Oregon Water Conditions Report

June 13th, 2022

HIGHLIGHTS

In Oregon, 17 counties have received Executive Orders issuing drought declarations under ORS 536 for 2022. Additionally, Executive Order 22-10 makes any county with an Executive Order issuing a drought declaration under ORS 536 declaration eligible to pursue assistance under ORS 401. See EO 22-10 for more details.

According to the US Drought Monitor, over 71% of Oregon is experiencing moderate (D1) to exceptional (D4) drought. This continues a trend of reduced areal coverage of drought and reduction in drought severity across the state due to recent precipitation, improved streamflows, and benefits to long-term drought indicators. See below for more information.

Basin snowpack has completely melted out or is near completion and has occurred near the typical date, according to NRCS data.

May precipitation measured well above average (130% - 300%) throughout most of western and northeastern Oregon. Elsewhere, precipitation was more variable and ranged from below to above average. More recently, precipitation over the past two weeks was average to well above average throughout much of Oregon, with some exceptions in eastern Oregon.

May temperatures were cooler than typical statewide, ranging between 1 °F and more than 5 °F below average. Temperatures over the past two weeks were more variable, mostly ranging within 2 °F of average.

Soil moisture benefitted from recent precipitation. Although shallow groundwater remains below to well below average outside of northwestern Oregon, surface and root zone profiles trended closer to average.

The 8 – 14-day climate outlook indicates probabilities favoring below average temperatures statewide. Precipitation is forecasted to vary, with western and northern Oregon projected near average, and much of eastern Oregon projected below average.

May streamflows were well above average throughout western and northern Oregon. Streamflows in central and eastern Oregon were mostly below average. Over the past seven days, flows have measured average to well above average nearly statewide, with some exception in similar areas.

Reservoir storage in USBR (including Klamath) and USACE storage systems is variable throughout the state. See below for more information.

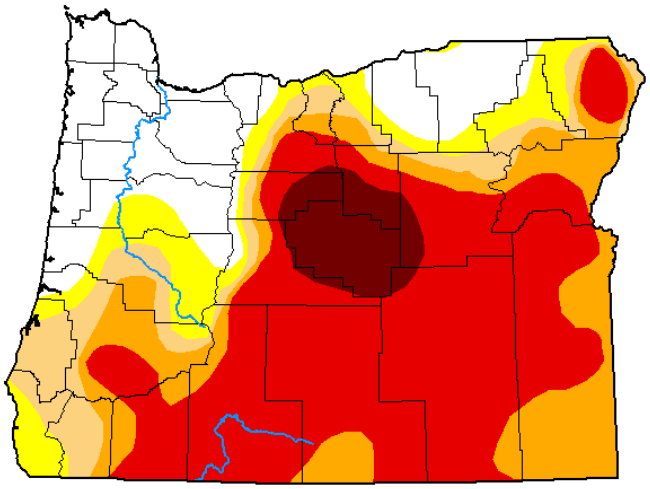
Significant wildfire potential over the next seven days is expected to be minimal, with normal potential in a portion of central Oregon.

DROUGHT CONDITIONS

Early June precipitation continued improvement in long-term drought indicators across the state, leading to several one-class improvements on the US Drought Monitor. Coverage of exceptional drought (D4) was removed from Klamath and Lake Counties, as well as much of Grant County. Drought severity in the northern portion of Baker County was reduced from extreme (D3) to severe (D2) drought.

U.S. Drought Monitor

Oregon



June 7, 2022

(Released Thursday, Jun. 9, 2022)

Valid 8 a.m. EDT

Drought Conditions (Percent Area)

	None	D0-D4	D1-D4	D2-D4	D3-D4	D4
Current	19.39	80.61	71.16	61.99	45.78	5.77
Last Week *05-31-2022*	18.70	81.30	73.06	63.39	47.22	11.81
3 Months Ago *03-08-2022*	5.66	94.34	90.01	76.16	50.07	16.22
Start of Calendar Year *01-04-2022*	4.16	95.84	89.75	75.37	50.84	17.27
Start of Water Year *09-28-2021*	0.00	100.00	100.00	96.47	72.10	26.59
One Year Ago *06-08-2021*	0.00	100.00	100.00	80.37	34.37	4.78

