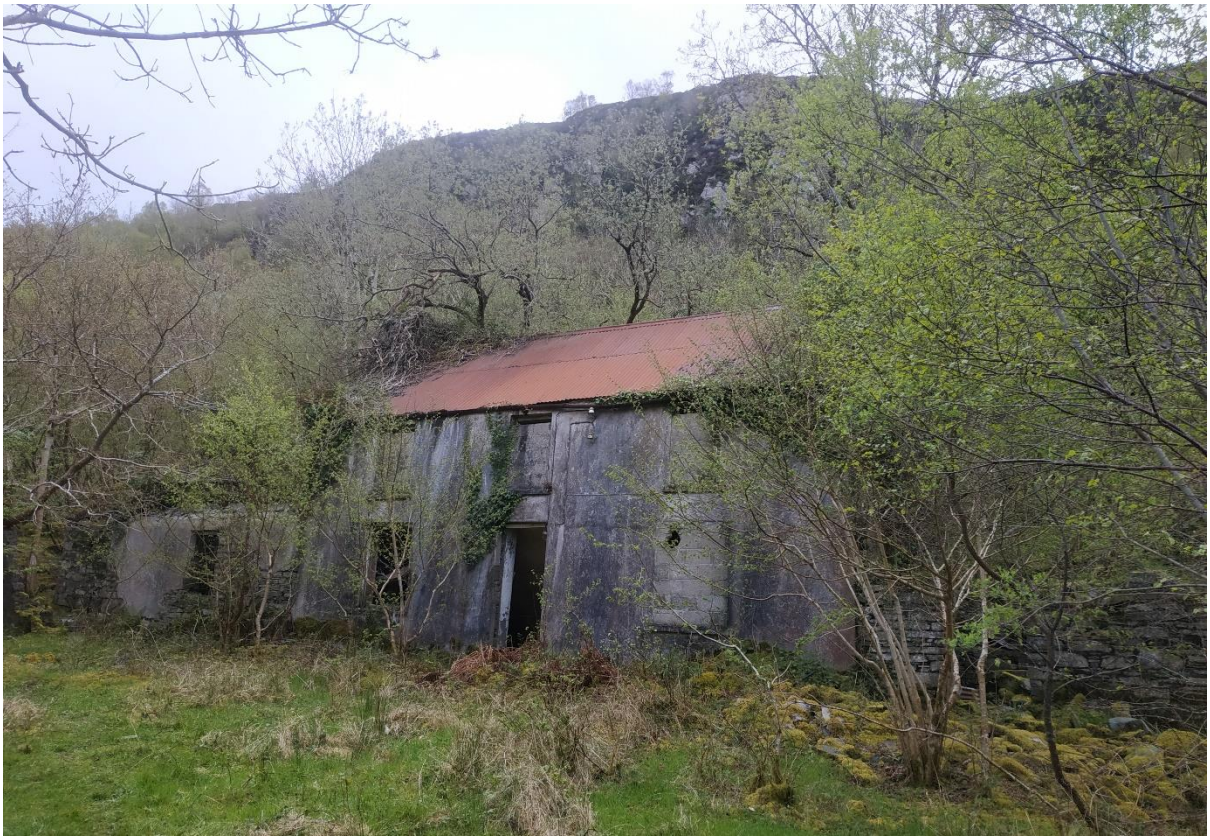
Supporting Information for an Application for Derogation Under Regulation 54 & 54A of the European Communities (Birds and Natural Habitats) Regulations 2011 to Carry Out Renovation Works on a Lesser Horseshoe Bat Maternity Roost, Dromcarban, Headford, Co. Kerry



NPWS

An tSeirbhís Páirceanna Náisiúnta agus Fiadhúlra
National Parks and Wildlife Service

Contents

Introduction

A derogation is being sought to allow NPWS Kerry Region to carry out renovation works on a derelict farm house utilised as a maternity roost by lesser horseshoe bats (*Rhinolophus hipposideros*), located in Dromcarban, Headford, Co. Kerry, in order to improve roosting conditions for this species.

