DISTRIBUTION CODE

For the electricity industry in Northern Ireland

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DISTRIBUTION CODE

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INTRODUCTION

1. The **Distribution Code** is designed to permit the development, maintenance and operation of an efficient, co-ordinated and economical **NI Distribution System** and generally to facilitate competition in the generation and supply of electricity. It is conceived as a statement of what is optimal (particularly from a technical point of view) for all **Users** and **NIE** itself in relation to the planning and operation and use of the **NI Distribution System**. It is designed to avoid any undue discrimination between **Users** and categories of **Users**.

2. Interim Nature of Distribution Code

- (a) This Distribution Code, in its Interim form, is intended to be migrated, either on a section by section basis, or in a single set of changes, into a full Distribution Code. Until that stages, the Distribution Code is to be read with the Grid Code, as provided for in the individual sections.
- (b) Users connected to or using the NI Distribution System will need to comply with the Distribution Code. During the interim period, Users will not be required to comply directly with the Grid Code: they will be required to comply with the Grid Code only to the extent that it applies to them through this Distribution Code and only as it is amended by the Distribution Code. Some Users (for example, Generators in relation to larger Generating Units) will also be required by the TSO to comply with the Grid Code. With the introduction of the full Distribution Code, all Users connected to or using the NI Distribution System will need to comply with the full Distribution Code.
- (c) Further provisions on this are set out in the T&D Licence and in the TSO Licence. There are provisions in the TIA dealing with the liaison required between the TSO and NIE in relation to the Distribution Code, and which set out further details and processes as required by the T&D Licence and TSO Licence. The relationship between NIE and the TSO is not covered in the Distribution Code.
- 3. The operating procedures and principles governing NIE's relationship with all Users of the NI Distribution System, be they Generators, Suppliers or Customers are set out in the Distribution Code. The Distribution Code specifies day-to-day procedures for both planning and operational purposes and covers both normal and exceptional circumstances.
- 4. The **Distribution Code** is divided into the following sections:-
 - (a) a **Planning Code** which provides generally for the supply of certain information by Users in order to enable **NIE** to undertake the planning and development of the **NI Distribution System**;
 - (b) **Connection Conditions** which specify the minimum technical design and certain operational criteria which must be complied with by **Users** connected to or seeking connection with the **NI Distribution System**;
 - (c) an **Operating Code** which is split into a number of sections and deals with:-
 - (i) **Demand** forecasting (**DOC1**);

- (ii) the co-ordination of the Outage planning process in respect of Generating Units and Power Station Equipment and Outages of equipment on the NI Distribution System for construction, repair and maintenance (DOC2);
- (iii) different methods of reducing **Demand** (**DOC4**);
- (iv) the reporting of scheduled and planned actions and unexpected occurrences such a faults between **NIE** and **Users (DOC5)**;
- (v) the co-ordination, establishment and maintenance of **Isolation** and **Earthing** in order that work and/or testing can be carried out safely (**DOC6**);
- (vi) certain aspects of contingency planning (**DOC7**);
- (vii) the provision of written reports on occurrences such as faults in certain circumstances (**DOC8**);
- (viii) the procedures for determining the number and nomenclature of **Plant** and **Apparatus (DOC9)**;
- (ix) the procedures for the establishment of **System Tests** (**DOC10**); and
- (x) **Testing, Monitoring and Investigations** in relation to User's Plant and Apparatus (DOC11);
- (d) a **Data Registration Code** which sets out a unified listing of all data required by **NIE** from **Users** and **Users** from **NIE**, under the **Distribution Code**; and
- (e) General Conditions which are intended to ensure, so far as possible, that the various sections of the Distribution Code work together and work in practice [and which include provisions relating to the establishment of the Distribution Code Review Panel and other provisions of a general nature].
 [Note: Further consideration is being given as to how the Distribution Code Review Panel should be dealt with during the interim period.]
- (f) [a Metering Code which is split into a number of sections and deals with:-
 - (i) the basic requirements for metering (MC);
 - (ii) specific requirements of the interim metering scheme for a generating tariff metering (**Sub-Code No 1**);
 - (iii) the specific requirements for the new metering scheme (Sub-Codes No 2.1-2.4);
 - (iv) the specific requirements for generation operational metering (Sub-Code No 3);
 - (v) procedures for the maintenance, testing, inspection and sealing of metering (Agreed Procedures No 1 and No 2);
 - (vi) reconciliation procedures for metering (Agreed Procedures No 3 and No 4);

- (vii) procedures for estimating settlement values in lieu of normal data collection methods (Agreed Procedures No 5 and No 6);
- (viii) communication protocols (Agreed procedure No 7); and
- (ix) Second Tier Customer Registration (Agreed Procedure No 8).]

