



An  
Bord  
Pleanála

## Inspector's Report ABP-321855-25

---

### Development

Proposed tail fed substation with associated grid connection to connect to 220/110KV Kells Substation.

### Location

Townlands of Ballyloo, Linkardstown, Killyballyhue, Graiguenspiddoge, Castletown, Moyle Big, Kellistown West and Kellistown East, Co Carlow.

### Planning Authority

Carlow County Council

### Type of Application

Pre-application consultation under section 182E of the Planning and Development Act 2000, as amended

### Prospective Applicant

Ballyloo Solar Farm Limited

### Inspector

Brid Maxwell

## **1. Introduction**

- 1.1 The Board received a request on 10<sup>th</sup> February 2025 from the prospective applicant, Ballyloo Solar Farm Limited, to enter into pre-application consultations under Section 182E of the Planning and Development Act, 2000, as amended ('2000 Act'), in relation to the proposed development of a tail fed substation with associated grid connection to connect to the existing 220/110kV Kells Substation on lands at Ballyloo, Linkardstown, Kilballyhue, Graiguenspiddoge, Castletown, Moyle Big, Kellistown West and Kellistown East, Co Carlow.
- 1.2 The primary purpose of the pre-application consultation is to address the issue of whether or not the proposed development constitutes strategic infrastructure for the purposes of the 2000 Act.
- 1.3 One pre-application consultation meeting was held with the prospective applicant on 31<sup>st</sup> March 2025. A record of the meeting is on file. An email requesting closure of the consultation process was received on the 11<sup>th</sup> June 2025.
- 1.4 This report provides an overview of the proposed development, as well as details of legislative provisions, and relevant precedent. My recommendation is that the proposed development does constitute strategic infrastructure development.

## **2. Site Location & Description**

- 2.1 The site of the proposed substation is located on agricultural lands approximately 2km to the south of the settlement of Tinryland, 5km south of Carlow Town and 1.6km to the north of the village of Nurney. The proposed substation is within the parcel of land for the proposed Ballyloo Solar Farm. The Commission should note that the Ballyloo Solar farm application was submitted to Carlow County Council under Section 34 of the Planning and Development Act 2000 (24/60043) and is currently subject of a first party appeal to the Commission following refusal by the local authority (322347). The proposed grid connection extends from the proposed substation eastwards to its termination at the existing 220/110kV Kellis substation which is circa 1.5km west of Rathoe village and 5km west of Tullow. In terms of land use the area within which the proposed substation and grid connection are located is predominantly rural, agricultural with linear and scattered one off residential housing

development. A number of quarries also noted within the wider area whilst I note that a number of solar farms have also been permitted in the locality.

- 2.2 The nearest European designated site is the River Barrow and River Nore Special Area of Conservation (SAC) (Site Code 002162) which is approximately 4km to the west of the proposed substation location. The area also has a rich cultural heritage with a number of recorded monuments including a cluster in close proximity to the proposed substation (Ballyloo Castle - Towerhouse CW012-031 and Bawn CW012-031001)
- 2.3 Road infrastructure in the area includes the M9 motorway (which runs to the north/northwest), N80 and Local roads L3050, L3052, L7148 and L3053. The Dublin Waterford railway line passes approximately 3km west of the proposed substation location.

### **3. Proposed Development**

- 3.1 The proposal comprises a tail fed substation with the associated grid connection comprising underground cabling which will connect into the existing 220/110kV Kellis Substation. The purpose of the proposed development is to transport the electricity generated at the proposed Ballyloo and permitted Park Solar farms to the national electricity grid. The electrical output of the two solar farms to be transported is expected to be in the region of 206MW.
- 3.2 The substation will be at either 110kV or 220kV voltage and will consist of both EirGrid and Independent Power Producer (IPP) including IPP control room buildings, HV electrical equipment and associated infrastructure including palisade fences and concrete post and rail fences. If it is 110kV then it will use Air Insulated Switchgear (AIS). If it is 220kV then it will use either AIS or Gas Insulated Switchgear (GIS) depending on the requirements of Eirgrid. The installation of HV electrical equipment will include a transformer with associated equipment along with cable sealing end, surge arrester, earth disconnect, current / voltage transformer, house transformer, circuit breaker, lightening mast, diesel generator, security fencing and cameras and drainage, access etc.

