

LIDL, PURBROOK WAY, HAVANT, HAMPSHIRE

Preliminary Ecological Appraisal

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REPORT

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EXECUTIVE SUMMARY

- RPS were commissioned by Lidl Great Britain Ltd, to undertake a Preliminary Ecological Appraisal of an area of land off of Purbrook Way, Havant, Hampshire, in order to inform the potential development of the site. This comprised a desk study, Phase 1 Habitat Survey and an ecological scoping survey which assessed the potential of the site to support species of conservation concern or other species which could present a constraint to the development of the site.
- The proposals involve the construction of a new Lidl retail store, along with areas of both hard and soft landscaping.
- Currently, the site is dominated by dense bramble and scrub, with scattered trees and small areas of neutral grassland.
- The scattered trees and scrub offers suitable habitat to support breeding birds. Therefore, the removal of any habitat should be undertaken outside of the breeding bird season (March-September). If this is not possible, then the habitat should first be checked by a suitably qualified ecologist, if nests are found; then the removal of the habitat will have to be delayed until after the chicks have fledged (about 6 weeks).
- The site offers suitable habitat for reptiles and amphibians; however, is isolated in the context of the wider landscape; surrounded by roads and commercial development on all sides. Therefore, it is considered unlikely that these species would be present on site; and no further survey work is recommended for these species.
- No evidence of badgers was recorded on site, however, much of the site was unable to be surveyed due to the large amounts of bramble, thicket and scrub. However, considering that the site is isolated in the context of the wider landscape, it is unlikely that any would be present. Notwithstanding this, recommendations for sensitive habitat clearance has been made.
- Although no evidence of dormice were found during the PEA, the site offers suitable habitat for dormice, and there is a known population circa 300m east of the site; therefore, recommendations have been made to carry out further survey work.
- Recommendations have been made in order to ensure that the development of the site can achieve a biodiversity net gain.

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1 INTRODUCTION

1.1 Purpose and scope of this report

- 1.1.1 RPS was commissioned by Lidl Great Britain Ltd to undertake a Preliminary Ecological Appraisal (PEA) of a potential development site, situated off of Purbrook Way, Havant, Hampshire.
- 1.1.2 To undertake an initial assessment of the potential ecological impact of the proposals, a desk study, Phase 1 Habitat Survey, and a preliminary protected species assessment were carried out. This is termed as a Preliminary Ecological Appraisal Report (PEAR) in accordance with CIEEM (2017).
- 1.1.3 The PEA aims to:
- undertake a desk-based review of designated sites and records of protected species and other species that could present a constraint;
 - map and assess the habitats present on site;
 - assess the site for potential to support protected species or other species that could present a constraint, and make appropriate recommendations for further survey work if necessary;
 - provide outline options for mitigation measures as appropriate; and
 - make recommendations for appropriate biodiversity enhancements in line with national and local planning policy.
- 1.1.4 This report pertains to these results only; recommendations included within this report are the professional opinion of an experienced ecologist and therefore the view of RPS. The surveys and desk based assessments undertaken as part of this review and subsequent report including the Ecological Appraisal Notes are prepared in accordance with the British Standard for Biodiversity Code of Practice for Planning and Development (BS42020:2013).

1.2 Study area and Zone of Influence

- 1.2.1 The site is located to the north-west of Havant (OS grid reference SU 6941 0778). The site is bordered by B&Q to the east, Purbrook Way to the south, and the B&Q access road to the north and west. Generally, the surrounding area is urban in character, although north of the site is Neville's Park Wood.
- 1.2.2 The site largely comprises dense scrub, with scattered trees around the site perimeter; limited areas of grass are present towards the north of the site.
- 1.2.3 The term Zone of Influence is used to describe the geographic extent of potential impacts of a proposed development. The Zone of Influence is determined by the nature of the development and also in relation to designated sites, habitats or species which might be affected by the proposals.
- 1.2.4 For this site, the Zone of Influence is considered to be land on, and immediately adjacent to the site and 500 m (where there is suitable habitat connectivity for GCN).

1.3 Development proposals

- 1.3.1 The development proposals include the construction of a new Lidl retail store, along with areas of both hard and soft landscaping.

1.4 Legislation and policy

- 1.4.1 Relevant legislation, policy guidance and both Local and National Biodiversity Action Plans (BAPs) are referred to throughout this report where appropriate. Their context and application is explained in the relevant sections of this report.

1.4.2 The relevant articles of legislation are:

- The National Planning Policy Framework (NPPF, 2019);
- ODPM Circular 06/2005 (retained as Technical Guidance on NPPF 2019);
- The Conservation of Habitats and Species Regulations 2017;
- The Wildlife and Countryside Act 1981 (as amended);
- The Protection of Badgers Act 1992;
- The Countryside and Rights of Way Act 2000;
- The Hedgerow Regulations 1997; and
- The Natural Environment and Rural Communities Act 2006.

1.4.3 A summary of legislation relevant to protected or other species identified as potential constraints in this report is provided in Appendix A.

2 METHODS

2.1 Desk Study

- 2.1.1 Ecological records within a 2 km radius of the site were requested from Hampshire Biological Records Centre (HBIC). Data requests were limited to records for protected species recorded within the last ten years and sites of nature conservation interest within 2 km of the site. This included a review of existing statutory sites of nature conservation interest, such as Sites of Special Scientific Interest (SSSIs), Special Protection Areas (SPAs), Special Area of Conservation (SACs) and National Nature Reserves (NNRs), and non-statutory sites, such as Sites of Importance for Nature Conservation (SINCs) and Local Wildlife Sites (LWSSs).
- 2.1.2 Locations of statutory designated sites were accessed via the government 'MAGIC' website (MagicMap, 2020).
- 2.1.3 A 1:25,000 OS map was used to identify nearby features such as ponds or green corridors that could provide habitat or connectivity to other areas.

