



BIDWELLS

**COIRE GLAS GRID  
CONNECTION  
PROJECT: 400KV OHL  
WOODLAND REPORT  
FLS GLENGARRY**

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## 1.0 Woodland Characteristics

Glengarry Woodland is owned by the Scottish Ministers and managed by Forest and Land Scotland (FLS) – West Forest District. The woodland is accessed from the A87 approximately 2 miles west of Invergarry, (Please refer to Location plan in Appendix 1). This woodland has Scots pine as its principal conifer species. The proposed Over Head Line (OHL) alignment impacts significantly between towers 38-44.

The forest is managed as per the Glengarry Land Management Plan. The primary objective of this area within the LMP is to restore, regenerate and expand the Caledonian pinewood reserve.

### **Towers 38-40**

Mixed commercial plantation, Sitka spruce (SS), Lodgepole pine (LP), Scots pine (SP) and Douglas fir (DF). Large areas of the commercial woodland have been thinned and managed under Continuous Cover Forestry (CCF). Areas classed as 2a within the Ancient Woodland Inventory (AWI) and Plantation on Ancient Woodland Site (PAWS), minimal indicators of ancient woodland present within the commercial plantations.

Popular footpath running along the river Garry with a significant number of mature and naturally regenerating oaks. SSEN to confirm if these can be managed using crown reduction rather than removal.

There will some additional felling required out with the operational corridor to maintain stability of the remaining crop.

The LMP identifies this compartment to be managed under Low Impact Silvicultural Systems (LISS).



Mature and natural regenerating oak along the river Garry footpath.



Previously thinned commercial stand of SS, DF And SP at Tower 38.



Mature SP and naturally regenerating SS and LP in previously cleared area. Site will be mulched to allow creation of new access track.





Native broadleaves and semi-mature/mature SS, LP and larch commercial woodland at tower 39. Despite the semi open habitat, additional felling will be required out with the OC to the south, to create a green edge.

#### **Towers 40-44**

Mixed Scots pine and native broadleaved woodland. Classed under the AWI as 2a. Sections recorded within the Caledonian Pinewood Inventory (Glengarry). Managed under CCF. The Scots pine woodland is made up of commercially planted and naturally regenerating semi mature pine and scattered mature 'granny' pines. The birch woodland is an open scattered habitat expanding onto the open bog areas. Due to the open habitat, no additional felling will be required out with the OC. Low ground pressure mulching is recommended within the broadleaved areas.



Mature and semi-mature Scots pine woodland, semi-open habitat creates a natural wind firm edge along OC corridor.



Naturally regenerating native broadleaves.



Naturally regenerating native broadleaves.

## 2.0 Development Requirements

The standard tower dimensions for the project have a width of 17.1 m at the widest part of the Tower (from one conductor to the other) in addition to this the vicinity zone from each conductor is 5 m on each side. The infrastructure and minimum clearance distance is therefore 27 m (13.5m either side of the centre line) and this has been utilised to calculate the area of the corridor occupied by infrastructure. In some cases, such as angle towers the requirement will be in excess of this distance however the average minimum distance has been used in this assessment.

A resilient Operational Corridor will be reduced to 25m in width either side of the line within the AWI areas. This will be increased to 45m in width either side of the line within the commercial woodlands.

The forest is served by a well-constructed Class A forest road running through the woodlands, access from the A87.

These roads can serve as the main arterial construction route. Tree felling and timber extraction will be able to utilise existing tracks, prior to any construction activity.

Stump removal and residue mulching will be required for the installation of tracks within the operational corridor and at each pole structure construction compound for the formation of a temporary crane pad.

### 3.0 Wind Blow Risk

There is a low wind blow risk across much of the woodland (wind throw hazard class assessed at 10). As detailed in section 1, there are several tower spans where the proposed OC opens a green edge to the prevailing wind necessitating additional felling out-with the OC to reach a stable edge.

In areas where the trees are smaller due to age or exposure then the wind blow risk is reduced along with the requirement for additional felling to wind firm boundaries.

