UTILITIES QUARTERLY REPORT

Review of Q2 2024

LYNN R. MORGAN WATER TREATMENT FACILITY (WTF)

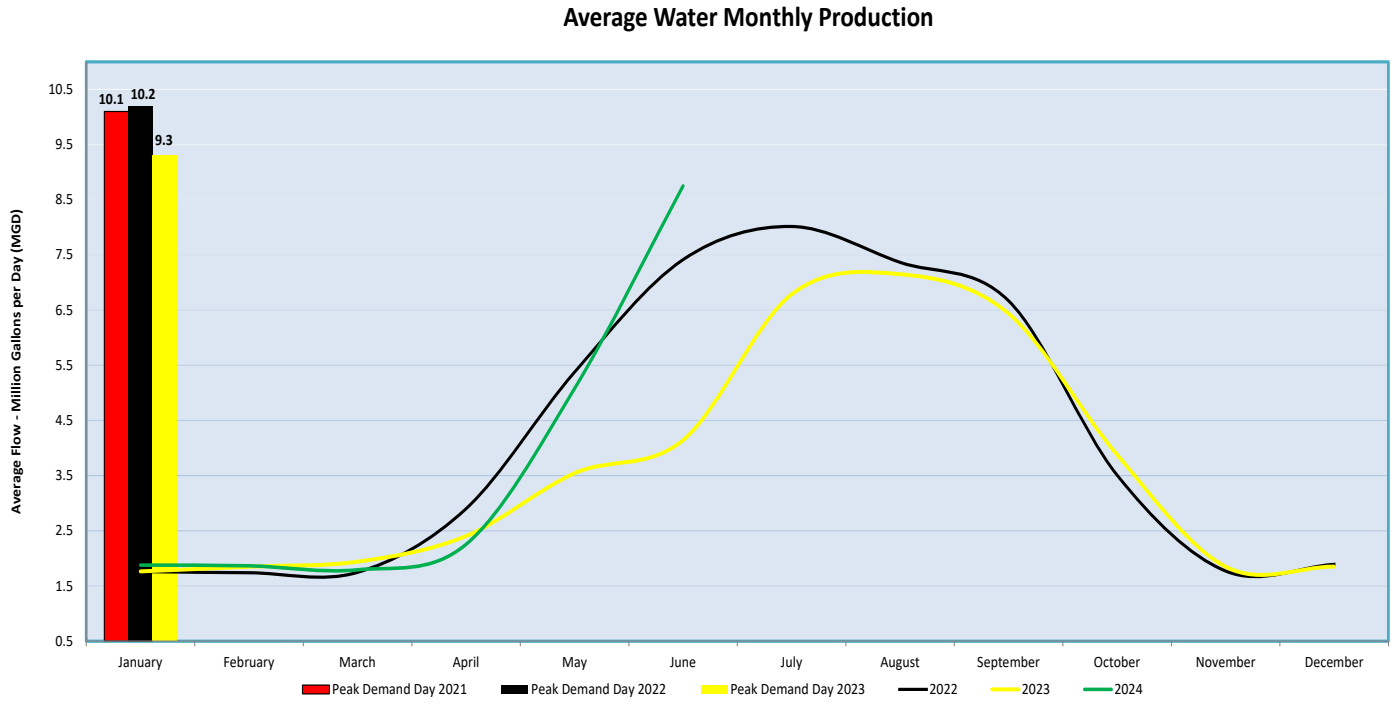
Average Flow Million Gallons per Day (MGD):

2021 – 4.3 MGD | 2022 – 4.2 MGD | 2023 – 3.6 MGD

Due to low precipitation and high temperatures the second quarter of 2024 has seen a huge jump in water demand over recent years. As new development comes online with water saving features and smaller landscaped areas, combined with the Town's strong tier pricing and conservation messaging; we are seeing water demands generally reacting appropriately.

What Does this Tell Us?

We are looking to message residents about water demands as we see bigger usage on Monday, Wednesday and Fridays – which is a common theme in our region and possibly tied to the default setting for smart irrigation controllers. Overall water demands are relatively flat in the winter (indoor demand) over the period of record and weather based in the summer irrigation period, with this year being hotter and dryer. Will continue to help residents manage their water use with incentives, smart meters and conservation programs.



