Appendix 5D
Bat Survey Report

OFFICE OF PUBLIC WORKS

Lower Lee (Cork City) Drainage Scheme

BAT FAUNA STUDY

December 2016

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1. Receiving Environment

1.1 Introduction

Due to repeated and increasingly common flood events, a flood relief scheme along the lower part of the River Lee from the townland of Innishcarra at the west to the centre of Cork city, is proposed and an emerging preferred option has been devised. As part of a wider ecological constraints assessment of the planned development, *Aardwolf Wildlife Surveys* was requested by *Ryan Hanley Consulting Engineers* to undertake a specific assessment of bat fauna within the study area.

Large-scale development entailing changes to or removal of existing vegetation and older structures may adversely affect bats through loss of breeding/resting places or traditional commuting features, displacement and injury. It is essential therefore that a study of protected species such as bats is undertaken in such cases to identify any conflict zones and hence to avoid and/or reduce impacts to these animals through mitigation.

1.2 Study area

The proposed flood relief scheme begins at Inniscara townland approximately 18km west of Cork city and follows the course of the River Lee to the centre of the city.

1.3 Bat fauna assessment

This report presents the results of an onsite bat assessment undertaken on 19 and 20 October 2014 by Conor Kelleher of Aardwolf Wildlife Surveys. The bat fauna recorded/expected to occur onsite is described and the likely impacts of the planned works on protected species discussed. Mitigation measures are given to safeguard bats prior to and during planned works.

1.3.1 Survey methodology

Initially, a desktop assessment of aerial photographs along the route of the proposed flood relief scheme was undertaken to identify existing structures and habitats adjudged to be favourable for bat use within planned construction areas. These habitats and structures were then assessed on the ground for their potential use by bats. Structures and trees were visually inspected for evidence of the presence of these animals with the aid of a powerful torch (141 Lumens) – *Petzl* MYO RXP and binoculars. Sign of bats is more often observed than the animals themselves therefore each building/tree was inspected for evidence of bat presence which is often shown by grease staining, droppings, urine marks, corpses, feeding signs such as invertebrate prey remains and/or the presence of bat fly *Nycteribiidae* pupae, though direct observations are also occasionally made.

The site survey was supplemented by a review of *Bat Conservation Ireland's* (BCIreland) National Bat Records Database.

1.3.2 Survey Constraints

The onsite assessment was undertaken during the autumn period when bat activity is much reduced as these animals prepare for winter hibernation therefore a bat activity survey using detectors was not possible. Temperatures were mild during survey with 18°C in daytime and 14°C at night. Winds were light and there was no rainfall.

2. Bat Fauna Assessment Findings

2.1 Review of local bat records

The review of existing bat records within the study area (sourced from BCIreland's National Bat Records Database) reveals that eight of the ten recorded Irish species have been observed locally. These include common *Pipistrellus* and soprano *P. pygmaeus* pipistrelle, Leisler's *Nyctalus leisleri*, brown long-eared *Plecotus auritus*, Daubenton's *Myotis daubentonii*, Natterer's *M. nattereri*, whiskered *M. mystacinus* and lesser horseshoe *Rhinolophus hipposideros* bats as shown in Table 1 below.

Table 1: Adjudged status of bat species within the study area

Common name	Scientific name	Presence	Roosts	Source
Common pipistrelle	*Pipistrellus*	Present	0 known	BCIreland
Soprano pipistrelle	*Pipistrellus pygmaeus*	Present	1 known	BCIreland
Nathusius' pipistrelle	*Pipistrellus nathusii*	Potential - rare	0 known	BCIreland
Leisler's bat	*Nyctalus leisleri*	Present	4 known	BCIreland
Brown long-eared bat	*Plecotus auritus*	Present	0 known	BCIreland
Lesser horseshoe bat	*Rhinolophus hipposideros*	Present	1 known	Pers. Obs.
Daubenton's bat	*Myotis daubentonii*	Present	1 known	BCIreland
Natterer's bat	*Myotis nattereri*	Present	0 known	BCIreland
Whiskered bat	*Myotis mystacinus*	Present	0 known	BCIreland
Brandt's bat	*Myotis brandtii*	Potential - rare	0 known	BCIreland

Four roosts of Leisler's bat and one roost each of soprano pipistrelle, Daubenton's and lesser horseshoe bats have also been identified in the area but all are several kilometres distant to the study area.

Brandt's bat *M. brandtii* (only discovered in 2003 (Mullen 2007)), may potentially occur in the area but records of the species are few to date and, since it cannot be distinguished from the whiskered bat by detector, it is probably often misidentified or overlooked.

The lesser horseshoe bat is restricted to the west of Ireland and it is only known from Counties Mayo, Galway, Clare, Limerick, Kerry and Cork (Kelleher 2004). However, single specimens have recently been discovered in Lough Key, near Boyle, Co. Roscommon in 2004 (B. Keeley, pers. comm.) and in Tubbercurry, Co. Sligo in 2008 (pers. obs.), two counties where their low numbers may have caused their presence to be overlooked until now. The population of this species in Co. Cork is small and most roosts are in West Cork however small numbers are known to be present in the Ovens, Ballincollig and Blarney areas to the immediate west and northwest of Cork city.

The remaining Irish bat species; Nathusius' pipistrelle *P. nathusii*, may occur in the area occasionally, however, to date, its known maternity roosts are restricted to north-east Ireland but it is being recorded more often, probably as a result of climate change, with more animals of this highly migratory species arriving from the continent, and with increased use of bat detectors in Ireland. The species has yet to be recorded in the immediate area but potential exists for its occurrence as it has been recorded near the village of Dripsey (pers. obs.), approximately 15km to the west.

Further information on the Irish bat fauna is given in Appendix 1 and 2.

