Monthly water situation report: Midlands

1 Summary - August 2025

Please see Section 7.3 for a map detailing the Midlands regional coverage of this report.

Rainfall - In August, all Midlands hydrological catchments received less than 50% of their long term average (LTA) rainfall. The amount of rainfall received across the region ranged between notably low to exceptionally low rainfall amounts relative to the LTA.

Soil moisture deficit - Soil moisture deficit (SMD) across the Midlands has increased in August from the previous month, meaning soils have become drier. By the end of the month, soils remained drier than usual for the time of year.

River flows – In August, the mean monthly flows were exceptionally low at nine sites, notably low at seven sites and below normal at four sites relative to their LTA. The exceptionally low flows occurred in the middle and Lower Severn, Teme, Lugg, Wye, Frome (Glocs), Dove, Derwent and Torne catchments. No data is available for Wedderburn Bridge.

Groundwater levels - As of the end of August all of the Midlands groundwater sites recorded normal or higher groundwater levels compared to the LTA with the exception of Southards Lane which recoded a below normal level.

Reservoir stocks - By the end of August, all Midlands reservoirs had below average storage compared to the LTA, with Charnwood and Derwent reservoirs below 30% and 40% storage respectively.

1.1 Rainfall

In August, all Midlands hydrological catchments received less than 50% of their LTA rainfall. Six hydrological catchments received exceptionally low rainfall totals ranging from 20% to 34% of the LTA. These were Tame, Soar, Avon, the Upper Trent, Shropshire Plains, and Mid Severn.

The remaining 6 hydrological catchments, which were predominantly spread across at the north-eastern and south-western patches of the Midlands received notably low rainfall totals ranging from 24% to 44% of the LTA. These were the Lower Trent, Derwent, Dove, Welsh Mountains, Lower Wye and Lower Severn.

Over the last 3 months, seven of the catchments received exceptionally low rainfall total ranging from 48% to 54% of their 3 month LTA. These areas of exceptionally low rainfall included most of the River Severn and upper to middle Trent. A further 4 catchments received notably low rainfall totals, these occurred in the north-eastern Midlands catchments of

Derwent, Dove, Lower Trent and Soar. The Welsh Mountains received below normal rainfall totals at 73% of 3 month LTA. Over the last 6 months, every single hydrological catchment in the Midlands received exceptionally low cumulative rainfall totals. This ranged from 41% to 58% of their 6 month LTA. With the exception of the Welsh Mountains, catchments in the Midlands received less than LTA over the last 6 months.

Looking at the last 12 months' rainfall total combined, rainfall has been normal for the majority of the catchments in the Midlands. Four hydrological catchments recorded below normal cumulative rainfall totals between 81% and 87% of the 12 month LTA. These were the Welsh Mountains, Mid Severn, Dove and Derwent.

1.2 Soil moisture deficit and recharge

SMD across the Midlands in August has slightly increased since last month, meaning that soils have become drier. With the exception of the Mid Severn, all hydrological catchments recorded a SMD between 101mm to 130mm. The Mid Severn recorded a SMD value between 131mm and 160mm meaning soils were slightly drier than the other catchments in the Midlands.

By the end of August, SMD values were much larger than their respective LTA for the time of year, meaning soils are drier than expected for the time of year.

1.3 River flows

In August, 9 sites recorded exceptionally low monthly mean flows ranging from 12% to 47% of the LTA. These were Whatstandwell, Tenbury, Butts Bridge, Marston On Dove, Bewdley, Deerhurst, Redbrook, Auckley and Ebley Mill, with the majority in the western half of the Midlands. Seven sites recorded notably low monthly mean flows. These were North Muskham, Kegworth, Yoxall, Clifton Hall, Walcot, Llanyblodwel, and Great Bridgeford. Four more sites recorded below normal monthly mean flows. These were Worksop, Derby St Marys, Stareton and Evesham.

Wedderburn Bridge has been showing unreliable data from September 2024 onwards, therefore, data has been removed from this report. Due to current issues with recording at low flows affecting Deerhurst, data for Haw Bridge was used in place of Deerhurst.

1.4 Groundwater levels

At the end of August, all of the Midlands groundwater sites except Southards Lane recorded normal or higher groundwater level bands compared to the LTA. Southards Lane recorded below normal groundwater levels. Rider Point, Four Crosses, Ram Hall, St Mary's Church and Anthonys Cross recorded normal groundwater levels relative to the LTA. A further 2 sites, Weir Farm and Crossley Hill, received above normal groundwater levels. Coxmoor in the north-east recorded exceptionally high groundwater level at the end of August relative to the LTA.

Since July, there has been a general downward trend in groundwater levels for the sites reported.

reservoirs

1.5 Reservoir stocks

By the end of August, all of Midlands reservoirs had below average storage compared to the LTA. Charnwood reservoir was at 27.2% while Derwent reservoir ended the month at 38.9% storage. Clywedog, Vrynwy and Draycote reservoirs were hovering around their LTAs, at 60.6%, 74.2% and 78.1% storage levels respectively.

All reservoirs in the Midlands experienced a reduction in storage since July.

1.6 Environmental impact

Both the West Midlands and East Midlands areas moved into drought incident status on 15 July 2025. We continue to work with water companies and other abstractors to manage water resources and take precautionary actions.

A number of low flow alleviation schemes are also active across the region.

1.7 River Severn operations

The River Severn is regulated to maintain a minimum flow at Bewdley gauging station. This ensures sufficient water flows along the river to support environmental and water supply requirements. Regulation is instigated when flows drop below a threshold. River Severn Regulation began on 9 May 2025 and as of the end of August, there have been 77 days of Severn Regulation so far.

Table 1.1: River Severn operational releases

Water supply (Ml/d)	Total releases	Normal releases	Regulation releases	Flood drawdown releases
Llyn Clywedog	200 Ml/d	18 Ml/d	182 Ml/d	0 Ml/d
Lake Vyrnwy	42 Ml/d	42 Ml/d	0 Ml/d	0 Ml/d
Shropshire Groundwater Scheme	96 Ml/d	N/A	96 Ml/d	N/A

1.8 River Wye operations

Following on from the previous month, River Wye Regulation continued throughout all of August. For all of August, storage in the Ellan Valley reservoirs was below the release control line. For all of August, the flows at Rebdrook gauging station were below the regulation threshold.

1.9 Water abstraction restrictions

As of 31 August there were 140 water abstraction licence restrictions in place across the Midlands affecting 600 licences in total. Please refer to the appendices for a full list of water abstraction licence restrictions.

Please refer to the appendices for a full list of water abstraction licence restrictions.

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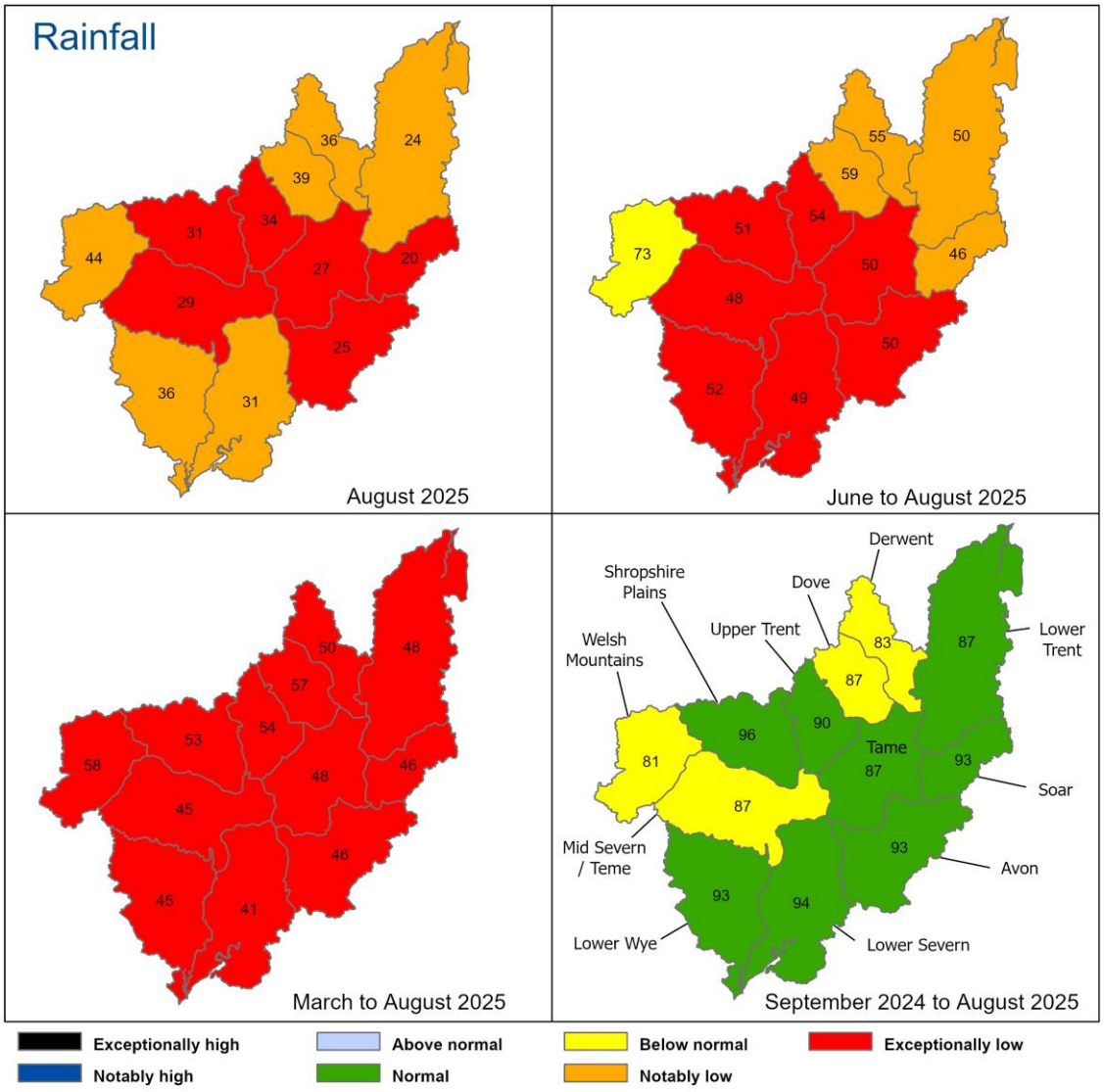
*[SMD]: soil moisture deficits

