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# **Ecological Impact Assessment:**

Miner's Welfare Ground & Charlie Wayman Fields Ferryhill County Durham

# **Prepared for:**

FSL Projects 71 Plato Close Leamington Spa CV34 6WE

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#### 1.0 EXECUTIVE SUMMARY

- 1.0.1 Dendra Consulting Ltd was commissioned to undertake this survey and report by FSL Projects. The scope of the contract was to undertake an Ecological Impact Assessment (EcIA) to support a planning application for proposed upgrade works to the Miners Welfare Ground and Charlie Wayman Fields, Ferryhill, County Durham
- 1.0.2 Data searches revealed no protected or priority species records from the site itself but do show a large number of protected species within 2km of the development site. There are no statutory or non-statutory nature conservation sites within the site boundary. The nearest designated sites are two locally designated sites more than 500m from the development site. There are no priority habitats on or adjacent to the site.
- 1.0.3 The survey site consisted of the Charlie Wayman Fields and the Miners Welfare Ground. These contained a mixture of urban parkland, tennis courts, play areas, grass sports pitches, a multi-use games area (MUGA), tennis, skate park, car park and two buildings. At the northern and western edges of Charlie Wayman were small groups of trees and areas of unmanaged grassland. In total eight habitats were identified using the UK Habs classification system. These are:
  - Developed land sealed surface u1b
  - Building u1b5
  - Built-up areas and gardens u1 (806 urban park)
  - Built-up areas and gardens u1 (847 Introduced shrub)
  - Modified grassland g4
  - Other neutral grassland g3c
  - Other broadleaved woodland w1g
  - Native hedgerow h2a.

These habitats are considered to be locally and nationally common and widespread.

- 1.0.4 No controlled invasive plant species listed under Schedule 9 (part ii) of the Wildlife and Countryside Act (1981), were observed on the site.
- 1.0.5 The site has very little potential for protected species. Two buildings have been assessed as having low/moderate potential to support bats. However an internal

inspection has not been undertaken. **Internal surveys have been recommended.**Areas of grassland, small wooded areas, trees and shrubs have the potential for nesting birds. Hedgehog are recorded in close proximity to the site.

- 1.0.6 The following impacts are predicted in the absence of further surveys and/or mitigation:
  - Potential damage to bats and bat roosts Further works required.
  - Loss of nesting and foraging habitat for an assemblage of locally common bird species.
  - Possible killing or injuring of a NERC Act listed species (Hedgehog).
  - Los of small number of amenity trees.
- 1.0.7 Mitigation, Compensation and Enhancement has been recommended as follows:
  - Controls on timing of work for vegetation clearance to avoid the bird nesting season.
  - Sensitive working practices with regards to Hedgehogs during the construction phase.
  - The planting of 25 new native trees and the creation of 1300m<sup>2</sup> of new neutral grassland
  - The erection of bat and bird boxes in the trees on site.
  - Additionally, to help meet the BNG targets, the existing small areas of neutral grassland and woodland will be managed.
- 1.0.8 The current on-site biodiversity baseline shows a score of 11.96 habitat units. The BNG calculations show that with the creation of the new neutral grassland, the planting of 25 native trees and the management of the existing areas on the site; the final BNG calculation scores an increase of 1.44 units, which provides a 12.04 Net Gain. A detailed 30-year habitat management and monitoring plan will be required as a condition of planning.

#### 2.0 INTRODUCTION

# 2.1 Background & Scope

2.1.1 Dendra Consulting Ltd was commissioned to undertake this survey and report by FSL Projects. The scope of the contract was to undertake an Ecological Impact Assessment (EcIA) to support a planning application for proposed upgrade works to the Miners Welfare Ground and Charlie Wayman Fields, Ferryhill, County Durham

### 2.2 Details of Proposals

- 2.2.1 The proposals include the following at Miners Welfare Ground:
  - New skate park to be installed.
  - New car parking area comprising 15no. spaces.
  - Construction of third tennis court, including run off extension.
  - Refurbishment of existing pavilion.
- 2.2.3 The following is proposed at Charlie Wayman Fields:
  - Removal of MUGA, skate park and existing changing facility.
  - Construction of clubhouse, car parking and 5v5 pitch.
  - Change in location/creation of football pitches.

# 2.3 Site Location and Setting

2.3.1 The site is located in Chilton, County Durham. The grid reference for the Miners Welfare Ground is NZ 2837 3014 and the grid reference for Charlie Wayman Fields is NZ 2816 3017. The sites are split by the A176 and are generally bordered by housing and industrial/commercial buildings. Outside of the urban areas are large areas of open farmland and woodland. The closest woodland is a narrow shelterbelt 40m to the north. Much larger woodland is located approximately 500m to the south. The nearest watercourse is a small stream running approximately 250m to the south. This stream feeds into the larger Rushyford Beck, around 1km from the site. Figure 1 shows the site location and surrounding area.



#### 3.0 METHODOLOGY AND LEGISLATION

## 3.1 Supporting Data

3.1.1 The Environmental Records Information Centre (ERIC) North East was contacted for information regarding protected species, nature conservation sites and priority habitats within 2km of the proposed development site. Google Earth and the Multi Agency Geographic Information for the Countryside (MAGIC) website were accessed to study aerial imagery of the site and the surrounding area. An OS map was purchased and is attached as Figure 1.

