

MPRS Validation Rules**Version: 8.2.1****Date: June 2023****Classification: Open****Approved by: Richard Warham**

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DOCUMENT CONTROL

A Document History

Version	Author(s)	Reason for Issue	Date
8.0	Madison Layton	Faster switching Added missing validation for LLFC MS Specific Type. Added additional ISC 34 message to support this.	August 2021
8.2	Daniel Tadicicco	MHHS Stage 0 BSC CP 1558, New Connection, EDI, Import Export Association REC CP R0032 D0312 Smart Data items	June 2023
8.2.1	Daniel Tadicicco	REC CP R0097 changes to D0312 validation rules	June 2023

B Distribution

Name	Company	Role
	LDSOs	
	RECCo	
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1 INTRODUCTION

Attachment 1 is a detailed list of the MPRS rules at the Business Entity level. This list was produced during the design phase from the design documentation and is therefore fairly technical in its presentation.

Attachment 2 contains examples of the impact of the detailed rules on the defined data flows into MPRS. These are examples only and should not be taken as exhaustive.

Attachment 3 lists other rules, constraints and/or design features of which Suppliers sending data to MPRS need to be aware.

Attachment 4 lists the reasons associated with rejection reason codes.

2 ATTACHMENT 1 – MPRS BUSINESS ENTITY RULES

2.1 MPRS Business Entity Rules

These rules are defined in the MPRS Detailed System Specification Appendix B under ‘Notes and Remarks’ for each entity. The rules are summarised in Table 1 below.

The rules are grouped by business entity and each rule is classified as one of the following types:-

Type	Rule Classification
Attribute Rule	Rule applies to the attributes of one instance of the entity only. <i>For example, the Effective From Date of an Appointment must be no earlier than the Retrospective Change Period before the Entry Date of the Appointment. This is expressed in table 1 as follows:-</i> <i>EFD >= Entry Date - Retrospective Change Period</i>
Instance Rule	Rule applies to the attributes across multiple instances of the entity. <i>For example, no new REGISTRATION can be made for a METERING POINT which has an existing REGISTRATION with an outstanding objection.</i>
Related Entity Rule	Rule applies to the relationship between the attributes of the entity and the attributes of a related entity <i>For example, for a DATA AGGREGATOR APPOINTMENT, the DATA AGGREGATOR must be of the same type as the MP MEASUREMENT CLASS for the period of the appointment.</i>

Five ‘general’ rules are also identified (G1 - G5) which are applicable to many entities in a similar form. These five rules are defined as follows:-

Rule #	Type	Rule
G1	Attribute	The Effective From Date (EFD) of the period of applicability of any instance of an entity must be on or before the Effective To Date (ETD) of the period. This is expressed in table 1 as <i>Effective From Date (EFD) <= Effective To Date (ETD)</i>
G2	Instance	There must not be any overlapping periods of {EFD, ETD} in the instances of the entity which are all related to the same parent entity.
G3	Related Entity	Any period of applicability {EFD, ETD} of any instance of the entity must be contained within the applicable periods of its related parent entity.

Validation Rules

Rule #	Type	Rule
G4	Instance	There must not be any gaps in the {EFD, ETD} periods of the instances of the entity during the applicable periods of its related parent entity.
G5	Related Entity	The start of the applicable period {EFD} of the instances of the entity must be within the {EFD, ETD} period of its related parent entity.

Table 1 Business Rules within MPRS

#	Entity	Rule #	Type	Rule
1	DATA AGGREGATOR		G1	
2			G2	for same ID and TYPE
3	DATA AGGREGATOR APPOINTMENT		G1	
4			G2	for a REGISTRATION
5			G5	associated entity = DATA AGGREGATOR
6			G3	associated entity = REGISTRATION
7		1	Related Entity	REGISTRATION must have valid data as at the <i>EFD</i> for MP ENERGISATION STATUS, MP MEASUREMENT CLASS, MP PROFILE CLASS (HH) or MP CONFIGURATION PROFILE (NHH), DC APPOINTMENT.
8		2	Related Entity	DATA AGGREGATOR must be same type as MP MEASUREMENT CLASS for the period { <i>EFD</i> , <i>ETD</i> }
9		3	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
10		4	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
11		5	Related Entity	<i>EFD</i> of a default appointment must = <i>EFD</i> of REGISTRATION
12		6	Instance	The <i>EFD</i> of a new appointment for REGISTRATION must >= <i>EFD</i> of latest appointment.
13	DATA COLLECTOR		G1	
14			G2	for same ID and TYPE
15	DATA COLLECTOR APPOINTMENT		G1	
16			G2	for a REGISTRATION
17			G5	associated entity = DATA COLLECTOR

Validation Rules

#	Entity	Rule #	Type	Rule
18			G3	associated entity = REGISTRATION
19		1	Related Entity	DATA COLLECTOR must be same type as MP MEASUREMENT CLASS for the period {EFD, ETD}
20		2	Attribute	EFD <= Entry Date + Advance Change Period
21		3	Attribute	EFD >= Entry Date - Retrospective Change Period
22		4	Related Entity	EFD of a default appointment must = EFD of REGISTRATION
23		5	Instance	The EFD of a new appointment for REGISTRATION must >= EFD of latest appointment.
24	GSP GROUP		G1	
25		1	Related Entity	ETD >= ETD of any related MP GSP GROUP
26	IN HOME DISPLAY INSTALL STATUS	1	Attribute	Must be I, D, E or F. (This represents Installed, Declined, Existing or Failed)
27	LINE LOSS FACTOR CLASS		G1	
28		1	Related Entity	ETD >= ETD of any related MP LLF CLASS
29	MEASUREMENT CLASS		G1	
30		1	Related Entity	ETD >= ETD of any associated MP MEASUREMENT CLASS
31	METER ASSET PROVIDERS		G1	
32			G2	for same ID
33	METER OPERATOR		G1	
34			G2	for same ID and TYPE
35	METER OPERATOR APPOINTMENT		G1	
36			G2	for a REGISTRATION
37			G5	associated entity = METER OPERATOR

Validation Rules

#	Entity	Rule #	Type	Rule
38			G3	associated entity = REGISTRATION
39		1	Related Entity	METER OPERATOR must be same type as MP MEASUREMENT CLASS for the period {EFD, ETD} and specifically: METER OPERATOR must be a MOp with MP MEASUREMENT CLASSES A, C, E, F and G. METER OPERATOR must be an UMSO with MP MEASUREMENT CLASS B METER OPERATOR must be an MA with MP MEASUREMENT CLASS D
40		2	Attribute	$EFD \leq \text{Entry Date} + \text{Advance Change Period}$
41		3	Attribute	$EFD \geq \text{Entry Date} - \text{Retrospective Change Period}$
42		4	Related Entity	EFD of a default appointment must = EFD of REGISTRATION
43		5	Instance	The EFD of a new appointment for REGISTRATION must \geq EFD of latest appointment.
44	METER/TIMESWITCH CLASS		G1	
45		1		$ETD \geq ETD$ of any related METERING POINT METER/TIMESWITCH CLASS
46	METERING POINT	1	Attribute	No changes are allowed of a 'disconnected' METERING POINT if the effective from date is after the date of disconnection.
47		2	Related Entity	When a METERING POINT is created, a METERING POINT STATUS of 'new' is also created.
48		3	Attribute	At least one Address line OR the Post Code must be present
49	METERING POINT ASSOCIATION	1	G1	
50		2	G2	
51		3	Attribute	$EFD \leq \text{MPRS System Date}$
52		4	Related Entity	EFD must be \geq MP Status N (RMP Status Created) EFD
53	METERING POINT ASSOCIATED EXPORT MPAN	1	Attribute	Must be a valid MPAN Core
54		2	Related Entity	Must have a Metering Point Energy Direction of Export

Validation Rules

#	Entity	Rule #	Type	Rule
55		3	Related Entity	Must not have an MP Status of Disconnected (RMP Status Terminated)
56		4	Related Entity	Must not be Associated with another Import MPAN
57	METERING POINT ASSOCIATED IMPORT MPAN	1	Attribute	Must be a valid MPAN Core
58		2	Related Entity	Must have a Metering Point Energy Direction of Import
59		3	Related Entity	Must not have an MP Status of Disconnected (RMP Status Terminated)
60		4	Related Entity	Must not be Associated with another Import MPAN
61		5	Related Entity	Must not be a Secondary MPAN in an MPAN Relationship
62	METERING POINT CONNECTION TYPE	1	G1	
63		2	G2	
64		4	G4	
65		5	Attribute	Must be a valid value, i.e. one of the following: 'W' Whole Current 'L' Low Voltage Current Transformer 'H' High Voltage Current Transformer 'E' Extreme High Voltage Current Transformer 'U' Unmetered
66		6	Instance	The number of Connection Type Indicator changes must not exceed the maximum allowed
67		7	Related Entity	EFD must be >= MP Status N (RMP Status Created) EFD
68		8	Attribute	EFD must not exceed the Advance Change Period
69	METERING POINT DCC SERVICE FLAG		G1	
70			G2	For a METERING POINT

Validation Rules

#	Entity	Rule #	Type	Rule
71		1	Related Entity	For a 'disconnected' METERING POINT, the <i>EFD</i> <= date of disconnection
72		2	Instance	New <i>EFD</i> >= <i>EFD</i> of latest for METERING POINT
73	METERING POINT ENERGY DIRECTION	1	Attribute	Must contain a value of either: I = "Import" E= "Export"
74		2	Instance	The number of Energy Direction changes must not exceed the maximum allowed
75		3	Related Entity	Specified Energy Direction must match the MS Specific LLF Class Initiator Energy Direction assigned to the currently effective Line Loss Factor Class as defined in MDD
76		4	Related Entity	The specified Energy Direction cannot be Export if the MPAN is in an active relationship as the primary MPAN
77		5	Related Entity	The specified MPAN must not currently be part of an Import/Export Association
78	METERING POINT ENERGISATION STATUS		G1	
79			G2	for a REGISTRATION
80		1	Related Entity	Energisation Status can only be set if, on the <i>EFD</i> , LLF CLASS, TS CODE, MEASUREMENT CLASS, and PROFILE CLASS/MP CONFIGURATION PROFILE CLASS are defined.
81		2	G3	associated entity = DATA COLLECTOR APPOINTMENT
82		3	G3	associated entity = DATA AGGREGATOR APPOINTMENT
83		4	G3	associated entity = METER OPERATOR APPOINTMENT
84		5	Related Entity	Status must be 'de-energised' when MP is 'disconnected'
85		6	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
86		7	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
87		8	Related Entity	<i>EFD</i> of a default status must = <i>EFD</i> of REGISTRATION
88		9	Instance	The <i>EFD</i> of a new status for REGISTRATION must >= <i>EFD</i> of latest status

Validation Rules

#	Entity	Rule #	Type	Rule
89	METERING POINT GSP GROUP		G1	
90			G2	for a METERING POINT
91			G4	for a METERING POINT
92		1	Related Entity	If METERING POINT is disconnected, <i>EFD</i> < disconnection date
93		2	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
94		3	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
95		4	Instance	New <i>EFD</i> >= <i>EFD</i> of latest for METERING POINT
96	METERING POINT LLF CLASS		G1	
97			G2	for METERING POINT
98			G4	for METERING POINT at status 'traded'
99		1	Related Entity	For a 'disconnected' METERING POINT, the <i>EFD</i> <= date of disconnection
100		2	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
101		3	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
102		4	Instance	New <i>EFD</i> >= <i>EFD</i> of latest for METERING POINT
103		6	Related Entity	For a LLF Class with a Site Specific LLF Type (J0775 B or D), the MEASUREMENT CLASS TYPE must be HH
104	METERING POINT MEASUREMENT CLASS		G1	
105			G2	for a REGISTRATION
106			G4	for METERING POINT at status 'traded'
107		1	Related Entity	For a 'disconnected' METERING POINT, the <i>EFD</i> <= date of disconnection