2.2 Review of favourable bat habitats and structures

The review of the habitats and structures with potential favourability for use by bats and directly impacted by the proposed development identified three specific areas with high suitability:

1) The derelict and disused structures of the Royal Gunpowder Mills within Ballincollig Regional Park.

2) The mature deciduous trees along the northern bank of the river within the University College Cork Distillery Campus and on the opposite, southern bank at the same location.

3) The quay walls within the city centre.

2.3 Structure Survey Findings

As part of the proposed flood relief scheme, Ballincollig Regional Park at the western end of the scheme, is designated as a planned 'Upstream Washlands' area which will be allowed to flood to lessen the downstream impact on the city. This park is the site of an extensive 18th century gunpowder manufacturing facility in which the derelict and ruined remains of buildings, including watch houses, press houses, magazines, refineries, mills, sawmill and cooperage, still exist.

Each of the structures within Ballincollig Regional Park were inspected for bats and bat use potential. Signs of bats or actual bat presence were noted in three buildings with droppings of brown long-eared bat in a storage building and a magazine and a roosting Daubenton's bat in a second magazine.

Though used by bats, the animals present within these buildings will not be at risk from the proposed scheme as all structures are above ground level and bat roosting sites within the buildings are several metres higher than predicted flood levels.

Similarly, the city quays, which are proposed to be increased in height, were inspected for their potential to harbour bats and, although many have crevices and holes of various sizes suitable for use as roosting features, all are, unsurprisingly, subject to inundation during flood events so are unlikely to be used by these animals due to the risk of drowning.

2.4 Tree survey findings

The mature deciduous trees along the river within the UCC Distillery Campus grounds (Plate 1 below) and also along the opposite riverbank which comprise of alder *Alnus glutinosa*, beech *Fagus sylvatica*, lime *Tilia* spp., sycamore *Acer pseudoplatanus*, ash *Fraxinus excelsior* and horse chestnut *Aesculus hippocastanum*, are potential bat roosts.

Plate 1: Mature trees along the river within the UCC Distillery Campus grounds

Although no bat roost was identified in any of these trees, the presence of cracks, crevices and hollows within branches and trunks, coupled with the proximity of the trees to the river, increases the likelihood that some may harbour bats. These trees will be impacted by the 1.2m high defence embankment proposed to be constructed in this area.

3. Legal Status – Bats

All Irish bat species are protected under the Wildlife Act (1976) and Wildlife Amendment Acts (2000 & 2010). Also, the EC Directive on The Conservation of Natural habitats and of Wild Fauna and Flora (Habitats Directive 1992), seeks to protect rare species, including bats, and their habitats and requires that appropriate monitoring of populations be undertaken. Across Europe, they are further protected under the Convention on the Conservation of European Wildlife and Natural Habitats (Bern Convention 1982), which, in relation to bats, exists to conserve all species and their habitats. The Convention on the Conservation of Migratory Species of Wild Animals (Bonn Convention 1979, enacted 1983) was instigated to protect migrant species across all European boundaries. The Irish government has ratified both these conventions.

All Irish bats are listed in Annex IV of the Habitats Directive and the lesser horseshoe bat is further listed under Annex II.

NB: Destruction, alteration or evacuation of a known bat roost is a notifiable action under current legislation and a derogation licence **has** *to be obtained from the* National Parks and Wildlife Service (NPWS) **before** *works can commence.*

The current status and legal protection of the known bat species occurring in Ireland is given in Table 2 below.

Table 2: Legal status and protection of the Irish bat fauna

Common and scientific name	Wildlife Act 1976 & Wildlife (Amendment) Acts 2000 & 2010	Irish Red List status	Habitats Directive	Bern & Bonn Conventions
Common pipistrelle *Pipistrellus*	Yes	Least Concern	Annex IV	Appendix II
Soprano pipistrelle *P. pygmaeus*	Yes	Least Concern	Annex IV	Appendix II
Nathusius' pipistrelle *P. nathusii*	Yes	Not referenced	Annex IV	Appendix II
Leisler's bat *Nyctalus leisleri*	Yes	Near Threatened	Annex IV	Appendix II
Brown long-eared bat *Plecotus auritus*	Yes	Least Concern	Annex IV	Appendix II
Lesser horseshoe bat *Rhinolophus hipposideros*	Yes	Least Concern	Annex II Annex IV	Appendix II
Daubenton's bat *Myotis daubentonii*	Yes	Least Concern	Annex IV	Appendix II
Natterer's bat *M. nattereri*	Yes	Least Concern	Annex IV	Appendix II
Whiskered bat *M. mystacinus*	Yes	Least Concern	Annex IV	Appendix II
Brandt's bat *M. brandtii*	Yes	Data Deficient	Annex IV	Appendix II

Also, it should be noted that any works interfering with bats and especially their roosts, including for instance, the installation of lighting in the vicinity of the latter, may only be carried out under a licence to derogate from Regulation 23 of the Habitats Regulations 1997 and Regulation 54 of the European Communities (Birds and Natural Habitats) Regulations 2011 (which transposed the EU Habitats Directive into Irish law), issued by NPWS. The details with regards to appropriate assessments, the strict parameters within which derogation licences may be issued and the procedures by which and the order in relation to the planning and development regulations such licences should

be obtained, are set out in Circular Letter NPWS 2/07 "*Guidance on Compliance with Regulation 23 of the Habitats Regulations 1997 - strict protection of certain species/applications for derogation licences*" issued on behalf of the Minister of the Environment, Heritage and Local Government on the 16th of May 2007, reproduced in Appendix 3.

Furthermore, on 21st September 2011, the Irish Government published the European Communities (Birds and Natural Habitats) Regulations 2011 which include the protection of the Irish bat fauna and further outline derogation licensing requirements re: European Protected Species.

3.1 Assessment of Bat Interest of the Study Area

The River Lee is an important habitat for bats and other wildlife. The watercourse acts as a vegetated corridor along which bats and other animals can commute from the wider countryside into the urban environment. The riparian habitat also provides a sheltered foraging area, a breeding site for invertebrate prey and, at night, screening from the surrounding artificial lighting of the urban area. Bridges, buildings and trees along and over the river also offer potential roosting sites for bats.

