CP Assessment Report

CP1505 'Allowing 'off site' Commissioning of Current Transformers (CTs) preinstalled in cut outs or switchgear at manufacture for use in Low Voltage (LV) installations'

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About This Document

This document is the Change Proposal (CP) Assessment Report for CP1505 which the Supplier Volume Allocation Group (SVG) approved on 29 May 2018. On 19 June 2018 the Imbalance Settlement Group (ISG) deferred their decision pending further information to help inform their decision. The ISG will reconsider the Assessment Report along with the new information included.

There are five parts to this document:

- This is the main document. It provides details of the solution, impacts, costs, and proposed implementation approach. It also summarises the ISG's and SVG's initial views, and SVG's final views on the proposed changes, along with the views of respondents to the CP Consultation.
- Attachment A contains the CP1505 Proposal form
- Attachment B contains the proposed redlined changes to deliver the CP1505 solution.
- Attachment C contains the full responses received to the CP Consultation.

Committee

Imbalance Settlement Group (ISG)

Recommendation

Approve

Implementation Date

1 November 2018 (November 2018 BSC Release)

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- Attachment D contains the full responses received to the Request For Information (RFI)

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1 Why Change?

Background

Code of Practice (CoP) 4 'The Calibration, Testing and Commissioning Requirements of Metering Equipment for Settlement Purposes' details the requirements for Commissioning Metering Equipment for Settlement purposes.

CoP4 Sections 5.5.2 and 6.2 (Half Hourly (HH) and Non Half Hourly (NHH) respectively) detail the required output of the Commissioning tests and state that these tests should be conducted 'on site':

''Commissioning tests on site shall be performed to confirm and record ….'

Therefore, the Metering Equipment must be in situ before Commissioning to be compliant to the CoP4 requirements.

What is the issue?

It is not practical for Commissioning tests to be completed 'on site' for certain Metering Equipment used in low voltage (LV) installations. This is the case for current transformers (CTs) preinstalled in cut outs or switchgear at manufacture.

In some installations for example, CTs are delivered in sealed units and have already been tested (and certain requirements of CoP4 confirmed) by the manufacturer 'off site' (i.e. in the factory). In these instances it may not be cost effective to complete all Commissioning tests 'on site', as elements of accuracy, such as ratios and polarity, will have been confirmed at manufacture. Further, it may not be practicable or even possible to perform tests on site due to the sealed design of the Metering Equipment, which prevents tampering of the transformers between manufacture and delivery for connection.

For High Voltage (HV) and Extra HV (EHV) sites, multi-ratio CTs are often used. Therefore 'on site' Commissioning tests are necessary to confirm the correct configuration of the Metering Equipment.

What counts as Metering Equipment?

Defined in Section X Annex X-1 'General Glossary' of the Balancing and Settlement Code (BSC) as Meters, measurement transformers (voltage, current or combination units), metering protection equipment including alarms, circuitry, associated Communications Equipment and Outstations and wiring.

What counts as low voltage?

CP1505 uses the LV definition listed in The Electricity Supply and Continuity Regulations 2002: 'In relation to alternating current, a voltage exceeding 50 volts measured between phase conductors (or between phase conductors and earth), but not exceeding 1000 volts measured between phase conductors (or 600 volts if measured between phase conductors and earth), calculated by taking the square root of the mean of the squares of the instantaneous values of a voltage during a complete cycle.'

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2 Solution

Proposed solution

This change proposes to add and amend text in CoP4 to specify that CTs preinstalled in cut outs or switchgear may be Commissioned 'off site'. This is conditional on the 'off site' tests being completed in line with requirements detailed in Sections 5.5 and 6.2 (HH and NHH respectively) of CoP4.

Where CTs are owned by a BSC Party, that Party shall be responsible for ensuring the requirements of the aforementioned sections of CoP4 are performed on its Metering Equipment up to and including the Testing Facilities. Where the CTs are not owned by a BSC Party, the Registrant of the Metering System, via its appointed Meter Operator Agent (MOA), shall be responsible for ensuring these requirements are met.

CP1505 also proposes an amendment to an existing footnote regarding the instruments used for Commissioning (footnote 7). The amendment shall confirm responsibility and traceability of the Commissioning tests completed 'off site'.

