

**AGREEMENT ON THE CONSERVATION OF POPULATIONS OF
EUROPEAN BATS (EUROBATS)**

Report on the implementation of the Agreement in the United Kingdom

2002

This document reports on actions undertaken by the UK in 2002 to meet its obligations under the Agreement.

A. GENERAL INFORMATION

Party: United Kingdom
Date of Report: April 2003
Period Covered by Report: January – December 2002
Competent Authority: The Department for Environment, Food and Rural Affairs
(Defra)

Changes Regarding:
Competent Authority -
Appointed member of the Advisory Committee -
Membership of other committees/working groups -

Abbreviations

ASSI	Area of Special Scientific Interest
BAP	Biodiversity Action Plan
BCT	Bat Conservation Trust
CCW	Countryside Council for Wales
CRoW	Countryside and Rights of Way Act 2000
cSAC	candidate Special Area of Conservation
DAFF	Department of Agriculture, Fisheries and Forestry (Isle of Man)
Defra	Department for Environment, Food and Rural Affairs
DETR	Department of the Environment, Transport and the Regions
EHS	Environment and Heritage Service (Northern Ireland)
EN	English Nature
ESA	Environmentally Sensitive Area
FC	Forestry Commission
GONHS	Gibraltar Ornithological & Natural History Society
HEI	Habitat Enhancement Initiative
JNCC	Joint Nature Conservation Committee
MAFF	Ministry of Agriculture, Fisheries and Food
NBMP	National Bat Monitoring Programme
NERC	Natural Environmental Research Council
NGO	Non-Governmental Organisation
RSPB	Royal Society for the Protection of Birds
SAC	Special Area of Conservation
SEPA	Scottish Environment Protection Agency
SNCOs	Statutory Nature Conservation Organisations
SNH	Scottish Natural Heritage
SSSI	Site of Special Scientific Interest
VWT	Vincent Wildlife Trust
WCA	Wildlife and Countryside Act 1981

B. STATUS OF BATS WITHIN THE TERRITORY OF THE PARTY

1. Summary Details of Resident Species

There has been no significant change in respect of the United Kingdom's 16 resident species of bat since the last report.

In September a Daubentons bat submitted to the Veterinary Laboratories Agency (Weybridge) as part of the routine passive surveillance of bats, tested positive for rabies antigen using the florescent antibody test (FAT). Further tests confirmed that the bat, which had bitten a bat carer, was carrying the European Bat Lyssavirus type 2. The bat carer was treated accordingly. In November a further case was reported of a bat worker being bitten by a Daubentons bat in Scotland. He later died.

Subsequent all Government agencies concerned (Defra, Scottish Executive, Department of Environment Northern Ireland, Department of Health, Public Health Laboratory Services, Scottish Centre for Infection & Environmental Health, Veterinary Laboratories Agency, SNCOs) and BCT met to establish a coherent approach to ensuring the safety of all those coming into contact with bats. As a result bat groups were sent all relevant information on the cases and updated advice was provided to bat workers and the public, including information on bat handling and advice on health and safety issues. Bat workers were sent the appropriate tubes and pre-paid envelopes on behalf of the Veterinary Laboratories Agency, and issued instructions on how to package and send dead bats, both for passive surveillance and where they were suspected of carrying rabies.

2. Status and Trends

England

Two parti-coloured bats were found in 2002, one in April in Yorkshire, and one in May in Wiltshire. One was also found in Sussex in 2001 leading to a belief in some quarters that there may be a small population of these in the UK.

A Kuhl's pipistrelle was found on the Isle of Wight in September. It is thought this is likely to be a migrant from continental Europe.

A young male greater mouse-eared bat (*Myotis myotis*) was found in Sussex in December. It was in the same hibernation roost as the last UK recorded greater mouse-eared bat. The species was declared extinct in the UK in 1991. This find has revitalised hopes that this species may still be present in the UK in small numbers, especially as an elderly female was found in January 2001.

Northern Ireland

No change since the last report.

Scotland

No significant changes since the last report.

Wales

A ringed greater horseshoe bat found hibernating in a disused mine in the Conwy valley in north Wales in 2000 was found again at the same site in 2002. Another greater horseshoe bat was also recorded in Gwynedd, North Wales in August.

