How we prepare for and respond to droughts

Yorkshire Water

Published May 2026

How to view this document

Contents page

Our contents page links to every section within this document. Clicking on a specific section will instantly take you to it.

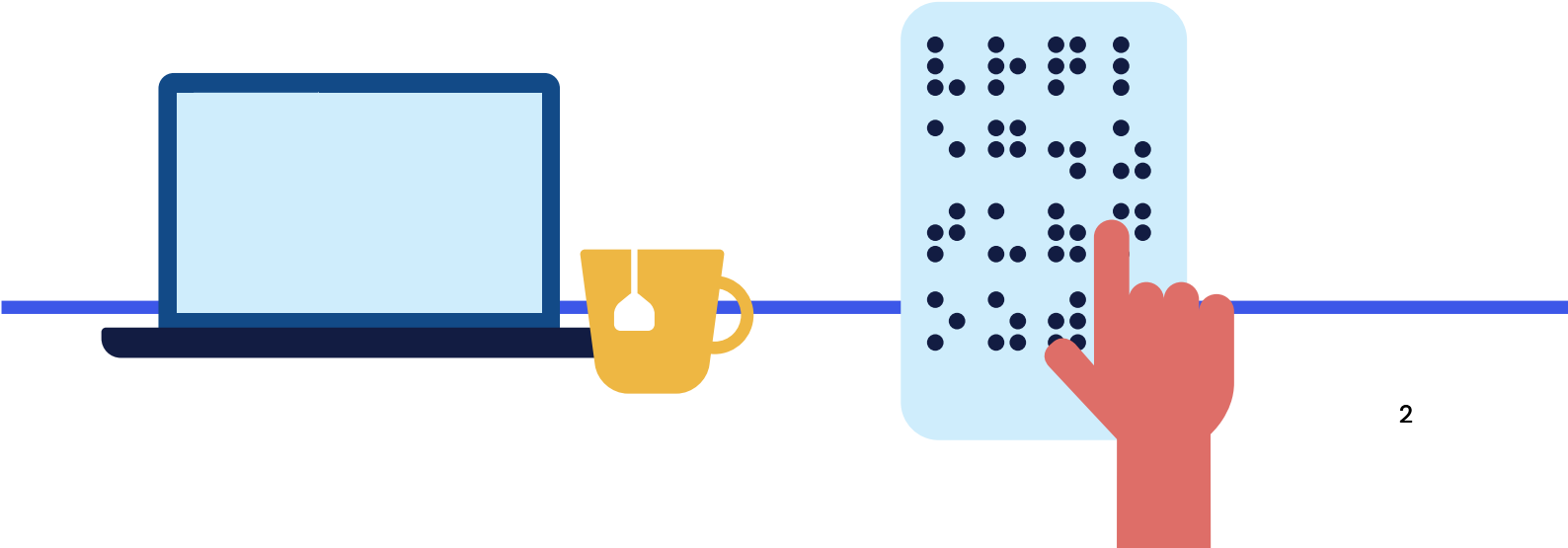
1. Click on the contents button to return to the contents page.
2. This button takes you to the previous page.
3. This button takes you to the next page.

There are also many other clickable links within this document which we've made easy to spot by underlining and **highlighting** them in blue.

Accessibility matters. It's really important that everyone can navigate our Drought summary plan.

To help with this, we've taken steps to make sure this document supports accessibility needs:

- Screen readers will recite content in a logical order, as well as spotting headers and using different text for images.
- Compatible with text-to-speech programmes and Braille displays.
- Easy navigation with contents table and bookmarked links.
- Simple text structure with clear headings, paragraphs and tables.
- Comfortable colour contrasts.



Contents

We've created colour-coded sections to help you to navigate this report easily. Just click on the section you are interested in on the contents page, and it will navigate you to that section.