Validation Rules

#	Entity	Rule #	Type	Rule
108		2	Related Entity	The TYPE of the MEASUREMENT CLASS must be the same as any DA APPOINTMENT, DC APPOINTMENT, METER OPERATOR APPOINTMENT or PROFILE CLASS or an MP CONFIGURATION PROFILE on the EFD and additionally: METER OPERATOR must be a MOp with MP MEASUREMENT CLASSES A, C, E, F and G. METER OPERATOR must be an UMSO with MP MEASUREMENT CLASS B METER OPERATOR must be an MA with MP MEASUREMENT CLASS D
109		3	Attribute	EFD <= Entry Date + Advance Change Period
110		4	Attribute	EFD >= Entry Date - Retrospective Change Period
111		5	Related Entity	EFD of a default class must = EFD of REGISTRATION
112		6	Instance	The EFD of a new class for REGISTRATION must >= EFD of latest class
113		7	Related Entity	The TYPE of MEASUREMENT CLASS must be HH if the LLF Class is Site Specific (J0775 B or D)
114	METERING POINT METER ASSET PROVIDERS		G1	
115			G5	associated entity = METER ASSET PROVIDER
116			G2	associated entity = REGISTRATION
117			G3	associated entity = METER OPERATOR APPOINTMENT
118			G3	associated entity = SUPPLIER
119		1	Related Entity	For a 'disconnected' METERING POINT, the EFD <= date of disconnection
120		2	Attribute	EFD {MAPA} <= Entry Date
121		3	Attribute	Current METER OPERATOR - the sender METER OPERATOR must match the latest METER OPERATOR APPOINTMENT or Previous METER OPERATOR - the sender METER OPERATOR must match the previous METER OPERATOR and the ETD of the METER OPERATOR must be on or after the Effective From Date {MAPA}

Validation Rules

#	Entity	Rule #	Type	Rule
122		4	Attribute	Meter ID must be associated with specified MPAN Core
123		5	Attribute	Meter ID must be unique within MPAN Core
124		6	Attribute	A METER OPERATOR is assigned to the MPAN Core as at the Effective from Date {MAPA}
125		7	Attribute	Effective from Date {MAPA} must be >= existing Effective from Date {MAPA}
126	METERING POINT METERS		G1	
127			G3	associated entity = METERING POINT
128		1	Related Entity	For a 'disconnected' METERING POINT, the Date of Meter Installation <= date of disconnection THIS APPLIES TO 12D ROWS ONLY – Meter Removals after the Disconnection Date are allowed.
129		2	Attribute	Date of Meter Installation <= Entry Date
130		3	Related Entity	There must be a METER OPERATOR to have a meter. There must be a REGISTRATION to have a METER OPERATOR
131		4	Attribute	Meter Type must exist in the valid list (J0483)
132		5	Attribute	associated entity = METER ASSET PROVIDER
133		6	Attribute	The previous METER OPERATOR can only alter meters within their METER OPERATOR appointment period. The Meter Install Date must be equal to or greater than the METER OPERATOR EFD but not later than the METER OPERATOR ETD or The sender METER OPERATOR MPID must match the previous METER OPERATOR and the ETD {MOPA} of the METER OPERATOR must be on or after the Install Date
134		7	G5	associated entity = METER OPERATOR APPOINTMENT
135		8	Attribute	METER ID (serial number) must not exist in both 12D and 13D groups
136		9	Attribute	Date of Meter Removal >= Date Meter of Installation

Validation Rules

#	Entity	Rule #	Type	Rule
137		10	Attribute	METER ID (serial number) must be unique within the 12D group
138		11	Attribute	METER ID (serial number) must be unique within the 13D group
139		12	Attribute	Date of Meter Removal <= entry date
140		13	Attribute	Current METER OPERATOR - When no 12D row is provided (i.e. All meters to be removed) the sender METER OPERATOR must match the current METER OPERATOR APPOINTMENT or Previous METER OPERATOR - the sender METER OPERATOR must match the previous METER OPERATOR and the ETD {MOPA} of the METER OPERATOR APPOINTMENT must be on or after the Date of Meter Removal
141		14	Attribute	Meter Location Must be a Valid value as defined in DTC J0419
142		15	Related Entity	Meter Location must be specified for Smart Meter Types (Prefixed with S1, S2 or 2)
143		16	Related Entity	Meter Location must not be included for Traditional and Advanced Meter Types
144		17	Attribute	ESME ID must be specified as XX-XX-XX-XX-XX-XX-XX (0-9, A-Z)
145		18	Instance	ESME ID must be unique (excluding Related MPANs and Associated Import Export)
146		19	Related Entity	ESME ID must be specified for Smart Meter Types (Prefixed with S1, S2 or 2)
147		20	Related Entity	ESME ID must not be specified for Traditional and Advanced
148		21	Attribute	Where the Meter Type is S1 the Number of Displayed Register Digits value must be either 6 or 5 Where the Meter Type is S2A, S2AD, S2ADE, 2ADF, 2ADEF, 2AEF, 2AF, S2B, S2BD, S2BDE, 2BF, 2BDF, 2BDEF or 2BEF the value must be "5". Where the Meter Type is prefixed with "S2C" the value must be "6". Where the Meter Type is 2CDEF, 2CF, 2CDF or 2CEF the value must be "6"
149		22	Related Entity	Number of Displayed Register Digits must be specified for Smart Meter Types (Prefixed with S1, S2 or 2)

Validation Rules

#	Entity	Rule #	Type	Rule
150		23	Related Entity	Number of Displayed Register Digits must not be specified for Traditional and Advanced
151		14	Attribute	When removing a meter, METER ID (Serial Number) must already be associated with the MPAN
152	METERING POINT METERED INDICATOR		G1	
153			G2	for a REGISTRATION
154		1	Related Entity	For a 'disconnected' METERING POINT, the EFFECTIVE FROM DATE <= date of disconnection
155		2	Instance	Can only be changed once and only from True (T) to False (F)
156	METERING POINT METER/TIMESWITCH CLASS		G1	
157			G2	for a REGISTRATION
158			G4	for METERING POINT at status 'traded'
159			G5	for a MTC/SSC COMBINATION where MP CONFIGURATION PROFILE exists
160		1	Related Entity	For a 'disconnected' METERING POINT, the <i>EFD</i> <= date of disconnection
161		2	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
162		3	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
163		4	Related Entity	<i>EFD</i> of a default class must = <i>EFD</i> of REGISTRATION
164		5	Instance	The <i>EFD</i> of a new class for REGISTRATION must >= <i>EFD</i> of latest class
165	METERING POINT PRIMARY RELATIONSHIP		G1	
166			G2	associated entity = REGISTRATION
167			G3	associated entity = MP SECONDARY RELATIONSHIP
168		1	Attribute	When the RELATIONSHIP ACTION is 'C' (CREATE) or 'A' (AMEND) the METERING POINT must not be disconnected
169		2	Attribute	Sending SUPPLIER must be the current SUPPLIER for the PRIMARY MPAN

Validation Rules

#	Entity	Rule #	Type	Rule
170		3	Attribute	PRIMARY MPAN must not be in a relationship when RELATIONSHIP ACTION is 'C' (CREATE)
171		4	Attribute	PRIMARY MPAN must be in a relationship when RELATIONSHIP ACTION is 'A' (AMEND) or 'D' DELETE
172		5	Attribute	RELATIONSHIP ACTION must be a 'C' (CREATE), 'A' (AMEND) or 'D' (DELETE)
173		6	Attribute	When RELATIONSHIP ACTION is 'D' (DELETE) all active SECONDARY MPANs held in MPRS must be specified.
174		7	Attribute	When RELATIONSHIP ACTION is 'A' (AMEND) all active SECONDARY MPANs held in MPRS must be specified.
175		8	Attribute	When RELATIONSHIP ACTION is 'C' (CREATE) at least 1 19M Group record must be specified
176		9	Attribute	When RELATIONSHIP ACTION is 'A' (AMEND) ALL specified MPAN Actions must not be 'D' (Delete)
177		10	Attribute	When the MPAN Action is 'A' (ADD) or 'C' (CONTINUE) the MPAN Core must not be disconnected
178		11	Attribute	The PRIMARY and SECONDARY MPAN cannot be the same
179		12	Attribute	A SECONDARY MPAN must be related to the PRIMARY MPAN when RELATIONSHIP ACTION is 'A' (AMEND) or 'D' (DELETE), unless the MPAN ACTION = 'A' (ADD).
180		13	Attribute	When the RELATIONSHIP ACTION is 'C' (CREATE) or 'A' (AMEND) the source SUPPLIER must be the current SUPPLIER for the SECONDARY MPAN OR the current SUPPLIER for the PRIMARY MPAN
181		14	Attribute	The MPAN ACTION must be 'C' (CONTINUE), 'A' (ADD) or 'D' (DELETE)
182		15	Attribute	When RELATIONSHIP ACTION is 'C' (CREATE) MPAN Action must be 'A' (ADD)
183		16	Attribute	When RELATIONSHIP ACTION is 'D' (DELETE) MPAN Action must be 'D' (Delete)
184		17	Related Entity	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date
185	METERING POINT SECONDARY RELATIONSHIP		G1	
186			G2	associated entity = REGISTRATION

Validation Rules

#	Entity	Rule #	Type	Rule
187			G3	associated entity = MP PRIMARY RELATIONSHIP
188		1	Attribute	When RELATIONSHIP ACTION is 'D' (DELETE) all active SECONDARY MPANs held in MPRS must be specified.
189		2	Attribute	When RELATIONSHIP ACTION is 'A' (AMEND) all active SECONDARY MPANs held in MPRS must be specified.
190		3	Attribute	When RELATIONSHIP ACTION is 'C' (CREATE) at least 1 19M Group record must be specified
191		4	Attribute	When RELATIONSHIP ACTION is 'A' (AMEND) ALL specified MPAN Actions must not be 'D' (Delete)
192		5	Attribute	When the MPAN Action is 'A' (ADD) or 'C' (CONTINUE) the MPAN Core must not be disconnected
193		6	Attribute	SECONDARY MPAN must not be in another relationship.
194		7	Attribute	FOR a SECONDARY MPAN the 19M rows within a '18M' instruction can only have 1 occurrence of any MPAN Core specified
195		8	Attribute	The PRIMARY and SECONDARY MPAN cannot be the same
196		9	Attribute	A SECONDARY MPAN must be related to the PRIMARY MPAN when RELATIONSHIP ACTION is 'A' (AMEND) or 'D' (DELETE), unless the MPAN Action = 'A' (ADD).
197		10	Attribute	When the RELATIONSHIP ACTION is 'C' (CREATE) or 'A' (AMEND) the source SUPPLIER must be the current SUPPLIER for the Secondary MPAN OR the current SUPPLIER for the PRIMARY MPAN
198		11	Attribute	The MPAN ACTION must be 'C' (CONTINUE), 'A' (ADD) or 'D' (DELETE)
199		12	Attribute	When RELATIONSHIP ACTION is 'C' (CREATE) MPAN ACTION must be 'A' (ADD)
200		13	Attribute	When RELATIONSHIP ACTION is 'D' (DELETE) MPAN ACTION must be 'D' (DELETE)
201		14	Related Entity	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date
202	METERING POINT STATUS		G1	
203			G2	for a METERING POINT

