



# Design and Access Statement (DAS)

## West Scales Energy Park

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## Basis of Report

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## 1.0 Introduction

For the purposes of the associated Environmental Impact Assessment, “the Site” comprises all land within the Proposed Development boundary, as shown by the red line on **Figure 1 (Site Location Plan)**. The Site extends to 122ha and is located 3km west of Gretna, within the administrative boundary of Dumfries and Galloway Council (D&GC), Scotland.

The Site includes for all land required for the construction, operation and maintenance of the Proposed Development. This comprises:

- wind energy infrastructure - including turbine locations, crane hardstandings, access tracks and underground cabling;
- solar photovoltaic (PV) arrays including panel mounting structures, inverter stations and associated internal access tracks;
- electrical infrastructure – including on-site substation, control building and grid connection infrastructure within the application boundary;
- temporary construction area, including site compound and proposed material storage areas; and
- ancillary works including drainage features in support of surface water management systems, and proposed landscape planting/ecological mitigation areas.

West Scales Windfarm Limited (“the Applicant”) is seeking planning permission under the Town and Country Planning (Scotland) Act 1997 (as amended) (“the Planning Act”) for the installation and operation of an energy park consisting of up to four wind turbines, solar photovoltaic (PV) arrays, a Battery Energy Storage System (BESS), and associated infrastructure (together, “the Proposed Development”) on land at West Scales Farm (“the Site”). This Design and Access Statement has been prepared in accordance with Regulation 13(4) of the Town and Country Planning (Development Management Procedure) (Scotland) Regulations 2013 (as amended, the ‘DMP Regulations’) which sets out the detailed requirements of the content of a Design and Access Statement in relation to planning permission.

Regulation 13 of the DMP Regulations states that a design and access statement is a written statement which:

*“(a) explains the policy or approach adopted as to design and how any policies relating to design in the development plan have been taken into account;*

*“(b) describes the steps taken to appraise the context of the development and demonstrates how the design of the development takes that context into account in relation to its proposed use; and*

*“(c) states what, if any, consultation has been undertaken on issues relating to the design principles and concepts that have been applied to the development and what account has been taken of the outcome of any such consultation.”*

This Design and Access Statement is submitted in support of the planning application for the Proposed Development. The Design and Access Statement does not form part of the Environmental Impact Assessment (EIA) Report. However, the Design and Access Statement should be read in the context of the EIA Report.

## 2.0 Site Location

In order to understand the design of the Proposed Development it is important to relate this to the Site and its context. A Site location plan is contained as **Figure 1** of this document. An



aerial photograph of the Site and its surroundings is contained as **Figure 2**. A plan (OS mapping not aerial photography) showing the application boundary is contained as **Figure 3**.

## 2.1 Site Description

A detailed site description is included within the **Chapter 2** of the EIA Report. The following paragraphs provide a general description of the Site.

The Site boundary, which encompasses approximately 122 hectares (ha), is located at West Scales Farm in Dumfries and Galloway, approximately 1km north east of Easttriggs between the settlements of Gretna and Annan. The Site lies wholly within the administrative boundary of Dumfries and Galloway Council (D&GC) and is predominantly used for agricultural purposes.

The Site is characterised by gently sloping agricultural land, with elevations gradually increasing from south to north. It includes areas of pastoral and arable farmland, native woodland and hedgerows. The Site contains no major streams or rivers but is intersected by small field drains.

There are no statutory environmental designations within the Site boundary. However, the Site lies approximately 2km north of several designated ecological sites including the Solway Firth Special Protection Area (SPA), Special Area of conservation (SAC) and Ramsar site, and the Upper Solway Flats and Marshes Site of Special Scientific Interest (SSSI).

The Site is host to some peat deposits in its southern, western and northern edges, particularly adjacent to Nutberry Moss.

## 2.2 Surrounding Area

The Site is located approximately 1km north-east of the settlement of Easttriggs, 3km west of Gretna, 5km east of Annan, and 2km south of Kirkpatrick-Fleming. The border between Scotland and England lies approximately 2km south-east at its nearest point (Solway Firth) with Cumberland Council being the nearest English local authority.

There are several residential properties located within 1km of the Site in all directions. West Scales Bungalow, located to the east of the Site boundary, is financially involved with the Proposed Development. West Scales Cottage, West Scales Farm, and Red Wood House are located within the Site boundary and are financially involved with the Proposed Development. At time of application submission, Nutberry Farm and Hillhead Cottage are also financially involved with the Proposed Development.

The immediate surrounding area is rural in nature, comprised predominantly of agricultural land with areas of native woodland and hedgerows.

The Site is bounded by the A75 trunk road to the south, a minor road to the east, and the B6357 to the north. Access to the Site is currently available via West Scales Farm and a gated entrance from the A75.

The Site is located within the 50km consultation zone for the Eskdalemuir Seismic Array, lying approximately 38km from the seismic array.

Ofcom's Spectrum Information Portal identifies two fixed telecommunication links within 500m of the Site.

The Chapelcross Nuclear Power Station, currently undergoing decommissioning, lies approximately 4.5km north west of the Site.

The Nutberry Peat Moss Works is located immediately to the north and west of the Site, though extraction operations here ceased in November 2024 after refusal of planning permission to extend its operational life.



The closest ecological designations within 5km of the Site include:

- Upper Solway Flats and Marshes SSSI – approximately 2km south;
- Solway Firth SPA, SAC, and Ramsar site – approximately 2km south;
- Raeburn Flow SSSI and SAC – approximately 3km north-east.

**Figure 4** shows ecological designations out to 20km from the Site.

The closest landscape designations within 20km of the Site include:

- Solway Coast Area of Outstanding Natural Beauty (AoNB) – approximately 3km south east;
- Kinmount Garden and Designated Landscape (GDL) – approximately 10km west;
- Solway Coast Regional Scenic Area (RSA) – approximately 11km west;
- Langholm Hills RSA – approximately 14km north east;
- Nith Estuary National Scenic Area (NSA) – approximately 15.5km west;
- Torthorwald Ridge RSA – approximately 16km north west;
- Rickerby Park Registered Park and Garden (RP&G) – approximately 16km south east;
- Dalston Road Cemetery RP&G – approximately 17km south east.

Within 10km of the Proposed Development, there are 83 designated cultural heritage assets, including one World Heritage Site (Hadrian's Wall), 429 Listed Buildings, 53 Scheduled Monuments, and one Conservation Area.

## 2.3 Site Selection Rationale

A number of factors were taken into account when considering whether this Site was appropriate for development, including;

- The Site is not located in a National Park or National Scenic Area (and therefore NPF4 is supportive of the location for renewable energy in principle).
- Initial desk-based studies and wind monitoring on Site suggest that there is a very good wind resource and the Site is available for renewable energy development.
- The Site is currently used for agriculture and does not support any statutory ecological or landscape designations.
- The closest residential properties were open to being financially involved in the Proposed Development.
- The Site benefits from existing access options via the A75 trunk road and local road network.
- The Site is located within an area which has considerable existing electrical infrastructure, with there being viable options to connect to the national grid (final connection route to be confirmed via a separate application).
- There Site has within it, and surrounding it, a dense expanse of existing trees and hedgerows, which help with the screening of some proposed infrastructure (e.g. Solar photovoltaic (PV) arrays, tracks, substation compound etc.).
- The Site is relatively flat, indicating minimal earthworks would be required during construction.



## 3.0 Design Policies

The preparation of this Design and Access Statement has regards to the National Planning Framework 4 (NPF4) and the Dumfries and Galloway Local Development Plan 2 (LDP2) (2019), including supplementary guidance.

The Proposed Development was designed with careful consideration of the national advice with regards to design, and the Development Plan (including supplementary guidance relevant to the Proposed Development).

**Chapter 4: Renewable Energy and Planning Policy** of the EIA Report, sets out the context of the relevant national and Development Plan policies (noting that NPF4 also forms part of the Development Plan). The Planning Statement provides an assessment of the Proposed Development against the Development Plan (including NPF4) and material considerations relevant to the decision-making process.

### 3.1 National Guidance

The most important national policy documents relating to the siting and design of the proposed development are NPF4, associated Planning Advice Notes (PANs) and the Onshore Wind Turbines: Planning Advice (Scottish Government, 2014).

NPF4 sets out significant and increased emphasis on the climate change and net zero agenda to bring together separate priorities and achieve sustainable development through three key themes: sustainable places, liveable places and productive places.

