

Of **w**at

CCW

The voice for water consumers
Llais defnyddwyr dŵr

Preferences research

.YONDER

April 2022

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Introduction

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Background to the research

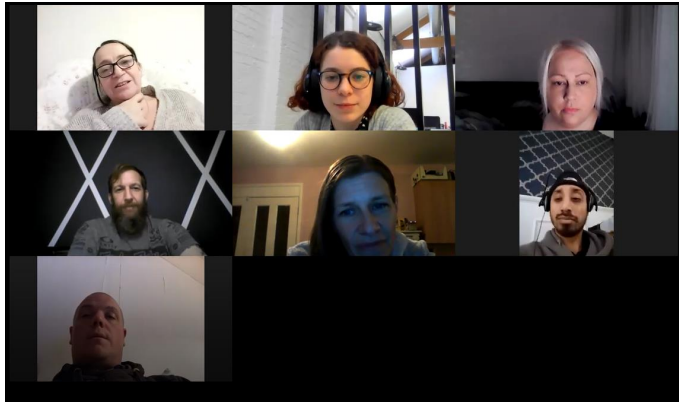
- + Ofwat and CCW commissioned Yonder to conduct qualitative research to inform the development of common Performance Commitments (PCs) for the next water industry price review (PR24).
- + Performance Commitments are used by Ofwat to measure water company progress towards the service outcomes that really matter to water consumers and make a difference to the environment.
- + Across England and Wales, this project aimed to:
 - + Understand **what matters most to water consumers when it comes to water and sewerage services**
 - + Explore **water consumers' views of Ofwat draft common PC areas for PR24 and identify any new areas for exploration**
 - + **Test descriptions and measurements of PCs with water consumers**, and identify any improvements to make them more meaningful for inclusion in future research with water consumers
 - + Understand any **differences in views between water consumer segments.**

Method overview

- + Overall, the approach **aimed to reduce the potential for anchoring** and allow for participants to introduce, and then for the research to test prioritisation of, potential PC areas not on Ofwat's draft list.

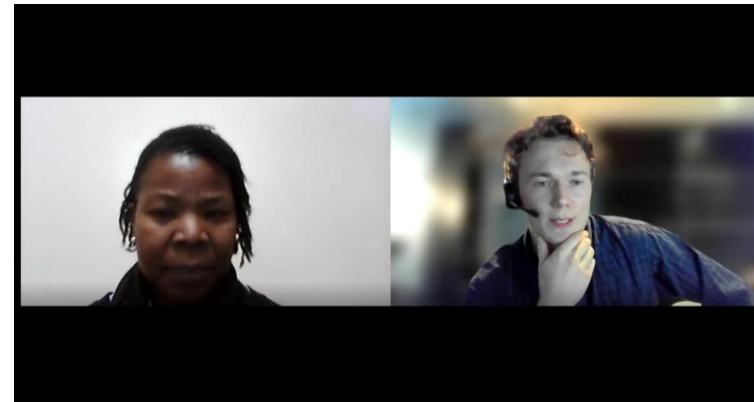
1. Online pre-task

- + To gather **wholly unprompted and unbiased (by other research participants) views** on water company services



2. 12 x 90 min online focus groups

- + With household participants to explore views on water company services
- + Encompassed **spontaneous discussion before evaluation of stimulus detailing different service aspects**



3. 16 x 60 min online depth interviews

- + With **business and specific household water consumer segments** e.g. 75 years +, future bill payers, ESL
- + Discussion flow consistent with focus groups

Pre-task and discussion flow

Pre-task

1. Context

- Historic water provider experience captured

2. Spontaneous service areas

- Water consumers asked to detail 5 areas in which they felt it is important for water companies to be doing well

3. Semi-prompted service areas

- Water consumers asked to consider customer service, water services, payment, tap water, sewerage, the environment, education & community engagement and water company reputation
- And whether any of these prompt additional thoughts on what a water company ought to be delivering

Spontaneous service areas (2.) underwent light quantitative analysis to indicate relative importance

Focus groups and depth interviews

1. Unprompted exploration of what matters to water consumers

- Discussion on what is important that water services deliver and other things that water companies should be doing e.g. to benefit wider society
- *Key to listen for service outcomes outside of draft common Ofwat list*

2. Ranking & prioritization of service aspects

- Participants asked to consider 15 service aspects (rotated across sessions) and rank top 4 (essential/ most important) and bottom 4 (less important) before detailed discussion
- *Moderator had scope to include service aspect generated at 1) in ranking exercise*

3. Service aspect measurements explored for comprehension/ relevance

Iteration key – new stimulus developed where relevant and introduced in subsequent sessions or removed if not relevant

Sample overview

12 x 90 min online focus groups

	Group type	Nation	Location 1	Location 2	Location 3
1	Future water bill payers (18-24)	England	Surrey	Norfolk	Greater Manchester
2	Future water bill payers (18-24)	England	Kent	Yorkshire	Birmingham
3	Future water bill payers (18-24)	Wales	Cardiff	Wrexham	-
4	Pre-family / young family life-stage water bill payers (18-35)	England	London	Bristol /Reading	Greater Manchester
5	Pre-family / young family life-stage water bill payers (18-35)	England	Yorkshire	Surrey	Kent
6	Pre-family / young family life-stage water bill payers (18-35)	Wales	Cardiff	Wrexham	-
7	Older family life-stage water bill payers (35-55)	England	London	Midlands	Bristol /Reading
8	Older family life-stage water bill payers (35-55)	England	Norfolk	Surrey	Yorkshire
9	Older family life-stage water bill payers (35-55)	Wales	Cardiff	Wrexham	-
10	Empty nesters / retired water bill payers (55+)	England	Kent	London	Norfolk
11	Empty nesters / retired water bill payers (55+)	England	Bristol / Reading	Greater Manchester	Birmingham
12	Empty nesters / retired water bill payers (55+)	Wales	Cardiff	Wrexham	-

+ **Locations** refer to areas where people were recruited from

16 x 60 min online depth interviews

	Depth type	Nation	Location
1	Non-household water bill payer	England	Surrey
2	Non-household water bill payer	England	Kent
3	Non-household water bill payer	England	London
4	Non-household water bill payer	England	Birmingham
5	Non-household water bill payer	England	Reading / Bristol
6	Non-household water bill payer	England	Greater Manchester
7	Non-household water bill payer	England	Leeds
8	Non-household water bill payer	Wales	Cardiff
9	Future water bill payer (18-24)	England	Birmingham
10	Future water bill payer (18-24)	Wales	Wrexham
11	Older 75+ bill payer	England	Norfolk
12	Older 75+ bill payer	England	Surrey
13	Older 75+ bill payer	Wales	Wrexham
14	Water bill payer who speaks English as a second language	England	Manchester
15	Water bill payer who speaks English as a second language	England	Leeds
16	Water bill payer who speaks English as a second language	Wales	Cardiff

+ People were recruited by 3rd party agencies. People were free-found, water company customer lists were **not** used

Stimulus development

- + An **iterative process** was adopted, **stimulus** was **amended and introduced** based on unprompted water consumer feedback
- + Stimulus was **rotated across sessions** to enable a large number of service areas to be explored, including service areas which were not anticipated in Ofwat draft common PC list, but driven by water consumer interest
- + Service aspect stimulus was developed through:
 - + **Collaboration between Yonder, Ofwat and CCW ahead of the research**, based on draft list of common performance commitments
 - + **Water consumer input during the research**
 - + Pre-task exercise and opening discussion (groups or depths) elicited **unprompted views** of what is important for water companies to deliver as aspects of service
 - + After the first two pilot groups, service descriptions **were refined to aid relevance and quick comprehension**
 - + Service aspects that emerged (not covered in Ofwat draft common PC list) were explored in conversation and/or **developed as stimulus included in subsequent research sessions**
- + In total **24 service areas** were explored via stimulus, with a maximum of 15 service areas covered in any one session. Each service area was explored by a minimum of 6 groups.

Service aspect stimulus – Ofwat draft common PC list



Water supply interruption



The appearance, taste and smell of tap water



Boil water notice



Do not drink notice



Hose pipe bans



Severe drought



Sewer flooding: outside your property



Sewer flooding: inside your property



Leaks



Bathing water quality



River water quality



Pollution incidents



Storm overflows



Non-essential use ban (businesses only)



Water pressure



The presence of lead in pipes



Biodiversity



Carbon



Helping people and businesses use less water



Customer satisfaction & customer service

Service aspect stimulus – other potential PCs



Water pressure



Boil water notice



The presence of lead in pipes



Do not drink notice

Service aspects stimulus - water consumer generated



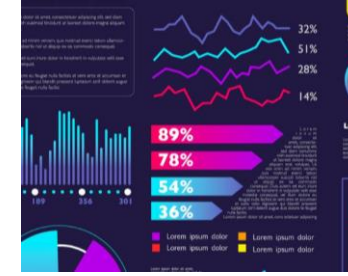
Resilience



Affordability & fairness



Roadworks disruption



Performance Transparency

+ Stimulus **developed and retained throughout fieldwork**

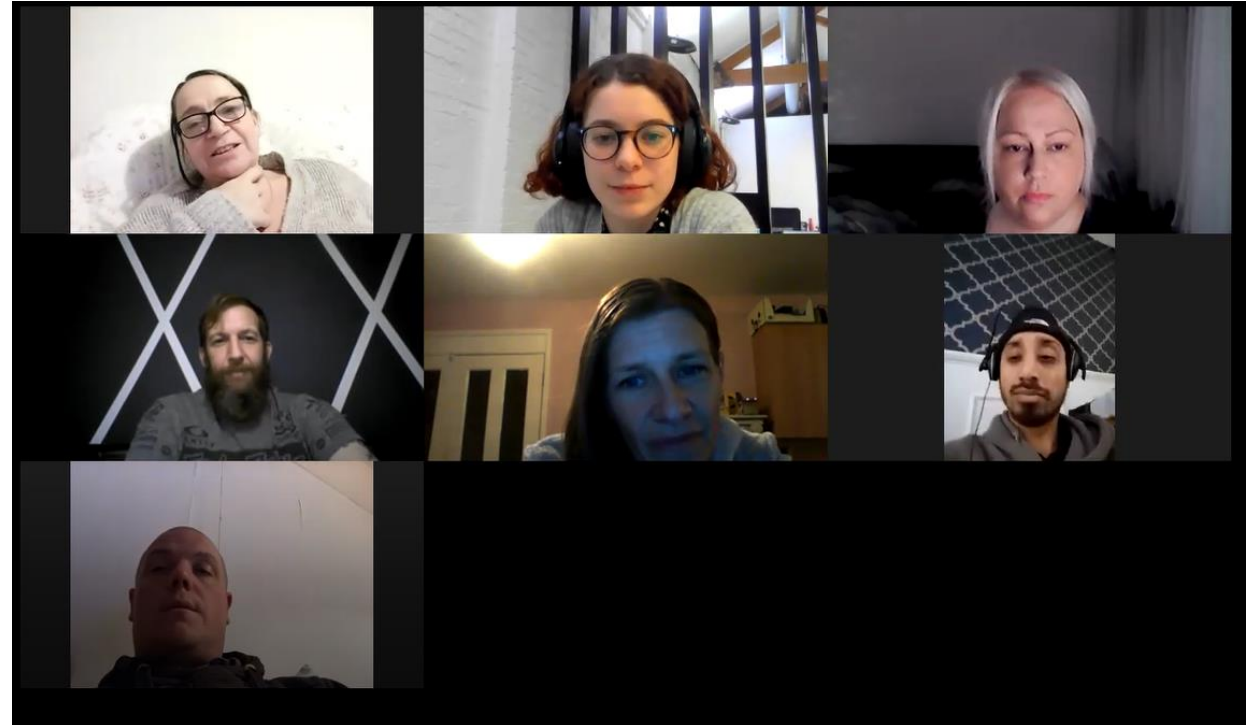
+ Stimulus **developed but discarded during fieldwork** as lacking importance with majority of water consumers

+ Other areas that were **discussed in general conversation but where stimulus was not developed due to lack of importance** included:

- + Education
- + Giving back to communities
- + Water hardness/ softening

Discussing PCs in groups helped participants engage

- + Participants admitted their surprise at **how engaging a conversation about water could be** – and how many things water companies were doing.
- + This was new for many, even more informed participants
- + Participants also enjoyed **hearing new perspectives** from other participants, which had the capacity to modify their initial views
- + This may not have come from independent evaluation of service areas through a controlled survey



Key insights

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People relate most to service aspects which affect them directly



+ People find service aspects which **do/ might impact them directly** most important e.g. supply interruption, bill affordability



+ Service aspects with **immediate impact** or **consequences** of higher priority than those with consequences in a more distant future e.g. appearance taste and smell of water more important than biodiversity



+ People highly engaged where **health** seemingly **at risk**, especially easy to relate to in the current Covid climate e.g. lead in pipes, do not drink notices



+ **Perceived provider failure** particularly irksome e.g. pollution incidents, leakage



+ People **relate more easily relate to outcomes** e.g. managing sewer floods *more* relatable than storm overflows (even though they are connected).