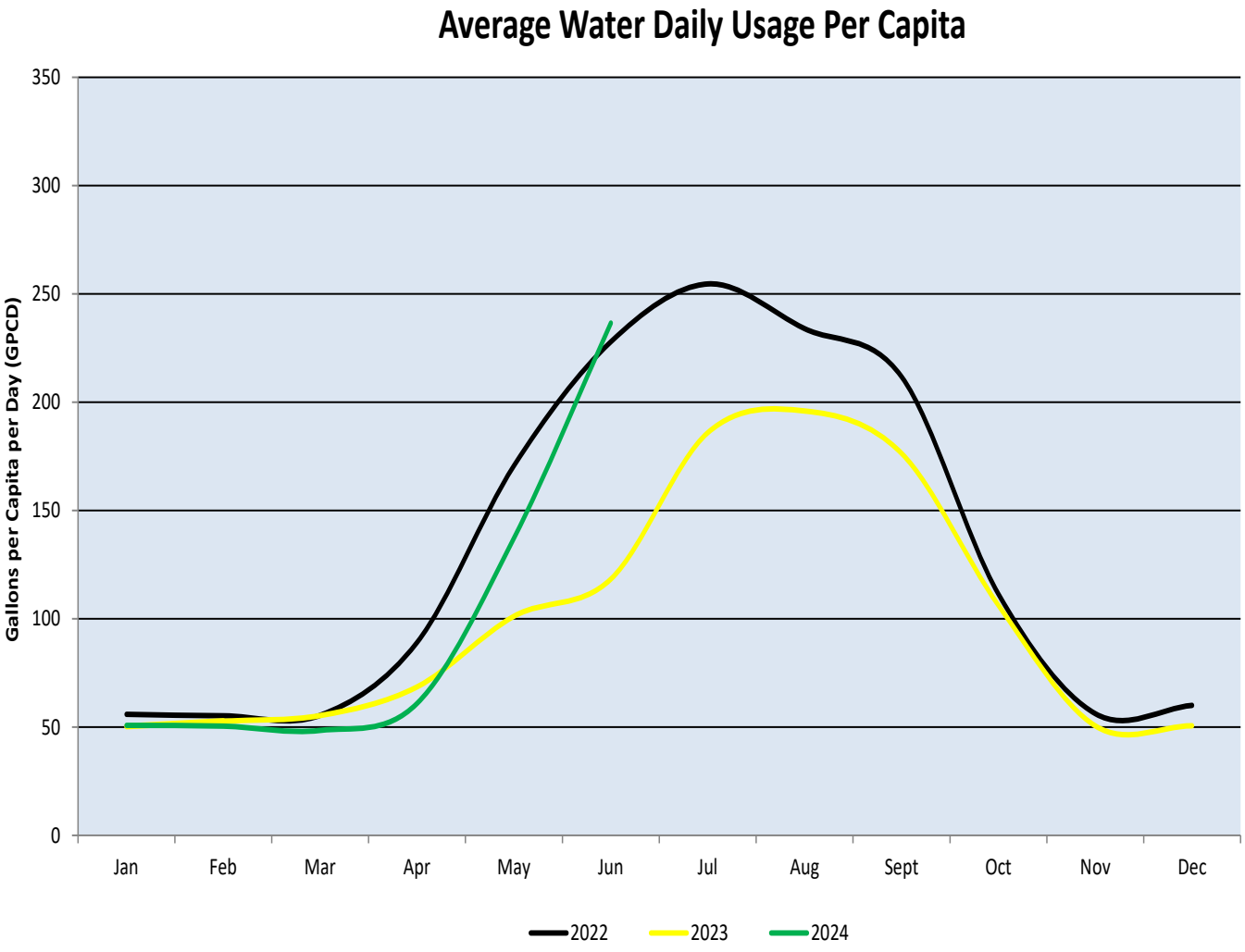
Average Per Capita per Day (GPCD):

2021 – 136 GPCD | 2022 – 132 GPCD | 2023 – 101 GPCD

Daily use per capita in the second quarter of 2024 saw a significant jump in spring and early summer. Indoor demands during winter remain relatively stable and are a good indicator of non-irrigation supply needs. Drought messaging, along with wetter conditions, seems to be helping curb excessive use, however we intend to increase conservation and appropriate irrigation as dry years tend to stress the system and our resources.

