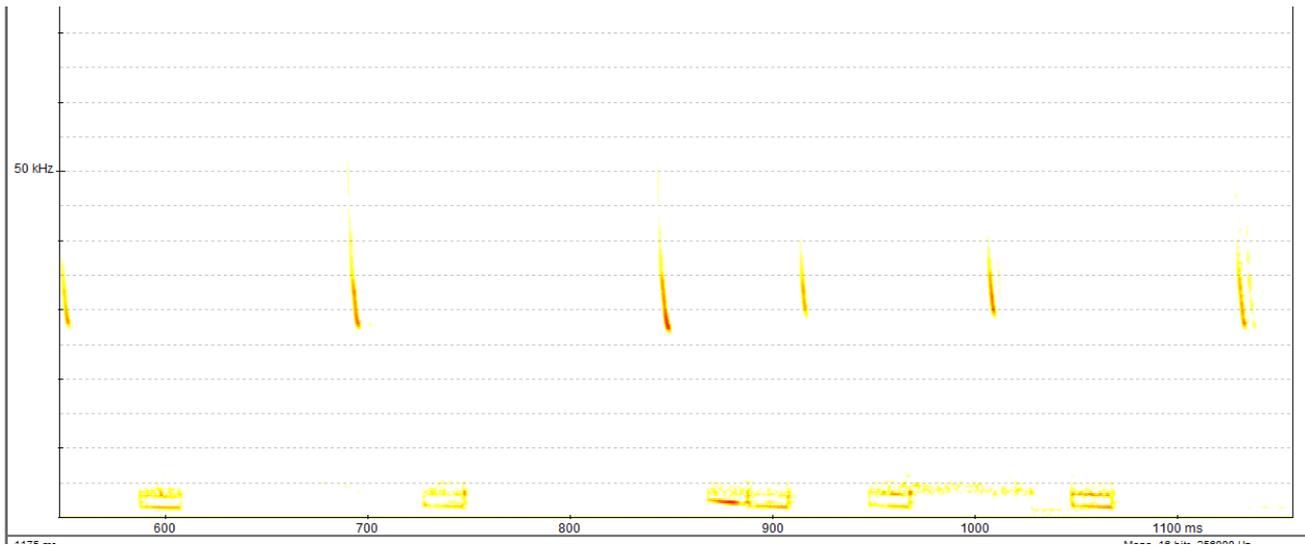


*Hibernation sites – Whiskered, Daubenton's, Brown Long-eared and Natterer's respectively (clockwise from top left) in underground sites in Kent*

You can see bats about and active typically from April / May when insect prey is available. They go into hibernation or torpor when the weather turns colder and insects diminish usually from October / November. Females tend to form nursery colonies around May and give birth to one pup in June. The pup takes a good few months of maternal care before reaching adolescence usually around August. Mating occurs in Autumn when bats swarm together in large numbers before going into hibernation – a truly spectacular sight to see.

All our species are insectivorous, gobbling up flies and creepy crawlies by the thousands. They feed nocturnally at the time when prey is mainly out and about and when predation risks are lower. They hunt using echolocation – a technique using sound or echoes bounced off objects to see in the dark. Bats do have good eye sight though – a common misconception is that they are blind or hard of sight.

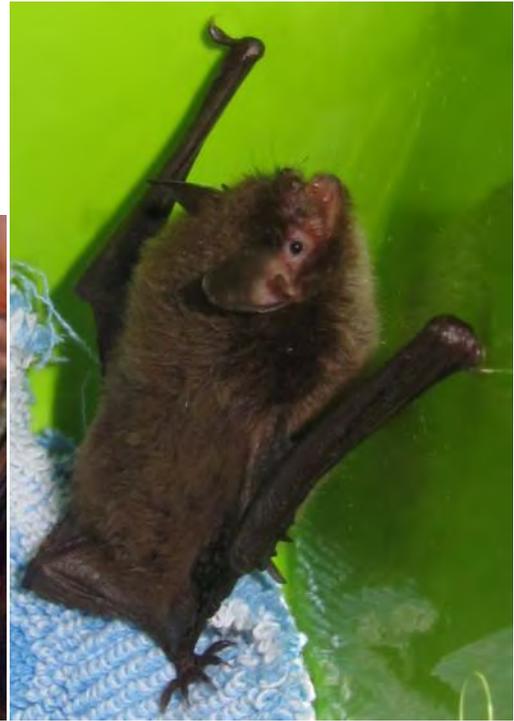
Their echolocation is inaudible to most humans and so in order to hear them a device called a bat detector is needed. Each of the species is unique in their morphology which in turn shapes their habitat, diet choices and the range or level at which they echolocate. Below is a graph showing a bat call of a Serotine bat pass recorded in Selmeston, on The Street. Serotine echolocate at around 30 kHz – so at the lower range to most other of the UK bat species.



Our smallest and most numerous species – the Common Pipistrelle gobbles up over 3000 mosquitoes and midges a night by aerial hawking along edge habitats, whereas, the Brown Long-eared bat also known as the whispering bat glean spiders and moths off leaves of trees and other foliage within woodland and more cluttered habitats. Then there are the big bats that are more linked to open habitats favouring larger beetles as prey such as chafers and dung beetles. Daubenton’s bat and Soprano Pipistrelle are linked with feeding over water, the Myotis species are light sensitive so seek out dark habitats, and then there are the other woodland specialists such as the rare Barbastelle and Bechstein’s bats. Their shape, size and prey choice affecting where they are found, roost sites, habitat choices and time of emergence from the roost.



*Common pipistrelle and long-eared taken in for care – Kim Dawson*



*Ringed Natterer's bat from a Sussex Bat Group hibernation count survey 2012 and a rescue Daubenton's bat found in Eastbourne and cared for by Kim Dawson*

From the bat walks I've done along The Street (Selmeaton) I can positively confirm at least 4 bat species including Serotine, Common and Soprano pipistrelle and a Myotis species bat. I'm also pretty certain that the village hall is being used by the odd Common Pipistrelle bat – likely to be tucked up under the ridge or hanging tiles, as I regularly see one or two early doors at dusk during their typical roost emergence time.

Bats are an amazing part of our ecosystem often being referred to as a biological indicator species i.e. where present they indicate a healthier, more natural environment – so we are lucky that they are here within the village. Unfortunately habitat loss usually linked to human development has affected the species significantly over the last 100 years, however, declines appear to be stabilising with a lot of targeted work by the local and national bat conservation groups, in addition to all the help and support from the public.

If anyone wants to find out more or would like to join me on a bat walk then I would love to hear from you. I'd also like to co-ordinate a bat census of the village – so if you think you have bats or you're not sure either way please get in touch and we can have a look.