People relate most to service aspects which affect them directly

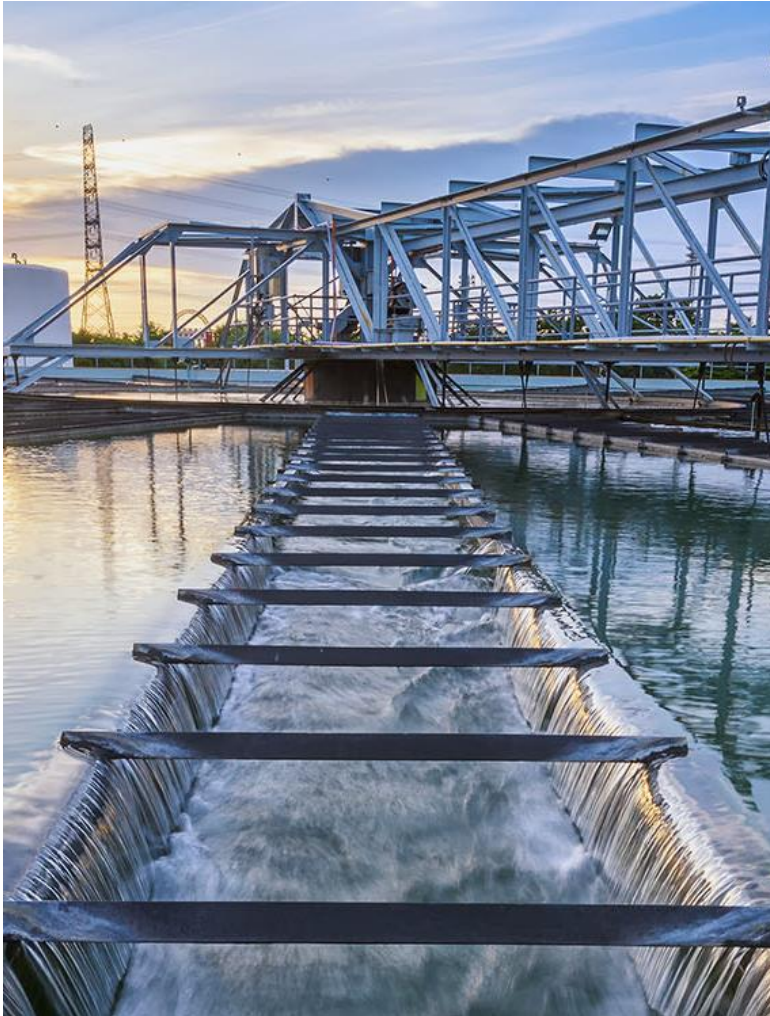
Pre-task analysis

- + Water consumers **mainly raise issues relating to supply**
- + **Issues around infrastructure feature highly** – many felt water companies should focus on network improvement/ reinvestment.
- + Water company communication and service were important – many wanted **clear information, education** and **good customer service**. Although this was **rarely a first priority**
- + The **environment featured below service delivery aspects**
 - + River and bathing water quality mentioned mostly in relation to news generated awareness
 - + Carbon and biodiversity seldom mentioned
- + **Priorities for Welsh water consumers closely aligned with English water consumers**

Please tell us what activities you think a water company should be doing?	1 st rank	2 nd rank	3 rd rank	4 th rank	5 th rank	Total
Appearance, taste	27	13	6	5	1	52
Constant water supply	15	9	8	9	4	45
Clarity of info / transparency	9	11	8	6	1	35
Upkeeping the network	6	5	7	7	5	30
Fixing leaks	12	4	7	5	1	29
Safe water	14	6	4	2	2	28
Fair prices	4	7	7	4	2	24
Educating customers	2	6	8	4	4	24
Reducing water usage	5	2	7	2	4	20
General environment	4	7	3	4	2	20
Efficient / working sewerage	3	7	6	0	1	17
Good customer service	2	2	3	5	5	17

- Total all responses: 302
- NB: descriptions coding frame only, consumer response open-ended and unprompted

Most struggle to link service areas, even if they are connected



- + Customers **don't understand water and sewerage**, most only engage when there is an issue.
- + People struggle to assimilate the relationships between different aspects of service
 - + People **don't know** (and don't want to know) **how the 'system' works** – instead they **want to explore the 'impact'** it has on day-to-day life
- + Greater relevance of descriptions would be brought by **more focus on positive customer impact and less focus on process and infrastructure**

People more interested in how failure of service affects them rather than an abstract measurement

- + Typically, people want to know:
 - + **How they will be affected**
 - + **How long they will be affected for**
 - + **Water company response time**
- + There is **some suspicion about numbers** provided by water companies, and people imagine manipulation to make them look as flattering as possible
 - + likely exacerbated by the current Covid climate where data often only felt to provide half the story
- + People have **more tolerance of service interruption where warning** given e.g.
 - + supply interruption less impactful if notice and people can plan around it



However, some incidence metrics do work better than others

+ Large numbers get attention but do not give accurate picture

- + Large numbers suggest that incidence is significant
- + People resist applying mental maths so struggle to understand scale e.g. 2000 properties sounds significant regardless of number of properties in a water company areas

+ Small percentages do not get attention, nor give accurate picture

- + People do not engage with small percentages – the risk appears low and insignificant
- + Larger, whole percentages, do however get more attention

+ Simple ratios (i.e. 1 in x households) get attention and are accurate

- + Ratios are relatable and easy to understand

Example:

There are **1,900** incidents of flooding in properties per year.

For one water provider, **180** properties out of 1,200,000 were affected. That is 0.02% or 1 in every 5,000.

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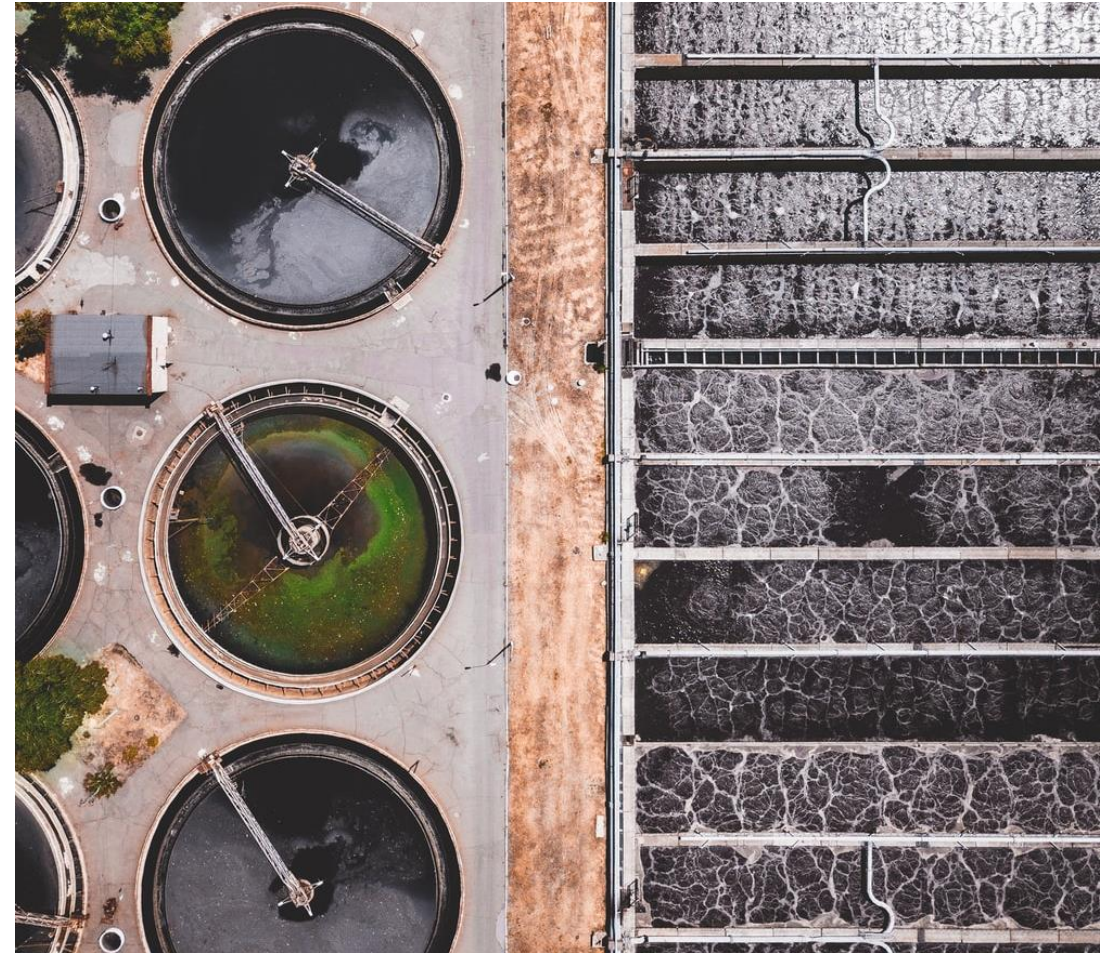
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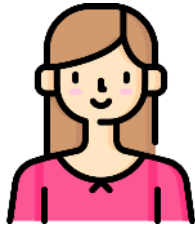
For one water provider, 180 properties out of 1,200,000 were affected. That is 0.02% or **1 in every 5,000**.

Lower priority services may still be important to customers

- + To meet the research objectives, people were asked to identify their **higher and lower service priorities**
- + Based on what was observed overall, services have then been identified as being higher or lower priority
- + However it should not be assumed that consumers did not want lower service priorities to be common PCs. Participants often said **that all of these service areas are important to them** but some had to be placed lower as an objective of this research
- + A key finding of this research is that the **presentation or wording of some service areas needs improvement** in order to help people better engage and understand them as services



Age, education and SEG had greatest impact on engagement



+ Future bill payers had the least knowledge

- + rarely interact with water provider
- + often live in situations where **no responsibility over their water** i.e. live with parents, or in student accommodation, and **no visibility of bill**

+ Education and socio-economic group also impact understanding

- + **More professional, higher income** water consumers tend to be **more informed** and **engaged**



+ Younger bill payers are quite engaged on environmental issues

- + but **less knowledgeable than older water consumers**
- + **switched on to** language about climate change (**buzzwords**) but **not specifics**



