

Date: 30 January 2025

1. Introduction

This DNA Access Operational Protocol must be read in conjunction with the Western Downs DNA Access Policy available on Powerlink's website (**Western Downs DNA Access Policy**) and the associated contract documents, including the Access Agreement for any specific Existing Connected Party. This document will be updated from time to time with the agreement of Powerlink (in its separate capacities as DNA Owner and Primary TNSP) and the Existing Connected Parties in accordance with the Western Downs DNA Access Policy.

This version of the DNA Access Operational Protocol indicates the operational schemes that may be required in the future. The initial connection of Wambo Wind Farm 1 and Wambo Wind Farm 2 only will not require any operational schemes to operate the DNA.

The procedures in this DNA Access Operational Protocol are always subject to the Electricity Laws, including the existence of a court order or any order or direction made by an Authority under the Electricity Laws.

2. Definitions

Capitalised terms in this DNA Access Operational Protocol have the meanings given to them in the Western Downs DNA Access Policy, unless the context requires otherwise. Italicised terms have the meanings given to them in the Rules.

3. Operational Responsibilities

Powerlink is the owner of the Western Downs DNA, and operator of the Western Downs DNA in its capacity as Primary TNSP.

4. Operational Communication

Powerlink (as Primary TNSP) maintains a Network Operations Control Centre staffed 24 hours per day, seven day a week for operational purposes.

Powerlink's contact details are available in the Access Agreement of each Existing Connected Party.

5. Technical Envelope of DNA Component 1

The Western Downs DNA is primarily limited by the configuration of DNA Component 1 as a single circuit (the 275kV transmission lines between Halys Substation and Diamondy Switching Station).

DNA Component 1 will be operated within its technical envelope by AEMO as other Powerlink transmission lines are. The technical envelope is advised to AEMO by Powerlink (as Primary TNSP) under the following parameters in Table 1. DNA Component 1 includes two circuits (configured as single circuit), and the ratings set out in Table 1 are on a per circuit basis.



Table 1 – Western Downs DNA Component 1 Thermal Ratings Table

Season	Normal Rating (MVA) per circuit	Emergency Rating (MVA) per circuit
Summer	826	957
Shoulder	944	1078
Winter	1030	1167

The ratings in the table for each season apply to the periods as note below:

- "Summer" applies from 1 October to 31 March;
- "Shoulder" applies from 1 April to 31 May and from 1 September to 30 September; and
- "Winter" applies from 1 June to 31 August.

Dynamic ratings are not used for this transmission element.

6. DNA Transfer Capacity

While DNA Component 1 is configured as a single circuit, the DNA Transfer Capacity is limited to a notional value of 750MVA. The actual transfer capacity available will depend on:

- The amount of FCAS that AEMO procures to manage contingencies (AEMO, through its NEM dispatch engine 'NEMDE', co-optimises this value every 5 minutes with the wholesale electricity market).
- If FCAS limits the transfer capacity below the DNA technical envelope, then AEMO will dispatch in accordance with market rules.

7. Priority Order

In normal operating conditions, Powerlink will provide DNA Service 1 to the Existing Connected Parties in the Priority Order (with Existing Connected Parties higher in the Priority Order receiving higher priority over Existing Connected Parties lower in the Priority Order, as defined in the Western Downs DNA Access Policy).

The Existing Connected Parties will be directed to reduce the use of DNA Service 1 by reducing their output in the Priority Order to maintain the Western Downs DNA within the DNA technical envelope (referred to in item 5 above) in the event of congestion while the Western Downs DNA is intact (DNA transmission circuit is not out of service). The Existing Connected Party first in the Priority Order will be the last to be directed to reduce output, and the Existing Connected Party last in the Priority Order will be the first to be directed to reduce output. As at the date of this Western Downs DNA Access Operational Protocol, the Priority Order is as follows:

Table 2 - Western Downs DNA Priority Order

Priority Order	DNA Party
1. Foundation Proponent	Wambo Wind Farm 1
2. Foundation Proponent	Wambo Wind Farm 2



8. Contingency Events – Run-back Scheme

A run-back scheme is not required as at the date of this DNA Access Operational Protocol. A run-back scheme will be required to ensure that the full DNA Transfer Capacity is available for use by the Existing Connected Parties when DNA Component 1 is upgraded by cutting in the second circuit of the double circuit feeder to provide additional DNA Transfer Capacity.

Run-back schemes may be implemented by Powerlink (as Primary TNSP) to further extend the DNA Transfer Capacity. The run-back scheme ensures that the Western Downs DNA lands within its DNA technical envelope following a *DNA Contingency Event*. If the DNA Transfer Capacity is extended then a run-back scheme is part of Powerlink's network security requirements and is critical for compliance with the NER. The run-back scheme(s) will be managed in conjunction with this Western Downs DNA Access Operational Protocol and will be documented separately as part of TNSP processes (connections, etc.). Any run-back scheme must comply with, and be consistent with, clause E3.2(e) of the Western Downs DNA Access Policy.

The Priority Order does not apply during DNA *Contingency Events* and during the period to resecure the *transmission system* following a DNA Contingency Event. During any DNA *Contingency Event*, all Existing Connected Parties will be required to ramp or trip generation output down to a pre-determined level. The time required to reach the pre-determined output is dependent on the thermal parameters of the circuit and the level of overload experienced. The expected times will be in the order of one minute.

Where necessary, Powerlink will take action to ensure the Western Downs DNA lands in a satisfactory state (in accordance with the Existing Connecting Party/s Access Agreement) should any Existing Connected Party not comply with any run-back scheme implemented under this item 8.

9. DNA Intact - Congestion Management Scheme

A congestion management scheme is not required as at the date of this DNA Access Operational Protocol.

To the extent the total of the Agreed DNA Transfer Limits allocated to all the Existing Connected Parties exceeds the DNA Transfer Capacity, a congestion management scheme is required to manage the total output from the Existing Connected Parties to within the technical envelope of the DNA (as set out in item 5).

Any congestion management scheme must comply with, and be consistent with, clause E3.2(e) of the Western Downs DNA Access Policy, including giving effect to the Priority Order of the Existing Connected Parties. The congestion management scheme will give effect to the Priority Order and may be implemented by Powerlink in its role as Primary TNSP or using an alternative mechanism.

Where necessary, Powerlink will take action ensure that the Western Downs DNA lands in a *satisfactory state* should any Existing Connected Party not comply with any congestion management scheme implemented under this item 9.





None as at the date of this Western Downs DNA Access Operational Protocol.