The additional text proposed under CP1505 is intended to enable the option for certain elements of Commissioning tests to be completed "off site" (e.g. ratio, polarity). This should avoid the repetition of testing, and the challenges Parties face when attempting to access the CTs in pre-sealed units. The text also makes clear that the Commissioning obligations related to Metering Equipment installed after the testing facilities (e.g. Meter, Outstation) must still be Commissioned on site, as per current CoP4 requirements. Also, given that the MOA must still Commission the meter and assess the overall accuracy of the Metering System, any errors with the pre-Commissioned Metering Equipment not identified by the "off site" Commissioning would be identified by the MOAs Commissioning tests.

Finally this CP shall add in two new footnotes (8 and 9). The first explicitly excludes multi ratio design CTs from being able to be Commissioned off site. This is because incorrectly configuring multi ratio CTs pose a greater risk to Settlement. The second clarifies that the MOA is not required to complete additional testing, other than what is already specified under CoP4, following the off site Commissioning of CTs. This has been added in order to reduce possible ambiguity within CoP4 and is in response to an observation raised as part of the CP Consultation.

Proposer's rationale

It has been brought to ELEXON's attention by a number of market participants - both BSC Parties (Licensed Distribution System Operators (LDSOs)) and non-BSC Parties (Independent Connection Providers (ICPs)) - that the requirement in CoP4 to Commission Metering Equipment 'on site' is not always practical or possible. Commissioning of Metering Equipment would be more cost efficient if completed 'off site'. The current requirement to Commission 'on site' causes duplication of testing, which is unnecessarily resource intensive and time consuming. In some instances, the CTs may not be accessible to complete Commissioning 'on site' where modern design of the sealed unit does not easily allow access. This CP was raised by GTC (ETCL & IPNL) on the 12 March 2018.

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3 Impacts and Costs

Central impacts and costs

Central impacts

CP1505 will require document changes to CoP4, which is jointly owned by the ISG and SVG.

No BSC Central System changes are required for this CP.

Central Impacts	
Document Impacts	System Impacts
• CoP4	• *None*

Central costs

The central implementation costs for CP1505 will be approximately £240 (one ELEXON working day to implement the necessary document changes).

BSC Party & Party Agent impacts and costs

This CP has an impact on Distribution System Operators (DSOs) and HH Meter Operator Agents (HHMOAs) which has been confirmed through CP consultation.

The impacts identified were mostly due to the amendment of standing processes and the necessity of a closer relationship with the off site Commissioning agent in order to ensure the timely receipt of test certificates.

Other impacts focussed on the wording of 'additional Commissioning' tests required by the MOA and the implication for further training and purchase of new Metering Equipment that could be required. However, it has been established that the context of 'additional Commissioning tests' was unclear and this has subsequently been addressed. No additional Commissioning tests to those already established in CoP4 will be required by the MOA.

Additionally the Consultation highlighted cost savings would be accrued by some DSOs through the removal of 'unnecessary' resource intensive procedural site visits.

BSC Party & Party Agent impacts are summarised in the table below. Please see Attachment B for the full responses.

BSC Party & Party Agent Impact Summaries (see attachment C for full responses)	
BSC Party/Party Agent	Impact
ESP Electricity Ltd	• A more efficient and cost effective use of resource.
SP Distribution SP Manweb	• Closer contact with the manufacturer to ensure the required quality of Commissioning. • Closer contact with manufacturer to ensure timely receipt of test certificates.

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BSC Party & Party Agent Impact Summaries (see attachment C for full responses)	
BSC Party/Party Agent	Impact
Southern Electric Power Distribution plc Scottish Hydro Electric Power Distribution plc	• Remove requirement of unnecessary site visits. • More effective use of resource. • Minor updates to documents and processes.
SSE Energy Supply Ltd SSE Electricity Ltd	• Changes to MOA testing/ required equipment. • Additional MOA training.
Npower	• Required to change MOA Field Processes which will have an impact on our business.
Northern Powergrid	• Use integrated metering CT panels as standard for LV installations and so will benefit through CP. • Reduction of risk of CT/meter mismatch therefore positive effect on risk to Settlement. • Better quality of Commissioning may be achieved in a more controlled environment with more readily available testing equipment.

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4 Implementation Approach

Recommended Implementation Date

CP1505 is proposed for implementation on **1 November 2018** as part of the November 2018 BSC Release.

The November 2018 Release is the next Release that can include this CP.

Nine respondents agreed with the proposed implementation date with one respondent commenting it would endorse their current working practices. Two respondents disagreed with the proposed implementation date due to not agreeing with the proposed solution. Despite this, one of the respondents in disagreement commented that they could not see an issue in implementing the change in the proposed timescale. The final respondent did not comment on this question due to previously disagreeing with the solution of the CP.

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5 Initial Committee Views

ISG's initial views

CP1505 was presented to the ISG for information at its meeting on 20 March 2018 (ISG203/04).

