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MolFarma, Norwich Research Park North

Preliminary Ecological Appraisal

Report for NRP LLP

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Executive Summary

- The Ecology Consultancy was commissioned by Norwich Research Park LLP in April 2015 to undertake a Preliminary Ecological Appraisal (PEA) of a parcel of land within the Norwich Research Park (NRP) North site, to the south of Norwich.
- The proposals are to construct new science and research buildings in line with the existing Masterplan for the site. The MolFarma building is anticipated to have a development footprint of approximately 1500m² with an option of expansion space to be used for the MolFarma building or to construct a new freestanding structure with approximately half the footprint of the MolFarma unit.
- A habitat survey of the site was carried out on the 10th April 2015. It covered the entire red-line site including boundary features. Habitats were described following standard Phase 1 Habitat survey methodology (JNCC, 2010) and assessed against Habitat of Principal Importance criteria as set-out by the JNCC (<http://jncc.defra.gov.uk/page-5706>). The potential of the site to support legally protected or otherwise noteworthy species was assessed from field observations carried out at the same time as the habitat survey, combined with the results of the desk top study.
- The site is approximately 1.15 ha in size, bounded to the north by the B1108 Watton Road, to the east by Colney Lane, to the south by car parks and offices and laboratories associated with the science park and to the west by scrub and secondary woodland. The habitats on site comprise areas of mown amenity grassland, rough grassland with patches of tall herbs, secondary woodland, planted shrubs and trees. In addition, the Hill House building is within the redline boundary but is not likely to be affected by the proposed works.
- The intrinsic conservation value of the habitats within the development footprint is generally considered to be negligible. They are common and widespread and exist locally as either larger areas or areas of higher quality than the site. The conservation value of the habitats within the wider site are generally considered to be important at the site level only. The habitats present have potential to support low numbers of protected species which have a value within the context of the site but are not considered rare or unusual.
- There is potential for bats and nesting birds to be present within the development footprint and the wider site.

- Felling of mature trees identified with bat potential should be carried out in a controlled way and limbs with cracks, fissures or cavities should be carefully lowered to the ground for inspection by a licenced bat ecologist.
- Any vegetation clearance should be undertaken outside of the bird nesting season (which runs from 1st March to the 31st August, inclusive) where appropriate. If this is not possible a detailed inspection for nesting birds should be carried out no more than 24 to 48 hours prior to any vegetation removal works being undertaken.

1 Introduction

BACKGROUND TO COMMISSION

- 1.1 The Ecology Consultancy was commissioned by Norwich Research Park LLP in April 2015 to undertake a Preliminary Ecological Appraisal (PEA) of a parcel of land within the Norwich Research Park (NRP) North site, to the south of Norwich. The appraisal was carried out in order to provide baseline ecological information about the site and to identify any potential ecological constraints associated with the proposed development.

SCOPE OF THE REPORT

- 1.2 The purpose of this PEA is to support a planning application at the site and to provide recommendations for further surveys and/or mitigation to ensure that the development complies with relevant nature conservation legislation and planning policy. It is based on a Phase 1 habitat survey (JNCC, 2010) of the site red-line boundary and immediate surrounds to map habitats and identify features with potential to support protected or noteworthy species.
- 1.3 This PEA has been prepared with reference to best practice as published by the Chartered Institute for Ecology and Environmental Management (CIEEM, 2013).
- 1.4 The survey, assessment and report were conducted and written by Danny Thomas BSc, MCIEEM, a Senior Ecologist at The Ecology Consultancy. Danny has over 11 years' experience working as an ecological consultant and as such is suitably qualified to undertake habitat surveys and protected species assessments.

SITE CONTEXT AND STATUS

- 1.5 The site is located within the NRP North site, Colney Lane, Norwich at approximately National Grid Reference TG 181 077. The site is approximately 1.15 ha in size, bounded to the north by the B1108 Watton Road, to the east by Colney Lane, to the south by car parks and offices and laboratories associated with the science park and to the west by scrub and secondary woodland.
- 1.6 Plans of the site are included in Appendix 1 and photographs of the site are included in Appendix 2.

DEVELOPMENT PROPOSALS

- 1.7 The proposals are to construct new science and research buildings in line with the existing Masterplan for the site. The MolFarma building is anticipated to have a development footprint of approximately 1500m² with an option of expansion space to

be used for the MolFarma building or to construct a new freestanding structure with approximately half the footprint of the MolFarma unit. The proposed MolFarma building will be located in the south eastern edge of the site, directly adjacent to the car park access road. In addition a new access road will need to be constructed to the existing Hill House building.

