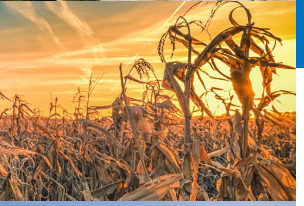



Drought Information Statement for Eastern OR & South Central WA

Valid June 14, 2024

Issued By: NWS Pendleton

Contact Information: pdt.operations@noaa.gov

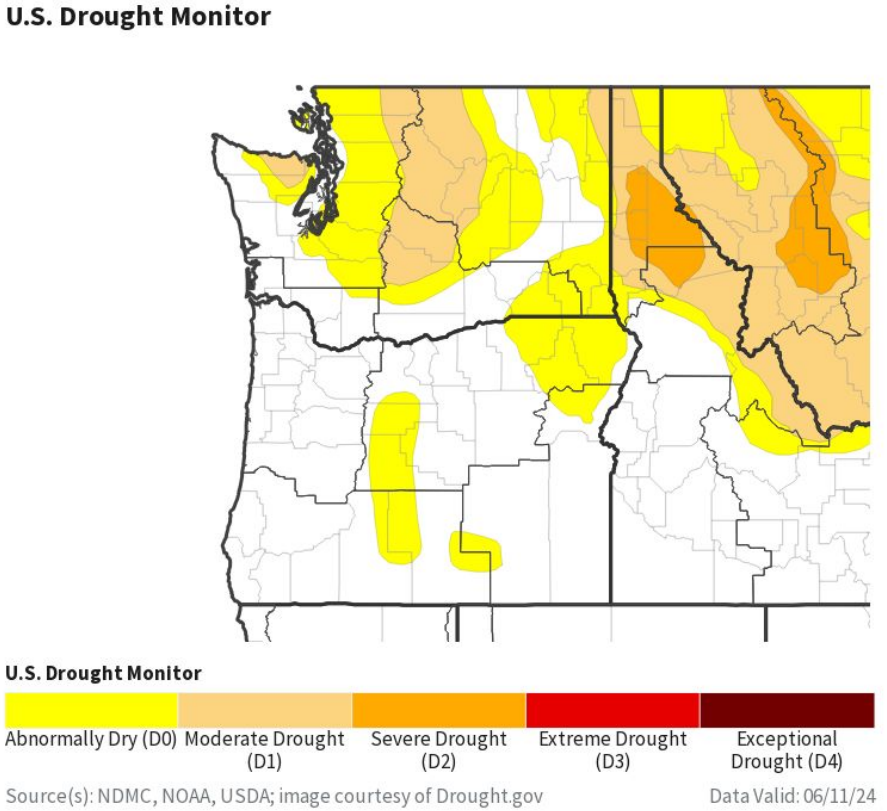
- This product will be updated if drought conditions change significantly.
- Please see all currently available products at https://drought.gov/drought-information-statements.
- Please visit https://www.weather.gov/pdt/DroughtInformationStatement for previous statements
- Please visit https://www.drought.gov/drought-status-updates/ for regional drought status updates.

- Moderate drought is affecting portions of the central WA Cascades and the Yakima and Kittitas Valleys
- Abnormally dry conditions continue in central OR, the Yakima Valley, the Blue Mountain Foothills of WA and OR and are expected to develop further into most of the rest of southeast and south central WA in the next few months
- Mountain snowpack is nearly gone, except in the higher mountains of the Cascades and the eastern OR mountains
- Northwest Geographic Area denotes the potential for significant fires will remain near normal (low risk) through September, except for a small area south and southeast of John Day (above normal risk)

U.S. Drought Monitor

Link to the latest U.S. Drought Monitor

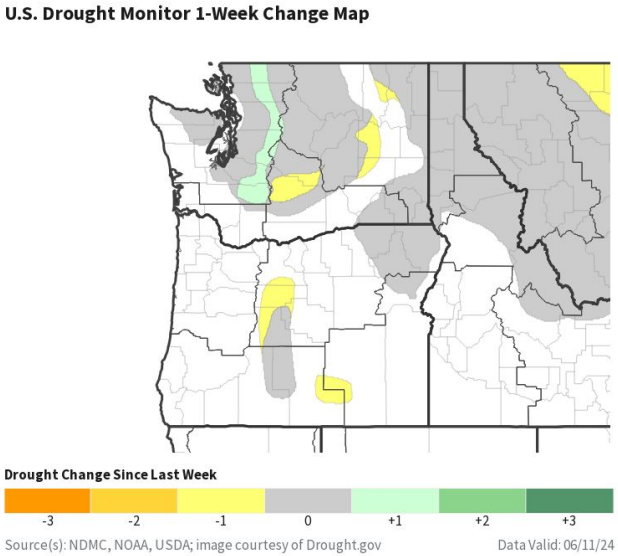
- Drought intensity and Extent
  - **D1 (Moderate Drought)**: Portions of the central Washington Cascades and the Kittitas and Yakima Valleys
  - **D0: (Abnormally Dry)**: Northern Blue Mountains of OR and WA, Blue Mountain Foothills of WA, Northern Blue Mountain Foothills of OR, the Grande Ronde Valley, portions of the Yakima Valley, portions of central OR, portions of the Columbia Basin of OR and WA, Wallowa County and the eastern slopes of the southern Washington Cascades



Recent Change in Drought Intensity

Link to the latest 4-week change map for the Pacific Northwest

- One-Week Drought Monitor Class Change
  - Drought Worsened (1 Class Degradation): Portions of the Yakima and Kittitas Valleys, central and north central OR
- Four-Week Drought Monitor Class Change
  - Drought Worsened (2 Class Degradation): Small portion of northern Yakima County.
  - Drought Worsened (1 Class Degradation): Portions of the Yakima and Kittitas Valleys, central and north central OR and eastern Wallowa County.
  - Drought Improved: Small portion of the central Washington Cascade crest