4. Potential Impact of the Development on Bats

Bat species within the area of the proposed development will be affected by both the construction phase and subsequent existence of new structures such as embankments and walls which may require the removal of mature trees.

Extant records of bats in the immediate area indicate that a diverse range of bat species use the river corridor and the key impacts on these animals arise through potential roost loss, loss of feeding areas and disruption of commuting routes.

5. Mitigation Measures

Standard mitigation measures as would apply to any large-scale development, should be adopted in the construction of the flood defenses. These include limiting season of disturbance to trees and vegetation to reduce impacts on breeding species, to provide for habitat replacement and to implement measures to avoid and/or control pollution and sedimentation into watercourses during construction and operation phases. Specific measures will be required to protect bats onsite and these are given below.

The following mitigation measures are in line with the NRA guidelines on provisions for the conservation of bats during the planning and construction of roads (2006). Reference is made to the NRA Guidelines (*Best Practice Guidelines for the Conservation of Bats in the Planning of National Road Schemes* and the *Guidelines for the Treatment of Bats during the Construction of National Road Schemes*).

Removal of deciduous trees

Should any mature broadleaved tree be scheduled for removal as part of the development plans, it should be surveyed for bat presence by a suitably experienced specialist immediately prior to felling. If bats are found, an application for a derogation licence should be made to the *National Parks and Wildlife Service* to allow its legal removal. Such trees should ideally be felled in the period late August to late October, or early November, in order to avoid disturbance of any roosting bats as per *National Roads Authority* guidelines (NRA 2006a and 2006b) and also to avoid the bird breeding seasons. Tree felling should be completed by mid-November at the latest as bats roosting in trees are very vulnerable to disturbance during their hibernation period (November – April). If trees are to be removed outside of these periods extra care should be taken prior to felling to ensure no protected species are present. Trees with ivy-cover, once felled, should be left intact onsite for 24 hours prior to disposal to allow any bats beneath foliage to escape overnight.

Trees to be retained

Where possible, treelines and mature trees that are located immediately adjacent to planned construction areas or are not directly impacted should be avoided and retained intact. Overall impacts on these sites should be reduced through modified design and sensitivity during construction. Retained trees should be protected from root damage by machinery by an exclusion zone of at least 7 metres or equivalent to canopy height. Such protected trees should be fenced off by adequate temporary fencing prior to other works commencing.

Boundary vegetation

Linear features such as hedgerows and treelines serve as commuting corridors for bats (and other wildlife) and the onsite boundary vegetation especially that bordering the river should be retained and/or replaced once construction ends. Native species should be chosen in all landscaping schemes. Planting schemes should attempt to link in with existing wildlife corridors (hedgerows and treelines) to provide continuity of wildlife corridors.

6. Residual Impact of the Development on Bats

The construction phase of the flood defenses may displace certain bat species through disruption of commuting routes but this is expected to be temporary. No impacts are expected to bats currently using the old gunpowder mill structures within Ballincollig Regional Park as flood water levels within and around these buildings will not be high enough to affect roosting bats. If the recommended mitigation measures to safeguard these animals are implemented, preserving the present nature of the river corridor, the residual impact of the development on bats is expected to be negligible and all bat species recorded in the area should persist.

7. References

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Appendices

Appendix 1- Bat Ecology

Introduction

The bat is the only mammal that is capable of true flight using modified hands and arms which are covered by a supple membrane of skin. This ability has allowed bats to exploit aerial insect prey and avoid predation. As the largest mammalian group after the rodents (to which they are not related), bats are very successful and have diversified into over 1,300 species worldwide, representing almost a quarter of all mammal species. Within such diversification, they have evolved a range of hunting strategies, means of reproduction, roosting behaviours and social interactions. They are found throughout the world and in every continent apart from Antarctica.

Bats are classified within the Order Chiroptera (meaning 'Hand-wing') and this is further divided into two Superfamilies: the Megachiroptera and Microchiroptera. The former are mainly fruit-eaters while the latter are predominantly insectivorous. Of these, 52 bat species are currently known in Europe.

Irish bat species

In Ireland, nine species of bat are currently known to be resident with the residency of the tenth recorded species yet to be proven. These are classified into two Families: the Rhinolophidae (Horseshoe bats) and the Vespertilionidae (Common bats). The lesser horseshoe bat *Rhinolophus hipposideros* is the only representative of the former Family in Ireland. All the other Irish bat species are of the latter Family and these include three pipistrelle species: common *Pipistrellus pipistrellus*, soprano *P. pygmaeus* and Nathusius' *P. nathusii*, four *Myotids*: Natterer's *Myotis nattereri*, Daubenton's *M. daubentonii*, whiskered *M. mystacinus*, Brandt's *M. brandtii*, the brown long-eared *Plecotus auritus* and Leisler's *Nyctalus leisleri* bats. Individual species accounts with distribution maps are given in Appendix 2.

Hunting with sound

The microbats are unique as they use a type of sonar, called echolocation, by which they hunt their prey. This is a stream of sound produced at high frequencies which allows the animal to build-up a complete 'sound picture' of their surroundings. These sounds are produced well beyond the range of human hearing. Using these sounds, the bats are able to detect the clutter of nearby leaves, hear an insect, know how fast it is travelling, how fast its wings are beating, whether it is hard or soft bodied etc. before closing in for the catch. Although bats use this method to find their way around, they also use their eyes to see in low light levels.

All the European bat species feed exclusively on insects and/or spiders and a pipistrelle, weighing only 4 to 8 grams, will eat up to 3,500 insects every night. This allows the bat to increase its body weight by 50% each night but this is immediately burned off through calorie consumption while flying. Such feeding ensures a build up of fat in the form of brown adipose tissue between the shoulder blades of the bat which acts as a winter fuel store to keep the animal alive while in hibernation.

