Department for
Business, Energy
& Industrial Strategy

Smart Meter Targets Framework:

Churn adjustment

Annex A: Analytical Evidence

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Interpretation

In this document:

“the Government” refers to the UK Government;

“we” refers to the UK Government;

“BEIS” or “the Department” refer to the Department for Business, Energy and Industrial Strategy, that has published the consultation on behalf of the UK Government;

“the Programme” refers to the Smart Metering Implementation Programme, which includes the Department’s Smart Metering Team and the wider group of partners and stakeholders responsible for delivering the rollout;

“the existing all reasonable steps (ARS) obligation” or “the existing obligation” refers to the legal obligation on energy suppliers to take “all reasonable steps” (ARS) to install smart meters. This obligation initially required installations to take place by the end of 2019 and, in 2013, it was extended to the end of 2020 (“the 2020 rollout duty”). In June 2020, due to the disruption caused by the COVID-19 pandemic, it was extended to 30 June 2021. In June 2021, it was extended by a further six months to 31 December 2021;

“the Targets Framework”, “the new Framework”, “the Framework” and “the new obligation” refer to the smart meter installation obligation which has been implemented and is due to take effect from 1 January 2022;

“customer-driven churn” refers to consumers switching between energy suppliers voluntarily, as a result of the consumer’s active choice;

“smart churn” refers to customers who already have a smart meter installed in their premises switching supplier;

> “Positive smart churn” refers to what an energy supplier experiences when more smart meter customers are **gained** than lost through churn;
>
> “Negative smart churn” refers to what a supplier experiences when more smart meters are **lost** than gained through churn;

“smart penetration” refers to the proportion of an energy suppliers’ customer base that have smart meters.

Problem under consideration and rationale for intervention

1. Smart meters are a vital upgrade to our national energy infrastructure and underpin the cost-effective delivery of the Government's net zero commitment. They are a critical tool in modernising the way we all use energy and support the transformation of the retail energy market, to make it work better for energy consumers.[1]

2. The Government is committed to ensuring that households and small businesses can benefit from smart meters as soon as possible. To meet this ambition and drive completion of the rollout, the Government confirmed in June 2020 that a new four-year Framework would set energy suppliers annual, individual installation targets on a trajectory to 100% coverage, subject to an annual tolerance level. In June 2021 the Government confirmed the tolerance levels for the first two years of the new Framework.[2]

3. In the June 2021 decision, the Government committed to consult on proposals for a modification in the calculation of Year 2 installation requirements to mitigate the impact of smart meter customers switching their energy supplier ("churn") during Year 1. In committing to consult on proposals for an adjustment, we accepted that the current methodology for calculating minimum installation requirements, by not mitigating the impact of smart churn, may potentially result in unfair penalisation of energy suppliers that are furthest ahead in their smart meter rollout, as they are potentially more likely to lose smart customers than gain them. This is a result of the fact that some energy suppliers are further ahead than others with regards to their smart meter rollout and all customers are free to move between energy suppliers. When a customer who has had a smart meter installed moves to a new energy supplier, the "credit" for that installation (in terms of smart meter coverage) is transferred to the new energy supplier. Whilst a supplier cannot meet its minimum installation requirements through a gain in smart meters alone, a net gain in smart meters obtained via churn in Year 1 would have a material impact on supplier minimum installation requirements in Year 2.

4. In proposing an adjustment to mitigate the impact of customer-driven smart churn, we seek to fulfil the intention of the Targets Framework to focus energy suppliers' obligations on the number of smart meters that they install in each rollout year. We also seek to address the current position whereby a supplier may be disadvantaged by being above market average smart penetration and losing more smart customers than they

[1] The rationale for Government intervention in the rollout is included in the 2019 Smart Meter Roll Out: cost benefit analysis.
[2] Smart meter policy framework post 2020: minimum annual targets and reporting thresholds for energy suppliers – government response

gain through customer-driven churn.[3] We recognise the challenges of the current market situation and that customer-driven churn is likely to decrease in this context, however, we consider that bringing forward a proposal for a customer-driven churn adjustment remains justified on the basis of the intentions set out above.