The report is structured as follows:

Overview

Water is essential at home, at work and for the environment. We supply water to around 5.5 million people and 140,000 businesses every day. Our Drought Plan explains what we'll do before, during and after prolonged dry weather to keep water flowing and protect rivers and wildlife.

It aligns with our long-term Water Resource Management Plan (WRMP24), the Water Resources North (WReN) Regional Plan, statutory requirements, and the Environment Agency's 2025 Drought Plan Guidance.

This document provides a summary of our Drought Plan 2027. The full plan, appendices and supporting environmental documents can be viewed here.

Have your say on this draft plan

This non-technical summary supports our draft Drought Plan 2027 consultation. You can submit comments by email to Defra at **Water.resources@defra.gov.uk** by the deadline stated in the consultation notice. We'll publish a Statement of Response and update the plan accordingly.

What is a drought?

A drought is a naturally occurring, prolonged period of dry weather that can last from several weeks to several years. Droughts build up over months, not just during a hot spell. When there's not enough rainfall to replenish water supplies in rivers, reservoirs and underground sources, we enter a drought. Every drought is different and the duration, intensity and impact on customers and the environment will depend on rainfall, temperatures, and time of year.

What this plan means for you

A Drought Plan sets out the actions we'll take before, during, and after dry weather and droughts: how we monitor conditions, when we act, how we prioritise demand reduction ahead of supply measures, and how we'll communicate clearly with households, businesses, and other interested parties at each stage.

During most dry periods our supplies are sufficient to meet demand, and customers are not directly impacted. During droughts, we may need to take extra steps to make sure there is enough water for homes, businesses and essential services, while protecting the environment.

Our approach is step-by-step. We start with actions that help save water without formal restrictions, like enhanced water-saving advice, increased leakage reduction activity and operational changes to make the best use of our supply network. If dry conditions continue, we may need to introduce temporary restrictions on certain water using activities and apply for legal permissions to make short-term changes to how we manage water resources. More severe emergency actions that restrict water supplied to homes and businesses are a last resort and have never been implemented in our region.

Throughout a drought, we'll keep you updated on what's happening, what we're doing, and what we're asking you to do.

Links to our other water resource plans

Our Drought Plan is one of several plans we use for managing short- and long-term risks to meeting our customers' demand for water.

Our Water Resources Management Plan 2024 (WRMP24) sets out how we'll invest over the long-term to meet increasing demand, offset climate change impacts and reduce the water we take from rivers and groundwater sources where there could be a risk to the environment. You can find our WRMP24 online here.

Water Resources North - We're part of Water Resources North (WReN), alongside Northumbrian Water and Hartlepool Water (part of Anglian Water). During drought, WReN provides a forum to share data, align messaging where appropriate, and coordinate across sectors such as agriculture, navigation and energy. You can find our WReN Regional Plan here.

Our **Emergency Drought Plan** is an internal document that would only be needed if we reached level 4 drought. Unlike drought plans, there is no statutory requirement to publish emergency drought plans.

Our supply area

We provide an average of 1.3 billion litres of water to over five million domestic and 140,000 business customers each day. During dry weather, demand for water increases and some days we see water use rise by 15 per cent.

For planning purposes, our region is divided into two water resource zones – **the Grid Surface Water Zone** and the **East Surface Water Zone**. Over 99% of our customers are supplied by our grid zone, which has high interconnectivity, allowing water to be taken from a range of water sources and used flexibly to meet customer demand.

Across our region, we operate more than 100 reservoirs. Much of this water is treated and supplied to customers. We also manage releases from our reservoirs into streams and rivers. These releases are part of legal agreements we hold with the Environment Agency that allow us to impound water. This means that during dry weather, the environment and downstream water users have a reliable flow, even when there is no rainfall.

As well as reservoirs, we're permitted to take water from 9 rivers and 50 groundwater sources each day. The water we take from all our sources is transferred to one of 50 water treatment works, where it's filtered and treated so that it's safe for drinking. It's then transferred to customers via 32,000km of pipelines.