Part 1 of NPF4 will be supported by the planning and delivery of sustainable places; “where we reduce emissions, restore and better connect biodiversity”. It sets out that:

*“Scotland’s future places will be net zero, nature-positive places that are designed to reduce emissions and adapt to the impacts of climate change, whilst protecting, recovering and restoring our environment.”*

In terms of renewable energy generation, NPF4 states that:

*“A large and rapid increase in electricity generation from renewable sources will be essential for Scotland to meet its net zero emissions targets”;*

and:

*“Additional electricity generation from renewables and electricity transmission capacity of scale is fundamental to achieving a net zero economy and supports improved network resilience in rural and island areas”.*

It is clear within NPF4 that the generation of renewable energy is recognised as being of national importance as:

*“significant weight will be placed on the contribution of the proposal to renewable energy generation targets and on greenhouse gas emissions reduction targets.”*

NPF4 recognises that renewable energy generation through onshore wind farm development is a key part of the way in which the emissions reduction statutory outcome and the attainment of the legally binding net zero will be fulfilled. This can be afforded significant weight.

In relation to the siting of a wind farm, Policy 11: Energy, of NPF4, makes clear that wind farm development within National Parks and National Scenic Areas will not be supported. However, outside of these designations the policy states that all forms of renewable, low-carbon and zero emissions technologies will be supported. Specific reference is made to wind farms, solar arrays, energy storage such as battery and proposals including co-location of these technologies.



NPF4 Policy 11 also highlights that development proposals should show how various potential impacts have been addressed through design and mitigation. These potential impacts are as follows:

- “i. impacts on communities and individual dwellings, including, residential amenity, visual impact, noise and shadow flicker;*
- ii. significant landscape and visual impacts, recognising that such impacts are to be expected for some forms of renewable energy. Where impacts are localised and/or appropriate design mitigation has been applied, they will generally be considered to be acceptable;*
- iii. public access, including impact on long distance walking and cycling routes and scenic routes;*
- iv. impacts on aviation and defence interests including seismological recording;*
- v. impacts on telecommunications and broadcasting installations, particularly ensuring that transmission links are not compromised;*
- vi. impacts on road traffic and on adjacent trunk roads, including during construction;*
- vii. impacts on historic environment;*
- viii. effects on hydrology, the water environment and flood risk;*
- ix. biodiversity including impacts on birds;*
- x. impacts on trees, woods and forests;*
- xi. proposals for the decommissioning of developments, including ancillary infrastructure, and site restoration;*
- xii. the quality of site restoration plans including the measures in place to safeguard or guarantee availability of finances to effectively implement those plans; and*
- xiii. cumulative impacts.*

*In considering these impacts, significant weight will be placed on the contribution of the proposal to renewable energy generation targets and on greenhouse gas emissions reduction targets.”*

Other NPF4 policies are also engaged with respect to the above mentioned criteria and have been considered during the design of the proposed development.

Where specific potential impacts listed under NPF4 Policy 11 are not relevant to the proposed development due to the nature of the site, design parameters or absence of sensitive receptors, this is also addressed within the supporting assessment to ensure a proportionate appraisal of effects. In this case, the key topic areas considered relevant to the proposal include topography and ground conditions (including peat), landscape and visual sensitivities (including nearby residential receptors), ecology (including birds, protected habitats and species), hydrology (including watercourses and private water supplies), cultural heritage features, noise, and aviation and radar constraints. Each of these matters has been assessed through the project design and environmental appraisal process, with appropriate mitigation incorporated where necessary to ensure compliance with the requirements of NPF4 Policy 11 and to demonstrate that any potential effects are considered and addressed where feasible in the design of the proposed development.

### **3.2 Dumfries and Galloway Local Development Plan (LDP2)**

The LDP2 was adopted by D&GC in 2019, and details in terms of planning policies what is required of new developments in order for them to be considered acceptable and receive



approval. The policy considered most relevant to the proposed development is ‘Policy IN1 – Renewable Energy’.

LDP2 Policy IN1 sets out the Council’s support in principle for renewable energy developments, including wind and solar, where they are appropriately sited and designed. The policy stipulates that proposals demonstrate they:

- *Do not result in adverse impacts on the landscape, natural and historic environment, or residential amenity;*
- *Take account of cumulative impacts;*
- *Are compatible with other land uses;*
- *Contribute to national and local renewable energy targets;*
- *Are supported by appropriate mitigation measures where necessary.*

In addition to Policy IN1, the following policies are considered relevant to the proposed development:

- *Policy OP1 – Development Considerations*
- *Policy NE14 – Carbon Rich Soils*
- *Policy IN2 – Wind Energy*
- *Policy OP2 – Design Quality and Placemaking*
- *Policy T2 – Location of Development/Accessibility*

### **3.3 Supplementary Guidance**

Supplementary guidance documents associated with LDP2 provide more detail on the application of these policies. These include the Wind Energy Development supplementary guidance and its Wind Energy Landscape Sensitivity Study appendix.

The Dumfries and Galloway Wind Energy Development Management Considerations, and the Wind Energy Appendix C – Landscape Supplementary Guidance provides detailed planning advice on how wind energy developments should be assessed in the area. It explains the main factors that need to be considered, including landscape and visual effects, impacts on nearby homes, natural heritage, and cumulative effects with other wind farms. The supplementary guidance identifies how sensitive different landscape areas are to wind energy development, helping to show where wind turbines may be more or less suitable. Together, these documents help guide decisions on the siting, scale, and design of wind farms in a consistent way across the region.

The Proposed Development has been designed with consideration to this supplementary guidance. The landscape character of the site and surrounding area has been reviewed to understand its capacity to accommodate wind turbines. This has helped inform the layout and positioning of the development, including consideration of nearby homes, landscape sensitivities, and other wind farms in the wider area. Where potential effects were identified, the design has been adjusted where possible to reduce these impacts through appropriate siting and spacing. Overall, the proposal follows the key principles of the supplementary guidance and is designed to fit appropriately within the local landscape context.

### **3.4 Siting and Designing Wind Farms in the Landscape (2017)**

NatureScot has produced guidance ‘Siting and Designing Wind Farms in the Landscape’ (NatureScot, 2017) that focuses on the assessment of landscape and visual impacts of wind farms, and informs wind turbine design, layout, and siting.



The guidance reflects an improved understanding of the main landscape and visual issues related to wind farm development and provides guidance on the appropriate turbine design parameters and siting wind farms in relation to landscape character and value.

Whilst it does not address technical design considerations or other natural heritage issues, which are also significant for siting and design, it has been used alongside national and local policies to inform and support decision-making elements of turbine siting and design evolution.

## 4.0 Design Principles

The layout and design of the Proposed Development was considered as part of an iterative process aimed at reducing the potential environmental effects of the energy park whilst taking into account Site constraints and commercial requirements.

In accordance Regulation 5(d) of the Town and Country Planning (Environmental Impact Assessment) (Scotland) Regulations 2017, reasonable alternatives (in terms of project design, technology, location, size and scale and characteristics) of the Proposed Development were considered.

As part of the development process the Applicant has reviewed and discounted alternative infrastructure siting (turbines and access) and tip heights due to a variety of factors including environmental, planning, technical and commercial constraints.

In line with the DMP Regulations, all consultation responses pertaining to the design principles and concepts that have been applied to the Proposed Development – including further actions undertaken by the Applicant in response, are set out in full within **Chapter 6: Scoping and Consultation**, and specifically detailed within **Technical Appendix 6.1**.

- Consultation which related directly to the design principles applied to the Proposed Development included further consideration of: Access routing strategy;
- Bridges, structures and abnormal loads;
- Spatial extents of site-specific infrastructure (substation, BESS compound, access tracks);
- Consideration of radio link infrastructure;
- Consideration of National Air Traffic Services (NATS) safeguarding;
- Police Scotland recommendations on perimeter fencing, plant and equipment protection, crime prevention;
- SEPA recommendations on Ground Water Dependent Terrestrial Ecosystems (GWDTE) and abstractions, riparian buffers and flood risk; and
- Ministry of Defence (DIO) advice on Eskdalemuir seismological safeguarding and low-flying military aviation considerations.

### 4.1 Constraints, Policy and Design Objectives

The design of any renewable development is driven by the key objective of positioning infrastructure so that it can capture the maximum available energy as far as practical within a suitable area, informed by environmental and technical constraints. The main constraints considered during the design process included:

- topography and ground conditions (including peat);
- identified landscape and visual sensitivities (including nearby residential receptors);



- presence of birds, protected habitats and species;
- presence of watercourses, private water supplies and related infrastructure;
- presence of cultural heritage features;
- noise; and
- aviation and radar constraints.