5. This Annex provides additional detail regarding our analytical considerations for proposing this adjustment.

6. In adjusting for customer-driven churn of smart meter customers, costs and benefits associated with the Targets Framework are simply redistributed between suppliers, generating no additional costs or benefits to society, as per HMT Green Book guidance on economic transfers.[4] Our analysis has therefore focused on the impact that the policy would have on suppliers' minimum installation requirements in Year 2 under different churn scenarios (using 8 illustrative domestic suppliers and 4 illustrative non-domestic suppliers).

7. The current methodology for calculating minimum installation requirements does not mitigate for positive smart churn (gaining more smart meters than are lost as a result of customers switching suppliers) or negative smart churn (losing more smart meters than are gained from customers switching). This could lead to more challenging Year 2 targets for suppliers experiencing negative smart churn than they would have expected had they not experienced such churn. This results from the fact that, when calculating their Year 2 target, a supplier's net smart churn at the end of Year 1 will be counted as part of their total metering points. Churn may therefore increase or decrease a supplier's smart meter coverage at the beginning of Year 2. A change to the proportion of smart customers in their portfolio as a result of churn will have an impact on the calculation of a supplier's minimum installation requirements for Year 2. If a supplier experiences negative smart churn in Year 1, their proportion of smart customers relative to their overall portfolio will reduce and this may result in higher installation requirements in Year 2.

8. Given the disparity between market-wide smart coverage and individual suppliers' smart coverage, a supplier with above average smart penetration is more likely, all other things being equal, to gain a higher proportion of traditional meters and lose a higher proportion of smart meters than suppliers with average or below average smart penetration. Therefore, the net effect of Year 1 churn may be to make Year 2 installation requirements more difficult for suppliers with above average smart penetration (and easier for suppliers with below average smart penetration). This would run contrary to the stated objectives of the policy framework (particularly objectives b) and d) which are detailed in paragraph 10 below). By not accounting for churn, suppliers that are ahead of market average in their smart rollout may see comparatively higher installation

[3] While we use the term 'customer' through this document for ease of reference, supplier installation requirements under the new Framework are based on metering systems and this would remain unchanged under the proposed adjustment. One customer may represent multiple metering systems, particularly in the non-domestic sector.
[4] The Green Book: Central Government Guidance on Appraisal and Evaluation, pg.58

requirements as a result of smart churn and those that are behind market average may see comparatively lower requirements. We have previously acknowledged the importance of delivering market-wide rollout and the role that all suppliers will play in achieving this. We therefore look to ensure that the minimum installation requirements are appropriately spread between suppliers, to put all suppliers on a track to achieving full smart coverage. The proposed churn adjustment would support this objective.

9. The present consultation proposes applying the most complete mitigation possible of the impact of customer-driven churn. This approach would ensure that a supplier's minimum installation requirements for Year 2 reflect the level of their smart meter installations in Year 1 only. It would also ensure that energy suppliers that are furthest ahead in their smart rollout are not penalised with higher installation requirements as a result of being more likely to experience negative smart churn.

Policy objectives

10. In the Impact Assessment published alongside the June 2021 consultation, we identified four key design principles for the policy framework.[5] These were:

    a) To encourage consumers to benefit from the rollout of smart meters, including how to use the data from their smart meters;

    b) To deliver a market-wide rollout of smart meters as soon as possible, that ensures value for money and maintains installation quality so that consumers can derive maximum benefit and have a good experience;

    c) To normalise smart meters so they are the default meter used in Great Britain;

    d) To provide certainty to the whole sector to invest and plan, ahead of and beyond June 2021.

11. In adjusting Year 2 installation requirements to account for customer-driven smart churn in Year 1, our intention is to support delivery of the above objectives, particularly objectives b) and d). By proposing the most complete adjustment for churn in Year 2, we intend to provide greater certainty for all energy suppliers as to what their minimum installation requirements for the second year of the new Framework will be, whilst also ensuring that the market-wide rollout of smart meters will continue at pace.

12. Specifically in relation to the proposed churn adjustment, we have assessed options against the following criteria that reflect the objectives for the adjustment:

[5] Impact Assessment, Smart Meter Policy Framework Post 2020: Government response to a consultation on minimum annual targets and reporting thresholds for energy suppliers.

