

BIODIVERSITY NET GAIN REPORT

LAND NORTH OF ORTON ROAD, WARTON, TAMWORTH, NR B79 0JG

ON BEHALF OF

MICHAEL ENSOR CATON & ANDREW NORMAN CATON C/O RICHBOROUGH

MARCH 2025

V1

BIODIVERSITY
LANDSCAPE
ARBORICULTURE
DESIGN
ECOLOGY

Report Data	
Title	Biodiversity Net Gain Report
Site Address	Land off Orton Road, Warton, Tamworth, Nr B79 0JG
Client	Michael Ensor Caton & Andrew Norman Caton c/o Richborough
BLADE Reference	180-E-RP-PL-1831BNG

Version	Author	Date Issued
V1	E. Seaton BSc (Hons) MCIEEM	28 March 2025

Disclosure:

This document has been prepared by BLADE Ecology Ltd. for the sole use of the commissioning client/s. It has been provided in accordance with the agreed scope and intended purpose. No other warranty is made as to the professional advice included in this document. It does not purport to give legal advice.

This report should not be copied or relied upon by any third party without the express prior written agreement of BLADE Ecology Ltd. and the commissioning client/s.

Where any appraisal is based upon information provided by third parties, it is assumed that this information is relevant, correct and complete; there has been no independent verification of information obtained from third parties unless otherwise stated. Where field investigations have been carried out these have been appropriate to the agreed scope of works and carried out to a level of detail required to achieve the stated objectives.







NORTH WARWICKSHIRE BOROUGH COUNCIL

RECEIVED

01/04/2025

PLANNING & DEVELOPMENT DIVISION

CONTENTS

1.0	Introduction	1
	Background to the Development	1
	Survey Objectives	2
2.0	Biodiversity Net Gain and Planning Policy	3
	Biodiversity Net Gain	3
	National Planning Policy	5
	Local Planning Policy	8
	Legislation	10
3.0	Methodology	11
	Condition Assessments	11
	Desk Study and Strategic Significance	11
	Measurement of Habitat and Hedgerow Units	11
	Calculating Biodiversity Units	12
	Limitations	12
4.0	Results	13
	Strategic Significance	13
	Existing On-site Habitats and Hedgerows Condition Assessment	15
	Pond	15
	Willow Scrub	16
	Retained Habitat	17
	Habitat Creation	17
	Biodiversity Unit Calculations	18
5.0	References	19

APPENDIX A Plans

APPENDIX B Photographs

APPENDIX C Condition Assessments

APPENDIX D Qualifications and Experience

1.0 INTRODUCTION

Background to the Development

- 1.1 BLADE Ecology Ltd. was commissioned by Michael Ensor Caton & Andrew Norman Caton c/o Richborough to undertake a Preliminary Ecological Appraisal at the land north of Orton Road, Warton (centred on Ordnance Survey grid reference SK 279 033).
- 1.2 The site is 6.37ha in area and comprises arable land, a pond associated with willow scrub and developed land. Species-rich hedgerows form the boundaries of the site
- 1.3 The application site boundary is shown in Figure 1.



Figure 1: Application Site Boundary

- 1.4 Planning consent is being sought from North Warwickshire Borough Council for 'outline planning for the construction of up to 110 dwellings, with access, landscaping, sustainable drainage features, and associated infrastructure. All matters are reserved except for primary vehicular access from Church Road'
- 1.5 This report has been based on the Framework Plan (RG-M-Ai02, Revision M) produced by Stantec.

Survey Objectives

- 1.6 The objectives of this report are to:
 - Classify the type, distinctiveness, condition and strategic significance of existing habitats.
 - Calculate baseline for existing habitat and hedgerow units for the site.
 - Inform the masterplan in line with the mitigation hierarchy, Biodiversity Net Gain hierarchy, and Biodiversity Net Gain: Good Practice Principles for Development (Baker et al., 2019).
 - Calculate the biodiversity net gain position.

2.0 BIODIVERSITY NET GAIN AND PLANNING POLICY

Biodiversity Net Gain

- 2.1 Biodiversity Net Gain (BNG) is defined as 'development that leaves biodiversity in a better state than before, and an approach where developers work with local governance, wildlife groups, landowners and other stakeholders in order to support their priorities for nature conservation'.
- 2.2 In 2016, the BNG: Good practice principles for development was published to support developments across the UK achieve BNG in accordance with good practice. These principles aimed to set a benchmark of 'what good looks like' and they include the mitigation hierarchy and avoiding impacts of irreplaceable habitats. In 2019, the principles were supplemented with practical guidance on designing, implementing and the long-term maintenance and monitoring of BNG through the project lifecycle.
- 2.3 Good practice principles for biodiversity net gain are set out within Table 1.1 of Biodiversity Net Gain: Good Practice Principles for Development (Baker et al., 2019):

Table 1: The UK's good practice principles for biodiversity net gain (after Baker, 2016)

Principle	In Practice
Apply the mitigation hierarchy	Do everything possible to first avoid and then minimise impacts on biodiversity. Only as a last resort, and in agreement with external decision makers where possible, compensate for losses that cannot be avoided. If compensating for losses with the development footprint is not possible or does not generate the most benefits for nature conservation, then offset biodiversity losses by gains elsewhere.
Avoid losing biodiversity that cannot be offset elsewhere	Avoid impacts on irreplaceable biodiversity – these impacts cannot be offset to achieve no net loss / net gain.
Be inclusive and equitable	Engage stakeholders early, and involve them in designing, implementing, monitoring and evaluating the approach to net gain. Achieve net gain in partnership with stakeholders where possible.
Address risk	Mitigate difficulty, uncertainty and other risks to achieving net gain. Apply well-accepted ways to add contingency when calculating biodiversity losses and gains in order to account for any remaining risks, as well as compensate for the time between the losses occurring and the gains being fully realised.
Make a measurable net gain contribution	Achieve a measurable, overall gain for biodiversity and the services ecosystems provide while directly contributing towards nature conservation priorities.
Achieve the best outcomes for biodiversity	Achieve the best outcomes for biodiversity by using robust credible evidence and local knowledge to make clearly justified choices when:

