

California Water Supply Outlook Report

May 2022



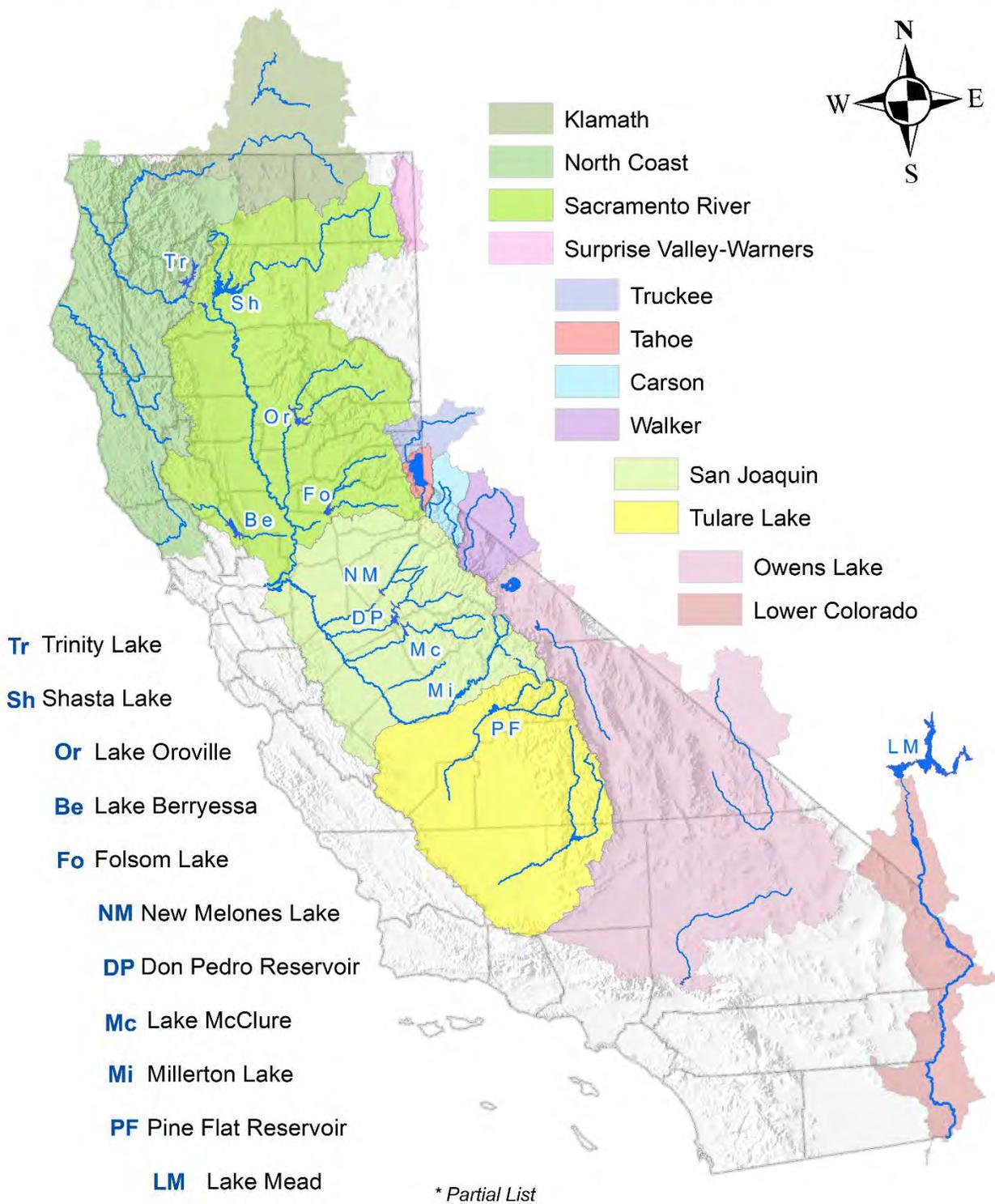
The U.S. Department of Agriculture (USDA) prohibits discrimination against its customers. If you believe you experienced discrimination when obtaining services from USDA, participating in a USDA program, or participating in a program that receives financial assistance from USDA, you may file a complaint with USDA. Information about how to file a discrimination complaint is available from the Office of the Assistant Secretary for Civil Rights. USDA prohibits discrimination in all its programs and activities on the basis of race, color, national origin, age, disability, and where applicable, sex (including gender identity and expression), marital status, familial status, parental status, religion, sexual orientation, political beliefs, genetic information, reprisal, or because all or part of an individual's income is derived from any public assistance program. (Not all prohibited bases apply to all programs.) To file a complaint of discrimination, complete, sign, and mail a program discrimination complaint form, available at any USDA office location or online at www.ascr.usda.gov, or write to: USDA Office of the Assistant Secretary for Civil Rights 1400 Independence Avenue, SW, Washington, DC 20250-9410 Or call toll free at (866) 632-9992 (voice) to obtain additional information, the appropriate office or to request documents. Individuals who are deaf, hard of lender. Persons with disabilities who require alternative means for communication of program information (e.g., Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at (202) 720-2600 (voice and TDD).