*[LTA]: long term average

2 Rainfall

2.1 Rainfall map

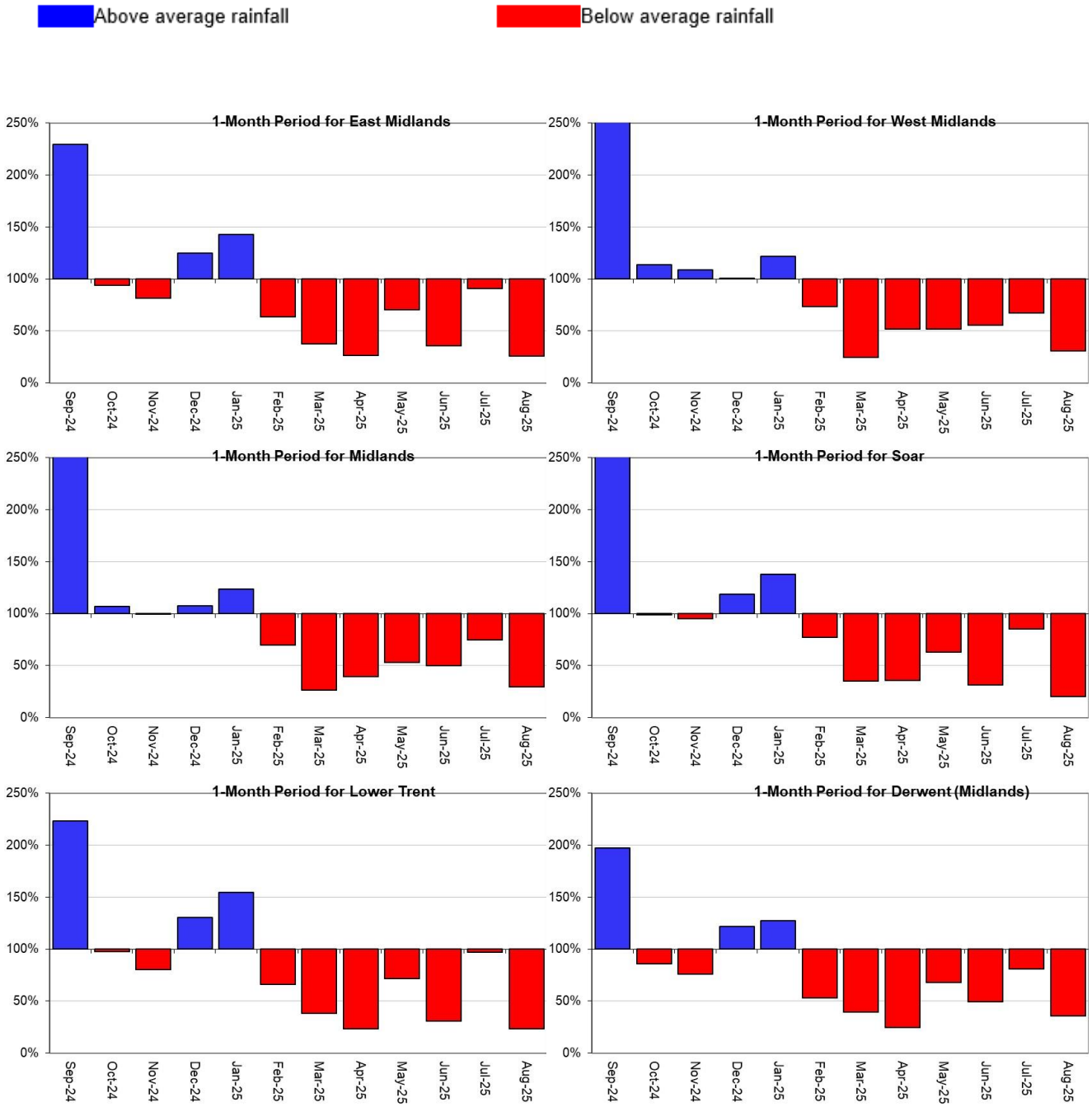
Figure 2.1: Rainfall as % LTA for hydrological areas for the current month (up to 31 August 2025), the last 3 months, the last 6 months, and the last 12 months, relative to an analysis of respective historic totals from 1991 to 2020. Table available in the appendices with detailed information.

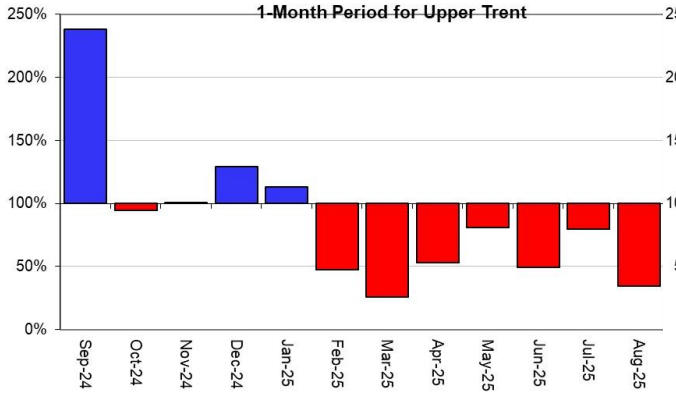


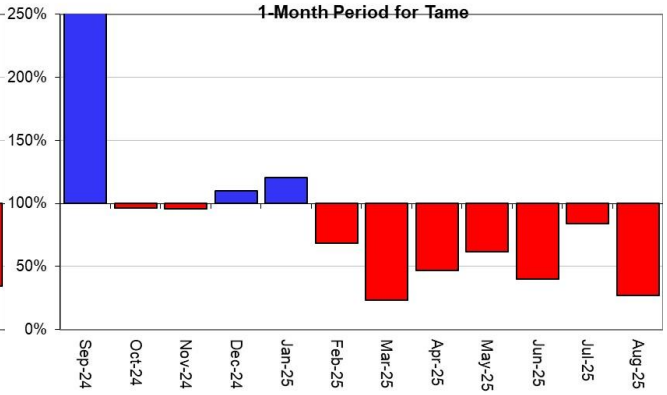
Provisional data based on Environment Agency 1km gridded rainfall dataset derived from Environment Agency intensity rain gauges (Source: Environment Agency. Crown Copyright, 100024198, 2025). HadUK data based on the Met Office 1km gridded rainfall dataset derived from registered rain gauges (Source: Met Office. Crown copyright, 2025).

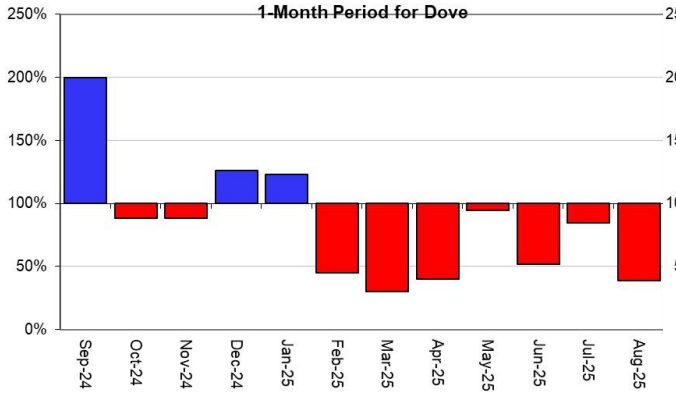
2.2 Rainfall charts

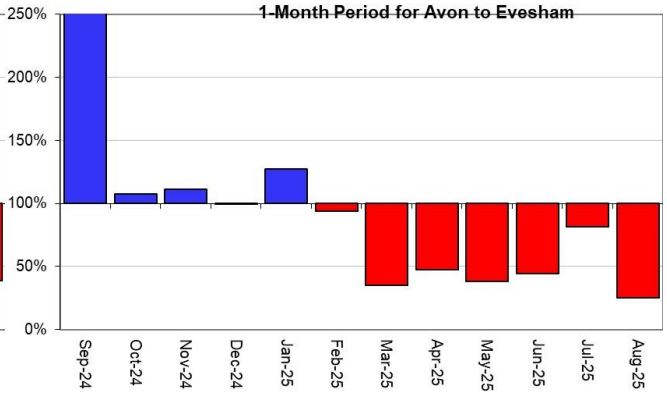
Figure 2.2: Monthly rainfall totals for the past 12 months as a percentage of the 1991 to 2020 long term average for hydrological areas across the Midlands region.

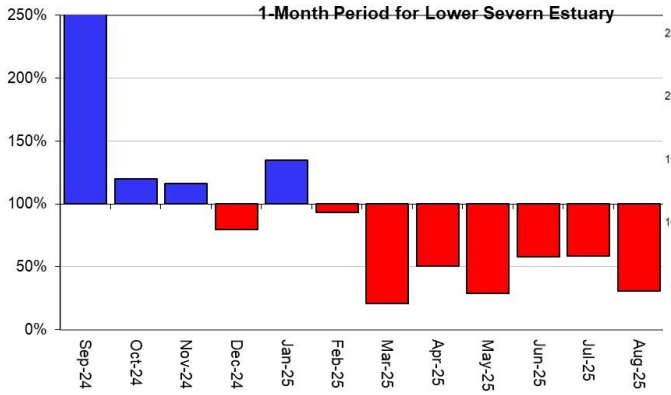


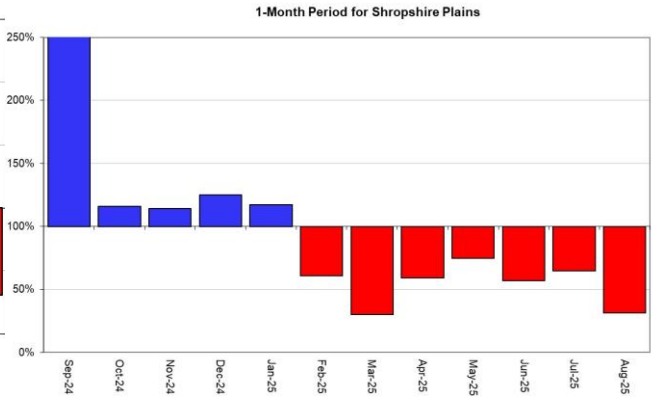

1-Month Period for Upper Trent
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25

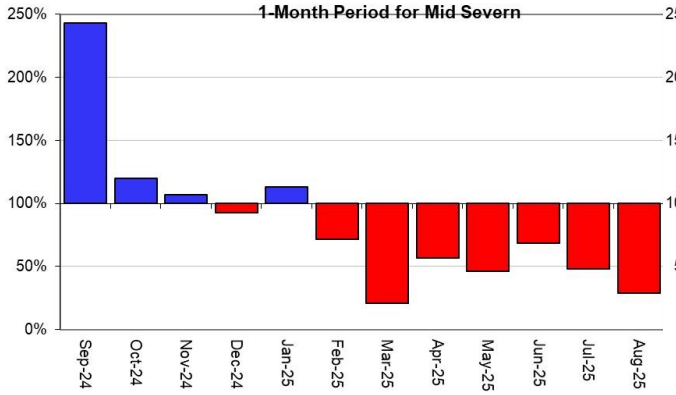

1-Month Period for Tame
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25

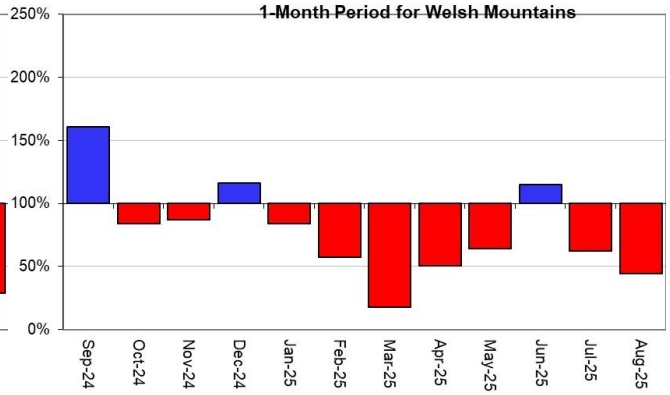

1-Month Period for Dove
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25

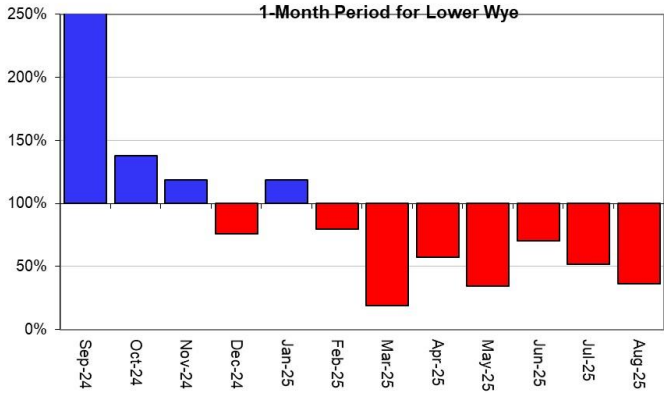

1-Month Period for Avon to Evesham
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25


