Novar 1 Wind Farm Repowering

Chapter 7 - Ecology

September 2026



7. Ecology

7.1 Executive Summary

7.1.1 This chapter considers the potential impacts of the Proposed Development and their associated effects on ecological features, such as designated nature conservation sites, habitats and protected species in line with best practice guidance from the Chartered Institute of Ecology and Environmental Management (CIEEM)[1].

7.1.2 The field study area was surveyed in 2025 to provide baseline information on habitats and faunal species. Surveys included UKHab and National Vegetation Classification (NVC) habitat surveys, bat surveys and terrestrial protected species surveys. The dominant habitats (excluding the coniferous woodland plantation) and existing wind farm footprint are peatlands in the form of blanket bog (much of it in a degraded state) as well as wet and dry heath. Areas of the coniferous woodland crossed by the Access Route are long established woodland of plantation origin (LEPO) and listed on the Ancient Woodland Inventory (AWI). Five areas of potential Groundwater Dependent Terrestrial Ecosystems (GWDTE) were recorded. Protected species surveys identified signs of pine marten *Martes martes* and badger *Meles meles*.

7.1.3 Without application of mitigation, significant adverse effects from habitat loss and degradation are predicted for peatlands such as blanket bog, as well as montane heath with willow scrub. There would be significant adverse effects from tree removal along the Access Route that are also considered to occur for LEPO woodland listed on the AWI. Non-significant adverse effects for pine marten from disturbance and loss of habitat are predicted.

7.1.4 Following the application of mitigation, such as implementation of a Biodiversity Enhancement Management Plan (BEMP) an outline version of which is provided in **Technical Appendix 7.4** and which includes mitigation and offsetting for the loss of peatland and LEPO woodland, standard working methods and good practice measures, such as a Decommissioning and Construction Environmental Management Plan (DCEMP) and pollution prevention measures, no significant residual effects are predicted.

7.2 Introduction

7.2.1 This chapter considers the likely significant effects on ecology associated with the decommissioning of the Novar 1 Wind Farm and the construction, operation and decommissioning of the repowered wind farm.

7.2.2 The specific objectives of the chapter are to:

- Describe the existing ecological baseline context and cumulative context;
- Describe the assessment methodology and significance criteria used in completing the impact assessment;
- Describe the potential effects, including direct, indirect and cumulative effects;
- Describe the mitigation measures proposed to address likely significant effects; and
- Assess the residual effects remaining following the implementation of mitigation.

7.2.3 The assessment has been carried out by Ramboll.

7.2.4 This chapter is supported by the following figures and technical appendices:

- Volume 3a: Figures
  - Figure 7.1: Designated Sites;

[1] CIEEM (2018) Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater, Coastal and Marine version 1.3. Chartered Institute of Ecology and Environmental Management, Winchester

  - Figure 7.2: UKHab Habitat Survey Results;
  - Figure 7.3: National Vegetation Classifications Survey Results;
  - Figure 7.4: Potential Groundwater Dependent Terrestrial Ecosystems;
  - Figure 7.5: Target Notes;
  - Figure 7.6: Bat Detector Locations; and
  - Figure 7.7: Areas Available for Peat Restoration

- Volume 4: Technical Appendices
  - Technical Appendix 7.1: Assessment Methodology;
  - Technical Appendix 7.2: Ecology Survey Results;
  - Technical Appendix 7.3: Deer Management Plan; and
  - Technical Appendix 7.4: Outline Biodiversity and Habitat Enhancement Management Plan (OBEMP).

7.2.5 Figures and technical appendices are referenced in the text where relevant.

7.3 Legislation, Policy and Guidance

7.3.1 The ecology assessment has been undertaken within the context of relevant legislative instruments, planning policies, and guidance documents, and these are summarised below.

Legislation

7.3.2 Relevant legislation has been reviewed and taken into account as part of the ecology assessment. Of particular relevance are:

- EC Directive on the Commission of Natural Habitats and wild Flora and Fauna, 92/43/EEC (European Commission, 1992)[2];
- Wildlife and Countryside Act (UK Government, 1981) (as amended)[3];
- The Conservation (Natural Habitats, &c.) Regulations 1994 (as amended)[4];
- The Conservation (Natural Habitats, &c.) (EU Exit) (Scotland) (Amendment) Regulations 2019[5];
- Nature Conservation (Scotland) Act (UK Government, 2004) (as amended)[6];
- Wildlife and Natural Environment (Scotland) Act (UK Government 2011)[7];
- UK Post-2010 Biodiversity Framework (UK Government, 2012)[8];
- The Electricity Works (Environmental Impact Assessment) (Scotland) Regulations 2017 (UK Government, 2017)[9]; and
- RAMSAR Convention on Wetlands (Ramsar Convention, 1971)[10].

[2] Legislation.gov.uk. (2025). Council Directive 92/43/EEC of 21 May 1992 on the conservation of natural habitats and of wild fauna and flora. [online] Available at: https://www.legislation.gov.uk/eudr/1992/43/contents?view=plain.

[3] GOV.UK (1981). Wildlife and Countryside Act 1981. [online] Legislation.gov.uk. Available at: https://www.legislation.gov.uk/ukpga/1981/69/contents.

[4] Gov.UK (2024). The Conservation (Natural Habitats, &c.) Regulations 1994. [online] Legislation.gov.uk. Available at: https://www.legislation.gov.uk/uksi/1994/2716/contents.

[5] GOV.UK (2019). CONSERVATION (NATURAL HABITATS, &C.) (EU EXIT) (SCOTLAND) (AMENDMENT) REGULATIONS 2019.

[6] Animallaw.info. (2018). Scotland - Wildlife - Nature Conservation (Scotland) Act 2004 | Animal Legal & Historical Center. [online] Available at: https://www.animallaw.info/statute/scotland-wildlife-nature-conservation-scotland-act-2004.

[7] Legislation.gov.uk. (2024). Wildlife and Natural Environment (Scotland) Act 2011. [online] Available at: https://www.legislation.gov.uk/asp/2011/6/contents.

[8] UK Post-2010 Biodiversity Framework Published by JNCC and Defra on behalf of the Four Countries' Biodiversity Group. (n.d.). Available at: https://data.jncc.gov.uk/data/587024ff-864f-4d1d-a669-f38cb448abdc/UK-Post2010-Biodiversity-Framework-2012.pdf.

[9] UK Government (2017). The Electricity Works (Environmental Impact Assessment) Regulations 2017. [online] Legislation.gov.uk. Available at: The Electricity Works (Environmental Impact Assessment) (Scotland) Regulations 2017

[10] United Nations Educational, Scientific and Cultural Organization (1983). The convention on wetlands of international importance especially as waterfowl habitat. Environmental Policy and Law, [online] 10(2), pp.70–71. doi: https://doi.org/10.1016/s0378-777x(83)80165-6.

Policy

7.3.3 Relevant planning policies reviewed for this ecology assessment are:

- National Planning Framework 4 (NPF4) (Scottish Government, 2023)[11];
- The Scottish Government's Policy on Control of Woodland Removal (Forestry Commission, 2009)[12];
- UK Biodiversity Action Plan (BAP) (Joint Nature Conservation Committee (JNCC), 2010a)[13];
- Scottish Biodiversity List (Scott Wilson, 2012)[14];
- 2020 Challenge (Scottish Government, 2013)[15];
- Highland-wide Local Development Plan (The Highland Council (THC), 2012)[16];
- The Inner Moray Firth Local Development Plan 2 (IMFLDP2) (June 2024)[17]; and
- Relevant supplementary guidance, particularly the Onshore Wind Energy Supplementary Guidance (OWESG) (2016) and Addendum Supplementary Guidance: Part 2b (2017)[18]; and
- The Highland Biodiversity Action Plan 2021-2026 (THC, 2020)[19]

Technical Standards and Guidance

7.3.4 Best practice guidance has been recognised when undertaking the following field surveys including:

- UK Hab Classification Survey (The UK Habitat Classification)[20];
- National Vegetation Classification: Users' Handbook(NVC)[21];
- Protected species (Protected Species A-Z Guide)[22]:
- European otter *Lutra lutra* (Monitoring the Otter)[23];

[11] Scottish Government (2023). National Planning Framework 4. [online] www.gov.scot. Available at: https://www.gov.scot/publications/national-planning-framework-4/ .

[12] Scottish Forestry (2025). Woodland removal. [online] Gov.scot. Available at: https://www.forestry.gov.scot/publications/control-woodland-removal-policy [Accessed 3 Mar. 2026].

[13] Jncc.gov.uk. (2020). Biodiversity – The UK Action Plan | JNCC Resource Hub. [online] Available at: https://jncc.gov.uk/resources/cb0ef1c9-2325-4d17-9f87-a5c84fe400bd .

[14] The Scottish Government (2025). Scottish biodiversity: list. [online] Gov.scot. Available at: https://www.gov.scot/publications/scottish-biodiversity-list/.

[15] 2020 Challenge for Scotland's Biodiversity A Strategy for the conservation and enhancement of biodiversity in Scotland. (n.d.). Available at: https://www.gov.scot/binaries/content/documents/govscot/publications/strategy-plan/2013/06/2020-challenge-scotlands-biodiversity-strategy-conservation-enhancement-biodiversity-scotland/documents/00425276-pdf/00425276-pdf/govscot%3Adocument/00425276.pdf.

[16] Butlin, H. (2012). Highland-wide Local Development Plan. [online] www.highland.gov.uk. Available at: https://www.highland.gov.uk/info/178/development_plans/199/highland-wide_local_development_plan.

[17] Council, T.H. (2024). Inner Moray Firth Local Development Plan 2 (IMFLDP2) | Inner Moray Firth Local Development Plan | The Highland Council. Highland.gov.uk. [online] doi: http://www.highland.gov.uk/site/scripts/documents_info.php?categoryID=178&documentID=202

[18] Butlin, H. (2016). Onshore wind energy. [online] www.highland.gov.uk. Available at: https://www.highland.gov.uk/onshorewind

[19] Highland Environment Forum - Providing an arena for discussion, networking and action on environmental issues. (2019). Highland Nature: Biodiversity Action Plan 2021 – 2026 - Highland Environment Forum. [online] Available at: https://www.highlandenvironmentforum.info/biodiversity/action-plan/ [Accessed 3 Mar. 2026].

[20] UK Habitat Classification. [online] Available at: https://www.ukhab.org/.

[21] Rodwell, J. (2006). National Vegetation Classification: Users' Handbook. [online] Available at: https://data.jncc.gov.uk/data/a407ebfc-2859-49cf-9710-1bde9c8e28c7/JNCC-NVC-UsersHandbook-2006.pdf.

[22] NatureScot. (2025). Protected species A-Z guide. [online] Available at: https://www.nature.scot/professional-advice/protected-areas-and-species/protected-species/protected-species-z-guide.

[23] England, N. (2007). Monitoring the Otter - IN112. [online] Natural England - Access to Evidence. Available at: https://publications.naturalengland.org.uk/publication/78009

- Water vole *Arvicola amphibius* (The Ecology and Conservation of Water Voles in Upland Habitats, The Water Vole Mitigation Handbook)[24,25];
- Red squirrel *Sciurus vulgaris* (Population ecology of the red squirrel (*Sciurus vulgaris*) in a fragmented woodland ecosystem on the Island of Jersey, Channel Islands)[26];
- Scottish wildcat *Felis sylvestris grampia* (Scottish Wildcat Conservation Action Plan)[27];
- Pine marten *Martes martes*[28]; and
- Bats (Bats and onshore wind turbines – survey, assessment and mitigation)[29].

7.4 Assessment Methodology

Overview

7.4.1 The ecology methodology is detailed in **Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4)** and follows the principles set out in the Ecological Impact Assessment (EcIA) guidelines from CIEEM[30].

7.4.2 The assessment is presented with reference to specific 'areas' of the Site. These areas comprise the Turbine Array and associated Access Route, as shown in **Figures 1.3A and 1.3B (EIAR Volume 3a)** and described in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)**.

Scope of Assessment

EIA Scoping Opinion

7.4.3 An EIA Scoping Report (presented in **Technical Appendix 1.3 Scoping Report (EIAR Volume 4)**) was submitted to the ECU on 23rd January 2025 with a formal request for a Scoping Opinion on the proposed scope of the EIA and assessment methodologies. The ECU subsequently issued their Scoping Opinion on the proposed scope and methodology of the topics for assessment within the EIA on 23rd May 2025. A copy of the ECU's Scoping Opinion is provided in **Technical Appendix 1.4 Scoping Opinion (EIAR Volume 4)**.

7.4.4 A summary of the key points raised in the ECU's Scoping Opinion, relevant to Ecology are presented in Table 7.1 including a response as to where the comments have been addressed.

Table 7.1: Summary of ECU Scoping Opinion Comments

The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
The Applicant should include walkover surveys looking for signs of protected species, including water vole, otter, badger, and pine marten.	Protected species walkover surveys, including water vole, otter, badger, bats and pine marten, have been completed for the Proposed Development. The detailed methodology followed for said surveys has been set out in

[24] Raynor, R. (2005). The ecology and conservation of water voles in upland habitats. [online] Available at: https://www.nature.scot/sites/default/files/2017-07/Publication%202005%20-%20SNH%20Commissioned%20Report%2099%20-%20The%20ecology%20and%20conservation%20of%20water%20voles%20in%20upland%20habitats.pdf.

[25] Dean, M., Strachan, R., Gow, D., Andrews, R., Mathews, F. and Chanin, P. (2016). The Water Vole Mitigation Handbook The Mammal Society Mitigation Guidance Series. [online] Available at: https://gat04-live-1517c8a4486c41609369c68f30c8-aa81074.divio-media.org/filer_public/1e/30/1e3072bf-0ffe-4df2-8ee2-e1af6f66755e/d93_-_water_vole_mitigation_handbook81824175_1.pdf.

[26] Magris, L. and Gurnell, J. (2006). Population ecology of the red squirrel (Sciurus vulgaris) in a fragmented woodland ecosystem on the Island of Jersey, Channel Islands. Journal of Zoology, 256(1), pp.99–112. doi:https://doi.org/10.1017/s0952836902000134.

[27] Scottish Wildcat Conservation Action Plan Contents. (n.d.). Available at: https://digital.nls.uk/pubs/e-monographs/2020/216528007.23.pdf.

[28] NatureScot. (2024). Standing advice for planning consultations - Pine Martens. [online] Available at: https://www.nature.scot/doc/standing-advice-planning-consultations-pine-martens

[29] NatureScot (2021). Bats and Onshore Wind Turbines - survey, Assessment and Mitigation. [online] NatureScot. Available at: https://www.nature.scot/doc/bats-and-onshore-wind-turbines-survey-assessment-and-mitigation.

