

Survey approach for C-MeX and D-MeX

Recommendations for the PR19 final determinations



Prepared for: Ofwat
Prepared by: BMG Research
December 2019

Table of Contents

1	Introduction	3
2	C-MeX recommendations	4
2.1	C-MeX background.....	4
2.2	NPS (Net Promoter Score)	4
2.3	CSS frequency of quotas and weighting	6
2.4	CSS weights, quotas and effective sample sizes	7
2.5	CSS online correction factor (OCF).....	11
2.6	CES age bands	13
2.7	CES quotas and weightings	14
2.8	CES interview methodology	14
2.9	CES effectiveness of postcode verification	16
2.10	CSS number of communication channels	17
2.11	CSS trend to digital.....	17
3	D-MeX Recommendations	19
3.1	D-MeX background	19
3.2	Setting D-MeX sample sizes and quotas	19
3.3	Weighting by customer size	22
3.4	Re-interview exclusion period	24
3.5	Multi-company transactional survey	25
3.6	Incorporating phasing	26
3.7	Statutory requirements	27
3.8	Bringing forward sample delivery date.....	29
4	Summary of C-MeX and D-MeX recommendations.....	31

1 Introduction

Customer service is one of the four key themes of Ofwat's 2019 price review (PR19). Providing an excellent experience for customers is fundamental for maintaining trust and confidence in the water sector. As part of PR19, Ofwat are introducing the customer measure of experience (C-MeX) and developer services measure of experience (D-MeX). C-MeX and D-MeX are both financial and reputational incentive mechanisms designed to incentivise water companies to provide customers in the water sector with excellent levels of service.

Following the results of a pilot study that took place during 2018, the shadow year (which runs from 1 May 2019 - 31 March 2020) has provided an opportunity to further develop and test the methodology for how C-MeX and D-MeX will be run during the 2020-2025 period.

BMG were commissioned to run both programmes during the shadow year. Ofwat required BMG to monitor and evaluate a number of specific points relating to C-MeX and D-MeX and to make associated recommendations about how the programme should best move forward after the shadow year.

Two working groups exist, one for C-MeX and one for D-MeX, involving representatives from the water companies and customers. Draft recommendations were discussed at these working groups and BMG sought feedback on those. A brief summary of working group feedback on the draft recommendations is included. Where working group quotes have been used, they have been chosen to illustrate (and be representative of) the feedback from working group members.

This document explains the recommendations associated with each of the issues BMG were asked to address and the considerations leading to them.

2 C-MeX recommendations

2.1 C-MeX background

C-MeX is a mechanism to incentivise water companies to provide an excellent customer experience for residential customers. C-MeX comprises two survey elements:

- Customer Experience survey (CES) – a customer satisfaction survey amongst a random sample of the water company’s customers
- Customer Service survey (CSS) – a customer satisfaction survey amongst a random sample of those who have contacted their water company.

During the shadow year, each of these surveys yield a customer satisfaction score and a Net Promoter Score (NPS). The customer satisfaction scores and the NPS are combined to give a single C-MeX score for each company.

2.2 NPS (Net Promoter Score)

2.2.1. Background

BMG were asked to make recommendations about NPS as follows:

“... to consider the inclusion of NPS as part of the C-MeX score in particular the volatility”
“...to monitor the level of customer understanding of the NPS question”

2.2.2. BMG’s recommendation regarding NPS

Our primary recommendation is to drop NPS from both the C-MeX surveys.

However, if Ofwat wish to include NPS in the C-MeX mechanism, we recommend that NPS be dropped from the CES but maintained in the CSS.

2.2.3. Considerations leading to this recommendation

Volatility:

On the whole, NPS has remained relatively stable over time for both CSS and CES. A numerical way to assess volatility is the average absolute deviations from the mean. Using this approach, the absolute deviations from the mean (based on scores out of 100), averaged across waves (for each water company) and then across water companies, are:

	CSAT	NPS
CSS – Customer Service	2.66	3.68
CES – Customer Experience	1.75	3.65

These figures demonstrate that NPS is more volatile than CSAT – which we would expect when comparing net scores to averages. However, it is the opinion of BMG that none of these represent a level of volatility that is unacceptable.

Customer understanding:

Feedback from a group of call centre interviewers who have worked on both the CSS and CES studies suggested that CES respondents are confused by the NPS question of whether they would recommend the water company as “It's hard to recommend anyone you have no experience of”, and interviewers have had to provide further guidance. When the interviewers were asked to estimate what proportion of respondents have been confused with this question, they said approximately half for CES and 1 in 10 for CSS.

The top five reasons given for the NPS rating for each survey (based on unweighted data) are as follows:

CSS:

- Overall satisfaction (23%)
- No problems/no complaints (17%)
- No choice/nothing to compare to (15%)
- Speed of response (10%)
- Resolution of queries/issues (10%)

CES:

- No problems/no dealings/no complaints (30%)
- No choice/nothing to compare to (16%)
- Overall satisfaction (16%)
- Billing services/price/tariff (8%)
- Quality of water (7%).

14% of CES respondents did not provide a response to this question (even after interviewer prompting), compared to 4% in CSS, suggesting that NPS is harder for respondents to evaluate in the CES.

NPS in the Customer Experience survey:

As noted above, we recommend excluding NPS from the CES because customers have difficulty understanding the question. This is based on the following reasons:

- It is the view of BMG that the NPS question works much better when people can base that recommendation on direct experiences they have had with organisations, rather than when their recollection of such experiences are limited. This view is based on BMG's extensive experience of working with clients on NPS studies and their high level of expertise on this topic
 - CSS is a sample of people who have contacted the water companies for some reason and via some method, so they have had an experience relating to the company
 - For CES the connection to a direct experience is more tenuous and sometimes non-existent in the minds of respondents
- Feedback from our interviewers has suggested that the NPS question needs considerable explanation in CES (for approximately half of respondents)
- For CES, 30% say “*No problems/no dealings/no complaints*” as reasons for their recommend score (almost twice that for CSS), suggesting that the lack of direct experience is a significant issue for CES
- 14% of CES respondents were unable to provide a response to this question (compared to 4% in CSS), suggesting that NPS is hard to evaluate in the CES.

NPS in the Customer Service survey:

The level of understanding of NPS is acceptable in the CSS. However, in CSS there is a high correlation between NPS and CSAT (significantly higher than for CES). We therefore recommend excluding NPS from the CSS for the following reasons:

- NPS adds a further level of complexity to the survey and calculation
 - And simplicity is one of the driving principles of C-MeX
- For CSS the inclusion of NPS adds little additional information
 - Since it is highly correlated with CSAT.