Roosting behaviour

Bats naturally roost in caves and trees but some species have recently adapted to using man-made structures for roosting. Being social animals, these roosts can reach substantial numbers in the peak period of bat activity in mid-summer and especially if the roost has been selected as a maternity site. These nursery roosts are mainly composed of breeding females but often they include some non-breeding females and males that may be the previous season's young still with their mother. Males are more solitary and form smaller roosts apart from the females. For summer roosting, bats seek warm temperatures but, for hibernation in winter, they require constant temperatures of only 5° or 6°C and humid surroundings to keep from dehydrating. In mild winters, bats will emerge from such sites to hunt should insects be on the wing.

Breeding and longevity

In autumn, male bats attract females by song flights and form harems with up to 20 females being defended by a male. After mating, the males take no further part in the rearing of the young. Irish bats can produce one young per year but, more usually, only one young is born in spring every two years. There is no fixed pregnancy period and gestation is governed by ambient temperature. The slow rate of reproduction by bats inhibits repopulation in areas of rapid decline. Although bats have been known to live for twenty or more years, this is rare as most die in their first and the average lifespan, in the wild, is four years. The survival of the young is closely linked to climate and poor weather in spring and summer can result in high infant mortality.

Threats

All bat species are in decline as they face many threats to their highly developed and specialised lifestyles. Many bats succumb to poisons used as woodworm treatments within their roosting sites (Racey and Swift 1986). Agricultural intensification, with the loss of hedgerows, treelines, woodlands and species-rich grasslands have impacted bat species also. Habitual roosting or hibernation sites in caves, mines, trees and disused buildings are also often lost to development. Summer roosts are prone to disturbance from vandals. Agricultural pesticides accumulate in their prey, reaching lethal doses. Chemical treatments in cattle production sterilise dung thus ensuring that no insects can breed within it to be fed upon by bats. Likewise, river pollution, from agricultural runoff, reduces the abundance of aquatic insects. Road building, with the resultant loss of foraging and roosting sites is a significant cause in the reduction of bat populations across Europe.

Extinction

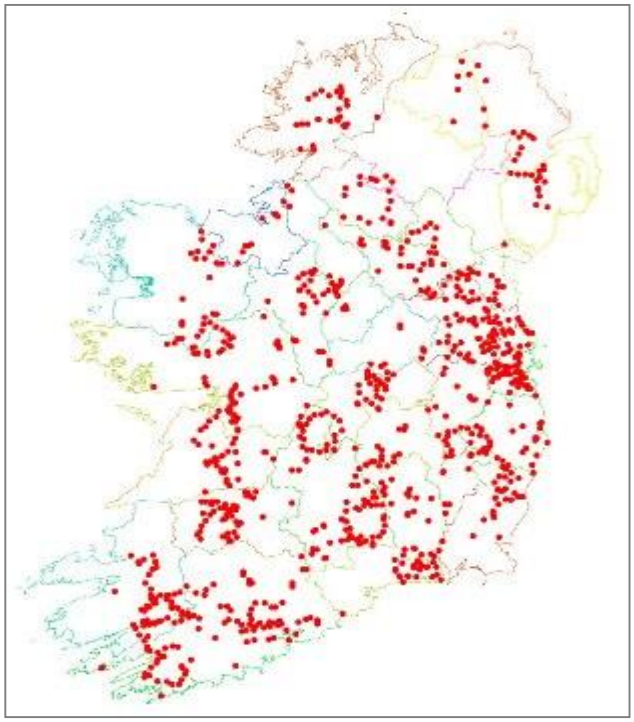
As recently as 1992, the greater mouse-eared bat *Myotis myotis* became the first mammal to become extinct in Britain since the wolf in the 18th century.

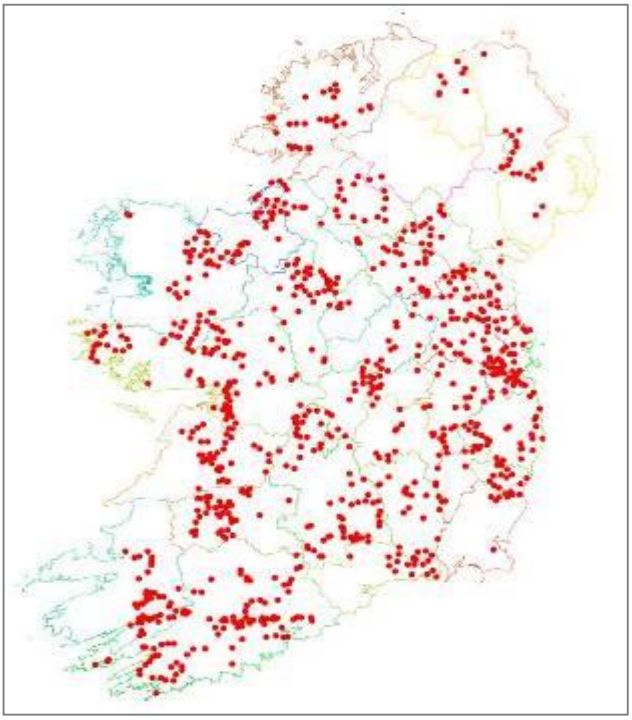
Appendix 2: Distribution and status of Irish bat species

Brief species accounts and current known distribution (maps from *Bat Conservation Ireland*)

Common pipistrelle *Pipistrellus pipistrellus*

This species was only recently separated from its sibling, the soprano or brown pipistrelle *Pipistrellus pygmaeus*, which is detailed below (Barratt *et al.* 1997). The common pipistrelle's echolocation calls peak at 45 kHz. The species forages along linear landscape features such as hedgerows and treelines as well as within woodland.