Validation Rules

#	Entity	Rule #	Type	Rule
204			G4	for a METERING POINT
205			G5	'Traded' status only if associated entity ENERGISATION STATUS exists
206			G5	'Registered' or 'Traded' only if associated entity REGISTRATION exists.
207		1	Attribute	Identifier is in set { 'N', 'R', 'T', 'X' }
208		2	Attribute	Valid Status transitions are: 'N' to { 'R', 'T', 'X' }; 'R' to { 'T', 'X' }; 'T' to { 'X' }
209		3	Attribute	For 'disconnected' status <i>EFD</i> <= date of entry
210		4	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
211		5	Instance	New <i>EFD</i> > <i>EFD</i> of latest status for METERING POINT
212		6	Related Entity	For 'disconnected' MPAN cannot have an entry in MP_PRIMARY_RELATIONSHIPS or MP_SECONDARY_RELATIONSHIP where the MPRS System Date is between the respective <i>EFD</i> and <i>xETD</i> of the relationship.
213	MP CONFIGURATION PROFILE		G1	
214			G2	for a REGISTRATION
215			G5	for a STANDARD SETTLEMENT CONFIGURATION PROFILE CLASS
216			G3	for a METERING POINT of type NHH
217			G5	for a MTC/SSC COMBINATION where METERING POINT METER/TIMESWITCH CLASS exists
218		1	Related Entity	MP PROFILE CLASS must not exist for same MP on <i>EFD</i>
219		2	Related Entity	<i>EFD</i> of profile of a 'disconnected' MP <= disconnection date of METERING POINT
220		3	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
221		4	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
222		5	Related Entity	<i>EFD</i> of a default profile must = <i>EFD</i> of REGISTRATION
223		6	Instance	The <i>EFD</i> of a new profile for REGISTRATION must >= <i>EFD</i> of latest profile
224	MP PROFILE CLASS		G1	

Validation Rules

#	Entity	Rule #	Type	Rule
225			G2	for a REGISTRATION
226			G5	for PROFILE CLASS
227		1	Related Entity	MP CONFIGURATION PROFILE must NOT exist for same MP on <i>EFD</i>
228		2	Related Entity	Must be same type as MEASUREMENT CLASS on <i>EFD</i>
229		3	Related Entity	<i>EFD</i> of profile of a 'disconnected' MP <= disconnection date of METERING POINT
230		4	Attribute	<i>EFD</i> <= Entry Date + Advance Change Period
231		5	Attribute	<i>EFD</i> >= Entry Date - Retrospective Change Period
232		6	Related Entity	<i>EFD</i> of a default profile must = <i>EFD</i> of REGISTRATION
233		7	Instance	The <i>EFD</i> of a new profile for REGISTRATION must >= <i>EFD</i> of latest profile
234	MP GREEN DEAL		G1	
235			G3	For Green Deal Licensee
236			G4	For METERING POINT at status 'traded'
237		1	Related Entity	MP LLFC must be of type IMPORT
238		2	Attribute	<i>EFD</i> > Entry Date
239		3	Related Entity	MPAN must not have a registration with Registration Status Pending
240		4	Related Entity	MPAN must not have a registration with Registration Status Secure Active and Supply Start Date > MPRS System Date
241	MP IN HOME DISPLAY INSTALL STATUS		G1	
242			G2	for a REGISTRATION
243			G5	for a REGISTRATION
244		1	Attribute	Must be I, D or E. (representing Installed, Declined or Existing)
245		2	Attribute	<i>EFD</i> >= Entry Date – Retrospective Change Period

Validation Rules

#	Entity	Rule #	Type	Rule
246		3	Attribute	EFD <= Entry Date
247		4	Instance	The <i>EFD</i> of a new MP IN HOME DISPLAY INSTALL STATUS for REGISTRATION must >= <i>EFD</i> of latest MP IN HOME DISPLAY INSTALL STATUS
248		5	Related Entity	<i>EFD</i> of a default MP IN HOME DISPLAY INSTALL STATUS will retain the <i>EFD</i> of the latest status for the previous Registration
249	MP SMETS VERSION	1	G1	
250			G2	for a REGISTRATION
251			G5	for a SMETS VERSION
252	MTC/SSC COMBINATION		G1	
253		1		<i>ETD</i> >= <i>ETD</i> of any related METERING POINT METER/TIMESWITCH CLASS
254		2		<i>ETD</i> >= <i>ETD</i> of any related MP CONFIGURATION PROFILE
255	PROFILE CLASS		G1	
256		1	Related Entity	<i>ETD</i> >= <i>ETD</i> of any associated SETTLEMENT CONFIGURATION CLASS
257		2	Related Entity	<i>ETD</i> >= <i>ETD</i> of any associated MP PROFILE CLASS
258	REFRESH REQUEST	1	Attribute	Significant From Date <= 'Current Date' + 2 years
259	REGISTRATION		G1	
260			G2	for a METERING POINT ignoring REGISTRATIONS with registration status 'cancelled'
261			G3	for SUPPLIER
262			G4	for 'registered' or 'traded' METERING POINT
263		1	Attribute	<i>EFD</i> > entry date
264		2	Instance	New Supplier must not be currently liable for the MP
265		4	Related Entity	METERING POINT STATUS not 'disconnected' on <i>EFD</i>

Validation Rules

#	Entity	Rule #	Type	Rule
266		8	Instance	No existing REGISTRATION for the METERING POINT can be pending. ('pending' on a date = <i>EFD</i> > the date) (ignoring REGISTRATIONS with registration status 'cancelled')
267		10	Attribute	Entry date >= receipt date
268		23	Attribute	Supplier must be Green Deal Licensee if active or future Green Deal exists
269			Attribute	Registration Inactive Date >= MPRS system date where the MPAN Status is Disconnected
270			Attribute	Registration Inactive Date >= Supply Start Date
271			Attribute	Registration Status From Date must not be prior to the previous Registration Status From Date
272			Attribute	If Registration Status = 'Secured Inactive' then Registration Effective To Date already set OR the MPAN Status is Disconnected.
273			Instance	Valid Registration Status transitions are: NULL to 'Pending'; 'Pending' to {'Cancelled' or 'SecuredActive'}; 'SecuredActive' to 'SecuredInactive'
274			Attribute	If Registration Status = 'Cancelled' then Supply Start Date > MPRS System Date
275	RESEND REQUEST	1	Attribute	Data format must be specified for resend method other than network
276	SETTLEMENT CONFIGURATION PROFILE CLASS		G1	
277			G3	for PROFILE CLASS
278			G3	for STANDARD SETTLEMENT CONFIGURATION
279		1	Attribute	<i>ETD</i> >= <i>ETD</i> of any associated MP CONFIGURATION PROFILE CLASS
280	SMART METERING SYSTEM OPERATORS		G1	
281			G2	for same ID
282	SMART METERING SYSTEM OPERATORS APPOINTMENTS		G1	
283			G2	For a REGISTRATION

Validation Rules

#	Entity	Rule #	Type	Rule
284			G3	associated entity = REGISTRATION
285			G5	Associated entity = SMART METER SYSTEM OPERATORS
286		1	Attribute	EFD >= Entry Date – Retrospective Change Period
287		2	Attribute	EFD <= Entry Date
288		3	Related Entity	<i>EFD</i> of a default appointment will retain the <i>EFD</i> of the latest appointment for the previous Registration
289		4	Instance	The <i>EFD</i> of a new appointment for REGISTRATION must >= <i>EFD</i> of latest appointment.
290	SMETS VERSION	G1		
291		1	Attribute	Must be a valid SMETS Version as defined by Elexon
292	STANDARD SETTLEMENT CONFIGURATION		G1	
293		1	Related Entity	<i>ETD</i> >= <i>ETD</i> of any associated SETTLEMENT CONFIGURATION PROFILE CLASS
294	SUPPLIER		G1	
295			G2	for same ID

3 ATTACHMENT 2 – DATA FLOW VALIDATION

Examples of the Impact of MPRS Business Entity Rules on Inward Data Flows from Suppliers

The examples below are based on extracts from the Data Transfer Catalogue. These illustrate the impact of the Business Entity rules listed in Attachment 1 on the data flows from a Supplier to MPRS.

These are examples only and are not exhaustive of all the rules in Attachment 1.

Examples of rules are shown as text in a box like this.
A line will indicate the associated data item(s) where appropriate.

MRA Secretariat

MRA Data Transfer Catalogue

Flow Reference: D0205
Flow Name: Update Registration Details
Flow Description: A Supplier initiated update of registration details
Flow Type: Electronic and Manual
Flow Sensitivity: Medium
Data Protection: No
Flow Ownership: MRA

From Supplier **To** MPAS **Version** 2.0

Data Items:

Reference	Item Name
J0163	Data Aggregation Type
J0183	Data Aggregator Id
J0205	Data Collector Id
J0218	Data Collector Type
J0219	Effective from Date {DCA}
J0210	Effective from Date {MOA}
J0334	Effective from Settlement Date {DAA}
J1836	Effective from Settlement Date {IHDI}
J0297	Effective from Settlement Date {MSES}
J0307	Effective from Settlement Date {MSMC}
J0308	Effective from Settlement Date {MSPC}
J0049	Effective from Settlement Date {REGI}
J0300	Effective from Settlement Date {SCON}
J1838	Effective from Settlement Date {SMSO}
J0080	Energisation Status
J0330	File Sequence Number
J1835	In Home Display Install Status
J0109	Instruction Number
J0723	Instruction Type
J0082	Measurement Class Id
J0178	Meter Operator Id
J0675	Meter Operator Type
J0301	Meter/Timeswitch Class Effective from Date
J0220	Meter/Timeswitch Class Id
J0003	MPAN Core
J0071	Profile Class Id
J1837	Smart Metering System Operator
J1839	SMETS Version
J0076	Standard Settlement Configuration Id

Flow Structure:

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
752	File Sequence Number	1	G									
					1							File Sequence Number
452	Identify Specific Registration and Provide Update Details	1-*	G									

Validation Rules

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
						1						Instruction Number
	MPAN Core / Effective from Settlement Date {REGI} must identify the registration.					1						Instruction Type
												MPAN Core
							1					Effective from Settlement Date {REGI}
	Any Effective from Settlement Date {XXXX} must not be prior to the previous EfSD for that data item AND must be within the period of validity of that data item.					0						Energisation Status
												Effective from Settlement Date {MSES}
							0					Measurement Class Id
	All or None of the data items of a "group" [illustrated by { }] must be specified.					0						Effective from Settlement Date {MSMC}
												Meter Timeswitch Code
							0					Meter Timeswitch Code Effective from Date
	This "group" is a special case - refer to Attachment 3 # 1.					0						Profile Class Id
												Effective from Settlement Date {MSPC}
							0					Standard Settlement Configuration Id
	The DA Type must be the same as the Measurement Class Type at the Effective from Settlement Date {DAA}.					0						Effective from Settlement Date {SCON}
												Data Aggregator Id
							0					Data Aggregation Type
	The DC Type must be the same as the Measurement Class Type at the Effective from Settlement Date {DCA}.					0						Effective from Settlement Date {DAA}
												Data Collector Id
							0					Data Collector Type
	The Meter Operator must be the correct type (MOp, UMISO or MA) if Measurement Class provided.					0						Effective from Date {DCA}
												Meter Operator Id
							0					Meter Operator Type
	These smart items can only be set to the same day as the entry date or retrospectively					0						Effective from Date {MOA}
												SMETS Version
							0					SMS Operator ID
							0					Effective from Date {SMSO}
							0					IHD Install Status
						0						Effective from Date {IHD}

Notes:

The rules for including specific data items and the dependency between items are to be specified within the MPAS Agreement.