- 3.3 The operational lifetime of the solar farms is assumed to be 40 years, however following decommissioning of the solar farms it is envisaged that the substation and underground cable will remain in situ as a functioning and operational part of the electricity network managed by Eirgrid.
- 3.4 The substation will connect to the existing 220/110kV Kells substation via a proposed 110kV or 220kV underground grid connection cable. The overall length of the grid connection cable is approximately 9km. The route travels east from the proposed substation on the L3050 before turning north onto the L30504. It then crosses the N80 at Castletown Cross Roads and continues east on the L7148 before turning south onto the L3053. The cable would then turn east onto the L30535 which is the main road access to the existing 220/110kV Kells substation. There are two design route options proposed for the last circa 400m accessing the substation. One option is the L30535 local road and the other option is within privately owned agricultural lands.

## **4. Prospective Applicant's Case**

- 4.1 The prospective applicant's case, as outlined in the consultation report submitted can be summarised as follows:
- The substation will transport electricity at either 110kV or 220kV to the existing 220/110kV Kells substation via underground cable. The substation therefore constitutes 'electric plant' in accordance with the definition as set out in Section 2(1) of the Electricity Act which refers to "any plant apparatus or appliance used for, or for the purposes connected with, the generation, transmission, distribution or supply of electricity."
  - The substation is part of the transmission system which "consists wholly or mainly, of high voltage lines and electric plant and which is used for conveying electricity from... one substation to another. As such it falls within the definition of 'transmission' as set out in section 182A(9).
  - The proposed substation and underground grid connection falls within the definition of "transmission" under Section 182(9) of the Act.
  - This opinion is consistent with recent similar determinations made by the Board.

## 5. Relevant Precedents

- 5.1 The prospective applicant cites a number of cases where the Board has determined that similar development comprised SID under s182A. Those cases, and others that I consider to be of relevance, include:

ABP Ref. No.	Location	Development Description	Decision Date	Decision
ABP-320154-24	Townlands of Rathcobane, Dundellerick West, Ballysallagh, Glenagaiff More, Ballynaglocgh, Ballyvatta, Ballybrannagh West, Aghaduff, Pigeonhill, Ballynanelagh, Kileena, Ballinbrittig and Ballynagaul Co Cork.	Proposed 220kV Air Insulated Switchgear (AIS) tail fed substation with associated grid connection comprising 220kV underground cabling connecting to the existing 220kV Knockraha substation	23/09/2024	Is a Strategic Infrastructure development
ABP-315433-22	Townlands of Delamain and Dunnstown near Kilcullen and Ballymore Eustace in County Kildare	Proposed development of a 220kV Air Insulated (AIS) tail fed substation with the associated grid connection comprising 220kV underground cabling to connect into the existing 400/220kV Dunnstown substation	08/05/2023	Is a Strategic Infrastructure development
ABP-317901-23	Mulhussey Townlands Kilclone Co Meath	Proposed 220kV loop in substation to connect to Eirgrid transmission network and underground connection to proposed solar farm	1/02/2024	Is Strategic Infrastructure development
ABP-313090-22	Lands at Kilshane Road, Kilshane, Finglas, Dublin 11 and within an overall landholding bound to the south by the R121 Cruiserath Road to the west by the R121 Church road and to the north by Cruiserath Drive.	Provision of a 220kV GIS substation on lands at Kilshane Road, Kilshane Finglas and underground 220kV transmission line connecting to the existing Cruiserath 220kV substation.	18/07/2022	Is Strategic Infrastructure development
ABP-317173-23	Townland of Rathcoursey East, Co Cork.	Proposed development of 110kV Air Insulated Switchgear (AIS) loop-in substation and associated grid connection	08/09/2023	Is a strategic Infrastructure development
ABP-303412-19	Townlands of Bogganstown, Co Meath, Revendale Kellystown, Blakestown (North Salt By) and Leixlip, Co Kildare	220kV electricity substation, 2 no 220 kV underground circuits forming a loop-in/loop out to the existing Maynooth-Woodland 220 kV Overhead Line and 3 no. 220 kV underground circuits	18/06/2019	Is a strategic infrastructure development

