

Smart Metering Implementation Programme

Government response to the consultation on changes to equipment installation requirements and the governance arrangements for technical specifications

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This document is also available from our website at www.gov.uk/decc

General Information

Purpose of this document:

This document sets out the Government's response to the consultation on smart metering equipment installation requirements and governance arrangements for technical specifications published on 10 April 2014.

Issued: 29 July 2014

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Territorial extent:

This consultation response applies to the gas and electricity markets in Great Britain. Responsibility for energy markets in Northern Ireland lies with the Northern Ireland Executive's Department of Enterprise, Trade and Investment.

Additional copies:

You may make copies of this document without seeking permission. An electronic version can be found at: https://www.gov.uk/government/consultations/changes-to-equipment-installation-requirements-and-governance-arrangements-for-technical-specifications.

Other versions of the document in Braille, large print or audio-cassette are available on request. This includes a Welsh version. Please contact us under the above details to request alternative versions.

Quality assurance:

This consultation has been carried out in accordance with the Government's Consultation Principles, which can be found here:

https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/60937/Consultation-Principles.pdf

If you have any complaints about the consultation process (as opposed to comments about the issues which are the subject of the consultation) please address them to:

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1. Executive Summary and Introduction

- 1 The Government's vision is for every home and smaller business in Great Britain to have smart electricity and gas meters. Smart meters will play an important role in our transition to a low-carbon economy and help to meet some of the long-term challenges in ensuring an affordable, secure and sustainable energy supply.
- 2 This document sets out the Government response to the consultation on changes to equipment installation requirements and the governance arrangements for technical specifications, which was published on 10 April 2014.
- 3 The consultation sought views on draft licence conditions and a policy implementation approach that:
 - Require the Data and Communications Company (DCC) to provide energy suppliers with communications hubs that comply with a Communications Hub Technical Specification (CHTS);
 - Require energy suppliers to install DCC-provided communications hubs in domestic premises as part of the Smart Metering System installation;
 - Require energy suppliers to comply with the technical specifications for a HAN Connected Auxiliary Load Control Switch (HCALCS) and Prepayment Interface Device (PPMID), where they install such devices;
 - Allow multiple versions of technical specifications to be in force at any time;
 - Require the Secretary of State to provide notice of when new Smart Metering Equipment Technical Specification (SMETS) 1 installations will no longer count towards suppliers' roll-out obligations; and
 - Provide for the Device Specifications¹ to be incorporated into the Smart Energy Code (SEC) and thereby be subject to the SEC modification process (Section D).
- 4 Seventeen consultation responses were received from a range of stakeholders including small and large energy suppliers, meter manufacturers, a consumer organisation and energy service companies. A full list of respondents is provided in Annex A and the full responses can be found at www.gov.uk/government/consultations/changes-to-equipment-installation-requirements-and-governance-arrangements-for-technical-specifications).
- 5 Most respondents agreed with the licence conditions as drafted. We are therefore implementing each of the proposals consulted upon. However, some points of clarification were raised and minor revisions suggested. These have been considered and the draft licence conditions have been amended where we considered it necessary. In addition, we have made other minor corrections.

¹ The overarching term for: the Gas Smart Metering and Electricity Smart Metering Equipment Technical Specifications (SMETS); the HAN Connected Auxiliary Load Control Switch (HCALCS) Technical Specification; the Pre-Payment Interface Device (PPMID) Technical Specification; the In-Home Display (IHD) Technical Specification; and Communications Hub Technical Specification (CHTS).

The amended licence conditions will now be notified to the European Commission, as required by the Technical Standards and Regulations Directive², alongside the Device Specifications, CPA Security Characteristics and GB Companion Specification. The licence amendments will be laid in Parliament under the procedure set out in Sections 88 & 89 of the Energy Act 2008 in due course. We expect this to be in early 2015, in preparation for DCC initial live operations in late 2015 and the availability of SMETS 2 meters and DCC communications hubs.

