## Appendix D – Bat Survey Report / Method Statement

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# Template Method Statement to be used within a Bat Development Licence Application

This template Method Statement is to be used to form part of your Licence Application for a European Protected Species Development Licence. It will be used to determine the impact of the application on the favourable conservation status of the species concerned (Regulation 55(9) (b) of the Conservation of Habitats and Species Regulations 2017). It must be prepared by a consultant ecologist of other suitably qualified person. You are strongly advised to refer to the Bat Mitigation Guidelines[1], and The Bat Survey Guidelines (3rd Edition). Please submit your Application and supporting Method Statement electronically to the contact details provided below.

**Please note as of the 1st March 2018 the declaration box found at the end of this template must be included on any Method Statements submitted in support of a licence application, and must be signed and dated by the applicant and ecologist. Any application containing a Method Statement without this declaration will be rejected.**

## Contact Details

**Natural Resources Wales**
**Species Permitting Team**
**Maes Y Ffynnon**
**Penrhosgarnedd**
**Bangor**
**LL57 2DW**

03000 654974 / 03000 654921
speciesslicence@naturalresourceswales.gov.uk
trwyddedrhywogaeth@cyfoethnaturiolcymru.gov.uk

| | |
|---|---|
| **Method Statement Title:** | Demolition of Clubhouse at James Jones, Wrexham |
| **Method Statement Version Number:** | 1.0 |
| **Method Statement Issue Date:** | 02/08/2024 |
| **Site Address:** | James Jones & Sons Ltd, Oak Road, Wrexham Industrial Estate, Wrexham |

[1] Bat Mitigation Guidelines (IN136) available to download from the Natural England website

## Background and Supporting Information

**A Executive Summary.** No more than one side of A4

It is proposed that the existing Clubhouse building at James Jones & Sons Ltd's site off Oak Road, Wrexham Industrial Estate, be demolished. The building is no longer in use, is in a poor state of repair and is a financial and health/safety liability.

The building was assessed for its bat roost potential in 2022 (Marches Ecology) and subject to bat detector surveys in 2024 (Etive Ecology). The building has numerous external features suitable to support bats and evidence of bat activity in the form of dropping shave been found inside the building.

During the 2024 bat detector surveys, common pipistrelle bats were seen to emerge from at least three different locations on the building. A peak count of four common pipistrelles were recorded during the three surveys. The building is concluded to support a summer/day roost for a small number (<5) of individual common pipistrelle bats.

It is proposed that the demolition be undertaken outside of the summer period when bats are most likely to be present. The works will be preceded by a dusk/dawn bat survey and the roost locations will be soft-stripped under direct bat-licensed supervision.

6 x bat boxes will be installed on nearby trees that fall within the ownership of the applicant. These boxes will be retained and maintained in perpetuity.

The boxes will be subject to an inspection approximately 1-year post-demolition.

**B Introduction**

**B.1 Background to activity/development**

The proposed activity is to demolish the existing Clubhouse building at the James Jones & Sons Ltd site off Oak Road, Wrexham Industrial Estate.

The building has not been used as a clubhouse for many years and has fallen into a state of disrepair. The building is taking up valuable space on site and is a health and safety liability, therefore it needs to be demolished.

**B.2 Full details of proposed works on site that are to be covered by the licence**

The license is to cover the demolition of the Clubhouse building. This to be consented by Wrexham CBC through the planning process.

The demolition will take place as soon as possible, following grant of conset from Wrexham CBC and grant of this Bat License.

**B.3 Actions requiring licensing**,

The Clubhouse has been found to support a small common pipistrelle summer roost. A number of roost locations have been identified, beneath damaged tiles and loose timbers. The demolition of the building therefore represents the permanent destruction of a bat roost.

The license will need to cover the disturbance of bats (during mitigation measures) and the permanent loss of the bat roost.

## C Survey and site assessment

### C.1 Existing information on the bat species at the survey site.

There are no statutory designated sites within 1km of The Clubhouse, and no designated sites for bats within 2km. Part of the non-statutory Wrexham Industrial Estate Wildlife Site lies approximately 285m to the west.

A Preliminary Roost Appraisal (PRA) was undertaken in September 2022 (Marches Ecology, January 2023). The PRA identified numerous potential roosting features (PRFs) on the external of the building. No access into the internal loft spaces was undertaken due to health and safety concerns. One possible bat dropping was seen at long-range from an access ventilation hatch. The building was concluded to be of High Bat Roost Potential (BRP) with up to three bat detector surveys recommended to be undertaken.

### C.2 Statutory sites notified for the species (SSSIs or SACs) within 10km

There are no statutory sites notified for bats within 10km of the site.

### C.3 Objectives of the survey.

The objective of the survey effort was to determine the presence/absence of roosting bats from the existing Clubhouse building, to inform the proposed demolition. The survey scope was based on the PRA findings.

### C.4 Scaled plan/map of survey area

See Figures C4.1 (Location Map) and C4.2 (Survey Area) attached.

### C.5 Site/habitat description (relevant to bats)

The Clubhouse is located on the eastern edge of Wrexham Industrial Estate, with industrial buildings to the west and north and rural areas to the east and south. The wider landscape comprises pasture fields and hedgerows and a block of woodland less than 300 m to the southwest, adjacent to the River Clywedog to the south (which in turn adjoins the River Dee approximately 2 km to the east). There are at least 9 ponds within 500 m of The Clubhouse, the closest situated approximately 50 m away to the south.

The area immediately surrounding the building was hardstanding in the form or roads and car parking, with some areas of amenity grassland and scattered trees, with a tree line running 40 m south of the site.

The Clubhouse is a single-storey building comprising a flat roof, with three large dormers on the north-east, south-east and north-western elevations; there is also an adjoining single pitched roof toilet block on the north-western corner.

Site Photographs are provided at Figure C.5

### C.6 Field survey(s).

Preliminary Roost Appraisal

The building was assessed for any signs of bats; these include droppings, feeding remains, and other indicative marks, plus features of potential use to bats such as crevices, cracks and other holes, and any potential access points into the building. High powered torches were used to inspect any identified features, and an endoscope was used to investigate any gaps or crevices, where appropriate. Both the exterior and interior of the building were surveyed.

The building inspection was originally carried out on the 16th September 2022 by Keymar Wake (bat licence No. S091201/1) and Ashley Payne (accredited agent on NRW bat licence number

S091201/1). Where deemed necessary Potential Roost Feature (PRF) assessments were carried out following best practice guidelines (Collins, 2016).

The PRA was repeated by Russell Grey (S093146/1) on 7th May 2024. The survey followed the updated base practice guidelines (BCT, 2023).

The loft spaces were not considered safe to enter so were only inspected from the external vent hatch entrances and via holes in the ceiling.

Bats are highly mobile animals and it is possible that they may move into a building after the PRA survey has occurred.

Bat Detector Surveys

Three dusk bat detector survey were undertaken on the building in 2024, as per the 2023 survey guidelines.

The surveys were all led by NRW Licensed ecologist Russell Grey and supported by three additional surveyors, all with previous bat survey experience. Surveyors all used EMTouch detectors, with recordings analysed using Kaleidoscope software. Night Vision Aids (NVAs) were used in the form of a Sony 4K Handycam utilising the Nightshot function and coupled with a Sony IR Lamp.

Survey dates and weather conditions were as follows:

- 7th May; 15°C, 4mph easterly, dry and 100% cloud cover.
- 28th May; 15°C, 9mph south-westerly, dry and 90% cloud cover.
- 17th June; 13°C, 7mph north-westerly, dry and 10% cloud cover.