RELEVANT LEGISLATION AND PLANNING POLICY

1.8 The following key pieces of nature conservation legislation are relevant to this PEA. A more detailed description of legislation is provided in Appendix 3:

- The Conservation of Habitats and Species Regulations 2010 (as amended) (the Habitats Regulations);
- The Wildlife and Countryside Act, 1981 (as amended);
- The Natural Environment and Rural Communities Act, 2006;

2 Methodology

DESK STUDY

- 2.1 Information regarding the present and historical ecological interest of the site and within a further 2 kilometre (km) radius was previously provided by the Norfolk Biodiversity Information Service (NBIS) for other sites within the NRP North site where ecological assessments were carried out within the last two years. It was considered that the data set is unlikely to have significantly changed in the interim period and thus is suitable for use in this assessment.
- 2.2 The status of species is taken directly from the relevant legislation, the UK Biodiversity Action Plan (UK BAP, 2009), local (Norfolk) BAP or the list of Birds of Conservation Concern (Eaton et al., 2009). The red and amber lists of Birds of Conservation Concern refer to bird species of particular conservation concern for a number of reasons. In general terms, Red list species are globally threatened showing severe recent declines in population. Amber list species are species either with unfavourable conservation status or those species showing moderate recent declines in population; they may also include particularly localised species.
- 2.3 Ordnance Survey maps, aerial photographs and the MAGIC website (<http://www.magic.gov.uk/>) were used to identify the presence of nationally and internationally designated sites of nature conservation importance (statutory sites) and information on locally designated sites and records of notable habitats such as ancient woodland within a radius of 2km of the site. In addition water bodies within 250m of the site were identified in order to establish if the land within the site could be used as terrestrial habitat for great crested newts. Although this species can use suitable terrestrial habitat up to 500m from a breeding pond, research suggests that newts are likely to travel no more than 250m from ponds where suitable habitats for foraging and hibernation exist in proximity to breeding ponds (ENRR 576, 2004). The 250m radius was considered an appropriate distance for this assessment based on the small size of the site and limited amount of terrestrial habitat likely to be affected by any proposed works.

HABITAT SURVEY

- 2.4 A habitat survey of the site was carried out on the 10th April 2015. It covered the entire red-line site including boundary features. Habitats were described following standard Phase 1 habitat survey methodology (JNCC, 2010). Habitats were also assessed against Habitat of Principal Importance criteria as set-out by the JNCC (<http://jncc.defra.gov.uk/page-5706>). Scientific names are given after the first mention of a vascular plant species, thereafter, common names only are used. Nomenclature

follows Stace (2010). Incidental records of birds and other fauna noted during the course of the habitat survey were also compiled.

- 2.5 The site was also surveyed for the presence of invasive plant species as defined by Schedule 9 of the Wildlife and Countryside Act, 1981 (as amended).

PROTECTED SPECIES ASSESSMENT

- 2.6 The potential of the site to support legally protected or otherwise noteworthy species was assessed from field observations carried out at the same time as the habitat survey, combined with the results of the desk study. The potential for protected species occurrence was ranked on a scale from negligible to present as described in Table 1.
- 2.7 The assessment of habitat suitability for protected/noteworthy species was based on professional judgement drawing on experience of carrying out surveys of a large number of rural sites and best practice survey guidance on identifying species' field signs which includes: bats (Hundt, 2012), great crested newt (English Nature, 2001), reptiles (Gent and Gibson, 2003).
- 2.8 An external inspection of trees within the development footprint was undertaken to determine the likelihood of roosting bats and to look for evidence of roosting bats.

Table 1: Protected species assessment categories.

Category	Description
Present	Presence confirmed from the current survey or by recent, confirmed records.
High	Local records provided by desk study. The site is within or close to a national or regional stronghold. Good quality surrounding habitat and good connectivity.
Moderate	On-site habitat provides all of the known key requirements for a given species/species group. Several desk study records and/or site within national distribution and with suitable surrounding habitat. Factors limiting the likelihood of occurrence may include small habitat area, habitat severance, and disturbance.
Low	On-site habitat considered to be of poor to moderate quality for a given species/species group. Few or no desk study records. However, presence cannot be discounted on the basis of national distribution, nature of surrounding habitats, habitat fragmentation and/or recent on-site disturbance etc.
Negligible	Presence cannot be absolutely discounted, however, site contained either no suitable habitat or very poor quality habitat for a particular species or species group. There were no desk study records. Surrounding habitat unlikely to support wider populations of a species/species group. The site may also be outside or peripheral to known national range for a species.

