



**Redlined BSCP502 text for CP1472 'Removal of SVA proving tests for Meters with a pulse multiplier of one'.**

This CP proposes changes to sections 3.5, 4.5, 4.6 and 4.9. We have redlined these changes against Version 25.0

**There is no impact on any other part of this document for this CP.**

Amend section 3.5 as follows.

### 3.5 Proving a Metering System<sup>1, 2</sup>.

Complex Sites are subject to Complex Site Validation test as set out in 3.5.7.

For Outstations with integral Meters which can only have a pulse multiplier of 1 as identified on the ELEXON website (compliance and protocol approval list), a proving test is not required. All other Metering Systems are subject to a Proving Test.

#### 3.5.1 Proving of a Metering System by Method 1.<sup>4</sup>

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.1.1	Following installation / reconfiguration, commissioning and once HH Metered Data retrieved or if previous proving test attempt failed.	Send request for proving test (indicating which Settlement Periods to be collected) or alternatively request re-test following failure of immediately preceding proving test and provide MTD.	MOA.	HHDC.	D0005 Instruction on Action. D0268 Half Hourly Meter Technical Details.	Electronic or other method, as agreed.
3.5.1.2		Obtain the same HH Settlement Period Meter reading as requested by the MOA using either a Hand Held Unit or via remote interrogation as appropriate (ensuring that data collected for the Settlement Period does not contain a zero value).	HHDC.		As a minimum the HHDC shall obtain the data required by the MOA, but may also obtain and send more data than requested.	Internal Process.

<sup>1</sup> The MOA shall decide what proving method is appropriate in conjunction with the HHDC.

<sup>2</sup> MS assigned to Measurement Class F are exempt from proving tests.

<sup>3</sup> All timescales in this process are undertaken in accordance with Appendix 4.5.

<sup>4</sup> In the case of a Registration Transfer from CMRS to SMRS, the proving test shall be performed in accordance with the timescale described in BSCP68, Section 3.2.

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.1.3		Send raw HH Metered Data or notification that Metered Data cannot be collected for the Settlement Periods requested <sup>5</sup> . If unable to collect metering data for Settlement Period requested, send alternative Settlement Period HH Metered Data.	HHDC.	MOA.	D0001 Request Metering System Investigation. D0003 Half Hourly Advances.	Electronic or other method, as agreed.

---

<sup>5</sup> The HHDC shall use all reasonable endeavours to collect the data for the Settlement Period requested.

### 3.5.2 Proving of a Metering System by Method 2. <sup>4</sup>

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.2.1	Following installation / reconfiguration, commissioning and once HH Metered Data retrieved or if previous proving test attempt failed.	Agree date and time for proving test with HHDC or alternatively request re-test following failure of immediately preceding proving test and provide MTD.	MOA.	HHDC.	D0005 Instruction on Action. D0268 Half Hourly Meter Technical Details. <del>If site is complex, send Complex Site Supplementary Information Form. Refer to Appendix 4.9 Guide to Complex Sites.</del>	Electronic or other method, as agreed.
3.5.2.2		Obtain the same HH Settlement Period Meter reading as agreed with the MOA using the either a Hand Held Unit or via remote interrogation as appropriate (ensuring that data for the Settlement Period collected does not contain a zero value).	HHDC.		As a minimum the HHDC shall obtain the data required by the MOA, but may also obtain and send more data than requested.	Internal Process.
3.5.2.3		Send raw HH Metered Data or notification that Metered Data cannot be collected. <sup>5</sup> If unable to collect HH Metered Data for agreed Settlement Period, send alternative Settlement Period HH Metered Data.	HHDC.	MOA.	D0001 Request Metering System Investigation. D0003 Half Hourly Advances.	Electronic or other method, as agreed.

### 3.5.3 Proving of a Metering System by Method 3. <sup>4</sup>

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.3.1	Following installation, commissioning and once HH Metered Data retrieved.	Send request for proving test or alternatively request a re-test following failure of immediately preceding proving test and provide MTD. <sup>6</sup>	MOA.	HHDC.	D0005 Instruction on Action. D0268 Half Hourly Meter Technical Details. <del>If site is complex, send Complex Site Supplementary Information Form. Refer to Appendix 4.9 Guide to Complex Sites.</del>	Electronic or other method, as agreed.
3.5.3.2		Obtain for Settlement Period Meter reading of own choosing either a Hand Held Unit or via remote interrogation as appropriate (ensuring that data for the Settlement Period collected does not contain a zero value).	HHDC.			Internal Process.
3.5.3.3		Send raw HH Metered Data or notification that Metered Data cannot be collected.	HHDC.	MOA.	D0001 Request Metering System Investigation. D0003 Half Hourly Advances.	Electronic or other method, as agreed.

