Utah Water Conditions (drought webinar)

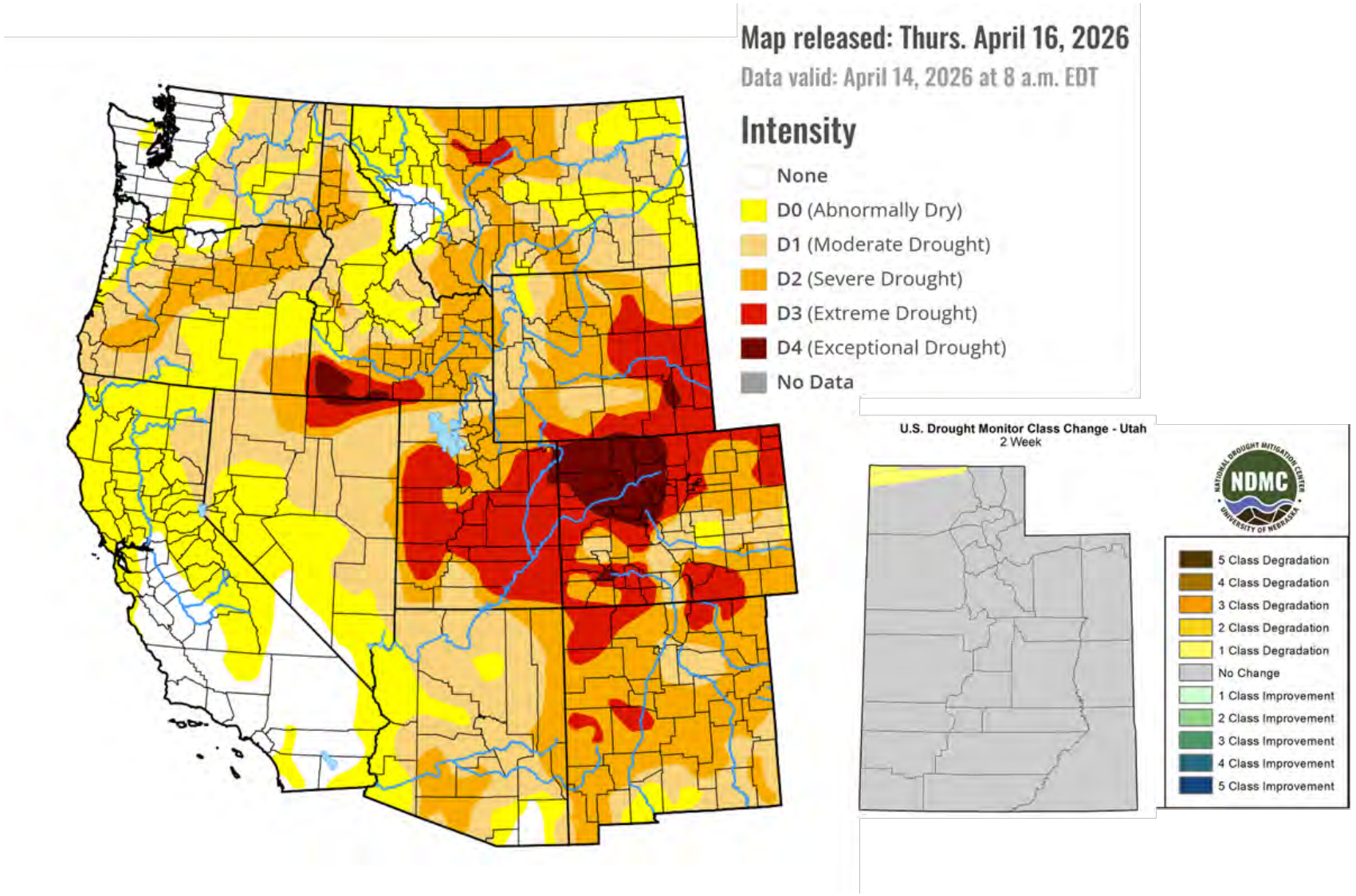
The meeting will begin shortly

Thank you to our contributors

Utah Water Conditions Update

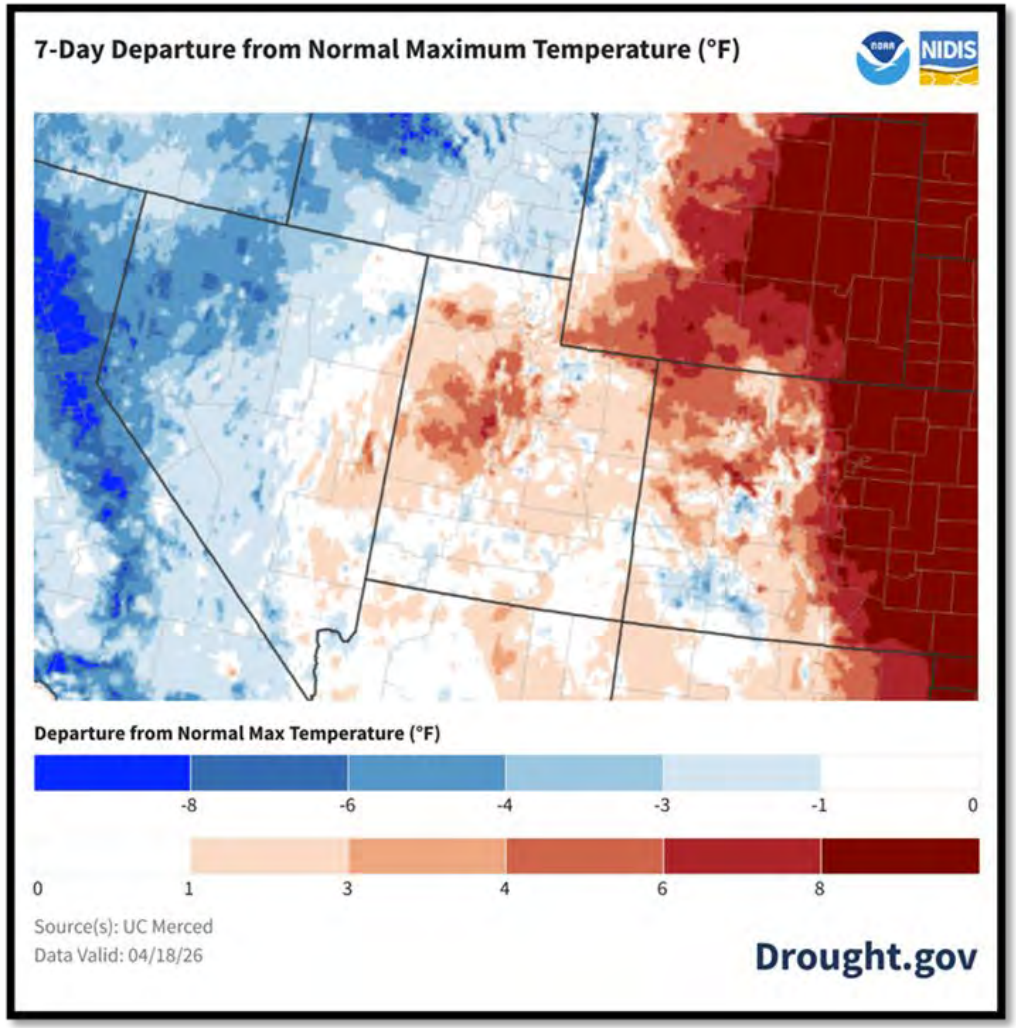
April 21, 2026

Drought Condition Summary

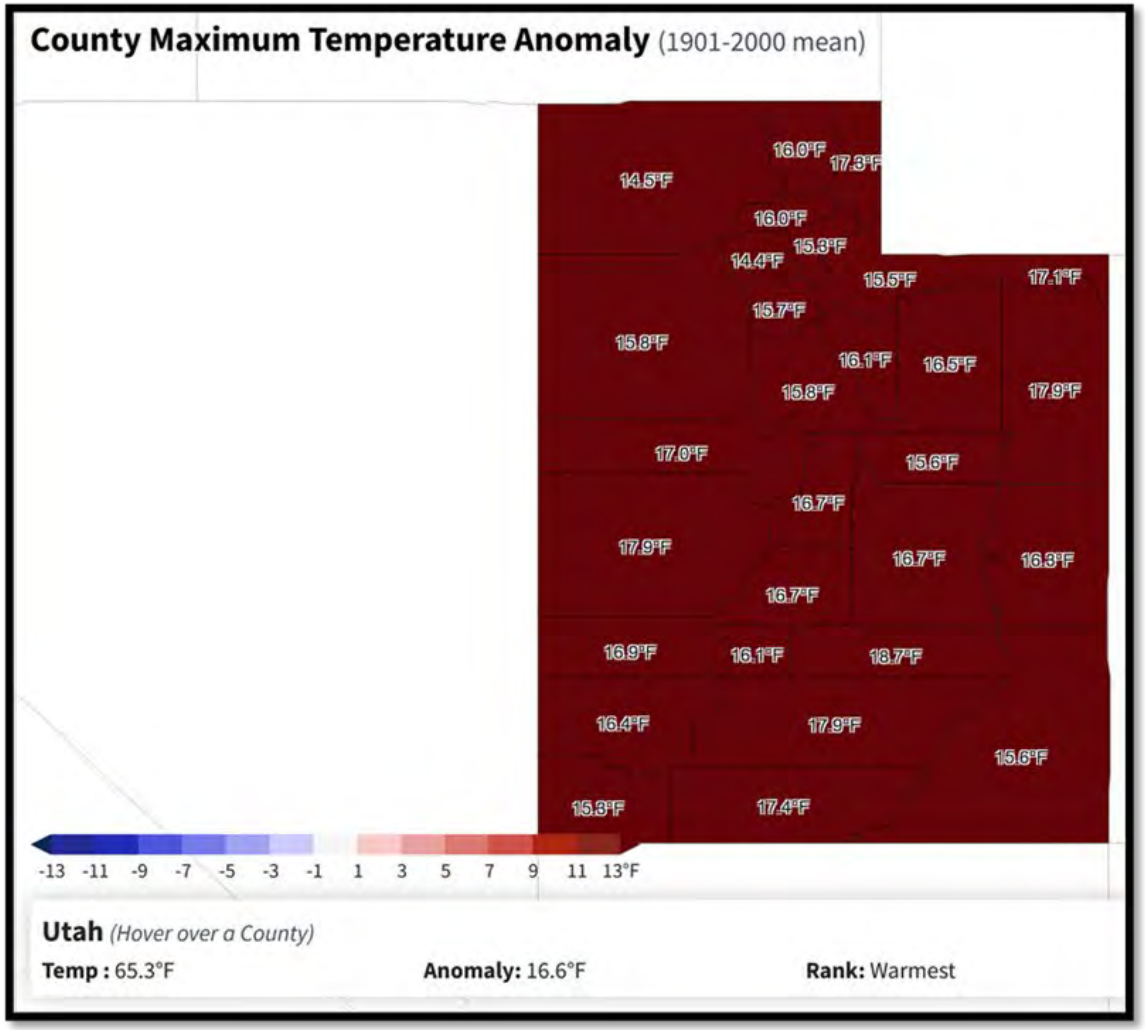


Agency - Utah Climate Center
Presenter - Jon Meyer

Temperature Summary

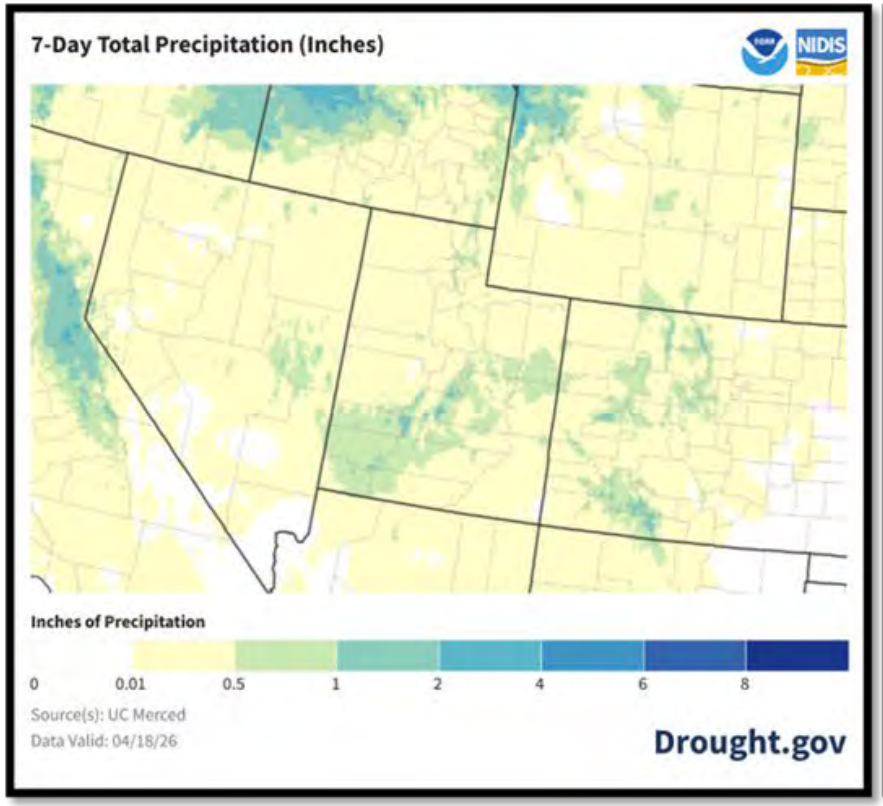


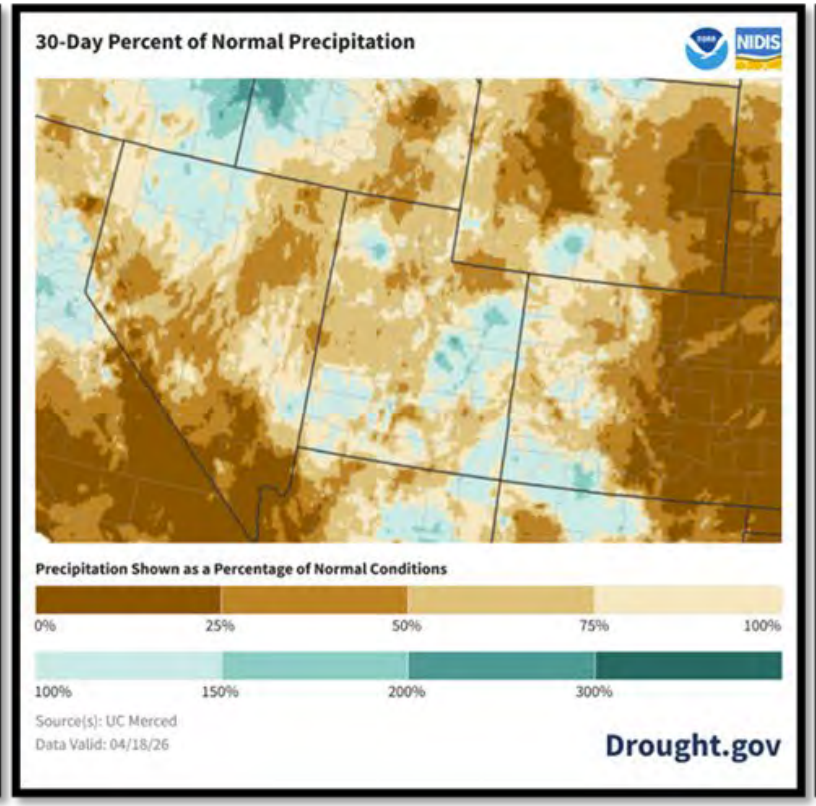
March Temperature Summary

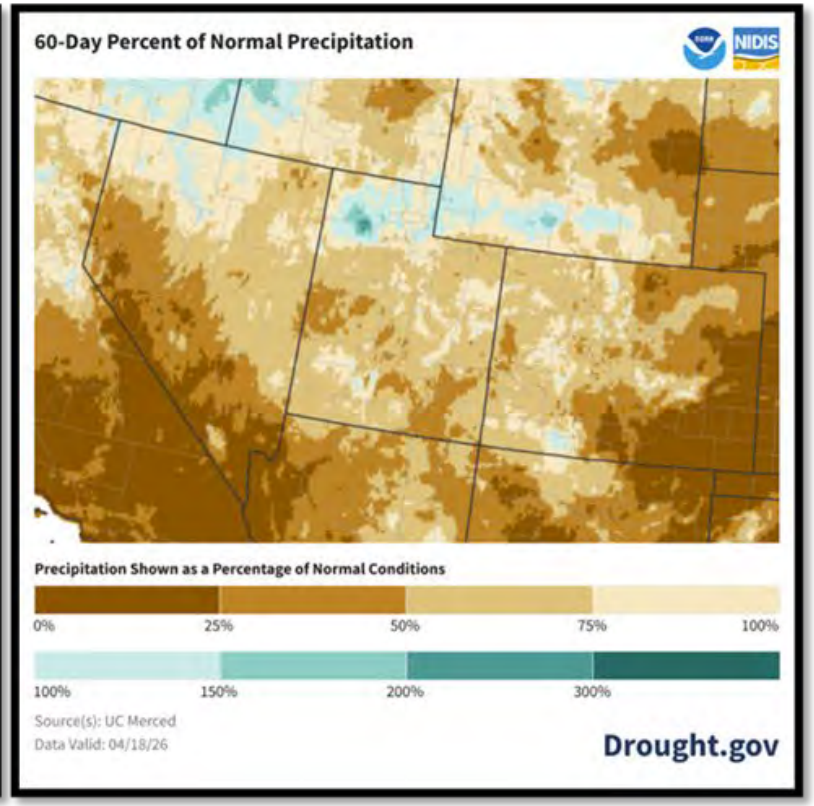


Agency - Utah Climate Center
Presenter - Jon Meyer

Precipitation Summary

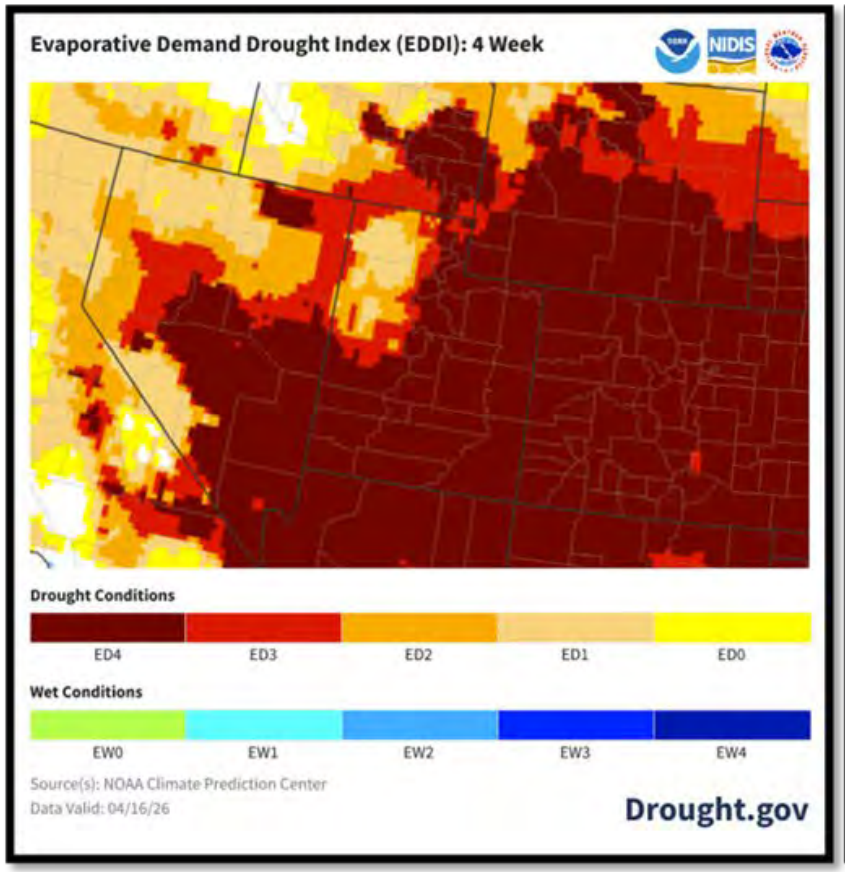


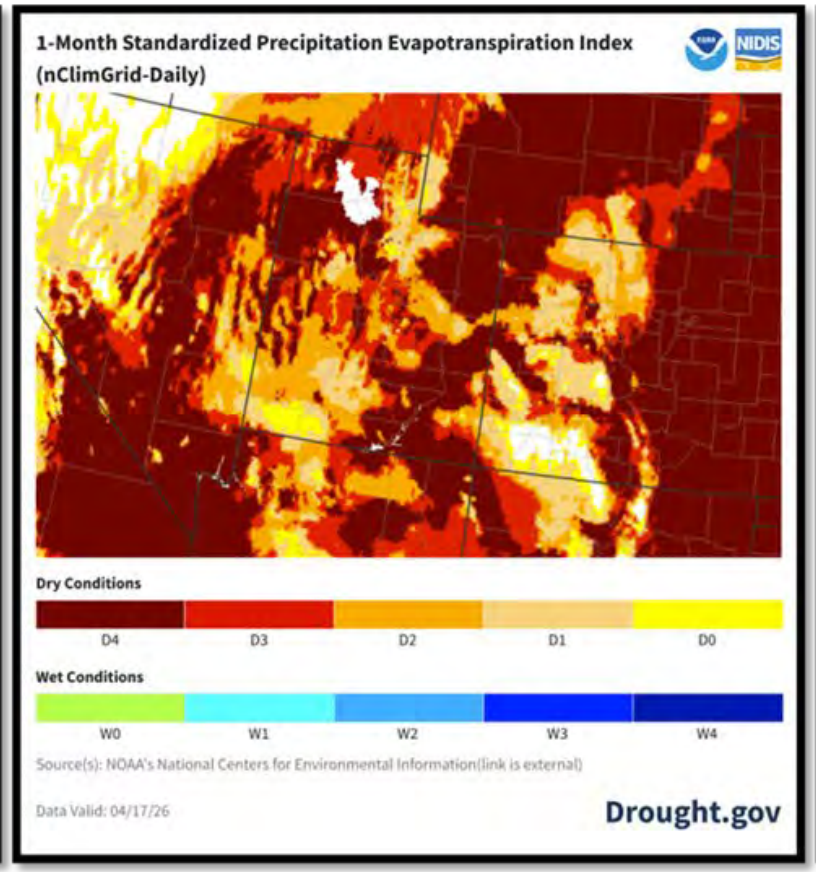


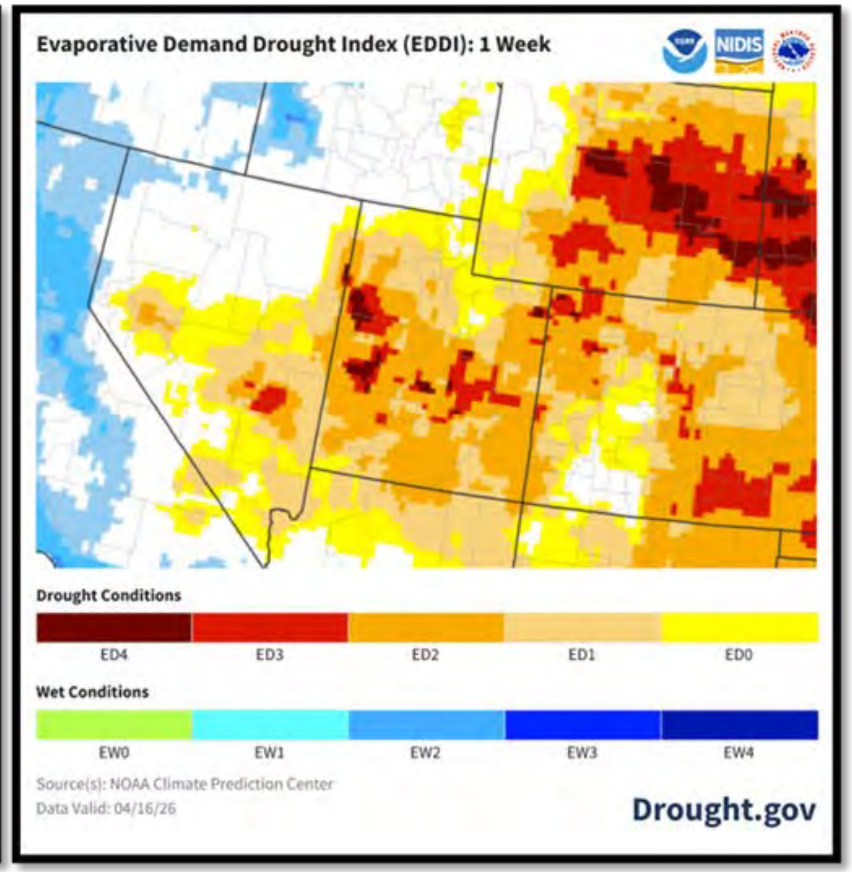


Agency - Utah Climate Center
Presenter - Jon Meyer

Recent Evaporative Demand



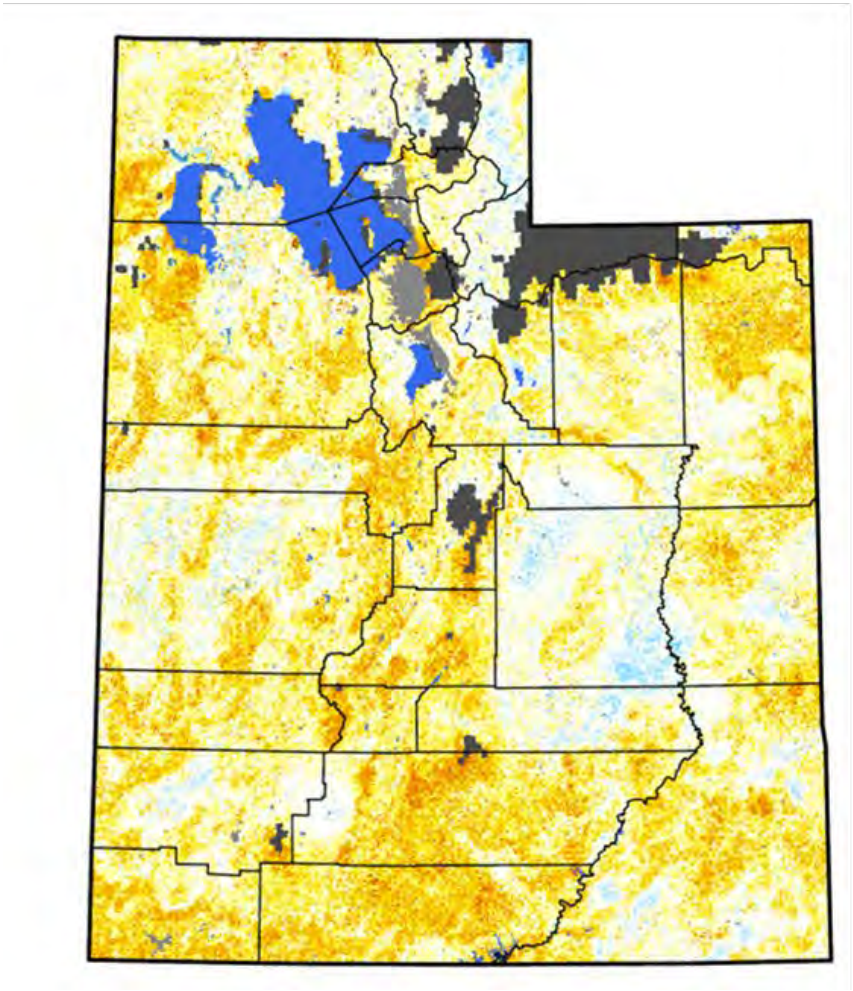




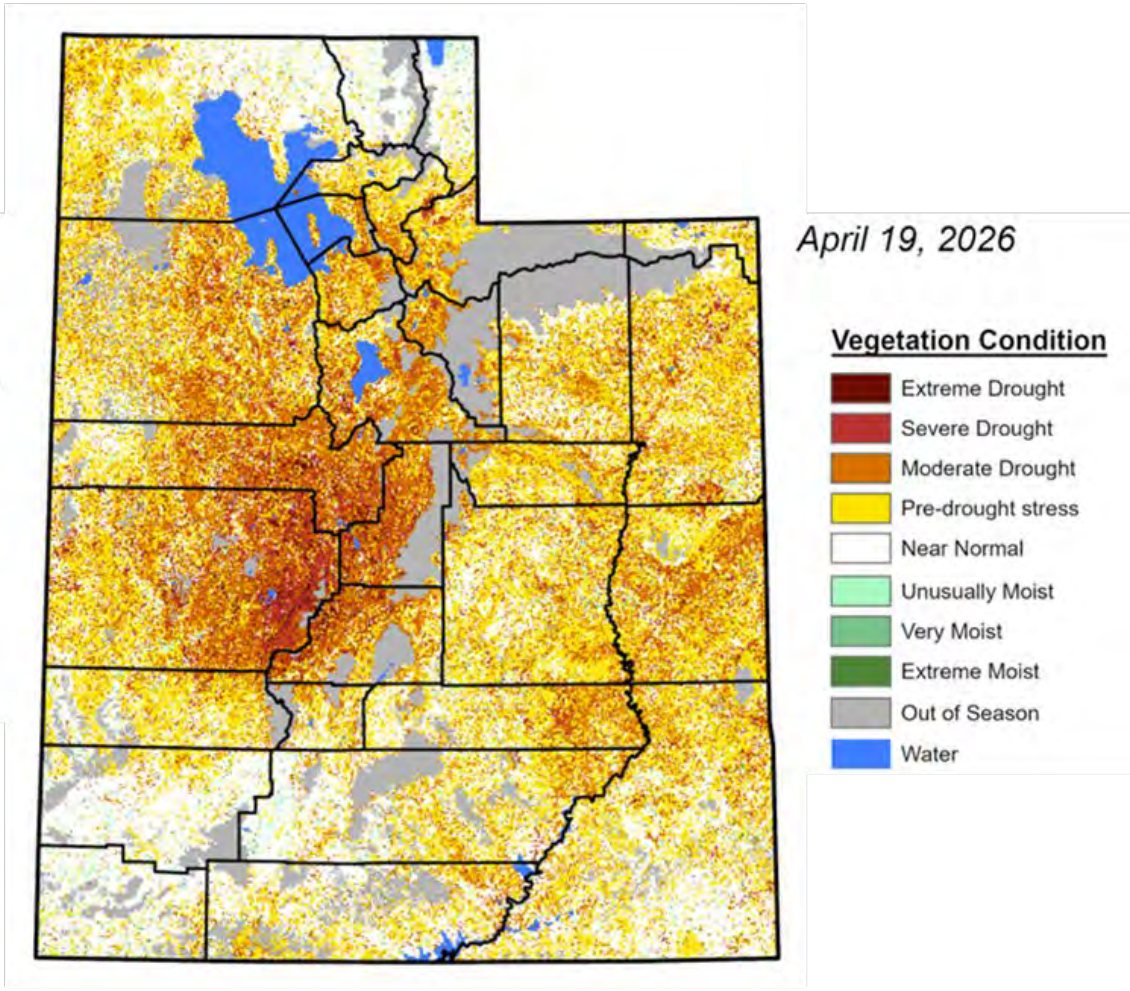
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Presenter - Jon Meyer

Drought Metrics