Version History:

Catalogue release	CR No.	Brief description of the change and its reason
Version 3.1	1398	Data Item 'Effective from Settlement Date {MCLA} corrected to Effective from Settlement
Version 3.1	1462	As per Data Interface requirements, sequential file and instruction numbers included in this

Validation Rules

Catalogue release	CR No.	Brief description of the change and its reason
Version 3.1	1562	Sub Groups removed as per MPRS design specifications.
Version 3.1	1981	Notes added for clarity and consistency

MRA Secretariat

MRA Data Transfer Catalogue

Flow Reference: D0324
Flow Name: Advise Green Deal Active at MPAN
Flow Description: Transaction to inform MPAS of a request to “flag” MPANs as having an active GD Plan associated with them between specific dates
Flow Type: Electronic and Manual
Flow Sensitivity: Medium
Data Protection: No
Flow Ownership: MRA

From GDCC **To** MPAS **Version** 1.0

Data Items:

Reference	Item Name
J1787	GD MPAN EFD
J1788	GD MPAN ETD
J1809	GDCC Instruction Number
J1813	Green Deal MPAN Core

Flow Structure:

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
03H	Green Deal MPAN Instruction	1		G								
					1							Green Deal MPAN Core
					1							GDCC Instruction Number
144	GD MPAN Dates	1-*		G								
						1						GD MPAN EFD
						1						GD MPAN ETD

For a first Green Deal both EFD and ETD must be provided. To update a Green Deal only the changed date should be included. A registration cannot be pending.

Notes:

The GD Plan MPAN Effective From Date must always be in the future The GD Plan MPAN Effective To Date cannot be earlier than the GD Plan Effective From Date. Data Items in Group 04H should all be populated on the first notification to MPAS, on subsequent notifications, these should only be populated where they differ from the values held, but at least one must be present.

Version History:

Catalogue release	CR No.	Brief description of the change and its reason
Version 10.2	3338	New Data Flow created

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MRA Data Transfer Catalogue

Flow Reference: D0350
Flow Name: Notification of DCC Services at Metering Point
Flow Description: DCC notifies MPAS that it is providing communication services to a metering point and provides any data updates required for MPAS.
Flow Type: Electronic and Manual
Flow Sensitivity: Medium
Data Protection: No
Flow Ownership: MRA

From	To	Version
DCC	MPAS	10.7

Data Items:

Reference	Item Name
J1833	DCC Service Flag
J1834	Effective From Date {DCCF}
J0330	File Sequence Number
J0109	Instruction Number
J0723	Instruction Type
J0003	MPAN Core
J0084	Supplier Id

Flow Structure:

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
81H	File Sequence Number	1		G								
					1							File Sequence Number
82H	List of Withdrawals	1-*		G								
						1						Instruction Number
						1						Instruction Type
						1						MPAN Core
						1						DCC Service Flag
						1						Effective from Date {DCCF}
						1						Supplier ID

Notes:

The notifying Supplier ID will inform MPAS which supplier requested the DCC flag update.

Version History:

Catalogue release	CP No.	Brief description of the change and its reason
Version 10.7	3362	New Data Flow 'Notification of DCC Services at Metering Point' created to support extended 'Smart' MPAD.
Version 11.0	3408	Data Item J0084 "Supplier ID" added to group 82H

MRA Secretariat

MRA Data Transfer Catalogue

Flow Reference: D0304
Flow Name: Notification of Meter Asset Provider
Flow Description: This is a notification sent to inform Parties the identity of the New MAP for particular metering equipment.
Flow Type: Electronic and Manual
Flow Sensitivity: Medium
Data Protection: No
Flow Ownership: MRA

From	To	Version
MOP	MPAS	12.5
MPAS	MOP	12.5

Data Items:

Reference	Item Name
J0012	Additional Information
J1679	Associated Equipment Serial Number
J1678	Associated Equipment Type
J0048	Contract Reference
J1682	Effective from Date {MAPA}
J0410	Manufacturers Make & Type
J1677	Meter Asset Provider Id
J0004	Meter Id (Serial Number)
J0003	MPAN Core
J2255	MPAS D0304 Response Code
J0275	Service Level Reference
J0274	Service Reference
J0716	Timing Device Id (Serial Number)

Flow Structure:

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
77C	New MAP Details	1		G								
					1							Meter Asset Provider Id
					1							Effective from Date {MAPA}
78C	MPAN Cores	1-*		G								
						1						MPAN Core
						0						Additional Information
						0						Contract Reference
						0						Service Reference
						0						Service Level Reference
79C	Meter Details	1-*		G								
							1					Meter Id (Serial Number)
							1					Manufacturers Make & Type

Validation Rules

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
							0					Timing Device Id (Serial Number)
80C	Associated Equipment Details	0-*					G					
								1				Associated Equipment Type
								1				Associated Equipment Serial Number
72M	MPAS Response	1-*	MPAS Only				G					
									1			MPAS D0304 Response Code

Notes:

MPRS only stores the following data items from this flow:

- Meter Asset Provider ID (J1677)
- Effective From Date {MAPA} (J1682)
- MPAN Core (J0003)
- Meter ID (Serial Number) (J0004)

Version History:

Catalogue release	CP No.	Brief description of the change and its reason
7.4	3142	Data Flow created.
7.4	3186	MOP to Supplier and MOP to Distributor instance added. Flow Description amended.
12.5	3554	MOP to MPAS and MPAS to MOP instance added. Response group added
12.5	3563	Condition of "MPAS Only" added to "MPAS Response" Data Group

REC Secretariat

REC EMAR

MM00256 - D0312 - 003 - Notification of Meter Information to MPAS

Market Message Reference	MM Description	Legacy Reference	Version	Notes
MM00256	Update MPAS with change to non-MPAS sourced data and the response	D0312	003	See Annex C for Flow Notes

Scenario Variants

Scenario Variant	Name	Source	Target	Owner
SV00256	Notification of Meter Information to MPAS	MEM	ERDA	RECCo
SV00258	Notification of Meter Information to MPAS	ERDA	MEM	RECCo
SV00259	Notification of Meter Information to MPAS	ERDA	Supplier	RECCo

Data Items

Data Item ID	Legacy Reference	Name
DI50003	J0003	MPAN Core
DI50004	J0004	Meter Id (Serial Number)
DI50102	J0178	Meter Operator Id
DI50230	J0483	Meter Type
DI50406	J0848	Date of Meter Installation
DI50635	J1269	Date of Meter Removal
DI51003	J1677	Meter Asset Provider Id
DI51544	J2256	MOP Flow Response Code
DI51599	J2312	ESME ID
DI51600	J2313	Number of Displayed Register Digits
DI50194	J0419	Meter Location

SV00256 Flow Structure

Group ID	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Data Name	Item	Value Rule
11D	MPAN Core	1-*		G										
					1							MPAN Core		
12D	Meter Group Info	0-*	Meter Info Group is Mandatory for each meter installed at a metering point; message collection must be Not Present if no meters are installed.		G									
						1						Meter Id (Serial Number)		
						1						Meter Type		If the Metering Point is Half Hourly then the only permissible enumeration value is H.
						1						Meter Asset Provider Id		
						1						Date of Meter Installation		
			Where the Meter Type is prefixed with "S1", "S2" or "2", Meter Location is Mandatory. Meter Location is Null for all other Meter Types.			C						Meter Location		
			Where the Meter Type is prefixed with "S1", "S2" or "2", ESME ID is Mandatory. ESME ID is Null for all other Meter Types.			C						ESME ID		Where the ESME ID is unknown and cannot be provided, the ESME ID should be populated as "00-00-00-00-00-00-00"
			Where the Meter Type is prefixed with "S1", "S2" or "2", Number of Displayed Register Digits is Mandatory. Number of			C						Number of Displayed Register Digits		Where the Meter Type is S1, the value should be populated as per the manufacturer specification. Where the

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MRA Data Transfer Catalogue

Flow Reference: D0386
Flow Name: Manage Metering Point Relationships
Flow Description: Used to initiate a change to a metering point relationship.
Flow Type: Electronic
Flow Ownership: MRA

From	To	Version
Supplier	MPAS	12.5
MPAS	Supplier	12.5

Data Items:

Reference	Item Name
J0109	Instruction Number
J2242	MPAN Action
J2243	Primary MPAN
J2240	Related MPAN Response Code
J2241	Relationship Action
J2244	Secondary MPAN

Flow Structure:

Group	Group Description	Range	Condition	L1	L2	L3	L4	L5	L6	L7	L8	Item Name
18M	Relationship Action	1-*		G								
					1							Primary MPAN
					1							Relationship Action
					1							Instruction Number
19M	Secondary MPANs	1-*		G								
						1						Secondary MPAN
						1						MPAN Action
20M	MPAS Response	1-*	MPAS Only	G								
						1						Related MPAN Response Code

Notes:

Version History:

Catalogue release	CP No.	Brief description of the change and its reason
Version 12.5	3550	New flow and data items created

ATTACHMENT 3 – ADDITIONAL RULES

Additional MPRS Rules/Constraints/Design Features Applicable to Data Flows/Messages

The following information is provided to aid the understanding of the use and the required content of Supplier data flows.

1.	<p>Data Flow D0205 (= SP02)</p> <p>MPRS uses the Profile Class, Standard Settlement Configuration and their respective Effective From Dates from the D0205 to create a combination known as a Configuration Profile, which is compared to valid PC/SSC combinations in MDD.</p> <p>The mapping between the D0205 data items to an MPRS Metering Point Configuration Profile (MP CP) is shown below:</p> <ol style="list-style-type: none"> 1. Profile Class ID (PC ID) 2. Metering Point Profile Class Effective From Date (MP PC EFD) = (MSPC EFD) 3. Standard Settlement Class ID (SSC ID) 4. Metering Point Configuration Profile Effective From Date (MP CP EFD) = (SC EFD) <p>For a change to</p> <ol style="list-style-type: none"> a. (NHH) PC only items 1 and 2 or items 1 and 4 must be provided. b. (NHH) SSC only items 3 and 4 only must be provided. c. (NHH) PC and SSC items 1, 2, 3 and 4 or 1, 3, 4 only must be provided. <p>The HH Profile Class is '00' and if not specified will default to this value.</p>
2.	<p>No appointment nor change to metering point related data is accepted if the Effective From Date of the new information is earlier than the Effective From Date of any existing occurrence of the same entity.</p> <p>MPRS does not allow the insertion of instances of data entities whose period of effectiveness is before an already existing instance.</p>
3.	<p>When a registration is cancelled any changes to the metering point data made by the Distribution Business between receiving the Pending and Cancellation notices to MPRS, are notified to suppliers via the D0089 data flow. (= SP51, SP64)</p> <p>MPRS understands that other systems may use the D0171 (= SP28, SP29) data flow.</p>