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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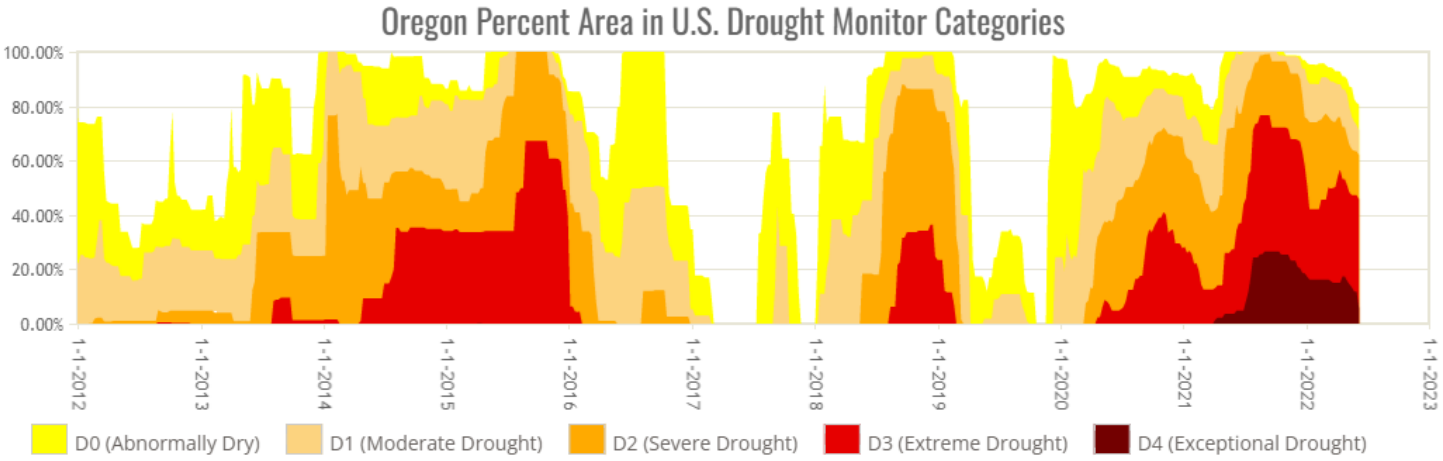
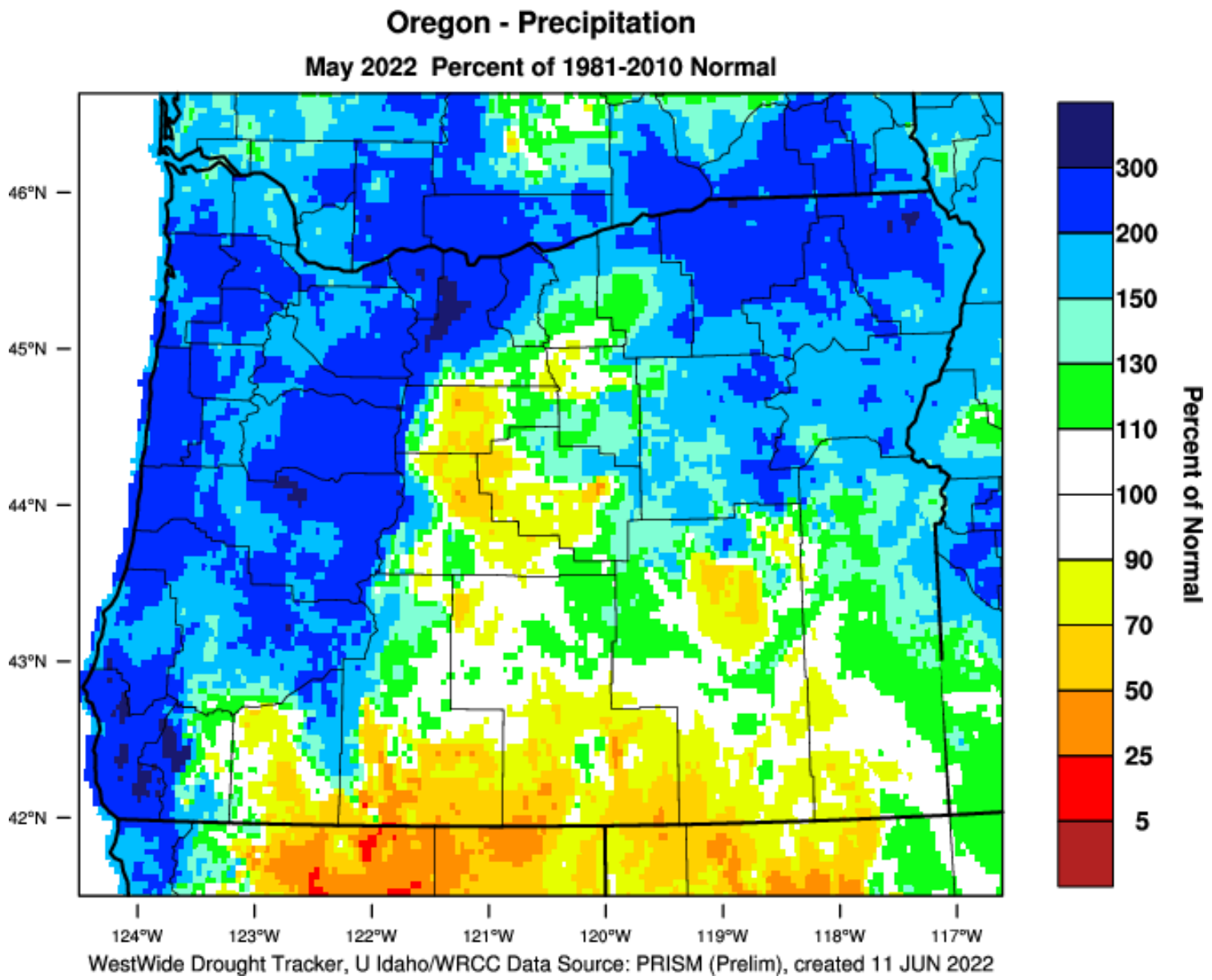
CPC/NOAA