+ Older age groups most informed

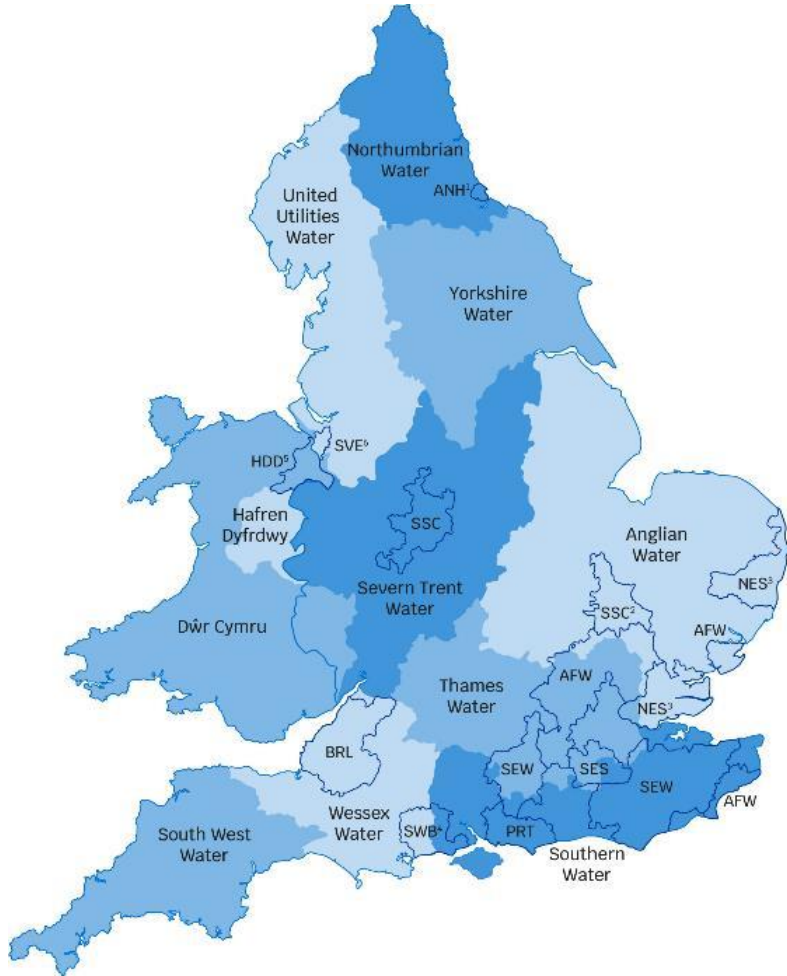
- + driven by **life experience** (of living in different areas/homes) and **news awareness**
- + more conversations about infrastructure, reinvestment, efficiency and preventing problems...
- + **most knowledgeable about the environment**

People are sensitive to environmental service elements



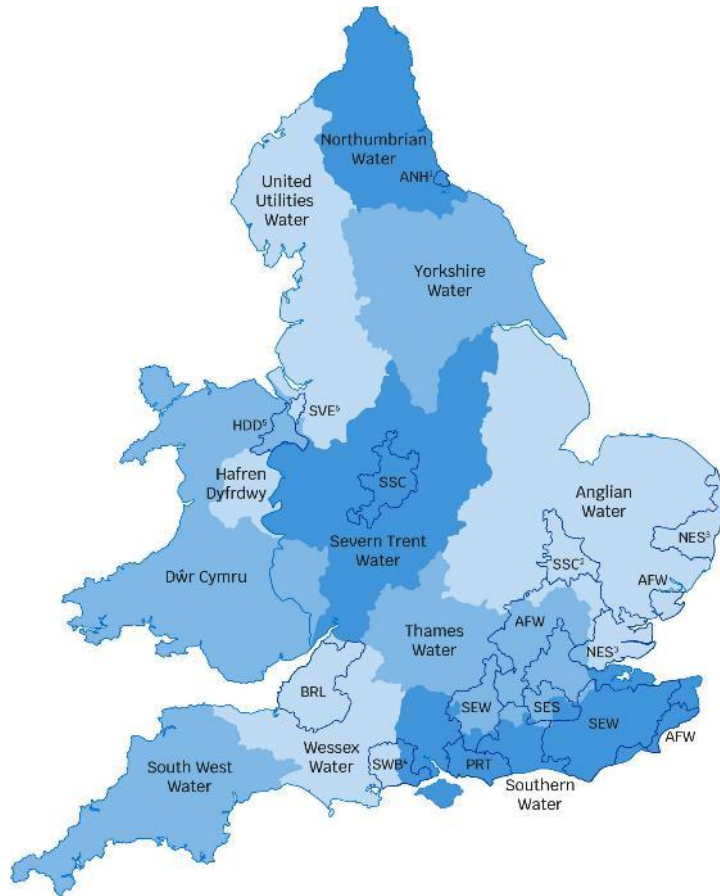
- + Public regard for the **environment is high**, due to:
 - + Being **in the news and/or topical** e.g. major pollution incidents in, or close to, local area
 - + **Personal agenda** and **politics**
- + The **more specific** the environmental aspects, the **more relevant** they felt. For example:
 - + Biodiversity vague in absence of specifics
 - + In contrast, monitoring industrial discharge into river water was seen as more coherent
- + **Life-stage, education and socio-economic group influences how people talk about the environment**
 - + Younger groups (future bill payers, young family) talk about environment but rarely in great specificity
 - + Older age groups tend to have a more specific indicators of what needs to be done to benefit environment (saving water, reducing pollution incidents...)
 - + CCW/Yonder research into awareness and perceptions of river water quality indicates how older people, higher SEGs, and those with higher education levels more likely to engage with environment as provides opportunity for enjoyable outdoor activities e.g. visiting national parks, National Trust properties etc

Location influenced views but at a local not regional or national level



- + **People in metropolitan areas/ cities** (London, Manchester etc.) appear more likely to spontaneously raise issues of infrastructure and sustainability
- + **People living in or near areas that flooded** more likely to raise flooding as a concern
- + **People near the coastline** more tuned in to bathing water quality
- + **People relate to what they see around them locally**

No-major difference in views of those in Wales vs. England



- + **Strong desire for reinvestment, likely due to the recent acquisition of Hafren Dyfrdwy**
 - + Some vocal about need to satisfy shareholders above water consumers
 - + But mainly from educated empty-nesters, not younger water consumers i.e. **as much about education, SEG and specific location vs. nationality**
- + **Hose pipe bans lacked any relevance because felt to rain abundantly in Wales**
 - + Whilst people in drier parts of UK e.g. Southern England might hold similar views this is especially pronounced in Wales
- + **Bathing water quality was of some importance**
 - + given press coverage detailing drops in bathing water quality around Gower peninsular
- + **But it is largely difficult to detect a major difference in attitude**
 - + Welsh water consumers consider service aspects that relate to water supply and environment in a similar fashion to English water consumers

The importance of servicing vulnerable customers emerged

- + **Financial vulnerability:** the affordability of water was felt to be paramount to people in vulnerable financial situations
 - + Unanimous view that **all have a fundamental right to water regardless** of ability to pay
- + For **older people, disabled people & mobility issues, children with SEND**, the importance of a safe, constant supply of water for hygiene, physical and mental wellbeing was noted
 - + These are segments who would struggle with unplanned or even planned interruption.
 - + People expected that such groups would be supported during outages e.g. bottled water provision
- + **English as second language:** amongst this small sample water consumers had very good command of English, vulnerability likely to be higher where little/ no command of English

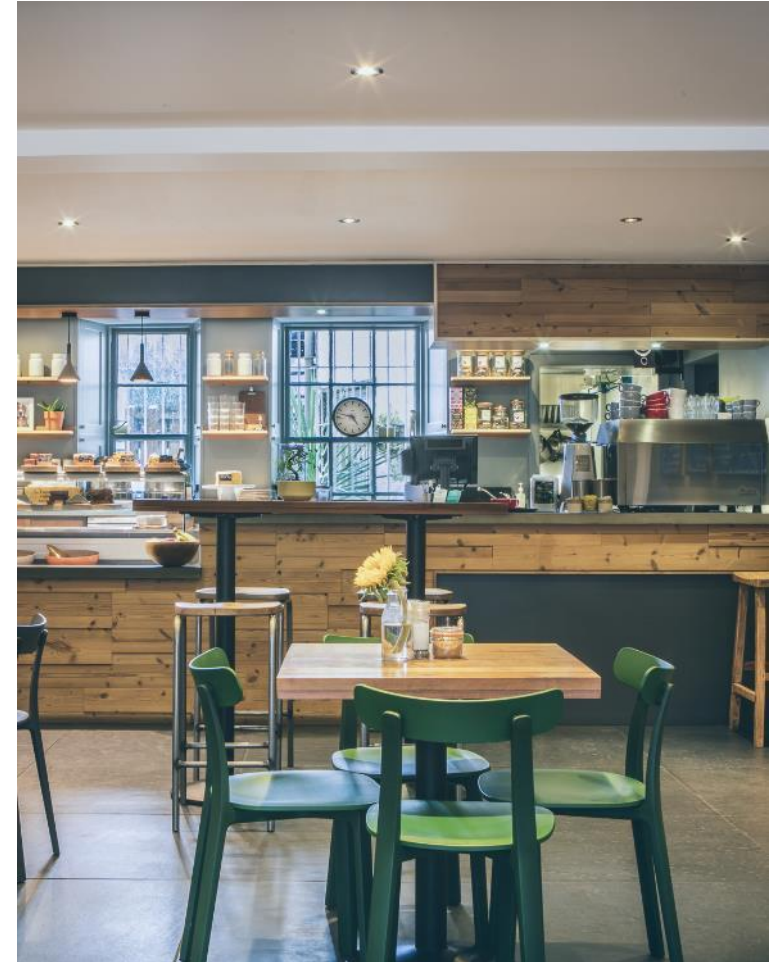


Businesses largely held similar views to households



NB: we spoke to a very small sample of business (8 in total).
Furthermore, most of the businesses where water was not essential were SMEs rather than large organisations with supply chains and large staff numbers.

- + Service aspects which were important for households were **even more important for businesses**
- + Where water was essential **reliability and quality of supply fundamental**
 - + Businesses can't operate if supply cut-off/ discoloured e.g. food businesses, hairdressers
- + But, for the most part, businesses **struggled to think about water from a business perspective** instead of from an individual one
 - + For non-essential businesses, **hybrid** working is on the rise and people are regularly working from home
 - + ***“As a business-person, I’m a citizen of the land first and foremost!”***



Small businesses had a nuanced view on water saving

- + Some **small businesses** felt it was **important to save water**
 - + But often because it's good for business to be seen to be environmentally responsible
- + Some small **businesses** felt **they could be expected to do more during a drought** and would conceivably welcome other measures e.g. hippo water saving devices, encourage staff to use bottled water
- + But all small businesses felt they would be **unaffected by non-essential use bans**
 - + (none had outside space or freight that would be affected by turning off the taps)



Business case studies evidence the importance of a clean supply and how scale has different levels of impact



Water essential businesses

Cafés use water to prepare drinks, food and wash dishes. Without a constant clean water supply (water supply interruption and do not drink notice), **they would lose business hours and therefore money.**

Hairdressers require water at all times for washing hair. Without water, they cannot operate their business. If they have put bleach on a customer's hair and can't take it off, they are liable. One hairdresser spent a lot of time dyeing wigs – if she was unable to wash the dye off, she **would lose £1000s per wig.**



Water non-essential businesses

A **law firm** runs at high pressure to tight deadlines. With water supply interruption, or any associated issues, **staff would need to be sent home.** This incurs a loss of time and efficiency and could risk missing deadline which might have a direct impact on business.

A **graphic design company** with a **small number of employees** felt they **wouldn't be strongly affected** by any of the issues mentioned – they could manage with bottled water throughout the day and work could easily be done from home if any issues arise.

Service aspect review framework

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Several themes impact on importance of service aspects

- + **Type of inconvenience:** How much this effects my day to day so do I have water, is the water drinkable, will my home environment be affected, is what I do outside of home affected?
- + **Duration & recurrence:** How long will I be inconvenienced, is a workaround possible, how likely is it to happen again?
- + **Health consequences:** Possibility of illness
- + **How likely is it to happen?:** Does this seem like it *might* or *definitely could* happen to me vs. not happen (based on experience and what people have heard about service aspect, not necessarily based in factual incidence)?
- + **Visibility to consumer:** Is this a service aspect people see/ experience/ are aware of or something which happens within the 'network' / 'underground'?
- + **Water company agency:** Is service response/ action something perceived as being within water company mandate to tackle?
- + **Immediate vs. long-term initiative:** Is immediate action pertinent vs. is this a long term initiatives (that might fall within wider government measures to tackle)

NB: not all themes were applicable to consideration of every service aspects

Relative importance of each theme affects how important service aspects are to water consumers

- High importance / impact
- Some importance / impact
- Lower importance / impact

- Detailed descriptions are rules of thumb for how the importance of each theme is assessed relative to a service aspect
- The more themes that are dark green relative to a service aspect the more important the service aspect
- The more themes that are paler relative to a service aspect, the lower importance the service aspect

	Lower importance/ impact	Some/ mid importance/ impact	Highly important/ impact
Type of inconvenience	No personal inconvenience, easy to work around	Some personal inconvenience (need to cross road to avoid flood) but workarounds possible	Significant personal inconvenience (can't cook, shower or clean)
Health consequences	No health consequences (a hosepipe ban is unlikely to impact people's health)	Minor health consequences, which may be avoided (by not bathing in the sea)	Significant health consequences (risk of illness or death)
Duration and recurrence	Predominantly rare or one-off occurrence	May happen with some regularity, which increases the importance	Potential to happen on a recurring or constant basis, becoming very important
How likely it is to happen	Seems unlikely or very unlikely to happen (1 in 200-year chance)	Feels like it <i>might happen</i> , something they've heard about	Something they've seen (or experienced), so feels like it <i>definitely could</i> happen to me
Visibility to consumer	Invisible to the public (infrastructure factors)	Occasionally visible to the public, mainly when things go wrong	Very visible to the public, especially when things go wrong
Water company agency	Out of the water company's control (extreme weather)	Partly within water company control, but only to a certain extent	Mainly or fully within water company control (negligence)
Immediate vs wider environmental agenda	Wider or long-term environmental agenda only, with no short-term consequences	Some short-term consequences, but part of wider or long-term environmental agenda	Immediate consequences on the customer or the environment

- High importance / impact
- Some importance / impact
- Lower importance / impact

Service aspect rankings by themes – highest importance

- + The slides that follow present the ordering of service aspects by theme grouped into highest importance, some importance and lower importance.
- + These groups are an **average** of views.
 - + Some will have ranked these service aspects differently to the majority based on their personal preferences.