SITE EVALUATION

- 2.7 The site was evaluated broadly following guidance issued by the Chartered Institute of Ecology and Environmental Management (IEEM, 2006) which ranks the nature conservation value of a site according to a geographic scale of reference: international, national, regional, county/metropolitan, district/borough, local/parish or of value at the site scale. In evaluating the nature conservation value of the site the following factors were considered: nature conservation designations, rarity, naturalness, fragility, connectivity and relevant nature conservation aims and objectives for a given area as contained in national and local biodiversity action plans and planning policies.

CONSTRAINTS

- 2.8 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.
- 2.9 The survey provides a preliminary view of the likelihood of protected species occurring on the development site, based on the suitability of the habitat and any direct evidence found during the survey. It should not be taken as providing a full and definitive survey of any protected species group. It is only valid at the time the survey was carried out. Additional surveys may be recommended if, on the basis of the preliminary assessment or during subsequent surveys, it is considered reasonably likely that other protected species may be present.
- 2.10 Any conclusions regarding roosting bats within the Hill House Building are formed from information collected during an internal inspection and emergence surveys undertaken by Danny Thomas on behalf of Atkins Ltd in 2012 as part of the data gathering for the Masterplan ecological impact assessment.

3 Results

DESK STUDY

Statutory Designated Nature Conservation Sites

3.1 There are two Local Nature Reserves (LNRs) within 2 km of the Application Site boundary. These are:

- **Bowthorpe Marsh LNR** which is approximately 550 m to the north of the development footprint, on the opposite side of the B1108. This is a marshland area and wet grazing meadows.
- **Earlham Park Woods LNR**, located approximately 1km m east of the development footprint at its closest point. This LNR is designated for its diverse range of habitat types including dense tall marsh, unimproved neutral grassland and a pond. The LNR also contains various woodland types dominated by oak and ash.

Non-statutory Designated Nature Conservation Sites

3.2 There are eight non-statutory sites within 2 km of the proposed development footprint and wider site; these are listed in the Table 2 below:

Table 2: Non-statutory designated sites within 2km of the proposed MolFarma site.

Site name and Reference Number	Description	Distance and Direction from NRP
Bowthorpe Marsh 2012	Low lying fen and unimproved grassland, drainage ditches and grazing meadow.	550 m North
The Heronry & Violet Grove 1446	Dense tall marsh, unimproved and semi-improved neutral grassland and woodland.	565 m East
UEA Marsh 1447	Comprises a dense species-poor neglected marsh of tall vegetation fringed by grey willow.	625 m South-east
Bowthorpe Riverside 1450	Dense marsh and unimproved grassland, drainage ditches and grazing meadow adjacent to the River Yare.	655 m North
Bawburgh/Colney Gravel Pits 235	A collection of mesotrophic lakes with moderately species rich marginal vegetation, willow and alder carr and reedbeds.	700 m North
Earlham Marsh 1451	Low lying fen and unimproved grassland, drainage ditches and grazing meadow.	760 m East

UEA Butterfly Meadow 1449	Calcareous Grassland with scattered scrub	950 m Southeast
UEA Broad 1448	Large mesotrophic lake with limited aquatic vegetation but moderately species rich marginal vegetation.	1115 m Southeast

- 3.3 Based on the small size of the proposed development footprint, the localised impacts of the proposed development and the distance from the designated sites it is considered very unlikely that this project will result in any impacts to any sites of nature conservation value and as such they are not considered further in this report.

PHASE 1 HABITAT SURVEY

Overview

- 3.4 The site is approximately 1.15ha in area comprising areas of mown amenity grassland, rough grassland with patches of tall herbs, secondary woodland, planted shrubs and trees. In addition, the Hill House building is within the redline boundary but is not likely to be affected by the proposed works and as such is not discussed in detail. The habitats are described in turn below and the Site Layout map is provided in Appendix 1.

Grassland

- 3.5 The majority of the site comprises grassland. Within the MolFarma development footprint the grassland is essentially amenity grassland as it is heavily mown and contains only a small selection of other forbs tolerant of regular mowing (Photograph 1).
- 3.6 To the west of the site the grassland is rough semi-improved with patches of shorter rabbit grazed grassland.