Trying to avoid or minimise any adverse effects relating to the above constraints as a result of the Proposed Development, while ensuring the energy potential of the Site was maximised, was the main focus of the design process. It was considered that aiming to minimise potential negative effects on the above areas was also beneficial in aligning with the policy requirements of NPF4 and the wider Development Plan outlined in Section 3 of this **Design and Access Statement**. This also allowed early design objectives to be set which had principles rooted in clearly defined constraints and policy requirements.

**Table 1** matches the relevant site constraints and relevant Development Plan policy requirements, with the resulting design objectives for the Proposed Development.

**Table 1: Constraints, Policy Requirements and Design Objectives**

Site Constraint	Relevant Development Plan Policy Considerations	Resulting Design Objective
Topography and ground conditions (including peat).	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 5(d): Soils.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy NE13: Agricultural Soils.</li> <li>• Policy NE14: Carbon Rich Soils.</li> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	<p>Avoid siting proposed infrastructure in deep peat &gt;1.5m where possible. Where not possible applicable mitigation to applied if available / realistic e.g. floated track, crane pad orientation.</p> <p>Avoid siting proposed infrastructure on gradients of 14% or more, where possible and practical.</p>
Identified landscape and visual sensitivities (including nearby residential receptors).	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 11 ii: significant landscape and visual impacts, recognising that such impacts are to be expected for some forms of renewable energy. Where impacts are localised and/or appropriate design mitigation has been applied, they will generally be considered to be acceptable.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy NE1: National Scenic Areas.</li> <li>• Policy NE2: Regional Scenic Areas.</li> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	<p>Reduce visibility of proposed infrastructure, from the surrounding area, as far as is possible whilst ensuring a viable scheme.</p> <p>Reduce nighttime aviation lighting impacts.</p>
Presence of birds, protected habitats and species.	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 11 ix: biodiversity including impacts on birds.</li> </ul>	<p>Avoid removal of large numbers of trees / hedgerows.</p>



Site Constraint	Relevant Development Plan Policy Considerations	Resulting Design Objective
	<ul style="list-style-type: none"> <li>• Policy 3: Biodiversity.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy NE4: Sites of International Importance for Biodiversity.</li> <li>• Policy NE8: Trees and Development.</li> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	<p>Avoid siting proposed infrastructure on areas identified as having a high potential for Ground Water Dependent Terrestrial Ecosystems.</p>
<p>Presence of watercourses, private water supplies and related infrastructure.</p>	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 11 viii: effects on hydrology, the water environment and flood risk.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy NE11: Supporting the water environment.</li> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> <li>• Policy IN7: Flooding and Development.</li> <li>• Policy IN8: Surface water drainage and sustainable drainage systems.</li> </ul>	<p>Try to ensure that no proposed infrastructure is located within 50m of a watercourse or waterbody where possible.</p> <p>Keep the number of watercourse crossings to a minimum.</p>
<p>Presence of cultural heritage features.</p>	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 11 vii: impacts on historic environment.</li> <li>• Policy 7: Historic Assets and Places.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy HE1: Listed Buildings.</li> <li>• Policy HE2: Conservation Areas.</li> <li>• Policy HE3: Archaeology.</li> <li>• Policy HE4: Archaeological Sensitive Areas.</li> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	<p>Reduce visibility of proposed infrastructure, from nearby cultural heritage assets, as far as is possible whilst ensuring a viable scheme.</p>
<p>Noise.</p>	<p>NPF4:</p> <ul style="list-style-type: none"> <li>• Policy 11 i: impacts on communities and individual dwellings, including, residential amenity, visual impact, noise and shadow flicker.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	<p>Ensure that no nearby residential receptors would experience noise levels over the allowable limits.</p>
<p>Aviation and radar constraints.</p>	<p>NPF4:</p>	<p>Ensure that there is not an unacceptable impact on aviation</p>



Site Constraint	Relevant Development Plan Policy Considerations	Resulting Design Objective
	<ul style="list-style-type: none"> <li>• Policy 11 iv: impacts on aviation and defence interests including seismological recording.</li> </ul> <p>D&amp;GC LDP2:</p> <ul style="list-style-type: none"> <li>• Policy IN1: Renewable Energy.</li> <li>• Policy IN2: Wind Energy.</li> </ul>	radar assets and military low flying.

## 4.2 Embedded Mitigation

The findings of the technical and environmental studies undertaken for the EIA were used to inform the design of the Proposed Development and hence achieve a ‘best fit’ within the environment of the Site. Where potentially significant effects were identified during the design evolution, efforts were made to avoid these through evolving the design of the Proposed Development, ‘embedding’ mitigation into the design. ‘Embedded mitigation’ includes but is not limited to:

- considering the size and scale of the Proposed Development appropriate to the location;
- sensitive siting of the proposed infrastructure incorporating appropriate buffer distances from environmental receptors (including nearby residential properties) to avoid or reduce effects; and
- potential for up to 75m micrositing of infrastructure during construction to ensure the best possible location is chosen based on Site investigations.

Considerable effort was made to produce a Site layout which balances environmental, technical and economic considerations. During the EIA process, the multi-disciplinary team met to discuss the various issues which were identified as part of the constraints mapping process. The team identified the optimal locations for the proposed turbines and associated infrastructure.

## 5.0 Design Evolution

The evolution of the design and layout of the Proposed Development was an iterative constraint-led process driven by the technical and environmental studies undertaken for the EIA. It involved review of multiple potential Site layouts and the balance of environmental, technical and economic considerations.

Two of the key design iterations are shown on **Figure 5** and comprise the Scoping layout (Layout A), and the Design Freeze Layout (Layout B: the Proposed Development). These two iterations represent key stages of the layout evolution, however several further ‘interim’ layouts were considered throughout the refinement process.

The factors that were considered as part of the design evolution process to achieve the final layout are described in the following paragraphs.

### 5.1 Wind Turbine and Solar PV Array Layouts

#### 5.1.1 Layout A (Scoping Layout): 4 Turbines at 230m tip height and 44ha of solar

During the EIA Scoping stage, an initial layout (“Layout A”) was developed and submitted to D&GC in March 2025. This layout comprised:



- Four wind turbines, each with a blade tip height of up to 230m; and,
- An indicative 44ha area of solar PV arrays, positioned across the Site.

At this stage, only limited design refinement and environmental assessment had been undertaken, particularly with regards to the solar PV component.

Following responses from the planning authority, statutory consultees, and feedback received during the first round of public exhibitions, as well as further environmental and landscape feasibility assessment, it was determined that the scale of the turbines should be reduced. This led to subsequent design development, including a reduction in tip height from 230m to 200m, and ultimately to the refined “Design Freeze” layout (Layout B).

In line with the DMP Regulations, all consultation responses pertaining to the design principles and concepts that have been applied to the Proposed Development – including further actions undertaken by the Applicant in response, are summarised in Section 4 Design Principles of this DAS, set out in **Chapter 6: Scoping and Consultation**, and further detailed in **Technical Appendix 6.1**.

### **5.1.2 Layout B (Design Freeze – The Proposed Development): 4 Turbines at 200m tip height and 11.1ha of Solar**

The Design Freeze layout (“Layout B”) represents the refined and finalised configuration of the Proposed Development following the Scoping stage, public consultation, and completion of detailed environmental and technical assessments. This layout includes:

- Four wind turbines, each with a maximum blade tip height of up to 200m (reduced from 230m in the scoping layout)
- 11ha of Solar PV arrays, reduced significantly from the 44ha indicated at Scoping to minimise landscape, environmental and technical impacts.

This layout was developed following responses from D&GC, statutory consultees, and feedback from the second round of public exhibitions, alongside detailed assessments of wake loss, yield optimisation, and environmental constraints. The reduction in turbine tip height was considered beneficial with respect to noise and residential visual amenity.

Layout B incorporates:

- Necessary rotor spacing based on the Site’s prevailing south-westerly wind direction.
- The finalised extent and positioning of solar PV arrays, focusing them on the western part of the Site.
- Additional infrastructure that was not shown in the Scoping layout, including internal access tracks, a substation compound with BESS, temporary construction compounds, and a permanent met mast.

This Design Freeze layout represents the optimum fit of the Proposed Development within the environmental, technical, and commercial parameters of the Site.