ISG members initially questioned the level of Commissioning that could currently be completed in line with CoP4. The ISG also questioned how many installations and associated MW of load had been installed under the current arrangements in order to gauge the potential materiality of the issue. ELEXON responded that the Proposer had installed 650 LV installations within the last 12 months, representing approximately 160MW load. Post meeting, it was confirmed as not possible to Commission CTs pre-installed in cut outs or switchgear via on-load testing (after energisation) due to the physical inaccessibility of the test terminals. However, it is possible to Commission (pre-energisation) via injection testing, which is already required for Central Volume Allocation (CVA) Metering Systems. This is not the case for Supplier Volume Allocation (SVA) Metering Systems and Parties argue that primary injection for CoP4 LV sites is impractical and not cost effective - particularly when elements of these tests have already been completed by the manufacturer off site.

ISG members questioned the point at which manufacturers complete the Commissioning tests and whether this was at the point of physical manufacture or at the point of sale. The ISG members noted concern regarding the time lag between installations being initially tested and then the point of installation on site, and questioned the point at which assurance would be provided. Members were concerned that a CT's accuracy could degrade between the point of manufacture and point of installation or through adverse and lengthy transportation conditions. In turn they asked if the certificates of assurance are time limited. It has been clarified by the Proposer that the LV installations are tested at the point of manufacture and the installations are then shipped directly to site (approximately 3-4 days). ELEXON acknowledged a possible risk of CTs being damaged through adverse and lengthy travel conditions and noted that any such damage would be identified by the MOA's established site testing which would still be necessary under CoP4 if CP1505 were implemented.

The ISG questioned whether, if Commissioning tests have been completed by the manufacturer off site for specific items of Metering Equipment, there would be assurance that those specific items of Metering Equipment would be fit for purpose on site. An ISG member explained that the DSO requires (time limitless) certificates that testing has been completed for audit purposes and confirmed that certificates are retained for each individual asset.

SVG's initial views

CP1505 was presented to the SVG for information at its meeting on 27 March 2018 (SVG206/08).

The SVG did not provide any direct comments on CP1505.

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6 Industry Views

This section summarises the responses received to the CP Consultation. You can find the full responses in attachment C.

Summary of CP1505 final CP Consultation Responses				
Question	Yes	No	Neutral/ No Comment	Other
Do you agree with the CP1505 proposed solution?	10	1	1	0
Do you agree that the draft redlining delivers the intent of CP1505?	9	2	1	0
Will CP1505 impact your organisation?	6	5	1	0
Will your organisation incur any costs in implementing CP1505?	2	7	3	0
Do you agree with the proposed implementation approach for CP1505?	10	1	1	0

CP1505 Consultation Responses

Those who agreed did so largely due to the change enabling a 'more efficient use of resource' and enabling the compliance of current working practices. Those who disagreed mainly did so due to concern of possible ambiguity in the solution of the CP regarding Commissioning obligations. Other respondents believed the solution would exacerbate an existing accountability issue whereby ELEXON cannot hold a non-BSC Party such as an ICP) accountable for Commissioning errors requiring subsequent rectification.

Not all respondents initially agreed that the draft redlining delivered the proposed solution. The primary reason outlined was due to the proposed wording in sections 5.5.2 and 6.2, which included an unclear obligation for the MOA to complete 'additional' Commissioning tests and confirm secure connections up to 'and including the Testing Facilities'. ELEXON confirmed with the respondents that no 'additional' Commissioning tests to the already established practices of CoP4 would be required and the inclusion of responsibility up to and 'including' the Testing Facilities was also incorrect in some instances. The draft redlining has been amended to address these issues. ELEXON has contacted those who disagreed with the draft redlining who have since confirmed satisfaction that their concerns had been resolved.

A respondent representing an LDSO business suggested removing the restriction that off-site testing be completed by the manufacturer in order to improve the redlining. It was their view that this limitation was restrictive as they may wish to Commission LV equipment at their depot for example. ELEXON and the Proposer agreed that this was a reasonable improvement as it may be more efficient on a cost basis to Commission off site at a depot. The obligation has been amended to enable an 'off site Commissioning agent' to complete the Commissioning tests. The identity, contact details and address of where Commissioning tests were performed shall still be required for audit purposes. These amendments have been communicated with the respondent. The respondent was pleased that their suggestions had been taken on board and the redlining had moved in the right direction but was disappointed that their suggestion to increase the scope to include voltage transformers (VTs) could not be incorporated. ELEXON and the Proposer agreed

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that this would be outside of the issue identified within this CP and therefore too large of an increase in the scope of the change.

