



NIFTYLIFT, HOYLAND.

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PRELIMINARY ECOLOGICAL APPRAISAL.

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1. INTRODUCTION.

1.1. Niftylift Ltd are seeking planning permission to extend their current yard into the adjacent land to the north.

1.2. Following the initial application Barnsley Metropolitan Borough Council (BMBC) responded with several comments regarding biodiversity and there have been discussions between the client and the LPA regarding offsetting the loss of biodiversity caused by the yard extension by improving the surrounding habitats.

1.3. Whitcher Wildlife Ltd has therefore been commissioned to carry out an initial Preliminary Ecological Appraisal (PEA) of the site to establish whether there are any issues that may affect the proposed works and to assess the impact of the proposals on the biodiversity of the site and recommend measures to ensure no net loss in biodiversity during the development.

1.4. The site survey was carried out on 15th January 2020. This report outlines the findings of that survey and makes appropriate recommendations.

1.5. Appendices I to IV of this report provide additional information on specific species and are designed to assist the reader in understanding the contents of this report.

2. SURVEY METHODOLOGY.

2.1. Prior to visiting the site, the survey area was cross referenced to maps and aerial photographs to give a general idea of the habitats and potential issues within the area and to identify potential access and walking routes.

2.2. The survey area was walked where access was agreed and public rights of way were used where no access was agreed. All habitats within and immediately around the survey area were documented and the dominant species within that habitat listed in line with the JNCC Handbook for Phase 1 Habitat surveys.

2.3. The survey area and immediate surrounding area was thoroughly searched for evidence of badger (*Meles meles*) activity by looking for the following signs in line with Harris S, Cresswell P and Jefferies D (1989). *Surveying Badgers*. Mammal Society: -

- * Badger setts.
- * Badger latrines or dung pits.
- * Badger snuffle holes and evidence of foraging.
- * Badger paths.
- * Badger prints in areas of soft mud.
- * Badger hairs caught on fencing.

2.4. The survey area was searched for watercourses and where found all watercourses within the survey area and for approximately 100m in each direction were thoroughly searched for evidence of water vole (*Arvicola amphibius*) activity by looking for the following signs, in line with Dean M, Strachen R, Gow D and Andres R (2016). *The Water Vole Mitigation Handbook (The Mammal Society Mitigation Guidance Series)*. Eds Fiona Mathews and Paul Chanin. The mammal Society, London: - (2011). *Water Vole Handbook: Third Edition*: -

- * Water vole burrows.
- * Water vole faeces and latrines.
- * Water vole feeding stations.
- * Water vole runs.
- * Water vole prints in areas of soft mud.
- * Water vole lawns.
- * Predator field signs.

2.5. The survey area was searched for watercourses and where found all watercourses within the survey area and for approximately 50m in each direction were thoroughly searched for evidence of otter (*Lutra lutra*) activity by looking for the following signs in line with the P Chanin (2003). *Monitoring the Otter and Conserving Natura 2000 Rivers: Monitoring Series No10 Guidelines*: -

- * Otter prints in soft mud.
- * Otter spraints.
- * Otter Holts.

2.6. The survey area was searched for watercourses and waterbodies. Where found, and where safe to enter the water, all were thoroughly searched for the presence of crayfish, for approximately 50m in each direction of the site, by searching under rocks and logs. Where stated, crayfish traps were also deployed into the watercourse. All survey work was carried out in accordance with the *Conserving Natural 2000 Rivers Monitoring Series No 1, Protocol for Monitoring the White Clawed Crayfish*.

2.7. The survey area was searched for trees and structures and where found these were checked for potential bat roosting sites in line with Collins, J. (ed.) (2016) *Bat Surveys for Professional Ecologists: Good Practice Guidelines (3rd edition)* by looking for the following signs: -

- * Holes, cracks or crevices.
- * Bat Droppings.

2.8. The land immediately adjacent to the survey area was assessed for bat roosting potential and bat foraging potential. Connective routes and flight lines were also assessed whilst on site and using maps of the area.

2.9. The area within 500m of the survey site was cross referenced to maps to highlight all ponds close to the site. Where possible, all ponds identified were accessed using agreed access or public rights of way to assess the potential for great crested newts (*Triturus cristatus*) to be present.

2.10. The survey area was assessed for the potential for reptiles and suitable reptile habitats. Where applicable the area was also searched for the presence of reptiles.

2.11. Where appropriate, the habitat within and surrounding the survey area was searched for species such as hazel, oak, honeysuckle, bramble and other species which may provide potential habitat for hazel dormice (*Muscardinus avellanarius*). Field signs such as feeding remains and nests were also searched for where possible,

in line with P Bright, P Morris and T Mitchell-Jones *The Dormouse Conservation Handbook 2nd Edition*.

2.12. Where appropriate, the area within and surrounding the survey area was assessed for its potential to house habitat for red squirrels. Field signs of red squirrels were searched for at least every 50m, looking for any dreys, feeding signs or sightings of red squirrels.

2.13. The survey area was searched for all alien invasive plant species as listed on Schedule 9 of the Wildlife and Countryside Act 1981. The location of all plants identified were recorded and listed within the survey report along with appropriate recommendations to avoid causing the plants to spread in the wild. All species were searched for, but the main species generally found under this category are Japanese knotweed, Giant hogweed, Himalayan balsam, Cotoneaster, Rhododendron and Japanese Rose.

2.14. All surveys were carried out in line with the Chartered Institute of Ecological and Environmental Management (CIEEM) survey standards and advice.