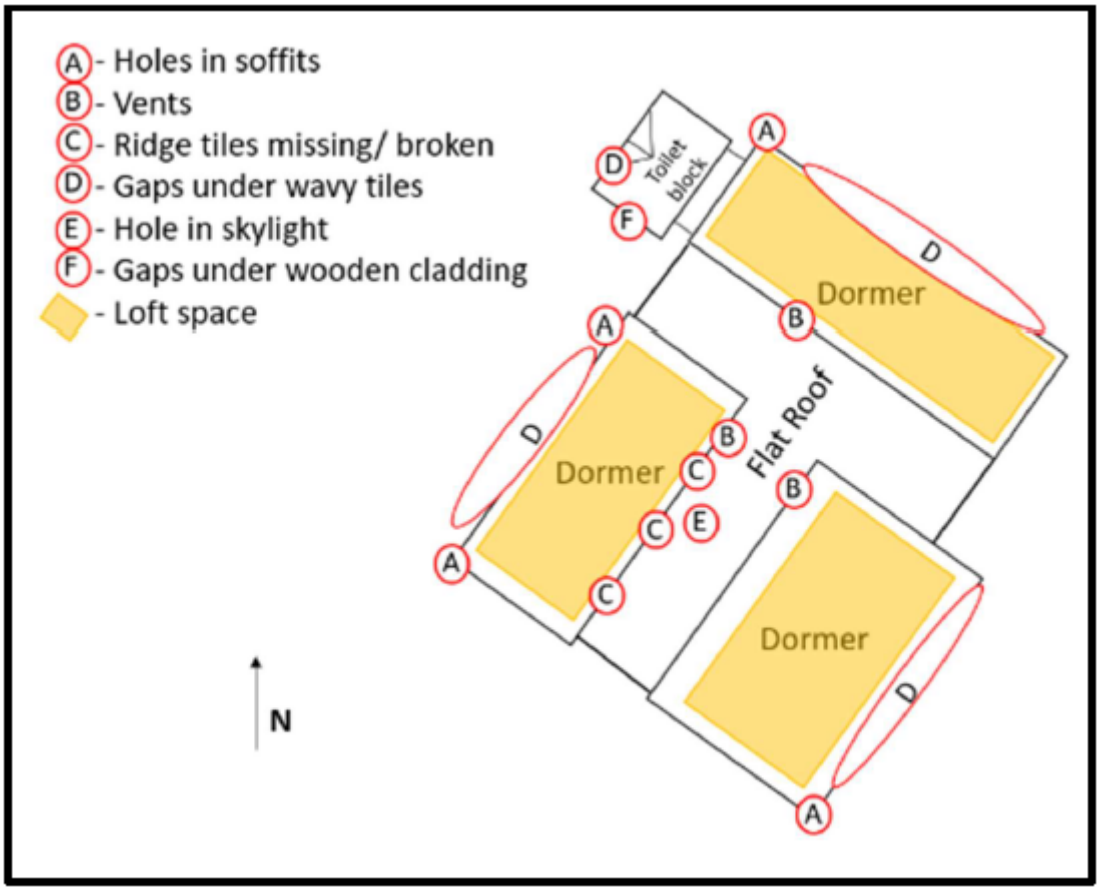
Surveyor locations are shown on Figure C.7.

## C.7 Survey Results.

Summarise findings in table form (if appropriate); provide clear, annotated and cross-referenced maps/plans/photographs to show roost locations, flight lines, access points, dimensions of existing roosts etc.). Raw data must be appended, including samples of sonograms, results of DNA analysis of droppings.

PRA Results

The 2022 PRA findings are presented in the attached report and are summarised below.




The 2024 inspection found the same external features present, many of which had degraded further, but still offered PRFs. A number of scattered bat droppings were identified within the building, scattered across the ground floor area in no pattern or cluster, indicating foraging or exploratory flight rather than any specific roosting locations. Droppings were of a size consistent with pipistrelle bats and were fresh enough to suggest they were left within 12 months of the PRA date (May 2024).

Bat Detector Survey Results

Survey 1 (sunset @ 20.50); **one common pipistrelle bat appeared to emerge** from along the valley running between the southeast and southwest dormers of the building at 21.20. The precise location of emergence was not visible to any of the surveyors.

Survey 2 (sunset @ 21.25); **three common pipistrelle bats emerged** from the northern elevation of the southeast dormer at 21.46. **One common pipistrelle emerged** from the southern elevation of the northern dormer at 21.56.

Survey 3 (sunset @ 21.43); **one common pipistrelle emerged** from the toilet block at the northwest corner of the building at 22.10. **Two common pipistrelles emerged** from the northern elevation of the southeast dormer at 22.21.

## C.8 Interpretation/evaluation of survey results

A peak count of four bats emerged from the Clubhouse building (Survey 2), but overall bats were seen to emerge from at least three different locations. It is therefore anticipated that the Clubhouse building supports not more than 5 x common pipistrelle bats using the building as a summer / day roost.

The structural condition of the building means that it Is not suitable as a hibernation site, given that there is exposure to the prevailing elements and that internally the conditions are very wet.

There was no evidence to indicate any maternity activity associated with the building.

The conservation value of the roost is therefore considered to be Low.

**D Impact assessment** – potential impacts in absence of mitigation/compensation. See Bat Mitigation Guidelines (section 6.2) and Wray et al (2010) [2]

**D.1 Short-term impacts: disturbance**

There are no short-term impacts anticipated from the proposed activity.

**D.2 Long-term impacts: roost modification**

There are no roost modification impacts anticipated from the proposed activity.

**D.3 Long-term impacts: roost loss.**

The summer/day roost for a small number of common pipistrelle bats will be permanently lost as a result of the proposed activity. The Clubhouse building will be demolished and will not be replaced.

Without mitigation the scale of this impact is significant adverse at the Local Scale. There are no significant impacts at any greater scale than Local, owing to the low conservation value of the roost and the species present.

**D.4 Long-term impacts: fragmentation and isolation.**

The loss of the building as a roost may cause fragmentation or isolation impacts to the local population of common pipistrelles. This is because without mitigation there will be no replacement roost provided, which could mean the loss of a useful roost site which supports the species during the summer months. Without this roost, or any replacement roost, the ability of the local population to forage or take shelter may be adversely affected.

Without mitigation the scale of this impact is not significant adverse at the Local Scale.

**D.5 Post-development interference impacts.**

There will be no interference impacts as a result of the proposed activity. No changes to lighting or overall site activity will result from the demolition of the building.

**D.6 Predicted scale of impact**

The scale of predicted impacts is Local. The loss of the roost is not significant at any scale higher than this, as a result of the low conservation value, the species of bat present and the number of bats present.

The building will be demolished, and the footprint of the building will be left as bare ground for the foreseeable future.

Figure D illustrates these impacts.

[2] Wray, S., Welss, D., Long, E. & Mitchell-Jones, T. (2010) Valuing bats in ecological impact assessment. In Practice, No 70, Institute of Ecology and Environmental Management

## Delivery Information – Mitigation, compensation and monitoring

Description of how the impacts will be addressed in order to ensure no detriment to the maintenance of the population at a favourable conservation status.

### E Works to be undertaken

Please identify which works will be undertaken or supervised by a licensed ecologist

#### E.1 Capture and exclusion

Capture and exclusion will be used to ensure that no bats are harmed during the demolition process.

Works will be timed to avoid the summer period (May – August inclusive) when bats are most likely to be present. Ideally the works will take place during the transitional period (September/October or March/April). As a worst-case (from a practical consideration due to weather conditions), demolition may take place during the winter, which is considered to be low risk with regards to bats as the building is not suitable to support hibernating bats.

Immediately prior to the start of works, a dusk and/or bat detector survey will be undertaken to determine the number of bats present and to identify the locations of roosting bats.

A soft-strip will then be undertaken under the direct supervision of a bat licensed ecologist. The site operatives will be briefed prior to the start by the bat licensed ecologist. Works will be undertaken by hand. Any bats found will be captured by gloved hand and carefully stowed in a bat box which will be retained on site so that the bat can emerge safely that evening.

No exclusion is proposed given the large number of potential access points and the difficulty in ensuring all such access points are effectively sealed with one-way devices.

Following removal of all suitable bat roost features by soft-strip, and the licensed ecologist is satisfied that bats are absent, the demolition of the building will continue by mechanical means.

#### E.2 Bat roosts and habitat

##### E.2.1 In-situ retention of roost(s)

No roosts will be retained in-situ.

##### E.2.2 Modification of existing roost(s)

None of the existing roosts will be modified.

##### E.2.3 New roost creation (including bat houses and bat boxes)

To compensate for the permanent loss of 3 x roost locations used by small numbers of individual common pipistrelle bats, a total of 6 x bat boxes will be installed on site. These will comprise 3 x Schwegler 2FN boxes and 3 x Schwegler 1FD boxes or similar. One of each box will be installed onto each of the three trees. Boxes will be positioned at least 4m off the ground, with good flight path access and orientated to face between southeast and southwest.

It is proposed that three trees within the existing southern site boundary will be used. The boundary comprises a line of Lombardy poplars within a dense roadside hedgerow. The inside edge of this tree line comprises a 3-5m wide vegetated corridor, which links to a wider area of scrub and a recently created GCN mitigation site – all of which offer excellent bat foraging/commuting habitat.

##### E.2.4 Maintenance &/or modification of new and existing habitat

The new boxes have been located within an existing line of mature trees which connects to other areas of suitable bat habitat. These habitat features will be retained and will continue to be managed with minimal intervention, to benefit wildlife.

There are no proposals or plans to remove any of these habitats.

### E.2.5 Scaled maps/plans

See Figure E2.5 attached.

## E.3 Mechanisms for ensuring delivery of mitigation and compensation measures

This Method Statement has been submitted as part of the planning application for the demolition of the Clubhouse building. Therefore, failure to comply with this document would result in a breach of planning consent. The scheme would be at risk of Planning Enforcement.

Furthermore, the applicant is a reputable company that values its environmental credentials. There is a corporate responsibility on the company to act responsibly when it comes to environmental permits and licenses.