- The extent to which they focus energy suppliers' obligations on the number of smart meters that they install in each rollout year; and
- The extent to which they ensure that suppliers that have achieved the highest levels of smart penetration (and therefore are most likely to experience negative smart churn) are not unfairly penalised.

Description of options considered

13. To implement the churn adjustment, we are proposing an amendment to the formula used to define minimum installation requirements. The proposed revised formula functions by introducing a variable churn adjustment parameter (β). This parameter applies a level of mitigation of the impact of churn on a supplier's installation requirements and can be set at a value from 0 to 1.

14. The addition of a churn adjustment factor to the target framework results in the following formula:

Figure 1: Target calculation formula

$$\boldsymbol{Ny} = \left(\frac{\mathbf{1}}{\boldsymbol{a_y}}\left\{\beta_y * \left(\boldsymbol{TMS_y} - \left(\boldsymbol{S_1} + \boldsymbol{NQ_y}\right)\right) + \left(\mathbf{1} - \beta_y\right) * \left(\boldsymbol{RSMS_y}\right)\right\} - \boldsymbol{T_y}\right)$$

Where:

Ny means the minimum installation requirement for the Rollout Year "y";

ay means a number used to calculate a proportion where "y" is equal to year of the framework (it takes a value equivalent to the number of years remaining in the framework);

βy means a number representing a **churn adjustment parameter in a range of 0 to 1**, which will apply a level of mitigation of the impact of smart meter customers switching supplier on supplier installation requirements and which shall have the value that is determined in a document published and issued by the Secretary of State for the purposes of Conditions 33A and 39A, following a consultation with all holders of Gas and Electricity Supply Licences;

TMSy means the total number of premises (domestic and designated) (smart and non-smart) supplied by supplier at the start of Rollout Year "y";

Ty means a number representing a tolerance level, which shall have the value that is determined, or calculated in accordance with a methodology specified in a document published and issued by the Secretary of State for the purposes of Conditions 33A and 39A, following a consultation with all holders of Gas and Electricity Supply Licences;

S1 means the total number of premises (domestic and designated) with a Qualifying Metering System (i.e. smart and advanced) that are the responsibility of the supplier at the start of the First Rollout Year;

NQy means the total number of premises (domestic and designated) at which a supplier has installed a Qualifying Metering System from the start of the First Rollout Year up to the date which immediately precedes the start of Rollout Year "y";

y means each Rollout Year within the Framework;

RSMSy means the number of Qualifying Relevant Premises[6] at the beginning of the Rollout Year.

15. The formula change alone does not automatically impact Year 2 targets; these are dependent on the value at which β is set. If β is set at 0, then there is no change to the supplier installation requirements for Year 2 that are implied by the obligations in the existing licence conditions. This, in essence, can be thought of as a "do-nothing" option insofar as adjusting for churn is concerned.

16. Conversely, setting this parameter at 1 represents a complete churn adjustment, whereby a suppliers' minimum installation requirements for Year 2 are based on their smart meter installation levels in the previous year. This would, in effect, exclude any smart meter customers that a supplier has gained or lost in Year 1 of the Framework from the calculation of their target for Year 2 (although that supplier's installation requirement would still reflect the new size of their overall portfolio, as would the overall tolerance adjustment that applies to them).

17. Any value in between 0 and 1 would partially adjust for churn and so a supplier's minimum installation requirements would reflect not only their smart meter installation levels in the previous year, but also to a degree the impact of smart churn during that year. The extent to which smart churn impacts on a supplier's installation requirements will depend on the exact value at which the churn adjustment parameter (β) is set.

18. The Government Response in June 2021, the accompanying Impact Assessment, and the accompanying analytical annex demonstrated that the targets set for suppliers are reflective of consumer demand, operational fulfilment, and operational capacity. The proposed adjustment does not change this.