Drought levels and triggers

The Environment Agency define drought levels that increase in severity. We use these levels to assess drought conditions in our supply area.

Normal (non-drought) conditions

Our reservoirs are at levels that are average for the time of year, we may experience short summer heat waves.

Level 1: Prolonged dry weather

We're experiencing below than average rainfall and our reservoir levels are lower than they are in most years.

Level 2: Drought

Rainfall, temperatures and low reservoir levels are indicating that we're in drought.

Level 3a: Drought

The dry weather continues for a prolonged period, and reservoirs are notably low.

Level 3b: Severe drought

Reservoirs are exceptionally low and there is no indication of the situation recovering soon.

Level 4: Emergency

Reservoir levels reach unprecedented low levels.

Recovering drought

Rainfall levels are sufficient for reservoir storage to begin replenishing, and forecasts indicate that we'll soon return to normal conditions.

We often experience dry weather that doesn't lead to a drought and not all droughts progress to each level. Historically, we've never reached level 4 in Yorkshire. Our Drought Plan provides information on drought levels up to level 3b, at which point we'd transition to our Emergency Drought Plan.

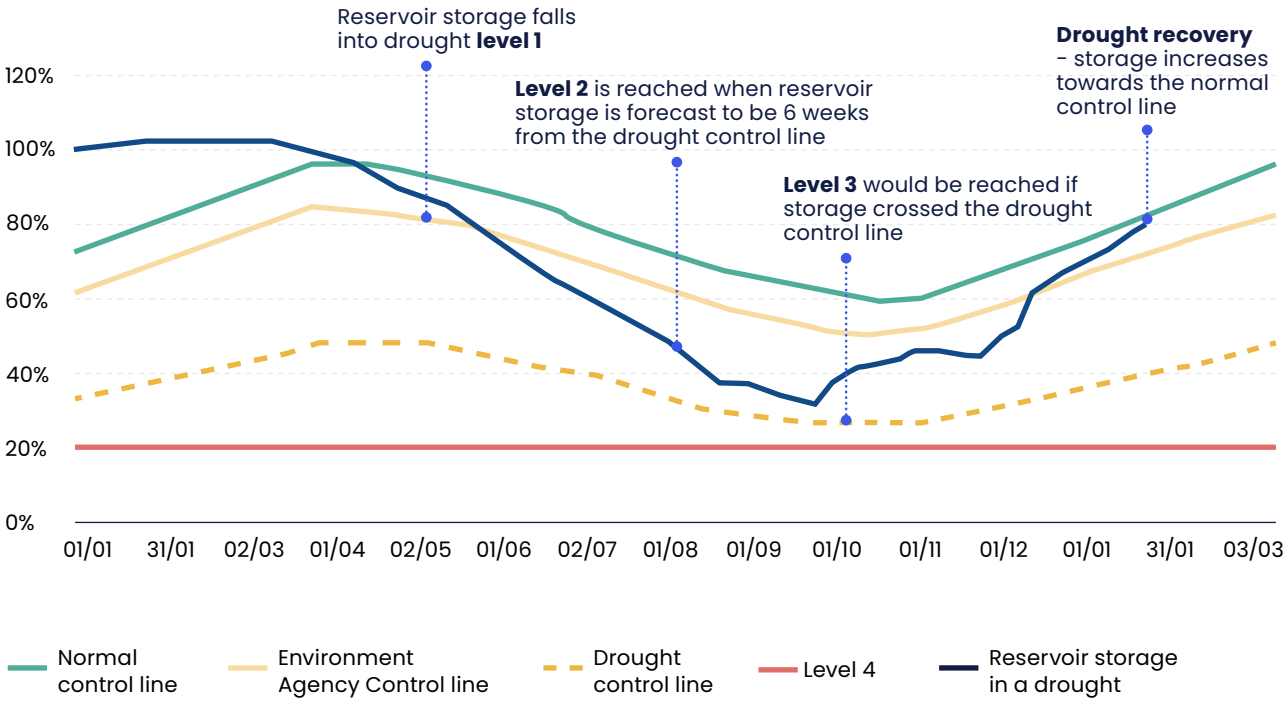
Drought triggers

It's normal for our reservoir stock levels to reduce over the summer when there's typically less rainfall and hotter, drier weather. In most years, they replenish in autumn and winter and are full when we go into spring. In drought years, they may not replenish, or levels may reduce more rapidly over the summer months.