The scientific officer overseeing the proposed work is Dr Daniel Buckley. Dr Buckley is the District Conservation Officer for the Kerry South District in the NPWS Kerry Region. He has over 20 years' experience in relation to bat surveying and research. In 2011 he was awarded a PhD from University College Dublin for his thesis on the roosting and foraging ecology and conservation genetics of the whiskered *Myotis mystacinus* bat in Ireland. Daniel has previously worked as an ecological consultant specialising in bat surveys and assessment and has supervised building works where bats are present under derogation licenses.

Background to proposed activity

The derelict farm house is located in the townland of Dromcarban (Figure 1) near Headford, Co. Kerry. The house and 16 acres of surrounding woodland was purchased by the National Parks and Wildlife Service as conservation measure. The property lies within in Killarney National Park, Macgillycuddy's Reeks and Caragh River Catchment SAC which has the below conservation objective for lesser horseshoe bats:

- There should be no decline in summer roosts.

This roost lies at the eastern edge of the range of this species in Co. Kerry and is important in terms of maintaining range integrity and the potential for lesser horseshoe bats to expand further east into suitable habitat. The proposed renovation works will improve the conditions of the building for roosting lesser horseshoe bats, both as a summer and winter roost and help achieve the above objective.

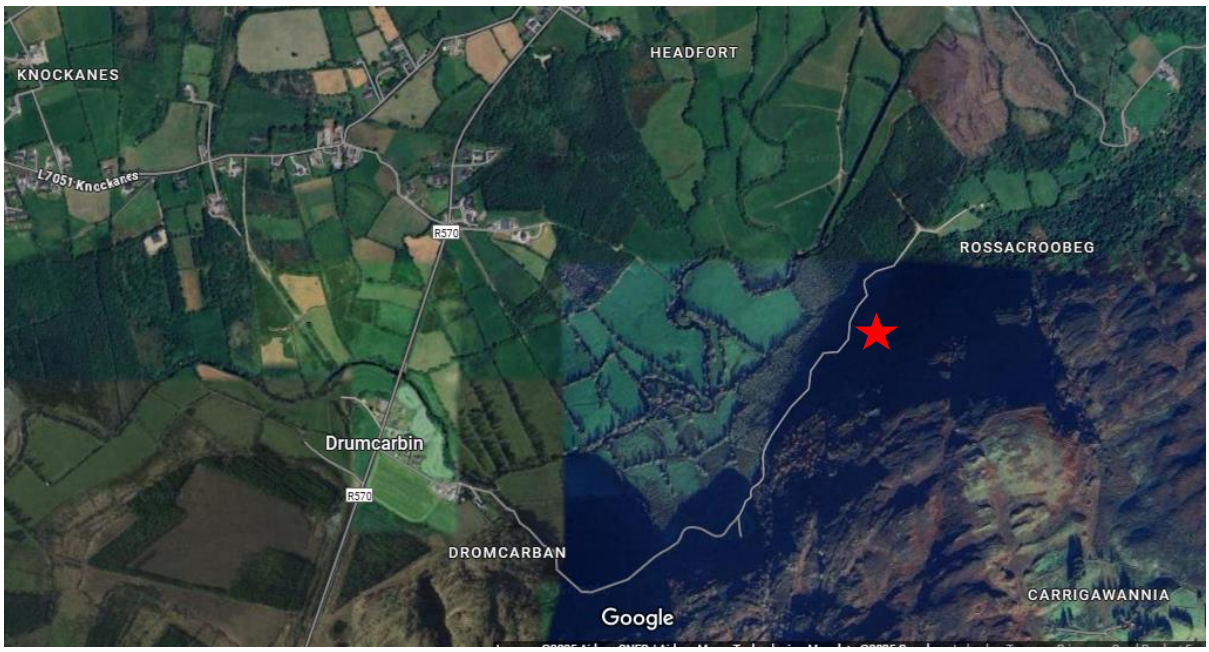


Figure 1: Location of derelict farm house used as a maternity roost by lesser horseshoe bats at Dromcarban, Headford, Co. Kerry.

