State of Ohio Quarterly Climate Summary

THE OHIO STATE UNIVERSITY

Summer Review (Jun-Aug)

Released: 9/25/2025

Temperature and Precipitation

This summer in Ohio was characterized by above-average temperatures and notable variability in precipitation departures from normal. Average temperatures across most of the state were 0–1°F above normal, with localized areas of 1–2°F above normal and a small region in southern Ohio reaching 2–3°F above normal (Fig. 1a). For precipitation, most of Ohio received 7.5–15 inches of rainfall, with isolated pockets accumulating 15–20 inches (Fig. 1b). The departure-from-normal precipitation map highlights this variability. Much of the state was 0–4 inches below normal, though bands of 0–4 inches above normal appeared south of Columbus and in the Cleveland area (Fig. 1c). Similarly, the percent-of-normal map shows most of Ohio at 75–100% of normal precipitation, with scattered sections of 50–75% in the north and southwest, and areas of 100–150% of normal south of Columbus and around Cleveland (Fig. 1d). The small regions of higher anomalies are a result of localized, extremely heavy or repeated precipitation from strong storms.

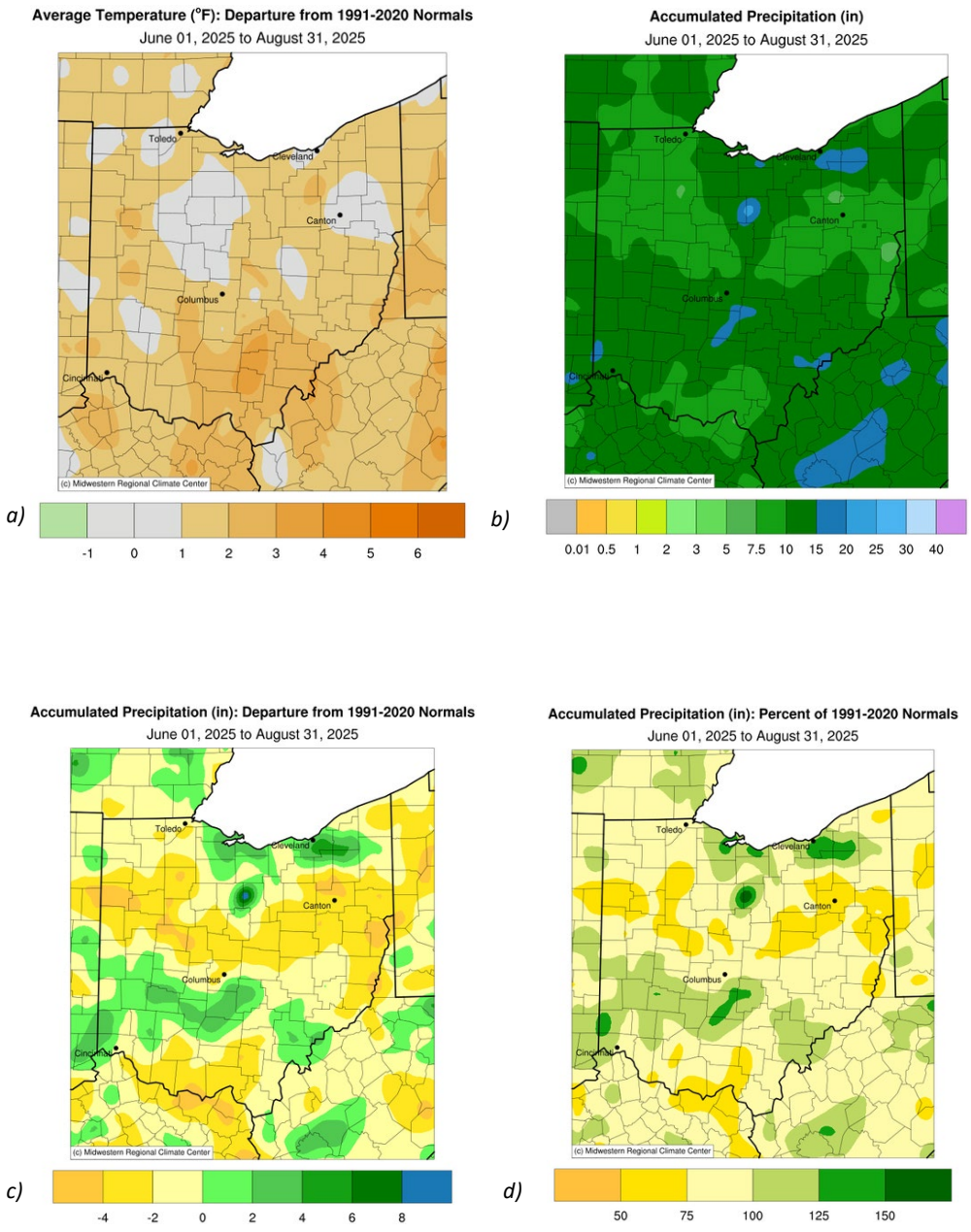