Nathusius pipistrelle were recorded at Skenfrith Castle in Monmouthshire in July and serotine bats were found during a winter survey of sea caves in Pembrokeshire

3. Habitats and Roost Sites

United Kingdom

Many of the 95 bat groups in the UK undertake habitat management and roost monitoring/creation. This work is largely funded by the Statutory Nature Conservation Organisations (SNCOs) and other government agencies, but also through Lottery funding, Peoples' Trust for Endangered Species, other charitable trusts, corporate sponsors, members of the UK's Bat Conservation Trust (BCT), and bat groups. BCT, a non-governmental organisation, has a Bat Support Fund with which it can help local bat conservation projects. The work undertaken contributes to conservation of bat habitats and roosting sites. In addition, the UK's National Bat Monitoring Programme has field survey habitats and roost sites identified on its database.

England

Paston Barn, Norfolk provides important all year round roosting for barbastelle bats. They also breed here. English Nature (EN) gave BCT the contract to manage "A behavioural study of bats at Paston Great Barn". The project is still running and it is monitoring:

- performance of the barbastelle population
- seasonal use of the site by barbastelles
- spatial and temporal use of the site by barbastelles
- impact of changes at the site on the bats.

The outcome of the project will inform discussions regarding the development of a long term monitoring programme and future management and use of the site.

Northern Ireland

No change since the last report.

Scotland

There was formerly an SSSI in South Ayrshire where bats were listed as part of the notified interest of the site. However, the boundaries of this site have been amended and the roost has been excluded from the SSSI, although it is still thought to exist. There is no evidence of significant changes in bat habitat and roost sites since the last report, although there may be increased pressure on house roosts, following the rabies incident in November 2002.

4. Threats

Isle of Man

On the Isle of Man there have been many planning applications for the refurbishment of old buildings, for new housing and holiday developments. Development, including road widening and associated tree removal, also has the potential to affect local bat populations and such proposals are being carefully monitored. The loss of trees is a particular concern on the island as there is relatively little broadleaved woodland.

Northern Ireland

No change since the last report.

Scotland

The recent rabies case is expected to result in an increase in requests for exclusion of bat colonies from houses, although the magnitude of this predicted increase will not be known until later this year. It is possible that there may be an associated increase in unauthorised (illegal) exclusions, but there are currently no means of accurately assessing this.

5. Data collection, analysis, interpretation and dissemination

UK

Monitoring in 2001 was interrupted by Foot and Mouth Disease restrictions (particularly for field survey), so monitoring in 2002 was the first for two years at some sites.

The NBMP holds datasets on monitoring surveys and data is held on over 2000 sites throughout the UK. Power analyses on existing data provided guidance on the number of survey sites required in meeting government targets for each species/survey. For example, to identify annual declines of 1.14% on the lesser horseshoe colony monitoring project, power analysis predicted that at least 100 colonies counted for 13 years is required based on present survey methodologies.

Contributors to the NBMP were sent a newsletter analysing and interpreting the data. Copies were made available on the BCT website at www.bats.org.uk/nbmp. Quarterly updates were published in the BCT newsletter *Bat News*.

With almost 1000 volunteers submitting data to date, the NBMP has involved many people in active bat conservation. To help ensure data quality on field surveys, twelve bat detector training workshops were run throughout the UK.

Species monitored, monitoring method employed and number of sites surveyed in 2002 and since survey inception (total network) for each selected species are shown in the table below. It refers only to sites where species are present unless otherwise indicated:

	HIBERNATION COUNTS		ROOST COUNTS		FIELD SURVEY	
	2002	Total Network	2002	Total Network	2002	Total Network
Greater horseshoe	29	62	-	-	-	-
Lesser horseshoe	79	127	113	181	-	-
Daubenton's	72	125	-	-	*186	*836
Natterer's	85	152	33	45	-	-
Whiskered	1	15	-	-	-	-
Serotine	1	4	45	74	*134	*421
Noctule	1	2	-	-	*134	*421
Common pipistrelle	-	-	-	-	*134	*421
Soprano pipistrelle	-	-	-	-	*134	*421
<i>Pipistrellus</i> sp	8	22	291	760	-	-
Brown long-eared	71	145	43	46	-	-

* Sites surveyed (includes sites where species surveyed for but absent)

In 2002, the main funders of the NBMP were the Joint Nature Conservation Committee (JNCC) and the Environment Agency.

