

LAND AT MULSFORD FARM

**GREAT CRESTED NEWT
COMPENSATION AREA
BIOSECURITY RISK ASSESSMENT**

**PLANNING REF P/2017/0799
APP/H6955/A/18/3208119**

DISCHARGE OF CONDITION 6

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LAND AT MULSFORD

GREAT CRESTED NEWTS COMPENSATION AREA (Sections 1 and 2) BIOSECURITY RISK ASSESSMENT (Section 3)

Condition 6 of the planning consent specifies:

No part of the development shall commence until the following have been submitted to and approved in writing by the Local Planning Authority:

1. A detailed plan of the compensation area shown in Appendix 2 of the Churton Ecology Addendum (relating to GCN) to the EIA dated February 2 2018, to include full details of all boundary treatments;
2. An Ecological Method Statement in respect of the works to be carried out to establish the compensation area referred to above, to include a timetable for implementation of those works;
3. A biosecurity risk assessment

1 COMPENSATION AREA

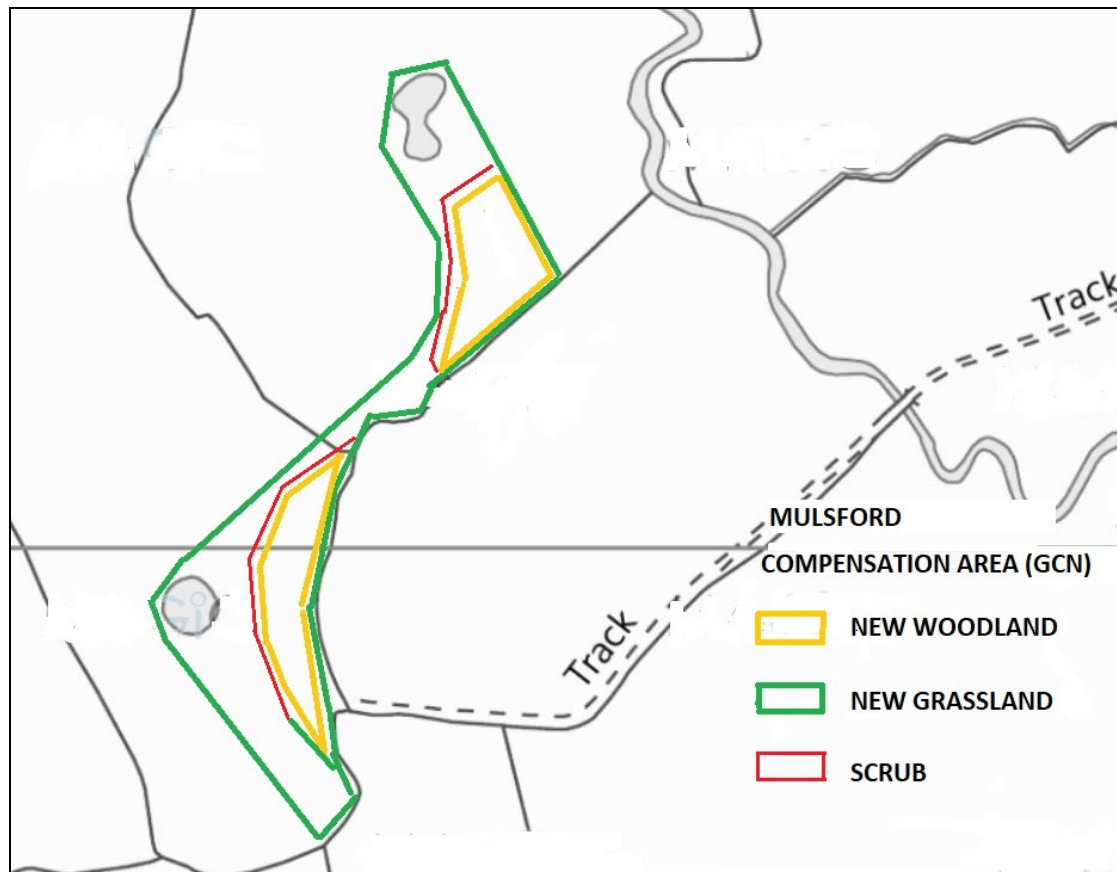
A compensation area of 1.5 ha has been proposed which, as requested by NRW, equates to the size of the construction area. This aims to offset the loss of terrestrial habitat (currently arable), being an area of better-quality habitat constructed to the west of the site (see Figure 1 below). This compensation area will comprise woodland, scrub and grassland, and will encompass the two GCN breeding ponds. In addition, two hibernacula will be constructed, one close to each pond. The ponds will be protected by buffer zones from future disturbance from grazing animals or ground cultivation near their margins.

Construction of compensation area

The boundary of the area compensation area, and woodland area within it (see Figure 1), has been plotted using grid references which allows accurate plotting of the area and provides a permanent record of its extent. The total area is approximately 1.5 ha and will allow a buffer zone around each pool of at least 15 metres.

The boundary of the compensation area will be fenced with a secure, gated access.