19. In our analysis below, we have considered two options (relative to the "do-nothing" option) for setting the value of the churn adjustment parameter (β) in Year 2:

[6] A Qualifying Relevant Premises is defined as a Domestic Premises or Designated Premises in respect of which the licensee is the Relevant Electricity Supplier and at which there is installed neither: (a) a Smart Metering System; nor (b) an Advanced Meter installed in accordance with the requirements of standard condition 39 (Smart Metering System – Roll-out, Installation and Maintenance), Energy supply licence conditions.

- Option 1: The value of the churn adjustment parameter (β2) in Year 2 is set at 1. This option has been proposed on the basis that it fully mitigates for the impact of Year 1 customer-driven smart churn on Year 2 minimum installation requirements. At present, this is our preferred option.
- Option 2: The value of the churn adjustment parameter (β2) in Year 2 is set at 0.5. This option has also been considered for the same reasons as Option 1 but is a less complete churn adjustment which spreads the impact of churn across the industry. This is currently viewed as sub-optimal as it does not fulfil the objectives of the churn adjustment to the same degree as Option 1 when assessed against the criteria set out in paragraph 12 above.

Details of churn modelling approach

20. To understand the impact of the different policy options, we have modelled the proposed intervention using illustrative suppliers as described below. The modelling aims to demonstrate to obligated suppliers the scale of the potential impacts that our proposals would have on Year 2 minimum installation requirements.

21. To model the impact of customer-driven churn and any proposed churn adjustment on suppliers' Year 2 installation requirements we have set out a scenario with eight illustrative domestic suppliers and four illustrative non-domestic suppliers. Supplier specific data has not been used to avoid issues around disclosure, but the intention is that a range of supplier circumstances are considered in the creation of these illustrative energy suppliers.

22. Having constructed portfolios for these illustrative suppliers, we have then calculated their minimum installation requirements for Year 1 of the Framework using the tolerance levels published in the June 2021 Government response. Minimum installation requirements for Year 1 remain unchanged at any level of churn adjustment for Year 2 targets.

23. We then consider the expected impact of customer-driven churn on suppliers' portfolios and consequently their Year 2 minimum installation requirements. To do this we use an estimated churn rate listed in the assumptions section below.

24. In constructing our analysis, the churn adjustment parameter (β) is given three values (0, 0.5, 1) to illustrate how supplier Year 2 installation requirements vary depending on the level of churn adjustment.

Modelling Assumptions

25. Below we have listed the assumptions made when modelling our churn adjustment:

a) In our central scenario the average rate of meter churn for **domestic suppliers** is 19% (this value has been chosen for illustrative modelling purposes based on historic churn rates. The actual churn rates will vary by supplier and depend on switching rates/levels of smart coverage for each supplier);[7]

b) In our central scenario the average rate of meter churn for **non-domestic suppliers** is 25% (this value has been chosen for illustrative modelling purposes based on historic churn rates. The actual churn rates will vary by supplier and depend on switching rates/levels of smart coverage for each supplier);[8]

c) **Smart meters** that are **lost through churn** are lost at the relevant rate above in proportion to a supplier's smart metering base;

d) **Traditional meters** that are **lost through churn** are lost at the relevant rate above in proportion to a supplier's traditional metering base;

e) **Smart meters** that are **gained through churn** are gained at the illustrative rates a) and b) above as a proportion of market average smart meter coverage;

f) **Traditional meters** that are **gained through churn** are gained at the relevant rate above as a proportion of market average traditional meter coverage;

g) **Domestic suppliers** with **above average smart penetration** are assumed to have a net loss of 250,000 meters over Year 1 (this value has been chosen for illustrative modelling purposes and is not a forecast);[9]

h) **Domestic suppliers** with **below average smart penetration** are assumed to have a net gain of 250,000 meters over Year 1 (this value has been chosen for illustrative modelling purposes and is not a forecast);[10]

i) **Non-domestic suppliers** with **above average smart penetration** are assumed to have a net loss of 25,000 meters over Year 1 (this value has been chosen for illustrative modelling purposes and is not a forecast);[11]

j) **Non-domestic suppliers** with **below average smart penetration** are assumed to have a net gain of 25,000 meters over Year 1 (this value has been chosen for illustrative modelling purposes and is not a forecast);[12]