Quick-Drought Response Index



Vegetation Drought Response Index

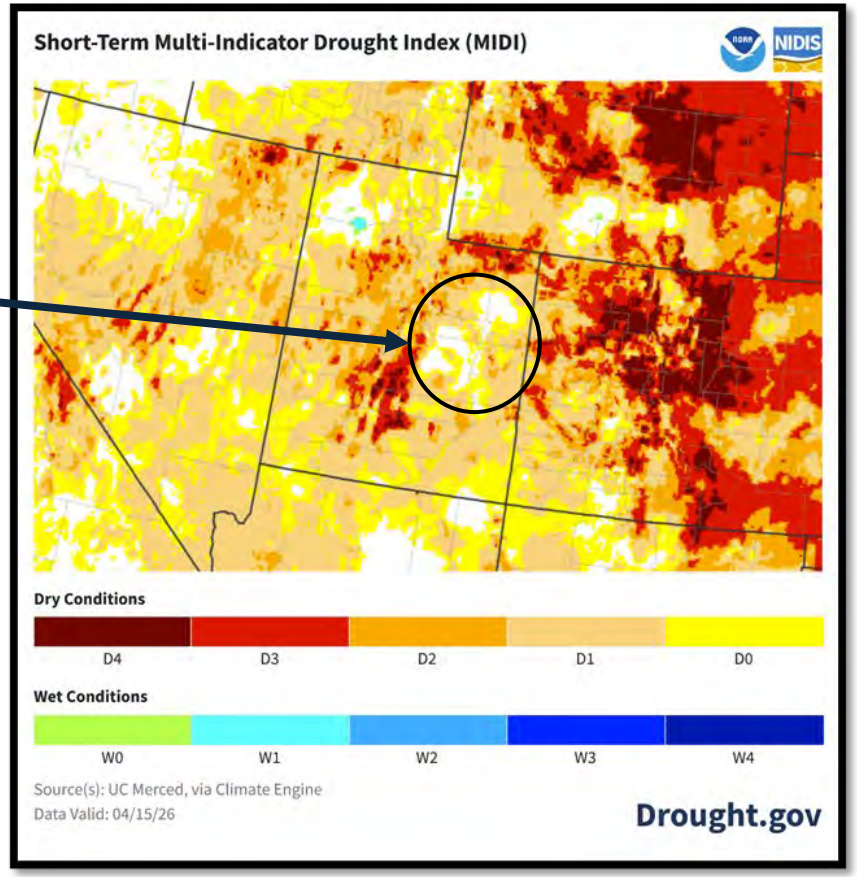


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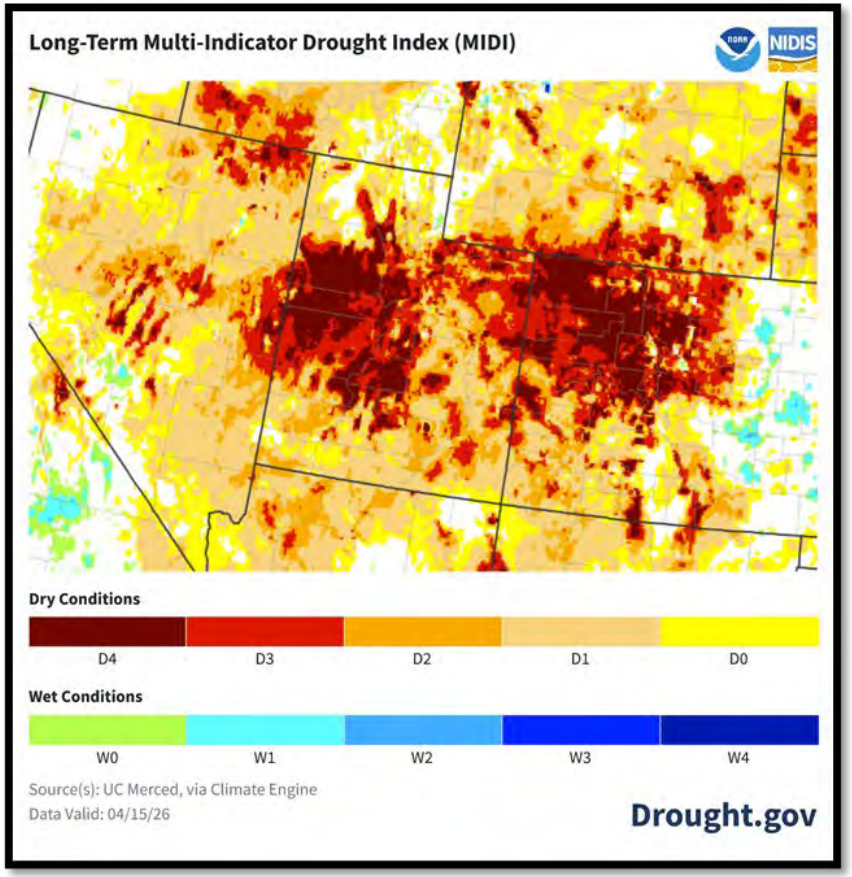
Drought Metrics

Have these counties seen any short-term relief?

Personal experiences matching this?



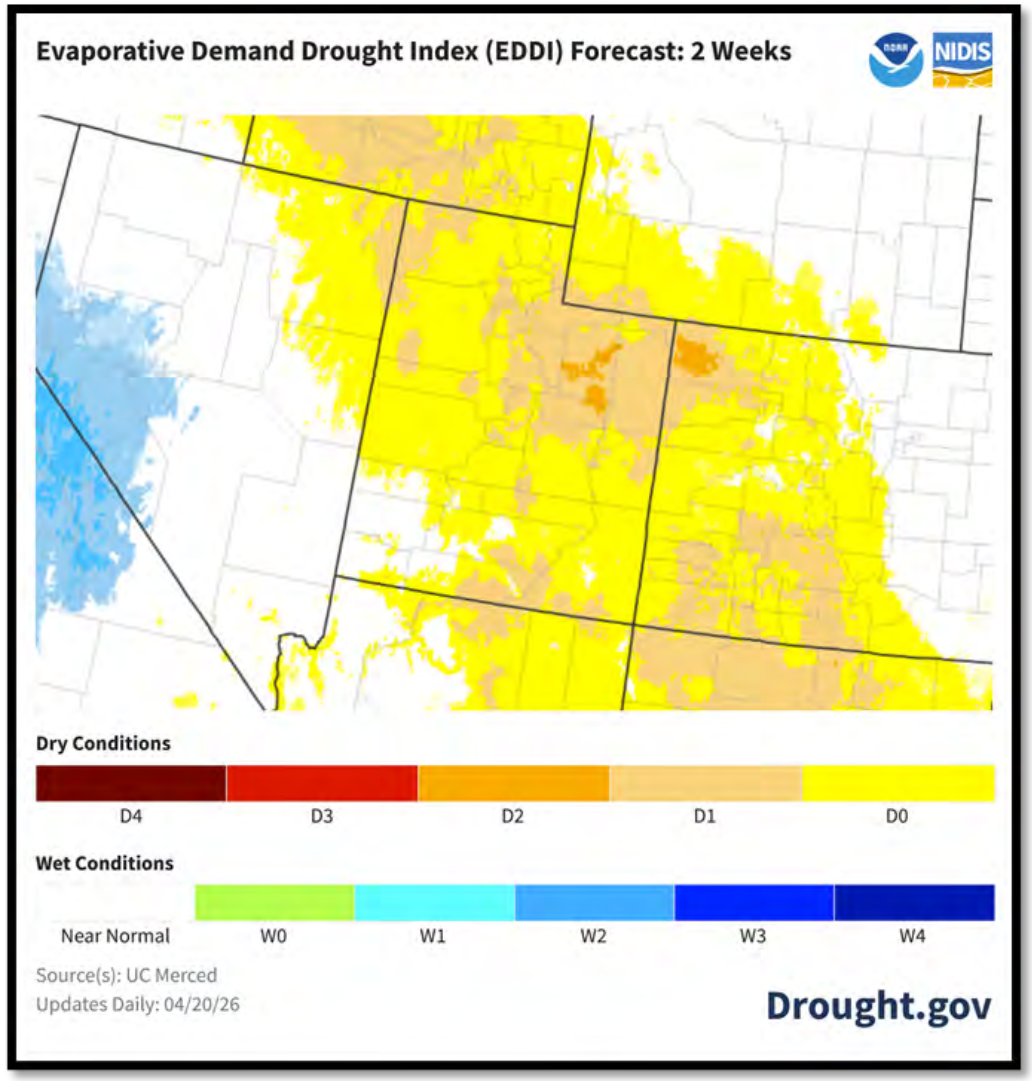
Short-Term MIDI= 0.2 *(PDSI/2) + 0.2 * SPI30d + 0.25 * SPI90d + 0.35 * (Z/2)
where
- PDSI = Palmer Drought Severity Index
- Z = Palmer's Z-Index
- SPI30d = 30-day Standardized Precipitation Index (SPI)
- SPI90d = 90-day Standardized Precipitation Index (SPI)

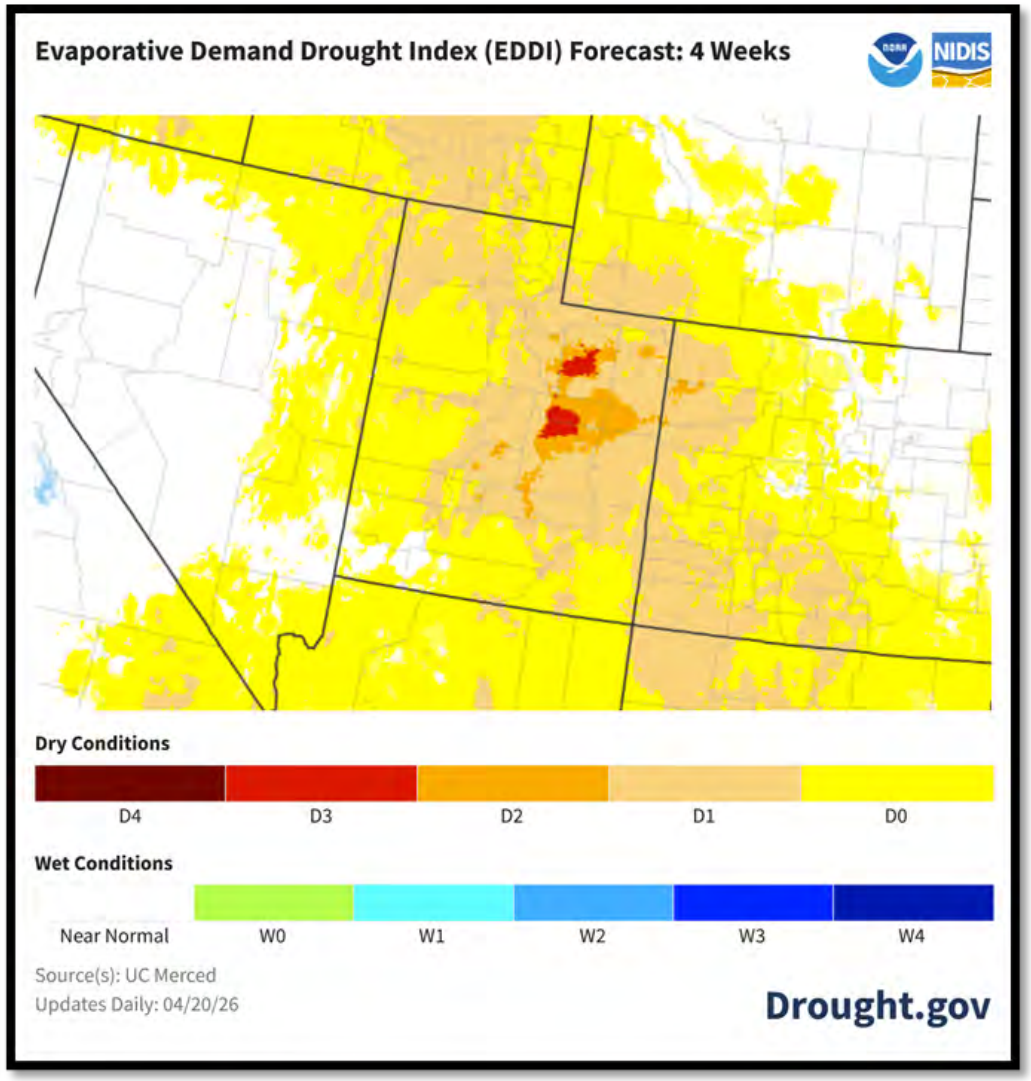


Long-Term MIDI= 0.35 *(PDSI/2) + 0.15 * SPI180d + 0.2 * SPI1y + 0.2 *SPI2y + 0.1 * SPI5y
where
- PDSI = Palmer Drought Severity Index
- SPI180d = 180-day Standardized Precipitation Index (SPI)
- SPI1y = 1-year Standardized Precipitation Index (SPI)
- SPI2y = 2-year Standardized Precipitation Index (SPI)
- SPI5y = 5-year Standardized Precipitation Index (SPI)

