



# **Biodiversity Loss/Gain Outline Mitigation Strategy**

## **Land North of Railway Line Rhoose Point Rhoose Vale of Glamorgan**

On Behalf of Persimmon Homes East  
Wales

May 2022

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Drawing TQ/pers:Rhoose Retained and Enhanced Habitats V1

## 1 Introduction

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### 1.1 General

TerrAqua Ecological Services have been commissioned by Persimmon Homes East Wales to produce an outline Biodiversity Loss/Gain Strategy for the proposed development North of the Railway Line, Rhoose Point, Rhoose, Vale of Glamorgan.

### 1.2 Client Details

The following outline Biodiversity Mitigation Strategy has been Plan developed for the Rhoose Development for Persimmon Homes East Wales, Persimmon House, Llantrisant Business Park, Llantrisant, Rhondda Cynon Taf, CF7 8YP.

### 1.3 Site Description

**Site Name:** Rhoose Point (North of Railway)

**Authority:** Vale of Glamorgan

**Development Description:** Residential Development (Persimmon Homes)

## 2 Background

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### 2.1 Planning Background

The site has been subject to a number of ecological assessments and surveys across a number of years. An extended Phase 1 habitat survey plus protected species surveys of the site were undertaken in 2004-05 and furthermore detailed surveys completed in 2007 (Capita Symonds).

An Environmental statement was produced by WYG for the extended Rhoose point site, a proportion of which has since been developed, and presented as part of a planning application on behalf of Persimmon and Belway Homes. in 2008:

Environmental Statement Volume 1: Main Text Land to the North of the Railway Line, Rhoose, Vale of Glamorgan The National Assembly for Wales Bellway plc Persimmon Homes (Wales) Ltd 2008



**Table 1** Surveys completed between 2004-2005 (Capita Symonds)

<b>Survey</b>	<b>Reasoning</b>	<b>Date</b>
<b>Extended Phase I</b>	Baseline Survey	2004
<b>Hedgerow</b>	Require assessment under hedgerow regulations 1997	2004
<b>Badger</b>	Suitable habitat – Phase I survey. Additional survey recommended by Capita Symonds and Biodiversity Officer, Vale of Glamorgan Council due to timing of initial work	2004-2005
<b>Bats</b>	Suitable habitats identified in Phase I	2004
<b>Birds</b>	Recommended by Biodiversity Officer, Vale of Glamorgan Council. Suitable habitat identified in Phase I survey	2005
<b>Dormouse</b>	Suitable habitat identified in Phase I survey and sub-optimal timing of initial survey. Additional surveys recommended by Biodiversity Officer, Vale of Glamorgan Council	2004-2005
<b>Invertebrates</b>	Suitable habitat identified in Phase I survey. Survey recommended by Biodiversity Officer, Vale of Glamorgan Council	2005
<b>Reptiles</b>	Slow worm recorded in Phase I survey	2005

**Table 2** Surveys completed in 2007 (Capita Symonds)

<b>Survey</b>	<b>Reasoning</b>	<b>Date</b>
<b>Hedgerow</b>	Previous survey highlighted some important hedgerows.	2007
<b>Badger</b>	Previous survey identified signs of activity.	2007
<b>Bats</b>	Suitable habitat identified and foraging activity previously recorded	2007
<b>Birds</b>	Red list species previously identified within survey area.	2007
<b>Dormouse</b>	Suitable habitat previously identified, previous survey hampered by tubes being lost and/or removed. Update requested by Biodiversity Officer, Vale of Glamorgan Council	2007
<b>Reptiles</b>	Previous survey reptiles recorded. Update requested by Biodiversity Officer, Vale of Glamorgan Council	2007

A full preliminary Ecological Assessment and species-specific survey have been undertaken during 2022: Survey completed include:

Preliminary Ecological Assessment (TerrAqua Ecological Services 2022)

Badger Survey (TerrAqua Ecological Services 2022)

Reptile Survey (TerrAqua Ecological Services 2022)

Hedgerow Regulations 1997 Survey (TerrAqua Ecological Services 2022)

Further survey work including that for Dormouse and Bat Activity are ongoing and will be completed during summer 2022.