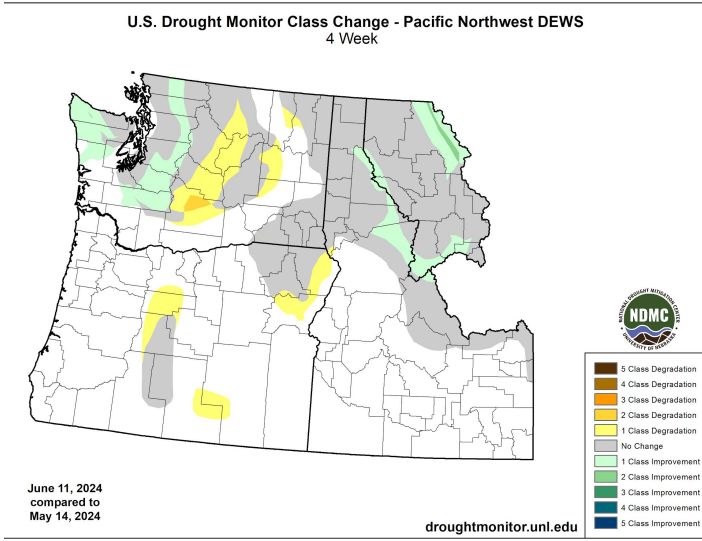
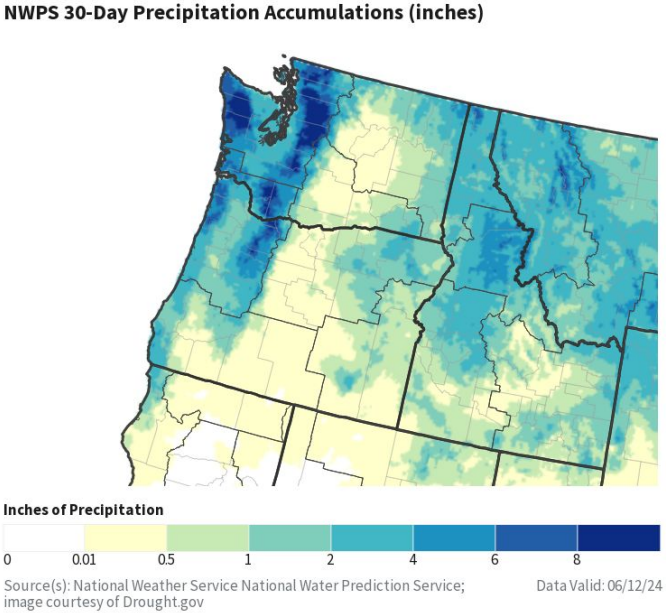


Image Captions:
Right - 4 Week Drought Class Change
Left - 1 Week Drought Class Change
Data Courtesy U.S. Drought Monitor and Drought.gov
Data over the past 7 and 28 days ending June 11, 2024

Precipitation - Last 30 Days

- Mostly well below normal precipitation areawide, except slightly above normal across the far eastern portions of the WA Columbia Basin, WA Blue Mountain Foothills, and the northern Blue Mountains of WA, and the WA Cascade crest
- The Yakima and Kittitas Valleys, central and north central OR and southern Deschutes County were less than 25 percent of normal
- Highest precipitation amounts were in excess of 3 inches along parts of the Cascade crest and 2-3 inches in the northern Blue and Wallowa Mountains



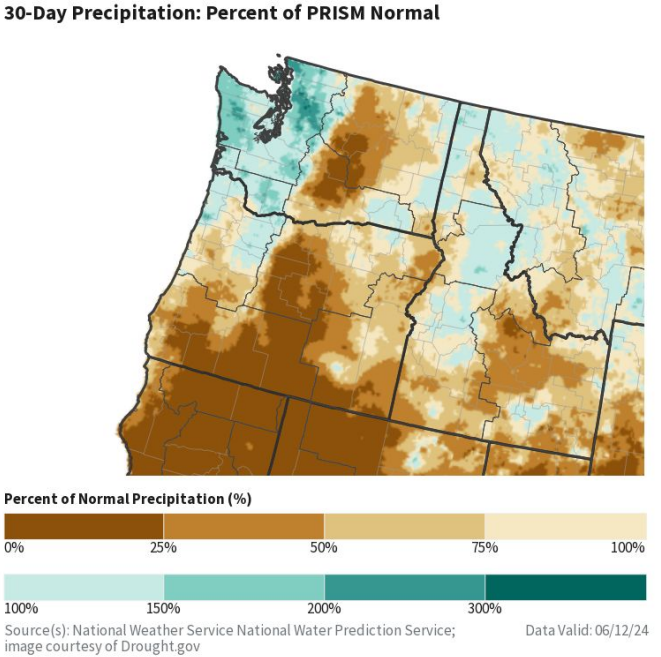
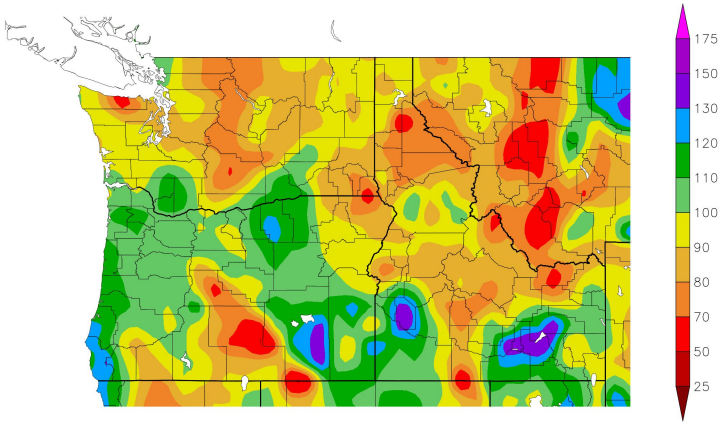


Image Captions:
Right - Precipitation Amount for Pacific NW
Left - Percent of Normal Precipitation for Pacific NW
Data Courtesy NWS Water Prediction Service
Data over the past 30 days ending June 12, 2024

Precipitation - Current Water Year

- Below normal precipitation continues for the current water year as a whole where precipitation was 50-100 percent of normal, except for parts of north central and central OR into the Lower Columbia Basin of WA
- The exception: areas of near to above normal precipitation (90-130%) across much of northern OR and the western WA Columbia Basin could largely attributable to precipitation in December, 2023, January 2024, and May 2024