### 4.0 Woodland Management Impact

The line route will create additional challenges for the future management of the forest as it dissects existing management units and introduces an electrical hazard. The constraint associated with the electrical hazard will be reduced by regular maintenance of the Operational Corridor which will avoid the incidences of “Red Zone” trees (reference FISA 804 “Electricity at Work: Forestry”). As part of construction works, dedicated crossing points will be discussed once the overhead line has been constructed, thus ensuring safe future working within the woodland.

The total loss of Native Broadleaved woodland resulting from the proposed alignment is 4.06 hectares.

### 5.0 Mitigation Opportunities

The chosen alignment has gone a long way to mitigating impact on this forest. The significant reduction in the operational corridor within the AWI and broadleaved areas will reduce the impact on the nationally important native woodland within this area. The native upland birch and oak woodland is likely to regenerate into the OC in vicinity of the tower post construction and present an opportunity to replace some of the woodland loss from tower/line construction.

**a. Restructuring**

Clear felling and restocking of Glengarry is ongoing and will continue to be



undertaken by the landowner in the future, regardless of development felling. It is recognised that the proposed route will result in areas being brought into felling, that would otherwise have been managed as LISS. The felling of the Operational Corridor for the development, will create a new green edge, allowing the landowner to carry out future clear fell more safely in proximity to the new power line.

**b. Restocking**

Restocking will be carried out by the landowner in all areas out-with the Operational Corridor with suitable species to continue the commercial viability of the forest. It is anticipated that native broadleaved regeneration is likely to occur within the Operational Corridor from towers 38-44 due to the presence of mature birch, oak and Scots pine woodlands. Any opportunity to restock within the Operational Corridor will be discussed with FLS following felling to link in with adjacent planned felling coupes where appropriate.

Refer to appendix 3 for plan showing on site restocking.

## 6.0 Nett Effect/Summary

Tower Span	Operational Requirements
38-40	Gross area of Operational Corridor felling approved via the Section 37 and undertaken by SSEN - <ul style="list-style-type: none"> <li>Native woodland – fell to windfirm edge.0.22ha</li> <li>Commercial woodland – 5.67ha</li> </ul>
40-44	Gross area of Operational Corridor felling approved via the Section 37 and undertaken by SSEN - <ul style="list-style-type: none"> <li>Native woodland – fell to windfirm edge.3.74ha</li> <li>Commercial woodland – 0.75ha</li> </ul>
Felling for new access tracks	Commercial woodland – 0.48ha
Additional area of recommended felling outside OC for wind throw or forest design purposes (Landowner to fell under forest plan revision or felling licence)	Clear fell to windfirm edge – SS/SP – 2.87ha
<b>Compensatory Planting Options</b>	
Potential onsite replacement planting/ regeneration within OC	3.26 ha
Nett effect (Loss of Woodland)	6.44 ha
<b>Operational Works</b>	
	<b>Total Area (ha)</b>
Clear fell harvesting	10.86
Felling out with OC	2.87
<b>TOTAL</b>	<b>13.73</b>



## 7.0 Compensatory Planting

The total amount of net felling requiring compensation under the Control of Woodland Removal Policy is 6.44 hectares.

In order to provide a greater balance limiting long term impacts on forestry interests it is proposed that the majority of this woodland loss is compensated via offsite compensatory planting. It is proposed that full details of the areas subject to this offsite compensatory planting is notified to Scottish Forestry prior to energising the Overhead Line.

The decommissioning of the existing 132Kv OHL will allow potential opportunities for compensatory planting where practical and in agreement with the landowner.