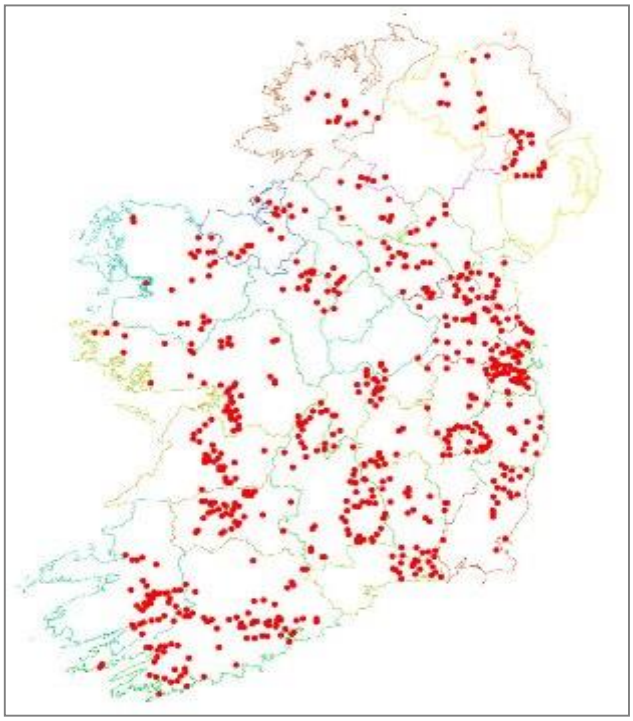


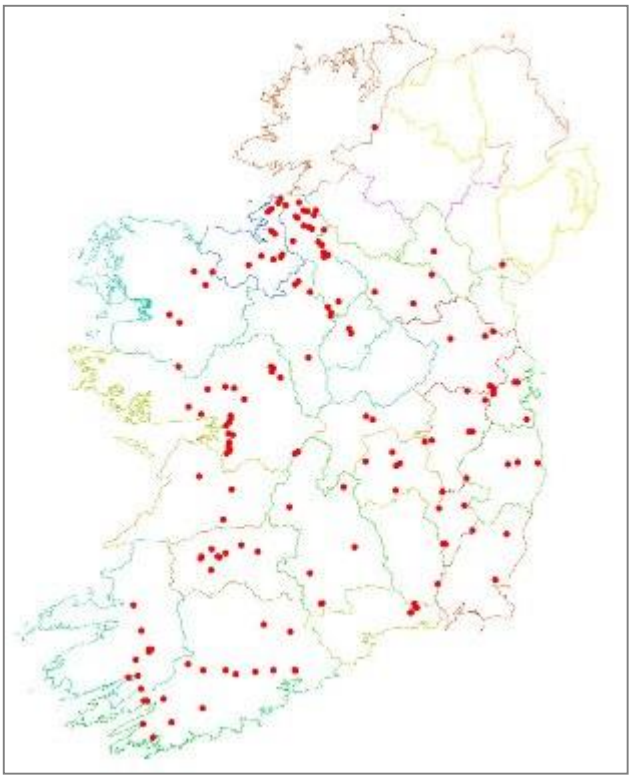
Soprano pipistrelle *Pipistrellus pygmaeus*

The soprano pipistrelle's echolocation calls peak at 55 kHz, which distinguishes it readily from the common pipistrelle. The pipistrelles are the smallest and most often seen of our bats, flying at head height and taking small prey such as midges and small moths. Summer roost sites are usually in buildings but tree holes and heavy ivy are also used. Roost numbers can exceed 1500 animals in mid-summer.

Leisler's bat *Nyctalus leisleri*

This species is Ireland's largest bat, with a wingspan of up to 320mm; it is also the third most common bat, preferring to roost in buildings, although it is sometimes found in trees and bat boxes. It is the earliest bat to emerge in the evening, flying fast and high with occasional steep dives to ground level, feeding on moths, caddis-flies, and beetles. The echolocation calls are sometimes audible to the human ear being around 15 kHz at their lowest. The audible chatter from their roost on hot summer days is sometimes an aid to location. This species is uncommon in Europe and Ireland holds the largest national population. The species is considered as *Near Threatened*.