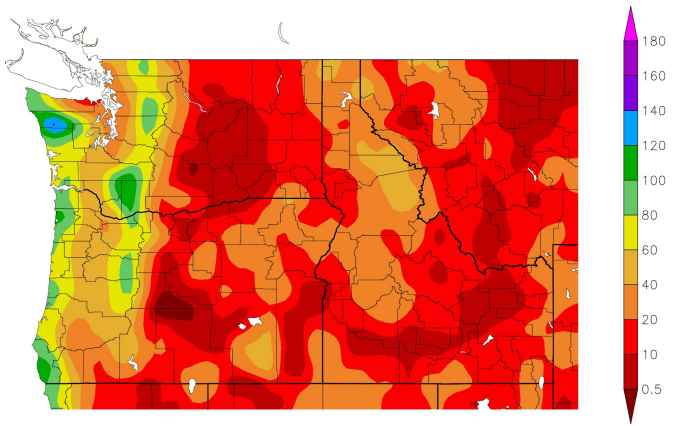
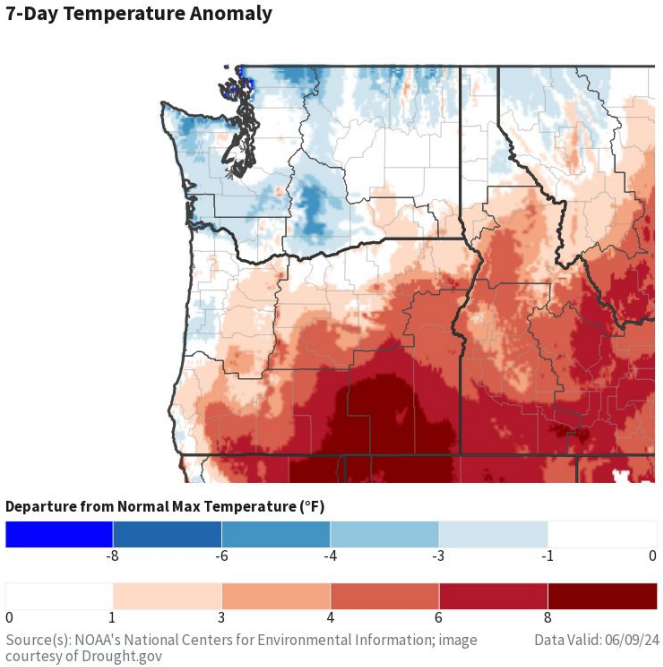


Image Captions:
Right - Precipitation Amount for Pacific NW
Left - Percent of Normal Precipitation for Pacific NW
Data Courtesy High Plains Regional Climate Center
Data for the current water year ending June 12, 2024

Temperature - Last 30 Days

- Slightly below normal average temperature the last 30 days in the central WA Cascades, the Yakima and Kittitas Valleys, the eastern Simcoe Highlands
- Slightly above normal across central Oregon and Ochoco-John Day Highlands
- Average low temperatures were mainly within a couple of degrees of normal except for 2-6 degrees above normal in the southern WA Cascades and 2-4 degrees below normal in small portions of the Blue Mountains
- Average high temperatures were mainly within a couple of degrees of normal, except for 2-4 degrees above normal across portions of central OR and the Ochoco-John Day Highlands northeast into the Grande Ronde Valley



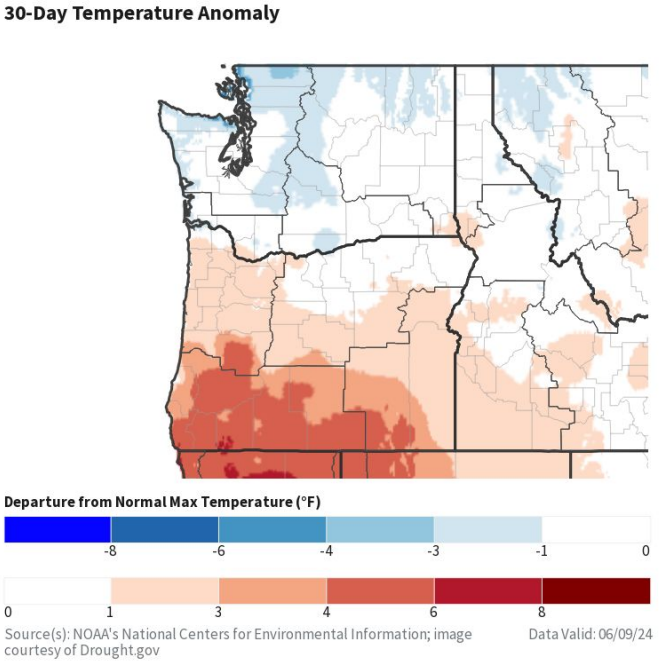


Image Captions:
Right - Temperature for Pacific NW
Left - Percent of Normal Precipitation for Pacific NW
Data Courtesy High Plains Regional Climate Center
Data for the last 30 days ending June 9, 2024

Summary of Impacts

See/submit Condition Monitoring Observer Reports (CMOR) and view the Drought Impacts Reporter

Hydrologic Impacts

- Below to well below normal streamflow (5-20%) across the Upper Yakima, Lower Yakima, Upper Columbia-Priest Rapids, and Lower Snake-Tucannon, elsewhere near to above normal streamflows.
- Reservoir levels are near to slightly below normal (60-96%) with a few outliers below to well below normal (25-55%) - this may affect fish and other aquatic species as well as recreation activities through the summer, especially in the Columbia Basin.

Snowpack Impacts

- Most snow telemetry (SNOTEL) monitoring sites show snow has melted/no remaining snow. There are no known impacts at this time with sites reporting below normal mountain snowpack (45-60%) along the highest peaks of the Washington and Oregon Cascades crest. The Wallowa Mountains are at 15% of normal.