	Water interruption	Taste, smell, appearance	Do not drink notice	External flooding	Internal flooding
Overall importance	High	High	High	High	High
Type of inconvenience	High	High	High	Some	High
Health consequences	Lower	Some	High	Some	High
Duration and recurrence	Some	Some	Some	Some	High
How likely it is to happen	High	High	Lower	High	Lower
Visibility to consumer	High	High	High	High	High
Water company agency	High	High	Some	High	Some
Immediate vs wider agenda	High	High	High	High	High

- High importance / impact
- Some importance / impact
- Lower importance / impact

Service aspect rankings by themes – some importance

	Boil water	Leaks	River water	Pollution	Lead	Affordability & Fairness	Resilience	Biodiversity
Overall importance	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact
Type of inconvenience	High importance / impact	Some importance / impact	Lower importance / impact	Lower importance / impact	Lower importance / impact	N/A	Some importance / impact	N/A
Health consequences	High importance / impact	Lower importance / impact	Some importance / impact	Lower importance / impact	High importance / impact	Some importance / impact	Some importance / impact	Some importance / impact
Duration and recurrence	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	N/A
How likely it is to happen	Lower importance / impact	High importance / impact	N/A	High importance / impact	Some importance / impact	N/A	Some importance / impact	N/A
Visibility to consumer	High importance / impact	Some importance / impact	Some importance / impact	Some importance / impact	Lower importance / impact	High importance / impact	Some importance / impact	Lower importance / impact
Water company agency	Some importance / impact	High importance / impact	Some importance / impact	High importance / impact	Some importance / impact	Some importance / impact	High importance / impact	Some importance / impact
Immediate vs wider agenda	High importance / impact	Some importance / impact	Some importance / impact	High importance / impact	Some importance / impact	N/A	Some importance / impact	Lower importance / impact

- High importance / impact
- Some importance / impact
- Lower importance / impact

Service aspect rankings by themes – least important

	Hose pipe ban	Severe drought	Bathing water	Storm overflows	Water pressure	Carbon	Using less water	Customer satisfaction	NEU for business
Overall importance									
Type of inconvenience						N/A			
Health consequences							N/A	N/A	
Duration and recurrence						N/A	N/A		
How likely it is to happen						N/A	N/A		
Visibility to consumer									
Water company agency									
Immediate vs wider agenda					N/A			N/A	

The following areas were raised during spontaneous discussions but deprioritized as not high priority

- + **The health of drinking water** (nutrients & minerals, the presence of chemicals & plastics...)
- + **Discharge compliance**

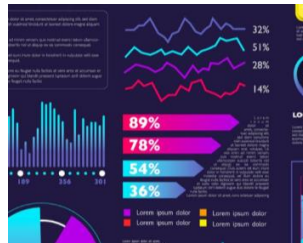
This area was **taken on trust (mandate of water company to manage)**

- + **Performance transparency** (independent comparison of performance against other water companies)
- + **Educating people** about what water companies do
- + **Giving back to communities** (community engagement, charity work, campaigning...)

These were seen as **costly and time consuming**, with **less return as many were not interested enough**, or did not have time, to engage on these topics.

- + **Roadworks** (traffic disruption, the presence of lorries, damage to roads...)
- + **Water hardness, or water softening**

These were **regional or specific issues**, which were only of real concern to a small number of people.



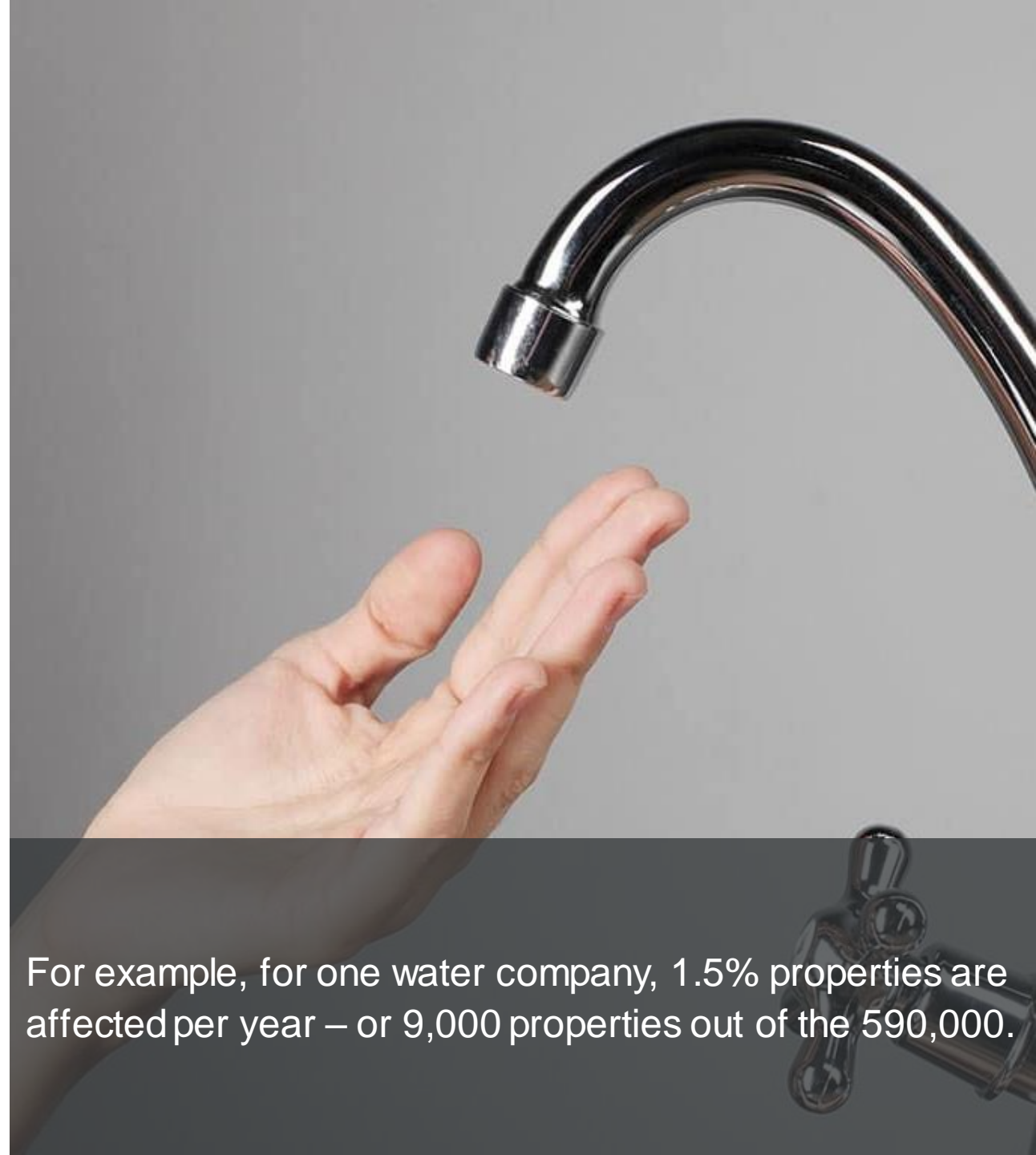
Stimulus was developed for Roadworks and Performance transparency and used in sessions but were eventually discarded as lacking in relevance

Detailed service aspect review

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Water supply interruption

Your tap water supply stops without warning for 3 - 6 hours.



For example, for one water company, 1.5% properties are affected per year – or 9,000 properties out of the 590,000.

Unplanned water supply interruption

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

WATER SUPPLY FUNDAMENTAL ASPECT OF SERVICE, RESOLVING OUTAGES TOP PRIORITY

- + Unplanned outages **highly inconvenient** although **little health consequence** if for short periods
 - + Buying bottled water a workaround for some but not an adequate solution for many
 - + High **potential to derail life/business** e.g. being unable to make hot drinks, wash/ shower or flush toilets

- + **3-6 hours tolerable but** long enough to inconvenience people in waking hours, whether at home or workplace

- + People felt it **might easily happen** (similar to electricity outages), low incidence (1.5%) did little to appease importance

- + Fully within the **control of water company, mandate to solve** with haste

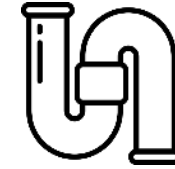
- + Degree of disruption would be mitigated if:
 - + **Planned:** customer can plan and work around e.g. buy bottled water, business can instruct to work from home
 - + **Non-waking hours:** night-time disruption would be over before people wake

Unplanned water supply interruption - specifics



Demographics

- + Consistent expectation for all age groups but more critical for:
 - + Businesses where water is essential/ large office-based workforce
 - + Domestic customers with more time at home – especially empty nesters and vulnerable



Link to other service aspects

- + Assumed that unplanned interruptions would be caused by issues and fixing the network – such as leaks



Example metrics

- + People resist engaging with percentage (1.5%) as very small
- + Engage more with large number (9,000 properties)
- + But most interested in how quickly issue would be fixed – which *is* indicated in the description (3-6h)
- + Planned vs. unplanned interruption ratio might engage customers since outages are far less inconvenient where warning



Written description

- + Description is clear, specific and suitable
- + NB: service interruption less impactful at night, description would benefit from clarification since people assumed waking hours outage

The appearance, taste and smell of tap water

Your tap water is discoloured, or smells or tastes less than ideal for a day. It is safe to drink, but you may not choose to do so.



By way of example, a water company receives 10,700 complaints from customers about water discoloration each year. This is less than 1 in 300 households.

Appearance, taste and smell of water

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

CLEAN, SAFE WATER A CORE EXPECTATION OF SERVICE, CUSTOMERS SENSITIVE TO EVEN A MINOR CHANGE IN QUALITY

- + A mild change has **capacity to inconvenience**
 - + Despite reassurances, many suggest they'd remain **unconvinced that safe to drink**, might switch to bottled water rather than take the risk
 - + People extremely sensitive to a change in water, especially one that was 'less than ideal'

- + Whilst people knew that such issues could be resolved quickly by running taps, some indicated that in the interests of good health they'd remain **suspicious of water quality** for a little time even **after water appears back to normal**

- + Many had experienced several times in the past and felt it was likely to happen to them in the future

- + This was **high priority** for water companies, as a key part of their service delivery

Appearance, taste and smell of water - specifics



Demographics

- + This was important for everyone
- + But older consumers more sensitive than future/younger billpayers – likely since more homeowners (vs. renters)
- + Water-essential businesses sensitive, might require additional reassurance that the water is *really* safe in event of appearance change



Link to other service aspects

- + A minority felt that lead pipes and leaks may allow impurities, affecting taste and appearance, to enter water supply



Example metrics

- + People feel number of complaints unclear indicator of scale of problem: there are 'fussy' people who would complain, some who would not, or one person may complain on behalf of many others (a whole road, for a nursing home... etc.)
- + Clear ratio (1 in 300) easier to understand than absolute numbers (10,700)



Written description

- + The description is clear
- + 'Less than ideal' is vague but a catch-all for the changes people experience whilst people do not have a more elegantly phrased alternative suggestion
- + People tend not to experience differences in 'smell', description only needs to reference taste and discoloration

Do not drink notice

Water companies may issue a do not drink notice asking you not to drink tap water for a certain amount of time, if your water supply has become contaminated and there is a public health risk.