## **5.2 Other Site Infrastructure**

### **5.2.1 Site Access**

Site access for the Proposed Development would be taken from the A75 trunk road, via the creation of a new junction designed specifically to accommodate construction traffic and abnormal load deliveries. The junction is proposed to operate as left-in, left-out only, avoiding right-turn manoeuvres across opposing traffic and improving road safety during construction. An area of hardstanding is proposed immediately east of the junction to safely



accommodate abnormal load overrun, particularly for wind turbine components. Following completion of abnormal load deliveries, this hardstanding area would be closed off using bollards or an agreed alternative.

Delivery of large turbine components is expected to originate from the King George V Dock in Glasgow, travelling south via the M8, M74, and M6 before approaching the Site via the A75. While this is the current assumption for assessment purposes, the final delivery route may be confirmed closer to construction. This route and its feasibility have informed the design and location of the access junction.

### 5.2.2 Site Tracks

The internal access tracks for the Proposed Development have been designed to provide safe and efficient access to all infrastructure while responding to the Site's topography, peat conditions, and environmental constraints. Track alignments aim to be as short and direct as practicable, while avoiding watercourse crossings, areas of deep peat, and steeper ground, thereby reducing the need for engineering works and minimising environmental effects.

Track gradients have been designed not to exceed 14%, in accordance with wind turbine manufacturer specifications to ensure the safe delivery and installation of turbine components. Although parts of the Site contain localised slopes exceeding this gradient, engineering design (including appropriate cut and fill) allows the final track formation to remain within acceptable limits.

Access tracks required for turbine construction would have a typical running width of 6 m, with additional width allowed at bends and junctions, and with space on either side for drainage and underground cabling. Tracks serving the solar PV arrays would be approximately 4m wide. These dimensions reflect the functional requirements for construction traffic and later operational access.

The track layout has also been informed by the need to avoid steep slopes, sensitive habitats, and deep peat, as confirmed through constraints mapping and geotechnical assessment. Tracks have been positioned to follow routes where peat is shallow and stable, helping to reduce excavation volumes and associated environmental impacts.

### 5.2.3 Borrow Pits

No borrow pits are proposed, as the Site's geology and topography do not provide suitable conditions for them.

### 5.2.4 Temporary Construction Compound

Up to two temporary construction compounds are proposed, one located in the north of the Site and one in the south. Their locations have been selected because they lie on suitable ground, in areas of shallow peat, and avoid sensitive habitats. Each compound would have a footprint of 45m × 75m and would accommodate site offices, welfare facilities, parking, storage areas, and laydown space. An indicative arrangement is shown in **Figure 3.12** of the EIA Report. These compounds would be removed following completion of construction.

### 5.2.5 Crane Pads

Each wind turbine would require a crane hardstanding to facilitate turbine assembly. These hardstandings would be located directly adjacent to each turbine and would have an estimated permanent footprint of approximately 99m × 38m, with additional space required for boom supports and blade storage during construction. An indicative crane hardstanding layout is shown in **Figure 3.7** of the EIA Report.



## 5.2.6 Substation Compound

A substation compound is proposed in the north of the Site, positioned in an area with suitable gradient, shallow peat, and away from sensitive habitats. The compound would accommodate the control building, associated high-voltage equipment, and the Battery Energy Storage System (BESS). It would be located more than 500m from the nearest residential property and set at least topple distance (200m) from the wind turbines. An indicative layout of the substation compound is shown in **Figure 3.9** of the EIA Report.

## 5.3 The Proposed Development Considered Against Design Objectives

The iterative design process has tried to ensure a balance between environmental and technical constraints, landscape and visual considerations and economic viability. Whilst giving due consideration to these various competing elements, the final layout forming the proposed development is considered to largely meet the design objectives detailed in **Table 1**. How the proposed development meets these design objectives is considered below in **Table 2**.

**Table 2: Design Objectives, Design Evolution and Design Outcomes**

Design Objective	Design Evolution	Outcome
<p>Avoid siting proposed infrastructure in deep peat &gt;1.5m where possible. Where not possible applicable mitigation to applied if available / realistic e.g. floated track, crane pad orientation.</p> <p>Avoid siting proposed infrastructure on gradients of 14% or more, where possible and practical.</p>	<p>Wind turbines have been relocated throughout the design process to ensure that they are located on peat less than 1.5m thick, and on gradients less than 14%.</p> <p>Throughout the design process the amount of other infrastructure (solar PV arrays, tracks, crane pads, construction compounds, substation, met mast) located on peat over 1.5m deep, or slopes greater than 14% has been reduced.</p>	<p>All proposed wind turbines are located in areas with less than 1m of peat.</p> <p>All other infrastructure, including the solar PV arrays, is located in areas with less than 1.5m of peat.</p> <p>All proposed infrastructure is located on ground where gradients do not exceed 14%, or where they do, the gradient in excess of 14% is localised.</p>
<p>Reduce visibility of proposed infrastructure, from the surrounding area, as far as is possible whilst ensuring a viable scheme.</p> <p>Reduce nighttime aviation lighting impacts.</p>	<p>The proposed wind turbines have been reduced in height from 230m to 200m.</p> <p>The proposed reduced aviation lighting scheme (see <b>Technical Appendix 14.1</b> of the EIA Report) would see only two of the four turbines requiring visible aviation lighting rather than all four.</p> <p>The solar PV arrays and substation compound (including BESS) have been located so as to take advantage of existing screening on Site in the form of trees and hedgerows. In addition to this, further screening is proposed in the form of new trees and hedgerows.</p>	<p>The nature of the Site and its surroundings (flat and expansive) means that the proposed wind turbines will be visible from surrounding areas extending out from the Site in all directions. The evolution of the Site design has however reduced day time and nighttime visibility where possible via a reduction wind turbine height, and a reduced aviation lighting scheme.</p> <p>The design evolution has seen the proposed Solar PV arrays and substation compound (including BESS) take advantage of existing screening in order to reduce their visibility from surrounding areas.</p>



Design Objective	Design Evolution	Outcome
		Proposed screening in the form of tree and hedgerow planting, reduces visibility from surrounding areas even further.
<p>Avoid removal of large numbers of trees / hedgerows.</p> <p>Avoid siting proposed infrastructure on areas identified as having a high potential for Ground Water Dependent Terrestrial Ecosystems (GWDTE).</p>	<p>The location of proposed infrastructure, including the orientation of access tracks, has been refined so as to reduce the number of trees and amount of hedgerow that required removal in order to facilitate the Proposed Development.</p> <p>The location of proposed infrastructure has been refined in order to avoid areas mapped as potential GWDTE habitats as far as possible.</p>	<p>The Proposed Development would result in the removal of a relatively small number of trees (&lt;75) and a combined area of approximately 0.62ha spread throughout the Site.</p> <p>There would be approximately 0.012ha of native hedgerow loss as a result of the Proposed Development.</p> <p>The Proposed Development includes for the planting of approximately 1.91ha of native trees and 0.046ha of hedgerows.</p> <p>The Proposed Development largely avoids impacting areas mapped as potential GWDTE habitats, however, where it does, these areas have been assessed (see <b>Chapter 10</b> of the EIA Report) as not predominantly sustained by groundwater.</p>
<p>Try to ensure that no proposed infrastructure is located within 50m of a watercourse or waterbody where possible.</p> <p>Keep the number of watercourse crossings to a minimum.</p>	<p>The location of proposed infrastructure has been refined in order to largely avoid siting infrastructure within 50m of watercourses and minimising watercourse crossings.</p>	<p>The access track as it enters the Site and heads north passes within 50m of watercourses and results in the need for one watercourse crossing. Two of the solar PV arrays have areas that are just within the 50m buffer to nearby watercourses.</p>
<p>Reduce visibility of proposed infrastructure, from nearby cultural heritage assets, as far as is possible whilst ensuring a viable scheme.</p>	<p>The proposed wind turbines have been reduced in height from 230m to 200m.</p> <p>The proposed reduced aviation lighting scheme (see <b>Technical Appendix 14.1</b> of the EIA Report) would see only two of the four turbines requiring visible aviation lighting rather than all four.</p> <p>The solar PV arrays and substation compound (including BESS) have been located so as to take advantage of existing</p>	<p>The nature of the Site and its surroundings (flat and expansive) means that the proposed wind turbines will be visible from surrounding areas extending out from the Site in all directions. This includes nearby heritage assets. However, the design refinements do result in reduced visibility from heritage assets when compared to the initial Site proposals.</p>



Design Objective	Design Evolution	Outcome
	screening on Site in the form of trees and hedgerows. In addition to this, further screening is proposed in the form of new trees and hedgerows.	
Ensure that no nearby residential receptors would experience noise levels over the allowable limits.	Proposed Site infrastructure has been moved so as to ensure no nearby residential receptors experience noise levels over the allowable limits.	No nearby residential receptors experience noise levels over the allowable limits.
Ensure that there is not an unacceptable impact on aviation radar assets and military low flying.	Consultation with aviation consultees has confirmed that there should be no unacceptable impact on aviation radar assets and military low flying.	Consultation with aviation consultees has confirmed that there should be no unacceptable impact on aviation radar assets and military low flying.