<sup>6</sup> The MOA does not specify the Settlement Periods to be collected by the HHDC.

### 3.5.4 Proving of a Metering System by Method 4. <sup>4</sup>

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.4.1	Following installation / reconfiguration, commissioning and once HH Metered Data retrieved.	Send request for proving test or alternatively request a re-test following failure of immediately preceding proving test and provide MTD <sup>6</sup> .	MOA.	HHDC.	D0005 Instruction on Action.  D0268 Half Hourly Meter Technical Details. <del>If site is complex, send Complex Site Supplementary Information Form. Refer to Appendix 4.9 Guide to Complex Sites.</del>	Electronic or other method, as agreed.
3.5.4.2		Obtain for Settlement Period Meter reading of own choosing either a Hand Held Unit or via remote interrogation as appropriate (ensuring that data for the Settlement Period collected does not contain a zero value).	HHDC.			Internal Process.
3.5.4.3		Send raw HH Metered Data or notification that Metered Data cannot be collected.	HHDC.	MOA.	D0001 Request Metering System Investigation.  D0003 Half Hourly Advances.	Electronic or other method, as agreed.

### 3.5.5 Issuing Results of Proving Test (All Methods of Proving).

REF	WHEN <sup>3 4</sup>	ACTION	FROM	TO	INFORMATION REQUIRED	METHOD
3.5.5.1	In accordance with timescales in Appendix 4.6.	Send notification of successful proving test / re-test. Proceed to process 3.4.	MOA.	HHDC, Supplier, LDSO.	D0214 Confirmation of Proving Tests.	Electronic or other method, as agreed.
3.5.5.2	In accordance with timescales in Appendix 4.6.	Send notification that proving test / re-test failed.	MOA.	HHDC.	D0002 Fault Resolution Report or Request for Decision on Further Action.	Electronic or other method, as agreed.

### **3.5.6 Complex Site Validation Test**

<b><u>REF</u></b>	<b><u>WHEN</u></b>	<b><u>ACTION</u></b>	<b><u>FROM</u></b>	<b><u>TO</u></b>	<b><u>INFORMATION REQUIRED</u></b>	<b><u>METHOD</u></b>
<a href="#"><u>3.5.6.1</u></a>	<a href="#"><u>As Appropriate</u></a>	<a href="#"><u>Receive request to validate Complex Site data</u></a>	<a href="#"><u>MOA</u></a>	<a href="#"><u>HHDC</u></a>	<a href="#"><u>D0005 Instruction on Action</u></a>	<a href="#"><u>Electronic or other method, as agreed</u></a>
<a href="#"><u>3.5.6.2</u></a>	<a href="#"><u>Within 5WD of 3.4.6.1</u></a>	<a href="#"><u>Collect Metered Data and aggregate in accordance with the Complex Site rules and send to HHMOA</u></a>	<a href="#"><u>HHDC</u></a>	<a href="#"><u>HHMOA</u></a>	<a href="#"><u>D0003 Half Hourly Advances</u></a> <a href="#"><u>Email with aggregated consumption data for the day requested in 3.5.6.2.</u></a>	<a href="#"><u>Electronic or other method, as agreed.</u></a>
<a href="#"><u>3.5.6.3</u></a>	<a href="#"><u>Within 2WD of 3.4.6.2</u></a>	<a href="#"><u>Validate Metered Volumes</u></a>	<a href="#"><u>MOA</u></a>			<a href="#"><u>Internal Process</u></a>
<a href="#"><u>3.5.6.4</u></a>	<a href="#"><u>Within 2 WD of 3.4.6.3 if data is validated</u></a>	<a href="#"><u>Send notification</u></a>	<a href="#"><u>MOA</u></a>	<a href="#"><u>HHDC Supplier</u></a>	<a href="#"><u>D0214 Conformation of Proving Tests</u></a>	<a href="#"><u>Electronic or other method, as agreed.</u></a>
<a href="#"><u>3.5.6.5</u></a>	<a href="#"><u>Within 2 WD of 3.4.6.3 if data is not validated</u></a>	<a href="#"><u>Send Notification</u></a>	<a href="#"><u>MOA</u></a>	<a href="#"><u>HHDC Supplier</u></a>	<a href="#"><u>D0002 Fault Investigation</u></a>	<a href="#"><u>Electronic or other method, as agreed.</u></a>
<a href="#"><u>3.5.6.6</u></a>	<a href="#"><u>At the same time as 3.4.6.5</u></a>	<a href="#"><u>Investing discrepancy with MOA and resolve and re-validate. Proceed to 3.4.6.1</u></a>	<a href="#"><u>MOA</u></a>	<a href="#"><u>HHDC</u></a>	<a href="#"><u>D0002 Fault Resolution Report or Request for Decision on Further Action.</u></a>	<a href="#"><u>Electronic or other method, as agreed.</u></a>
<a href="#"><u>3.5.6.7</u></a>	<a href="#"><u>Within 5 WD of 3.4.6.6 if remains not validated.</u></a>	<a href="#"><u>Proceed to the Metering System Investigation Process (3.4.3).</u></a>	<a href="#"><u>HHDC</u></a>			<a href="#"><u>Internal Process</u></a>