droughtmonitor.unl.edu

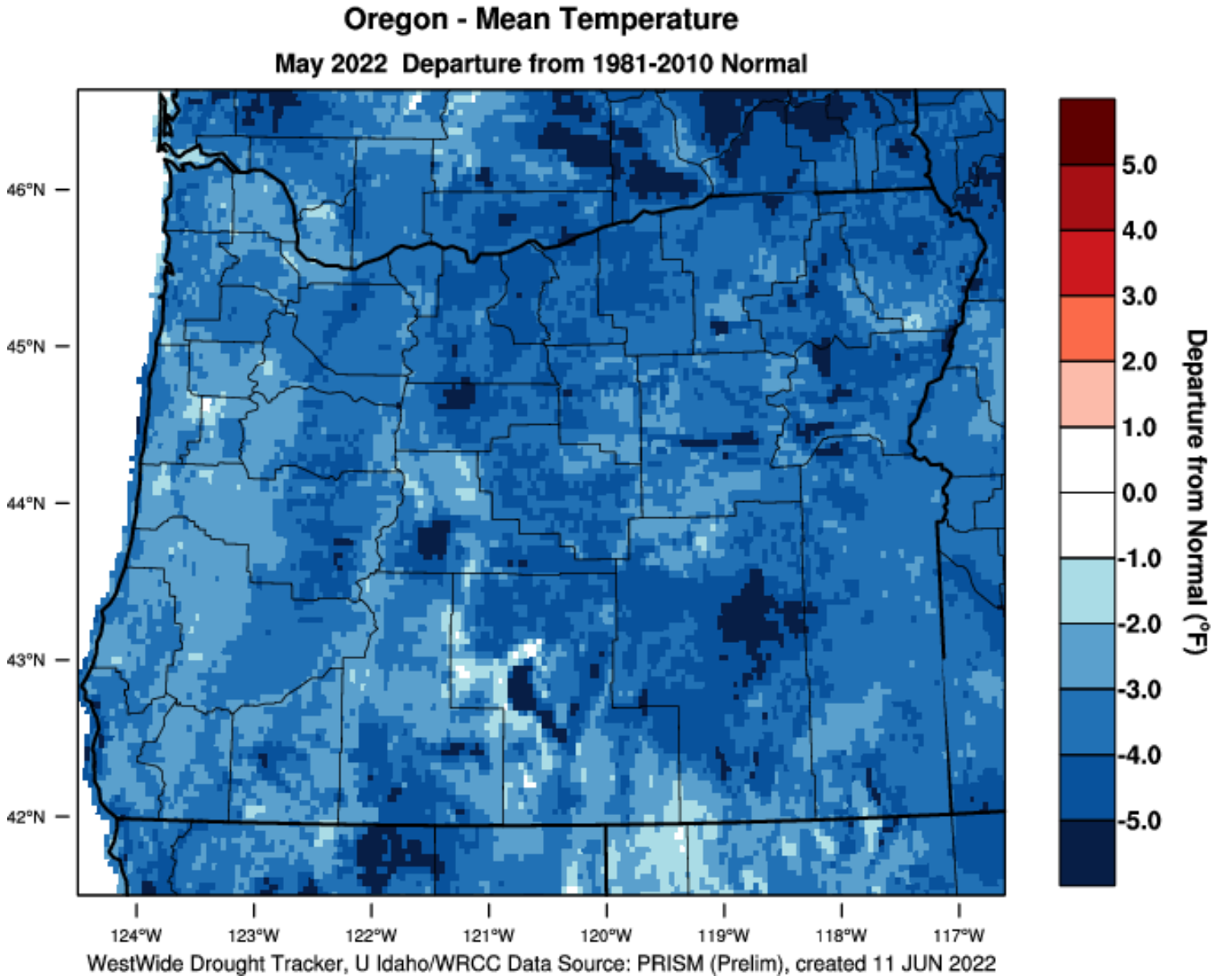


CLIMATE CONDITIONS

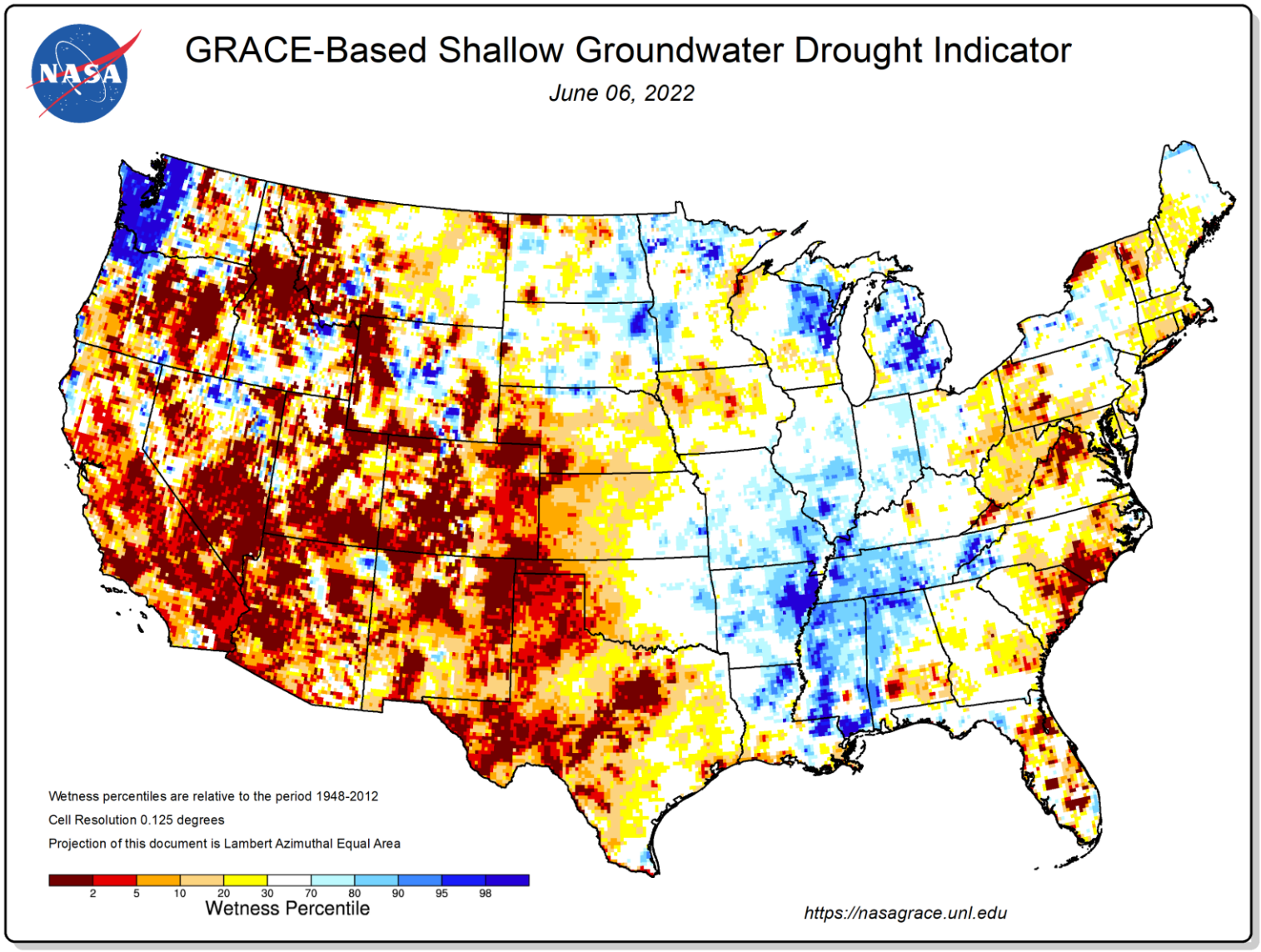