Principle	In Practice	
	- delivering compensation that is ecologically equivalent in type, amount and condition that accounts for the location and timing of biodiversity losses	
	- compensating for losses of one type of biodiversity offsetting by providing a different type that delivers greater benefits for nature conservation	
	- achieving net gain locally to the development whilst also contributing towards nature conservation priorities at local, regional, and national levels.	
	- enhancing existing or creating new habitat	
	- enhancing ecological connectivity by creating more bigger, better and joined areas for biodiversity.	
Be additional	Achieve nature conservation outcomes that demonstrably exceed existing obligations i.e. do not deliver something that would occur anyway	
Create a net gain legacy	Ensure net gain generates long-term benefits by:	
	- engaging stakeholders- and jointly agreeing practical solutions that secure Net Gain in perpetuity	
	- planning for adaptive management and securing dedicated funding for long-term management	
	- designing net gain for biodiversity to be resilient to external factors, especially climate change	
	- mitigating risks from other land uses	
	- avoiding displacing harmful activities from one location to another	
	- supporting local-level management of net gain activities	
Optimise sustainability	Prioritise BNG and, where possible, optimise the wider environment benefits for sustainable society and economy	
Be transparent	Communicate all net gain activities in a transparent and timely manner, sharing the learning with all stakeholders.	

National Planning Policy

National Planning Policy Framework (NPPF)

- 2.4 The National Planning Policy Framework (NPPF) (Department for Levelling Up, Housing & Communities, 2024) provides guidance for Local Planning Authorities (LPAs) in creating development plans and determining applications.
- 2.5 Section 8 states that Achieving sustainable development means that the planning system has three overarching objectives, which are interdependent and need to be pursued in mutually supportive ways (so that opportunities can be taken to secure net gains across each of the different objectives):
 - a) an economic objective to help build a strong, responsive and competitive economy, by ensuring that sufficient land of the right types is available in the right places and at the right time to support growth, innovation and improved productivity; and by identifying and coordinating the provision of infrastructure;
 - b) a social objective to support strong, vibrant and healthy communities, by ensuring that a sufficient number and range of homes can be provided to meet the needs of present and future generations; and by fostering well-designed, beautiful and safe places, with accessible services and open spaces that reflect current and future needs and support communities' health, social and cultural well-being; and
 - c) an environmental objective to protect and enhance our natural, built and historic
 environment; including making effective use of land, improving biodiversity, using
 natural resources prudently, minimising waste and pollution, and mitigating and
 adapting to climate change, including moving to a low carbon economy.
- 2.6 Section 151 states that once Green Belts have been defined, local planning authorities should plan positively to enhance their beneficial use, such as looking for opportunities to provide access; to provide opportunities for outdoor sport and recreation; to retain and enhance landscapes, visual amenity and biodiversity; or to improve damaged and derelict land.
- 2.7 Section 187 states that planning policies and decisions should contribute to and enhance the natural and local environment by:
 - a) protecting and enhancing valued landscapes, sites of biodiversity or geological value and soils (in a manner commensurate with the statutory status or identified quality in the development plan);
 - b) recognising intrinsic character and beauty of the countryside, and the wider benefits from natural capital and ecosystem services including the economic and other benefits of the best and most versatile agricultural land, and of trees and woodland;
 - c) maintaining the character of the undeveloped coast, while improving public access to it where appropriate;
 - d) minimising impacts on and providing net gains for biodiversity, including by establishing coherent ecological networks that are more resilient to current and future

pressures and incorporating features which support priority or threatened species such as swifts, bats and hedgehogs;

- e) preventing new and existing development from contributing to, being put at unacceptable risk from, or being adversely affected by, unacceptable levels of soil, air, water or noise pollution or land instability. Development should, wherever possible, help to improve local environmental conditions such as air and water quality, taking into account relevant information such as river basin management plans; and
- f) remediating and mitigating despoiled, degraded, derelict, contaminated and unstable land, where appropriate.
- 2.8 Section 188 states that plans should distinguish between the hierarchy of international, national and locally designated sites; allocate land with the least environmental value or amenity value, where consistent with other policies in this Framework; take a strategic approach to maintaining and enhancing networks of habitats and green infrastructure; and plan for the enhancement of natural capital at a catchment or landscape scale across local authority boundaries.
- 2.9 Section 185 states that in order to protect biodiversity, plans should:
 - identify, map and safeguard components of local wildlife-rich habitats and wider ecological networks, including the hierarchy of internal, national and locally designated sites of importance for biodiversity; wildlife corridors and stepping stones that connect them; and areas identified by national and local partnerships for habitat management, enhancement, restoration or creation; and
 - promote the conservation, restoration and enhancement of priority habitats, ecological networks and the protection and recovery of priority species; and identify and pursue opportunities for securing measurable net gains for biodiversity.
- 2.10 Section 189 states that great weight should be given to conserving and enhancing landscape and scenic beauty in National Parks, the Broads and National Landscapes which have the highest status of protection in relation to these issues. The conservation and enhancement of wildlife and cultural heritage are also important considerations in these areas, and should be given great weight in National Parks and the Broads. The scale and extent of development within all these designated areas should be limited, while development within their setting should be sensitively located and designed to avoid or minimise adverse impacts on the designated areas.
- 2.11 Section 190 states that when considering applications for development within National Parks, the Broads and National Landscapes, permission should be refused for major development6 other than in exceptional circumstances, and where it can be demonstrated that the development is in the public interest. Consideration of such applications should include an assessment of:
 - a) the need for the development, including in terms of any national considerations, and the impact of permitting it, or refusing it, upon the local economy;