However, we should take in to consideration the original thinking behind including this metric. Clips from the C-MeX policy document, March 2019 state that:

“We agree that NPS is a more demanding test for companies than customer satisfaction (overall scores are lower) and is considered a strong comparative tool with results that are easy to understand. Therefore, we consider it has the potential to encourage companies to improve customer experiences and is practical to implement.”

If there is a desire from Ofwat that NPS be included in the C-MeX calculation in some form, we would recommend that it is only maintained in the CSS. The levels of volatility and customer understanding of NPS are acceptable in the CSS.

Summary of C-MeX working group feedback on inclusion of the NPS metric:

Of the 12 working group responses we received on this issue:

- 2 were happy to include NPS in CSS but exclude it from CES
- 3 would prefer to keep NPS in both surveys
- 7 would like to see it removed from both surveys.

2.3 CSS frequency of quotas and weighting

2.3.1. Background

Currently survey quotas are set on a monthly basis and in BMG’s opinion would benefit from some simplification. Examples of challenges presented by current quotas include:

- For CSS, the water and wastewater companies (WaSCs) quotas by ‘Type’ are Billing:Water:Wastewater = 33:17:17 per month split by digital/non-digital, giving rise to six quota cells
 - 67 interviews per month (200 per company per quarter as specified in the guidance) are distributed (differently for each water company) across these 6 quota cells
 - We are sometimes aiming for quotas of only 1 or 2 interviews for a quota cell – which then need to be weighted
- For CES, 67 interviews are split across 8 different quota cells (4 age groups x gender), individual quotas are sometimes as low as 5-6 per month.

2.3.2. BMG's recommendation regarding frequency of quotas and weighting

Our recommendation is:

- To interview monthly but only apply quotas and weighting quarterly
- To calculate scores every quarter
 - This is partly as a consequence of not weighting data every month, and partly because of the instability of monthly scores (based on only 67 interviews with heavy weighting).

2.3.3. Considerations

Monthly reporting on 67 interviews generates unstable monthly scores, and detailed quotas make these 67 interviews even less stable. It is difficult to achieve such small quotas, which can lead to excessive weighting and lower effective sample sizes. [For a more detailed explanation of ESS, see the following section on CSS weights, quotas and effective sample sizes].

We believe that our recommendations will help alleviate the challenges associated with monthly quotas:

- Quotas can be more easily managed on a quarterly basis and are far more practical than some of the very low monthly quotas
- Any deviation from quotas will have less of an impact on weighting
 - e.g. being 1 or 2 interviews short on a target of 4 has a more significant weighting impact than being 1 or 2 interviews short on a target of 12
- The impact of unstable monthly scores will be reduced by weighting and calculating scores on a quarterly basis
- There will be more consistency in the scores reported to the water companies.

Summary of C-MeX working group feedback:

There is broad agreement for this recommendation, with nine of the twelve working group responses we received being in favour of this proposal, and a further two being in favour in principle.

2.4 CSS weights, quotas and effective sample sizes

2.4.1. Background

Currently weights are set through a combination of Type (Billing/Water/Wastewater) and the proportion of digital contacts provided within Type:

- WaSC: Billing/Water/Wastewater (50%/25%/25%)
- WoC: Billing/Water (50%/50%)
- The digital element of the weight is dependent on the proportion of digital and non-digital contacts within each contact type (as specified in the shadow year guidance).

The weights for the six quota cells (3 types x digital/non-digital) will vary by water company. However, the quotas are not always in line with these weights – the current shadow year quotas are:

- For CATI (telephone) WaSCs: Billing/Water/Wastewater = 33:33:33
- For CATI WoCs: Billing/Water = 50:50
- For all companies, telephone and online surveys have quotas of 75% and 25% respectively.

2.4.2. BMG’s recommendation regarding CSS weights and quotas

Our recommendation regarding weights and quotas for CSS is as follows.

Weights:

Retain the current weighting approach but apply on a quarterly basis:

- WaSC: Billing/Water/Wastewater (50%/25%/25%)
- WoC: Billing/Water (50%/50%)
- Weights are determined by a combination of Type (as above) and % digital within Type. This is how we are currently calculating weights and is in line with the shadow year guidance.

Consideration should be given to how the final end-of-year weighting is applied to the annual data. BMG recommends that weights be calculated as above but based on annual data, and applied accordingly to produce full year scores.

Quotas:

Set quotas for each of the six cells (Type by digital/non-digital) in line with the weights on a quarterly basis:

- So the profile of digital (within Type) in the usable sample is what determines both the weights and the quotas.

2.4.3. Considerations

It is the alignment of quotas and weights that determines the extent (or heaviness) of the weighting factors – and this in turn determines the effective sample size (ESS). Furthermore, the heavier the weighting, the lower the ESS and the broader the confidence intervals.

Consider for example a sample size of 200 (representing the target per company per quarter for CSS):

- When weights and quotas are well aligned, the weighting is lighter, the weighting efficiency is higher and the ESS is closer to the actual sample size
 - A weighting efficiency of 95% would deliver an ESS of 190 (instead of 200)
- When weights and quotas are significantly different to each other, the weighting is heavier, the weighting efficiency is lower and the ESS is smaller
 - A weighting efficiency of 70% would deliver an ESS of 140 (instead of 200).

The effective sample sizes in Quarter 1 varied significantly across water companies. For example:

- For some the 25% online quota was reasonably representative of the digital weight, so the weighting efficiency was high
- For others, the digital weights and online quotas were not well aligned so the weighting efficiency was much lower.

The table below shows the weighting efficiency (in order) for all water companies using Q1 data. The second column shows the associated ESS assuming a quarterly CSS sample size of 200.

Table 1: Weighting efficiency and Effective Sample Size for Q1 CSS Data

CSS Quarter 1	
Weighting	ESS (based on
Efficiency	sample of 200)
62%	124
64%	128
72%	144
73%	145
73%	146
81%	161
84%	169
88%	176
90%	179
90%	180
91%	181
92%	183
92%	184
93%	186
95%	190
97%	194
98%	195

Clearly for some companies the weighting is much heavier than is desirable. We have therefore considered recommendations that will lead to better alignment between weights and quotas, thus increasing weighting efficiency and ESSs and alleviating the negative impact on confidence intervals.