[30] CIEEM (2024) Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater, Coastal and Marine version 1.3. Chartered Institute of Ecology and Environmental Management, Winchester Guidelines for Ecological Impact Assessment (EcIA) | CIEEM

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
Bat surveys should include static bat detectors. If bats are potentially affected by the proposal, mitigation should be outlined in the EIA. The spatial cover of the bat detectors should be provided on a map, providing a reasonable cover of the study area.	**Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4**) The results of these surveys have been included in Section 7.5.17 below. The spatial cover of bat detectors within the Site has been presented in **Figure 7.6 (EIAR Volume 3a)**.
Consideration of Highland Nature Biodiversity Action Plan (HNBAP) priority species and habitats as well as the Scottish Biodiversity List (SBL) to comply with Policy 59 of the Highland-wide Local Development Plan (HwLDP) for habitat surveys.	Section 7.4.1 - 7.4.4 details how the NatureScot pre-application guidance for onshore wind farms and the good practice NatureScot guidance on planning, development and protected species has been consulted. This information is also presented in **Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4)**. In addition, Important Ecological Features (IEF) such as relevant statutory designated sites and their cited qualifying interests, internationally or nationally important habitats and populations of ecological species listed on Annex IV of the Habitats Directive or Schedule 5 of the WCA 1981, or scarce, or a priority for conservation under the UK BAP, HNBAP and or SBL have been considered in Section 7.5.1 - 7.5.8. Consideration of the protected and priority habitats and species in the above lists aligns with and ensures compliance with policy 59 of the HwLDP. The assessment has also taken account of the extent of habitat loss and damage and effects of habitat loss/damage and effects of protected species presented in an **Outline Biodiversity Enhancement Management Plan (OBEMP) and an Outline Peat Management Plan (PMP)** (**Technical Appendices 7.4 and 9.6**, **EIAR Volume 4**).
The Applicant must provide detail on what constitutes as a worst-case scenario for ecological effects related to the Proposed Development during construction.	The Scoping Report referred to two potential development scenarios but after further consideration by the Applicant, the decision has been taken to assume a combined decommissioning and construction phase which would last for up to 3 years. This represents the worst-case scenario for ecological effects.
The developer should undertake a specific peat assessment to inform the siting, design, or other mitigation to overcome significant effects on peatland and Carbon Rich Soils, Deep Peat, and Priority Peatland Habitat. An up-to-date NVC survey and a commitment to undertake peatland restoration on an area of increased size to that of the application	A desk study peat assessment and best practice NVC surveys were carried out to inform the EIAR. Section 7.4.12 refers to high level mapping that predicts the majority of the Site is located within an area of potentially nationally important peatland (Class 1 peat) and the baseline surveys (including the NVC surveys) broadly support this. The Site is dominated by blanket bog with areas of degraded blanket bog habitat, and the Stage 1 and 2 peat surveys (refer to **Chapter 9: Hydrology,**

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
site is expected. The EIAR should provide details of all direct, indirect, permanent, and temporary impacts to any bog habitat present on the site.	**Hydrogeology and Soil (EIAR Volume 2)**) identified areas of deep peat in the north, central and south of the Site. This suggests a mix of Class 1 and Class 2 (classified as 'nationally important carbon-rich soils, deep peat and priority peatland habitat. Areas of potentially high conservation value and restoration potential') peatland have been identified across the Site. These are both of national importance with high conservation value, with Class 2 also having a high potential for restoration.
The EIAR should address the likely impacts on designated sites (SACs, SPAs, and SSSIs), and protected species and habitats within those sites, and outline appropriate mitigation measures to avoid or reduce impacts where possible.	Section 7.7 details the impacts on habitats, the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in an **Outline Biodiversity Enhancement Management Plan (OBEMP)** and an **Outline Peat Management Plan (PMP)** (**Technical Appendices 7.4 and 9.6**, **EIAR Volume 4**).
The EIAR needs to address the aquatic interests within local watercourses, including downstream interests that may be affected by the development, for example increases in silt and sediment loads resulting from construction works; pollution risk/incidents during construction; obstruction to upstream and downstream migration both during and after construction; disturbance of spawning beds/timing of works; and other drainage issues. The EIAR should evidence consultation input from the local fishery board(s) where relevant.	Sections 7.7.22 - 7.7.23 address the watercourse impacts however there is no mention of fish as all impacts to fish have been scoped out at an early stage of the assessment through the Scoping Report.
NVC and UKHab survey results are to be included in the EIAR. It is recommended that surveys cover an appropriate buffer, including any areas where access tracks/track upgrades and borrow pits may be proposed. Target notes should be used to identify the presence of any notable plants including any nationally rare/scarce species. It is advised that survey results are used to inform the design and layout process, so that the development avoids, where possible, sensitive habitats. Where this is not possible,	NVC and UKHab surveys were undertaken in accordance with best practice guidelines and results are detailed in section 7.5. The UKHab and NVC survey methodology and appropriate buffers are described in **Technical Appendix 7.1**. Section 7.7 details the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in an **OBEMP and a PMP**. These are presented in **Technical Appendices 7.4** and **9.6 (EIAR Volume 4)**.

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
suitable restoration and/or compensation measures should be proposed. Assessment should consider extent of habitat loss and damage, both direct and indirect, with suitable mitigation and/or restoration measures presented in an Outline Habitat Management Plan and, where required, a Peat Management Plan.	
The assessment of peatland loss and peatland restoration proposals should adhere to Nature Scot guidance 'Advising on peatland, carbon-rich soils and priority peatland habitats in development management'. A peat management plan should be provided. Mitigation and compensation should follow NatureScot guidance.	The loss of peatland habitat as a result of the construction of the Proposed Development is considered in section 7.7 below. Restoration of peatland post-construction is outlined and discussed in **Technical Appendix 7.4: OBEMP (EIAR Volume 4).** An Outline PMP has also been produced and is presented as Technical Appendix 9.6 (EIAR Volume 4).
A Habitat Management Plan (HMP) and Species Protection Plan (SPP) should be produced as part of the EIA, including proposals for mitigation and enhancement in relation to important habitats and species.	Section 7.7 details the extent of habitat loss and damage and effects on protected species, both direct and indirect temporary and permanent, with suitable mitigation and/or restoration measures presented in an **OBEMP** (**Technical Appendix 7.4** (**EIAR Volume 4**)).
The Highland Council's Biodiversity Enhancement Planning Guidance must be followed. It is recommended to include a detailed metric assessment, where all sites marked for enhancement are identified and mapped in the EIA.	NatureScot released a consultation on 31st August 2026 on a potential Scottish Planning Biodiversity Metric (SPBM) for Scotland[31] that would be similar to requirements for biodiversity net gain (BNG) in England. However, at the time of preparation and submission of the EIAR, neither the SPBM or BNG are mandatory in Scotland, but NPF4 does make biodiversity enhancement a requirement. The core principles of the Highland Council's Biodiversity Enhancement Planning guidance have been incorporated into the enhancement measures outlined in the **OBEMP Technical Appendix 7.4 (EIAR Volume 4)**. The standard mitigation hierarchy of avoidance and minimisation of impacts has been incorporated into the design of the Proposed Development. Land has been confirmed as available within the Application Boundary for achieving slightly in excess of a 1:10 compensation (lost:restored) ratio for blanket bog habitats (f1a, f1a5, f1a6). A further 12 ha for peatland restoration may also be available either within land controlled by Novar Estates, or at another appropriate

[31] https://www.nature.scot/professional-advice/planning-and-development/planning-and-development-advice/scottish-planning-biodiversity-metric

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
	location subject to the outcome of ongoing landowner engagement to achieve enhancement of 10% of the baseline as recommended by NatureScot. This is described in detail in **Technical Appendix 7.4 (EIAR Volume 4)**. Further mitigation and enhancement measures have been prescribed for montane heath and willow scrub. Outline plans for restoration and enhancement of these habitats have been presented in section 7.8 below and in the **OBEMP (Technical Appendix 7.4, EIAR Volume 4)**.
SEPA	
SEPA's requirements in relation to NPF4 Policy 5 must be addressed where proposals are on peatland or carbon rich soils (CRS). This includes an Outline Peat Management Plan (PMP). It should be clearly demonstrated that the project is in accordance with relevant guidance and the mitigation hierarchy in NP4, and that adverse impacts are first avoided and then minimised through best practice.	Section 7.7 details that the assessment has considered the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in **an OBEMP (Technical Appendix 7.4, EIAR Volume 4)**. An **Outline PMP** is presented in **Chapter 9: Hydrology, Hydrogeology and Soil (EIAR Volume 2) Technical Appendix 9.6 (EIAR Volume 4).**
NVC surveys should: Include information demonstrating all GWDTE and existing groundwater abstractions are outwith a 100 m radius of all excavations shallower than 1 m and outwith 250 m of all excavations deeper than 1m and proposed groundwater abstractions. The survey needs to extend beyond the site boundary where the distances require it. If minimum buffers cannot be achieved, detailed site specifics qualitative and/or quantitative risk assessment will be required.	NVC surveys followed best practice guidelines and were undertaken to identify potential GWDTEs and section 7.5.12 describes the results of these surveys with the extent of the GWDTEs presented in **Figure 7.4: Potential Groundwater Dependent Terrestrial Ecosystems (EIAR Volume 3a).** Section 7.4.9 details that the buffers have been applied where required.
The EIAR must include a schedule of mitigation, including best practice pollution prevention and construction techniques and regulatory requirements.	Best practice pollution prevention guidelines, construction techniques and regulatory requirements are presented in the Outline Decommissioning and Construction Environmental Management Plan (ODCEMP) (Technical Appendix 3.1, EIAR Volume 4). A Schedule of Mitigation is also presented in Appendix 14.1 (EIAR Volume 4).
Proposals for decommissioning must demonstrate accordance with SEPA guidance on the life extension and decommissioning of onshore wind farms.	Section 2.3.32 of the EIA Scoping Report states that following the period of operation, the Proposed Development would be decommissioned. Any above ground infrastructure would likely be dismantled and

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The Applicant must demonstrate how the hierarchy of environmental impact has been applied. Discard of materials as waste should be avoided.	removed in accordance with industry best practice at the time as discussed in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)**.
NatureScot	
The applicant must aim to avoid direct and indirect impacts to protected areas. These sites are protected by the legislative requirements of the Conservation Regulations 1994 as amended, and/or The Conservation of Habitats and Species Regulations 2017.	A Habitat Regulations Assessment (HRA) has been prepared to assess any likely significant effects on protected areas. This is presented in **Technical Appendix 8.3 (EIAR Volume 4)**.
The applicant should carry out habitat surveys to NVC level where Annex 1 or UKBAP Priority Habitats occur. Habitat surveys should cover the whole development site and cover an appropriate buffer to account of hydrological changes as well as any areas where access tracks/track upgrades and borrow pits may be proposed. Target notes should be used to identify the presence of any notable plants including any nationally rare/scarce species. Assessment should consider the extent of habitat loss and damage, both direct and indirect, temporary and permanent, and suitable mitigation and/or restoration measures be presented in an Outline Habitat Management Plan and Peat Management Plan. Full details of proposed methods for decommissioning, construction, reinstatement and habitat restoration are to be included in the EIAR.	The UKHab and NVC survey methodologies and the appropriate survey buffers are in accordance with best practice guidelines and are provided in **Technical Appendix 7.1.** Section 7.7 considers the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in the **OBEMP** and **Outline PMP (Technical Appendices 7.4 and 9.6** respectively in **EIAR Volume 4**).
It is recommended that survey and assessment of impacts to priority peatland habitats follows NatureScot guidance. Peatlands are protected by NPF4 Policy 5. In addition to NVC habitat survey, development proposals on peat should be supported by site-specific and detailed peat survey, a Peat Management Plan and a Peat Landslide Hazard Risk Assessment (PLHRA).	At the time of preparation and submission of the EIAR, neither the SPBM or BNG are mandatory in Scotland, but NPF4 does make biodiversity enhancement a requirement. Land has been confirmed as available within the Application Boundary for achieving slightly in excess of a 1:10 compensation (lost: restored) ratio for blanket bog habitats (f1a, f1a5, f1a6). A further 12 ha for peatland restoration may also be available either within land controlled by Novar Estates, or at another appropriate location subject to the outcome of ongoing landowner engagement to achieve enhancement

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
Site-specific assessments and surveys inform the project design and siting to ensure compliance with the mitigation hierarchy, and that impacts to blanket bog are avoided by design. Where impacts cannot be avoided, they should be minimised, and our current recommendation is that restoration to achieve offsetting (i.e. compensation rather than biodiversity enhancement) should be in the order of 1:10 (lost:restored) plus an additional 10% of the baseline assessment of the extent of peatland for enhancement. Areas of the proposed development contain deep peat. These areas of habitat appear to be intact, and it is advised that habitat surveys confirm the habitat at this location, and in accordance with NatureScot guidance, the Applicant should aim to avoid impacts to this habitat.	of 10% of the baseline as recommended by NatureScot. Further mitigation and enhancement measures have been prescribed for montane heath and willow scrub. Outline plans for restoration and enhancement of these habitats have been presented in section 7.8 below and in the **OBEMP (Technical Appendix 7.4, EIAR Volume 4)**. Section 7.7 states that the assessment has considered the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in **an OBEMP and an Outline PMP** (**Technical Appendices 7.4 and 9.6 (EIAR Volume 4)**). A separate **Peat Landslide Hazard Risk Assessment** has also been prepared and is presented in **Technical Appendix 9.7 (EIAR Volume 4)**. Section 2.4.4 of the EIA Scoping Report states that unmodified blanket bog is a key influence on the design process and so has been avoided where possible. As the blanket bog is a priority habitat and is projected to be impacted, bespoke compensation has been implemented and presented in the OBEMP to satisfy NPF4 (linked to BNG). Section 7.5.11 states that the baseline surveys broadly support this, with ecological surveys identifying the Site as being dominated by blanket bog, with areas of degraded bog habitat, and the Stage 1 and 2 peat surveys (see **Chapter 9: Hydrology**) identifying areas of deep peat (>1 m) in the north, central and south of Site. This suggests a mix of Class 1 and Class 2 (classified as 'nationally important carbon-rich soils, deep peat and priority peatland habitat. Areas of potentially high conservation value and restoration potential') peatland occur across the Site.
The EIAR should demonstrate that survey work for protected species has covered the proposed development site, access routes and appropriate buffers, as well as any proposed habitat enhancement areas. The EIAR should demonstrate that survey work and any necessary mitigation have followed NatureScot standing advice on protected species survey methods (including timing of surveys, survey area and shelf-life), SPPs, mitigation and licence applications. Mitigation details/SPPs	Field surveys for protected species were undertaken in accordance with best practice guidance and details on survey methodologies and appropriate buffers are provided in **Technical Appendix 7.1 (EIAR Volume 4)**. Section 7.4.9 states that the survey areas for the protected species surveys (excluding bats) have covered the Site (including the Access Route) plus a 250 m buffer.