- b) the cost of, and scope for, developing outside the designated area, or meeting the need for it in some other way; and
- c) any detrimental effect on the environment, the landscape and recreational opportunities, and the extent to which that could be moderated.
- 2.12 Section 191 states that within areas defined as Heritage Coast (and that do not already fall within one of the designated areas mentioned in paragraph 189), planning policies and decisions should be consistent with the special character of the area and the importance of its conservation. Major development within a Heritage Coast is unlikely to be appropriate, unless it is compatible with its special character.
- 2.13 Section 192 states that to protect and enhance biodiversity and geodiversity, plans should:
 - a) Identify, map and safeguard components of local wildlife-rich habitats and wider ecological networks, including the hierarchy of international, national and locally designated sites of importance for biodiversity; wildlife corridors and stepping stones that connect them; and areas identified by national and local partnerships for habitat management, enhancement, restoration or creation; and
 - b) promote the conservation, restoration and enhancement of priority habitats, ecological networks and the protection and recovery of priority species; and identify and pursue opportunities for securing measurable net gains for biodiversity.
- 2.14 Section 193 states that when determining planning authorities should apply the following principles:
 - if significant harm to biodiversity resulting from a development cannot be avoided (through locating on an alternative site with less harmful impacts), adequately mitigated, or, as a last resort, compensated for, then planning permission should be refused;
 - development on land within or outside a Site of Special Scientific Interest, and which is likely to have an adverse effect on it (either individually or in combination with other developments), should not normally be permitted. The only exception is where the benefits of the development in the location proposed clearly outweigh both its likely impact on the features of the site that make it of special scientific interest, and any broader impacts on the national network of Sites of Special Scientific Interest;
 - development resulting in the loss or deterioration of irreplaceable habitats (such as ancient woodland and ancient or veteran trees) should be refused, unless there are wholly exceptional reasons and a suitable compensation strategy exists; and
 - development whose primary objective is to conserve or enhance biodiversity should be supported; while opportunities to improve biodiversity in and around developments should be integrated as part of their design, especially where this can secure measurable net gains for biodiversity or enhance public access to nature where this is appropriate.

- 2.15 Section 194 states that the following should be given the same protection as habitats sites:
 - potential Special Protection Areas and possible Special Areas of Conservation;
 - listed or proposed Ramsar sites; and
 - sites identified, or required, as compensatory measures for adverse effects on habitats sites, potential Special Protection Areas, possible Special Areas of Conservation, and listed or proposed Ramsar sites.
- 2.16 Section 195 states that the presumption in favour of sustainable development does not apply where the plan or project is likely to have a significant effect on a habitats site (either alone or in combination with other plans or projects) unless an appropriate assessment has concluded that the plan or project will not adversely affect the integrity of the habitats site.
- 2.17 Section 33 states that local plans and spatial development strategies should be informed throughout their preparation by a sustainability appraisal that meets the relevant legal requirements. This should demonstrate how the plan has addressed relevant economic, social and environmental objectives (including opportunities for net gains). Significant adverse impacts on these objectives should be avoided and, wherever possible, alternative options which reduce or eliminate such impacts should be pursued. Where significant adverse impacts are unavoidable, suitable mitigation measures should be proposed (or, where this is not possible, compensatory measures should be considered).

Local Planning Policy

North Warwickshire Local Plan 2021

- 2.18 <u>LP16 Natural Environment</u>: The Borough Council recognises the importance of the natural environment to the Borough's local character, identity and distinctiveness. The quality, character, diversity and local distinctiveness of the natural environment will be protected and enhanced as appropriate relative to the nature of development proposed. This policy seeks to minimise impacts on, and provide net gains for biodiversity, where possible, relative to the ecological significance of international, nationally and locally designated sites of importance for biodiversity.
- 2.19 <u>Understanding the Natural Environment:</u> All development applications that affect the natural environment will be required to provide sufficient information and an assessment of those proposals on the natural asset(s) including via Appropriate Assessment under Regulation 63 of the Conservation of Habitats and Species Regulations 2017, or successor legislation, where likely significant effects individually or in combination with other schemes cannot be ruled out.
- 2.20 <u>Conserving the Natural Environment:</u> Sites of Special Scientific Interest (SSSI's) will be subject to a high degree of protection, in view of their national importance. Development adversely affecting a SSSI will only be permitted where the benefits of