We compare our stocks against three **reservoir control lines.** These show whether current levels are typical for the time of year or below average. If levels fall below the drought trigger line, a drought is declared and predefined actions are implemented:

- **Non-drought** – reservoir stocks are close to the **Normal Control Line**.
- **Level 1** – reservoir stocks fall below the **Environment Agency Control Line**.
- **Level 2** – reservoir stocks are forecast to be **six weeks from crossing the Drought Control Line**.
- **Level 3a** – reservoir stocks reach the **Drought Control Line**.
- **Level 3b** – reservoir stocks are forecast to be **four weeks from reaching 20 per cent of storage**.
- **Level 4** – reservoir stocks **reach 20 percent of storage**.

The combined volume of water stored in our reservoirs is presented in the diagram below showing an example of when drought levels are triggered.



Water use and weather monitoring

We use a range of data to assess the risk to water supply at the onset, during and after a drought. Data we use is available on our website Water Situation Report

Reservoirs (how much water do we have)

We monitor our reservoirs both individually and in combination. They're organised into five geographical groups, reflecting the fact that different parts of the region can be affected differently by low rainfall. This approach allows us to redirect supplies across our grid system and to make decisions on drought actions.

The 5 reservoir groups are:

- **North**
- **North West**
- **South**
- **South West**
- **East**

Demand and rainfall indicators (how much is being used, and how much is coming in)

- We track **customer demand** to understand when people are using more water than usual. It's normal for demand to show summer spikes but heatwaves prolong periods of high demand which increases the rate of reservoir levels declining.
- We track **rainfall** and other weather factors including temperature and soil moisture deficit. If we have less rain than expected, our reservoir stocks and other water sources will be depleted.
- We model repeats of **historical droughts** to assess the risks of reaching trigger levels.
- **Weather forecasts** are also key to our decision making as they indicate if the situation will improve or get worse in the short term.

Drought actions, what do they mean?

We keep a close eye on how much water we have stored in our reservoirs and how quickly it's being used up. If stocks start to decline more than usual for the time of year, we start to take action ahead of a drought fully developing.

We have a range of drought options that we consider implementing as we move from normal conditions through to level 1, 2, 3 and 4.

Operational optimisation - in most years, we experience periods of dry weather, and we manage this by making operational changes to balance reservoir levels and avoid any area's supplies reducing disproportionately to the others. If reservoirs fall below the normal control line, its common practice for us to prioritise the use of rivers and groundwater sources above the use of reservoirs as much as possible.

Appeals for constraint – we have an "always on" approach to water saving communications and will promote water efficiency and offer free devices regardless of the weather. In drought we enhance the tone and frequency of messaging.

Leakage and pressure reduction – we manage leakage and water pressure each year and we have objectives to achieve a year-on-year reduction in daily average leakage. During droughts, dry ground leads to increased leakage and we'll increase leakage control activity to counteract these breakouts. We'll also reduce pressure on our network within permitted minimum limits.