2.15. This survey was carried out by Steven Whitcher MCIEEM. Since 2002 Steven has gained extensive experience in a professional capacity as an ecological consultant carrying out ecology, protected species and Extended Phase 1 Habitat surveys. Steven's knowledge has been supplemented through the attendance of a variety of courses run by the Chartered Institute of Ecology and Environmental Management (CIEEM), the Bat Conservation Trust (BCT) and the Field Studies Council (FSC) in the relative protected species, plant species and in carrying out Extended Phase 1 Habitat Surveys. Steven holds Natural England Survey Licences in respect of bats, great crested newts, hazel dormice, crayfish and barn owls, NRW Survey Licences in respect of bats and great crested newts and an SNH Survey Licence in respect of bats. Steven is also a Registered Consultant with Natural England and is confined spaces trained and qualified in tree climbing and aerial rescue.

3. SURVEY RESULTS.

3.1. Data Search Results.

3.1.1. Desktop data searches for existing records of protected species or designated sites within 2km of the surveyed area were submitted to Barnsley Biological Records Centre (BBRC), South Yorkshire Bat Group (SYBG) and South Yorkshire Badger Group.

3.1.2. BBRC do not hold any records of nationally designated sites within 2km of the surveyed area. There are records of several locally designated sites within the area although none within or immediately adjacent to the surveyed area. The sites comprise:

- Wombwell Wood Local Wildlife Site (LWS) – located 750m north of the surveyed area.
- Barrow Colliery Site LWS – located 750m northwest of the surveyed area.
- Short Wood and Hay Green LWS – located 1.1km west of the surveyed area.
- Skiers Sprint Wood LWS – located 1.9km south of the surveyed area.

3.1.3. BBRC also hold abundant records of protected and notable species within 2km of the surveyed area. The notable records comprise:

- Barn owls within the immediate surrounding area.
- Common frogs within the industrial estate approximately 450m to the southwest and within Wombwell Wood LWS.
- Hedgehogs within the surrounding area.
- Brown hares within Wombwell Wood LWS.
- Common toads within a pond 600m to the north.
- BBRC also hold abundant records of birds, including some notable species such as house sparrow, and flowering plants within 2km of the site although none within the surveyed area or immediately surrounding area.

3.1.4. SYBG hold several records of bats within 2km of the surveyed area although none within the surveyed area.

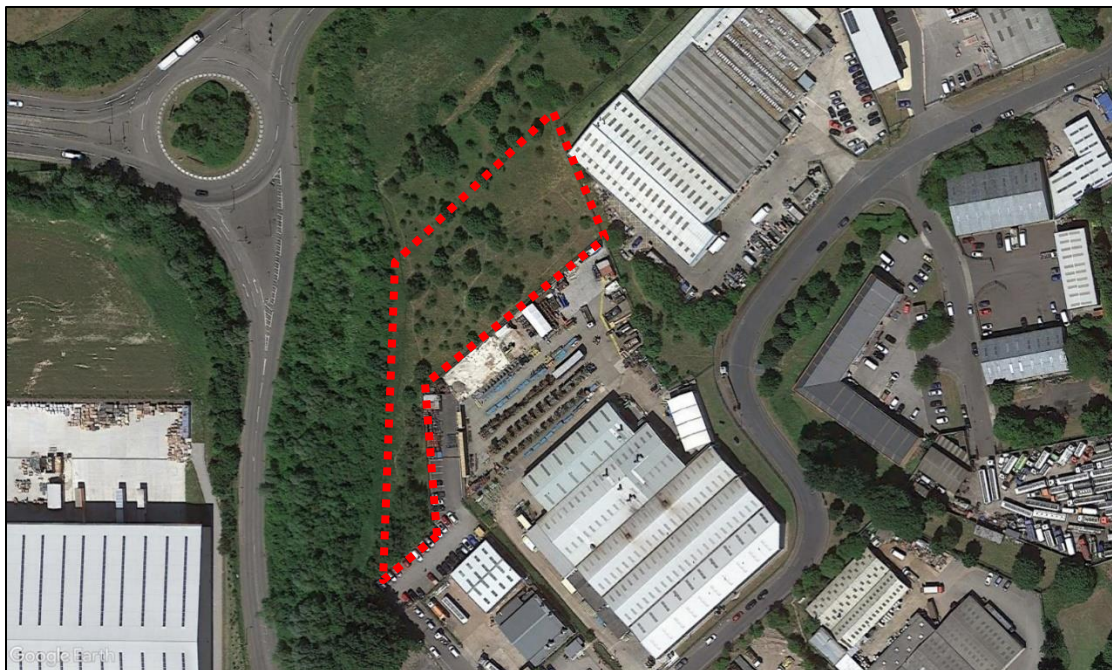
3.1.5. The records include abundant roost and field records of bats within 2km of the surveyed area. The closest field records are located 450m to the southwest with the closest roost, a noctule/leislars bat roost with a max count of three bats, located 800m to the northwest.

3.1.6. South Yorkshire Badger Group do not hold any records of badgers within the search area.

3.1.7. A full copy of the results received from BBRC, SYBG and South Yorkshire Badger Group can be provided on request.

3.2. The Surveyed Area.

3.2.1. The surveyed area was the proposed extension area adjacent to the existing Niftylift Ltd site at Hoyland, as shown below.



3.2.2. The surveyed area comprises an area of grass and scrub extending from the existing site to the north before dropping away towards the Dearne Valley Parkway. Several unofficial footpaths cross the site with a public footpath crossing the area to the north of the surveyed area.



3.2.3. The land surrounding the site comprises industrial land to the south extending to densely urban land within Hoyland beyond. To the north the site is bordered by the Dearne Valley Parkway. Beyond this the land comprises a mixture of open farmland, woodland and old colliery sites with several areas designated as Local Wildlife Sites (LWS).



3.3. Description of Habitats.

3.3.1. Appendix V of this report contains annotated maps marked up with the varying habitats that are cross referenced to target notes in Appendix VI of this report. The habitats on and adjacent to the site are: -

- Semi Improved Neutral Grassland.
- Scattered Scrub.
- Dense/Continuous Scrub.
- Other Habitat – Hard Standing.
- Dry Ditch.
- Fences.