PRECIPITATION



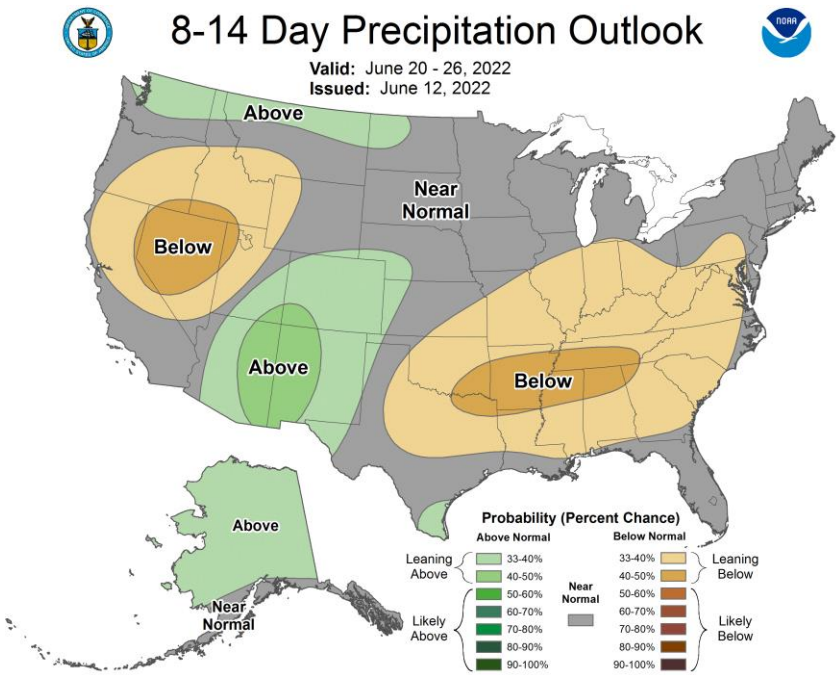
TEMPERATURE

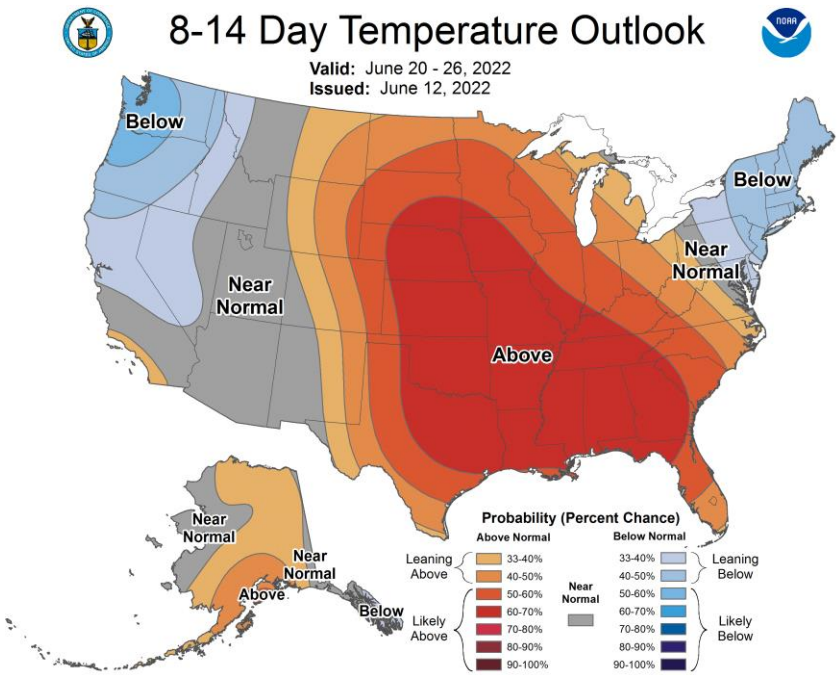


SOIL MOISTURE