## 3.2 Field Survey Methodology, Timing and Personnel

- 3.2.1 A site walkover survey was conducted on 22<sup>nd</sup> February 2024. Habitat types were identified and mapped in accordance with the UK Habitat Classification System, Version 2 (UKHab, 2023). The walkover field survey was carried out both across the site and, where necessary, over surrounding land, in order to establish broad habitat types and features of ecological interest that would provide potential for, or display evidence of, protected species. The information was then mapped onto a habitat plan in Appendix 2 and used to determine the need for more detailed surveys.
- 3.2.2 The site survey was undertaken by Barry Anderson, an experienced ecologist who holds a Natural England Level 2 Bat Survey Class Licence (WML-CL18) and a Level 1 Great Crested Newt Survey Class Licence (WML-CL08). The weather conditions during the survey were 12°C and dry, with a Force 1 wind.
- 3.2.3 During the site walkover survey a check for controlled invasive plant species listed under Schedule 9 (part ii) of the Wildlife and Countryside Act 1981 (as amended) was made. Under this Act, it is an offence to cause the spread or relocation to the wild of species such as Japanese knotweed *Fallopia japonica*, Himalayan balsam *Impatiens glandulifera* and Giant hogweed *Heracleum mantegazzianum*.

### 3.3 Legislation

- 3.3.1 This assessment focuses on those species afforded full protection under the Conservation of Habitats and Species Regulations 2019, the Wildlife and Countryside Act 1981 (as amended) and the Protection of Badgers Act 1992. Also included within this assessment are those species considered to be of local and/or national importance through their designation as a local Biodiversity Action Plan (BAP) species or via their listing within Section 41 of the Natural Environment and Rural Communities Act 2006. A very brief summary of the protection that the current legislation provides is as follows:
- 3.3.2 The Conservation of Habitats and Species Regulations 2019 make it illegal to:
  - Deliberately capture, injure or kill a European Protected Species (EPS)
  - Deliberately disturb an EPS<sup>[\*]</sup>
  - Damage or destroy a resting place used by an EPS

[\*] Disturbance of includes in particular any disturbance which is likely to:

- Impair their ability to survive, breed, reproduce, rear or nurture their young, hibernate or migrate
- Affect significantly the local distribution or abundance of the species to which they belong
- 3.3.3 The Wildlife and Countryside Act 1981 makes it illegal to:
  - Intentionally kill, injure or take any wild bird
  - Intentionally take, damage or destroy the nest of any wild bird whilst
     it is in use or being built
  - Intentionally take or destroy the egg of any wild bird
  - Intentionally capture, kill or injure by animals listed on schedule 5 of the act (e.g. red squirrel, Water vole)
  - Damage, destroy or obstruct any structure or place used for shelter by animals listed on schedule 5 of the act
  - Disturb animals listed on Schedule 5 when occupying a place used for shelter

- 3.3.4 The Protection of Badgers Act 1992 makes it illegal to:
  - Kill, injure or take a badger
  - Cruelly ill-treat a badger
  - Interfere with a badger sett
- 3.3.5 Under the Natural Environment and Rural Communities (NERC) Act (2006), all local authorities have a statutory obligation to conserve and enhance biodiversity when exercising their functions, including planning and development decisions. As such, this assessment also considers those priority species listed under Section 41 of the Act.

#### 3.4 Limitations

- 3.4.1 The site survey was undertaken outside of the optimal period of late April to mid-October; therefore, identification of fauna was limited. However, due to the common nature of the habitats present, and the competency of the surveyor, it is believed this limitation is not significant for this site. Therefore, there are no significant limitations affecting the classification or evaluation of the habitats or ecological features present.
- 3.4.2 The information and conclusions contained in this report remain valid for a period of 6 months from the date of the survey, after which the site walkover survey will need to be repeated to check for any change in the habitats and conditions present. Any changes to the development proposals or the red line site boundary may also require the report recommendations to be reviewed and re-assessed.

#### 4.0 SITE SURVEY AND ASSESSMENT

# 4.1 Protected and Priority Species Records (Desk Study)

4.1.1 Consultation data received from ERIC North East revealed no protected or priority species records from the site itself but does show a large number of protected species within 2km of the development site. Where four figure grid references were provided, the location name field was used to filter out any records that were more than 2km away from the site boundary. The closest record of each protected species is shown in Figure 2 below.

Figure 2 - Closest protected species records as provided by ERIC North East.

Species	Grid ref	Approx. distance from site and direction	Additional Comments
Bat (Common pipistrelle)	NZ285297	520m south east	2020
Bat (Myotis sp.)	NZ286311	1km north	2008
Bat (Noctule)	NZ266297	1650m south west	1990
Bat (Unidentified sp.)	NZ292298	1km south east	2008
Water vole	NZ264296	2km south west	2009
Great Crested Newt	NZ267289	1950 south west	2001
Badger			2009
Otter	NZ283287	1500m south	2009
Barn owl	NZ2628	<2km south west	2013
Brambling	NZ2630	<2km west	2013
Kingfisher	NZ2829	<2km south	2012
Red kite	NZ2832	<2km south	2012
Ruff	NZ2832	<2km north	2008

4.1.2 In addition to those species above afforded legal protection, Figure 3 outlines those species recorded by ERIC North East within a 2km radius which are listed in the Natural Environment and Rural Communities (NERC) Act (2006) and/or the local Biodiversity Action Plan.

Figure 3 – Records of NERC and local BAP priority species recorded within 2km search area.