What Does this Tell Us?

Reducing summer irrigation and increasing reuse water availability will reduce reliance on treated water supplies in the future. Outdoor irrigation amounts to roughly 40% of annual deliveries, the shift in demand is notable. Staff will be collaborating with Water Conservation staff in Environmental Services to continue Turf Replacement programs and other conservation messaging. We recently received a grant to develop code-based water landscaping standards that can reduce customer bills and demand, while also leveraging our water supply portfolio. The Town is an innovator in the State and region in these areas.



NORTH WATER RECLAMATION FACILITY (NWRF)

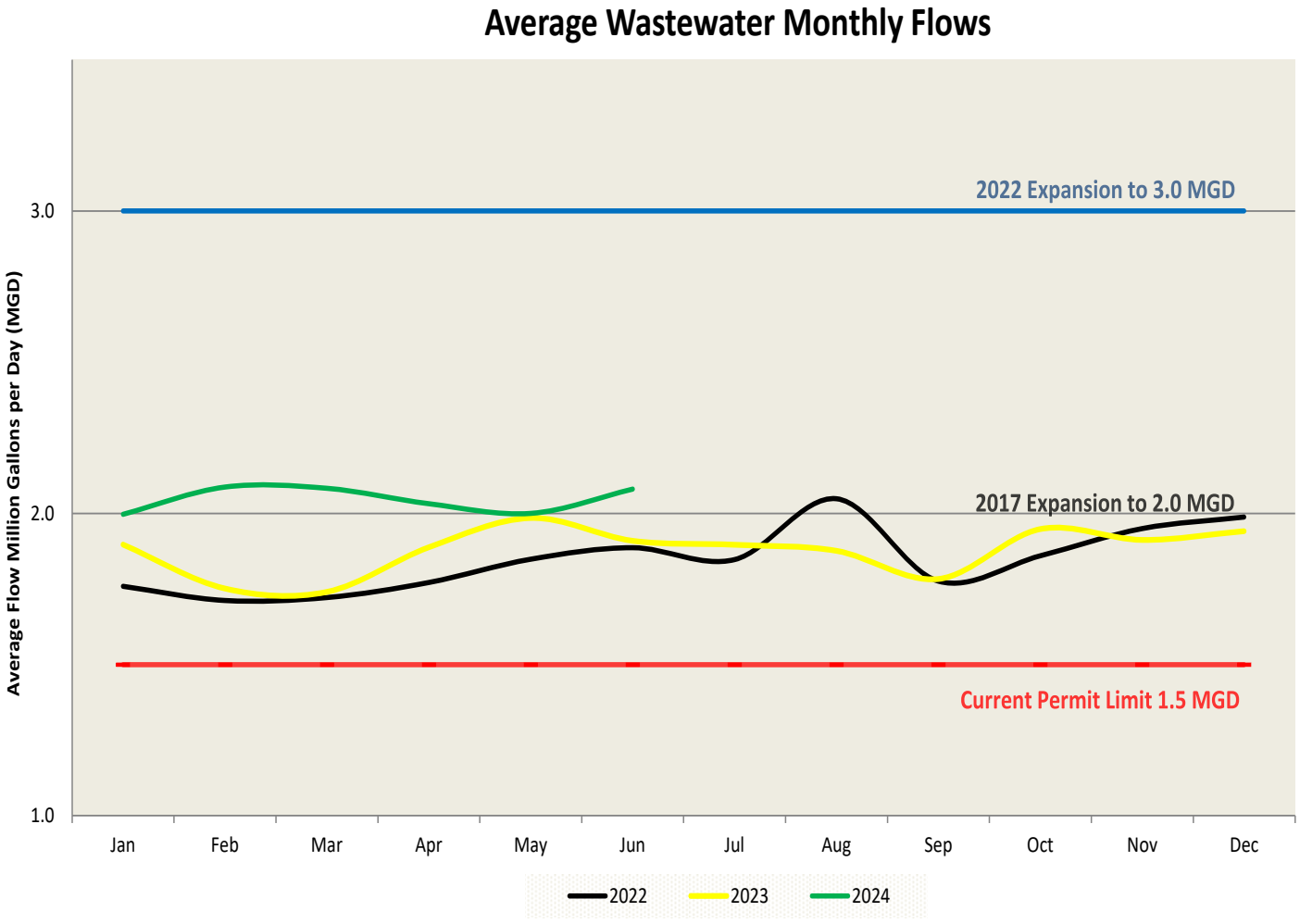
Average Flow Million Gallons per Day (MGD):