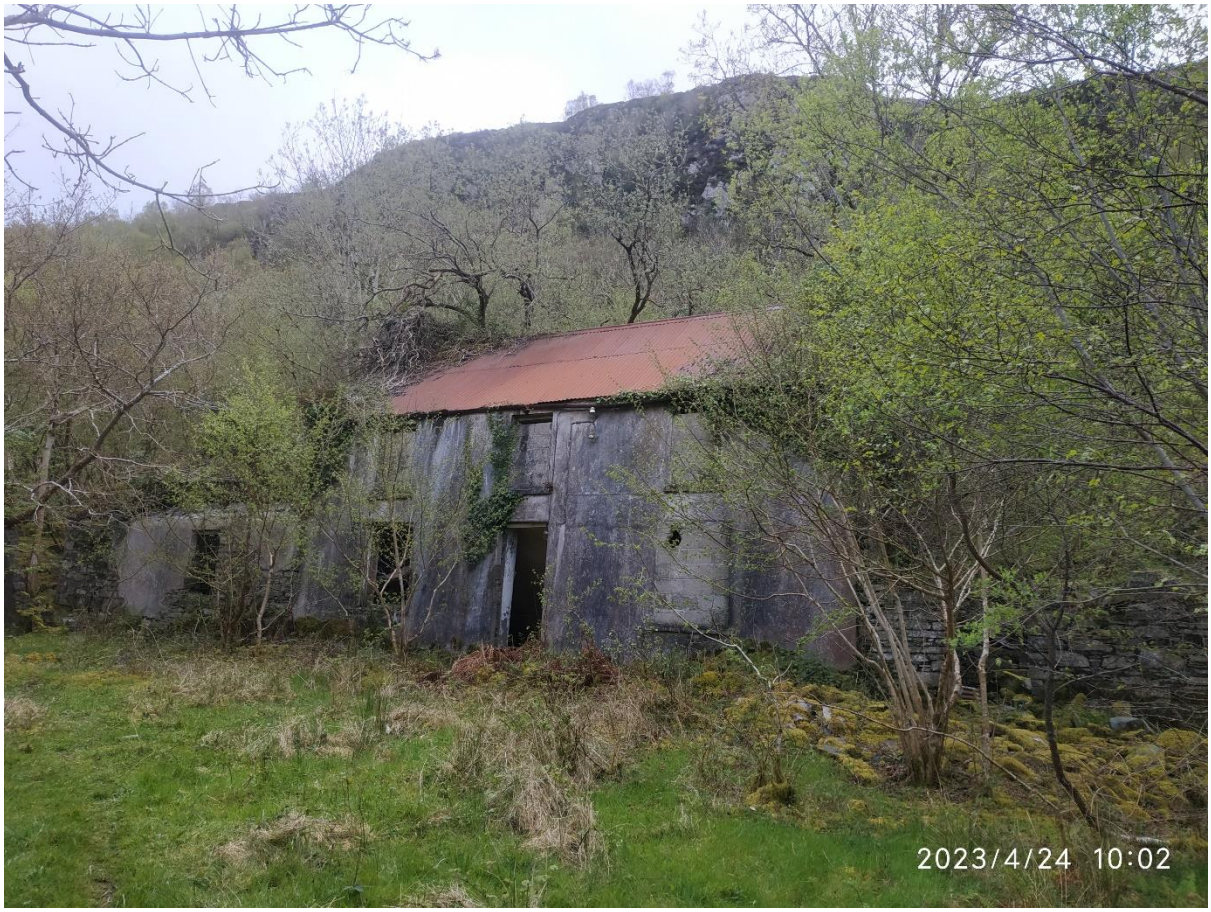


Photo 1: Derelict farm house used as a maternity roost by lesser horseshoe bats at Dromcarban, Headford, Co. Kerry proposed for renovation works in order to improve conditions for roosting bats.