Species	NERC	Local BAP
Blackbird	✓	✓
Black-headed gull	✓	✓
Blue tit	✓	✓
Brown hare	✓	✓
Brown trout		✓
Buff ermine		✓
Carrion crow		✓
Coal tit		✓
Collared dove		✓
Common toad		✓
Coot		✓
European eel		✓
Ghost moth		✓
Herring gull		✓
House martin		✓
House sparrow	✓	✓
Iceland gull	✓	✓
Jack snipe	✓	✓
Jackdaw	✓	✓
Jay	✓	✓
Kestrel	✓	✓
Kingfisher	✓	✓
Lapwing		✓
Lesser black-backed gull		✓
Mallard		✓
Marsh tit		✓
Meadow pipit		✓
Mottled rustic		✓
Nuthatch	✓	✓
Pheasant		✓
Reed bunting	✓	✓
Rook	✓	✓
Rosy rustic	✓	
Rustic	✓	
Shoveler	✓	✓
Skylark		✓
Sparrowhawk		<b>✓</b>
Stock dove		✓

Swallow		✓
Tree sparrow		✓
Tufted duck		✓
West European hedgehog	✓	✓
White ermine	✓	
White letter hairstreak	✓	
Whitethroat	✓	✓
Willow warbler	✓	
Wren	✓	✓
Yellow wagtail		✓
Yellowhammer	<b>√</b>	<b>√</b>

## 4.2 Statutory and Non-Statutory Nature Conservation Sites (Desk Study)

4.2.1 There are no statutory or non-statutory nature conservation sites within the site boundary. Sites within 2km of the proposed development site are provided in Figure 4 below.

Figure 4 - Designated wildlife sites within 2km.

Site	Status *	Approx distance from site and direction
Mill wood	LWS	500m south west
Paddock plantation pond	LWS	1800m south west

- \* LWS Local Wildlife Site
- \* LNR Local Nature Reserve

#### 4.3 Field Walkover Survey

- 4.3.1 The survey site consisted of the Charlie Wayman Fields and the Miners Welfare Ground. These contained a mixture of urban parkland, tennis courts, play areas, grass sports pitches, a multi-use games area (MUGA), tennis, skate park, car park and two buildings. At the northern and western edges of Charlie Wayman were small groups of trees and areas of unmanaged grassland. In total eight habitats were identified using the UK Habs classification system. These are:
  - Developed land sealed surface u1b
  - Building u1b5
  - Built-up areas and gardens u1 (806 urban park)
  - Built-up areas and gardens u1 (847 Introduced shrub)

- Modified grassland g4
- Other neutral grassland g3c
- Other broadleaved woodland w1g
- Native hedgerow h2a.

### 4.3.2 Developed land sealed surface u1b

Hard surfacing is present in the form of tennis courts, play area, footpaths, car parks, a skate park and a MUGA (photographs 1, 2 & 3).

## 4.3.3 Building u1b5 – Charlie Wayman Fields

A single building is present near the south east corner of site (photograph 4). The building had a hipped tiles roof. The ridge tiles and roof tiles were generally in good condition. Small gaps in the pointing around the ridge tiles were present but seemed to be very shallow and not lead into the roof space. The soffits were generally well sealed to the walls with only small numbers of gaps present. An internal inspection was not undertaken.

## 4.3.4 <u>Building u1b5 – Miners Welfare Ground</u>

A single building is present near the centre of the site (photograph 5). The roof has multiple pitches and is covered with tiles and ridge tiles. There were multiple damaged tiles which could be used by bats to access the roof. Other small holes were present at the eaves. An internal inspection was not undertaken.

# 4.3.5 <u>Built-up areas and gardens u1 (806 urban park)</u>

The Miners Welfare Ground is a formal urban park with lawned areas, tennis courts flower beds, shrub beds and a bowling green. Due to this the whole site has been mapped as an urban park with the exception the larger areas of hardstanding (photograph 6)

## 4.3.6 Built-up areas and gardens u1 (847 Introduced shrub)

A small bed of introduced shrub was located near the south west corner of the building on the Charlie Wayman Fields.

### 4.3.7 Modified grassland g4

The vast majority of the Charlie Wayman Fields site was covered with shorth mown grassland used as playing fields (photograph 7). This habitat was species poor and very well-manicured. Along the southern and western boundaries a very narrow strip (approx 1m wide) of less managed grassland was present however this was considered too small to map given the size of the site. Using the statutory biodiversity metric condition assessment sheets, this habitat has been assessed as being in poor condition.

## 4.3.8 Neutral grassland g3c

Patches of rank neutral grassland were present at the north east corner, north west corner and eastern boundary (photographs 8 & 9) of Charlie Wayman Fields. These were dominated by grass species such as cocksfoot, with species such as willowherb, spear thistle and creeping thistle also present. These areas were interspersed with small groups of trees which have been classed at broadleaved woodland. Using the statutory biodiversity metric condition assessment sheets, this habitat has been assessed as being in poor condition.

#### 4.3.9 Other broadleaved woodland w1g

Small groups of native broadleaved trees were present on Charlie Wayman Fields at the north west corner, northern boundary and along parts of the eastern boundary (photographs 9 &10). Species present included cherry, oak, ash and silver birch. The trees are mostly semi-mature and have attained heights of up to 9m with stem diameters up to 40cm measured at 1.5m from ground level. Although small these areas have been mapped as woodland. Using the statutory biodiversity metric condition assessment sheets, this habitat has been assessed as being in poor condition.

# 4.3.10 Native hedgerow h2a

A short section of hawthorn hedgerow was present near the western boundary of Charlie Wayman Fields (photograph 11). This appeared unmanaged and no other wood species were present in the hedge.

#### 4.4 Fauna

- 4.4.1 During the site survey a total of six bird species were seen to utilise the habitats within or immediately adjacent to the site:
  - Greenfinch Chloris chloris a species of Red conservation status,
     meaning they are of the highest conservation concern.
  - Woodpigeon Columba palumbus a species of Amber conservation status meaning they are of medium conservation concern.
  - Common gull *Larus canus* a species of Amber conservation status.
  - Robin Erithacus rubecula a species of Green conservation status, meaning they occur regularly in the UK and are not considered of conservation concern.
  - Blue tit *Cyanistes caeruleus* a species of Green conservation status.
  - Jackdaw *Coloeus monedula* a species of Green conservation status.
  - Blackbird *Turdus merula* a species of Green conservation status.
- 4.4.2 A rabbit (*Oryctolagus cuniculus*) warren was present at the north west corner of Charlie Wayman Fields.