Trees

- 3.7 There are five mature trees located within the construction footprint for the proposed MolFarma building; two horse chestnut *Aesculus hippocastanum*, two common lime *Tilia x europaea* and a silver birch *Betula pendula* all of which are expected to be removed to facilitate construction (Photograph 2). There are other mature trees within the wider site but these are outside of the current proposed development footprint.

Secondary Woodland

- 3.8 There are areas of dense young secondary woodland within the site with some directly adjacent to the proposed development area (Photographs 1 & 2). The majority of this woodland will be unaffected by the proposed works, however, it is likely that some

localised clearance of the secondary woodland adjacent to the MolFarma development area will be required.

Buildings

- 3.9 There is a single building present within the redline boundary of the site but outside of the proposed development area. The building is Hill House, a Victorian style, two storey red-brick building with a pitched roof and wooden gables and soffits (Photograph 3). The building is known to support roosts of at least three species of bat including a large pipistrelle roost, brown long-eared bat roost and a single myotis bat of unknown species (personal obs. 2012).

Other Habitats

- 3.10 There are several amphibian and reptile hibernacula and a small, recently dug pond within the secondary woodland within the western section of the site (Photograph 4). Although these are included in the client's redline site boundary, these are not anticipated to be affected by the proposed construction of the MolFarma building.

PROTECTED SPECIES ASSESSMENT

Bats

- 3.11 The mature lime and birch trees within the site do not offer any features suitable for roosting bats. The two horse chestnut trees have some features which might support small numbers of bats including splits and rot holes within major limbs. The trees are a little isolated within the wider landscape, located within the amenity grassland, however, even with this limited connectivity to foraging habitat the presence of roosting bats cannot be completely ruled out.
- 3.12 The trees appear to be suffering from bleeding canker; a disease which affects about 50% of horse chestnut trees in the UK.

Breeding Birds

- 3.13 There is potential for birds to nest within trees and secondary woodland within the proposed development footprint and the wider site.

Reptiles

- 3.14 The proposed development footprint for the MolFarma building is principally located within mown amenity grassland which is not suitable for reptiles. The rough grassland within the wider site is suitable habitat for reptiles; the grassland provides foraging habitat and artificial hibernacula constructed as mitigation for other developments within the NRP North site provide refuge and basking opportunities. However, this

area is not anticipated to be affected by the current development proposals and as such reptiles are not considered further.

INVASIVE SPECIES

- 3.15 A number of plant species are listed on Section 14 and Part II of Schedule 9 of the Wildlife and Countryside Act 1981 (as amended) making it illegal to cause or permit their spread into the wild. Invasive species are widespread in many habitats, commonly found on disturbed sites and along water courses. No invasive species were recorded during the site survey.

Other Protected Species

- 3.16 Other protected species have been assessed and based on specialist knowledge they have been determined unlikely to be present within the habitats on site and are therefore not considered further.

4 Conclusions and Recommendations

NATURE CONSERVATION EVALUATION

- 4.1 The intrinsic conservation value of the habitats within the development footprint is generally considered to be negligible. They are common and widespread and exist locally as either larger areas or areas of higher quality than the site.
- 4.2 The conservation value of the habitats within the wider site are generally considered to be important at the site level only. The habitats present have potential to support low numbers of protected species which have a value within the context of the site but are not considered rare or unusual.

CONSTRAINTS AND MITIGATION/COMPENSATION

Bats

- 4.3 The two mature horse chestnut trees to be removed have some, albeit limited potential to support roosting bats. It is considered reasonably unlikely that bats will be roosting within these trees however, the presence of a single bat cannot be fully ruled out. As such it is recommended that the trees are 'soft felled' under the supervision of a licenced bat ecologist allowing any cavities or cracks in major limbs to be inspected prior to felling. Felling should be carried out in a controlled way and limbs with cracks, fissures or cavities should be carefully lowered to the ground for inspection by a licenced bat ecologist.
- 4.4 If any bats are found during the soft felling, works must stop immediately and Natural England contacted if considered necessary by the supervising ecologist. Works should only recommence on instruction from the supervising ecologist.

Breeding birds

- 4.5 The mature trees and secondary woodland have potential to support nesting birds. Any vegetation clearance should be undertaken outside of the bird nesting season (which runs from 1st March to the 31st August, inclusive) where appropriate. If this is not possible a detailed inspection for nesting birds should be carried out no more than 24 to 48 hours prior to any vegetation removal works being undertaken.
- 4.6 Any nests found to be in use or being built during this inspection may need to be left undamaged for the entire nesting season or until such time as they can be confirmed as no longer in use.