		connecting the proposed substation to electricity transformers.		
ABP-313676-22	Townlands of Tincurry, Crory and Ballylough near Ferns, Co. Wexford	Development of a substation and associated grid connection	01/11/2022	Is a strategic infrastructure development
ABP-311187-21	Bendinstown, Gilbertstown, Kellistown West, Ballycurragh, Ardbeam, and Ballynunnery, Co. Carlow	Proposed 110kV AIS single bay tail-fed substation and underground cable connection	24/11/2021	Is a strategic infrastructure development
ABP-311403-21	Townland of Clonin, Rhode, Co. Offaly	Proposed development of 110kV infrastructure	17/01/2022	Is a strategic infrastructure development
ABP-310846-21	Tarduff West, Athlone, County Roscommon	110kV substation to feed into the existing Athlone 220/110 kV substation at Monksland, Co. Roscommon, including underground cable connection and all associated works	24/11/2021	Is a strategic infrastructure development
ABP-310024-21	Townlands of Coolboy, Ballymoney and Killiniskyduff, Arklow, Co. Wicklow	Proposed development of 110kV substation	10/09/2021	Is a strategic infrastructure development
ABP-310033-21	Dunnstown Co Kildare	Proposed development of a 220kV substation and grid connection at existing Dunnstown 400kV substation	18/01/2022	Is a strategic infrastructure development

## 6. Legislative provisions

### 6.1 Planning and Development Act 2000, as amended

Section 2(1) of the Planning and Development Act 2000, as amended ('2000 Act'), defines 'strategic infrastructure' as including, *inter alia*:

*"any proposed development referred to in section 182A(1)"*

Under subsection 182A(1) of the 2000 Act, where a person (the 'undertaker') intends to carry out development comprising or for the purposes of electricity transmission, the undertaker shall prepare, or cause to be prepared, an application for approval of the development under section 182B and shall apply to the Board for such approval accordingly.

Subsection 182A(9) states that:

*"...'**transmission**', in relation to electricity, shall be construed in accordance with section 2(1) of the Electricity Regulation Act 1999 but, for the purposes of this section, the foregoing expression, in relation to electricity, shall also be construed as meaning the transport of electricity by means of—"*

- (a) a high voltage line where the voltage would be 110 kilovolts or more, or*
- (b) an interconnector, whether ownership of the interconnector will be vested in the undertaker or not."*

Section 182E(1) provides that a prospective applicant who proposes to apply for approval under section 182B or 182D shall, before making the application, enter into consultations with the Board in relation to the proposed development.

## **6.2 Electricity Regulation Act 1999, as Amended**

Section 2(1) of the Electricity Regulation Act 1999, as amended ('1999 Act'), sets out the following definitions:

- **'Transmission':**

*"...the transport of electricity by means of a transmission system, that is to say a system which consists, wholly or mainly, of high voltage lines and electric plant and which is used for conveying electricity from a generating station to a substation, from one generating station to another, from one substation to another or to or from any interconnector or to final customers but shall not include any such lines which the Board may, from time to time, with the approval of the Commission, specify as being part of the distribution system but shall include any interconnector owned by the Board."*

- **'Electric line':**

*"...has the meaning assigned to it by section 4(1) of the ESB (Electronic Communications Networks) Act 2014."*

The definition set out in s.4(1) of the 2014 Act is as follows:

*"...any line which is used solely or amongst other things for carrying electricity for any purpose and as including –*

- (a) any support for any such line, that is to say, any structure, pole or other thing in, on, by or from which any such line may be supported, carried or suspended,*
- (b) any apparatus connected to or associated with any such line for the purpose of carrying electricity or electronic communications services,*

*whether such apparatus is owned by the Board or by any company referred to in section 2 or by a company which has been provided access or services referred to in section 3, or*

*any wire, cable, tube, pipe or similar thing (including its casing or coating) which is used for the purpose of carrying electricity or electronic communications services and which surrounds or supports or is surrounded or supported by, or is installed in close proximity to, or is supported, carried or suspended in association with, any such line."*

- **'Electric plant':**

*"...any plant, apparatus or appliance used for, or for the purposes connected with, the generation, transmission, distribution or supply of electricity other than –*

*(a) An electric line*

*(b) a meter used for ascertaining the quantity of electricity supplied to any premises, or*

*(c) an electrical appliance under the control of a consumer"*

- **'Distribution':**

*"...the transport of electricity by means of a distribution system, that is to say, a system which consists of electric lines, electric plant, transformers and switchgear and which is used for conveying electricity to final customers".*

## **7. Consultation Meeting**

- 7.1 One pre-application consultation meeting was held with the prospective applicant on the 31<sup>st</sup> March 2025. The meeting record relating to this development proposal and the presentation made by the applicant to the Board's representatives are attached to the file.