Many of the bat groups in the UK undertake their own survey and monitoring and collect distributional data on bats with much of this data feeding into the land use planning process and local records offices.

Isle of Man

DAFF undertook a survey of ponds and dubs in the north of the island. Whilst the project provided data on the plants and water quality, the results should prove useful in wildlife protection and indicate where the better quality wildlife sites lie. Invertebrate survey work is likely to follow.

Northern Ireland

No change since the last report.

Scotland

Scottish Natural Heritage (SNH) is currently in the process of developing a centralised bat roost database, which when complete in the summer of 2003, will greatly facilitate the analysis, interpretation and dissemination of information on bat roosts throughout Scotland. This work began at the end of 2002.

C. MEASURES TAKEN IN ACCORDANCE WITH ARTICLE III TO THE AGREEMENT

6. Legal measures taken to protect bats, including enforcement action

Since March 2000 all licence applications to derogate from the provisions of the Habitats Directive have been considered by Defra, the National Assembly for Wales and the Scottish Executive, for England, Wales and Scotland respectively. All three administrations have formally announced that, in future, where derogations are required as a result of land use planning proposals, then they will be considered as part of the planning decision-making process, and therefore be considered by the relevant local planning authority.

The Countryside and Rights of Way Act 2000 (CRoW) has been useful in securing an improvement to the Wildlife & Countryside Act 1981 – this legislation relates to England and Wales. It has meant that damage or destruction of roosts and disturbance to bats can now be prosecuted if it can be proved to be “reckless”. CRoW also requires Ministers and Government departments to have regard to the conservation of biological diversity in the course of their functions. The Act requires the Secretary of State in England and the National Assembly for Wales to publish lists of priority species and habitats and to take steps, or promote the taking of steps by others, to further the conservation of the listed species and habitats.

BCT and RSPB (both NGOs) work collaboratively to assist the police across the UK to identify bat-related offences and assist with enforcement of legislation. An RSPB Investigations Officer has been seconded to BCT as Bat Investigations Officer to enable this to happen. A short leaflet “Bats & the Law” has been produced to compliment an earlier booklet produced in 2001. Incident reporting and update sheets have been produced to make it easier for volunteer workers to report potential bat offences to BCT. Training has been provided to police wildlife liaison officers, SNCO staff and bat workers.

During 2002 eighty-four incidents across the UK were investigated by the police and dealt with without formal legal action. In many cases, although there was strong evidence to suggest that an offence had been committed, formal caution or prosecution could not proceed due to a variety of reasons.

England

A church warden in Derbyshire was formally cautioned by police for netting a church porch and obstructing a bat roost. One bat was found caught in the netting (this occurred November 2001 but was not mentioned in last year’s report).

In Sussex two cautions were issued when work was undertaken on a building with a long established brown long-eared maternity colony without any consultation with English Nature. During the work, 13 *Plecotus auritus* bats were removed from the property and taken to a wildlife centre by a building contractor. One bat died and another had a broken wing. Police investigated the offence and interviewed the men involved. There were obvious signs of the bats in the loft (droppings and a dead bat). The owner and the contractor involved admitted the offences and both received official cautions.

Isle of Man

The planning system on the Isle of Man is under review by the Department of Local Government and the Environment, with consultation undertaken in late 2002. Proposed changes are awaited. The enforcement of environmental conditions requires attention.

The first review of schedules of the Wildlife Act 1990 is currently being undertaken and is expected to maintain the protection of all bat species.

The Manx Agri-Environment Scheme 2002 (a pilot scheme) was launched, with 18 farms signing up and a further 10 expected to enter in 2003. 1,700 ha of farmland are now in the scheme.

Northern Ireland

617 enquiries about bats in dwelling houses were received. In 23 cases, guidance on means of exclusion was provided. 2 licences to allow for repairs to buildings and development were issued.