Agency - Utah Climate Center
Presenter - Jon Meyer

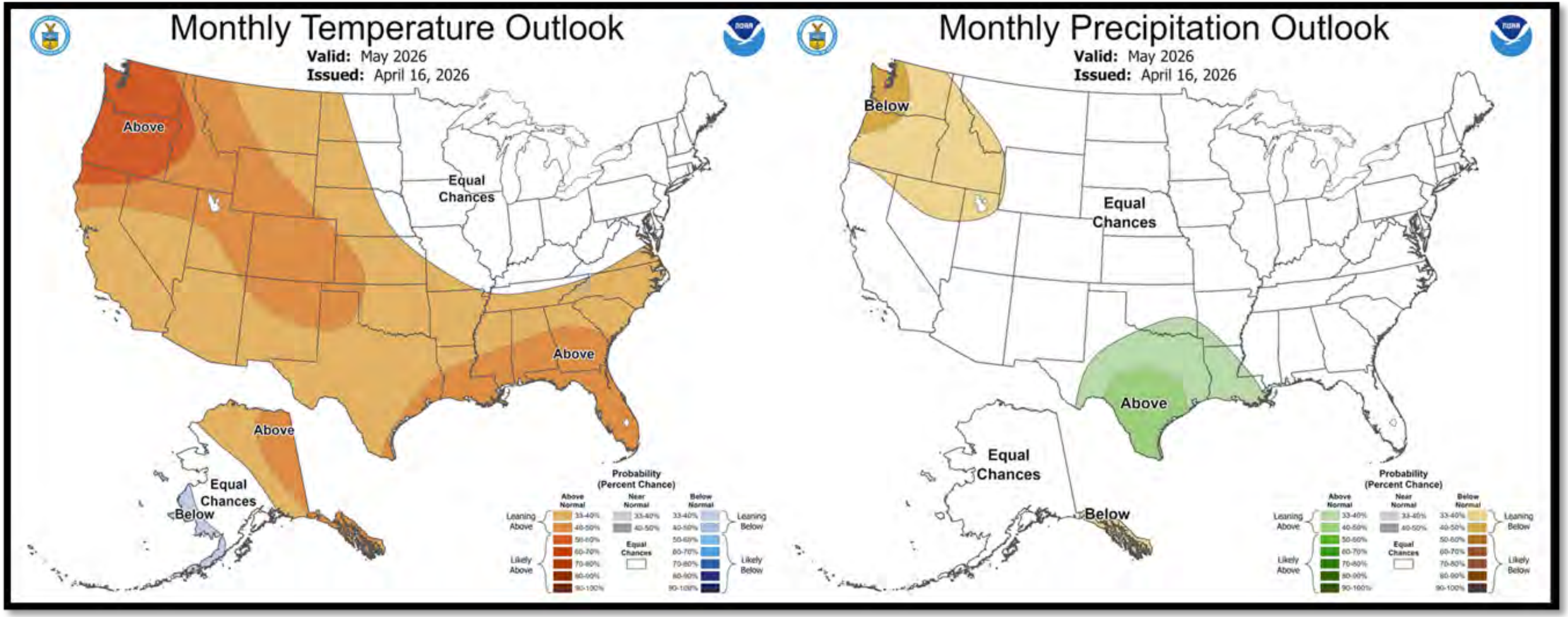
EDDI Outlook





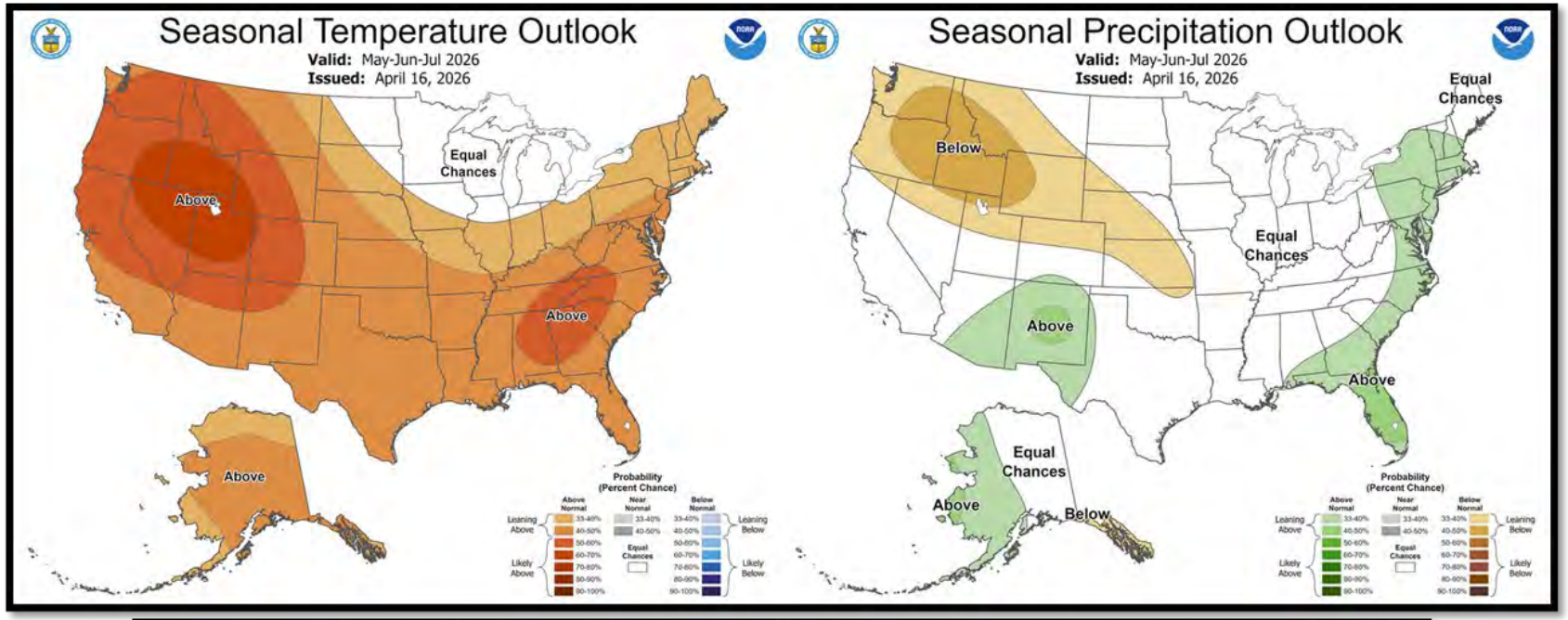
Agency - Utah Climate Center
Presenter - Jon Meyer

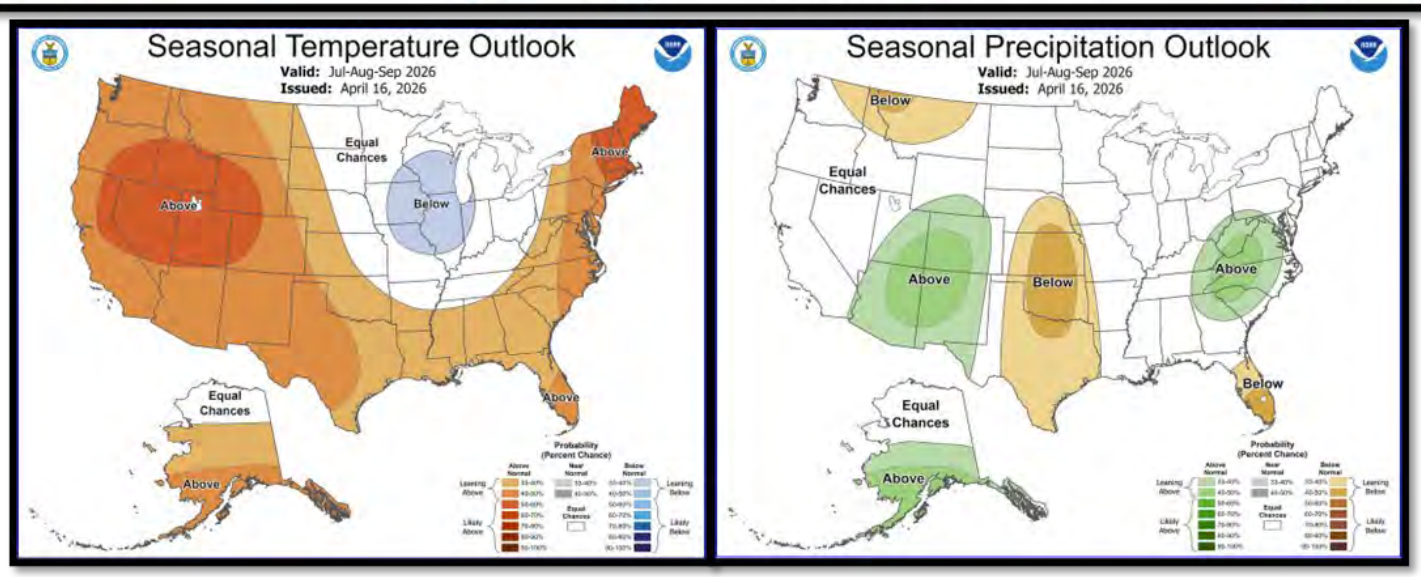
Climate Predictions Center May Outlook



Agency - Utah Climate Center
Presenter - Jon Meyer

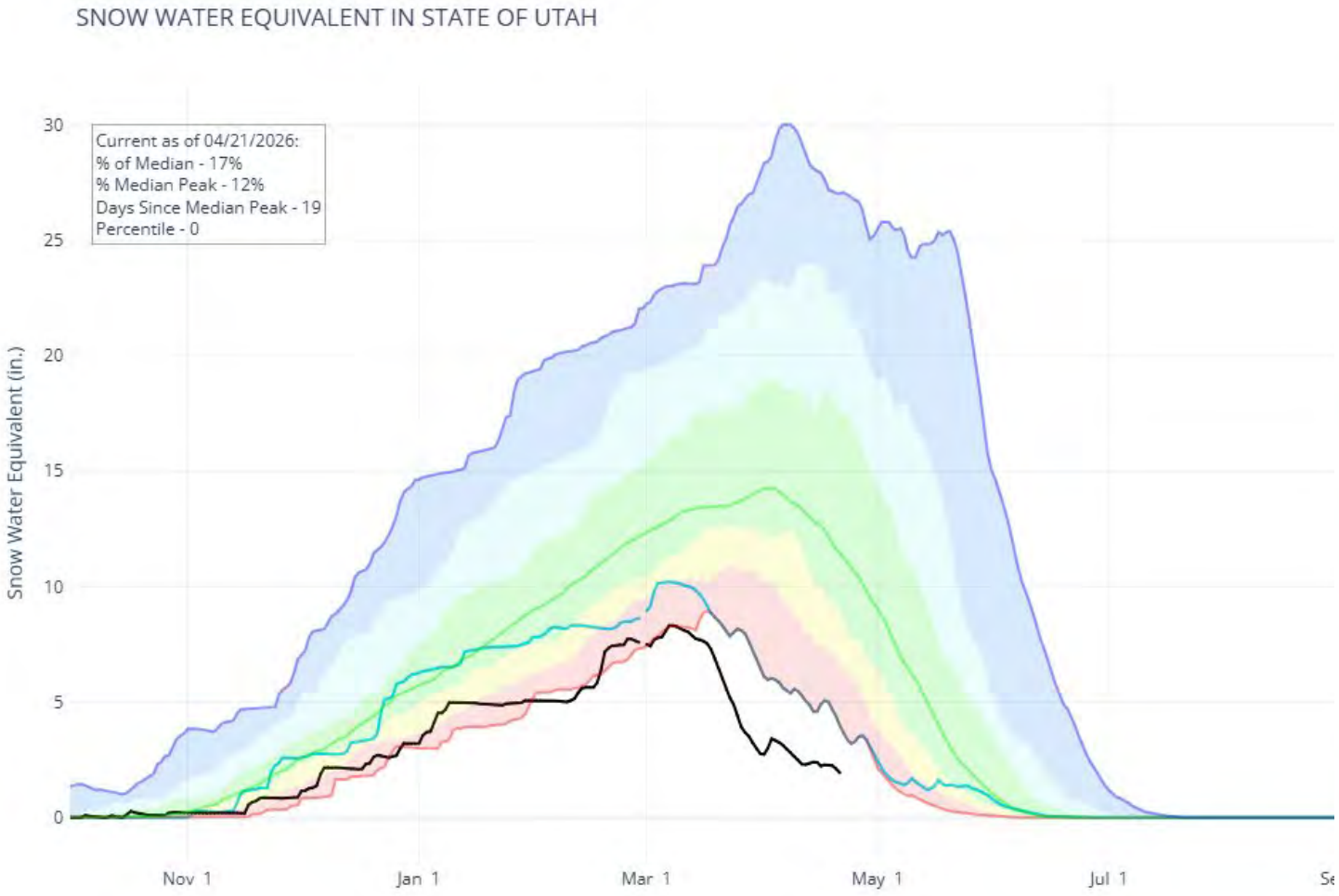
Climate Predictions Center Spring & Summer Outlook

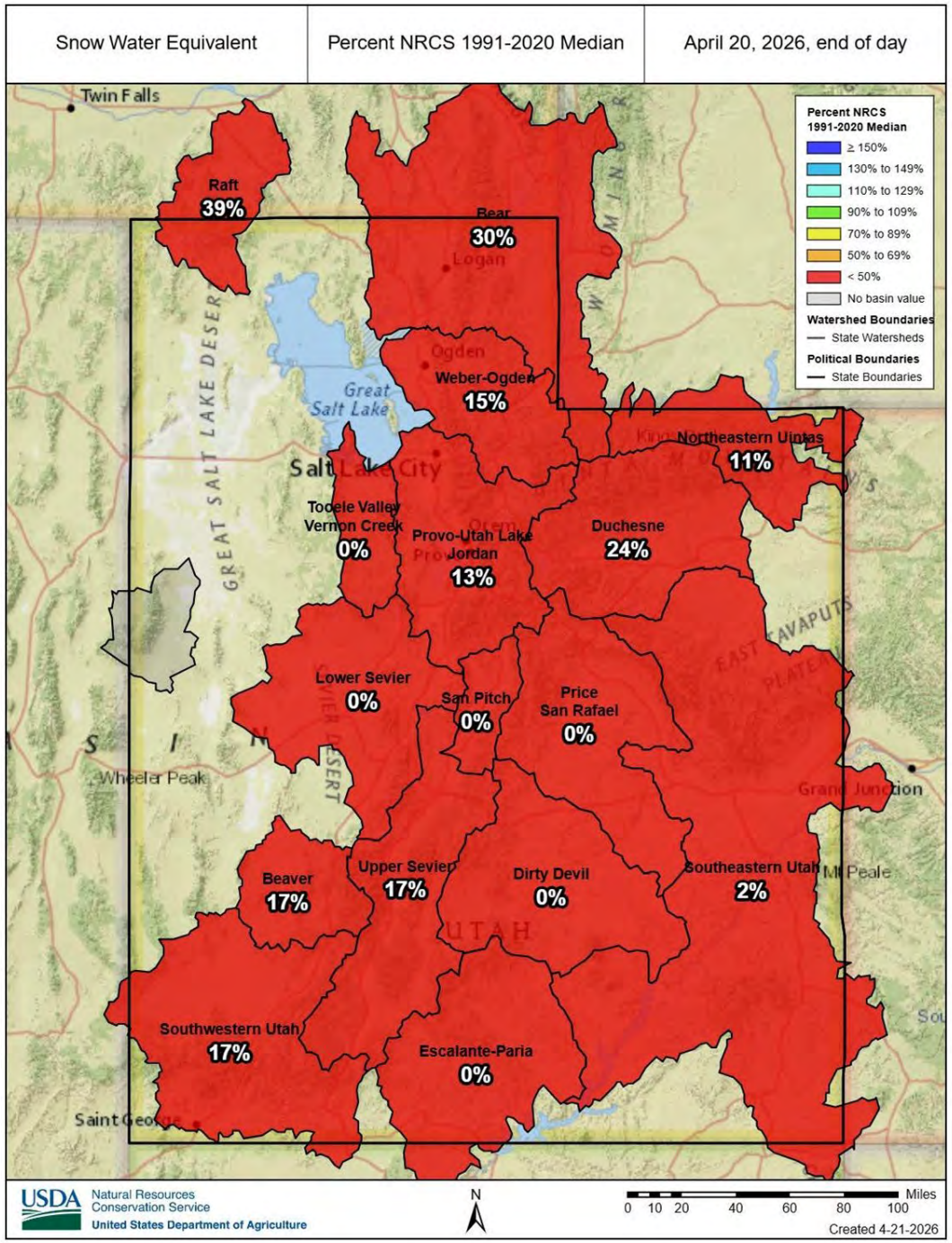




Agency - Utah Climate Center
Presenter - Jon Meyer

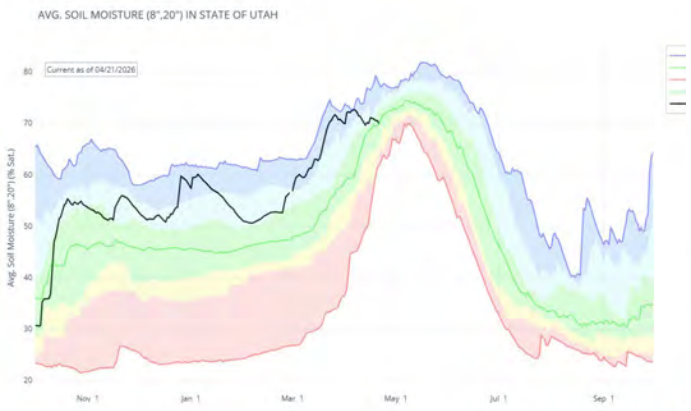
Snowpack

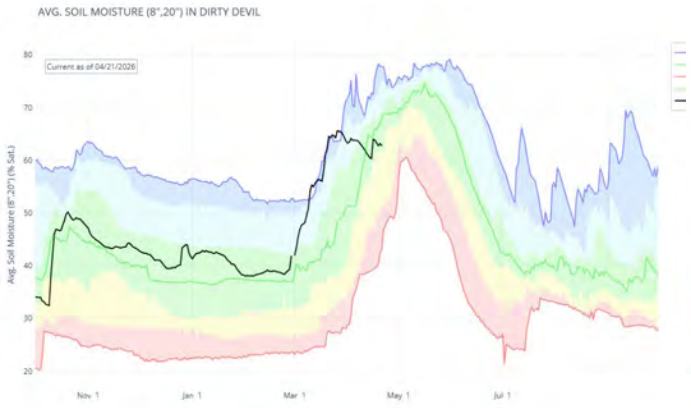


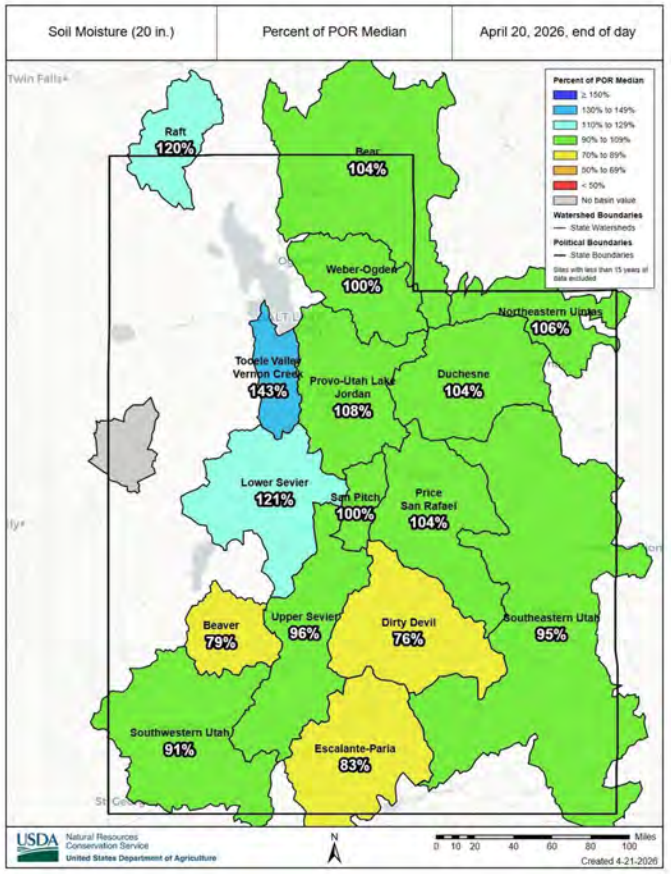


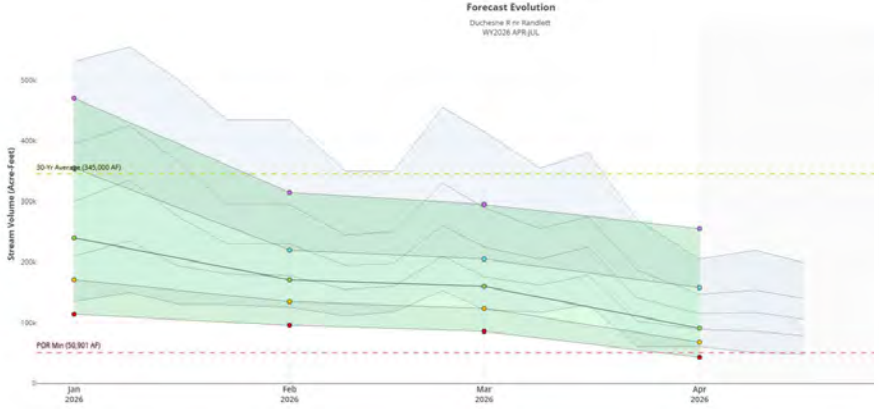
Agency - NRCS
Presenter – Jordan Clayton