Figure 1: Statewide departures from normal temperature (a) and accumulated precipitation (b) over the summer months at top, followed by statewide accumulated precipitation departures (c) and percent of normals for precipitation (d) at bottom. All data courtesy of the Midwestern Regional Climate Center (http://mrcc.purdue.edu).

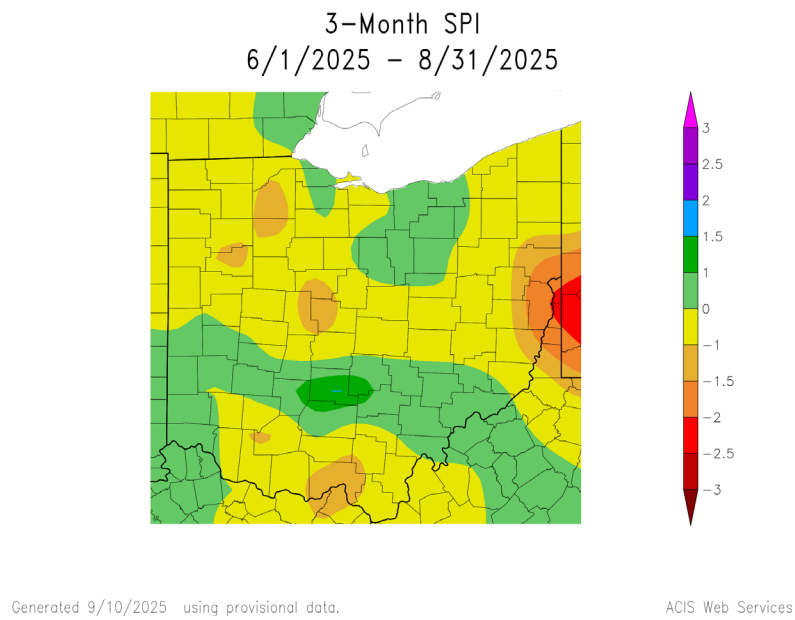


Figure 2: Three-month Standardized Precipitation Index (SPI) across the state of Ohio from June 2025 through August 2025, used as a proxy for soil moisture conditions. Data courtesy of the High Plains Regional Climate Center (https://hprcc.unl.edu/)

Soil and Energy

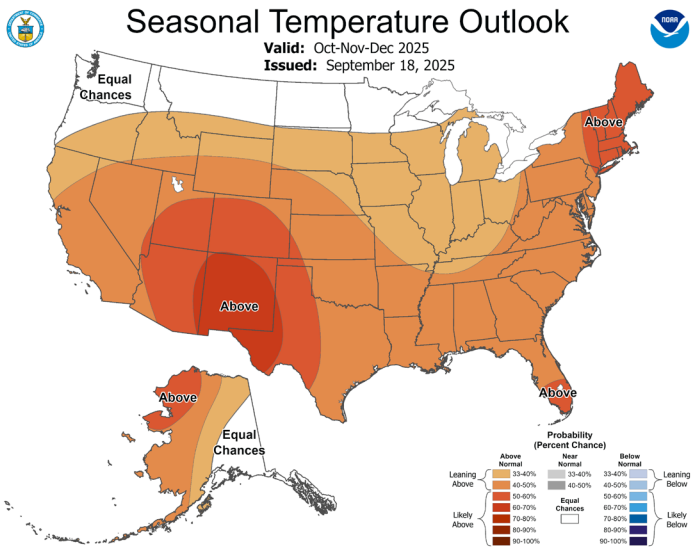
The 3-month Standardized Precipitation Index (SPI) indicates near-normal moisture conditions for most of Ohio during the summer. Most of the state recorded SPI values of –1 to 1 which indicates near normal soil conditions, with small pockets of –1 to –1.5 indicating drier than normal conditions and 1 to 1.5 indicating wetter than normal conditions. A region of –1 to –2.5 SPI values extended into the center of Ohio's eastern border indicated a region of extreme dryness (Fig. 2). These values suggest that while broad conditions were close to normal, localized areas experienced more notable dryness or wetness.