## E.4 Mitigation contingencies

*Building is found to support a maternity roost*; in this instance, the works will pause and the license revised, to include additional compensatory measures and a revised timetable of works to avoid the maternity period.
*Building is found to support hibernating bats*; in this instance, the works will pause and the license revised, to include additional compensatory measures and a revised timetable of works to avoid the hibernation period.
*Not safe to conduct a soft strip using conventional access, e.g. scaffolding*; in this instance, additional dusk/dawn surveys will be carried out to identify when bats are no longer present within the building. Use of a MEWP would also be considered, as a means of access, to facilitate the soft-strip.

## E.5 Biosecurity risk assessment

No non-native species have been identified within the working area or indeed on the wider site at James Jones. The risk of spreading INNS off-site is therefore negligible.

There is a risk of INNS being brought onto site by contractors and their vehicles. To mitigate this, all contractors will be asked to ensure that all of their work wear and their machinery are thoroughly cleaned before entering the site.

A post-works inspection of the area will be undertaken as part of the bat monitoring, to confirm the absence of INNS.

# F Post-development site safeguard

## F.1 Habitat/site management and maintenance

The applicant will be wholly responsible for maintaining the 6 x bat boxes and associated habitat within which they have been placed.

## F.2 Population monitoring, roost usage etc.

Bat boxes will be subject to an inspection by hand and/or by endoscope for 1-year post-works. The inspection will be carried out by a bat licensed ecologist during the period May to August.

### F.3 Post-development mitigation contingencies

It is quite likely that there could be no evidence of bat usage of the boxes 12 months after their installation. However, provided he boxes remain in place and in suitably good condition, they will continue to offer potential roosting opportunities for at least the medium-term (minimum of 10 years).

If boxes are found to have been damaged, removed or no longer in a suitable location to be of value to bats, then boxes will be replaced and/or moved as required.

### F.4 Mechanism for ensuring delivery of post-development works

This Method Statement has been submitted as part of the planning application for the demolition of the Clubhouse building. Therefore, failure to comply with this document would result in a breach of planning consent. The scheme would be at risk of Planning Enforcement.

Furthermore, the applicant is a reputable company that values its environmental credentials. There is a corporate responsibility on the company to act responsibly when it comes to environmental permits and licenses.

It is assumed that Etive Ecology Ltd will be appointed to undertake the monitoring work and to report he findings to the LPA and to NRW.

## G Timetable of works.

Include timings of exclusion operations, demolition and construction works, creation of mitigation measures, timing of other post development works and monitoring.

The precise timing of the demolition works are unknown, given the uncertainty over the period of time taken for the planning application to be determined. Therefore, the sequence of timings are presented below.

1. Planning approval is granted.
2. Bat License application is submitted to NRW immediately following 1.
3. 6-8 weeks for NRW to determine the bat license application.
4. Upon grant of license, install 6 x bat boxes.
5. Undertake dusk/dawn if during the period Sept/Oct/March/April.
6. Undertake soft-strip immediately following dusk/dawn survey, under direct bat-licensed ecological supervision.
7. Complete demolition following soft-strip.
8. Undertake monitoring of bat boxes at least 12 months following completion of the demolition.

Updated details of the timing of works will be provided when this document is revised before submission to NRW.

## H Land Ownership – Mitigation Site

### H.1 Mitigation Site/Compensation Site Ownership

All mitigation works will take place on land owned by and in the full control of the applicant.

### H.2 Mitigation Site/Compensation Ownership post construction

The applicant has no intention of selling the land post-works. The land will remain within their ownership as part of the existing operation facility.

## I Declaration

I declare that should a licence be granted, the work as proposed in this Method Statement will be strictly adhered to. I understand that any deviation from the works as proposed in this Method Statement without agreement from NRW would result in a breach of the licence.

***NB**. Applicants should note that it is an offence under regulation 59 of the Conservation of Habitats and Species Regulations 2017 to knowingly or recklessly provide false information in order to obtain a licence.*

| | | | |
|---|---|---|---|
| Signature of the **Applicant** | Michael Nelson | **Date** | 02.08.24 |
| ***For electronic submissions please insert an electronic signature above or place an x in the box opposite to confirm agreement with the declarations above.*** | | | X |
| Full name in BLOCK LETTERS | MICHAEL NELSON | | |
| | | | |
| Signature of the **Ecologist** | Russell Grey | **Date** | 02.08.24 |
| ***For electronic submissions please insert an electronic signature above or place an x in the box opposite to confirm agreement with the declarations above.*** | | | X |
| Full name in BLOCK LETTERS | RUSSELL GREY | | |

## J References

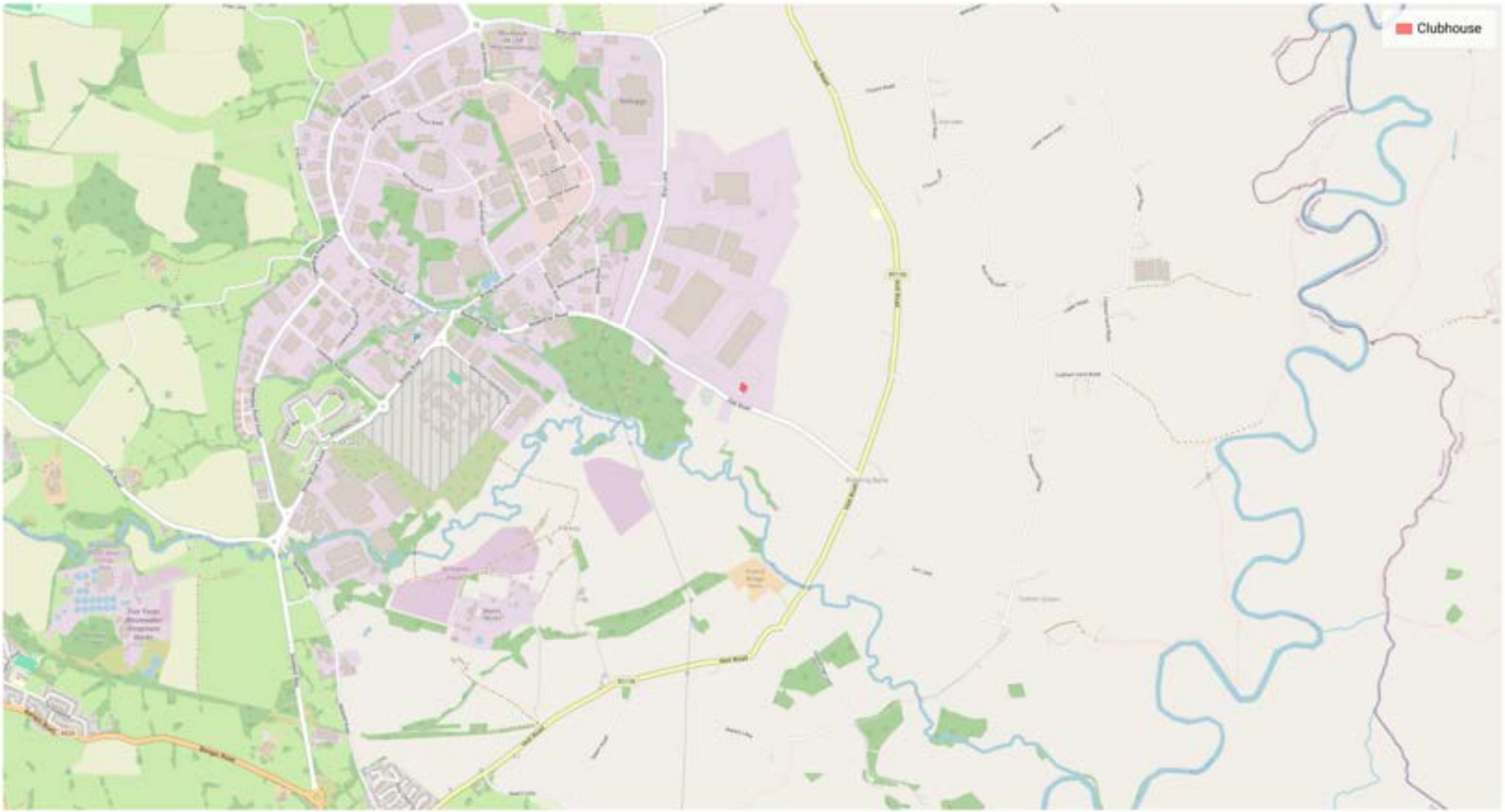
Credits for source information.