2021 - 1.73 MGD | 2022 - 1.85 MGD | 2023 - 1.98 MGD

The average monthly flows in the first quarter of 2024 were considered high compared to previous years. This is likely due to moderate precipitation and growth. June 2024 set a high average monthly flow of 2.08 million gallons per day (MGD).

What Does this Tell Us?

The NWRF is permitted to treat 3.03 MGD, design for expansion is required at 80% (2.4 MGD) of permitted capacity and we must be in construction for an expansion at 95% (2.9 MGD) capacity. Based on current growth trends, we are 7-8 years out from our next expansion. As development becomes more dense, we could see that timeline shrink.



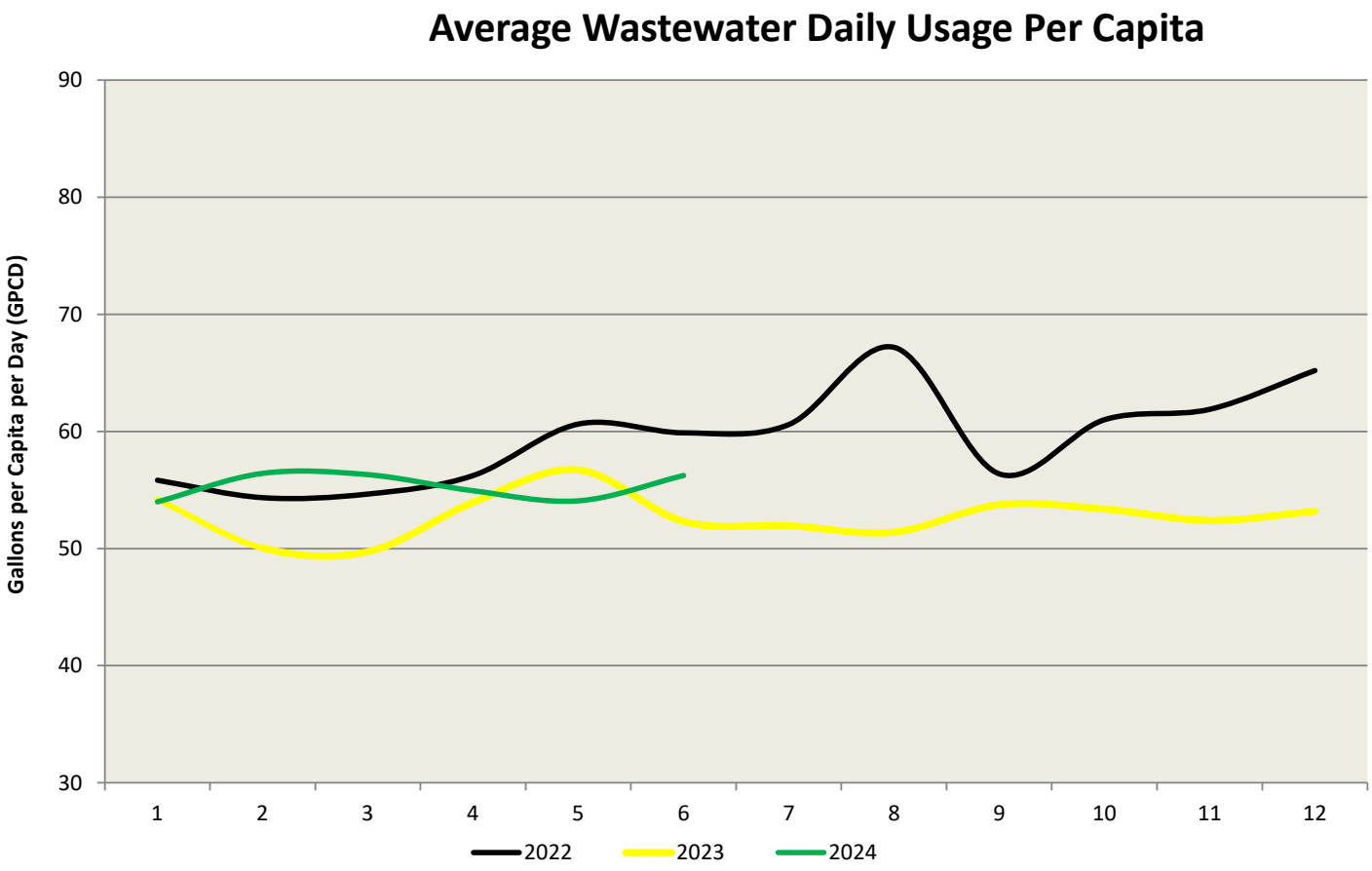
Annual Gallons Per Capita per Day (GPCD):