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
should be included if protected species could be affected.	
The NatureScot standing advice on mountain hares, wildcats, and pine martens should be followed.	Section 7.4.2 confirms that the good practice NatureScot guidance on planning, development and protected species has been followed.
A Deer Management Statement should be included in the EIAR in accordance with NatureScot guidance.	A Deer Management Plan has been prepared. This is included in **Technical Appendix 7.3, EIAR Volume 4**.
It is recommended that the EIA process assess the likely impacts of decommissioning for the new proposal.	The EIA has assessed both the decommissioning of the existing Novar 1 Wind Farm and the decommissioning of the repowered wind farm once it has reached the end of its operational life (see section 7.4.5).
RSPB	
In woodland habitats, the EIAR should consider the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in an Outline Habitat Management Plan (HMP) and/or Species Protection Plans (SPP) and an Outline Peat Management Plan (PMP).	Section 7.4.1. details that the assessment has considered the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in an **OBEMP** and the **Outline PMP (Technical Appendices 7.4 and 9.6, EIAR Volume 4)**.
In peat and priority peatland habitats, a Peatland Condition Assessment and a Habitat Condition Assessment should be undertaken.	Habitat (Peatland) Condition Assessment data have not been presented in this EIAR as a metric–based approach to BNG has not been adopted, however the collected habitat survey data were used to confirm the state of peatland habitats, e.g. good quality or degraded and has been used to inform the proposed peatland mitigation efforts.
The final infrastructure design should avoid deep peat over 50 cm and any sensitive habitats. The mitigation hierarchy must be followed, with impacts avoided and minimised where possible.	Section 8.3.3 of the EIA Scoping Report details that a Carbon and Peatland Map has been created that identifies areas of deep peat over 50 cm deep. As this falls under a priority habitat, policy 5 of NPF4 has been implemented ensuring that impacts to this habitat are avoided at all costs where possible, and when not possible, project specific compensation will be implemented. Land has been confirmed as available within the Application Boundary for achieving slightly in excess of a 1:10 compensation (lost:restored) ratio for blanket bog habitats (f1a, f1a5, f1a6). A further 12 ha for peatland restoration may also be available either within land controlled by Novar Estates, or at another appropriate location subject to the outcome of ongoing landowner engagement to

Table 7.1: Summary of ECU Scoping Opinion Comments	
The Highland Council (THC)	**Response or location within the EIAR where comments are addressed**
	achieve enhancement of 10% of the baseline as recommended by NatureScot.
Appropriate track design and construction methods should be planned for locations where new tracks or upgraded tracks will cross peatland areas. It is recommended to prepare a peat management plan (PMP).	Section 12.4.7 of the EIA Scoping Report states "*it is expected that the route of the existing access route will be maintained with localised widening/upgrade where required*." Maintenance and expansion of the Access Route and Internal Tracks is discussed in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)**. An Outline PMP has been prepared and is presented as **Technical Appendix 9.6 (EIAR Volume 4)**.
Operational pollution risks and indirect effects of peatland drying next to infrastructure should be scoped into assessment.	The management of surface water runoff during construction and the implementation of best practice measures for the prevention of pollution during construction would be detailed in a CEMP that would be prepared and implemented by the contractor. An Outline Decommissioning and Construction Environmental Management Plan (ODCEMP) has been prepared and is presented as **Technical Appendix 3.1 (EIAR Volume 4)**. Assuming that good practice is followed, including appropriate siting of all infrastructure and the provision, and adherence to, a detailed and approved CEMP, no significant effects on surface water during construction or operation are considered likely and an assessment will be scoped out of the EIAR. Best practice measures for the prevention of pollution during construction are presented in the ODCEMP in **Technical Appendix 3.1 (EIAR Volume 4)**.
The Applicant should follow NatureScot guidance on enhancement for priority peatland habitats.	This chapter confirms that NPF4 policy 3 and NatureScot guidance has been followed which details the enhancement for priority habitats including peatland.
The Applicant should include an Outline HMP that details any mitigation and compensation actions required, as well as proposals for Biodiversity Enhancement and post construction monitoring. Scottish Government guidance on biodiversity and implementation of the NPF4 Policy 3 for EIA and major development should be referred to.	Section 7.4.4 details that the assessment has considered the extent of habitat loss and damage and effects on protected species, both direct and indirect, temporary and permanent, with suitable mitigation and/or restoration measures presented in an OBEMP and an Outline PMP. The OBEMP and PMP have been prepared and are presented in **Volume 4** of the EIAR as **Technical Appendix 7.4** and **9.6**. Policy NPF4 is referenced in Section 7.4.12 and it has been implemented throughout the design of the Proposed Development.

Potential Impacts Scoped In

7.4.5 The scope of this chapter is set out in Table 7.2. The scope of the assessment has been informed by the responses summarised in Table 7.1.

Table 7.2 Impacts Considered within the Assessment

Impact	**Phase***		
	C	O/M	D
Permanent habitat loss, temporary damage/modification, fragmentation or change (including dewatering) particularly the peatland habitats within the wind Turbine Array and the LEPO woodland crossed by the Access Route.	*X*		*x*
Disturbance to protected species or inadvertent damage to their breeding sites, resting places and foraging resources from construction and operational activities (this includes pine marten and bat species such as common and soprano pipistrelle).	*X*	*X*	*x*
Inadvertent killing or injuring of protected or otherwise notable species from construction and operational activities.		*X*	
Interaction of bats with operational turbine blades leading to collision mortality or barotrauma.		*X*	
Disturbance and displacement of deer populations during construction through removal of habitat and increased human presence. Additional disturbance can occur through the presence of machinery on Site and increased risk of injury or death by collision with vehicles.	*X*		*X*
New watercourse crossings causing pollution or nutrient enrichment or hydrological disruption.	*X*		
Operational pollution risk e.g. oil leaks from turbines.		*X*	

*C=construction, O=operation and maintenance and D=decommissioning.

7.4.6 The chapter assesses cumulative effects as arising from the addition of the Proposed Development to other cumulative developments, which are the subject of a valid planning application. The cumulative development list includes projects:

- Where an application for consent has been submitted to the relevant authorities but is under determination;
- Where consent has been refused but an appeal against that decision has been submitted and is under determination;
- Where there is an approved consent, but construction has yet to commence;
- Where construction has commenced; and
- That are operational.

7.4.7 The assessment is based on the Proposed Development as described in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)**.

Potential Impacts Scoped Out

7.4.8 The assessment focusses on likely significant effects and as such, impacts that are not likely to result in significant effects have been scoped out of the assessment. A summary of the impacts scoped out, together with reasoning for scoping them out is presented in Table 7.3.

Table 7.3: Impacts Scoped Out of the Assessment	
Impact	**Reasoning**
Operational impacts on all protected species, excluding bats.	Operational impacts on all protected species, except for bats, are considered unlikely to give rise to significant effects due to the nature of activities associated with an operational wind farm. No protected terrestrial species were recorded within the Turbine Array. No resting places of protected species were recorded within disturbance distance of the Access Route. Furthermore, any protected species potentially utilising the Site are likely to be habituated to the presence of the existing Novar 1 Wind Farm, which has been operational since 1997.
An assessment of the following species: amphibians and reptiles, invertebrates, and fish and freshwater pearl mussel.	Based on the findings of the field and desk study, an assessment of the following species has been scoped out of the assessment: • Amphibians and reptiles: the assessment adopts a precautionary approach and assumes common and widespread reptiles/amphibians are present within suitable habitat, noting that no pools suitable for amphibian breeding will be impacted. Appropriate mitigation will be adopted such as pre-construction checks of vegetation to be cleared. As such, significant effects on these features are considered unlikely. No signs of great-crested newt (GCN) *Triturus cristatus* presence or activity were identified during the field survey or Desk Study information return; • Fish and freshwater pearl mussel: there are no designated sites (watercourses etc) known for fish or freshwater pearl mussel associated within or with connectivity to the Proposed Development. Watercourses crossed or close to the Proposed Development are all small peatland streams or streams within non-native coniferous woodland, none of which are particularly suitable for these receptors. Industry-established good practice measures would be employed in the detailed design of the Proposed Development and the methodologies used for the construction and operation would minimise, or mitigate for, impacts on the water environment and ensure that the free passage of fish, where required, within the Site is maintained. The infrastructure layout would be designed to minimise the number of watercourse crossings and 50 m buffer zones around all watercourses have been adopted. As such, significant effects on water quality, and therefore aquatic receptors such as fish or pearl mussels, are considered unlikely. The THC agrees with scoping out of amphibians, reptiles, invertebrates, fish and freshwater pearl mussels.
Significant effects on designated sites during the construction, operation or decommissioning stages.	Considering the design and layout of the Proposed Development, the separation distance and lack of connectivity or impact pathways of the Proposed Development to designated sites in the surrounding area, impacts on designated sites during the construction, operation and decommissioning stages have been scoped out. However, a HRA is included in **Volume 4** of the **EIAR** as **Technical Appendix 8.3** to ensure that a legal tests for HRA on designated sites can be completed by the Competent Authority.

Method of Baseline Characterisation

Extent of the Study Area

7.4.9 The ecology Study Area comprises both a Desk Study Area and a Field Survey Area. The Field Survey Area includes the Site and extends up to 250 m beyond, including the Access Route to its junction with the B817.

7.4.10 The Desk Study Area comprises the Field Survey Area and extends to a 5 km buffer beyond the Site. This area is considered to represent the Zone of Influence (ZoI) in which impacts on ecological features could occur.

7.4.11 **Figure 7.1: Designated Sites (EIAR Volume 3a)** shows the Desk Study Area, relevant designated sites, and the Site.

Desk Study

7.4.12 A Desk Study to collect existing baseline data for the ecology Study Area, such as the location of designated nature conservation sites, other natural features of potential ecological importance, was undertaken, drawing upon the following data sources:

- NatureScot (NS) Sitelink[32];
- National Biodiversity Network online atlas[33];
- Scotland's Environment Carbon and Peatland map[34];
- Multi-Agency Geographic Information for the Countryside website (MAGIC)[35];
- Ceislein Wind Farm Environmental Impact Assessment Report[36].

7.4.13 Further details of the Desk Study methodology are provided in **Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4)**.

Field Survey

7.4.14 The following field surveys were undertaken, with their methodologies described in **Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4)**:

- UK Habitat Classification (UKHab) Survey;
- NVC Survey of the Turbine Array area[37];
- Protected terrestrial species; and
- Bat activity and roost assessment.

Method of Assessment

Overview

7.4.15 Detailed information on the assessment methodology, including criteria for assessing sensitivity of receptors, magnitude of change and cumulative effects, as well as overall significance criteria, is provided in **Technical Appendix 7.1: Assessment Methodology (EIAR Volume 4)**.

Limitations and Assumptions

7.4.16 It should be noted that the availability and quality of the data obtained during desk studies is reliant on third party responses and recorders. This varies from region to region and for different species groups. Furthermore, the comprehensiveness of data often depends on the level of coverage, the expertise and experience of the recorder and the submission of records to the local recorder.

[32] NatureScot. SiteLink. [online] sitelink.nature.scot. Available at: https://sitelink.nature.scot/home

[32] NBN Atlas (2025). NBN Atlas - UK's largest collection of biodiversity information. [online] NBN Atlas. Available at: https://nbnatlas.org/. [Accessed 15th January 2026]

[34] Scottish Government (2019). Map | Scotland's environment web. [online] Gov.scot. Available at: https://map.environment.gov.scot/sewebmap/. [Accessed 16th February 2023].

[35] magic.defra.gov.uk. (n.d.). MAGIC. [online] Available at: http://magic.defra.gov.uk/. [Accessed 16th February 2023].

[36] The Scottish Government. Ceislein Wind Farm Environmental Impact Assessment Report, Chapter 8-Ecology and Nature Conservation. (2026) Available at: https://www.energyconsents.scot/ApplicationDetails.aspx?cr=ECU00005174&T=5. [Accessed March 2026].

[37] Excludes the Access Route

7.4.17 The habitat and faunal surveys provide a snapshot of ecological conditions and do not record plants or animals that may be present in the ecology Study Area at different times of the year. The absence of a particular species cannot be confirmed definitively by a lack of field signs and only concludes that an indication of its presence was not located during the survey effort. However, surveys for faunal species were undertaken during optimal periods for locating field signs.

7.4.18 At the outset of the field survey season, bat detectors were placed at the initially proposed locations of the wind turbines. These detectors (shown in **Figure 7.6: Bat Detector Locations (EIAR Volume 3a)**) remained at these locations throughout spring, summer and autumn 2024. Due to several factors, changes and alterations to the design of the Proposed Development led to the layout shown in **Figure 1.3A: Proposed Site Layout (EIAR Volume 3a)**, which resulted in bat detectors not all being fully paired to prospective turbines, and one turbine location which was not represented by a paired bat detector. The closest bat detectors to the proposed location of Turbine 3 are D4 (450 m to the northwest) and D6 (500 m to the southeast). Due to the relatively homogenous nature of the habitats found within the Site and the uniform geographical distribution of the detectors, it is believed that this does not present a material limitation on the validity of the bat activity data.

7.4.19 During the decommissioning phase of Novar 1 Wind Farm, all redundant Internal Tracks and areas of hardstanding would be removed and the land sensitively restored where practicable.

7.4.20 A micrositing allowance of 100 m is proposed. While the final location of infrastructure may vary within this tolerance, any such changes would remain within the parameters assessed in the EIAR and would not give rise to materially different environmental effects. Therefore, the conclusions of this assessment would remain unchanged.

7.4.21 In the event that turbine locations change within the micrositing allowance, the habitat calculations would be updated to ensure peatland restoration targets remain accurate based on actual impacts.

7.5 Baseline Conditions

Current Baseline

Statutory Designated Nature Conservation Sites

7.5.1 No statutory designated nature conservation sites for ecological features occur within the field survey area, as shown on **Figure 7.1 (EIAR Volume 3a)**.

7.5.2 The closest statutory designated nature conservation sites for ecological features within the Desk Study Area is the Altt nan Caorach Site of Special Scientific Interest (SSSI), located approximately 1 km west of the Site. This SSSI is designated for its subalpine dry heath and upland birch woodland habitats. The following are also found within the desk study area:

- The Cromarty Firth SSSI, located 1.4 km east and south of the Site; and
- Ben Wyvis Special Area of Conservation (SAC) and SSSI, located 1.5 km southeast of the Site.

7.5.3 The Altt nan Caorach SSSI is separated from the Site by a ridge of higher ground. The SSSI lies approximately 2 km upstream of the confluence of the unnamed watercourses crossed by the Access Route and the River Glass (into which the Altt nan Caorach flows). The Ben Wyvis SAC/SSSI lies even further west, further upstream than the Altt nan Caorach SSSI, and separated from the Site by an extensive stand of commercial forestry and/or Loch Glass. As such there is not considered to be potential connectivity with the Proposed Development for these or other designated sites. In line with the scoping process, no statutory designated nature conservation sites for ecological features are considered further in this assessment.

Non-statutory Designated Nature Conservation Sites

ANCIENT WOODLAND

7.5.4 All three categories of Ancient Woodland as identified in the Ancient Woodland Inventory (AWI)[38] are found within the Desk Study Area. As shown on **Figure 7.1 (EIAR Volume 3a)**, no Ancient Woodland of semi-natural origin occurs on the Site with all of the AWI woodland which does occur being of the Long-established (of plantation origin) (LEPO) category. The category includes plantation woodland shown on maps produced in 1750 or 1860 and continuously wooded since. Some Long-established sites have developed semi-natural characteristics similar to the Ancient (of Semi-natural origin) woodland category.

7.5.5 The LEPO woodland occurring on Site is crossed by 3.5 km of the existing Access Route and is classified in the UKHab Survey as either plantation coniferous woodland or a mixed woodland dominated by birch *Betula spp*. alongside the Access Route with more coniferous species occurring further into the woodland blocks. Occasional larger individual trees indicative of past non-native planting occur along the margins of the Access Route including Douglas fir *Pseudotsuga menziesii*, western hemlock *Tsuga heterophylla* and western red cedar *Thuja plicata*. Much of the woodland is in commercial rotation and typically dominated by Scots Pine *Pinus sylvestris*, with abundant or frequent European Larch *Larix decidua*, Sitka Spruce *Picea sitchensis*, occasional other conifers and a limited amount of birch. The LEPO woodland has more natural characteristics than many commercial forestry areas, including a ground flora of heather *Calluna vulgaris* and blaeberry *Vaccinium myrtillus* more typical of native pine woodlands. Occasional granny Scots pines[39] also occur. Much of the LEPO woodland coincides with the Novar Special Protection Area (SPA) designated for capercaillie *Tetrao urogallus,* a species which typically does not occur in low biodiversity value forestry areas (see **Chapter 8: Ornithology (EIAR Volume 2)**).