## K Annexes

**K.1** Pre-existing survey reports
**K.2** Raw survey data.

# C4.1 - James Jones Clubhouse; Site Location Plan

Land App




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ETIVE ECOLOGY
Ecological Services & Solutions

500 m
Scale 1:25000 (at A4)

N

C4.2 - James Jones Clubhouse; Survey
Area Plan

Land App




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ETIVE ECOLOGY
Ecological Services & Solutions

50 m
Scale 1:2000 (at A4)

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# Figure C.5; Site Photographs




Western elevation of Clubhouse




Southern elevation of Clubhouse



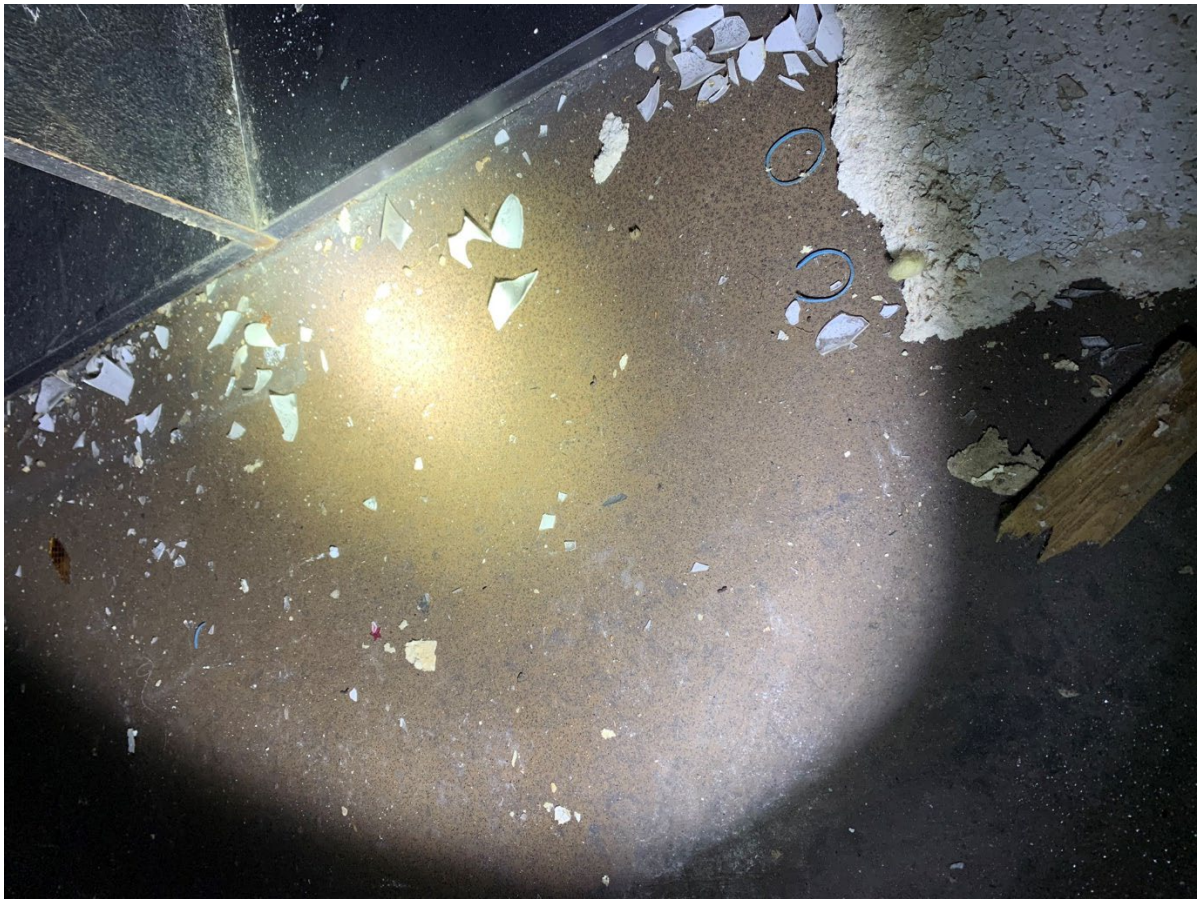

Example of security lighting shining on the Clubhouse



Internal areas in a poor state of repair



Holes in ceiling provide access to roof space



Occasional scattered bat droppings found in ground floor areas

# C7 - James Jones Clubhouse - Survey Results

Land App




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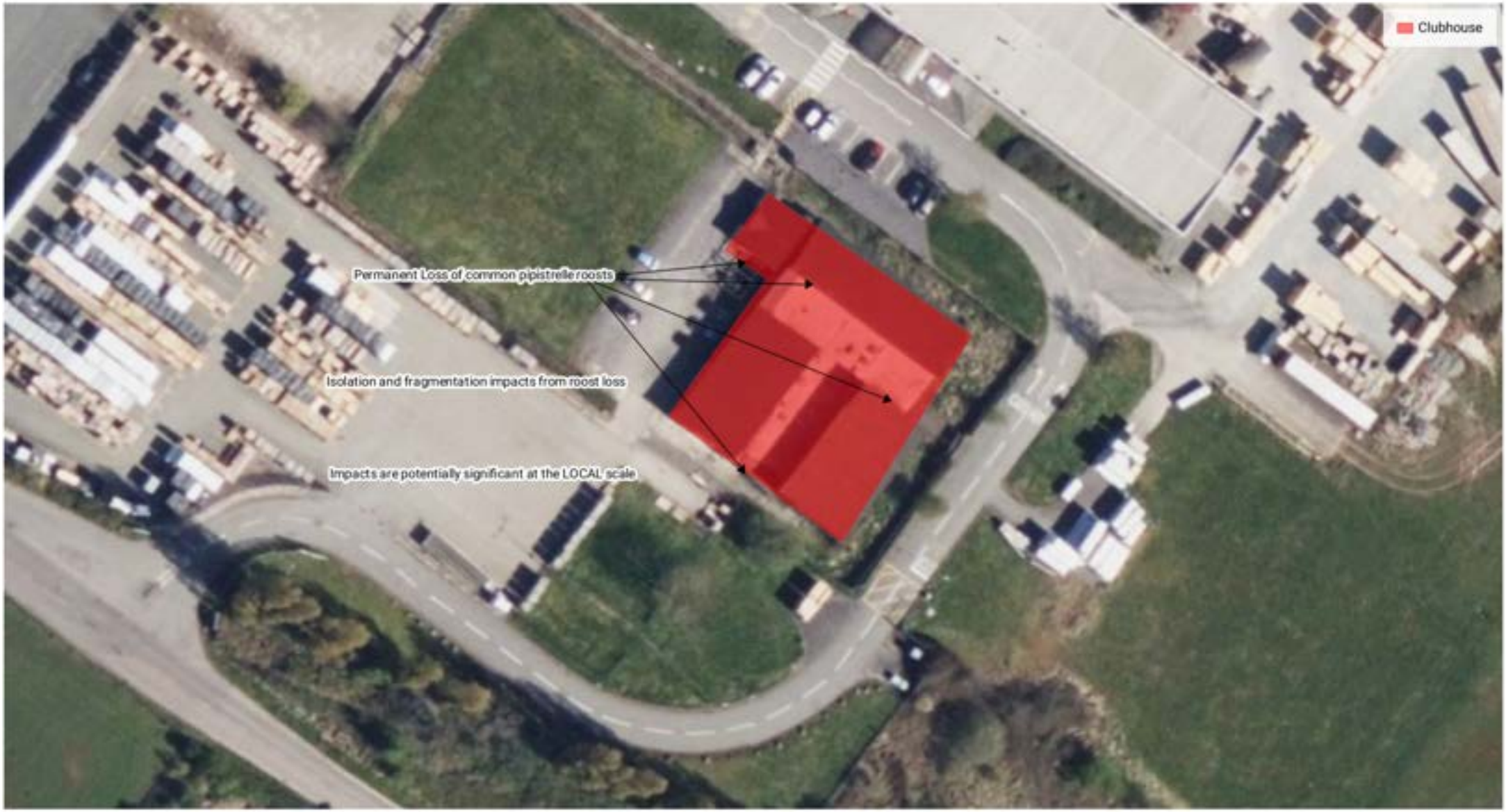
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Ecological Services & Solutions