## 2.2 Scope of Biodiversity Enhancements Plan Report

This report covers all phases of the development: a Persimmon Homes Development.

*\* The following is based on the supplied site layout (May 2022). Changes to future layout may require amendments to the Biodiversity strategy.*

## 3 Retained Ecological Features/Habitats

**Table 2** Showing Extent of Habitats Present (Ha) and areas to be lost

Habitat	Phase I Nomenclature	Area Ha (approx.)	Areas to be Lost or Translocated	Created Habitats
Arable	J1	3.6	3.6	
Semi Improved Grassland	B6	8.4	7.97	
Unimproved Grassland	B2	0.3		
Scrub	A2	0.8	0.55	
Hedgerows (Species Poor) Hedgerows (Species Rich)	J2.1.2 J2.1.1	501m 990m	820m (to be translocated)	
Tall Herb	C1	0.22	0.11	
Orchard				0.23Ha
Infilled Hedgerow following Translocation				381m
Species Rich Grassland				1.35Ha
Ecological Buffer Planting				0.5Ha

### 3.1 Retained Habitats

#### Hedgerows (Track boundary Hedges)

All hedgerows forming the boundary of the site will be retained. These include the species rich hedgerows bordering the public footpath/track running north-south on the western side of the site. These hedgerows have been identified as “Important” under the hedgerow regulations and represent the best quality hedgerows within/bordering the site. The hedgerows provide potential foraging and commuting routes for a range of species around the site and provide excellent links with the wider countryside including adjacent areas of scrub associated with the railway corridor.

These hedgerows are considered to be the most valuable habitat within the site and therefore their retention will successfully ensure that potential foraging and commuting routes for species such as bats and small mammals is retained through the site post development.

## **Scrub**

Areas of scrub, tall herb and pockets of unimproved grassland will also be retained within the footprint of the current track. These retained areas will provide potential opportunities for small mammals, feeding areas invertebrates such as bees and butterflies and combined with the retained hedgerows nesting and feeding areas for birds. Areas of scrub bordering the existing gardens at the north eastern side of the site will also be retained ensuring opportunities for nesting birds and potential foraging and commuting routes for bats are retained at the northern side of the site.

## **4 Habitats to be Lost**

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### **Semi Improved Grassland**

The development will lead to the loss of almost all semi-improved grassland with the exception of small areas adjacent to the development. These grasslands do not represent grassland swards of high conservation value and all have been the subject of agricultural improvement.

### **Arable**

All arable areas will be lost as a result of the development. These areas have been assessed as having a low ecological value. No species rich field margins occur within the arable areas and therefore no areas of high conservation value exist within these areas.

## Mature Trees

A small number of semi mature trees located within the species poor hedgerows will be lost as a result of the development. These include a number of dead specimens located within hedgerow H9. None of the trees to be lost have features suitable for roosting bats.

## 5 Biodiversity Loss Mitigation

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All hedgerows within the main body of the site, predominantly species poor, will be translocated to areas along the southern boundary of the site as shown in Drawing TQ/pers:Rhoose Retained and Enhanced Habitats V1. This will ensure that the overall total loss of hedgerows is negligible and provide a reinforced ecological buffer along the boundary with the existing railway corridor. The translocated material will be reinforced with infill planting of hedgerow species native to the Vale of Glamorgan, thereby creating a species rich hedgerow. Species to be planted will include:

Hazel (*Corylus avellana*) 25%

Hawthorn (*Crataegus monogyna*) 25%

Holly (*Ilex aquifolium*) 10%

Blackthorn (*Prunus spinosa*) 10%

Elder (*Sambucus nigra*) 5%

Field Maple (*Acer campestre*) 15%

Dog Rose (*Rosa canina*) 10%

The infill will be double staggered with plants set at 300mm apart and at 450mm centres and will be protected by plastic guards attached to wooden posts to ensure protection from rabbits and rodents.