Setting CSS quotas according to the weights:

BMG recommend that the digital weights need to continue to be reflective of the digital profile of usable sample supplied by each water company (WC) – and therefore needs to vary by WC. However, we are concerned about the heaviness of the weighting and recommend that the weights and quotas should be better aligned to combat this.

We consider the current weighting mechanism to be appropriate. An option to minimise the impact of weighting is to set quotas in direct proportion to the weights.

The table below shows the weighting profiles for Quarter 1 usable sample data – to demonstrate the variation across water companies. In each case, the ‘Type’ weights equate to 50:25:25 or 50:50 (WaSC or WOCs) and the digital weights represent the % of usable sample that was digital by Type.

Table 2: Quarter 1 CSS weighting profile

Quarter 1 weighting profile					
Non-digital			Digital		
Billing	Water	Waste	Billing	Water	Waste
33%	25%	25%	17%	0.0%	0.0%
22%	25%	25%	28%	0.1%	0.1%
45%	50%		5%	0.2%	
31%	25%	25%	19%	0.4%	0.0%
20%	25%	24%	30%	0.4%	0.9%
46%	25%	25%	4%	0.5%	0.0%
37%	24%	24%	13%	0.9%	0.5%
29%	24%	23%	21%	1.0%	1.7%
32%	24%	24%	18%	1.3%	0.9%
45%	49%		5%	1.4%	
29%	48%		21%	2.2%	
34%	48%		16%	2.3%	
40%	23%	23%	10%	2.4%	1.5%
24%	22%	23%	26%	2.5%	1.7%
31%	22%	22%	19%	2.7%	2.8%
46%	47%		4%	2.7%	
34%	47%		16%	2.9%	

The advantage of setting quotas in line with weights is that it minimises the impact of weighting (and therefore minimises the negative impact on ESSs and confidence intervals):

- If the weights and quotas are perfectly aligned, there is effectively no weighting and the ESS is equal to the actual sample size.

This approach would mean that different companies have different quotas for digital/non-digital (e.g. for some more than 75% of interviews conducted by telephone and for others less) but importantly:

- It will not impact a company’s score as that is driven by the weighting profiles (described above) and the scores within each of the six quota cells. It will, however, make those scores more robust by reducing the weighting factors
- It will improve the robustness of those overall scores (as the weighting impact will be minimised).

Finally, it will provide future-proofing against any changes in the profile of digital v non-digital contacts; if for example the percentage of contacts that are digital grows, then the weights and quotas will adapt accordingly.

Summary of C-MeX working group feedback:

The working group feedback we received was generally in favour of finding ways to reduce the impact of weighting and therefore increase effective sample sizes:

“We agree with the principle of looking at different ways to reduce the weighting to increase effective sample size, as that will reduce the margin of error for company sample sizes and help to differentiate performance.”

The working group were, however, keen that the digital weighting continued to be reflective of the digital profile of usable sample supplied by each WC. They were opposed to the idea of having a fixed weight for digital across all companies:

“Our preference would be for a representative sample of digital contacts to be surveyed based on our sample data.”

2.5 CSS online correction factor (OCF)

2.5.1. Background

During the pilot study 425 additional telephone interviews were carried out with digital contactors across the industry in order to directly compare the online and telephone methodologies and determine the cause of the lower online scores. It was concluded that there was a methodological impact on the scores (telephone scores being higher than online for this study) and that it was appropriate to apply a correction factor to online scores. Ofwat decided that for the shadow year, the OCF would be an upward correction factor of 5% applied to the online results.

Relevant clips from the C-MeX policy document (March 2019) include:

“During the pilot studies, Allto found that the results from the online surveys were significantly less positive than the results from phone interviews.”

“At the December C-MeX working group Workshop, one water company offered the use of its own telephone survey tracking data with digital contactors as a comparison to its C-MeX online survey results, in order to validate this figure. The evidence corroborated Allto’s findings. Allto found that telephone results amongst digital contactors were 5.9% better than online results and the water company found that telephone results amongst digital contactors were 4.3% better than online results.

Our decision is to apply an upward correction factor of 5% to the online results in the shadow year, but to test this in the shadow year as this will inform our final decision on the methodology.”

2.5.2. BMG's recommendation regarding OCF

Our recommendation is:

- Maintain the current OCF, an upward correction factor of 5% applied to the online results
- No cap to be applied, at a case level individual customers could give a score of 105 (see considerations).

It should be noted that BMG have, from the beginning, been applying the OCF to both CSAT and NPS (the instructions were to “*apply a 5% upward correction factor to the online interviews*”). It would be difficult to justify applying it to one score and not to another. So an ancillary recommendation is:

- The online correction factor is applied to both CSAT and NPS (if NPS continues to be included).

2.5.3. Considerations

No change to the 5% OCF:

BMG currently use an online methodology to interview digital contactors and a telephone methodology to interview non-digital contactors. To determine the extent to which differences in scores are due to methodological versus experiential differences, a separate study would be required employing a similar methodology to that used in the pilot (i.e. using a telephone methodology to achieve interviews with a large sample of digital contactors and comparing this to digital contactor interviewers achieved online).

BMG have conducted some desk research to search for more general publications on differences between telephone and online findings. Much of the information available on the comparability or otherwise of CAWI and CATI survey results is in the field of academic health research, or around particularly sensitive subjects such as illicit drug use, or alcohol consumption among general populations, rather than in the area of customer service research, thereby limiting its relevance.

One relevant study undertaken by Gallop did identify consistently lower results among CAWI respondents than CATI respondents (both groups had access to the internet) in relation to a number of attitudinal statements, but these ranged from 4% in relation to overall satisfaction, to significantly higher percentages in relation to other questions such as ‘always treat me fairly’ – suggesting that the methodological effects could well vary by study and by questions within a study. However, the figure relating to overall satisfaction is similar to (and therefore in support of) the current OCF.

(<https://news.gallup.com/opinion/methodology/233291/why-phone-web-survey-results-aren.aspx>)

In summary, our desk research has provided no evidence to challenge the pilot study recommendations of an online correction factor of 5%.

Applying a cap:

There were subsequent discussions about whether to apply a cap to either individual or aggregate scores to prevent them going above 100. Without a cap, people could potentially give companies a score of 105:

- A score of 10 out of 10
- Rescaled to 100
- Multiplied by 1.05 (OCF) = 105.

However, applying a cap creates some challenges. Any cap would have to be applied at an individual level:

- Applying a cap at an aggregate level would introduce inconsistencies in the scores according to the level of aggregation, which is unacceptable
 - A cap at a broad aggregate level is much less likely to have any impact than a cap at a finer aggregate or individual level.

