

Water Supply Availability Committee/Drought Readiness Council Meeting – January 14, 2021

Phone Conference – Meeting Notes

Attendees

Ryan Andrews – OWRD (Acting Chair)	Scott Oviatt – NRCS
Andy Bryant – NWS	Larry O’Neill – OCS
Spencer Sawaske – ODFW	Daniel Stoelb – OEM
Erik Rau – OEM	Jon Rocha – USBR
Marc Stewart – USGS	Carrie Boudreau – USGS
Nick Yonker – ODF	Mary Karen Scullion – USACE
Traci Naile – OEM	Aaron Borisenko – DEQ
Henry Pai – NWRFC	Roxy Nayar – DEQ
Jim Johnson – ODA	Salina Hart – USACE
Chris Sutton – OEM	Tom Jenkins – OEM
Anders Carlson – OGI	

Presentations – update on water supply conditions

Scott Oviatt

- Anthony Lakes SNOTEL SWE measuring 95% of long-term median
- Statewide SNOTEL SWE measured 77% of median as of February 11th
 - Down 3% from January meeting (80%)
 - Although not much change overall, individual basin values changed a bit
 - Major changes include NE basins (~10% decrease), E/SE basins (~15-20% decrease); slight increases in Western and Central basins
 - Harney basin dominated by Steens SNOTEL site (high elevation)
 - Reports from producers and media indicating lack of low to mid-elevation snowpack
- Statewide SNOTEL precipitation measured 87% of normal over the water year to date (as of February 11th)
 - Down 8% from January meeting (95%)
 - With exception of Willamette (91%), Hood-Sandy-Lower Deschutes (96%), and Umatilla-Walla Walla-Willow (94%) measuring near normal, all basins measuring below to well below normal with negative trend moving north to south
 - Several locations in Klamath basin measured near-lowest WY precipitation rank on record
 - Long-term downward trend in terms of precipitation as indicated by 499-day precipitation records
 - Many locations along Cascade Crest and in Klamath lowest on record during this period
- Water supply forecasts (April through September) indicate no individual site at or above 100% within OR
 - Water users advised to look at 70% exceedance flows for water supply information

Andy Bryant

- Statewide WY precipitation measuring below normal for much of state
 - Small pockets of NW OR measuring normal to above normal
 - Eastern OR faring worse with some regions measuring below 50% of normal
 - Small areas measuring below 25% of normal in Harney County
- Precipitation over past 30 days followed similar trend to WY in western OR
 - Beneficial precipitation in western OR over past ~40 days
 - Much of eastern OR measured below 50% of normal, including large portions measuring below 25% of normal
- January temperatures measured above to well above normal statewide
 - High elevations experienced above average temperatures leading to precipitation falling as rain instead of snow
- Mid-late February outlook projects above average precipitation for much of state over next 10 days, including eastern OR
 - Below normal temperatures projected
- 3-month outlook (February through April) predicts below normal temperatures for NW half of state (swath from SW to NE OR) and equal chances above/below normal temperatures for SE half
 - Above normal precipitation projected for northern half of state, with equal chances above/below normal for southern half

Henry Pai

- Observed adjusted WY runoff to date
 - West of Cascades normal to above normal runoff conditions in northern OR with negative trend moving southward
 - East of Cascades largely below normal with driest locations in central OR with very small corner in NE OR about normal
- Water supply forecasts for April through September indicate normal to below normal conditions west of Cascades, with negative trend from north to south
 - Central and SE OR volume forecasts projected well below normal
 - NE OR ranges from normal to just below normal conditions
- A couple sites (Willamette at Salem; Rogue at Raygold) in western OR have drifted slightly downward since mid-January
 - Recent 5- and 10-day forecasts have oscillated with most recent showing above average precipitation
- Umatilla near Gibbon shows noticeable decline through January as precipitation was further below average than basins west of Cascades
 - Although Owyhee at Owyhee Dam shows less noticeable decline, starting point was much lower

Larry O'Neill

- Areal extent of drought has not improved much, but some improvements in drought severity
 - Improvements in drought severity in SW and central OR
 - Deterioration in NE OR in parts of Baker County due to little monsoonal rain
 - Indications of long-term drought