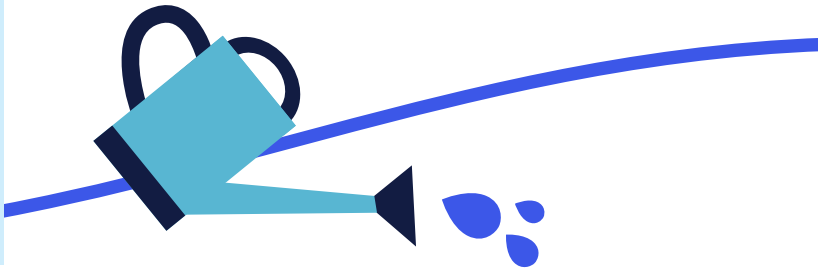
Water use restrictions – in some droughts we may need to limit water use to slow the rate of decline in our reservoirs until we receive sufficient rainfall for them to recover. These include:

- **Temporary use ban** – we can restrict specific household usage such as watering your garden, washing your car or filling a pool with a hosepipe.
- **Non-essential use ban** - requires Defra to grant an ordinary drought order that allows us to restrict specific non-household activities such as operating a mechanical vehicle washer, cleaning non-domestic premises, or watering outdoor plants at a commercial location. We would only impose if there was a clear benefit to do so.
- **Emergency restrictions** – requires Defra to grant an emergency drought order. These can impose rota cuts (where customers' access to water is limited to certain times of day), standpipes (full disconnection of mains water, with access to water provided at a communal location), or significant pressure reductions.

Water is precious – please always use it wisely

Everyone can help by using less water at home and at work. Find practical tips and free resources on our **Save Water** page.

Visit **here** for more details.



Our levels of service set expectations for how often restrictions might occur on average:

- **Temporary use bans:** no more than 1 in 25 years.
- **Non-essential use bans/supply-side permits & orders:** 1 in 50 years moving to 1 in 80 years from 2028.
- **Level 4 emergency measures:** 1 in 100 years, improving to 1 in 200 years in 2024 and 1 in 500 years by 2040.

Increasing supply – we may need to find ways to increase water supply availability or to conserve water in our reservoirs for longer. We can only do this if we're granted drought permits by the Environment Agency or ordinary drought orders by Defra.

- **Reduce reservoir releases** – this conserves water in reservoirs for longer, which means it's available later in the year if the drought continues for both supply and maintaining a release into the environment at a lower volume.
- **River abstractions** – these options temporarily alter constraints on our river abstraction permissions to allow us to take water at lower flow levels or take a higher annual volume than usual.

Extreme drought options – if we reach level 3b we have more extreme demand reduction and supply options available. We'll implement those that will have the most benefit.

- Examples of extreme demand reduction options include a national demand reduction campaign to reduce water use to very low levels or extreme pressure management.
- Extreme supply option examples include new river abstractions and pipes to connect to treatment works and tankering of supplies. These require additional investigations and permissions such as environmental assessments and planning consents.

Drought actions: what we do first, and how actions escalate

Our drought action sequencing prioritises demand-reduction ahead of options to increase supply. This helps us to limit the impact of drought on the environment. Actions are implemented successively and accumulatively as a drought progresses through the levels.

Normal

- No drought actions in place.
- Business as usual operational activities.
- Promotion of water efficiency as part of our annual campaign.

Level 1

- Operational changes to manage supplies and conserve reservoir stocks.
- Notify customers of the dry weather and additional need to save water.
- Enhance leakage control and reduce water pressure.

Level 2

- In summer months, a temporary use ban will be in pace to limit household usage.
- In winter, drought order / permit actions to reduce compensation flows or increase river abstractions when the environmental impacts will be minor.

Level 3a

- In summer, drought order / permit actions are level 3a as there is a potential for greater impacts on the environment.
- Consider a non-essential use ban to restrict non-household use. We'd only impose if there was a clear benefit to do so.

Level 3b

- Implement extreme drought actions to reduce demand further.
- Initiate actions to introduce new supplies.

Level 4

- Take emergency actions permitted under an emergency drought order.

Drought recovery

When the situation returns to normal conditions, we revoke actions in reverse order and only if our data shows the risk of a return to drought is extremely low. We use the same indicators we use during drought (including reservoir levels and forecasts) to help decide when to lift measures. However, we often experience heavy rainfall following a drought meaning reservoirs refill extremely quickly and all actions may be lifted in quick succession.