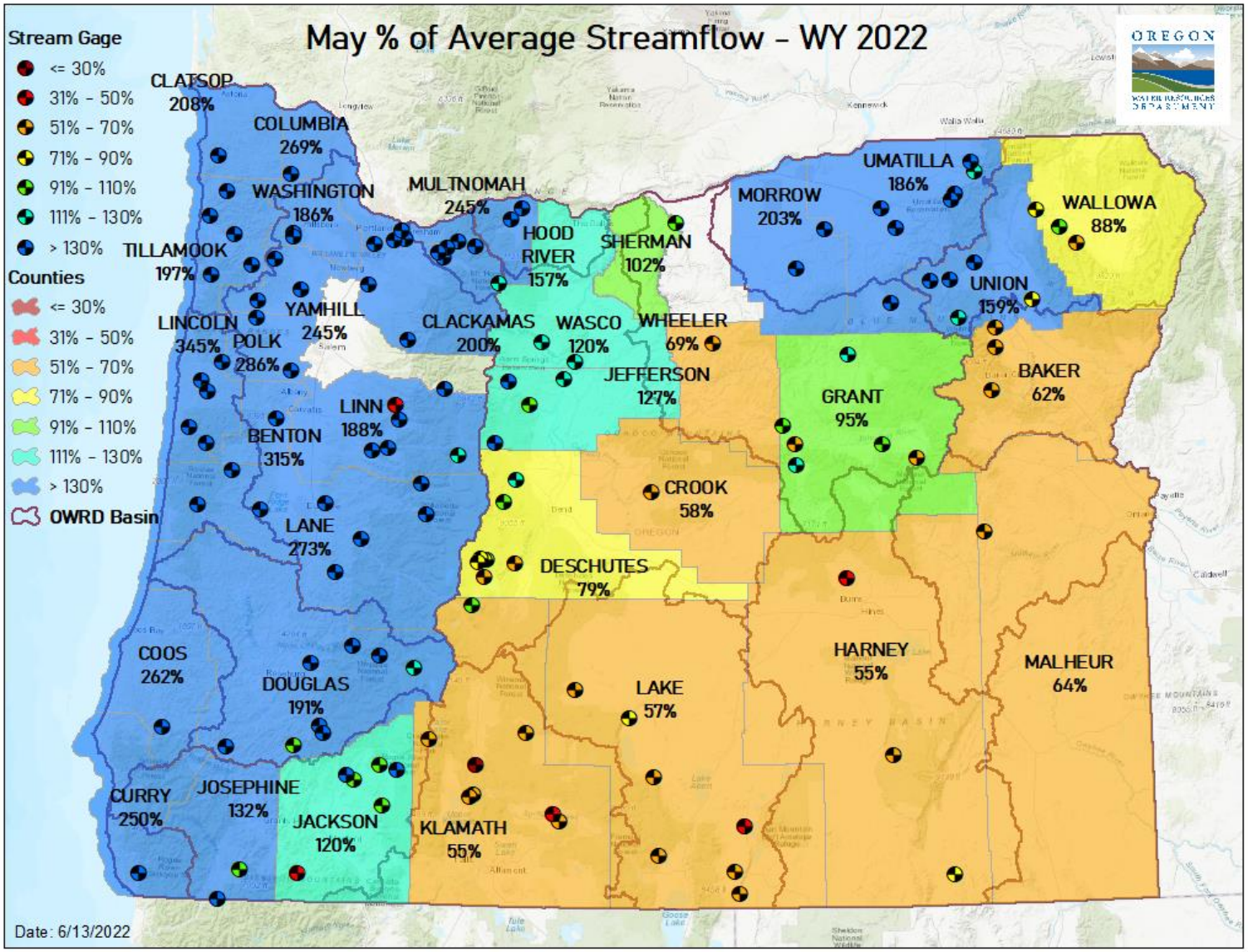
CLIMATE OUTLOOK



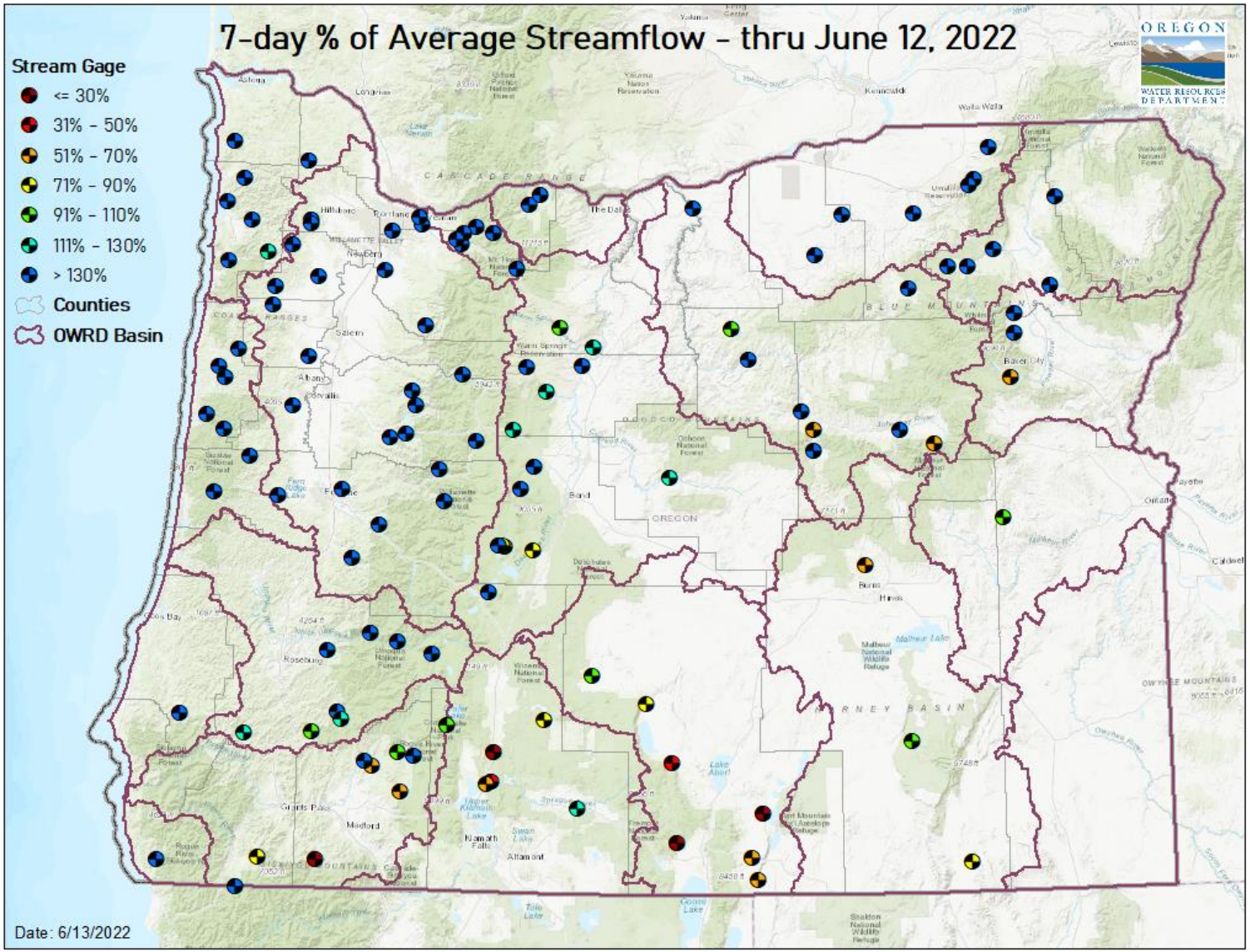


STREAMFLOW

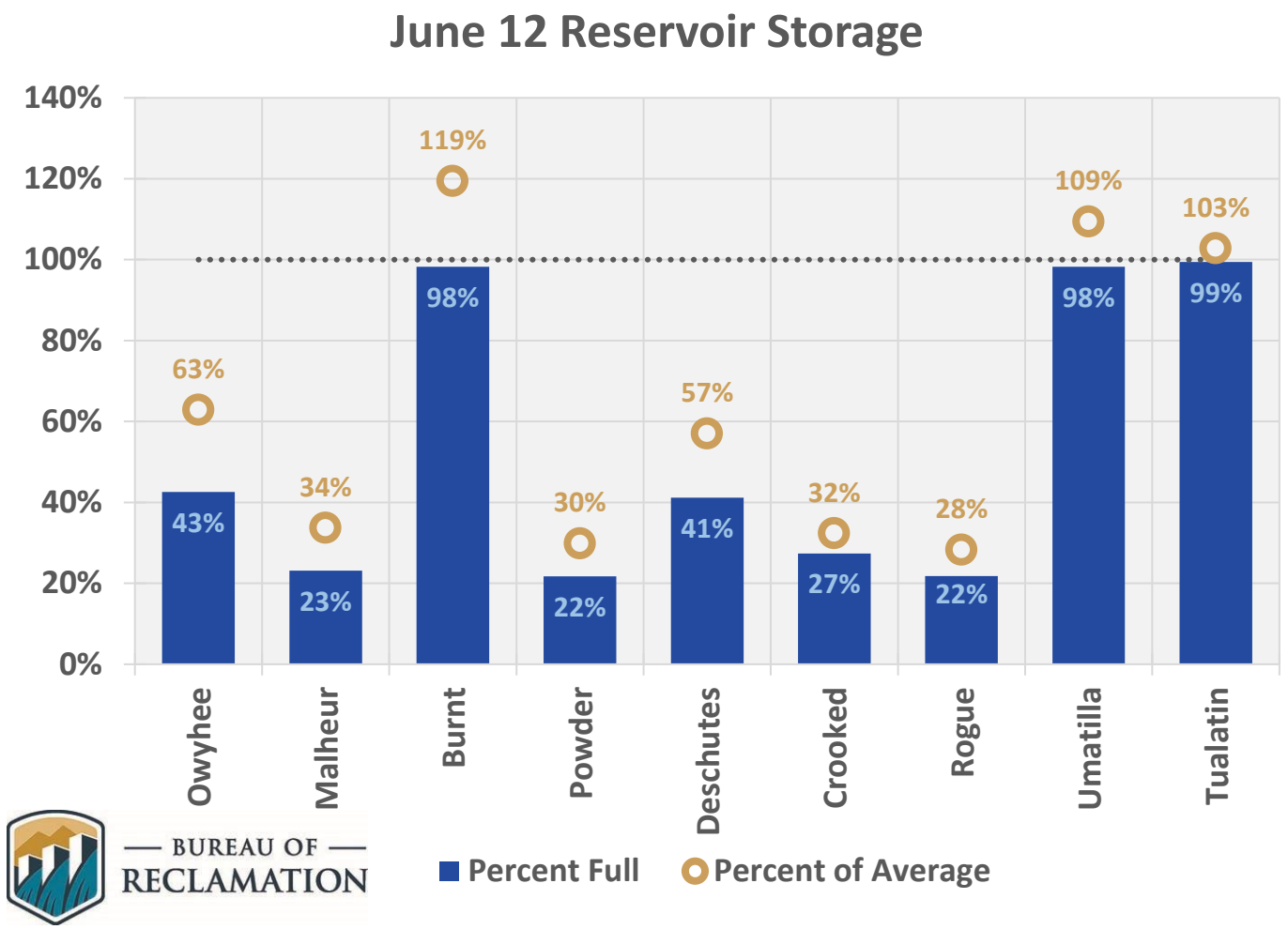
MAY

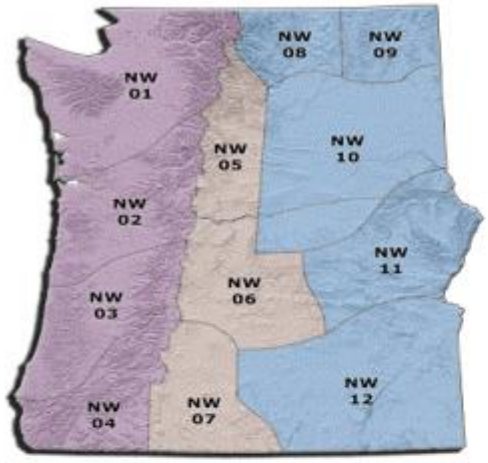


7-DAY


7-day % of Average Streamflow - thru June 12, 2022
Stream Gage
<= 30%
31% - 50%
51% - 70%
71% - 90%
91% - 110%
111% - 130%
> 130%
Counties
OWRD Basin
Date: 6/13/2022
OREGON
WATER RESOURCES DEPARTMENT