² Directive 98/34/EC of the European Parliament and of the Council of 22 June 1998 laying down a procedure for the provision of information in the field of technical standards and regulations and of rules on Information Society services

2.1 Requirements to install DCC-provided communications hubs

Summary of the Issue under Consideration

- We concluded in the Government response to the consultation on the first version of the SMETS³ that, with the exception of SMETS 1 installations⁴, communications hubs should be provided as part of a Smart Metering System installation in a domestic property and that these should be physically separate or detachable from meters. This position was further developed in the Part 1 response to the SMETS 2 consultation⁵, where it was concluded that the DCC should be required to provide energy suppliers with communications hubs, and that these should be compliant with the CHTS.
- 9 Part 2 of the response to the SMETS 2 consultation confirmed that non-domestic suppliers would not be required to install a DCC-provided communications hub.
- 10 The consultation proposed amending the supply licence conditions to require energy suppliers to install a communications hub provided by the DCC as part of any SMETS 2 Smart Metering System installation at domestic premises. Therefore in the case of such SMETS 2 installations, in order for the rollout obligation to be met, a supplier would have to install both SMETS 2 compliant equipment and a DCC-provided communications hub. We also proposed to require the DCC, through an obligation in the DCC licence, to provide suppliers with CHTS-compliant communications hubs.
- 11 We also proposed that suppliers would be required to install an additional aerial (provided by the DCC) adjacent to the communications hub if requested to do so by the DCC to ensure its effective operation.

- 12 All 16 respondents to this question agreed, or agreed with caveats, with the proposed approach and legal drafting for requiring energy suppliers to install DCC-provided communications hubs with SMETS 2 meters at domestic premises, and requiring the DCC to provide energy suppliers with CHTS-compliant communications hubs.
- 13 Of those respondents that agreed with caveats, a number of suppliers and a consumer group indicated their preference for expanding the proposed arrangements to non-domestic premises as well. The consumer group

³ https://www.gov.uk/government/consultations/smart-metering-implementation-programme-draft-licence-conditions-and-technical-specifications-for-the-roll-out-of-gas-and-electricity-smart-metering-equipment

⁴ SMETS 1 includes Wide Area Network (WAN) Interface requirements, but does not require the installation of a separate communications hub.

⁵ <u>www.gov.uk/government/consultations/smart-metering-equipment-technical-specifications-second-version.</u>

respondent stated that the benefits the communications hub can bring (for example, allowing the connection of a Consumer Access Device) should not be restricted to domestic premises. The large supplier respondents indicated this would deliver a better consumer experience on churn, reduce the cost of supply to non-domestic consumers and minimising barriers that would otherwise exist upon DCC opt-in.

- 14 The policy in relation to non-domestic premises has been subject to previous consultation, where we concluded that the requirement to give customers in non-domestic premises timely access to half hourly readings for electricity and hourly readings for gas, if requested to do so by the customer⁶, was sufficient to ensure these consumers have access to the consumption data that they need. We are currently considering the rules that should apply to non-domestic suppliers seeking to enrol SMETS 2 meters in the DCC, and will consult on this in due course.
- 15 One respondent commented that they were unable to see the regulatory changes to support the requirement that the SEC Panel maintains a list of the particular versions of each of the Device Specifications which are intended to be compatible. The legal drafting that supports this obligation is included as part of the SEC4 consultation⁷.
- 16 Respondents also mentioned that devices should be backwards compatible wherever this is economically efficient, and requested clarity over which versions will be compatible. We agree the Government considers that the economic impact of any change to Device Specifications, including backwards compatibility, should be considered as part of the SEC modification process for Device Specifications. A compatibility matrix for Device Specifications will be maintained and provided by the SEC Panel (see paragraph 15 of this document).
- 17 Within the consultation we proposed that Condition 46 (Electricity) and 40 (Gas) in the Supply Licence Conditions (Security Controls in Relation to Smart Metering Systems) be restricted to Smart Metering Systems that are compliant with SMETS 1 only. However, we recognise there may be potential for suppliers to operate Smart Metering Systems that are compliant with other versions of the SMETS prior to the initial live operations of the DCC, and have therefore removed this restriction.

⁶ This is included in new licence conditions for electricity and gas suppliers which entered into force on 4th June 2014

⁷ Chapter 11. https://www.gov.uk/government/consultations/new-smart-energy-code-content-stage-4

- Where an energy supplier installs a SMETS-compliant meter (except where
 it is compliant with SMETS 1) at domestic premises its roll out licence
 obligation will require it to be accompanied with a DCC-provided
 communications hub. This requirement will be introduced once SMETS 2
 equipment and communications hubs become available in sufficient
 volume.
- Energy suppliers will not be required to install communications hubs in non-domestic premises in order to meet their roll-out obligations, but may choose to do so.
- The DCC will be required in the DCC Licence to provide energy suppliers with CHTS-compliant communications hubs upon request.