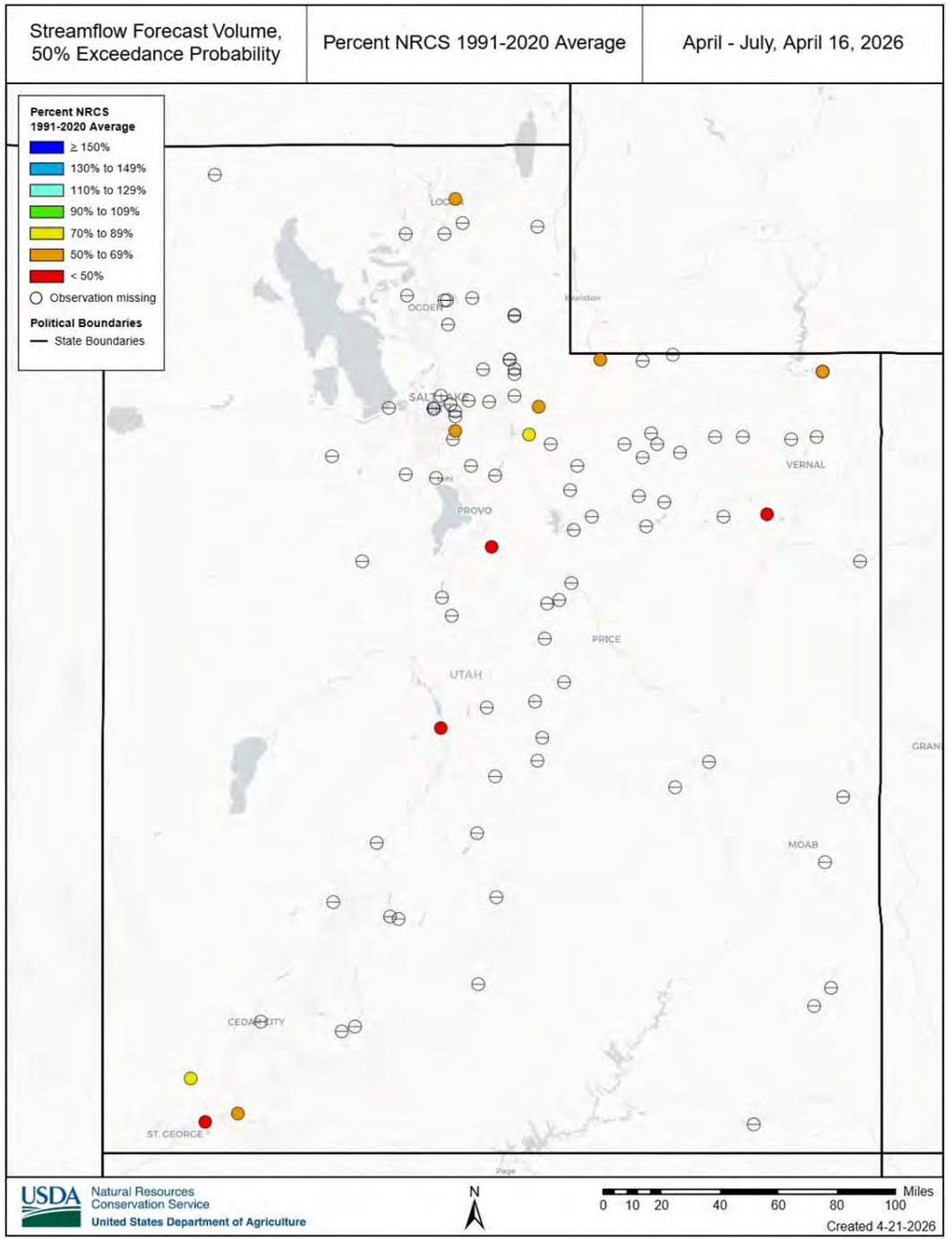
Soil Moisture & Snowmelt Forecasts











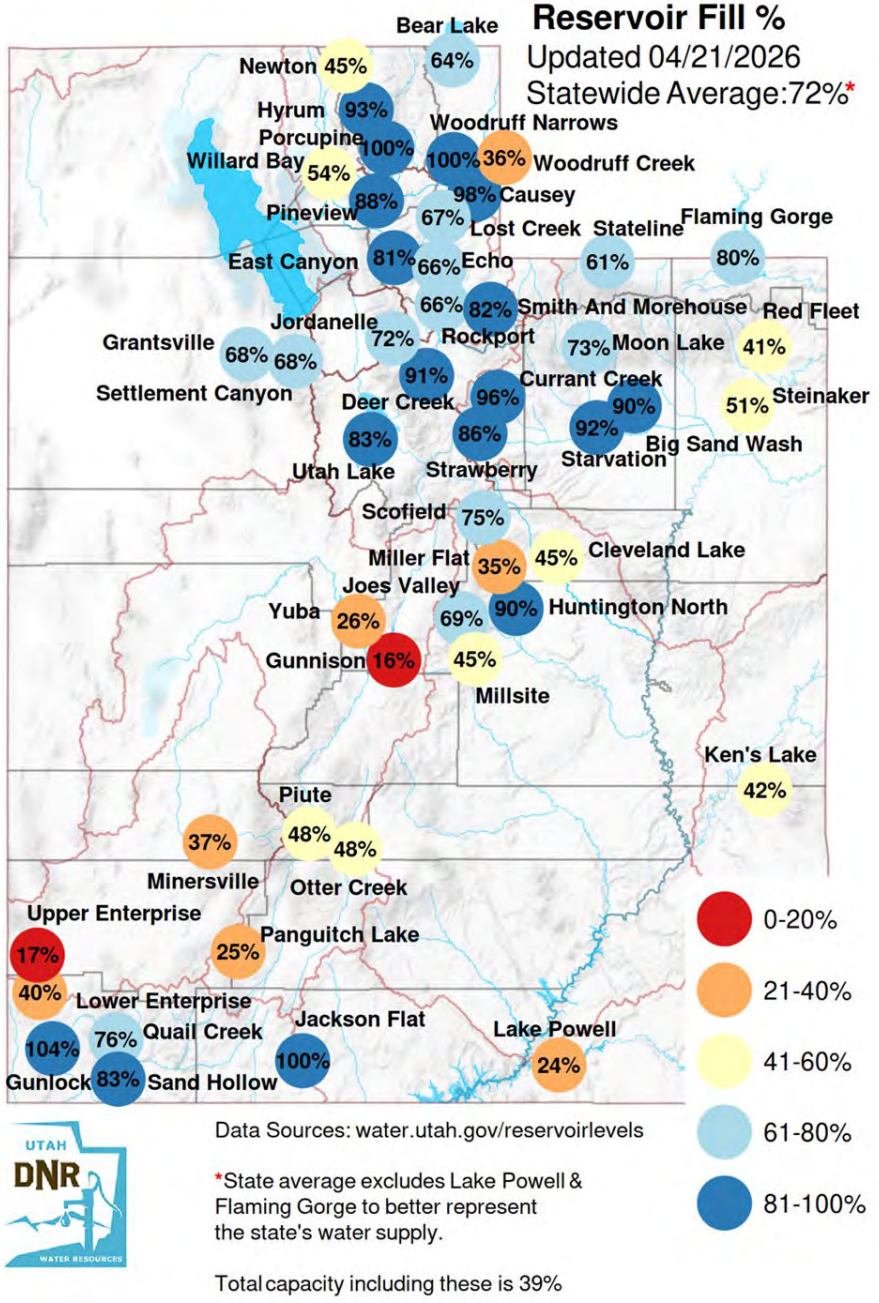
Agency – NRCS
Presenter – Jordan Clayton

Statewide Reservoirs

Statewide reservoir storage is 72%

Similar to two weeks ago

10% below last year



Agency - Utah Division of Water Resources
Presenter – Laura Haskell

Reservoir Storage

System storage: 79% full

- (Excluding Powell, Flaming Gorge, Fontenelle)
- ~3.3% higher than last month (75%)
- ~10% lower than last year (~89%)
- ~2% higher than the 22-year average (~76%)

Basin storage: 47-83% full

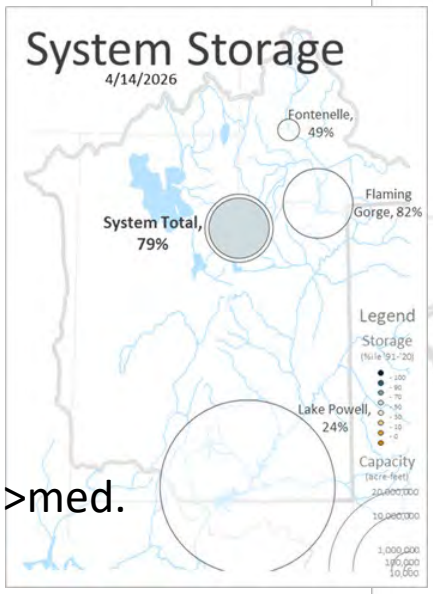
- Weber, Price/San Rafael, Duchesne, Upper Green>med.
- Bear, Provo <median

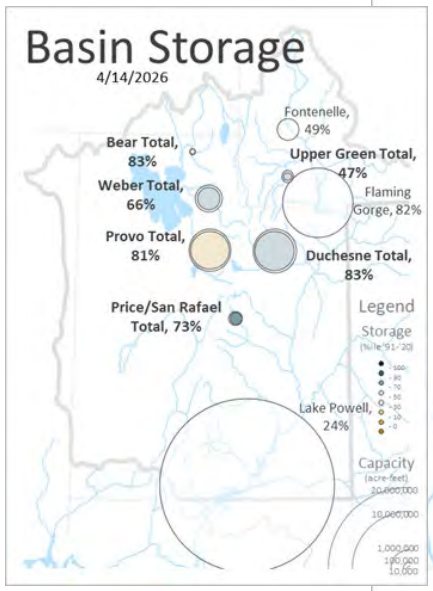
Reservoir storage: 23-99% full

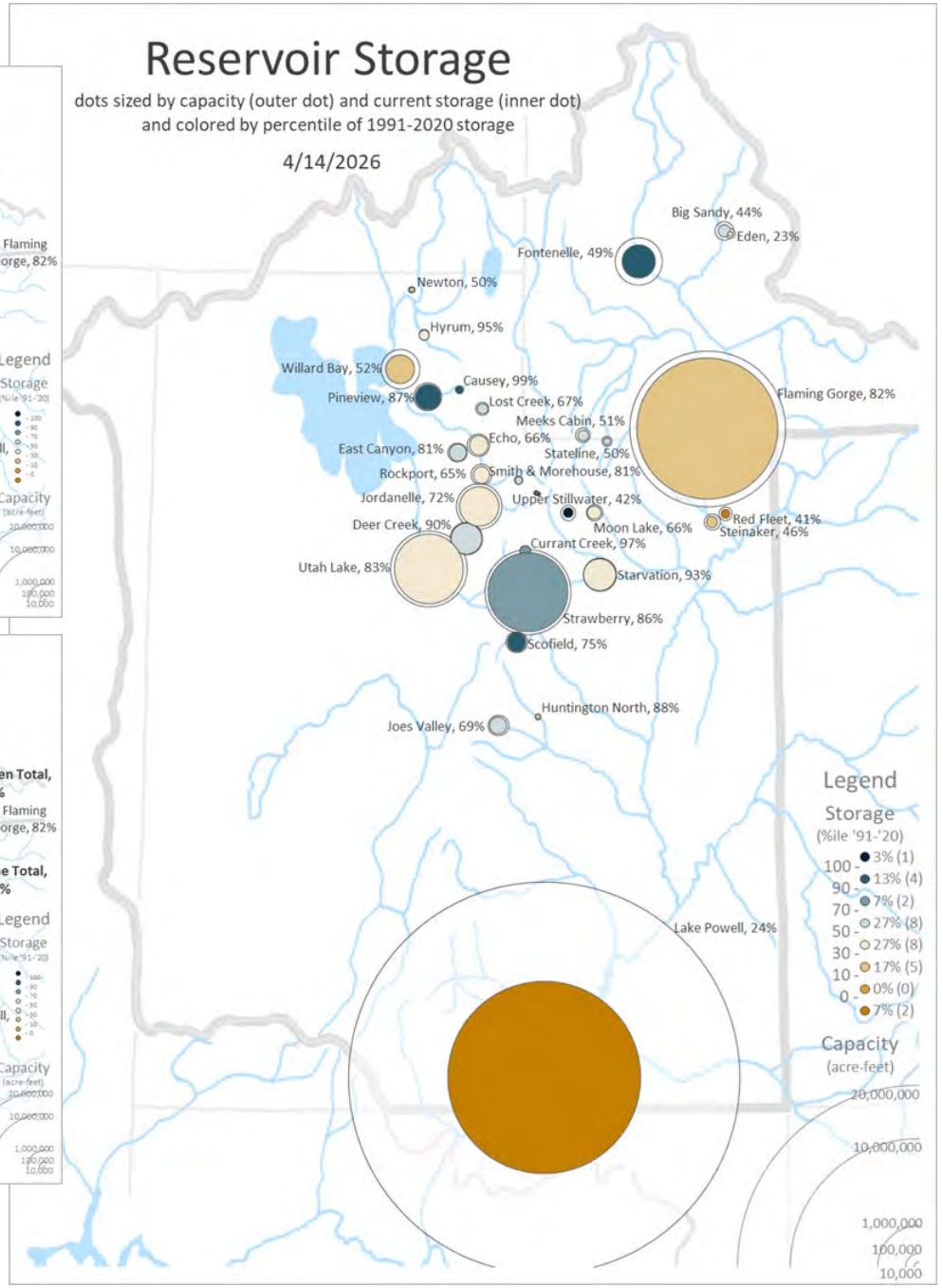
- 15/30 >30-year median
- centered ~50th percentile

Outlook

- storage increasing
- early runoff
- unlikely fill

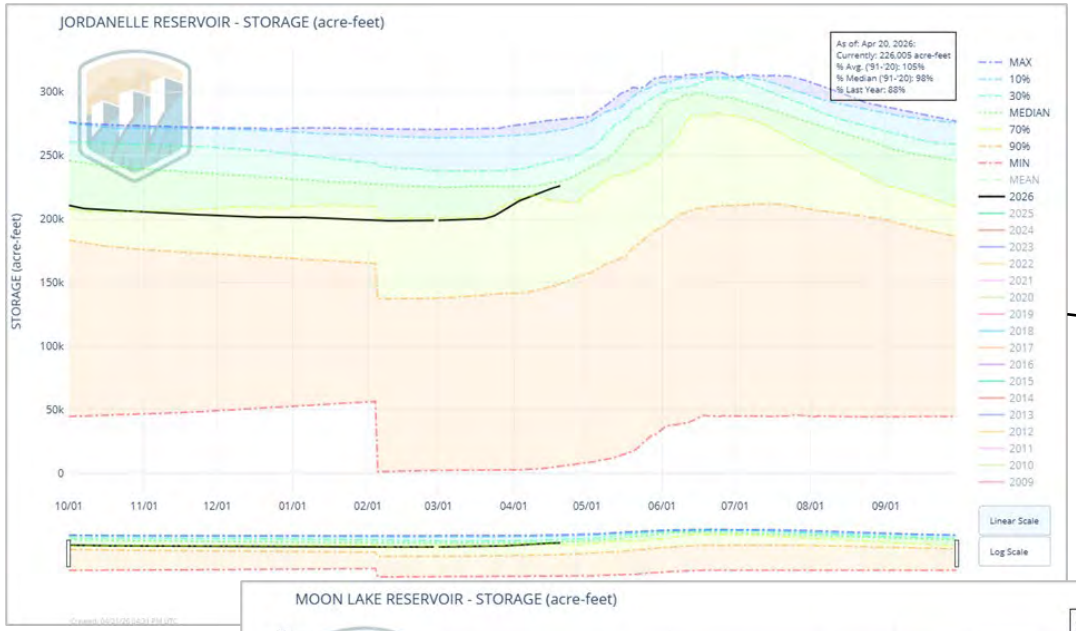


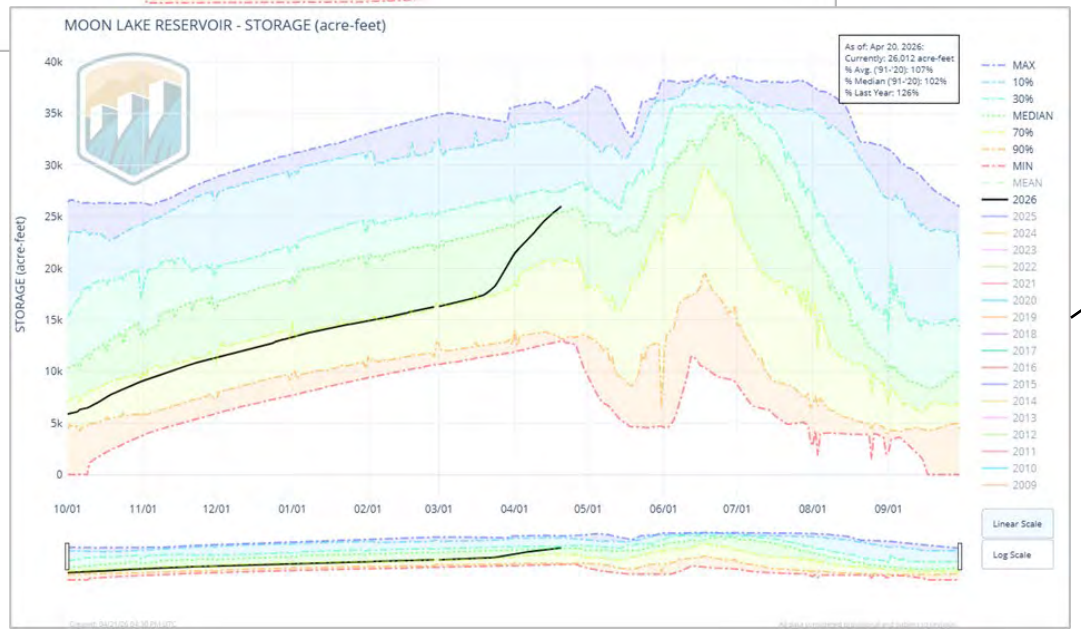


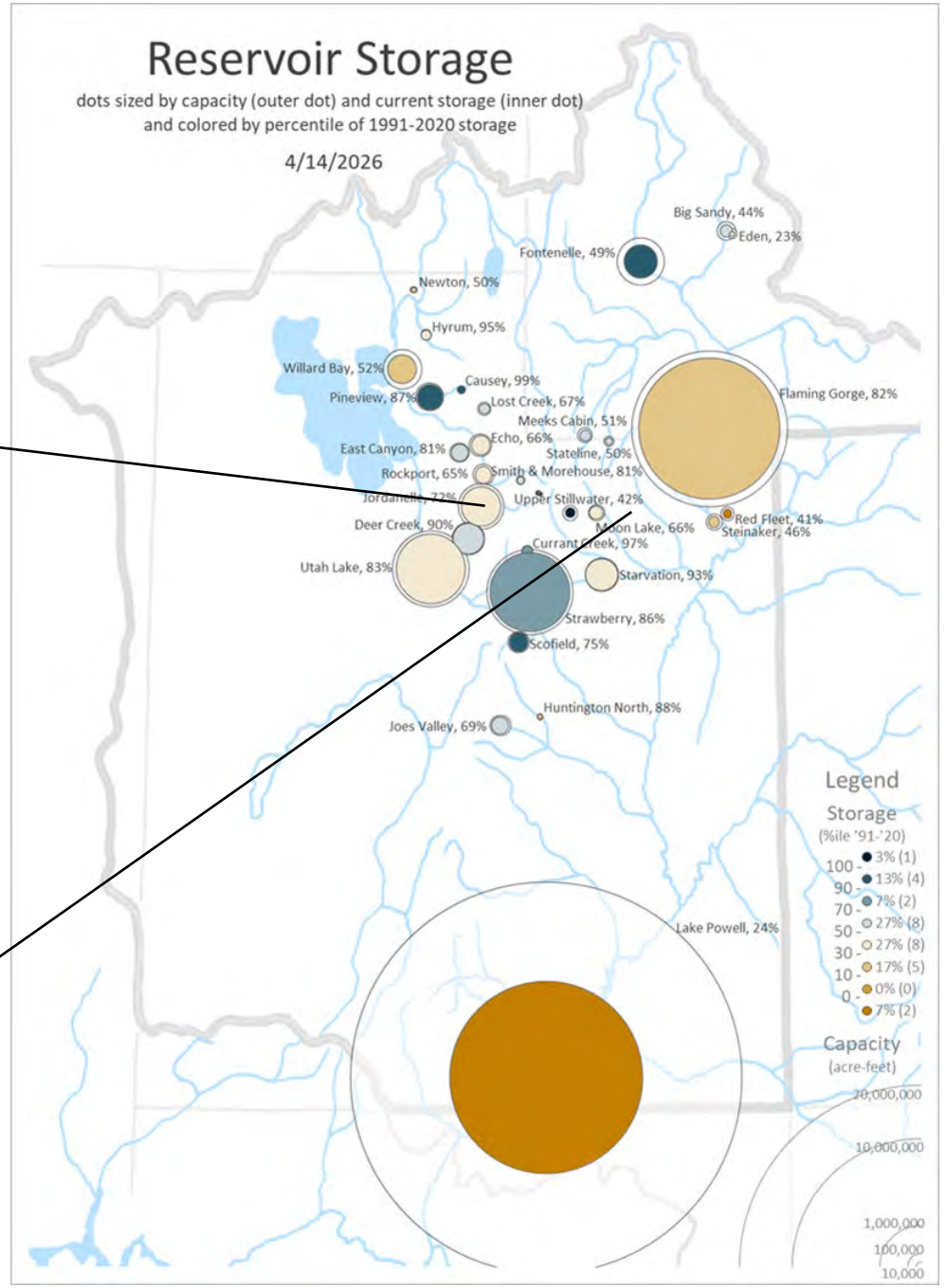


Agency - USBR
Presenter – Gary Henrie

Reservoir Storage







Agency - USBR
Presenter – Gary Henrie

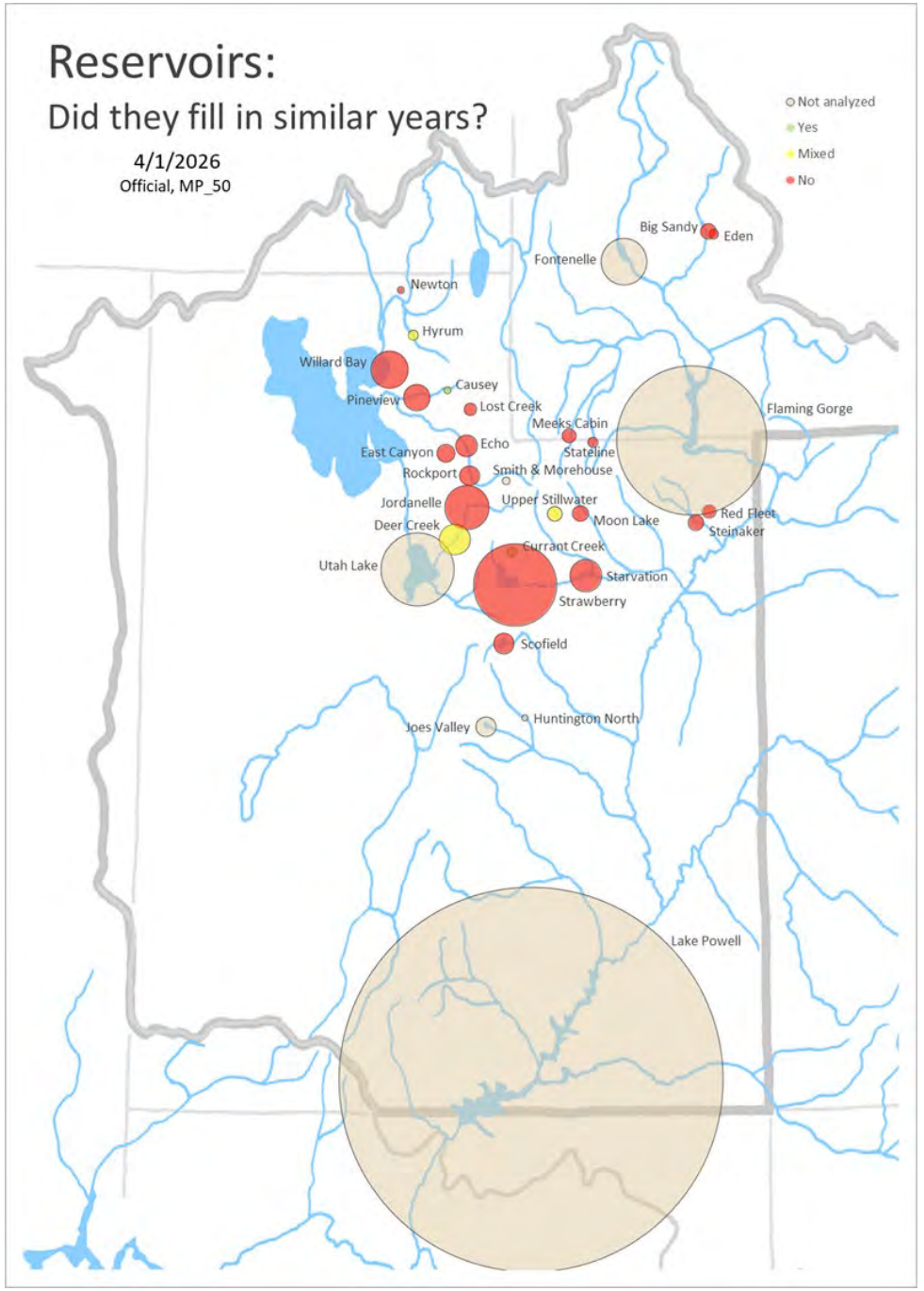
Reservoir Storage

How do our current reservoir and runoff conditions compare to past years?