STORAGE


June 12 Reservoir Storage
140%
120%
100%
80%
60%
40%
20%
0%
63%
43%
34%
23%
119%
98%
30%
22%
57%
41%
32%
27%
28%
22%
109%
98%
103%
99%
Owyhee
Malheur
Burnt
Powder
Deschutes
Crooked
Rogue
Umatilla
Tualatin
BUREAU OF RECLAMATION
Percent Full
Percent of Average



Legend

Fire Environment (FEN) 4 levels

Minimal	- The Overall Fire Environment suggests a very low risk for Large fires (**less than 1% chance**)
Normal	- The Overall Fire Environment suggests a normal risk for large fires (**1 - 4% chance**)
Elevated	- The Overall Fire Environment suggests a moderately high risk for large fires (**5 - 19% chance**)
High Risk	**The risk for large fire(s) is very high (≥ 20%)** **Triggers: 1. (Significant Lightning)** **2. BEN (Critical Burn Environment)**

The assessment of the overall fire environment considers multiple factors including weather, lightning amount and fuel dryness. Large Fire probabilities are derived objectively via statistical methods. **High Risk** levels (≥ 20% probability of a large fire) are almost always due to significant lightning as burning conditions alone rarely result in a large fire probability much above about 10%.

Pacific Northwest 7 Day Significant Fire Potential

Monday, 6/13/2022

Predictive Service Areas	ytd	Today	Tue	Wed	Thu	Fri	Sat	Sun
NW01								
NW02								
NW03								
NW04								
NW05								
NW06								
NW07								
NW08								
NW09								
NW10								
NW11								
NW12								

Fire Weather: Cool temperatures continue today, along with showers over the Cascades, Blues and along the eastern third of Washington. General winds will remain breezy today and tomorrow, especially through Cascade gaps. Temperatures should be coldest today and gradually return to seasonal normal through the week. Showers will taper off tomorrow, leading to mostly dry conditions by afternoon and continuing into Thursday. An upper-level trough will start to move over the region Thursday, bringing showers and thunderstorms through the weekend, but not nearly as much precipitation is expected from this system as the one last weekend.

Monitor your NWS forecasts for local details.

Fire Potential: The potential for new significant fires remains low across the geographic area.

Preparedness Level:

Northwest: 1
National: 2

- Eric Wise

RESOURCES/REFERENCES

Please visit Oregon Water Resources Department's drought information page to learn about current drought conditions, assistance programs, and potential drought tools.

If you are interested in submitting local drought-related conditions and impacts, please visit the drought impacts toolkit to learn more. Click here to visit the map of condition monitoring observer reports.

Released every Thursday, the US Drought Monitor provides a weekly assessment of drought conditions. The USDM provides a network infographic which depicts the network of observers who gather and report information about conditions and drought impacts.

The WestWide Drought Tracker uses data from PRISM to provide easy access to fine-scale drought monitoring and climate products, such as the figures depicting climate conditions within this report.

The National Weather Service's Climate Prediction Center offers weekly, monthly, and seasonal climate outlooks illustrating the probabilities of temperatures and precipitation.

The Regional Climate Centers (RCC) working with NOAA partners, deliver climate services at national, regional, and state levels. Climate anomaly maps of Oregon are updated daily at around noon PST.

NASA's Gravity Recovery and Climate Experiment (GRACE) provide satellite-based observations of soil moisture conditions that are useful as drought indicators, helpful in describing current wet or dry soil conditions.

USGS Water Watch provides maps of real-time and average streamflow conditions at USGS sites throughout the state.

Reservoir storage "teacup" diagrams are offered by both the US Bureau of Reclamation and US Army Corps of Engineers. The diagrams represent the level of fill in the reservoirs as both percent full and as a ratio of volume of water currently in the reservoir to the volume of water in the reservoir when it is full.

Oregon wildfire information can be found through InciWeb and the Oregon Department of Forestry's Wildfire News, along with the National Interagency Fire Center which offers outlooks on the significant wildland fire potential.

Oregon Office of Emergency Management maintains a hydrology/meteorology dashboard which shows state and local drought declarations, as well as hosts many of the data sources to generate this report. Use the selection arrows at the bottom of your browser to navigate through the various sources.

US Department of Agriculture provides the Weekly Weather and Crop Bulletin as a vital source of information on US and global weather, climate, and agricultural developments, along with seasonally appropriate agrometeorological charts and tables. USDA's Drought Programs and Assistance offers links to programs and resources to help those struggling with persistent drought.