

Snowpack Evaluation

Weather Research and Consulting Services, LLC

This is the May 1, 2021 Washington and Oregon snowpack report, along with comparisons to 2017, 2018, 2019 and 2020. The report will be updated on or about May 15.

The last half of April was warmer and much drier than usual, especially the last week when some lower elevation temperatures climbed into the 80s. This accelerated the normal spring snowmelt rate resulting in a significant drop in Snow Water Equivalent (SWE) percentages, especially in Oregon which fell a whopping 39% since April 15. The Oregon SWE is now only 57% of median, very similar to last year's 53% on May 1. The SWE ranges from 118% in the Mt. Hood area to 0% in the Malheur River Basin. The John Day River Basin has dropped to 24% of median and Lake County 29%. Other than Mt. Hood, snowpacks in the Willamette and Grande River Basins are holding up relatively well at 87% and 86% of median. The Washington SWE also experienced an increase in snowmelt rate during the past two weeks, but the decline was only a modest 16% of median. The snowpack ranges from 186% of median in the Cedar/Snoqualmie River Basin to 58% in the Lower Yakima River Basin. The only other basins that have a below average snowpack are the Spokane River Basin at 81% and the Lower Snake at 83% of median. The rate of snowmelt is an important factor in determining the severity of the summer fire season, and correlates much better than SWE alone. While both Washington and Oregon recorded an above or much above normal snowpack on April 1, the rapid snowmelt in Oregon should be of concern for an active and possibly severe fire season this summer. See our upcoming Spring Snowpack Index report for more information concerning the upcoming fire season.

A graphic of Snow Water Equivalent (SWE) percentages across the western United States is also included for comparison. Areas shaded in blue indicate above normal snowpack, green indicates near normal, and yellow, orange and red below normal. The best snowpack is located in Washington, the worst across California, Nevada, Utah, Arizona and New Mexico. The statewide California snowpack (not shown on map but reported by the California Department of Water Resources) fell drastically since April 15 and is now just 24% of normal, even worse than last year's 34% on this date.

We will continue to monitor snowpack figures through June 1. If you have questions about this report, please contact Weather Research and Consulting Services, LLC using the links at the end of this report.

Oregon and Washington Snowpack Comparison as of May 1, 2021

Oregon

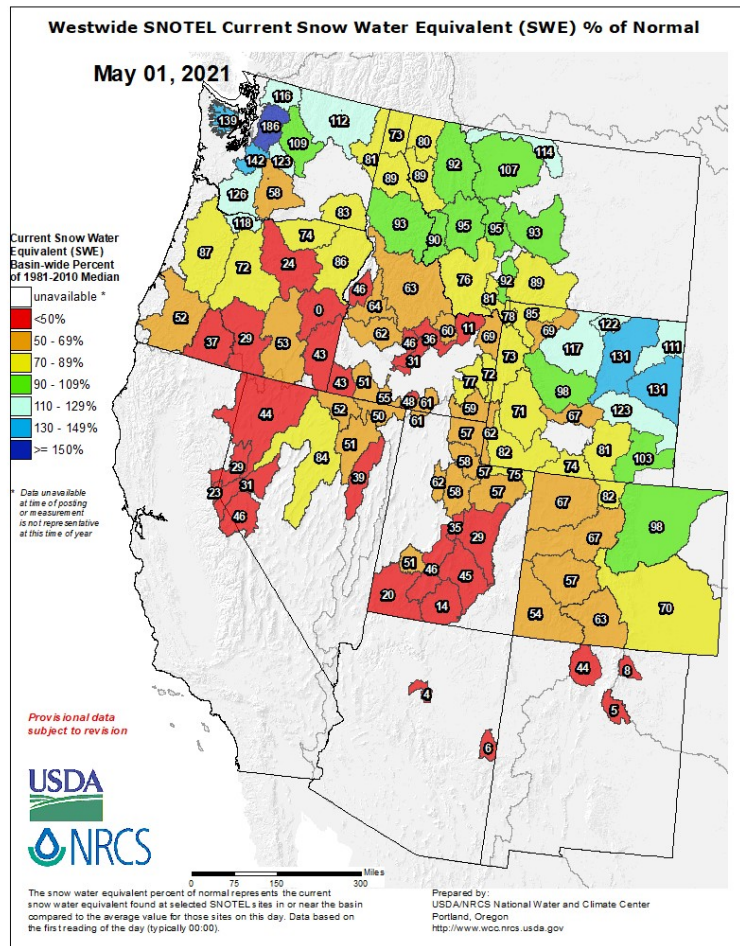
		(Percent of Normal)				
<u>River Basin</u>	<u>Date</u>	<u>2021</u>	<u>2020</u>	<u>2019</u>	<u>2018</u>	<u>2017</u>
Owyhee	May1	43	22	63	15	119
Malheur	May1	0	30	114	9	163
Grande Ronde	May1	86	95	149	84	158
Umatilla	May1	74	92	159	87	172
John Day	May1	24	37	188	2	226
Deschutes	May1	72	53	80	57	130
Lower Columbia	May1	118	81	71	100	153
Willamette	May1	87	58	82	70	155
Rogue/Umpqua	May1	55	46	88	50	152
Klamath	May1	37	34	80	38	146
Lake County	May1	29	36	111	55	172
Harney	May1	53	47	126	38	162
State AVG		57	53	109	50	159

Note: Red figures indicate the lowest snowpack average in the past 5 years.

Washington

(Percent of Normal)

River Basin	Date	2021	2020	2019	2018	2017
Spokane	May1	81	102	85	138	112
Columbia/Methow	May1	112	88	77	153	148
Chelan/Wenatchee	May1	109	87	63	118	132
Upper Yakima	May1	123	72	62	106	105
Lower Yakima	May1	58	92	85	102	128
Lower Snake	May1	83	102	111	128	124
Lewis/Cowlitz	May1	126	98	81	120	163
White/Green	May1	142	114	83	112	128
Cedar/Snoqualmie	May1	186	106	60	139	138
Baker/Skagit	May1	116	103	64	131	121
Olympic	May1	139	96	78	138	133
State AVG		116	96	77	126	130



Paul Werth, Fire Weather Meteorologist
 Weather Research and Consulting Services, LLC
www.fireweather.com or www.firewx.com
 360.907.2022 (cell)
wrcs@prodigy.net