[Note: The provisions relating to the Metering Code are being considered further.]

(g) This **Introduction** is provided to **Users** and to prospective **Users** for information only and does not constitute part of the **Distribution Code**.

GLOSSARY AND DEFINITIONS (GD)

GD1. <u>DEFINED TERMS & CONSTRUCTION OF REFERENCES</u>

- GD1.1 In the **Distribution Code**, the **NI Distribution System** related provisions of the Glossary and Definitions in the **Grid Code** shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:
 - (a) "the TSO" are references to "NIE";
 - (b) the "NI System" are references to the "NI Distribution System"; and
 - (c) the "Grid Code" are references to the "Distribution Code".

NIE and Users will implement and comply with this Distribution Code accordingly.

GD1.2 In addition, in the **Distribution Code**, the following words and expressions shall, unless the subject matter or the context otherwise requires or is inconsistent therewith, bear the following meanings:

| Demand Control | All or any of the methods of achieving a demand reduction as set out in DOC4.1.2(a) of the Distribution Code . |
|---|--|
| Distribution Connection Conditions or DCC | The part of the Distribution Code which is identified as the Distribution Connection Conditions . |
| Distribution General Conditions or DGC | The part of the Distribution Code which is identified as the Distribution General Conditions . |
| Distribution Operating Code or DOC | The part of the Distribution Code which is identified as the Distribution Operating Code . |
| Distribution Planning Code or DPC | The part of the Distribution Code which is identified as the Distribution Planning Code . |
| Distribution Code | The Distribution Code prepared pursuant to the T&D Licence , as from time to time revised in accordance with the T&D Licence that may incorporate, by reference, sections of the Grid Code . |
| Distribution Code Review Panel | The panel with the functions set out in [DGC • of the Distribution Code] . |
| NIE | Northern Ireland Electricity plc whose company number is NI026041 and whose registered office is at 120 Malone Road, Belfast BT9 5HT. |
| NIE Energy | NIE Energy Limited whose company number is NI027394 and whose registered office is at [] and |

| | its successors and permitted assigns. |
|-------------|--|
| T&D Licence | The licence granted to NIE under article 10(1)(b) of the Order . |
| TIA | The Transmission Interface Arrangements prepared by NIE and the TSO pursuant to the TSO's Licence and the T&D Licence . |

DISTRIBUTION PLANNING CODE

DPC1 INTRODUCTION

- DPC1.1 The Distribution Planning Code (the "DPC") specifies the requirements for the supply of information by persons connected or seeking connection to, or using, the NI Distribution System in order to enable NIE to undertake the planning and development of the NI Distribution System. It also specifies the technical and design criteria and procedures to be applied by NIE in the planning and development of the NI Distribution System and to be taken account of by NIE and other persons connected or seeking connection to the NI Distribution System in the planning and development of their own Plant and Systems.
- DPC1.2 A requirement for reinforcement or extension of the **NI Distribution System** may arise for a number of reasons including, but not limited to:-
 - (a) a development on a User's System connected to the NI Distribution System;
 - (b) the introduction of a new, or a modification relating to an existing, Connection Point between a User's System and the NI Distribution System;
 - (c) transient or steady-state stability considerations;
 - (d) the aggregate effect of **Customer** developments and/or transits utilising the **NI Distribution System**;
 - (e) the cumulative effect of any combination of the above.
- DPC1.3 Accordingly, the reinforcement or extension of the **NI Distribution System** may involve work:-
 - (a) at the **Connection Point** between a **User's System** and the **NI Distribution System**;
 - (b) on distribution or transmission lines or substations or other facilities which join the **Connection Point** to the remainder of the **NI Distribution System**; and
 - (c) at or between points on the **NI Distribution System** near to or remote from a **Connection Point**.
- DPC1.4 Since **System** developments must be planned with sufficient lead time to allow any necessary consents to be obtained and any necessary detailed engineering design/construction work to be completed, the **DPC** and the relevant **Connection Agreement** and/or **Use of System Agreement** impose appropriate timescales on the exchange of information between **NIE** and **Users**, subject to all parties having regard, where appropriate, to the confidentiality of such information.
- DPC2 <u>OBJECTIVES</u>
- DPC2.1 The objectives of the **DPC** are to:-

- (a) provide for the supply of information required by **NIE** from **Users** in order for **NIE** to plan the development (including reinforcement and extension) of the **NI Distribution System**;
- (b) reflect the **Licence** requirements for the supply of information by **NIE** to **Users** in order to facilitate the identification and evaluation of opportunities for use of, or connection to, the **NI Distribution System**;
- (c) set out the requirements for the supply of information in respect of any proposed development on a **User's System** which may impact on the performance of the **NI Distribution System**; and
- (d) specify the technical and design criteria and procedures which will be applied by NIE in the planning and development of the NI Distribution
 System and which are to be taken into account by Users in the planning and development of their own Systems.