Agricultural Impacts

- There are no known impacts at this time

Fire Hazard Impacts

- There are no known impacts at this time

Other Impacts

- Washington Drought Emergency declared for all counties east of the Cascades

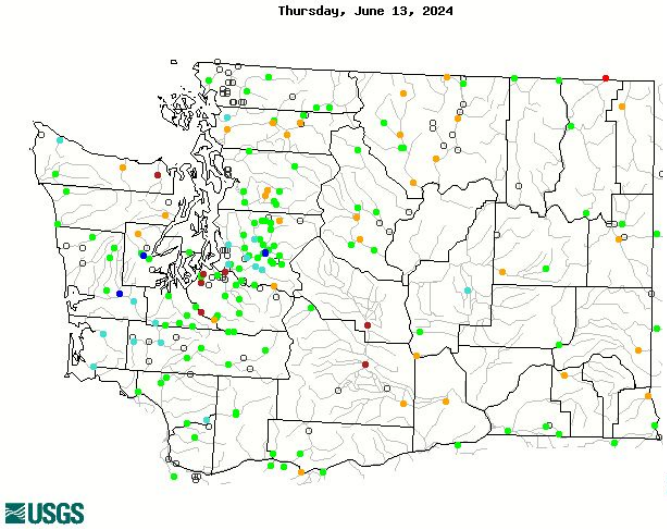
Mitigation actions

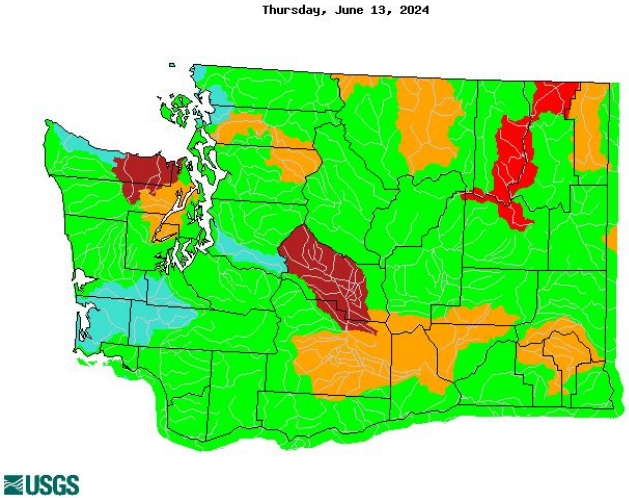
- Please refer to your municipality and/or water provider for mitigation information

Hydrologic Conditions and Impacts - Washington

Main Takeaways

- The Upper Yakima basin has much below normal streamflow (less than the 10th percentile)
- The Lower Yakima, Upper Columbia-Priest Rapids and Lower Snake-Tucannon basins have below normal streamflow (10th-24th percentile)
- Most other river, stream, and creek flows (left) are near normal





Explanation - Percentile classes							
Low	<10	10-24	25-75	76-90	>90	High	No Data
	Much below normal	Below normal	Normal	Above normal	Much above normal		

Impacts

No known impacts at this time

Reduced streamflow may be detrimental to aquatic species and recreational activities.

Image Captions:
Right - USGS 7-day average streamflow station map valid June 13, 2024
Left - USGS 7-day average streamflow HUC map valid June 13, 2024
Data Courtesy USGS Water Watch

Hydrologic Conditions and Impacts - Oregon

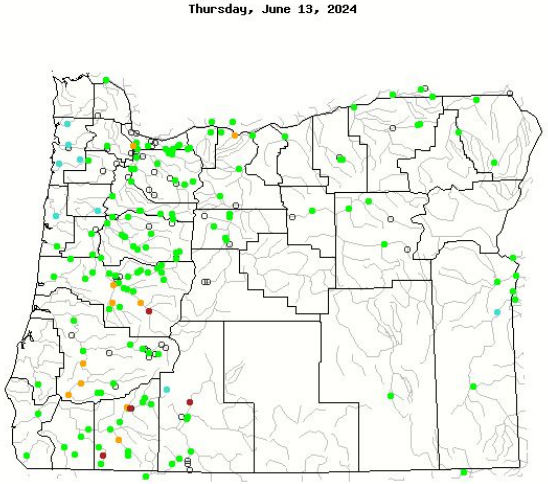
Main Takeaways

- All reporting river, stream, and creek flows (left) across eastern and central OR are near normal, except below normal for the Columbia River at The Dalles
- All HUC basins are reporting streamflows at normal levels (right)

Impacts

No known impacts at this time

Reduced streamflow may be detrimental to aquatic species and recreational activities.



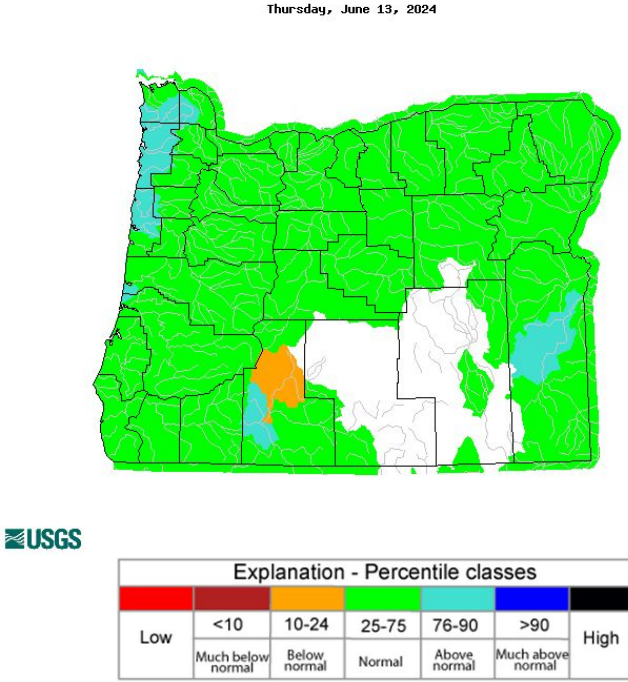
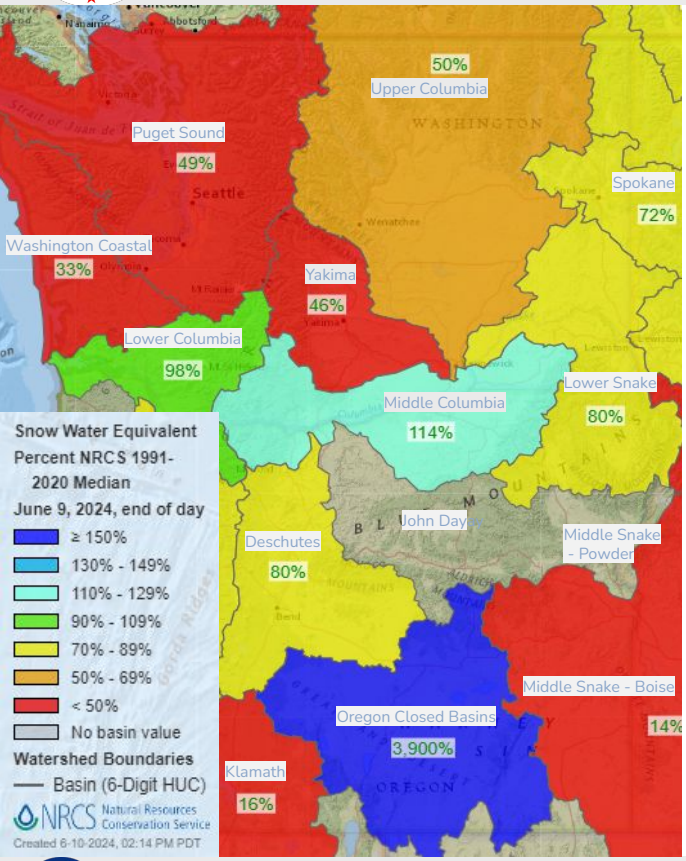


Image Captions:
Right - USGS 7-day average streamflow station map valid June 13, 2024
Left - USGS 7-day average streamflow HUC map valid June 13, 2024
Data Courtesy USGS Water Watch

Snowpack Conditions and Impacts



Main Takeaways

- **Mountain snowpack is past peak across much of the Cascades and is gone at many locations in the mountains of Oregon and Washington**
- Slightly below to slightly above normal snowpack (80-114%) is seen across OR and southern WA except for no value in the John Day basin
- Mountain snowpack across the Yakima and Upper Columbia basins are well below normal (46-50%)

Impacts

No known impacts at this time

Snow water equivalent is related to the amount of water stored in snowpack.