3.3.2. *Semi improved neutral grassland:* The site predominantly comprises an open area of grassland that displays minimal management, with a long sward present, although the grassland is subjected to regular disturbance with paths leading throughout the area and an abundance of animal and human waste in some areas.

3.3.2.1. The species present in the grassland comprise cocks foot (*Dactylis glomerata*), perennial rye grass (*Lolium perenne*), fescue (*Festuca* sp), false oat grass (*Arrhenatherum elatius*), common bent (*Agrostis capillaries*), cow parsley (*Anthriscus sylvestris*), common ragwort (*Senecio jacobaea*), teasel (*Dipsacus fullonum*), ribwort plantain (*Plantago lanceolata*), bittercress (*Cardamine* sp), daisy (*Bellis perennis*), creeping buttercup (*Ranunculus repens*), thistle (*Cirsium* sp), hairy tare (*Ervilia hirsuta*), dock (*Rumex* sp), nettle (*Urtica dioica*), yarrow (*Achillea millefolium*), vetch (*Vicia* sp) and mugwort (*Artemisia vulgaris*).



3.3.2.2. The grassland was assessed as being semi improved neutral grassland at the time of this survey due to the abundance of cocks foot (*Dactylis glomerata*), a neutral indicator species, and the presence of other indicators such as false oat grass (*Arrhenatherum elatius*) but was classified as semi improved due to the presence of perennial rye grass (*Lolium perenne*), which implies some agricultural or other improvement.

3.3.3. *Scattered scrub*: Young trees and some other scrub species are dominant throughout the grassland. The trees are predominantly small in size although occasional larger trees are present in some areas. The trees were all classified as scrub during this survey due to the tree predominantly being below 5m in height.



3.3.3.1. The tree species present including oak (*Quercus sp*), hawthorn (*Crataegus monogyna*), silver birch (*Betula pendula*), Norway maple (*Acer platanoides*), ash (*Fraxinus excelsior*) and alder (*Alnus glutinosa*) with gorse (*Ulex europaeus*) and bramble (*Rubus fruticosus*) also present in some area.



3.3.4. *Dense/continuous scrub*: There are two areas of dense scrub within the surveyed area.

3.3.4.1. To the north and west of the surveyed area a bank drops away to the Dearne Valley Parkway and Ryecroft Bank. The bank has been classified as dense scrub although there are occasional larger trees present and the area could also be classified as dense scrubby young woodland. The scrub appears to have been planted as

screening during the construction of the industrial estate due to the presence of tree protectors around the majority of the trees. The scrub comprises hawthorn (*Crataegus monogyna*), blackthorn (*Prunus spinosa*), ash (*Fraxinus excelsior*), alder (*Alnus glutinosa*), willow (*Salix sp*), black poplar (*Populus x canadensis*), snowberry

(*Symphoricarpos albus*), dogwood (*Comus sanguinea*), dog rose (*Rosa canina*) and bramble (*Rubus fruticosus*)



3.3.4.2. The scrub shows abundant signs of disturbance due to occasional paths throughout the area and an abundance of rubbish throughout.

3.3.4.3. There are also occasional dense patches of bramble (*Rubus fruticosus*), blackthorn (*Prunus spinosa*) and gorse (*Ulex europaeus*) within the grassland.

3.3.5. *Other habitat – hard standing*: The existing Niftylift yard extends along the southern boundary of the surveyed area. The yard comprises a tarmac area used for storing materials and a small parking area.



3.3.6. *Dry ditch:* A dry ditch crosses the grassland to the north of the surveyed area adjacent to an existing public footpath. The ditch is shallow and the vegetation within comprises the grassland from the surrounding area.



3.3.7. *Fences:* There are existing fences along the boundaries of the surveyed area. A palisade fence separates the area from the adjacent industrial land with a wooden post and rail stock fence along the top of the scrub bank to the north and west.



3.4. Description of Species.

3.4.1. No badger setts or other badger field signs were identified within the surveyed area. Occasional paths were identified crossing the grassland (T2) although these appeared to be unofficial footpaths used regularly by the public.

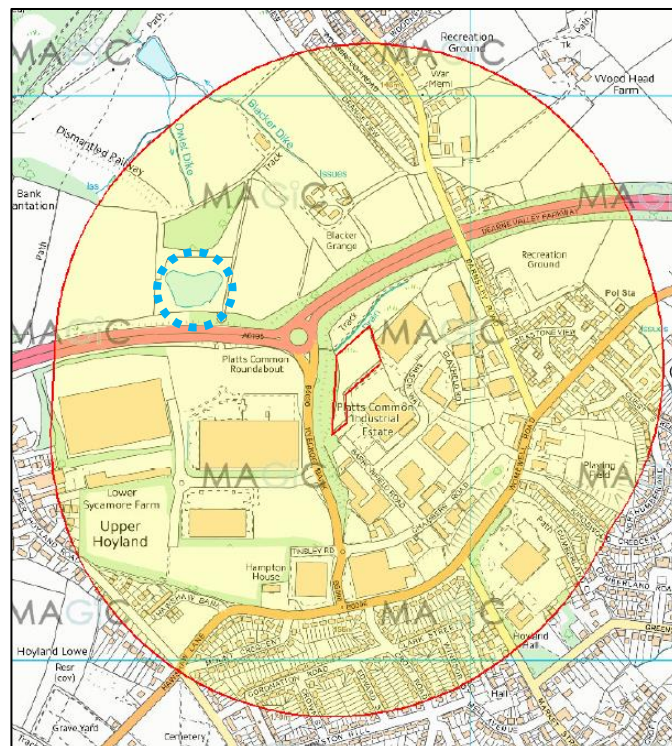
3.4.2. No watercourses that would provide a suitable habitat for water voles, otters or crayfish were identified within the surveyed area or immediate surrounding area.

3.4.3. No structures were identified within the surveyed area and all of the trees were assessed as providing negligible potential to support roosting bats due to the lack of suitable Potential Roost Features (PRF).