	Summary of changes to the legal drafting		
Electricity Supply Licence Condition (ESLC) 1	Gas Supply Licence Condition (GSLC) 1	 A minor amendment has been made to the definition of "Communications Hub" to account for the situation where an aerial slots directly into the communications hub. The definition of "Smart Metering System" has been amended to delete the word "first" as it is redundant. 	
		amended to delete the word mot as it is redundant.	
ESLC 46	GSLC 40	 Paragraph 21 has been deleted to open up this condition to Smart Metering Systems compliant with any version of the SMETS. 	

2.2 Technical specifications for Pre-Payment Interface Devices (PPMIDs) and HAN Connected Auxiliary Load Control Switches (HCALCS)

Summary of the Issue under Consideration

- 18 The two-part response to the SMETS 2 consultation included a requirement on suppliers that any PPMID and HCALCS⁸ which are installed must comply with specific technical specifications.
- 19 We therefore proposed a requirement on suppliers to comply with the PPMID and HCALCS Technical Specifications where they choose to install such devices. Where these devices are installed, we proposed that suppliers should be required to maintain them to the specification extant at the time of their installation (as amended from time to time).

- 20 Around two-thirds of the 16 respondents to this question agreed with our proposals and legal drafting requiring compliance with the technical specifications for PPMIDs and HCALCS where such devices are installed. The remaining one-third of respondents agreed with our proposals and legal drafting, but suggested caveats to the proposed approach.
- 21 One large supplier indicated that a specific licence condition is not needed to implement this requirement, but rather they would expect this to be enforced through the Smart Energy Code (SEC). We continue to consider that these provisions must be included in the supply licences as this provides an appropriate mechanism to enforce this policy to secure consumer benefits.
- 22 Three supplier respondents expressed concern over the obligation to maintain PPMIDs and HCALCS to the specification extant at the time of their installation. Two of these respondents stated that such an obligation should not apply where the device was no longer required by the customer and/or supplier. We consider that in these circumstances, the supplier could un-pair these devices from the Smart Metering System. We have made a minor amendment to the licence condition to the effect that maintenance would only be required where the PPMID or HCALCS remained connected to the Home Area Network (HAN).
- 23 Another large supplier respondent stated that such an obligation to maintain serves to dissuade the development of one-box solutions (for example, an IHD with PPMID functionality). They suggested that the licence condition drafting should be amended to relate only to the provision of PPMID functionality when the Smart Metering System is operated in prepayment mode. We do not consider that this is necessary as the current drafting does not preclude a one box solution. In accordance with Appendix E of the SEC, certain devices must have a specific connection to the Smart Metering System. A one-box solution operating as both IHD and PPMID would need to have a different connection (this would

⁸ Auxiliary Load Control Switches can also be incorporated in Electricity Meters. There are separate requirements in SMETS 2 for such devices.

- require a type 1 connection) than a device operating as an IHD only (which only requires a type 2 connection). By connecting the one-box solution as an IHD only, with no PPMID functionality, the PPMID would no longer be connected to the HAN and there would be no obligation to maintain it.
- 24 One respondent stated that there is no DCC Service to allow remote upgrades of HCALCS and PPMIDs, and therefore the obligation to continue to maintain these devices according to the relevant technical specification would only be possible through site visits. We do not expect that updates of installed PPMIDs and HCALCS will be mandated in many instances, but we may need to call on these powers to protect the integrity of the end-to-end security approach or to secure consumer benefits (e.g. device functionality). As noted in paragraph 22 above, suppliers are only required to maintain these devices in accordance with the relevant technical specification when they are paired to the Smart Metering System.
- 25 One respondent stated that the provision of HCALCS functionality does not necessarily have to be solely provided by the supplier. However, in order to maintain the security of the End-to-End Solution, the SEC (Appendix E) states that only suppliers have the right to commission such a device.
- 26 One consumer group respondent requested clarification as to the rights consumers will have to request either device. We confirm that consumers are able to request either device, however provision of these devices to the consumer from the supplier is not mandatory.

- Where a device with prepayment or HAN connected auxiliary load control functionality is installed, suppliers will be required to ensure that such devices meet the requirements of the PPMID or HCALCS technical specifications respectively.
- Suppliers will be required to maintain these devices to the specification extant at the time of their installation if they are connected to the HAN (and the specification can be amended if such a SEC modification is approved).