A respondent highlighted possible ambiguity around the Commissioning requirements in CoP4 due to potential terminology misunderstanding, which they felt could be increased due to the proposed changes, which may lead to a greater risk to Settlement and discrepancies within the Commissioning test process. The Proposer and ELEXON disagree with this view due to the same testing being required as it is currently, but in a more controlled and practical environment. ELEXON explained this view to the respondent but they confirmed their view had not changed.

Another argument the same respondent held against the solution was that on site Commissioning is still required for Metering Systems using single-ratio CTs connected to HV and EHV Distribution Systems and therefore it should still be required for LV systems. The Proposer and ELEXON disagree due to a substantial increase in risk involved with the Commissioning of HV and EHV systems. For these systems there is often infrastructure, such as roads and kerb lines required for initial installation which aids accessibility to the systems and reduces the hazard to the Commissioning agent in completing Commissioning on site. Therefore, ELEXON and the Proposer consider it a reasonable requirement to complete full Commissioning tests on site as part of installation. The Proposer highlighted that HV and EHV systems often utilise multi ratio CTs. The Proposer had not intended the inclusion of multi ratio CTs but they had not been explicitly excluded in the draft redlining as it had been viewed LV installations do not use them. However, due to the higher risk of incorrect configuration and concern of ambiguity within the CP they have now been explicitly excluded from the redlining. ELEXON informed the respondent of the amendments made and the reasoning behind why the Proposer and ELEXON consider on site testing necessary for HV and EHV systems. The respondent was pleased that multi ratio CTs had been explicitly excluded but still did not fully agree that HV and EHV sites should be excluded.

A respondent suggested in order to more easily gauge that the off site Commissioning had been completed and not tampered with, tamper evident seals should be used on the CTs. ELEXON and the Proposer agreed with this view and updated the redlining to include this. The respondent also questioned the process of the provision of the Commissioning documents. ELEXON clarified the process for provision of part 1 of the Commissioning documents will not be affected. The test results will still be provided following completion within 16WD of installation/energisation in accordance with the current process. The respondent who disagreed with the CP partly for these reasons has since updated their response to become neutral towards the CP.

One respondent agreed with the proposed CP solution on condition that the redlining be updated with their suggested improvements. This included the addition of text to create a responsibility that the third party Commissioning agent transports and installs the LV Metering Equipment correctly in accordance with the manufacturer's instructions. The respondent also suggested a requirement for the Distributor to add a Meter Operation Code of Practice Agreement (MOCOPA) label in such circumstances to account for non-standard phase rotation. ELEXON notes that the content of the MOCOPA label is not under the control of BSC governance and therefore is out of scope of this change. Further, CoP4 requires phase rotation to be standard at the Meter terminals which would contradict with the proposed amendment. However, ELEXON did add wording to specify that no alterations can be made to the Metering Equipment once it has been Commissioned off-site. ELEXON contacted the respondent following the amendments to the draft redlining and the respondent accepted the updates and amended their consultation response to agree with the solution.

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Comments on the proposed redlining

Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
5.3.1	A typographical error – there should be a space between 'and' and '5.3.2 (Initial Calibrations)'.	This error has been amended.
5.3.1	WPD suggests the proposed redline text for this section is changed as follows: For the avoidance of doubt where measurement ~~current~~ transformers ~~contained within a LV cut outs or switchgear~~ are Commissioned off site in line with section 5.5.2 (paragraph 3) the requirements detailed in sections 5.3.1 (Responsibility for Calibrations and Maintenance of Records) and 5.3.2 (Initial Calibrations) shall still endure and remain with the relevant BSC Party. The BSCCo (or any delegated 3rd party) shall have the right to audit any ~~manufacturers performing~~ Commissioning performed off site to ensure that this Commissioning is undertaken in line with CoP4 requirements. Any non-compliance found shall be the responsibility of the relevant BSC Party responsible for Commissioning.	The Proposer and ELEXON viewed it necessary to keep the proposal limited to current transformers and LV installations. This is due to the higher associated risk to Settlement that the full Commissioning of voltage transformers and HV installations holds. The Proposer explained the change could possibly be extended to include HV Metered Ring main units, where the whole package is sealed and delivered as a single unit. Certain aspects of the CoP4 part one Commissioning could be conducted off site. However, if the ring main unit is required to be Commissioned on site for protection, the Proposer was not sure of the benefits to be gained. ELEXON and the Proposer subsequently view that all HV installations should not be included within the change, in order to maintain clarity of the solution and avoid possible misinterpretation.
5.3.1	~~'For the avoidance of doubt where current transformers contained within a LV cut outs or switchgear are Commissioned off site in line with section 5.5.2 (paragraph 3) the requirements detailed in sections 5.3.1 (Responsibility for Calibrations and Maintenance of Records) and5.3.2 (Initial Calibrations) shall still endure and remain with the relevant BSC Party.~~[1] The BSCCo (or any delegated 3rd party) shall have the right to audit any manufacturers	ELEXON and the Proposer agree with the suggested rewording but the suggestion has been updated to include 'off site Commissioning agent' as opposed to 'manufacturer' in the redlined text.