Wales

No prosecutions or cautions have been issued in Wales. Nine incidents involving bats were reported in 2002. Of those, on five occasions the police in conjunction with the Countryside Council for Wales (CCW), local authorities and sometimes local bat groups provided advice to potential offenders often resulting in the prevention of offences. Of the remaining four incidents one was found to be a false report. Three cases were considered for prosecution but on each occasion no further action was decided upon. All matters were discontinued on the basis that there was no realistic prospect of conviction. In two instances the cases failed because owners of dwelling houses are not obliged to follow the advice of CCW after seeking such advice.

Scotland

A Nature Conservation (Scotland) Bill has recently been issued by the Scottish Executive for consultation and includes a number of proposals designed to improve the existing species protection legislation. Bats are among the species that will benefit from the proposed changes.

7. Sites identified and protected which are important to the conservation of bats

United Kingdom

In addition to the sites already listed as Special Areas of Conservation under the provisions of the Habitats Directive (92/43/EC) and in response to the conclusions of the Atlantic Region Seminar held in the Hague in June 2002 the UK is currently in the process of putting forward three new sites for barbastelle bats and the addition of that species to an existing candidate Special Area of Conservation (cSAC), together with two new sites for Bechstein's bat and the addition of that species to an existing cSAC.

Northern Ireland

No further ASSIs or SACs have been declared for their bat interests.

Scotland

There are no SSSI's or cSACs in Scotland where bats are part of the notified interest of the site. (See also Section 3, above).

Wales

Five new SSSI's were notified for lesser horseshoe bats in Wales in 2002. This included Rose Cottage in Llethrid near Swansea and Llangovan Church in Monmouthshire, both nursery roosts for lesser horseshoe bats; Mwyngloddfa Mynydd-Bach in Monmouthshire and Cadair Idris in Gwynedd, both hibernation sites and Plas Maenan in Conwy which is used as both a nursery roost and hibernation site.

8. Consideration given to habitats which are important to bats

United Kingdom

The Forestry Commission continue to put up bat boxes in large numbers around the UK.

A barbastelle and Bechstein's bat Technical Advisory Group has been established to:

- help show whether the existing SAC list is adequate
- make recommendations on future SAC designations
- make recommendations to the UK Government on how to maintain "favourable conservation status" for these species.

In March 2002 information was gathered from bat groups and volunteer bat workers about barbastelle and Bechstein's sites that should be considered for SAC designation. This list was put this to the Atlantic Biogeographical meeting in June 2002. (See Section 7 above).

England

Hedge planting works have taken place on a Countryside Stewardship site within a cSAC for Barbastelle.

Bat boxes to benefit pipistrelles, daubentons and noctules were included in a Countryside Stewardship agreement as part of a project with British Waterways along a stretch of the Shropshire Union Canal. All building restoration proposals now require a wildlife survey, which identifies mitigation measures and habitat enhancement opportunities, which could involve bats.

At a site in County Durham a Countryside Stewardship Scheme special project is paying for a metal grille to keep people out of a tunnel which is used by bats.

A barn is being restored and bats are using the adjacent house roof space at a farm in St John's Chapel. The ESA conservation plan includes leaving gaps in the restored barn wall so that the bats can continue to access the house roof space

Northern Ireland

No change since the last report.

Scotland

The Scottish Environment Protection Agency (SEPA) has a Habitat Enhancement Initiative (HEI) that is promoting the adoption of best practices in aquatic habitat management. Of particular relevance to bats are a series of documents promoting better management of ponds, pools and lochans, and of river / riverbank habitats by a range of sectoral interests, including agriculture, river fisheries and urban watercourse management. The good practice guidance in these documents is promoted by SEPA staff and partners at local and national level.

Under it's HEI, SEPA also provides small amounts of financial support to habitat enhancement projects for demonstration purposes. Benefits to Biodiversity Action Plan priority bat species are often expected from these projects where improved riparian habitat management is an objective of the proposal. The HEI series of publications are available on SEPA's website: <http://www.sepa.org.uk/guidance/hei/index.htm>

SEPA is also involved in all Local Biodiversity Action Plans in Scotland and takes a lead in these groups in preparing action for freshwaters, frequently associated with local action plans for bat species (although these latter plans are led by others). SEPA also promotes the adoption of sustainable urban drainage schemes as an alternative to more traditional piped urban drainage for surface water run-off. These schemes often incorporate a significant wetland and open-water component that may be providing for new feeding areas for bats in urban areas where such habitats are otherwise rare or absent.

