

Experience in Bat Mitigation: Guidance for Ecologists and Developers



1. Aims of this note:

- To help ecological consultants to assess their skills and experience levels before applying for a EPS mitigation licence as a 'named' ecologist.
- To guide ecologists when assessing the skills and experience levels of accredited agents or assistants employed on mitigation schemes.
- To guide referees when writing references on behalf of the ecologist.

Developers need to be confident that ecologists they appoint have relevant experience. Guidance on choosing a consultant is provided within our advice document on "[How to get a licence](#)"

Preparing a mitigation scheme for bats requires a range of skills to ensure that a proposed activity can proceed lawfully and without adversely affecting the favourable conservation status of the species of bats concerned. Proposals vary in complexity and in their potential impacts on the bats. It is the responsibility of the ecologist to ensure that he/she has the relevant skills, knowledge and experience to design and implement an appropriate method statement for each application. It should be remembered that a licence does not constitute a qualification or accreditation and should not be used as one.

The first requirement for assessing the impacts of a proposed activity on a population of bats is a survey. A sound survey, including an assessment of all available evidence, will enable any impacts at site level and in a wider perspective to be accurately assessed. It is also crucial for the subsequent design and implementation of appropriate and proportionate mitigation measures. Hence, to become a good surveyor, there is a need for a substantial amount of fieldwork experience.

Bat mitigation plans for a particular scheme must be clear, achievable and discussed fully with planners and developers. A sound understanding of the planning system and construction industry is therefore essential to avoid misunderstandings and to ensure the delivery of realistic and proportionate mitigation schemes.

2. Skills and experience required

2.1. Ecological consultants

Skills are gained through training, experience, keeping abreast of the literature and giving due attention to details of survey, impact assessment and mitigation design and implementation. It is expected that a new applicant will have an understanding of the guidance given in the most recent editions of: the *Bat Mitigation Guidelines* (English Nature, now Natural England), *The Bat Workers Manual* (JNCC), *Bat Surveys – Good Practice Guidelines* (Bat Conservation Trust) and the various guidance available on the Natural England internet site.

(a) Essential skills for a ‘named’ ecologist

The table below identifies the skills and experience required to successfully carry out a mitigation scheme and to be a ‘named’ ecologist on a EPS mitigation licence.

Ecologists who have held¹ or been named² on a mitigation licence within the last three years for the same species, and in relation to a project with a similar scale, methodology and mitigation are not required to hold a personal survey or roost visitor licence, although this is highly desirable.

Ecologists who have held or been named on a EPS mitigation licence but not in the last three years are expected to provide evidence of their more recent bat experience using this table as a guide, which includes the requirements to hold a survey or roost visitor licence.

Ecologists applying for additional species should use this table as a guide and provide evidence of their experience with the species in question. For example, if you have held licences for common bat species previously, but now wish to obtain a licence for rarer species of bats, you must demonstrate that you have the appropriate experience. Some bat species are very similar in terms of morphology, ecology and behaviour; therefore it might not always be necessary to demonstrate experience with a species if you have extensive experience with another similar species. In these instances, the Wildlife Adviser will make an assessment of the evidence presented on a case by case basis.

A new applicant should satisfy Natural England that he or she has achieved at least the minimum standard for each skill by providing brief, written evidence based on the guidance in the second column.

¹ those ecologists who have held a licence as the principal licensee (ie., pre the changes made in November 2007 where the principal licence holder became the landowner/developer).

² those ecologists who have (since November 2007) been named on the licence to assist the principal licence holder.

Skills and experience	Evidence
Understanding of bat biology, ecology and conservation.	Roost visitor (Conservation) licence or survey (Science and Education) licence and evidence of understanding of bat ecology from a range of field experience, literature, and attending training courses and conferences.
Identification of all bats likely to be encountered in a range of situations.	Roost visitor (Conservation) licence or survey (Science and Education) licence and evidence of field experience of identifying bats. At least two years experience with a range of species.
Experience in handling and examining bats.	Roost visitor (Conservation) licence or survey (Science and Education) licence to take or disturb bats by hand or static net at roosts. Evidence from at least five sites over a two year period.
Working knowledge of survey methods and site assessment.	Held own survey (Science and Education) licence to disturb bats and take bats by hand or static net for identification and release for at least two years. Surveyed a minimum of five sites in these two years including both crevice and void-dwelling bats. Give details of species encountered and roost types surveyed. Give details of any courses attended.
Working knowledge of the structure and terminology of buildings: dwellings, barns, churches, bridges and other structures and trees.	Knowledge gained from field experience, literature, training courses. Give details of any courses attended.
Identifying bats using bat detectors	Competent in the use of a range of bat detectors and analysing sonograms.
Understanding of impact assessment for the range of bat species likely to be encountered in development schemes.	Work on, or study of, a range of at least three licensed projects. Give details of species and scale of main impacts of these developments.
Working knowledge of Local Authority planning, European Protected Species legislation and licensing process:- assessing risks of committing offences, avoidance measures and planning effective, pragmatic and proportionate mitigation strategies.	Work on at least three licensed bat projects including both crevice and void-dwelling bats.
Working knowledge of roost destruction techniques, roost creation, restoration and enhancement for species commonly encountered in mitigation	Good understanding of implementing mitigation schemes and ability to supervise construction staff on details of mitigation. Involvement in at least three licensed bat projects. Give brief details of species encountered and mitigation provided.

Planning and implementing long-term habitat management, maintenance and monitoring.	Work on, or study of, method statements for at least three licensed projects where this has been/is required.
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Occasionally, it is evident that although a prospective ‘named’ ecologist can demonstrate all of the above, he/she submits an application that is substantially below the standard required. In such cases, we may decide the applicant does not demonstrate adequate application of experience to be named on a EPS mitigation licence. In these circumstances, we will provide the ecologist with our assessment report which will highlight the areas of concern and include constructive feedback on the issues that need to be addressed. This report can be used to improve the quality of future licence applications to achieve a successful outcome. If requested, we can also provide verbal feedback to the ecologist.

