REQUEST FOR INFORMATION

INFORMATION FOR	Industry impacts of large scale changes to Market Domain Data as a result of the Targeted Charging Review (TCR)
Owner	Faysal Mahad
Purpose	Seeking views on the potential impacts of the LLFCs and valid set combinations that will be added to the MDD as a consequence of Ofgem's TCR Decision.
Classification	Public

Dear Industry Members,

We request the provision of information, detailed below, and set out in the attached response form. Please send responses, using the response form, to bsc.change@elexon.co.uk by 17:00 on Friday 21 August 2020.

Information required

To support the implementation of Ofgem's Targeted Charging Review (TCR) Significant Code Review (SCR) Decision the Market Domain Data (MDD) will need to be updated with approximately 19,000 new Line Loss Factor Classes (LLFCs) and 300,000 valid set combinations by April 2021, see appendix one and two for details. The MDD is the central repository for data in the retail electricity market and LDSOs can only start to change the registration details for their metering systems once the new LLFCs are on the MDD. The impacts of such large changes to LLFCs and MDD on Market Participants is unclear.

This Request for Information is to invite you to provide your views on the potential impacts of the LLFCs and valid set combinations that will be added to the MDD as a consequence of Ofgem's TCR Decision.

We are also interested in impacts from Metering Point Administration Service (MPAS)/ Supplier Meter Registration Agent (SMRA) Registration Record updates that will be made once the LLFCs are available for use in MDD. As we understand LDSOs plan to update approximately 2.5m Metering Systems' registration records in MPAS. And LDSOs must make these changes before DUOS and TNUOS TDR charges take effect in April 2022.

Information from this RFI will support our plans to mitigate the risks associated with a change of this magnitude. It will identify to Ofgem and LDSOs the scale of the challenge and to what extent the current plan is achievable or may need reconsidering.

Steps ELEXON will take to maintain confidentiality and anonymity

Before being shared with industry, the data provided will have any reference to the respondent and specific MSIDs removed, and will be aggregated to provide a holistic view of industry views. Individual costs will not be publicly shared. However, all information will be provided to Ofgem and held internally.

Before the data is shared externally, providers of the data will be given the opportunity to review the data.

Background to request

The TCR, launched in 2017, is an Ofgem-led project that assessed how residual network charges should be set and recovered in Great Britain. It also sought to keep other 'embedded benefits' (i.e. the differences in charges faced by smaller distributed generators and larger generators) under review. Ofgem set up the TCR in response to the changing role of the networks as more electricity is generated from a wider range of sources and more flexible demand.

Targeted Charging Review Decision and Direction

As communicated in the TCR final decision on 21 November 2019 in order to reduce the harmful distortions caused by the current residual charging arrangements which encourage some organisations to reduce exposure to residual charges, Ofgem has decided that there should be a single fixed charging band for domestic consumers and a series of fixed charging bands for non-domestic customers:

- For domestic consumers, there will be a single transmission residual charge, and a single distribution residual charge within each of the 14 distribution licensed areas. So all domestic customers within each of 14 distribution areas will pay the same level of residual charge.
- For non-domestic consumers, there will single set of transmission residual charges, and a set of distribution residual charges for each of the 14 distribution licensed areas for each fixed charging band. Bands will be defined by a consumer's voltage level and, where further segmentation is required, further boundaries will be defined based on agreed capacity for larger consumers for whom this data is readily available, and net consumption volume for smaller consumers for whom this data does not routinely exist.

Impacts of TCR Decision on MDD

The TCR decision directed the National Electricity Transmission System Operator (NETSO) and certain Licenced Distribution System Operators[1] (LDSOs) to make changes to how residual revenues are recovered through Distribution Use of System (DUoS) and Transmission Network Use of System (TNUoS).

Consequently, LDSOs and NETSO raised DCUSA and CUSC Modifications[2] to introduce new DUoS and TNUoS charges from 1 April 2022. To give effect to the new charging arrangements LDSOs must create new Line Loss Factor Class (LLFCs) for metering systems.

LLFCs are used to identify how the Imports or Exports measured by groups of Metering Systems should be scaled using Line Loss Factors to account for losses on the GB Distribution Systems. LLFCs are paired with other Market Domain Data items such as Profile Class (PC), Standard Settlement Configuration (SSC), Time Pattern Regime (TPR) and Meter Timeswitch Class (MTC) in a series of different arrangements known as 'valid combinations.' It is important to note that LLFCs are also used by LDSOs to indicate how Metering Systems are treated for network charging purposes. Furthermore, four of the six valid set combinations are not used for Settlement purposes.

Both LLFCs and Valid Set Combinations are part of ELEXON's Market Domain Data (MDD). The MDD is the reference data used by Suppliers, Supplier Agents and LDSOs in the retail electricity market. It allows the Supplier Volume Allocation (SVA) Trading Arrangements (and other industry arrangements, e.g. network charging) to operate by ensuring everyone uses the same data.

To support the implementation of Ofgem's TCR Decision, the MDD will need to be updated with approximately 19,000 LLFCs and 300,000 valid set combinations by April 2021. This is because LDSOs can only start to change the registration details for Metering Systems once the new LLFCs are available through MDD.