DPC3 <u>SCOPE</u>

- DPC3.1 The DPC applies to NIE and to Users, which in the DPC means:-
 - (a) Generators;
 - (b) **Suppliers**;
 - (c) **Customers** with **Demand** of 1**MW** and above; and
 - (d) Aggregators
- DPC3.2 Persons whose prospective activities would place them in any of the above categories of User will, either pursuant to a Licence or as a result of the application procedure for a Connection Agreement and/or Use of System Agreement, become bound by the DPC prior to their generating, supplying or consuming, as the case may be. And references to the various categories (or to the general category) of User should, therefore be taken as referring to them in that prospective role as well as to Users actually connected.

DPC4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of the Planning Code in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION CONNECTION CONDITIONS

DCC1 <u>INTRODUCTION</u>

- [(a) The **Distribution Connection Conditions** specify the technical, design and certain operational criteria which must be complied with by **Users** whose **Plant** and **Apparatus** is connected to, or who are seeking a connection to, the **NI Distribution System.**
- (b) They also set out the procedures by which **NIE** shall seek to ensure compliance with these criteria a pre requisite to granting approval for the connection of a **User's Plant** and **Apparatus**.
- (c) Users are defined for the purpose of these Distribution Connection Conditions in DCC3.
- DCC1.2 Procedures by which NIE and Users may conclude a Connection Agreement are reflected in the Distribution Planning Code. Each Distribution Connection Agreement shall require Users to comply with the terms of the Distribution Code and NIE will not grant approval to connect the User's installation to the NI Distribution System unless and until it is satisfied that the criteria laid down by the Distribution Connection Conditions have, subject to any derogations issued by the Authority, been met.
- DCC1.3 The provisions of the **Distribution Connection Condition** shall apply to all connections to the **NI Distribution System**:-
 - (a) existing on 31 March 1992; or
 - (b) established or modified thereafter.

DCC2 <u>OBJECTIVES</u>

- DCC2.1 The **Distribution Connection Conditions** are designed to ensure that:-
 - (a) no new or modified connection will impose unacceptable effects on the NI
 Distribution System or on any User System nor will it be subject itself to unacceptable effects by its connection to the NI Distribution System; and
 - (b) the basic rules for connection treat all **Users** of an equivalent category in a non-discriminatory fashion, in accordance with **NIE's** statutory and **Licence** obligations.

DCC3 <u>SCOPE</u>

DCC3.1 The **Distribution Connection Conditions** apply to **NIE** and to **Users** which, in the **Distribution Connection Conditions**, means:-

- (a) **Generators**;
- (b) Large Demand Customers; and

(c) Aggregators.

DCC3.2 Persons whose prospective activities would place them in any of the above categories of **User** will, either pursuant to a **Licence** or as a result of the application procedures for a **Connection Agreement**, become bound by the **DCC** prior to their generating or consuming, as the case may be, and references to the various categories (or to the general category) of **User** should, therefore, be taken as referring to them in that prospective role as well as to **Users** actually connected.]

DCC4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of the Connection Conditions in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 1

DEMAND FORECASTING

DOC 1.1 INTRODUCTION

Distribution Operating Code No. 1 ("**DOC1**") is concerned with **Demand** forecasting and specifies the procedures to be followed and the data to be supplied to **NIE** to enable **NIE** to forecast **Demand** on the **NI Distribution System** through the timescales ranging from 7 years in advance (namely part of the **Operational Planning Phase**) through to the **Control Phase** and into real time operation.

DOC 1.2 <u>OBJECTIVE</u>

The objectives of **DOC1** are to set out the requirement for **Users** to provide data to **NIE** to enable **NIE**, insofar as it is able to do so, to maintain the integrity of the **NI Distribution System**, and to specify those factors which **NIE** will take into account when conducting **Demand** forecasting.

DOC 1.3 <u>SCOPE</u>

DOC 1.3.1 **DOC1** applies to **NIE** and to **Users** which is this **DOC1** means:-

(a) **Suppliers**;

- (b) Generators; and
- (c) Generator Aggregators.

DOC 1.4 PROCEDURE

The **NI Distribution System** related provisions of Operating Code No.1, Demand Forecasting, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that:

- (a) (unless the context otherwise requires) all references therein to:
 - (i) "the TSO" are references to "NIE";
 - (ii) the "NI System" are references to the "NI Distribution System"; and
 - (iii) the "Grid Code" are references to the "Distribution Code"; and
- (b) [where a User has provided the information in question to the TSO, it need not also provide it to NIE] [Note: To be Considered further].