Reservoir empty space vs runoff forecast

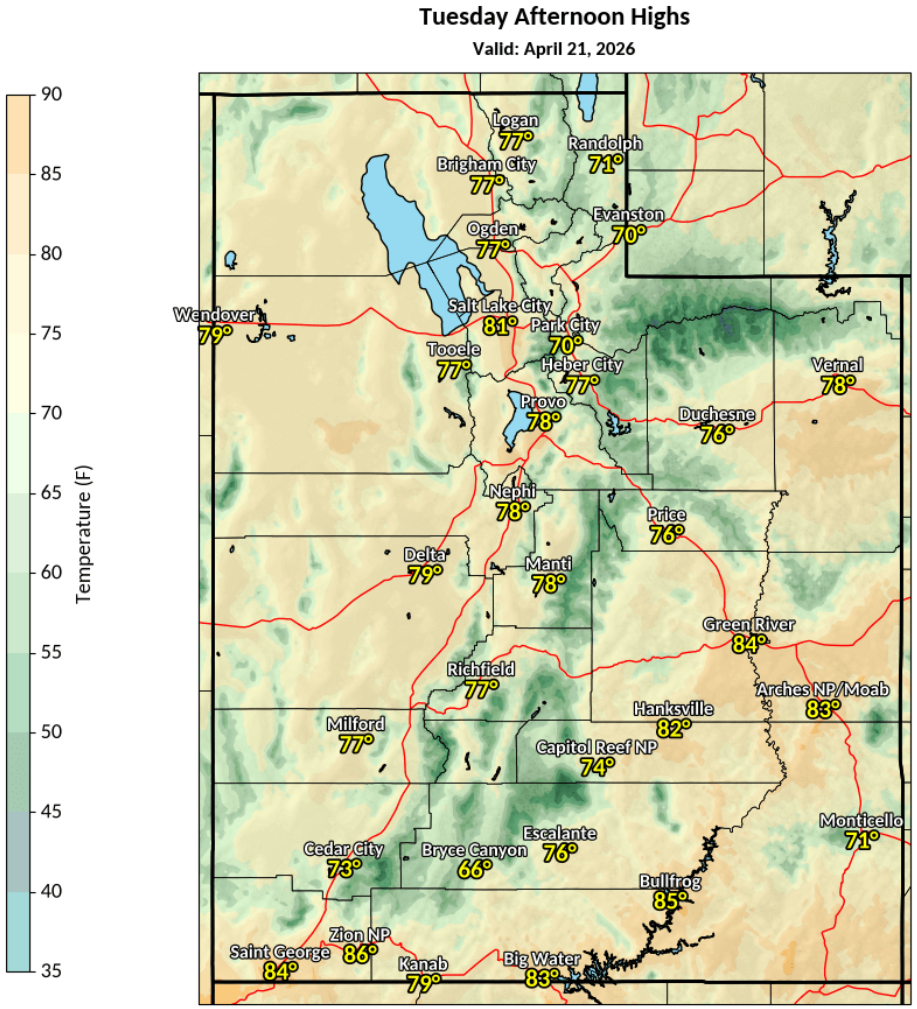
Current conditions vs past years and did the reservoirs fill in past similar years?

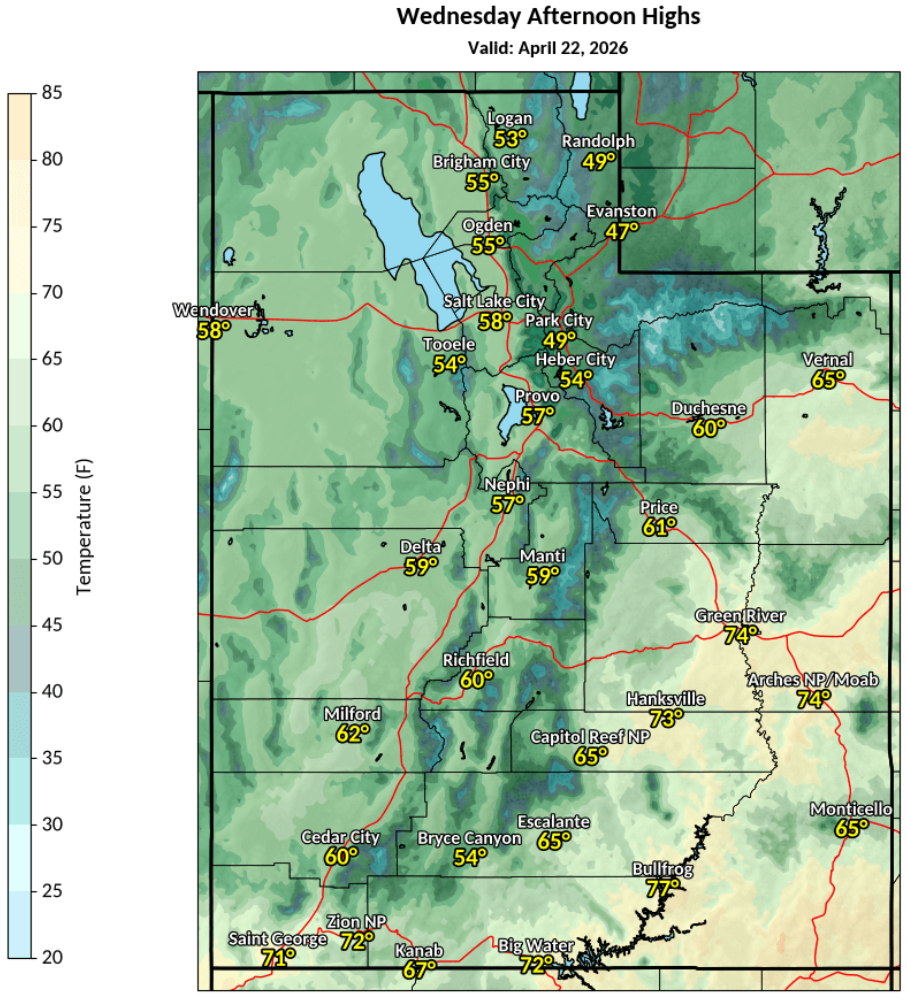
– Green = yes
– Yellow = some did/didn’t
– Red = no



Agency - USBR
Presenter – Gary Henrie

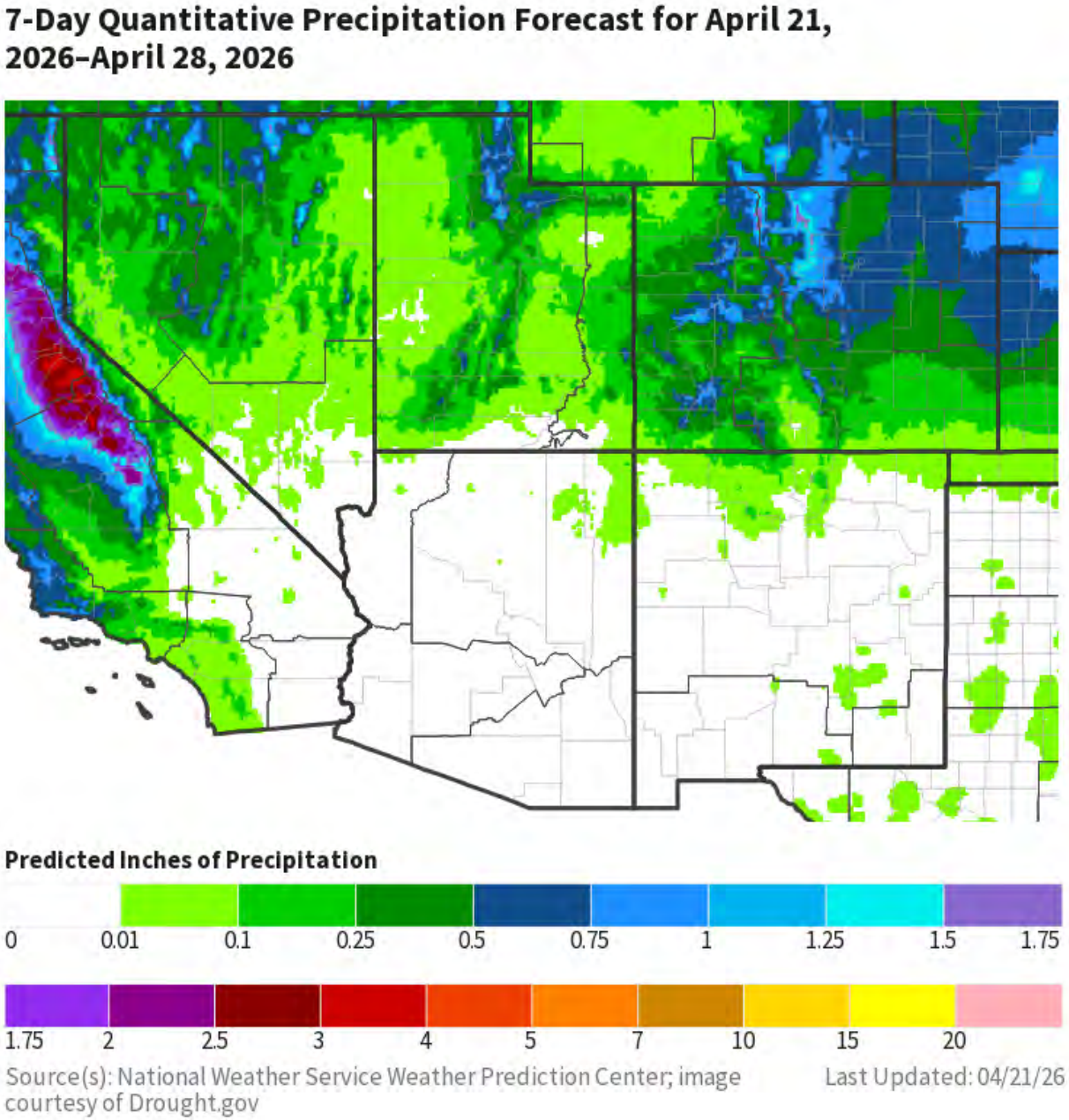
From Summer Back To Spring





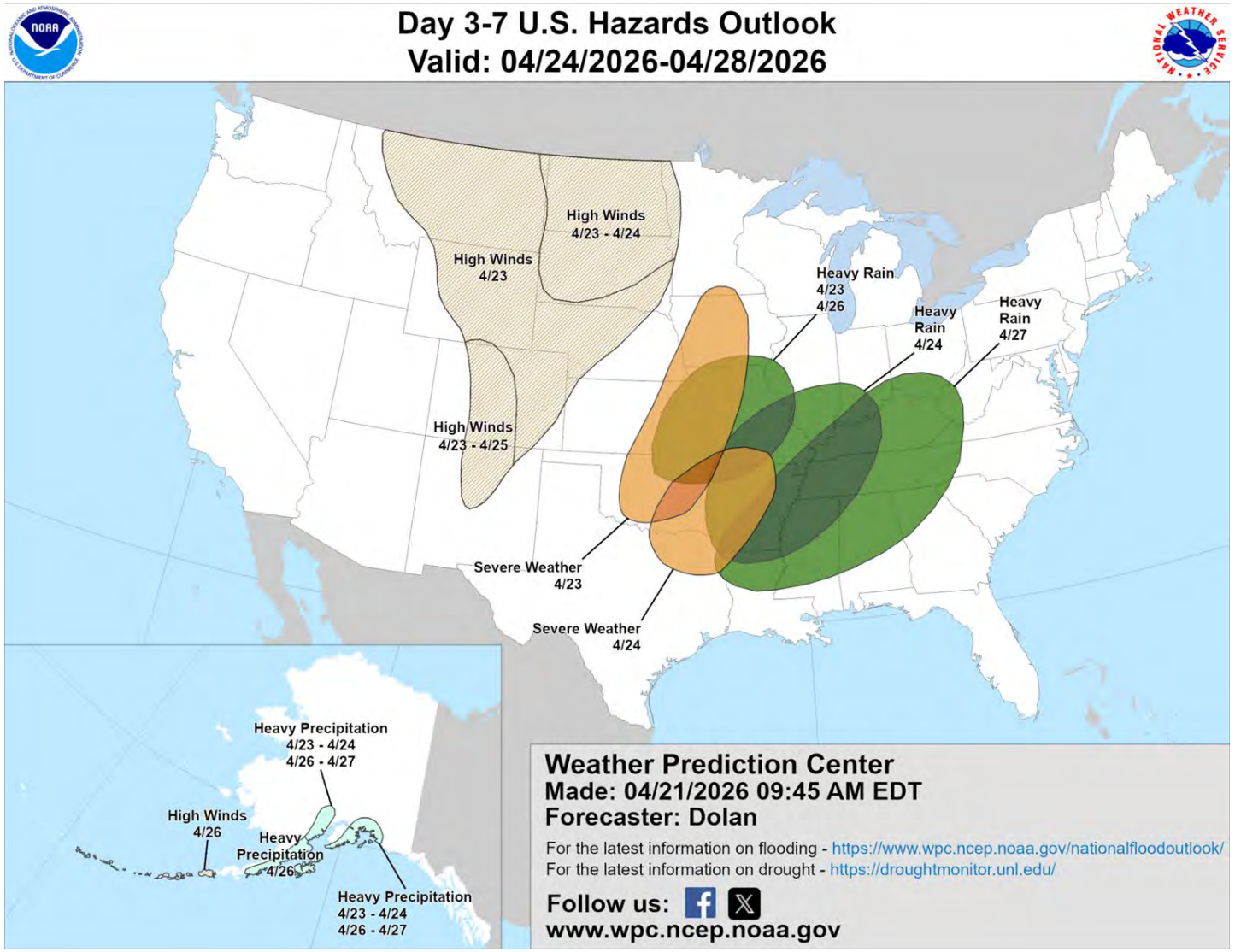
Agency – National Weather Service
Presenter – Christine Kruse

Day 1 to 7 Outlook



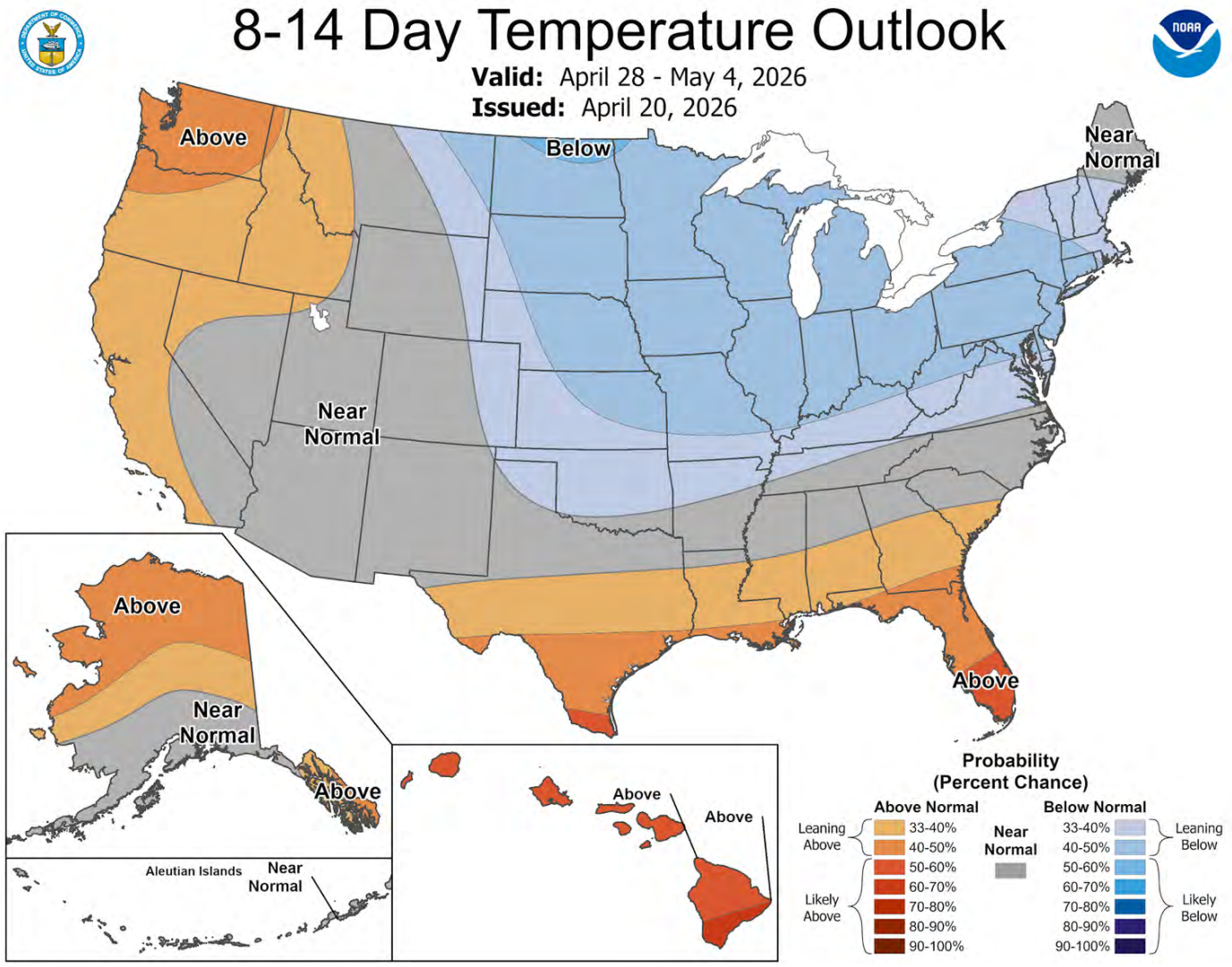
Agency – National Weather Service
Presenter – Christine Kruse

Day 3 to 7 Hazards



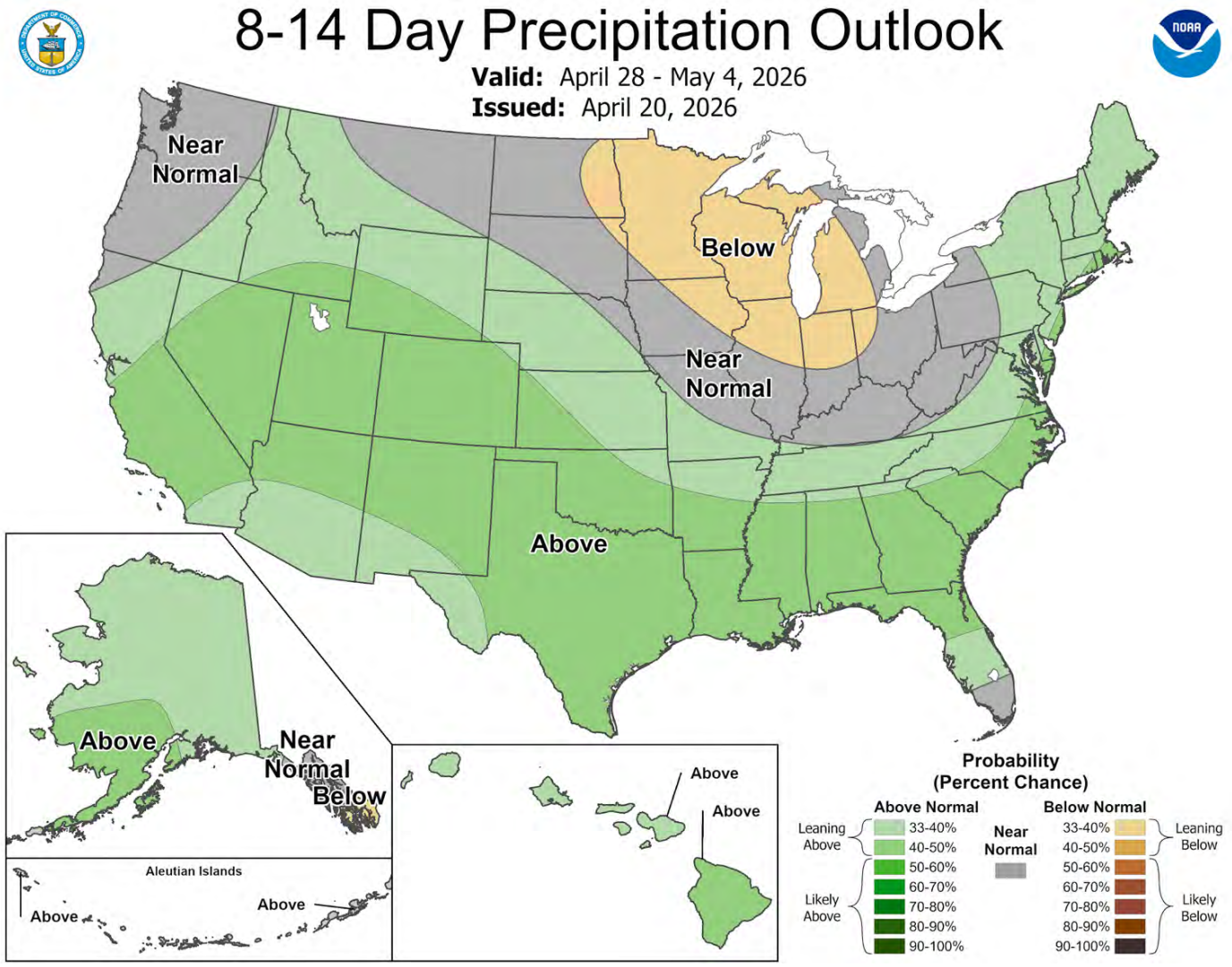
Agency – National Weather Service
Presenter – Christine Kruse

8 to 14 Day Outlooks - Temperature



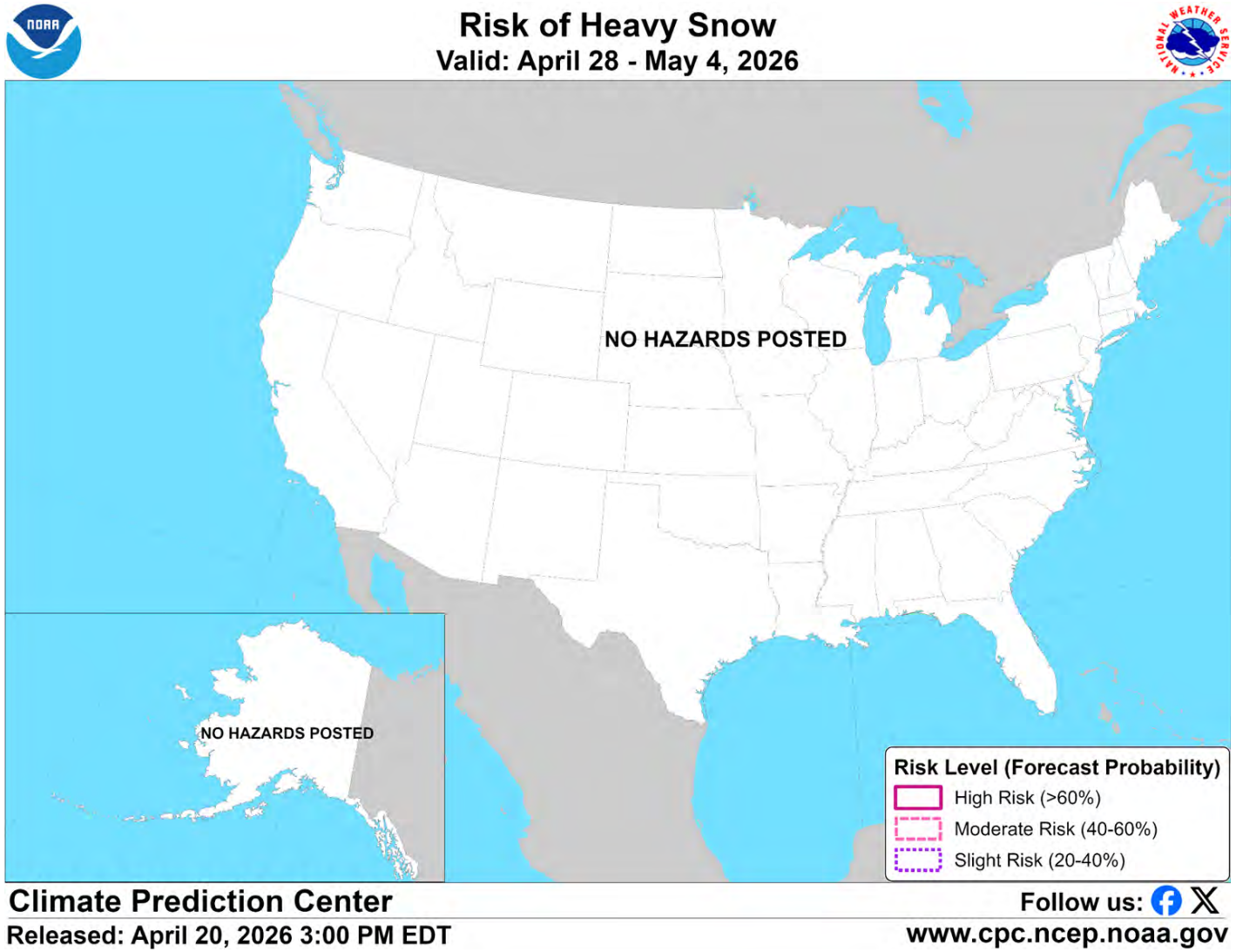
Agency – National Weather Service
Presenter – Christine Kruse