The question then becomes whether to apply a cap at an individual level or not at all:

- An individual level cap would only apply to those who gave a score of 10 out of 10
- But the 5% uplift was determined at an aggregate level, so not applying it to those who gave a score of 10 would effectively be applying an aggregate level cap of less than 5%
- Furthermore, a cap would more heavily penalise a company who scored a higher proportion of 10s compared to others – which would be prejudicial.

We therefore recommend that no cap be applied; hence individual customers could give a score of 105.

Summary of C-MeX working group feedback:

Of the nine working group responses we received, six were broadly supportive of retaining the 5% online correction factor, although some suggested they would like to see further investigation. Six out of nine also supported the recommendation that no cap be applied:

“On the basis of simplicity ...”

“The simplicity introduced that enables easier score reproduction make this approach appealing.”

“The recommendation of no cap on digital surveys makes analysis easier for companies and the results more transparent.”

2.6 CES age bands

2.6.1. Background

BMG were asked to investigate whether more age bands in the CES would lead to greater representation.

Originally, three age bands were proposed for the CES; 18 to 29, 30 to 59 and 60+. However, BMG initially evaluated five age bands to be more in line with census groupings (18-24, 25-34, 35-49, 50-64, 65+) but then reduced that to four as part of a necessary methodological change (moving a greater percentage of interviews for the younger age groups to face-to-face data collection). The four age bands currently used for quotas are:

- 18-29, 30-44, 45-64, 65+.

2.6.2. BMG’s recommendation regarding CES age bands

To continue with the four age bands currently used: 18-29, 30-44, 45-64, 65+.

2.6.3. Considerations

These four age bands represent a more detailed age breakdown than was originally suggested in the guidance (3 bands) and appear to be working well. The WCs supported the use of these four age bands.

2.7 CES quotas and weightings

2.7.1. Background

Currently companies are allocated quotas and weights for the CES (by age and gender) according to their individual WC census data. There are no significant differences across WCs in gender profiles, but each company does have a different age profile (for most companies these are only slight, but for two the differences are more noticeable).

2.7.2. BMG's recommendation regarding CES quotas and weightings

Our recommendation is to use the national (England and Wales) census profiles for all water companies. All companies would therefore be weighted to the same age-gender profile.

2.7.3. Considerations

BMG consider it to be both simpler and fairer to apply the same quotas and weights to all companies in line with the national (England and Wales) profile:

- Fairer because younger versus older and telephone versus face-to-face would carry equal weights for all companies, so there would be no age or methodological bias
 - This is the primary reason for our recommendation
- Simpler to have just one profile, one set of quotas and one target weighting grid for all companies
 - Especially since for most companies the age-gender profiles are only slightly different
 - And simplicity is one of the driving principles of C-MeX.

Summary of C-MeX working group feedback:

Eight of the eleven working group responses we received to this recommendation agreed that a consistent approach to quotas/weighting by age and gender should be adopted:

“to make sure there is no regional bias and to ensure that survey results are comparable between companies”.

2.8 CES interview methodology

2.8.1. Background

Currently the youngest two age bands are interviewed using a face-to-face (CAPI) methodology and the eldest two are interviewed using a telephone (CATI) methodology. However, randomly interviewing a representative group of people by telephone is becoming more challenging and BMG are not confident that the current approach is sufficiently future-proofed.

2.8.2. BMG's recommendation regarding CES interview methodology

Our recommendation is:

- To conduct interviews for the first age group (18-29) via CAPI/face-to-face
- To conduct interviews for the middle two age groups (30-44, 45-64) via a mixture of CATI/telephone and CAPI/face-to-face
 - Over the course of the next 5 years the percentage of face-to-face interviews for these age groups may need to increase if the telephone option continues to become more challenging
- To conduct interviews for the eldest age group (65+) via CATI/telephone. To use a broader combination of RDD and available lists
 - e.g. mobile phone number lists, lifestyle lists (that come with age data to help target quotas) and other potential list-sources such as electoral roll samples
- All in proportion to the national census data (England and Wales) as described above (see CES quotas and weightings).

2.8.3. Considerations

Random telephone interviewing is becoming and will continue to become more challenging:

- Fewer people have landlines (see link below)
- Fewer people answer mobile calls from unknown numbers
- Random telephone interviewing tends to capture the elderly population (but is far less effective at capturing younger age groups).

The decline in landline usage is evident in Ofcom's Technology Tracker

(https://www.ofcom.org.uk/data/assets/pdf_file/0032/137966/future-fixed-telephone-services.pdf), showing a 9% decline from 2017 – 2018:

"landline call volumes nearly halved in the same period [2012 – 2017], falling from 103.1 billion minutes to 53.6 billion."

BMG also considered two other options for the CES methodology:

- Asking water companies to provide a sample of customers who had not contacted them
- The use of online panels.

Water company supplied email addresses:

BMG considered the use of WC-supplied emails for people who have not contacted them in the last 3 months. However, the WCs were reluctant (and in one case unable) to supply email addresses as a source of sample for the CES. The main reasons given for this are GDPR concerns and concern over a lack of representativeness. BMG agree that these concerns have validity and that it will be difficult to pursue this option for data collection.

Online panels:

BMG also considered the use of online panels for the CES. However, there are legitimate concerns about the representativeness and composition of such panels and further exploration is necessary to understand if online panels are a viable option. We believe that an online panel approach might be viable for part of the CES quota, but we cannot recommend it without a trial and time does not allow

for this prior to the launch of C-MeX in April 2020. The C-MeX working group were generally in agreement with the BMG position on this. The majority of those who responded said they would consider the use of online panels, subject to more information and a trial.

Optimising the current F2F / telephone approach:

We therefore have to consider how to optimise the two current methodologies. BMG consider the best approach utilising these methodologies is to conduct interviews for the first age group (18-29) via face-to-face and the eldest age group (64+) via telephone. For the middle two age groups (30-64) a combination of these two methodologies can be employed. Although a significant proportion can currently be obtained via telephone, BMG envisage this becoming more challenging over time.

2.9 CES effectiveness of postcode verification

2.9.1. Background

BMG were asked to evaluate the effectiveness of postcode verification in the CES. If a respondent (who has been contacted randomly) can name their water company the interview continues. If they cannot we go through a postcode verification process:

- Obtain the respondent's postcode
- Look up water company (<https://www.water.org.uk/advice-for-customers/find-your-supplier/>)
- Prompt respondent
 - "Based on your postcode area, I believe your water supply company should be [Water Company Name]. Is that correct?"
 - Yes [Continue]
 - No/Don't know [Thank & Close].