Once the LLFCs are available for use in MDD, LDSOs plan to update approximately 2.5m Metering Systems' registration records in MPAS. LDSOs must make these changes before DUoS and TNUoS TDR charges take effect in April 2022.

[1] Ofgem's direction only applies to LDSOs who are Distribution Services Providers, i.e. Distribution Network Operators (DNOs) not Independent DNOs (IDNOs).

[2] DCP326- Introduction of Load Diversification Identifiers for Load Managed Areas and DCP268 - DUoS Charging Using HH Settlement Data.

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Measures to mitigate known risk

Engagement with LDSOs

ELEXON has been working with the LDSOs to understand the scale and mitigate the impacts of adding this unprecedented amount of data to the MDD .

To ensure the April 2022 TCR implementation deadline is met a number of activities must be planned and completed. In addition to the design and implementation of the new charging arrangements in the CUSC and DCUSA, LDSOs and NETSO must ensure that they will receive the data they need to determine Residual Charging Bands, allocate Sites to these bands, set Transmission Demand Residual Tariffs and bill. Furthermore, it must be clear to Suppliers and others how Sites will be treated in charging arrangements.

In order to set tariffs and bill for sites connected to Distribution Systems, LDSOs must, amongst other things:

- Create new LLFCs (~19,000) and valid sets (~300,000)
- Update ~2.5m Metering Systems' registration records in SMRS/MPAS. LDSOs require enough time to update MSID registration records in MPAS as there is a limit on how many MSID records can be updated daily. We understand in the case of the changes needed for the TCR as LDSOs are expected to update about 2.5 million metering systems' records.
- LDSOs must communicate to Suppliers, customers and other interested parties how sites will be treated and give notice of charge changes.

Based on these steps, LDSOs have indicated that the LLFCs and valid sets need to be available in MDD by April 2021. This is to ensure that LDSOs have time to update Metering Systems registration records in MPAS/SMRS. We are not aware that the LDSOs have agreed or communicated a specific plan for updating Metering System records but we understand that LDSOs may be limited to making a maximum of 20,000 record updates per GSP Group per day. Also, we understand that commitments to perform system testing during 2021 in support of the Faster Switching Programme implementation may limit LDSOs opportunities for making changes in MPAS/SMRS during 2021. Appendix 1 summarises the schedule of MDD versions we expect to be implemented, including likely additional LLFCs and valid combinations to be added. Appendix 2 illustrates the schedule of MDD releases and our understanding of the corresponding MPAS and CSS testing dates.

Based on the estimated numbers of LLFCs and valid sets, and the deadline for adding them to MDD, we shared an initial plan with LDSOs to facilitate the raising of MDD Change Requests (CRs). Whereby different LDSOs would submit their CRs according to an agreed monthly schedule between October 2020 and March 2021, see appendix 1 for details. This schedule aims to smooth the load and risk of adding large numbers of LLFCs and valid sets to MDD which might otherwise significantly impact MDD systems and market participant's systems, and ensures LLFCs are available to LDSOs to enable them to update Metering System records in MPAS/SMRS.

We are working with LDSOs to understand whether the April 2021 deadline is a hard stop deadline or if the work can continue into the second part of 2021. Allowing the extension of the work into the summer of 2021 may allow ELEXON to make the necessary systems changes needed to efficiently process the MDD CRs.

BSC Change Proposal (CP)

BSCP509 'Changes to Market Domain Data' sets out the Change Request (CR) process for the MDD. It ensures that all changes to MDD are made in an auditable and controlled manner. This covers the raising of a change (an MDD Change Request 'MDD CR'), authorisation and notification of MDD items to all relevant Market Participants including the SVAA.

However, the current process is a manually intensive process and to date has not been used to make such large and sustained changes to MDD. Once a request to amend data in MDD from an LDSO has been submitted and validated, each line of data needs to be manually added to the MDD by an operator. Manually processing data of the magnitude required for the TCR would need a significant increase in resource and increase the risk of introducing erroneous data in to the MDD.

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ELEXON will raise a BSC Change Proposal (CP) to mitigate the known risks associated with introducing this large volume of data to the MDD. The CP will stop a significant increase in operational costs of the MDD and reduce the risk of erroneous data entering the MDD.

More generally, and aside from the immediate and considerable risks associated with adding ~19,000 new LLFCs and ~300,000 valid set combinations to support implementation of TCR, we believe the current level of manual intervention in the MDD CR process is unnecessary. The CP would therefore be an enduring solution rather than a limited contingency provision. Digitalising certain MDD entity forms will introduce a more efficient and enduring approach to the MDD CRs process by reducing the level of errors which could be attributable to the manual processing of data.

Engagement with Service Provider

ELEXON has been working with its service provider to understand the impacts of the change on their resources. Namely, their capacity to complete MDD updates during this period (as we are expecting other BAU submissions such as further IDNO entrants) as well as any additional resources which may be required in order to meet the forecasted volumes of MDD CRs.

As part of this work we are exploring with them the potential for additional validation to help mitigate the risk of manual errors in the period before the implementation of the BSC CP mentioned above.