Table formatting key

Key	
text	**meaning**
Red text	suggested insertion
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Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
	performing Commissioning off site to ensure that the~~is~~ Commissioning is undertaken in line with CoP4 requirements. Any such audit will be facilitated by the BSC Party responsible for ensuring the requirements of 5.5 are performed on its Metering Equipment up to and including the Testing Facilities.[2] Any non-compliance found shall be the responsibility of the relevant BSC Party responsible for the Commissioning.' 1) It is not necessary to include this text in this section as the existing text still works for pre-commissioned units i.e. Regardless of how the CTs are commissioned it is still the BSC Party owning the equipment that is responsible for ensuring the requirements of 5.3 are met. 2) Added this into section 5.3.1 instead of 5.5.4 as I think it fits better here. Therefore, the proposed additional red-line text for section 5.3.1 is: 'The BSCCo (or any delegated 3rd party) shall have the right to audit any manufacturers performing Commissioning off site to ensure that the Commissioning is undertaken in line with CoP4 requirements. Any such audit will be facilitated by the BSC Party responsible for ensuring the requirements of 5.5 are performed on its Metering Equipment up to and including the Testing Facilities. Any non-compliance found shall be the responsibility of the relevant BSC Party responsible for the Commissioning.'	
5.5.1	WPD suggests the proposed redline	Suggestions addressed in a

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Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
	text for Note 7 to this section is changed as follows: '[7] or relevant network operator, as appropriate. Where measurement ~~current~~ transformers are Commissioned off site in line with paragraph 3 (section 5.5.2) then the BSC Party responsible for the Commissioning of measurement transformers shall ensure a traceable process exists and is followed for the periodic calibration of instruments used for Commissioning. '	previous comment.
5.5.2	WPD suggests the proposed redline text for this section is changed as follows: 'Measurement ~~Current~~ Transformers preinstalled in an enclosure ~~LV cut outs or switchgear~~ off site and where subsequent access or alteration is not expected under normal circumstances, ~~delivered to site for connection~~ may be partially Commissioned off site provided this is done in accordance with Section 5.5.2 of CoP4 other than the requirement that the Commissioning be performed on site. ~~Additional~~ Commissioning tests will be required on site by the MOA[7] to complete the ~~a~~ full Commissioning tests in line with CoP4 obligations and confirm correct ~~and secure~~ connections from the measurement transformers ~~Meter~~ up to and including the Testing Facilities. Where the measurement ~~current~~ transformers are not owned by a BSC Party then the Registrant of the Metering System, via its appointed MOA, shall be responsible for ensuring these	ELEXON considers the suggested rewording, 'not expected under normal circumstances' to be too vague which could lead to potential misinterpretation and therefore introduce a risk to Settlement.

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Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
	requirements are met.'	
5.5.2 – First sentence	'Commissioning tests on site1 shall be performed to confirm and record where appropriate the following:' 1) This section also includes off site commissioning in the proposal so "on site" should be removed. The proposed new wording: 'Commissioning tests shall be performed on site with the exception of where Current Transformers are ~~preinstalled~~ integrated[2] within ~~LV~~ low voltage[3] ~~cut outs or~~ switchgear[4] at manufacture. Providing there is no further alteration[5] to the Metering Equipment following Commission some elements[6] of the Commissioning tests ~~off site and delivered to site for connection~~ may be carried out ~~Commissioned~~ off site ~~provided this is done in accordance with Section 5.5.2 of CoP4 other than the requirement that the Commissioning be performed on site. Additional Commissioning tests will be required on site by the MOA to complete a full Commissioning test in line with CoP4 obligations and confirm correct and secure connections from the Meter up to and including the Testing Facilities. Where the current transformers are not owned by a BSC Party then the Registrant of the Metering System, via its appointed MOA, shall be responsible for ensuring these requirements are met.~~[7]' 2) think this is a better word than preinstalled 3) LV is not defined within CoP4 so will need to be added to section 4 –	ELEXON and the Proposer agree with all proposed amendments. A version of the suggested text has been incorporated into the redlining which includes other amendments made due to the CP Consultation.