2.2 Ecological Appraisal

- 2.2.1 The ecological appraisal consisted of two components: a Phase 1 Habitat Survey and a scoping survey for protected species and other species of conservation concern which could present a constraint to development.
- 2.2.2 The survey was carried out on the 7th July 2020, by a suitably qualified ecologist, Hannah Knight MSc ACIEEM.
- 2.2.3 The Phase 1 Habitat Survey followed the standard methodology (JNCC, 2010), and as described in the Guidelines for Preliminary Ecological Assessment (IEEM, 2012). In summary, this comprised walking over the survey area and recording the habitat types and boundary features present.
- 2.2.4 A protected species scoping survey was carried out in conjunction with the Phase 1 Habitat Survey. The site was assessed for its suitability to support protected species, in particular great crested newts *Triturus cristatus*, reptiles, birds, badgers *Meles meles*, bats, and other species of conservation importance that could pose a planning constraint.
- 2.2.5 The surveyor looked for evidence of use including signs such as burrows, droppings, footprints, paths, hairs, refugia and particular habitat types known to be used by certain groups such as ponds. Any mammal paths were also noted down and where possible followed. Fence boundaries were walked to establish any entry points or animals signs such as latrines. Areas of bare earth were inspected for mammal prints. Areas of habitat considered suitable for protected species or those of conservation interest were recorded.

2.3 Impact Appraisal

- 2.3.1 The overall ecological appraisal is based on the standard best practice methodology provided by the Guidelines for Preliminary Ecological Appraisal (CIEEM, 2017). The assessment identifies sites, habitats, species and other ecological features that are of value based on factors such as legal protection, statutory or local site designations such as Sites of Special Scientific Interest (SSSI) or Local Wildlife Sites (LWS) or inclusion on Red Data Book Lists or Biodiversity Action Plans.
- 2.3.2 The assessment also refers to planning policy guidance (e.g. NPPF) where relevant to relate the value of the site and potential impacts of development to the planning process, identifying constraints and opportunities for ecological enhancement in line with both national and local policy.
- 2.3.3 The methodology for evaluation of the nature conservation value of ecological features affected by development (ecological receptors) is adapted from the current Chartered Institute of Ecology & Environmental Management guidelines for Ecological Impact Assessment (CIEEM, 2016). These guidelines recommend assignment of value (or potential value) to ecological receptors in accordance with the following scale:

-
1. International;
 2. National (i.e. England/Northern Ireland/Scotland/Wales);
 3. Regional;
 4. County (or Metropolitan - e.g. in London);
 5. District (or Unitary Authority, City, or Borough);
 6. Local or Parish; and/or
 7. within immediate zone of influence only.

2.3.4 Following on from the above, potential constraints to development are identified on that basis, with recommendations for further, more detailed surveys made as appropriate, for example to fully investigate botanical value or to confirm presence / likely absence of a protected species

2.3.5 In appraising any impacts, the review considers the client's site proposals and any subsequent recommendations made are proportionate and appropriate to the site and have considered the Mitigation Hierarchy as identified below:

- **Avoid:** Provide advice on how the development may proceed by avoiding impacts to any species or sites by either consideration of site design or identification of an alternative option.
- **Mitigate:** Where avoidance cannot be implemented mitigation proposals are put forward to minimise impacts to species or sites as a result of the proposals. Mitigation put forward is proportionate to the site.
- **Compensate:** Where avoidance cannot be achieved any mitigation strategy will consider the requirements for site compensatory measures.
- **Enhance:** The assessment refers to planning policy guidance (e.g. NPPF) to relate the ecological value of the site and identify appropriate and proportionate ecological enhancement in line with both national and local policy.

2.3.6 When describing impacts on ecosystem structure and function, reference is made to the following aspects where appropriate:

1. extent;
2. magnitude;
3. duration;
4. reversibility; and
5. timing and frequency.

2.3.7 Understanding the nature of the impact enables determination of the effect on the ecological integrity of the ecological receptor. This in turn is assessed against the importance of the receptor to determine the significance of the effect on nature conservation interests as being (i) not significant, or (ii) a significant positive or adverse impact.

2.4 Limitations

Desk Based Assessment

2.4.1 The desk study data is third party controlled data, purchased for the purposes of this report only. RPS cannot vouch for its accuracy and cannot be held liable for any error(s) in these data.

Survey

2.4.2 It should be noted that whilst every effort has been made to provide a comprehensive description of the site, no investigation can ensure the complete characterisation and prediction of the natural environment.

2.4.3 The protected/notable species assessment provides a preliminary view of the likelihood of these species occurring on the site, based on the suitability of the habitat, known distribution of the

species in the local area provided in response to our enquiries and any direct evidence on the site. It should not be taken as providing a full and definitive survey of any protected/notable species group.

Accurate Lifespan of Ecological Data

- 2.4.4 The majority of ecological data remain valid for only short periods due to the inherently transient nature of the subject. The survey results contained in this report are considered accurate for two years, assuming no significant considerable changes to the site conditions.

3 RESULTS

3.1 Designated Sites

3.1.1 There are no statutory designated sites for nature conservation value within 2 km of the site.

3.1.2 43 non-statutory sites are located within the 2 km search radius of the site.