3.4.4. The surveyed area was assessed as providing a moderate value foraging and commuting habitat for bats predominantly due to the connectivity provided by the scrub along the north and west of the area. However, the surrounding areas are heavily disturbed by traffic noise and artificial lighting making the habitats unlikely to support species other than common light tolerant species.

3.4.5. A thorough assessment of the foraging and commuting activity within the surrounding area was not possible during this daytime survey of the site.

3.4.6. One pond was identified within 500m of the surveyed area on maps of the area.



3.4.7. The pond is located 250m northwest of the surveyed area on the opposite side of the Dearne Valley Parkway. Aerial photography implies that the pond is regularly dry although the pond contained high levels of water at the time of this survey.

3.4.8. A Habitat Suitability Index (HSI) assessment of the pond identified it as providing a 'Below Average' potential to support great crested newts.



Location	1
Pond area	
Pond drying	0.5
Water quality	0.33
Shade	1
Fowl	0.67
Fish	1
Ponds	0.67
Terrestrial habitat	0.33
Macrophytes	0.3
HSI	0.58
Potential	Below Average

3.4.9. The surveyed area provides some potential terrestrial habitat although the Dearne Valley Parkway, a busy dual carriageway, is assessed as a barrier to amphibian movements and therefore it is unlikely that great crested newts, or other amphibians, would be present on the site even if they are present in the pond.

3.4.10. The surveyed area provides suitable nesting opportunities for a range of bird species although no active nests were identified during this survey, which was carried out outside the nesting season. Occasional old nests were identified within the areas of scrub at the time of this survey (T1).

3.4.11. The surveyed area provides some areas of suitable reptile habitat although the site is isolated from other areas of suitable habitat by the existing urban land to the south and the Dearne Valley Parkway to the north. No reptiles were identified during this survey of the site.

3.4.12. The surveyed area lies outside the known UK range for hazel dormice and red squirrels.

3.4.13. No invasive non-native plant species listed on Schedule 9 of the Wildlife and Countryside Act 1981 were identified at the time of this survey. Some species die back over the winter although there were no signs, such as dead stems, that such species are present.

3.4.14. The surveyed area provides some opportunities for hedgehogs although no hedgehog field signs were identified during this survey of the site.

4. EVALUATION OF FINDINGS.

4.1. No designated sites were identified within the surveyed area or immediate surrounding area, the closest being located 750m to the north. Therefore, there will be no impact on designated sites during the proposed yard extension.

4.2. The grassland within the surveyed area was assessed as being semi improved neutral grassland at the time of this survey due to the presence of some species that indicate neutral grassland but also the presence of agricultural species, implying a level of improvement. The grassland was identified as displaying a quite diverse and long sward and was therefore assessed as having a moderate ecological value. Although this assessment was carried out outside the peak growing season for grassland it is assessed as unlikely, due to the location and disturbance, that the grassland will be significantly more diverse or have a different classification or ecological value during the peak season.

4.3. The scattered scrub present throughout the grassland was identified as predominantly being young trees with occasional scrub species also present. The trees were small at the time of this survey although still display some ecological value due to the structure they create and the species they will support. The scattered scrub was therefore assessed as providing a moderate ecological value.

4.4. The dense areas of scrub, particularly the bank to the north and west of the surveyed area, were identified as displaying a moderate/high ecological value due to the species the scrub will support and the connectivity the habitat provides in the wider landscape. However, the scrub also shows signs of regular disturbance and abundant rubbish, which reduce the overall value of the habitat.

4.5. The fences and existing hard standing areas provide little or no ecological value and are subjected to regular disturbance.

4.6. Overall the surveyed area provides a moderate ecological value due to the range of habitats present and the species the habitats could support. However, the overall ecological value of the site is slightly reduced by the abundance of rubbish and the presence of human and animal waste in some areas of the site.

4.7. The proposed yard extension will remove approximately 0.45ha of the grassland and scrub habitats and will therefore have a significant impact on the overall

ecological value of the site although the higher value habitats, such as the dense scrub, will remain unaffected.

4.8. No badger setts or other badger field signs were identified within the surveyed area and there were no signs to imply that the paths present throughout the area were made by badgers. Therefore, there will be no impact on badgers during the proposed works.

4.9. No watercourses that would provide a suitable habitat for water voles, otters or crayfish were identified within the surveyed area or immediate surrounding area. Therefore, there will be no impact on these species during the proposed works.

4.10. No structures that would support roosting bats were identified within the surveyed area and the trees that will be impacted upon by the development were all identified as providing negligible potential to support roosting bats. Therefore, there will be no impact on roosting bats during the proposed works.

4.11. The surveyed area was assessed as providing a moderate value foraging and commuting habitat for bats although the presence of high levels of light and disturbance around the site limit the potential to common light tolerant bat species. A thorough assessment of the foraging and commuting activity within the surveyed area was not carried out as part of this daytime survey of the site.

4.12. The proposed works will remove some habitats from the area, replacing them with further areas of regularly disturbed hard standing land. However, the works will leave the main structure around the area, the dense scrub, unaffected. Therefore, given the existing levels of disturbance and lighting within the surrounding area it is assessed that the proposed yard extension will have minimal impact on foraging and commuting bats.

4.13. The only pond identified within 500m of the surveyed area on maps of the area was a large pond identified 250m to the north on the opposite side of the Dearne Valley Parkway to the surveyed area. The pond was assessed as providing a 'Below Average' potential to support great crested newts with the only amphibian records within the area being records of common frogs and common toads 450m or more from the surveyed area.

4.14. Therefore, given the barriers to amphibian movements present around the surveyed area and the lack of existing records of great crested newts it is assessed as highly unlikely that great crested newts will be present in the area or impacted upon by the proposed works. It is also unlikely that common amphibians will be impacted by the works with precautionary working methods further reducing the potential.