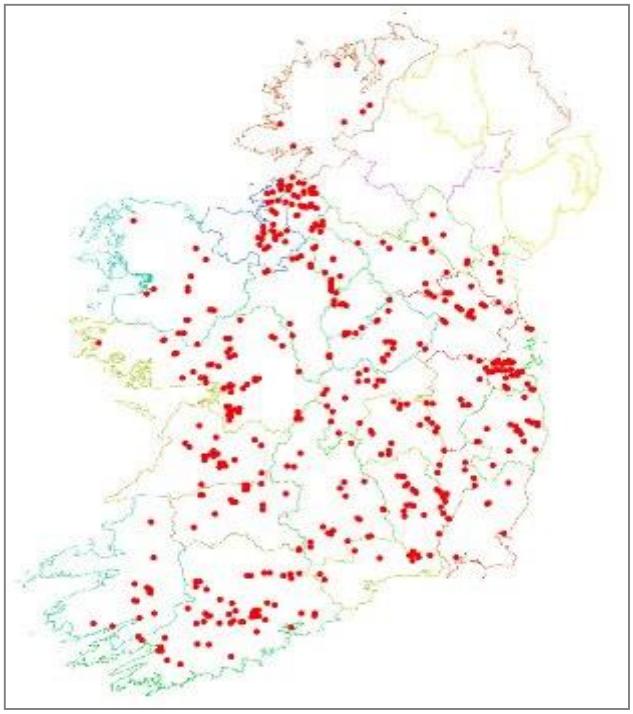


Natterer's bat *Myotis nattereri*

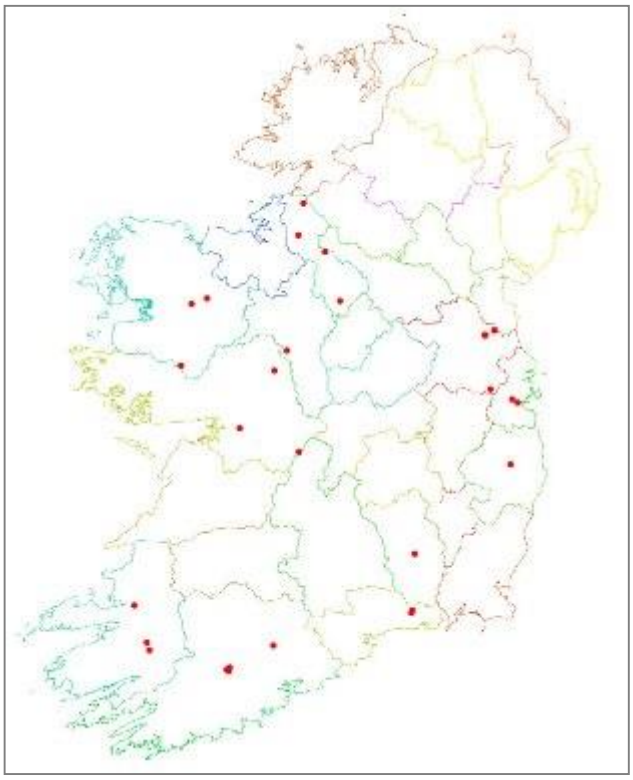
This species has a slow to medium flight, usually over trees but sometimes over water. They follow hedges and treelines to their feeding sites, consuming flies, moths and caddis-flies. Natterer's bats are frequently recorded in hibernation sites in winter but there are few records of summer roosts. Those that are known are usually in old stone buildings but they have been found in trees and bat boxes.

Daubenton's bat *Myotis daubentonii*

This bat species feeds close to the surface of water, either over rivers, canals, ponds, lakes or reservoirs, but can also be found foraging in woodlands. Flying at 15 kilometres per hour, it gaffs insects with its over-sized feet as they emerge from the surface of the water - feeding on caddis flies, moths, mosquitoes, midges etc. It is often found roosting beneath bridges or in tunnels and also makes use of hollows in trees.



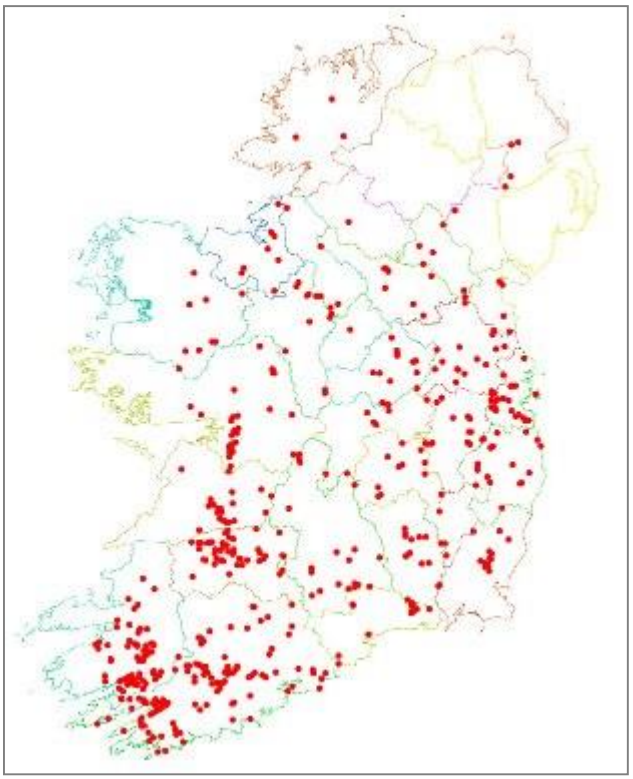
Whiskered bat *Myotis mystacinus*

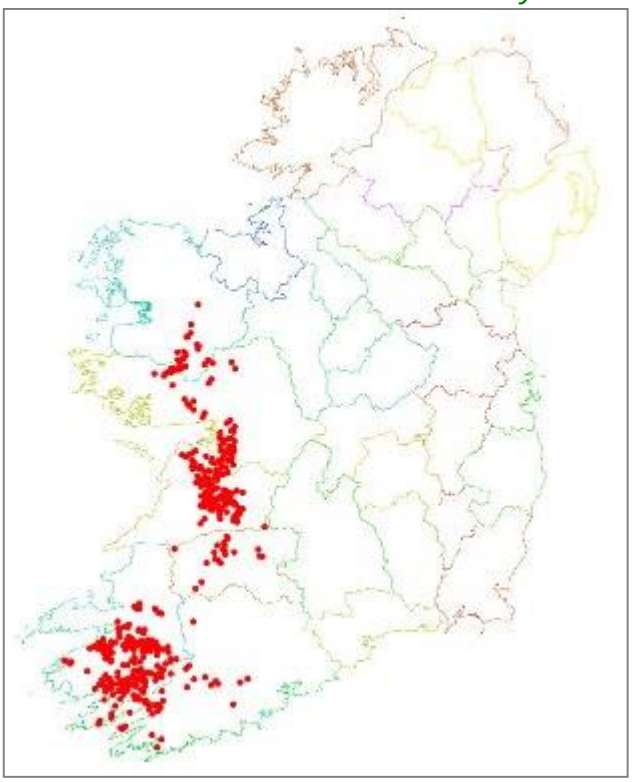


This species, although widely distributed, has been rarely recorded in Ireland. It is often found in woodland, frequently near water. Flying high, near the canopy, it maintains a steady beat and sometimes glides as it hunts. It also gleans spiders from the foliage of trees. Whiskered bats prefer to roost in buildings, under slates, lead flashing or exposed beneath the ridge beam within attics. However, they also use cracks and holes in trees and sometimes bat boxes.