DISTRIBUTION OPERATING CODE NO. 2 OPERATIONAL PLANNING

DOC2.1 <u>INTRODUCTION</u>

- DOC 2.1.1 **Distribution Operational Planning** involves the coordination through various timescales of outages of **Plant** and **Apparatus** which affect the operation of the **NI Distribution System**.
- DOC 2.1.2 **DOC2** sets out the data required by **NIE** from **Generators** in order to conduct the **Operational Planning** process, and the procedures to be adopted by **NIE** in the planning and co-ordination of **Generating Unit Outages** and **NI Distribution System Outages** in accordance with this **DOC2**.

[Customer Equipment outages being considered further]

DOC 2.1.3 In **DOC2**, "Year 0" means the current calendar year at any time, Year 1 means the next calendar year at any time, Year 2 means the calendar year after year 1, etc.

DOC 2.2 OBJECTIVE

DOC 2.2.1 The objective of **DOC2** is to ensure, as far as possible, that **NIE** co-ordinates, optimises and approves **Outages** of **Generating Units** taking into account **NI Distribution System Outages**, to minimise the number of effect of constraints on the **NI Distribution System**.

DOC 2.3 SCOPE

DOC 2.3.1 DOC2 applies to NIE, and to Users which in this OC2 means:-

(a) Generators; and

(b) Large Demand Customers.

DOC 2.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 2, Operational Planning, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 3

Not used

DISTRIBUTION OPERATING CODE NO. 4 DEMAND CONTROL

DOC 4.1 INTRODUCTION

- DOC 4.1.1 Distribution Operating Code No. 4 ("DOC4") is concerned with the provisions made by NIE and procedures to be followed by NIE and Users to permit a reduction in Demand in the event that there are insufficient Generating Plant, PD WFPSs, Independent Generating Plant or transfers across any External Interconnections available to meet Demand in all or any part of the NI Distribution System and/or in the event of problems on the NI Distribution System, including, without limitation, in the event of both a steady state shortfall of generation and a transient shortfall of generation following a sudden loss of generation. DOC4 also covers operating problems such as unacceptable voltage levels and thermal overloads and also the provision of information on any Demand Control arrangements by Suppliers, including Demand Control arrangements providing for the utilisation of controllable Load blocks on the NI Distribution System (for example, by radio teleswitching).
- DOC4.1.2 (a) **DOC4** deals with the following:
 - (i) Customer Demand Management initiated by Suppliers;
 - (ii) Customer Demand Management initiated by NIE (such as that achieved by directing the timing of supply to a Customer in a manner and to the extent agreed for commercial purposes between the Supplier and its Customer and offered by a Supplier to NIE including that resulting from Load Management Arrangements);
 - (iii) Customer Voltage Reduction initiated by NIE;
 - (iv) **Planned Manual Disconnection** (such as **Rota Load Shedding**) and/or **Emergency Manual Disconnection** initiated by **NIE**;
 - (v) Protection of supply to any part of the **NI Distribution System** where system security is weak; and
 - (vi) Disconnection of Land blocks by operation of Automatic Load Shedding Devices to preserve overall NI Distribution System security,

where the term "Demand Control" is used to describe any or all of those methods of controlling **Demand**.

(b) The type of **Demand Control** utilised by **NIE** in any particular case will depend upon the amount of time between **NIE** becoming aware of the need for implementing **Demand Control** and the time at which it needs to be implemented. In the event of a sudden and unexpected loss of generation and/or **NI Distribution System** problems, the requisite **Demand Control** will normally be achieved by means of **Automatic Load Shedding** but, occasionally, **Emergency Manual Disconnection** may additionally be required. The amount of time which **NIE** has in which to implement **Demand Control** will also determine whether **Customer Demand**

Management will be implemented before voltage reduction. In all cases when **Demand Control** is necessary, **NIE** will generally use **Demand Disconnection** as the last option.

DOC 4.1.3 **Load Shedding** shall not, so far as possible, be exercised in respect of **Protected Customers** and **Contract Customers**. **DOC4**, therefore, applies subject to this exclusion.

DOC 4.2 OBJECTIVE

The objective of **DOC4** is to detail the provisions required to enable **NIE** to achieve a reduction in **Demand** to avoid or relieve operating problems on all or any part of the **NIE System**. Subject to **DOC4.1.3**, **NIE** will utilise **Demand Control** in a manner which does not unduly discriminate against, or unduly prefer, any one or any group of **Customers**. **DOC4** requires that **NIE** be notified of any **Demand Control** arrangements entered into or utilised by **Users**.