**Do not
drink**

Do not drink notice

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

IN THE ABSENCE OF INCIDENCE STATISTICS, DO NOT DRINK NOTICE OF HIGH IMPORTANCE GIVEN RISK TO HEALTH

- + Being unable to drink tap water for an undefined period of time is **highly inconvenient** - people would *have* to buy bottled water
 - + Whilst some assumption that bottled water might be provided, service issues remain a major hassle, **ease of access** and use (cooking) **of tap water highly prized**
- + **Health risks of great concern**
 - + People worry about **potentially lethal consequences** if they do drink tap water
 - + Increases concerns about bathing use if tap water completely unsuitable to drink
- + But it **seemed unlikely**, people could not imagine a ‘public health risk’ *actually occurring* in the the UK, rather it was something they could better imagine in developing countries
- + In the event of a public health risk **taking immediate action high priority** for a water company
 - + However, blame not necessarily ascribed to water company, perception that contamination of this type could only be a one-off and wholly unpredictable event

Do not drink notice - specifics



Demographics

- + This scenario was alarming across all customers segments because of the potential health consequences



Link to other service aspects

- + The Do not Drink notice was new, alarming that people did not readily connect to failings of water provider (or any other service areas)
- + Whilst a minority linked to the taste, appearance and smell of water, the scale of problem was wholly different in the case of a public health concern



Example metrics

- + Ratio-based incidence would be essential for people to be able to give a more considered view on importance e.g. Do not drink notice likely 1 in xxx years



Written description

- + The amount of time people are affected felt to be extremely vague
- + As a note – talking about a public health risk is highly emotive and raises the importance of this service aspect to a level that belies the reality (nobody had actually experienced this problem)

Sewer flooding: outside your property

Water companies have to manage sewer flooding outside of people's properties where waste water pipes block and overflow.



There are 7,600 incidents a year amongst the 3.6 million households served by a water company.

For one water provider, there are 2,186 incidents in any year out of 1,200,000 properties, which is 0.2% or one in every 500 properties.

Sewer flooding - external

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

IMPORTANT TO CUSTOMERS, SELDOM EXPERIENCED BUT EASILY IMAGINED AND IMPACTFUL ON HOME/ BUSINESS PREMISES

- + People felt that sewer flooding was **inconvenient and unpleasant** regardless of scale on account of the **smell, health hazards and unpleasantness**
 - + Participants indeed felt they would be more affected where within their property boundary, where financial cost and emotional repercussions (e.g. vegetable patches, driveways getting damaged)
- + They worried about **health consequences**, mainly surrounding the risk of walking sewage into their homes
- + Since flooding of drains and roads in general had high salience across the groups, people conceived that **it could happen** despite low incidence
- + External sewer flooding **very visible** and felt **directly related to water company practice** – who were not maintaining the pipes properly or failing to prevent recurring floods
- + Only a minority of water consumers attributed problems to wet wipes/ fat, oils and grease– tended to imagine that **system malfunction** main factor

Sewer flooding external - specifics



Demographics

- + Older people were more concerned about external flooding than younger age groups – due to higher levels of home ownership and emotional investment in their own homes and local area
- + People living in areas that were more likely to be flooded rated sewer flooding incidents higher and were more emotive



Link to other service aspects

- + People felt that external flooding was slightly less important than internal sewer flooding
- + People didn't spontaneously link this service aspect to other PC areas, attributing it to general 'network failure' rather than insufficient storm overflows



Example metrics

- + The ratio (1 in 500) was easy to understand and felt realistic based on experience.
- + People did not engage with the percentage (0.2), it was too small to be meaningful
- + The large numbers e.g. 7,600 were also easy to assimilate but did not give an accurate impression of real extent of problem
- + Furthermore, people draw distinctions between impact of sewer flooding based on scale and duration - becomes a real nuisance if last for more than a couple of days



Written description

- + The description (and any imagery) needs to clarify that sewer flooding outside is within property boundaries – many felt that description covered pavements/ roads which was less disruptive

Sewer flooding: inside your property

Water companies have to manage water from sewers flooding into properties, when waste water pipes block or overflow.



There are 1,900 incidents of flooding in properties per year.

For one water provider, 180 properties out of 1,200,000 were affected. That is 0.02% or 1 in every 5,000.

- High importance / impact
- Some importance / impact
- Lower importance / impact

Sewer flooding - internal

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

HIGHLY IMPORTANT TO CUSTOMERS, ANY INTERNAL SEWER FLOOD HIGH PRIORITY TO BE RESOLVED AS QUICKLY AS POSSIBLE

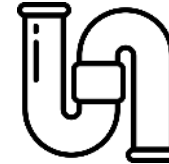
- + An internal sewer flood would be **highly inconvenient** and seen as a violation, worse than external flooding.
 - + Flooding could cause **significant and expensive disruption regardless of scale**
 - + Whilst contaminated carpets/ furniture was more serious than sewer water backing up on shower tray, even the latter extremely upsetting
 - + Participants worried that any internal sewer flood might mean moving out of their property for a (considerable) period
- + There were **significant health concerns** around the presence of sewage in homes and the risk of making people ill
- + Whilst **less likely to happen** than some of the other service areas, people were very concerned that the same people would be affected on **multiple occasions**
- + Internal sewer flooding **very visible to customers** but not necessarily **directly related to water company practice**
 - + Believed that problems with sewage backing up might be caused by drainage/ plumbing issues within own property

Sewer flooding internal - specifics



Demographics

- + Consistent disgust across customer groups, whether people with young families, future bill payers, business customers with business premises or when thinking about vulnerable customers



Link to other service aspects

- + Internal flooding was seen as more important than external flooding
- + Participants didn't spontaneously link this service aspect to other PC areas, attributing it to general 'network' or home plumbing/ drainage failure rather than some more specific shortfall elsewhere (e.g. insufficient storm overflows)



Example metrics

- + The ratio (1 in 5,000) was easy to understand and felt realistic based on their own experience. People did not engage with the percentage (0.02%)
- + The large numbers (180) were easy to assimilate but did not give an accurate impression of the scale of problem, it felt a big number in spite of the context (out of 1,200,000) provided
- + Similar to other service areas, people were far more interested in how quickly water companies addressed issues



Written description

- + Whilst people draw distinctions between different scales of internal flooding, the description was a good catch-all in as far as *any* scale of internal sewer flood could be highly impactful and distressing

Boil water notice

Water companies may issue a notice asking you to boil tap water before drinking, cooking or preparing food for a number of reasons, for example because of traces of e-coli in the water. You may be asked to boil tap water for two days.



Boil water notice

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

IN THE ABSENCE OF FREQUENCY STATISTICS, BOIL WATER NOTICE OF SOME IMPORTANCE GIVEN CAPACITY TO MANAGE HEALTH RISK

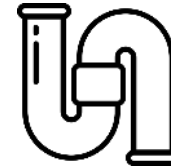
- + Boiling water is **something of a hassle** but felt to be **easy enough to accommodate** for a short period
- + Associated **health risks very concerning**, many wouldn't take the risk of drinking water even after boiled
 - + Furthermore, there was concern that water might also carry risks in bathing (hand-washing, showering) use
- + But it felt **very unlikely to happen**, and none had any experience boil water notices
- + Issue would **directly affect how people used supply** within their homes/ business premises
- + In the event of a contaminated supply, **taking immediate action should be a high priority** for a water company
 - + However, blame was not attributed to water company, as contamination of this type (e-coli) felt wholly unprecedented

Boil water notice - specifics



Demographics

- + No discernable difference across demographics
- + People could survive absence of cold tap water, even families with children drinking tap water could find alternative solutions (bottled water etc.)



Link to other service aspects

- + The Boil water notice was new, alarming and a one-off scenario that people did not readily connect to failings of water provider (or any other service areas)



Example metrics

- + Ratio-based incidence would be essential for people to be able to give a more considered view on importance e.g. Boil water notice likely 1 in xxx years



Written description

- + The written description is clear and specific
- + Two days felt like a relatable timeframe for a problem of this nature
- + Talking about a e-coli is highly emotive and raises the importance of this service aspect to a level that belies the reality (since nobody had actually experienced this problem)

Reducing leaks

Water companies are committed to reducing leaks in the pipe network.



Current leakage amounts to 434 million litres every day, or around 120L per household per day within one water company area.

As an example, about 15% of treated water is lost in the network.

Reducing leaks

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

REDUCING LEAKS ARE OF SOME IMPORTANCE, A CORE MANDATE OF WATER COMPANY AND ENVIRONMENTAL RESPONSIBILITY

- + Reducing leaks had **little impact on people's day-to-day lives**, both in terms of inconvenience and health consequences
 - + Leak fixing is largely unseen, although some had experience of burst pipes in the road and water being shut off as consequence

- + What concerned people more, was a belief arising from media coverage, that network leaks **happening on a grand scale, consistently**
 - + Many felt uneasy about what they felt was **wasteful** (so a poor use of **environmental** resources)
 - + It made no sense, when being charged, that providers lose large amounts of water on a daily basis
 - + Many did not want to bear the costs (in billing) of overhauling the network where leaks are allowed to proliferate

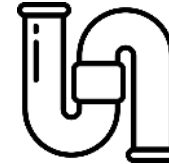
- + Water customers imagined that the description detailed network leaks vs. property leaks, importance likely to increase (slightly) if clear that leak fixing commitment encompasses people's own homes

Reducing leaks - specifics



Demographics

- + All demographics showed similar (lower mid level) concern with leaks



Link to other service aspects

- + A minority linked leak fixing to low water pressure or supply interruptions (water turned off whilst leaks fixed)
- + But for the most part leaks were simply the Achilles' heel of water companies
- + For many it was frustrating to be asked to reduce their water consumption (helping households and businesses save water) when so much water is lost in the network



Example metrics

- + Both the percentage (15%) and litres per day lost per household (120L) were relatively easily to assimilate
- + Both are given relevant context – percentage relates to total water lost in network, litres per day at household level
 - + And both appear large numbers, so easy to grasp



Written description

- + Clear and specific description but additional clarity that also encompasses leaks within own home network might increase importance

River water quality

In order to maintain 'good' river water quality, the Environment Agency monitors discharge of industrial farming and treated sewage into the waterways.



500 miles of river are less than 'good' quality, out of the total of 3,000 miles.

River water quality

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen N/A
Visibility to consumer
Water company agency
Immediate vs. wider agenda

RIVER WATER QUALITY ONE OF THE MOST IMPORTANT OF THE ENVIRONMENTAL PCS

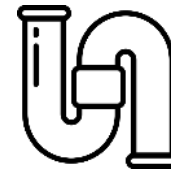
- + River water quality had little day to day impact, unless avid fishermen, wild swimmers or pleasure-boat enthusiasts!
- + But something of a **constant, somewhat linked to quality of supply**
 - + **A desire for raw, untreated product to be of the best quality possible**
 - + So oversight on discharge important as part of water-cycle best-practice i.e. of highest quality when re-enters rivers, before being treated
 - + The **higher standards throughout**, the better the water I drink, **the healthier I am** etc
- + There is also a high regard and even pride in rivers – natural beauty that **visibly defines local environments**
- + Furthermore, health of the rivers directly reflected **health of the countryside, wildlife and the environment in general**
 - + Because rivers flow everywhere, through all water company areas, **more important than bathing water quality**

River water - specifics



Demographics

- + Consistent response, no demographic differences



Link to other service aspects

- + River water quality was considered similar to other environmental water quality PCs (bathing water quality, pollution incidents, storm overflows) but was seen as more relatable and a better measure of how well water companies were doing



Example metrics

- + People struggled to calibrate the distances (they think 10s of miles, not 1000s)
- + A simpler ratio would be a more relatable i.e. 1 in every 6 miles of river
- + People in the UK think in terms of miles not km
- + People understood 'less than good' as being 'poor' which was alarming
- + Suggest remove 'less than good', state that 5 out of 6 miles good quality



Written description

- + Description is clear, specific and suitable
- + EA action relatable and relevant

Pollution incidents

In order to manage impact on the environment, water companies aim to reduce pollution incidents, which can be caused by a discharge or spillage from a company wastewater network or treatment works.