20 m
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N

# D - James Jones Clubhouse; Impacts Plan

Land App




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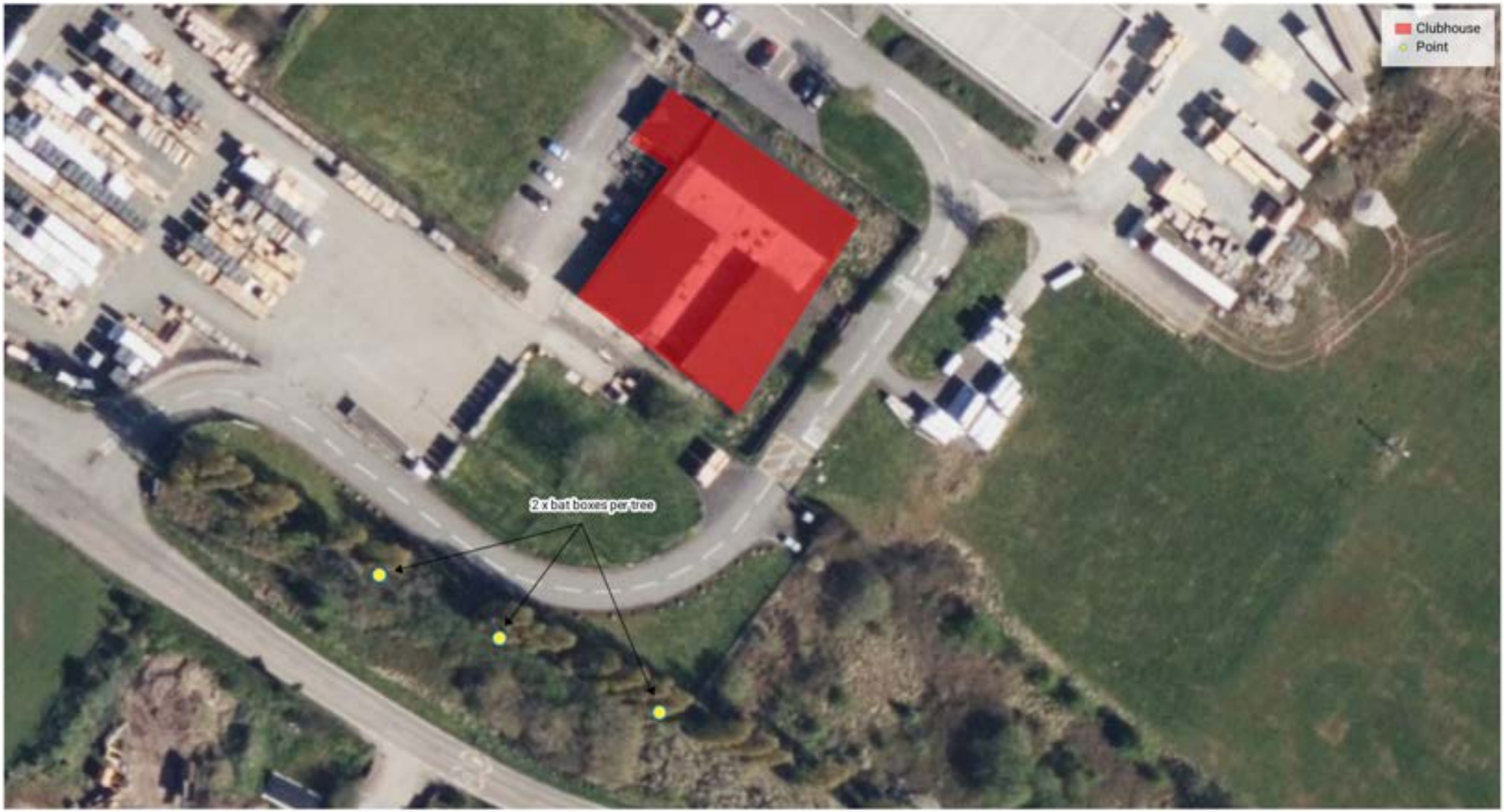
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Ecological Services & Solutions

20 m
Scale 1:700 (at A4)

N

# E2.5 - James Jones Clubhouse; Mitigation Plan

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ETIVE ECOLOGY
Ecological Services & Solutions

20 m
Scale 1:750 (at A4)

N

| | |
|---|---|
| **Report Title** | **Proposed Demolition of The Clubhouse, James Jones & Sons Ltd, Off Oak Road, Wrexham Industrial Estate, Wrexham – Preliminary Roost Assessment** |
| **Date issued** | **19th January 2023** |
| **Author** | **Keymar Wake** |
| **Report Version** | **C442/ PRA/ 1.0** |
| **Client** | **James Jones & Sons (Pallets and Packaging) Ltd** |
| **Contract Ref.** | **C442** |

**This report was produced by Enfys Ecology Ltd on behalf of**

**Unit 23, The Malthouse Business Centre,**
**Regent Street, Llangollen, Denbighshire, LL20 8HS**
**01978 860889**

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## Quality Assurance

| Survey/ Assessment Work Schedule | | |
|---|---|---|
| **Survey/Assessment Type** | **Surveyors/ Author** | **Date** |
| Preliminary Roost Assessment | Keymar Wake and Ashley Payne | 16/09/2022 |

| Review Schedule | | | | |
|---|---|---|---|---|
| **Issue** | **Date** | **Author** | **Reviewed by** | **Approved by** |
| 1.0 | 19/01/2023 | Keymar Wake | Joe Franklin | Max Ellson |

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## EXECUTIVE SUMMARY

| | |
|---|---|
| **Site** | The Clubhouse, Wrexham Industrial Estate, Wrexham, LL13 9RG |
| **Grid Reference** | SJ 3933 4916 |
| **Surveyors** | Preliminary Roost Assessment: Keymar Wake (bat licence No. S091201/1), assisted by Ashley Payne (Enfys Ecology) |
| **Proposed work** | The Clubhouse is proposed for demolition. |
| **Type of survey** | Preliminary Roost Assessment; 16th September 2022. |
| **Results of survey** | • The Clubhouse had many potential (external) roosting features for crevice dwelling bats, as well as ample access into three loft spaces, with access points suitable for Lesser Horseshoe bat.<br>• The loft spaces could not be inspected due to health and safety constraints but there was one potential dropping observed from the access vent hatch – due to its distance from the surveyor it could not be confidently confirmed as bat.<br>• The building provided highly suitable habitat for nesting birds and evidence of bird presence was observed in the form of inactive nests, bird droppings and a dead bird within the building.<br>• The surrounding habitat has high suitability for bats, with surrounding buildings, woodland blocks, a number and ponds and two river corridors, connected via tree and hedge lined field boundaries and roads. |
| **Survey conclusions** | • The Clubhouse is considered to have high potential for bats due to the suitable surrounding habitats and quantity and quality of potential roosting features.<br>• The site has been used by birds in the past to nest and is considered likely to be used annually.<br>• The proposed demolition works will destroy potential bat roosting habitat and nesting bird habitat. |
| **Mitigation and Enhancement** | • As The Clubhouse is considered to have high potential for bats, at least two (but up to three) emergence surveys are required to be carried out between May – August to determine if and how bats are using the building.<br>• RAMs, mitigation and enhancement measures will be required to be based on the results of the emergence surveys and will be confirmed following such surveys. |

# 1.0 INTRODUCTION

## 1.1 Background

1.1.1 Marches Ecology was commissioned by James Jones & Sons (Pallets and Packaging Ltd) to carry out a Preliminary Roost Assessment (PRA) of The Clubhouse, James Jones & Sons Ltd, off Oak Road, Wrexham Industrial Estate, Wrexham (Approximate OS Grid Ref: SJ 3933 4916).

1.1.2 The PRA was commissioned to inform demolition of the building (refer to *Section 1.2* below); no trees are proposed to be affected by the works. It is required to determine whether the proposed demolition works would affect bats (and nesting birds). The survey work to inform this report was carried out on 16th September 2022. This report is valid for a period of eighteen months from this date in accordance with best practice.

1.1.3 All British bats (and roost sites) are protected under the *Wildlife and Countryside Act* (WCA) *1981* (as amended). In addition, all bats are classified as European Protected Species by *The Conservation of Habitats and Species Regulations 2017* (as amended). Under this legislation, it is an offence to kill, injure or disturb a bat, or to destroy any place used as a shelter by bats.

1.1.4 Should evidence of bats be found and it is deemed likely that the proposed works will disturb them a licence from Natural Resources Wales (NRW) must be obtained before any work may proceed.

## 1.2 The Proposal

1.2.1 The Clubhouse is indicated by a redline on a .pdf file (ref: S1882_4-00 - Proposed Site Plan_Revised mn CLUBHOUSE LOCATION with storage area); this plan also indicates an associated proposed '*machine working area*', along with a '*temporary storage*' area.

1.2.2 No other information has been provided to inform this report.

# 2.0 SITE DESCRIPTION

## 2.1 Survey Area

2.1.1 The Clubhouse is located on the eastern edge of Wrexham Industrial Estate, with industrial buildings to the west and north and rural areas to the east and south (*Figure 2.1*). The wider landscape comprises pasture fields and hedgerows and a block of woodland less than 300 m to the south west, adjacent to the River Clywedog to the south (which in turn adjoins the River Dee approximately 2 km to the east). There are at least 9 ponds within 500 m of The Clubhouse, the closest situated approximately 50 m away to the south.

2.1.2 The Clubhouse is highlighted with a solid red line in *Figure 2.2* below. The area immediately surrounding the building was hardstanding in the form or roads and car parking, with some areas of amenity grassland and scattered trees, with a tree line running 40 m south of the site.



