

## Company Directive

### PARENT DIRECTIVE: DSO/2

### Distribution System Operator Policy

#### Summary

This is the Parent Directive for the Distribution System Operator (DSO) suite. This suite covers the activities of the Distribution System Operator (DSO), and its interface with the Distribution Network Operator (DNO).

**Author:** Stephen Quinn

**Implementation Date:** March 2024

**Approved by**



**Benjamin Godfrey**  
**Director of Distribution System Operator**

**Date:** 13<sup>th</sup> March 2024

Target Staff Group	Authors of directives in the DSO suite.
Impact of Change	Amber – authors should follow new consultation requirements.
Planned Assurance checks	Assess progress of DSO suite at annual review of this directive.

**NOTE:** The current version of this document is stored in the NGED Corporate Information Database. Any other copy in electronic or printed format may be out of date. Copyright © 2024 National Grid Electricity Distribution

## IMPLEMENTATION PLAN

### Introduction

This is the Parent Directive for the Distribution System Operator (DSO) suite. This suite covers the activities of the Distribution System Operator (DSO), and its interface with the Distribution Network Operator (DNO).

### Main Changes

- Update consultation requirements in 5.0 to reflect recent company reorganisation
- Update source of DSO Roles in 6.0
- New section 6.2 referencing conflict of interest risk

### Impact of Changes

Target Staff Group	Authors of directives in the DSO suite.
Impact of Change	Amber – authors should follow new consultation requirements.

### Implementation Actions

DSO Policy Engineer to make authors of directives in the DSO suite aware of updated consultation requirements.

### Implementation Timetable

Consultation requirements to be followed for any new consultations from the date of issue.

## REVISION HISTORY

DOCUMENT REVISION & REVIEW TABLE			
Issue	Date	Comments	Author
2	13/03/2024	<ul style="list-style-type: none"><li>• Update consultation requirements in 5.0 to reflect recent company reorganisation</li><li>• Update source of DSO Roles in 6.0</li><li>• New section 6.2 referencing conflict of interest risk</li></ul>	Stephen Quinn
1	02/06/2023	Review and addition of informative Appendix A: DSO Policy Roadmap.	Stephen Quinn
0	24/11/2022	Initial issue of PAD: DSO	Stephen Quinn

## CONTENTS

1.0	Scope.....	5
2.0	Responsibilities .....	5
3.0	Review and Feedback Arrangements.....	5
4.0	Research and Introduction of New Technology .....	6
5.0	Consultation Requirements .....	6
6.0	Risk Management .....	7
Appendix A: DSO Policy Roadmap .....		9
Appendix B: Superseded documentation .....		11
Appendix C: Record of comment during consultation .....		11
Appendix D: Ancillary Documentation .....		11
Appendix E: Keywords .....		11

## **1.0 SCOPE**

This is the Parent Directive for the Distribution System Operator (DSO) suite. This suite covers the activities of the Distribution System Operator (DSO), and its interface with the Distribution Network Operator (DNO).

This suite includes the following subject areas:

- DSO Governance
- Load Projections and Profiles
- Network Modelling and Analysis
- Distribution System Planning
- Security Of Supply
- Capacity Management
- Flexibility Service Products
- Flexibility Service Markets
- Distribution System Operations
- Whole System Engagement

A list of directives being developed in the DSO suite can be found in Appendix A: DSO Policy Roadmap.

The DSO suite is complementary to the other suites of NGED policy; these suites also apply to the activities of the Distribution System Operator where relevant.

## **2.0 RESPONSIBILITIES**

The Director of Distribution System Operator is the responsible executive manager for this Parent Directive. The DSO Policy Engineer shall lead the direction of the DSO suite on behalf of the Director of Distribution System Operator.

## **3.0 REVIEW AND FEEDBACK ARRANGEMENTS**

Feedback on directives in the DSO suite shall be directed to the reviewing author. The DSO Policy Engineer shall ensure that directives in the DSO suite are periodically reviewed as set out below with due consideration of feedback received. Periodic reviews may be brought forward where triggered by feedback or changes in regulations or legislation.

### **3.1 Policy Directives (POLs)**

In light of the rapid pace of development in the DSO, each Policy Directive (POL) in the DSO suite shall be reviewed no later than one year from its date of issue or last review, whichever is later.

### **3.2 Standard Techniques (STs)**

Each Policy Directive (POL) in the DSO suite shall set review arrangements for its subsidiary Standard Techniques (STs).

### **4.0 RESEARCH AND INTRODUCTION OF NEW TECHNOLOGY**

Research and innovation projects within the scope of the DSO suite shall be approved and sponsored by the Director of Distribution System Operator or their direct reports.

### **5.0 CONSULTATION REQUIREMENTS**

Drafts of new or amended Directives in the DSO suite shall be sent to the following nominated consultees for comment:

1. The following directors of NGED, who may delegate their role as consultee to one or more executive managers within their directorate:
  - a. Director of Distribution System Operator
  - b. Director of Asset Management and Ops Support
  - c. Director of Field Operations
  - d. Director of Customer Excellence
  - e. Director of Regulation
  - f. Director of SHE
2. Safety Representatives as listed in Appendix B of POL: GE1.
3. The DSO Policy Engineer, where they are not the author.
4. Any other consultees pertinent to a particular Directive as agreed between the author and the Director of Distribution System Operator.