1-Month Period for Lower Severn Estuary
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25


1-Month Period for Shropshire Plains
250%
200%
150%
100%
50%
0%
Sep-24
Oct-24
Nov-24
Dec-24
Jan-25
Feb-25
Mar-25
Apr-25
May-25
Jun-25
Jul-25
Aug-25





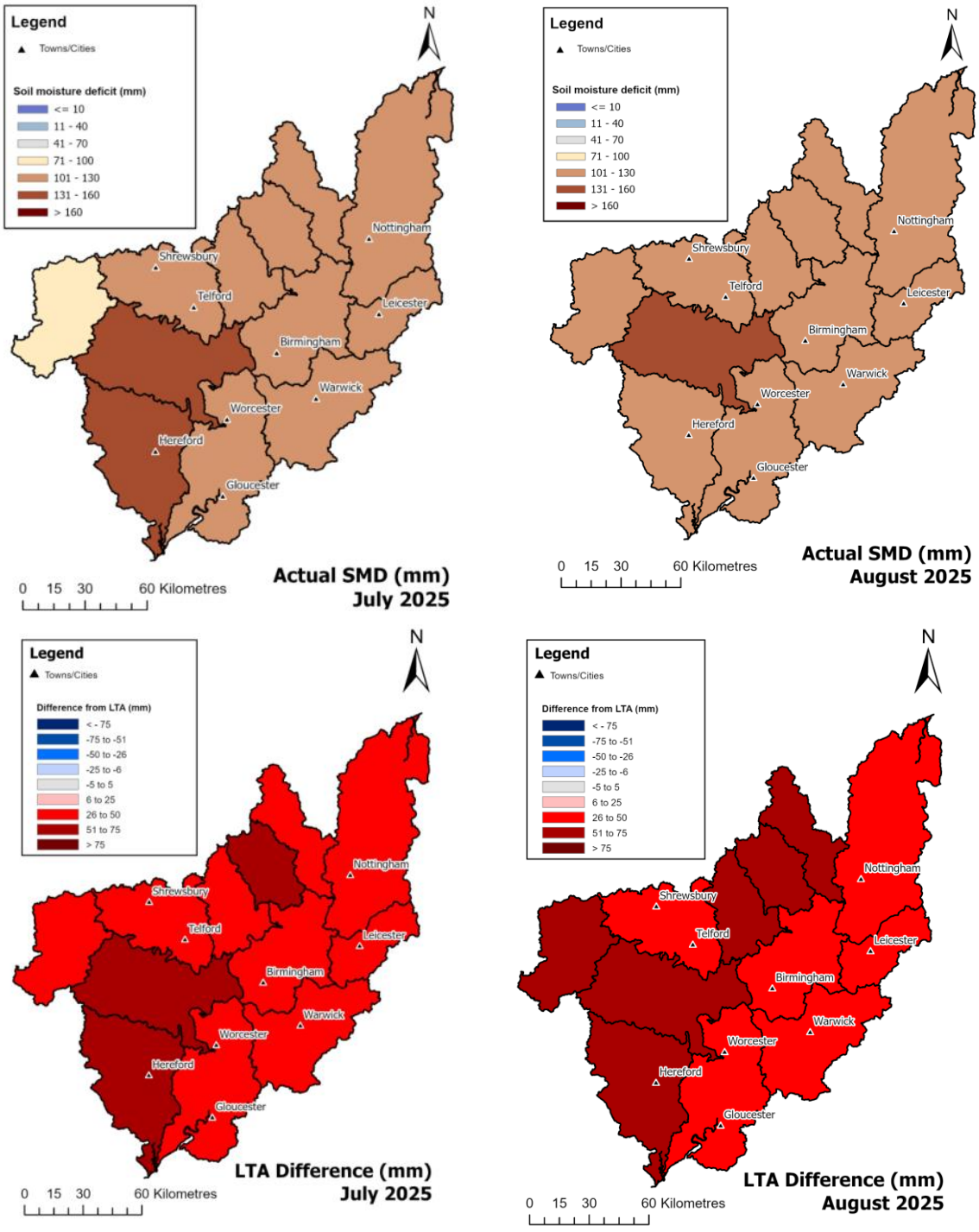


Provisional data based on Environment Agency 1km gridded rainfall dataset derived from Environment Agency intensity rain gauges (Source: Environment Agency. Crown Copyright, 100024198, 2025). HadUK data based on the Met Office 1km gridded rainfall dataset derived from registered rain gauges (Source: Met Office. Crown copyright, 2025).

3 Soil moisture deficit

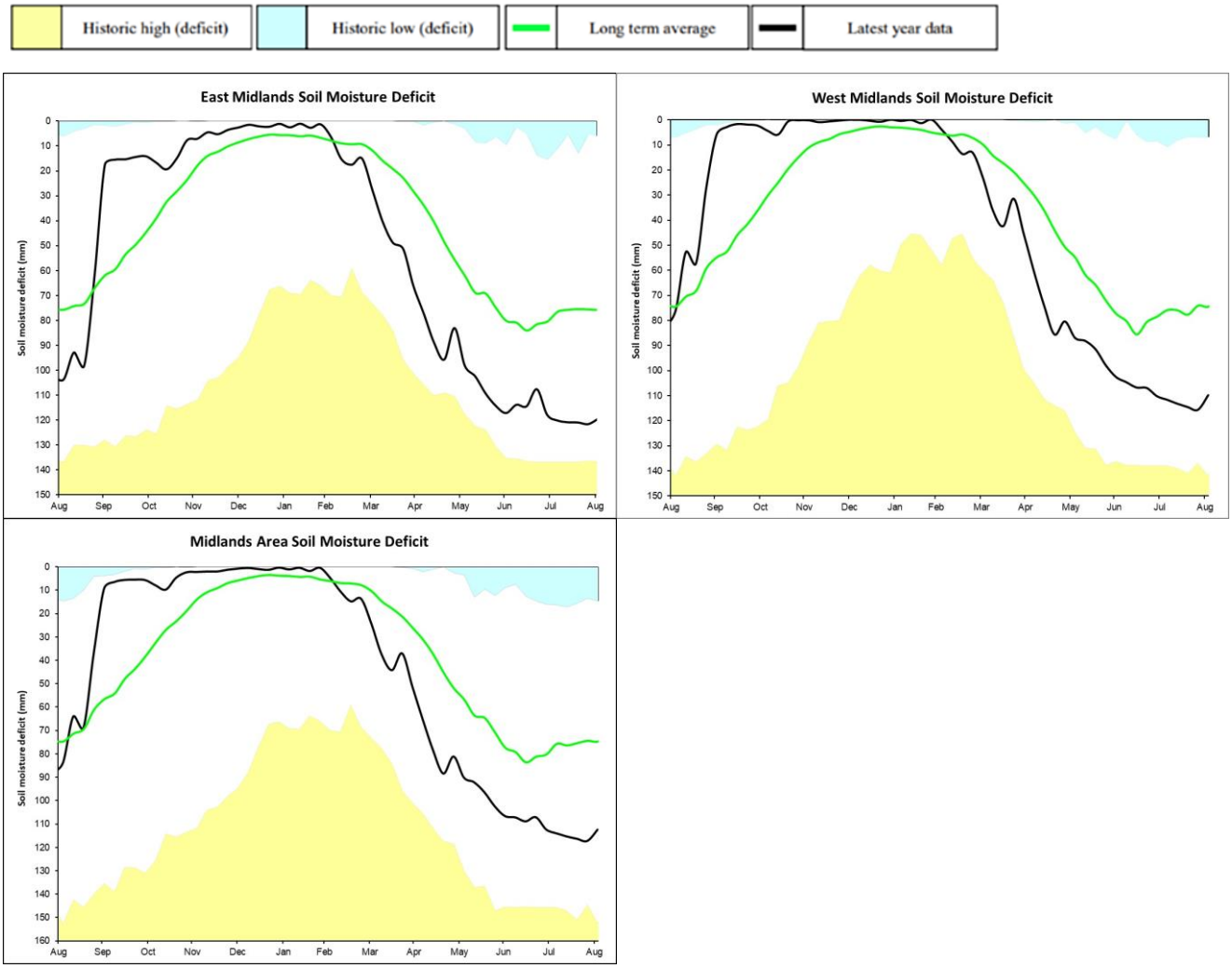
3.1 Soil moisture deficit map

Figure 3.1: Soil moisture deficits for weeks ending 31 August 2025. Shows the difference (mm) of the actual soil moisture deficit from the 1991 to 2020 long term average soil moisture deficits. MORECS data for real land use.