## 4.5 Controlled Invasive Species

4.5.1 No controlled invasive species were noted during the survey.

Photograph 1 – Car park in Charlie Wayman Fields



Photograph 2 – Skate park in Charlie Wayman Fields



Photograph 3 – Tennis courts on the Miners Welfare Ground



Photograph 4 – Building on Charlie Wayman Fields



Photograph 5 – Building on Miners Welfare Ground



Photograph 6 – Urban park landscape on the Miners Welfare Ground



Photograph 7 – Modified grassland covering the vast majority of the Charlie Wayman Fields



Photograph 8 – Neutral grassland and north east corner of the Charlie Wayman Fields



Photograph 9 – Neutral grassland and small group of trees on eastern boundary of Charlie wayman



Photograph 10 – Small woodland at north west corner of Charlie Wayman





Photograph 11 – Shorth section of native hedge on Charlie Wayman

#### 5.0 IMPACT ASSESSMENT

#### 5.1 Statutory and Non-Statutory Nature Conservation Sites

5.1.1 There are two nature conservation sites within 2km of the development site. Both of these are local wildlife sites and lie between 500m and 2km from the site. Given the scale of the proposals, and the distance from the two LWS, we do not predict any measurable impacts on the two LWS.

## **5.2** Priority Habitats

5.2.1 In total, eight types of habitat were recorded during the survey: Developed land sealed surface u1b, Building u1b5, Built-up areas and gardens u1 (847 Introduced shrub), Built-up areas and gardens u1 (806 Urban park), Modified grassland g4, Other neutral grassland g3c, Other broadleaved woodland w1g, Native hedgerow h2a. These are mostly common habitats with little ecological value. The woodland blocks are very small with no recognizable NVC community present. They do not meet the criteria for a priority habitat. The proposals will not impact any priority habitats

# **5.3** Protected and Priority Species

5.3.1 From the results of the site walkover, the scale and urban location of the site, the habitats present both on site and within the locality, the protected species records provided by the local records centre and the known current distribution of species across the UK, it is concluded that the site has only very limited potential for the majority of protected species. The site is largely unsuitable for reptiles as it lacks the mosaic of habitats these species require and is subject to regular pedestrian disturbance. No scarce or threatened invertebrates or larval food plants were observed. There are no ponds present within the site, or within a 500m radius of the redline boundary, and therefore it is considered highly unlikely that Great crested newt *Triturus cristatus* will be present within the immediate local area. The nearest watercourse is located 350m to the south-west, separated from the site by urban development and busy roads, therefore impacts on Otter *Lutra lutra* 

or Water vole *Arvicola amphibius* are considered highly unlikely. There are no buildings or trees containing suitable openings for nesting Barn owl *Tyto alba* and only limited suitable foraging habitat for this species present on site. No Badger *Meles meles* setts or signs of foraging badgers were noted. The site does not contain habitat to support Red squirrel *Sciurus vulgaris*, and it is considered highly likely that this species is now absent from the local area. The site is considered to have a low potential for some protected and priority species, which have been given further consideration below.

### 5.4 Bats Chiroptera spp.

- 5.4.1 Data provided by ERIC North East has not revealed the presence of bats on the Miners Welfare Ground or the Charlie Wayman Fields.
- 5.4.2 The trees within the site boundary were inspected from ground level for potential features suitable of supporting roosting bats, such as cracks, splits (for example where hazard beams occur), cavities, hollows, loose or flaking bark, included bark and knot, rot and woodpecker holes. No potential bat roosting features were identified and therefore under current industry guidance (Collins, 2023), the trees within the site boundaries have been assessed as having a negligible potential to support roosting bats.
- 5.4.3 The building on Charlie Wayman Fields has very few gaps present which would allow access for bats and is considered to be a low risk. However no internal inspection was undertaken.
- 5.4.4 The building on the Miners Welfare Ground has gaps present which would allow access for bats and is considered to be a moderate risk. However no internal inspection was undertaken.
- 5.3.5 The vegetation present within the site boundary is considered to provide poor to moderate quality bat foraging habitat, although much better habitat is present in the surrounding area. The site has very little potential for

foraging bats other than low numbers of common species such as common pipistrelle.

### 5.5 Birds Aves spp.

- 5.5.1 ERIC North East provided no records of rare or threatened birds from within the site boundary but did provide numerous records from the surrounding 2km including species listed under Schedule 1 of the Wildlife and Countryside Act 1981 (as amended), red and amber listed species (JNCC 2009)and many species listed as priority species either under Section 41 of the NERC Act (2006) or within the Durham BAP.
- 5.5.2 During the site survey the following species were recorded on site:
  - Greenfinch Chloris chloris a species of Red conservation status,
     meaning they are of the highest conservation concern.
  - Woodpigeon *Columba palumbus* a species of Amber conservation status meaning they are of medium conservation concern.
  - Common gull *Larus canus* a species of Amber conservation status.
  - Robin Erithacus rubecula a species of Green conservation status, meaning they occur regularly in the UK and are not considered of conservation concern.
  - Blue tit Cyanistes caeruleus a species of Green conservation status.
  - Jackdaw Coloeus monedula a species of Green conservation status.
  - Blackbird *Turdus merula* a species of Green conservation status.
- 5.5.3 Potential nesting habitat on the site is limited to amenity trees, shrub beds, small sections of hedgerow and possibly the area of neutral grassland. However as the site is a functioning recreation ground, with very high levels of disturbance, bird nesting is likely to be confined to low numbers of common species.