HIGHLAND BIODIVERSITY ACTION PLAN

7.5.6 The Ecology study area is located within the Highland Council Biodiversity Action Plan (BAP) area[40]. The habitats and priority species present in the Highlands and included in the BAP that are relevant to the Proposed Development based on the habitats and species recorded in the Desk Study Area and field survey area, are detailed below:

Habitats

- Upland and moorland;
- Peatland and wetland; and
- Woodland.

Species

- Mountain hare *Lepus timidus*;
- Pine marten;
- Brown long-eared bat;
- Natterer's bat;
- Pipistrelle bats: common, soprano and Nathusius'; and
- Daubenton's bat.

[38] NatureScot. (2023). A guide to understanding the Scottish Ancient Woodland Inventory (AWI). [online] Available at: https://www.nature.scot/doc/guide-understanding-scottish-ancient-woodland-inventory-awi.

[39] Scots pines older than 300 years are referred to as granny pines given their extremely long lifetimes and likely key role in having produced seeds for many later generations.

[40] The Highland Council, 2021. Highland Nature Biodiversity Action Plan 2021-2026. Available at: https://www.highland.gov.uk/downloads/download/2260/highland_nature_biodiversity_action_plan_2021_to_2026 [Accessed: January 2026]

Desk Study

7.5.7 The proposed Ceislein Wind Farm development that is located approximately 1 km east of the Proposed Development recorded evidence of protected species during baseline surveys including red squirrel, badger, pine marten, otter and water vole.

7.5.8 The baseline survey identified red squirrel feeding signs with no dreys recorded. There were badger footprints, snuffle holes and well-used paths identified with no setts recorded. Pine marten scat was found, with no dens recorded. Many otter spraints were found along water courses including Corran Burn and its tributaries; Allt Srath an Loin, Allt a Bhuideanaich, the tributary of Allt Leacach, and Allt na Seasaigh. However, no signs of holts or couches were observed during the surveys. Several water vole burrows were identified on the banks of Allt na Moine, Allt Srath an Loin, Allt Leacach (and its tributary, Allt a Choire Bhric), a tributary of Caochan Gobhlach, Corran Burn and its tributary. Water vole field signs encountered included latrines, prints, feeding stations and pathways.

Field Surveys

7.5.9 Full details of the results of the field surveys undertaken for the Proposed Development are provided in **Technical Appendix 7.2: Ecology Results (EIAR Volume 4)**. Summarised results are provided in this chapter. The summarised results only present the information on the ecological features required to undertake the assessment.

UK Hab Habitat Surveys

7.5.10 The dominant UKHab habitats present in the field survey area are f1a6 – Degraded blanket bog, h1b5 – Dry heaths; upland (H4030) and f1a – Blanket bog, as shown on **Figure 7.2 (EIAR Volume 3a)**. Target notes are shown on **Figure 7.5 (EIAR Volume 3a)** and described in Table 7.4 in **Technical Appendix 7.2 (EIAR Volume 4)**. The habitats recorded in the field survey area are detailed in Table 7.4.

Table 7.4: UKHab Habitat types within the Site

UKHab Habitat Type	**Area within the Site (ha)**
c1 - Arable and horticulture	0.28
f1a - Blanket bog	52.59
f1a5 - Blanket bog (H7130)	0.35
f1a6 - Degraded blanket bog	126.63
f2c - Upland flushes, fens and swamps	0.50
g1b - Upland acid grassland	0.33
g1c - Bracken	0.75
g3c - Other neutral grassland	0.03
g4 - Modified grassland	0.56
h1b - Upland heathland	17.17
h1b5 - Dry heaths; upland (H4030)	60.02
h1b6 - Wet heathland with cross-leaved heath; upland (H4010)	16.81
h1c - Mountain heaths and willow scrub	14.02
h3e – Gorse scrub	0.36
h3h - Mixed scrub	3.44

Table 7.4: UKHab Habitat types within the Site	
UKHab Habitat Type	**Area within the Site (ha)**
u1b - Developed land, sealed surface	14.49
u1c - Artificial unvegetated unsealed surface	1.39
w1 - Broadleaved and mixed woodland	0.51
w1d - Wet woodland	0.05
w1e - Upland birchwoods	0.79
w1h - Other woodland; mixed	0.89
w1h5 - Other woodland; mixed; mainly broadleaved	0.12
w1h6 - Other woodland; mixed; mainly conifer	0.02
w2 - Coniferous woodland	0.30
w2c - Other coniferous woodland	2.42
Total	314.83

NVC Habitats

7.5.11 The habitats classified during NVC surveys are shown on **Figure 7.3: National Vegetation Classifications Survey Results (EIAR Volume 3a)**. The dominant NVC habitat present in the field study area is M19 Calluna vulgaris-Eriophorum vaginatum blanket mire. All NVC habitats recorded in the Turbine Array but excluding the Access Route, are detailed in Table 7.5.

Table 7.5: NVC Habitat Types within Turbine Array Area	
Habitat Type	**Area within Turbine Array Area (ha)**
M17 Scirpus cespitosus-Eriophorum vaginatum blanket mire	35.49
H2a Calluna vulgaris-Ulex minor heath, typical sub-community	26.82
H22 Vaccinium myrtillus-Rubus chamaemorus heath	24.01
H10a Calluna vulgaris-Erica cinerea heath	17.40
M15 Scirpus cespitosus-Erica tetralix wet heath	16.42
H13 Calluna vulgaris-Cladonia arbuscula heath	10.29
H16 Calluna vulgaris-Arctostaphylos uva-ursi heath	8.07
U2 Deschampsia flexuosa grassland	0.39
M7 Carex curta-Sphagnum russowii mire	0.38
Total	139.27

GWDTEs

7.5.12 The NVC results have been used to determine the potential groundwater dependency of the habitats present in the field survey area. Three high and five moderate potential GWDTEs were recorded, as shown on **Figure 7.4: Potential Groundwater Dependent Terrestrial Ecosystems (EIAR Volume 3a)**, with their NVC types shown on **Figure 7.3: National Vegetation Classifications Survey Results (EIAR Volume 3a)**. Table 7.6 provides further information on the potential GWDTEs recorded in the Field Survey Area. Table 7.5

above provides details on the full names of all NVC communities, which have been shortened here for ease.

Table 7.6: Potential GWDTEs and their Extent		
NVC Community	**Groundwater Dependency[41]**	**Area within Field Survey Area/Site (ha)**
M7/M17/U2	High	0.31
M7		0.04
M7/M17/U2		0.03
M15/H22	Moderate	5.98
M15		3.45
M15/M19/H22		2.87
M15/M19/H22		2.07
M15/M19/H2a		2

7.5.13 Further information on the hydrological and hydrogeological sensitivity and an assessment of the groundwater dependency of the potential GWDTEs is provided in **Technical Appendix 7.2 (EIAR Volume 4)**. However, in consultation with SEPA, despite being habitat types potentially supporting GWDTEs, it has been agreed that the specific Site conditions mean that wetlands present in the field survey area are unlikely to be dependent on groundwater. As a result, these habitats are not considered further in relation to groundwater dependency in this assessment. These habitats are still considered further in relation to other impacts, such as habitat loss, as detailed in Table 7.11.

Protected and Notable Species

BATS

7.5.14 Full details of the results of the bat surveys are provided in **Technical Appendix 7.2: Ecology Results (EIAR Volume 4)**. The locations of bat detectors are shown on **Figure 7.6: Bat Detector Locations (EIAR Volume 3a)**.

7.5.15 Four confirmed bat species comprising common pipistrelle *Pipistrellus pipistrellus*, soprano pipistrelle *P. pygmaeus*, Natterer's bat *Myotis nattereri* and *Myotis spp.*[42] were recorded in the field survey area. Table 7.7 provides a summary of the bat activity recorded at each detector per season. No roosting locations or trees suitable for bat roosts were recorded in the field survey area. The most common bat species in the field Study Area was common pipistrelle, followed by Natterer's bat.

[41] Badger, A., Pritchett, C., Schutten, J., Authorised, K. and Farquhar, A. (2014). Land Use Planning System SEPA Guidance Note 31 Guidance on Assessing the Impacts of Windfarm Development Proposals on Groundwater Abstractions and Groundwater Dependent Terrestrial Ecosystems Originator. [online] Available at: https://www.sepa.org.uk/media/143868/lupsgu31_planning_guidance_on_groundwater_abstractions.pdf. [Accessed: January 2026].

[42] Unlike many other bat species, *Myotis spp.* do not have a specific call frequency but sweep through all frequencies very rapidly. As a result, even computer analysis software cannot identify the species with any particular accuracy. Given the location of the field survey area, it is likely that the *Myotis spp.* records are Daubenton's bat *Myotis daubentonii and Natterer's bat Myotis nattereri.*

Table 7.7: Summary of Bat Activity from Static Detectors

Detector Number[43]	Closest turbine[44] and distance away	Number of bat passes			UKHab habitat Type at detector locations	Total number of bat passes per detector
		Spring	Summer	Autumn		
D01	T1 (886 m)	0	0	0	N/A	0
D02	T1 (434 m)	0	35	0	N/A	35
D03	T1 (10 m)	47	7	0	f1a Blanket bog	54
D04	T2 (125 m)	2	0	2	H1b Upland heathland	4
D06	T4 (26 m)	9	204	32	F1a Blanket bog	245
D07	T5 (30 m)	2	0	5	F1a6 Degraded blanket bog	7
D08	T6 (100 m)	10	65	49	F1a6 Degraded blanket bog	124
D09	T9 (90 m)	5	6	6	H1b5 Upland dry heath	17
D10	T7 (261 m)	2	8	12	F1a6 Degraded blanket bog	22
Total Number of Passes per Season		77	325	106		

7.5.16 Overall bat activity in the Field Survey Area was considered low, with occasional small increases in activity in localised areas such as in the vicinity of the proposed T4 in the centre of the Site during summer and in the southeast of the Site at the proposed locations of T6 and T8.

PROTECTED TERRESTRIAL MAMMALS

7.5.17 Target notes for protected and notable terrestrial mammals are shown on **Figure 7.5: Target Notes (EIAR Volume 3a)** and described in **Technical Appendix 7.2: Ecology Results (EIAR Volume 4)**. The following protected and notable terrestrial mammals were recorded:

- Pine marten scats were recorded at the northern end of the existing Access Route (Target Notes 36, 37 and 38), and there were three rocks with multiple pine marten scats close to the existing Access Route, roughly halfway to the Turbine Array of the existing wind farm, within the area of the proposed Access Route clearance buffer (Target Notes 10, 12 and 13). Suitable habitat for pine marten denning was recorded close to the Access Route (e.g. multiple old trees, presence of a shrub layer) though no confirmed den was found;
- A possible badger latrine with mammal track behind it was recorded at the northern end of the existing Access Route, close to the existing track within the area of the proposed Access Route clearance buffer (Target Note 48); and

[43] An initially proposed Detector D05 was not deployed following layout refinements. Original numbering of detectors was retained to avoid potential data errors.

[44] Turbine 8 is situated between detectors D8, D9 and D10 but each of those detectors lies closer to a different turbine. D8 is the closest, approximately 250 m to the west.

- Hare *Lepus sp*. scat was recorded west of the proposed location of T2 (Target Note 2), which is likely to be mountain hare *L. timidus*.

7.5.18 No confirmed protected dwellings (such as pine marten dens or badger setts) were recorded in the Field Survey Area.

Future Baseline

7.5.19 The future baseline of the field survey area under a "do nothing" scenario is unlikely to change significantly in the absence of the Proposed Development. It is noted that decommissioning of the current wind farm would be required in the future owing to the current planning permission expiring in 2031.

7.5.20 The future felling plans for the coniferous plantation areas within the field survey area, including the LEPO woodland, involves phased rotational felling and restocking as far out as 2044, in keeping with forestry management in the wider area. Felling within the SPA area is likely to be tightly controlled in order to preserve optimal habitat for capercaillie. Felled areas would typically be restocked with a coniferous species dominant mix, albeit possibly with some smaller areas of broadleaved woodland. Areas of woodland have been observed with both mature trees and showing signs of natural woodland regeneration and these may be retained, rather than felled as far as possible within the final design of the Access Route.

7.5.21 The peatland habitats are considered unlikely to change significantly in the absence of the Proposed Development as the open habitats would continue to be impacted and shaped by afforestation, grazing, and direct human modification, with numerous peat hags observed within bog habitats. Therefore, the distribution of species present within the field survey area is unlikely to change significantly in the future. The only expected change could result from a change of the climate including potentially rising temperatures with longer dry periods and/or high precipitation events that could accelerate drying of the peatland habitats, erosion of the peat in exposed areas and could gradually change the availability of prey or other food resources.

Summary of Sensitive Receptors

Scoped in receptors

7.5.22 A summary of the receptors potentially impacted by the Proposed Development and therefore scoped into the assessment are set out in Table 7.8 together with their associated sensitivity.

Table 7.8: Summary of Sensitive Receptors

Receptor	Importance	Justification
Long-established woodland of Plantation Origin (LEPO) 2b	County	LEPO 2b is woodland originally established as plantation existing on maps from 1860 that has remained continuously wooded to the present day. Many LEPO sites have developed to contain semi-natural characteristics, the oldest of which may become as rich as Ancient Woodland. The LEPO areas present in the field study area consist mainly of commercial forestry plantation but contain mature conifers such as granny pines with an open structure and native ground flora. No legislation specifically protects Ancient Woodland or LEPO, although there is a strong presumption against removal of ancient semi-natural woodland or plantations

Table 7.8: Summary of Sensitive Receptors		
Receptor	**Importance**	**Justification**
		on Ancient Woodland sites[45]. As a result, this feature is of County importance.
Peatlands blanket bog, degraded blanket bog, wet and dry heath	County	These habitat types are included in Annex 1 of the EC Habitats Directive[46] and are sensitive to environmental change, such as changes to hydrology, carbon function, species composition and nutrient status. Much of the peatland habitat in the UK is in poor condition due to damage from anthropogenic activities such as drainage, grazing and peat extraction. Peatland, wetland, upland and moorland habitats are included in the Highlands BAP and blanket bog is further identified as a priority habitat in the Scottish Biodiversity List (SBL). The examples of undegraded blanket bog within the field survey area are of good and moderate condition and with all of these habitats assessed as being of 'Possible National Interest' based on the NatureScot Peatland Assessment. The condition of this habitat is not expected to change outside of the areas directly impacted by the Proposed Development. Minimisation of impacts to surrounding peatland is outlined in **Technical Appendix 9.6: Outline Peat Management Plan (EIAR Volume 4)**. The degraded blanket bog within the field survey area is of moderate condition, though with some hags/areas of peat cutting evident throughout. However, this habitat has the potential to recover and return to active, peat-forming blanket bog and is an important part in the overall peatland landscape within which the Site is situated, therefore this feature is also considered to be of County importance. The upland flushes, fens and swamps within the survey area are of good condition with high GWDTE. Due to the small areas present in the field study area and how common this habitat is in the uplands this feature is of county importance. The wet and dry heath within the field survey area is of good and moderate condition, with some areas supporting peat-forming vegetation (M15) and other areas dominated by common heather *Calluna vulgaris* (H2a and H1) or bilberry *Vaccinium myrtillis* (H22). These areas of h1b6 - Wet heathland with cross-leaved heath; upland (H4010) with NVC M15, have moderate GWDTE potential and M15 is included in Annex 1 of the EC Habitats Directive (European Commission, 1992). As such, this feature is also considered to be of County importance.
Mixed and broadleaved	County	Woodland covers approximately 19 % of Scotland, with under a quarter of these woodlands considered native[47]. The SBL includes terrestrial woodland habitats, including

[45] Control of Woodland Removal. (2009). Available at: https://www.forestry.gov.scot/sites/default/files/pub-documents/PDF_Policy_Felling_Trees_SG_Policy_on_Control_of_Woodland_Removal_022009.pdf [Accessed 3 Mar. 2026]. [Accessed: January 2026]

[46] European Commission, 1992. EC Directive on the Conservation of Natural Habitats and Wild Flora and Fauna, 92/43/EEC. Available at: https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A01992L0043-20130701 [Accessed: January 2026].

