IOWA DNR
DEPARTMENT OF NATURAL RESOURCES

WATER SUMMARY UPDATE

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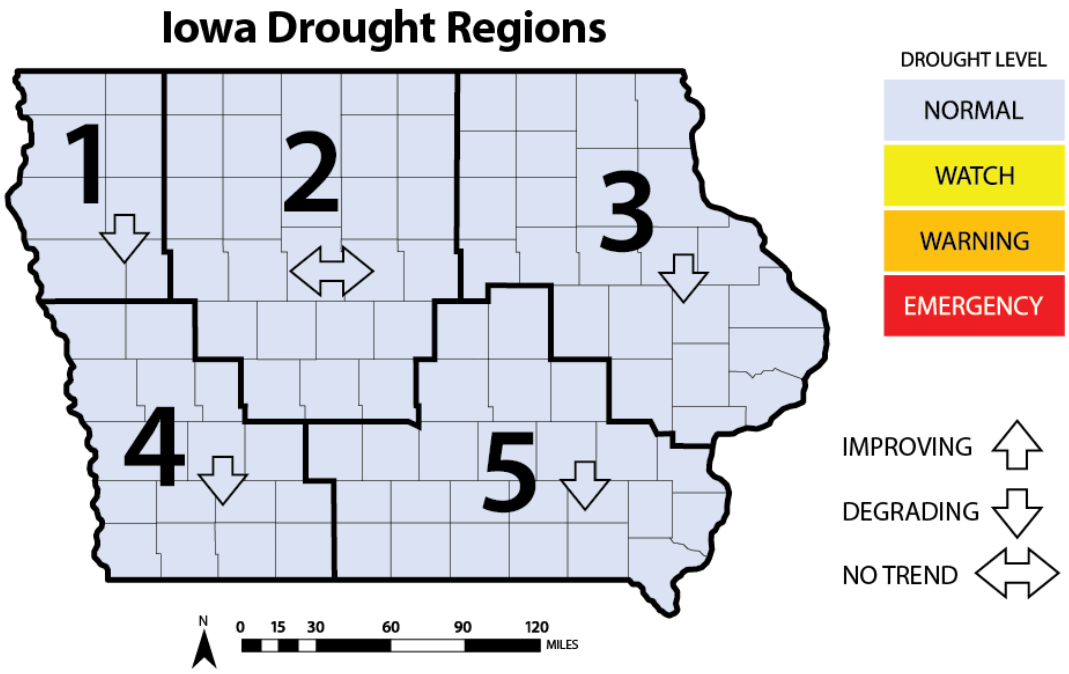
A snapshot of water resource trends for September 2025

IOWA DROUGHT CONDITIONS



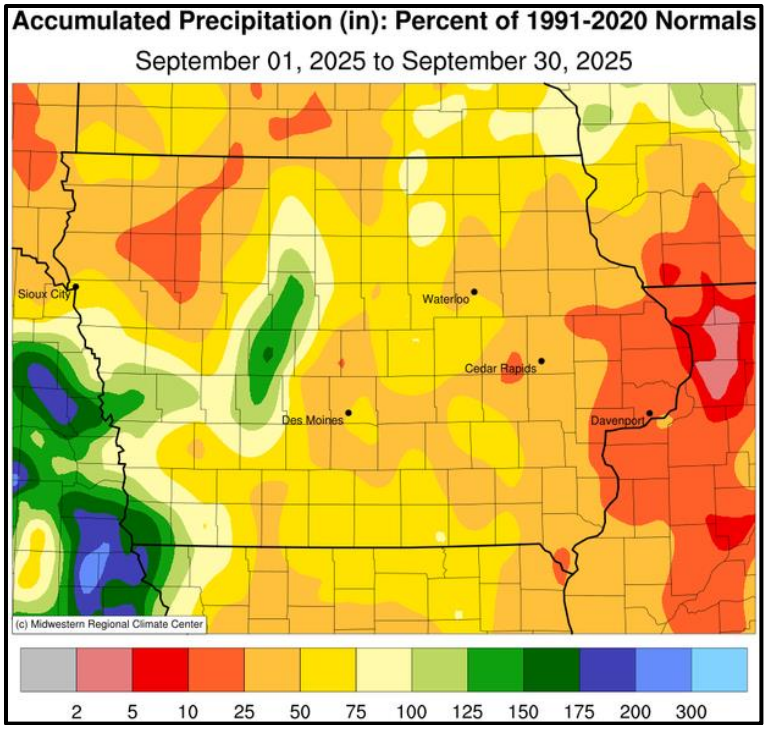
CONDITION SUMMARY - CONDITIONS DEGRADE THROUGH SEPTEMBER