[7] Quarterly domestic energy switching statistics 2020, available at https://www.gov.uk/government/statistical-data-sets/quarterly-domestic-energy-switching-statistics
[8] Estimated uplift from domestic switching rate above to reflect that the loss of one non-domestic customer through churn can often affect many metering points (e.g. a business customer will often have multiple sites).
[9] This an illustrative assumption made for modelling purposes based on losses and gains in meters observed in previous years.
[10] As above.
[11] As above.
[12] As above.

k) Market-wide, domestic smart coverage is 47.2% (1 d.p.) at the start of the Framework (this value is a result of the figures used in the illustrative supplier scenarios set out below. It is not a market-wide forecast);

l) Market-wide, non-domestic smart coverage is 48.4% (1 d.p.) at the start of the Framework (this value is a result of the figures used in the illustrative supplier scenarios set out below. It is not a market-wide forecast);

m) We have, for modelling ease, assumed no change in the overall number of metering points between years.

Calculation methodology (worked example)

26. The below provides an example of how the revised formula detailed in paragraphs 13 and 14 would function:

A domestic supplier with:

Year 1: Total Metering Points – 1,000,000

Year 1: Smart Coverage – 600,000

Year 1: Non-Smart Coverage – 400,000

Year 1 Smart Installations – 65,000

Year 1 Smart Meters lost – 50,000

So that in Year 2:

$\mathbf{a}y = 3$

$\beta_y = 1$ (complete churn adjustment)

$\mathbf{TMS}2 = 950{,}000$

$\mathbf{S}1 = 600{,}000$

$\boldsymbol{NQ}2 = 65{,}000$

$\mathbf{RSMS}2 = 335{,}000$

$\mathbf{T}2 = 48{,}450$

Minimum Installation Requirements for Year 2 with complete churn adjustment:

$\mathbf{N}2 = 1/3*((1*(950{,}000-(600{,}000+65{,}000)) + (1-1)*335{,}000)$

$\mathbf{N}2 = 1/3*(950{,}000-665{,}000) = 95{,}000$

$\mathbf{N}2 - \mathbf{T}2 = 95{,}000 - 48{,}450 = 46{,}550$

Impact of churn adjustment – central scenario

Table 1: Year 2 minimum install requirements with different β values - Domestic

Domestic Supplier	Smart meter penetration at beginning of Year 1	Year 2 targets where β= 0	Year 2 targets where β=0.5	Year 2 targets where β=1
Supplier 1	50.0%	838,196	809,691	781,186
Supplier 2	48.2%	735,795	713,365	690,935
Supplier 3	48.5%	116,965	96,628	76,291
Supplier 4	90.0%	0	0	0
Supplier 5	33.3%	172,797	197,741	222,685
Supplier 6	38.3%	357,278	385,382	413,486
Supplier 7	40.0%	559,145	590,233	621,320
Supplier 8	41.5%	452,905	480,037	507,170

27. **Table 1** above considers the impact that the varying levels of churn adjustment would have on domestic suppliers' Year 2 installation requirements. When β =0 we can see that for suppliers with an above average smart penetration (suppliers 1-4) that Year 2 targets are noticeably higher compared to a full churn adjustment scenario where β =1.

28. If we consider the example of Supplier 1, we can see that the installation requirements for Year 2 drop by just under 60,000 meters (6.8%) when β =1 which, given the greater certainty provided by the churn adjustment, makes Year 2 targets materially less challenging than if no adjustment is applied. This is further evident for Supplier 3 for whom the minimum number of installations in Year 2 would drop by 34.8% (just over 40,000 meters).

29. Whilst the churn adjustment works to reduce the Year 2 installation requirements for suppliers with above average smart penetration, it conversely works to increase the Year 2 installation requirements for suppliers with a below average smart penetration (in the example above the increase ranges from 11 to 29%) if they experience positive smart churn in-line with the assumptions above. Whilst this means that Year 2 requirements are more challenging for these suppliers, it acknowledges that in order to achieve market-wide smart coverage, all energy suppliers need to be installing smart meters in place of traditional meters. The revised calculation of installation requirements, by focussing on smart meter installations rather than smart meter customers gained through churn, would therefore support the effective delivery of market-wide rollout as soon as possible.