[47] Walton, P., Eaton, M., Stanbury, A., Hayhow, D., Brand, A., Brooks, S., Collins, S., Duncan, C., Dundas, C., Foster, S., Hawley, J., Kinninmonth, A., Leatham, S., Nagy-Vizitiu, A., Whyte, A., Williams, S., and Wormald, K., (2019), The State of Nature Scotland 2019. The State of Nature Partnership.

Table 7.8: Summary of Sensitive Receptors		
Receptor	**Importance**	**Justification**
woodland and scrub		upland birchwood. Two areas of upland birchwood occur in the field survey area, along with several scattered areas of broadleaved and mixed woodland and scrub adjacent to the existing Access Route. Some of these areas of woodland also overlap with LEPO 2b woodland and some overlap with the Novar SPA. All broadleaved woodlands play an important role in the ecosystem, offering shelter and foraging opportunities for a wide range of protected and notable species, including specialists and generalists. As such, woodland and scrub are of County importance.
Watercourses	Local	There are a small number of small watercourses on Site. The majority flow through the coniferous plantation areas with limited vegetation. No protected fauna species were recorded using them. As such, Local value is the appropriate valuation.
Coniferous woodland (non-LEPO)	Local	The coniferous woodland on Site is of plantation origin, comprising multiple areas with varying composition. There are areas dominated by Scots pine and other areas dominated by fir and spruce trees. Regeneration has been observed in previously felled areas. Parts of the coniferous woodland are classified as LEPO woodland, indicating the presence of some semi-natural characteristics and ecological processes similar to natural woodland. The LEPO woodland closely aligns with the Novar SPA boundary. The non-LEPO coniferous woodland on Site, which are the areas crossed by the Access Route north of the Altt Sgorr a Choltair watercourse are of lower ecological value than the LEPO woodland. There is more consistent commercial forestry in the wider area and therefore it has been classified as being of Local importance.
Bats	Local	Bats are European Protected Species under the EC Habitats Directive. Bat activity is low for all species across the entire Site with spikes in activity for common pipistrelle at D6 and *Myotis* spp. at D8. Activity is dominated by common pipistrelle and Myotis spp. pipistrelle, which are common species. Common and soprano pipistrelle (the latter of which is present at very low levels throughout the Study Area) are at a high risk of adverse effects on their populations. Natterer's bat, Daubenton's bat and other unidentified *Myotis* spp. (which may include Natterer's and Daubenton's) are at a low risk of adverse effects on their populations via direct collision. Field survey at the Site recorded very low levels of activity on average, with activity being limited to common and widespread species. Bats in the survey area may be subject to displacement and disturbance as a result of habitat loss along the Access Route. For these reasons, bats are of Local importance.
Pine marten	Local	This species receives full protection under Schedule 5 of the Wildlife and Countryside Act 1981 (as amended) and certain methods of killing or taking pine martens are illegal under the Conservation (Natural Habitats, &c.)

Table 7.8: Summary of Sensitive Receptors		
Receptor	**Importance**	**Justification**
		Regulations 1994 (as amended)[48]. Pine marten is also an SBL species. The Mammal Society[49] reported that there has been an increase in the geographical range and population size of pine marten, with a continuous expansion in Scotland over the last 20 years, which is predicted to continue. Given the level of activity recorded in the field survey area, with 6 records of pine marten scat, 3 of which included multiple scats, and the presence of suitable habitat for pine marten, although no den was found, the population of pine marten is of Local importance.
Mountain hare	Local	Mountain hares are protected under Schedule 5 of the Wildlife and Countryside Act 1981 (as amended) and are a species of 'Community interest' listed on Annex V of the Habitats Directive[50]. Mountain hares are likely to be present in the moorland although given the very low level of activity recorded in the field survey area (one scat), they are of Local importance.
Badger	Local	Badgers and their setts are fully protected under the Badger Protection Act of 1992 (as amended). Given only a possible badger latrine was found on Site, with a mammal track behind it, and no sett or other evidence of badgers was found within the survey area, badgers are of Local importance.
Deer species	Local	Deer are widespread throughout the field study area and in the Highlands. As a result, they are of Local importance.

Scoped Out Receptors

7.5.23 A summary of the ecological features (receptors) that have been scoped out of the assessment based on the survey results are provided in Table 7.9, together with justification for their exclusion.

Table 7.9: Summary of Receptors Scoped Out of Assessment	
Receptor	**Justification**
Other habitats	Habitats assessed to be of less than local value have been scoped out from further consideration on the basis that effects on these habitats would not be considered significant given their low ecological value.
Otter, water vole, fish and fresh-water pearl mussel	As set out in the Scoping Report, in-water working is not anticipated, and key infrastructure of the Proposed Development would be installed outside of riparian zones. Construction would follow best practice methods including the adherence to Guidelines for Pollution Prevention

[48] UK Government, 1994. The Conservation (Natural Habitats Etc.) Regulations (as amended) (1994): http://www.legislation.gov.uk/uksi/1994/2716/contents/made [Accessed: January 2026].

[49] Mathews, F., Kubasiewicz, L.M., Gurnell, J., Harrower, C.A., McDonald, R.A., Shore, R.F. (2018), *A Review of the Population and Conservation Status of British Mammals: Technical Summary*. Natural England: Peterborough.

[50] UK Government (2017). The Conservation of Habitats and Species Regulations 2017. [online] Legislation.gov.uk. Available at: https://www.legislation.gov.uk/uksi/2017/1012/contents/made. [Accessed January 2026].

Table 7.9: Summary of Receptors Scoped Out of Assessment	
Receptor	**Justification**
	(GPP)[51]; thus, surface run-off and pollution of watercourses is not an anticipated impact. A pre-construction survey would be undertaken for otter and water vole to address the potential for these mobile species to colonise the Site in the intervening period. Should they be found to be present, licensing requirements would be adhered to if features such as resting places could not be avoided. It is therefore not anticipated that there would be significant effects on aquatic species, and these features have been scoped out of further assessment.
Reptiles and amphibians	Reptiles and amphibians are likely to be present in open moorland and rough grassland as evidenced by a record of a single common lizard ***Zootoca vivipara***. Reptiles and amphibians may be negatively affected by vegetation clearance works associated with the Proposed Development. However, the impacts are considered to be small in scale relative to the extensive habitat that will still remain available for these species and the ability for the species to move. Pre-construction surveys will confirm the presence of sensitive features used for shelter and hibernation and will inform micro-siting of the design, none of which were recorded in the baseline surveys. Where this is not possible, surveys will inform non-licensed precautionary methods of working under the supervision of the Ecological Clerk of Works (EnvCoW). As a result, this species group is not considered further.
Terrestrial invertebrates	Surveys of this species group were considered unnecessary as the assessment adopts a precautionary approach and includes appropriate mitigation, where required, to avoid significant effects.

7.6 Embedded Mitigation

7.6.1 Embedded mitigation includes design and standard best practice measures as described in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)** and the **Chapter 4: Design Evolution and Alternatives (EIAR Volume 2)** the latter of which provides a detailed review of mitigation achieved through design.

7.6.2 As the embedded mitigation would form an integral part of the Proposed Development, the assessment of likely significant effects assumes that these mitigation measures are implemented.

7.6.3 A summary of the embedded mitigation considered for the ecology assessment is set out in Table 7.10. Embedded mitigation for ecology has been given a unique mitigation reference ID (ECO1, ECO2 etc.) and is further detailed below and in Table 7.10.

7.6.4 Prior to the commencement of construction, a DCEMP would be prepared that would set out standardised management and mitigation measures that would be implemented to avoid potential impacts to protected species and habitats. The mitigation hierarchy set out in **Technical Appendix 7.1: Outline Decommissioning Construction and Environmental Plan (EIAR Volume 4)** would be adhered to.

7.6.5 A suitably qualified and experienced Environmental Clerk of Works (EnvCoW) would be appointed to enforce measures detailed in the DCEMP, required during construction, operation (if appropriate during operational works) and during decommissioning. **(ECO1)**

7.6.6 Standard practice construction methods, including noise, vibration and artificial lighting control measures such as avoidance and/or minimisation of overlap of noisy activities or switching off engines when machinery is not in use or running machinery at lower speeds

[51] www.netregs.org.uk . (2024). Guidance for Pollution Prevention (GPP) documents | NetRegs | Environmental guidance for your business in Northern Ireland & Scotland. [online] Available at: https://www.netregs.org.uk/environmental-topics/guidance-for-pollution-prevention-gpp-documents/ .

would be detailed within the DCEMP. Construction works should avoid disturbing dense vegetation, soil piles, or potential refuges as a precautionary measure. **(ECO2)**.

7.6.7 Standard mitigation and pollution prevention measures would be implemented during the construction work to ensure that pollution or siltation risk on watercourses would be appropriately managed, to not be affected by pollution or siltation. The appropriate buffer distance from watercourses should be determined on a site-specific basis, taking into account the type of construction works and the proximity of activities to watercourses. Mitigation measures should be implemented within this buffer to minimise pollution risk. Such measures would be detailed within the DCEMP. **(ECO3)**.

7.6.8 A pre-construction ecological survey for protected species will be undertaken by a suitably qualified ecologist prior to the commencement of works, with appropriate mitigation and licensing implemented where required. **(ECO4)**

Table 7.10: Summary of Embedded Mitigation

ID	Phase*	Description	Purpose of Mitigation
Embedded Mitigation			
ECO1	C, O, D	Measures detailed in the DCEMP will be enforced by EnvCoW during construction, operational and decommissioning phases.	Avoid/minimise impacts to protected species.
ECO2	C, D	Standard practice construction methods, including noise, vibration and artificial lighting control measures such as avoidance and/or minimisation of overlap of noisy activities or switching off engines when machinery is not in use or machinery at lower speeds.	Avoid/minimise impacts to protected species.
ECO3	C, D	Standard pollution prevention measures would be implemented to ensure that pollution or siltation risk to watercourses would be appropriately managed, to not be affected by pollution or siltation.	Avoid/minimise pollution impacts on aquatic and riparian habitats and any protected species which may utilise these habitats for foraging, commuting or shelter.
ECO4	PC	Pre-construction surveys will be undertaken to check if there have been any changes in distribution and abundance of the protected species identified in the baseline. The results of the surveys would inform the need for species protection plans and licensing requirements.	Avoid/minimise impacts to protected species.

*PC=Pre-construction, C=construction, O=operation and maintenance and D=decommissioning.

7.7 Assessment of Likely Effects

Decommissioning of Novar 1 Wind Farm

Damage or Disturbance of Habitats

7.7.1 As part of the Proposed Development, the existing 34 turbines would be removed from the Site.

7.7.2 Decommissioning would occur across the full extent of the Site as part of a combined decommissioning and construction phase which would last up to 3 years. Approximately 4 km of Internal Track would be removed as part of the decommissioning process.

7.7.3 At turbine locations, the existing crane pads that are not required or upgraded for the repowered wind farm, would be excavated to an agreed depth and the aggregate reused on Site where feasible. Internal Tracks which are to be retained and widened as part of the Proposed Development would have existing underground cables removed and upgraded cables would be installed. Sections of redundant Internal Tracks would be restored where feasible with the previous cables retained therein. Excavated material would be screened and reused across the Site where practicable.

7.7.4 The removal of this existing infrastructure would impact existing peatland habitat as excavation of the material would be a direct impact which could damage and disturb those areas immediately adjacent to the activities as personnel and vehicles are likely to need to operate on the area immediately adjacent to the areas to be removed. However, this is unlikely to extend more than 10 m beyond the existing footprint. Many of these areas were previously impacted by the works to construct the Novar 1 Wind Farm with heathland habitat lining all existing infrastructure, even where it sits within larger areas of blanket bog, a clear indication that the zone of habitat closest to Novar 1 is the modified peatland that was able to form post-construction. Whilst they have established to form a functioning part of the overall peatland landscape of the Site, damage or disturbance of those already modified areas would be a low magnitude impact, compared to damage to natural habitats not previously directly impacted. The works to decommission the Novar 1 Wind Farm would be ongoing (during normal working hours) and are unlikely to result in disruption to protected species. The impact is reversible, i.e., effective mitigation is possible.

7.7.5 The areas of existing hardstanding and Internal tracks which are to be removed, totalling circa 4 km would be restored to a peatland habitat where practicable, in keeping with the bog and heath habitats of the Site area as they likely existed prior to the construction of the Novar 1 Wind Farm and as they remain immediately adjacent to them. This would be achieved through reuse of the peat/soils being excavated for the new wind farm infrastructure to recreate peatland habitats. Along the Internal Tracks, this would allow a simple heathland, likely dominated by heather and other woody plants, and similar to that currently lining the Novar 1 infrastructure, to develop. At the turbine locations, although natural bog habitat is not truly replaceable, by careful removal, storage and reuse of peat, separating the acrotelmic and catotelmic layers, the Proposed Development would aim to restore areas to a level where they function in a similar way to surrounding, natural bog habitats with conditions allowing sphagnum bog mosses and other key peat forming flora to exist and therefore recreate habitat and hydrological linkages impacted by the construction of the existing Novar 1 Wind Farm.

7.7.6 The use of heavy machinery in sensitive wetland habitats has the potential to result in impacts through pollution events, e.g. diesel or hydraulic fluid spills. However, embedded mitigation covering best practice use of machinery and avoidance of pollution is discussed in **Chapters 2 and 3 (EIAR Volume 2)**, and in the **ODCEMP (Appendix 3.1, EIAR Volume 4)** and has therefore not been considered further here.

7.7.7 As such, the decommissioning of the Novar 1 Wind Farm is not predicted to result in significant adverse effects on peatland habitats of county importance. Rather, with successful reinstatement of the Novar 1 hardstanding and Internal Tracks where practicable, a beneficial effect for those county importance habitats could occur, albeit one that **is not considered significant** in terms of the EIA Regulations.

Protected Species

7.7.8 No protected species were recorded within the field survey area. Pine marten signs were recorded at two locations close to the existing Access Route; in the woodland around Coire Mosach and Sgorr a Choltair, with a possible badger latrine near Cnoc na Moine. No resting places such as dens or setts were recorded. As such, no direct impacts associated with the removal of hardstanding and Internal Tracks within the Site are predicted. The decommissioning of the Novar 1 Wind Farm would involve an increase in vehicle and heavy machinery movement along the full extent of the existing Access Route for the duration of the decommissioning works. The frequency and timing of vehicle movements during that period are unknown and so it has been assumed that they would be regular throughout the day. However, as there is an existing Access Route with vehicle movements, and no actual dens or setts were recorded close to the Access Route and both pine marten and badger are crepuscular/nocturnal species, no direct impacts are predicted, and any potential disturbance impacts are considered likely to be of very low magnitude. Therefore, **no significant** effects are predicted to occur on protected species.