2021 - 58 GPCD | 2022 - 59 GPCD | 2023 - 53 GPCD

This graph depicts customer indoor water usage. The average daily usage per capita in the first quarter of 2024 was not unusual compared to previous years. In comparison, August 2022 had the highest usage at 67 GPCD, again due to intense rain.

What Does this Tell Us?

High precipitation events that flood streets have a major impact on inflows to the NWRF. This is primarily due to leakage into manholes. Overall usage per capita continues to be tempered by lower water using plumbing fixtures and newer, less prone to leakage, infrastructure.



MONTHLY WEATHER DATA FOR BOULDER

National Oceanic and Atmospheric Administration (NOAA) & Natural Resource Conservation Service (NRCS)

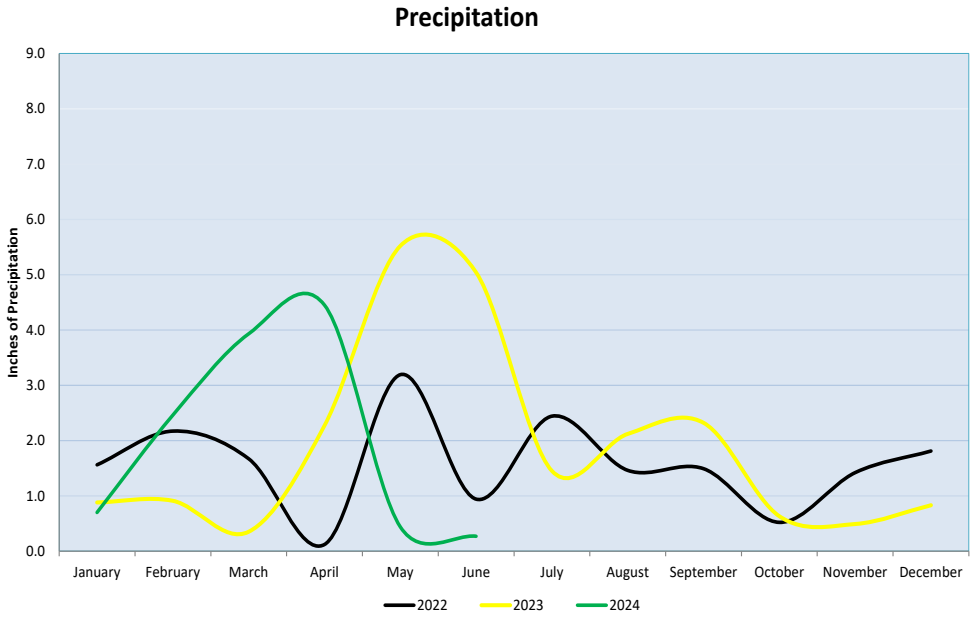
NOAA is predicting below 40 – 50% below normal precipitation above normal temperatures July – September. This year's high precipitation is on display in the graph below. We had a generally average snowfall year and snowmelt is Erie's primary source of water supply.