<p>4.</p>	<p>To facilitate CP1267, MPRS supports the assignment of a Meter Operator (MOp), Meter Administrator (MA) or an Unmetered Supplies Operator (UMSO) agent to a registration. The agent is taken from the Meter Operator Id (MOID) field (J0178) on the 0205 flow.</p> <p>MPRS performs validation on data received from the D0205 flow to check (where possible) that the Meter Operator ID, Meter Operator Type and Measurement Class (MC) are consistent.</p> <p>Because the Meter Operator ID and Measurement Class are optional fields on the D0205 flow, this validation will only be performed when both fields are populated on the flow, or where loading the flow creates both items by virtue of one of the data items already existing within MPRS. When the MOID and MC are present, validation is performed as follows:</p> <ul style="list-style-type: none"> • MPRS validates that a Meter Operator is provided for a metered Measurement Class (A,C,E,F,G) and that the agent is of the same type (HH/NHH) as the Measurement Class for the period. • MPRS validates that an UMSO is provided for a NHH unmetered Measurement Class (B) • MPRS validates that a Meter Administrator is provided for a HH unmetered Measurement Class (D) • Where a Meter Operator ID is provided in the flow but no Measurement Class exists (either on the flow or within MPRS), MPRS will assume that the MPAN is metered and assign a Meter Operator. The Meter Operator will be validated to ensure that it is present in the MPRS list of valid MOps. <p>If any of these checks fail then the flow will be rejected.</p> <p>MPRS will also attempt to perform an agent re-assignment to correct data mismatches (and avoid flow rejections) under the following specific circumstance:</p> <ul style="list-style-type: none"> • Where the D0205 flow contains a Measurement Class that represents an Unmetered MPAN but the agent on MPRS is a MOp, MPRS will use the MPID of the agent currently assigned in MPRS and determine whether there is an MA (for HH MCs) or UMSO (NHH MCs) with the same MPID. If so, the MA or UMSO will be substituted for the MOp; if not the flow will be rejected.
<p>5.</p>	<p>When the Meter Type is changed - HH to NHH or vice versa - ALL relevant data MUST be supplied at the time of the change and all this associated data must be of the same new type viz. Data Aggregator, Data Collector, Meter Operator.</p>
<p>6.</p>	<p>At any point in time only ONE future change to a data item may be pending. An additional future change to a data item will therefore be rejected if a future change to that data item already exists in MPRS.</p>
<p>7.</p>	<p>ALL trading data must be present for the registration when the Data Aggregator is appointed. This data must already reside in MPRS or must be supplied in the current message.</p>

<p>8.</p>	<p>All MPRS validation is based on the Instruction Type Code. Cross validation of Instruction Type Code and Data Transfer Catalogue Flow Type will be performed based on the table below. Any invalid combinations will be rejected with an instruction based on the incoming Data Transfer Catalogue Flow Type (and Instruction Type Code**) with a Rejection Reason Code = 1.</p> <table border="1" data-bbox="316 508 1409 1060"> <thead> <tr> <th data-bbox="332 508 597 697">Scenario</th> <th data-bbox="597 508 846 697">Incoming DTC Flow</th> <th data-bbox="846 508 1024 697">Incoming Instruction Type Code</th> <th data-bbox="1024 508 1182 697">Rejection DTC Flow</th> <th data-bbox="1182 508 1409 697">Rejection Instruction Type Code for Incorrect Incoming Instruction</th> </tr> </thead> <tbody> <tr> <td data-bbox="332 697 597 772">Change of Supplier details</td> <td data-bbox="597 697 846 772">D0205</td> <td data-bbox="846 697 1024 772">SP02</td> <td data-bbox="1024 697 1182 772">D0203</td> <td data-bbox="1182 697 1409 772">SP30</td> </tr> <tr> <td data-bbox="332 772 597 848">Notification of Meter Asset Provider</td> <td data-bbox="597 772 846 848">D0304</td> <td data-bbox="846 772 1024 848"></td> <td data-bbox="1024 772 1182 848">D0304</td> <td data-bbox="1182 772 1409 848"></td> </tr> <tr> <td data-bbox="332 848 597 924">Notification of Meter Information to MPAS</td> <td data-bbox="597 848 846 924">D0312</td> <td data-bbox="846 848 1024 924"></td> <td data-bbox="1024 848 1182 924">D0312</td> <td data-bbox="1182 848 1409 924"></td> </tr> <tr> <td data-bbox="332 924 597 968">DCC Service Flag</td> <td data-bbox="597 924 846 968">D0350</td> <td data-bbox="846 924 1024 968">DC01</td> <td data-bbox="1024 924 1182 968">D0351</td> <td data-bbox="1182 924 1409 968">DC11</td> </tr> <tr> <td data-bbox="332 968 597 1043">Manage Metering Point Relationships</td> <td data-bbox="597 968 846 1043">D0386</td> <td data-bbox="846 968 1024 1043"></td> <td data-bbox="1024 968 1182 1043">D0386</td> <td data-bbox="1182 968 1409 1043"></td> </tr> </tbody> </table>	Scenario	Incoming DTC Flow	Incoming Instruction Type Code	Rejection DTC Flow	Rejection Instruction Type Code for Incorrect Incoming Instruction	Change of Supplier details	D0205	SP02	D0203	SP30	Notification of Meter Asset Provider	D0304		D0304		Notification of Meter Information to MPAS	D0312		D0312		DCC Service Flag	D0350	DC01	D0351	DC11	Manage Metering Point Relationships	D0386		D0386	
Scenario	Incoming DTC Flow	Incoming Instruction Type Code	Rejection DTC Flow	Rejection Instruction Type Code for Incorrect Incoming Instruction																											
Change of Supplier details	D0205	SP02	D0203	SP30																											
Notification of Meter Asset Provider	D0304		D0304																												
Notification of Meter Information to MPAS	D0312		D0312																												
DCC Service Flag	D0350	DC01	D0351	DC11																											
Manage Metering Point Relationships	D0386		D0386																												
<p>9.</p>	<p>Many of the timing rules in MPRS are dependent on a set of defined values known as 'Trading Parameters'. A description of these is given below. The default, Industry-defined values for these are also given in the list below.</p>																														
<p>10.</p>	<p>Where a D0205 instruction contains an MPAN's MP Configuration Profile or MTC which results in an invalid combination of MTC and SSC then the instruction will be rejected. Validation will only be carried out when both parts of the combination have been received. If a flow containing a new SSC assignment is received for an MPAN which has no MTC or a flow containing a new MTC assignment is received for an MPAN which has no SSC assigned, then this validation will not be applied.</p>																														

11.	<p>KEY VALIDATIONS FOR D0324</p> <p>The validation used by MPRS on receipt of a D0324 from the GDCC is:</p> <ul style="list-style-type: none"> • MPAN is not disconnected • MPAN is Traded on or before the Green Deal EFD • The Green Deal EFD must be > MPRS System Date • The Green Deal ETD is on or after the Green Deal EFD • The current supplier is not cancelled and is a Green Deal licensee as at the Green Deal EFD • The LLF Class assigned to the MPAN as at the EFD of the GD is an Import type LLF Class (i.e. MS Specific LLF Class Indicator is 'A' or 'B'). • The new Green Deal is not received for an MPAN with a Pending registration. • The new Green Deal is not received for an MPAN with registration at Status of 'SecuredActive' and Supply Start Date > MPRS System Date <p>ADVISE OF GREEN DEAL ACTIVE AT MPAN</p> <p>Once the MPRS System Date has reached the CSS go-live date the current validation applied to the GD01 and GD02 instructions will be changed as follows:</p> <table border="1" data-bbox="311 877 1344 1289"> <thead> <tr> <th>Current rejection (Applied before CSS go-live Date)</th> <th>Rejection Message No</th> <th>New rejection (Applied from the CSS go-live date)</th> <th>New Rejection Message No</th> </tr> </thead> <tbody> <tr> <td>Green Deal received for an MPAN during the lockout period of a change of supply.</td> <td>20571 (341)</td> <td>Green Deal received for an MPAN with a Pending registration.</td> <td>20648 (341)</td> </tr> <tr> <td>Green Deal received for an MPAN during the lockout period of a change of supply.</td> <td>20571 (341)</td> <td>Green Deal received for an MPAN with registration at Status of 'SecuredActive' and Supply Start Date > MPRS System Date</td> <td>20653 (341)</td> </tr> </tbody> </table>	Current rejection (Applied before CSS go-live Date)	Rejection Message No	New rejection (Applied from the CSS go-live date)	New Rejection Message No	Green Deal received for an MPAN during the lockout period of a change of supply.	20571 (341)	Green Deal received for an MPAN with a Pending registration.	20648 (341)	Green Deal received for an MPAN during the lockout period of a change of supply.	20571 (341)	Green Deal received for an MPAN with registration at Status of 'SecuredActive' and Supply Start Date > MPRS System Date	20653 (341)
Current rejection (Applied before CSS go-live Date)	Rejection Message No	New rejection (Applied from the CSS go-live date)	New Rejection Message No										
Green Deal received for an MPAN during the lockout period of a change of supply.	20571 (341)	Green Deal received for an MPAN with a Pending registration.	20648 (341)										
Green Deal received for an MPAN during the lockout period of a change of supply.	20571 (341)	Green Deal received for an MPAN with registration at Status of 'SecuredActive' and Supply Start Date > MPRS System Date	20653 (341)										
12.	<p>KEY VALIDATIONS FOR SMART DATA</p> <p>Validating new and old format flows:</p> <p>DTC v10.6 will be updated to DTC v10.7 following the completion of the overnight batch process on 07 November 2013.</p> <p>Outgoing</p> <p>All outbound flows produced on or after 8 November 2013 will include the new smart data items where appropriate.</p> <p>MPRS validates the smart data as follows:</p> <ul style="list-style-type: none"> • Future dated EFDs for the SMSO and IHD Install Status smart items are not allowed. • Unlike other data items in MPRS, unless the smart data items are changed, they retain their original effective from dates. • SMETS Version does not have an effective from date for a registration, MPRS uses the entry date into MPRS as a pseudo effective from date in order for it to process flows correctly during the objection process. 												

	<ul style="list-style-type: none"> • DTC CP 3505 introduced the new IHD Status value of Failed (F). For go-live, any instruction containing an IHD Status of 'F' received before close of day on Wednesday 1 November 2017 will be rejected, irrespective of the IHD Status Effective From Date. The Effective From Date of any IHD Status of 'F' instructions cannot be < 2 November 2017 • Validation on the IHD Install status value checks it is valid within DTC data item DCC Service Flag {J1833} list of values. There is no concept in MPRS of any valid sequence of events. • Smart data can only be set on the D0205 flow. • As for other MPRS data items, changes to data can only be made for the period of the supplier's registration. Note any changes made by an old supplier, providing they are in the retrospective change period, will be informed to the new supplier. • Appendix A gives an example of the SMSO update. • The associated EFD must be provided when setting the In Home Display Install Status value or the SMSO ID • Smart data is not classed as trading data and is therefore not required for a registration to be classified as traded
13.	<p>KEY VALIDATIONS FOR DCC SERVICE FLAG (D0350 FLOW) The D0350 flow will be processed as part of overnight MPRS batch. This is controlled by a switch-on parameter within MPRS to match the formal DCC go-live date.</p> <p>Minimal validation will be performed in relation to the Effective From Date and the Requesting Supplier.</p> <p>MP077 changes the list of allowable values.</p>
14.	<p>UPRN SUPPRESSION DTC CP 3486 requires all outbound supplier/CSS flows containing a UPRN data item to have the UPRN suppressed.</p>

15. **KEY VALIDATIONS FOR MANAGE METERING POINT RELATIONSHIPS D0386**

Consequential Response Codes

Scenario – Response Code L (Secondary MPAN is not in a Relationship)

Relationship A	Relationship B
Primary- 9914000000000	Primary- 9913110000552
Secondary MPANs: 9913110000223	Secondary MPANs: 9913110001101

D0386 is sent to MPRS to Delete 9913110000223 from Relationship A. However, the Supplier specifies the Primary MPAN from Relationship B:

Inbound Flow to MPRS:

ZHV|1|D0386001|X|SCST|P|SCST|20190628000000|||OPER|

18M|9913110000552|D|1|

19M|9913110000223|D|

ZPT|1|2||1|20190628000000

MPRS Rejects with:

ZHV|124|D0385001|P|SCST|X|SCST|20190305121213|||OPER|

18M|9913110000552|D|313|

19M|9913110000223|D|

20M|C|

20M|K|

20M|L|

ZPT|124|5||1|20190305121213|

C| secondary MPAN is in another relationship

K| primary MPAN is not in a relationship

L| secondary MPAN is not in a relationship

Consequential code K and L could be misleading as the Primary and Secondary MPANs are in MPAN Relationships However, they are not in the same MPAN Relationship.