Where the Directive under consultation relates to the interface between the DSO and DNO, particular care should be taken by both author and consultees to ensure that it aligns with the respective duties of the DSO and DNO.

The consultation period shall be two weeks unless otherwise authorised by the Director of Distribution System Operator.

## 6.0 RISK MANAGEMENT

Ofgem has set three DSO Roles<sup>1</sup> as part of the DSO incentive in RIIO-ED2:

1. Energy system planning,
2. Market facilitation of flexible resources, and
3. Real time operation of local energy networks.

These are subdivided into DSO Activities, which in turn are subdivided into Baseline Expectations.

### 6.1 General and Safety Risks

In carrying out the DSO Roles, the DSO contributes to NGED's compliance with:

- Electricity Distribution Licence conditions including:
  - 7A (Whole Electricity System Obligations)
  - 13 (Charging Methodologies for Use of System and connection)
  - 21 (The Distribution Code)
  - 24 (Distribution System planning standard and quality of performance reporting)
  - 25 (Long-Term Development Statement)
  - 25B (Network Development Plan)
  - 31E (Procurement and use of Distribution Flexibility Services)
- The general duties of Electricity Distribution Licence holders under section 9 of the Electricity Act 1989:
  - To develop and maintain an efficient, co-ordinated and economical system of electricity distribution
  - To facilitate competition in the supply and generation of electricity
- Duties under the Distribution Code, Electricity at Work Regulations and Electricity Safety, Quality and Continuity Regulations where they pertain to the management of network capability, network loading, and quality of supply.

---

<sup>1</sup> *Distribution System Operation Incentive Governance Document*, 17 February 2023

The DNO also contributes to NGED's compliance with these obligations; their risk control measures are codified in other policy suites. Authors of Directives in both the DSO and DNO should collaborate with each other to ensure comprehensive risk coverage without conflicting requirements or unnecessary duplication.

As the role and remit of the DSO is formalised both within NGED and externally, the general responsibilities outlined above will be reviewed and made more specific. Other general and safety risks are outside the scope of this policy suite.

## **6.2 Conflict of Interest Risk**

Ofgem has identified in Baseline Expectation 3.2.5 that electricity distribution licensees have a risk of actual or perceived conflict of interest between their DSO and their network ownership roles or other business interests. This risk will be addressed in POL: DSO1, *DSO Governance*.



## APPENDIX A: DSO POLICY ROADMAP

The DSO suite is being expanded to achieve the aims and objectives of the Parent Directive. Policy Directives under development at the time of writing include:

- POL: DSO1, *DSO Governance*, regarding topics including:
  - Audit requirements
  - Key DSO-DNO Interfaces
  - The DSO Scrutiny Panel
- POL: DSO2, *Load Projections and Profiles*, and subordinate directives regarding:
  - *The Distribution Future Energy Scenarios*
  - *Determination of Best View Forecasts*
  - *Customer Behaviour and Diversity*
  - *Identification of Cardinal Load Points for Power Planning*
  - *Load-sets for Energy Planning*
- POL: DSO3, *Network Modelling and Analysis*, and subordinate directives regarding:
  - *Data Provision*
  - *Ratings*
  - *Load-Flow Modelling and Analysis*
  - *Fault-Level Modelling and Analysis*
  - *Dynamic and Stability Modelling and Analysis*
- POL: DSO4, *Distribution System Planning*, and subordinate directives regarding:
  - *Security of Supply in Investment Planning Timescales*
  - *The Distribution System Operating Manual*
  - *Cost-Benefit Analysis of Network Options*
- POL: DSO5, *Flexibility and Markets*, and subordinate directives regarding:
  - *Procurement of Flexibility Services*
  - *Markets and Competition*
  - *Development of Flexibility Services*
  - *Technical Risk Management*

- POL: DSO6, *Flexibility Service Specifications* and subordinate specifications for:
  - *Secure*
  - *Dynamic*
  - *Restore*
  - *Sustain*
  
- POL: DSO7, *Distribution System Operations* and subordinate directives regarding:
  - *Security of Supply in Operational Timescales*
  - *Operational Liaison and Practice*
  - *Management of Curtailment*
  - *Dispatch Decision Making*
  - *Operational Forecasting*
  
- POL: DSO8, *Whole System Interface*:
  - Transmission-Distribution Boundary Management
  - Cross-Utility Coordination
  - Local Planning for Net Zero
  - Stakeholder Engagement

## **APPENDIX B: SUPERSEDED DOCUMENTATION**

This directive supersedes PAD: DSO/1 dated June 2023 which has now been withdrawn.

## **APPENDIX C: RECORD OF COMMENT DURING CONSULTATION**

No comments received.

## **APPENDIX D: ANCILLARY DOCUMENTATION**

None

## **APPENDIX E: KEYWORDS**

DSO, Distribution System Operator, Interface