## 5.6 Hedgehog Erinaceus europaeus

5.6.1 During the site walkover survey no evidence hedgehog was noted, however ERIC North East provided a number of records for Hedgehog within a 2km radius of the site boundary. The closest record is from 2021, located 235m from the site. The habitats on site do provide shelter for this species and as a result, it is possible that hedgehog move through the site and therefore precautionary working methods must be adopted to prevent the killing or injuring of this species during all phases of the project.

# **5.7** Vegetation Clearance

- 5.7.1 The proposed plans will result in the removal of a small number of trees, urban parkland and areas of modified grassland. Ecologically the impacts of this are considered to be negligible. However the trees to be retained will require suitable protection measures; to be detailed in an Arboricultural Impact Assessment.
- 5.7.2 The removal of vegetation could impact upon low numbers of common bird species, if the work was undertaken during the nesting season. The impacts of this would be minor and confirmed to a site level, however the loss of an active nest would constitute a criminal offence.

#### 6.0 RECOMMENDATIONS

## **6.1** Summary of Predicted Impacts

- 6.1.1 Without mitigation the following impacts are predicted from the proposed works;
  - Potential damage to bats and bat roosts Further works required.
  - Loss of nesting and foraging habitat for an assemblage of locally common bird species.
  - Possible killing or injuring of a NERC Act listed species (Hedgehog).
  - Los of small number of amenity trees.

# **6.2** Recommended Further Survey Work

6.2.1 An internal inspection of the buildings should be carried out to further inform the risk of bat presence. This inspection can be undertaken at any time of the year.

# 6.3 NPPF and Mitigation Hierarchy

- 6.3.1 The National Planning Policy Framework is a statutory planning policy document focussing on land use development and protection. Chapter 15 of the NPPF sets out the national policy for conserving and enhancing the natural environment. Minimising impacts on biodiversity as well as providing net gains in biodiversity are key principles, and planning applications may not be supported if significant harm cannot be avoided, mitigated or compensated for.
- 6.3.2 The mitigation hierarchy is a set of prioritised steps to alleviate environmental harm as far as possible through avoidance and mitigation of detrimental impacts. As a last resort, compensatory measures are proposed where unavoidable residual impacts remain following avoidance and mitigation measures. Avoidance, mitigation, and where necessary, compensation measures for each of the potential impacts outlined below.

#### 6.4 Avoidance

## 6.4.1 Nesting Birds

Any tree felling and shrub removal works must be undertaken outside of the main bird nesting season of March to August inclusive, to avoid the destruction of an active nest. If it is considered necessary to undertake the works during the bird nesting season, the site will require an inspection by a suitably qualified ecologist immediately prior to commencement. **NOTE:** if active nests are found a minimum of a 5m radius exclusion zone will be applied around the nest site and works will not be allowed to proceed in that area. This could impose a significant constraint on the project timetable, and therefore the primary recommendation is that any vegetation clearance is undertaken outside of the main nesting season.

### 6.5 Mitigation

# 6.5.1 <u>Hedgehog</u>

To prevent killing injuring of hedgehogs it is recommended that the works are undertaken in the following manner:

- Any vegetated areas to be cleared will be checked for the presence of Hedgehog before work commences.
- Any excavations left open overnight will incorporate a ramp (e.g. scaffolding board) of no less than 220mm in width and inserted at an angle of no greater than 45°, to allow any animals which fall in to climb out
- If any Hedgehog are found within the work area at any time, gloves will be used to carefully move the individual(s) to the woodland in the south of the wider school site which is to remain unaffected by the demolition

## 6.6 Compensation

## 6.6.1 <u>Vegetation removal</u>

The landscaping plan for the site will include the proposed new habitats;

- 25 Individual trees
- The creation of 1300m2 of neutral grassland

This will compensate for tree loss and also feed into the BNG calculations for the site. The trees will be planted over the neutral grassland habitat and will consists of species with a small ultimate size so as to maintain the grassland habitat and not form a woodland. Suitable species include: Rowan, Silver birch, Downy birch, Hazel and Holly.

#### 6.7 Enhancement

- 6.7.1 To enhance the site for biodiversity the following are recommendations are made;
  - Four tree mounted bat boxes, such as the 2F Schwegler (<a href="https://www.nhbs.com/2f-schwegler-bat-box-general-purpose">https://www.nhbs.com/2f-schwegler-bat-box-general-purpose</a>), or similar, can be installed in suitable locations throughout the site. The boxes should be positioned at a height of between 3m to 6m, in an open sunny location, with clear flight lines to the entrance.
  - Eight tree mounted bird boxes can be installed in suitable locations within the site, with each box containing a different sized entrance hole, with the addition of one open fronted box, to attract a range of bird species. Suitable boxes include, but are not restricted to, the Schwegler 3s Starling nest box (<a href="https://www.nhbs.com/3s-schwegler-starling-nest-box">https://www.nhbs.com/3s-schwegler-starling-nest-box</a>), the Schwegler 2M 26mm & 32mm (<a href="https://www.nhbs.com/2m-schwegler-nest-box">https://www.nhbs.com/2m-schwegler-nest-box</a>) and the Vivara Pro Barcelona (<a href="https://www.nhbs.com/vivara-pro-barcelona-woodstone-open-nest-box">https://www.nhbs.com/2m-schwegler-nest-box</a>).

#### 7.0 BIODIVERSITY NET GAIN

## 7.1 Biodiversity Net Gain Calculation

- 7.1.1 In order to meet the requirements of the NPPF, all development projects should seek an overall net gain in biodiversity. The habitats present within the site boundary have been assessed using the DEFRA Statutory Biodiversity Metric calculation tool (February 2024). The metric provides a method of measuring and accounting for biodiversity losses and gains resulting from development or land management changes.
- 7.1.2 The current on-site biodiversity baseline shows a result of 11.96 habitat units.