2.9.2. BMG's recommendation regarding postcode verification

To maintain the current approach utilising postcode verification.

2.9.3. Considerations

Analysis of the Quarter 1 data for the customer experience survey identified that only 8% of all those who qualified for the survey needed the assistance of postcode verification to aid recall. In those instances, 68% confirmed that the prompted water company was correct.

Scaled up, postcode verification means that over a 12-month interviewing period, we expect to have achieved approximately 750 completed interviews we may have otherwise lost without that process. The postcode checker has proven to be effective and has secured interviews that would have otherwise been lost.

2.10 CSS number of communication channels

2.10.1. Background

BMG were asked by Ofwat to monitor the number of communication channels offered by the companies through which customers can contact them. Ofwat's guidance states that companies should provide at least five channels, of which at least three should be online.

2.10.2. BMG's recommendation regarding number of communication channels

We recommend that the number of overall and online communications channels continues to be monitored and that Ofwat continue to apply a downward adjustment to a C-MeX score if a water company does not offer at least five channels, including at least three online channels.

2.10.3. Considerations

On average, companies are submitting contacts from seven different channels, four of which are online.

Our data audit of valid communication channels can only assess the number of different communication channels we receive in a company's sample on any particular wave – this may not represent the number they offer in total. However, we can look across waves and assume that (where there is variation), the maximum number of channels received in sample (across waves) is representative of the number of different channels that customers can use.

Over the course of the last six months, there are just three water companies who have submitted fewer than five contact channels for any particular wave – but all of these have submitted five or more channels on at least one of the waves. We therefore conclude that all water companies offer at least five channels of communication.

Likewise, there are three water companies who have submitted fewer than three digital contact channels for any particular wave – but two of these have submitted three or more digital channels on at least one of the waves. We therefore conclude that all but one water company offers at least three digital channels of communication.

2.11 CSS trend to digital

2.11.1. Background

BMG were asked to assess the rate at which digital contact is replacing non-digital contact to confirm Ofwat's approach to the channels that are used to contact customers in CSS.

2.11.2. BMG's recommendation regarding the trend to digital

We recommend that the current Ofwat approach of interviewing digital contactors via an online methodology is correct. Furthermore, our earlier recommendation that CSS quotas are set in line

with the weights will help to future-proof any trends towards more digital interactions. It will ensure that the digital quotas will adapt according to the percentage of digital contacts that are supplied.

2.11.3. Considerations

BMG have six month's data submissions to analyse – which is not sufficient to identify any long-term trends. As such we cannot say if there are any trends to digital, but we can say that the overall percentage of digital contacts has not gone down over the first six months of data submissions.

An important consideration here is an earlier recommendation that CSS quotas are set in line with the weights. As such the digital quota varies according to the digital profile of usable sample supplied by water companies. This provides future-proofing against any changes in the profile of digital v non-digital contacts; if for example the percentage of contacts that are digital grows, then the weights and quotas will adapt accordingly.

3 D-MeX Recommendations

3.1 D-MeX background

D-MeX is a mechanism to incentivise water companies to provide an excellent customer experience for developer services (new connections) customers. These customers include small and large property developers, self-lay providers (SLPs), and those with new appointments and variations (NAVs).

During the shadow year, the qualitative component of D-MeX is derived from a customer satisfaction survey for developer services based on transactions. That is, a selection of developer services customers who have received a service from a water company in the relevant period will be contacted. The qualitative component of the D-MeX score is the overall customer satisfaction score, averaged across surveys for each water company.

3.2 Setting D-MeX sample sizes and quotas

3.2.1. Background

BMG were asked to recommend the appropriate sample size for each company for when D-MeX becomes operational.

The current shadow year sample design as per the policy document (March 2019) states that 20% of Developer Services' customers per water company should be targeted and the number of completed interviews should be boosted to a minimum of 100 per year where 20% falls below this.

3.2.2. BMG's recommendation regarding setting D-MeX sample sizes and quotas

Our recommendation is:

- To set target sample sizes at 20% of usable contacts for each water company
Except:
 - To cap this at 1000 completed interviews per year for any single water company
 - This equates to an average of c. 84 per month
 - For the three smallest water companies (in terms of number of contacts provided) to try to achieve as many interviews as possible from the contacts available
 - BMG estimates that a completion rate of 30-35% for these companies should be achievable.

3.2.3. Considerations

It is the absolute sample size (i.e. the number of interviews completed rather than the percentage) that is most relevant when considering confidence intervals and robustness (not accounting for the finite population correction factor). Because there are no weightings in D-MeX (see below) we do not need to consider effective sample sizes.

BMG recommend a maximum annual sample size of 1000 completed interviews per water company (= c. 84 per month). We consider that sample sizes above 1000 would deliver diminishing returns; the increases in robustness (and decreases in confidence intervals) would not warrant the extra cost.

D-MeX sample sizes impact confidence intervals. In particular, companies with the smallest sample sizes will have the broadest confidence intervals (both individually and in paired comparisons), so maximising the annual sample sizes for the smallest companies is desirable.

The confidence interval around a mean CSAT score for any individual WC is inversely proportional to the square root of n (the sample size of completed interviews):

$$\text{Confidence interval} \propto \frac{1}{\sqrt{n}}$$

The broadest confidence intervals are therefore driven by the companies with the smallest sample sizes – and this applies to confidence around an individual mean score as well as a comparison of mean scores. When comparing two mean scores (relevant when comparing positions in a league table), the confidence interval is driven primarily by the smallest sample size of the pair. This supports our recommendation to maximise sample sizes for the smallest D-MeX companies.

Example analysis of sample size recommendations:

Although the amount of usable sample we receive from water companies varies wave-on-wave, we have provided an estimate of the annualised figures based on Quarter 1 data. The last column in the table below represents our best estimate of annual sample sizes should this recommendation be adopted.