3.1.3 A summary of these sites is provided in Table 3.1 below and the location of each site is detailed in Figure 3.1.

Table 3.1: Designated sites within 2 km of the study area

Number on Figure 3.1	Site name	Type	Interest Features	Distance from site (km)
Non-statutory Sites				
0	Stakes Coppice Remnant 2	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	0.8 km north-west
1	Stakes Coppice Remnant 7	SINC	Designated for containing areas of ancient semi-natural woodland, and an area of wildlife value to the local community.	0.95 km north
2	Portsmouth City Golf Course Copse	SINC	Designated for having remnant areas of ancient, semi-natural woodland present. The site also supports one or more notable species.	1.15 km south
3	Stakes Coppice Remnant 5	SINC	Designated for containing areas of ancient semi-natural woodland, and contains areas of woodland of restricted distribution across the county.	0.8 km north
4	Neville's Park West Wood	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	0.4 km north
5	Littlepark Wood (East)	SINC	Designated for containing areas of ancient semi-natural woodland.	1.4 km north-west
6	Stakes Coppice Remnant 1	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	1.5 km south
7	Field East of Farlington Redoubt (North)	SINC	Designated for containing areas of unimproved grassland.	1.3 km north-west
8	Stakes Coppice Remnant 4	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	1.1 km north-west
9	Frank's Coppice	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	1.1 km north
10	Land to the north of Portsdown Hill Road	SINC	Contains areas of woodland of restricted distribution across the county. The site also supports one or more notable species.	1.2 km south
11	Stakes Coppice Remnant 6	SINC	Designated for containing areas of ancient semi-natural woodland.	1.3 km south
12	Camp Down Grassland Remnants	SINC	Designated for containing areas of unimproved grassland.	0.8 km north
13	Beech Wood East	SINC	Designated for having remnant areas of ancient, semi-natural woodland present.	1.8 km south-west

Number on Figure 3.1	Site name	Type	Interest Features	Distance from site (km)
14	Fort Purbrook	SINC	Contains areas of agriculturally unimproved grassland. The site also supports one or more notable species.	1.4 km north
15	Sandy Dell	SINC	Designated for containing areas of ancient semi-natural woodand.	1.4 km south-west
16	Fort Purbrook Paddock 1 (Havant)	SINC	Designated for containing areas of agriculturally unimproved grassland. The site also supports one or more notable species.	1.6 km south
17	Fort Purbrook Paddock 3 (Havant)	SINC	Designated for containing areas of agriculturally unimproved grassland	1.6 km south
18	Fort Purbrook Paddock 4 (Havant)	SINC	Designated for containing areas of agriculturally unimproved grassland	1.7 km north
19	Hurst Wood, Havant	SINC	Designated for containing areas of ancient semi-natural woodand.	1.0 km north-west
20	Newlease Copse, Havant	SINC	Designated for containing areas of ancient semi-natural woodand.	1.7 km south-west
21	Purbrook Park Wood	SINC	Designated for containing areas of ancient semi-natural woodand.	1.0 km west
22	Johnston's Coppice	SINC	Designated for containing areas of ancient semi-natural woodand. The site also supports one or more notable species.	0.5 km south-west
23	Gundymoor Wood (West)	SINC	Designated for containing areas of ancient semi-natural woodand.	0.3 km west
24	Hulbert Road Meadow	SINC	Designated for containing areas of unimproved grassland.	0.4 km south
25	Gundymoor Wood (Main)	SINC	Designated for containing areas of ancient semi-natural woodand.	500m north
26	Littlepark Wood (West)	SINC	Designated for containing areas of ancient semi-natural woodand. The site also supports one or more notable species.	1.6 km south
27	Portsmouth Golf Course West	SINC	Designated for containing areas of unimproved grassland.	0.3 km south
28	Portsmouth Golf Course East	SINC	Designated for containing areas of unimproved grassland.	1.6 km south-west
29	Outhurst/Inhurst/Beech Woods	SINC	Designated for containing areas of ancient semi-natural woodand.	1.9 km south-west
30	East and West of Gillman Road	SINC	Designated for containing areas of agriculturally unimproved grassland	1.3 km north
31	Field to West of Gillman Road	SINC	The site supports one or more notable species.	1.8 km south
32	Bushy Lease	SINC	Designated for containing areas of ancient semi-natural woodand.	1.9 km south-west
33	Neville's Park Areas 4-10	SINC	Designated for having remnant areas of ancient, semi-natural woodland present. The site is also designated for containing areas of unimproved grassland.	0.62 km north-east

Number on Figure 3.1	Site name	Type	Interest Features	Distance from site (km)
34	Neville's Park Areas 2 & 3	SINC	Designated for containing areas of agriculturally unimproved grassland.	0.4 km east
35	Cherry Tree Row	SINC	Designated for containing areas of ancient semi-natural woodland.	0.6 km north
36	The Warren, Havant	SINC	Designated for having remnant areas of ancient, semi-natural woodland present. The site also contains areas of woodland of restricted distribution across the county.	1.1 km north
37	Meadow Adjacent to Johnston's Copse	SINC	Designated for containing areas of ancient semi-natural woodland. The site also supports one or more notable species populations.	1.6 km north-east
38	Fields off Havant Road	SINC	The site supports one or more notable species.	0.1 km west
39	Neville's Park East Wood	SINC	Designated for containing areas of ancient semi-natural woodland.	1.7 km south-west
40	Fort Purbrook Paddock 2 (Havant)	SINC	The site also supports one or more notable species.	0.2 km north
41	Meadow by Bells Copse	SINC	Designated for containing areas of agriculturally unimproved grassland.	1.9km north-east
42	Dunsbury Hill Wood	SINC	Contains areas of woodland of restricted distribution across the county.	1.9 km north-east
43	Cabbagefield Row	SINC	Designated for containing areas of ancient semi-natural woodland.	2.0 km north-east

3.2 Species

- 3.2.1 Records of protected species were obtained from HBIC. A number of species of conservation importance or otherwise notable were recorded within the 2 km search radius of the site. A summary of these records is provided below in Table 3.2.
- 3.2.2 In order to simplify the results, only records of species from the last 10 years are shown. In addition, only data with a 6 figure grid reference resolution or higher are provided, since locations given at a lower resolution do not allow accurate calculation of distance to the site boundary.
- 3.2.3 No records were returned from within the site itself.

Table 3.2: Species records summary from the last 10 years within 2 km of the site

Species	Number of records
Birds	624
Invertebrates	67
Flora	38
Mammals	19
Bats	249
Reptiles	2
Amphibians	1

3.3 Phase 1 Habitat Survey

- 3.3.1 The survey results are presented in the form of a map with the habitat types and boundary features marked (Figure 3.2).
- 3.3.2 Descriptions of the habitat types and boundary features are detailed below. Habitat descriptions are defined by broad habitat types (JNCC, 2010).