Brown long-eared bat *Plecotus auritus*

This species of bat is a 'gleaner', hunting amongst the foliage of trees and shrubs, and hovering briefly to pick a moth or spider off a leaf, which it then takes to a sheltered perch to consume. They often land on the ground to capture their prey. Using its nose to emit its echolocation, the long-eared bat 'whispers' its calls so that the insects, upon which it preys, cannot hear its approach (and hence, it needs oversize ears to hear the returning echoes). As this is a whispering species, it is extremely difficult to monitor in the field as it is seldom heard on a bat detector. Furthermore, keeping within the foliage, as it does, it is easily overlooked.



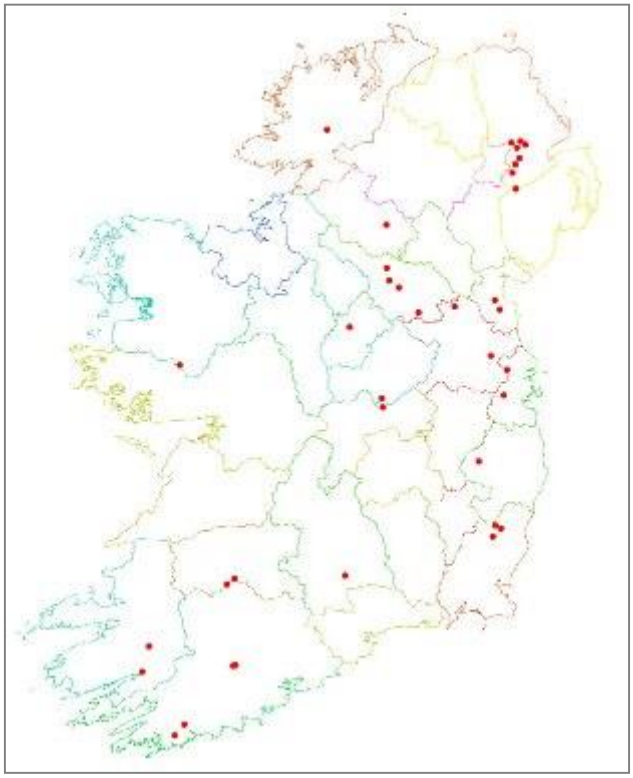


Lesser horseshoe bat *Rhinolophus hipposideros*

This species is the only representative of the Rhinolophidae family in Ireland. It differs from our other species in both habits and looks, having a unique nose leaf with which it projects its echolocation calls. It is also quite small and, at rest, wraps its wings around its body. Lesser horseshoe bats feed close to the ground, gleaning their prey from branches and stones. They often carry their prey to a perch to consume, leaving the remains beneath as an indication of their presence. The echolocation call of this species is of constant frequency and, on a bat detector, sounds like a melodious warble. Its distribution is restricted to the western Atlantic seaboard counties of Mayo, Galway, Clare, Limerick, Kerry and Cork (Kelleher 2004). However, single specimens have recently been discovered in Lough Key, near Boyle, Co. Roscommon in 2004 (B. Keeley pers. comm.) and in Tobercurry, Co. Sligo in 2008 (pers. obs.), two counties where their low numbers may have caused their presence to be overlooked in the past. This species is an Annex II species under the *EC Habitats Directive 1992*.

Nathusius' pipistrelle *Pipistrellus nathusii*

Nathusius' pipistrelle is a recent addition to the Irish fauna and, so far, has only been recorded from the north of the island in Cos. Antrim, Down and Longford but is assumed to be spreading as the known resident population is enhanced in the autumn months by an influx of animals from Scandinavian countries. There is a likelihood, therefore, that this species may occur in the area as a vagrant especially in the autumn months. However, it was not observed during the present survey. The status of the species has not been determined.



Brandt's bat *Myotis brandtii*

This sibling species to the whiskered bat is known from four specimens found to date in Cos. Wicklow (Mullen 2007), Cavan, Clare (B. Keeley pers. comm.) and Tipperary (Kelleher 2006b). A fifth specimen was identified in Killarney National Park, Co. Kerry in August 2005 (Kelleher 2005 & 2006a). Its status is unknown – no map shown.

AN ROINN COMHSHAOIL, OIDHREACHTA AGUS RIALTAIS ÁITIÚIL
DEPARTMENT OF THE ENVIRONMENT, HERITAGE AND LOCAL GOVERNMENT

Circular Letter NPWS 2/07

16 May, 2007

AN ROINN COMHSHAOIL, OIDHREACHTA AGUS RIALTAIS ÁITIÚIL
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Guidance on Compliance with Regulation 23 of the Habitats Regulations 1997 – strict protection of certain species/ applications for derogation licences.

A chara,

I am directed by the Minister for the Environment, Heritage and Local Government to refer to the EU Habitats Directive, to the Habitats Regulations 1997-2005 which transpose that directive into Irish law,[1] and to Ireland's obligations under that Directive.

The Directive, and the implementing Regulations, require that certain species listed in Annex IV of the Habitats Directive are strictly protected. A list of these species is appended.

These species are not necessarily associated with areas subject to a specific nature designation: in the case of bat species and otters they may be found anywhere throughout the country.

Under Regulation 23 of the Habitats Regulations 1997, any person who, in regard to the animal species listed in Annex IV of the Habitats Directive-

"(a) deliberately captures or kills any specimen of these species in the wild,
(b) deliberately disturbs these species particularly during the period of breeding, rearing, hibernation and migration,
(c) deliberately takes or destroys the eggs from the wild, or
(d) damages or destroys a breeding site or resting place of such an animal,

shall be guilty of an offence."

[1] Council Directive 92/43/EEC of 21 May 1992, on the conservation of natural habitats and of wild flora and fauna, the European Communities (Natural Habitats) Regulations, 1997 (S.I. No. 94 of 1997), the European Communities (Natural Habitats) (Amendment) Regulations, 1998, (S.I. No. 233 of 1998), and the European Communities (Natural Habitats) (Amendment) Regulations, 2005, (S.I. No. 378 of 2005),

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Regulation 21 provides corresponding protection for Annex IV plant species.