(b) Additional skills for a ‘named’ ecologist

Natural England expects ‘named’ ecologists to have the following skills but does not need supporting evidence:

- Welfare of bats during survey, building works and mitigation.
- Communication skills, to allow effective liaison with planners, developers, landowners and others.
- Organisational and report writing skills.
- Flexibility and problem-solving skills, to deal effectively with unexpected challenges.

2.2. Employing accredited agents and assistants

The difference between an accredited agent and an assistant is important. Accredited agents are appointed by the ‘named’ ecologist on behalf of the licensee (developer) and can work independently on site without supervision whereas assistants require supervision at all times by either the consultant or agent.

Agents and assistants do not need the same level of skills and experience as a ‘named’ ecologist because they will be working under either direction or supervision of the ecologist. Employment as an accredited agent or assistant can be viewed as training to becoming a ‘named’ ecologist on a mitigation licence. An accredited agent is expected to have wider experience than an assistant, who must work under the direct supervision of the appointed ecologist or the agent. The ‘named’ ecologist should decide on the necessary level of supervision of the agent, depending on the significance and complexity of the task. ‘Named’ ecologists are responsible for all ecological work carried out under the licences, including that carried out by accredited agents and assistants. It is therefore the responsibility of the ‘named’

ecologist to ensure anyone they employ has the appropriate skills and experience. Natural England does not require evidence for accredited agents or assistants, but as a guide, each should have the following key skills:

Accredited Agent key skills

- Identification of bats likely to be encountered in mitigation schemes, in the hand. Experience in identifying bats using a bat detector.
- Own survey licence and/or roost visitor licence (which includes the relevant activities & methods, e.g. take by hand/static hand net).
- Understanding of bat ecology
- Basic knowledge of legislation and licensing process
- Understanding of bat welfare issues
- Record keeping
- Good understanding of the structure and terminology of buildings, barns, bridges and other structures, and trees
- Good understanding of implementing mitigation schemes and ability to supervise construction staff on detail of mitigation
- Good working knowledge of construction practices
- Should an accredited agent apply to be a 'named' ecologist on a mitigation licence in the future they should give details of their experience including the reference numbers of the licences that they have worked under.

Assistant key skills

- Gaining skills in bat identification and the use of bat detectors
- Bat welfare issues
- Basic knowledge of bat ecology
- Basic knowledge of construction practices
- Record keeping
- Basic knowledge of implementing mitigation schemes
- Training in progress towards own survey licence/roost visitor licence preferable

3. Suggested ways of gaining experience

- Attend training courses run for example by Bat Conservation Trust (BCT), Institute of Ecologists and Environmental Managers (IEEM), Wildlife Trusts (WTs), Field Studies Council (FSC), etc.
- Work as a volunteer for a conservation body such as a Bat Group or County Wildlife Trust.
- Train as a Natural England volunteer bat warden.
- Work as an accredited agent or assistant on a variety of mitigation schemes.

- Attend conferences such as BCT National Bat Conferences, Mammal Society conferences and IEEM conferences.

4. Refereeing for a prospective 'named' ecologist

Two references are needed for ecologists who have not previously held a bat licence for a mitigation scheme or been a 'named' ecologist under the current licensing procedure, and those who have not held a mitigation licence in the last 3 years.

References need not be lengthy but should contain sufficient, specific information to support the prospective 'named' ecologist's experience in relation to the proposed scheme and more widely.

In general, a referee should hold relevant bat licences (e.g. roost visitor, survey, development) and have worked on mitigation projects with the person applying to be a 'named' ecologist, or be able to vouch for their competence through other bat work or training undertaken. A brief outline of the referee's own bat experience should be included and the length of time he/she has known the prospective 'named' ecologist in relation to work with bats. If possible, the prospective 'named' ecologist's trainer should be a referee. At least one referee must have held a bat mitigation licence in the last three years.

As mitigation schemes vary in complexity, the referee should be satisfied that the prospective 'named' ecologist has the necessary survey and mitigation design and implementation skills for a range of projects involving the relevant species of bats and the methods and activities to be undertaken on the application site. Wider experience (of both the prospective 'named' ecologist and the referee) will be needed for projects involving rarer bats or less widely distributed bats. Experience must include high welfare standards.

If the referee has worked with the prospective 'named' ecologist on other mitigation projects, brief details of the mitigation methods and level of responsibility held by the prospective 'named' ecologist are needed. It may be that the prospective 'named' ecologist has worked as an assistant or accredited agent under other licences and has gained experience in areas such as project management or the designing of mitigation schemes. EPSL or EPSM reference numbers for licences which the named ecologist has worked on should be provided wherever possible.

If the prospective 'named' ecologist has attended any relevant training courses these should also be mentioned.

In order to determine whether a prospective named ecologist is suitably experienced, the wildlife adviser assessing an application will assess the information provided by the prospective named ecologist in the application form; the supporting information provided by referees; and the quality and standard of the method statement. Where the information indicates a lack of

experience, or fails to demonstrate the level of experience required (see table above), a Further Information Request will be issued requesting more information is provided or that a more experienced ecologist applies for the licence.

5. Further reading

Mitchell-Jones, A., 2004. Bat mitigation guidelines. English Nature (now Natural England).

Bat Conservation Trust, 2007. Bat surveys – good practice guidelines.

Joint Nature Conservation Committee, 2004. Bat Workers Manual.

Altringham, J. D. (2003). British Bats. The New Naturalist Library, Volume 93. Harper Collins, London.