DOC 4.3 SCOPE

- DOC 4.3.1 **DOC4** applies to **NIE** and to **Users**, which in **DOC4** means:-
 - (a) Suppliers; and

(b) Generators.

DOC 4.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 4, Demand Control, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 5 OPERATIONAL LIAISON

DOC 5.1 INTRODUCTION

- DOC 5.1.2 **DOC5** sets out the requirements for the exchange of information in relation to **Operations** and/or **Events** on the **NI Distribution System** or a **User System** which have had (or may have had) or will have (or may have) an **Operational Effect**:-
 - (i) on the **NI Distribution System** in the case of an **Operation** and/or **Event** occurring on a **User System**; and
 - (ii) on a User System in the case of an Operation and/or Event occurring on the NI Distribution System;

where no specific requirement for liaison is specified in any other section of the **Distribution Code**. **DOC5** also sets out the procedure for issue of warnings in the event of a risk of serious and widespread disturbance of the whole, or part of, the **NI Distribution System**.

DOC 5.2 <u>OBJECTIVE</u>

The exchange of information is needed in order that the implications of the **Operation** and/or **Event** can be considered and the possible risks arising from it can be assessed and appropriate action taken by the relevant party in order to maintain the integrity of the **NI Distribution System** and the relevant **User Systems**. **DOC5** does not seek to deal with any actions arising from the exchange of information, but merely with that exchange.

DOC 5.3 <u>SCOPE</u>

DOC5 applies to NIE and to Users, which in this DOC5 means:-

(a) Generators; and

(b) Large Demand Customers.

DOC 5.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 5, Operational Liaison, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (b) (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 6 SAFETY CO-ORDINATION

DOC 6.1 INTRODUCTION

- DOC 6.1.1 [(a) Distribution Operating Code No. 6 ("DOC6") specifies the standard procedures which are to be followed by NIE and Generators for the coordination, establishment and maintenance of necessary Safety Precautions when work and/or testing (other than System Tests, which are covered in DOC10 and the type of tests covered DOC11) is to be carried out on the NI Distribution System or a Generator's User System and when, for this to be done safely, Safety Precautions are required on the other's System.
 - (b) The procedures to be followed by NIE and persons connected to the NI Distribution System other than Generators for the co-ordination, establishment and maintenance of Safety Precautions when work and/or testing (other than System Tests, which are covered by DOC10 and the type of tests covered by DOC11) is to be carried out on the NI Distribution System or such person's User System are not dealt with under this DOC6, but are to be agreed locally.
 - (c) NIE may agree detailed site-specific operational procedures with Generators for the co-ordination, establishment and maintenance of Safety Precautions instead of the RISSP procedure detailed in this DOC6. Such operational procedures shall satisfy the requirements of paragraphs DOC6.2.
- DOC 6.1.2 Where, by reason of the design of any HV Apparatus on which Safety Precautions are to be applied, it is not practicable to apply Safety Precautions on such HV Apparatus, the Safety Precautions shall be applied at the most appropriate point(s) on the Generator's Plant and Apparatus (for example, at steam valves) to achieve Safety From the System on the HV Apparatus on which Safety From the System is to be achieved.
- DOC 6.1.3 **DOC6** does not apply to a situation in which **Safety Precautions** need to be agreed solely between **Generators** or between **Generators** and other persons connected to the **NI Distribution System**.
- DOC 6.1.4 **DOC6** does not seek to impose a particular set of **Safety Rules** on **NIE** and **Generators**, the **Safety Rules** to be adopted and used by **NIE** and each **Generator** shall be those chosen by each.
- DOC 6.1.5 The procedures set out in this **DOC6** do not refer expressly to a situation in which both **NIE** and a **User** require the other to implement **Safety Precautions** at the same time. In such circumstances the relevant procedures of this **DOC6** should be applied twice, once with **NIE** acting as **Implementing Safety Co-ordinator** and once with the **User** acting in that role.
- DOC 6.1.6 In this **DOC6** the following terms shall have the following meanings:-
 - (a) **"HV Apparatus"** means **High Voltage** electrical circuits forming part of a **System** on which **Safety From The System** may be required or on which

Safety Precautions may be applied to allow work and/or testing to be carried out on a **System**;

- (b) "Isolation" means the disconnection of HV Apparatus from the remainder of the System in which that HV Apparatus is situated by means either of an Isolating Device(s) in the isolating position or adequate physical separation or sufficient gap or the disablement (by means of switching or dismantling) of Plant and/or Apparatus so that electrical energy cannot pass from the Apparatus (or in the case of Plant, from the associated Apparatus) to the HV Apparatus other than by an Isolating Device;
- (c) **"Earthing**" means a way of providing a connection between conductors and earth by means of an **Earthing Device**.]