ENHANCEMENT

- 4.7 Landscape planting should comprise native species where possible or include non-native species which add value for wildlife such as species which provide good foraging or nesting habitat for birds. Vegetation should be managed to maximise

benefit to the bird species present in line with the Environmental Management Plan for the NRP North Masterplan¹.

- 4.8 Integration of green walls into the design of the MolFarma building will provide tangible benefits to wildlife but will also help to conceal the building by blurring it into the surrounding natural habitats.
- 4.9 House martins currently nest on the nearby Hill House building. Installation of artificial house martin boxes on the proposed MolFarma building would provide additional nesting opportunities for this colonial species and strengthen the endurance of the existing colony.

¹ Appendix 9.5 of the NRP North Masterplan Environmental Statement (2012)

References

CIEEM (2013) *Guidelines for Preliminary Ecological Appraisal*. Chartered Institute of Ecology and Environmental Management, Winchester, Hampshire.

DfCLG (2012) *National Planning Policy Framework*. Department for Communities and Local Government, London.

Gent, A.H., & Gibson, S.D. eds. (2003) *Herpetofauna Workers' Manual*. JNCC, Peterborough.

English Nature report (ENRR) Number 576, 2004, 'An assessment of the efficiency of capture techniques and the value of different habitats for the great crested newt *Triturus cristatus*'. Peterborough.

English Nature (2001) *Great Crested Newt Mitigation Guidelines*. Peterborough.

Hundt, L. (2012) *Bat Surveys: Good Practice Guidelines 2nd Edition*. Bat Conservation Trust, London

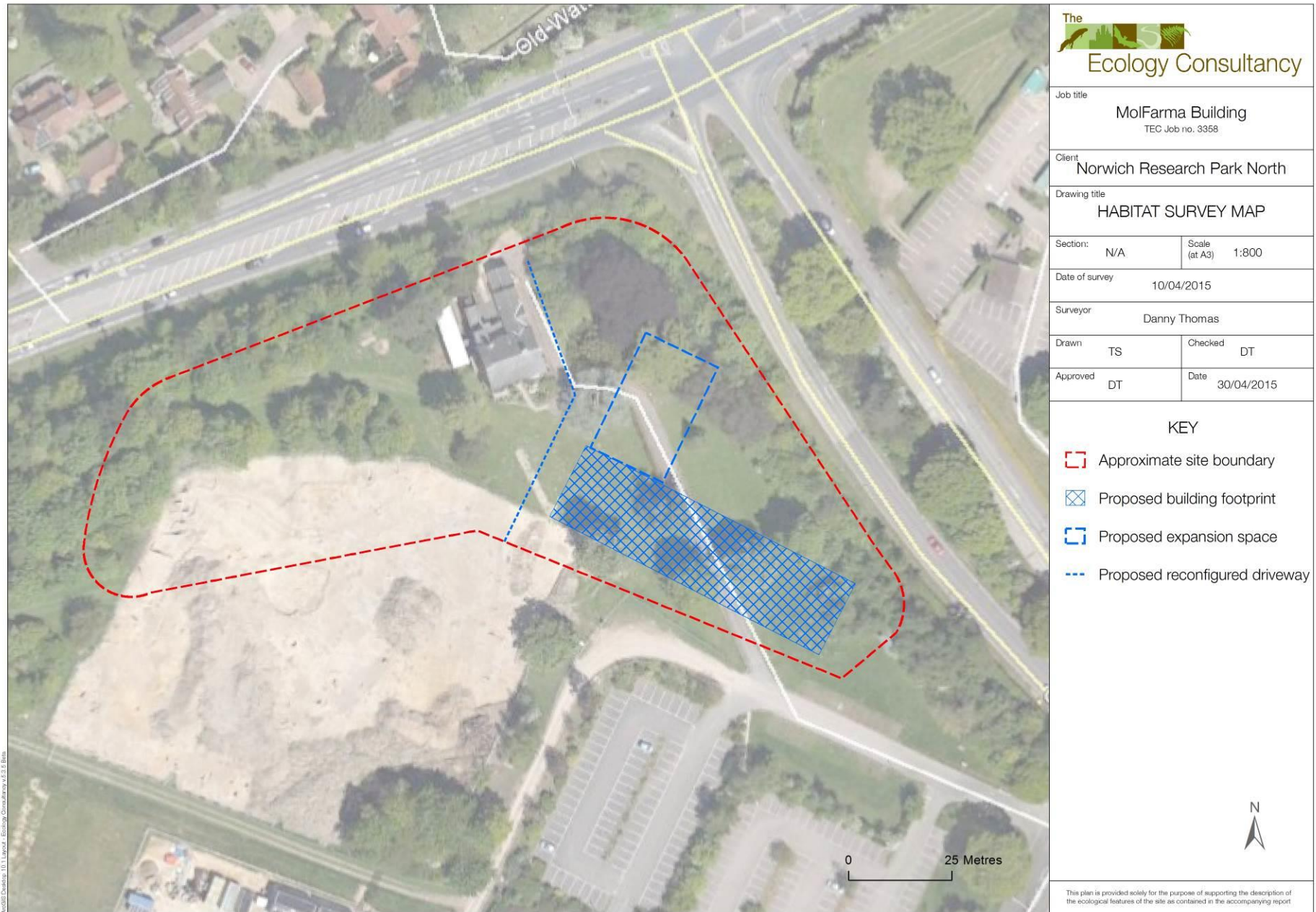
IEEM (2006) *Guidelines for Ecological Impact Assessment*. Institute of Ecology and Environmental Management, Hampshire.