## 6.0 Proposed Development

The Proposed Development is described in **Chapter 3** of the EIA Report. An outline Construction and Environmental Management Plan (CEMP) is contained within the EIA Report as **Technical Appendix 3.1**. The layout of the Proposed Development is contained in **Figure 3.1**. In summary, the Proposed Development would comprise:

- four wind turbines including internal transformers, with blade tip heights of up to 200m;
- four turbine foundations (approximately 27m in diameter) and associated crane harstandings (approximately 99m x 38m and 1m in depth, with additional areas for the boom supports and blade storage trestles);
- pp to 44ha of bi-facial solar PV panels mounted on metal frames, with up to 50,000 tracking modules reaching 4.5m in height at peak tilt, including inverters, combiner boxes and transformer stations;
- approximately 5.1 km of new access track with a typical running width of 6 m (wider at bends and junctions) and associated drainage;
- underground cabling along access tracks to connect the turbine, solar panel and onsite electrical substation;
- one onsite electrical substation which would accommodate a 33kV Switchgear to collect electricity from different parts of the Site. The substation compound would have an area of approximately 75m × 100m and would include a control and metering buildings (approximately 16 m × 11 m and 5 m high), as well as up to 12MW of battery storage (battery storage unites measuring approximately 6.1m x 2.5m x 2.9m).
- two temporary construction compounds (45m x 75m);
- one permanent anemometry mast (up to 122.5m in height) and one temporary anemometry mast to monitor wind conditions.



## 7.0 Public Access

### 7.1 Public Access – Pedestrian

Public access to the Site would be restricted during the construction of the Proposed Development for obvious health and safety reasons due to construction activities, the movement of heavy plant and the erection of wind turbines. When operational, however, there would be no formal access restrictions beyond the fenced off solar PV arrays and substation compound, and members of the public would be able to access the Site on foot and make use of the access tracks in accordance with the provisions of the Land Reform (Scotland) Act 2003.

During periods of maintenance, access by the public could be restricted depending on the nature of the maintenance activity.

### 7.2 Public Access – Vehicular

Once the Proposed Development is operational (if consent is granted) vehicular access would be limited to individuals directly involved in the maintenance of the Proposed Development, the landowners and estate workers, and emergency vehicles.

## 8.0 Conclusion

The layout of the Proposed Development has evolved through an iterative EIA and design process, taking account of feedback from statutory consultees and the local community. Constraints identified throughout the EIA process were avoided, and potential impacts of the Proposed Development avoided or reduced by the iterative design. EIA studies were used to achieve a 'best fit' within the environment of the Site and its surroundings.

The final layout of the Proposed Development comprises four wind turbines with tip heights of 200m and three solar PV arrays covering up to a combined 11.1ha in area. This is considered to be an appropriate number and size of wind turbines and solar PV modules that can be accommodated by the Site, balancing both energy yield and contribution towards renewable energy generation targets, with key planning, technical and environmental constraints.

## 9.0 References

UK Government (1997). Town and Country Planning (Scotland) Act 1997 (as amended). Available at: <https://www.legislation.gov.uk/ukpga/1997/8/contents>

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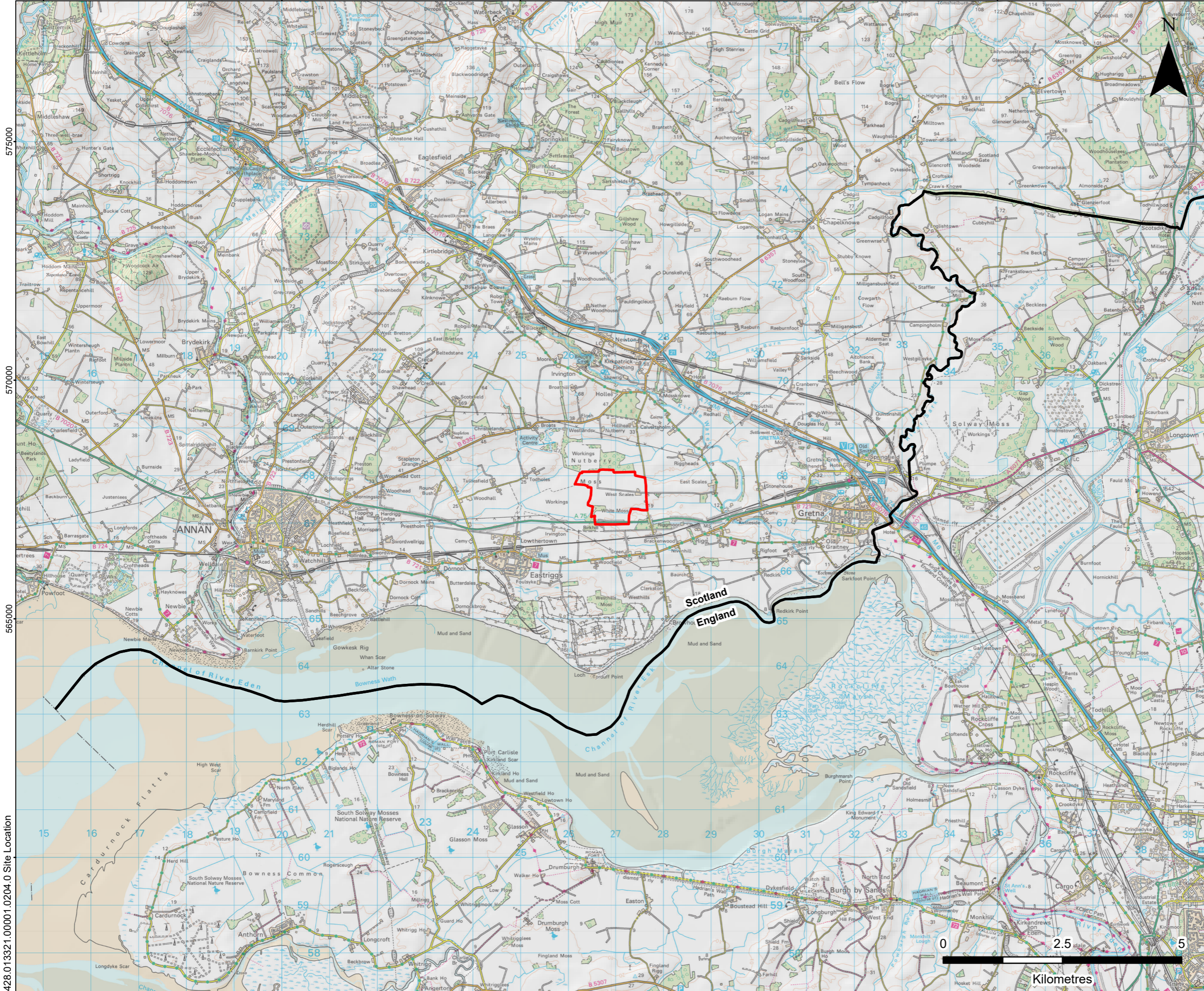
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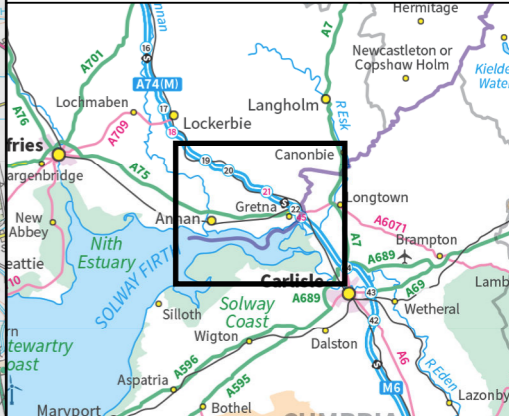
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**LEGEND**