***Figure 2.1***: The approximate location of The Clubhouse (red star), and the surrounding habitat. Base Image © Google 2021.

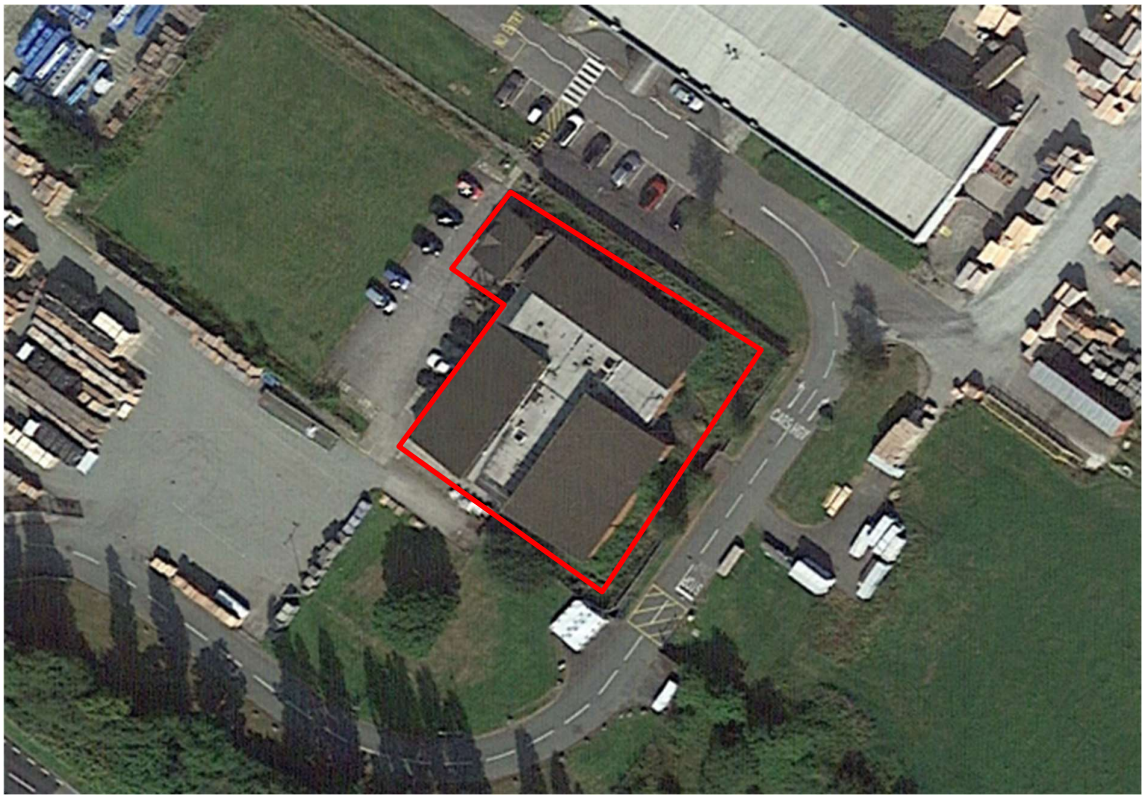


***Figure 2.2***: The Clubhouse is shown by the red line.
Base Image © Google 2021.

## 2.2 Statutory and Non-Statutory Designated Sites

2.2.1 There are no statutory designated sites within 1 km of The Clubhouse, and no designated sites for bats within 2 km. Part of the non-statutory Wrexham Industrial Estate Wildlife Site lies approximately 285 m to the west.

# 3.0 METHODOLOGY

## 3.1 Preliminary Roost Assessment

3.1.1 The building was assessed for any signs of bats; these include droppings, feeding remains, and other indicative marks, plus features of potential use to bats such as crevices, cracks and other holes, and any potential access points into the building. High powered torches were used to inspect any identified features, and an endoscope was used to investigate any gaps or crevices, where appropriate. Both the exterior and interior of the building were surveyed.

3.1.2 The building inspection was carried out on the 16th September 2022 by Keymar Wake (bat licence No. S091201/1) and Ashley Payne (accredited agent on NRW bat licence number S091201/1); Enfys Ecology. Where deemed necessary Potential Roost Feature (PRF) assessments were carried out following best practice guidelines (Collins, 2016). Photographic evidence was taken where necessary.

## 3.2 Limitations

3.2.1 The loft spaces were not considered safe to enter so were only inspected from the external vent hatch entrances.

3.2.2 Bats are highly mobile animals and it is possible that they may move into a building after the survey has occurred.

# 4.0 SURVEY RESULTS

## 4.1 Building Descriptions

4.1.1 The Clubhouse is a single-storey building comprising a flat roof, with three large dormers on the north-east, south-east and north-western elevations; there is also an adjoining single pitched roof toilet block on the north-western corner.

4.1.2 The basic layout of the building is shown in *Figure 4.1,* and external and internal descriptions (where applicable) are detailed in *Table 4.1.* For the purposes of this report, the descriptions have been separated into three areas: 1) the flat roof section of the building, 2) the dormers and 3) the toilet block.

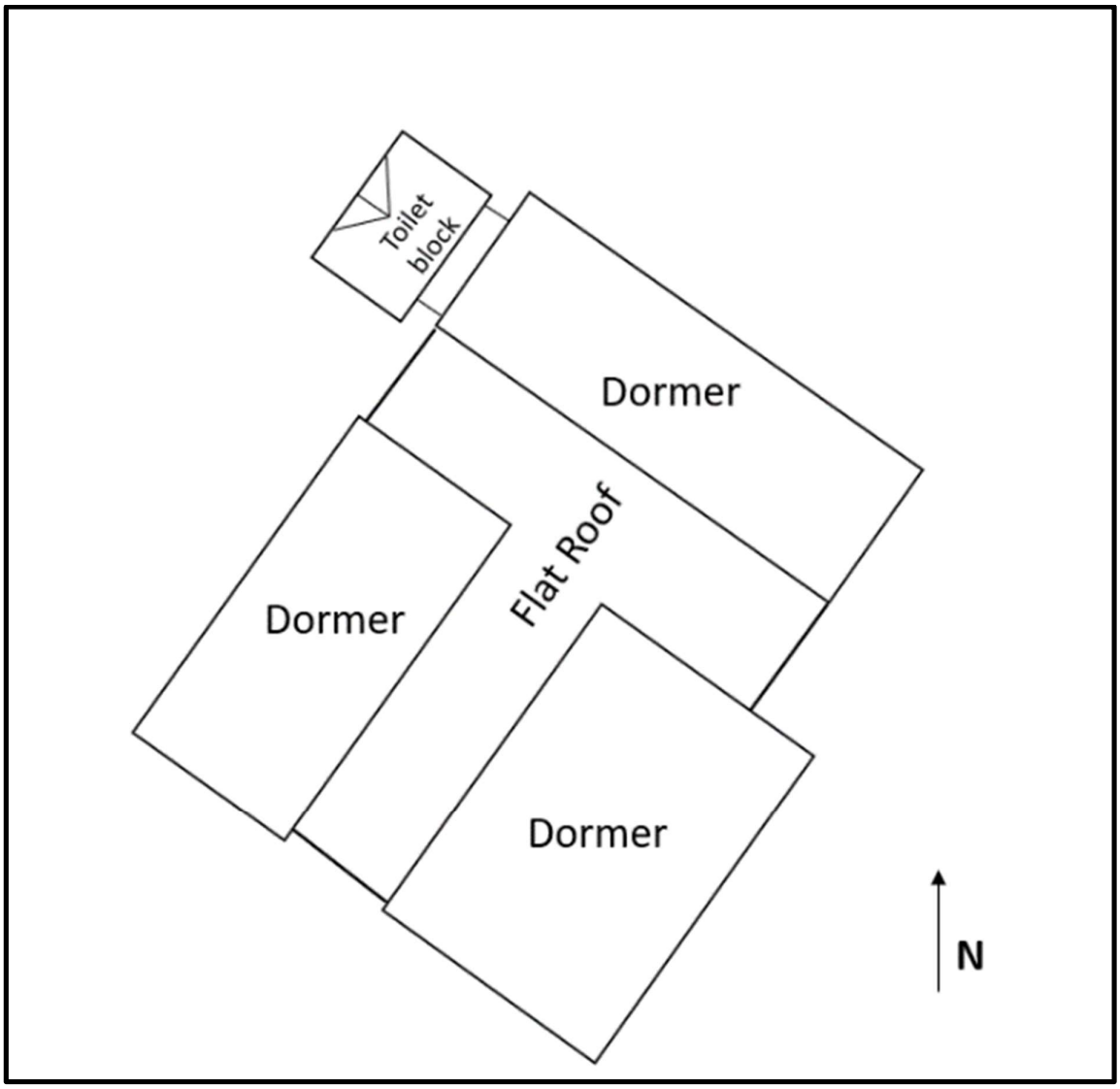
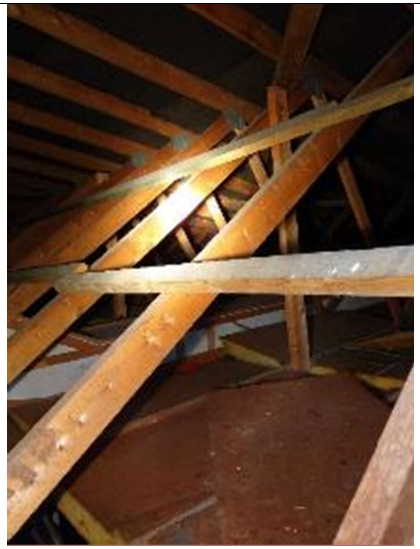