3.2 Soil moisture deficit charts

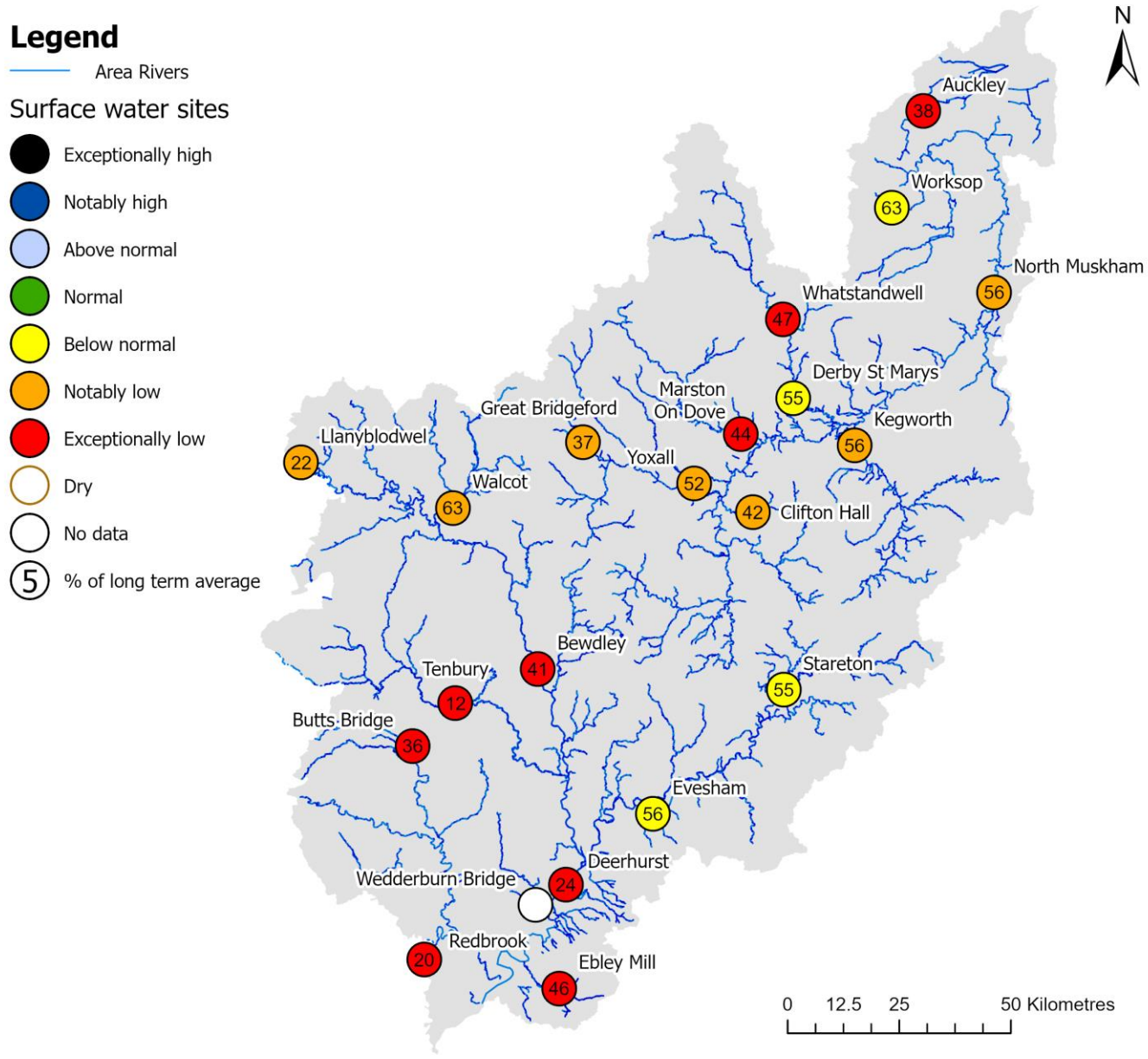
Figure 3.2: Latest soil moisture deficit charts for selected areas across the Midlands.



4 River flows

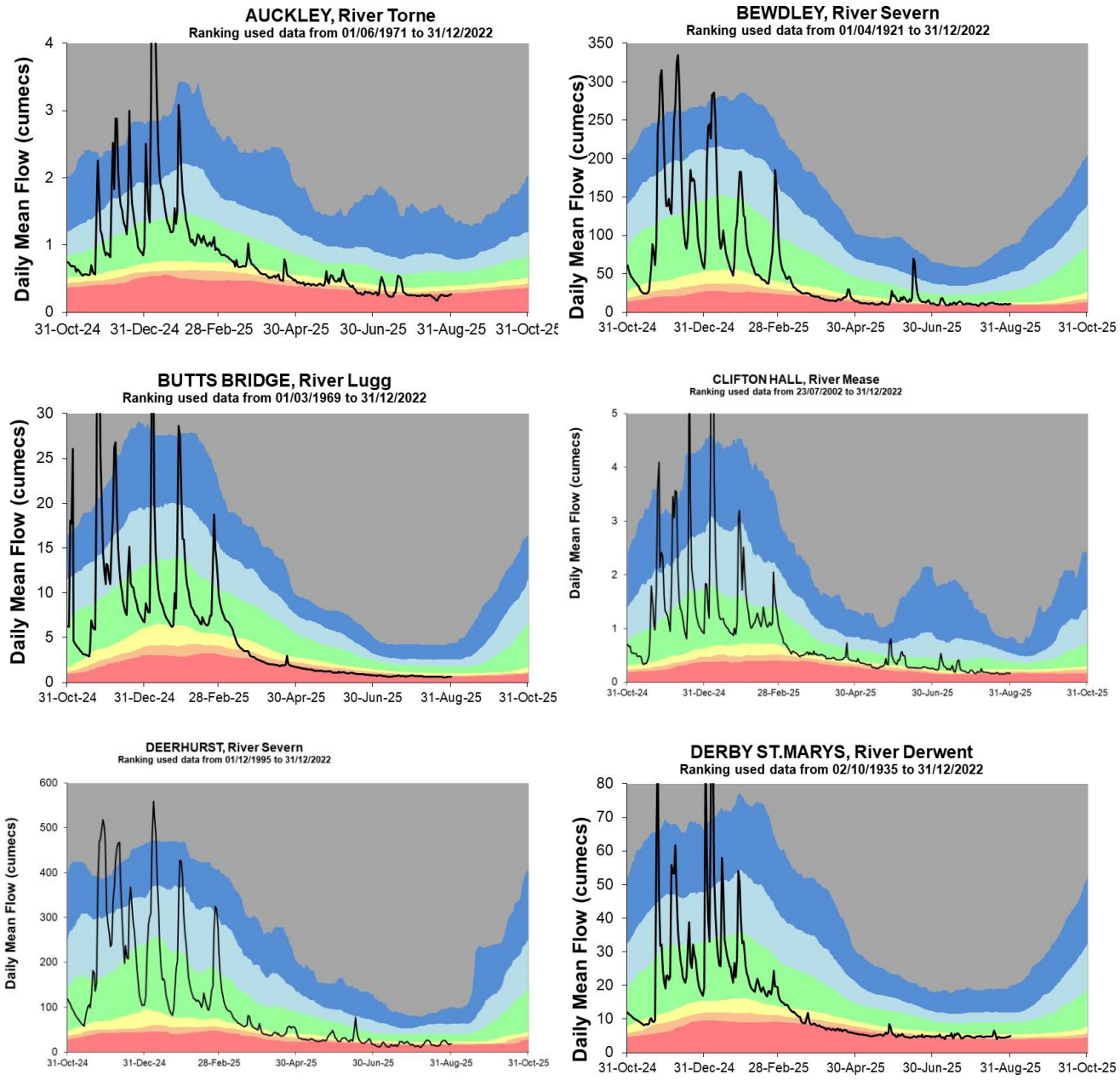
4.1 River flows map

Figure 4.1: Monthly mean river flow for indicator sites for [August 2025], expressed as a percentage of the respective long term average and classed relative to an analysis of historic August monthly means. Table available in the appendices with detailed information.



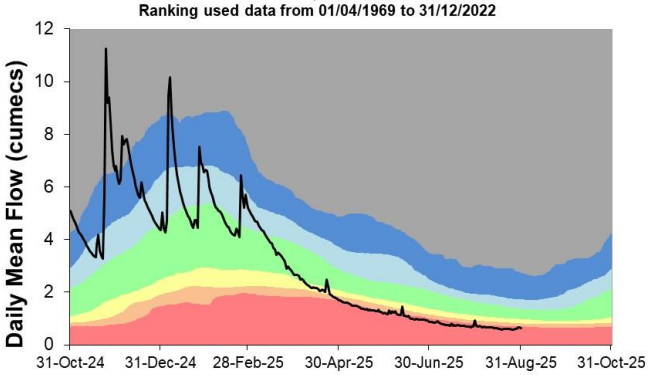
4.2 River flow charts

Figure 4.2: Daily mean river flow for index sites over the past year, compared to an analysis of historic daily mean flows, and long term maximum and minimum flows.