- *The lack of snow can affect the amount of available water for spring and summer snow melt. This can have impacts on water storage, irrigation, fisheries, vegetation, municipal water supplies, and wildfire.*

Image Captions:
Oregon and Washington SNOTEL Current Snow Water Equivalent % of Normal
Data Courtesy USDA Natural Resources Conservation Service
Daily Value as of June 9, 2024

Water Supply Forecast - April - September 2024

Link to the latest Northwest River Forecast Center Water Supply Forecast.

Main Takeaways

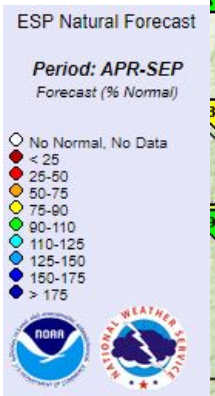
- Much below-normal water supply (50-75% of the 1991-2020 normal) is forecast for the April-September 2024 period across much of south central WA into parts of the Lower Columbia Basin and Union county
- Below-normal water supply (75-90%) is forecast across much of north central OR, Wallowa, and parts of the eastern slopes of the WA Cascades
- Near-normal water supply is forecast across much of central OR east into east central OR

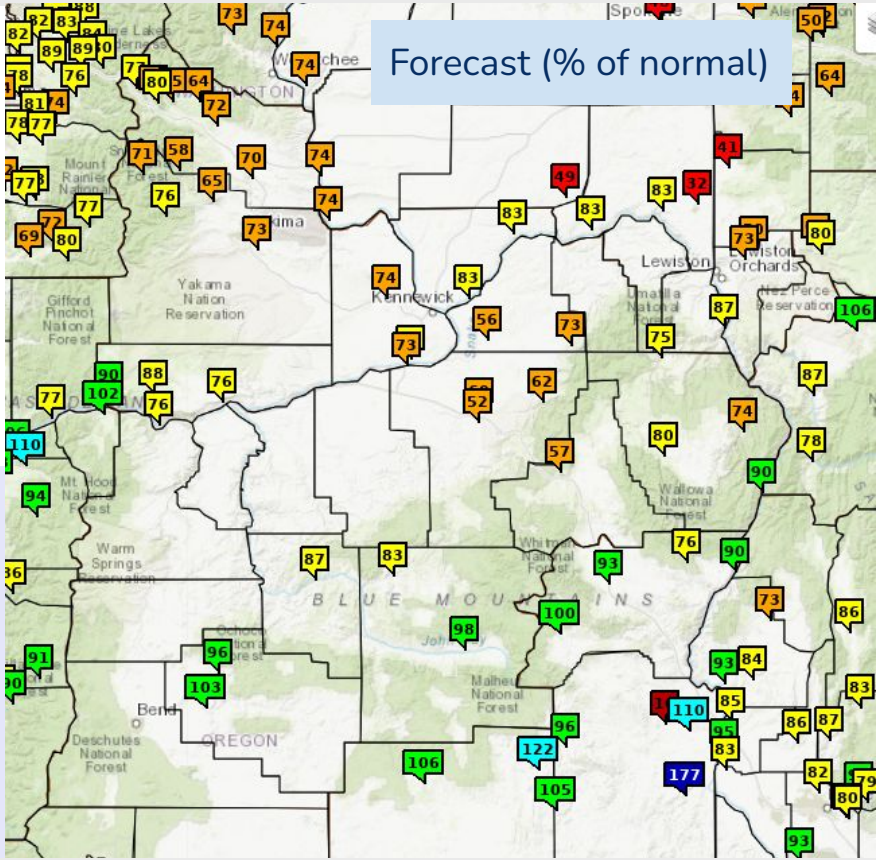
Impacts

No known impacts at this time

Low reservoir levels would be expected to affect agriculture production, fish, and other aquatic species.

Image Caption:
Ensemble Streamflow Prediction Natural Forecast
Data Courtesy NOAA NWS Northwest River Forecast Center
Issued June 10, 2024





Fire Hazard Impacts - June through September

Link to Wildfire Potential Outlooks from the National Interagency Coordination Center.

Main Takeaways

- Near normal (i.e., very low) risk of significant wildland fire potential for June 2024
- Identical forecasts of near normal wildland fire potential, except *above normal south and southeast of John Day*, for July through September 2024
- Significant wildland fires are expected at typical times and intervals during normal significant wildland fire potential conditions

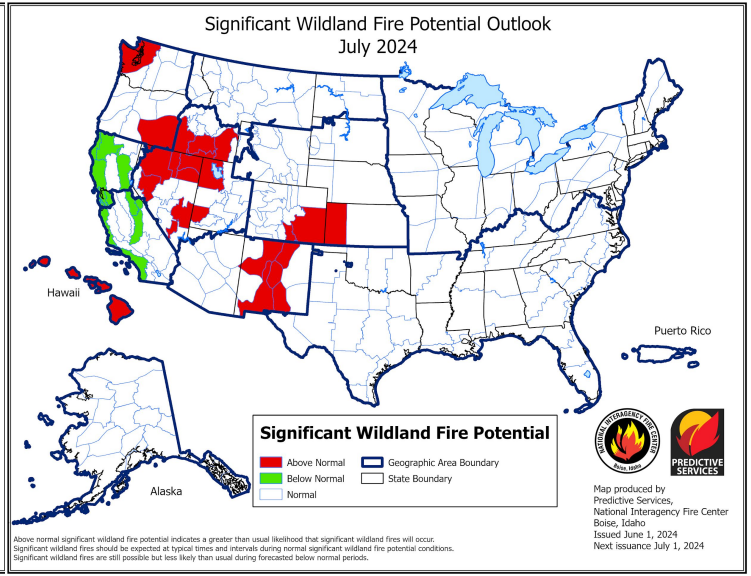


Image Caption:
Left - June 2024
Right - July 2024
Data Courtesy National Interagency Coordination Center
Issued June 1, 2024