Consideration of habitats of importance to bats is continuing through a range of initiatives designed to benefit biodiversity. The JNCC publication *Habitat management for bats* is used as a basis for much of this advice.

Wales

Considerable progress was made in 2002 with 540 new farms signed up to Tir Gofal, the Wales agri-environment scheme. This brings the total number of farms to 1,100 with 112,000 ha under agreement and includes 6,288 ha of native broadleaved woodland protected and sensitively managed and 1,057 km of hedgerows to be restored.

9. Activities carried out to promote the awareness of the importance of the conservation of bats

United Kingdom

In 2002 the Bat Group Forum met in January, May and September. This Forum facilitates communication between bat NGOs and the Government's statutory nature conservation agencies. Stakeholders from all over the UK attend Forum meetings.

Excluding rabies related articles, there was an increase in positive media stories about bats during 2002. For instance, BBC News Online and several national papers reported on a Greater mouse-eared bat found in Sussex in December. Twelve local radio stations, The Times and many local newspapers included items on Eurobats Night. Articles also appeared in a wide range of other periodicals, including coverage of The Sunrise Survey (piloted in 2002).

Two bat groups were re-launched in 2002.

The Field Studies Council published its Bat Field Guide

BCT were involved in a number of activities aimed at promoting bat conservation, including:

- Publication of a number of leaflets for bat groups, including Young Batworker, Bat News and Bat Monitoring Post.
- Mail-outs containing news, advice and information were regularly circulated to a wide range of stakeholder interests.
- Attendance at, and involvement in, numerous events aimed at promoting bats, including Eurobats night in August – 43 varied events across the UK and Eire held by local groups (compared with 33 events in 2001). Also the organisation of the BCT Conference held at Reading University in September.
- Maintenance of a helpline which dealt with over 6,000 telephone inquiries in 2002, plus e-mail inquiries. Many inquiries are from professionals (e.g. planners, architects, developers, timber treatment companies). In 2002 there was a marked increase in the number of inquiries for professionals qualified to undertake bat surveys for Habitats Directive derogations applications. Since September there has been an increase in the number of callers wanting information about bats and rabies. The BCT's website (www.bats.org.uk) is regularly updated.
- Acquisition of free pre-exposure rabies vaccinations for all bat handlers. (In the past only licensed bat workers have been eligible for free pre-exposure vaccinations.)
- Development a relational database with support from the Environment Agency and the Mammals Trust UK. This enables more effective management of volunteers. It also assists in raising awareness to key target audiences and to track performance. The database structure will be available on disk and therefore available to other organisations delivering similar services.

England

A number of Countryside Stewardship Project Officers attended training events on bat conservation.

Northern Ireland

EHS continues to give financial support to the Northern Ireland Bat Group.(£1,298 for the period of this report), and fund an advisor post at the Ulster Museum who spends 75% of their time dealing with bat issues (£27,967 for the reporting period)

Scotland

A range of activities for the public were organised by the Scottish bat groups and BCT in Scotland during 2002, especially during European Bat Week. In November BCT organised the Scottish Bat Conference. This is now an annual day long event held at the SNH's conference.

SNH continues to support the work of BCT through grant aid and has recently increased the level of funding to BCT by a factor of 2.5 to support the employment of a new Scottish Bat Officer post.

Wales

CCW continues to grant-aid BCT to support their work encouraging bat workers in Wales and raising awareness of the importance of bat conservation. CCW hosted the annual meeting of the Wales Bat Groups and together with BCT organised a training day for bat trainers. The Welsh Bat Conference, organised by local bat workers was held in May. This was attended by over 100 people from Wales and elsewhere in the UK and was grant-aided by CCW. In November CCW hosted the second Wildlife and Environmental Crime Conference.

10. Responsible bodies, in accordance with Article III.5 of the Agreement, nominated for the provision of advice on bat conservation and management

No change since the last report.

11. Additional action undertaken to safeguard populations of bats

United Kingdom

Many of the UK bat groups undertake the training of professionals. During 2002 for instance South Nottinghamshire Bat Group trained planners, Surrey Bat Group trained highways engineers, and Kent Bat Group has been involved with training arborists. In addition, most bat groups give talks and lectures to promote bat conservation to a wide variety of interest and youth groups.