Full details of proposed activity to be covered by the derogation

Based on an assessment of the building by an engineer It is proposed to carry out the following works as part of the building renovation to improve roosting conditions for bats:

- All roofing timbers, remaining sections of flooring timbers etc. will require complete removal.
- Outhouse buildings – also derelict will also require removal of all timbers, roof structures etc.
- All vegetation must be removed from structures.
- Tops of walls should be cleaned down and stabilised by securing any loose or defective stonework and providing (lime mortar) capping detail where roofs are not being reinstated.
- Lintels over windows and doors are of timber construction. For stability purposes, defective lintels should be removed and replaced in precast concrete.
- The building will require a complete new roof structure incorporating bituminous sarking membrane (felt) and natural slate.
- The chimneys will need to be removed below the roof line and roofed over.
- Metal gutters will need to be installed.
- A completely new first floor will need to be installed in the farm house with an access hole to be left open to allow bats access the first floor and roof space.

- A new secure door will be installed with a letter box opening to allow bats to access the building. A baffle should be installed just inside the door to reduce light entering the ground floor. A second open doorway located on the eastern side of the ground floor should be bricked up but allowing a gap of sufficient width at the top to allow bats to have a second access point into the building. A baffle should be installed just inside the doorway to reduce light entering the ground floor.
- Windows should be bricked up with concrete blocks to prevent light entering the building.
- One or two hot boxes should be installed in the roof space to provide warm micro-climates for roosting bats or alternatively a partial attic space.
- A ground floor room will be converted into a cool room for bats to use during the winter and very hot summer days by installing insulation and a door with a letter box opening.

It is proposed to carry out renovation works outside the maternity period when bats will not be using the building or are present in very low numbers (October-March inclusive).

Ecological Survey and site assessment

Since 2020, the bat roost in the derelict farm house at Dromcarban is monitored annually by NPWS staff during the maternity period as part of the national lesser horseshoe bat summer roost monitoring scheme. An emergence count is conducted with two people, one located at the front of the building and one located at the rear of the building to cover all possible exits. Surveyors use handheld Anabat Scout bat detectors to detect echolocation calls of emerging bats. Bat surveys are carried out with reference to the following publications:

Collins, J. (2023) Bat Surveys for Professional Ecologists: Good Practice Guidelines 4th edition. Bat Conservation Trust

Roche, N., Aughney T. and Langton S. (2015) Lesser horseshoe bat: population trends and status of its roosting resource. Irish Wildlife Manuals, No. 85. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht, Ireland.

The highest count for this roost was 39 bats. In 2024 numbers dropped to 15 bats but in 2025 the number increased to 33. Bats mainly emerge from the front and side doorway located on the ground floor (see Photo 2). Some bats have also emerged from the central upstairs window. Bats roost in the roof space (Photo 3). They can sometimes be seen in the open roof where the ceiling boards are no longer present but mainly roost in a section of attic space above the ceiling of the eastern bedroom.