Figure 2: Proportion of Year 2 installations by energy supplier under different churn scenarios - Domestic

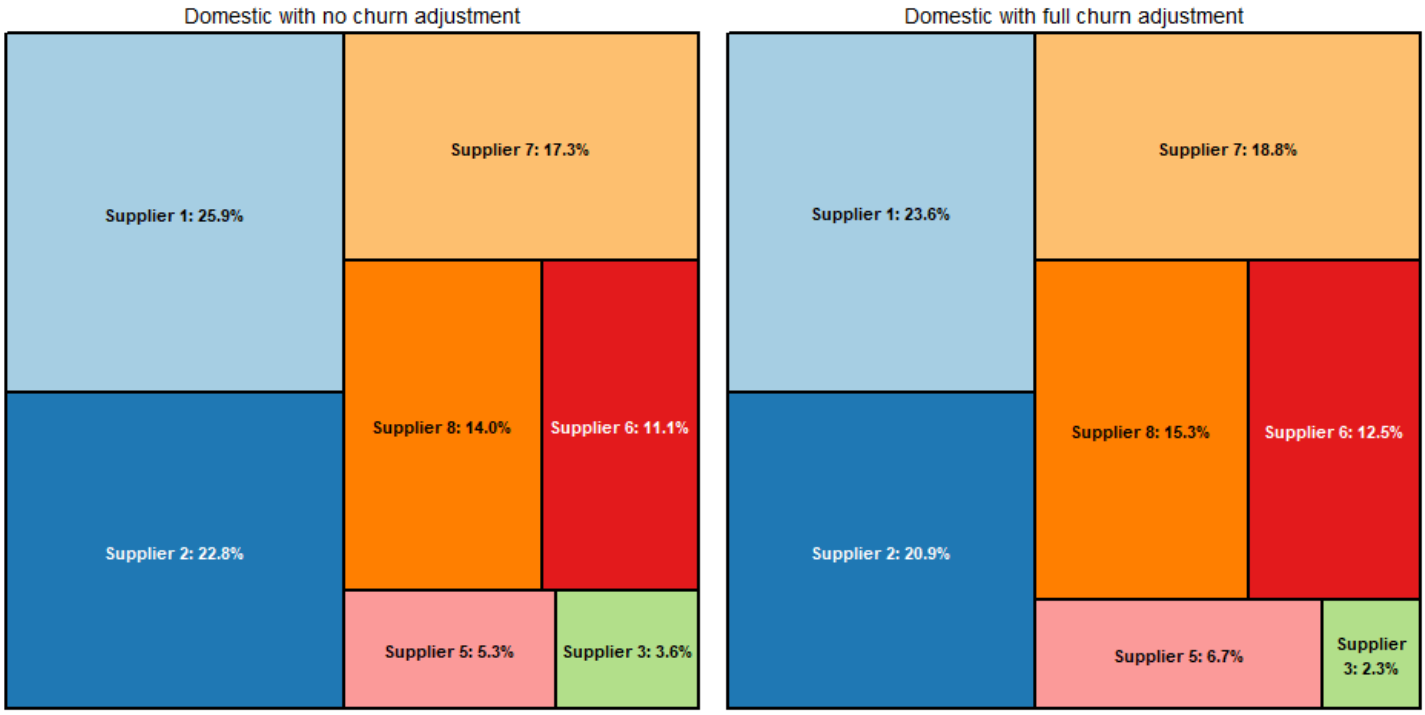


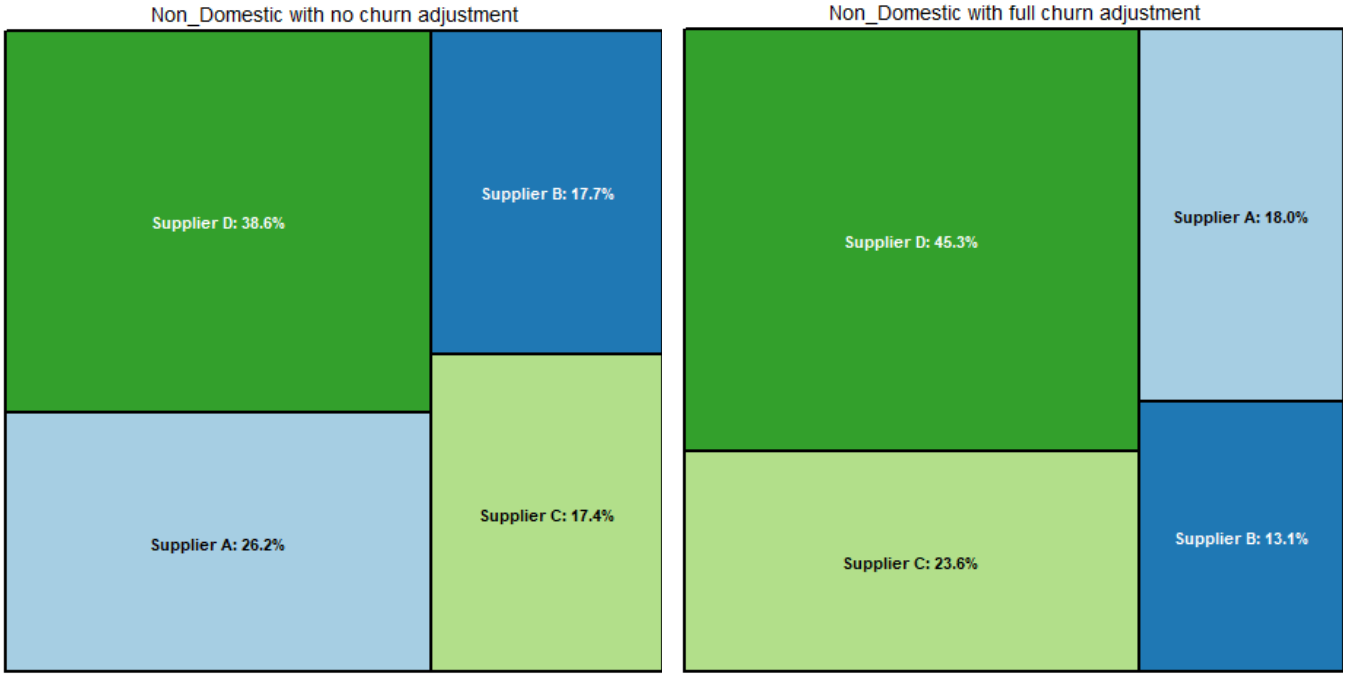
Table 2: Year 2 minimum install requirements with different β values – Non-domestic

Non-domestic Supplier	Smart meter penetration at beginning of Year 1	Year 2 targets where β= 0	Year 2 targets where β=0.5	Year 2 targets where β=1
Supplier A	57.1%	24,939	21,015	17,092
Supplier B	50.0%	16,870	14,656	12,442
Supplier C	34.4%	16,571	19,527	22,482
Supplier D	12.2%	36,694	39,876	43,058

30. An identical picture can be seen with the non-domestic suppliers. **Table 2** above shows that Suppliers A and B, whose smart penetration is above the market average, see their Year 2 minimum installation requirements fall as a result of the churn adjustment, whilst those with below average smart penetration see their Year 2 minimum installation requirements increase. Much like with domestic suppliers, this better aligns the outcomes of the new Framework with our stated objectives.

31. It is also worth noting that customer-driven churn in the non-domestic sector can have different characteristics to the domestic sector. The loss of one customer from a non-domestic supplier could in actuality be a loss of several meters. The absence of a churn adjustment would make planning for Year 2 installations more challenging for non-domestic suppliers. As above, the churn adjustment provides greater certainty to suppliers attempting to plan their installations.

Figure 3: Proportion of Year 2 installations by energy supplier under different churn scenarios – Non-domestic



Sensitivity analysis

32. In our sensitivity analysis we have run two additional scenarios for both domestic and non-domestic churn where we have increased and decreased the average churn rate used for the scenario analysis.

33. Assumptions 25a and 25b above are varied as described below. All other assumptions remain identical to the assumptions log above.