- the development at these sites clearly outweigh the likely impacts on the site and any broader impacts on the national network of SSSI's.
- 2.21 Development that affects Sites of Regional and Local Importance for Nature Conservation will only be permitted where the benefits of the development outweigh the nature conservation value of the site and the contribution it makes to the Borough's ecological network.
- 2.22 Development that damages habitats and features of importance for nature conservation will only be permitted where there are no reasonable alternatives to the development taking place in that location. Where appropriate, developments will be required to help enhance these features and/or secure their beneficial management.
- 2.23 Planning permission will be refused if development resulting in the loss or deterioration of irreplaceable habitats, including ancient woodland and the loss of aged or veteran trees found outside ancient woodland, unless the need for, and benefits of, the development in that location clearly outweigh the loss. Given the natural heritage of the Borough, the Council expects such circumstances to be wholly exceptional and for there to be a suitable compensation strategy in place where any loss or deterioration would occur.
- 2.24 Developments should avoid significant harm to biodiversity by locating to an alternative site with less harmful impacts. If this is not possible adequately mitigate the impacts or, as a last resort compensate the loss. Where development takes place, it should help ensure there is a measurable net gain of biodiversity and geological interest. Warwickshire, Coventry and Solihull Biodiversity Impact Assessment calculator will be used to assess the changes to biodiversity resulting from the development and Biodiversity Offsetting will be used where net gain cannot be achieved within the site boundary. Offsets will be sought towards enhancements of the wider ecological network in the Borough or sub-region in line with local, regional and national priorities for nature conservation.
- 2.25 A minimum buffer zone of 15m will be required in line with Government Guidance for ancient woodland and individual ancient or veteran trees. The size and type of buffer zone should vary depending on the scale, type and impact of the development and the sensitivity of the natural asset(s) that may be affected based on proportionate evidence.
- 2.26 Where possible, a buffer zone should:
 - contribute to wider ecological networks
 - be part of the green infrastructure of the area
- 2.27 Encouragement will be given to the planting of street trees, wherever possible.

Legislation

Biodiversity Action Plan (BAP) Habitats and Species

2.28 The UK Biodiversity Action Plan (HMSO 1995, 1998; UKBAP 2007) lists species and habitats which have undergone significant declines in recent years and for which conservation is a priority in order to preserve biodiversity in the UK. The BAPs provide a list of actions to be implemented to halt or reverse these declines. These species and habitats are identified as Habitats and Species of Principal Importance for the conservation of biological diversity in England under Section 41 of the Natural Environment and Rural Communities (NERC) Act 2006. Section 40 of the NERC Act, planning policy and underpinning guidance (ODPM, 2005)

3.0 METHODOLOGY

Condition Assessments

3.1 Condition assessments were completed on 27 January 2025. Habitat condition was assigned following guidance from the 'The Statutory Biodiversity Metric User Guide' and 'Statutory Biodiversity Metric Condition Assessments' documents (Department for Environment, Food & Rural Affairs, 2024) to be read in conjunction with the Statutory Biodiversity Metric calculation tool. The condition of each broad habitat type was assessed following this guidance. Full details of condition assessments completed can be seen in Appendix B.

Desk Study and Strategic Significance

- 3.2 Strategic significance is used to assess the value of a habitat in relation to its spatial location using published local strategies and objectives for improving biodiversity, including Local Nature Recovery Strategies, local biodiversity plans, National Character Areas objectives, Local Planning Authority Local Ecological Networks and green infrastructure strategies, as per the guidance of the 'User Guide' document (Natural England, 2023).
- 3.3 The following documents / sources were reviewed to determine the strategic significance of habitats:
 - North Warwickshire Local Plan 2021
 - The Multi Agency Geographic Information for the Countryside (MAGIC) online database (http://magic.defra.gov.uk).
 - A 2km third-party data search was instructed by the client as part of this commission. This was a cross-boundary search undertaken by Warwickshire Biological Record Centre and Leicestershire and Rutland Environmental Records Centre undertaken during February 2025 to identify any records within a 2km radius of the site. It should be noted that the absence of biological records for an area does not imply that taxa are not present.
 - A search of European statutory designated sites such as Special Areas of Conservation (SAC) or Special Protection Areas (SPA) within 10km of the site boundary was also undertaken.

Measurement of Habitat and Hedgerow Units

- 3.4 Baseline habitat parcels were measured using habitat mapping and aerial imagery overlain in QGIS. A minimum mapping unit of 25m² and 5 linear metres was implemented.
- 3.5 Survey units for hedgerows have been recorded in line with the Hedgerow Survey Handbook, 2007:
 - 'An end point, or node, is:

- o any point or connection between two, or more, hedgerows to other features e.g. fences, walls, ditches, roads
- o the point at which a hedgerow stops and there is a gap of more than 20m to the next hedgerow (e.g. where the hedgerow ends in the middle of a field)
- o the point at which the hedgerow links to a woodland or other seminatural habitat such as a pond
- There may be significant variation along this length that may require refining lengths into 'survey units'. These additional points where changes occur as follows:
 - o the point at which the hedgerow changes character from one hedgerow type to another for 20m or more
 - o where there is a distinct change in hedgerow height for lengths of 20m or more
 - o the ends of lengths (20m or more) of recent planting, coppicing or laying'

Calculating Biodiversity Units

The Statutory Biodiversity Metric calculation tool. was used to calculate the baseline (habitat and hedgerow units). Metric calculations have been undertaken by E. Seaton BSc (Hons) MCIEEM.

Limitations

3.7 The baseline assessment was undertaken in February 2025. This is not within the optimal survey period for most habitats in England (JNCC, 2010). However, as the site is arable dominated (not requiring condition assessment); this did not present a significant limitation.

4.0 RESULTS

Strategic Significance

4.1 Habitats have been assessed for strategic significance in relation to its spatial location using published local strategies.

