

This document is classified as **Clear** in accordance with the Panel Information Policy. Recipients can distribute this information to the world, there is no limit on disclosure. Information may be shared without restriction subject to copyright.



DP294

‘Review of DCC Maintenance Activities and Temporary Additional Allowance’

Modification Report

Version 0.1

10 June 2025



About this document

This document is a draft Modification Report. It currently sets out the background, issue, and progression timetable for this modification, along with any relevant discussions, views and conclusions. This document will be updated as this modification progresses.

Contents

1.	Summary	3
2.	Issue	3
3.	Assessment of the proposal	6
4.	Appendix 1: Progression timetable	8
5.	Appendix 2: Glossary	8

Contact

If you have any questions on this modification, please contact:

Talia Lattimore

020 7090 1010

talia.lattimore@gemserv.com

1. Summary

This proposal has been raised by David Rollason from the Data Communications Company (DCC) and is co-sponsored by Emslie Law (OVO).

The DCC is required under the Smart Energy Code (SEC) to maintain DCC Systems to avoid service disruption as much as possible. The Proposer and Co-Sponsor are currently looking to do the following with regards to DCC Maintenance:

- a full review of the best practise to be followed, and the allowable purposes of using Unplanned Maintenance;
- consider opportunities to manage increasing change volumes in a controlled way until the new Data Service Provider (DSP) 2 is delivered via temporarily additional maintenance; and
- introduce Planned Resilience Maintenance, where Maintenance activity is not expected to impact services to Devices connected to 100,000 or more Communications Hubs.

2. Issue

What are the current arrangements?

Planned and Unplanned Maintenance

The DCC is required to maintain DCC Systems to avoid service disruption as much as possible. This includes completing Planned Maintenance and Unplanned Maintenance activities to ensure vital components are running, are up to date, are reliable and secure.

[SEC Section H “DCC Services”](#) and [SEC Section A “Definitions and Interpretation”](#) currently set out provisions related to the maintenance of DCC Systems. This includes definitions and provisions regarding Planned Maintenance and Unplanned Maintenance.

Definition of Planned and Unplanned Maintenance

Planned Maintenance is, in respect of a month, Maintenance of the DCC Systems planned prior to the start of that month and will disrupt, or pose a Material Risk of disruption to the provision of services described in a) and b) below, and where the provision of services is in relation to devices associated with Communications Hubs, at least 100,000 Communications Hubs are affected:

- a) High Impact Planned Maintenance where one or more of the following is disrupted:
 - i. end-to-end communications between Users and Communications Hubs in either direction;
 - ii. install & commission activities; or
 - iii. previously scheduled SMETS1 migrations.
- b) Low Impact Planned Maintenance which will disrupt or poses a Material Risk of disruption to the provision of services, excluding those services set out in High Impact Planned

Maintenance, and will not require changes to be made by Users except in cases where Service Improvements are being made to the SSI.

Planned Maintenance must be notified to Parties 20 working days prior to the start of the month in which the activity is scheduled, in accordance with SEC Section H8.4.

Unplanned Maintenance is, in respect of a month, Maintenance of the DCC Systems that has not been planned prior to the start of that month which disrupts, will disrupt, or poses a Material Risk of disruption to the provision of the Services (and, where it disrupts, will disrupt, or poses a Material Risk of disruption to, the provision of the Services in relation to Devices associated with Communications Hubs, at least 100,000 Communications Hubs are affected).

The DCC must provide as much notice as is possible for Unplanned Maintenance, in accordance with SEC Section H8.6.

Maintenance outside the definition of Planned Maintenance and Unplanned Maintenance

There is a third type of Maintenance that does not fall within the definitions as set out above. That is, Maintenance that does not pose a risk to the provision of services in relation to Devices associated with at least 100,000 Communications Hubs. This type of Maintenance does not currently require any notification of the activity to be provided.

What is the issue?

Impacts due to the current definition of Planned and Unplanned maintenance

Planned and Unplanned Maintenance activities and system releases are inevitable and are required to allow system improvements and the delivery of larger programs and SEC Modifications. Their implementation causes service disruption which impacts DCC Users and consumers. While Planned Maintenance is clearly defined, the allowance for Unplanned Maintenance is ambiguous, including where it might be appropriate to deploy it.