34. In the “high scenario”, we have increased the average churn rate to 30% for domestic suppliers and 35% for non-domestic suppliers. Given that churn is dependent on a myriad of market factors and is inherently difficult to predict, we have determined what we consider a prudent range of values for the churn rate in our sensitivity analysis, taking values that are around 10 percentage points higher and lower than our central estimate.

35. This has the effect of increasing the number of smart meters lost via churn for suppliers who have greater than average smart penetration (suppliers 1-4, and suppliers A-B) and increasing the number of smart meters gained via churn for those suppliers who have a lower than average smart penetration (suppliers 5-8 and suppliers C-D.)

Table 3: Change in minimum installation requirements, central vs high scenario

Supplier	Smart meter penetration at beginning of Year 1	Change in Y2 minimum install requirements (central)	Change in Y2 minimum install requirements (high)
Supplier 1	50.0%	57,010	67,239
Supplier 2	48.2%	44,860	48,054
Supplier 3	48.5%	40,674	41,445
Supplier 4	90.0%	0	10,792
Supplier 5	33.3%	-49,888	-55,994
Supplier 6	38.3%	-56,208	-65,973
Supplier 7	40.0%	-62,175	-75,393
Supplier 8	41.5%	-54,265	-62,904
Supplier A	57.1%	7,847	9,371
Supplier B	50.0%	4,428	4,585
Supplier C	34.4%	-5,910	-6,660
Supplier D	12.2%	-6,365	-7,296

36. **Table 3** above considers the impact that the most complete churn adjustment would have in the central scenario compared to this high scenario. We can see that under a scenario where the rate of churn is greater than in the central scenario, the churn adjustment would have a larger redistributive effect on suppliers' Year 2 minimum installation requirements. That is, for suppliers with above average smart penetration, the most complete churn adjustment would further reduce Year 2 minimum installation requirements.

37. Conversely, in the "low scenario", we have decreased the average churn rate to 10% for domestic suppliers and 15% for non-domestic suppliers. Given that churn is dependent on a myriad of market factors and is inherently difficult to predict, we have determined what we consider a prudent range of values for the churn rate.

38. This "low scenario" has the effect of reducing the number of smart meters lost via churn for suppliers who have greater than average smart penetration (suppliers 1-4, and suppliers A-B) and decreasing the number of smart meters gained via churn for those suppliers who have a smaller than average smart penetration (suppliers 5-8 and suppliers C-D.)

Table 4: Change in minimum installation requirements, central vs low scenario

Supplier	Smart meter penetration at beginning of Year 1	Change in Y2 minimum install requirements (central)	Change in Y2 minimum install requirements (low)
Supplier 1	50.0%	57,010	48,641
Supplier 2	48.2%	44,860	42,246
Supplier 3	48.5%	40,674	40,043
Supplier 4	90.0%	0	0
Supplier 5	33.3%	-49,888	-44,893
Supplier 6	38.3%	-56,208	-48,219
Supplier 7	40.0%	-62,175	-51,359
Supplier 8	41.5%	-54,265	-47,196
Supplier A	57.1%	7,847	6,323
Supplier B	50.0%	4,428	4,271
Supplier C	34.4%	-5,910	-5,161
Supplier D	12.2%	-6,365	-5,433

39. **Table 4** above considers the impact that the most complete churn adjustment would have in the central scenario compared to this low scenario. We can see that under a scenario where the rate of churn is lower than in the central scenario, the churn adjustment would have a smaller redistributive effect on suppliers' Year 2 minimum installation requirements. That is, for suppliers with above average smart penetration, the most complete churn adjustment would reduce Year 2 minimum installation requirements by less than the central scenario.

40. In essence, what the above findings demonstrate is the sensitivity of suppliers' Year 2 minimum installation requirements to the rate of churn. Whilst we have constructed a central churn scenario for the purposes of this modelling, we acknowledge that the rate of churn during Year 1 of the framework is uncertain. In setting out the detail in this Annex, we aim to illustrate to suppliers how customer-driven smart churn would impact on their installation requirements in Year 2 of the Framework. This should be used to support development of responses to the churn adjustment consultation.

This consultation is available from: www.gov.uk/beis

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