Table 2: Strategic Significance

Resource	Strategic significance of habitats in relation to spatial location	Relevance to application site and habitats
North Warwickshire Local Plan 2021	New development should, as far as possible retain existing trees, hedgerows and nature conservation features such as water bodies with appropriate protection from construction where necessary and strengthen visual amenity and biodiversity through further hard and soft landscaping. The Council will seek replacement or enhancement to such natural features where their loss results from proposed development. Development proposals should be designed so that existing and new conservation features, such as trees and hedgerows and water bodies are allowed to grow to maturity without causing undue problems, or are not unacceptably compromised by development, for example by impairing visibility, shading or damage. Development will not be permitted which would directly or indirectly damage existing mature or ancient woodland, veteran trees or ancient or species—rich hedgerows (other than	Species-rich hedgerows and mature trees present within application site.
	were appropriate avoidance, mitigation, or compensation has been taken and any minimised harm is justified having considered the policies in this plan as a whole)	
The Multi Agency Geographic Information for the Countryside (MAGIC) online database	National Habitat Networks are specified. The southern section of the site falls within the 'Network Expansion Zone'. This is land beyond the Network Enhancement Zones with potential for expanding, linking/joining networks across the landscape.	No habitats proposed fall within those identified within the Network Expansion Zone e.g. upland calcareous grassland, reedbeds, lowland raised bog, wood-pasture and parkland etc.

Table 3: Warwickshire's Biodiversity Action Plan

BAP Habitats	
Acid Grassland (updated November 2021)	Allotments (updated July 2021)
Built Environment (August 2015)	Calcareous Grassland (updated November 2021)
Canals (updated August 2021)	Churchyards and Cemeteries (updated November 2021)
Field Margins (updated November 2021)	Gardens (updated July 2021)
Hedgerows (updated November 2021)	Lakes and Reservoirs (updated July 2021)
Lowland Heathland (updated November 2021)	Marsh and Swamp, Wet Grassland and Wet Woodland (updated November 2021)
Mosaic Habitats on Previously Developed Land (updated November 2021)	Neutral Grassland (updated November 2021)
Old Parkland and Veteran Trees (updated February 2021)	Parks and Public Open Spaces (updated November 2021)
Ponds (revised March 2022)	Quarries and Gravel Pits (updated November 2021)
Reed beds (updated March 2022)	Rivers and Streams (updated February 2018)
Roadside Verges (updated August 2021)	School Grounds (updated August 2021)
Traditional Orchards (updated November 2021)	Woodland (updated November 2021)
BAP Habitats	BAP Species
H1 Arable Farmland	S1 Otter
H2 Traditional Orchard	S2 Dormouse
H3 Hedgerows	S3 Bats
H4 Scrub	S4 Water vole
H5 Woodland	S5 Noble Chafer
H6 Ancient Veteran Trees	S6 Nightingale
H7 Wet Woodland	S7 Shad
H8 Reedbed	S8 Adder
H9 Fen and Marsh	S9 Slow-worm
H10 Wet Grassland	S10 Great Crested Newt
H11 Grassland	S11 White-clawed Crayfish

H12 Lowland Heathland	S12 High Brown Fritillary
H13 Road Verges	S13 Brown Hairstreak
H14 Urban	S14 Common Clubtail
H15 Canals	S15 Stag Beetle
H16 Ponds and Lakes	S16 Violet Click
H17 Rivers and Streams	S17 Hornet Robberfly
	S18 Black Poplar
	S19 True Service Tree
	S20 Farmland Birds
	S21 Wood White
	S22 Grizzled Skipper
	S23 Pearl-bordered Fritillary
	S24 Common Fan-foot
	S25 Drab Looper
	S26 Grayling

- 4.2 Taking the above into account, the following habitats have been ascribed a level of strategic significance:
 - Species-rich hedgerow with trees high 'formally identified in local strategy' strategic significance.
 - Pond (BAP habitat) high 'formally identified in local strategy' strategic significance.

Existing On-site Habitats and Hedgerows Condition Assessment

4.3 A summary of baseline condition assessments has been provided below. Full condition assessments can be seen in Appendix B.

Arable

4.4 Arable land forms the majority of the application site. This is a low distinctiveness habitat with condition assessments not applicable.

Pond

4.5 A pond is situated at the north-east of the site. It is overshaded by goat willow *Salix* caprea scrub with minimal aquatic vegetation present. Common nettle *Urtica dioica* dominates the banks.

Table 4: Pond Condition

Pond Type	Distinctiveness	Condition
Pond (priority habitat)*	High	Moderate

^{*}precautionarily assigned due to outstanding great crested newt eDNA survey

Willow Scrub

4.6 A parcel of willow *Salix caprea* scrub surrounds and overshadows the pond. It reaches c. 4m in height with no other scrub species being recorded.

Table 5: Scrub Type and Condition

Scrub Type	Distinctiveness	Condition
Willow scrub	Medium	Poor

Developed Land

4.7 A road runs along the northern boundary of the site. This is a low distinctiveness habitat with condition assessments not applicable.

Hedgerows and Margins

4.8 Four hedgerows are present within the application site. A description of the hedgerows including associated margins (where present) is provided in Table 6 with condition assessments provided in Table 7.

Table 6: hedgerow description and species composition

Hedgerow Reference	Description
Hedgerow 1 (H1)	Hedgerow 1 runs along the southern section of the eastern boundary of the site. It is a new species-rich hedgerow comprising whip planting including hawthorn <i>Crataegus monogyna</i> , dogrose <i>Rosa canina</i> , dogwood <i>Cornus sanguinea</i> , blackthorn <i>Prunus spinosa</i> , and hazel <i>Corylus avellana</i> . It is recently established, reaching c.0.5m in height. Some existing bramble <i>Rubus fruticosus</i> and rowan <i>Sorbus aucuparia</i> are also present along this boundary.
	A c.1m vegetated margin is associated with this hedgerow, comprising cock's-foot <i>Dactylis glomerata</i> , red fescue <i>Festuca rubra</i> , cow parsley <i>Anthriscus sylvestris</i> , common nettle <i>Urtica dioica</i> , and dandelion Taraxacum spp,
Hedgerow 2 (H2)	Hedgerow 2 runs along the northern section of the eastern boundary. It is a species-rich hedgerow with trees reaching c.5m in height. Species recorded include hawthorn <i>Crataegus monogyna</i> , yew <i>Taxus baccata</i> , bramble <i>Rubus fruticosus</i> , dogrose <i>Rosa canina</i> , holly <i>Ilex aquifolium</i> , sycamore <i>Acer pseudoplatanus</i> , pedunculate oak <i>Quercus robur</i> (tree), and common beech <i>Fagus sylvatica</i> .