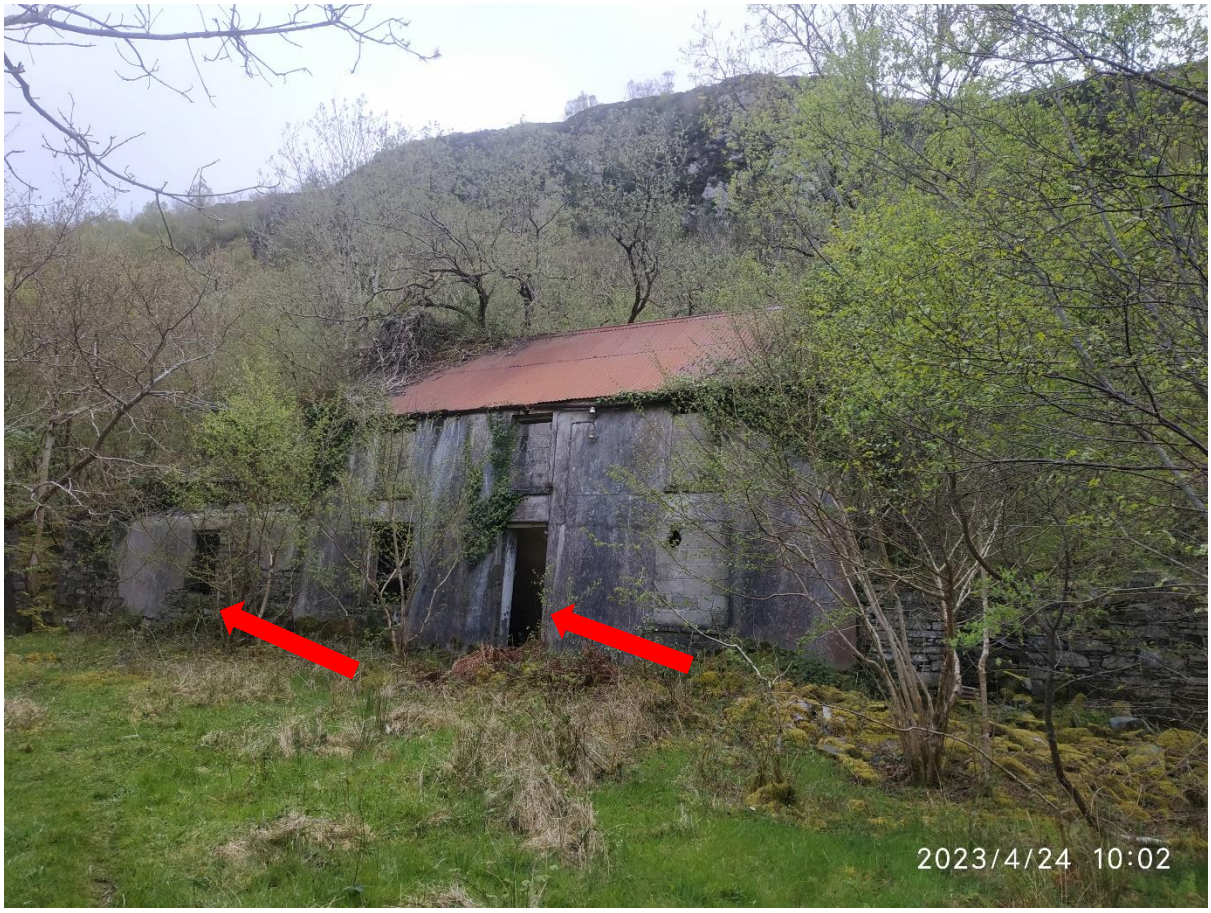


Photo 2 Location of main emergence points for lesser horseshoe bats from the derelict farm house, Dromcarban, Headford, Co. Kerry.