Iowa's drought-free status ended in early October due to degrading conditions throughout September. D0 - Abnormally Dry conditions now cover half the state, mostly in northwest and southeast Iowa. A small area of D1 - Moderate Drought has also reappeared in eastern Iowa. Stream flows remain largely normal, while soil moisture is trending slightly drier in the state. Currently, there are no drought watches or warnings in effect for any of the state's drought regions. Looking ahead, the Climate Prediction Center's (CPC) Seasonal Drought Outlook suggests that new drought conditions are likely to develop in southeastern Iowa. The CPC has issued a new outlook for October, indicating an uncertain precipitation outlook, with no clear signal. However, the entire state will likely trend warmer than normal.

September Precipitation and Temperature

Iowa's statewide preliminary precipitation totaled 1.70 inches, or 1.78 inches below normal. Much of Iowa reported precipitation deficits through September, with the driest conditions across eastern and northwest Iowa; these deficits were at or above two inches. Swaths of stations in western Iowa reported positive departures in the range of one to two inches. Monthly precipitation totals ranged from 0.22" in Davenport to 8.24" in Mondamin.

The statewide preliminary average temperature was 67.1 degrees, or 3.4 degrees above normal. Davenport reported the month's high temperature of 99 degrees on the 13th, 22 degrees above normal. Stanley reported the month's low temperature of 32 degrees on the 7th, which was 19 degrees below normal.



Standardized Precipitation Index (SPI)

The SPI is an index based on accumulated precipitation for various time scales. SPI is the most commonly used indicator worldwide for detecting and characterizing meteorological droughts. The SPI indicator measures precipitation differences based on a comparison of observed total precipitation amounts over the period of interest with the long-term historical precipitation record for that period. Droughts are characterized by negative SPI values, while positive SPI values indicate wet periods. The range of SPI values is between -3 and +3, denoting “extremely dry” to “extremely wet”.

Ninety-day SPI values for all drought regions in September (comparing July, August, and September precipitation) range from 0.8 to 1.4, with all values above zero. Drought Regions 3 and 4 180-day SPI values increased slightly, and all others decreased slightly, though all values remain above zero.

Drought Region	3-month SPI	6-month SPI	IDP Classification ↑ = improving ↓ = degrading ↔ = no trend
1	0.8	0.6	Normal ↓
2	1.4	1.3	Normal ↔
3	1.1	0.9	Normal ↔
4	0.8	0.6	Normal ↔
5	0.7	0.4	Normal ↔

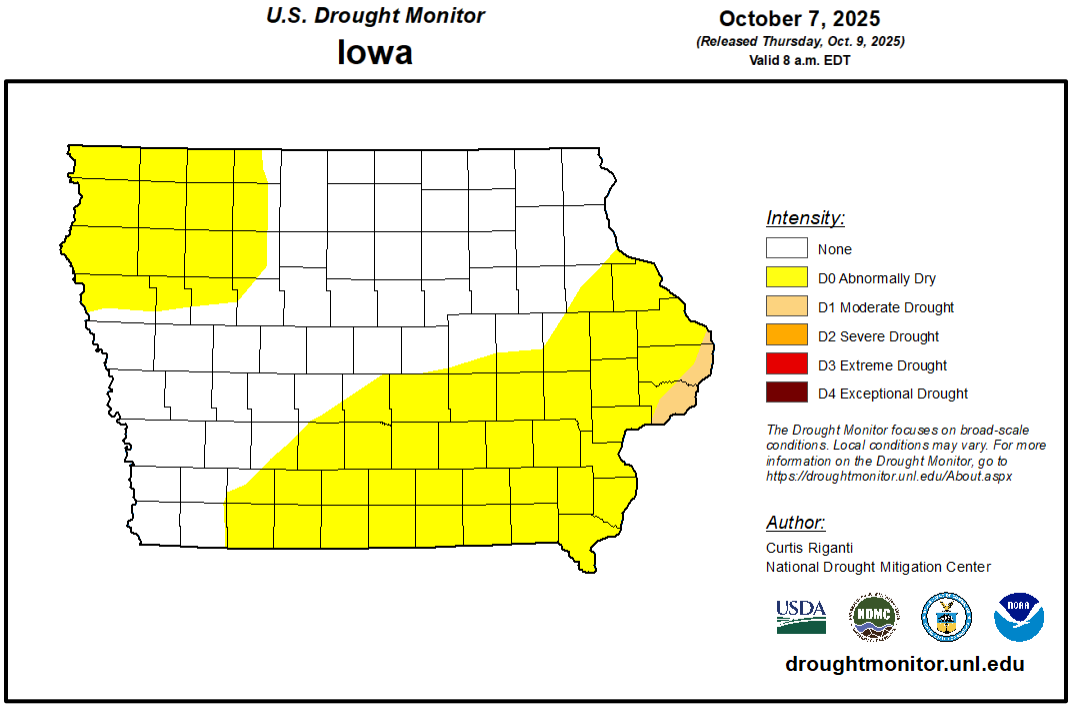
Standardized Streamflow Index (SSI) and Streamflow