Pollution incidents are classified according to their impact on the environment and people, from category 4 (little or no impact) to category 1 (serious and persistent).

For example, one water company is aiming to reduce category 3 pollution incidents to 300 incidents per year from 430.

A minor pollution incident happens, on average, every 10 days.



Pollution incidents

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

MANAGING POLLUTION INCIDENTS EXTREMELY IMPORTANT, BUT SPECIFIC AWARENESS IS LOW WHICH IMPACTS IMPORTANCE

- + Pollution incidents do **not affect people's day-to-day**
 - + Any **health impact low**, assumed that pollution incidents would be contained and affected water would not enter the supply chain
- + Nevertheless, people **feel very strongly about pollution incidents**, but perceive they mainly result from **industrial malpractice**
- + Furthermore, feel **pollution incidents likely an ongoing, recurring issues** – stemming from overall impression that water (whether rivers or seas) is seldom crystal clear around towns/ cities
 - + Although, outside of highly publicised incidents e.g. Southern Water 2021 fine, specific awareness relatively low
- + **Absolutely critical for water companies to remedy immediately**, whilst penalties should be administered
- + Immediate need to control pollution incidents, because of **damage to the environment**

Pollution incidents - specifics



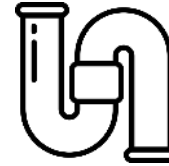
Demographics

- + Consistent views on pollution incidents
- + None of the businesses we spoke to were industrial, such that they might have a more specific viewpoint



Example metrics

- + 'Once every 10 days' measure felt most meaningful and relatable to people
- + Talking about multiple categories (1-4) difficult to assimilate, people don't have the head space for more than one metric
- + Whilst any scale of pollution is distressing, people relate more readily to more significant events
 - + Indeed, frequency of minor incidents (every 10 days) difficult to relate to own experience – category 1 or 2 incidents may be better



Link to other service aspects

- + This resonated with participants in a similar way to river water quality
- + But river water and pollution incidents felt like separate measures – one was seen to be a continuous measure while other a measure of malpractice



Written description

- + The title 'minor pollution incidents' (used in pilot sessions) seemed vague so was removed in subsequent sessions
- + People struggle to differentiate water company and industrial pollution incidents, so additional clarification is required to enable specific water company focus

Affordability and fairness

Keeping bills low and making them fair across households.



Affordability and fairness

Overall importance
Type of inconvenience N/A
Health consequences
Duration and recurrence
How likely it is to happen N/A
Visibility to consumer
Water company agency
Immediate vs. wider agenda N/A

AFFORDABILITY AND FAIRNESS DEFINES CORE CONTRACT BETWEEN CUSTOMER AND WATER COMPANY, SO AN ONGOING AND IMPORTANT SERVICE ASPECT

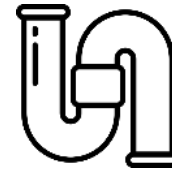
- + Affordability of water bills is an issue for many **low-income households**. For those who took part in this research, it was understood as a **consistent aspect of delivery**.
 - + Water bills tend to be **lower than other bills** but some claim to **watch out for sharp rises/ increases**
 - + And water customers **recognise that those on lower incomes (vulnerable) can be impacted more**
- + Furthermore, many (especially older customers) were **irate about a perceived lack of fairness** – in principal that they might be paying the same as larger households using more water
 - + Different people held **different views on fairness** which were often driven by the way they were charged for their water
 - + Most support **water companies offering choice** of standard/ metered tariff so people are able to choose what's best for them
 - + Although people might complain about fairness, because of relatively low cost of water actually **attaining a water meter can be low on people's priorities**
- + In consequence, **fairness itself would perhaps be difficult to measure**

Affordability and fairness - specifics



Demographics

- + Whilst important to all customers, affordability was a higher priority for people with families whilst older customers (empty nesters) talk about fairness



Link to other service aspects

- + Not spontaneously linked to customer satisfaction



Example metrics

- + No metrics to evaluate
- + Some participants called for comparison measures
 - + How bill compared to customers in other water areas
 - + How bill compared to customers like themselves in same area



Written description

- + The description would benefit from more unpacking regarding affordability and fairness e.g. “Keeping bills low and fair across households by offering choice of fixed tariffs based on household size or providing water meters”

Resilience

Making sure that water and sewerage services keep working through floods, drought and power failures, and planning for what needs to be done to keep services reliable into the future.



Resilience

- High importance / impact
- Some importance / impact
- Lower importance / impact

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

RESILIENCE THAT TOUCHES ON INVESTMENT IN INFRASTRUCTURE OF SOME IMPORTANCE BUT ABILITY TO DEAL WITH SHORT TERM PROBLEMS APPEARS MOST CRITICAL

- + In general, people are **rarely affected by resilience issues**, whilst problems are **very inconvenient they are perceived to be infrequent**
- + Resilience in itself is **not easily comprehended**. Awareness that ‘things going wrong’ and that water companies likely maintain and upgrade the network continually
 - + But **none know how this might look in practice**
- + However, when water customers begin to imagine the **impact of water/ sewage outages on critical (emergency) services** e.g. hospitals/ care homes they **become more engaged**
 - + Indeed, a lack of planning or network incidents could also have **significant health consequences** and could **impact more vulnerable customers**

Resilience - specifics



Demographics

- + Older and more urban groups are more likely to raise resilience-related issues spontaneously



Link to other service aspects

- + Little spontaneous appreciation – difficult for people to think beyond the stimulus



Example metrics

- + No example metrics



Written description

- + Comprehension might be increased by:
 - + Detailing impact of not keeping water/ sewerage services working through problem, talk outcome, not process
 - + Provide top-level specifics to increase comprehension and engagement
- + Separate present and future resilience outcomes

Biodiversity

Water companies are committed to promoting biodiverse environments that are better able to support nature and are more resilient to the impacts of climate change, flooding and drought.



Biodiversity

- High importance / impact
- Some importance / impact
- Lower importance / impact

Overall importance

Type of inconvenience
N/A

Health consequences

Duration and recurrence
N/A

How likely it is to happen
N/A

Visibility to consumer

Water company agency

Immediate vs. wider agenda

BIODIVERSITY OF SOME IMPORTANCE BECAUSE OF RELEVANCE OF WATER WITHIN ENVIRONMENT BUT LACKS RELEVANCE ON A DAY-TO-DAY LEVEL

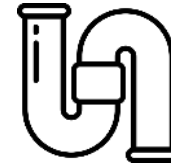
- + Biodiversity was **not felt to affect people's day to day lives** although some able to draw links between increased biodiversity, better climate and impact on public health
- + People struggled to think of what a water company could or should be doing specifically to promote biodiversity and its positive outcomes (resilience to climate change, flooding and drought)
 - + There is a lack of awareness about what biodiversity is and what this means for water companies, **it is difficult to properly assess**
 - + Indeed, people spoke of biodiversity more as the **creation of a long-term plan** with broad benefits **not accountability to any immediate or fixed objectives**

Biodiversity - specifics



Demographics

- + Views on biodiversity were consistent across age groups



Link to other service aspects

- + Most simply felt that biodiversity delivers a better, greener environment
- + Only a minority truly engaged with detail in the description which spoke of role in mitigating severe drought



Example metrics

- + No example metrics
- + Participants felt that water companies could only be measured on what they do to promote biodiversity
 - + However, they had little knowledge of what this might include beyond managing pollution incidents



Written description

- + The description clearly conveys positive outcomes of biodiversity
- + However, for increased engagement it might want to include:
 - + More specific positive day-to-day outcomes e.g. improved habitat for animals and native fauna to thrive
 - + How water companies achieve goals e.g. controlling extraction of water from natural sources, protected areas

Lead pipes

Water companies are working to replace lead pipes and install extra equipment at water treatment works to reduce health risks, particularly for children under 6 and pregnant women.



Lead pipes

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

REPLACEMENT OF LEAD PIPES OF SOME IMPORTANCE, ON ACCOUNT OF HEALTH RISKS CONVEYED, BUT NOT A TOP PRIORITY AMONGST WATER CONSUMERS

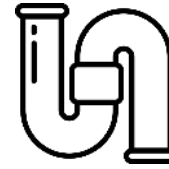
- + **Health consequences of lead pipes were concerning**, especially because they affected children and pregnant women
- + Felt **likely to be true** and a **consistent problem**, there was little surprise that lead pipes remain part of the network
 - + Some aware of positive stories/ media about lead pipes being replaced which reassured them water companies were taking action
 - + Some had experience of replacing lead pipes in their own homes, so able to relate directly to issue
- + But largely, the **replacement of lead pipes within the network was wholly invisible to people**, who would not notice any difference or behave any differently on a day-to-day basis on account of water company action
- + So, whilst upgrading pipes is within a water company's mandate, because it does not impact supply, it is, in reality, **not a top priority**

Lead pipes - specifics



Demographics

- + This was of greatest concern for young families, since they had young children or infants, and worried about the health impacts of drinking water with lead in it



Link to other service aspects

- + Some connection to Resilience – believe that modern materials more likely to deliver greater reliability



Example metrics

- + No example metrics
- + Believe that specifics and statistics around health should be introduced so people can properly assess importance



Written description

- + Description is clear but note that focus on the health impact for children and pregnant women was highly emotive

Hosepipe ban

In the event of a drought, water companies may impose a hosepipe ban lasting up to five months to make sure there is enough water for everyone.

There is a 1 in 100 year chance of a five month hosepipe ban happening in any year.



Hosepipe ban

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs wider agenda

HOSEPIPE BANS THE LEAST IMPORTANT SERVICE ASPECT FOR DOMESTIC CUSTOMERS

- + In the event of a ban, people felt they would **hardly be impacted**
 - + Alternative solutions exist i.e. use of watering cans (garden), bucket and sponge (car) for all but the oldest, least mobile (who are less likely to be carrying out such tasks anyway)

- + A longer hosepipe ban was seen to be more inconvenient than a short one, but people **felt they would adapt** (much in the same way that Covid measures have been adopted)

- + Hosepipe bans **rare and unlikely**
 - + Whilst many had experienced hosepipe bans in their lifetime, most had to stretch back a considerable time
 - + People also **believe water excess vs. shortage a problem in the UK**, if flooding is an indicator

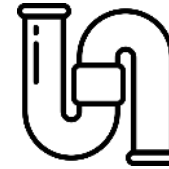
- + Whilst water providers could manage water supply to a certain extent, people believed water shortages were primarily driven by environmental factors **outside of their control** i.e. long periods of hot weather

Hosepipe ban - specifics



Demographics

- + This was consistently, across all age groups and locations, the least important service area
- + This was the least inconvenient and had the least bearing on health



Link to other service aspects

- + Most attributed hosepipe bans to ad hoc periods of hot weather – few felt any real link to other environmental measures



Example metrics

- + The ratio gave people a good idea of low probability
- + However, '1 in 100 year 'chance' felt awkward – people felt that '1 in every 100 years' would be clearer
 - + People do not understand 'chance', it is confusing – people do not comprehend that 'chance' is not a certainty



Written description

- + A hosepipe ban is very well understood, but a ban of up to 5 months doesn't feel relatable where people's experience tends to be in weeks rather than months
- + Water levels in the UK are generally believed to be high, a more considered view of the importance of hosepipe bans would require more educational context

Severe drought measures

In the event of a severe drought, water companies may restrict household water use for up to two months, for up to five hours a day.

You may be provided with a standpipe in the street.



There is a 1 in 200 year chance of a severe drought happening in any year.