	Summary of changes to the legal drafting		
Electricity Supply Licence Condition (ESLC) 1	Gas Supply Licence Condition (GSLC) 1	 A clarification has been added to the definitions of "HAN Connected Auxiliary Load Control Switch" and "Prepayment Interface Device" to reflect that their relevant functionality can only be replicated once they are connected to the HAN. 	
ESLC 52	GSLC 46	 This condition has been amended to only require the maintenance of PPMIDs/HCALCS if they are connected to the HAN, forming part of the Smart Metering System. 	

2.3 Enabling more than one version of the Device Specifications to be in force

Summary of the Issue under Consideration

- We proposed in the consultation to amend the roll-out licence conditions to allow multiple versions of the Device Specifications to be in force at any point in time. In our consultation, we proposed that each version of a Device Specification will have a declared start date. All of the Device Specifications will eventually also have a declared end date. Devices that meet the requirements of that Device Specification which are installed between the specified start and end date (or in the case where no end date has yet been specified, devices installed on or after the start date), will satisfy the requirements of the rollout licence obligation. This would allow for more than one version of a Device Specification to be legally in force at any one time, as the declared start date of a newer version of the Device Specification may come before the declared end date of an earlier version. This would allow suppliers to install devices compliant with the latest version of the Device Specification as early as possible, enabling a smooth operational transition from installing devices which are compatible with the previous one.
- 28 We proposed that a device will need to be maintained so as to ensure that it continues to be compatible with the version of the Device Specification with which it complied at the time at which it was installed.
- 29 We also proposed that devices which are installed and being maintained in accordance with the old version of the Device Specification (which applied to them when they were first installed) may, where that version is updated and such a direction is given, need to be reconfigured or modified in order to comply with the updated provisions (we do not consider that this will be a regular occurrence).

- 30 Of those 16 respondents who replied to this question, about two thirds agreed with our proposals, with the remaining one-third agreeing but with caveats.
- 31 One large supplier respondent stated that it was their understanding that any amendments would apply only to the current version of a Device Specification. This is not the case. The legal drafting (as set out in condition 53 in the Electricity Supply Licence Conditions and condition 47 in the Gas Supply Licence Conditions) provides that there are different types of amendments. Firstly, amendments can be undertaken to any version of a Device Specification relevant for the installation of new equipment. Secondly, amendments can be undertaken to any version of a Device Specification relevant only to device maintenance.
- 32 Another respondent commented that devices that are compliant with a version of the Device Specification extant for the purposes of installation at the time of their manufacture (and not at installation) should be allowed to be installed. We do not agree with this position which could put consumer benefits at risk. We consider that there will be a reasonable notice period to allow the running down of stock compliant with a given version of a Device Specification before that version stops being extant for the purposes of installation.

- 33 Three suppliers expressed concern in relation to amendments to Device Specifications valid for maintenance purposes that apply to devices installed before such an amendment. One of these suppliers suggested that any such proposed modification would need to be subject to a pre-defined and rigorous test before it was considered in order to mitigate liabilities. We agree and consider that the SEC modification process is a mechanism that will sufficiently assess and scrutinise such changes before these were implemented.
- 34 One large supplier commented that it was important that the licence conditions should be drafted specifically with security issues in mind. We envisage that security issues could be the driver for amendments to a technical specification valid for maintenance purposes, but it is important to retain flexibility and not restrict it to such cases as unforeseen circumstances may arise. Ultimately, the SEC modification process will define whether or not amending a version of a technical specification is justifiable in relation to the cost it may impose.
- 35 Another respondent commented that there will need to be clear direction with regards to when specified versions of SMETS devices can be installed. Our stated position is that each version of the SMETS will have a clearly defined start date, which will be viewable on the SEC website⁹. The end date of this technical specification can be defined as part of a SEC modification that is raised after the technical specification has been introduced (although this does not apply to the end date of SMETS 1, which will be defined by the Secretary of State). The same provisions will also apply to all other technical specifications.

- The supply licence conditions will be amended to allow more than one version of technical specifications to be in force at any point in time.
- The Government will consult upon the date from which installation of equipment that complies with SMETS 1 will no longer meet the requirements of the rollout licence condition, and following that consultation, will provide notice of that date.