4.15. The surveyed area provides a suitable nesting habitat for a variety of bird species during the nesting season, which extends from March to September each year. No active nests were identified during this survey although occasional old nests were identified showing that the area has previously been used for nesting.

4.16. Any vegetation clearance works carried out within the nesting season have the potential to have a high impact on any birds present in the vegetation at that time.

4.17. The surveyed area was assessed as providing some potential for reptiles but is isolated by heavily disturbed or densely urban habitats. There are also no records of reptiles in the surrounding area. Therefore, it is unlikely that the proposed works will impact on reptiles with precautionary working methods reducing the potential.

4.18. The site lies outside the known UK range for hazel dormice and red squirrels and therefore there will be no impact on these species during the proposed works.

4.19. No invasive non-native plant species listed on Schedule 9 of the Wildlife and Countryside Act 1981 were identified within the surveyed area and there were no signs to imply the presence of species that die back over the winter. Therefore, there is no risk of plant species being spread during the proposed works.

4.20. The surveyed area provides some opportunities for hedgehogs and there are existing records of the species in the surrounding area although no hedgehog field signs were identified during this survey of the site.

4.21. The proposed works will leave the majority of the dense habitats unaffected and therefore, if the works are carried out with care, the potential impact on hedgehogs will be minimal.

5. RECOMMENDATIONS.

5.1. It is recommended that the biodiversity value of the site is offset in the surrounding land, as previously discussed with the LPA.

5.2. The biodiversity units provided by the site were assessed using the DEFRA Biodiversity Metric 2.0. Due to the metric not allowing habitat mosaics the condition of the grassland was increased to account for the scattered scrub present. Therefore, the overall loss of biodiversity units was assessed as 1.8 units.

5.3. Using the metric it was assessed that enhancing the surrounding habitats, including 1ha of scrub and 0.35ha of grassland, would offset the biodiversity loss, providing an overall net gain of 17.09%.

5.4. The required improvements to the areas should be agreed with the LPA but should include the following:

- Planting native fruit and berry bearing tree and shrub species along the boundary of the site and occasionally throughout the areas of grassland to offset the trees/scrub lost to the yard extension.
- Additional seeding of the grassland using a suitable wildflower seed mix to increase the diversity of the grassland sward.
- The removal of rubbish and other waste from the area reducing the impact of people on the grassland and scrub habitats.
- Habitat piles created in the surrounding grassland and scrub habitats using the trees removed from the site.

5.5. It is recommended that all personnel carrying out the site clearance works are briefed on the potential presence of amphibians and reptiles in the area and how to identify the species. Toolbox talks have been included at the end of this report to aid in the briefing.

5.6. It is then recommended that precautionary working methods are implemented during the works. The working methods should include:

- Care during the initial site clearance with any grassland removed during the growing season initially being reduced to approximately 150mm to allow animals to escape prior to being reduced to ground level.
- Dense areas of vegetation being initially removed to 150mm to allow animals to escape prior to being reduced to ground level.

- Any areas of potential refugia being carefully removed by hand and the area underneath inspected.

5.7. In the event that individual common amphibians or reptiles are encountered they should be carefully moved to areas of suitable refugia outside the footprint of the works. If large numbers of common amphibians or reptiles or any great crested newts are identified works should cease immediately and further advice should be sought.

5.8. Ideally it is recommended that any vegetation clearance works are carried out outside the nesting season, which extends from March to September each year.

5.9. Any vegetation clearance works carried out within the nesting season must be immediately preceded by a thorough nesting bird survey carried out by a suitably experienced surveyor. Any nests identified must remain undisturbed until the young have fledged from the nest.

Prepared by:	
Steven Whitcher, MCIEEM.	Date: 21 st January 2020.

Checked by:	
Jenny Whitcher Roebuck MCIEEM.	Date: 24 th January 2020.

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Appendix I. BAT INFORMATION.

Ecology

There are currently 18 species of bat residing in Britain, 17 of which are known to breed here. They are extremely difficult to identify in the hand and even more so in flight.

All appear to be diminishing in numbers, probably due to habitat change and shortage of food, caused by pesticides, as insects are their sole diet.

As their diet consists solely of insects, bats hibernate during the winter when their food source is at its most scarce. They will spend the winter in hollow trees, caves, mines and the roofs of buildings.

Certain species, particularly the pipistrelle (the commonest and most widespread British bat) can quickly adapt to man-made structures and will readily use these to roost and to rear their young.

Surveys

During walkover surveys, bat roosts can be identified by looking for:

- Suitable holes, cracks and crevices within any building, tree or other structure.
- Bat droppings along walls, window cills, or on the ground.
- Prey remains, such as insect wings.

Further investigations can be made using endoscopes, by carrying out aerial inspections of trees or by conducting bat activity surveys during dusk and dawn over summer months.

Legislation

Bats are protected under Appendix II and III of the Bern Convention (1982), Schedule 5 and 6 of the Wildlife and Countryside Act (1981), Annex IV of the Habitats Directive (some species under Annex II), Annex II of the Conservation of Habitats and Species Regulations (2010) and EUROBATs agreement. Numerous species are also listed under section 41 of the Natural Environment and Rural Communities Act (2006) making them species of principal importance.

All bats and their roosts are therefore protected in the UK. This makes it an offence to kill, injure or take any bat, to interfere with any place used for shelter or protection, or to intentionally disturb any animal occupying such a place.

The UK has designated maternity and hibernacula areas as Special Areas of Conservation (SAC's) under the Habitats Directive. Implementation of the UK Biodiversity Action Plan also includes action for a number bat species and the habitats which support them.

Where development proposals are likely to affect a bat roost site, a licence is required from Natural England.

Appendix II. GREAT CRESTED NEWT INFORMATION.

Ecology

Great Crested Newts breed in ponds and other water bodies. They can begin to migrate to their breeding ponds as early as the first frost-free days in late January with the majority reaching their breeding ponds by mid-March. Timing will be influenced by several factors, primarily evening temperatures above 5°C and rainfall.