All plants used will be of local provenance and conform to BS 3936:1992

### 5.1 Community Orchard

Orchards are recognised as providing excellent habitats for a very wide range of species. Traditional orchards have become increasingly rare and recognised as being priority habitats

for the enhancement and protection of biodiversity. Proposals for the development of the site include the creation of new community orchard. The orchard will be located at the north eastern corner of the site as shown in Drawing TQ/pers:Rhoose Retained and Enhanced Habitats V1 This new orchard will provide a combination of fruit trees and grassland flora significantly increasing the ecological value of an area currently dominated by semi improved agricultural grassland.

The creation of the orchard will include the planting of both standard trees and young saplings. This will encourage rapid structural diversity providing niche habitats for invertebrate and other species. In addition, the species selected will represent those of both mid and late fruiting varieties affording a food source for wildlife over an extended period.

The precise species list will be produced during the detailed orchard design and layout but will include varieties known to have been traditionally used within in Wales. The following provides an indicative list of potential varieties to be planted:

Apples:

Champagne Apple

Bakers Delicious

Broom Apple

Channel Beauty

Cox;s Pippin

Pear:

Berllanderi Green

Early St Brides

Gwehelog Green

Plums:

Denbigh

Cox;s Express

Victoria

Damson:

## Abergwyngregyn

In addition to the benefits of fruit trees the orchard will be managed to enhance and maximise the diversity of ground and field layers beneath the trees. The areas beneath the trees will be seeded with an appropriate grassland mix with species tolerant of shade/partial shade. Mixes considered suitable include Emersgate EH1, EM10 and EG9 among others. The final selection will be made following the assessment of ground conditions etc.

Following seeding the sward will be managed to retain structural diversity with rotational mowing ensuring the retention of both short and long swards. No mowing will take place until after the main flowering season.

### 5.2 Wildflower Meadow Grassland

A new area of wildflower grassland will be created around the margins of the development as shown in Drawing TQ/pers:Rhoose Retained and Enhanced Habitats V1. The grassland will be created using a seed mix suitable typical of a meadow grassland. The proposed grassland will be created using Emersgate EM1 1 seed mix. This mix contains a diversity of species commonly found in meadow grasslands and includes grass species common bent, crested dogs tail, red fescue, and smaller cats tail. Wildflower species includes common knapweed (*Centaurea nigra*), self-heal (*Prunella vulgaris*), meadow buttercup (*Ranunculus acris*), common sorrel (*Rumex acetosa*), red campion (*Silene dioica*), wild carrot (*Daucus carota*), salad burnet (*Sanguisorba nigra*) and oxeye daisy among others. The mix also includes a range of grass species. The seed will be sown at a rate of 4g per m<sup>2</sup>.

This newly created grassland will afford new opportunities for a wide range of invertebrate species including butterflies.

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### 5.3 Ecological Enhancements Bat and Bird Boxes

In addition to the above habitat creation the biodiversity of the site will be further enhanced by the inclusion within the residential properties of bat and bird boxes. Details of the proposed box types and plot locations will be finalised on completion of the site layout. It is envisaged that at least 20% of all properties will contain a bat or bird box according to plot locations.

## Summary

Any conclusions presented in this report relating to the impact of the development on ecological receptors is subject to the results of the ongoing bat activity and dormouse surveys which will be concluded in July and October 2022 respectively.

Given the above limitation and that the details of the layout provided for this Report are provisional, we can conclude that with the implementation of the ecological enhancements referenced herein and the implementation of appropriate management of the enhancements proposed, the site's development has the Potential to provide a Net Biodiversity gain. It should be noted that this interpretation is subject to change subject to the outcome of survey work and any changes to the site layout.

## **Appendix I**

### **Drawing TQ/pers:Rhoose Retained and Enhanced Habitats V1**



# TerrAqua Ecological Services Ltd

Land off Pentir y De, Rhooose  
for Persimmon East Wales

## Biodiversity Retention & Enhancement Plan

SCALE :  
1 : 1500 @ A2

DATE :  
5/9/2022

### MAP FILENAME :

TQ/Pers: Rhooose Retained & Enhanced Habitat v1



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### Legend

- Species rich grassland planting
- Orchard with ecological ground layer
- Ecological Buffer
- Translocated Hedgerow
- Retained Hedgerow and Associated Scrub