Seven Day Precipitation Forecast

- A unsettled weather pattern will provide many opportunities for rainfall tonight through Tuesday with the highest chances across the mountains
    - 7-Day totals: Up to 1.5 inches in the Cascades, up to an inch in the Blue and Wallowa mountains, up to a half inch in the Blue Mountain Foothills and Wallowa County, a tenth to a quarter inch in the eastern Columbia Basin and and up to a tenth of an inch of precipitation over most of the rest of the area
    - Saturday night and Sunday look to be the driest in this coming four day period

- Visit weather.gov/Pendleton for the latest weather forecast

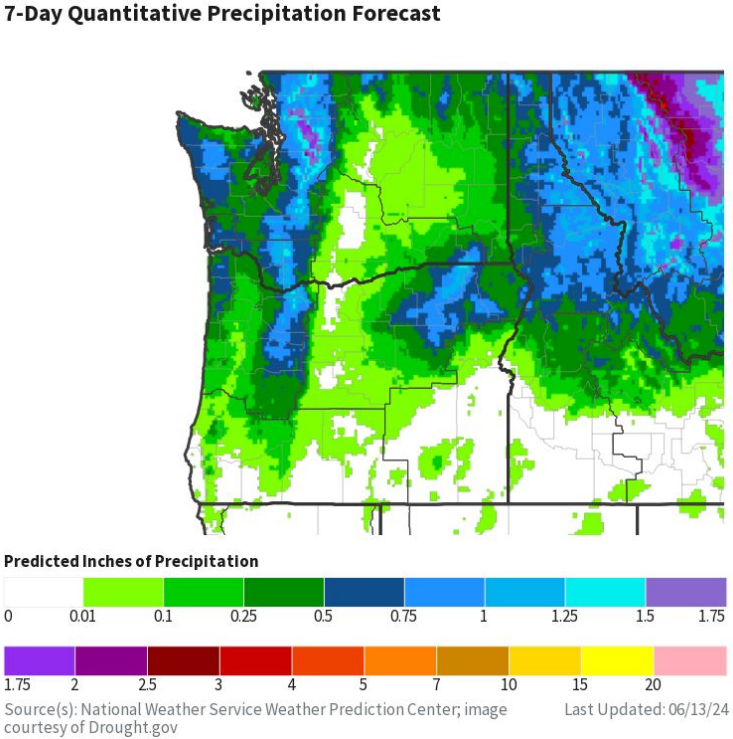


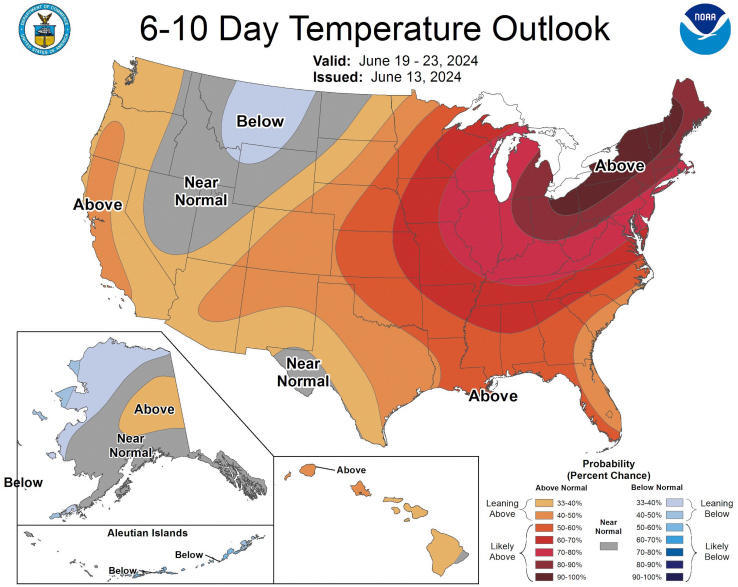
Image Caption:
Weather Prediction Center 7-day precipitation forecast

6-10 Day Outlook

Link to the latest Climate Prediction Center 6 to 10 day Temperature Outlook and Precipitation Outlook.

Main Takeaways

- Leaning mainly towards above normal temperatures area-wide (33-40%), except equal chances of above, near and below normal near the Idaho border
- Leaning towards above normal precipitation WA and northern Oregon (33-40%), and equal chances of above, near and below normal elsewhere