16.	<p>PIR702 CSS MANAGE METERING POINT RELATIONSHIPS</p> <p>As part of faster switching a new rule introduced is that relationships cannot be created, amended or deleted when there is a pending switch in place. This is to prevent issues such as split supply. Once the MPRS System Date has reached the CSS Delta Go-live Date the validation of the D0386 Flow will be enhanced as follows:</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr style="background-color: #00AEEF; color: white;"> <th style="text-align: center;">Group No</th> <th style="text-align: center;">Validation Rule</th> <th style="text-align: center;">Applies To</th> <th style="text-align: center;">MPRS Rejection Message No</th> <th style="text-align: center;">Rejection Code</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">18M</td> <td>There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date</td> <td style="text-align: center;">Primary MPAN</td> <td style="text-align: center;">20649</td> <td style="text-align: center;">F</td> </tr> <tr> <td style="text-align: center;">19M</td> <td>There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date</td> <td style="text-align: center;">Secondary MPAN</td> <td style="text-align: center;">20650</td> <td style="text-align: center;">F</td> </tr> </tbody> </table>	Group No	Validation Rule	Applies To	MPRS Rejection Message No	Rejection Code	18M	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date	Primary MPAN	20649	F	19M	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date	Secondary MPAN	20650	F
Group No	Validation Rule	Applies To	MPRS Rejection Message No	Rejection Code												
18M	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date	Primary MPAN	20649	F												
19M	There must not be a registration request with a Registration Status = 'Pending' or a Supply Start Date > MPRS System Date	Secondary MPAN	20650	F												
17.	<p>D0386 RESOLVING BROKEN RELATIONSHIPS</p> <p>For the interim stages between CSS Migration Stage 0 and CSS Migration Stage 1 we have allowed the Supplier of the Primary MPAN to Delete the MPAN Relationship where the MPANs have been incorrectly related and a Change of Supply has occurred.</p> <p><u>Rule:</u></p> <p>Where the Suppliers for the Primary and Secondary MPANs are different, the Supplier of the Primary MPAN is able to Delete the whole relationship (Relationship Action D & MPAN Action D for all Secondary MPANs) or the Secondary MPAN using Relationship Action A & MPAN Action D.</p> <p>ZHV 1 D0386001 X SCST P SCST 20190628000000 OPER </p> <p>18M 9913110000552 D 1 </p> <p>19M 9914000000000 D </p> <p>19M 9913110000223 D </p> <p>ZPT 1 3 1 20190628000000</p>															

18. D0386 RESOLVING DISCONNECTED MPANS

The MRA states that a MPAN Relationship must be ended before a MPAN can be disconnected. However, in extenuating circumstances a related MPAN could be disconnected before the MPAN Relationship is ended.

To account for this scenario MPRS allows Suppliers to Delete MPAN Relationships in the following scenarios.

Rule:

1. Where a MPAN Relationship has a Secondary MPAN which is disconnected and the Primary MPAN is not disconnected. The Supplier of the Primary MPAN can delete the Secondary Disconnected MPAN using Relationship Action A & MPAN Action D for the Disconnected Secondary MPAN. MPAN Action C must be used for Secondary MPANs which are not disconnected.

```
ZHV|1|D0386001|X|SCST|P|SCST|20190628000000|||OPER|
18M|9913110000552|A|1|
19M|9914000000000|C|
19M|9913110000223|D|
ZPT|1|3||1|20190628000000
```

2. Where a MPAN Relationship has a Primary MPAN which is disconnected. The Supplier of the Primary MPAN can delete the whole relationship or the Disconnected MPAN. This is performed using Relationship Action D and MPAN Action D for all Secondary MPANs. Or Relationship Action A MPAN Action D for removing only the Disconnected MPAN.

```
ZHV|1|D0386001|X|SCST|P|SCST|20190628000000|||OPER|
18M|9913110000552|D|1|
19M|9914000000000|D|
19M|9913110000223|D|
ZPT|1|3||1|20190628000000
```

A parameter can be switched on within MPRS to enable this.

19. KEY VALIDATIONS FOR METER TECHNICAL DETAILS D0312/D0304Sending MOP:

The currently appointed MOP can make changes to the Meter Details.

The immediately previous MOP is able to make changes to the Meter Details where the Installation or Removal Date is on or before their MOP appointment Effective To Date (J0360).

Any MOP appointed before the immediately previous MOP cannot make changes to the Meter Details.

D0312 DTC Annex C Rule 1

All data items pertaining to EVERY installed meter defined at the relevant MPAN must be included within Group 12D whether they have changed or not. This group is therefore the definitive statement of meters at a metering point.

Therefore, if previously Installed Meters are not included in the D0312 12D or 13D groups, MPRS will "Implicitly Remove" these Meters.

Disconnections

Meters cannot be installed or changed once an MPAN has been Disconnected.

However, the last MOP to be appointed before the MPAN is disconnected can remove meters after the MPAN has been Disconnected. The Meter Removal date can be set before, on and after the Disconnection Date.

Meter ID (Serial Number)

For all inbound flows into MPRS the data is converted into uppercase and then output to Market Participants in Uppercase. This includes the Meter ID (Serial Number) on the D0312/D0304. Any lower-case Meter ID (Serial Number) will be converted to uppercase in MPRS and EES. Other formatting such as spaces and special characters will be retained.

D0312 Meter Removal Response Code K

A meter can only be removed if it was previously listed the 12D row of the D0312.

If MPRS does not recognise the Meter ID (Serial Number) in the 13D row (i.e. a Meter with this Meter ID is not currently Installed on this MPAN), it will reject with response code K Rejected - Meter ID not Specified.

20.	<p>KEY VALIDATIONS FOR SMART METER TECHNICAL DETAILS REC CP R0032</p> <p><u>ESME ID Population</u></p> <p>For MHHS early Migration MPRS will allow the use of a dummy ESME ID to help the MEM identify what Smart Equipment is installed at the Metering Point.</p> <p>If the Installing MEM does not know the ESME ID then “00-00-00-00-00-00-00-00” can be supplied and the following logic will be applied:</p> <ul style="list-style-type: none"> • If the Meter Id is recognised, and MPRS holds an ESME ID for this Meter Id then the D0312 response will include the MPRS held ESME ID • If the Meter Id is recognised, and MPRS does not hold an ESME ID for this Meter ID then the Dummy ESME ID is stored and included on the response back to the MEM. Dummy ESME IDs will be reported on and tracked by the MHHS Programme, these must be cleansed ahead of MHHS Go Live. • If the Meter Id is not recognised, MPRS will consider this to be a Brand New Smart Meter. MPRS will store Dummy ESME ID and include it on the response back to the MEM. Dummy ESME IDs will be reported on and tracked by the MHHS Programme, these must be cleansed ahead of MHHS Go Live. • If the Meter Type is Smart and a NULL ESME ID is supplied, MPRS will reject the D0312 with AB <p>The ESME ID must be unique within MPRS. The exceptions to this rule are: ESME ID can be shared across MPANs when either:</p> <ul style="list-style-type: none"> • the MPAN is part of either a Supplier Related MPAN Relationship • or the MPAN is part of a LDSO Associated Import Export Association. <p>This is one Smart Meter shared across many MPANs (Metering Points)</p> <p><u>Number of Displayed Register Digits & Meter Location</u></p> <p>To assist with MHHS Data Population MPRS will permit the use of NULL for these data items. MPRS will work in the following way:</p> <ul style="list-style-type: none"> • Where the Meter ID is Recognised on a Smart Meter Type and blank value is provided MPRS will populate the response with the values it holds for these items. If MPRS does not hold a value the response will be blank. • Where the Meter Id is Not Recognised on a Smart Meter Type MPRS will reject with Y or AA. For new Smart Meters, these values must be included, use of NULL is not permitted
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21.	<p>KEY VALIDATION FOR LDSO ASSOCIATED IMPORT EXPORT MPANS</p> <p>An Import MPAN can be associated with one or more Export MPANs. However, an Export can only be associated with one Import MPAN.</p> <p><u>MHHS</u></p> <p>A Linked MPAN is a MPAN which is in a Supplier Related MPAN relationship (D0386) and/or is in a LDSO Associated Import Export Association. The Primary or Import is referred to as the Principle MPAN. The Export or Secondary is referred to as the Subsidiary MPAN</p> <p>To support the MHHS Service Alignment Logic, LDSOs cannot associate an Import MPAN which is already a Secondary MPAN in a Supplier MPAN Relationship to an Export MPAN. They must request that the Supplier breaks the MPAN relationship before setting up the association or use the Primary MPAN.</p> <p>Release R8.2 does not apply the same restrictions on the D0386. Suppliers could set up a New Supplier Related MPAN Relationship with an Export (Subsidiary) as the Primary (Principle). This will cause issues with MHHS Service Alignment and must be cleansed before MHHS Go Live.</p> <p>The Registration Service intends to prevent this from happening in the enduring IF-020 solution. Covered under MHHS DI-107 and DI-119</p>
22.	<p>FASTER SWITCHING</p> <p>From CSS Go Live, all Change of Supply Requests and Initial Registration requests must be submitted to the Central Switching Service (CSS). MPRS will be informed of these Registration Updates and will in response, send a D0217/D0260 to the Gaining Supplier.</p> <p>A D0217/D0260 will be sent for each individual registration in either a MPAN Relationship or OFAF (One Fail All Fail) switch.</p> <p>Registration Data and Supplier Agents are set using the D0205. This should not be sent to MPRS until the D0217/D0260 has been processed by the Gaining Supplier.</p>
23.	<p>REGISTRATION TRANSACTION NUMBER J0031</p> <p>CSS will master a new unique registration identifier called registrationId. This will only be included on messages to and from the CSS.</p> <p>J0031 will be nullified on the D0217 and D0204.</p>

Trading Parameters

Parameter (Default value)	Default Value	Description
ADVANCE CHANGE PERIOD	28	The maximum number of calendar days in advance that a change can be made to Metering Point or Appointment Details for a Registration by a Supplier.
MPRS OUTPUT RETENTION PERIOD	28	The number of working days for which an MPRS Output must be retained.
MPRS OUTPUT RETENTION QUANTITY	5	The number of MPRS Outputs which must be retained for a Market Participant.
RETROSPECTIVE CHANGE PERIOD	310	The maximum number of working days allowed between a MP Details or Appointment change being made and entered onto MPRS.

4 ATTACHMENT 4 – REJECTION REASON CODES

Additional information supporting rejection reason codes produced by the MPRS application

The following information is provided to assist in the understanding of the reasons for rejections produced from MPRS validation. The table identifies for each Industry Code the different meanings applied by the MPRS application.