  Initial calculations of the first site layout resulted in a net loss and the site has been redesigned in order to produce a 10% Net Gain for Biodiversity.
- 7.1.3 The proposals will now include 1300m2 of neutral grassland down the western boundary of the Charlie wayman Fields and the planting of 25 native trees over the grassland as stated in paragraph 6.6.1 above.
- 7.1.4 In addition to the new planting, the existing small areas of woodland and neutral grassland on the Charlie wayman fields will be managed in order to raise their condition from poor to moderate. This will be achieved by:
  - Annual cutting and clearing of the arisings to reduce nutrient levels in the soil.
  - Seeding areas of the neutral grassland where the species diversity is low.
  - Creating standing deadwood in the woodland blocks
  - Planting native shrub species in the woodland blocks
- 7.1.5 The BNG calculations show that with the creation of the new neutral grassland, the planting of 25 native trees and the management of the existing areas on the site; the final BNG calculation scores an increase of 1.44 units, which provides a 12.04 Net Gain. A detailed 30-year habitat management and monitoring plan will be required as a condition of planning.

#### 8.0 REFERENCES

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Viewed 18th February 2024

# **APPENDIX 1 – SPECIES LIST**

Common Name	Biological name
Norway maple	Acer platanoides
Sycamore	Acer pseudoplatanus
Horse chestnut	Aesculus hippocastanum
Alder	Alnus glutinosa
Cow Parsley	Anthriscus sylvestris
Monkey puzzle	Araucaria araucana
Daisy	Bellis perennis
Silver birch	Betula pendula
Sweet chestnut	Castanea sativa
Deodar cedar	Cedrus deodara
Creeping thistle	Cirsium arvense
Spear thistle	Cirsium vulgare
Hazel	Corylus avellana
Hawthorn	Crataegus monogyna
Cypress	Chamaecyparis sp.
Cocksfoot	Dactylus glomerata
Tufted hair grass	Deschampsia caespitosa
Teasel	Dipsacus fullonum
Willowherb	Epilobium sp.
Ash	Fraxinus excelsior
Cleavers	Galium aparine
Rush	Juncus sp.
Privet	Ligustrum ovalifolium
Scots pine	Pinus sylvestris
Ribwort plantain	Plantago lanceolata
Poplar	Populus sp.
Wild cherry	Prunus avium
Laurel	Prunus laurocerasus
Blackthorn	Prunus spinosa
Oak	Quercus robur
Creeping buttercup	Ranunculus repens
Rhododendron	Rhododendron
Rose	Rosa sp.
Bramble	Rubus fruticosus
Broad-leaved dock	Rumex obtusifolius
Elder	Sambucus nigra
Goat willow	Salix caprea
Ragwort	Senecio jacobaea
Rowan	Sorbus aucuparia
Swedish whitebeam	Sorbus intermedia
Dandelion	Taraxacum officinale
Common lime	Tilia x europaea
Elm	Ulmus sp.
	ı

Stinging nettle	Urtica dioica	
Vetch	Vicia sp.	
BIRDS		
Greenfinch	Carduelis chloris	
Woodpigeon	Columba palumbus	
Jackdaw	Corvus monedula	
Blue tit	Cyanistes caeruleus	
Robin	Erithacus rubecula	
Common gull	Larus canus	
Blackbird	Turdus merula	





00	Condition Sheet: GRASSLAND Habitat Type (low distinctiveness)					
UK	UK Habitat Classification (UKHab) Habitat Type					
Gra	assland - Modified grassland					
	-site or off-site, site name and ation	Charlie Wayman Fields	Survey date and Surveyor name	Barry Anderson 22/02/2024		
Lin	nitations (if applicable)	Winter survey	Survey reference (if relating to a wider survey)	FSL_ MWG&CWF_EcIA1.1		
Gri	d reference	NZ 2837 3014	Habitat parcel reference			
Hal	bitat Description					
	ying fields - Short mown amenity	grassland				
<u>uk</u> h	nab – UK Habitat Classification					
Co	ndition Assessment Criteria		Criterion passed (Yes or No)	Notes (such as justification)		
	include those listed in Footnote 1 Good condition.	cies per m <sup>2</sup> present, including at least 2 forbs (these may ). <b>Note - this criterion is essential for achieving Moderate or</b> present are characteristic of medium, high or very high	N			
	distinctiveness grassland, or ther (excluding those listed in Footnot whether the grassland should ins	e are 9 or more of these characteristic species per m <sup>2</sup> e 1), please review the full UKHab description to assess tead be classified as a higher distinctiveness grassland. Where n, high, or very high distinctiveness, please use the relevant				
		0% of the sward is less than 7 cm and at least 20% is more s which provide opportunities for vertebrates and invertebrates	N			
	such as bramble Rubus fruticosu  Note - patches of scrub with cont	ess than 20% of the total grassland area. (Some scattered scrub s agg. may be present).	Y			
	relevant scrub habitat type.		Y			
D	damage include excessive poach	s than 5% of total grassland area. Examples of physical ing, damage from machinery use or storage, erosion caused by damaging management activities.				
E	Cover of bare ground is between concentration of rabbit warrens) <sup>2</sup> .	1% and 10%, including localised areas (for example, a	Y			
F	Cover of bracken <i>Pteridium aquili</i>	inum is less than 20%.	Y			
G There is an absence of invasive non-native plant species <sup>3</sup> (as listed on Schedule 9 of WCA <sup>4</sup> ).						
		Essential criter	ion achieved (Yes or No)			
		N	umber of criteria passed			
	ndition Assessment Result at of 7 criteria)	Condition Assessment Score	Score Achieved ×/√			

Passes 6 or 7 criteria including passing essential criterion A	Good (3)		
Passes 4 or 5 criteria including passing essential criterion A	Moderate (2)		
Passes 3 or fewer criteria; OR Passes 4 - 6 criteria (excluding criterion A)	Poor (1)	5	

Suggested enhancement interventions to improve condition score

#### Footnotes

Footnote 1 – Creeping thistle Cirsium arvense, spear thistle Cirsium vulgare, curled dock Rumex crispus, broad-leaved dock Rumex obtusifolius, common nettle Urtica dioica, creeping buttercup Ranunculus repens, greater plantain Plantago major, white clover Trifolium repens and cow parsley Anthriscus sylvestris.