# APPENDIX 1

# LOCATION PLAN

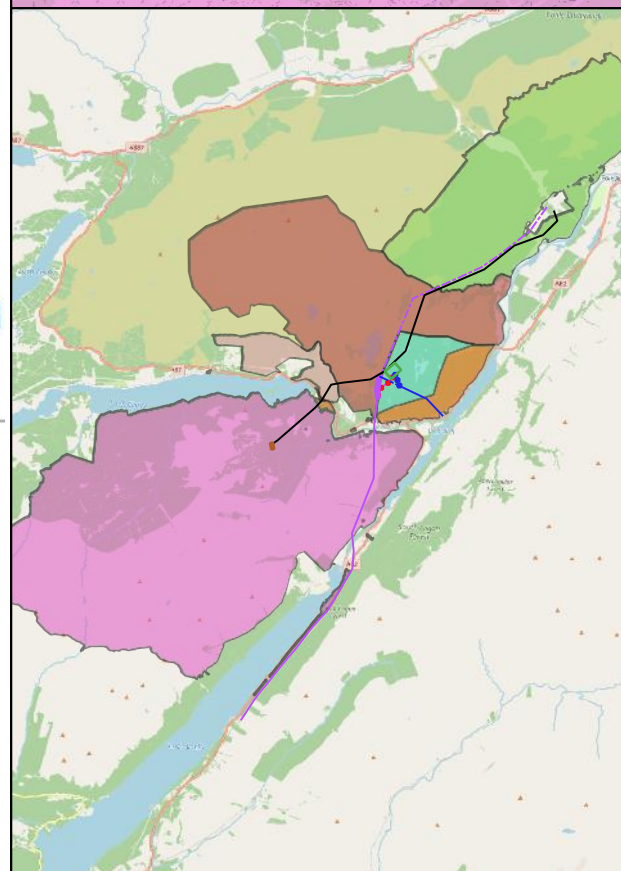
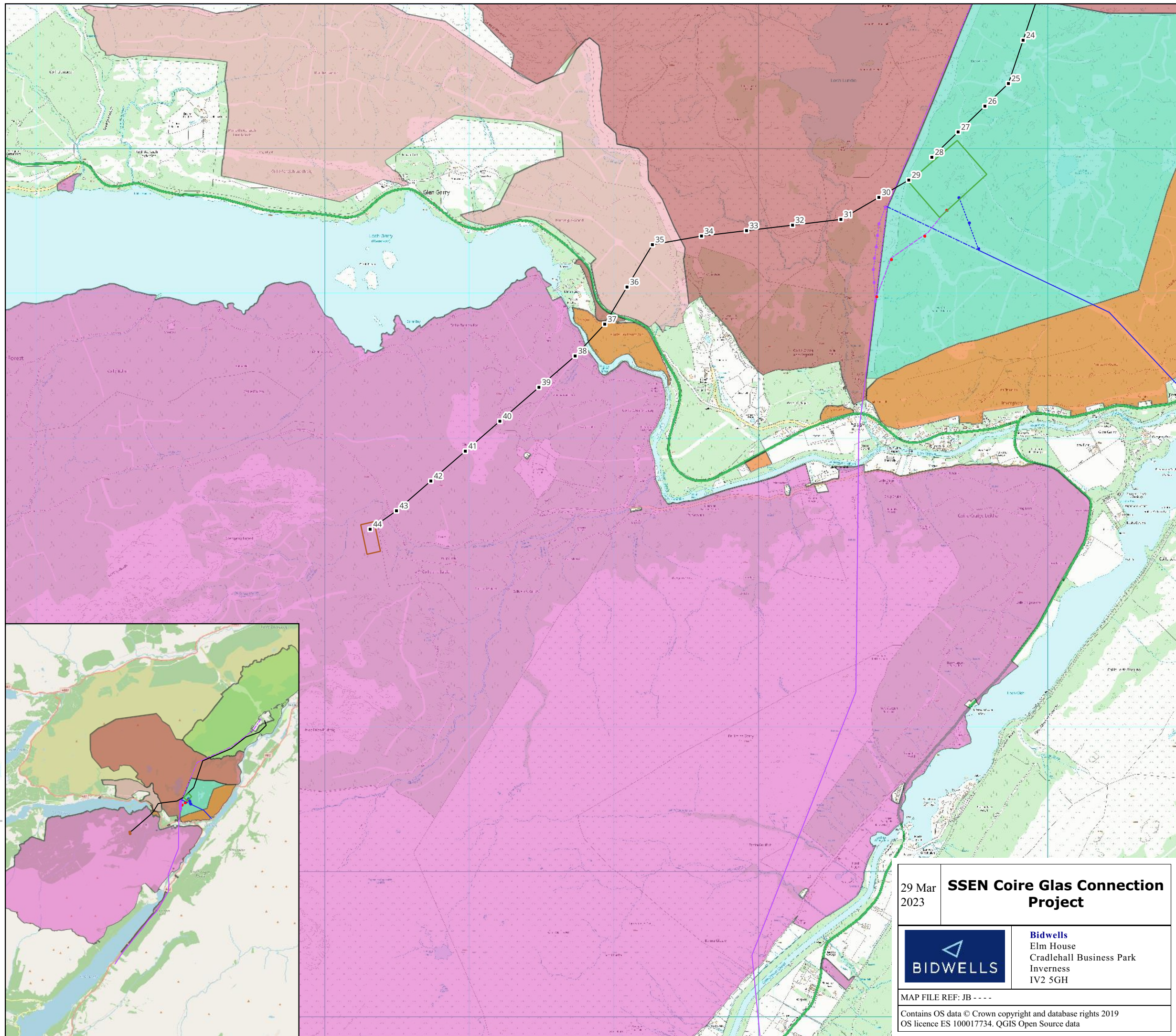
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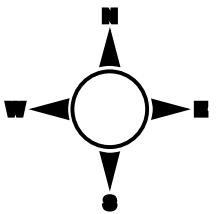
Appendix 1  
FLS Glengary Woodland Location Plan