Neutral grassland

- 3.3.3 The northern section of the site comprised an area of neutral grassland, part of which was on a steep, north facing bank. The grassland on the bank was more species-rich than the other areas (TN1, Figure 3.2). Dominant graminoid species included false oat grass *Arrhenatherum elatius*, tall fescue *Festuca arundinacea*, red fescue *Festuca rubra*, common bent *Agrostis capillaris* and Yorkshire fog *Holcus lanatus*. There were also a large number of wildflowers present, including: ox-eye daisy *Leucanthemum vulgare*, pyramidal orchid *Anacamptis pyramidalis*, common spotted orchid *Dactylorhiza fuchsii*, black medic *Medicago lupulina*, field vetch *Vicia sativa*, creeping buttercup *Ranunculus repens*, ribwort plantain *Plantago lanceolata*, dock *Rumex sp.*, yarrow *Achillea millefolium*, white clover *Trifolium repens*, birdsfoot trefoil *Lotus corniculatus*, bugle *Ajuga reptans*, ragwort *Jacobaea vulgaris*, wild strawberry *Fragaria vesca*, and teasel *Dipsacus sp.*.
- 3.3.4 The area on top of the slope (TN2, Figure 3.2) was dominated by the same grass species as mentioned above, but with less wildflowers present, and a slightly higher %coverage of scrub (bramble *Rubus sp.*, and hawthorn *Crataegus monogyna*).
- 3.3.5 A thin strip of common nettles *Urtica dioica* was present along the southern most area of grassland, where it graded into dense scrub.

Dense Scrub

- 3.3.6 Much of the central area of the site comprised dense scrub, and was comprised of bramble, dogrose *Rosa canina*, hawthorn, blackthorn *Prunus spinosa* and gorse *Ulex sp.*.
- 3.3.7 Other areas of scattered scrub were present within the neutral grassland, and largely comprised hawthorn and low-level brambles.
- 3.3.8 A strip of scattered scrub runs alongside the western boundary of the site, adjacent to the B&Q entrance road, this is mainly comprised of ivy *Hedera helix* and dogwood *Cornus sanguinea*, although there are also scattered pyramidal orchids and wildflower species present.
- 3.3.9 Aerial photography (Google Earth, 2020), shows that this central area was cleared in 2008, and has since recolonised.

Scattered Trees / Broadleaved woodland

- 3.3.10 A large number of scattered trees were present on site, situated within the grassland were a number of mature pine *Pinus sp.*, species.
- 3.3.11 The remaining scattered trees were present around the site boundaries, and resembled a mature broadleaved woodland treeline strip. Historic Images from Google Earth (2020), confirms this to be the case.
- 3.3.12 Species here included pine, ash *Fraxinus excelsior*, birch *Betula sp.*, elm *Ulmus sp.*, hawthorn, blackthorn, hazel *Corylus avellana*, apple *Malus sp.*, whitebeam *Sorbus aria*, goat willow *Salix caprea*, oak *Quercus sp.*, and beech *Fagus sylvatica*.
- 3.3.13 Along the eastern boundary of the site (adjacent to the B&Q car park), trees (comprising similar species to those mentioned above), were present alongside the top of a retaining wall.

3.4 Ecological Scoping Survey

Amphibians

- 3.4.1 The site provides suitable terrestrial habitat for amphibians (the grassland and scrub). However, Google Maps (2020) and MAGIC (2020) do not identify any ponds within 500 m of the site, and there are no GCN records from within 500 m of the site in the last ten years.
- 3.4.2 Further to this, the site is fairly isolated in the context of the wider landscape, being surrounded by the B&Q entrance road, car park and Purbrook Way. Therefore, no further survey work is considered to be necessary.

Birds

- 3.4.3 The dense scrub, scattered trees and thicket on site all provide suitable nesting habitat for birds. Recommendations for further survey work are made in Section 4.

Dormice

- 3.4.4 There was no evidence of dormice *Muscardinus avellanarius* found on the site. However, the scrub on site provides suitable habitat for dormice, and the treeline would also provide suitable habitat.
- 3.4.5 Information about the dormouse presence in the local area was found in an ecological report for a nearby site (WYG, 2019), which noted that three Natural England licences are present in the surrounding area, including one, circa 300m east of the application site (Licence reference 2014-3156-EPS-MIT).
- 3.4.6 Given that the area for which this licence covers is connected to the proposed development area, it is likely that dormice could also be using the application site; and so, further survey work is recommended in Section 4.

Bats

- 3.4.7 All species of bat present in the UK receive full protection under The Conservation of Habitats and Species Regulations 2010, and the Wildlife and Countryside Act 1981 (as amended). A number of bat species are also listed in Section 41 of the NERC Act 2006. These include the widespread species Soprano Pipistrelle *Pipistrellus pygmaeus* and Brown Long-eared bat *Plecotus auritus*, and the rarer woodland species such as Bechstein *Myotis bechsteinii* and Barbastelle *Barbastella barbastellus*.
- 3.4.8 There were no buildings on site. The trees on site were all assessed for their bat roosting suitability, although none were found to have any.
- 3.4.9 The mosaic of habitats provide good commuting and foraging habitat, although the location of the site (in such an urban area, with prominent street lighting and roads), combined with the small size of the site, make it extremely unlikely that bats would make use of the site.
- 3.4.10 The local plan for the area (Havant Borough Council, 2014) identifies the site (C11) as having the potential to support foraging Bechsteins' bats.
- 3.4.11 The closest record of a Bechsteins' bat is 1.4 km north of the site, within Nevilles Park Wood. Bechstein's, have a known foraging range of circa 1.5 km, very rarely travelling further between the roost and foraging site (Schofield and Morris, 2000). It is noted however, that there could be more local roosts of Bechsteins to the site, for which there is no evidence, or the records have not been submitted.
- 3.4.12 However, it is widely recognised that Bechsteins' are primarily woodland species, with nearly all of their foraging occurring under closed canopy habitats (Harris and Yalden, 2008).
- 3.4.13 The site is dominated by low level dense scrub and grassland, with a thin (circa 15m wide) stretch of young broadleaved woodland on the southern and western boundaries. The woodland strips,

however, are currently heavily lit overnight (being adjacent to roads), and noisy, and so the likelihood of any Bechsteins' using these for foraging is considered to be extremely low.