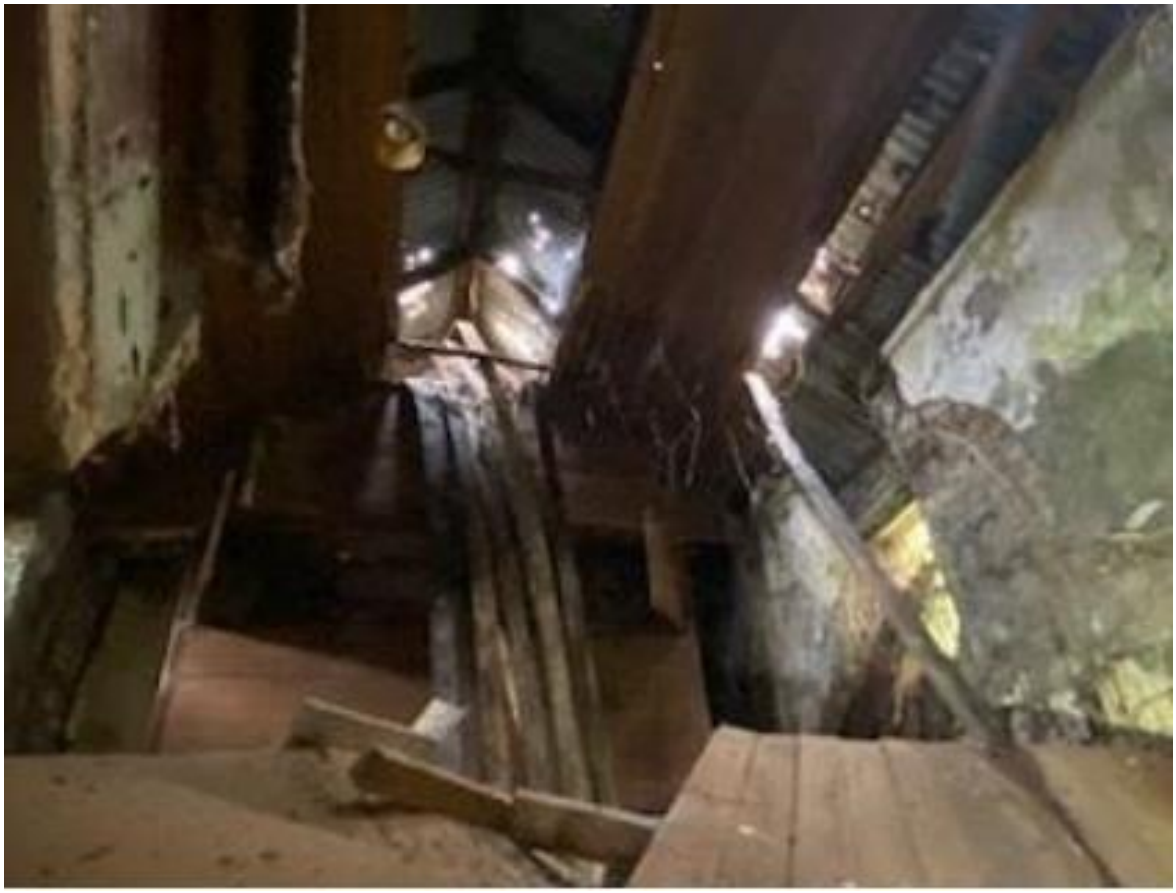


Photo 3: Roof space in derelict farm house, Dromcarban, Headford, Co. Kerry.

Evidence to support the Derogation Tests

Test 1 - Reason for Derogation:

The reason for the derogation falls into reason 2D "for the purpose of research and education, of re-populating and re-introducing these species and for the breeding operations necessary for these purposes, including artificial propagation of plants." This is because the proposed renovation works are necessary in order to improve roosting conditions that will hopefully lead to recovery and increase in the number of lesser horseshoe bats using the building as a result of increased survival of pups and immigration of bats from nearby roosts that are deteriorating. However, the works may cause temporary disturbance to any bats that are roosting in the house due to the extensive nature of the renovation (removal and replacement of the roof for example).

Test 2 - Absence of Alternative Solutions

Alternative Scenario-Do nothing

If the proposed works are not carried out, then the building will continue to fall into disrepair and will no longer be suitable as a maternity roost for bats. The first floor in the main part of the building has collapsed and there are now extensive holes in the corrugate roof which will lead to the rotting of supporting timbers leading to the eventual collapse of the roof.

Test 3 - Impact of a derogation on Conservation Status

If the renovation works were carried out during the maternity period, it would likely cause disturbance to roosting bats and the abandonment of the roost resulting in the loss of a breeding year if the bats do not locate an alternative roost. However, once the renovation works were completed bats would likely re-occupy the roost and the improved roosting conditions would likely lead to increased bat numbers in the roost in the long-term.

The proposed mitigation to avoid disturbance to roosting bats is to carry out the renovation works outside the maternity season (October-March inclusive) this will avoid any disturbance to the maternity roost. It is possible that small numbers of bats utilise the building during the winter months but any disturbance as a result of the renovation works will be temporary. Key parts of the renovation work where there is a possibility of disturbance to bats, such as the removal of the roof, will be supervised on site by the scientific officer.

Monitoring the impacts of the derogation

Once the renovation works are completed, the building will continue to be monitored as part of the national lesser horseshoe bat summer roost monitoring scheme. The positive impact on the roost will be indicated by a stabilisation of bat numbers in the short term and a long term trend of increasing numbers of bats using the roost.

Temperature and humidity data loggers will be placed in the 1st floor and the cold room located on the ground floor to determine if, following renovation works, the internal conditions at both locations are appropriate for a maternity and winter roost respectively.