Summary of changes to the legal drafting				
Electricity Supply Licence Condition (ESLC) 49	Gas Supply Licence Condition (GSLC) 43	 The definition of "Enrolment Service" has been clarified to point to the relevant clauses in condition 17 of the DCC licence. 		
ESLC 50	GSLC 44	 Paragraph 10 has been clarified in line with allowing for multiple versions of the SMETS. Paragraph 13 (Supplier Transfer) has been amended to show the correct reference. 		

⁹ https://www.smartenergycodecompany.co.uk/

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2.4 Incorporation of the Device Specifications into the SEC

Summary of the Issue under Consideration

36 We proposed to transfer the SMETS into the SEC as soon as we consider it practical to do so. Subsequent modifications to the technical specifications would then follow the SEC modification process. We noted that the exact timing of this change is yet to be determined, but that we expect it to coincide with the introduction of SMETS 2 and CHTS into the legal framework.

- 37 The large majority of the 16 respondents to this question agreed with our proposal concerning the incorporation of the SMETS into the SEC. Three respondents suggested caveats.
- 38 One respondent commented that their agreement to this approach was conditional upon the GB Companion Specification (GBCS) having been proved through testing before the SMETS is moved into the SEC. Another respondent stated their preference to include the GBCS in the SEC at the same time as the SMETS. We confirm that it is our intent to incorporate the GBCS in the SEC at the same time as the Device Specifications. The GBCS has been developed with significant industry input (including DCC proving exercises) and is now subject to public consultation (until 21 August).
- 39 One respondent sought clarification as to the continuance of the Section X variation to the SEC modification process. To respond to this point, the Section X variations to the SEC modification process allow only Urgent or Fast-Track Modification proposals to be raised. Whether this variation should continue to apply will be one of the matters we consider before incorporating the technical specifications into the SEC.
- 40 One respondent asked for clarification in relation to the scenario and volume of amendments the Secretary of State is able to make to technical specifications before these are incorporated into the SEC, and whether provisions outlined in the legal drafting at Electricity Supply Licence Condition 53.7 (Gas Supply Licence Condition 47.7) are designed to refer to an interim period. We confirm that once the technical specifications are moved to the SEC, they will be subject to the SEC Modifications Process. The Secretary of State retains his Section 88 powers until 2018, which allows for the direction of changes to technical specifications after appropriate consultation. However, we do not anticipate at present that these powers will be used. In the interim period modifications will be considered via the transitional modification process under the Technical and Business Design Group (TBDG).
- 41 Another respondent considered that governance arrangements for all versions of the SMETS should be identical to promote consistency in the change control arrangements. We agree and confirm our intention that all versions of the Device Specifications will be subject to the SEC modifications process and so will be treated in a consistent manner.

- 42 A consumer body respondent thought that a Panel overseeing SMETS modifications should include consumer and user expertise. We confirm that the SEC Change Board, the body that will oversee SMETS modifications as well as all other modifications to the SEC, will include two Consumer Members.
- 43 One respondent asked that the complete suite of documentation is reviewed when any proposed update or change is required, in order to ensure that there are no unforeseen detrimental impacts on the SMETS document set, as a whole. We confirm that this role will be undertaken by the technical sub-committee to the SEC Panel, which is required to provide advice to the Panel, Change Board and Working Groups on any planned variations to technical specifications.

The technical specifications will be incorporated into the SEC at the earliest appropriate time. Any future modifications would then be undertaken using the SEC's modification process.

Summary of changes to the legal drafting		
DCC Licence Condition 1	 The definitions of IHD Technical Specification, PPMID Technical Specification and HCALCS Technical Specification have been added in line with the changes in Condition 22. 	
DCC Licence Condition 22	 Condition 22 has been updated to capture that the IHD, PPMID and HCALCS Technical Specifications will be moved to the SEC in line with the consultation document's proposals. 	

Annex A: Respondents

Responses to the Consultation on equipment installation requirements and governance arrangements for technical specifications were received from the following organisations:

British Gas	British Standards Institution
Citizens Advice	The Co-operative Energy
Community of Meter Asset Providers	The Data and Communications Company
EDF Energy	EDMI Smart Metering Solutions
EON Energy	Good Energy
Northern Powergrid	NPower
Ofgem	Scottish Power
Siemens	Scottish and Southern Energy
Trilliant	

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