Table 3: D-MeX annual sample size estimates

Annual estimates (based on Q1 data)	Annual Usable contacts	20% sample	Capped at 1000	Boosted to 33% (3 smallest WCs)
Hafren Dyfrdwy	352	70	70	117
Portsmouth Water	688	138	138	229
SES Water	860	172	172	287
South Staffs Water	1772	354	354	354
Bristol Water	1852	370	370	370
South East Water	2908	582	582	582
Wessex Water	3624	725	725	725
Northumbrian Water	3652	730	730	730
Southern Water	3824	765	765	765
Affinity Water	4072	814	814	814
South West Water	4992	998	998	998
Dŵr Cymru (Welsh Water)	6400	1280	1000	1000
United Utilities	6424	1285	1000	1000
Yorkshire Water	8044	1609	1000	1000
Thames Water	8780	1756	1000	1000
Anglian Water	10120	2024	1000	1000
Severn Trent Water	11428	2286	1000	1000
Totals	79792	15958	11719	11973

In summary, the exceptions to the ‘20% target’ apply to water companies that provide the largest and smallest number of usable contacts:

- 20% is more than 1000 interviews per year for the companies that provide the largest number of contacts
 - For these we recommend applying a cap of 1000 per year
- 20% is fewer interviews per year than we would want for the companies that provide the smallest number of contacts
 - For the three smallest water companies we recommend trying to achieve as many interviews as possible from the contacts available
 - BMG estimates that a completion rate of 30-35% for these companies should be achievable.

One further consideration is that we will be sampling a significant proportion of the total population of available contacts. When the sample is large compared to the population (>5%), it is good practice to apply a correction to the formulas used to compute standard errors and confidence intervals. This correction is called the finite population correction factor. This narrows the confidence intervals when we are sampling a significant proportion of the total population.

Summary of D-MeX working group feedback:

The majority of the working group feedback we received was supportive of any sample size recommendations that improved confidence intervals. The majority were particularly supportive of boosting sample sizes, where possible, for the smaller water companies.

3.3 Weighting by customer size

3.3.1. Background

BMG were asked to suggest appropriate definitions for different sizes of developer customer, and how different sized customers could be weighted.

The guidance says:

The Qualitative component of D-MeX =

$$\frac{\beta_1 \sum_a^A CSAT_a + \beta_2 \sum_b^B CSAT_b + \beta_3 \sum_{ci}^C CSAT_c}{\beta_1 A + \beta_2 B + \beta_3 C}$$

Where $\beta_1 + \beta_2 + \beta_3 = 1$

The guidance also says (page 23):

For the D-MeX calculation, while the weightings are subject to change, unless otherwise stated:

- *The weightings applied to each customer size in the D-MeX formula are equal and therefore are one third each: $\beta_1=1/3$, $\beta_2=1/3$, $\beta_3=1/3$,*

While the default weights were equal, BMG were asked to evaluate whether different customer size weights could be applied.

3.3.2. BMG’s recommendation regarding weighting by customer size

Our recommendation is that no weights are applied by customer size. The D-MeX score should continue to be calculated as a straight average of CSAT across all interviews randomly selected from the usable sample provided by water companies.

3.3.3. Considerations

Through analysis of data and discussions with Ofwat and the D-MeX working group, it has become apparent that there are significant challenges to weighting by customer size. To achieve a workable recommendation regarding this we would require:

- A way of categorising customers according to size that is meaningful for all companies
- A determination of weights (betas) for each category that provides a fair comparison between water companies
- A sufficient sample size of each category such that the weighting process is feasible.

Defining customer size:

Creating a common definition of customer size that worked across all companies and all customers proved not to be feasible. The potential definition suggested in the guidance is to categorise the size of each customer based on the following rule:

- Large: is equivalent to the top 10% of customers by number of connections
- Small: customers who have completed one single connection during the period
- Medium: customers who have completed 2 or more connections but lie outside of the top 10%.

However, on analysing the data it became apparent that with this definition:

- A few companies would not have any medium sized customers (over 90% of their customers had only one connection)
- For some companies, a large customer may only have 1 connection (if we stuck rigidly to the 10% rule)
- The same customer could be defined differently for different companies.

There were many lengthy discussions at working groups about how best to define customer size, but it was eventually concluded that it was not feasible to create a common definition of customer size that worked fairly across all companies and all customers.

Determining weights for customer size:

Even if we had been able to create a workable definition of customer size, the next step would have been to determine the beta weights to apply. The most objective way would have been to weight by a measure of volume or value to the company. However, SLPs, NAVs and large developers account for only a small percentage of completed interviews, but a large percentage of volume. Therefore, an objective approach to weighting (e.g. by volume of business) would mean that a very small proportion of interviews would carry a significantly large proportion of the weight. This is not a viable approach to weighting, as it leads to volatility (through dependence on a small number of interviews) and broader confidence intervals (due to heavy weighting and lower effective sample sizes).

Conclusion:

Given that it was not feasible to create a common definition of customer size that worked fairly across all companies and all customers, and that it was not feasible to devise an objective and practical way of weighting, it is not viable to weight by customer size.

Summary of D-MeX working group feedback:

There was broad agreement among those who provided feedback on the recommendation to continue to calculate a straight average of CSAT across all completed interviews.

3.4 Re-interview exclusion period

(particularly relevant for SLPs, NAVs and larger developers)

3.4.1. Background

The current re-interview exclusion period for D-MeX customers is 6 months – a customer who has been interviewed cannot be re-contacted for 6 months. However, SLPs and NAVs (and some of the larger developers) tend to have dealings with multiple companies. A combination of deduplication and the re-interview period allows BMG to speak to customers about an individual WC only once every 6 months.

3.4.2. BMG's recommendation regarding re-interview exclusion period

Our recommendation is:

- To maintain a re-interview exclusion period of 6 months in relation to a customer and the water company they were interviewed about
- To reduce the re-interview exclusion period to 2 months for customers in relation to any water companies they have not been interviewed about in the last 6 months
- To apply this to all D-MeX customers
 - It will only impact those who have dealings with more than one water company.

3.4.3. Considerations

There is an element of deduplication across water companies in each wave:

- The largest proportion of duplication overall comes from within a company sample (so people who have interacted with the same water company more than once)
- 4% of duplication comes from the same person appearing in different water company samples.

Optimum re-interview period:

If we were to reduce the re-interview exclusion period for customers who deal with multiple companies, they would have greater opportunity to evaluate multiple water companies. The shadow year guidance states that:

Each fresh month's sample file will be checked against this, and any contacts appearing in the master log as having been interviewed or declined within the previous 6 months will be removed from the sample to be used that month. After 6 months, their record will be removed from the master exclusions log and they may be contacted again. We recognise that deduping customer contact to only survey once every 6 months may diminish the voice of SLPs over the surveying period as volumes are low. We will monitor this in the shadow year and consider if a different approach for SLPs is warranted.

