

United States Department of Agriculture

Water and Climate Update May 26, 2022

The Natural Resources Conservation Service produces this weekly report using data and products from the <u>National</u> <u>Water and Climate Center</u> and other agencies. The report focuses on seasonal snowpack, precipitation, temperature, and drought conditions in the U.S.

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Drought conditions continue across the West



Drought in the western U.S. is expected to continue through the summer months, with reduced water supplies for some areas. The most recent Drought Monitor report depicts six percent of the total U.S. in the Exceptional Drought category, the most severe drought intensity, mostly concentrated in the West and Southwest. Although drought intensity improved in some parts of the West over the last year, most of the region is still experiencing Severe-to-Exceptional Drought. State and local emergency drought declarations have resulted in strict water conservation measures.

Related:

With a third year of drought, Southern California facing a hot, dry summer – Los Angeles Times (CA) New water restrictions approved in drought-stricken California – Yahoo News Summer outlook: Most of US will see above-average temps as Western drought continues – CNN Exceptional drought returns to Arizona – KPNX (AZ) Colorado, Nebraska jostle over water rights amid drought – MV MagicValley.com (ID) Bannock County signs emergency drought declaration – Idaho State Journal (ID) Spring rains 'not nearly enough' to overcome Northwest drought, wildfire risk, experts say – The Daily News (WA) Nevada suffering downtrend in wildlife populations due to drought conditions – Tahoe Daily Tribune (CA)

Water and Climate Update

Snow



Snow water equivalent percent of median map

See also: Snow water equivalent values (inches) map



Alaska snow water equivalent percent of median map

See also: <u>Alaska snow</u> <u>water equivalent</u> <u>values (inches)</u> <u>map</u>

<u>Current Snow Depth</u>, National Weather Service Snow Analysis

 $^{\mathrm{cm}}$

Source: NOAA Office of Water Prediction



Snow Depth 2022-05-26 06 UTC



Precipitation

Last 7 Days, NRCS SNOTEL Network



7-day precipitation percent of average map

See also: <u>7-day total precipitation</u> values (inches) map

Alaska 7-day precipitation percent of average map

See also: Alaska 7-day total precipitation values (inches) map



Last 7 Days, National Weather Service (NWS) Networks

Source: Regional Climate Centers

7-day precipitation percent of normal map for the continental U.S.

See also: 7-day total precipitation values (inches) map





Generated 5/26/2022 at HPRCC using provisional data.

NOAA Regional Climate Centers

Last 7 Days, National Weather Service (NWS) Networks

Source: Regional Climate Centers

<u>7-day precipitation</u> <u>anomaly map</u> for Alaska.

See also:

7-day total precipitation values (inches) map



Generated 5/26/2022 at HPRCC using provisional data.

NOAA Regional Climate Centers

Month-to-Date, All Available Data Including SNOTEL and NWS Networks

Source: PRISM



Last 3 Months, All Available Data Including SNOTEL and NWS Networks Source: PRISM



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Water Year-to-Date, NRCS SNOTEL Network



See also:

2022 water year-to-date precipitation percent of average map

2022 water year-todate precipitation values (inches) map

Alaska 2022 water yearto-date precipitation percent of median map

See also:

Alaska 2022 water year-todate precipitation percent of average map

Alaska 2022 water year-todate precipitation values (inches) map

Temperature

Last 7 Days, National Weather Service (NWS) Networks

Source: Regional Climate Centers

<u>7-day temperature</u> <u>anomaly map</u> for the contiguous U.S.

See also: <u>7-day</u> temperature (° F) map Departure from Normal Temperature (F) 5/19/2022 - 5/25/2022



Generated 5/26/2022 at HPRCC using provisional data.

NOAA Regional Climate Centers

Last 7 Days, National Weather Service (NWS) Networks

Source: Regional Climate Centers

<u>7-day temperature</u> <u>anomaly map</u> for Alaska.

See also: <u>7-day temperature</u> (° F) map



Generated 5/26/2022 at HPRCC using provisional data.

NOAA Regional Climate Centers



Month-to-Date, All Available Data Including SNOTEL and NWS Networks Source: PRISM

Last 3 Months, All Available Data Including SNOTEL and NWS Networks Source: PRISM



Drought

U.S. Drought Monitor

Source: National Drought Mitigation Center

U.S. Drought Portal Source: NOAA



Current National Drought Summary, May 24, 2022

Source: National Drought Mitigation Center

"A strong upper-level trough moved across the contiguous U.S. (CONUS) during this U.S. Drought Monitor (USDM) week (May 18-24). Surface low pressure systems and cold fronts were associated with this complex trough. They tapped Gulf of Mexico moisture to spread above-normal precipitation across parts of the Plains, Midwest, Southeast, and Mid-Atlantic Coast, and locally heavy snow across parts of Colorado. One of the fronts moved very slowly across the southern Plains near the end of the week, dumping locally heavy rain on parts of Oklahoma and Texas. Precipitation also fell across parts of the Pacific Northwest, North Dakota, and western Great Lakes. Most of the West was drier than normal, with much of the area from Oregon to California and southern Idaho to New Mexico receiving little to no precipitation. Weekly temperatures averaged below normal behind the fronts from the Pacific Northwest to Great Lakes and from the northern Rockies to Mid-Mississippi Valley. Temperatures averaged warmer than normal across the eastern third of the CONUS and from California to Texas. The continued lack of precipitation in the dry areas further dried soils, lowered stream levels, and stressed crops and other vegetation, while the warmer-than-normal temperatures increased evapotranspiration that added to the stress caused by lack of precipitation. But widespread heavy rain fell across several drought areas, contracting drought and abnormal dryness, especially in the central to southern Plains, Lower Mississippi Valley, Southeast, and Mid-Atlantic states. Drought and abnormal dryness also shrank in the Pacific Northwest where drought indicators showed improving conditions. Drought or abnormal dryness expanded or intensified where it continued dry, especially in southern parts of the West, in the Ohio and Tennessee Valleys, and parts of southern New England."