Construction of Repowered Wind Farm

Ancient Woodland

7.7.9 Approximately 3.5 km of LEPO ancient woodland is crossed by the existing Access Route. Existing trees would need to be felled or trimmed in a small number of sections to allow the alteration of the existing Access Route to accommodate the transportation of the larger turbine components. Removal or alteration of LEPO woodland would be a direct, adverse impact on LEPO woodland (as per the ancient woodland inventory map). Two areas of LEPO Woodland as identified on the ancient woodland inventory map are crossed by the Access Route cover 1,012.28 ha and therefore the potential loss represents a negligible percentage of those blocks. The arboricultural impact assessment survey conducted in March 2026 (**Appendix 3.2, Volume 4 of the EIAR**) found that within the woodland areas along the Access Route, a total of 75 trees[52] of varying species and age category require removal. This includes mature oak, Sitka spruce, Larch, birch and several other young and semi-mature broadleaf and coniferous species.

7.7.10 The removal of these trees is low magnitude given the extent of this habitat type in the area and the relatively low number of individual trees estimated to be impacted. The impact would be permanent for all areas where trees would be felled and temporary for those where trimming is sufficient. The loss of ancient woodland in these areas presents a loss of specialised habitat and ecological niches which is considered **significant** at a local level. The value of this habitat type is also considered to be important for receptors described in the Ornithology chapter (**Chapter 8: EIAR Volume 2**).

Habitats

7.7.11 Table 7.11 sets out the areas of permanent loss and indirect habitat impact[53,54] by habitat type within the Turbine Array and **Figure 7.2** (**EIAR Volume 3a**) shows the Proposed Development overlaid on the habitats mapped using UK Hab methodology. Habitat loss relating to the access route is considered in section 7.7.15 below.

[52] The Arboricultural Report indicates that 75 trees are to be felled along the Access Route, 71 of them are located within the LEPO woodland.

[53] Calculated using ArcPro from land take and infrastructure data provided by the Applicant.

[54] Woodland loss figures are not included in this table as tree removal has been discussed in greater detail in section 7.7.15 below.

Table 7.11: Permanent and Indirect Loss of Habitat resulting from the Proposed Development		
UKHab Habitat Type	**Habitat Loss (ha)**	**Area Indirectly Impacted within Turbine Array (ha)**
c1 - Arable and horticulture	0.20	N/A
f1a - Blanket bog	2.79	4.88
f1a5 - Blanket bog (H7130)	0.25	0.33
f1a6 - Degraded blanket bog	10.39	16.70
f2c - Upland flushes, fens and swamps	0.00	0
g1b - Upland acid grassland	0.06	0
g1c - Bracken	0.75	N/A
g3c - Other neutral grassland	0.03	N/A
g4 - Modified grassland	0.50	0.01
h1b - Upland heathland	2.55	8.70
h1b5 - Dry heaths; upland (H4030)	0.49	1.46
h1b6 - Wet heathland with cross-leaved heath; upland (H4010)	0.57	0.57
h1c - Mountain heaths and willow scrub	1.08	1.43
h3e – Gorse scrub	0.36	N/A
h3h - Mixed scrub	3.44	N/A
u1b - Developed land, sealed surface	0.11	2.93
u1c - Artificial unvegetated unsealed surface	0.89	1.04
Total	29.52	38.05

7.7.12 Construction activities have the potential to degrade or destroy terrestrial habitats either directly through excavation, compaction or modification (e.g. vegetation removal) or indirectly as a result of dewatering or from the accidental release of fuels, lubricants or other chemicals.

7.7.13 Direct habitat loss during construction would be an adverse impact extending across the working areas for each of the nine turbine locations (turbine base and hardstanding area[55]), the area of proposed new Internal Tracks (approximate width of 6 m), widened existing Internal Tracks (approximately 6 m width), and the substation compound.

7.7.14 Within the Turbine Array, temporary, indirect habitat modification is calculated as a 10 m buffer around the areas of direct habitat loss. This follows the precautionary principle of the worst-case scenario of habitat that is likely to be indirectly modified by the Proposed Development but with careful, best practice construction following a CEMP, such impacts should be avoided.

7.7.15 As noted in paragraph 7.7.9, an arboricultural impact assessment was commissioned to determine the extent of tree loss along the Access Route. The loss of trees to facilitate transportation of turbine materials amounts to 75 individual trees in total, with most of these located in areas of LEPO ancient woodland. Removal of trees and understory habitats

[55] During habitat loss calculations, there was no distinction between areas of permanent hardstanding and temporary laydown areas within the data provided by the Applicant, therefore, as a worst-case scenario, all these areas were considered to result in permanent habitat loss.

would be required where trees lie within the footprint of the widened Access Route. Any trees located within the impact areas would require felling and alteration to the individual trees themselves, whereas it is assumed that all associated understory habitats at these locations would remain unaffected. As these are discreet, specific trees on the margin of the woodland to be removed, no additional 10 m buffer of temporary, indirect habitat modification has been included. This avoids over-estimating the habitat impacts in that part of the Site. The trees requiring removal comprise several species and age categories including mature birch, Douglas fir, Sitka spruce and Scots pine. The results of the arboricultural impact assessment are presented in **Appendix 3.2 in Volume 4 of the EIAR**.

BLANKET BOG, FLUSHES AND MIRES

7.7.16 The permanent loss or degradation of blanket bog[56], flushes and mires (including both good quality and degraded bog corresponding to the M19 *Calluna vulgaris-Eriophorum vaginatum* blanket mire NVC Community) would comprise 13.43 ha which is 7.5% of the total extent of these habitat types recorded within the Site. No direct impacts on the flush habitats found on Site are predicted. The permanent loss or degradation would be a one-time, direct impact of moderate magnitude on this feature due to the potential to disrupt the functionality of the habitat, especially as the blanket bog in the field survey area is already subject to modification from the existing Novar 1 Wind Farm and from other anthropogenic impacts such as coniferous woodland plantation. The best examples of blanket bog are an Annex 1 habitat[57], and blanket bog in the Highlands has been greatly disturbed by afforestation/other anthropogenic activities and therefore is in less than favourable condition. As such, without mitigation, further loss or degradation of this feature would be considered a **significant** adverse effect on a feature of county importance. However, the impact is reversible, i.e., mitigation is possible.

MOUNTAIN HEATH AND WILLOW SCRUB

7.7.17 Approximately 1.08 ha of mountain heath and willow scrub would be lost as a result of the Proposed Development. This habitat is currently unaffected by the existing Novar 1 Wind Farm but would be impacted by the creation of a borrow pit in the north of the Site and by hardstanding in the east of the Site in the location of Turbine 9. The habitat loss in these areas combines to form a direct loss of 7.7% of the total recorded area for this habitat within the Site (1.08 ha). Additional indirect impacts on this habitat type may arise from fragmentation and alteration to hydrology or connectivity with other habitats. This may lead to an indirect effect on 1.45 ha of mountain heath and willow scrub within the Site. This impact represents a direct adverse impact and permanent loss of a protected habitat (UK BAP: Montane habitat, EU Annex 1: Alpine and boreal heaths; Sub-arctic Salix scrub; Siliceous alpine and boreal grassland). Due to the permanent loss of protected habitat as part of the Proposed Development, this is regarded as being a moderate impact. Mountain heath and willow scrub is a natural Scottish upland habitat particularly in the Highlands, with little representation elsewhere in Britain. As such, without mitigation, loss and degradation of this habitat would be considered a **significant** adverse effect on a feature of county importance. However, the impact is reversible, i.e., mitigation is possible.

WET HEATH

7.7.18 Wet heath within the Study Area (largely comprising NVC community WH1 and a subset of a priority EU Annex 1 habitat) lies concentrated to the east and west of the existing Access Route and to the north of the Site in the proposed location of Turbines 1 and 2. Pre-mitigation, the construction of Internal Tracks and associated hardstanding in the north of

[56] Including all loss of fla, f1a5 and f1a6 UK hab types.

[57] Blanket bog (Blanket bogs) - Special Areas of Conservation

the Site would result in the direct, permanent, irreversible loss of wet heath habitat. The total projected direct loss of 0.57 ha represents 3.39% of the total wet heath recorded within the Site and presents a low magnitude loss for this habitat type. It should be noted that the majority of this habitat type within the Site is in a degraded state due to the presence of the existing Novar 1 Wind Farm. Given the previously altered state of this habitat and the presence of other wet heath in the area, this effect would be **not significant**.

DRY HEATH

7.7.19 The permanent loss or degradation of dry heath (corresponding to the H2a, H10, H13 and H22 NVC communities) would comprise 0.49 ha (0.82%) of the total extent of this habitat type recorded in the field survey area. This would be a one-time, direct and low magnitude impact due to the potential to disrupt the functionality of the habitat, especially as the heath habitats in the field survey area are already subject to modification from the existing Novar 1 Wind Farm and the surrounding coniferous woodland plantation. Although good quality dry heath is an Annex 1 habitat[57], the degraded nature of this feature means that it would be considered a **non-significant** adverse effect on a feature of county importance. Additionally, the impact is reversible, i.e., mitigation is possible.

MIXED WOODLAND

7.7.20 The areas of mixed woodland within the Site, are mostly found along the Access Route in the form of w1, w1h, w1h5 and w1h6 broadleaved and mixed woodland. On the margins of these areas of woodland, 75 trees, would be impacted by the widening of the existing Access Route to facilitate the transportation of turbine material. Felling and trimming of trees and scrub material would occur in several short segments where engineers deem necessary on bends and meanders of the existing Access Route. In the context of the wider area and despite possible impacts on mature trees, owing to the low number of trees being lost, other mature trees occurring elsewhere in the woodland and the overall habitat being common and widespread in the immediate area and beyond, this represents a low magnitude loss with limited extent. The impact would be permanent with respect to individual trees being altered or removed, but due to the low magnitude impact and the presence of this habitat type in the wider area it is unlikely that the felling of 75 trees equating to 0.7 ha of woodland, would result in an adverse significant effect at a county level. However, this impact is reversible through mitigation, i.e. through replanting of woodland at an alternative location. Although the impact on mixed woodland is deemed to be **not significant** for in purely ecological terms, it is considered further for ornithological features in **Chapter 8: Ornithology (EIAR Volume 2)**.

CONIFEROUS WOODLAND

7.7.21 Areas of coniferous woodland which are not listed on the Ancient Woodland Index occur along the existing Access Route. Felling and trimming of trees would occur in several short segments where engineers deem necessary on bends and meanders of the existing Access Route. These losses are estimated to be limited to 10 individual trees in the impact area along the Access Route. In the context of the wider area, this loss is considered **not significant** due to the habitat being common and widespread in the immediate area and beyond. As such, this would be a low magnitude impact. The impact on individual trees would be a permanent, non-reversible impact for individual trees which are to be felled and would present a temporary impact on trees which require trimming or alteration. These impacts constitute a one-off event but are considered reversible through mitigation planting close to the Site. The felling and trimming of coniferous woodland is a **non-significant** effect on a receptor of local importance for ecology. The biodiversity value for coniferous woodland within the Site is considered low for ecological receptors but is considered more valuable and locally important considering its importance to ornithological features (see **Chapter 8: Ornithology (EIAR Volume 2)**).

WATERCOURSES

7.7.22 No watercourses are crossed by the Proposed Development within the Turbine Array. The existing Access Route crosses a number of small watercourses with these all culverted under the route. Within the Turbine Array, two named watercourses, the Allt Srath nan Gleann and the Altt Torran an Tairneanaich lie with 50 m of the existing Internal Tracks to be reused between Turbines 3 and 4, and 5 and 6.

7.7.23 Twenty-one watercourses have been identified along the Access Route which have been identified as requiring upgrades to meet the needs of the Proposed Development. The location of each water crossing is presented in **Technical Appendix 9.2: Water Crossing Assessment (EIAR Volume 4)**. The Proposed Development has the potential to lead to direct adverse impacts from sediment or pollution release in the vicinity of these crossings, however, these potential impacts are likely to be limited in extent and given the small size of the watercourses, any such spills are considered unlikely to travel far downstream or if they did, be heavily diluted in a short distance. As such, potential impacts to water crossings are of low magnitude, and likely a short-term, one-time, reversible impact, i.e. mitigation is possible. Measures to prevent sediment dispersion and pollution are included as standard practice within the DCEMP (**Technical Appendix 3.2, Volume 4**) which forms part of the embedded mitigation. Therefore, this is a **non-significant** effect.

Protected Species

BATS

7.7.24 Nine bat detectors were deployed on the Site based on an indicative nine turbine layout (**Figure 7.4: Bat Detector Locations EIAR Volume 3a**). No bat roosts would be disturbed, destroyed or damaged from proposed construction activities. Construction has the potential to result in a short-term, low magnitude adverse impact on bats that forage and commute in the woodland plantation through displacement, particularly in areas where woodland is to be felled to facilitate the delivery of turbine infrastructure. Post-felling, the access route would still provide linear commuting and foraging habitat for bat species. Effects on bats are considered to be **not significant**. Further information regarding the results of bat surveys is presented in **Technical Appendix 7.2: Ecology Results (EIAR Volume 4)**.

Pine Marten

7.7.25 Construction of the Proposed Development could result in temporary and permanent adverse impacts on pine marten within the Study Area. Pine marten scats were identified at two locations along the existing Access Route. The Proposed Development has the potential to result in permanent direct impacts on pine marten through loss of habitat, or incidental death or injury of individuals may occur through construction activities such as felling of woodland, or from collisions with construction vehicles along the access route. This is of low magnitude considering the availability of alternative habitat in the immediate vicinity of the Site, the ability of pine marten to move away from the areas, the crepuscular/nocturnal nature of the species and the absence of identified pine marten dens in the areas to be felled. The felling would be a short-term, one-off event lasting for a matter of a few days. This is a **non-significant** effect at the local level, and is reversible, i.e., effective mitigation is possible.

7.7.26 The construction of the Proposed Development also presents potential for indirect adverse impacts on pine marten from the increased amount of human activity, noisy machinery and increased vehicle movements on Site. This would be focused around the two areas of identified pine marten activity. It is similarly considered to be a low magnitude impact of short duration. It would be a one-off impact, but mitigation is possible, i.e., it is a reversible impact. **No significant effect** at a local level is predicted.

Badger

7.7.27 A lone possible badger latrine was identified during walkover surveys. The removal of woodland along the Access Route has the potential to result in a direct adverse impact of loss of habitat or mortality of individuals from construction vehicle collisions. Given the small amount of habitat loss, the absence of badger activity signs, and availability of other suitable habitat to allow badgers to move away and the absence of any badger setts, it would be a low magnitude impact. The felling would be a short-term, one-off event lasting for a matter of a few days. This is therefore a **non-significant** effect at a local level, and it is reversible, i.e., effective mitigation is possible.

7.7.28 The construction of the Proposed Development also presents potential for indirect adverse impacts on badger via the increased amount of human activity, noisy machinery and increased vehicle movements on Site. This overlaps the one area of identified badger activity. However, it is similarly considered to be a low magnitude impact of short duration. It would be a one-off impact and mitigation is possible, i.e., it is a reversible impact. **No significant effect** at a local level is predicted.