JNCC (2010) *Handbook for Phase 1 Habitat Survey*. JNCC, Peterborough.

Stace, C.A. (2010) *New Flora of the British Isles – 3rd edition*. Cambridge University Press, Cambridge.

Appendix 1: Figures

Figure 1. Site Layout Plan



Appendix 2: Photographs

Photograph 1.
Amenity grassland within development
footprint



Photograph 2.
Secondary woodland and mature trees
to be removed to accommodate
MolFarma Building.



Photograph 3.
Existing footpath to Hill House and
location of proposed new road access.



Photograph 4.
Secondary woodland and rough semi-
improved grassland with reptile
hibernacula to the west of the site.



Appendix 3: Legislation & Planning Policy

Important Notice: This section contains details of legislation and planning policy applicable in Britain only (i.e. not including the Isle of Man, Northern Ireland, the Republic of Ireland or the Channel Islands) and is provided for general guidance only. While every effort has been made to ensure accuracy, this section should not be relied upon as a definitive statement of the law.

A NATIONAL LEGISLATION AFFORDED TO SPECIES

The objective of the EC Habitats Directive² is to conserve the various species of plant and animal which are considered rare across Europe. The Directive is transposed into UK law by The Conservation of Habitats and Species Regulations 2010 (as amended) (formerly The Conservation (Natural Habitats, &c.) Regulations 1994 (as amended)) and The Offshore Marine Conservation (Natural Habitats, &c.) Regulations 2007 (as amended).

The Wildlife and Countryside Act 1981 (as amended) is a key piece of national legislation which implements the Convention on the Conservation of European Wildlife and Natural Habitats (Bern Convention) and implements the species protection obligations of Council Directive 2009/147/EC (formerly 79/409/EEC) on the Conservation of Wild Birds (EC Birds Directive) in Great Britain.

Since the passing of the Wildlife & Countryside Act 1981, various amendments have been made, details of which can be found on www.opsi.gov.uk. Key amendments have been made through the Countryside and Rights of Way (CROW) Act (2000) and Nature Conservation (Scotland) Act 2004.

Other legislative Acts affording protection to wildlife and their habitats include:

- Deer Act 1991
- Countryside and Rights of Way (CROW) Act 2000
- Natural Environment & Rural Communities (NERC) Act 2006
- Protection of Badgers Act 1992
- Wild Mammals (Protection) Act 1996

² Council Directive 92/43/EEC on the Conservation of Natural Habitats and of Wild Fauna and Flora

Species and species groups that are protected or otherwise regulated under the aforementioned domestic and European legislation, and that are most likely to be affected by development activities, include herpetofauna (amphibians and reptiles), badger, bats, birds, dormouse, invasive plant species, otter, plants, red squirrel, water vole and white clawed crayfish.