-  Site Boundary
-  Country Boundary



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**WEST SCALES ENERGY PARK  
DAS REPORT  
SITE LOCATION  
FIGURE 1**

Scale 1:75,000 @ A3 Date MARCH 2026

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326500

327000

327500

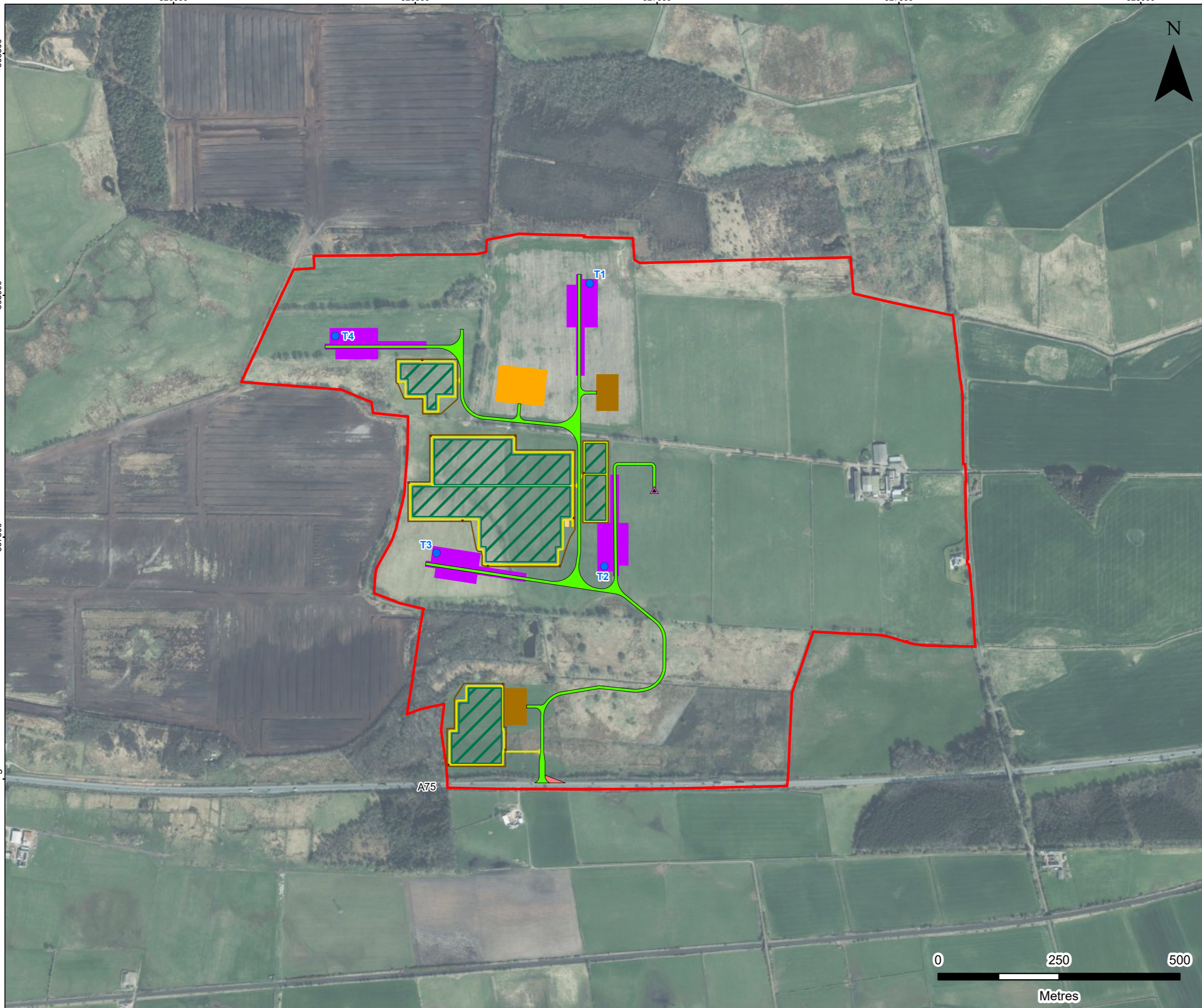
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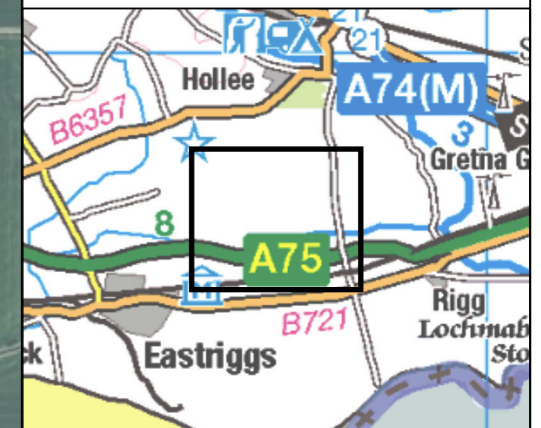
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428.013321.00001.0205.0 Aerial site and surroundings



LEGEND	
	Site Boundary
	Proposed Turbine Location
	Proposed Permanent Met Mast Location
	Proposed Access Track (6 m Wide)
	Proposed Abnormal Indivisible Load Vehicle Overrun Area
	Proposed Crane Pad
	Proposed Temporary Construction Compound
	Proposed Substation Compound
Proposed Indicative Solar Infrastructure	
	Proposed CCTV
	Proposed Fence
	Proposed Transformer
	Proposed Solar PV Array
	Proposed Access Track

**Note:** Point features are not drawn to scale in this figure.



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WEST SCALES ENERGY PARK  
 DAS REPORT  
 AERIAL PHOTOGRAPH OF THE  
 SITE AND SURROUNDINGS

**FIGURE 2**



Scale 1:7,500 @ A3	Date MARCH 2026
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326500


327000

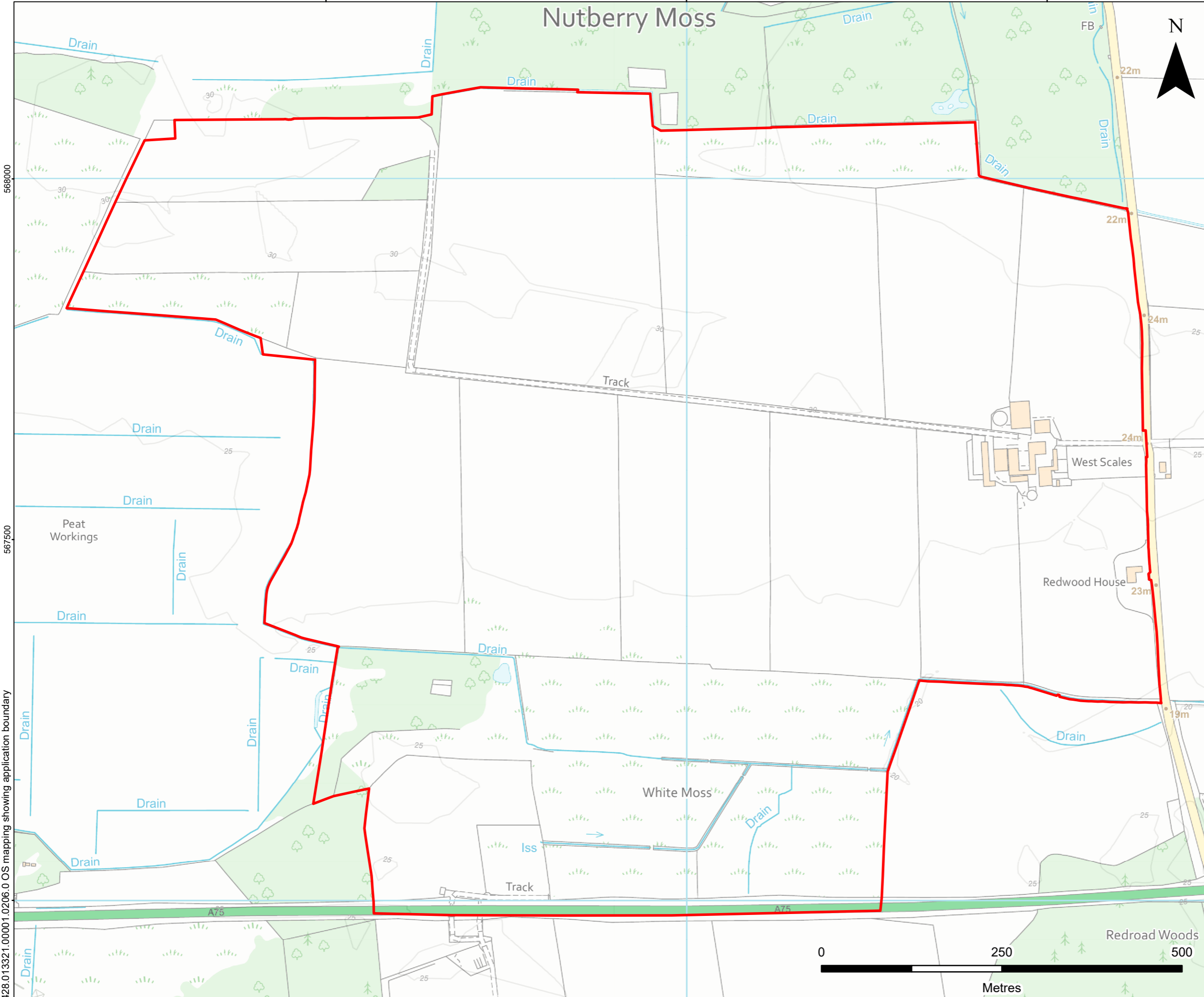
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# Nutberry Moss