Warmer-than-normal temperatures resulted in a higher number of cooling degree days (CDDs) and a lower number of heating degree days (HDDs). Departures from normal were +90 to +150 for CDDs and –15 to –35 for HDDs (Fig. 3). These increased temperatures likely led to higher demand for air conditioning throughout the summer, raising overall energy use in Ohio.

Climate Division	Heating Degree Days	Normal	Departure	Cooling Degree Days	Normal	Departure
1	23	39	-16	790	673	117
2	25	40	-15	728	637	91
3	39	62	-23	611	516	95
4	20	37	-17	815	666	149
5	19	31	-12	801	677	124
6	33	55	-22	665	553	112
7	33	52	-19	647	556	91
8	8	21	-13	899	755	14
9	0	17	-17	932	746	186
10	16	32	-16	793	640	153
Statewide	23	39	-16	760	640	120

Figure 3: (Left) Total June 2025 – August 2025 heating & cooling degree days. (Right) Corresponding Ohio Climate Divisions. Data courtesy of the Midwestern Regional Climate Center (http://mrcc.purdue.edu).

a)



b)

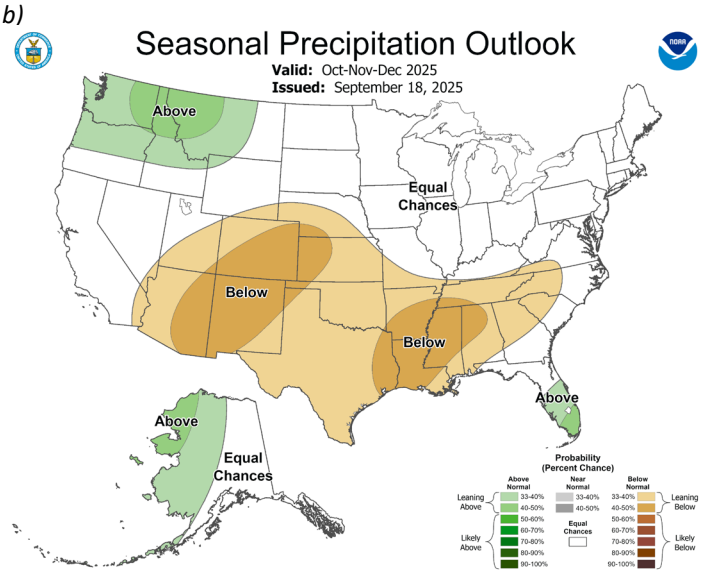


Figure 4: a) Nationwide Seasonal Temperature and b) Precipitation Outlook for October – December 2025. Courtesy of the Climate Prediction Center (https://www.cpc.ncep.noaa.gov/).

Looking Ahead

The Climate Prediction Center's (CPC) seasonal outlook suggests a warm autumn for Ohio. The temperature outlook predicts above-normal temperatures across the entire state, with generally low confidence overall and slightly higher confidence in eastern Ohio (Fig. 4a). The precipitation outlook indicates equal chances of above- or below-normal precipitation over the next three months (Fig. 4b).

Overall, these forecasts are consistent with recent seasonal trends, with the only notable change being a slight decrease in confidence for the temperature outlook. Warmer-than-normal conditions could extend the growing season for some crops, providing additional time for late harvests and potentially benefiting farmers. At the same time, the reduced need for early-season heating may temporarily lower energy demand, although swings in daily temperatures could still create short-term variability in usage.

Note: these outlooks do not provide the quantity of above or below normal conditions, just the likelihood of occurrence (i.e., the probability).

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