BMG consider it reasonable to reduce the re-interview exclusion period for customers who have dealings with multiple companies. We consider it is reasonable to reduce this to 2 months:

- We do not recommend going as low as one month as this may over-burden those customers, and previous interviews may potentially bias subsequent ones

- We consider that at 2 months, the above issues are suitably alleviated
- At 2 months, multi-WC customers will have the opportunity to evaluate three times as many WCs as with the current 6-month period
 - If it were 3 months, they would only have the opportunity to evaluate twice as many.

Application of the reduced period:

Firstly, it would be defeating the purpose of this recommendation if we re-interviewed a customer about the same water company after a 2-month period. Our recommendation is therefore:

- To maintain a re-interview exclusion period of 6 months in relation to a customer and the water company they have been interviewed about
- To reduce the re-interview exclusion period to 2 months for customers in relation to any water companies they have not been interviewed about in the last 6 months.

Secondly, BMG recommend that this set of rules applies to all D-MeX customers – but it will only impact those who have dealings with multiple water companies (most likely to be NAVs, SLPs and large developers).

Summary of D-MeX working group feedback:

There was broad agreement that the re-interview period should be reduced for NAVs, SLPs and developers who have dealings with multiple water companies.

3.5 Multi-company transactional survey

3.5.1. Background

Another option to capture the views of SLPs, NAVs and large developers more comprehensively is to conduct a separate study that enables us to talk to these customer groups about more than one company at a time (that they have had transactions with). The questions might be phrased in the following manner, for example:

- Please tell us which of these WCs you have had transactions with over the last month?
- Thinking about those transactions over the last month, how satisfied are you overall with how [Water Company Name] handled these transactions?
- Repeat for different WCs they have had transactions with over the last month.

This would allow us to ask satisfaction for more than one company, up to an agreed maximum.

3.5.2. BMG's recommendation regarding multi-company transactional survey

Our recommendation is to continue with the current D-MeX study and not conduct a multi-company transactional study.

3.5.3. Considerations

The concept of a multi-company transactional survey has certain appeals:

- It allows customer who deal with multiple water companies to evaluate multiple water companies
- It would increase the representation of NAVs, SLPs and large developers.

However, this approach would obviously have cost implications, and would also present significant challenges:

- Different water companies have significantly different proportions of SLP/NAV business
 - So they would be represented to different extents in a multi-company transactional survey
 - How do we deal with these varying amounts of representation?
- A challenge would also arise in how to incorporate scores from this new vehicle in the overall D-MeX score
 - What weight does this survey have compared to the core study?
 - Would different companies have different weights according to the amount of SLP/NAV representation they have?
- If different weights were applied, a calibration would be necessary as average C-SAT scores would be different to those from the core study.

As such we consider the complexities, challenges and costs of conducting a separate multi-company transactional study outweigh the benefits.

Summary of D-MeX working group feedback:

The majority of working group responses we received to this recommendation were in agreement:

“Whilst we are keen for an increased SLP, NAV and large developer representation, we agree with the recommendation not to implement an additional survey and scoring mechanism for SLPs and NAVs. This would exacerbate an already complicated measure.”

3.6 Incorporating phasing

3.6.1. Background

BMG were asked to make a recommendation regarding a method for incorporating developer projects that have multiple phases. Large developments on a single site may involve multiple phases, each with their own respective teams and liaisons with their water company. In this event, companies were asked to record this data in their sample submission files.

3.6.2. BMG’s recommendation regarding phasing

It is not viable to incorporate phasing into the D-MeX mechanism.

3.6.3. Considerations

The water companies struggled to provide data on phasing, primarily due to:

- A lack of capability / available data from their systems
- A discussion among the working group members that phasing was difficult to define and was liable to different interpretations.

Water companies detailed the challenges of providing the information requested during Working Group meetings. With regard to phasing, the reasons were largely due to the complexity of phasing in projects; some “could take many years to complete” and some “could be in their umpteenth phase”.

In fact, the 'phase' field had the highest proportion of blank cells of all fields, with 97% of phase cells being blank. BMG have therefore concluded that is not viable to incorporate phasing into the D-MeX mechanism.

Summary of D-MeX working group feedback:

All of the working group responses we received agreed that phasing should be removed:

“We are pleased to see the removal of the information relating to phasing ... as we do not see the value to effort ratio.”

3.7 Statutory requirements

3.7.1. Background

BMG were asked to look at whether the CSAT element of company D-MeX scores is affected by differences in statutory requirements between England and Wales.

3.7.2. BMG's recommendation regarding statutory requirements

We have found no evidence to suggest that differences in regulatory frameworks impact D-MeX scores in such a manner that would require calibration or some other intervention.

This is not a conclusion that differences in regulatory frameworks do not impact D-MeX scores – just that we have found no evidence that they do. Consideration should also be given to any upcoming changes affecting how English companies operate as well as the statutory requirements imposed on Welsh companies.

3.7.3. Considerations

BMG were unable to determine through the analysis of available data whether any differences in scores are due to experience or regulation. The D-MeX scores and associated numeric data do not provide us with any evidence that regulatory differences have had an impact.

Open-end response analysis:

BMG have examined the data and developed specific code-frames for open-ended questions to investigate this. Code-frames enable us to numerically count different categories of responses to open-ended questions. We worked with Ofwat to develop a code-frame containing key words believed to be mentioned by respondents when referring to statutory requirements.

The following code-frame was developed:

Table 4: Statutory requirements code-frame

Statutory requirements
Sprinkler(s)
Timescales
Pre-planning Service
Charging
Adoption agreement
Fire

We investigated the open-ended comments for all interviews, across all companies for Quarter 1 looking for certain words and phrases that might be related to statutory differences. However, this task yielded very little useful information. Upon reviewing responses to open-ended questions, we identified a small number of additional comments we felt may relate to regulations, and therefore the code-frame was extended to include:

- S104 agreement
- S102 agreement
- S106 agreement.

With this extended code-frame, we evaluated the number of people who used certain phrases and examined the differences between England and Wales. There were no meaningful differences to these coded responses, comments came from a broad geographical area covering both England and Wales. We therefore have to conclude that there is not enough evidence in the open comments to suggest that responses are impacted by differences in statutory requirements.

Summary of D-MeX working group feedback:

Only three working group responses provided substantive responses to this issue. Dŵr Cymru (Welsh Water) noted that:

“Our response to Ofwat as part of our Draft Determination response on D-MeX outlines the further evidence we have regarding the impact on customer satisfaction scores that new legislative or regulation has in Wales.”