Severe drought measures

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs wider agenda

SEVERE DROUGHT SERVICE ASPECTS OF LOW IMPORTANCE DUE TO EXTREMELY LOW PROBABILITY

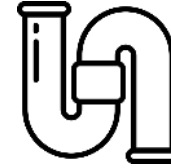
- + People were alarmed by the notion of severe drought and the impact on their lives that it could have (more so than hose-pipe bans)
- + This was seen as **very inconvenient** since consumers' water supply would be significantly limited
 - + There were concerns that this **could impact vulnerable customers** more than others, since they might struggle to access a standpipe or buy bottled water
 - + It might also **impact people's physical and mental wellbeing**
 - + As a consequence, this was of **higher importance than a hosepipe ban**
- + However, people understood the **likelihood of this happening was very low**. This would happen as a result of freak/extreme weather conditions which participants could not conceive of in the UK
- + Whilst water companies should put preventative measures in place, resorting to emergency measures perceived to be **driven by environmental factors wholly outside of their control**

Severe drought measures - specifics



Demographics

- + Across all groups, participants struggled to picture and engage with this scenario
- + People who lived in locations where it rained regularly and water was abundant (Wales, North-East) couldn't imagine this scenario would *ever* affect them



Link to other service aspects

- + Most attributed severe drought measures to significant climate change and extreme weather conditions
- + A minority felt that biodiversity, carbon and saving water could help mitigate the scale of severe drought measures in the future given relevance to climate change



Example metrics

- + The ratio gave people a good idea of low probability
- + However, '1 in 200 year 'chance' felt to be awkward expression – people felt that '1 in every 200 years' would be clearer
 - + People do not understand 'chance', it is confusing – people do not comprehend that 'chance' is not a certainty



Written description

- + The description is clear and precise, and felt like a realistic response in the event of a severe drought

Bathing water quality

The government classifies areas where bathing is expected, as being poor to excellent. The quality of water can be affected by discharge of treated wastewater and sewer overflows when there is heavy rain, in a water company area.

The chance of illness for an Excellent beach is 3 in 100 people, for a Good beach it is between 3 and 8 out of 100 people, and for a sufficient beach it is 8 or more out of 100.

80% of beaches are rated at 'excellent' status.

Out of 33 beaches, the bathing water is rated as 'excellent' at 20, 'good' at 10, and 'sufficient' at 3.



Bathing water quality

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs wider agenda

OF LOW IMPORTANCE, PEOPLE HAVE HIGH LEVELS OF TRUST OF BATHING WATER SAFETY AND EASY TO AVOID WHERE QUESTIONABLE

- + Low bathing water quality was seen as a **relatively minor inconvenience**, because people didn't *need* to be swimming in the sea, and could easily swim elsewhere
- + This said, there was concern around the health consequences of swimming in low quality water, and many expressed surprise that this could happen
 - + But participants rationalised that any **health consequences would most likely be minor** or affect a small numbers of people
- + There were **few known incidents** of beaches being shut because of water quality – **not a problem known to persist**
- + People struggled to connect upstream discharge with poor bathing water quality. Should a real problem exist they felt there would be **more contributory factors** e.g. discharge of detergents, industrial chemicals, oil etc. which were felt to be, to some extent, **outside of a water company's power to police**
- + So whilst important in the short-term to fix, it tended also to be seen as **part of a wider or long-term agenda** e.g. clean up beach campaigns, government interventions to control discharge from shipping

Bathing water - specifics



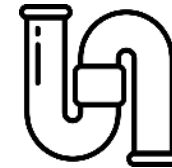
Demographics

- + There was a consistent lack of engagement with this PC across all groups. Customers who rated this more highly tended to:
 - + Live near coastlines or in areas where sea water pollution is a known problem
 - + Have young children (so more sensitive to health risk)
 - + Be part of more specialist groups e.g. regular sea swimmers



Example metrics

- + These measurements felt quite complex, apart from the percentage '80% of beaches are rated as excellent'. After all, the limit of people's evaluation currently is whether beach is 'blue flag' or not! All participants want to know is whether the beach is good for bathing or not.
- + People were alarmed by what felt high rates of illness, even for excellent beaches, whilst the perceived lack of distinction between levels of illness was perplexing



Link to other service aspects

- + Felt less important than other pollution PCs – more concern with water people believed they might end up drinking e.g. river water
- + Struggle to spontaneously connect what happens upstream e.g. storm overflows – believe other factors at play outside of water company activity



Written description

- + The description would benefit by focusing less on a process they have little capacity to understand e.g. sewer overflows and more on the role water companies can positively play to improve bathing water quality within big picture (shipping etc.) of factors.

Storm overflows

When there is high rainfall, storm overflow sewers can discharge sewage into rivers, lakes, the sea etc. to reduce the risk of sewage flooding properties.



Storm overflows

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs wider agenda

PEOPLE DO NOT EXPERIENCE STORM OVERFLOWS DIRECTLY, SPONTANEOUSLY THEY FIND IT DIFFICULT TO LINK TO SEWER FLOODING, SO RANK IT LOWER

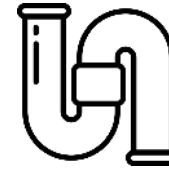
- + Participants **did not feel directly affected** by storm overflows, although some recognised this could have a knock-on impact on health through the environment and contamination of water supply
- + Using a storm overflow was felt to be a **response to severe weather events but not a constant**
- + Indeed, generally, the use of storm overflows was seen as being **outside of water company control** since perceive to be weather, not network, related
- + It was difficult to conceive how storm overflows had an immediate, direct impact on people's lives although people felt they were **important as a means of controlling flooding and maintaining the environment**

Storm overflows - specifics



Demographics

- + All consistently unengaged by storm overflows



Link to other service aspects

- + Sewer flooding appeared high on the list of priorities, and for many, storm overflows seemed a way to reduce the likelihood of homes being flooded – like network resilience
- + However, spontaneously people did not easily connect up 'system' to impact – people only engage with PCs which they feel directly relate to them



Example metrics

- + No example metrics



Written description

- + The description is clear and understood – however, people do simply not engage (for reasons above)

Water pressure

High demand, or an emergency such as a burst in a water main pipe may reduce water pressure in the mains network.



A small number of households across the country are affected.

Water pressure

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda N/A

OVERALL, OF LOWER IMPORTANCE, WHILST IT CAN DIRECTLY AFFECT PEOPLE THEY ARE IN A MINORITY AND IT IS HARDLY DISRUPTIVE

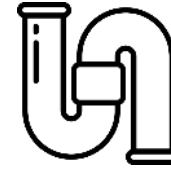
- + Although it was inconvenient, this was **less inconvenient than other service aspects**
 - + If you have low water pressure, at least you have water, whilst there are **no known health downsides**
- + Although a small number of people had experienced long-term water pressure issues, most felt an issue would be **short-term** and the **disruption not problematic**
- + Whilst people could recognize and accept that mains burst could contribute to low pressure, low pressure perceived to be caused by **short-term network issues** or suspect **plumbing inside their own properties** rather than something water company could control

Water pressure - specifics



Demographics

- + Not specific to any demographics or particular area – water pressure issues felt random
- + Can affect businesses that rely on water pressure e.g. hairdressers but only for as long as the problem persists



Link to other service aspects

- + For short-term issues, some were able to connect this with 'network' issues



Example metrics

- + Example metrics ties in with lack of importance/ relevance



Written description

- + The description is clear and understood – however, people simply do not engage (for reasons above)

Carbon

Water companies have a target to meet net zero carbon emission, so not adding to the amount of greenhouse gases in the environment, by 2030.



Carbon

- High importance / impact
- Some importance / impact
- Lower importance / impact

Overall importance
Type of inconvenience N/A
Health consequences
Duration and recurrence N/A
How likely it is to happen N/A
Visibility to consumer
Water company agency
Immediate vs. wider agenda

WHILST PEOPLE UNDERSTAND THAT REDUCING CARBON EMISSIONS KEY TO MANAGING CLIMATE CHANGE NOT AN OBJECTIVE THAT FEELS SPECIFIC TO WATER COMPANIES

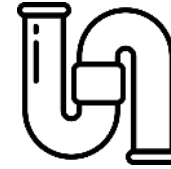
- + Managing carbon emissions should be a **responsibility of any large company**
 - + **Not specific to water companies**, so difficult to rank highly
- + Such an agenda would have **little impact on water consumers in the short-term**, there no immediate health benefits to carbon reduction
 - + In the UK carbon emission is deemed relatively under control for general health
 - + Rather it was more a longer-term initiative, with long term environmental benefits
- + Furthermore, people struggled to conceive how water companies were producing carbon although people accepted that it was inevitable that they might
 - + It **demands an understanding of process that people are resistant to**

Carbon - specifics



Demographics

- + Overall, older families and empty nesters were more enthusiastic about this service aspect



Link to other service aspects

- + Whilst carbon was better understood than biodiversity (direct impact on climate change), biodiversity has more relevance since it feels more closely linked to people's immediate environment



Example metrics

- + No example metrics



Written description

- + Information on current water company carbon emission would be helpful for customers. Without information, they struggled to relate to the net zero goal

Helping households and businesses use less water

Water companies issue water saving advice and free water saving devices to help people use less water to help manage the environmental impact of taking water from rivers/ reservoirs/ underground sources.



Each person uses on average 136L of water per day.

Helping people and businesses use less water

Overall importance
Type of inconvenience
Health consequences N/A
Duration and recurrence N/A
How likely it is to happen N/A
Visibility to consumer
Water company agency
Immediate vs. wider agenda

WHILST FEW WATER CUSTOMERS WOULD ARGUE AGAINST USING WATER RESPONSIBLY, WATER SAVING FEELS PERIPHERAL TO SUPPLY AND PROTECTING THE ENVIRONMENT

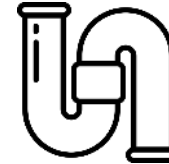
- + It was challenging for many to fully appreciate why this was so important to water companies
 - + Whilst a means of mitigating environmental impact **people struggled to imagine that this might be necessary, in a country where rain seems so abundant**
- + On domestic level people **could not imagine significant gains**, unless en masse adoption, which felt unlikely
- + People typically had **no idea of the amount of water they used**
- + Businesses where water is essential were more conscious of water usage and were more open to steps to reduce it
 - + However, it was **far from a top priority**
- + This said, most recognised that reducing water use was an important part of a **wider, longer-term environmental agenda** as a means of battling climate change

Helping people and businesses use less water - specifics



Demographics

- + Older people with an amount of time on their hands (children left home, not working) slightly more open to water saving, especially if it helped minimize bills
- + However, for the most part something people struggled to imagine fitting into a busy life, so not something they felt water companies should be prioritising



Link to other service aspects

- + In light of water saving, participants were often frustrated by the amount of water lost through leaks



Example metrics

- + The number of litres used per person per household was clearly understood, although for many this felt high and difficult to visualise
 - + An indicator of how quickly water used might assist comprehension e.g. 5 litres of water = 45s of running the tap



Written description

- + The description is clear but people lack knowledge about water scarcity and how quickly water is used at home/ within business premises
- + Relevance might be increased by coupling education and context with direct water company action e.g. leak fixing, controlled extraction from natural sources

Customer satisfaction and customer service

Water companies are measured on overall satisfaction from their customers and on their customer services such as complaints handling and dealing with customer queries.



Customer service and satisfaction

Overall importance
Type of inconvenience
Health consequences N/A
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda N/A

FEW COULD ARGUE AGAINST THE IMPORTANCE OF CUSTOMER SERVICE, BUT IT FELT LIKE A HYGIENE FACTOR, DISTINCT FROM TECHNICAL AREAS OF PERFORMANCE

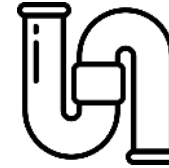
- + People recognised that dealing with their water company’s customer service was often time consuming and inconvenient – but **would hardly impact on** the smooth running of their **day-to-day life**
- + Contacting customer support was seen to be a **one-off and infrequent occurrence**, even if participants felt it was likely to happen to them at one point
- + Its **low frequency** was one of the main factors which set this PC apart as less important than others
- + Managing customer queries and complaints was seen as **core to water company mandate**
 - + They felt it was important for water companies to have **easily accessible customer** support (ideally no chat bots) since people are paying for the service

Customer service & satisfaction - specifics



Demographics

- + Low priority for all – even for businesses, since anticipate that mainly applies to billing issues (which are not a priority for their day-to-day)
- + Older (esp. empty nesters) get more upset where poor customer service, but similarly to others seldom have an issue with water utility



Link to other service aspects

- + Distinct from all other areas of service



Example metrics

- + No example metrics
- + People wanted measurements of customer satisfaction to be rated through various variable – response time, call wait time, expertise of call handler etc.



Written description

- + Description is clear and captures key issues of complaints handling and dealing with customer queries
- + Customer satisfaction itself feels vague – complaints handling more easily linked to performance metrics than general measure of satisfaction

Water restrictions: non essential use ban

This would be a ban on businesses using water for non-essential reasons, like to water plants, cleaning vehicles, cleaning non-domestic premises, cleaning windows.