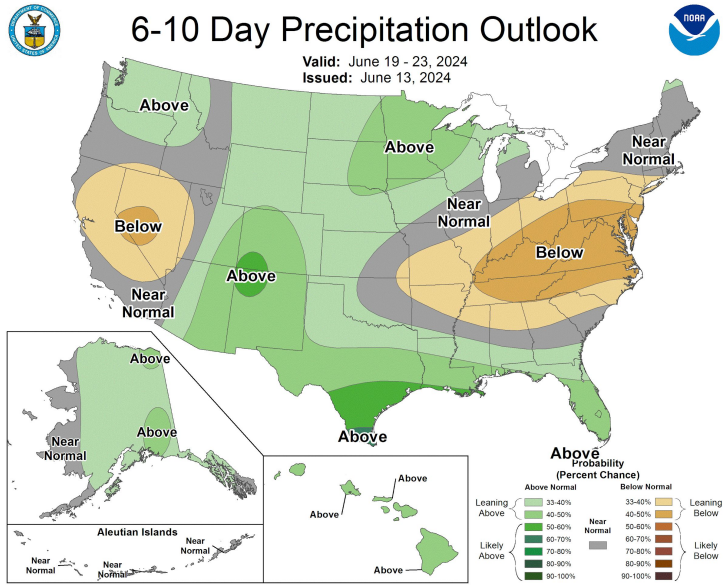


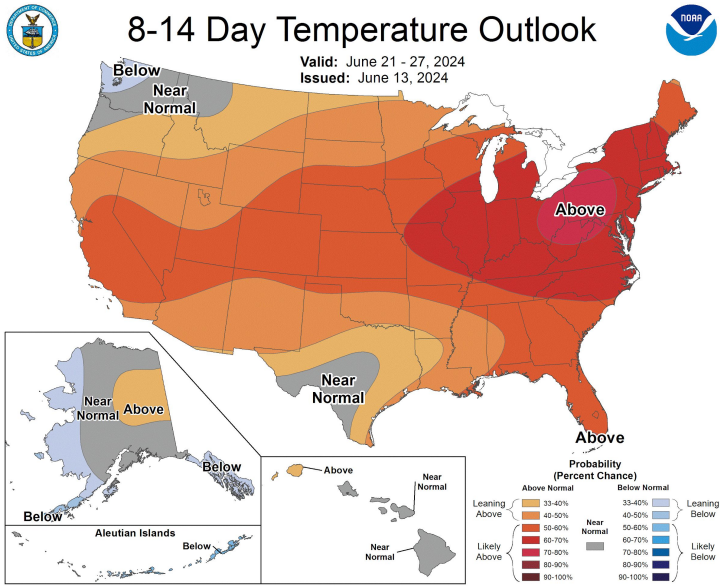
Image Captions:
Left - Climate Prediction Center 6-10 Day Temperature Outlook.
Right - Climate Prediction Center 6-10 Day Precipitation Outlook.
Valid June 19-23, 2024

8-14 Day Outlook

Link to the latest Climate Prediction Center 8 to 14 day Temperature Outlook and Precipitation Outlook.

Main Takeaways

- Near normal temperatures in WA and north central OR and above normal temperatures (33-40%) in the rest of OR
- Above normal precipitation (33-40%) for much of the WA Columbia Basin, below normal precipitation (33-40%) over the Ochoco-John Day Highlands and southern Deschutes county, and near normal precipitation elsewhere



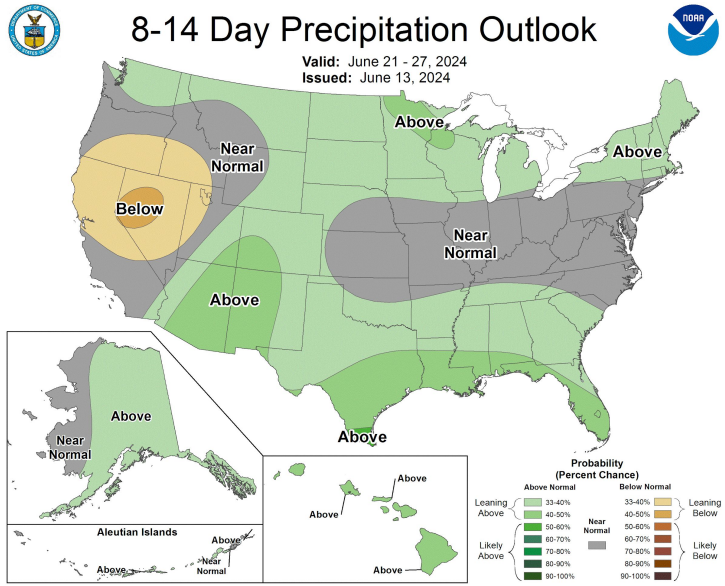


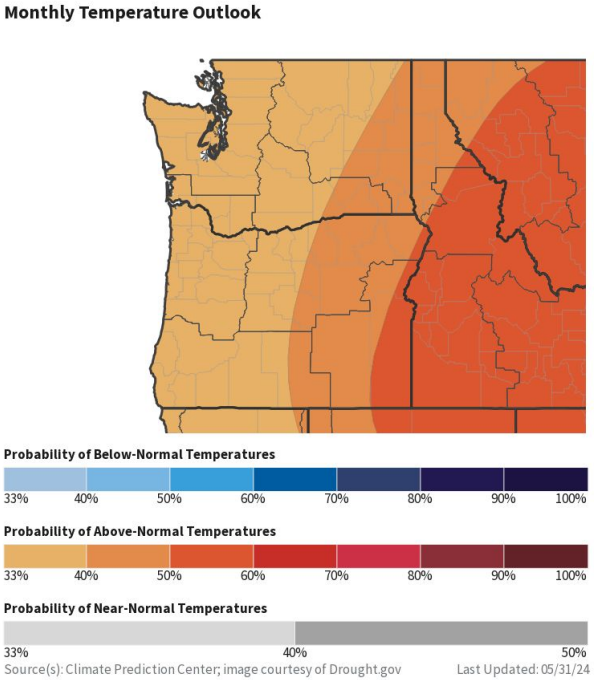
Image Captions:
Left - Climate Prediction Center 8-14 Day Temperature Outlook.
Right - Climate Prediction Center 8-14 Day Precipitation Outlook.
Valid June 21 - June 27, 2024

Monthly Climate Outlook

Link to the latest Climate Prediction Center Monthly Outlook.

Main Takeaways for June

- Odds favor above normal temperatures (33-60%)
- Odds favor near normal precipitation for most areas, except for below normal (33-40%) in Wallowa County and the southeast Grande Ronde Valley and above normal precipitation (33-40%) in the WA Cascades