Changes in Drought Monitor Categories over Time

Source: National Drought Mitigation Center



6 Months

1 Year



Changes in drought conditions over the last 12 months for the contiguous U.S.

Highlighted Drought Resources

- Drought Impact Reporter
- Quarterly Regional Climate Impacts and Outlook
- U.S. Drought Portal Indicators and Monitoring
- U.S. Population in Drought, Weekly Comparison
- USDA Disaster and Drought Information

USDA Secretarial Drought Designations

Source: USDA Farm Service Agency



Wildfires: USDA Forest Service Active Fire Mapping



Highlighted Wildfire Resources

- <u>National</u>
 <u>Interagency</u>
 <u>Fire Center</u>
- <u>InciWeb</u> <u>Incident</u> <u>Information</u> <u>System</u>
- Significant Wildland <u>Fire</u> <u>Potential</u> <u>Outlook</u>

Other Climatic and Water Supply Indicators

Soil Moisture

Source: NOAA National Centers for Environmental Prediction



Soil Moisture Percent of Saturation

Source: NRCS SNOTEL and <u>Soil Climate Analysis Network</u> (SCAN) U.S. soil moisture map at 8-inch depth:



Soil Moisture

Source: NRCS Soil Climate Analysis Network (SCAN)



This chart shows the precipitation and soil moisture for the last 30 days at the <u>Enterprise</u> SCAN site in Utah. All soil sensors at the site indicate a decline in soil moisture over the past 30 days due to the lack of precipitation during the period.

Soil Moisture Data Portals

- USCRN Soil Moisture
- National Soil Moisture Network
- NOAA Climate Prediction Center Soil Moisture
- NASA Grace

Streamflow, Drought, Flood, and Runoff

Source: U.S. Geological Survey WaterWatch Streamflow Map



Map of flood and high flow conditions

(39 in floods [major: 3, moderate: 7, minor: 29], 32 in near-flood)

		Expla	anation - Pe	rcentile	classes	
<95	95-98	>= 99	Above action stage fl	Above lood stage	Above moderate flood stage	Above major flood stage
	Δs	treamgage w	ith flood stage O) Streamgage	e without flood stage	

WaterWatch: Streamflow, drought, flood, and runoff conditions

Reservoir Storage

Hydromet Teacup Reservoir Depictions

Source: U.S. Bureau of Reclamation

- Upper Colorado
- Pacific Northwest/Snake/Columbia
- <u>Sevier River Water, Utah</u>
- Upper Missouri, Kansas, Oklahoma, Texas

Current California Reservoir Conditions

Source: California Department of Water Resources



Current California Reservoir Conditions

Agricultural Weather Highlights

Author: Brad Rippey, Agricultural Meteorologist, USDA/OCE/WAOB

National Outlook, Thursday, May 26, 2022: "A slow-moving storm system currently centered near the Kansas-Missouri border will drift eastward, crossing the Ohio Valley on Friday and exiting the Atlantic Coast early in the Memorial Day weekend. Additional rainfall could total 1 to 2 inches along and near the storm's path—with higher amounts possible along a trailing cold front sweeping through the Southeast, where locally severe thunderstorms may occur on Thursday and Friday. In contrast, little or no rain will fall during the next 5 days from California to the southern half of the Plains, accompanied by early-season heat. Weekend temperatures will top 100°F on the southern High Plains. Farther north, however, cool, showery weather will engulf areas from the Pacific Northwest to the northern Plains, with weekend snow expected at some highelevation sites in the Cascades and northern Rockies. The NWS 6- to 10-day outlook for May 31 – June 4 calls for the likelihood of near- or below-normal temperatures across the West and the northern and central Plains, while warmer-than-normal weather will prevail in most areas along and east of a line from western Texas to Lake Superior. Meanwhile, near- or above-normal rainfall across much of the country should contrast with drier-than-normal conditions in parts of California, the Great Basin, the lower Great Lakes region, and the Northeast."

Weather Hazards Outlook: May 28 – June 1, 2022

Source: NOAA Weather Prediction Center



Monterrey

MÉXICO

Guadalajara

NOTE: These products are only created Monday through Friday. Please exercise

Precipitation	
Temperature	
Soils	



Mami

Hayana Esri, HERE, Garmin, FAO, NOAA, USGS, EPA

Seasonal Drought Outlook: May 19 – August 31, 2022

Source: National Weather Service



Climate Prediction Center 3-Month Outlook

Source: National Weather Service

Precipitation



Temperature

June-July-August 2022 precipitation and temperature outlook summaries

More Information

The NRCS <u>National Water and Climate Center</u> publishes this weekly report. We welcome your feedback. If you have questions or comments, please <u>contact us</u>.