DOC 6.2 <u>OBJECTIVE</u>

The objective of this **DOC6** is to achieve **Safety From the System** when work and/or testing on a **System** necessitates the provision of **Safety Precautions** on or relating to another **System** (on or relating to **HV Apparatus**) up to a **Connection Point**.

DOC 6.3 SCOPE

DOC6 applies to NIE and to Generators.

DOC 6.4 PROCEDURE

The **NI Distribution System** related provisions of Operating Code No. 6, Safety Coordination, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 7 CONTINGENCY PLANNING

DOC 7.1 INTRODUCTION

DOC7.1.1 Distribution Operating Code No. 7 ("DOC7") covers the following:-

- (a) the implementation of recovery procedures in the event of a **Total Shutdown** or **Partial Shutdown**;
- (b) the **Re-Synchronisation** of parts of the **Total System** which have ceased to be **Synchronised** with each other where there is no **Total Shutdown** or **Partial Shutdown**;
- (c) the establishment of a communication route and arrangements between senior management representatives of NIE and Users involved in, or who may be involved in, actual or potential serous or widespread disruption to the Total System or a part of the Total System which requires, or may require urgent managerial response, day or night, but which does not fall within the provisions described in DOC7.1.2; and
- (d) the procedure to be followed when the **[NIE Control Centre]** is incapacitated for any reason.
- DOC 7.1.2 It should be noted that, under Article 58 of the **Order**, the **Department** may give directions to [the **TSO**], [**NIE**] and/or any **Generator** and/or any **Supplier** for the purpose of, "mitigating the effects of any civil emergency which may occur" (i.e. for the purposes of planning for dealing with a civil emergency); a civil emergency is defined in the **Order** as "any natural disaster or other emergency which, in the opinion of the **Department**, is or may be likely to disrupt electricity supplies". Under the Energy Act 1976, the Secretary of State has powers to make orders and give directions controlling the production, supply, acquisition or use of electricity, where an Order in Council under Section 3 is in force declaring that there is an actual or imminent emergency affecting electricity supplies. In the event that any such directions are given or orders made under the Energy Act 1976, the provisions of the **Distribution Code** will be suspended insofar as they are inconsistent with them.

DOC 7.2 OBJECTIVE

The overall objectives of DOC7 are:-

- (a) to achieve, as far as possible, assistance in the restoration of the Total System and to enable Demand once again to be satisfied in the shortest possible time, taking into account Power Station capabilities, transfers across any External Interconnections and the operational constraints of the Total System;
- (b) to achieve assistance in the **Re-Synchronisation** of parts of the **Total System** which have ceased to be **Synchronised** with each other;
- (c) to ensure that communication routes and arrangements are available to enable senior management representatives of NIE and Users, who are authorised to make binding decisions on behalf of NIE or the relevant User,

as the case may be, to communicate with each other in the circumstances described in **DOC7.1.1(c)**; and

(d) to ensure that the **NI Distribution System** can continue to operate in the event that the **NIE Control Centre** is incapacitated for any reason.

DOC 7.3 <u>SCOPE</u>

DOC7 applies to NIE and to Users which in this DOC7 means:-

(a) Generators; and

(b) Large Demand Customers.

DOC 7.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 7, Contingency Planning, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

NIE and Users will implement and comply with this Distribution Code accordingly.

[DOC 7.5 EMERGENCY INSTRUCTIONS

During a Total Shutdown, Partial Shutdown or Re-Synchronisation of or to the Total System:-

- (a) it may be necessary for the **TSO** to issue **Emergency Instructions** either directly or through **NIE** [as **Distribution System Operator**];
- (b) NIE [as Distribution System Operator] will as soon as reasonably practicable inform Users which, in the opinion of NIE [as Distribution System Operator], need to be informed that a Total Shutdown or, as the case may be a Partial Shutdown exists or that parts of the Total System have ceased to be Synchronised, and that the TSO intends to implement the Black Start procedure, and may issue Emergency Instructions either directly or through NIE [as Distribution System Operator]; and
- (c) all Users are required to comply with Emergency Instructions whether issued directly by the TSO directly or by NIE [as Distribution System Operator.]

[Note: Further consideration is being given to this provision.]

DISTRIBUTION OPERATING CODE NO. 8 OPERATIONAL EVENT REPORTING AND INFORMATION SUPPLY

DOC 8.1 INTRODUCTION

DOC8 sets out the requirements for reporting in writing and, where appropriate, more fully those **Significant Incidents** which initially were reported to **NIE**, or a **Generator** orally under **DOC5** and the requirements for the provisions to **NIE** of information to enable it to prepare analyses and assessments of policies in the **Distribution Code**.