Contents

California Forecast Basins, Major Rivers, and Large Reservoirs (Map).....	3
State of California General Outlook	4
Streamflow Forecasts:	
Sacramento River Basin	5
San Joaquin River Basin	6
Tulare Lake Basin	7
North Coastal Area Basin	8
Klamath Basin	9
Lake Tahoe Basin	10
Truckee River Basin	11
Carson River Basin	12
Walker River Basin	13
Surprise Valley-Warner Mtns	14
Lower Colorado River Basin /Owens Lake.....	15
How Forecasts are Made	16

Cover: Sierra Snow Pack as seen from Wilton, CA, 5/1/22. Photo by NRCS

California Forecast Basins, Major Rivers, and Large Reservoirs*



STATE OF CALIFORNIA GENERAL OUTLOOK

May, 2022

NEW 1991-2020 MEDIANS

On October 1, 2021 the NRCS updated its 30-year normals period, shifting it from 1981-2010 to 1991-2020. The normals available from the National Water and Climate Center (NWCC) include the median and average for Snow Water Equivalent (SWE), snow depth (snow courses only), precipitation, volumetric streamflow, and reservoir storage. Values are calculated from data collected by NRCS-managed stations and external agencies such as the U.S. Geological Survey (USGS), National Weather Service (NWS), state agencies, and private organizations. Normals are calculated for various durations including daily, month-to-date, semi-monthly, monthly, seasonal, and annual based on the data type.

The 1991-2020 normals update may have shifted the reported median values compared to those in previous reports for one or both of the following reasons: 1) the underlying data used to compute the statistics are not the same between the two 30-year periods; and 2) Calculation methods for 1991-2020 have also been updated. Therefore, caution is recommended when making inferences from comparisons between the 1991-2020, 1981-2010, and 1971-2000 normals. More information is available online at <https://www.nrcs.usda.gov/wps/portal/wcc/home/snowClimateMonitoring/30YearNormals/>.

SNOWPACK

Snow gages in the northern-, central-, and southern mountains have seen a steady decrease in snow pack percent of normal. As of May 20, 2022, the snow water equivalent percent of normal for the three Sierra regions were 20-, 14-, and 6 percent, respectively. Since last month's report, the statewide average snowpack has continued to drop, from 35 percent on April 22 to 14 percent on May 20.

More information is available online at <http://cdec.water.ca.gov/snow/current/snow/index2.html>.

PRECIPITATION

After very dry Spring, the Northern Sierra-, San Joaquin-, and Tulare Basin Index stations are currently at 79-, 64-, and 60 percent of their monthly averages as of May 20, 2022, with a downward trend for the rest of the month.

More information is available online at http://cdec.water.ca.gov/snow_rain.html

RESERVOIRS

Most reservoirs as of May 20, 2022 had storages below normal amounts. Several major reservoir storages were far below normal for this time of year, such as Shasta (46%), Oroville (69%), and San Luis (62%).

More information is available online at http://cdec.water.ca.gov/snow/reservoir_ss.html.

STREAMFLOW

NWS forecasts are both above and below the 1991-2020 average between April and July. However, at this point, there is no specific basin that is extremely low or high on the runoff forecast. Summaries for each basin are provided below.