*Amend sections 4.5 as follows.*

#### **4.5 Key SVA Meter Technical Details.**

Subject to 3.5 b Below is a list of key fields of Meter Technical Details (MTD) that will cause the MS to be proved if any, or all, of them are changed whilst the MS is energised:

- Outstation Id;
- Meter Id (serial number);
- Outstation number of channels;
- Measurement Quantity Id;
- Meter multiplier;
- Pulse multiplier;
- CT and / or VT Ratios; and
- Access to Metering Equipment at Password level 3.

Where any, or all of the above are changed whilst a MS is de-energised, a proving test shall be initiated as soon as that MS becomes energised and completed in the timescales set out in Appendix 4.6.5.

*Amend section 4.6 as follows.*

#### **4.6 Proving of Half Hourly Metering Systems.**

For Outstations which can only have a pulse multiplier of 1 as identified on the ELEXON website (compliance and protocol approval list), a proving test is not required unless the Outstation is subject to a Complex Site arrangement or is separate from the Meter.

##### **4.6.1 Reasons for a Proving Test.**

Subject to 3.5. Aa proving test shall be carried out on both main and check MS and shall be carried out in the following circumstances:

- As a result of new connection or Registration Transfers from CMRS to SMRS;
- Following a change of HHDC but only in the event that the MTD was manually intervened;
- Following a change of MOA appointment but only in the event that the MTD was manually intervened;



- Following a concurrent Change of Supplier and HHDC but only in the event that the MTD was manually intervened;
- When a MS is reconfigured / replaced;
- Following a change of Measurement Class from NHH to HH;
- When there is a Key field change (refer to Appendix 4.5);
- Where there has been a Key field change (refer to Appendix 4.5) whilst a site has been de-energised and the MS becomes energised; ~~and~~
- Where a feeder is energised for the first time; ~~and~~
- Where a Complex Site is created, modified or removed, or where one of the above changes impacts on a MS which is part of a Complex Site.

‘Manually intervened (with regard to proving test)’ means that the MTD have been entered, re-entered or changed in a software system manually, i.e. the data has not been automatically entered into systems via receipt of a data flow.

MS assigned to Measurement Class F are exempt from proving tests (except where part of a Complex Site).

#### 4.6.2 Methods of Proving.

~~The MOA shall decide what method of proving test is appropriate in conjunction with the HHDC and has one of the four methods outlined below to choose from:~~

~~Complex Sites shall be proven in the same way as a non-Complex Site except that the MOA shall use the aggregated data provided by the MS for comparison.~~

The HHMOA shall decide from method 1 to 4 what which method of proving test is appropriate in conjunction with the HHDC. Complex Sites shall always be proved using the Complex Validation Test.

##### Method 1

The MOA installs / reconfigures the MS and commissions the MS and records the HH Metered Data reading while on site. The MOA then requests the HHDC to collect HH Metered Data for the same Settlement Period as collected by the MOA. The HHDC then collects the HH Settlement Period requested and sends this raw HH Metered Data to the MOA for comparison.

##### Method 2

The MOA installs / reconfigures the MS and commissions the MS and records the HH Metered Data reading while on site. The MOA then agrees with the HHDC a date and time for the proving test. The MOA visits the site a second time and collects and records the HH Metered Data reading for the specified HH Settlement Period requested of the HHDC. The HHDC collects for the same HH Settlement Period and sends this raw HH Metered Data to the MOA for comparison.

##### Method 3

The MOA installs / reconfigures the MS and commissions the MS and records the HH reading while on site. When at the office, the MOA then uses its own data retrieval system to read the MS for the same HH Settlement Period as collected during the site visit. The MOA then compares the HH Metered Data collected on site with the data retrieved at the office. The HHDC collects for the HH Settlement Period of own choosing and sends this to the MOA<sup>7</sup>. The MOA then uses its data retrieval system to read for the same HH Settlement Period as provided by the HHDC.