Hedgerow 3 (H3)	Hedgerow 3 runs along the north-western boundary. It is a species-rich hedgerow with trees comprising pedunculate oak <i>Quercus robur</i> , bramble <i>Rubus fruticosus</i> , holly <i>Ilex aquifolium</i> , dogrose <i>Rosa canina</i> , elder <i>Sambucus nigra</i> , and hawthorn <i>Crataegus monogyna</i> . A number of standing dead and fallen elm <i>Ulmus spp</i> . trees are also present. The hedgerow reaches approximately 5m in height.
Hedgerow 4 (H4)	Hedgerow 4 runs along the southern boundary and is a species-rich hedgerow with trees. It comprises elm <i>Ulmus spp</i> , elder <i>Sambucus nigra</i> , hawthorn <i>Crataegus monogyna</i> , pedunculate oak <i>Quercus robur</i> , holly <i>Ilex aquifolium</i> , blackthorn <i>Prunus spinosa</i> , and aspen <i>Populus tremula</i> .

Table 7: Hedgerow Conditions

Hedgerow	Description	Distinctiveness	Condition
H1	Species-rich native hedgerow	Medium	Moderate
H2	Species-rich native hedgerow with trees	High	Good
H3	Species-rich native hedgerow with trees	High	Good
H4	Species-rich native hedgerow with trees	High	Good

Retained Habitat

- 4.9 The pond, willow scrub and developed land (road running along the north of the site) will all be subject to retention.
- 4.10 The boundary hedgerows will also be retained excluding the removal of small sections for access points. A total of 3m of Hedgerow 1, 13m of Hedgerow 2 and 6m of Hedgerow 3 are to be lost.
- 4.11 T7 is also proposed for removal due to Health & Safety Concerns.

Habitat Creation

- 4.12 The following habitat creation is proposed (see Landscape Plan in Appendix A for locations).
 - 0.72ha of modified grassland in 'poor' condition
 - 0.91ha of other neutral in 'moderate' condition (fenced areas)
 - 0.26ha of other neutral grassland in 'poor' condition (unfenced areas)
 - 0.06ha of traditional orchard in 'moderate' condition

- 0.07ha of pond in 'moderate' condition (shown as EM8 on landscape plan). Consultation with the drainage engineers has confirmed this area will support a wet core.
- 2.28ha of developed land (development cells). In line with statutory BNG guidance, this area has been subject to a 70:30 built development (1.6ha) and vegetated garden (0.68ha) split.
- Planting of 174 small native trees outside of traditional orchard, scrub and private gardens.
- Planting of 273m of native, species-rich hedgerow with trees in 'moderate' condition.

Biodiversity Unit Calculations

4.13 The site is formed from 12.23 habitat and 18.17 hedgerow units and will result in a +14.24% hedgerow and +13.30 hedgerow net gain.

Table 8: Habitat Biodiversity Impact

Factor	Units
On-site Baseline units	12.23
On-site Post-intervention biodiversity units	13.97
On-site net unit change	1.74
Total net % change	+14.24
Trading Rule Satisfied	Yes

Table 9: Hedgerow Biodiversity Impact

Factor	Units
On-site Baseline units	18.17
On-site Post-intervention biodiversity units	20.59
On-site net unit change	2.42
Total net % change	+13.30
Trading Rule Satisfied	Yes

5.0 REFERENCES

Baker, J., Beatty, B., Hoskin, R., Footprint Ecology, Butterworth, T., WSP (2019). *Biodiversity Net Gain. Good Practice Principles for Development – A Practical Guide.* CIRIA, London, UK.

BLADE Ecology (2024). Preliminary Ecological Appraisal (including 2km third-party data search) – Orton Road, Warton. BLADE Ecology Ltd., Worcester, UK.

CIEEM (2017). *Guidelines for Ecological Report Writing*. Chartered Institute of Ecology and Environment, Winchester, UK.

CIEEM (2018). Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater, Coastal and Marine. Chartered Institute of Ecology and Environment, Winchester, UK.

Department for Environment, Food & Rural Affairs (2024). *The Statutory Biodiversity Metric – User Guide*. Department for Environment, Food & Rural Affairs, UK. Available from: https://www.gov.uk/government/publications/statutory-biodiversity-metric-tools-and-guides [Accessed March 2025]

Department for Environment, Food & Rural Affairs (2024). *Statutory Biodiversity Metric Condition Assessments*. Department for Environment, Food & Rural Affairs, UK. Available from: https://www.gov.uk/government/publications/statutory-biodiversity-metric-tools-and-guides [Accessed March 2025]

MAGIC (2021). *Interactive Map*. Available from: https://magic.defra.gov.uk/ [Accessed March 2025]

National Planning Policy Framework (2024). Department for Communities and Local Government, UK.