**Sacramento River
Streamflow Forecasts - May 1, 2022**

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Sacramento River	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Inflow to Shasta Lk (NWS)	APR-JUL	780	785	800	46%	830	885	1738.5
MF American R nr Auburn (DWR)								
MF American R nr Auburn (NWS)	APR-JUL	235	245	255	55%	285	310	461.7
Inflow to Shasta Lk (DWR)	OCT-SEP	2880		3000	53%		3440	5643
	APR-JUL	760		840	48%		1210	1767
Silver Ck bl Camino Div. Dam (DWR)	APR-JUL			85	54%			157
McCloud R ab Shasta (DWR)	APR-JUL			220	56%			393
Sacramento R nr Red Bluff (NWS)	APR-JUL	1130	1140	1150	38%	1190	1250	3026
MF Feather R nr Clio (DWR)								
NF Feather R at Pulga (DWR)	APR-JUL			440	52%			842
Inflow Jackson Mdws & Bowman Res (DWR)	APR-JUL			63	61%			103
Feather R at Lk Almanor (DWR)	APR-JUL			125	52%			241
Inflow to Folsom Res (DWR)	OCT-SEP	1710		1810	67%		2130	2689
	APR-JUL	570		670	54%		970	1247
Pit R at Shasta Lk (NWS)	APR-JUL	455	460	465	43%	475	490	1080.2
Silver Ck bl Camino Div. Dam (NWS)	APR-JUL	88	91	96	56%	105	113	171.6
Pit R at Shasta Lk (DWR)	APR-JUL			620	63%			992
Inflow to Oroville Res (NWS)	APR-JUL	800	810	820	53%	870	910	1533.3
Inflow to Folsom Res (NWS)	APR-JUL	690	725	750	63%	810	870	1195.3
Yuba R at Smartville (DWR)	OCT-SEP	1450		1560	69%		1810	2273
	APR-JUL	490		590	59%		830	993
N Yuba R bl Goodyears Bar (DWR)	APR-JUL			165	61%			271
Yuba R at Smartville (NWS)	APR-JUL	550	560	565	59%	610	645	949.9
Inflow to Union Valley Res (NWS)	APR-JUL	53	55	58	59%	64	69	97.5
N Yuba R bl Goodyears Bar (NWS)	APR-JUL	150	153	157	58%	166	176	272.3
Sacramento R at Shasta (NWS)	APR-JUL	91	93	86	29%	102	122	296.6
Sacramento R nr Red Bluff (DWR)	OCT-SEP	4130		4290	51%		5020	8351
	APR-JUL	1070		1200	49%		1800	2474
S Yuba R nr Langs Crossing (DWR)	APR-JUL			140	59%			237
Cosumnes R at Michigan Bar (NWS)	APR-JUL	65	65	67	55%	71	79	121.5
McCloud R ab Shasta (NWS)	APR-JUL	187	187	189	50%	192	200	374.5
NF American R at N FK Dam (DWR)	APR-JUL			140	58%			240
Sacramento R at Shasta (DWR)	APR-JUL			100	32%			309
SF Feather R at Ponderosa Dam (DWR)								
NF Feather R nr Prattville (NWS)	APR-JUL	121	123	129	45%	135	144	283.6
Inflow to Oroville Res (DWR)	OCT-SEP	2800		2920	67%		3340	4341
	APR-JUL	770		870	51%		1260	1710

1) 90% And 10% exceedance probabilities are actually 95% And 5%
2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Sacramento River	68	51%	44%