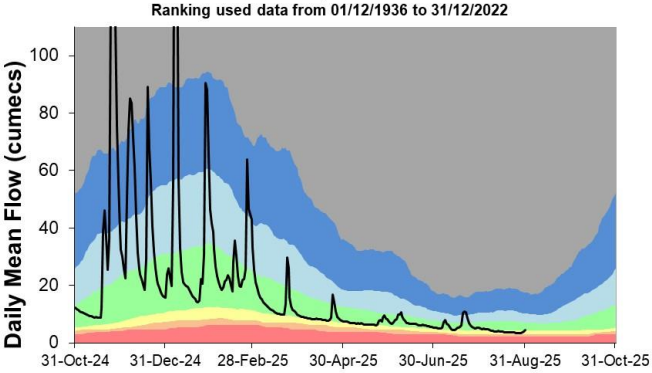
EBLEY MILL, River Frome

Ranking used data from 01/04/1969 to 31/12/2022



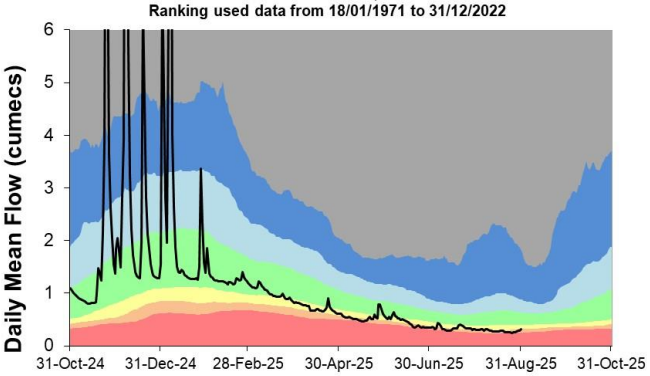
EVESHAM, River Avon

Ranking used data from 01/12/1936 to 31/12/2022



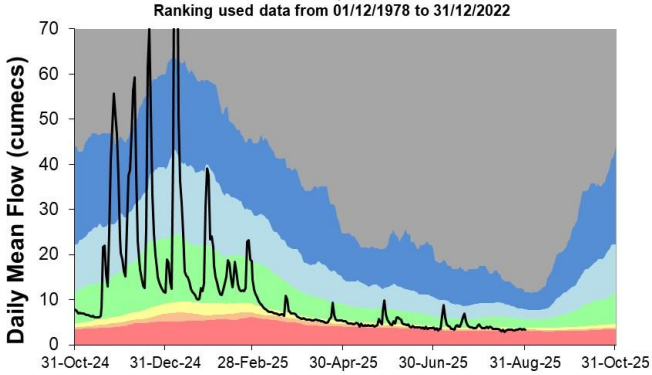
GREAT BRIDGFORD, River Sow

Ranking used data from 18/01/1971 to 31/12/2022



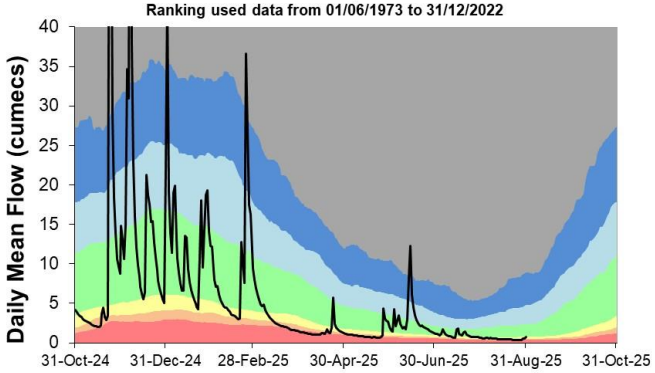
KEGWORTH, River Soar

Ranking used data from 01/12/1978 to 31/12/2022



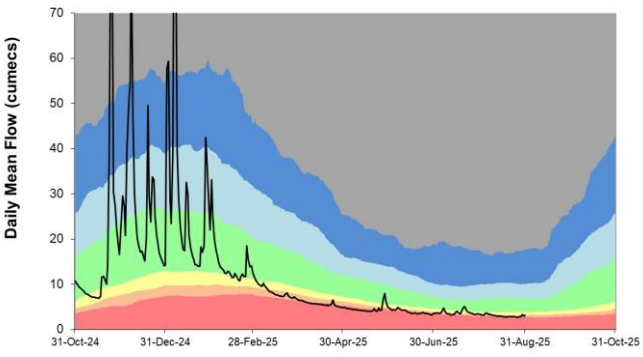
LLANYBLODWEL, Afon Tanat

Ranking used data from 01/06/1973 to 31/12/2022



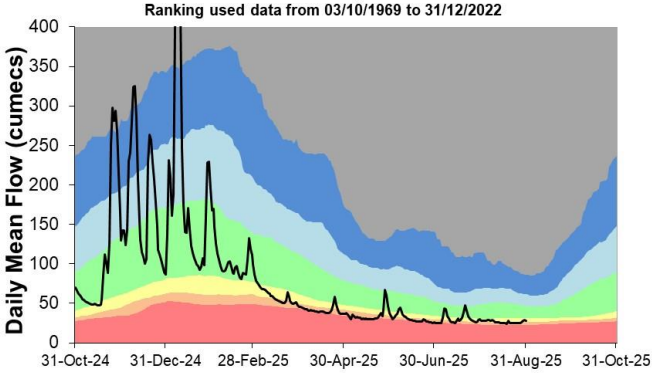
MARSTON ON DOVE, River Dove

Ranking used data from 01/07/1965 to 31/12/2022



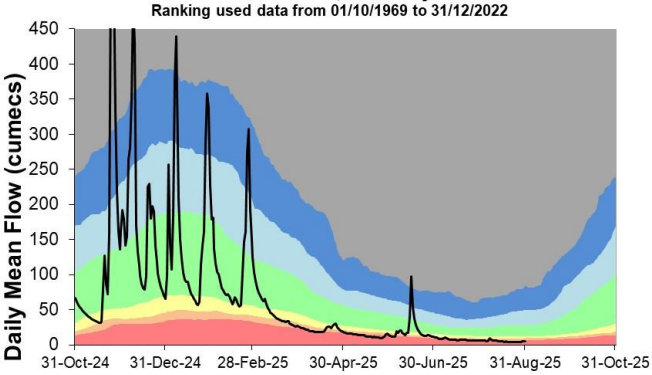
NORTH MUSKHAM, River Trent

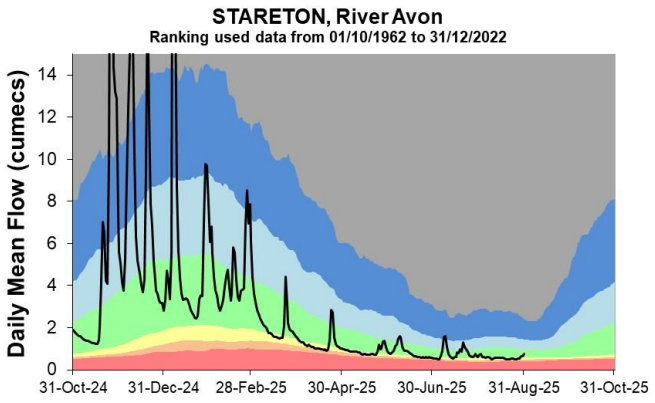
Ranking used data from 03/10/1969 to 31/12/2022

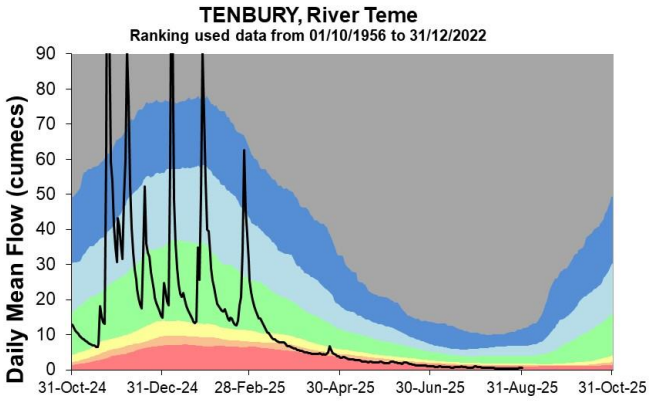


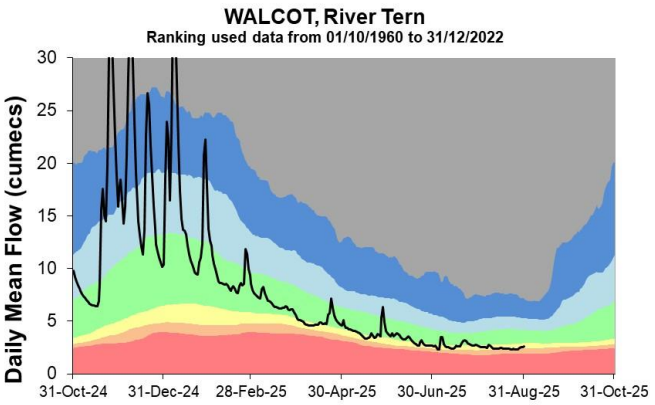
REDBROOK, River Wye

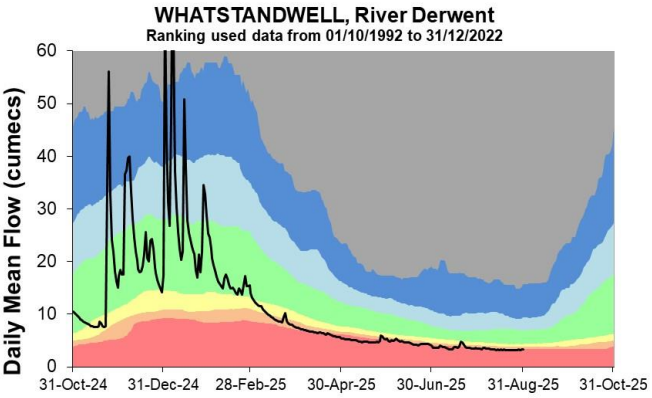
Ranking used data from 01/10/1969 to 31/12/2022

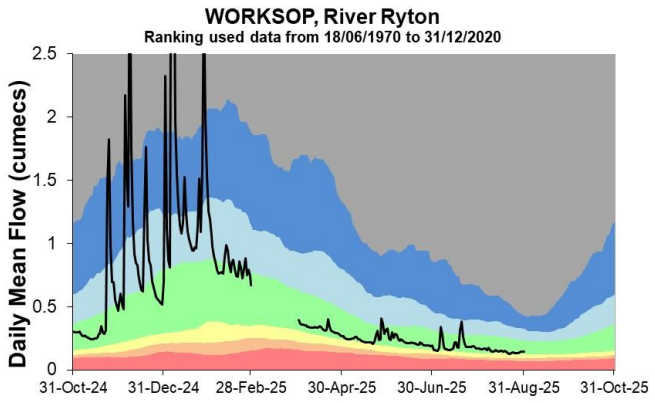


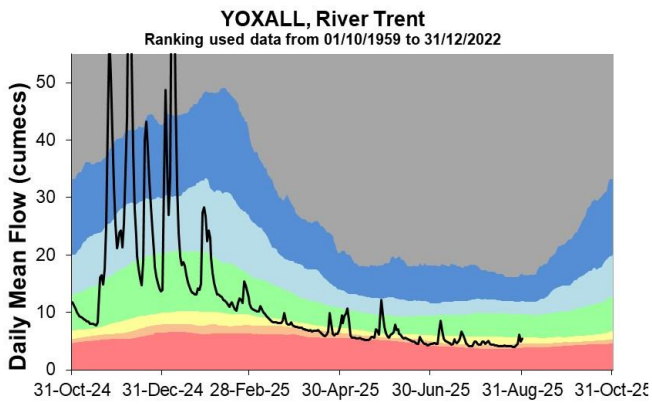

STARETON, River Avon
Ranking used data from 01/10/1962 to 31/12/2022
Daily Mean Flow (cumecs)
0
2
4
6
8
10
12
14
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25


TENBURY, River Teme
Ranking used data from 01/10/1956 to 31/12/2022
Daily Mean Flow (cumecs)
0
10
20
30
40
50
60
70
80
90
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25


WALCOT, River Tern
Ranking used data from 01/10/1960 to 31/12/2022
Daily Mean Flow (cumecs)
0
5
10
15
20
25
30
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25


WHATSTANDWELL, River Derwent
Ranking used data from 01/10/1992 to 31/12/2022
Daily Mean Flow (cumecs)
0
10
20
30
40
50
60
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25