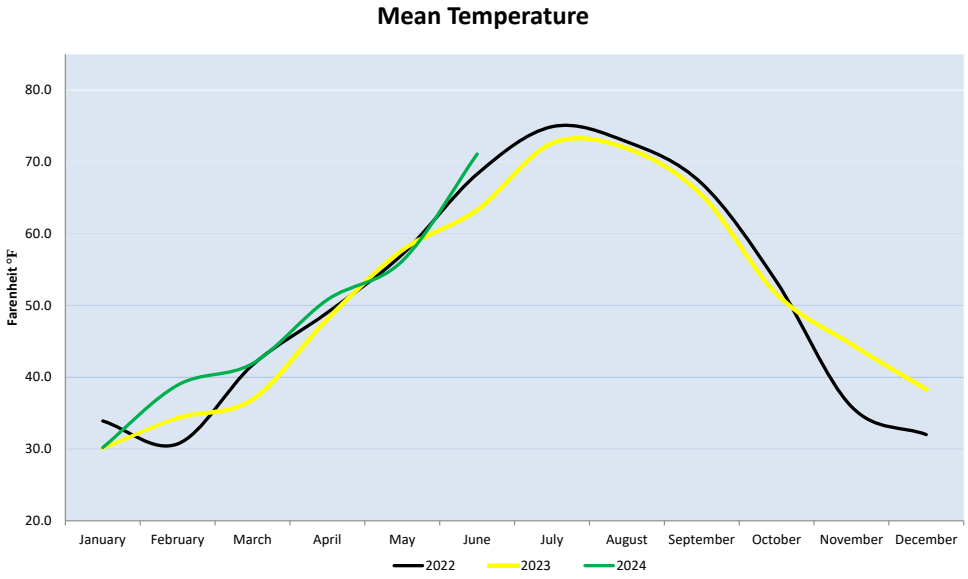
HIGHLIGHTS

We continue to move forward to develop the North Water Treatment Facility design as well as Boulder Creek and Filly Lake supplies.

We also are continuing to work through water saving landscape standards.

The Utility Rate and Fee Study has an August 20 Study Session.