DOC 8.2 OBJECTIVE

The objective of DOC8 is to facilitate:-

- (i) The provision of more detailed information in writing of **Significant Incidents**;
- (ii) The provision of information aimed at enabling the NI Distribution System to be operated in accordance with the Distribution Code; and
- (iii) The assessment of the effectiveness of policies adopted in accordance with the **Distribution Code**.

DOC 8.3 SCOPE

DOC8 applies to NIE and to Users, which in this DOC8 means:-

(a) Generators; and

(b) Large Demand Customers.

DOC 8.4 PROCEDURE

The **NI Distribution System** related provisions of Operating Code No. 8, Operational Event Reporting and Information Supply, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code** save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 9 NUMBERING AND NOMECCLATURE OF PLANT AND APPARATUS AT CONNECTION SITES

DOC 9.1 INTRODUCTION

- DOC 9.1.1 This **Operating Code** sets out the responsibilities and procedures for determining and notifying **NIE** and **Users** of the numbering and/or nomenclature of the other's **Plant** and/or **Apparatus** at **Connection Sites**. For clarification, nomenclature shall include the selection of **Substation** names.
- DOC 9.1.2 The numbering and/or nomenclature of **Plant** and/or **Apparatus** is to be included in an **Ownership Diagram** prepared for each **Connection Site** as provided in the **CC**.

DOC 9.2 OBJECTIVES

The prime objective embodied in this **DOC9** is to ensure that at any **Connection Site** every item of **Plant** and/or **Apparatus** has numbering and/or nomenclature that, so far as possible, has been mutually agreed and that has been notified between the **NIE** and **Users** to ensure, so far as is reasonably practicable, the safe and effective operation of the **NI Distribution System** by minimising the risk of error in identifying **Plant** and/or **Apparatus**.

DOC 9.3 SCOPE

DOC9 applies to NIE and to Users which, in this DOC9, means:-

- (a) Generators; and
- (b) Large DemandCustomers.

DOC 9.4 PROCEDURE

The **NI Distribution System** related provisions of Operating Code No. 9, Numbering and Nomenclature of Plant and Apparatus at Connection Sites, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code**, save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 10 SYSTEM TESTS

DOC 10.1 INTRODUCTION

- DOC 10.1.1 **Distribution Operating Code No. 10** ("**DOC10**") relates to the following types of test (all of which are referred to as "**System Tests**"):-
 - (a) tests to be carried out by a User or NIE which involve or may involve simulating conditions or the controlled application of irregular, unusual or extreme conditions on the User's System or the NI Distribution System (as the case may be) which may have a material effect on those Systems and other Users' Systems, beyond the User's System or the NI Distribution System (as the case may be); and
 - (b) **Commissioning/Acceptance Tests** or **Plant** and **Apparatus** to be carried out by a **User** or **NIE** which involve or may involve the application of irregular, unusual or extreme conditions and which may have a material effect on those **Systems** and other **Users' Systems**, beyond the **User's System** or the **NI Distribution System** (as the case may be).
- DOC 10.2 **DOC10** only deals with the responsibilities and procedures for arranging and carrying out tests which have (or may have) a material effect on the **Systems** of both **NIE** and **Users**. Accordingly, where a test proposed by a **User** will not have a material effect on the **NI Distribution System** or where a test proposed by **NIE** will not have a material effect on a **User System**, such test will not fall within this **DOC10** and **DOC10** shall not apply to it.
- DOC 10.1.3 **DOC10** does not cover **Commissioning/Acceptance Tests** of a **User's Plant** and **Apparatus** which will have no material effect on the **NI Distribution System** beyond the **User's System** and other **Users' Systems**; such tests will be undertaken solely pursuant to **CC9** (as incorporated pursuant to **DCC4**). Neither does it cover the type of tests which are dealt with in **DOC11** (Testing, Monitoring and Investigation).

DOC 10.2 <u>OBJECTIVE</u>

The overall objectives of DOC10 are:-

- (a) to ensure, so far as possible, that tests proposed to be carried out either by:
 - a User which may have a material effect on the NI Distribution
 System or any part of the NI Distribution System and other
 Users' Systems (in addition to that User's System); or
 - (ii) NIE which may have a material effect on a User's System or any part of a User's System (in addition to the NI Distribution System);

do not threaten the safety of personnel or threaten to damage **Plant** and/or **Apparatus** and cause minimum detriment to **NIE** and **Users**; and

(b) to set out the procedures to be followed for establishing and where appropriate reporting such tests and to set out guidelines for which tests need to be notified to **NIE** prior to the test being carried out.