Figure 1



2 METHOD STATEMENT

Woodland area

This will measure approximately 0.5ha and will use native broadleaved trees of local provenance, as follows:

Quercus robur	Pedunculate oak	25%
Quercus petraea	Sessile oak	10%
Betula pubescens	Downy birch	20%
Alnus glutinosa	Alder	20%
Acer campestre	Field maple	10%
Sorbus aucuparia	Rowan	10%
Malus sylvestris	Crabapple	5%

Trees will be planted at 2 metre centres and will be protected against rabbits using spiral guards supported by bamboo canes. Trees will be maintained

weed free for 3 years until established and any losses replaced. Weed free conditions will be achieved through use of bio-degradable mats.

The woodland will be planted in the first available season after construction, namely autumn 2019.

Grassland area

The grassland area will measure approximately 1.0 ha and will be established between the pools and the new woodland. Species will be chosen to create a tussocky grassland and include cocksfoot (*Dactylis glomerata*), Timothy (*Phleum pratense*) and Tall fescue (*Schedonurus arundicaeus*). Grassland will be established by standard cultivations and sown by seed drill, followed by rolling to firm seed bed.

Management will be annual topping except in a 5 metre strip along the woodland edge will be left to develop into a scrub habitat measuring ultimately approximately 0.15ha. This will be maintained at a maximum height of approximately 2 metres to form a graded edge between the grassland and the woodland.

The grassland will be sown in the first available season after construction, namely autumn 2019.

Timetable

EPS LICENCE	Expected approval May 2019	
GCN TRAPPING AND EXCLSION	May/June 2019	
CONSTRUCTION	July 2019 onwards	
GRASSLAND ESTABLISHMENT	September 2019	
WOODLAND ESTABLISHMENT	November 2019	
GRASSLAND MAINTENANCE	Annual topping in late summer	In perpetuity
WOODLAND MAINTENANCE	Mulch mats	3 years

3 BIOSECURITY RISK ASSESSMENT

MULSFORD POULTRY FARM			
BIOSECURITY PROTOCOL FEBRUARY 2019			
Species	Potential contamination route	Likelihood of risk	Operational Procedures/Actions required to minimise risks
Himalayan balsam	Introduction of species via construction machinery Introduction of seeds via contaminated soil.	Low. Himalayan Balsam is not known to be present on site or in the locality Low. There are no requirements to import soil.	Ensure owner and contractors know what Himalayan Balsam looks like. If any plants are identified these should be pulled up and left to dry before the seeds set (July/August).
Japanese knotweed	Introduction of species via construction machinery Introduction of fragments via contaminated soil.	Low. Japanese knotweed is not known to be present on site or in the locality Low. There are no requirements to import soil.	Ensure contractors know what Japanese knotweed looks like. If it is identified on site, refer to the Environment Agency's Japanese knotweed Code of Practice.
Invasive aquatic plants: Water fern, <i>Azolla filiculoides</i> Parrot's-feather, <i>Myriophyllum aquaticum</i>	Introduction of species via construction machinery and	Medium. Surveyors (and to a lesser extent, contractors) may well have previously been to sites where these species are present	Avoid entering ponds whenever possible. Consider using survey techniques that constitute a lower bio-security risk (eg torching).

MULSFORD POULTRY FARM			
BIOSECURITY PROTOCOL FEBRUARY 2019			
Species	Potential contamination route	Likelihood of risk	Operational Procedures/Actions required to minimise risks
Floating pennywort, <i>Hydrocotyle ranunculoides</i> Australian swamp stonecrop <i>Crassula helmsii</i> Water hyacinth, <i>Eichornia crassipe</i> Water primrose, <i>Ludwigia peploides</i> , <i>Ludwigia uruguayensis</i> (= <i>L. grandiflora</i>) Canadian waterweed, <i>Elodea canadensis</i> Curly waterweed. <i>Lagarosiphon major</i> Nuttall's waterweed, <i>Elodea nuttalli</i> Waterweeds (other Elodea), <i>Elodea spp</i> Least duckweed, <i>Lemna minuscula</i>	as propagules on boots, waders, bottle traps, nets etc.		Use bottle traps on a site-specific basis. Consider using nets and other equipment on a site-specific basis where non-native species have been recorded. Clean equipment, boots/waders and clothes after each survey. Where surveys entail surveys of two or more ponds, consider provision of duplicate equipment including boots/waders. Based on degree of risk, consider surveying ponds supporting invasive species last or use a team to specifically survey ponds supporting non-native species.
Fish (all species)	Deliberate introduction	Low: The owner has agreed to a strict policy of no fish introduction	Continued agreement by the owner
Chyrid fungus	Ecologists, aquatic survey equipment	The Chyrid fungus has been identified in Flintshire. This fungus has affected amphibian globally and has caused the extinctions of species. The risk is low but serious.	Ecologists and other contractors to disinfect boots and equipment before entering ponds

MULSFORD POULTRY FARM			
BIOSECURITY PROTOCOL FEBRUARY 2019			
Species	Potential contamination route	Likelihood of risk	Operational Procedures/Actions required to minimise risks
Tree diseases including Chalara, Phytophthora	Planting of infected trees	Low	Ensure trees purchased from nurseries registered as disease-free