Mountain Hare

7.7.29 No forms were found and evidence of mountain hare on Site includes an example of scat identified during the Site walkover. There is a temporary opportunity for direct impacts on mountain hare during the construction phase from incidental death and injury relating to human presence. Death and injury may arise from vehicle collisions. Following completion of the construction of the Proposed Development, the risk to mountain hare would decrease substantially with the reduction of human presence and activity at the Site. Following best practice and standard mitigation where on Site speed limits are adhered to, it is unlikely that the magnitude of these impacts would be greater than negligible. Due to the low number of individuals recorded on Site, the extent of usable habitat throughout the wider area and the ability of hare to rapidly re-locate themselves to avoid harm, this effect would be **not significant**.

Deer

7.7.30 Construction activities present a temporary window for direct, adverse impacts to occur on local deer populations. These impacts largely arise from increased potential for incidental death and injury from collision with works vehicles on Site. Given that the Proposed Development predominantly overlays the boundary of the existing Novar 1 Wind Farm, it is likely that the local deer population is habituated to the presence of humans on the Site and is at less of a risk of collision than deer at a previously undisturbed location. Existing speed limits on site for vehicles would be maintained. Additionally, given the large population of deer in the area, it is unlikely that direct impacts on the species would amount to more than a negligible effect on a receptor of local importance, which is **not significant**.

7.7.31 Temporary displacement of deer populations may also occur from increased human presence and activity on Site. This indirect impact is reversible and would not factor into the conservation of deer species post-construction but may have lasting impacts on local habitats in the surrounding such as wet heath and woodlands should deer populations be displaced long term. Given the healthy population of deer in the Highlands and the likelihood of deer to be habituated to the presence of humans within the Site, it is unlikely that this would amount to more than a low magnitude impact and is therefore a **non-significant effect** at a local level. Impacts on deer are further considered in **Technical Appendix 7.3: Deer Management Plan (EIAR Volume 4)**.

Operation of Repowered Wind Farm

Habitats

7.7.32 Operational impacts on habitats and locally occurring protected species are considered possible through the accidental spillage of fuels, chemicals, lubricants during maintenance works, or leaks from operational turbines or other equipment in the event of a failure. This could lead to a direct, adverse impact of habitat degradation albeit likely localised in extent, occurring on hardstanding rather than natural habitat and given the small volumes of such fluids likely to be on the Site during operation. The impact is therefore likely to be low magnitude and a one-off event rather than an impact occurring repeatedly or over a large period of time. The impact would be **not significant**.

Protected Species

BATS

7.7.33 The highest level of activity occurred during the summer period at detector D06 in the centre of the Site, close to the proposed location of Turbine 4 as shown in **Figure 7.6: Bat Detector Locations (EIAR Volume 3a)**. Based on the generally low overall bat activity on site, the higher number of passes at this detector has been attributed to repeated passes by a small number of common pipistrelles. This is further supported by the inconsistent activity levels across the period at this detector (172 out of 245 passes recorded at this detector during the summer were recorded during one night). It is possible that conditions on this high-activity night allowed for a large amount of foraging for local common pipistrelles, perhaps an insect hatch event. Activity at this detector commenced one hour after sunset and no bat roosts were identified within the Survey Area. Activity on Site was lower in spring and autumn, which could be attributed to less invertebrate foraging due to season and/or lower temperatures. The next most-active detector was D08, located between the proposed locations for Turbines 6 and 8 in the southeast of the Site – **see Figure 7.6 (EIAR Volume 3a)**. This detector was dominated by Natterer's bat activity and unidentified Myotis species activity (quite likely just more Natterer's bat calls) suggesting the potential presence of a roost in the woodland to the southeast of the Turbine Array. It is worth noting that although the activity was higher at this location compared to the wider Site, the activity is still regarded as 'low' and amounted to roughly half the number of bat passes than the most active detector, D06 (112 passes across the entire season at D08, compared with 235 passes at D06).

7.7.34 The main operational impact on bat species is direct collision with wind turbines leading to bat fatalities. It is unlikely that internal haemorrhaging due to indirect barotrauma is responsible for a significant number of bat fatalities, with collision the more likely cause of the majority of bat fatalities around wind turbines. It is likely that due to the presence of the existing Novar 1 Wind Farm that bats in the area are habituated to wind turbines and are potentially at a lower risk of injury through collision and barotrauma. Additionally, the low level of commuting and foraging habitat in the vicinity of the Turbine Array further reduces potential impacts during the operational phase of the Proposed Development and likely has contributed to low activity levels throughout the Site.

7.7.35 Overall, the field survey area is considered to support a low number of foraging and commuting bats dominated by common and widespread species, such as common and soprano pipistrelles with some *Myotis* species, with most activity at a low level across the survey season. Given the results of the bat surveys that indicate a low level of bat activity, the field survey area is not considered to support important bat populations.

7.7.36 Pipistrelle species are at high risk of collision with turbines, but the likelihood of collision is low when taking into account the low activity recorded in the field survey. The risk to *Myotis* species from collision is similarly considered to be low when taking into account the low level

of activity recorded across the field survey area. Whilst direct collision would be an adverse impact, these are considered to involve a low number of individuals from roosts in unknown locations in the wider area. It is unclear as to the location of roosts in the wider area as there are very few online records of bats within the desk study area. Given the number of Natterer's bats and unidentified *Myotis* species recorded during the survey season it is believed that there is a Natterer's roost in the wider area, potentially southeast of the Site, however none were identified within the Survey area. Taking all of this into account, no likely significant effect on bat species from collision risk are predicted.

7.7.37 Indirect impacts of wind turbines on bats also include disturbance and displacement from foraging, commuting or migrating areas. There is potential for a low magnitude of disturbance and displacement where bat activity is low in the centre and southeast of the field survey area. Although disturbance and displacement are possible at this Site, the effect would be **non-significant** as there are no suitable habitat features which are to be removed in the vicinity of the Turbine Array, and the overall activity at the Site is low. Further information regarding the results of bat surveys is presented in **Technical Appendix 7.2: Ecology Results (EIAR Volume 4)**.

Decommissioning of Repowered Wind Farm

7.7.38 Decommissioning impacts would involve personnel and machinery accessing locations across the field survey area to dismantle and remove infrastructure, including turbines, hardstanding and Site buildings, as detailed in **Chapter 3: Site Description and Proposed Development (EIAR Volume 2)**. It is assumed that concrete foundations would be broken down to a minimum depth of 0.5 m below surface level. The Internal Tracks and electrical cables would be left in situ where practicable to minimise habitat disturbance. The overall impacts of decommissioning would be short-term, intermittent and temporary. Existing Internal Tracks would be used to access the infrastructure to be decommissioned. Compounds are likely to be introduced at the same locations used during the construction phase, where possible i.e., on habitats previously disturbed by the construction of the Proposed Development. As a result, **no significant** adverse effects on habitats are predicted, with habitats allowed to recover and regenerate following the removal of infrastructure.

7.7.39 Activities would likely take place in a shorter overall duration (approximately 6 to 12 months). Wind turbines and electrical equipment would be removed and the hardstanding areas and substation restored/reinstated. There may be a temporary and short-term disturbance impact on protected species, such as pine marten, in the field survey area but this would be restricted to the internal access tracks and other infrastructure and would be a **non-significant** effect.

7.7.40 As part of the decommissioning of the repowered wind farm, a Decommissioning Environmental Management Plan (DEMP) would be prepared to manage the works, which would include environmental control measures that would be used to minimise potential adverse environmental effects. This would perform a similar role to the DCEMP for the construction phase, setting out the mitigation measures that would be implemented to minimise adverse environmental effects.

Potential Cumulative Effects

7.7.41 Cumulative effects are considered to include both the total effects resulting from the Proposed Development in combination with other similar developments (present and reasonably foreseeable), and the additional contribution of the Proposed Development to the total cumulative effects taking account of other similar developments. As such, the aim is to identify any likely significant effects associated with the combination or addition of the Proposed Development with the cumulative baseline. EIA Reports for infrastructure projects within a 10 km buffer zone from the Proposed Development have been reviewed and are

presented in Table 7.12. Developments for which no data could be reviewed are also listed in Table 7.12 but have been left out of the assessment. The absence of data for some cumulative developments is not considered to be a considerable limitation on this assessment. Based on professional judgement, specialist local knowledge of the area and the robust and precautionary approach taken in this assessment, it is considered unlikely that significant cumulative effects would occur.

Table 7.12: Cumulative Schemes within 10 km of the Site

Scheme	Description	Status	Relevant cumulative effects previously identified	Potential for cumulative effects with Proposed Development
Abhainn Dubh Wind Farm	A nine-turbine wind farm located 2 km west of the Site.	In Planning	Minor non-significant adverse effects on 0.39 ha of blanket bog	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Beinn Tharsuinn Wind Farm	A 17-turbine wind farm located 10 km north of the Site and proposed repowering of 31 turbines.	Scoping	Potential impacts through habitat fragmentation. The Scoping Report highlights potential effects on nearby woodland and protected species using this habitat.	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Carn Fearna Wind Farm	A 17-turbine wind farm located 10 km west of the Site.	Operational	Permanent loss of 24.8 ha of nationally important peatland resulting in a significant effect. Additional non-significant effects on 8.9 ha of non-national interest peat, 15.6 ha of heath, 0.82 ha of marshy grassland and 0.51 ha of woodland.	**Yes** – see table 7.13 below for further information.
Ceislein Wind Farm	An 11-turbine wind farm located <1 km east of the Site	In Planning	Permanent loss of 9.85 ha of degraded blanket bog and 5.52 ha of coniferous woodland plantation resulting in effects which are not considered to be significant. No significant adverse effects are anticipated on protected species or designated sites as a result of this	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.

Table 7.12: Cumulative Schemes within 10 km of the Site				
Scheme	**Description**	**Status**	**Relevant cumulative effects previously identified**	**Potential for cumulative effects with Proposed Development**
			development. Significant positive effects are anticipated on peatland habitats following suggested mitigation.	
Coire na Cloiche Wind Farm	A 13-turbine wind farm located 5 km north of the Site.	Operational	No significant effects on habitats or protected species anticipated	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Creachan Wind Farm	A 13-turbine wind farm located 5 km north of the Site.	In Planning	Permanent loss of 60.9 ha of peatland habitats and 5.3 ha of priority peatland habitats amount to a significant effect. Through compensation measures delivered through a Habitat Management Plan (HMP) no significant residual effects are anticipated. No significant effects are anticipated on protected species or designated sites.	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Glasa Wind Farm	A 27-turbine wind farm 5-10 km from the Site	Scoping	The scoping report highlights the potential for impacts on protected species and habitats resulting from the development. Impacts on bats, priority peatland, ancient woodland and fish populations were scoped in for further assessment. The nature of these potential impacts are unknown at this stage and will remain so until a full suite of surveys is completed and their results published.	**Yes** – see table 7.13 below for further information.

Table 7.12: Cumulative Schemes within 10 km of the Site				
Scheme	**Description**	**Status**	**Relevant cumulative effects previously identified**	**Potential for cumulative effects with Proposed Development**
Novar 2	A 16-turbine extension to Novar 1 located next to the Site	Operational	Project is within an area of forestry that was felled to allow construction. As such, the majority was heavily degraded peatland habitat, likely to now be recovering to an extent with the removal of trees.	**No** potential for cumulative effects has been identified as no significant effects are believed to have occurred on receptors likely effected by the Proposed Development.
Spittal to Loch Buidhe to Beauly 400kV OHL Connection	A new overhead transmission line crossing the Access Route and passing immediately to the north and east of the wind turbine array.	In Planning	The development will not result in significant impacts on protected species, habitats or designated sites. It has been reported that the in combination cumulative effect of the development and other developments in the area will result in a net positive effect on ecological receptors, particularly blanket bog.	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Strathrory	A seven-turbine wind farm located 5-10 km from the Site	Consented	No significant effects are anticipated to occur on habitats or protected species from the development. No cumulative impacts have been identified in the EIAR for this development due to the mitigation measures proposed by surrounding developments.	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.
Yellow Wells	A single turbine 5-10 km from the Site	Operational	No significant effects are anticipated to occur on habitats or protected species from the proposed development. Cumulative effects between developments and the Yellow Wells development have been assessed as being negligible or non-existent.	**No** potential for cumulative effects have been identified as no significant effects are anticipated on receptors likely effected by the Proposed Development.

Potential Cumulative Construction Effects

7.7.42 The Spittal-Loch Buidhe-Beauly 400kV Overhead Transmission Line Connection is an in-planning development which passes to the north and east of the Turbine Array and crosses the Access Route and Secondary Vehicular Access Route for the Proposed Development.

7.7.43 Abhainn Dubh is an in-planning development located roughly 5 km southwest from the Site. The submitted EIAR states that there is no potential for any significant effect on habitats, bats, pine marten or mountain hare in the absence of mitigation. Moderate adverse effects to water vole *Arvicola amphibius* at a local level are anticipated via unintentional disturbance/death/injury pre mitigation.

7.7.44 Beinn Tharsuinn Wind Farm is an in-scoping repowering development consisting of 31 turbines located 10 km northeast of the Site. Preliminary data available in the submitted Scoping Report state that effects to habitats and protected species during the construction phase are expected to be negligible.

7.7.45 Carn Fearna Wind Farm is an in-planning development consisting of up to 9 turbines located 10 km southwest of the Site. The submitted EIAR ecology chapter highlights a direct and permanent loss of several hectares of peatland communities of potential national interest (24.8 ha). This is estimated to be a significant loss. Additional permanent habitat loss on the site includes woodland (0.51 ha), marshy grassland (0.82 ha), heath (15.6 ha) and peatland which is not of national interest (8.9 ha). Temporary loss of habitat is predicted to occur within 0.3 ha of heath and 0.86 ha of peatland which is of national interest.

7.7.46 Ceislein Wind Farm is an in-planning development consisting of eleven turbines located on the Novar Estate, immediately adjacent to the Proposed Development. The submitted EIAR ecology chapter identifies areas of habitat loss and disturbance/direct mortality to protected species. No significant adverse effects have been predicted resulting from the construction of this development and significant positive effects are anticipated to occur on blanket bog habitats due to the proposed mitigation measures.

7.7.47 Coire na Cloiche Wind Farm is an operational site consisting of 13 turbines located 5 km north of the Site. The submitted EIAR ecology chapter identifies no significant effects on habitats or protected species from the construction phase.

7.7.48 Creachan Wind Farm is an in-planning development consisting of 13 turbines located 10 km from the boundaries of the Site. The EIAR highlighted direct and indirect loss of habitats from the construction of the development, with the majority of loss being blanket bog (60.9 ha). All other effects on other habitats, designated sites and protected species in the construction and operational phases of the development have been assessed as not significant.

7.7.49 Glasa Wind Farm is a 27-turbine development located 5-10 km west of the Proposed Development which is currently at the scoping stage. The Scoping Report identified potential impacts to priority peatland habitats and ancient woodland based on proximity to the development. Due to the lack of information, it is not possible to make a judgement on whether there is the potential for a significant cumulative effect to be generated.

7.7.50 Strathrory Wind Farm is a consented development in construction consisting of up to 7 turbines located approximately 10 km northeast of the Site. No information regarding construction effects on local habitats or protected species was available at the time of writing this assessment. The Scoping Report highlighted potential effects on habitats and protected species arising from habitat fragmentation, disturbance and modifications through hydrological changes.

7.7.51 Yellow wells is a lone turbine development located 8 km northwest of the Proposed Development. No significant effects have been highlighted in the application which would

contribute to cumulative effects with either the Proposed Development or other developments in the area.