- 3.4.14 In addition to this, if Bechsteins' were to be present on site, the mitigation for this would involve the retention and enhancement of the woodland strips. This is reflected in the current layout, with only a small section removed to facilitate the entrance. Existing lighting alongside the access will not be greater than the levels which are currently present alongside the road to serve B&Q, to ensure that the species will continue to use the site, if present.
- 3.4.15 It is recommended that a bat mitigation strategy be recommended as a condition of the application, to ensure that, if presents, bats can continue to use the site, post-development.

Badgers

- 3.4.16 No evidence of badgers were found on the site. Recommendations are made in Section 4.

Reptiles

- 3.4.17 The grassland on site provided a small area of suitable habitat for reptiles, however, given the isolated nature of the site (being surrounded by roads / built development on all sides), it is not considered that a population of reptiles would be present. Therefore, no further survey work is considered necessary.

4 EVALUATION AND POTENTIAL IMPACTS

4.1 Designated sites

- 4.1.1 There are no statutory designated sites within 2 km of the application boundary, and therefore, no constraints to the proposed development of the site in this respect.
- 4.1.2 There are 44 non-statutory designated sites within 2 km of the application boundary; the closest of these being 500m north of the application boundary and designated for containing ancient woodland.
- 4.1.3 Given that the intervening habitats include a heavily used entrance / exit road for B&Q, and the storage yard for B&Q, it is unlikely that the development of the site will cause any impacts (such as noise or light disturbance) above those currently present in the surrounding area.

4.2 Species

Dormice

- 4.2.1 Dormice receive full protection under The Conservation of Habitats and Species Regulations 2010, and the Wildlife and Countryside Act 1981 (as amended). They are also listed in Section 41 of the NERC Act 2006.
- 4.2.2 The site offers suitable habitat for dormice, with a known population circa 300m to the east of the site. Therefore, further survey work should be undertaken, as much of the central area of scrub is to be removed to facilitate the development.
- 4.2.3 This would involve setting out nest tubes around the site in areas of suitable habitat and checking them once a month between April to September.

Birds

- 4.2.4 Breeding birds are protected by the Wildlife and Countryside Act 1981 (as amended). Under this legislation it is an offence to intentionally kill, injure or take the birds or their eggs, or to intentionally destroy or disturb a nest, when it is in use or being built.
- 4.2.5 The site has suitable habitat for nesting birds. Therefore, any vegetation clearance should take place outside of the breeding bird season, which is generally considered to be from March to August inclusive. If this is not possible, prior to removal, such vegetation should first be checked for the presence of nesting birds by an experienced ecologist. If any nests are found, they would have to be left undisturbed until the chicks had fledged (usually around six weeks).

Badgers

- 4.2.6 Badgers and their setts are protected by the Protection of Badgers Act 1992. This makes it a criminal offence to kill/injure a badger, interfere with or damage a sett or disturb a badger occupying a sett.
- 4.2.7 This legislation effectively prevents development on a site where badger activity occurs without mitigation being agreed and carried out prior to construction works. If a sett is likely to be disturbed or destroyed a licence will be required from Natural England and options to minimise impact to the species should be considered.
- 4.2.8 No evidence of badgers was recorded on site during the duration of the survey; however, in order to ensure that no badgers are harmed during the site clearance, it is recommended that the scrub be cleared under the watching brief on an ecologist, and if any evidence of badgers are found; works cease until a suitable licence can be obtained from Natural England.

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APPENDICES

Appendix 1 – Relevant Legislation

GREAT CRESTED NEWTS

Great crested newts *Triturus cristatus* are listed on Schedule 5 of the Wildlife and Countryside Act 1981 (and as amended), which affords the species protection under Section 9. The species is also listed on Schedule 2 of the Conservation of Habitats and Species Regulations 2017. In combination, this makes it an offence to:

- intentionally kill, injure or take (capture etc.) a great crested newt;
- possess a great crested newt; and
- intentionally or recklessly damage, destroy, obstruct access to any structure or place used by Great Crested Newt for shelter or protection, or disturb any animal occupying such a structure or place; and sell, offer for sale, possess or transport for the purpose of sale (live or dead animal, part or derivative) or advertise for buying or selling such things.

Great crested newts are also listed on the UKBAP as a Priority Species and are listed as a species of principal importance for biodiversity in England & Wales under Section 41 of the Natural Environment & Rural Communities Act (2006).

REPTILES

All common UK reptile species (Adder *Vipera berus*, grass snake *Natrix Helvetica*, common lizard *Zootoca vivipara* and slow worm *Anguis fragilis*) are protected through part of Section 9(1 and 5) of the Wildlife & Countryside Act 1981 (as amended). This prohibits:

- Intentional or reckless injuring or killing;
- Selling, offering or exposing for sale, or having in possession or transporting for the purpose of sale, any live or dead wild animal or any part of, or anything derived from, such an animal; or
- Publishing or causing to be published any advertisement likely to be understood as conveying buying or selling, or intending to buy or sell, any of those things.

BIRDS

All birds, their nests and eggs are afforded protection under the Wildlife and Countryside Act 1981, as updated by the Countryside and Rights of Way Act 2000. It is an offence to:

- intentionally kill, injure or take any wild bird;
- intentionally take, damage or destroy the nest of any wild bird while it is in use or being built; and
- intentionally take or destroy the egg of any wild bird.