### LEGEND

 Site Boundary



**Eurowind Energy™**

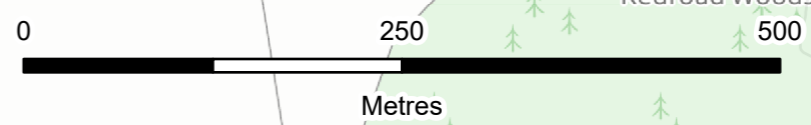


**WEST SCALES ENERGY PARK**

**DAS REPORT**

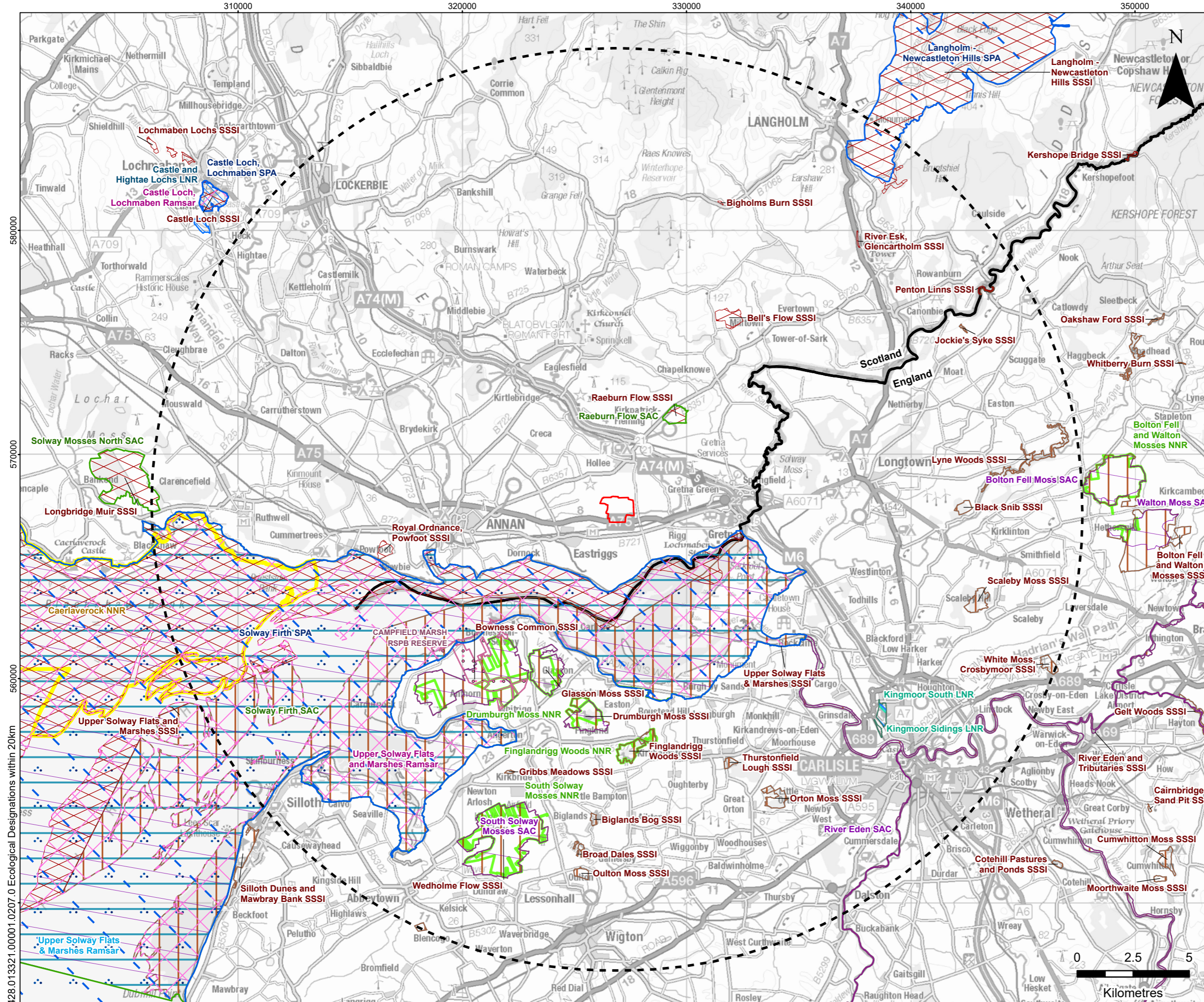
**OS MAPPING SHOWING APPLICATION BOUNDARY**

**FIGURE 3**



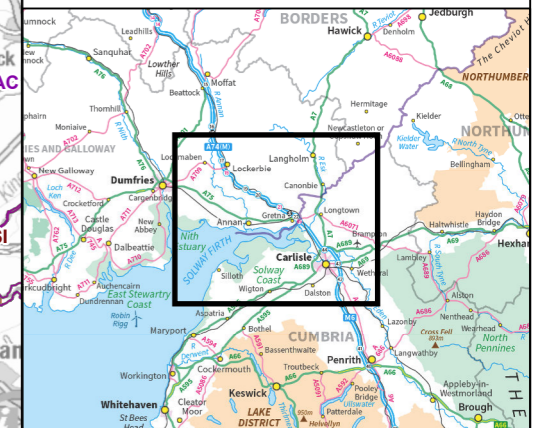
Scale 1:5,000 @ A3 Date MARCH 2026

428.013321.00001.0206.0 OS mapping showing application boundary



**LEGEND**

- Site Boundary
- Site Boundary 20 km Buffer
- Scotland Ecological Designations**
  - Special Protection Area (SPA)
  - Special Area of Conservation (SAC)
  - Ramsar
  - Site of Special Scientific Interest (SSSI)
  - Local Nature Reserve (LNR)
  - National Nature Reserve (NNR)
  - RSPB Reserve
- England Ecological Designations**
  - Special Protection Area (SPA)
  - Special Area of Conservation (SAC)
  - Ramsar
  - Site of Special Scientific Interest (SSSI)
  - Local Nature Reserve (LNR)
  - National Nature Reserve (NNR)
  - RSPB Reserve
- Country Boundary