Legend

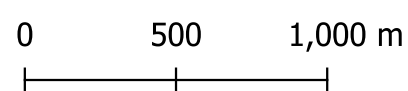
- Proposed\_Steel\_Lattice\_Tower
- Proposed OHL Alignment (Steel Lattice Towers)
- Existing 132 kV Invergarry Tee OHL (Steel Lattice Towers)
  - New Permanent Trident Steel Pole Location
  - to be retained
  - to be Diverted
  - to be dismantled
- Existing 132 kV Fort Augustus to Fort William OHL (Steel Lattice Towers)
  - temporary Trident wood pole locations
  - temporary OHL diversion
  - New permanent Steel Lattice Tower Locations
  - To Be Retained
  - To be diverted into the proposed Loch Lundie Substation
  - to be dismantled
- Proposed Loch Lundie Substation Platform
- Proposed Coire Glas Switching Station Platform
- FLS
  - AUCHTERAWE FARM
  - GLENGARRY II
  - GLENGARY DEER FOREST
  - DRYNACHAN
  - Kilfinnan and Munerigie
  - Aberchalder Estate



TRANSMISSION



Scale (A3 page): 1:25,000



29 Mar 2023	<b>SSEN Coire Glas Connection Project</b>
	<b>Bidwells</b> Elm House Cradlehall Business Park Inverness IV2 5GH
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# APPENDIX 2

## PLAN SHOWING OPERATIONAL CORRIDOR AND FELLING

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Appendix V4 14.1  
 FLS Glengarry Woodland  
 App 2 OC Felling Requirements  
 Towers 38-44

Legend

FLS Glengarry Operational Requirements Towers 38-44

- OC Felling 10.48ha
- Felling out with OC 2.87ha
- New Track felling 0.48ha
- Proposed Steel Lattice Tower
- Proposed OHL Alignment (Steel Lattice Towers)
- New Track
- New Track Temporary
- Existing Track No Upgrades
- Existing Track To Be Upgraded
- Proposed Coire Glas Switching Station Platform