Schedule 1 birds cannot be intentionally or recklessly disturbed when nesting and there are increased penalties for doing so. Licences can be issued to visit the nests of such birds for conservation, scientific or photographic purposes but not to allow disturbance during a development even in circumstances where that development is fully authorised by consents such as a valid planning permission.

BATS

All British bat species are fully protected under Schedule 5 of the Wildlife and Countryside Act 1981, as updated by the Countryside and Rights of Way Act 2000. All British bats are also included on Schedule 2 of The Conservation of Habitats and Species Regulations 2017 as European Protected Species. It is an offence to:

- intentionally or recklessly kill, injure or capture bats;
- deliberately or recklessly disturb bats (whether in a roost or not); and

-
- damage, destroy or obstruct access to bat roosts

A roost is defined as 'any structure or place which [a bat] uses for shelter or protection'. As bats tend to reuse the same roosts, legal opinion is that a roost is protected whether or not bats are present at the time of survey.

A licence will therefore be required by those who carry out any operation that would otherwise result in offences being committed.

The following bat species are listed as being of principal importance for the conservation of biodiversity in England, (commonly referred to as UKBAP Priority species): Barbastelle, Bechstein's, Noctule, Soprano Pipistrelle, Brown Long-eared, Greater Horseshoe, and Lesser Horseshoe.

BADGER

Badgers are protected under the Protection of Badgers Act 1992. This act is based on the need to protect badgers from baiting and deliberate harm or injury. The act makes it an offence to:

- Wilfully kill, injure, take, possess or cruelly ill-treat a badger, or attempt to do so; and
- Intentionally or recklessly interfere with a sett. Sett interference includes disturbing badgers whilst they are occupying a sett, as well as damaging or destroying a sett or obstructing access routes.

A sett is defined as "any structure or place that displays signs indicating current use by a badger".

DORMOUSE

Hazel dormouse *Muscardinus avellanarius* is fully protected under Schedule 2 of the Conservation of Habitats and Species Regulations 2017. The Regulations prohibit:

- Intentionally, recklessly or deliberately kill, injure or take a dormouse;
- The deliberate disturbance of this species in such a way as to be significantly likely to affect:
 - Their ability of to survive, hibernate, migrate, breed, or rear or nurture their young; or;
 - The local distribution or abundance of dormice.
- Damage or destruction of a breeding site or resting place (nest);
- The possession or transport of Dormice or any other part of.

Dormice are also protected under the Wildlife and Countryside Act 1981 (as amended) through their inclusion in Schedule 5. Under the Act, they are protected from:

- Intentional or reckless disturbance (at any level);
- Obstruction of access to any place of shelter, breeding or rest;
- Selling, bartering or exchange of these species, or parts of.

Offences can be deliberate, intentional or reckless and penalties for any of the above include fines of up to £5k and imprisonment of up to 6 months, per animal affected.

Dormice are also listed on Section 41 of the NERC Act 2006 as a Species of Principal Importance; national objectives & targets include the maintenance of the geographical range and viability of existing Dormice populations to ensure that it remains in favourable conservation status.

Appendix 2 – BREEAM Report



**LIDL, PURBROOK ROAD,
HAVANT:**

**BREEAM NEW
CONSTRUCTION: ECOLOGY**

October 2020

Our Ref: ECO01347_872

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EXECUTIVE SUMMARY

RPS was commissioned by Lidl Great Britain Limited to complete the ecological component of the BREEAM 2018 New Construction (BRE 2018) assessment of the proposed new Lidl store, off of Purbrook Road, Havant, Hampshire.

The assessment is based on the Preliminary Ecological Appraisal of the site, undertaken in August 2020 (RPS, 2020). Pre-development, the site comprised largely of scrub, with a small patch of neutral grassland and ruderal vegetation, along with scattered trees and a thin broadleaved woodland strip.

A range of recommendations are made within the report, with the aim of increasing the ecological value of the site, post development, in line with the intent of the BREEAM process.

Under the ecological component of the BREEAM 2018 New Construction assessment of the proposed Lidl development, the existing situation was compared with the situation that is predicted upon completion of the development. It is concluded the site can be awarded at least six credits:

- LE1 – 0 credits for site selection, a second credit TBC;
- LE2 – 1 credit for survey and evaluation, 1 credit for determining the ecological outcomes of the site;
- LE3 – 2 credits for managing negative impacts on ecology;
- LE4 – 0 credits for change and enhancement of ecological value of the site;
- LE5 – 2 credits for long term impact on biodiversity.

Confirmation that the developer has complied with the recommendations and suggestions will be provided separately, on completion of the works.

1 INTRODUCTION

Background to the study

- 1.1 RPS was commissioned by Lidl Great Britain Limited to complete the BREEAM assessment of the proposed Lidl development, in Havant, Hampshire, in relation to the ecology credits available under the BREEAM New Construction 2018 guidelines (BRE 2018).
- 1.2 Pre-development, the site consisted mainly of dense scrub, with small areas of semi-improved neutral grassland, and ruderal vegetation. A thin strip of broadleaved woodland was present along the southern boundary (RPS, 2020).

Aim of the study

- 1.3 The assessment is based on a previous detailed Preliminary Ecological Assessment of the site undertaken by RPS in August 2020 (RPS, 2020).
- 1.4 The aim of the study was to examine the 2018 BREEAM New Construction assessment criteria and to provide an indication of the number of ecology credits which are available, including recommendations for ecological enhancement measures, and the actions required to obtain them.

Study area

- 1.5 The site is located to the north-west of Havant (OS grid reference SU 6941 0778). The site is bordered by B&Q to the east, Purbrook Way to the south, and the B&Q access road to the north and west. Generally, the surrounding area is urban in character, although north of the site is Neville's Park Wood.

