



Wildlife & Habitats



Wildlife recording is represented by a huge amount of work, undertaken professionally by institutions, government and conservation bodies, and voluntarily by societies, groups and individuals. There is an overwhelming wealth of data – but turning this into real knowledge is much more difficult, given the wide range of recorders and recording necessary over time. This problem is now recognised nationally, and reflected by the development of the National Biodiversity Network as well as more focused national recording schemes. In Hertfordshire, some new indicators reflect the improved recording effort, and the need to understand what is happening to our biodiversity resource.

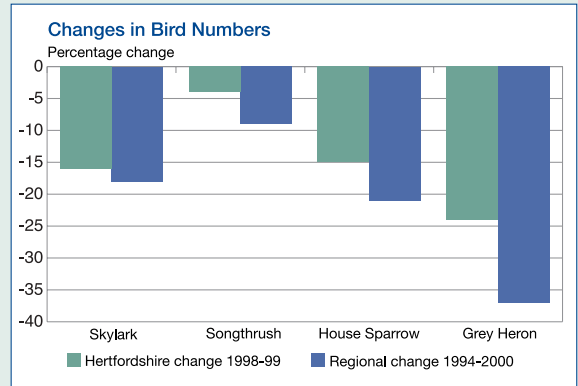
INDICATOR WH1 – Population of water voles

An extensive water vole survey in 2002, co-ordinated by the Chilterns Chalk Stream Project, focused efforts on searching for signs of water voles along the River Ver, River Gade, River Bulbourne and Grand Union Canal in west Hertfordshire. The survey revealed that mink and brown rats were widespread along the rivers, but that signs of water voles were very limited. The results (currently being analysed) are likely to suggest a drastic decline in the status of water voles along these three rivers. In east and north Herts, however, continued monitoring of known key sites suggest that water vole numbers are remaining stable.

INDICATOR WH2 – A Sample of Key Bird Species

The British Trust for Ornithology (BTO)'s Breeding Bird Survey data and other records collected by the Hertfordshire Bird Club provide data on bird population changes in the county. The Bird Club records are published several years after being collected, so a short time-lag will occur with the information presented here. Therefore, this data is most accurate when represented over the long-term. Key indicator species were chosen

to reflect the quality of particular habitat or land-use types, and the following changes have been noted in Hertfordshire.



The skylark is an indicator of changes in farmland and may be declining due to the intensification of agriculture. Song thrushes are an indicator of woodlands and mixed farmland, and nationally they have started to increase, possibly due to wetter summers and a reduction in the use of slug pellets. The house sparrow is an indicator of the urban environment, and the cause of its decline is currently being researched. These three species are on the Red List showing that their rapid decline over the last 25 years is of high conservation concern. The grey heron as an indicator of wetlands, it is on the Green List as it is not threatened nationally.

INDICATOR WH3 – Number of Wildlife Sites in Hertfordshire

Wildlife Sites represent the most important ecological sites outside those receiving statutory protection (eg. SSSIs), and are protected under planning policies throughout the county. By 2002, a total of 1,941 Wildlife Sites had been identified in Hertfordshire by the Wildlife Sites Project. This amounts to 17,215 ha of land, representing 10.6% of the county. Of these sites, since 1997 a total of 1,145 sites had been reported to their owners, and conservation advice had been provided on around 400 sites.



INDICATOR WH4

– Population of Pipistrelle Bats

Pipistrelle bat surveys have been collated nationally by the National Bat Monitoring Programme since 1998. There are both common pipistrelle and soprano pipistrelle bats. A study of 115 colonies in the south-east of England (including Hertfordshire roosts) showed a mean colony size of 49 in the year 2000 and a mean colony size of 46 in the year 2001. Although this represented a small decrease, this was the greatest decline nationally, while some other regions showed considerable increases. Within Hertfordshire no significant changes were encountered in the colonies monitored.

INDICATOR WH5

– Butterflies - population % change from 2000

Recording has greatly increased since 1995 due to distribution and transect surveys by the Hertfordshire and Middlesex Branch of Butterfly Conservation, who have now regularly recorded on nearly 40 sites throughout the county. A range of indicator species has been chosen to broadly reflect habitat type although many butterflies can be found in a variety of places.

Chalk grassland

Following a dramatic increase of **chalkhill blue** in the mid 1990s, there has been a steady decline - 27% since 2000. Some sites retain a very healthy population.

Neutral grassland / damp meadows

The **meadow brown** is perhaps the most common species, but has shown a 30% decrease although this did reflect unfavourable management on one site. The **common blue** has shown a 72% increase since 2000, although there is also a small contraction in range.

Acid grassland / heath / bracken

The **small heath**, once a universally common butterfly, continues to undergo a dramatic decline. There has been a 27% decrease since 2000, the fourth major decline in a row, a trend reflected nationally.

Mature broad-leaved woodland

White admiral has also declined significantly – 69% since 2000, although it continues to appear in both new and former sites, suggesting expansion or new colonisation.

Rides and glades

The **speckled wood** has shown a long term local and national increase, although since 2000 there has been a decline of 27%.

Scrub / hedgerows

The **brimstone** declined by 39% since 2000, its largest decrease since 1995 when abundance changes began to be listed. Usually stable, this may reflect climatic changes.

The fortunes of two rare national Biodiversity Action Plan species of conservation importance are also considered. One **small blue** was seen on just two occasions in 2001, and this species is now almost extinct in Herts. The **purple emperor** has been found in a small number of new locations within large woodland areas, and may be fairing better than assumed several years ago.