##### Method 4

The MOA installs / reconfigures the MS and commissions the MS and records the HH Metered Data reading while on site. The HHDC collects for the HH Settlement Period of own choosing and sends this to the MOA<sup>7</sup>. The MOA then uses either the manufacturer's software or software which has a relevant protocol approval in accordance with BSCP601 'Metering Protocol Approval and Compliance Testing' to read the Meter constants, pulse multiplier, serial number etc, then collects Meter

<sup>7</sup> Ideally this should be the latest Settlement Period for which non-zero data is available. This is to prevent the data from being overwritten in the Meter's memory before the MOA has had time to collect it.

pulses or engineering data for the same HH Settlement Period as provided by the HHDC and calculates the reading.

### **Complex Site Validation Tests**

Complex Sites (including Measurement Class F Metering System) shall be proven in the same way as non Complex Sites except the HHDC shall provide the HHMOA with aggregated data in accordance with the Complex site supplementary information form.

#### **4.6.3 Comparison of Data.**

After a proving test has been undertaken by any of the methods selected above, the MOA then compares the data received from the HHDC to determine a successful or a failed proving test.

#### **4.6.4 Reporting.**

The MOA shall report both successful and non-successful proving tests to relevant parties.

#### **4.6.5 Proving Test / Re-Test Timescales.**

##### **Proving Test Timescales**

A proving test may be undertaken prior to the appointment of the HHDC and / or MOA in the SMRS so long as there is agreement between the Supplier, MOA, HHDC and the customer.

The timescale for carrying out the proving test shall vary depending on the Code of Practice that the MS is assigned to.

It is not necessary that all the steps of the relevant processes are carried out on the same day; the requirement is that the proving test in its entirety is completed by the timescale specified below and subject to the exceptions listed below. The maximum timescale between the initiation of a proving test as a result of the circumstances in 4.6.1 and the successful completion of the proving test by the MOA (by sending the D0214 Confirmation of Proving Tests) to the HHDC is listed below for each CoP.

##### **Re-Test Timescales**

Where the proving test has failed, the MOA shall initiate a re-test and the MOA and HHDC should ensure wherever possible that the timescale is the same as for the original proving test.

##### **Extended Proving Test / Re-Test Timescales During the P272 Transition Period**

For MS assigned to Code of Practice 10, the 'extended' timescale will be applied to any proving test and subsequent re-test where the original proving test is initiated during the period commencing on 5 November 2015 and ending on the last calendar day before the P272 Implementation Date inclusive. The 'standard' timescale will be

applied where the original proving test is initiated on or before 4 November 2015 or on or after the P272 Implementation Date.

Any MS assigned to any other Codes of Practice will remain subject to standard proving test timescales at all times.

## Timescales

Code of Practice	WD to Complete Proving Test <sup>8</sup>	WD to Complete Re-Test	Total
One	5	5	10
Two	5	5	10
Three	10	10	20
Five	15	15	30
Ten (standard)	15	15	30
Ten (extended)	30	30	60

In the event that timescales are exceeded and the proving test is not completed, the process shall proceed to completion and an audit trail will be maintained by Supplier Agents in order to explain the delay.

### 4.6.6 Failed Proving Test.

If a proving test has failed, then the Metered Data collected will be flagged as estimated i.e. 'E' flagged. This collected HH Metered Data will continue to be flagged as estimated until a successful proving test is completed.

The MOA and HHDC shall complete the re-test as soon as possible after failure of the original proving test. For a Code of Practice Three related MS, the timescale for completing the proving test may extend beyond the Initial Volume Allocation Run, in which case the rules for Code of Practice Five related MS's shall apply as far as data estimation is concerned.

### 4.6.7 Non-Completion of Proving Test.

If a proving test is not completed so that proved data can enter Settlements by the due timescales, the actual retrieved HH Metered Data shall be used for Settlements and shall be 'A' flagged until a proving test has been completed. Once a proving test has been completed, the data will be flagged as either estimated or actual i.e. 'A' flagged depending on whether or not there was a successful proving test.

### 4.6.8 Proving Test Exemptions

If a Proving Test is not required as set out in section 3.5.1 then the actual retrieved HH Metered Data shall be used for Settlements and shall be 'A' flagged.

<sup>8</sup> The starting date for this time is either the Date of Meter Installation, the Date of Commissioning, the Effective From Date of the Meter, the Effective Date of a Change of Agent as described in Section 4.6.1, or the date when a Metering System becomes energised where there has been a key field change whilst the Metering System was de-energised, whichever is the later.