2 BREEAM NEW CONSTRUCTION: ECOLOGY

Suitably Qualified Ecologist

- 2.1 This report has been completed by Hannah Knight who holds a BSc and MSc in Biodiversity Conservation, is an Associate Member of the Institute of Ecology and Environmental Management and has over six years' experience as an ecologist in relation to development. She is therefore a Suitably Qualified Ecologist (SQE), as defined by BRE.

Appointment of SQE

- 2.2 The SQE was appointed to the project in October 2020, prior to any development and in consultation with the proposed timeline. It is considered that the SQE was appointed at an appropriate time to be able to influence the final design in favour of biodiversity.

LE1: Site Selection

Credit 1: Previously occupied land

- 2.3 This credit is awarded if the development is on land which, in the last 50 years previously consisted of at least 75% previous development. At the time of the RPS Preliminary Ecological Appraisal, the majority of the site comprised dense scrub, broadleaved woodland and neutral grassland. Under the BREEAM New Construction guidelines 2018, this does not qualify as re-use of land, and therefore, this credit cannot be awarded.

Credit 2: Contaminated Land

- 2.4 This credit is awarded if the development is on land which, has been confirmed to be contaminated by a specialists' site investigation. This credit is outside the scope of this report, and therefore could only be awarded after investigation by a suitably qualified expert. Therefore, at this stage, it cannot be awarded.

- 2.5 **Conclusion: 0 credits awarded, credit 2 TBC.**

LE2: Identifying and Understanding the Risks and Opportunities for the Project

Credit 1: Survey and Evaluation

Survey

- 2.6 A SQE has been appointed at an early stage in the design process. A walkover survey assessing the habitats on site and in the immediate vicinity was undertaken in August 2020. This assessed the current and potential ecological value and condition of the site and related areas within the zone of influence. The survey also looked at direct and indirect risks to current ecological value of the site, and capacity and feasibility for enhancement of the ecological value of the site, as well as areas within the zone of influence.
- 2.7 This Preliminary Ecological Appraisal will be used to share information with the design team, and inform the site preparation, design and construction works. Briefly, it details:

- zone of influence for the site;
- the current flora and fauna;
- the quality habitat extent, connectivity and fragmentation;
- existing policies relating to the site / ecological initiatives; and
- identification and consultation with the relevant stakeholders.

2.8 Historic site information is not discussed within the Preliminary Ecological Appraisal, but briefly, historic 1895 Ordnance Survey maps indicate that the site has always been an open area of land, historically dominated by scrub.

Evaluation

2.9 The site is assessed as being of moderate ecological value, dominated by dense scrub, with a small area of neutral grassland with scattered ruderal vegetation. The southern boundary has a thin strip of broadleaved woodland. The dense scrub and woodland offer suitable habitat to support common species of nesting birds, and also dormice. A search of the planning portal found reference to a dormouse population circa 300m east of the application site.

2.10 Direct risks to the site and surrounds include impacts upon dormice and nesting birds. Full details on further survey work and the mitigation strategies regarding dormice and nesting birds can be found in the Preliminary Ecological Appraisal for the site (RPS, 2020).

2.11 No direct risks are anticipated to the offsite habitats.

2.12 Indirect risks to offsite habitats could include noise, dust and light pollution. Given the extremely urban nature of the site, it is not expected that any noise or light pollution will be present above that which is already present in the immediate surrounds during the construction phase of the development.

2.13 Dust pollution will be prevented via implementing all good dust suppression methods.

2.14 There is room for the site to be enhanced for ecology, post-development, and the SQE has liaised with the project landscape architects to ensure that native landscaping buffers have been included on site, as well as a series of bird and bat boxes. The species chosen are of particular benefit to dormice and will enhance the connectivity of the site to the wider off-site landscape.

Credit 1 - Conclusion

2.15 Using a combination of the Preliminary Ecological Appraisal, and the historic data, it is concluded that the initial ecological survey and evaluation has been undertaken in accordance with the 2018 BREEAM New Construction guidelines, and therefore, **this credit can be awarded.**

Credit 2: Determining the ecological outcomes for the site

2.16 To support the optimisation of ecological outcomes for the site, relevant liaison has been undertaken with the design team, including planners, architects, and landscape architects. This has included enhancing the ecological value of the site, ensuring improved connectivity, and the creation of more valuable habitats. In this instance, this has involved removing the dense scrub,

and replacing areas with native shrub planting, to encourage invertebrates, birds and bats onto the site.

- 2.17 The dormouse habitat removal will be overseen by a suitably licenced ecologist, and will take place between May – October, when dormice are active. The habitat will be removed following standard good-practice methodology, following a fingertip search of the habitat. Details are set out in the Ecological Appraisal, RPS 2020, and if needed, in accordance with the Natural England licence.
- 2.18 Wider site sustainability and ecosystem services benefits have been considered within the design process, in particular, the landscape design will enhance the biodiversity of the site, as well as the green infrastructure to offsite adjacent habitats through improved connectivity. This will be delivered through the additional native planting along the boundaries of the site.
- 2.19 No noise, water quality, or air quality control measures have been discussed, as these issues are not considered to be relevant to this application site, given the highly urban setting.

Credit 2 – Conclusion

- 2.20 It is considered that the optimisation of ecological outcomes for the site has been properly considered during the design stage, and therefore, the second credit can be awarded.