8 to 14 Day Outlooks - Precipitation



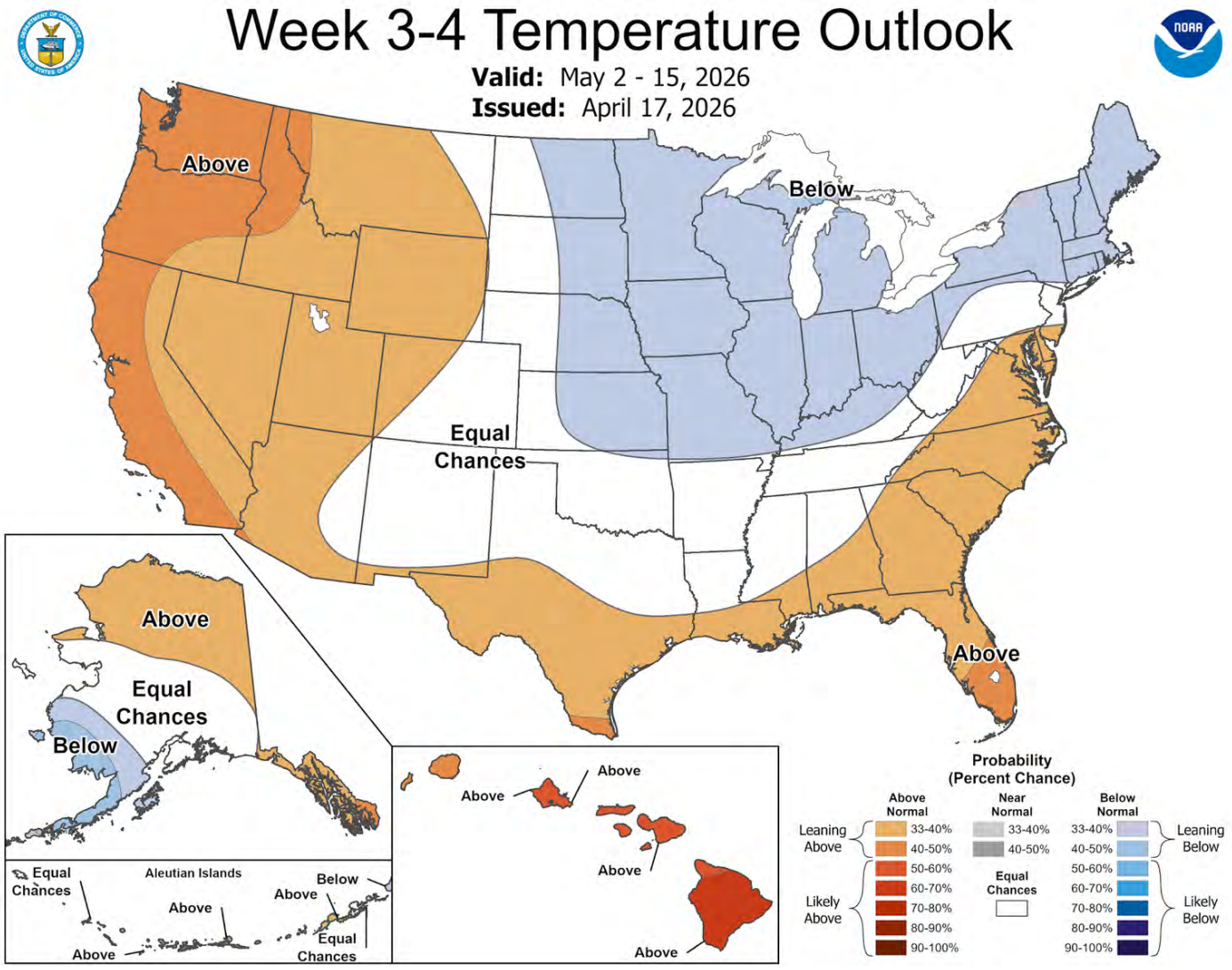
Agency – National Weather Service
Presenter – Christine Kruse

U.S Week-2 Hazards Outlook



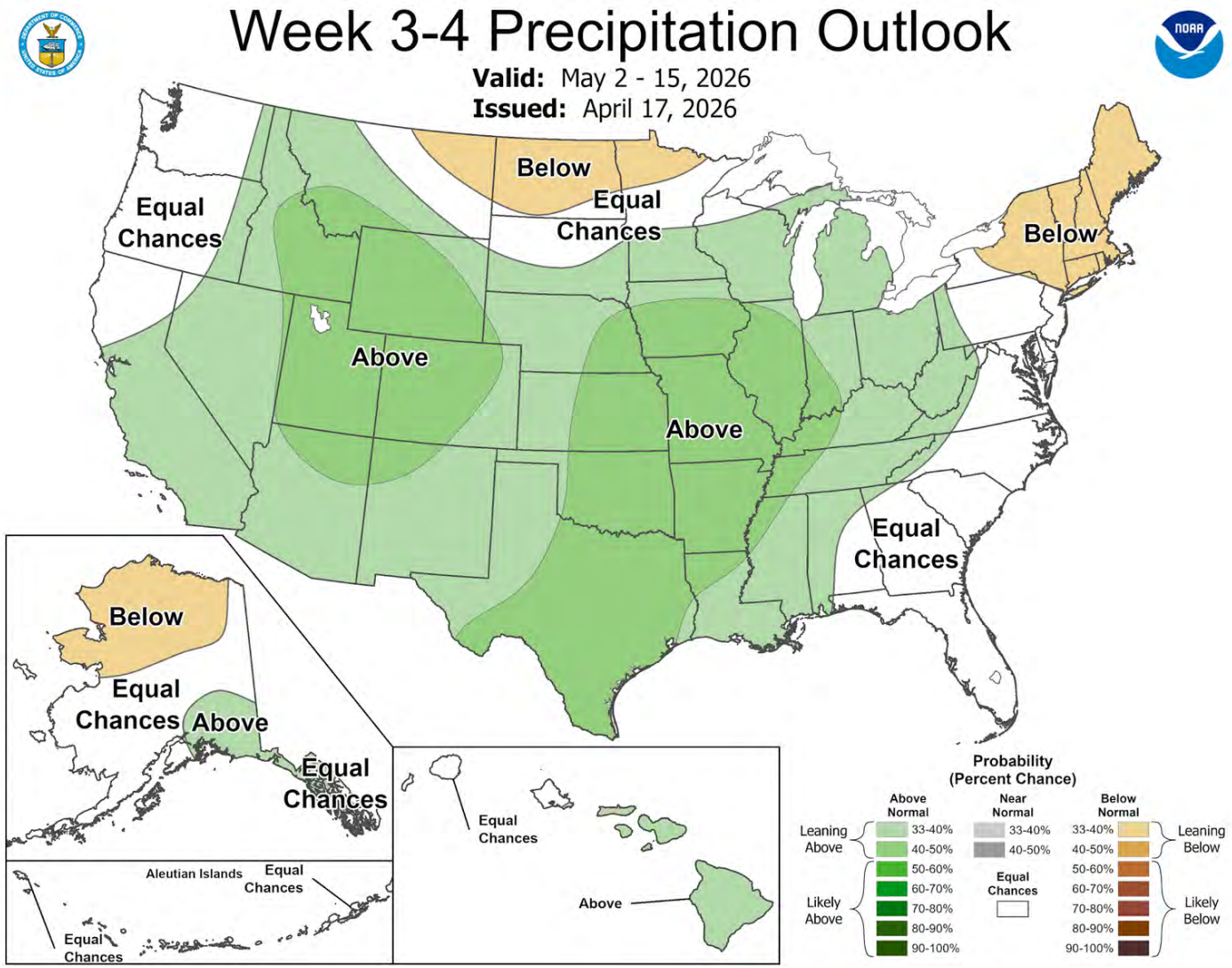
Agency – National Weather Service
Presenter – Christine Kruse

3 – 4 Week Outlook



Agency – National Weather Service
Presenter – Christine Kruse

3 – 4 Week Outlook

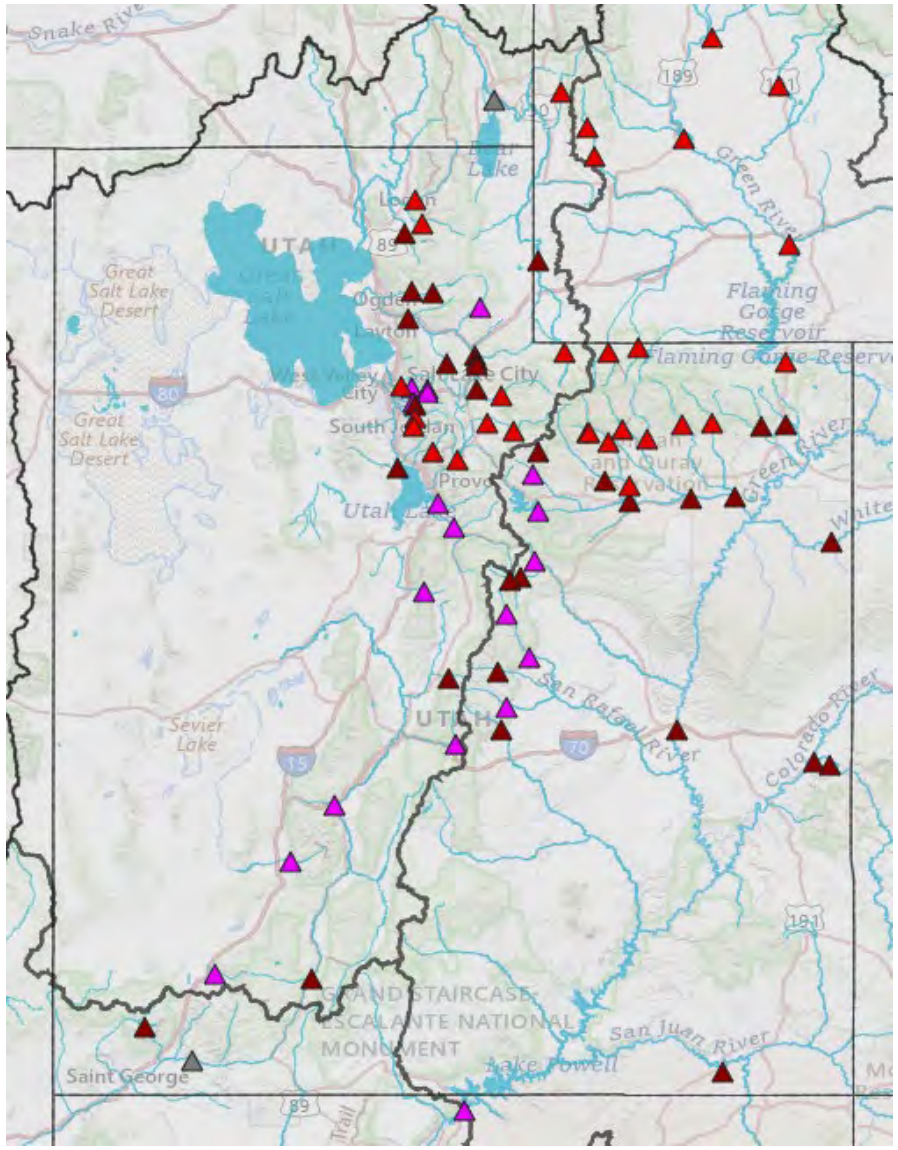


Agency – National Weather Service
Presenter – Christine Kruse

Colorado Basin River Forecast Center

Presenter – Jorge Gonzalez

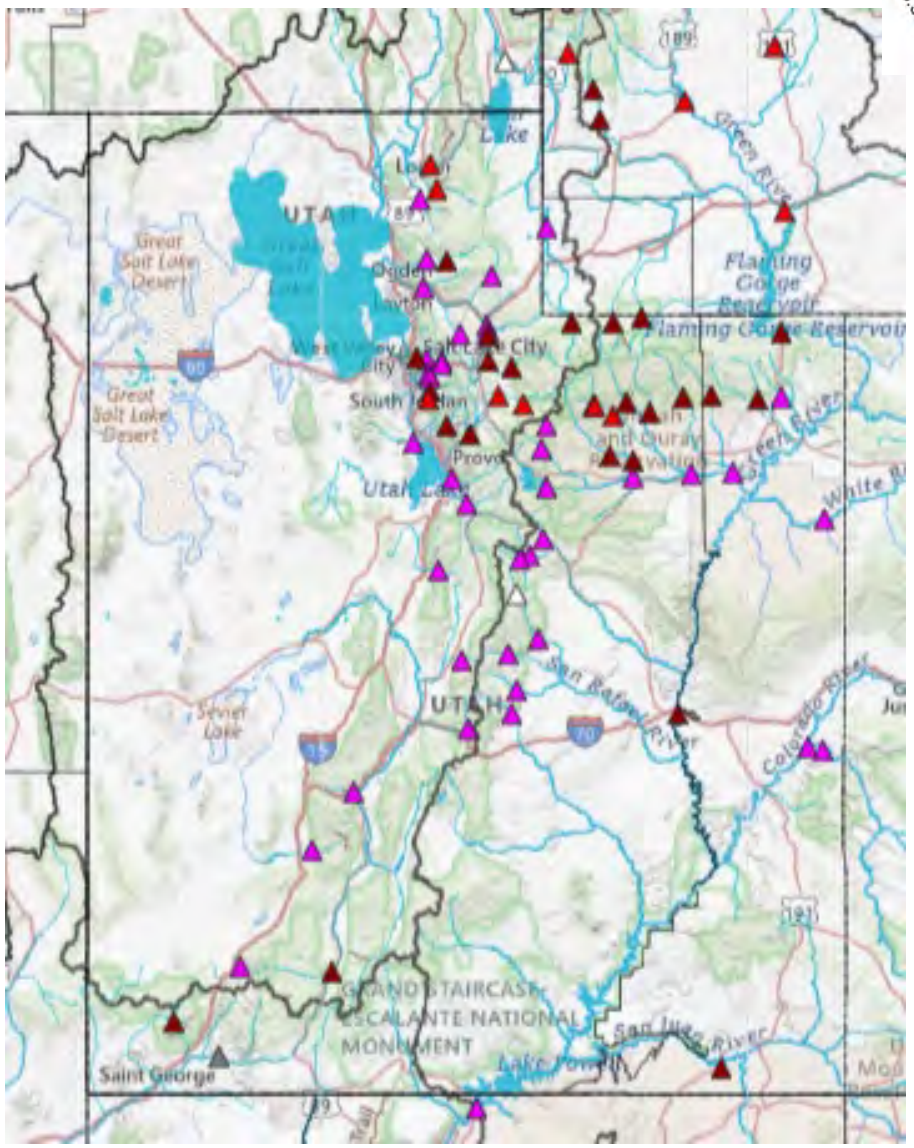
4/7/2026

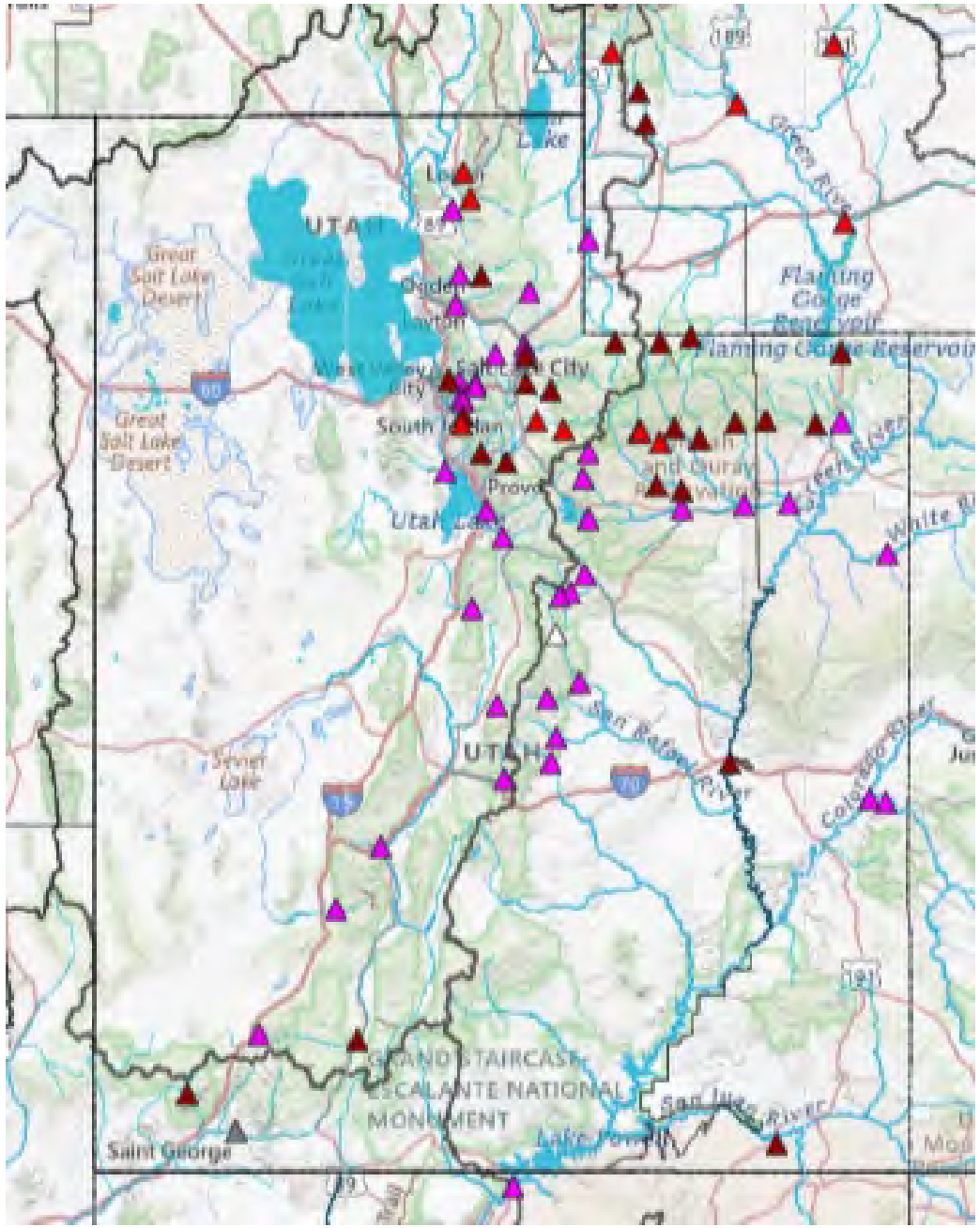


Percent Average

< 30%	18 vs 31 (+13)
30-50%	22 vs 28 (+6)
50-70%	30 vs 11 (-19)
70-90%	
90-100%	
100-110%	
110-130%	
130-150%	
150-200%	
200-300%	
300-500	
>500%	
Regulated	
No Forecast	

4/20/2026





Hydrologic conditions have not improved since 4/7 despite some periods of active weather.

Forecasts range from **11%** (Springville; 700 East, Provo) to **64%** (Smiths Fork, Bear) of normal.