Footnote 2 – For example, this could include small, scattered areas of bare ground allowing establishment of new species, or localised patches where not exceeding 10% cover.

Footnote 3 – Assess this for each distinct habitat parcel. If the distribution of invasive non-native species varies across the habitat, split into parcels accordingly, applying a buffer zone around the invasive non-native species with a size relative to its risk of spread into adjacent habitat, using professional judgement.

Footnote 4 – Wildlife and Countryside Act 1981 (as amended).

# Condition Sheet: GRASSLAND Habitat Type (medium, high and very high distinctiveness) UK Habitat Classification (UKHab) Habitat Types Grassland - Lowland calcareous grassland Grassland - Lowland dry acid grassland Grassland - Lowland meadows Grassland - Other lowland acid grassland Grassland - Other neutral grassland Grassland - Tall herb communities (H6430) [Not to be confused with the Tall forbs secondary code - see UKHab guidance for details.] Grassland - Upland acid grassland Grassland - Upland calcareous grassland Grassland - Upland hav meadows Sparsely vegetated land - Calaminarian grassland Charlie Wayman Fields Barry Anderson 22/02/2024 On-site or off-site, site name and Survey date and location Surveyor name Winter survey Survey reference Limitations (if applicable) (if relating to a FSL\_ MWG&CWF\_EcIA1.1 wider survey) NZ 2837 3014 Habitat parcel Grid reference reference Habitat Description Tussocky neutral grassland around the park edges ukhab - UK Habitat Classification Criterion passed **Condition Assessment Criteria** Notes (such as justification) (Yes or No) Ν The parcel represents a good example of its habitat type, with a consistently high proportion of characteristic indicator species present relevant to the specific habitat type (and relative to Footnote 3 suboptimal species which may be listed in the UKHab description).1 Note - this criterion is essential for achieving Moderate or Good condition for nonacid grassland types only. Ν Sward height is varied (at least 20% of the sward is less than 7 cm and at least 20% is В more than 7 cm) creating microclimates which provide opportunities for insects, birds and small mammals to live and breed. Cover of bare ground is between 1% and 5%, including localised areas, for example, С rabbit warrens<sup>2</sup>.

Cover of bracken Pteridium aguilinum is less than 20% and cover of scrub (including

bramble Rubus fruticosus agg.) is less than 5%.

D

Ш	(such as excessive poaching, da access, or any other damaging r area.	cative of suboptimal condition <sup>3</sup> and physical damage amage from machinery use or storage, damaging levels of management activities) accounts for less than 5% of total species <sup>4</sup> (as listed on Schedule 9 of WCA <sup>5</sup> ) are present, ed.	Y	
Ad	ditional Criterion - must be ass	sessed for all non-acid grassland types		
F	There are 10 or more vascular p characteristic of the habitat type contribute towards this count).	plant species per m <sup>2</sup> present, including forbs that are (species referenced in Footnote 3 and 5 cannot all for achieving Good condition for non-acid	Y	
	Essential criterior	for Good condition achieved (for non-acid grassland) (Yes or No)	N	
		Number of criteria passed	4	
Со	ndition Assessment Resu <b>l</b> t	Condition Assessment Score	Score Achieved ×/√	
Ac	id grassland types (Result out	of 5 criteria)		
Pa	sses 5 criteria	Good (3)		
Pa	sses 3 or 4 criteria	Moderate (2)		
Pa	sses 2 or fewer criteria	Poor (1)		
No	n-acid grassland types (Result	out of 6 criteria)		
ess	sses 5 or 6 criteria, including sential criterion A and additional erion F.	Good (3)		
	sses 3 - 5 criteria, including sential criterion A.	Moderate (2)		
OR Pa	sses 2 or fewer criteria; c sses 3 or 4 criteria excluding erion A and F.	Poor (1)	4	
Su	ggested enhancement interver	ntions to improve condition score		

#### Notes

Footnote 1 - Professional judgement should be used alongside the UKHab description.

**Footnote 2** – For example, this could include small, scattered areas of bare ground allowing for plant colonisation, or localised patches not exceeding 5% cover.

**Footnote 3** - Species indicative of suboptimal condition for this habitat type include: creeping thistle *Cirsium arvense*, spear thistle *Cirsium vulgare*, curled dock *Rumex crispus*, broad-leaved dock *Rumex obtusifolius*, common nettle *Urtica dioica*, creeping buttercup *Ranunculus repens*, greater plantain *Plantago major*, white clover *Trifolium repens* and cow parsley *Anthriscus sylvestris*. There may be additional relevant species local to the region and or site.

Footnote 4 – Assess this for each distinct habitat parcel. If the distribution of invasive non-native species varies across the habitat, split into parcels accordingly, applying a buffer zone around the invasive non-native species with a size relative to its risk of spread into adjacent habitat, by applying professional judgement.

Footnote 5 – Wildlife and Countryside Act 1981 (as amended).