The carrying out of any work that has the potential to disturb these species, and for which a derogation licence has not been granted, may constitute an offence under Regulation 21 or 23 of the Habitats Regulations.

It should be noted that in the case of Regulation 23 (d), it is not necessary that the action should be deliberate for an offence to occur. This places an onus of due diligence on anyone proposing to carry out an action or project that might result in such damage or destruction.

A particular concern arises regarding works carried out by or on behalf of local authorities themselves, including works of maintenance or repair.

Examples of cases that are likely to require assessment are the removal of trees and other habitat during the construction of roads or other infrastructure, the modification of the courses of rivers, drainage and discharge of water, and even the re-pointing or replacement of masonry in bridges, walls and other structures where bats are likely to roost, etc.

Procedure to be followed
Local authorities must ensure that they, their staff and their agents comply fully with the requirements of the Directive and the Regulations as follows:

1. In advance of any works, an appropriate initial assessment should be carried out by a person competent to identify where a risk of damage or disturbance to an Annex IV species may exist (e.g. by an appropriately qualified ecologist). The fact that such an assessment has been carried out should be recorded and kept with the papers associated with the project.

2. Projects where a risk is identified should be subject to an appropriate scientific assessment. It will be necessary to identify alternatives or modifications that will avoid that risk.

3. Where it is not possible to identify a means of avoiding the risk completely, the question of seeking a derogation licence from the Minister under Regulation 23 of the Habitats Regulations should be considered if it is desired, notwithstanding, to proceed with the action or project.

4. The Minister is empowered, within strict parameters, to grant a license for derogation from complying with the requirements of the provisions of section 21 of the Wildlife Act 1976 and Regulations 23 and 24 of the Habitats Regulations. The scope of the Minister's powers to grant derogation licences is set out in Regulation 23, as follows:

Where there is no satisfactory alternative and the derogation is not detrimental to the maintenance of the populations of the species to which the Habitats Directive relates at a favourable conservation status in their natural range, the Minister may, in respect of those species, grant a licence to one or more persons permitting a

derogation from complying with the requirements of the provisions of section 21 of the Principal Act and Regulations 23 and 24 where it is—

(a) in the interests of protecting wild fauna and flora and conserving natural habitats, or

(b) to prevent serious damage, in particular to crops, livestock, forests, fisheries and water and other types of property, or

(c) in the interests of public health and public safety, or for other imperative reasons of overriding public interest, including those of a social or economic nature and beneficial consequences of primary importance for the environment, or

(d) for the purpose of research and education, of repopulating and re-introducing these species and for the breeding operations necessary for these purposes, including the artificial propagation of plants,

(e) to allow, under strictly supervised conditions, on a selective basis and to a limited extent, the taking or keeping of certain specimens of the species to the extent (if any) specified therein, which are set out in the First Schedule.

6. Any application for a derogation licence (to be submitted to Mr Jamie Mulleady of this Department at: Species and Regulations Unit, National Parks and Wildlife Service, 7 Ely Place, Dublin 2 email: Jamie.mulleady@environ.ie) should address the criteria referred to in the above paragraph as well as proposed scientifically-based mitigation measures to address any potential impact on the identified Annex IV species. A decision on an application will be made on the basis of the information and proposals submitted and best scientific knowledge.

7. An application for such a derogation licence should be made in advance of seeking approval under Part 8 or 10 of the Planning and Development Regulations, 2001, as amended, or seeking planning permission for works. This will ensure that full consideration can be given to the impacts of the proposed project on the species and to avoid the possibility of delay to the proposed project or of a refusal of a derogation licence which would prevent the works being carried out as planned.

8. The obligation to obtain a derogation licence is additional to the requirement to notify the Minister of a proposed development which may have an impact on nature conservation to the Minister under article 82(3)(n) and others of the Planning and Development Regulations, 2001 (as amended). Local authorities should notify the Minister (Development Applications Unit) in any case where it appears that a proposed development may pose a risk to Annex IV species.

9. Should a problem be identified regarding Annex IV species in the course of works, this should be reported immediately to the National Parks and Wildlife Service. No further work that might impact on such species should take place unless a derogation licence has been obtained.

Applications for planning permission
Issues concerning damage or disturbance to Annex IV species also arise in the context of applications for planning permission for proposed development, e.g. proposals to renovate older houses. The responsibility of avoiding disturbance or damage to Annex IV species, or of obtaining an appropriate derogation licence, rests with the developer.

However, planning authorities should note that in any case where it appears that a proposal may pose a risk to Annex IV species, the planning application should be referred to the Minister under article 27(1)(n) of the Planning and Development Regulations 2001 (as amended). This referral should be done in the appropriate manner for applications having impacts on nature conservation sites. Planning authorities could also take the opportunity afforded by any pre-application discussions to alert prospective applicants to the requirements in relation to Annex IV species.

Further information
Species Action Plans, which set out specific measures for the monitoring and protection of these species, have been or are being prepared. They are published on www.npsw.ie or can be obtained from Species Unit (Tel: 01 888 3212). Guidelines in regard to bats are available at www.npsw.ie.

General questions in relation to the protection of Annex IV species or require any further information on an application for a derogation licence should be referred to Species Unit (01 8883214). Specific queries regarding a proposed project, location or species should be referred to the appropriate National Parks and Wildlife Service Divisional Ecologist or to the Regional Manager (contact details http://www.npws.ie/media/Media,4976,en.pdf).

If you have any questions in relation to the referral of a planning application, please contact Development Applications Unit (Tel: 01 8883181)

Is mise le meas,

Peter Carvill,
Assistant Principal Officer.

To: all County and City Managers, Directors of Services for Planning, Town Clerks