SSI is a metric that compares current streamflow against the historical record to determine how far away the current streamflow value is from the river’s historical mean observed on the same date. SSI values in all five drought regions have decreased, with Drought Region 3 with the largest 30-day SSI decrease in September compared to August.

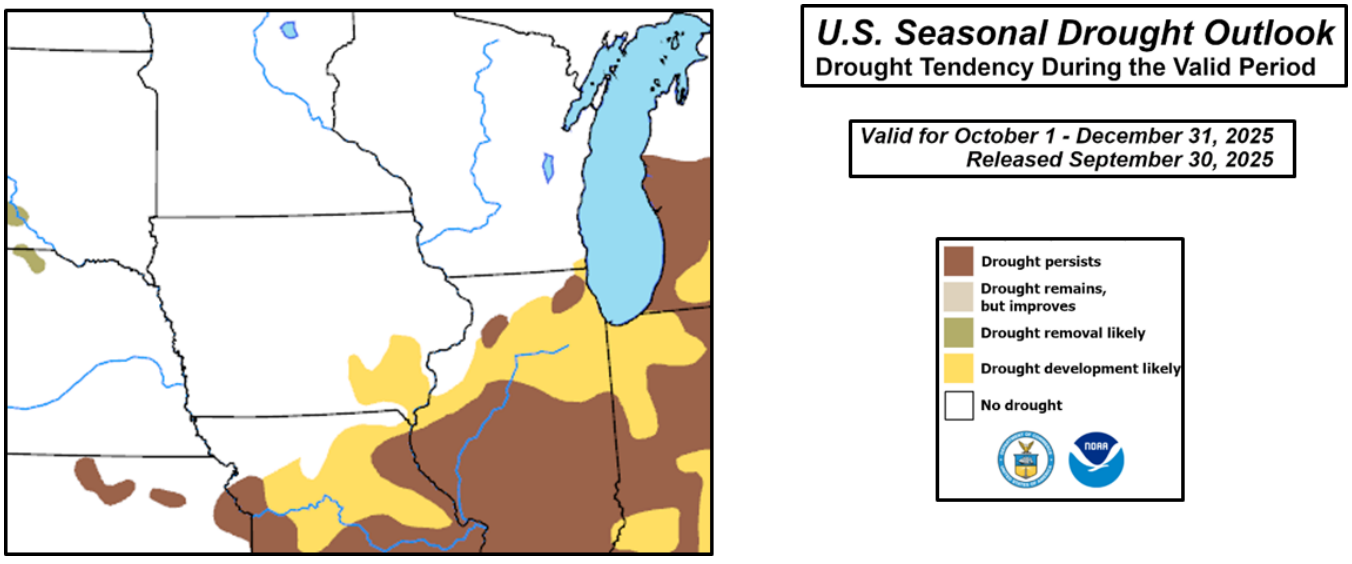
According to the US Geological Survey, in September, most of the state experienced normal and above-normal streamflow conditions. A small portion of western Iowa experienced below normal flow conditions.

US Drought Monitor and Drought Conditions

The current US Drought Monitor (USDM) released on October 9 confirms the expansion of abnormally dry conditions and drought. By the end of September, the entire state was free of drought, and despite dry conditions, just over two-thirds of the state was rated free of dryness. However, the current map depicts the further expansion of D0 - Abnormally Dry to cover half of the state, and a small area of D1 - Moderate Drought has developed in eastern Iowa.



The Seasonal Drought Outlook released on September 30, 2025, by the CPC, valid through December 31, 2025, indicates the potential for drought to develop in southeastern Iowa. While the Seasonal Precipitation Outlook offers no clear signal for precipitation, the Seasonal Temperature Outlook indicates that above-normal temperatures are likely across the state. The Seasonal Drought Outlook considers the impacts of recent precipitation as well as seasonal precipitation outlooks.