Since 2023 Unplanned Maintenance has been instigated six times. However, there may be a perception that Unplanned Maintenance is being used to enable short notice User impacting work to be undertaken when that activity could have been completed as Planned Maintenance or where the volume of Planned Maintenance is at its maximum allowed time.

The SEC does not contain detail of what might be considered an allowable reason for instigating Unplanned Maintenance. Consideration should be given to documenting reasonable purposes of instigating Unplanned Maintenance, with the end consumer in mind.

Impacts of maintenance outside of the current definition of Planned and Unplanned Maintenance

Planned and Unplanned Maintenance are Maintenance activities which are likely to impact the provision of Services to Devices associated with at least 100,000 Communications Hubs. Where Maintenance is required but this level of Service disruption is not likely there are no restrictions as to when or how this can be completed and no requirement for the DCC to notify Parties.

Maintenance can be deployed without disruption to Services where resiliency is utilised. However, it is noted that any maintenance activity comes with some level of risk. Where such activity is completed but Parties aren't notified, they remain unaware of the activity.

Impacts due to the growth and age of DCC infrastructure

As the Services delivered by the DCC have grown so too have the number of Service Providers. In turn the number of components and amount of required change / maintenance has also increased.

Over the last 5 years the number of DCC Service Providers has increased from 4 to 16. At the end of 2024 there were 19 Service Providers across the DCC ecosystem, an increase of almost 80% in five years.

The DCC and its Service Providers also need to maintain, replace, and uplift technical components to ensure Services can be delivered in line with operational performance measures. The number of DCC Smart Metering Systems has and will continue to increase, and there is wider use of Service Requests as various systems are maturing. Within this context, older, 'on-premises' components require technical refresh activity that is essential to maintain the System, and in some cases, transition to Cloud provision. Additionally, with the introduction of new DSP2 and Future Services Management (FSM) and other capability, DCC Service Providers are looking to minimise overall impacts on DCC Customers by delivering core capability during monthly planned outages wherever this is feasible.

The volume of change has increased significantly over this period and by the end of 2024, change volumes reached ~4800/year. This is a 40% increase on 2023 change volumes and almost 60% compared to 2022 volumes. The SEC allowable volume of Planned Maintenance has not changed during this time period. As we transition from legacy DSP to DSP2, it is reasonable to anticipate a need for additional High Impact Maintenance windows.

Whilst different Maintenance activities can be combined or run in parallel to reduce overall outage time, this approach presents additional risk. The increasing complexity of change means that there is less time available to complete post deployment checks which increases the risk of change related Incidents being experienced.

This has been demonstrated by recent change related Incidents, supported by the fact that the largest contributors to outage time in 2024 were Planned Maintenance and change-related Incidents.

This situation is likely to be exacerbated as the new DSP 2 service is built and deployed, during which period the Maintenance needs of the ageing existing DSP architecture are expected to increase.

Whilst the SEC provides for an allowable volume of Planned Maintenance windows, this has not changed since the current arrangements were put in place, despite the backdrop of increasing volume and complexity of change and Maintenance activity.

There is therefore a need to consider opportunities to manage increasing change volumes and complexity in a controlled way until the new DSP is delivered.

What is the impact this is having?

Increased risk of Major Incidents

As change and Maintenance activity volumes increases, including its complexity, the risk of issues associated with that activity also increases.

Increasingly congested High Impact Windows mean that there is less post-deployment time available within those windows for proving that the changes have been deployed and operate successfully. This increases the risk of major incidents occurring following Planned Maintenance activity.

Whilst overall incident volumes and outage durations are trending downwards, change related major incidents have demonstrated an upward trend.

Ambiguity surrounding Unplanned Maintenance

The SEC wording on Unplanned Maintenance, and the absence of any detail relating to when such Maintenance might be acceptable, does not provide confidence to Parties that the intent of the wording is being followed.

Maintenance utilising resilience

Where Maintenance does not meet the definition of Planned or Unplanned, Parties are not provided with any insight into that activity.

Impact on consumers

Increased volume of Maintenance and more complexed Maintenance increases the likelihood of change related Incidents which can disrupt services in an unplanned and unnotified manner.

The necessity and reasons for deploying Unplanned Maintenance will continue to be disputed.