428.013321.00001.0207.0 Ecological Designations within 20km

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**SLR**

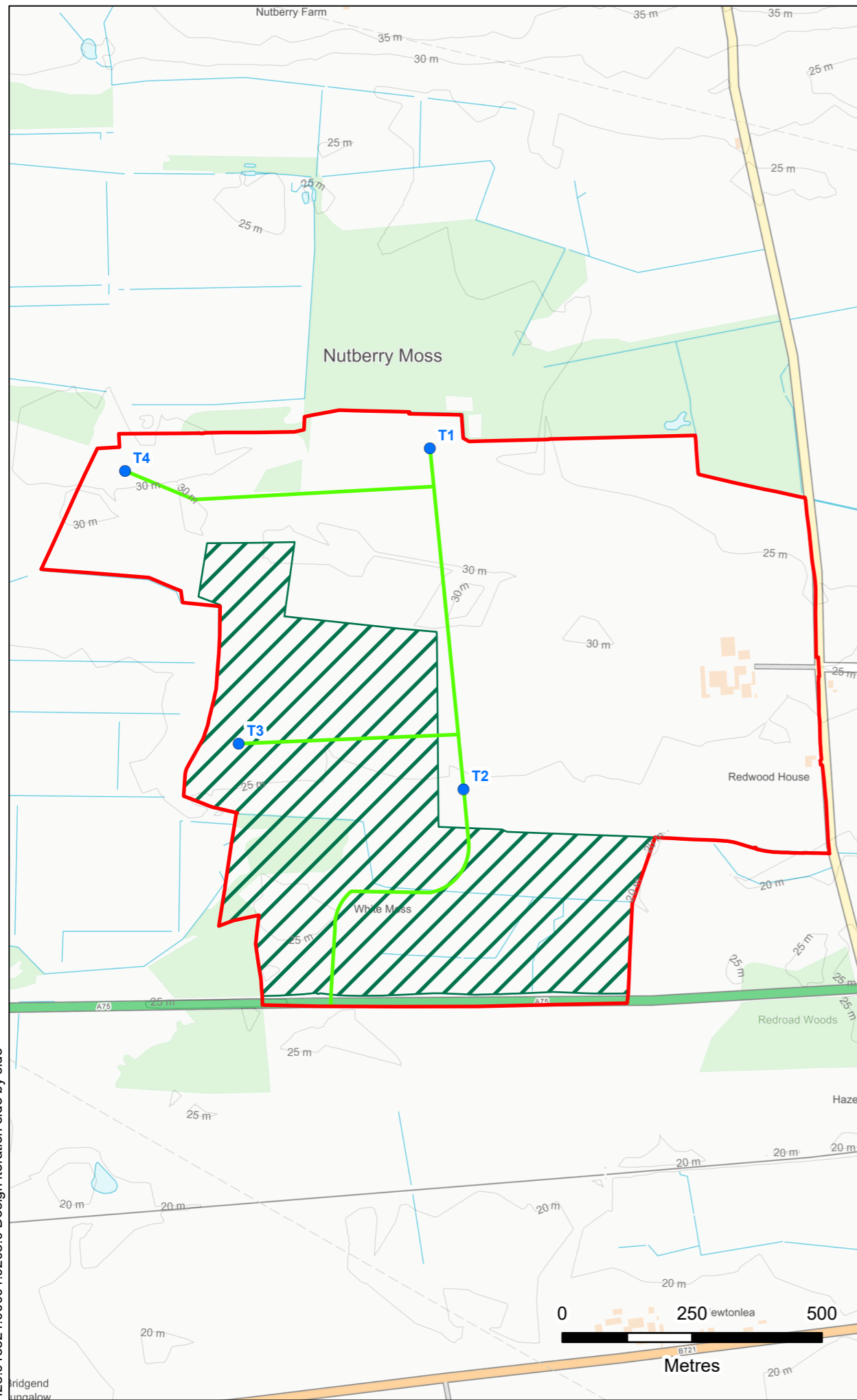
**WEST SCALES ENERGY PARK**

DAS REPORT

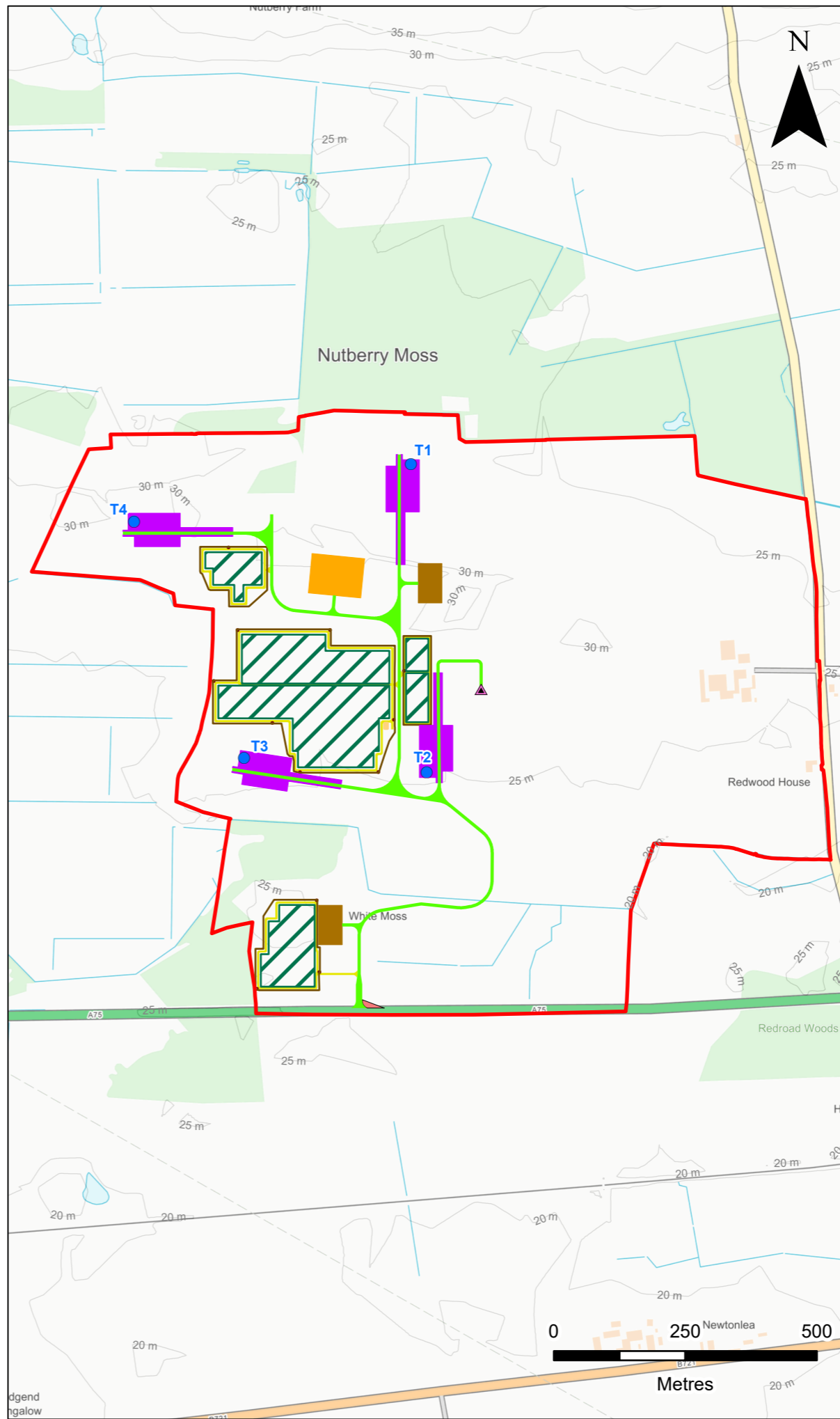
**ECOLOGICAL DESIGNATIONS WITHIN 20 KM**

**FIGURE 4**

Scale 1:160,000 @ A3 Date MARCH 2026



**LAYOUT A: SCOPING LAYOUT**



**LAYOUT B: FINAL LAYOUT**

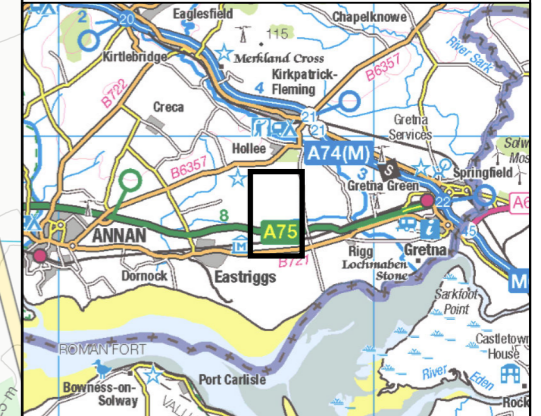
**LEGEND**

- Site Boundary
- Proposed Turbine Location
- ▲ Proposed Permanent Met Mast Location
- Proposed Access Track (6 m Wide)
- Proposed Abnormal Indivisible Load Vehicle Overrun Area
- Proposed Crane Pad
- Proposed Temporary Construction Compound
- Proposed Substation Compound

**Proposed Indicative Solar Infrastructure**

- Proposed CCTV
- Proposed Fence
- Proposed Transformer
- Proposed Solar PV Array
- Proposed Access Track

**Note:** Point features are not drawn to scale in this figure.



**WEST SCALES ENERGY PARK**  
**DAS REPORT**  
**DESIGN ITERATION SIDE BY SIDE**

**FIGURE 5**

Scale: 1:10,000 @ A3      Date: FEBRUARY 2026

428.013321.00001.0208.0 Design iteration side by side