Since the rabies incident in November, the Government and its agencies have been proactive on all fronts in relation to bats and rabies and has taken action to address many of the issues arising from this case. While much of the emphasis has been on taking the necessary measures to minimise the risk to the general public and bat workers, of exposure to the virus, the conservation message has not been lost and SNH is working closely with BCT and others to promote a positive image for bats, for example through the forthcoming revised *Bats & People* booklet and provision of funding for the new bat officer post in Scotland. The work in support of these initiatives, although not completed in 2002, was started during that year.

Training of volunteers in bat detector skills continues under the NBMP. BCT has recruited a Training Officer to help improve the quality of bat skills. They also run a course on 'Bats and Bat Surveys for Environmental Professionals' which continues to be effective in raising the level of skill among professionals involved in surveys. Consideration is being given to the development of standards for all levels of bat work.

12. Recent and ongoing programmes (including research and policy initiatives) relating to the conservation and management of bats. In the case of research, summaries of completed projects should be provided, giving references where possible and acknowledging the sources of funding.

United Kingdom

UK BAP Reports have been compiled on-line, for the pipistrelle, lesser horseshoe, barbastelle and Bechstein's bat. These can be viewed on: www.ukbap.org.uk/asp/2002_LPLogin.asp.

The BAP Five Year Plan completed in October, identified how to convert the biodiversity action plan into deliverable action. This will consist of a suite of major projects to deliver targeted bat conservation in areas identified as priorities; woodland, farmland, buildings, wetlands, planning and national recording and with a greater focus on the lesser horseshoe, barbastelle and Bechstein's bat. The next step will be to raise the funds to build on the successes of Biodiversity Action for Bats and launch projects identified by the BAP Five Year Plan.

Key areas of research include:

- A partnership research and development project was undertaken with the Environment Agency and BCT to examine bats as indicators of environmental quality. A draft report has been produced which demonstrates that Daubenton's bat activity is positively related to insect biodiversity.
- In 2002 NERC-funded research continued at the University of Bristol into the molecular ecology of greater horseshoe bats. DNA has been extracted from all bats captured at Woodchester since 1993, and investigations into patterns of paternity and population structure (additional data now available from Devon and Cornwall) over large scales of time and space are about to be undertaken.
- A research project continued at the University of Bristol into autumnal swarming behaviour.
- A study on species composition and turnover has been accepted in *Biological Conservation* and will be published in 2003.
- A study has been conducted on bat and insect activity on organic and conventional farms. This will be completed in early 2003.
- A Defra funded study of bat activity has been initiated in relation to agricultural intensification.
- A seroprevalence study of lyssaviruses in British bats
- A study of the ecology of whiskered and Brandt's bats.
- A review of SNH advice and the effectiveness of bat boxes.
- A review of the use by local authority planners of existing protected species advice.
- Barbastelle monitoring at Paston Barn.
- A custom built bat house has been erected in Northern Ireland to house bats that have been excluded. Monitoring will be undertaken to establish the success of this type of mitigation.

England

Hertfordshire Bat Group continued to study populations of bats in barns. This investigates the effect of barn conversions on the bats that roost there.

Isle of Man

DAFF now requires that licensed bat workers are vaccinated against rabies. The Daubenton's bat, from which the risk is believed to be greatest, is widespread on the island. Consideration was given to testing Daubenton's bats for rabies on the Isle of Man but this was dismissed as the results were thought unlikely to affect government policy or advice.

Scotland

Further to the rabies incident in November, SNH has reviewed and overhauled its working practices in relation to bat casework and made the necessary changes in accordance with health & safety requirements. The nature of the advice provided to the public in respect of bats in the living space of houses has also been reviewed. A range of research projects have been, or will be developed to address various issues that have arisen since the incident. Again, much of this work was still in its infancy at the end of 2002, but is now being taken forward in 2003 and thereafter.

Wales

Following the identification of a barbastelle roost in Pengelli forest further research was undertaken to identify autumn roosts and foraging areas.

CCW continue to fund the automatic bat counters in lesser and greater horseshoe bat roosts. Welsh bat groups again took part in the annual lesser horseshoe bat roost count using non-intrusive methods with over 9,200 bats counted at 124 roosts.