UK Habitat Ltd. (2023). *UK Habitat Classification Version 2.0*. https://ukhab.org [Accessed March 2025]

APPENDIX A

Plans

Biodiversity Net Gain Baseline Plan Landscape Plan











- oscane Shalley



APPENDIX B

Photographs



Photograph 1: view across the site.



Photograph 2: view along Hedgerow 3.





boundary.

Photograph 3: view along the eastern Photograph 4: view across the site.





Photograph 5: pond and willow scrub.

Photograph 6: view across the site.

APPENDIX C

Condition Assessments

Table 10: Scrub (excluding bramble scrub) Condition Assessment Criteria

Conditi	Condition Assessment Criteria									
А	The scrub is a good representation of the habitat type it has been identified as, based on its UKHab description (where in its natural range). The appearance and composition of the vegetation closely matches the characteristics of the specific scrub type.									
	≥80% of scrub is native, and there are ≥3 native woody species (as defined in the Hedgerow Survey Handbook), with no single species comprising >75% of the cover (except hazel Corylus avellana, common juniper Juniperus communis, sea buckthorn Hippophae rhamnoides or box Buxus sempervirens, which can be up to 100% cover).									
В	Seedlings, saplings, young shrubs and mature (ancient or veteran) shrubs are all present.									
С	There is an absence of invasive non-native species (as listed on Schedule 9 of WCA, 1981) and species indicative of sub-optimal condition make up <5% of ground cover.									
	Species indicative of sub-optimal condition for this habitat type may include: non-native conifers, tree-of-heaven <i>Alianthus altissima</i> , holm oak <i>Quercus ilex</i> , European turkey oak <i>Quercus cerris</i> , cherry laurel <i>Prunus laurocerasus</i> , snowberry <i>Symphoricarpos</i> spp., shallon <i>Gaultheria shallon</i> , American skunk cabbage <i>Lysichiton americanus</i> , buddleia <i>Buddleja</i> spp., cotoneaster <i>Cotoneaster</i> spp., Spanish bluebell <i>Hyacinthoides hispanica</i> and hybrid bluebells <i>Hyacinthoides x massartiana</i> . There may be additional relevant species local to the region and or site.									
D	D The scrub has a well-developed edge with scattered scrub and tall grassland and/or herbs present between the scrub and adjacent habitat(s).									
Е	E There are clearings, glades or rides present within the scrub, providing sheltered edges.									
Conditi	Condition Assessment Result Condition Assessment Score									
Passes	Passes 5 of 5 criteria Good									
Passes	Passes 3 or 4 criteria Moderate									
Passes	Passes 2 or fewer criteria; Poor									

Table 11: Scrub Assessment Results

Parcel	Criteria			Score		
	A B C D E					
Willow scrub	N	N	Υ	Υ	N	Poor

Table 12: Hedgerow Condition Assessment Criteria

Attribute	Criteria	Description				
A1. Height		The average height of woody growth estimated from base of stem to the top of shoots, excluding any bank beneath the hedgerow, any gaps or isolated trees.				
	>1.5 m average along length	Newly laid or coppiced hedgerows are indicative of good management and pass this criterion for up to a maximum of four years (if undertaken according to good practice).				
		A newly planted hedgerow does not pass this criterion (unless it is > 1.5 m height).				
A2. Width		The average width of woody growth estimated at the widest point of the canopy, excluding gaps and isolated trees.				
	>1.5 m average along length	Outgrowths are only included in the width estimate when they are >0.5m in height.				
		Laid, coppiced, cut and newly planted hedgerows are indicative of good management and pass this criterion for up to a maximum of four years (if undertaken according to good practie).				
B1. Gap – hedge base	Gap between ground and base of canopy <0.5 m for	This is the vertical 'gappiness' of the woody component of the hedgerow, and its distance from the ground to the lowest leafy growth.				
	90% of length	Certain exceptions to this criterion are acceptable (see page 65 of the Hedgerow Survey Handbook).				
B2. Gap – hedge canopy	Gaps make up <10% of total length and	This is the horizontal 'gappiness' of the woody component of the hedgerow. Gaps are complete breaks in the woody canopy (no matter how small).				
continuity	No canopy gaps >5 m	Access points and gates contribute to the overall 'gappiness', but are not subject to the >5m criterion (as this is the typical size of a gate).				
C1. Undisturbed	>1m width of undisturbed ground with perennial	This is the level of disturbance (excluding wildlife disturbance) at the base of the hedge.				
ground and perennial vegetation	herbaceous vegetation for >90% of length:	Undisturbed ground should be present for at least 90% of the hedgerow length greater than 1m in width and must be present along at least one side of the hedge.				
 measured from outer edge of hedgerow, and is present on one side of the hedge (at least) 		This criterion recognises the value of a hedge base as a boundary habitat with the capacity to support a wide range of species. Cultivation, heavily trodden footpaths, poached ground etc. can limit available habitat niches.				
C2. Undesirable perennial vegetation	Plant species indicative of nutrient enrichment of soils dominate <20% cover of the area of undisturbed ground	The indicator species used are nettles <i>Urtica spp.</i> , cleavers <i>Galium aparine</i> and docks <i>Rumex spp.</i> Their presence, either singly or together does not exceed 20% cover threshold.				
D1. Invasive and neophyte species	90% of the hedgerow and undisturbed ground is free of invasive non-native species (including those on Schedule 9 of WCA) and recently introduced species.	Recently introduced species refer to plants that have naturalised in the UK since AD 1500 (neophytes). Archaeophytes count as natives. For information on neophytes see the JNCC website, as well as the BSBI website where the 'Online Atlas of the British and Irish Flora' contains an up-to-date list of the status of				