Explanatory notes relating to species protected under The Conservation of Habitats and Species Regulations 2010 (as amended) (which includes smooth snake, sand lizard, great crested newt and natterjack toad), all bat species, otter, dormouse and some plant species) are given below. **These should be read in conjunction with the relevant species sections that follow.**

- In the Directive, the term ‘deliberate’ is interpreted as being somewhat wider than intentional and may be thought of as including an element of recklessness.
- The Conservation of Habitats and Species Regulations 2010 does not define the act of ‘migration’ and therefore, as a precaution, it is recommended that short distance movement of animals for e.g. foraging, breeding or dispersal purposes are also considered.
- In order to obtain a European Protected Species Mitigation (EPSM) licence, the application must demonstrate that it meets all of the following three ‘tests’: i) the action(s) are necessary for the purpose of preserving public health or safety or other imperative reasons of overriding public interest including those of a social or economic nature and beneficial consequence of primary importance for the environment; ii) that there is no satisfactory alternative and iii) that the action authorised will not be detrimental to the maintenance of the species concerned at a favourable conservation status in their natural range.

Herpetofauna (Amphibians and Reptiles)

The sand lizard, smooth snake, natterjack toad, great crested newt and pool frog receive full protection under The Conservation of Habitats and Species Regulations 2010 (as amended) through their inclusion on Schedule 2. Regulation 41 prohibits:

- Deliberate killing, injuring or capturing of species listed on Schedule 2
- Deliberate disturbance of any Schedule 2 species as:
 - to impair their ability:
 - to survive, breed, or reproduce, or to rear or nurture young;

- (ii) in the case of animals of a hibernating or migratory species, to hibernate or migrate
 - b) to affect significantly the local distribution or abundance of the species
- Deliberate taking or destroying of the eggs of a Schedule 2 species
- Damage or destruction of a breeding site or resting place
- Keeping, transporting, selling, exchanging or offering for sale whether live or dead or of any part thereof.

With the exception of the pool frog, these species are also currently listed on Schedule 5 of the Wildlife and Countryside Act 1981 (as amended). Under this Act, they are additionally protected from:

- Intentional or reckless disturbance (at any level)
- Intentional or reckless obstruction of access to any place of shelter or protection
- Selling, offering or exposing for sale, possession or transporting for purpose of sale.

Other native species of herpetofauna are protected solely under Schedule 5 of the Wildlife & Countryside Act 1981 (as amended). Species such as the adder, grass snake, common lizard and slow-worm are listed in respect to Section 9(1) & (5). For these species, it is prohibited to:

- Intentionally (or recklessly in Scotland) kill or injure these species
- Sell, offer or expose for sale, possess or transport for purpose of sale these species, or any part thereof.

Common frog, common toad, smooth newt and palmate newt are listed in respect to Section 9(5) only which affords them protection against sale, offering or exposing for sale, possession or transport for the purpose of sale.

How is the legislation pertaining to herpetofauna liable to affect development works?

A European Protected Species Mitigation (EPSM) Licence issued by the relevant countryside agency (e.g. Natural England) will be required for works liable to affect the breeding sites or resting places of those amphibian and reptile species protected under The Conservation Habitats and Species Regulations 2010 (as amended). A licence will also be required for operations liable to result in a level of disturbance which might impair their ability to undertake those activities mentioned above (e.g. survive, breed, rear young and hibernate). The licences are to allow derogation from the relevant legislation but also to

enable appropriate mitigation measures to be put in place and their efficacy to be monitored.

Although not licensable, appropriate mitigation measures may also be required to prevent the intentional killing or injury of adder, grass snake, common lizard and slow worm, thus avoiding contravention of the Wildlife and Countryside Act 1981 (as amended).

Birds

All wild birds, their nests and eggs are protected under Sections 1-8 of the Wildlife and Countryside Act 1981 (as amended). Among other things, this makes it an offence to:

- Intentionally (or recklessly in Scotland) kill, injure or take any wild bird
- Intentionally (or recklessly in Scotland) take, damage or destroy (or, in Scotland, otherwise interfere with) the nest of any wild bird while it is in use or being built
- Intentionally take or destroy an egg of any wild bird
- Sell, offer or expose for sale, have in his possession or transport for the purpose of sale any wild bird (dead or alive) or bird egg or part thereof.
- In Scotland only, intentionally or recklessly obstruct or prevent any wild bird from using its nest

Certain species of bird, for example the barn owl, black redstart, hobby, bittern and kingfisher receive additional special protection under Schedule 1 of the Act and Annex 1 of the European Community Directive on the Conservation of Wild Birds (2009/147/EC). This affords them protection against:

- Intentional or reckless disturbance while it is building a nest or is in, on or near a nest containing eggs or young
- Intentional or reckless disturbance of dependent young of such a bird
- In Scotland only, intentional or reckless disturbance whilst lekking
- In Scotland only, intentional or reckless harassment

How is the legislation pertaining to birds liable to affect development works?