Native Woodland Survey Scotland

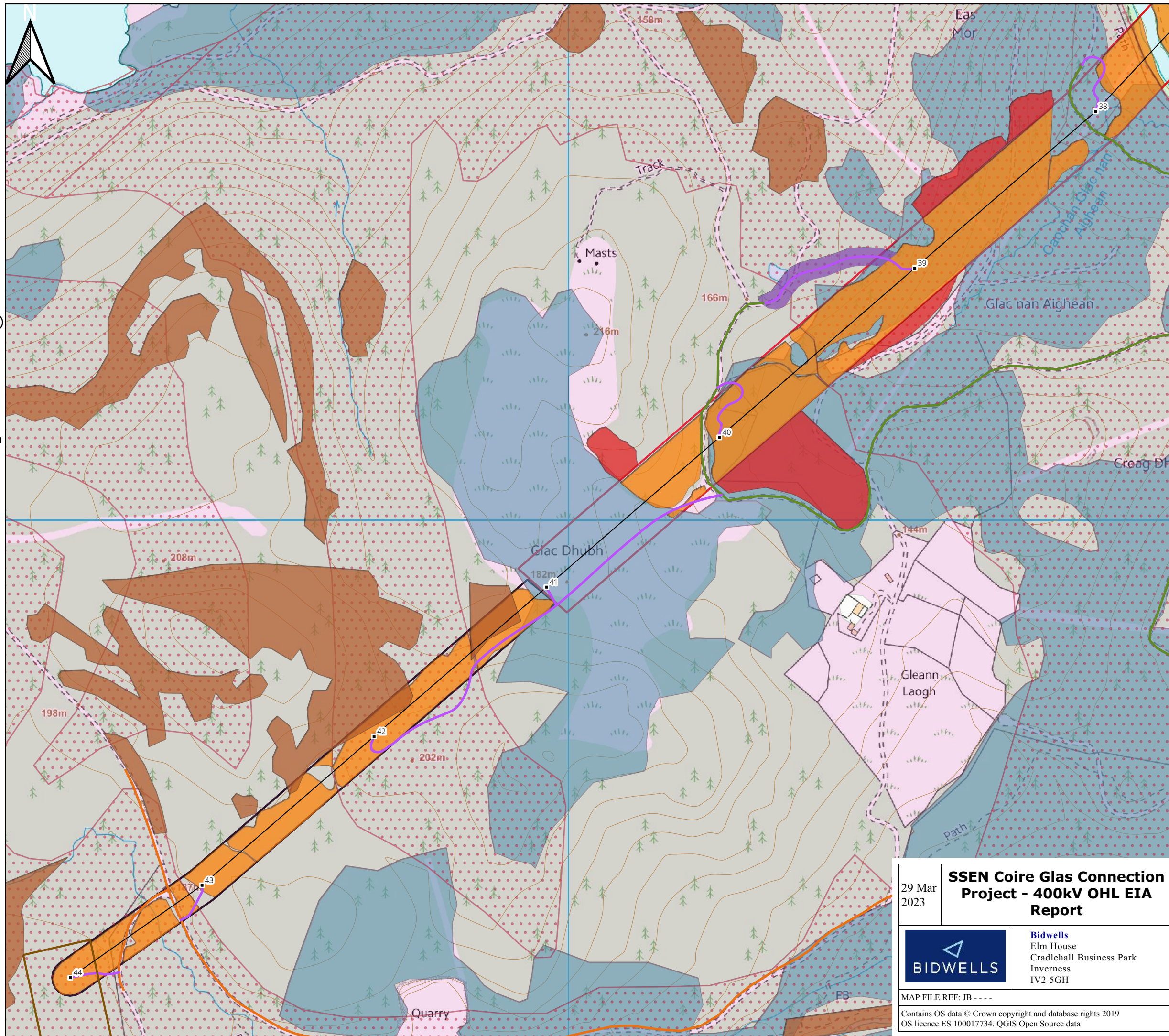
- PAWS

Ancient Woodland Inventory

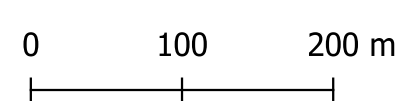
- 1a
- 2a
- 2b
- 3
- Glengarry Caledonian Pinewood (CPI)
- 90m OC
- 50m OC

FLS Boundary

- GLENGARRY DEER FOREST



Scale (A3 page): 1:5,000



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# APPENDIX 3

## PLAN SHOWING RESTOCKING

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Appendix V4 14.1  
 FLS Glengarry Woodland  
 App 3 Restocking Plan

Legend

FLS Glengarry Restock Plan

- Natural Regeneration
- Proposed Steel Lattice Tower
- Proposed OHL Alignment (Steel Lattice Towers)
- Proposed CoireGlas Switching Station Platform
- 50m OC
- 90m OC
- Glengarry Caledonian Pinewood