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Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
	definitions and interpretations – or just use the words 'low voltage'. 4) These are in ISUs too so I think the word 'Switchgear' covers all. 5) Included this as any alteration to any of the equipment will invalidate the factory commission. Also, LV ACB installations with a remote meter panel would still require some on-site commission. 6) Not all can be done off site. 7) I don't think any of this is required as paragraphs 1 and 2 of section 5.5 already cover this. The introduction of pre-commissioned units should not cause the MOA to carry out additional commissioning tests.	
5.5.4	WPD suggests the proposed redline text for this section is changed as follows: 'Where measurement transformer Commissioning has taken place off site, records shall include the identity of the off site ~~third party~~ Commissioning agent along with the ~~contact details and~~ address at which the testing was performed. For the avoidance of doubt, where BSCCo intends to audit ~~a manufacturer completing~~ off site Commissioning, BSCCo will contact the BSC Party responsible for ~~ensuring the requirements of COP4 Section 5.5 have been met~~ the Commissioning of measurement transformers. It is the responsibility of said Party to organise the site audit.'	ELEXON and the Proposer agree to amend 'third party Commissioning agent' to become 'off site Commissioning agent' and the requirement to record the contact details of the off site Commissioning agent has been removed.

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Comments on the CP1505 Proposed Redlining		
Document & Location	Comment	The Proposer and ELEXON's Response
6.2	WPD suggests the proposed redline text for this section is changed as follows: 'Current Transformers preinstalled in an enclosure ~~LV cut outs or switchgear~~ off site and where subsequent access or alteration is not expected under normal circumstances, ~~delivered to site for connection~~ may be partially Commissioned off site provided this is done in accordance with Section 6.2 of CoP4 other than the requirement that the Commissioning be performed on site. ~~Additional~~ Commissioning tests will be required on site by the MOA[7] to complete the ~~a~~ full Commissioning tests in line with CoP4 obligations and confirm correct ~~and secure~~ connections from the current transformers ~~Meter~~ up to and including the Testing Facilities. Where the current transformers are not owned by a BSC Party then the Registrant of the Metering System, via its appointed MOA, shall be responsible for ensuring these requirements are met.'	Suggestions addressed in a previous comment.

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7 Final/Interim Committee views

SVG's final views

CP1505 was presented to the SVG for decision at its meeting on 29 May 2018 (SVG208/03).

One SVG member queried which of WPD's suggestions ELEXON had not incorporated following the CP Consultation. ELEXON clarified that it had incorporated their suggestion to allow off site Commissioning to be completed by an 'off site Commissioning Agent' as opposed to solely the manufacturer. However, WPD had also proposed widening the scope of the CP – disagreeing with the solution's restriction to current transformers and low voltage installations. ELEXON advised that it had not progressed this, since ELEXON and the Proposer considered it to be outside the scope of the change.

The SVG unanimously:

- **AGREED** the amendments to the proposed redlining for CoP4 for CP1505 made following the CP Consultation;
- **APPROVED** the proposed changes to CoP4 for CP1505;
- **APPROVED** CP1505 for implementation on 1 November 2018 as part of the November 2018 Release; and
- **NOTED** that CP1505 will also be presented to the Imbalance Settlement Group (ISG) on 19 June 2018 for decision.

ISG's interim views (deferred decision)

CP1505 was presented to the ISG for information at its meeting on 19 June 2018 (ISG206/04).

An ISG member questioned the rationale for excluding multi ratio CTs and therefore HV and EHV installations from the scope of CP1505. The member felt that similarly to LV installations, many of the Commissioning requirements of CoP4 can be successfully completed off site and therefore, these systems should not be excluded from the CP. ELEXON clarified that HV and EHV Systems primarily utilise multi ratio CTs and therefore Commissioning tests on site should be completed due to the increased risk to Settlement from the incorrect installation of this Metering Equipment. Further, to include HV systems would have been outside the scope of the issue identified. The Consultation received initial resistance and therefore it is viewed off site Commissioning should be approached cautiously and implemented on much lower risk installations first before considering further applications. HV and EHV systems have now been specifically excluded in order to reduce the concern of CoP4 being misinterpreted within the Commissioning process. The ISG member noted that they did not agree that HV and EHV sites should be excluded but not to the extent they would oppose CP1505.