Sanjoaquin Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

SanJoaquin	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
MF Stanislaus R bl Beardsley (DWR)	APR-JUL			155	52%			297
Tuolumne R nr Hetch Hetchy (NWS)	APR-JUL	315	315	330	55%	345	355	605.2
Big Ck bl Huntington Lk (DWR)	APR-JUL			50	52%			97
Inflow to New Melones Res (NWS)	APR-JUL	290	300	310	46%	335	365	672.1
Inflow to Millerton Lk (NWS)	APR-JUL	600	610	625	50%	645	670	1238.4
NF Mokelumne R nr West Point (DWR)								
Inflow to New Don Pedro Res (NWS)	APR-JUL	535	540	565	47%	590	615	1208.3
Inflow to Millerton Lk (DWR)	OCT-SEP	1000		1080	61%		1250	1775
	APR-JUL	500		570	46%		730	1229
Cherry & Eleanor CKs, Hetch Hetchy (DWR)	APR-JUL			155	49%			317
Inflow to New Don Pedro Res (DWR)	OCT-SEP	990		1080	55%		1280	1954
	APR-JUL	480		560	46%		760	1222
Merced R at Pohono Bridge Yosemite (DWR)	APR-JUL			165	45%			369
Cosumnes R at Michigan Bar (DWR)	OCT-SEP	225		230	59%		280	390
	APR-JUL	55		62	47%		110	133
SF San Joaquin R nr Florence Lk (DWR)	APR-JUL			90	48%			188
Inflow to New Melones Res (DWR)	OCT-SEP	625		690	58%		830	1181
	APR-JUL	270		330	47%		460	699
Inflow to Pardee Res (DWR)	OCT-SEP	420		460	60%		550	764
	APR-JUL	170		210	45%		300	469
Merced R at Pohono Bridge Yosemite (NWS)	APR-JUL	200	200	205	54%	215	230	382.3
Inflow to Lake McClure (NWS)	APR-JUL	265	270	275	45%	285	305	610.6
Inflow to Lake McClure (DWR)								
Inflow to Pardee Res (NWS)	APR-JUL	215	225	230	52%	250	270	443.5
Tuolumne R nr Hetch Hetchy (DWR)	APR-JUL			300	51%			587

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
- 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
SanJoaquin	70	44%	38%

Tulare Lake Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Tulare Lake	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Kaweah R at Terminus Res (DWR)	OCT-SEP	142		154	36%		195	426
	APR-JUL	75		88	32%		125	276
Kaweah R at Terminus Res (NWS)	APR-JUL	90	90	92	33%	95	100	282.1
	APR-JUL	510	515	530	43%	540	560	1222.8
Inflow to Pine Flat Res (NWS)	OCT-SEP	190		210	31%		265	672
	APR-JUL	90		105	25%		150	427
Inflow to Isabella Res (DWR)	OCT-SEP	695		780	47%		940	1671
	APR-JUL	410		490	41%		640	1204
Tule R at Success Res (DWR)	OCT-SEP	34		35	27%		50	132
	APR-JUL	8		9	16%		21	56
Tule R at Success Res (NWS)	APR-JUL	11	11	11	18%	12	12	60.3
	APR-JUL	104	109	113	25%	117	121	455.3
NF Kings R nr Cliff Camp (DWR)	APR-JUL	104	109	113	25%	117	121	455.3
	APR-JUL			100	26%			379

1) 90% And 10% exceedance probabilities are actually 95% And 5%

2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Tulare Lake	26	35%	22%

North Coast Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

North Coast	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Trinity R at Lewiston (DWR)	OCT-SEP	445		480	36%		600	1322
	APR-JUL	120		155	24%		270	648
Inflow to Clair Engle Lk (NWS)	APR-JUL	153	159	168	29%	198	235	584
Scott R nr Fort Jones (NWS)	APR-JUL	36	39	45	27%	53	62	167

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
- 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
North Coast	11	8%	25%

Klamath Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Klamath	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Sprague R nr Chiloquin	MAY-SEP	44	59	71	66%	84	105	108
Upper Klamath Lake Inflow ¹²	MAY-SEP	103	146	168	65%	192	250	260
Gerber Reservoir Inflow								
Clear Lake Inflow								
Williamson R bl Sprague R nr Chiloquin	MAY-SEP	110	139	159	76%	179	210	210

1) 90% And 10% exceedance probabilities are actually 95% And 5%

2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Reservoir Storage End of April, 2022	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)
Upper Klamath Lake	336.4	321.8	466.3	523.7

Basin Index
of reservoirs

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Klamath	24	61%	50%

Tahoe Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Tahoe	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Lake Tahoe Net Inflow	APR-JUL	13.9	43	63	62%	83	112	101
	MAY-JUL	-20	5.2	20	43%	42	66	47
Lake Tahoe Rise Gates Closed ¹	APR-HIGH	0.4	0.48	0.65	55%	0.92	1.4	1.19
	MAY-HIGH	0.061	0.144	0.3	39%	0.499	0.86	0.76

1) 90% And 10% exceedance probabilities are actually 95% And 5%

2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Reservoir Storage End of April, 2022	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)
Lake Tahoe	155.5	274.7	311.8	744.5