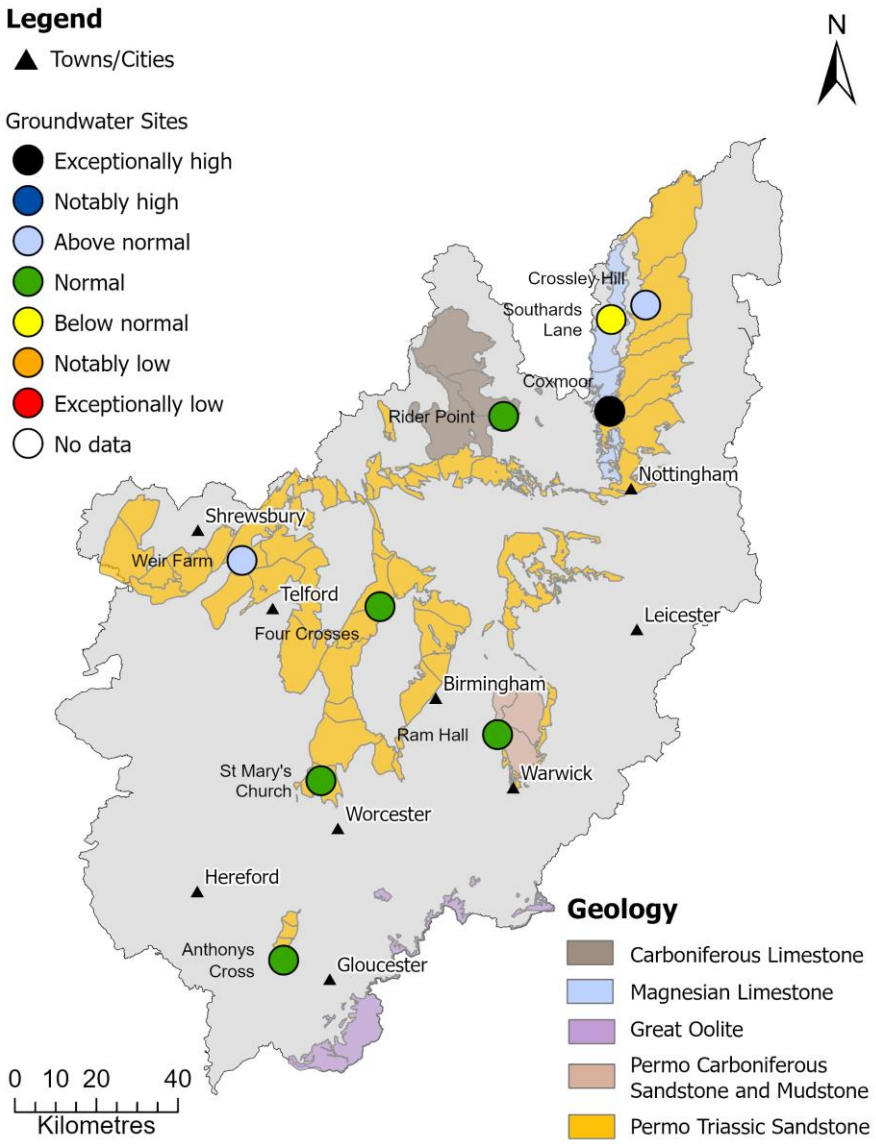

WORKSOP, River Ryton
Ranking used data from 18/06/1970 to 31/12/2020
Daily Mean Flow (cumecs)
0
0.5
1
1.5
2
2.5
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25


YOXALL, River Trent
Ranking used data from 01/10/1959 to 31/12/2022
Daily Mean Flow (cumecs)
0
10
20
30
40
50
31-Oct-24
31-Dec-24
28-Feb-25
30-Apr-25
30-Jun-25
31-Aug-25
31-Oct-25

5 Groundwater levels

5.1 Groundwater levels map

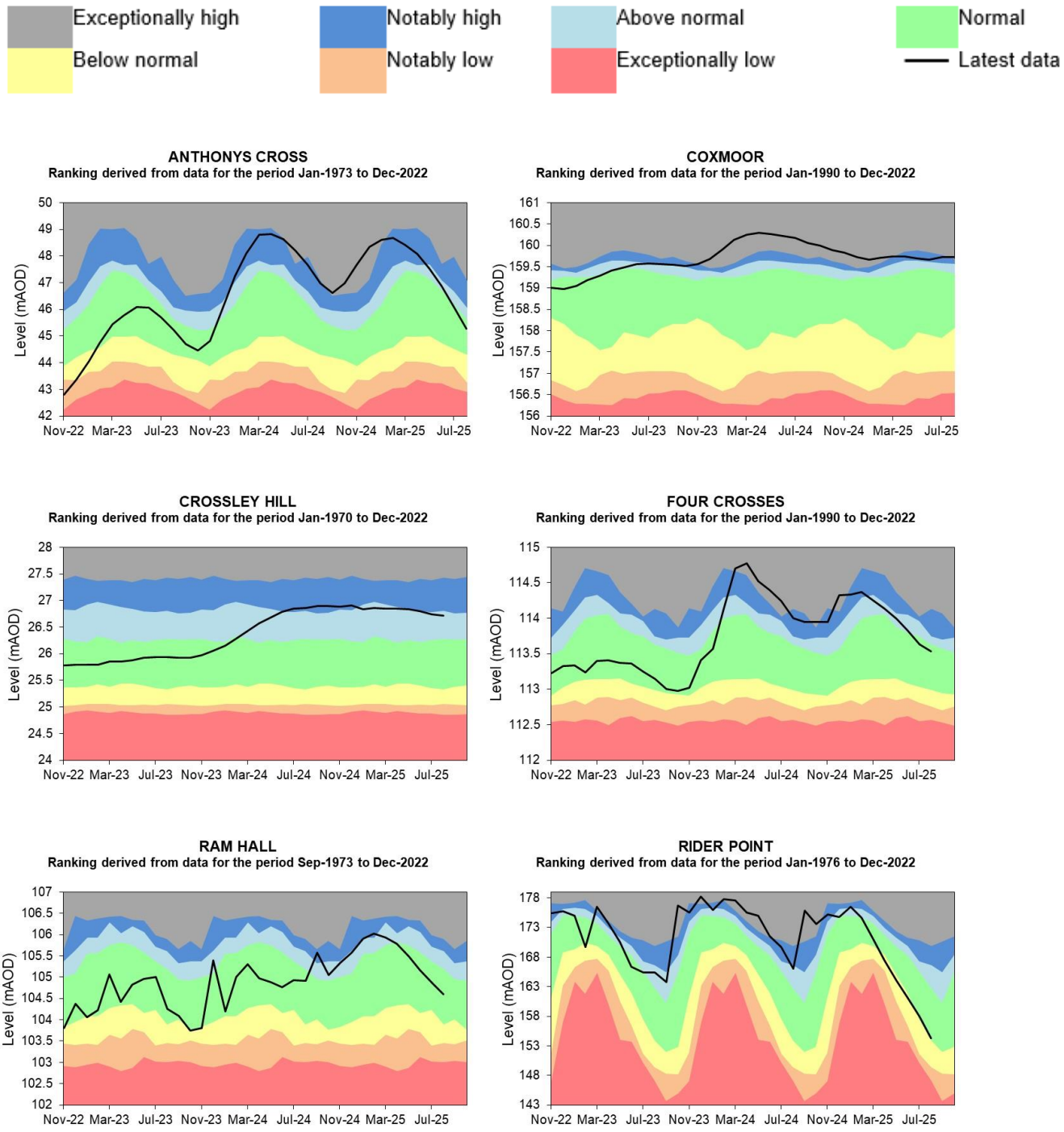
Figure 5.1: Groundwater levels for indicator sites at the end of [August 2025], classed relative to an analysis of respective historic August levels. Table available in the appendices with detailed information, including aquifer type.

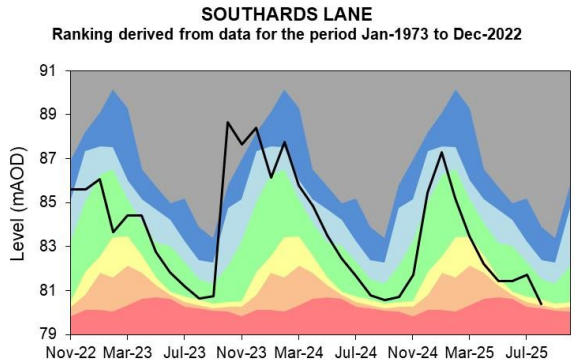


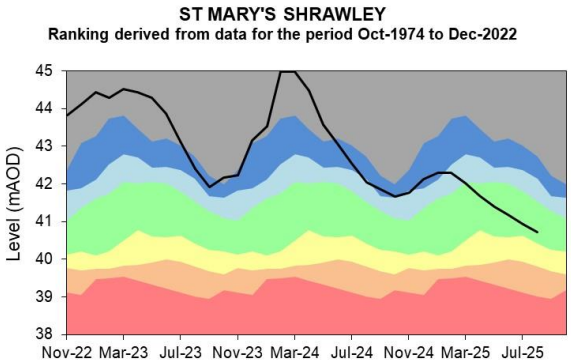
(Source: Environment Agency). Geological map reproduced with kind permission from UK Groundwater Forum, BGS copyright NERC. Crown copyright. All rights reserved. Environment Agency, 100024198, 2025.

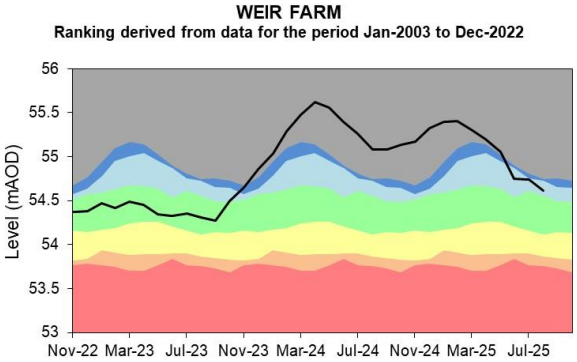
5.2 Groundwater level charts

Figure 5.2: End of month groundwater levels at index groundwater level sites for major aquifers. 34 months compared to an analysis of historic end of month levels.