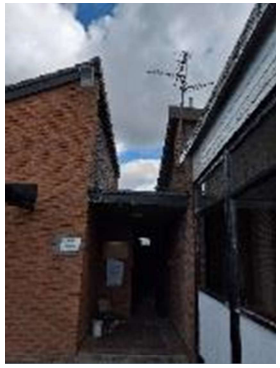

***Figure 4.1***: Basic layout of The Clubhouse (Not to scale)

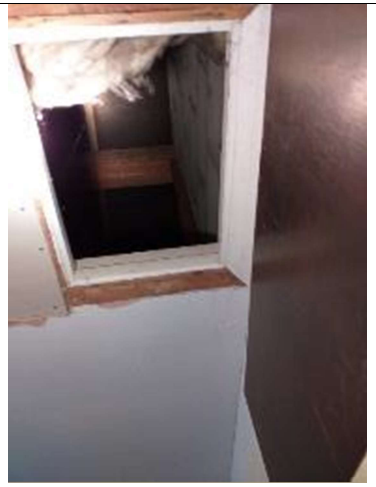
*Table 4.1 – Building Descriptions*

<table>
<tr><th colspan="4">Flat Roof Section</th></tr>
<tr><th>External Description</th><th>External Photo</th><th>Internal Description</th><th>Internal Photo</th></tr>
<tr>
<td>The Clubhouse (excluding the toilet block) is approximately 33 x 29 m. The flat roof of the building is approximately 4 m high.<br><br>It comprises breeze block walls with brick, wood and board cladding. The fascias, soffits and barge boards are all wooden. There are wooden framed windows along all elevations.<br><br>The flat roof is lined with felt; it is not in good condition with tears and holes in the felt. There were a number of skylights/ vents along the top of the roof.</td>
<td><br>Western elevations<br><br>Flat roof from south-west elevation</td>
<td>Internally, the ground floor of The Clubhouse was in a state of disrepair with collapsed ceilings, damp and mould. The rooms are no longer in use and while the majority are empty, there are some areas being used for storage.<br><br>The internal walls are breezeblock and plastered and are generally well sealed. The floors are concrete and carpeted in some rooms.<br><br>There are many holes in the ceilings throughout the building, showing a void of approximately 0.5 m between the ceiling and the top of the flat roof. The void has a timber frame and is insulated with rock wool in some areas that could be seen (but not throughout).</td>
<td><br>Main central bar area<br><br>Room to the north-east</td>
</tr>
</table>

| | | | |
|---|---|---|---|
| | <br>**South-eastern elevation** | The rooms were well illuminated and subject to low airflow levels. | <br>**Hole in ceiling showing void** |
| **Dormer Roofs** | | | |
| **External Description** | **External Photo** | **Internal Description** | **Internal Photo** |
| There are three dormer, single pitch roofs that extend from the flat roof on the north-eastern, south-eastern and north-western elevations. The south-eastern and north-western roofs are approximately 1.75 m high above the flat roof, at their highest point. The dormer on the north-eastern elevation has a maximum height of approximately 0.75 m from the flat roof.<br><br>The dormers comprise wooden cladded walls (above the flat roof) and concrete wavy tiles along the roof pitch, with felt lining the back of the concrete ridge tiles. There were | <br>**South-eastern dormer** | The loft spaces within each of the dormer roofs could be inspected via vent hatch openings within the wooden cladding.<br><br>The loft spaces have a timber frame and are lined with felt. There are insulation blocks along the floor of the loft spaces. The gable walls are exposed breezeblock.<br><br>The loft spaces had low light levels in areas away from the access hatches, but moderate | <br>**Example of an access vent hatch** |

| | | | |
|---|---|---|---|
| windows along the north and south eastern dormers, that had been boarded up. | <br>**North-eastern elevation**<br><br>**South-western dormer** | air flow levels due to the open vent hatches. | <br>**Example of inside the loft spaces** |

<table>
<tr><th colspan="4">Toilet Block</th></tr>
<tr><th>External Description</th><th>External Photo</th><th>Internal Description</th><th>Internal Photo</th></tr>
<tr>
<td>The toilet block measures approximately 8 x 5.5 m and adjoins the north-western corner of the building via a flat roofed corridor.<br><br>The toilet block also comprises breeze block walls with brick cladding, and wooden fascias, barge boards and soffits, with areas of wooden cladding on the gable ends.<br><br>The roof is a single pitch with wavy concrete tiles. There is a small dormer window at the bottom of the roof pitch, that has been plastered over.</td>
<td><br>South western elevation<br><br>Adjoining corridor</td>
<td>Internally, the toilet block comprises WC and shower rooms, and is no longer in use. The interior walls are cladded with brick-style panelling and timber. The floor is concrete and tiled.<br><br>The loft space could be viewed from a loft hatch but was not accessed. The loft space is approximately 1.5 m high to the apex and is timber framed, felt lined and insulated with rock wool.<br><br>The ground floor of the toilet block was well illuminated via the windows. The loft space had low light and airflow levels in areas away from the loft hatch.</td>
<td><br>Main corridor</td>
</tr>
</table>

| | | | |
|---|---|---|---|
| |  **Dormer window (plastered over)** | |  **Open hatch into loft space** |

## 4.2 PRA Results

4.2.1 The Clubhouse has a number of potential features which provide access into the building and loft space, and offer external roosting potential for bats. The locations of the Potential Roosting Features (PRF's) and access points are illustrated in *Figure 4.2* and are described in *Table 4.2.*

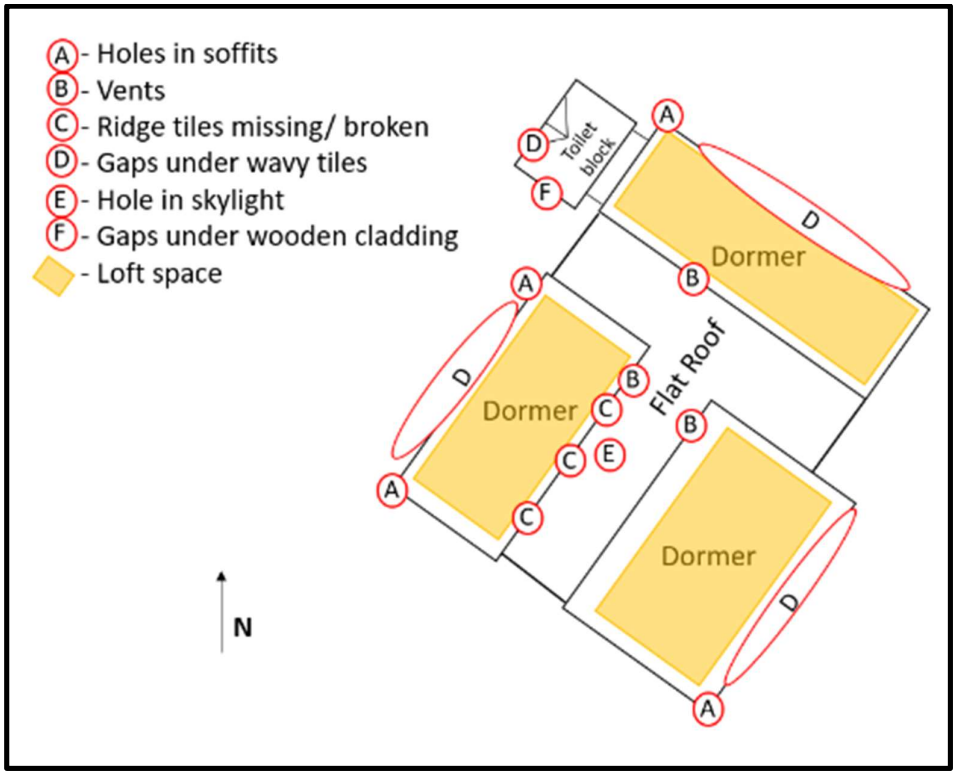
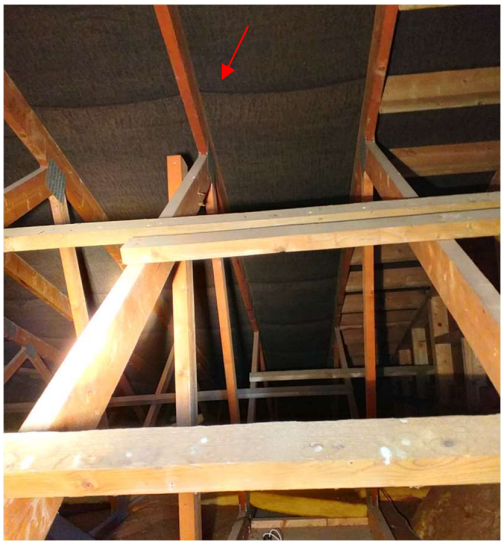