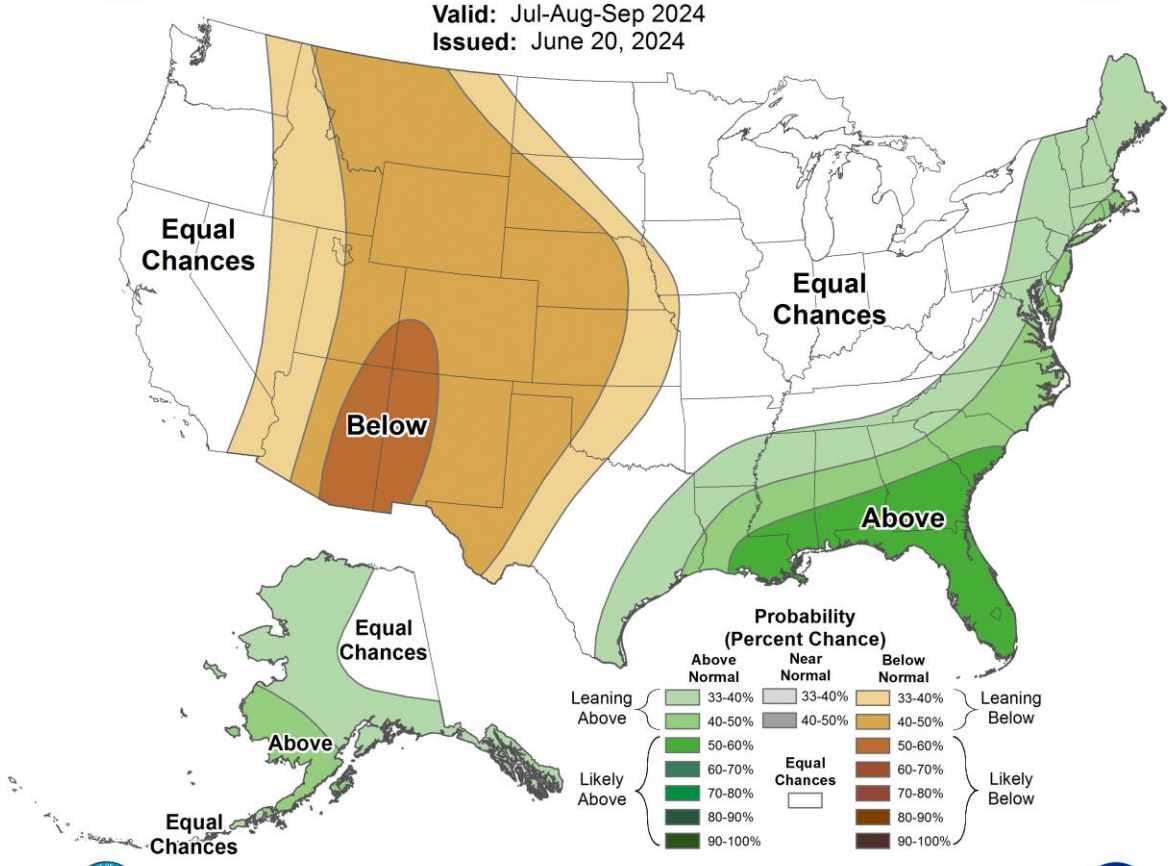


What Does this Tell Us?

Precipitation and temperature are the two most significant factors in irrigation season water demands. Tracking these demands over time helps us track demand patterns and also see factors that may influence demands and timing in water supplies and wastewater I&I.