Ten Highest Forecast Points

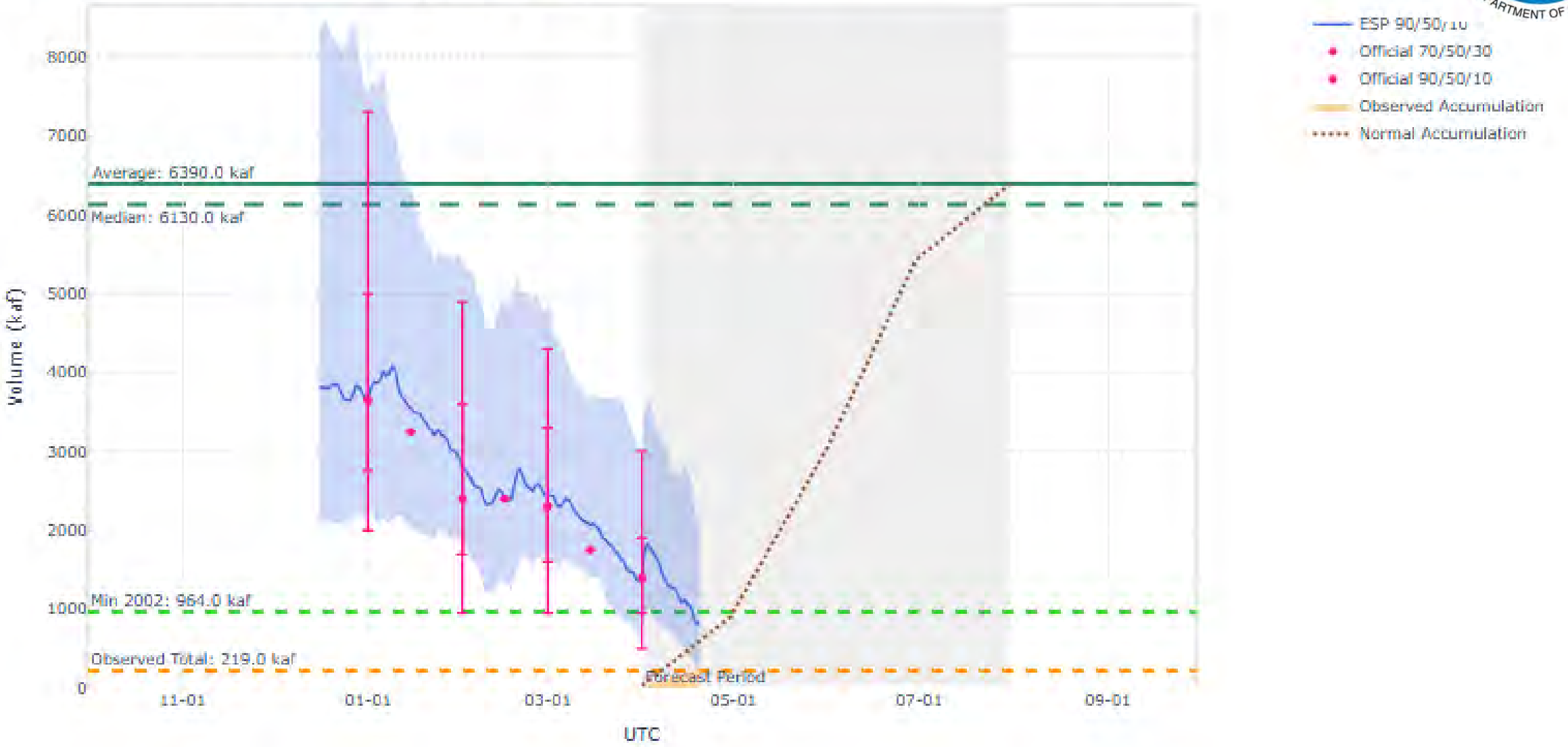
Slot	Area	Sub Area	Forecast Group	RFC	HSA	St	NWS ID	River	Location	ESP Date	Forecast Period	MP 50	Avg	Pct Avg	Pct Diff Day	Pct Diff Week	Pct Diff Month
35	Great	Six Creeks	Six Creeks-Jordan	CBRFC	SLC	UT	LCTU1	Little Cottonwood Ck	Salt Lake City; Nr	2026-04-19	Apr-Jul	19.9	34.0	58%	-1%	-2%	-15%
5	Great	Bear	Bear	CBRFC	SLC	UT	LGNU1	Logan	Logan; Nr; State Dam; Abv	2026-04-19	Apr-Jul	58.0	106	55%	-3%	-8%	-21%
6	Great	Bear	Bear	CBRFC	SLC	UT	HRMU1	Blacksmith Fork	Hyrum; Nr; Upnl Dam; Abv	2026-04-19	Apr-Jul	20.0	37.0	54%	-3%	-4%	-22%
19	Great	Utah Lake	Provo-Utah Lake	CBRFC	SLC	UT	PVHU1	Provo	Hailstone; Nr	2026-04-19	Apr-Jul	56.0	106	53%	0%	-3%	-15%
31	Green	Duchesne	Duchesne-Price	CBRFC	SLC	UT	ROKU1	Rock Ck	Mountain Home; Nr	2026-04-19	Apr-Jul	45.0	87.0	52%	-3%	-10%	-18%
29	Green	Duchesne	Duchesne-Price	CBRFC	SLC	UT	USTU1	Rock Ck	Upper Stillwater Reservoir	2026-04-19	Apr-Jul	38.0	72.0	52%	-3%	-11%	-19%
18	Great	Utah Lake	Provo-Utah Lake	CBRFC	SLC	UT	WOOU1	Provo	Woodland; Nr	2026-04-19	Apr-Jul	50.0	96.0	52%	-1%	-5%	-19%
8	Great	Weber	Weber	CBRFC	SLC	UT	OAWU1	Weber	Oakley; Nr	2026-04-19	Apr-Jul	55.0	111	50%	-3%	-5%	-14%
1	Great	Bear	Bear	CBRFC	SLC	UT	BERU1	Bear	Utah	2026-04-19	Apr-Jul	54.0	109	50%	0%	-2%	-17%
34	Green	Duchesne	Duchesne-Price	CBRFC	SLC	UT	DADU1	Duchesne	Duchesne; Nr; Knight Div; Abv	2026-04-19	Apr-Jul	90.0	188	48%	-2%	-10%	-14%

Ten Lowest Forecast Points

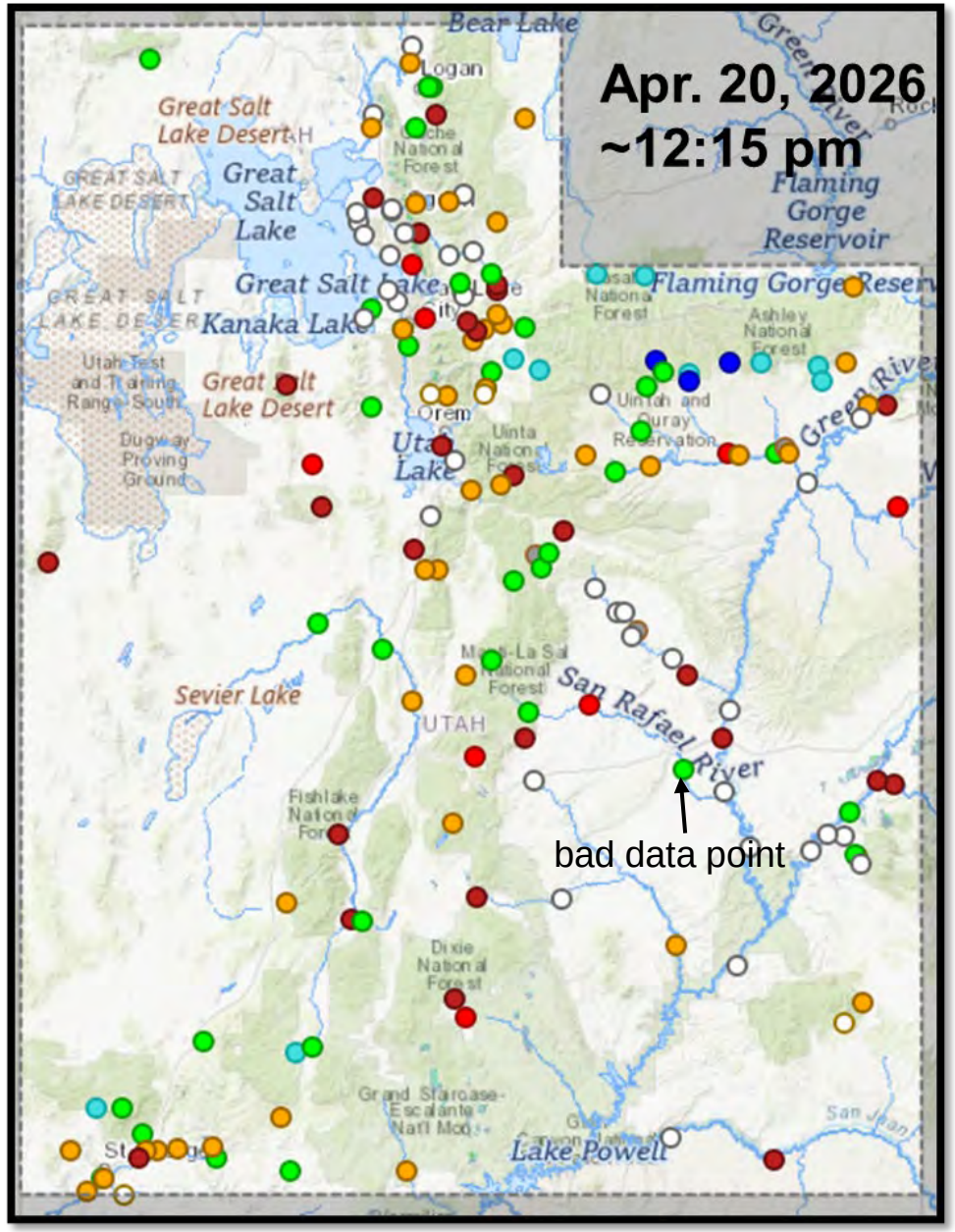
Slot	Area	Sub Area	Forecast Group	RFC	HSA	St	NWS ID	River	Location	ESP Date	Forecast Period	MP 50	Avg	Pct Avg	Pct Diff Day	Pct Diff Week	Pct Diff Month
32	Great	Six Creeks	Six Creeks-Jordan	CBRFC	SLC	UT	PRLU1	Parleys Ck	Salt Lake City; Nr	2026-04-19	Apr-Jul	2.10	11.5	18%	-1%	-6%	-29%
13	Great	Weber	Weber	CBRFC	SLC	UT	CRAU1	Lost Ck	Lost Ck Reservoir; Croyden; Nr	2026-04-19	Apr-Jul	2.30	12.8	18%	-5%	-12%	-44%
36	Green	Duchesne	Duchesne-Price	CBRFC	SLC	UT	STIU1	Strawberry	Strawberry Reservoir; Soldier Springs	2026-04-19	Apr-Jul	10.2	60.0	17%	-7%	-14%	-36%
25	Great	Utah Lake	Provo-Utah Lake	CBRFC	SLC	UT	SZZU1	Salt Ck	Nephi Powerplant Div; Blo	2026-04-19	Apr-Jul	1.27	7.80	16%	-7%	-2%	-30%
41	Green	Lower	Duchesne-Price	CBRFC	SLC	UT	SFSU1	Price	Scofield Reservoir; Scofield; Nr	2026-04-19	Apr-Jul	5.00	34.0	15%	-14%	-27%	-69%
6	Sevier		Sevier	CBRFC	SLC	UT	SAYU1	Salina Ck	Emery; Nr	2026-04-19	Apr-Jul	0.840	6.20	14%	0%	-1%	-22%
35	Green	Duchesne	Duchesne-Price	CBRFC	SLC	UT	CRUU1	Currant Ck	Currant Ck Reservoir	2026-04-19	Apr-Jul	2.50	17.7	14%	-5%	-9%	-44%
40	Green	Lower	Duchesne-Price	CBRFC	SLC	UT	FCNU1	Fish Ck	Scofield; Nr; Reservoir; Abv	2026-04-19	Apr-Jul	3.30	26.0	13%	-16%	-27%	-74%
30	Great	Six Creeks	Six Creeks-Jordan	CBRFC	SLC	UT	DELU1	Dell Fk	Little Dell Reservoir	2026-04-19	Apr-Jul	0.580	4.40	13%	-1%	-9%	-47%
22	Great	Utah Lake	Provo-Utah Lake	CBRFC	SLC	UT	HBCU1	Hobble Ck	Springville; 700 East	2026-04-19	Apr-Jul	1.84	16.5	11%	-3%	-16%	-37%

2026 Water Supply Forecast - Colorado - Lake Powell, Glen Cyn Dam, At (GLDA3)

ESP is Unregulated and No Precipitation Forecast Included
Official 50% Fcst (2026-04-01): 1400 kaf (22% Avg, 23% Med), (3% of Yrs Below Fcst, 61 Highest Flow / 62 Tot Yrs)
ESP 50% Fcst (2026-04-20): 807 kaf (13% Avg, 13% Med), (0% of Yrs Below Fcst, 63 Highest Flow / 62 Tot Yrs)
Observed Volume: 219 kaf (3% Average, 4% Median)



Current Streamflows



National Water Dashboard

Percentage of Gages

Day-of-Year Status	Apr. 7	Apr. 20
All-time high for this day-of-year	5.4%	0.0%
Much above normal for this day-of-year	2.4%	1.8%
Above normal for this day-of-year	5.4%	6.0%
Normal for this day-of-year	23.2%	22.0%
Below normal for this day-of-year	20.8%	24.4%
Much below normal for this day-of-year	13.1%	14.9%
All-time low for this day-of-year	3.6%	4.8%
Not ranked - insufficient record	23.2%	23.2%
Not ranked - no measurement	0.6%	1.2%
Not ranked - stream not flowing	2.4%	1.8%

- Above flood stage
- All-time high for this day — 100th percentile (maximum)
- Much above normal — >90th percentile
- Above normal — 76th – 90th percentile
- Normal — 25th – 75th percentile
- Below normal — 10th – 24th percentile
- Much below normal — <10th percentile
- All-time low for this day — 0th percentile (minimum)
- Not flowing
- Not ranked
- Measurement flag
- Recent measurement unavailable

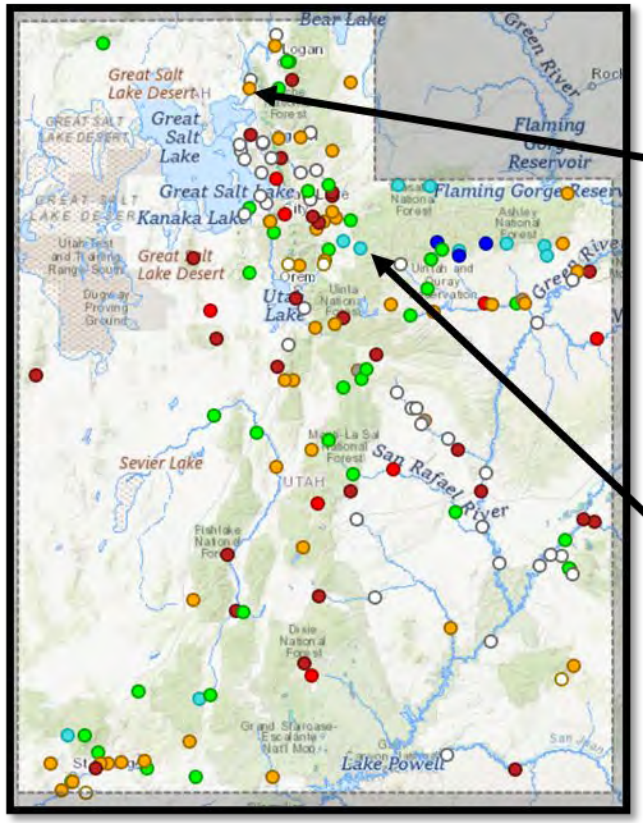
Provisional data, subject to revision

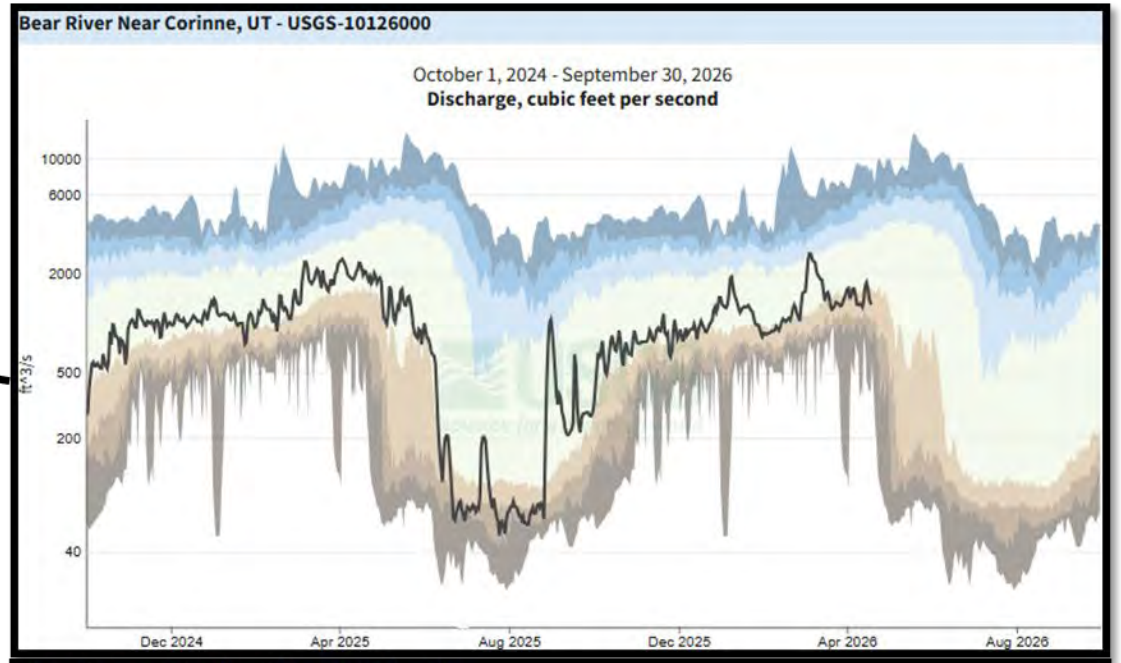
***Sites must have at least 20 years of streamflow record to be ranked.**

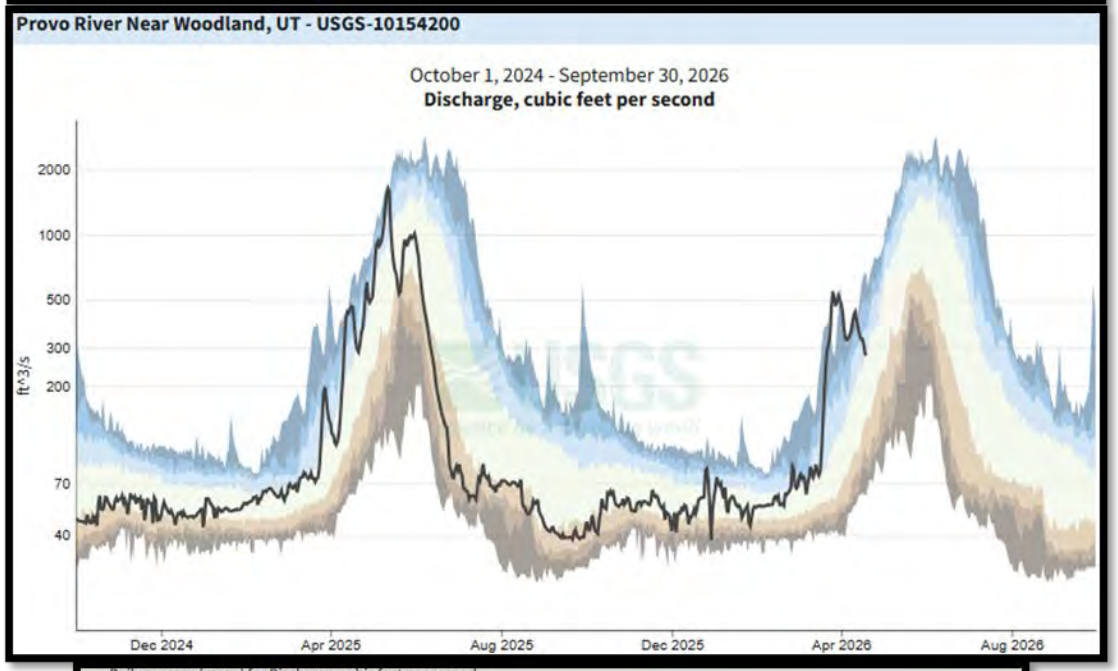
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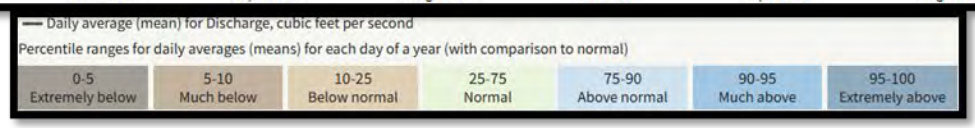
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Streamflows at Selected Gages





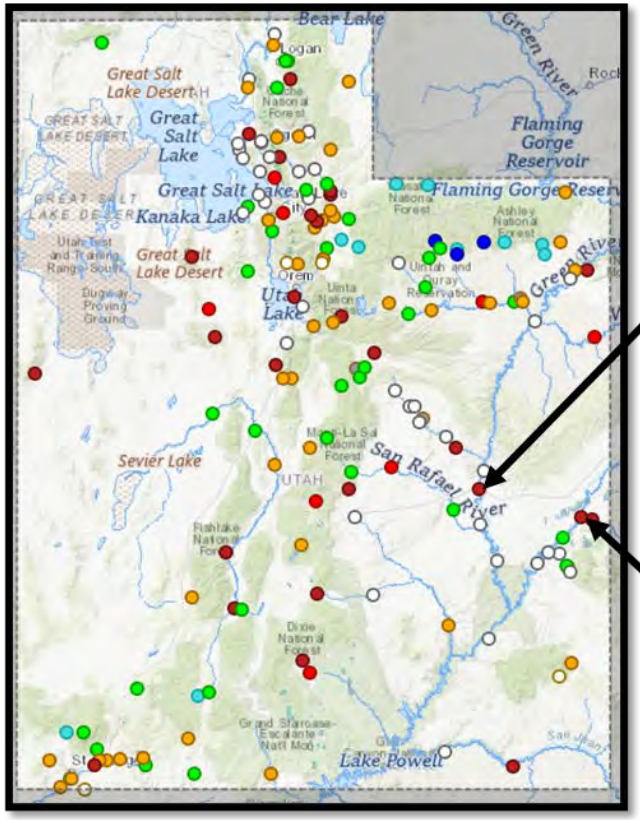


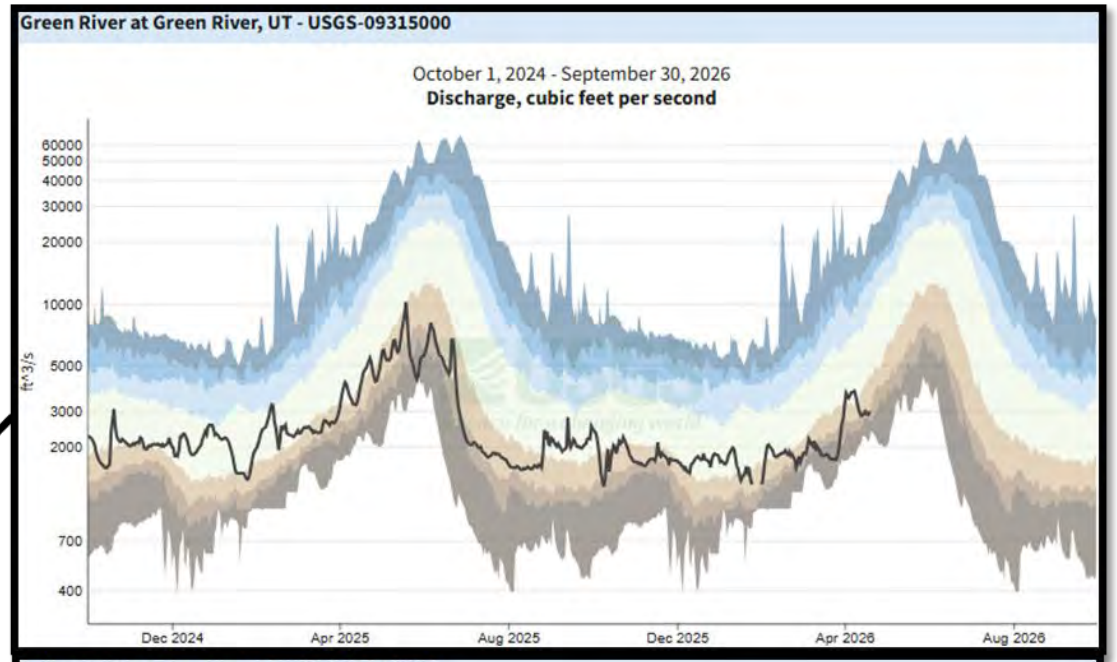


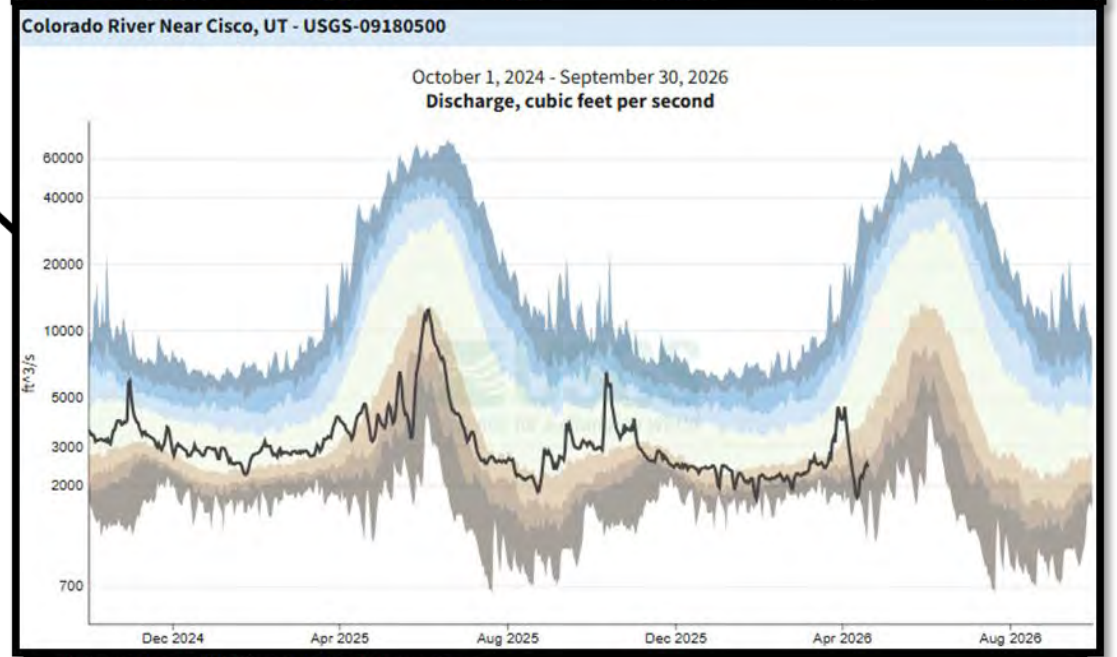
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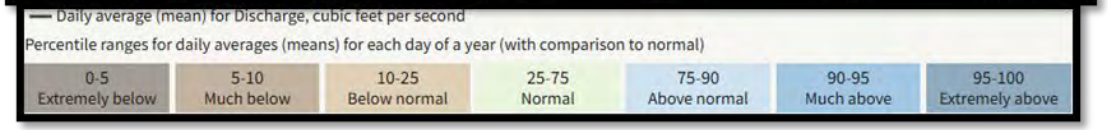
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Streamflows at Selected Gages