## **8. Assessment**

- 8.1 The definition of 'strategic infrastructure' includes development comprising or for the purposes of electricity transmission, with 'transmission' defined as either:

- The transport of electricity by means of a high voltage line of 110 kV or more, or an interconnector.
- The transport of electricity by means of a transmission system (a system of high voltage lines and electric plant used for conveying electricity from a generating station to a substation, from one generating station to another, from one substation to another or to or from any interconnector or to final customers, including interconnectors but excluding distribution system lines).

8.2 The proposed development involves the provision of a tail fed substation with the associated grid connection comprising underground cabling which will connect into the existing 220/110kV Kellis Substation. The purpose of the proposed development is to transport the electricity generated at the proposed Ballyloo (Carlow Co Co Ref 24/60043 ABP. Ref 322347) and permitted Park Solar farm (Carlow Co Co Ref 24/60205) to the national electricity grid. The electrical output of the two solar farms to be transported is expected to be in the region of 206MW. The substation will be at either 110kV or 220kV voltage and will consist of both EirGrid and Independent Power Producer (IPP) including IPP control room buildings, HV electrical equipment and associated infrastructure including palisade fences and concrete post and rail fences. The proposed development includes only the 220kV/110kV substation and grid connection and not the solar farms or other ancillary development which form part of the wider project and which require separate permissions under section 34 of the Planning Acts. (as referenced above)

8.3 Section 182A(9) of the Act sets a threshold of 110kV in order for a high voltage electricity transmission line to be considered strategic infrastructure. No threshold is set in respect of a substation. The substation will be at either 110kV or 220kV. If it is 110kV then it will use Air Insulated Switchgear (AIS) and if it is 220kV then it will use either AIS or Gas Insulated Switchgear (GIS). Electricity will be transported from the proposed substation to the existing 110/220kV Kellis substation at either 110kV or 220kV voltage. It is considered therefore that the substation constitutes 'electric plant' in accordance with the definition set out in Section 2(1) of the Electricity Act which refers to "any plant, apparatus or appliance used for, or for purposes connected with, the generation, transmission, distribution or supply of electricity..."

In additional reference to Section 2(1) I am satisfied that that the 110/220kV substation and grid connection is part of a transmission system which “consists, wholly or mainly, of high voltage lines and electric plant and which is used for conveying electricity from.... One substation to another”. As such it is considered that the substation and grid connection fall within the definition of ‘transmission’ as set out in section 182A(9). The operational lifetime of the solar farms is assumed to be 40 years, however following decommissioning of the solar farms it is envisaged that the substation and underground cable will remain in situ as a functioning and operational part of the electricity network managed by Eirgrid. The substation and associated grid infrastructure will therefore form part of the transmission system. I note the similarity between this case and other pre application consultation decisions under Section 182E of the Planning and Development Act 2000 as amended, as outlined at section 5 above.

- 8.4 In conclusion, therefore, I recommend that the Board issue a determination that the: Proposed tail fed substation and associated grid connection to connect to the existing 220/110kV Kellis substation does fall within the scope of section 182A of the 2000 Act, as amended, and that a planning application should be made directly to the Commission in the first instance.

A list of prescribed bodies is set out in Appendix 1.

## **9. Recommendation**

I recommend that the prospective applicant, Ballyloo Solar Farm Limited, be informed that:

- (i) the proposed tail fed substation with associated grid connection to connect to existing 220/110kV Kellis substation located in the townlands of Ballyloo, Linkardstown, Killyballyhue, Graiguenspiddoge, Casteotown, Moyle Big, Kellistown West and Kellistown East, Co Carlow as set out in the plans and particulars received by An Bord Pleanála on the 10<sup>th</sup> February 2025 falls within the scope of section 182A of the Planning and Development Act 2000, as amended, and that a planning application should therefore be made directly to the Commission;

I confirm that this report represents my professional planning assessment, judgement and opinion on the matter assigned to me and that no person has influenced or sought to influence, directly or indirectly, the exercise of my professional judgement in an improper or inappropriate way.



---

Bríd Maxwell

**Planning Inspector**

Date: 25<sup>th</sup> June 2025

## **Appendix 1: Prescribed Bodies**

*The following is a list of prescribed bodies considered relevant by the Commission:*

- *Minister for Housing, Local Government and Heritage*
- *Minister for the Environment, Climate and Communications*
- *Carlow County Council*
- *Commission for the Regulation of Utilities*
- *Transport Infrastructure Ireland*
- *Uisce Éireann*
- *Inland Fisheries Ireland*
- *Office of Public Works*
- *An Taisce*
- *Heritage Council*
- *An Chomhairle Ealaíon*
- *Fáilte Ireland*

Further notifications should also be made, where deemed appropriate.