2.21 **Conclusion: 2 credits to be awarded.**

LE3: Managing negative impacts on ecology

Planning, liaison, implementation and data

- 2.22 Roles and responsibilities for managing negative impacts on the ecology are clearly defined and allocated to support successful delivery of project outcomes at an early enough stage to influence the Preparation and Brief or Concept Design.
- 2.23 Potential impacts were discussed above in the evaluation section of LE02 and have been identified at an early stage of the project. A Construction Environmental Management Plan (CEMP) will be written and implemented, and will cover mitigation measures to prevent pollution, run-off or dust spread from the development.
- 2.24
- 2.25 In order to protect bird nests and comply with the law protecting them, any clearance of the arable field or vegetation removal should take place outside of the breeding bird season, which is generally considered to be from March to August inclusive. If this is not possible, prior to removal the area should first be checked for the presence of nesting birds by an experienced ecologist. If any nests are found, they will be left undisturbed until the chicks had fledged (usually around six weeks).
- 2.26 The mitigation strategy regarding dormice will be completed on receipt of the survey results but will likely include the habitat removal will be overseen by a suitably licenced ecologist, and will take place between May – October, when dormice are active. The habitat will be removed following standard good-practice methodology, following a fingertip search of the habitat. Details are set out

in the Ecological Appraisal, RPS 2020, and if needed, in accordance with the Natural England licence.

Credit 1 – Conclusion

- 2.27 Considering all of the above, the project team, have liaised and collaborated with representative stakeholders and, taking into consideration data collated and shared, have proposed solutions and selected measures to be implemented during site preparation and construction works.

Managing negative impacts of the project

- 2.28 Negative impacts from site preparation and construction works have been managed, as described above. The vegetation clearance will be timed to avoid any impacts to nesting birds, reptiles and dormice. No other impacts are anticipated.
- 2.29 The change in ecological value occurring as a result of the project was calculated in accordance with the process set out in GN36 – BREEAM, CEEQUAL and HQM Ecology Calculation Methodology – Route 2. As the total impact will be greater than 0.05 ha, the full methodology will be used.

Credits 2 and 3 – Conclusion

- 2.30 As criteria 2 and 4 of the BREEAM 18 New Construction guidelines have been achieved, the first two credits can be awarded.
- 2.31 As the post-development score is 19.16% of the pre-development score, the third credit cannot be awarded.
- 2.32 **Conclusion: 2 credits to be awarded.**

LE4: Change and enhancement of ecological value

Change and enhancement of ecology

- 2.33 Up to three credits can be awarded based on the calculation of the change in ecological value occurring as a result of the project. This was calculated in accordance with the process set out in GN36 - BREEAM, CEEQUAL and HQM Ecology Calculation Methodology – Route 2. Credits are awarded as follows:
- 6.a: Minimising loss of ecological value (one credit - percentage score of 75-94);
 - 6.b: No net loss of ecological value (two credits - percentage score of 95-104);
 - 6.c: Net gain of ecological value (three credits - percentage score of 105-109);
 - Above a percentage score of 110, an exemplary level credit is awarded.
- 2.34 The total area of the development footprint is 12,704 m².
- 2.35 The ecological value of the species on site pre-development is detailed below, Table 1, this gives the site a pre-development score of **101,272** biodiversity units.

Table 1 - Ecological value of site pre-development

Habitat	Area (m ²)	Distinctiveness	Condition	Biodiversity Units
Neutral grassland	2,620	Medium (4)	Moderate (2)	20,960
Ruderal vegetation	60	Low (2)	Poor (1)	120
Dense scrub	8,218	Medium (4)	Moderate (2)	65,744
Broadleaved woodland	1,806	Medium (4)	Moderate (2)	14,448
Total Units	12,704m²	-	-	101,272

Table 2 – Post development biodiversity units lost

Habitat	Area Lost (m ²)	Distinctiveness	Condition	Biodiversity unit Lost Due To Development (Distinctiveness x Condition x Area (m ²) lost)
Neutral grassland	2,620	Medium (4)	Moderate (2)	20,960
Ruderal vegetation	60	Low (2)	Poor (1)	120
Dense scrub	7,598	Medium (4)	Moderate (2)	60,784
Broadleaved woodland	-	Medium (4)	Moderate (2)	-
Total Units Lost				81,864

2.36 Pre-development (101,272) – units lost (81,864) = 19,408 + units created (0) = 19,408

2.37 $19,408 / 101,272 \times 100 = 19.16\%$

Conclusion

2.38 As the post-development score is only 19.16% of the pre-development score, 0 credits can be awarded, as per the 2018 BREEAM New Construction Guidelines.

2.39 **Conclusion: 0 credits to be awarded.**

LE5: Long-term ecology management and maintenance

Planning, liaison, data, monitoring and review management and maintenance

2.40 The project team, in consultation with RPS ecologists, will monitor and review the effectiveness with which the plans for LE 03 & LE 04 are implemented. This will include ongoing maintenance and management of the site, to ensure that the ecological measures continue to act as required.

Landscape and Ecology Management Plan

2.41 An appropriate ecological management plan will be produced, in accordance with the BREEAM report.

Scope of management plan

2.42 Briefly, the management plan will cover the first five years after completion of the development. It will provide details of the necessary actions required in order that the ecological enhancements suggested within this report are maintained. Also, so that habitats present on site are managed to the benefit of wildlife while still having regard to other factors such as usage requirements.

2.43 The key responsibilities are to:

- maintain the habitats as required; and
- ensure all works are undertaken with biodiversity benefit in mind.
- Identification and guidance to trigger appropriate remedial actions to address previously unforeseen impacts
- Clearly defined and allocated roles and responsibilities

2.44 **Conclusion: 2 credits can be awarded in respect of long-term biodiversity impact.**

3 CONCLUSIONS

- 3.1 Under the ecological component of the BREEAM New Construction (2018) assessment of the development, the existing situation was compared with the situation that is predicted upon completion. It is therefore concluded that the site can be awarded at least six credits:
- LE1 – 0 credits for site selection, a second credit TBC;
 - LE2 – 1 credit for survey and evaluation, 1 credit for determining the ecological outcomes of the site;
 - LE3 – 2 credits for managing negative impacts on ecology;
 - LE4 – 0 credits for change and enhancement of ecological value of the site
 - LE5 – 2 credits for long term impact on biodiversity.
- 3.2 Written consent confirming the developer's has complied with the recommendations will be provided in due course.

4 REFERENCES

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