ELEXON response to previous consultation

On 3 October 2019, ELEXON responded to Ofgem's consultation entitled 'Future Charging and Access programme - refined residual charging banding in the TCR'. In our response we highlighted the challenge of developing and implementing new changes to the BSC and its systems by April 2021.

What's next?

Attachment A contains the specific questions on which we seek your views. Please use this form to provide your response to these questions, and to record any further views or comments you wish to be considered. Please complete and return the response form to bsc.change@elexon.co.uk by **17:00 Friday 21 August 2020**.

If you have any further questions about this RFI, please email **Faysal Mahad** (bsc.change@elexon.co.uk) or call on **0207 380 4375.**

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Appendix 1

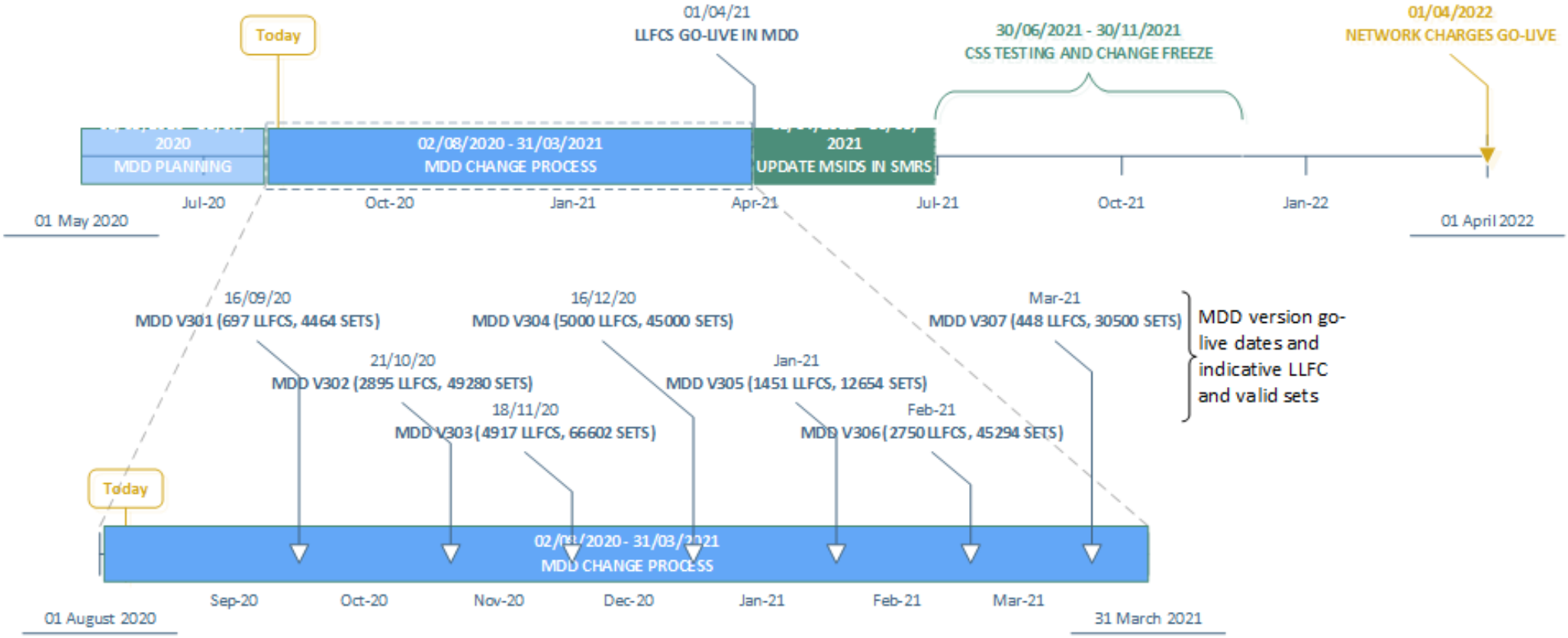
The below table shows approximate number of new LLFCs and Valid Set Combinations, in addition to normal 'BAU' volumes, we expect.

Planned MDD Version	Approximate Number of New LLFCs	Approximate Number of Valid Set Combinations in addition to normal 'BAU' volumes	Planned MDD Go Live Date*
301	697	4664	September 2020
302	63	705	October 2020
302	2500	40000	October 2020
302	48	4412	October 2020
302	231	3171	October 2020
302	53	992	October 2020
303	1375	11094	November 2020
303	2500	40000	November 2020
303	994	12000	November 2020
303	48	3508	November 2020
304	2500	5000	December 2020
304	2500	40000	December 2020
305	800	400	January 2021
305	651	4066	January 2021
305		8188	January 2021
306	700	7000	February 2021
306	390	7794	February 2021
306	1100	5500	February 2021
306	560	25000	February 2021
307	448	30500	March 2021

*Please note this is not the Effective From Date, which for TCR changes is planned to be 01 April 2020.

Appendix 2

The below timeline illustrates how the MDD changes fit in to the steps needed to support the implementation of the TCR by April 2022



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