CODE	MEANING
1	Instruction Type not valid for the Data Transfer Catalogue Flow Type
3	MPAN Core not specified
3	Non numeric MPAN Core
3	Unknown Metering Point
3	MPAN Core is too long
5	Data Aggregator is not effective during the Data Aggregator appointment period
5	Data Aggregator invalid or unknown on specified date
6	Registration is not effective during the Data Aggregator appointment period
6	Appointment period conflicts with another Data Aggregator appointment for the same Registration
6	Data Aggregator appointment Effective From Date is not the same as the Registration Effective From Date for a default entry
6	Data Aggregator appointment Effective From Date is later than the Effective To Date
6	Invalid Data Aggregator appointment Effective From Date
6	Retrospective Change Period has been exceeded by the Data Aggregator appointment Effective From Date
6	Advance Change Period has been exceeded by the Data Aggregator appointment Effective From Date
7	Data Collector is not effective during the Data Collector appointment period
7	Data Collector invalid or unknown on specified date
8	Registration is not effective during the Data Collector appointment period
8	Advance Change Period has been exceeded by the Data Collector appointment Effective From Date
8	Retrospective Change Period has been exceeded by the Data Collector appointment Effective From Date
8	Invalid Data Collector appointment Effective From Date
8	Appointment period conflicts with another Data Collector appointment for the same Registration
8	Data Collector appointment Effective From Date is later than the Effective To Date
8	Data Collector appointment Effective From Date is not the same as the Registration Effective From Date for a default entry
9	Meter Operator is not effective during the Meter Operator appointment period
9	Meter Operator invalid or unknown on specified date

Validation Rules

CODE	MEANING
10	Registration is not effective during the Meter Operator appointment period
10	Advance Change Period has been exceeded by the Meter Operator appointment Effective From Date
10	Retrospective Change Period has been exceeded by the Meter Operator appointment Effective From Date
10	Meter Operator appointment Effective From Date is not the same as the Registration Effective From Date for a default entry
10	Meter Operator appointment Effective From Date is later than the Effective To Date
10	Appointment period conflicts with another Meter Operator appointment for the same Registration
10	Invalid Meter Operator appointment Effective From Date
11	Meter Timeswitch Class invalid or unknown on specified date
11	Meter/Timeswitch Identifier must be numeric
11	MP Configuration Profile SSC is invalid with MPANs assigned MTC
12	The Registration is not effective on the Effective From Date of the new MP Meter Timeswitch Class
12	The new MP Meter Timeswitch Class date range falls outside of the Meter Timeswitch Class date range
12	The Advance Change Period has been exceeded by the Effective From Date for the new MP Meter Timeswitch Class
12	The date range conflicts with another MP Meter Timeswitch Class for the same Registration
12	The MP Meter Timeswitch Class Effective From Date must be the same as the Registration Effective From Date for a default entry
12	Invalid MP Timeswitch Class Effective From Date
12	Effective From Date is later than the Effective To Date for the new MP Meter Timeswitch Class
12	The Retrospective Change Period has been exceeded by the Effective From Date for the new MP Meter Timeswitch Class
13	Measurement Class invalid or unknown
14	The Advance Change Period has been exceeded by the Effective From Date for the new MP Measurement Class
14	The MP Measurement Class Effective From Date must be the same as the Registration Effective From Date for a default entry
14	Effective From Date is later than the Effective To Date for the new MP Measurement Class
14	The date range conflicts with another MP Measurement Class for the same Registration
14	The Retrospective Change Period has been exceeded by the Effective From Date for the new MP Measurement Class
14	Invalid MP Measurement Class Effective From Date
14	The Registration is not effective on the Effective From Date of the new MP Measurement Class
15	Standard Settlement Configuration/Profile Class combination invalid or unknown on specified date
15	Invalid Profile Class and/or Standard Settlement Configuration
15	MTC is invalid with MPANs assigned MP Configuration Profile SSC
16	If a MP Profile Class EFD and MP Configuration Profile EFD are both provided with a NHH Profile Class, they must be the same
16	The new MP Configuration Profile date range falls outside of the Settlement Configuration Profile Class date range

Validation Rules

CODE	MEANING
16	The Advance Change Period has been exceeded by the Effective From Date for the new MP Configuration Profile
16	The Retrospective Change Period has been exceeded by the Effective From Date for the new MP Configuration Profile
16	The new MP Profile Class date range falls outside of the Profile Class date range
16	The Retrospective Change Period has been exceeded by the Effective From Date for the new MP Profile Class
16	Effective From Date is later than the Effective To Date for the new MP Profile Class
16	The MP Profile Class Effective From Date must be the same as the Registration Effective From Date for a default entry
16	Invalid MP Configuration Profile Effective From Date
16	Invalid MP Profile Class Effective From Date
16	The Registration is not effective on the Effective From Date of the new MP Configuration Profile
16	The date range conflicts with another MP Profile Class for the same Registration
16	The Advance Change Period has been exceeded by the Effective From Date for the new MP Profile Class
16	The Registration is not effective on the Effective From Date of the new MP Profile Class
16	The MP Configuration Profile Effective From Date must be the same as the Registration Effective From Date for a default entry
16	Effective From Date is later than the Effective To Date for the new MP Configuration Profile
16	The date range conflicts with another MP Configuration Profile for the same Registration
17	Energisation Status invalid or unknown
18	The Registration is not effective on the Effective From Date of the new MP Energisation Status
18	Effective From Date is later than the Effective To Date for the new MP Energisation Status
18	The MP Energisation Status Effective From Date must be the same as the Registration Effective From Date for a default entry
18	The Advance Change Period has been exceeded by the Effective From Date for the new MP Energisation Status
18	The Retrospective Change Period has been exceeded by the Effective From Date for the new MP Energisation Status
18	The date range conflicts with another MP Energisation Status for the same Registration
18	Invalid MP Energisation Status Effective From Date
19	Effective Date is after Advance Registration Period
19	Registration for Metering Point with this Effective From Date already exists
19	Registration dates overlap
19	Invalid Registration Effective From Date
19	Registration Effective From Date not specified
19	Supplier is Barred from Registrations
20	Supplier not effective for the specified date
20	Requesting Supplier is not the latest or previous Supplier

MPRS



Validation Rules

CODE	MEANING
20	Supplier has never been registered to Metering Point
20	Supplier not registered to Metering Point on date of Metering Point data change
22	Registration which is the subject of the instruction was not found
22	Old Registration not found
23	Metering Point is Disconnected so no changes are allowed
27	Old Registration not found
28	Registration within lockout period
31	MP Configuration Profile found for Half Hourly Measurement Class
31	Half Hourly Profile Class cannot be combined with a Standard Settlement Configuration
31	MP Configuration Profile must be defined with a Non Half Hourly Profile Class
31	MP Profile Class found for Non Half Hourly Measurement Class
32	There is a pending Registration
33	No MP Energisation Status found for Traded Metering Point
33	No Data Aggregator appointment found for Traded Metering Point
33	Attempt to define MP Energisation Status before full Metering Point Administration Data (which includes MP Line Loss Factor Class) is defined
34	There is no Line Loss Factor Class for the Metering Point on the Effective From Date of the Registration
34	The MP LLF Class type must be general for the duration of a Non Half Hourly MP Measurement Class
35	Registration Transaction Number not provided
35	Registration Transaction Number incorrect
35	Transaction Registration Number and Registration Dates Are Incorrect
36	Profile Class invalid or unknown on specified date
36	Profile Class not numeric or unknown
37	Standard Settlement Configuration invalid or unknown on specified date
38	Attempt to define Data Aggregator appointment before full Metering Point Administration Data (which includes MP Line Loss Factor Class) is defined
38	Not all data provided for a new Data Aggregator appointment
38	Not all data provided for a new MP Profile Class
38	Not all data provided for a new MP Energisation Status
38	Not all data provided for a new Data Collector appointment
38	Not all data provided for a new MP Measurement Class
38	Not all data provided for a new Meter Operator appointment
38	Not all data provided for a new MP Configuration Profile

Validation Rules

CODE	MEANING
38	Not all data provided for a new MP Timeswitch Class
38	Smart Meter Data Items received in D0205 Instruction prior to SM Go Live
38	No Smart Meter Data Items received in D0205 Instruction
38	SMSO ID specified without EFD
38	IHD Install Status specified without EFD
38	SMSO EFD specified without SMSO ID
38	IHDI EFD specified without IHDI Status
38	Too many fields received in instruction
38	Too few fields received in instruction
38	Not all data provided for SMETS
39	Measurement Class conflicts with Data Aggregator type
39	Measurement Class conflicts with Meter Operator type
39	Measurement Class conflicts with Data Collector type
45	Already supplying to this metering point
46	Invalid value for Change Of Tenancy Indicator
49	Supplier not a Green Deal Licensee
50	SMSO ID Invalid
50	SMSO ID Invalid (must be DCC MPID)
50	SMSO ID Invalid (MPID Cancelled)
51	SMSO ID Date Invalid
51	SMSO ID Date Invalid (non-latest)
51	SMSO ID Date is before Registration EFD
51	SMSO ID Date before or after SMSO is effective
51	The SMSO ID EFD cannot be a future date
51	The Retrospective change period has been exceeded by the Smart Meter System Operator effective from date
51	Effective from date is greater than the Effective to date for the new MP Smart Meter System Operator
52	IHD Install Status Invalid
53	IHD Install Status Date Invalid
53	IHD Install Status Date is prior to SM go-live
53	IHD Install Status Date Invalid (non- latest)
53	The IHD Install Status EFD cannot be a future date

Validation Rules

CODE	MEANING
53	IHD Install Status Date Invalid (non-latest)
53	The retrospective change period has been exceeded by the effective from date for the new MP IHD Install Status
53	Effective from date is greater than the Effective to date for the new MP IHD Install Status
54	SMETS Version Invalid
54	Retrospective change period has been exceeded by the SMETS Version effective from date
54	Attempting to process a non-latest data item for MP SMETS Version
54	Effective from date is greater than the Effective to date for the new MP SMETS Version
54	SMETS ID Date before or after SMETS is effective
54	SMETS ID Date is before Registration EFD
54	SMETS Version is flagged for deletion
54	SMETS Version Date cannot be a future date
57	Invalid UPRN (exceeds maximum field size)
59	Supplier is not the supplier of the new registration

4.1 D0304 Validation

Response Code & Message	Validation
C (Rejected - Meter Asset Provider ID not specified)	Meter Asset Provider must be specified
B (Rejected - Meter Asset Provider ID is invalid or unknown on Effective from Date {MAPA})	Specified Meter Asset Provider must exist as a non-cancelled entry within the METER_ASSET_PROVIDERS table with a MAP.EFD =< Effective From Date {MAPA} and MAP.ETD >= MPRS System Date
D (Rejected - Effective from Date {MAPA} invalid)	Effective From Date {MAPA} must be a valid date format / value
E (Rejected - Effective from Date {MAPA} in the future)	Effective From Date {MAPA} must not be in the future
H - Rejected - MPAN Core is disconnected	Effective From Date must be on or before the MPRS Date of Disconnection
F (Rejected - MPAN Core is not recognised)	MPAN Core must exist in MPRS
G (Rejected – No Supplier registered to MPAN on Effective from Date {MAPA})	A supplier must be registered to the MPAN as at Effective from Date {MAPA}
H (Rejected - MPAN Core is disconnected)	MPAN Core must not be disconnected at Effective from Date {MAPA}

Validation Rules

Response Code & Message	Validation
I (Rejected - Meter Id (Serial Number) not recognised on specified MPAN Core)	Must exist within the portfolio of the specified MPAN
J (Rejected - Meter Id (Serial Number) is not specified)	Must be provided
I (Rejected - Meter Id (Serial Number) not recognised on specified MPAN Core)	Must be maximum of 10 chars
K (Rejected - Meter Id (Serial Number) is not unique within the MPAN)	Unique within MPAN
L (Rejected - Sending MOP is not the appointed MOP on date of MAP appointment or the current MOP)	The sender MPID must match the current MOP or the sender MPID must match the previous MOP and the ETD of the MOP must be on or after the Effective From Date {MAPA}
M (Rejected - No MOP appointed to MPAN on date of MAP appointment)	A MOP is assigned to the MPAN as at the Effective from Date {MAPA}
N (Rejected – Effective From Date {MAPA} not specified)	Effective from Date {MAPA} must be specified
O (Rejected – MPAN Core not specified)	MPAN Core must be specified
P (Rejected – Effective From Date {MAPA} prior to current MAP Effective From Date)	Effective from Date {MAPA} must be >= existing MAP EFD