*Amend section 4.9 as follows.*

#### **4.9 Guide to Complex Sites.**

A 'Complex Site' means; any site that requires a 'Complex Site Supplementary Information Form' to enable the HHDC to interpret the standing and dynamic Metered Data relating to SVA MSs for Settlement purposes to be provided to the HHDC in addition to the D0268 Half Hourly Meter Technical Details.

The primary electronic data flow between the HHMOA and HHDC for Half Hourly MTD is the D0268 data flow. In the case of Complex Sites, this data flow alone is insufficient to accurately describe to the HHDC how to allocate the various channels of data that should be utilised in Settlements, therefore the D0268 data flow is supplemented with the 'Complex Site Supplementary Information Form'.

The HHMOA should identify a Complex Site by providing a 'Complex Site Supplementary Information Form' in addition to the D0268 data flow to the HHDC and Supplier and indicating in the D0268 data flow that the site is complex. This action shall alert the HHDC to expect a 'Complex Site Supplementary Information Form' from the HHMOA containing details of how to configure the data collection requirements and passing of information to the HHDA and Supplier. The 'Complex Site Supplementary Information Form' should be sent electronically or by any other method agreed.

A Complex Site Validation Test in accordance with section 3.5.6 shall be carried out by the HHMOA and HHDC. The purpose of this test is to verify that the Complex Site Supplementary Information Form has been correctly interpreted by the HHDC. The information to be provided by the HHDC shall be the aggregated volumes of all the relevant Outstation channels associated with the Complex Site. The HHMOA will confirm the data provided is consistent with the complex rule or otherwise. If the HHMOA confirms the data is accurate then the data shall be 'A flagged' otherwise it shall be 'E flagged'.

It is the responsibility of Suppliers to manage and co-ordinate their Agents to achieve compliance and to intervene should any issues arise.

The Supplier should identify to the HHMOA which MSIDs relate to the Import energy and which MSIDs relate to the Export energy.

Where the Complex Site is subject to Shared Meter Arrangements, one D0268 data flow and therefore one 'Complex Site Supplementary Information Form' is required. The D0268 'Complex Site Supplementary Information Form' shall be sent by the HHMOA to the HHDC and the Primary Supplier. The Primary Supplier shall decide whether this information shall be copied to the secondary Supplier(s) and provide this information if required.

In many cases, a Complex Site shall meet the conditions required to apply for a Metering Dispensation as described in BSCP32 'Metering Dispensations'. Where Complex Sites use a MS which is not fully compliant with the relevant Codes of

Practice, a Metering Dispensation should be applied for via BSCP32. Once a Dispensation has been granted, the information shall be available for all future Suppliers, so that they shall have the ability to understand the metering configuration at the Complex Site. As part of the dispensation application process, the Supplier shall need to submit a simplified schematic diagram of the Complex Site connection arrangements and the proposed metering points; as required in BSCP32.

This Appendix 4.9.1 to 4.9.8 provides a non-exhaustive list of Examples of Complex Sites and non-Complex Sites. These examples illustrate the need to create rules that accurately describe the aggregation necessary to derive the total energy for a customer. The aggregation rule contains terms that define each metered quantity at each Meter Point and form part of the total energy. The HHMOA is required to define the terms in the aggregation rule relative to the data.

The HHDC is required to establish gross energy for the site for each Settlement Period. This is achieved by applying the aggregation rule to the metered data values. If the resultant value applied to the rule is positive, the site is Exporting, and the Import value is zero. Conversely, if the result is negative, then the site is Importing, and the Export value is zero. Where the resultant is zero, the site is neither importing nor exporting and both values shall be zero.

When the HHMOA indicates Complex Site on the D0268 data flow, the HHMOA is required to provide all the information necessary, via the 'Complex Site Supplementary Information Form', for the HHDC to aggregate correctly. As part of the supplementary information, the HHMOA is required to provide a schematic diagram of the MS.

Form BSCP514/8.4.8 'Complex Site Supplementary Information Form' provides a means for the HHMOA to convey the information necessary for correct aggregation. BSCP514/8.4.8a gives an overview of the data source and BSCP514/8.4.8b shows the information needed to collect that data.

Where Meter channel data is missing, incomplete or incorrect, the HHDC should attempt to use the associated check data indicated on BSCP514/8.4.8a.

Where duplicated Outstations are provided, two sets of BSCP514/8.4.8a shall be provided each clearly indicating primary and secondary Outstations.