The ISG Members discussed the existing requirement in CoP4 for Registrants to Commission non BSC Party owned measurement transformers (via their appointed MOA). Some Members consider it impractical and impossible to meet the requirements within CoP4 where the measurement transformers are not owned by a BSC Party (i.e. the LDSO). This is most commonly the case where the connection is installed by an Independent Connection Provider (ICP).

In this scenario, the Registrant (via its appointed MOA) has responsibility for the Commissioning of the measurement transformers. However, neither the Registrant nor the MOA has a commercial relationship with the ICP, so in the case of any issues arising with

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the Metering Equipment from installation, the Registrant is unable to ensure the ICP corrects the issues for which it introduced at the site. Similarly, as the ICP is not a BSC Party, ELEXON has no remit to hold them accountable for ensuring the Commissioning process is completed in line with CoP4, and reverts to the Registrant as the responsible party. This loop is circular as the Registrant is required to fix an issue that it did not introduce at the site. Some ISG Members believe that, by allowing off-site Commissioning, CP1505 could make this issue worse. As this is an existing concern, understood to be held by a number of Suppliers, the ISG were concerned that as only one Supplier had acknowledged it in their Consultation response, other Suppliers may not be fully aware of the connection between CP1505 and the accountability issue.

ELEXON clarified that three Suppliers had responded to the Consultation and only one had noted the concern regarding accountability for non-BSC Parties or Party Agents. Indeed this Supplier was not in support of the CP due to this concern. Further, the SVG had already approved CP1505 and had not highlighted the same concern as the ISG.

ELEXON noted that the concern held will be explored as part of a forthcoming BSC Issue 'Ensuring Network Connection assets installed by a non-BSC Party are successfully Commissioned within the BSC timescales'. It was noted that this issue could be complex and require lengthy discussions. Therefore it can't be specified when a final solution may be implemented post the issues process.

ELEXON noted that the concern was not within scope of the defined issue of CP1505. Further, that the solution to CP1505 would not adversely affect the identified concern but would improve aspects of the Commissioning process such as:

- it would allow more effective Commissioning by allowing testing to be completed in a controlled environment offsite;
- it would formalise and provide BSC structure to working practices already currently undertaken in the industry; and
- it would provide procedural and financial benefits those Commissioning measurement transformers.

ELEXON also noted that errors with Metering Equipment would be identified by the MOA's final Commissioning tests. Whilst this may not identify the root cause of the issue, it would identify the need to investigate further and the overall Commissioning would fail until resolved.

ISG members were concerned that if the Commissioning tests failed, the Offsite Commissioning agent could not always be held accountable. This is for the aforementioned reason such that the BSC places the obligation on the Registrant, but as the Registrant may not have a commercial relationship with the ICP, the Registrant would be required to fix an issue for which it did not originally create.

Ultimately, at its meeting on 19 June 2018,the ISG decided to defer its final decision on CP1505. They felt that Suppliers may not have realised the relationship between CP1505 and the existing accountability issue when responding to the Consultation. The ISG **deferred** its decision and requested that ELEXON:

- contact Suppliers (primarily those who responded to the CP Consultation) in order to confirm if the ISG's concern affected their view of CP1505; and
- show progress that the ISG's concern was being mitigated through the forthcoming Issue.

Please see attachment D for the consolidated responses to the RFI issued in regards to the ISG's concern.

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What actions did ELEXON take following the ISG's discussion?

In order to fulfil the ISG's request ELEXON issued an RFI to the industry in order to gain their views on the ISG's concern. ELEXON also directly contacted all Suppliers who responded to the CP Consultation.

Summary of CP1505 RFI Responses				
Question	Yes	No	Neutral/ No Comment	Other
Do you believe that CP1505 will exacerbate the accountability issue?	4	5	0	0
If you already responded to the CP1505 consultation, does the ISG's concern alter your previous view on whether CP1505 should be approved?	0	6	3	0
If you did not respond previously to the CP1505 consultation, do you believe that CP1505 should be approved?	1	1	7	0

In total there were nine responses to the RFI. Two of the respondents were Suppliers; one who initially raised the accountability concern and the other, a Supplier who had not responded to the initial CP consultation. Five of the respondents were DSOs; one of whom was the Proposer. The remaining respondents consisted of one MOA and a Trade Association Representing MOAs.