Other Water Resource Information

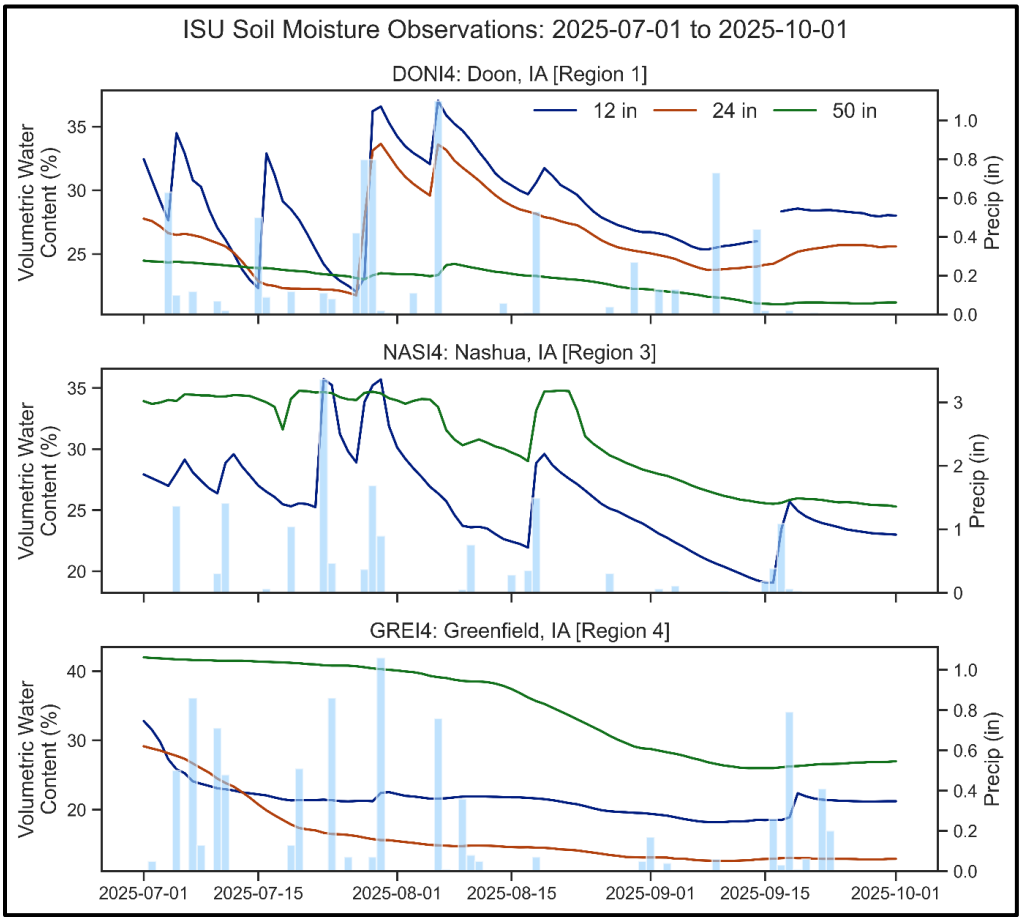
Border River Conditions

In their monthly update of Missouri River conditions dated October 6, 2025, the Army Corps of Engineers (USACE) indicates that the volume of water stored in the system of reservoirs is 50.4 Million Acre-Feet (MAF), which is about the

same volume as last month. US Army Corps of Engineers reports that total reservoir storage peaked for the year in the summer and is decreasing. The annual runoff forecast updated on October 2, 2025, for the upper Missouri River Basin above Sioux City has been raised to 19.6 Million Acre Feet (MAF) or 76% of the average annual runoff. “Beneficial rainfall occurred over central South Dakota and North Dakota in September resulting in well-above average runoff into Oahe, Big Bend, Fort Randall, and Gavins Point,” said John Remus, chief of the U.S. Army Corps of Engineers’ Missouri River Basin Water Management Division. “The above-average runoff combined with the lower releases from Gavins Point slightly improves the System storage outlook for the beginning of the 2026 runoff season,” Remus added.

September Soil Moisture

Most of eastern and parts of southwestern Iowa show values of soil saturation below 30% at the surface of the soil. At deeper soil layers, soil saturation is above 50% in most of the state, except areas in the northwest, southwest, and northeast.



ADDITIONAL INFORMATION

This edition of the Water Summary Update continues to reflect use of the 2023 Iowa Drought Plan (IDP), which was developed as a collaborative effort between the Department of Natural Resources, the Department of Agriculture and Land Stewardship, and the Department of Homeland Security and Emergency Management. The IDP can be seen in its entirety on the DNR’s website: The Iowa Drought Plan.

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