DOC 10.3 <u>SCOPE</u>

DOC10 applies to NIE and to Users which, in the DOC10, means:-

(a) Generators; and

(b) Customers.

DOC 10.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 10, System Tests, in the **Grid Code** (but not the Introduction, Objectives or Scope thereof) shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code** save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION OPERATING CODE NO. 11 TESTING, MONITORING AND INVESTIGATION

DOC 11.1 INTRODUCTION

Distribution Operating Code No. 11 ("**DOC11**") specifies the procedures to be followed by **NIE** in carrying out:

(a) Monitoring of the compliance of Users with the Distribution Code;

(b) Testing:-

- (i) in certain circumstances, (whether by means of a formal test or verification by inspection) to ascertain whether the **Design and Operating Requirements** are being complied with in respect of User's Equipment (including that of Large Demand Customers); and
- (ii) at the request of a User, in certain circumstances; and
- (c) **Investigations** in relation to equipment and operational procedures at **Power Stations** and other **User Sites**.

DOC 11.2 OBJECTIVES

The objectives of **DOC11** are to establish whether **Users** operate within their **Design and Operating Requirements** and whether **Large Demand Customers'** equipment complies with the **DCC**.

DOC 11.3 <u>SCOPE</u>

DOC11 applies to NIE and to Users which in this DOC11 means:-

- (a) Generators;
- (b) Large Demand Customers; and
- (c) Aggregators.

DOC 11.4 <u>PROCEDURE</u>

The **NI Distribution System** related provisions of Operating Code No. 11, Testing, Monitoring and Investigations, in the **Grid Code** shall apply to this **Distribution Code** as if set out herein in full, such that the relevant provisions shall be deemed to be part of this **Distribution Code** save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

DISTRIBUTION DATA REGISTRATION CODE

DRC1 <u>INTRODUCTION</u>

| | DRC.1 | The Distribution Data Registration Code (" DDRC ") presents a unified listing of all data required by NIE from Users and any Users from NIE , from time to time under the Distribution Code . The data which is specified in each section of the Distribution Code is collated here in the DRC . Where there is any inconsistency in the data requirements under any particular section of the Distribution Code and the Distribution Data Registration Code , the provisions of the particular section of the Distribution Code shall prevail. | |
|-------|---------------|---|--|
| | DRC1. | 2 The DDRC identifies the section of the Distribution Code under which each item of data is required. | |
| | DRC1 | .3 The Code under which any item of data is required specifies procedures and timings for the supply of the data, for routine updating and for recording temporary or permanent changes to that data. All timetables for the provision of data area repeated in the DDRC . | |
| | DRC1 | .4 Various sections of the Distribution Code also specify information which the Users will receive from NIE . This information is summarised in a single schedule in the DDRC (Schedule 8). | |
| DRC2 | <u>OBJECT</u> | <u>TIVE</u> | |
| | The object | etive of the DRC is to:- | |
| | (a) | list and collate all the data to be provided by each category of User to NIE under the Distribution Code ; and | |
| | (b) | list all the data to be provided by NIE to each category of User under the Distribution Code . | |
| DRC 3 | <u>SCOPE</u> | | |
| | The User | he Users to which the DDRC applies are:- | |
| | (a) | Generators; | |
| | (b) | Suppliers; and | |
| | (c) | Large Demand Customers. | |
| DRC 4 | <u>PROCEI</u> | DURE | |
| The | | Distribution System related provisions of the Data Registration Code in the | |

The NI Distribution System related provisions of the Data Registration Code in the Grid Code (but not the Introduction, Objectives or Scope thereof) shall apply to this Distribution Code as if set out herein in full, such that the relevant provisions shall be deemed to be part of this Distribution Code save that (unless the context otherwise requires) all references therein to:

- (a) "the TSO" are references to "NIE";
- (b) the "NI System" are references to the "NI Distribution System"; and
- (c) the "Grid Code" are references to the "Distribution Code".

NIE and Users will implement and comply with this Distribution Code accordingly.

For the avoidance of doubt, Schedule 4 of the DRC shall be replaced by a blank Schedule, and references in Schedule 8 of the DRC to SDC1 shall be removed.

DISTRIBUTION GENERAL CONDITIONS

DGC1 <u>INTRODUCTION</u>

DGC3 <u>SCOPE</u>

DGC4 <u>PROCEDURE</u>

[Note: Further consideration is being given as to whether reference can be made to the General Conditions of the Grid Code in this section.]

[DISTRIBUTION METERING CODE]

[To be considered further]