3. Assessment of the proposal

Areas for assessment

Temporary increase in the allowable volume of Planned Maintenance

Whilst the SEC provides for an allowable volume of Maintenance windows, this has never changed despite the backdrop of increasing volume and complexity of change and Maintenance activity.

There is therefore a need to consider opportunities to manage increasing change volumes in a controlled way until the new DSP 2 is delivered.

The Proposer believes that an increase of six additional hours per month, during the period of April to October is required. The Proposer does not see this increase as needing to be permanent and therefore suggests a sunset clause, linked to the end of data migration to the new DSP, be included in the SEC. This ensures a defined end to the temporary increase, which, if required, can only be ended or revised with the agreement of the SEC Panel. This temporary increase would:

- a) reduce congestion in existing Maintenance windows;
- b) allow additional time for pre and post Maintenance checks to “prove” the success (or otherwise), of the activity;
- c) provide a buffer should change need to be rolled back, or unexpected issues addressed; and
- d) support risk mitigation of change related major incidents and / or Unplanned Maintenance.

Maintenance notifications where service disruption is not expected (Planned Resilience Maintenance)

To supplement the temporary increase in the allowable volume of the Planned Maintenance, the Proposer is seeking to reduce Planned Maintenance window congestion further through the introduction of Planned Resilience Maintenance, where Maintenance activity is not expected to impact services to Devices connected to 100,000 or more Communications Hubs.

Planned Resilience Maintenance would utilise system resilience to implement change without service impact, although it is recognised that any maintenance activity, regardless of the complexity, poses a level of risk. It is proposed that Planned Resilience Maintenance should have a requirement for DCC to provide notification five Working Days advanced notice of such activity. This notification would provide Users with additional insight on DCC Maintenance activities.

Review of the scope/definition of Planned and Unplanned Maintenance

A full review of the best practise to be followed, and the allowable purposes of using Unplanned Maintenance, with the end consumer in mind, needs to be carried out. Amending the term names for clarity, and defining acceptable purposes for instigating Unplanned Maintenance should be considered for inclusion in either the SEC or the DCC's Release Management Policy.

This would ensure clarity on the allowance for completing Unplanned Maintenance and provide assurance to Parties that Unplanned Maintenance is only completed in emergency scenarios.

Sub-Committee input

SECAS will engage with the Chairs from the Operations Group (OPSG), the Technical Architecture and Business Architecture Sub-Committee (TABASC), the Security Sub-Committee (SSC), the Smart Metering Key Infrastructure Policy Management Authority (SMKI PMA), the Testing Advisory Group (TAG) and the Privacy Sub-Committee (PSC) to confirm what input is required from these forums.

SECAS believes the following Sub-Committees will need to provide the following input to this modification:

Sub-Committee input	
Sub-Committee	Input sought
OPSG	Assess any potential operation impacts as a result of the potential solution.
PSC	No input required
TABASC	Assess any potential technical impacts as a result of the potential solution.
SSC	No input required
SMIKI PMA	No input required
TAG	Assess any potential testing impacts as a result of the potential solution.

4. Appendix 1: Progression timetable

Timetable	
Event/Action	Date
Presented to Issues Group	4 June 2025
Draft Proposal raised	By 10 June 2025
<i>Presented to CSC for initial comment</i>	17 June 2025
<i>Modification discussed with TAG</i>	25 June 2025
<i>Modification discussed with TABASC</i>	3 July 2025
<i>Modification discussed with OPSG</i>	8 July 2025
<i>Modification discussed with the Working Group</i>	6 August 2025

Italics denote planned events that could be subject to change

5. Appendix 2: Glossary

This table lists all the acronyms used in this document and the full term they are an abbreviation for.

Glossary	
Acronym	Full term
DCC	Data Communications Company
DSP	Data Service Provider
FSM	Future Services Management
OPSG	Operations Group
PSC	Privacy Sub Committee
SECAS	The Smart Energy Code Administrator and Secretariat
SMETS	Smart Metering Equipment Technical Specifications
SMKI PMA	Smart Metering Key Infrastructure Policy Management Authority
SSC	Security Sub-Committee
TABASC	Technical Architecture and Business Architecture Sub-Committee
TAG	Testing Advisory Group