To avoid contravention of the Wildlife and Countryside Act 1981 (as amended), works should be planned to avoid the possibility of killing or injuring any wild bird, or damaging or destroying their nests. The most effective way to reduce the likelihood of nest destruction in

particular is to undertake work likely to affect suitable nesting habitat outside of the main bird nesting season which typically runs from March to August³. Where this is not feasible, it will be necessary to have any areas of suitable habitat thoroughly checked for nests prior to vegetation clearance.

Those species of bird listed on Schedule 1 are additionally protected against disturbance during the nesting season. Thus, it will be necessary to ensure that no potentially disturbing works are undertaken in the vicinity of the nest. The most effective way to avoid disturbance is to postpone works until the young have fledged. If this is not feasible, it may be possible to maintain an appropriate buffer zone or standoff around the nest.

B NATIONAL AND EUROPEAN LEGISLATION AFFORDED TO HABITATS

Statutory Designations: National

Nationally important areas of special scientific interest, by reason of their flora, fauna, or geological or physiographical features, are notified by the countryside agencies as statutory **Sites of Special Scientific Interest** (SSSIs) under the National Parks and Access to the Countryside Act 1949 and latterly the Wildlife & Countryside Act 1981 (as amended). As well as underpinning other national designations (such as **National Nature Reserves** which are declared by the countryside agencies under the same legislation), the system also provides statutory protection for terrestrial and coastal sites which are important within a European context (Natura 2000 network) and globally (such as Wetlands of International Importance). See subsequent sections for details of these designations. Improved provisions for the protection and management of SSSIs have been introduced by the Countryside and Rights of Way Act 2000 (in England and Wales) and the Nature Conservation (Scotland) Act 2004.

The Wildlife & Countryside Act 1981 (as amended) also provides for the making of **Limestone Pavement Orders**, which prohibit the disturbance and removal of limestone from such designated areas, and the designation of **Marine Nature Reserves**, for which byelaws must be made to protect them.

Non-Statutory Designations

³ It should be noted that this is the main breeding period. Breeding activity may occur outwith this period (depending on the particular species and geographical location of the site) and thus due care and attention should be given when undertaking potentially disturbing works at any time of year.

Areas considered to be of local conservation interest may be designated by local authorities as a **Wildlife Site**, under a variety of names such as **County Wildlife Sites** (CWS), **Listed Wildlife Sites** (LWS), **Local Nature Conservation Sites** (LNCS), **Sites of Biological Importance** (SBIs), **Sites of Importance for Nature Conservation** (SINCs), or **Sites of Nature Conservation Importance** (SNCIs). The criteria for designation may vary between counties.

Together with the statutory designations, these are defined in local and structure plans under the Town and Country Planning system and are a material consideration when planning applications are being determined. The level of protection afforded to these sites through local planning policies and development frameworks may vary between counties.

THE NATURAL ENVIRONMENT AND RURAL COMMUNITIES ACT 2006 AND THE BIODIVERSITY DUTY

The Natural Environment and Rural Communities (NERC) Act came into force on 1st October 2006. Section 40 of the Act requires all public bodies to have regard to biodiversity conservation when carrying out their functions. This is commonly referred to as the 'biodiversity duty'.

Section 41 of the Act (Section 42 in Wales) requires the Secretary of State to publish a list of habitats and species which are of 'principal importance for the conservation of biodiversity.' This list is intended to assist decision makers such as public bodies in implementing their duty under Section 40 of the Act. Under the Act these habitats and species are regarded as a material consideration in determining planning applications. A developer must show that their protection has been adequately addressed within a development proposal.

NATIONAL PLANNING POLICY

The National Planning Policy Framework replaced PPS9 in April 2012 and emphasises the need for sustainable development. The Framework specifies the need for protection of designated sites and priority habitats and priority species. An emphasis is also made for the need for ecological networks via preservation, restoration and re-creation. The protection and recovery of priority species – those listed as Species of Principal Importance under the NERC Act – is also listed as a requirement of planning policy. In determining planning application, planning authorities should aim to conserve and enhance biodiversity by ensuring that: designated sites are protected from adverse harm; there is appropriate mitigation or compensation where significant harm cannot be avoided; opportunities to incorporate biodiversity in and around developments are encouraged; planning permission

is refused for development resulting in the loss or deterioration of irreplaceable habitats including aged or veteran trees and also ancient woodland.



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