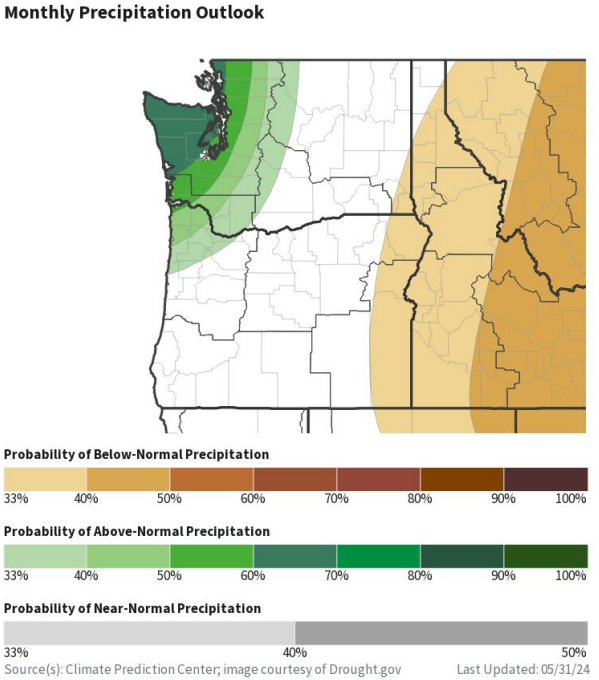


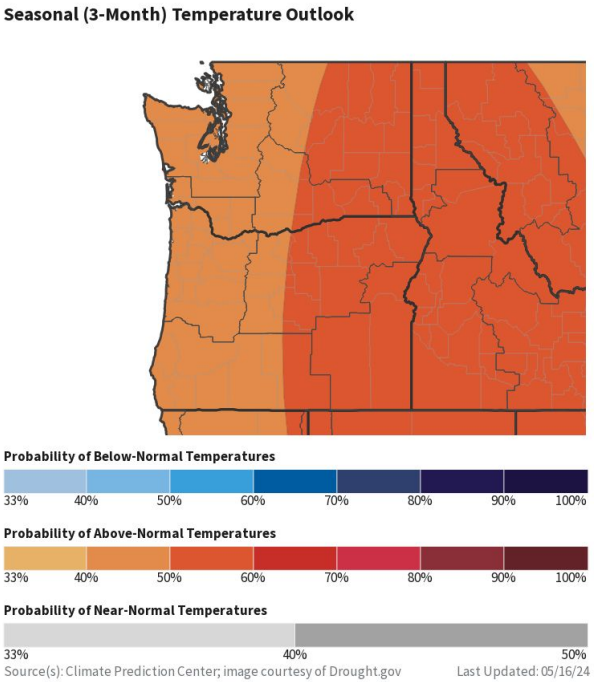
Image Captions:
Left - Climate Prediction Center Seasonal Temperature Outlook.
Right - Climate Prediction Center Seasonal Precipitation Outlook.
Valid June 2024

Seasonal Climate Outlook

Link to the latest Climate Prediction Center Seasonal Outlook.

Main Takeaways for June-July-August

- Odds leaning towards above normal temperatures area-wide (40-60%)
- Odds leaning towards below normal precipitation area-wide (33-50%)



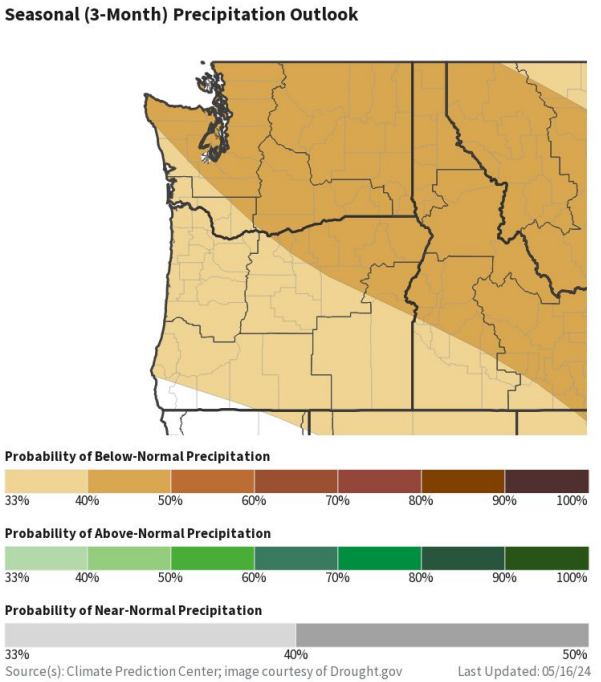


Image Captions:
Left - Climate Prediction Center Seasonal Temperature Outlook.
Right - Climate Prediction Center Seasonal Precipitation Outlook.
Valid June, July and August 2024

Drought Outlook

The latest drought outlooks can be found on the CPC homepage.

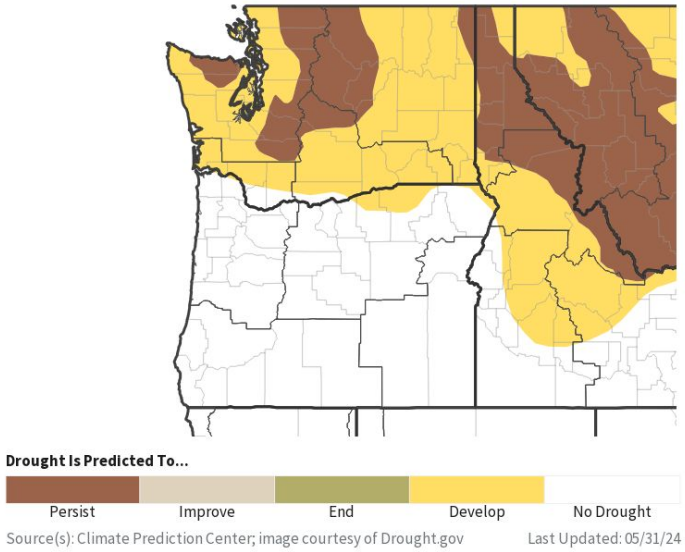
Main Takeaways

- Drought is expected to persist along the east slopes of the central and northern WA Cascades
- Drought is expected to develop in most of eastern WA
- These areas are vulnerable between this winter's precipitation and the warm seasonal outlook

Possible Impact

- Reduced streamflows and reservoir levels, possible reduction in agricultural yield, crop loss, and poor pasture conditions where irrigation water is not available.

Seasonal (3-Month) Drought Outlook



1-Month Drought Outlook

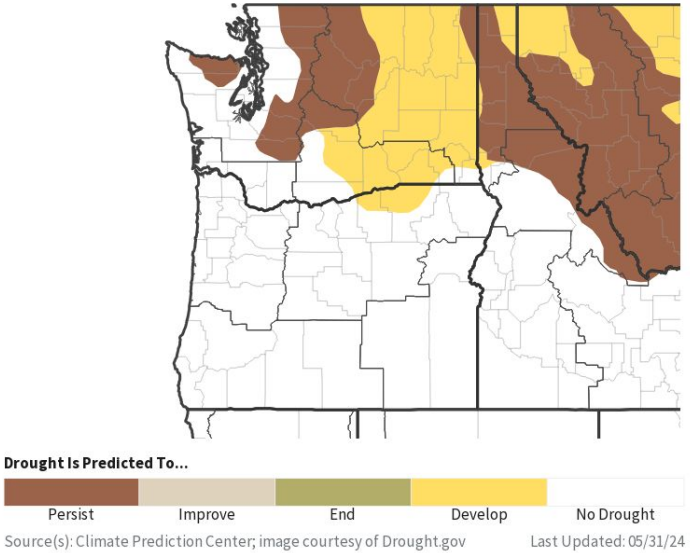


Image Captions:
Right - Climate Prediction Center Monthly Drought Outlook Released May 31, 2024
Left - Climate Prediction Center Seasonal Drought Outlook Released May 31, 2024