		species. For information see the GB Non-Native	n on invasive non-native species Secretariat website.
D2. Current Damage	90% of the hedgerow or undisturbed ground is free of damage caused by human activities	s damaging activities that may eterioration in other attributes. vidence of pollution, piles of or inappropriate management e hedge cutting).	
Additional gro	oup – applicable to hedgerow t	rees only	
E1. Tree class	There is more than one age- class (or morphology) of tree present (for example, young, mature, veteran and or ancient) and there is on average at least one mature, ancient or veteran tree present per 20-50m of hedgerow.	there are a range of age-classes h allow for replacement trees ies for different species.	
E2. Tree health	≥95% of hedgerow trees are in healthy condition (excluding veteran features valuable for wildlife). There is little or no evidence of an adverse impact on tree health by damage from livestock or wild animals, pests or diseases, or human activity.	s if the trees are subject to omises the survival and health of ns.	
Condition Ass	sessment Result for Hedgerows	s without Trees	Condition Assessment Score
AND	n 2 failures in total; n 1 failure in any functional groi	ID.	Good
	1 4 failures in total;	<i>α</i> μ.	Moderate
AND	14 failules III totat,		Moderate
	both attributes in more than or A1, A2, B1 and C2 = Moderate		
Fails a total of	more than 4 attributes;	Poor	
	ributes in more than one fund A2, B1 & B2 = Poor condition).		
Condition Ass	sessment Result for Hedgerows	Condition Assessment Score	
No more than	n 2 failures in total;	Good	
AND	n 1 failure in any functional grot		
	n 5 failures in total	ар. 	Moderate
AND	i o iaitures iri totat		Moderate

<u>Does not fail both attributes</u> in more than one functional group (e.g. fails attributes A1, A2, B1, C2 and E1 = Moderate condition).	
Fails a total of more than 5 attributes; OR	Poor
Fails both attributes in more than one functional group (e.g. fails attributes A1, A2, B1 & B2 = Poor condition).	

Table 13: Hedgerow Assessment Results

Refence		Criteria									Score
	A1	A2	B1	B2	C1	C2	D1	D2	E1	E2	
H1	N	N	Υ	Υ	Υ	Υ	Υ	Υ	N.	/A	Moderate
H2	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Good
H3	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Good
H4	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Good

Table 14: Pond Condition Assessment Criteria

Condition A	Condition Assessment Criteria							
А	The pond is of good water quality, with clear water (low turbidity) indicating no obvious signs of pollution. Turbidity is acceptable if the pond is grazed by livestock.							
В	There is semi-natural habitat (moderate distinctiveness or above) for ≥10 m from the pond edge for its entire perimeter.							
С	<10% of the water surface is covered with duckweed of	or filamentous algae.						
D	The pond is not artificially connected to other waterbodies, e.g. agricultural ditches or artificial pipework.							
Е	Pond water levels can fluctuate naturally throughout the year. No obvious dams, pumps or pipework.							
F	There is an absence of listed non-native plant and anir	mal species.						
G	The pond is not artificially stocked with fish. If the ponative fish assemblage at low densities.	ond naturally contains fish, it is a						
Additional c	riteria only applicable to non-woodland ponds							
Н	H Emergent, submerged or floating plants (excluding duckweeds) cover ≥50% of the pond area which is <3 m deep.							
I	The pond surface is ≤50% shaded by adjacent trees and scrub.							
Condition A	Condition Assessment Result for woodland ponds Condition Assessment Score							

Passes 7 of 7 criteria	Good			
Passes 5 to 6 criteria	Moderate			
Passes 4 or fewer criteria	Poor			
Condition Assessment Result for non-woodland ponds	Condition Assessment Score			
Passes 9 of 9 criteria	Good			
Passes 6 to 8 criteria	Moderate			
Passes 5 or fewer criteria	Poor			

Table 15: Pond. Assessment Results

Pond				Score						
	А	A B C D E F G H I								
Pond	Υ	Ν	Υ	Υ	Υ	Υ	Υ	N/A		Moderate

APPENDIX D

Qualifications and Experience

BLADE Ecology Ltd is Registered Practice of the Chartered Institute of Ecology and Environmental Management (CIEEM). A comprehensive range of ecological services are offered including Preliminary Ecological Appraisal (PEA), Ecological Impact Assessment (EcIA), Habitat Regulations Assessment (HRA), Biodiversity Impact Assessment (BIA) and European Protected Species (EPS) Surveys / Licensing.

The practice works closely work closely with clients to achieve their aspirations alongside securing the best outcomes for the environment. With wildlife legislation and policy as its basis; commercial awareness, pragmatism and defensible advice is combined to form BLADE Ecology's approach.

As well as offering a wide range of ecological services, BLADE Ecology offers an inhouse collaborative approach in conjunction with BLADE Landscape Architects and BLADE Trees.

Emma Seaton BSc (Hons) MCIEEM

Emma holds a BSc (Hons) degree in Biology from the University of Sheffield and has since gained a postgraduate certificate in Ecological Consultancy. Her ecological experience includes Preliminary Ecological Appraisals, Ecological Impact Assessments (EcIA), surveying for notable / European Protected Species, mitigation / licensing advice and providing Continued Professional Development (CPD) sessions for developers on Biodiversity Net Gain. She has held Natural England survey licences for bats (Class 2), great crested newts and white-clawed crayfish since 2015. She is also a Registered Consultant under the Bat Mitigation Class Licence (BMCL) licence and an Earned Recognition consultant under the Natural England bat pilot project. Emma is a Full member of the Chartered Institute of Ecology and Environmental Management.