Ancient Woodland Inventory

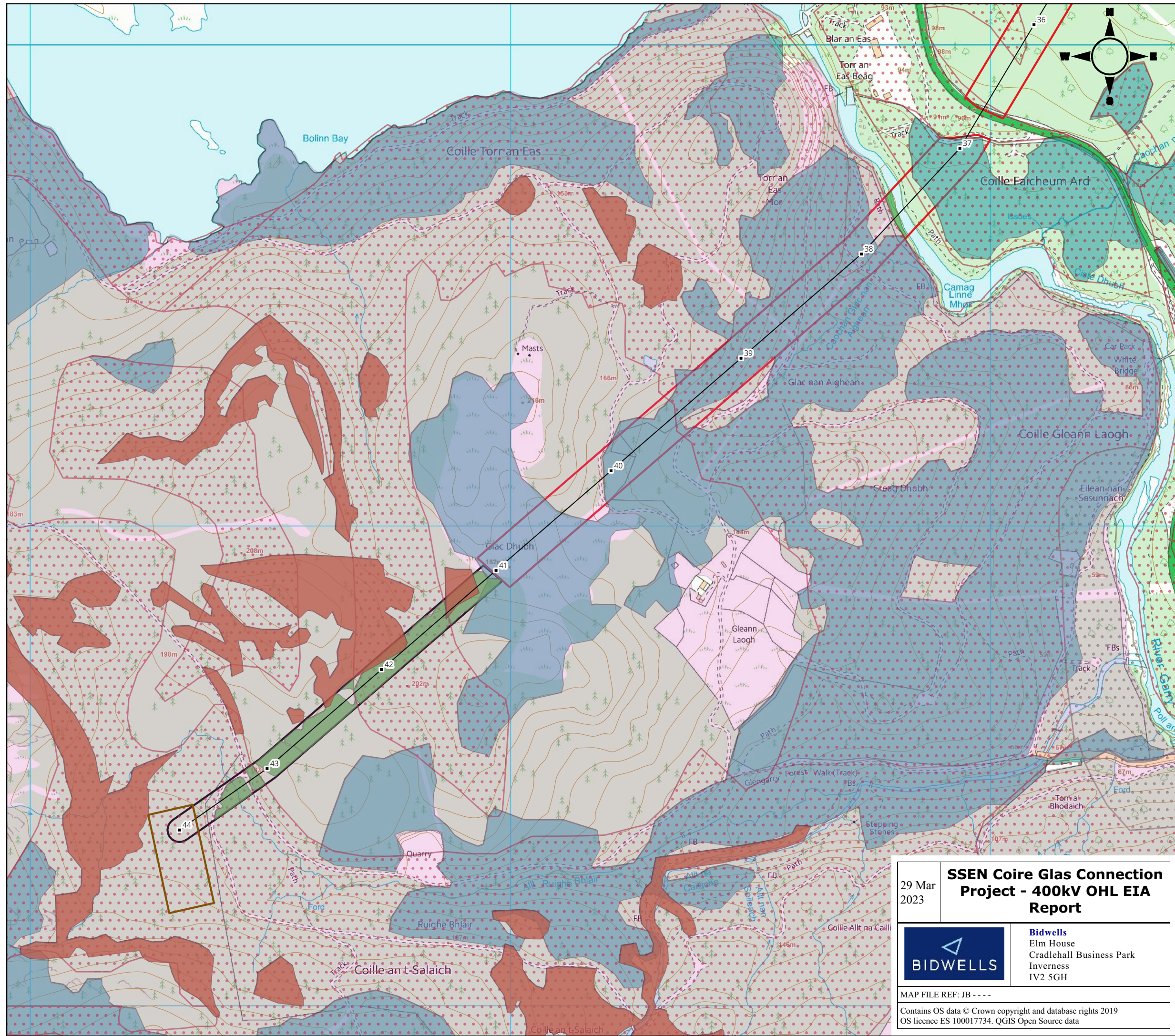
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- 2a
- 2b
- 3

Native Woodland Survey Scotland

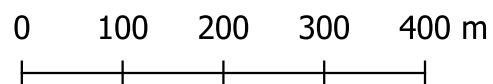
- PAWS

FLS Boundary

- GLENGARRY DEER FOREST



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