

MP178 ‘Removing DSP validation against the SMI join status for SR8.8.x’

Annex B

Business requirements – version 0.4

About this document

This document contains the business requirements that support the solution(s) for this Modification Proposal. It sets out the requirements along with any assumptions and considerations. The DCC will use this information to provide an assessment of the requirements that help shape the complete solution.

1. Business requirements

This section contains the functional business requirements. Based on these requirements a full solution will be developed.

Business Requirements	
Ref.	Requirement
1	To remove the Data Service Provider (DSP) validation associated with the unjoin commands (SRV8.8.1 and SRV8.8.2) resulting in Response Code E080801
2	Update the DCC User Interface Specification (DUIS) to align with other Smart Energy Code (SEC) requirements of not mandating DSP validation of unjoin command

2. Considerations and assumptions

This section contains the considerations and assumptions for each business requirement.

2.1 General

2.1.1 Background

The secure exchange of data between two Devices on the same Smart Meter Home Area Network (SMHAN) at the application layer requires pair-wise authorisation of the two Devices. The process of authorising two Devices to communicate is referred to as 'Joining' and the removal of the authorisation is referred to as 'Un-joining'. The following Service Reference Variants (SRVs) for joining and un-joining are available to DCC Users:

- 8.7.1 Join Service (Critical)
- 8.7.2 Join Service (Non-Critical)
- 8.8.1 Unjoin Service (Critical)
- 8.8.2 Unjoin Service (Non-Critical)

The DCC evaluates the responses from the Devices and tracks the status of the joining in the Smart Meter Inventory (SMI).

2.1.2 Issue

There have been cases observed where the response to the SRV 8.7.2 'Join Service (Non-Critical)' is not received by the DSP despite the join working within the Electricity Smart Metering Equipment (ESME). As a consequence, the Service User is unable to send an Unjoin command as the business validation on the SRV 8.8.1 'Unjoin Service (Critical)' or 8.8.2 'Unjoin Service (Non-Critical)' commands check that only Devices joined in the SMI may be un-joined.

2.1.3 Proposed solution

This solution aims to remove DSP validation of Join status in the Smart Meter Inventory (SMI) when sending an Unjoin Service Request. This will allow the sending of unjoin commands irrespective of the join status held in the SMI. This solution would suppress the Response Code E080801 from being created in association with an unjoin command.

This modification does not intend to alter current Security elements of the process.

2.2 Requirement 1: To remove the Data Service Provider (DSP) validation associated with the unjoin commands (SRV8.8.1 and SRV8.8.2) resulting in Response Code E080801

Use cases have arisen that would benefit from removing the DSP validation process, which is currently associated with the Unjoin command. The current manual workaround is costly and time consuming to update the SMI to reflect the correct status for each Device. This has led to unsatisfactory Consumer experience and costs.

A part of the Unjoin command, SRV8.8.2 validates the SMI Join relationship. The system only allows the Unjoin command (SRV8.8.x) if Devices are already joined to each other (in the SMI), otherwise the DSP will reject the Service Request with the following error code.

Response Code	Response Code Description
E080801	According to the DCC Systems Smart Metering Inventory the 'Other Device' is not joined to the BusinessTargetID Device

2.3 Requirement 2: Update the DCC User Interface Specification (DUIS) to align with other Smart Energy Code (SEC) requirements of not mandating DSP validation of unjoin command

The second requirement is about the delivery of the first requirement.

It should be noted that there is no Smart Metering Equipment Technical Specifications (SMETS), GB Companion Specification (GBCS), Security or any other SEC requirement mandating that the DSP must apply such validation other than what is defined in the DUIS Section 3.8.111.3 and 3.8.112.3. Therefore, this area of the SEC needs to be updated if this solution is approved.

3. 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 Services Provider
DUIS	DCC Users Interface Specification
GBCS	GB Companion Specification
ESME	Electricity Smart Metering Equipment
SEC	Smart Energy Code
SMETS	Smart Metering Equipment Technical Specifications
SMHAN	smart meter Home Area Network
SMI	Smart Metering Inventory
SR	Service Request
SRV	Service Reference Variant