“We have clear evidence that developer customers who are unhappy with new legal/regulatory changes in the development sector introduced by Welsh Government often consider wrongly that Welsh Water is to blame for resulting difficulties.”

[Permission was given to publish these quotes]

Two English-based water companies noted that there are regional differences amongst water companies and that each company has their own things to deal with. Additionally, one English-based company noted that:

“... from April 2020 there are mandatory changes for English companies, not Welsh companies, that may pose an argument the other way. Swings and roundabouts.”

3.8 Bringing forward sample delivery date

3.8.1. Background

BMG have been asked to provide a recommendation on the sample submission date. This is a guidance issue.

As stipulated in the guidance, water companies currently provide their monthly sample submissions to BMG on (or just before) the 24th of the following month:

Each month, companies must provide to our appointed agent a list of transactions ... completed in the previous month and reported to Water UK. Lists should be provided as soon as possible after the Water UK return is submitted on the 20th of each month (as currently due), and in any event within 4 working days thereafter. For example, for May 2019 data, the deadline will be 24 June 2019, and earlier if possible.

Given there is deduplication, cleaning and quota-setting to be done, this means that BMG are unable to start fieldwork until the following month – potentially over two months after the transaction took place.

3.8.2. BMG's recommendation regarding bringing forward sample delivery date

We recommend that the sample delivery date be brought forward; ideally to the first working day on or after the 10th of every month (but this may have to be transitioned over time).

Some companies have expressed concern about having to reconfigure their systems to achieve this and would need time to implement that. We therefore recommend that they are informed as soon as possible of this change, and that they are given a reasonable amount of time to reconfigure their systems.

3.8.3. Considerations

The time lag between contact and interview is considerable. By comparison, for some programmes in other industries (e.g. automotive, financial services, telecommunications, retail) people are interviewed within 48 hours of their contact with a company. Sometimes a survey invite is sent within seconds of a transaction being completed.

A reduction in the time lag between contact and interview would assist with recall, which in turn would provide more accurate feedback especially for those who have dealt with multiple companies.

As per the feedback provided by some water companies, this recommendation would require system changes and therefore a lead-in time is recommended before this is implemented. This feedback will need to be considered when deciding which date to ask for sample submission and when that change should take effect.

Summary of D-MeX working group feedback:

Nine working group responses were received to this recommendation and five indicated that this would be possible. However, four were unable to commit to this in the short term at least:

“... it will not be possible to deliver system changes until at least 12 to 18 months after D-MeX is finalised and even this timescale will be challenging.... Any changes to submission timescales as early as January/ February 2020 (as suggested by BMG) in readiness for April 2020 will not be feasible.”

“We are willing to commit to providing data within 17 working days of month end, following an appropriate launch time period, and are also happy to see how complete our data set could be at 10 days, however without an opportunity to test and then implement any required process or system changes, we don't feel able to sign up to the current BMG recommendation.”

“We would ask that companies are allowed to transition to this point, especially as the methodology and reporting requirements are not as yet finalised.”

“... a significant amount of resource and manual handling is currently required to collate the survey data from several systems, validate it and then submit it in the required format. We are very supportive of the concept of surveying customers at the earliest opportunity after their transaction has been completed, but we are opposed to introducing the new timetable now. ... we would be unable to comply with a request for submission of data by the first working day after the 10th of each month in the months before April 2020 at the earliest.”

4 Summary of C-MeX and D-MeX recommendations

BMG analysed available data and used our experience and expertise of running similar programmes to arrive at these C-MeX and D-MeX recommendations. Our overarching goal is to improve the survey mechanisms and throughout this process we have been cognisant that the final design for both C-MeX and D-MeX should:

- Encourage companies to improve customer experiences and innovate
- Be simple and meaningful for companies and customers
- Be proportionate
- Be practical to implement
- Measure performance across companies consistently, reliably and fairly
- Reflect customer behaviour changes and market changes.

The tables below outline a brief summary of the issues addressed and associated recommendations made – for details please refer to the main body of this document.

Table 5: Summary of C-Mex recommendations

Issue	Recommendation
NPS	To drop NPS from both the C-MeX surveys.
CSS frequency of quotas and weighting	To interview monthly but only apply quotas and weighting quarterly. To calculate scores every quarter.
CSS weights, quotas and effective sample sizes	Retain the current weighting approach but apply on a quarterly basis. Set quotas for each of the six cells (Type by digital/non) in line with the weights on a quarterly basis.
CSS online correction factor	Maintain the current OCF, an upward correction factor of 5% applied to the online results. No cap to be applied; at a case level, individual customers could give a score of 105.
CES age bands	To continue with the four age bands currently used: 18-29, 30-44, 45-64, 65+.
CES quotas and weightings	To use the national (England and Wales) census profiles for all water companies.
CES interview methodology	To conduct interviews for the first age group (18-29) via CAPI/face-to-face. To conduct interviews for the middle two age groups (30-44, 45-64) via a mixture of CATI/telephone and CAPI/face-to-face. To conduct interviews for the eldest age group (65+) via CATI/telephone. To use a broader combination of RDD and available lists.
CES effectiveness of postcode verification	To maintain the current approach utilising postcode verification.
CSS number of communication channels	Ofwat continue to apply a downward adjustment to a C-MeX score if a water company does not offer at least five channels, including at least three online channels.
CSS trend to digital	The current Ofwat approach of interviewing digital contactors via an online methodology should be continued.

Table 6: Summary of D-MeX recommendations

Issue	Recommendation
Setting D-MeX sample sizes and quotas	To set target sample sizes at 20% of usable contacts for each water company. Except: To cap this at 1000 completed interviews per year for any single water company. For the three smallest water companies to try to achieve as many interviews as possible from the contacts available.
Weighting by customer size	No weights are applied by customer size.
Re-interview exclusion period	To maintain a re-interview exclusion period of 6 months in relation to a customer and the water company they were interviewed about. To reduce the re-interview exclusion period to 2 months for customers in relation to any water companies they have not been interviewed about in the last 6 months. To apply this to all D-MeX customers.
Multi-company transactional survey	To continue with the current D-MeX study and not conduct a multi-company transactional study.
Incorporating phasing	It is not viable to incorporate phasing into the D-MeX mechanism.
Statutory requirements	We have found no evidence to suggest that differences in regulatory frameworks impact D-MeX scores in such a manner that would require calibration or some other intervention.
Bringing forward sample delivery date	We recommend that the sample delivery date be brought forward; ideally to the first working day on or after the 10th of every month (but this may have to be transitioned over time).