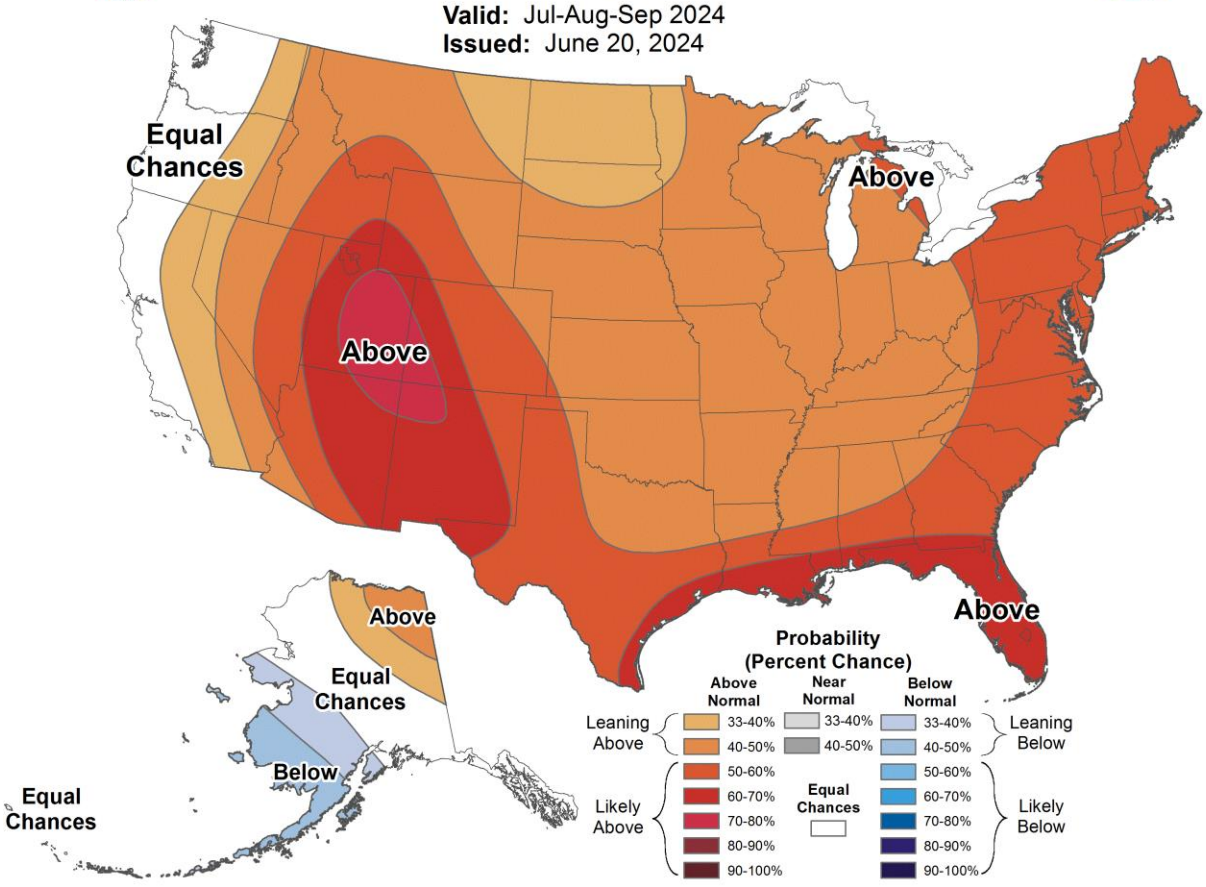
Seasonal Precipitation Outlook

Valid: Jul-Aug-Sep 2024
Issued: June 20, 2024



Seasonal Temperature Outlook

Valid: Jul-Aug-Sep 2024
Issued: June 20, 2024



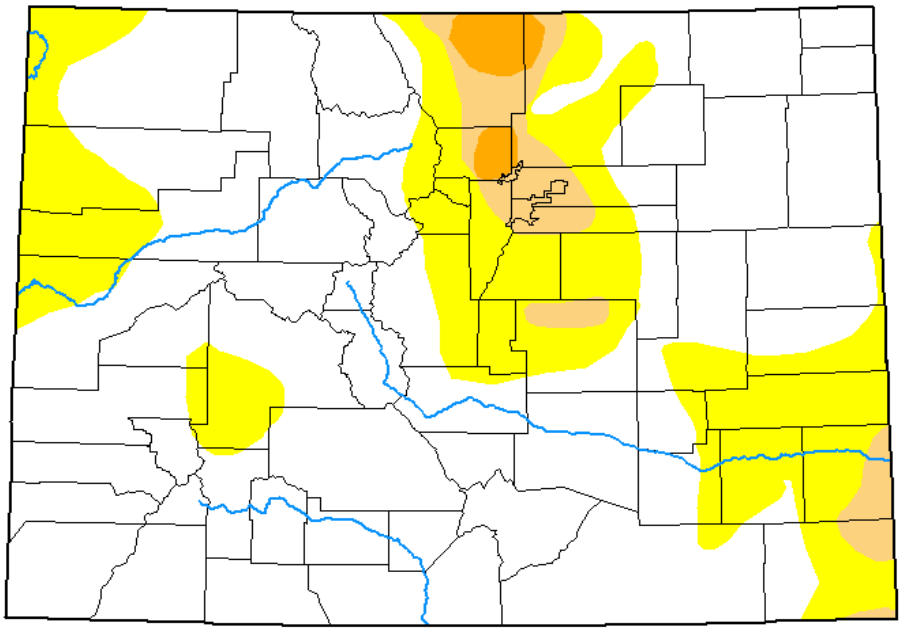
U.S. Drought Monitor

Colorado

July 9, 2024

(Released Thursday, Jul. 11, 2024)

Valid 8 a.m. EDT



Intensity:

- None
- D0 Abnormally Dry
- D1 Moderate Drought
- D2 Severe Drought
- D3 Extreme Drought
- D4 Exceptional Drought

The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. For more information on the Drought Monitor, go to https://droughtmonitor.unl.edu/About.aspx

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droughtmonitor.unl.edu

River Surfing in Salida, Colorado