The peak egg-laying period is from mid-March to mid-May. The newts will lay their eggs individually, mainly on the leaves of submerged plants. The larva hatch after three weeks and then take another 2-3 months to complete larval development. Adult newts generally leave their breeding ponds from late May onwards.

Once the larvae have completed metamorphosis (the transition from aquatic larvae, efts, to land-adapted juveniles), they emerge from the pond. This emergence begins in late August and generally continues until late October. It takes 2-4 years to reach sexual maturity, during which time the newts will be land based.

Adults and immature newts spend the winter in places that afford protection from frost and flooding. This will generally be underground amongst tree roots, in mammal burrows, or under suitable refuges above ground like deadwood or rubble piles. Hibernation may last from October to February.

Whilst on land, outside the hibernation period, great crested newts will forage at night, taking a wide range of invertebrate prey.

Great Crested Newts therefore spend the majority of their time on land and only visit the ponds for breeding purposes.

Great Crested Newts will travel large distances between ponds and terrestrial refuges. It is recommended that anywhere within 500m of a pond should be treated as potential Great Crested Newt habitat.

Surveys

Walkover surveys will identify the suitability of any ponds within the area for Great Crested Newts by using a HSI assessment. The terrestrial habitat and their links will also be assessed.

Aquatic surveys of newts can be carried out through the trapping of ponds in suitable weather conditions during the breeding season, although these surveys do not provide accurate population estimates.

Terrestrial surveys and exclusions can be conducted between March and September when newts are moving out of breeding ponds.

An experienced surveyor must carry out the surveys and must be in possession of an appropriate Natural England Great Crested Newt survey license.

It is essential that Great Crested Newt surveys are planned well in advance of any development and ideally before Planning Consent is sought. Surveys can only be carried out at the appropriate time of year and repeat surveys are essential.

Legislation

Great Crested Newts are protected under Appendix II of the BERN Convention (1982), Schedule 5 of the Wildlife and Countryside Act (1981), Annex II and IV of the Habitats Directive, Annex II of the Conservation and Wildlife Regulations (2010) and are listed under section 41 of the Natural Environment and Communities Act (2006) making them a species of principal importance.

This makes it an offence to kill, injure or take any Great Crested Newt, to interfere with any place used for shelter or protection, or to intentionally disturb any animal occupying such a place.

If Great Crested Newts are to be affected by any development, a thorough assessment of the population is essential followed by the design of a comprehensive mitigation package. Only when this has been done can a license application be submitted to Natural England for approval. It takes 30 working days for a license application to be determined and the period that mitigation measures take can be measured in months. It is therefore essential to plan well in advance of development commencing.

Appendix III. NESTING BIRD INFORMATION.

Ecology

The nesting season will vary according to the weather each year but generally commences in March, peaks during May and June and continues until September. It is also worth remembering that some birds nest in trees and scrub, but others are ground nesting or prefer man-made structures or buildings.

Surveys

Nesting bird surveys search for potential nest sites in vegetation, buildings etc. Potential nesting sites are observed over a suitable period of time for bird movements or calling male birds that would indicate the presence of a nest. The presence of a nest can be identified from the field signs without the necessity to see the nest itself, thereby avoiding any disturbance of the nests. The best way to avoid this issue is to plan for vegetation clearance to be carried out outside the bird-nesting season.

Legislation

Nesting birds are protected under The Wildlife and Countryside Act 1981.

Part 1. -(1) Of the Act states that: - If any person intentionally: - kills, injures or takes any wild bird; takes, damages or destroys the nest of any wild bird while that nest is in use or being built; or takes or destroys an egg of any wild bird, he shall be guilty of an offence.

Part 1. -(5) of the Act states that: - If any person intentionally: - disturbs any wild bird included in Schedule 1 while it is building a nest or is in, on, or near a nest containing eggs or young; or disturbs young of such a bird, he shall be guilty of an offence and liable to a special penalty.

The Countryside and Rights of Way Act 2000 amends the above by inserting after “intentionally” the words “or recklessly”.

Appendix IV. REPTILE INFORMATION.

Ecology

There are five main species of reptile that reside in the UK; Common or Viviparous Lizard (*Lacerta vivipara*); Sand Lizard (*Lacerta agilis*); Slow Worm (*Anguis fragilis*); Grass Snake (*Natrix natrix*) and Adder (*Vipera berus*). The Adder is the only native species that is venomous although this is rarely harmful to humans.

Reptiles occupy a wide range of habitats including woodland, marshes, heathland, moors, sand dunes, hedgerows and bogs. Sand Lizards are confined to moorland and coastal sand dunes where they lay their eggs in the warm sand. The range of the Sand Lizard in the UK is therefore very limited. Slow Worms can be found in a wide variety of habitats throughout Britain and is the most likely reptile to be found in urban and suburban environments.

Maintaining the right body temperature is vital to reptiles' survival. In the morning, they find a warm basking site to heat up their bodies, then later they may move back into the shade because they do not sweat and have to be careful not to overheat. During hot summers, Adders will try to move to damper, cooler sites.

Over winter reptiles will hibernate in burrows or under logs where they are protected from the cold and predators, emerging from February onwards as the weather warms up.

Reptiles generally begin to mate April to May with young born in late July to September. The Common Lizard gives birth to live young, hence the term viviparous, meaning live bearing.