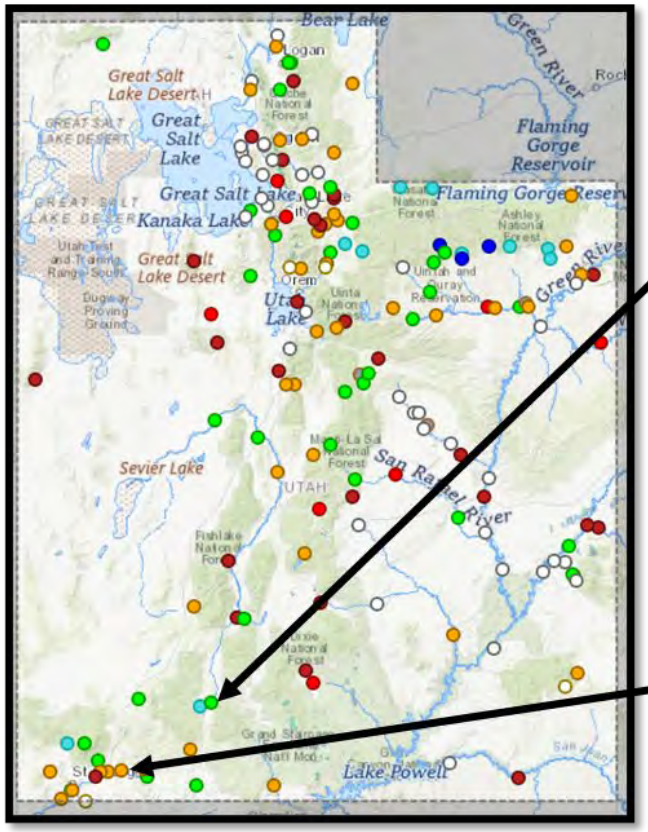


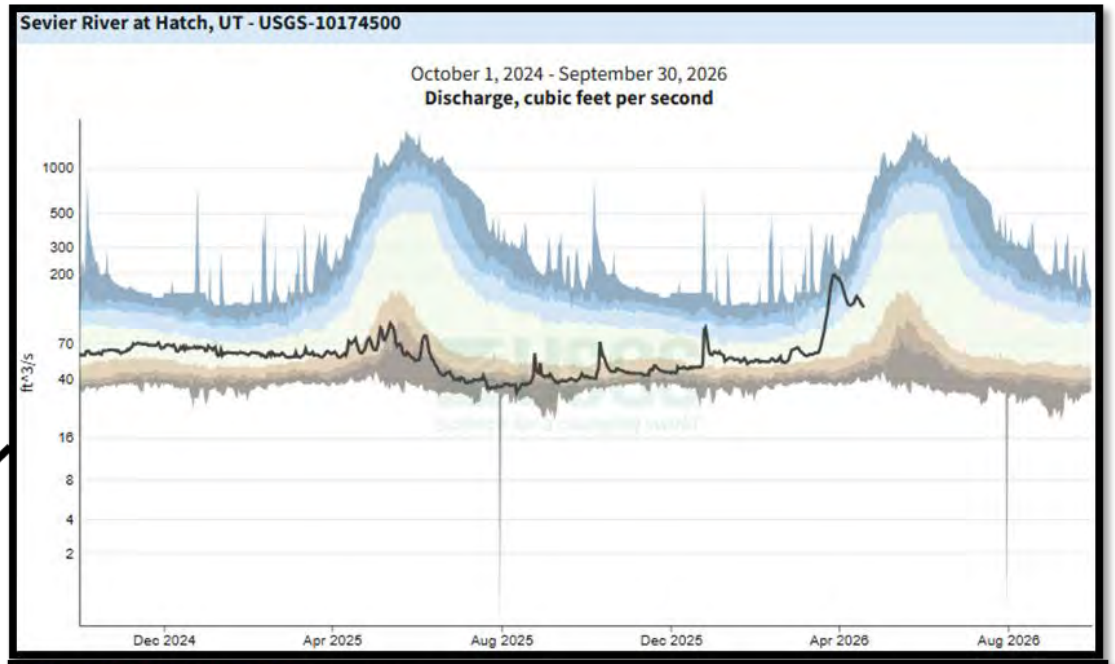


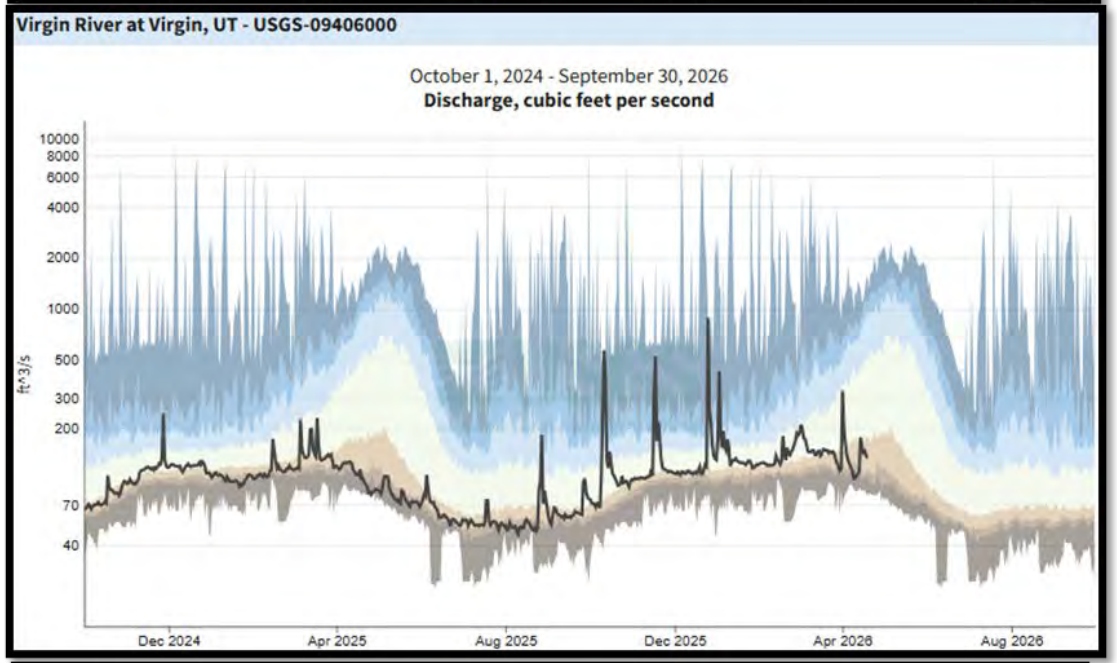
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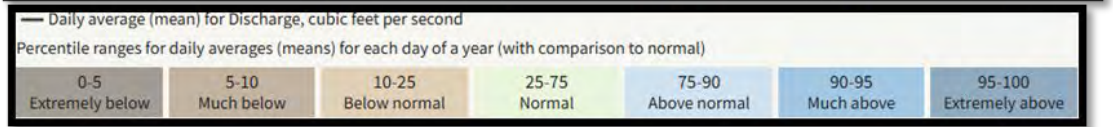
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Streamflows at Selected Gages





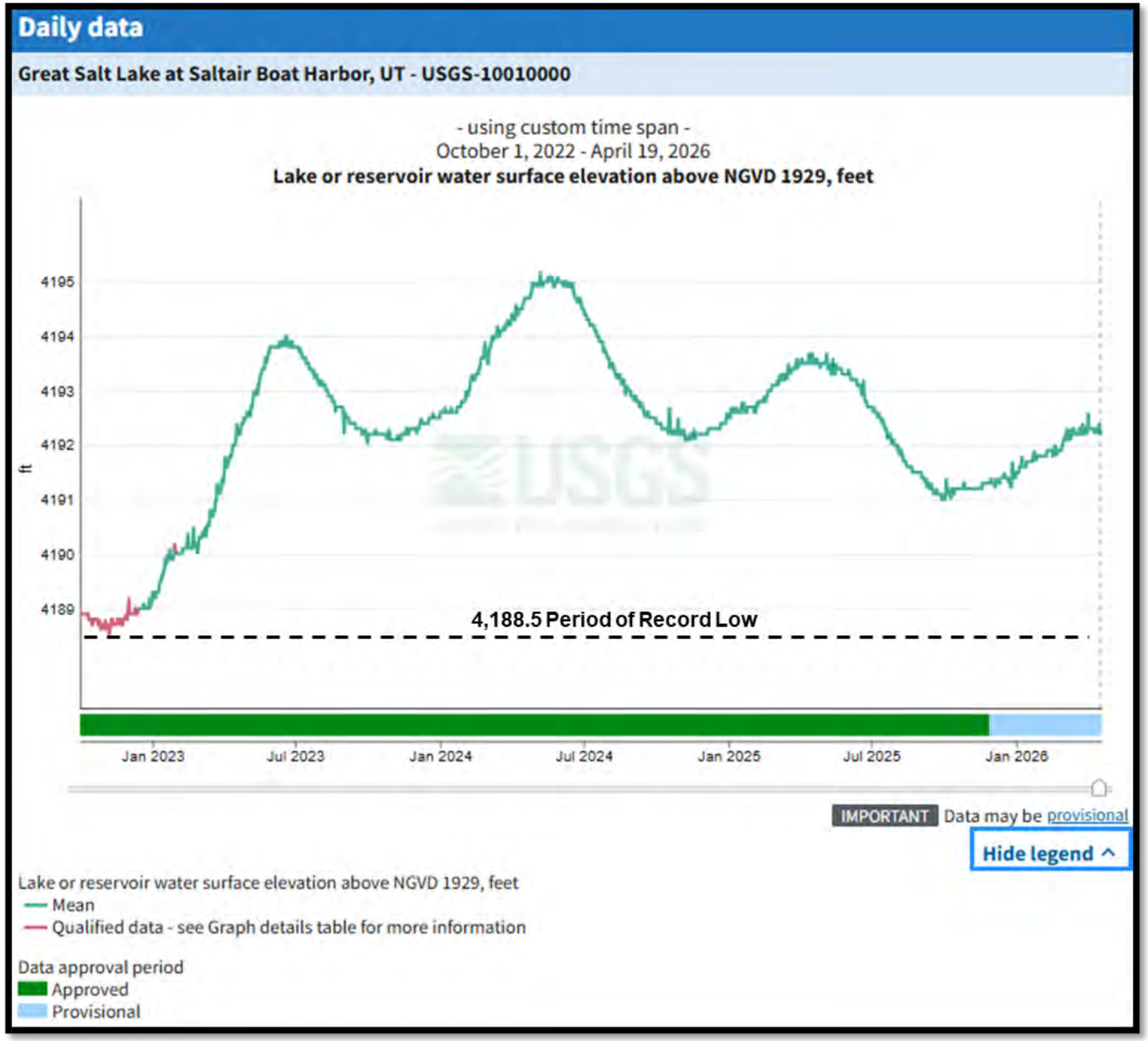




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Great Salt Lake Water Surface Elevations



Daily Values 04/19/2026

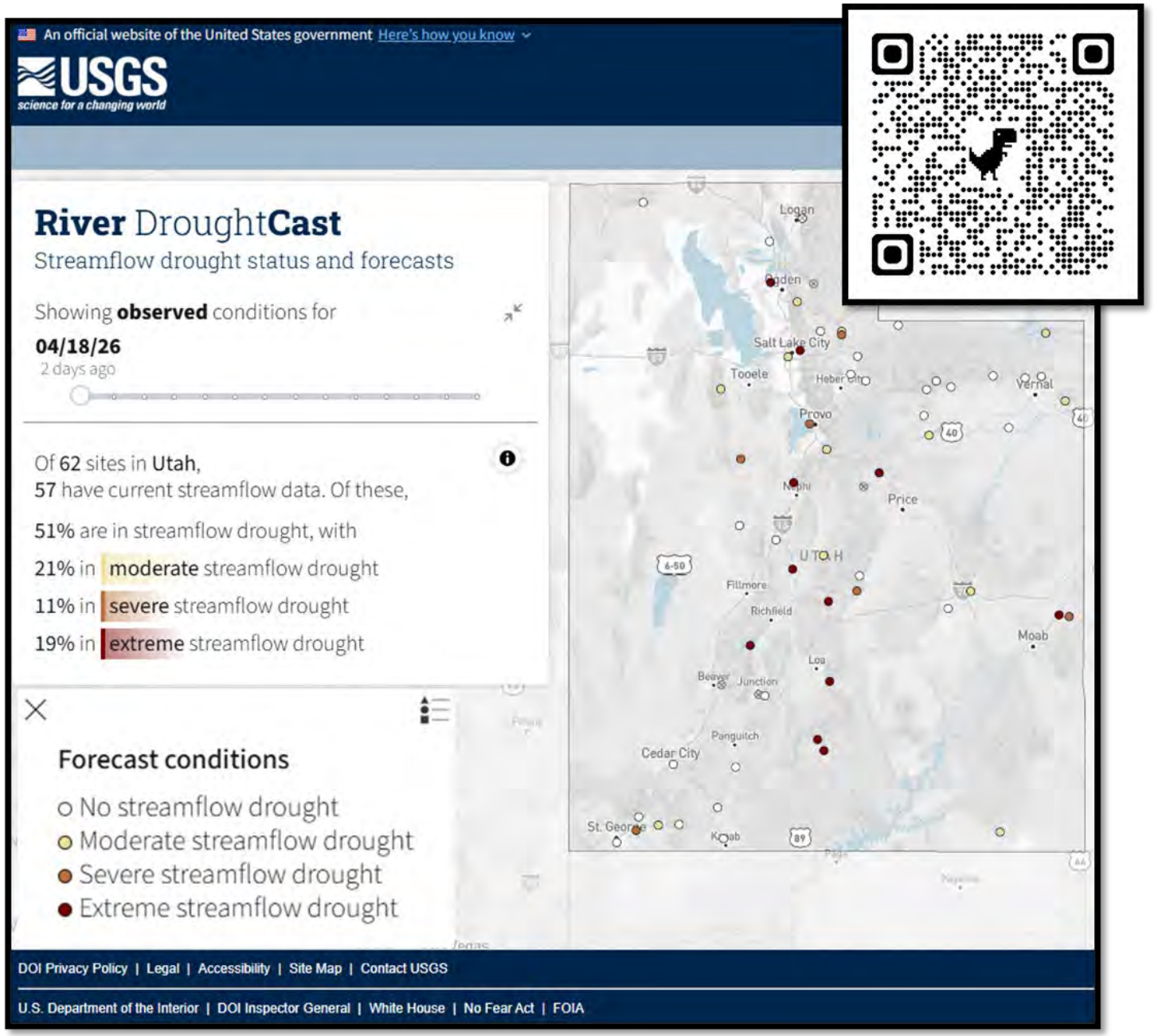
South Arm (Saltair gage): 4192.2’
May have peaked in early April 4,192.6’

North Arm (Saline gage): 4,191.3’
May have peaked in early April at 4191.6’

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New website – USGS River DroughtCast: Streamflow drought status and forecasts

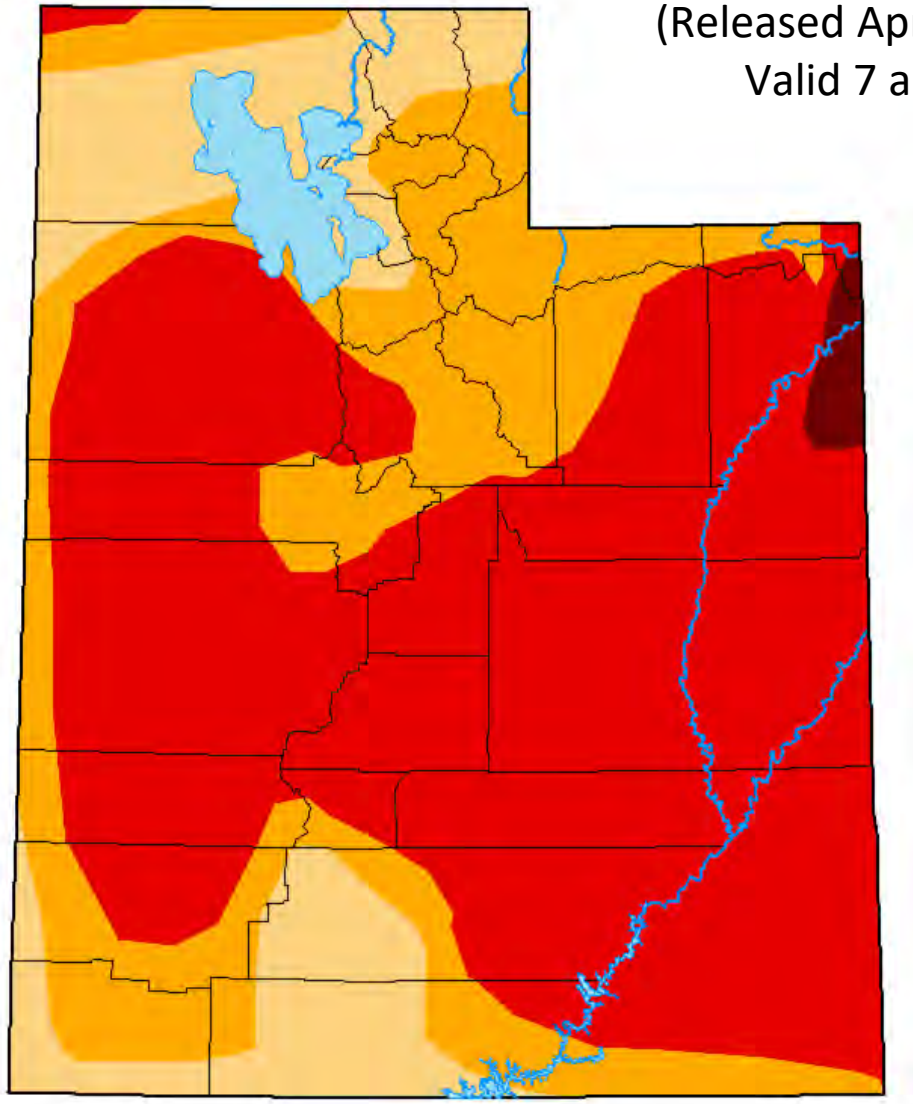


- **Shows gages with nearly complete records for the 40-year period 1981-2020**
- **Machine learning model forecasts streamflow drought**
- **Website includes links to detailed descriptions of methodology**

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U.S. Drought Monitor Map - Utah



April 14, 2026

(Released April 16, 2026)

Valid 7 a.m. EST

Intensity:

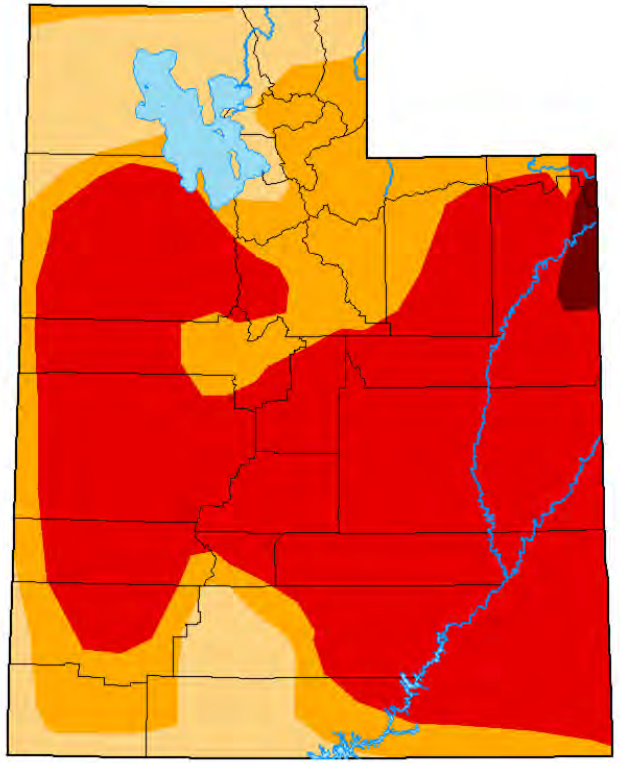
- None
- D0 Abnormally Dry
- D1 Moderate Drought
- D2 Severe Drought
- D3 Extreme Drought
- D4 Exceptional Drought

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

Author:

Rocky Bilotta
NCEI/NOAA

droughtmonitor.unl.edu



To report on conditions between meetings:

Submit a report on CMOR drought website
Email Lhaskell@utah.gov
email drought@utah.gov