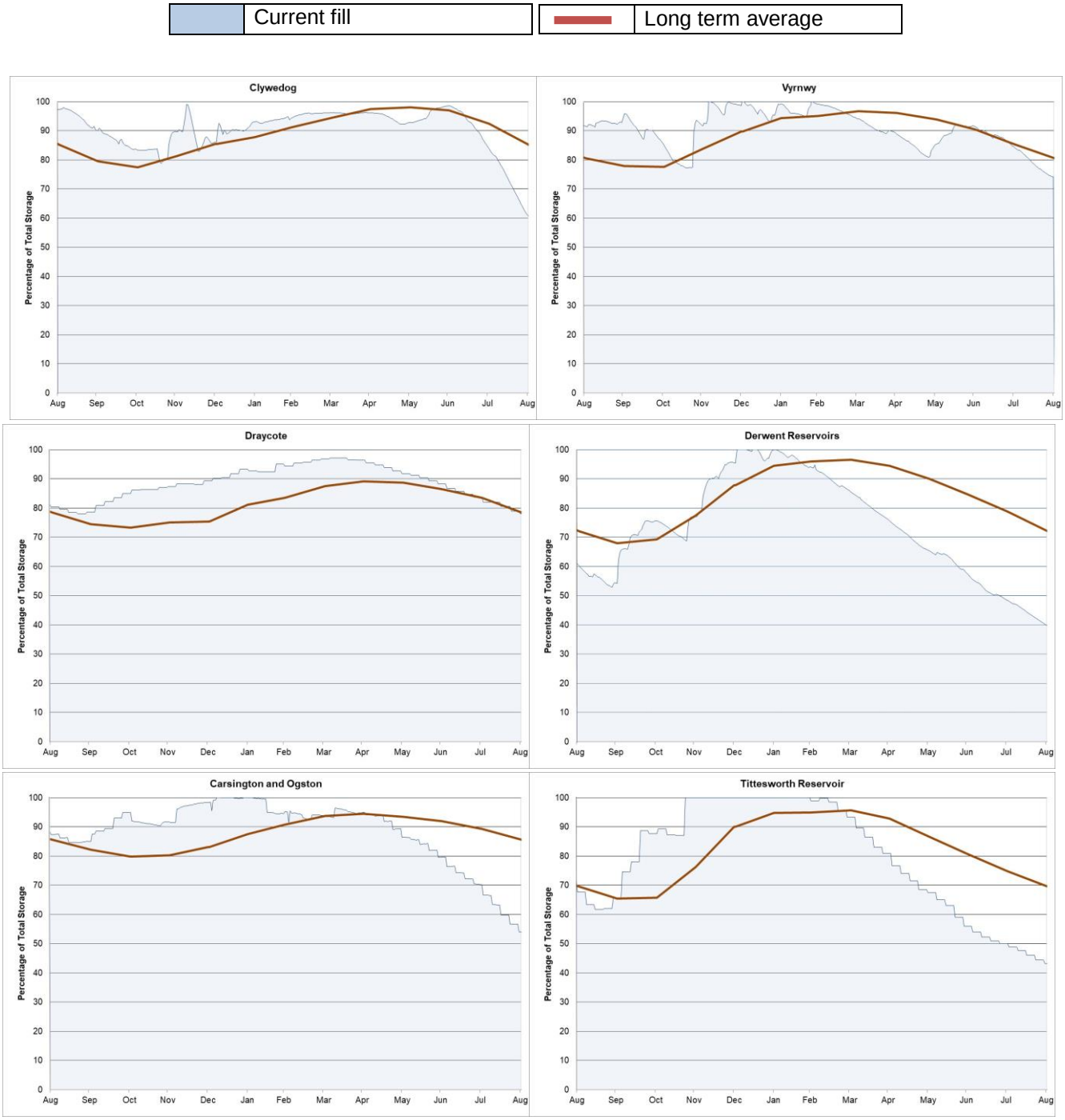


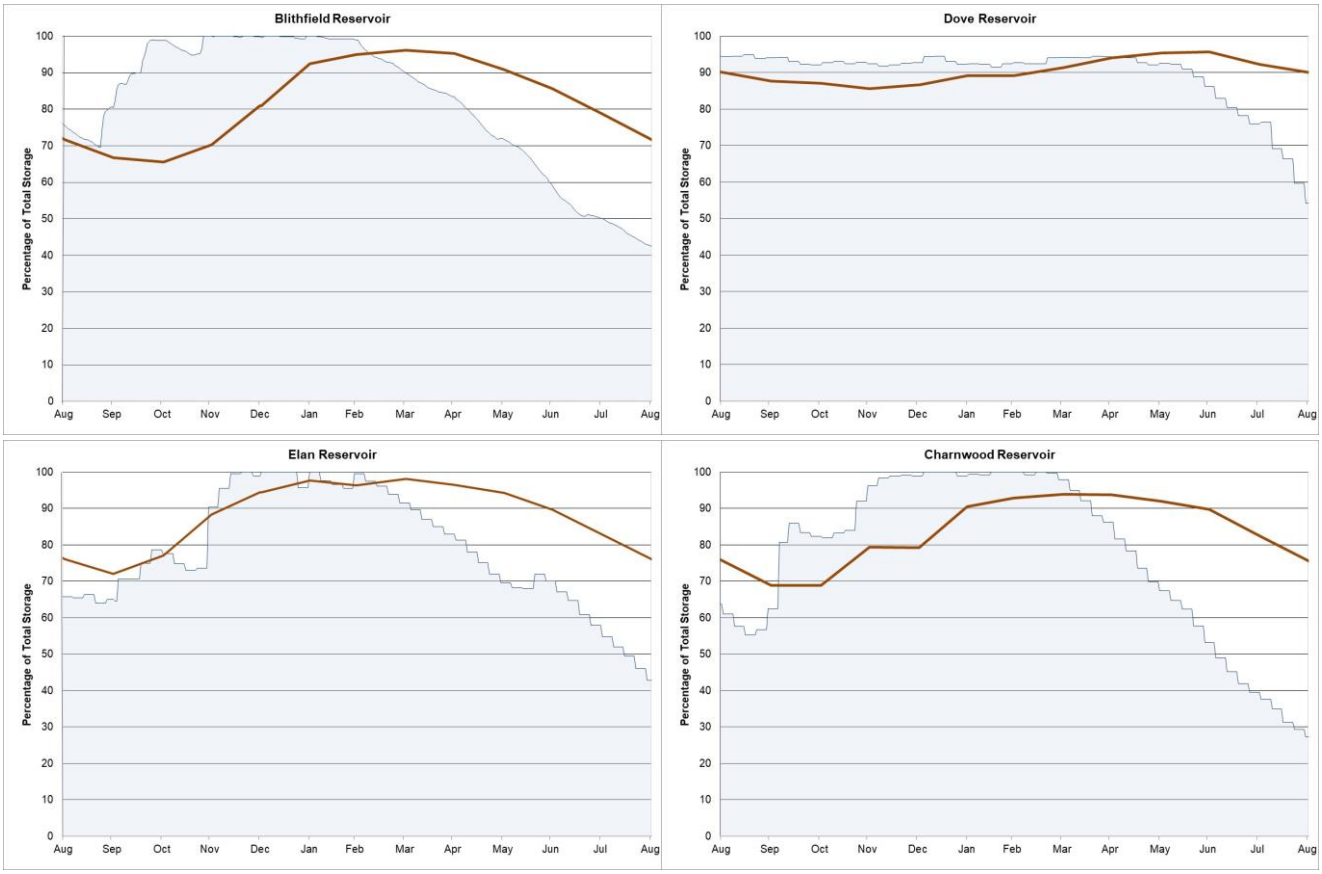


(Source: Environment Agency, 2025).

6 Reservoir stocks

Figure 6.1: End of month regional reservoir stocks compared to long term average stocks. Note: Historic records of individual reservoirs and reservoir groups making up the regional values vary in length. Please see Section 7.4 for a map detailing the locality of the Midlands reservoirs reported on.





(Source: water companies).

7 Glossary

7.1 Terminology

Aquifer

A geological formation able to store and transmit water.

Areal average rainfall

The estimated average depth of rainfall over a defined area. Expressed in depth of water (mm).

Artesian

The condition where the groundwater level is above ground surface but is prevented from rising to this level by an overlying continuous low permeability layer, such as clay.

Artesian borehole

Borehole where the level of groundwater is above the top of the borehole and groundwater flows out of the borehole when unsealed.

Cumecs

Cubic metres per second (m^3s^{-1}).

Effective rainfall

The rainfall available to percolate into the soil or produce river flow. Expressed in depth of water (mm).

Field capacity

Soil at field capacity is holding all of the water which it can hold against gravity.

Flood alert and flood warning

Three levels of warnings may be issued by the Environment Agency. Flood alerts indicate flooding is possible. Flood warnings indicate flooding is expected. Severe flood warnings indicate severe flooding.

Groundwater

The water found in an aquifer.

Long term average (LTA)

The arithmetic mean calculated from the historic record, usually based on the period 1991 to 2020. However, the period used may vary by parameter being reported on (see figure captions for details).

mAOD

Metres above ordnance datum (mean sea level at Newlyn Cornwall).

MORECS

Met Office Rainfall and Evaporation Calculation System. Met Office service providing real time calculation of evapotranspiration, soil moisture deficit and effective rainfall on a 40 by 40 km grid.

Naturalised flow

River flow with the impacts of artificial influences removed. Artificial influences may include abstractions, discharges, transfers, augmentation and impoundments.

NCIC

National Climate Information Centre. NCIC area monthly rainfall totals are derived using the Met Office 5 km gridded dataset, which uses rain gauge observations.

Recharge

The process of increasing the water stored in the saturated zone of an aquifer. Expressed in depth of water (mm).

Reservoir gross capacity

The total capacity of a reservoir.

Reservoir live capacity

The capacity of the reservoir that is normally usable for storage to meet established reservoir operating requirements. This excludes any capacity not available for use (for example, storage held back for emergency services, operating agreements or physical restrictions). May also be referred to as ‘net’ or ‘deployable’ capacity.

Soil moisture deficit (SMD)

The difference between the amount of water actually in the soil and the amount of water the soil can hold. Expressed in depth of water (mm).

7.2 Categories

Exceptionally high

Value likely to fall within this band 5% of the time.

Notably high

Value likely to fall within this band 8% of the time.

Above normal

Value likely to fall within this band 15% of the time.

Normal

Value likely to fall within this band 44% of the time.

Below normal

Value likely to fall within this band 15% of the time.

Notably low

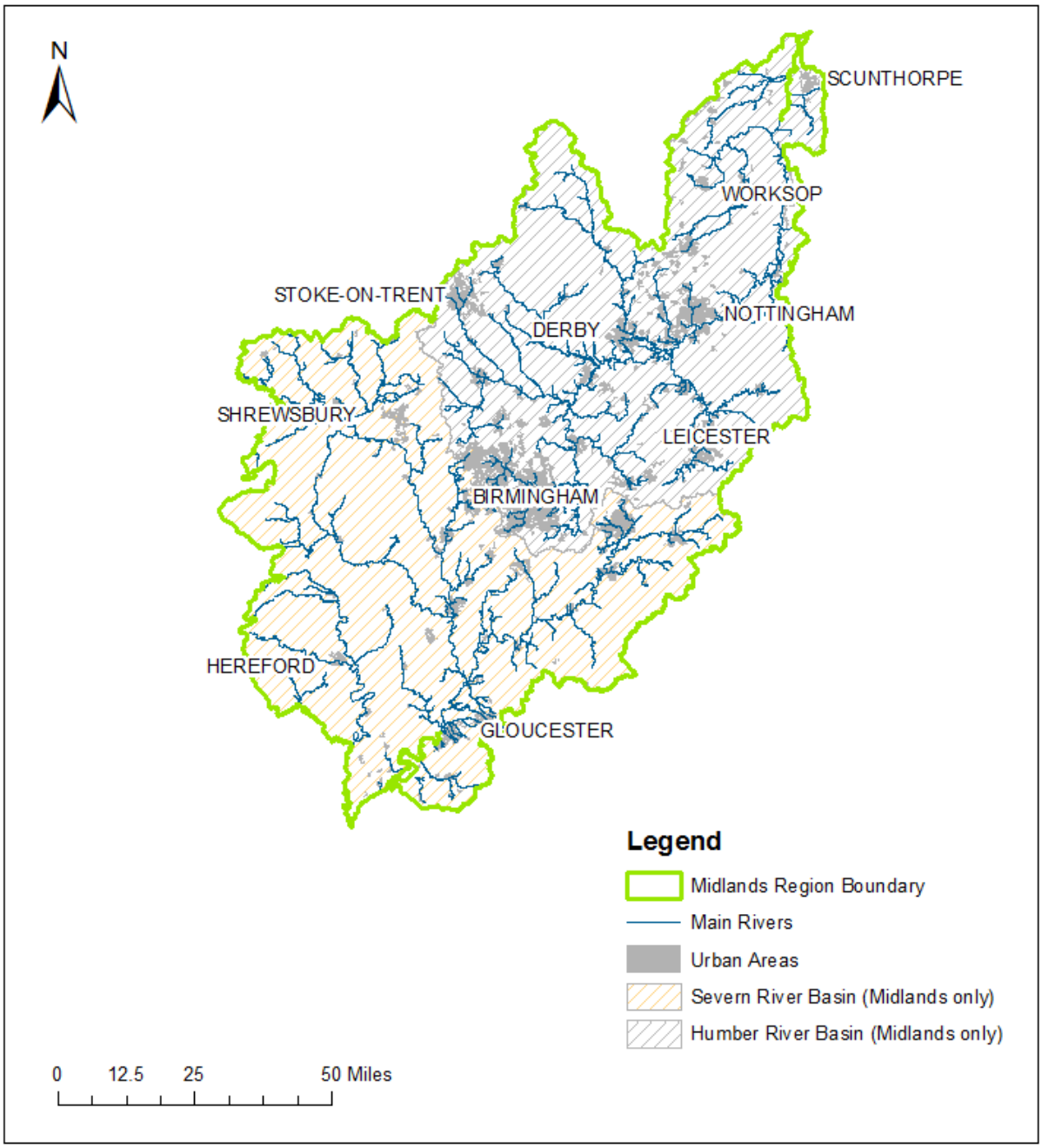
Value likely to fall within this band 8% of the time.