Basin Index
of reservoirs

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Tahoe	13	53%	28%

Truckee Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Truckee	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
L Truckee R ab Boca Reservoir ²	APR-JUL	30	39	46	64%	53	62	72
	MAY-JUL	4.9	16.9	25	57%	33	45	44
Independence Lk Inflow ²	APR-JUL	5	6.3	7.2	69%	8.1	9.4	10.5
	MAY-JUL	3.2	4.4	5.2	71%	6	7.2	7.32
Donner Lake Inflow ²	APR-JUL	5.7	8.1	9.8	65%	11.5	13.9	15
	MAY-JUL	0.28	3	4.9	60%	6.8	9.5	8.2
Truckee R ab Farad Sidewater ²	APR-JUL	56	70	79	88%	88	102	90
	MAY-JUL	33	45	52	83%	59	71	63
Boca Res Local Inflow ²	APR-JUL	-1.64	0.5	1.76	116%	2.5	4.1	1.52
	MAY-JUL	-0.67	-0.25	0.26	62%	0.56	1.16	0.42
Stampede Res Local Inflow ²	APR-JUL	32	40	46	78%	52	60	59
	MAY-JUL	9.5	20	28	78%	36	47	36
Martis Ck Res Inflow ²	APR-JUL	2.3	3.8	4.9	86%	6	7.5	5.7
	MAY-JUL	0.42	0.88	1.9	73%	2.9	4.4	2.6
Sagehen Ck nr Truckee	APR-JUL	1.71	2.5	3	73%	3.5	4.3	4.1
	MAY-JUL	0.24	1.11	1.7	77%	2.3	3.2	2.2
Prosser Ck Res Inflow ²	APR-JUL	18.4	23	26	74%	29	34	35
	MAY-JUL	9.4	13.3	16	73%	18.7	23	22
Truckee R at Farad ²	APR-JUL	103	131	150	67%	169	197	225
	MAY-JUL	38	65	84	60%	103	130	139

1) 90% And 10% exceedance probabilities are actually 95% And 5%

2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Reservoir Storage End of April, 2022	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)
Independence Lake	14.3	12.6	15.5	17.3
Martis Reservoir		0.9	0.9	35.8
Stampede Reservoir	119.4	91.9	154.8	226.5
Donner Lake	9.5	6.7	6.3	9.5
Boca Reservoir	26.9	15.6	25.7	40.9
Prosser Reservoir	14.9	11.0	13.7	29.8

Basin Index
of reservoirs

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Truckee	15	72%	39%

Carson Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Carson	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
EF Carson R nr Gardnerville								
	APR-JUL	92	109	121	74%	133	150	164
	MAY-JUL	56	74	87	75%	100	118	116
	200 cfs	23 Jun	01 Jul	06 Jul		11 Jul	19 Jul	14 Jul
	500 cfs	30 May	08 Jun	14 Jun		20 Jun	29 Jun	20 Jun
WF Carson R nr Woodfords								
	APR-JUL	26	32	36	80%	40	46	45
	MAY-JUL	12.6	20	25	83%	30	37	30

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
- 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Carson	14	44%	38%

Walker Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Walker	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
E Walker R nr Bridgeport ²	APR-AUG	6	16.7	24	55%	31	42	44
	MAY-AUG	5.7	15.4	22	54%	29	38	41
W Walker R nr Coleville	APR-JUL	58	72	82	56%	92	106	147
	MAY-JUL	38	54	64	52%	74	90	122
W Walker R bl L Walker R nr Coleville	APR-JUL	65	79	88	58%	97	111	153
	MAY-JUL	46	60	70	56%	80	94	126

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
- 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Reservoir Storage End of April, 2022	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)
Bridgeport Reservoir	17.4	13.8	23.3	42.5

Basin Index
of reservoirs

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Walker	8	55%	48%

Data Current As of: 5/17/2022 7:03:56 AM

Surprise Valley-Warners - May 1, 2022

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Surprise Valley-Warners	2	73%	40%

Data Current As of: 5/17/2022 7:04:22 AM

Colorado Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Colorado	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Lake Powell Inflow ²	APR-JUL	2620	3310	3840	63%	4420	5350	6130
	MAY-JUL	2030	2720	3250	62%	3830	4760	5240