- Precipitation over WY to date 2.5 inches below the long-term mean (1901-2000)
 - 40th driest out of 127 years (1895-2021)
 - Slight improvements in SW OR
 - Baker City has driest WY on record; La Grande at 3rd driest
 - Klamath and Lake Basins very dry
- WYTD Standard Precipitation and Evaporation Index (SPEI) and Standard Precipitation Index (SPI) differences due to temperature-driven evaporation
 - SPEI correlates well with hydrological drought indicators on seasonal to annual timescale
 - Not much excessive evaporation signal for WYTD in OR so SPEI and SPI are almost same
- 6-month SPEI and SPI comparison
 - Differences indicate very warm end to last summer (2020) lead to excessive evaporation and lead to lower SPEI compared to SPI
 - NE OR has SPEI < 1.5, which is about D3 drought category on USDM
- Average statewide temperature over WYTD ranks 118 out of 127 Oct-Jan periods (1895-2021)

Marc Stewart

- 28-day average streamflow has not significantly improved over the past month
 - Below normal flows for Klamath County, Jackson County, and extending to center of Douglas County
 - Areas of eastern OR also showing stress with below normal streamflows
- Williamson River below Sprague in Klamath below the 25th percentile
 - Other Klamath Lake inflows also show lower than normal streamflows
 - Klamath Lake water level lower this WY than for this period in past 10 years
- Streamflows as percent of average in most of SWSI basins for runoff to date for WY are below normal, with exception of Umatilla, Hood, and North Coast
- USGS implemented real-time cameras on some streams
- Statewide 7-day average runoff measuring below normal (10-24%) as of February 11th

Ryan Andrews

- County-wide streamflows for month of January show differences between western and eastern OR
 - Many western counties measured above to well above average
 - Min = Jackson at 64%; Max = Washington at 160%
 - With exception of Jefferson (128%), Umatilla (98%), Deschutes (95%) and Wallowa Counties (88%), all other counties measured below to well below normal
 - Min = Lake at 26%
- 7-day average streamflows as of February 9th continued similar Western/Eastern trends from January with many sites measuring below 50% of normal
- Trends over WYTD are different between western and eastern OR
 - Sites show negative trend from north to south west of Cascades
 - Many sites in NW OR and north Cascades measuring above normal
 - Recent precipitation improved conditions in SW OR

- Sites in eastern OR experiencing deficit of streamflow runoff with exception of NE corner
- January precipitation as a whole over western OR improved cumulative yield over WY by nearly 10%
- Many western basins show steady or upward trend in runoff yield over WYTD
 - Central basins continue to measure below to well below normal runoff yield
 - With exception of Umatilla and Grande Ronde, eastern basins continue to measure below to well below normal

Jon Rocha

- With exception of Rogue and Powder basins, many reservoir systems expected to meet irrigation demands
- Owyhee needs about 300,000-350,000 acft to meet demands
 - Transitioning to about 200 cfs for hydropower demands at end of February
- Beulah Reservoir may not fill to meet irrigation demands
 - Drought contingency plans for Bully Creek in place such that flow is being diverted from Malheur
- Phillips Lake current conditions and forecasts leading to outreach with stakeholders regarding efficiencies
 - May potentially fill to meet irrigation demands
- Deschutes system
 - Crane Prairie likely to fill, but not Wickiup
- Ochoco may top off near historical lows, similar situation in Prineville
 - Prineville locked in by minimum fish flows
 - Probably cover irrigation demands but need to negotiate lower fish flows for next winter
- Howard Prairie in Rogue system also doing outreach
- Scoggins only dam performing flood control

Mary Karen Scullion

- Refill of USACE reservoirs started February 1st in Willamette and Rogue systems
 - Many started empty or below
- Trending below rule curve and meeting minimum flow demands

Nick Yonker

- Low fire danger
 - Near normal fire danger expected through May

Alaina Mayfield, Tom Jenkins, Chris Sutton

- New program as of 2020
 - Regional support for county emergency managers, including planning and training
 - 6 regions (eastern position vacant)
- Introduce county emergency managers with OWRD region managers and watermasters
- OEM has monthly update call with county emergency managers
 - Weekly watch

- Regular meetings to gage understanding

Discussion

- Next meeting proposed for Thursday, March 11th
 - Maintain meetings with GoToMeeting