Exceptionally low

Value likely to fall within this band 5% of the time.

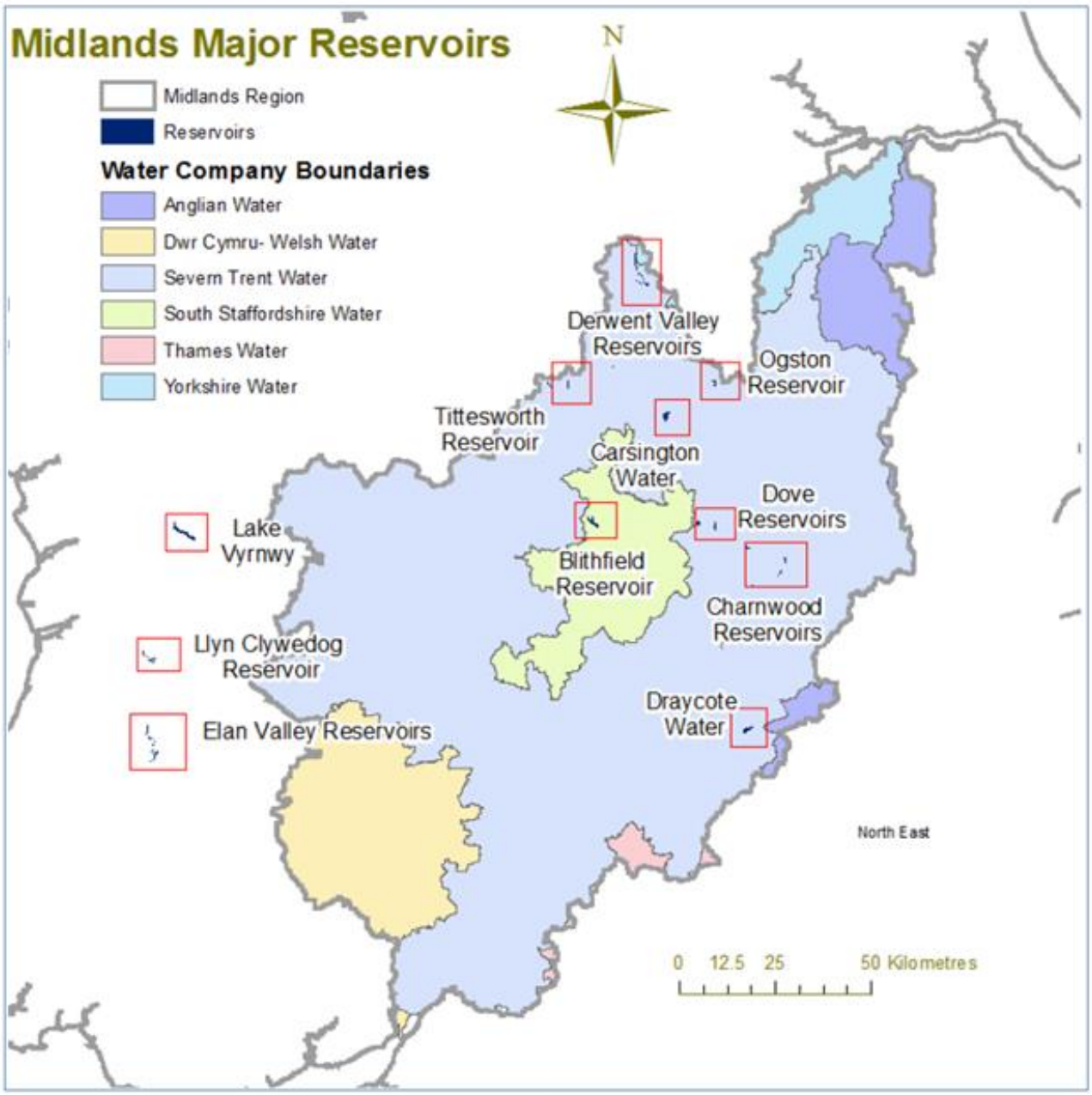
7.3 Midlands regional coverage

Figure 7.1: The Midlands regional boundary and the hydrological boundaries of the River Severn and River Trent.



7.4 Midlands major reservoirs

Figure 7.2: Location of major reservoirs in the Midlands.



8 Appendices

8.1 Water abstraction licence restrictions table

Area	Rivers and stations restricted
East	River Wye at Ashford River Derwent at Derby St. Mary's Rothley Brook at Rothley River Soar at Littlethorpe River Soar at Kegworth River Erewash at Sandiacre River Leen at Triumph Road River Devon at Wensor Bridge River Trent at Colwick River Trent at North Muskham River Maun and River Meden at Perlethorpe and Whitewater Bridge River Ryton at Blyth River Torne at Auckley
West	River Arrow at Broom River Avon at Stareton River Avon at Evesham Badsey Brook at Offenham Bow Brook at Besford Bridge

	River Dene at Wellesbourne
	River Leam at Princes Drive
	Piddle Brook at Wyre Piddle
	River Stour at Wimpstone
	River Dove at Marston on Dove
	River Severn at Bewdley
	River Severn at Deerhurst
	River Leadon at Wedderburn Bridge
	River Coley Brook at Coley Mill
	River Meese at Tibberton
	River Perry at Yeaton
	River Rea at Hookagate/Rea
	River Roden at Rodington
	River Strine at Crudgington
	River Tern at Ternhill on Tern
	River Tern at Walcot
	River Penk at Penkridge
	River Sow at Great Bridgford
	River Trent at Yoxall
	River Trent at Darlaston
	River Anker at Polesworth
	River Cole at Coleshill
	River Mease at Clifton Hall
	River Trent at Drakelow

	River Corve at Ludlow River Teme at Knightsford Bridge River Teme at Tenbury River Afon Tanat at Llanyblodwel River Mor Brook at Dowles Brook at Oak Cottage River Salwarpe at Harford Hill River Stour at Puxton River Worfe at Burcote River Wye at Belmont River Frome at Bishops Frome River Lugg at Byton River Lugg at Lugwardine River Garren at Marstow Mill River Wye at Redbrook River Arrow at Titley Mill River Lugg at Butts Bridge River Lugg at Laystone Bridge

8.2 Rainfall table

Hydrological area	Aug 2025 rainfall % of long term average 1991 to 2020	Aug 2025 band	Jun 2025 to August cumulative band	Mar 2025 to August cumulative band	Sep 2024 to August cumulative band
Avon To Evesham	25	Exceptionally low	Exceptionally low	Exceptionally low	Normal
Derwent (Midlands)	36	Notably low	Notably low	Exceptionally low	Below normal
Dove	39	Notably low	Notably low	Exceptionally low	Below normal
Lower Severn Estuary	31	Notably low	Exceptionally low	Exceptionally low	Normal
Lower Trent	24	Notably low	Notably low	Exceptionally low	Normal
Lower Wye	36	Notably low	Exceptionally low	Exceptionally low	Normal
Mid Severn	29	Exceptionally low	Exceptionally low	Exceptionally low	Below normal
Shropshire Plains	31	Exceptionally low	Exceptionally low	Exceptionally low	Normal
Soar	20	Exceptionally low	Notably low	Exceptionally low	Normal
Tame	27	Exceptionally low	Exceptionally low	Exceptionally low	Normal

Upper Trent	34	Exceptionally low	Exceptionally low	Exceptionally low	Normal
Welsh Mountains	44	Notably low	Below normal	Exceptionally low	Below normal

8.3 River flows table

Site name	River	Catchment	Aug 2025 band	Jul 2025 band
Auckley	Torne	Torne	Exceptionally low	Notably low
Bewdley	Severn	Severn Lower Mid	Exceptionally low	Notably low
Butts Bridge	Lugg	Lugg	Exceptionally low	Exceptionally low
Clifton Hall	River Mease	Mease	Notably low	Below normal
Deerhurst	Severn	Severn Lower	Exceptionally low	No data
Derby St. Marys	Derwent	Derwent Der to Markeaton con	Below normal	Notably low
Ebley Mill	Frome (Gloucestershire)	Frome Gloucs	Exceptionally low	Exceptionally low
Evesham	Avon (Midlands)	Avon Warwks Lower	Below normal	Normal
Great Bridgford	Sow	Sow Upper	Notably low	Notably low
Kegworth	Soar	Soar to Kingston Brook confl	Notably low	Below normal
Llanyblodwel	Tanat	Severn Upper River Tanat	Notably low	Normal

Marston On Dove	Dove (Midlands)	Dove Derb to Hilton Br confl	Exceptionally low	Notably low
North Muskham	Trent	Trent to Cromwell	Notably low	Below normal
Redbrook	Wye (Herefordshire)	Wye H and W d s Lugg	Exceptionally low	Exceptionally low
Stareton	Avon (Midlands)	Avon Warwks Upper	Below normal	Normal
Tenbury	Teme	Teme	Exceptionally low	Exceptionally low
Walcot	Tern	Tern	Notably low	Below normal
Wedderburn Bridge	Leadon	Leadon	No Data	No Data
Whatstandwell	Derwent	Derwent Derb to Amber conf	Exceptionally low	Exceptionally low
Worksop	Ryton	Ryton Upper to Oldcoates Dyke	Below normal	Normal
Yoxall	Trent	Trent to Tame Mease confl	Notably low	Below normal

8.4 Groundwater table

Site name	Aquifer	End of Aug 2025 band	End of Jul 2025 band
Anthonys Cross	Severn Vale Permo Triassic Sandstone’	Normal	Normal
Coxmoor	Permo Triassic Sandstone	Exceptionally high	Notably high
Crossley Hill	Permo Triassic Sandstone	Above normal	Above normal
Four Crosses	Grimsby Ancholme Louth Limestone	Normal	Normal
Ram Hall, Meriden	Grimsby Ancholme Louth Limestone	Normal	Normal
Rider Point Via Gellia	Carboniferous Limestone	Normal	Normal
Southards Lane, Bolsover	Magnesian Limestone	Below normal	Normal
St Mary’s Church, Shrawley’	East Shropshire Permo-triassic Sandstone	Normal	Normal
Weir Farm	Bridgnorth Sandstone Formation	Above normal	Above normal