Four respondents agreed that CP1505 would exacerbate the accountability issue, two of which were Suppliers, the other being a DSO and a trade association for MOAs. The summarised reasoning behind those who agreed that CP1505 would exacerbate this issue is:

- CP1505 would introduce discrepancies in the interpretation of CoP4 leading to an increased risk to Settlement;
- faults in the Metering Equipment could occur in transit of the Metering Equipment and may not be picked up at the install stage; and
- allowing Commissioning off-site and by non-BSC Parties may lengthen the time taken to resolve any issues with the Metering Equipment due to the Registrant being obligated to rectify issues with Metering Equipment that a non-BSC Party Commissioned and installed.

The respondents who believed that CP1505 would not exacerbate the accountability issue consisted of four Distributors and one MOA. The summarised reasoning behind those who disagreed that CP1505 would exacerbate this issue is:

- the quality and timing of Commissioning records being made available could be improved by the Commissioning being done off site;

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- the Commissioning requirements of CoP4 are maintained and supported by the Commissioning party's adherence to industry standards e.g. CE, BSEN 60529, IEC 60044-1, BS 7626;
- Commissioning will be able to be completed in a more controlled environment with the secure labelling providing assurance thereby improving the quality of the Commissioning process; and
- the ISG's concern is outside of the scope of the issue identified and is being addressed by a forthcoming issue.

None of the respondent's views had been changed since being informed of the ISG's concerns. Of the two respondents who had not responded to the initial Consultation, the Distributor (Proposer), believed that CP1505 should be approved. The other respondent, a Supplier, did not as they felt the accountability issue would be exacerbated.

ELEXON returned to SVG210 presenting the RFI responses and the accountability issue for discussion and comment. As the SVG had already approved the CP, they were not asked to re-consider their decision, but rather to provide comments to help inform the ISG's decision. An SVG Member commented that they felt the ISG's concern was a separate issue outside of CP1505 and should be treated as such, but did not further elaborate.

ELEXON and the Proposer maintain the view that CP1505 should be approved and shall not negatively impact the current baseline, as the overall risk of inaccuracy is reduced by the Metering Equipment being Commissioned in a controlled environment rather than at site upon installation. The accountability issue is a known and separate problem which will be addressed through a forthcoming Issue. This accountability issue has been noted by the Performance Assurance Board (PAB) and BSC Panel, who plan to send a letter to Competition in Connections Code of Practice (CiCCoP) Code Administrator/Panel informing them of their concern. ELEXON is continuing to communicate with the BSC Issue Proposer regarding their proposal.

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8 Recommendations

We invite you to:

- **AGREE** the amendments to the proposed redlining for CoP4 for CP1505 made following the CP Consultation;
- **APPROVE** the proposed changes to CoP4 for CP1505;
- **APPROVE** CP1505 for implementation on 1 November 2018 as part of the November 2018 Release; and
- **NOTE** that CP1505 was approved by the SVG at its meeting on 29 May 2018.

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Appendix 1: Glossary & References

Acronyms

Acronyms used in this document are listed in the table below.

Acronyms	
Acronym	Definition
BSC	Balancing and Settlement Code *(industry Code)*
CiCCoP	Competition in Connections Code of Practice
CoP	Code of Practice
CP	Change Proposal
CPC	Change Proposal Circular
CT	Current Transformer
DSO	Distribution System Operator
EHV	Extra High Voltage
HH	Half Hourly
HV	High Voltage
HHMOA	Half Hourly Meter Operating Agent
ICP	Independent Connection Provider
ISG	Imbalance Settlement Group *(Panel Committee)*
LV	Low Voltage
LDSO	Licensed Distribution System Operator
MOCOPA	Meter Operation Code of Practice Agreement
NHH	Non Half Hourly
PAB	Performance Assurance Board
SVG	Supplier Volume Allocation Group *(Panel Committee)*

External links

A summary of all hyperlinks used in this document are listed in the table below.

All external documents and URL links listed are correct as of the date of this document.

External Links		
Page(s)	Description	URL
2	Code of Practice 4: The Calibration, Testing and Commissioning Requirements of Metering Equipment for Settlement Purposes	https://www.elexon.co.uk/bsc-and-codes/bsc-related-documents/codes-of-practice/
6	ISG203 meeting ELEXON webpage	https://www.elexon.co.uk/meeting/isg-203/

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External Links		
Page(s)	Description	URL
6	SVG206 meeting ELEXON webpage	https://www.elexon.co.uk/meeting/svg-206/
7	SVG208 meeting ELEXON webpage	https://www.elexon.co.uk/meeting/svg-208/
17	SVG210 meeting ELEXON webpage	https://www.elexon.co.uk/meeting/svg-210/
17	ISG206 meeting ELEXON webpage	https://www.elexon.co.uk/meeting/isg-206/

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