4.2 D0312 Validation

Response Code & Message	Validation
E (Rejected – The MPAN is not recognised)	The specified MPAN must exist within MPRS
C (Rejected – The MPAN is disconnected on date of meter work)	MPAN must not be disconnected before the Date of Meter Work (Installation Date) THIS APPLIES TO 12D ROWS ONLY – Meter Removals after the Disconnection Date are allowed.
B (Rejected – The Installation Date is in the future)	Must not be a future date
D (Rejected – No Supplier registered to MPAN on date of meter work)	A supplier registration must be active as at the Installation Date
G (Rejected - Meter Type is invalid)	Must exist in the valid list
H (Rejected - Meter Asset Provider ID is invalid or	Must exist as a valid active MAP in the METER_ASSET_PROVIDERS table

Validation Rules

Response Code & Message	Validation
unknown on date of meter work)	
I (Rejected - Sending MOP is not the appointed MOP on date of meter work or the current MOP)	The sender MPID must match the current MOP or the sender MPID must match the previous MOP and the ETD of the MOP must be on or after the Installation Date
J (Rejected - No MOP appointed to MPAN on date of meter work)	A MOP is assigned to the MPAN as at the Installation Date
K (Rejected - Meter ID not specified)	12D Meter Id must be specified
K (Rejected - Meter ID not specified)	13D Meter Id must be specified
U (Rejected - Meter Id (Serial Number) is not unique with the MPAN)	The same Meter Id must not be specified in both 12D and 13D groups
F (Rejected – The removal date is before the installation date)	Must be equal to or after the installation date
L (Rejected - Meter ID is too long)	Meter Id must be a maximum of 10 characters
U (Rejected - Meter Id (Serial Number) is not unique with the MPAN)	Meter Id must be unique within the 12D group (This will be checked using the cleansed MSN)
L (Rejected - Meter ID is too long)	Meter Id must be a maximum of 10 characters
U (Rejected - Meter Id (Serial Number) is not unique with the MPAN)	Meter Id must be unique within the 13D group (This will be checked using the cleansed MSN)
M (Rejected - Meter Type is not specified)	Meter Type must be specified
N (Rejected - The installation date is invalid)	The Installation Date is a valid date format / value
P (Rejected - The removal date is not specified)	Removal Date must be specified
Q (Rejected - The removal date is invalid)	Removal Date must be a valid date format / value
R (Rejected - The removal date is in the future)	Must not be a future date
I (Rejected - Sending MOP is not the appointed MOP on date of meter work or the current MOP)	When no 12D row is provided (i.e. All meters to be removed) the sender MPID must match the current MOP or the sender MPID must match the previous MOP and the ETD of the MOP must be on or after the Removal Date
S (Rejected - Meter Asset Provider ID not specified)	Meter Asset Provider must be specified

MPRS



Validation Rules

Response Code & Message	Validation
S (Rejected - Meter Asset Provider ID not specified)	Meter Asset Provider must be specified
T (Rejected - The installation date is not specified)	The Installation Date must be specified
K (Rejected - Meter Id (Serial Number) is not associated with the MPAN)	Meter Id must be associated to the MPAN
AA (Rejected - Meter Location is invalid)	If specified, must be a valid code as per the Valid Set
AA (Rejected - Meter Location is invalid)	If the provided MSN is not recognised (i.e. it is a new meter) and the Meter Type is smart the Meter Location must be specified
AA (Rejected - Meter Location is invalid)	If the Meter Type is not smart the Meter Location must NOT be specified
X (Rejected – EMSE ID Format is Invalid)	If specified, must be a valid format, which is: XX-XX-XX-XX-XX-XX-XX (0-9, A-Z)
V (Rejected – ESME ID already exists within MRPS on MSN <MSN> for MPAN <MPAN> and does not match Removed Meter, Associated Import/Export MSID or Related MPAN	When specified, must be unique to this meter across the whole MPRS system, excluding active related MPANs and active associated MPANs or where the value is specified as '00-00-00-00-00-00-00'
AB (Rejected – Non-Smart Meter Type with ESME ID populated)	If specified, the Meter Type must be a Smart Meter, i.e. one of those defined below, or prefixed with "S1", "S2" or "2".
W (Rejected - MSN relates to a Smart Meter Type and the ESME ID is NULL)	When not specified the Meter Type must not be a Smart Meter, i.e. one of those defined below, or prefixed with "S1", "S2" or "2".
AC (Rejected – Number of Displayed Register Digits is incorrect)	If specified, must be a positive integer value of either 5 or 6
Y (Rejected – Number of Displayed Register Digits is NULL and the MSN relates to a Smart Meter Type)	Must be specified for a new meter (i.e. the MSN is not already at this MPAN) when the Meter Type is Smart
Z (Rejected – Non-Smart Meter Type with Number of Displayed Register Digits populated)	Must not be specified when the Meter Type is non-Smart
AC (Rejected – Number of Displayed Register Digits is incorrect)	Where the Meter Type is S1, the value should be populated as per the manufacturer specification. Where the Meter Type is S2A, S2AD, S2ADE, 2ADF, 2ADEF, 2AEF, 2AF, S2B, S2BD, or S2BDE, 2BF, 2BDF, 2BDEF or 2BEF the value must be "5". Where the Meter Type is prefixed with "S2C" the value must be "6". Where the Meter Type is 2CDEF, 2CF, 2CDF or 2CEF the value must be "6".

4.3 D0386 Validation

Response Code & Message	Validation
T (Rejected – Primary MPAN not specified)	Primary MPAN must be specified
D (Rejected – Unknown Primary MPAN)	MPAN Core must exist in MPRS
G (Rejected – Primary MPAN is Disconnected)	When the Relationship Action is ‘C’ or ‘A’ the MPAN Core must not be disconnected
F (Rejected – Request not from current Supplier of all MPANs)	Source MPID must be the current Supplier for the Primary MPAN
B (Rejected – Relation Action is ‘C’ and Primary MPAN is in another relationship)	Primary MPAN must not be in a relationship when Relationship Action is ‘C’ (Create) No entry must exist in the V_MPAN_RELATED_LIST view where the RELATIONSHIP_X_ETD is NULL
K (Rejected –Primary MPAN is not in a relationship)	Primary MPAN must be in a relationship when Relationship Action is ‘A’ (Amend) or ‘D’ Delete An entry must exist in the MP_PRIMARY_RELATIONSHIP table where the MPPR_EFFECTIVE_TO_DATE is NULL
V (Rejected – Relationship Action not specified)	Must be specified
I (Rejected – Relationship Action not in valid set)	Must be a valid value from defined set, i.e. Exist as an ACTION_CODE in the V_RELATIONSHIP_ACTION view.
M (Rejected – Relationship Action is ‘D’ and all Secondary MPANs have not been specified)	When Relationship Action is ‘D’ all active Secondary MPANs held in MPRS must be specified. All MPANs referenced by the associated entries in the MP_SECONDARY_RELATIONSHIP table where the MPSR_EFFECTIVE_TO_DATE is NULL must have a corresponding ‘19M’ Group row.
N (Rejected – Relationship Action is ‘A’ and all Secondary MPANs have not been specified)	When Relationship Action is ‘A’ all active Secondary MPANs held in MPRS must be specified. All MPANs referenced by the associated entries in the MP_SECONDARY_RELATIONSHIP table where the MPSR_EFFECTIVE_TO_DATE is NULL must have a corresponding ‘19M’ Group row.
Q (Rejected – Relationship Action is ‘C’ and no Secondary MPANs have been specified) (This would actually result in the file being rejected as the DTN defines that the ‘19M’ Group is mandatory)	When Relationship Action is ‘C’ at least 1 ‘19M’ Group record must be specified
S (Rejected – Relationship Action is ‘A’ and all MPAN Actions are ‘D’)	When Relationship Action is ‘A’ (Amend) ALL specified MPAN Actions must not be ‘D’ (Delete)
X (Rejected – Instruction Number not specified)	Must be specified

Validation Rules

Response Code & Message	Validation
R (Rejected – Instruction Number format is invalid)	Must be a number of 12 or less digits
U (Rejected – Secondary MPAN not specified)	Secondary MPAN must be specified
E (Rejected – Unknown Secondary MPAN)	MPAN Core must exist in MPRS
H (Rejected – Secondary MPAN is Disconnected)	When the MPAN Action is 'A' or 'C' the MPAN Core must not be disconnected
C (Rejected – Secondary MPAN is in another relationship)	MPAN Core must not be in another relationship. When the MPAN Action is 'C' or 'D' the MPAN referenced must not have a row in the V_MPAN_RELATED_LIST view where the RELATIONSHIP_ETD is null and the parent MPAN differs from the 18M.Primary MPAN. When the MPAN Action is 'A' (Add) then the MPAN referenced must not have a row in the V_MPAN_RELATED_LIST view where the RELATIONSHIP_ETD is NULL (irrespective of the Primary MPAN)
C (Rejected – Secondary MPAN is in another relationship)	The '19M' rows within a '18M' instruction can only have 1 occurrence of any MPAN Core specified
C (Rejected – Secondary MPAN is in another relationship)	MPAN Core must not be the same as the 18M.Primary MPAN
L (Rejected – Secondary MPAN is not in a relationship)	MPAN Core must be related to the Primary MPAN when Relationship Action is 'A' (Amend) or 'D' (Delete), unless the MPAN Action = 'A'. The MPAN referenced must have a row in the MP_SECONDARY_RELATIONSHIP table where the MPSR_EFFECTIVE_TO_DATE is NULL and the parent MPAN = 18M.Primary MPAN.
F (Rejected – Request not from current Supplier of all MPANs)	When the Relationship Action is 'C' or 'A' the source MPID must be the current Supplier for the Secondary MPAN When the Relationship Action is 'D' or Relationship Action is A and MPAN Action is D the current Supplier of the Primary MPAN can delete a secondary MPANs supplied by other suppliers when the 'primary supplier can delete broken relationships' system variable is set to 'YES'
W (Rejected – MPAN Action not specified)	MPAN Action must be specified
J (Rejected –MPAN Action not in valid set)	MPAN Action must be a valid value from defined set. i.e. Exist as an ACTION_CODE in the V_MPAN_ACTION view
P (Rejected – Relationship Action is 'C' and MPAN Action is not 'A')	When Relationship Action is 'C' (Create) MPAN Action must be 'A' (Add)
M (Rejected) – Relationship Action is 'D' and all Secondary MPANs have not been specified)	When Relationship Action is 'D' (Delete) MPAN Action must be 'D' (Delete) (Not currently defined as a validation rule by industry)

APPENDIX A SCENARIO – UPDATING SMSO ID AND EFD

This scenario assumes that Supplier 1 (the old supplier) is registered to metering point A which has a smart meter and an SMSO and EFD exist in MPRS.

Supplier 2 (the new supplier) registers for the metering point with the base data, ie only the MPAN and a future registration date are provided in the D0055. They then receive the default appointments and details for the metering point including the SMSO and EFD.

If Supplier 2 is satisfied with these appointments, then no further action is required. MPRS will store the smart data items with the original EFD, so the SMSO will keep its original EFD. The DC, DA and MOP agent appointments will have an effective from date of the new registration, this is no change from how MPRS currently works.

Once the registration is confirmed from MPRS, Supplier 2 has the option to update the meter point details and to appoint their own agents (DA, DC and MOP) via a D0205 flow. The flow can be sent prior to the registration effective from date to appoint them immediately the registration is effective. This is not the case with smart data.

As changes to smart data can be made retrospectively or the same day, the earliest date a supplier can send a D0205 changing the SMSO is the registration effective from date. Hence Supplier 2 has to send the D0205 amending the SMSO on or after the registration effective from date.

This scenario is represented diagrammatically below.