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Reservoir Storage End of April, 2022	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)
Lake Powell	5790.6	8504.5	12892.0	24322.0

Basin Index
of reservoirs

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Colorado	199	76%	64%

Data Current As of: 5/17/2022 7:04:18 AM

Owens Lake Streamflow Forecasts - May 1, 2022

Forecast Exceedance Probabilities For Risk Assessment
Chance that actual volume will exceed forecast

Owens Lake	Forecast Period	90% (KAF)	70% (KAF)	50% (KAF)	% Median	30% (KAF)	10% (KAF)	30yr Median (KAF)
Owens R (DWR)	APR-JUL			90	39%			231

- 1) 90% And 10% exceedance probabilities are actually 95% And 5%
 2) Forecasts are For unimpaired flows. Actual flow will be dependent On management of upstream reservoirs And diversions

Watershed Snowpack Analysis May 1, 2022	# of Sites	% Median	Last Year % Median
Owens Lake	2	49%	28%

HOW FORECASTS ARE MADE

Most of the annual streamflow in the western United States originates as snowfall that has accumulated in the mountains during the winter and early spring. As the snowpack accumulates, hydrologists estimate the runoff that will occur when it melts. Measurements of snow water equivalent at selected manual snowcourses and automated SNOTEL sites, along with precipitation, antecedent streamflow, and indices of the El Niño / Southern Oscillation are used in computerized statistical and simulation models to prepare runoff forecasts. These forecasts are coordinated between hydrologists in the Natural Resources Conservation Service and the National Weather Service. Unless otherwise specified, all forecasts are for flows that would occur naturally without any upstream influences.

Forecasts of any kind, of course, are not perfect. Streamflow forecast uncertainty arises from three primary sources: (1) uncertain knowledge of future weather conditions, (2) uncertainty in the forecasting procedure, and (3) errors in the data. The forecast, therefore, must be interpreted not as a single value but rather as a range of values with specific probabilities of occurrence. The middle of the range is expressed by the 50% exceedance probability forecast, for which there is a 50% chance that the actual flow will be above, and a 50% chance that the actual flow will be below, this value. To describe the expected range around this 50% value, four other forecasts are provided, two smaller values (90% and 70% exceedance probability) and two larger values (30%, and 10% exceedance probability). For example, there is a 90% chance that the actual flow will be more than the 90% exceedance probability forecast. The others can be interpreted similarly.

The wider the spread among these values, the more uncertain the forecast. As the season progresses, forecasts become more accurate, primarily because a greater portion of the future weather conditions become known; this is reflected by a narrowing of the range around the 50% exceedance probability forecast. Users should take this uncertainty into consideration when making operational decisions by selecting forecasts corresponding to the level of risk they are willing to assume about the amount of water to be expected. If users anticipate receiving a lesser supply of water, or if they wish to increase their chances of having an adequate supply of water for their operations, they may want to base their decisions on the 90% or 70% exceedance probability forecasts, or something in between. On the other hand, if users are concerned about receiving too much water (for example, threat of flooding), they may want to base their decisions on the 30% or 10% exceedance probability forecasts, or something in between. Regardless of the forecast value users choose for operations, they should be prepared to deal with either more or less water. (Users should remember that even if the 90% exceedance probability forecast is used, there is still a 10% chance of receiving less than this amount.) By using the exceedance probability information, users can easily determine the chances of receiving more or less water.

This publication is posted with other Water Supply Outlook Reports for California at:
<https://www.nrcs.usda.gov/wps/portal/nrcs/detail/ca/snow/>.

For questions, contact Greg Norris, California NRCS, at Greg.Norris@usda.gov

Issued by

**Terry Cosby, Chief
Natural Resources Conservation Service
Conservation Service
U.S. Department of Agriculture**

Released by

**Carlos Suarez, State Conservationist
Natural Resources Conservation Service
U.S. Department of Agriculture
Davis, CA**



YOU MAY OBTAIN THIS PRODUCT AS WELL AS CURRENT SNOW, PRECIPITATION, TEMPERATURE AND SOIL MOISTURE, RESERVOIR, SURFACE WATER SUPPLY INDEX, AND OTHER DATA BY VISITING OUR WEB SITE:

www.nrcs.usda.gov/wps/portal/nrcs/main/ca/snow/



California Water Supply Outlook