***Figure 4.2*** – Location of features identified in *Table 4.2.*

*Table 4.2 – Potential features and access points for bats and birds*

| Location | Feature Description | Example Photos |
|---|---|---|
| **A** | Holes in soffit boxes (an old bird nest was observed on the south-west corner). |   |
| **B** | Open vent hatches providing access into loft spaces. |   |

| | | |
|---|---|---|
| **C** | Missing/ broken ridge tiles providing access under the wavy concrete tiles. |   |
| **D** | Gaps under wavy concrete tiles. |   |

| | | |
|---|---|---|
| **E** | Hole in skylight providing access into the building. |  |
| **F** | Gaps under wooden cladding. |  |
| **All loft spaces - Internal** | Spaces behind the felt lining (example shown by red arrow) and roosting potential for free hanging bats on the timber frame. |  |

| | | |
|---|---|---|
| **Internal** | Holes in ceilings and open loft hatches providing access into the main building from the loft space. |   |
| **Internal – flat roof section** | A void of approximately 0.5 m providing roosting areas within the flat roof. |  |

4.2.2 No evidence of bats was found externally on the building or within the ground floor rooms. The loft spaces could not be inspected fully as the floors were not considered safe.

4.2.3 One potential bat dropping was observed from the vent hatch of the north-western facing dormer; due to the distance it was away from the hatch it could not be confirmed as bat (*Figure 4.3*). Mouse droppings were found within the ground floor rooms of the building.



***Figure 4.3*** – Potential bat dropping.

## 4.3 Nesting Birds

4.3.1 There were several areas where birds could access the building (as shown in *Table 4.2*) and many nesting opportunities around the exterior of the building; underneath the tiles and within the soffit boxes. One old bird nest was observed in the soffit box of the south-western corner. Bird droppings were observed in the loft space of the north-eastern dormer and an unidentified dead bird was present on the ground floor of the building.

## 4.4 Cofnod Data Search

4.4.1 An associated Cofnod data search (undertaken by Marches Ecology for an unrelated project at James Jones) returned no bat records within a 500 m search radius. There was one record of 'bat' at 560 m away, and records of Brown Long-eared bat (*Plecotus auritus*), Common Pipistrelle (*Pipistrellus pipistrellus*) and Lesser Horseshoe bat (*Rhinolophus hipposideros*) from a 1 km grid reference point 880 m from The Clubhouse (all from 2005).

# 5.0 DISCUSSION AND EVALUATION

## 5.1 Proposed works

5.1.1 It is proposed to demolish The Clubhouse. There are no plans for any re-development of the footprint available at the time of this report.

## 5.2 Designated Sites

5.2.1 There are no statutory designated sites within 1 km of The Clubhouse. The nearby Wildlife Site will not be impacted by the proposal as it is set apart from the works area by other industrial buildings and roads. The demolition will be carried out on/ from the current hard standing and no vegetation or habitats will be removed.

## 5.3 Bats

5.3.1 The Clubhouse has numerous PRF's for bats, primarily in the form of gaps under tiles and soffit boxes, as well as ample access into the loft spaces via vent hatches, and then into the remainder of the building through holes and open hatches in the ceiling. Roosting opportunities are available within the loft spaces for crevice dwelling species, underneath the felt and behind the wooden timbers; and for free-hanging bats such as Brown Long-eared and Lesser Horseshoe on the exposed timbers.

5.3.2 One potential bat dropping was observed within the loft space from the vent hatch, this dropping was identified from a distance of approximately 2 m so it could not be confirmed as bat. The loft spaces could not be inspected further than the immediate area around the vent hatches. Therefore, it cannot be ruled out that there were bat droppings, and/or further evidence of bats, within the loft spaces at the time of survey.

5.3.3 The surrounding habitat has high suitability for bats with an expanse of pasture fields to the south and east, with hedge and tree lined boundaries providing connectivity between surrounding blocks of woodland and the river corridors. There are several ponds surrounding the industrial estate that would provide further suitable foraging areas and the buildings within the estate would likely provide roosting opportunities for bats in the area. Whilst obtained Cofnod data shows very few records of bats in the area, and no records within the last 17 years, this is likely a result of under-recording in the area as opposed to the lack of bat presence.

5.3.4 Under the Good Practice Guidelines (Collins, 2016), the site is regarded as having high suitability for roosting bats[1]. The roosting opportunities available are considered suitable for larger roosts of bats, including maternity roosts, due to their size (within the loft spaces and building itself) and abundance (the number of spaces underneath the wavy tiles).

5.3.5 The proposed works will result in the demolition of the building, and therefore the destruction of potential roosting areas for bats. Further emergence surveys (at least two but potentially up to three) will be required within the main bat activity season (May – August) to determine the numbers and species of bats using the building, as well as their access points into the loft spaces.

[1] Defined as "*A structure … with one or more potential roost sites that are obviously suitable for use by larger numbers of bats on a more regular basis and potentially for longer periods of time due to their size, shelter, protection, conditions and surrounding habitat*".

### 5.4 Nesting birds

5.4.1 The Clubhouse provides highly suitable nesting bird habitat and evidence of bird presence and previous nesting was evident during the survey.

5.4.2 The survey was carried out towards the very end of the nesting bird season so the full extent of the use of the building by birds could not be determined; it is suggested that further assessment is carried out during the bat emergence surveys (between May and August).

# 6.0 MITIGATION, REASONABLE AVOIDANCE MEASURES (RAMS) AND ENHANCEMENTS

## 6.1 Bats

6.1.1 If following the emergence surveys bats are found to be using The Clubhouse, a licence from NRW will be required before any work (including but not limited to demolition) can commence.

6.1.2 Mitigation, RAMs and compensation measures will be provided following the emergence surveys.

## 6.2 Birds

6.2.1 As evidence of nesting birds was found within and around the building, all intrusive/ demolition works should be constrained to periods outside of the nesting bird season (March – September inclusive).

6.2.2 If it is necessary to carry out any such works within the nesting bird season (subject to the results of the bat surveys), a nesting bird check will need to be carried out by an ecologist immediately prior to (no more than 48 hours beforehand) works commencing to confirm there are no birds nesting within the building.

6.2.3 If birds are found to be nesting then it may be necessary to postpone works until outside of the nesting bird season or until chicks have fledged. It may also be possible to provide a buffer zone from active nests to allow some parts of the works to continue; this would be determined by an ecologist.

6.2.4 Such RAMs, along with compensatory nesting recommendations will be confirmed/ provided following the further surveys.

## 6.3 Enhancements

6.3.1 Enhancements for bats and birds will be provided following the further surveys/ once the plans for the site are finalised.

# 7.0 LEGISLATION

## 7.1 Bats

The *Wildlife and Countryside Act* (WCA) *1981* (as amended) forms the key legislation protecting habitats and species in the UK. All UK bat species are fully protected under the 1981 Act through inclusion on *Schedule 5*. All bats are also listed under *Schedule 2* of the *Conservation of Habitats and Species Regulations (2017)* which transcribes the EC Habitats Directive into UK law. In combination, this legislation makes it an offence to:

- Deliberately or recklessly take, injure or kill a bat;
- Deliberately or recklessly damage or destroy a place or structure used by bats for shelter or protection;
- Deliberately or recklessly obstruct access to a bat roost; or
- Deliberately or recklessly disturb bats while occupying a roost.

Bat roosts are protected under these laws whether the animals are present at the time of survey or not. Under both laws the Welsh Government and D.E.F.R.A. are empowered to issue licences to carry out work to bat roosts for reasons of overriding public interest. It is not illegal to tend to a disabled bat pending recovery.

## 7.2 Birds

In addition, under the *Wildlife and Countryside Act, 1981* (as amended) and the *Countryside and Rights of Way, 2000*, all wild birds, their nests and eggs are protected during the breeding season (typically March to August inclusive). This makes it an offence to:

- Intentionally kill, injure or take any wild bird.
- Take, damage or destroy the nest of a wild bird included in Schedule ZA1.
- Take, damage or destroy the nest of any wild bird while that nest is in use or being built.
- Take or destroy an egg of any wild bird.

## 8.0 REFERENCES AND INFORMATION SOURCES

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