Condition Sheet: WOODLAND Habitat Type

UK Habitat Classification (UKHab) Habitat Types

Woodland and forest - Lowland beech and yew woodland

Woodland and forest - Lowland mixed deciduous woodland

Woodland and forest - Native pine woodlands

Woodland and forest - Other coniferous woodland

Woodland and forest - Other Scot's pine woodland

Woodland and forest - Other woodland; broadleaved

Woodland and forest - Other woodland; mixed

Woodland and forest - Upland birchwoods

Woodland and forest - Upland mixed ashwoods

Woodland and forest - Upland oakwood

Woodland and forest - Wet woodland

## Habitat Description

ukhab – UK Habitat Classification					
This condition sheet is based on the England Woodland Biodiversity Group (EWBG) Woodland Condition Survey Method, available here:			available here:		
	Woodland Wildlife Toolkit (sylva.org.uk)				

IMPORTANT: This biodiversity metric woodland condition assessment must be used to assess woodland being input into the biodiversity metric. The outputs of this condition assessment are not equivalent to, nor are they comparable with the scores from the EWBG condition assessment, because the EWBG assessment has been adapted for the biodiversity metric, including the removal of EWBG Indicator 7 (Proportion of favourable land cover around woodland) and Indicator 14 (Size of woodland), and minor changes to other indicators.

On-site or off-site, site name and location		Survey date and Surveyor name	Barry Anderson 22/02/2024
Limitations (if applicable)		Survey reference (if relating to a wider survey)	FSL_ MWG&CWF_EcIA1.1
Grid reference	NZ 2837 3014	Habitat parcel reference	

# **Condition Assessment Criteria**

Indicator		licator	Good (3 points)	Moderate (2 points)	Poor (1 point)		Notes (such as
	A	Age distribution of trees	Three age-classes <sup>1</sup> present.	Two age-classes <sup>1</sup> present.	One age-class <sup>1</sup> present.	indicator 1	justification)
I	В	,	No significant browsing damage evident in woodland <sup>2</sup> .	Evidence of significant browsing pressure is present in less than 40% of whole woodland <sup>2</sup> .	Evidence of significant browsing pressure is present in 40% or more of whole woodland <sup>2</sup> .	3	
	С		No invasive species <sup>3</sup> present in woodland.	Rhododendron Rhododendron ponticum or cherry laurel Prunus laurocerasus not present, and other invasive species <sup>3</sup> <10% cover.	Rhododendron or cherry laurel present, or other invasive species <sup>3</sup> ≥10% cover.	3	
I	D	Number of native tree species	Five or more native tree or shrub species <sup>4</sup> found across woodland parcel.	Three to four native tree or shrub species <sup>4</sup> found across woodland parcel.		2	

E	Cover of native tree	>80% of canopy trees and >80% of understory shrubs are native <sup>5</sup> .	50 - 80% of canopy trees and 50 - 80% of understory shrubs are native <sup>5</sup> .	<50% of canopy trees and <50% of understory shrubs are native <sup>5</sup> .	3			
F	woodland	10 - 20% of woodland has areas of temporary open space <sup>6</sup> . Unless woodland is <10ha, in which case 0 - 20% temporary open space is permitted <sup>7</sup> .	21 - 40% of woodland has areas of temporary open space <sup>6</sup> .	<10% or >40% of woodland has areas of temporary open space <sup>6</sup> . But if woodland <10ha has <10% temporary open space, please see Good category <sup>7</sup> .	1			
G		All three classes present in woodland <sup>8</sup> ; trees 4 - 7 cm Diameter at Breast Height (DBH), saplings and seedlings or advanced coppice regrowth.	One or two classes only present in woodland <sup>8</sup> .	No classes or coppice regrowth present in woodland <sup>8</sup> .	1			
н		Tree mortality 10% or less, no pests or diseases and no crown dieback <sup>9</sup> .	11% to 25% tree mortality and or crown dieback or low-risk pest or disease present <sup>9</sup> .	Greater than 25% tree mortality and or any high-risk pest or disease present <sup>9</sup> .	3			
I	Vegetation and ground	Recognisable NVC plant community <sup>10</sup> at ground layer present, strongly characterised by ancient woodland flora specialists.	Recognisable woodland NVC plant community <sup>10</sup> at ground layer present.	No recognisable woodland NVC plant community <sup>10</sup> at ground layer present.	1			
J	ctructuro	Three or more storeys across all survey plots, or a complex woodland <sup>11</sup> .	Two storeys across all survey plots <sup>11</sup> .	One or less storey across all survey plots <sup>11</sup> .	1			
K	Veteran trees	Two or more veteran trees <sup>12</sup> per hectare.	One veteran tree <sup>12</sup> per hectare.	No veteran trees <sup>12</sup> present in woodland.	1			
L	Amount of deadwood	50% of all survey plots within the woodland parcel have deadwood, such as standing and fallen deadwood, large dead branches and or stems, branch stubs and stumps, or an abundance of small cavities <sup>13</sup> .	as standing and fallen deadwood, large dead	Less than 25% of all survey plots within the woodland parcel have deadwood, such as standing and fallen deadwood, large dead branches and or stems, stubs and stumps, or an abundance of small cavities <sup>13</sup> .	1			
М	Woodland disturbance	No nutrient enrichment or damaged ground evident <sup>14</sup> .	Less than 1 hectare in total of nutrient enrichment across woodland area, and or less than 20% of woodland area has damaged ground <sup>14</sup> .	1 hectare or more of nutrient enrichment, and or 20% or more of woodland area has damaged ground <sup>14</sup> .	3			
			Total Scor	e (out of a possible 39)				
Со	ndition Assessment Res	sult		Condition Assessment	Score	Result Achieved		
Tot	Total score >32 (33 to 39) Good (3) 24							
	Total score 26 to 32 Moderate (2)							
	Total score <26 (13 to 25) Poor (1)							
Su	ggested enhancement ir	nterventions to improve con	idition score					