Surveys

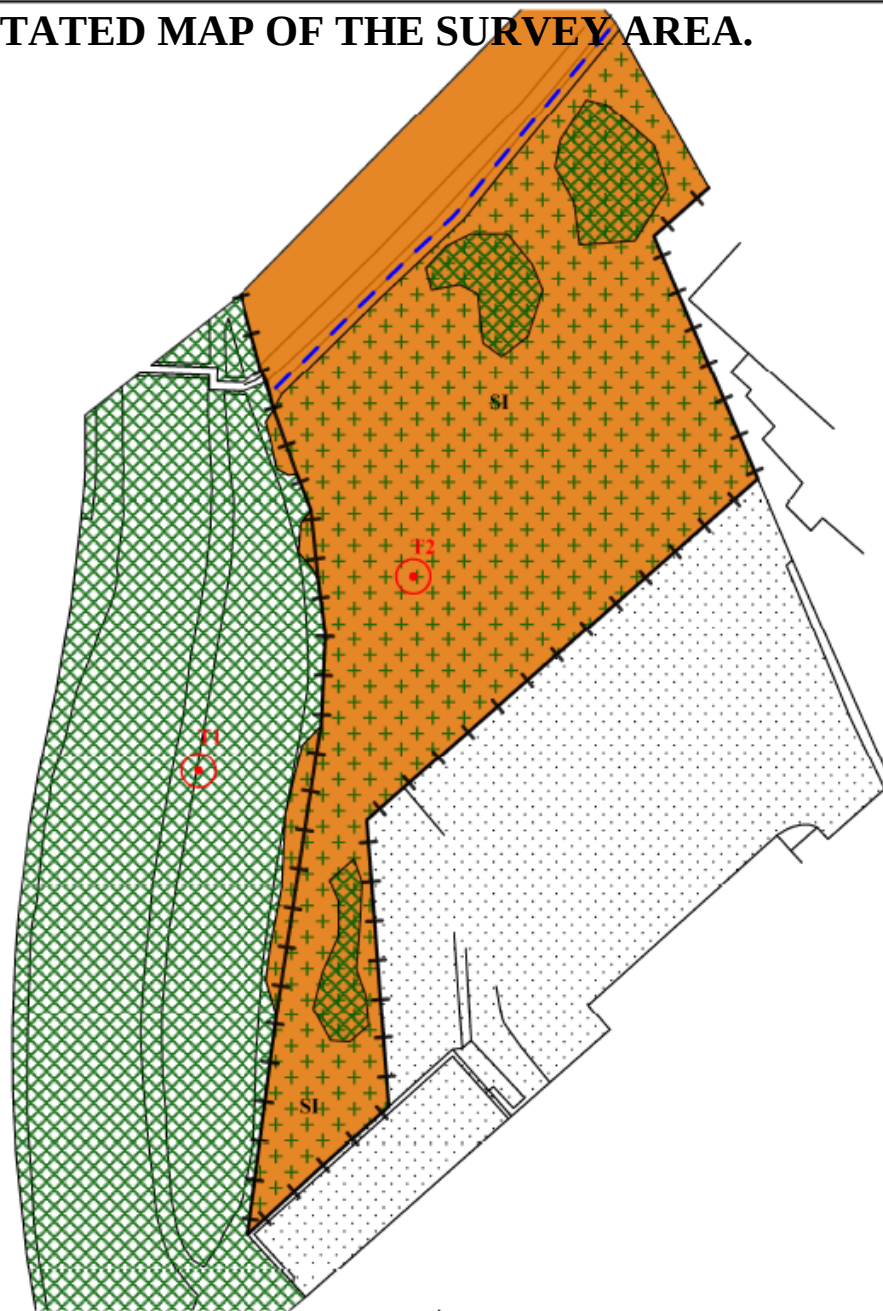
Reptile surveys involve the searching of refuge such as logs and stones for any animal sheltering below. Artificial refuge may be laid out on site for the purpose of reptile surveys.

Legislation

Reptiles are protected under Appendix II (sand lizards) and Appendix III (common lizard, slow worms, smooth snake, grass snake and adders) of the BERN Convention (1982), partially protected under Schedule 5 of the Wildlife and Countryside Act (1981), Annex IV of the Habitats Directive and are all listed under section 41 of the Natural Environment and Communities Act (2006) making them a species of principal importance.

This makes it an offence to disturb any reptile while it is occupying a structure or place it uses for shelter or protection or to obstruct access to such a place.

Appendix V. ANNOTATED MAP OF THE SURVEY AREA.



Semi Improved Neutral Grassland

SI

Scattered Scrub



Dense/Continuous Scrub



Other Habitat - Hard Standing



Dry Ditch



Fences



Target Notes



Site: Niftylift, Hoyland

Reference: 200135

Prepared by: Steven Whitcher

Date: 20th January 2020



Appendix VI. TARGET NOTES.

T1: Old nests identified within the dense scrub habitats.

T2: Paths identified leading throughout the grassland.

Appendix XIV. SPECIES LISTS.

1. Semi Improved Neutral Grassland.

Species.	DAFOR Assessment.
Cocks foot (<i>Dactylis glomerata</i>)	A
Perennial rye grass (<i>Lolium perenne</i>)	F
Fescue (<i>Festuca sp</i>)	F
False oat grass (<i>Arrhenatherum elatius</i>)	O
Common bent (<i>Agrostis capillaries</i>)	F
Cow parsley (<i>Anthriscus sylvestris</i>)	F
Common ragwort (<i>Senecio jacobaea</i>)	O
Teasel (<i>Dipsacus fullonum</i>)	O
Ribwort plantain (<i>Plantago lanceolata</i>)	O
Bittercress (<i>Cardamine sp</i>)	O
Daisy (<i>Bellis perennis</i>)	O
Creeping buttercup (<i>Ranunculus repens</i>)	O
Thistle (<i>Cirsium sp</i>)	O
Hairy tare (<i>Ervilia hirsuta</i>)	R
Dock (<i>Rumex sp</i>)	R
Nettle (<i>Urtica dioica</i>)	O
Yarrow (<i>Achillea millefolium</i>)	O
Vetch (<i>Vicia sp</i>)	O
Mugwort (<i>Artemisia vulgaris</i>)	R