Species Challenge Fund projects in 2002 included a continuation of the Pembrokeshire Bat Hunt which has surveyed each 5km square in Pembrokeshire using point counts and undertaken counts at roost sites. The National Trust was funded to undertake a survey of pipistrelle bats on their properties in mid and South East Wales. The survey was successful in proving that all three species of pipistrelle bat, common, Nathusius' and soprano are present and are both roosting and foraging over the Trust land holding. In addition the project also found a further six bat species were present including some with nursery colonies. Management recommendations were provided for all properties with bats present. BCT undertook two projects – Bats in Barns and Population Trends on *Pipistrellus* spp in Wales which will be completed in 2003.

13. Consideration being given to the potential effects of pesticides on bats, and their food sources and efforts to replace timber treatment chemicals which are highly toxic to bats

United Kingdom

The Wildlife Incident Investigation Scheme (WIIS) is operated by the four UK agriculture departments and is co-ordinated by the Health and Safety Executive. Although there are some local differences in detail, the basic operation of the Scheme is the same throughout the UK. Field investigations are carried out into cases where it is suspected wildlife has been affected by pesticides, *post mortem* examinations of casualties are undertaken and samples analysed for pesticide residues. The results of these enquiries are used in reviews of the conditions of approval of the pesticides concerned, and evidence of illegal use (whether a deliberate attempt to poison wildlife or an unapproved method of use against the proper target species) may lead to prosecution or other enforcement action.

During 2002, one case involving bats was accepted into this Scheme. Twelve dead pipistrelle bats were found inside an empty holiday home, with reports of dead bats also seen in the garden. It was suspected that exposure to pesticides occurred at another location. Analysis was negative, apart from small background residues of organochlorine.

The Environmental Panel Subgroup on Wider Biodiversity (part of the Advisory Committee on Pesticides) is considering issues related to pesticides and biodiversity. As part of this assessment, they will examine those non-target species, including bats, that are associated with agriculture and determine whether they need to be considered in an appropriate risk assessment.

BCT distributed leaflets at the Pest-Tech event at Birmingham in November 2002, input into an article in Professional Pest Control Magazine, and sent out their Professional Support Sheet 'Bats in Buildings' to pest controllers.

England

Within the Pennine Dales ESA, the Rural Development Service sent out English Nature's Species Handbook guidance on bat-friendly timber preservation to all agreement holders proposing barn work.

Scotland

The prevention of pollution of surface waters by pesticides and their impacts on invertebrate assemblages in those waters, is a key objective of SEPA. As the invertebrate assemblages of rivers, lochs and canals include the aquatic life stages of many flying insects that, on emerging from the water environment, form the prey of bats, this pollution prevention role provides considerable indirect benefit to bats which feed over water. SEPA's current river classification scheme, which combines chemical biological and aesthetic criteria indicates that, of 50,000 km of rivers in Scotland classified under the scheme, around 96% of the length has Excellent or Good status.

SNH continues to provide advice on the use of approved timber treatment pesticides for use in bat roosts. This work is ongoing and forms much of their statutory advice in relation to bats.

D. FUNCTIONING OF THE AGREEMENT

14. Co-operation with other Range States

Defra initiated, and is funding, a project entitled Bat Conservation in Eastern Europe. The aim of the project is to set-up the framework for effective national bat conservation and monitoring programmes in two countries in Eastern Europe (Romania and Moldova), in consultation with local and international experts, under the Agreement on the Conservation of populations of European Bats.

The objectives of the project are:-

- Information gathering: carry out skills/needs analysis for bat conservation and monitoring
- Action planning: enable the development of an agreed national action plan for bat conservation and monitoring
- Implementation: provide appropriate resources to commence implementation of the national action plan, e.g. equipment, expert training, and advice

The project is being undertaken by BCT on behalf of Defra.

SNH has been in consultation with Dr Hans Baagoe of the University of Copenhagen, Denmark, in relation to bats and rabies and the approach that has been taken there.

In response to an urgent request from Portugal in June with regard to *Miniopterus schreibersii*, Defra funded post mortem work to investigate why Spain and Portugal had experienced large mortality rates for this species. The post-mortem results were inconclusive.

15. Measures taken to implement Resolutions adopted by Meetings of Parties

None identified.