Non-essential use ban (businesses only)

Overall importance
Type of inconvenience
Health consequences
Duration and recurrence
How likely it is to happen
Visibility to consumer
Water company agency
Immediate vs. wider agenda

LESS IMPORTANT TO BUSINESSES, ESSENTIAL OUTPUT NOT AFFECTED

- + This was seen by businesses as **only slightly inconvenient** – but this was only a minor as it did not impact their ability to work
- + Water-essential businesses would still be able to use water for primary purposes
- + Water-non-essential businesses felt the impacts would be very minor, especially as some were working from home
 - + Some were willing to take more steps to help in a drought situation
- + **NB: sample was very small in size and most business SMEs rather than large organisations with supply chains and large staff numbers**

Research implications

.YONDER

Ofwat draft common PC list

.YONDER

Implications – Ofwat draft common PC list

PC / service aspect area	Importance (lower / middle / high)	Commentary	Description insights	Measurement insights
Water supply interruption	High	<ul style="list-style-type: none"> The fundamental expectation of service. 	<ul style="list-style-type: none"> Currently descriptions works very well as indicative of impact and outcome/ response (3-6 hours inc.) People know how they might be affected. 	<ul style="list-style-type: none"> Timeframe is appropriate. Interest in planned vs. unplanned interruption ratio as indicator of performance.
Appearance, taste and smell of tap water	High	<ul style="list-style-type: none"> Core expectation that water should be clean and safe. 	<ul style="list-style-type: none"> Description works well. Timeframe is relatable and indicates impact. However, 'smell' not required. 	<ul style="list-style-type: none"> People ambivalent about complaints, timeframe a better indicator of impact. But ratio (1 in 300) clear and accurate.
Internal sewer flooding	High	<ul style="list-style-type: none"> Highly important because of high degree of impact to people's lives e.g. health, potential move-out. 	<ul style="list-style-type: none"> Description is clear regardless of scale (back up on to shower tray vs. carpets/ curtains damaged), violation level is fairly consistent. 	<ul style="list-style-type: none"> People want to know response time/ duration in order to understand impact (before incidence). Ratios clear and accurate, singular numbers engaging but emotive so do not necessarily give accurate presentation of problem.
External sewer flooding	High	<ul style="list-style-type: none"> Important because of unpleasant impact. 	<ul style="list-style-type: none"> Description is clear but clarity required to indicate that within property boundary Sewer flooding on road/ pavement less impactful. 	
Do not drink notice	High	<ul style="list-style-type: none"> Important because linked to significant health impact. But emotive natures belies probability. 	<ul style="list-style-type: none"> Description is very clear but certain period of time is vague (and people tend to inflate duration). 	<ul style="list-style-type: none"> Lack of measurement stats may give an increased importance to Do not Drink. Require stats for balanced view.

Implications – Ofwat draft common PC list

PC / service aspect area	Importance (lower / middle / high)	Commentary	Description insights	Measurement insights
Boil water notice	Mid	<ul style="list-style-type: none"> Important because linked to health impact but modified by short duration of inconvenience. 	<ul style="list-style-type: none"> Description clear – describes action, outcome and timeframe. But reference to e-coli highly emotive and potentially raises importance. 	<ul style="list-style-type: none"> Lack of measurement stats may give an increased importance to Boil Water. Require stats for balanced view.
Leakage	Mid	<ul style="list-style-type: none"> Leaks are core mandate of water company but rarely impact on day-to-day. 	<ul style="list-style-type: none"> Description works very well - people already understand problem and impact on experience. However, perceived that 'network' leaks, clarifying that leak fixing within homes a commitment might raise importance. 	<ul style="list-style-type: none"> Stats clear and relatable. Litres lost in context of household and % relatively large number in context of network.
Pollution incidents	Mid	<ul style="list-style-type: none"> Managing pollution incidents very important as perceived to relate to malpractice. But low awareness/ knowledge impacts importance. 	<ul style="list-style-type: none"> Description needs to underline how water company spillages might arise so they are not coupled with industrial malpractice. 	<ul style="list-style-type: none"> Multiple categories are confusing. Measurement needs to focus on 1 relevant level only (category 3 is something that people don't relate to/ know much about).
River water quality	Mid	<ul style="list-style-type: none"> Quality of river water central to environment and connected to supply. 	<ul style="list-style-type: none"> Description clearly focussed on positive outcome (good river water) that water customers understand. 'Less than good' alarming, suggest to simply talk about 'good' river miles. 	<ul style="list-style-type: none"> Ratio is appropriate but not relatable. 3000 miles of rivers does not feel local, specific enough. Recommend 1: x ratio. Miles more relatable than KM.
Biodiversity	Mid	<ul style="list-style-type: none"> Becomes important as a proxy for environmental policy but ill understood. 	<ul style="list-style-type: none"> Description and presentation would do well to focus on specific water company actions and impact on environment now (as well as in the future) e.g. Protecting Native Species. 	

Implications – Ofwat draft common PC list

PC / service aspect area	Importance (low / middle / high)	Commentary	Description insights	Measurement insights
Storm overflows	Lower	<ul style="list-style-type: none"> Lower importance because people do not perceive they experience them directly. Difficult for people to equate with sewer flooding prevention around property. Reframe as outcome focused e.g. Flood Prevention or Sewer flooding. 		
Bathing water quality	Lower	<ul style="list-style-type: none"> Lower importance as avoidable and not felt to be a real problem. Only consider including at local/ regional level (and where known issues). 	<ul style="list-style-type: none"> Description is clear but people do not easily connect to water company activity that happens upstream. Focussing on positive action close to bathing area e.g. monitor water released to maintain blue flag status, may increase engagement. 	<ul style="list-style-type: none"> Range of stats confusing and alarming (illness appears possible whether excellent or sufficient). People seek simple indicators e.g. % Excellent only.
Carbon	Lower	<ul style="list-style-type: none"> Lower importance as not well understood and difficult to relate to what water companies are doing. 	<ul style="list-style-type: none"> Description would need to provide more information. 	<ul style="list-style-type: none"> Metrics would need to illustrate current and goal carbon emissions.
Customer satisfaction *	Lower	<ul style="list-style-type: none"> It felt important that companies provided good customer service, but most rarely – if ever – require it. 	<ul style="list-style-type: none"> Description was clear and simple. People rarely thought in terms of satisfaction, complaints handling felt more tangible and would impact them when they had an issue. 	<ul style="list-style-type: none"> No metrics tested. Desire to capture water company response e.g. call wait time, response time etc.
Hose pipe ban	Lower	<ul style="list-style-type: none"> Lower importance since has little effect on people – a reasonable expectation during periods of drought. Low relevance as water levels in the UK perceived to be high. 	<ul style="list-style-type: none"> Clear and relatable – most have heard of hose pipe bans. The duration of 5 months felt unrelatable as people mainly think of hose pipe being shorter and lasting a couple of weeks. 	<ul style="list-style-type: none"> Ratio made sense to people but wording was confusing.
Severe drought	Lower	<ul style="list-style-type: none"> Even though this could have significant personal impact, it was of lower importance because it seemed so unlikely to happen. 	<ul style="list-style-type: none"> Clear and precise – explained the effects of drought restrictions in a practical manner. 	
Non-essential use ban for businesses	Lower	<ul style="list-style-type: none"> Lower importance – does not impact day to day business function; a non essential ban was indeed felt to be non-essential! NB: small sample size 		

Ofwat potential PC list

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Implications – Ofwat potential PC list

PC / service aspect area	Importance (low / middle / high)	Commentary	Description insights	Measurement insights
Speed of response	High	<ul style="list-style-type: none"> • Very important – customers are tolerant of issues that are quickly solved, but not if the water company is showing little effort to fix issues. • But not a standalone measure, people expect response to be included as part of other service aspects. 	<ul style="list-style-type: none"> • No description tested. 	<ul style="list-style-type: none"> • No metrics tested.
Water company reputation	Mid	<ul style="list-style-type: none"> • Dependent on region – consider developing PC where reputation may be an issue e.g.. Southern Water pollution (July 2021), but generally not high on people’s lists. 	<ul style="list-style-type: none"> • No description tested. 	<ul style="list-style-type: none"> • No metrics tested.
Trust	Mid	<ul style="list-style-type: none"> • Ultimately customers place trust in their water company to do things correctly e.g. monitoring chemical levels in water supply. So, while important, it is something of an expected hygiene factor. 	<ul style="list-style-type: none"> • No description tested. 	<ul style="list-style-type: none"> • No metrics tested.
Affordability (level of bill or bill increase) *	Mid	<ul style="list-style-type: none"> • People can be alert to increases or fluctuations but less impact than in other utilities. 	<ul style="list-style-type: none"> • Description clear but would benefit from unpacking role of meters e.g. “keeping bills low and fair by offering choice of fixed tariffs or providing water meters”. 	<ul style="list-style-type: none"> • No metrics tested.
Affordability (help for households on low incomes)*	Mid	<ul style="list-style-type: none"> • Important since people wanted to know water companies would support more vulnerable households. 		
Metering*	Mid	<ul style="list-style-type: none"> • Available choice of metering or fixed tariffs critical to deliver fairness. 		
Water extraction	Mid	<ul style="list-style-type: none"> • Can be considered as part of biodiversity and resilience, as well as drought planning. • But rarely discussed spontaneously, needs to be part of a service aspect that is framed as a positive outcome e.g. protecting local ecosystems and plant / animal life. 	<ul style="list-style-type: none"> • No description tested. 	<ul style="list-style-type: none"> • No metrics tested.

Implications – Ofwat potential PC list

PC / service aspect area	Importance (lower / middle / high)	Commentary	Description insights	Measurement insights
Payment options	Lower	<ul style="list-style-type: none"> No spontaneous mention. 	<ul style="list-style-type: none"> No description tested. 	<ul style="list-style-type: none"> No metrics tested.
Smart metering	Lower	<ul style="list-style-type: none"> No spontaneous mention. 	<ul style="list-style-type: none"> No description tested. 	<ul style="list-style-type: none"> No metrics tested.
Water pressure *	Lower	<ul style="list-style-type: none"> Although inconvenient, this was of little importance because it happens occasionally and affects few people. Only consider including where known issues. 	<ul style="list-style-type: none"> Clear and relatable. 	<ul style="list-style-type: none"> Measurement confirmed issue being considered of lower importance.
Mains repairs	Lower	<ul style="list-style-type: none"> Not tested, and only occasionally raised through conversations around resilience and roadworks. Low on people's radar. 	<ul style="list-style-type: none"> No description tested. 	<ul style="list-style-type: none"> No metrics tested.
Value for money	Lower	<ul style="list-style-type: none"> Customers want to know whether they are paying the 'right' amount for their water. But this is less about value, more about not being overcharged. 	<ul style="list-style-type: none"> No description tested. 	<ul style="list-style-type: none"> No metrics tested.
Education	Lower	<ul style="list-style-type: none"> Mentioned but lacks obvious return for water company/ consumers (difficult to conceive of return unless mass communication effort). 	<ul style="list-style-type: none"> No description tested. 	<ul style="list-style-type: none"> No metrics tested.
Community level engagement	Lower		<ul style="list-style-type: none"> No description tested 	<ul style="list-style-type: none"> No metrics tested
Helping businesses save water*	Lower	<ul style="list-style-type: none"> Although saving water was important to many, other activities felt more impactful on the environment. People felt responsibility extended beyond water companies, i.e. also government mandate. 	<ul style="list-style-type: none"> Description would need to educate on water scarcity and show what water companies are doing e.g. by way of leaks to increase engagement and credibility. 	<ul style="list-style-type: none"> People would need to be able to visualise consumption (and wastage) better e.g. how much water is used by leaving the tap running.

Implications – other consumer generated additions

PC / service aspect area	Importance (lower / middle / high)	Commentary	Description insights	Measurement insights
Resilience	Mid	<ul style="list-style-type: none"> Resilience now important when impact of outages understood. Future Resilience is expected but difficult to imagine in detail. Measuring resilience would be better facilitated by dividing resilience now and in the future. 	<ul style="list-style-type: none"> Resilience now best explained by presenting outcome of resilience e.g. Emergency Contingency for critical services, in the event of power failures. Resilience in the future should also be outcome focussed e.g. Flood prevention planning. 	

.YONDER