2. Scattered Scrub.

Species.	DAFOR Assessment.
Oak (<i>Quercus sp</i>)	O
Hawthorn (<i>Crataegus monogyna</i>)	F
Silver birch (<i>Betula pendula</i>)	F
Norway maple (<i>Acer platanoides</i>)	O
Ash (<i>Fraxinus excelsior</i>)	O
Alder (<i>Alnus glutinosa</i>)	O
Gorse (<i>Ulex europaeus</i>)	O
Bramble (<i>Rubus fruticosus</i>)	O

3. Dense/Continuous Scrub.

Species.	DAFOR Assessment.
Hawthorn (<i>Crataegus monogyna</i>)	D
Blackthorn (<i>Prunus spinosa</i>)	D
Ash (<i>Fraxinus excelsior</i>)	F
Alder (<i>Alnus glutinosa</i>)	O
Willow (<i>Salix sp</i>)	A
Black poplar (<i>Populus x canadensis</i>)	O
Snowberry (<i>Symphoricarpos albus</i>)	F
Dogwood (<i>Comus sanguinea</i>)	O
Dog rose (<i>Rosa canina</i>)	O
Bramble (<i>Rubus fruticosus</i>)	F
Gorse (<i>Ulex europaeus</i>)	O

Toolbox Talk: Amphibians

Whitcher Wildlife Ltd

Ecological Consultants



Identification: Smooth Newts.

Smooth newts can grow to around 10cm in length. They are usually brown in colour, often with visible black spots on the upper body. Their belly is pale orange with black spots fading away to the sides. The males have a wavy crest running from head to tail, although this can sometimes only be visible in water.



Other Amphibians.

In addition to the common amphibians listed adjacent there are also three other species present in the UK, those being great crested newts, natterjack toads and pool frogs. These species are less common.

The species are also afforded a higher level of protection because they are European Protected Species.

Identification: Palmate Newts.

Palmate newts are very similar to smooth newts but are usually smaller, to around 9cm. Their throat is usually pink and unspotted. The males often have webbed back feet and a fine filament at the end of the tail during the breeding season.



Habitat.

Amphibians predominantly live on land but breed in ponds. The aquatic requirements for each species vary slightly although the presence of one species does not rule out the potential presence of the other species.

When not in their ponds amphibians require a variety of refugia for shelter and can therefore be found under log piles, in rubble, under tree roots or within areas of scrub or rough grassland. Amphibians hibernate, spending the winter in burrows or under logs protected from the cold and predators.

Identification: Common Frogs.

Common frogs are one of the more common amphibians in the UK. They have smooth skin with a distinctive patch behind their eyes. They are predominantly green or brown with black patches although their colour can vary through orange, red or black.



Identification: Common Toads.

Common toads are a Species of Principal Importance in the UK.

Common toads have rough warty skin with two distinctive lumps behind the eyes. When disturbed they have a tendency to remain still, when moving they crawl rather than hopping.



Legislation.

The common amphibians listed above are protected only by Section 9(5) of the Wildlife and Countryside Act 1981. This section prohibits sale, barter, exchange, transporting for sale and advertising to sell or to buy. Collection and keeping of these amphibians is not an offence.

The common toad is also listed as a Species of Principal Importance in the UK.

If amphibians are identified during works, allow them to move away of their own accord.

If large numbers or amphibians (5+) are identified stop works and contact Whitcher Wildlife Ltd directly on 01226 753271 or at info@whitcher-wildlife.co.uk

Toolbox Talk: Reptiles

Whitcher Wildlife Ltd

Ecological Consultants



Identification: Grass Snakes.

The grass snake can be up to 120cm long. It is generally dark green in colour but may occasionally appear grey with vertical black bars and spots that run along its sides. There is usually a yellow marking around the neck.



Other Reptiles.

In addition to the reptiles outlined on this document, there are also two other reptile species in Great Britain, the smooth snakes and the sand lizard. These reptiles are a lot less common than the four species covered with the smooth snake being predominantly found on heathland in southern England and the sand lizard found throughout Great Britain in coastal dune areas.

These species are also afforded a higher level of protection because they are European Protected Species.

Identification: Adders.

The adder is the only native species that is venomous, but it is rarely harmful to humans. Adult adders are generally up to 66cm long. Background colouration is a light shade of grey or brown with a black zigzag marking along the length of the back. As with all reptiles, colouration varies and becomes duller as sloughing (skin shedding) approaches.



Habitat.

Maintaining the right body temperature is vital to reptiles' survival. In the morning they find a warm basking site to heat up their bodies and then later they may move back into the shade so as not to overheat. Hence, reptiles require a habitat that provides a range of suitable refugia for shelter such as dense vegetation, rubble or log piles, or crevices and open areas for basking such as bare ground, rocks or railway ballast shoulders. During hot summers reptiles may be found in damper, cooler sites. Reptiles hibernate, spending the winter in burrows or under logs protected from the cold and predators.

Identification: Slow Worms.

Slow worms grow to around 45cm in length. The males and females display a marked difference in colour when fully grown. In general, the species displays colouring that varies from light brown, dark brown, grey, bronze or brick red with the females often displaying a dark vertebral stripe and both males and females displaying occasional markings on the flanks.



Identification: Common Lizards.

Common lizards grow to around 16cm. They are grey brown to dark brown, often with a darker streak that may run the entire length of the spine. A continuous dark band bordered by light yellow or white spots is often seen on either side of the body. The underside of the males is egg yolk yellow to orange spotted with black. Females are yellowish grey.



When disturbed in their natural habitat reptiles will usually move away quickly.

Legislation.

Reptiles are protected under Schedule 5 of the Wildlife and Countryside Act 1981. They received greater protection following reviews of the schedules published in 1988 and 1991. This means they are protected against intentional or recklessly killing and injuring and against sale or transporting for sale.

If reptiles are identified during works, stop all works and contact Whitcher Wildlife Ltd directly on 01226 753271 or at info@whitcher-wildlife.co.uk