7.7.52 Due to the extent of habitat loss associated with the construction phase of the Carn Fearna Wind Farm, there is the potential for a **significant** adverse cumulative effect with the construction phase of the repowered wind farm.

Potential Cumulative Operational Effects

7.7.53 Beinn Tharsuinn repowering and extension is at the scoping stage and therefore, bat collision risk data is not yet available. However, it is considered that there is potential for a cumulative collision risk for these developments, though it is likely to be low given the similarity of the habitats with the Proposed Development, and therefore it would be not significant.

7.7.54 Within the EIAR, Abhainn Dubh Wind Farm was considered to have a moderate significant beneficial effect at a local level for blanket bog from the proposed restoration. No significant effects were anticipated on local bat species due to the low activity levels, low number of species recorded and the unfavourable conditions on Site for bats.

7.7.55 Within the EIAR for the Carn Fearna Wind Farm, a site risk assessment has been completed to determine the risk to bat species from death or injury by collision and barotrauma. The analysis determined that the overall site risk level was of negligible significance.

7.7.56 Within the EIAR for the Ceislein Wind Farm, low levels of bat activity were reported which were attributed to common and widespread bat species. The Site is largely comprised of low suitability habitat (open moorland and heath), with any suitable commuting and foraging areas located > 50 m from proposed turbine locations. Due to low recorded activity and the unsuitable character of the habitat on site, no significant adverse effects are predicted to occur on local bat species at this site. Operational impacts at Ceislein Wind Farm are not deemed significant enough to lead to a cumulative effect with the Proposed Development.

7.7.57 No bat collision data has been provided as part of the Coire na Cloiche EIAR therefore it is unclear whether this development may contribute to a cumulative effect when considered with the Proposed Development although given the similarities in landscape, habitats and location it is possible that bat activity levels are similar and adverse effects are unlikely.

7.7.58 Creachan Wind Farm EIAR has highlighted the potential risks to protected species from vehicle movements and increased human presence in the area, although the effects arising from this would not be significant. Due to the low levels of bat activity recorded at the site and the embedded mitigation ensuring a 50 m distance between turbines and high-value bat habitats, adverse effects on bats associated with the operational phase of the development would not be significant. There is no potential for cumulative operational impacts between this development and the Proposed Development.

7.7.59 The Scoping Report for the proposed Glasa Wind Farm has highlighted potential risks to bat species via displacement of roosting and foraging habitats and via death or injury due to collision or barotrauma. No collision risk data is available at this time and will not become available until a full suite of surveys has been completed.

7.7.60 No information on bat collision risk is available for the proposed Strathrory Wind Farm so it has not been possible to undertake a cumulative assessment.

7.7.61 Due to the nature of the development, the Spittal to Loch Buidhe to Beauly OHL Connection is unlikely to present operational risks to local bat species. The submitted EIAR has stated that any operational maintenance or monitoring of habitats will be conducted in line with the relevant HMP. Therefore, it is unlikely that any cumulative effects will occur between this development and the Proposed Development.

7.7.62 Within the supporting statement for the lone turbine at Yellow Wells, the site was considered to be unsuitable for bats (open moorland and heath) with few opportunities for roosting in the vicinity of the development. The potential for cumulative effects to occur is negligible.

7.7.63 Due to the distance between the above sites and the Proposed Development, the similarity in bat activity levels and the overall negligible operational effects across all sites, any operational cumulative effects would **not be significant**.

7.7.64 Table 7.13 summarises the potential significant cumulative effects on each ecological feature from the Proposed Development in combination with the cumulative developments scoped into the assessment.

Table 7.13: Summary of Significant Cumulative Effects

Feature	Developments with Potential Significant Effects[58]	Potential Effect Significance
Peatland (blanket bog habitats)	Carn Fearna Wind Farm Glasa Wind Farm	The submitted EIAR for Carn Fearna highlights the loss of 24.8 ha of nationally important peatland habitat, in addition to 8.9 ha of non-national interest peat. The loss of nationally important peat was assessed as being an effect of minor adverse significance. The loss of this important habitat at a site in close proximity to the Proposed Development, with similar predicted losses (~14 ha of peatland) could result in a significant cumulative effect on this habitat type. The submitted Scoping Report for the Proposed Glasa Wind Farm identified potential impacts on several habitats including peatland. Although potential impacts have been stated, it is worth noting that as this project is in the scoping stage of assessment, the inclusion of the Glasa Wind Farm in this section is highly precautionary and further surveys at this site will be required to solidify the anticipated effects to ecological receptors.
Ancient Woodland	Glasa Wind Farm	The submitted Scoping Report for the Proposed Glasa Wind Farm identified potential impacts on several habitats including ancient woodland. Although potential impacts have been stated, it is worth noting that as this project is in the scoping stage of assessment, the inclusion of the Glasa Wind Farm in this section is highly precautionary and further surveys at this site will be required to solidify the anticipated effects to ecological receptors.

7.8 Additional Mitigation and Enhancement Measures

7.8.1 The layout of the Proposed Development has, as far as possible, been designed to avoid the habitats of highest ecological importance and with the highest sensitivity to impacts, as detailed in **Chapter 3: Site Description and Proposed Development and Chapter 4: Design Evolution and Alternatives (EIAR Volume 2)**. The Proposed Development has also been designed where possible to incorporate the Internal Tracks and hardstanding of the existing Novar 1 Wind Farm to minimise further impacts on local habitats and protected species.

[58] This includes developments yet to be submitted into planning that may provide significant impacts, based on review of scoping report.

7.8.2 Where it has not been possible to entirely avoid blanket bog or mountain heath, the majority of turbines and infrastructure have been positioned in areas which will keep impacts on the natural functions of these habitats to a minimum. Furthermore, areas of woodland present on the Ancient Woodland Index under the sub-category of "Ancient (of semi-natural origin)" have been avoided. Areas of Ancient Woodland which are likely to be impacted by the development are strictly limited to those categorised as "Long Established of Plantation Origin" and present lower inherent biodiversity value than those of semi-natural origin.

7.8.3 In the absence of additional mitigation, significant adverse effects are predicted on:

- Blanket bog;
- Mountain heath and willow scrub; and
- Ancient Woodland (LEPO)

7.8.4 A summary of the additional mitigation is set out in Table 7.14. Additional mitigation for ecology has been given a unique mitigation reference ID and is further detailed below and in Table 7.14.

7.8.5 Specific mitigation for habitat loss is presented in **Technical Appendix 7.4: Outline Biodiversity Enhancement and Management Plan (EIAR Volume 4)**. Specific mitigation for habitat reinstatement of temporary infrastructure, pre-construction protected species surveys, pollution prevention, maintaining hydrological connectivity and surface water management is provided as standard practice construction environmental management measures and are detailed in the outline DCEMP in **Technical Appendix 3.1 (EIAR Volume 4)**. These measures would avoid and/or mitigate adverse effects on habitats and protected species in relation to pollution and disturbance.

Habitat Restoration and Enhancement

Blanket Bog

7.8.6 Active restoration of the peatland habitats in the field survey area, both the habitats impacted by the Proposed Development and habitats that are already modified, would be carried out in line with **Technical Appendix 7.4: Outline Biodiversity Enhancement Management Plan (EIAR Volume 4)** and is anticipated to be controlled by a planning condition. Active restoration is defined here as the process of actively encouraging the regeneration of degraded peatland habitats. Degraded peatland habitats are those that are reduced in quality. A minimum of 134 ha of peatland would be restored in areas of modified blanket bog within the Site that no longer contain a significant proportion of peat-forming vegetation, with a further 1.4 ha set aside for enhancement within the Application Boundary. This aligns with the 1:10 compensation (lost: restored) target for blanket bog habitats of this habitat type. A further 12 ha for peatland restoration may also be available either within land controlled by Novar Estates, or at another appropriate location subject to the outcome of ongoing landowner engagement to achieve enhancement of 10% of the baseline as recommended by NatureScot. The overall aim will be to restore a larger area of peatland than the area lost. This will mitigate the permanent and temporary loss and modification of peatland from the Proposed Development as detailed in **Technical Appendix 7.4: Outline Biodiversity Enhancement Management Plan (EIAR Volume 4)**. **(ECO5)**

Mountain Heath and Willow Scrub

7.8.7 Enhancement of mountain heath and willow scrub within the Site would be carried out in line with the proposal presented in **Technical Appendix 7.4: Outline Biodiversity Enhancement Management Plan (EIAR Volume 4)**. Enhancement for this habitat type is defined as encouraging the growth and development of existing mountain heath and willow scrub within the Site, with the goal of improving the overall quality of the habitat and its capacity to support biodiversity. It is believed that due to the limited amount of this

habitat within the Site and its rarity nationwide, that the entirety of this habitat type identified during the survey will be subject to enhancement protocols. Enhancement of mountain heath and willow scrub within the Site could lead to the promotion of an Annex 1 priority habitat and the provision of foraging and sheltering opportunities for other protected species, of ecological and ornithological significance. **(ECO6)**

Ancient Woodland (LEPO)

7.8.8 Restoration and enhancement of woodland throughout the wider Novar Estate would be carried out in line with the proposal presented in **Technical Appendix 7.4: Outline Biodiversity Enhancement Management Plan (EIAR Volume 4)**. Restoration enhancement of this habitat type is defined as improving the condition of and extending the woodland within the adjacent Novar SPA. It is assumed that to adequately account for felled trees and scrub along the Access Route, that 0.7 ha of native woodland would be required to be replanted to successfully mitigate against the losses described above. Rehabilitation and addition to the existing native woodland within the Novar Estate and SPA via replanting at a low density with appropriate deer protection measures would be the priority for any restorative efforts for woodland habitats and a location within the northern part of the SPA has been identified as suitable for these mitigation measures. **(ECO7)**

Table 7.14: Summary of Additional Mitigation

Description of Impact	ID	Description of Mitigation	Purpose of Mitigation	Timing of Mitigation*	Consultation or Approval Required
Permanent and temporary loss and modification of peatland habitat.	ECO5	A minimum of 134 ha of peatland would be restored in areas of modified blanket bog, and 1.4 ha set aside for enhancement within the Site. The intention is that there would be an additional 12 ha of enhancement offsite but this is subject to landowner agreement.	Active restoration and enhancement measures to restore a larger area of peatland than area lost.	O	No
Degradation and permanent loss of protected mountain heath and scrub habitat.	ECO6	Enhancement of mountain heath and willow scrub within the Site.	Improving the overall quality of the habitat and its capacity to support biodiversity.	O	No
Loss of Ancient LEPO Woodland through the felling/trimming of trees to widen the Access Route.	ECO7	Replanting a minimum of 0.7 ha of native woodland within the wider Novar Estate and Novar SPA.	Overall gain of higher biodiversity value woodland habitat off-Site.	O	No

**PC=Pre-construction, C=Construction, O=operation and maintenance and D=decommissioning.*

7.9 Significant Residual Effects

Decommissioning of Novar 1 Wind Farm

7.9.1 There would be no adverse effects following the implementation of embedded mitigation and consequently, residual effects from the decommissioning of the Novar 1 Wind Farm are predicted to be **not significant**.

Construction of Repowered Wind Farm

Habitats

7.9.2 Following completion of construction of the Proposed Development (including reinstatement work), residual adverse effects are anticipated for the medium-term (approximately 10 to 15 years), until peatland habitats have re-established. Permanent habitat loss would occur in blanket bog (13.4 ha) due to the excavation of turbine bases and other infrastructure. Permanent habitat loss would also occur in 0.7 ha of woodland (including LEPO ancient woodland and non-ancient woodland) due to the requirements of transporting the turbines.

7.9.3 A minimum of 135.7 ha of peatland would be restored within the Application Boundary towards good-quality, active blanket bog and/or wet heath following the completion of construction, and in the medium to long-term would provide a local beneficial effect, particularly as the majority of peatland is currently modified by the surrounding coniferous woodland plantation. A further 12 ha for peatland restoration may also be available either within land controlled by Novar Estates, or at another appropriate location subject to the outcome of ongoing landowner engagement to achieve enhancement of 10% of the baseline as recommended by NatureScot. The aim is that by restoring degraded peatland, it would become actively peat-forming blanket bog and/or wet heath, which is able to store increased levels of water and carbon dioxide, helping with flood prevention and climate change, respectively. The aim is also to restore a larger area of blanket bog than the area lost. An area of 0.7 ha of native woodland would be planted in suitable areas to extend and improve the woodland in the Novar SPA following construction of the Proposed Development. As a result, residual effects are predicted to be **not significant**.

7.9.4 Implementation of the proposed DCEMP would avoid adverse effects from pollution events on habitats, with residual effects predicted to be **not significant**.

7.9.5 Overall, with the completion of the mitigation and good practice measures, whereby the most ecologically valuable and sensitive habitats have been avoided by design and measures to reduce impacts on all other habitats of higher value and sensitivity have been employed, the residual effects on habitats are predicted to be **not significant**.

Bats

7.9.6 Following implementation of the proposed DCEMP, no permanent adverse effects from habitat lost are anticipated on local bat populations, with residual effects predicted to be **not significant**.

Pine Marten

7.9.7 Implementation of the proposed DCEMP would avoid adverse effects from pollution events on pine marten, with residual effects predicted to be **not significant**.

Deer

7.9.8 Implementation of the proposed DCEMP and Deer Management Plan **(Technical Appendix 7.3, EIAR Volume 4)** would avoid adverse effects from pollution events on deer, with residual effects predicted to be **not significant**.

Operation of Repowered Wind farm

Habitats and Protected and Notable Species

7.9.9 Following the application of standard mitigation and good practice measures, such as pollution prevention measures, the residual effects on these ecological features during operation are predicted to be **not significant**.

Bats

7.9.10 Following the application of mitigation to include the use of sensitive lighting, which would avoid the disturbance of bats, the residual effects on bats would be **not significant**.

Decommissioning of Repowered Wind farm

7.9.11 There are no adverse effects predicted from the decommissioning of the repowered wind farm. Consequently, residual effects from decommissioning activities are predicted to be **not significant**.

Cumulative Effects

Residual Cumulative Construction Effects

7.9.12 The cumulative developments in combination with the Proposed Development would lead to a loss of 47.1 ha of peatland habitat (including nationally and non-nationally important peat). However, with the restoration of 137.5 ha of peatland as proposed in **Technical Appendix 7.4: Outline Biodiversity Enhancement and Management Plan (OBEMP) (EIAR Volume 4)**, it is not considered that this would result in a significant residual effect. Additionally, cumulative habitat loss includes 5.5 ha of woodland, which is also not considered significant with the proposed woodland replanting as discussed in the **OBEMP**.

Residual Cumulative Operational Effects

7.9.13 All cumulative developments mentioned have committed to a minimum protective buffer of 50 m between turbine blade tips and key habitat features, which would lower the bat mortality risk. As a result, **no significant** residual cumulative operational effects on bats are predicted.

7.10 Monitoring

Construction Phase Monitoring

7.10.1 No monitoring is required as there would be no significant residual effects.

Operational Phase Monitoring

Bats

7.10.2 Due to the low levels of activity recorded throughout the Site during the field survey period, it is anticipated that there would be no requirement for monitoring or carcass searches during the operational phase of the Proposed Development.

Decommissioning Phase Monitoring

7.10.3 No monitoring is required during the decommissioning phase of the existing or proposed wind farms as there would be no significant residual effects.

Summary of Significant Residual Effects

7.10.4 No significant residual effects are anticipated during the decommissioning of the Novar 1 Wind Farm or from the construction, operation or decommissioning of the proposed repowered wind farm.