Environmental assessment

Why we assess

Actions we take to reduce reservoir releases or increaser river abstraction during droughts have potential environmental impacts. We carry out assessments and have an environmental monitoring plan to check conditions before, during and after the action. The plan is also screened under the Habitats Regulations and includes a Strategic Environmental Assessment (SEA), ensuring the environment is considered throughout.

What we assess

For each potential action, we prepare an Environmental Assessment Report that looks at:

Habitats and species in the river or reservoir downstream (such as fish, invertebrates, protected species and designated sites).

Flows and levels (how a temporary change could affect river depth, river flows, wetted area, and habitat connectivity).

Water quality risks (total ammonia, phosphate and oxygen content within the rivers).

Cumulative effects (what else is happening in the area, including actions by other parties).

Duration and timing (short, time-limited changes, avoiding sensitive seasons like when fish are spawning where possible).

We screen all drought options under the Habitats Regulations and where a protected site could be affected we follow guidance from Natural England. The Drought Plan also goes through a Strategic Environmental Assessment process, so cumulative impacts are assessed not just each option in isolation.

Communications strategy

We communicate the drought situation and request customers take action to reduce their water use throughout a drought, from onset through to recovery. We use an agile approach using multiple media channels and scaling communications up or down depending on how the drought develops.

We engage regularly with the Environment Agency, as well as with retailers and new appointments and variations operating in our area. Other key stakeholders, such as Natural England, river trusts, agricultural representatives, anglers and recreational groups, will be kept informed and formally consulted where appropriate, depending on which drought actions are implemented.

We make customers aware of any need for water use restrictions or drought permit/order applications through media channels and formal notices published in newspapers.

We communicate the end of restrictions using the same channels we used to announce them and keep promoting water saving as part of our normal activities.

New appointments and variations are companies that provide a water and/or sewerage service. This is usually new developments.

Water retailers are companies who supply water to non-domestic customers and either purchase wholesale water to supply non-domestic premises or introduce water into the supply system for supplying its own customers.

How businesses are affected by restrictions

- A temporary use ban is introduced primarily to reduce domestic use but some restrictions apply to commercial water users.
- A non-essential use ban impacts on commercial water users.

We notify retailers and new appointments and variations operating in our area in advance of imposing any restrictions.

Supporting customers in vulnerable circumstances

We consider the needs of customers in vulnerable circumstances when managing drought. For example, some customers may have medical or health conditions that mean they need a reliable water supply. Many customers are exempt from water restrictions, and we'll make this information available ahead of imposing restrictions.

If you rely on a private water supply - Some households and businesses use private water supplies and are not a Yorkshire Water customer. This means they should have their own contingency plans for dry weather but may seek advice from their local authority or Yorkshire Water. In certain circumstances, where a local authority considers there to be a danger to human health, bottled water may be provided for a specified period.

What has changed since our previous plan?

We review and update our Drought Plan every five years as a minimum. Since we published our Drought Plan 2022, we have experienced drought in 2022 and 2025. Both droughts reached level 3a and tested our drought plan showing it to be effective. The 2025 drought highlighted some areas for improvement and work to identify solutions is still ongoing.

For our draft Drought Plan 2027, we've made some minor changes to our drought action triggers to shorten the time between imposing a temporary use ban and submitting drought permit and order applications, and we've reviewed and updated our extreme drought options. We'll continue to assess where further changes may be needed and make updates to our revised draft Drought Plan 2027. This includes further updates to drought triggers, enhancing our non-household strategy and exploring more demand reduction options.

We review and update our Drought Plan every five years as a minimum.

Thank you for reading

Yorkshire Water Services Limited,
Western House, Halifax Road, Bradford, BD6 2SZ.
Registered in England and Wales No.02366682

yorkshirewater.com

YorkshireWater