

## NOVEMBER 2023 WEATHER SUMMARY FOR THE CENTRAL CALIFORNIA INTERIOR

*By Brian Ochs, JP Kalb, and Antoinette Serrato, Climate Services Focal Points  
WFO San Joaquin Valley-Hanford*

Dry and relatively warm weather occurred during the first half of the month, although there was one day with light precipitation (on the 7th). A longer, somewhat unsettled weather period occurred around 15th until the 18th. Despite the length of this period, most locations received little precipitation. Freezing temperatures began in the coldest locations of the San Joaquin Valley as early as the 20th, although they became more widespread by the morning of the 25th and lasted for the next few days.. Gusty winds developed at times, mainly in the typical prone areas, due to the passage of the low pressure systems and easterly winds due to high pressure over the Great Basin. Gusts of 45 to 55 mph were common along the Mojave Desert slopes in eastern Kern County, as well as the Kern County mountains towards Tehachapi and the Grapevine with these events. Warmer than average temperatures prevailed (see also Fig 1), as daytime highs were considerably warmer than average on quite a few days. In terms of precipitation, the month ended up mainly below average (Fig 2), except for the western portion of the San Joaquin Valley and adjacent mountain ranges due to thunderstorms that produced heavy rain during the middle part of the month.

**Table 1 – November 2023 Summary Statistics –  
NWS Hanford, CA ASOS Sites**

<b>Location</b>	<b>Monthly Average Temp (deg F)</b>	<b>Departure from Average (deg F)</b>	<b>Temperature Rank</b>	<b>Total Monthly Precipi- tation (inches)</b>	<b>Departure from Normal (inches)</b>	<b>Precipitation Rank</b>
Bakersfield	58.9	+2.6	15th warmest	0.02	-0.49	24th lowest
Fresno	57.8	+2.7	12th warmest	0.21	-0.66	33rd lowest
Hanford	55.7	+2.5	12th warmest	0.13	-0.49	19th lowest
Madera	55.2	+1.1	19th warmest	0.41	-0.51	29th lowest
Merced	55.6	+2.1	14th warmest	0.84	0.18	52nd lowest

The month began with warm temperatures and dry conditions for much of the San Joaquin Valley. However, no records were broken despite high temperatures being 5-10 degrees above average. The pattern changed early on the 6th through the 7th as a trough brought the first rain of the season to the San Joaquin Valley. Temperatures also cooled to about average on the 6th and 7th and remained seasonable on the 8th.

A warming trend occurred during the 9th until the 14th, although afternoon high temperatures were generally mild, or several degrees above average. The warmest locations during this period reached into the mid-upper 70's, including in the Central Valley. Chilly overnight lows continued, while little or no fog developed in the San Joaquin Valley.

While relatively little change in high temperatures occurred on the 15th until the 18th, precipitation occurred on these days. Overnight lows were generally mild due to the presence of clouds. There were two distinct periods of precipitation; the first one was mainly on the 15th while the second one began a couple of days later. Mainly light precipitation was reported with this first wave, as most locations received a tenth of an inch or less. However, gusty winds developed in portions of Kern County, including Bakersfield, Tehachapi, and the Grapevine. Gusts were around 40 to 55 mph in these locations; the gusty winds were strong enough to knock down large trees in Bakersfield and lift enough dust to reduce visibility down to around one half mile where gusts of 40 to 45 mph were recorded.

The second precipitation event on the 17th into the 18th brought additional rain and high elevation snow. Isolated thunderstorms developed on the afternoon and evening of the 18th in the San Joaquin Valley towards Los Banos, Dos Palos, Mendota, and Firebaugh. Mainly brief heavy rainfall occurred with the strongest storms. A heavier shower also developed in Merced and brought nearly one half inch. Otherwise, most of the Central Valley received up to a tenth of an inch of rainfall with this system.

On the 19th, cooler temperatures arrived along with breezy conditions. This continued into the 20th, before a warming trend began on the 21st into the 22nd. Chilly overnight low temperatures prevailed during this period, with locally freezing temperatures in the San Joaquin Valley. Gusty easterly winds developed towards Tehachapi and the Grapevine during the morning of the 20th and lasted until the morning of the 21st (though were much stronger on the Los Angeles County side of the Grapevine). A few locations reported gusts around 45 to 55 mph as early as the afternoon of the 20th, and similar gusts were also reported at times until the morning of the 21st.

High pressure built over Central California briefly, on the 22nd and 23rd, which brought a warming trend. Another upper-level trough arrived on the morning of the 24th and allowed a northerly flow that brought in noticeably cooler air. This resulted in more widespread freezing overnight lows by the morning of the 25th. Temperatures remained steady for the next few days, with the coldest overnight lows on the 26th and 27th. Otherwise, afternoon temperature readings were considerably warm, but mild from the 25th until the end of the month. A wind event

developed along the Mojave Desert slopes in eastern Kern County on the afternoon and evening of the 30th, while light precipitation accumulated in some areas of the forecast area. Precipitation amounts were not measurable at the ASOS sites, but some locations received up to a few hundredths of an inch in the Central Valley and a dusting up to an inch of snow in the higher elevations of the Sierra Nevada, mainly above 4,000 feet. Elsewhere, liquid precipitation amounts were generally less than 0.10 inch.

**Table 2 – Seasonal Precipitation for ASOS Locations (ending on November 30th, 2023)**

<b>Location</b>	<b>Since Jan 1st (inches)</b>	<b>Departure From Average (inches)</b>	<b>Since Jul 1st (inches)</b>	<b>Departure From Average (inches)</b>	<b>Since Oct 1st (inches)</b>	<b>Departure From Normal (inches)</b>
Bakersfield	9.31	+4.05	1.40	+0.56	0.32	-0.47
Fresno	12.98	+3.78	0.40	-1.11	0.21	-1.22
Hanford	11.54	+4.77	0.61	-0.53	0.13	-0.95
Madera	9.29	+0.32	0.56	-0.84	0.43	-0.93
Merced	15.75	+5.86	1.12	-0.59	1.00	-0.66

<b>Table 3 – Warmest High Temperatures and Coolest Low Temperatures of the Month for ASOS Locations</b>				
<b>Location</b>	<b>High</b>	<b>Date(s)</b>	<b>Low</b>	<b>Date(s)</b>
Bakersfield	83	5th	36	26th
Fresno	81	4th	36	27th
Hanford	82	4th & 5th	31	25th, 26th, 27th & 28th
Madera	82	4th	29	27th
Merced	81	4th	32	27th

### **Daily Records Set During November 2023**

**Bakersfield** – No daily records tied/set.

**Fresno** – No daily records tied/set.

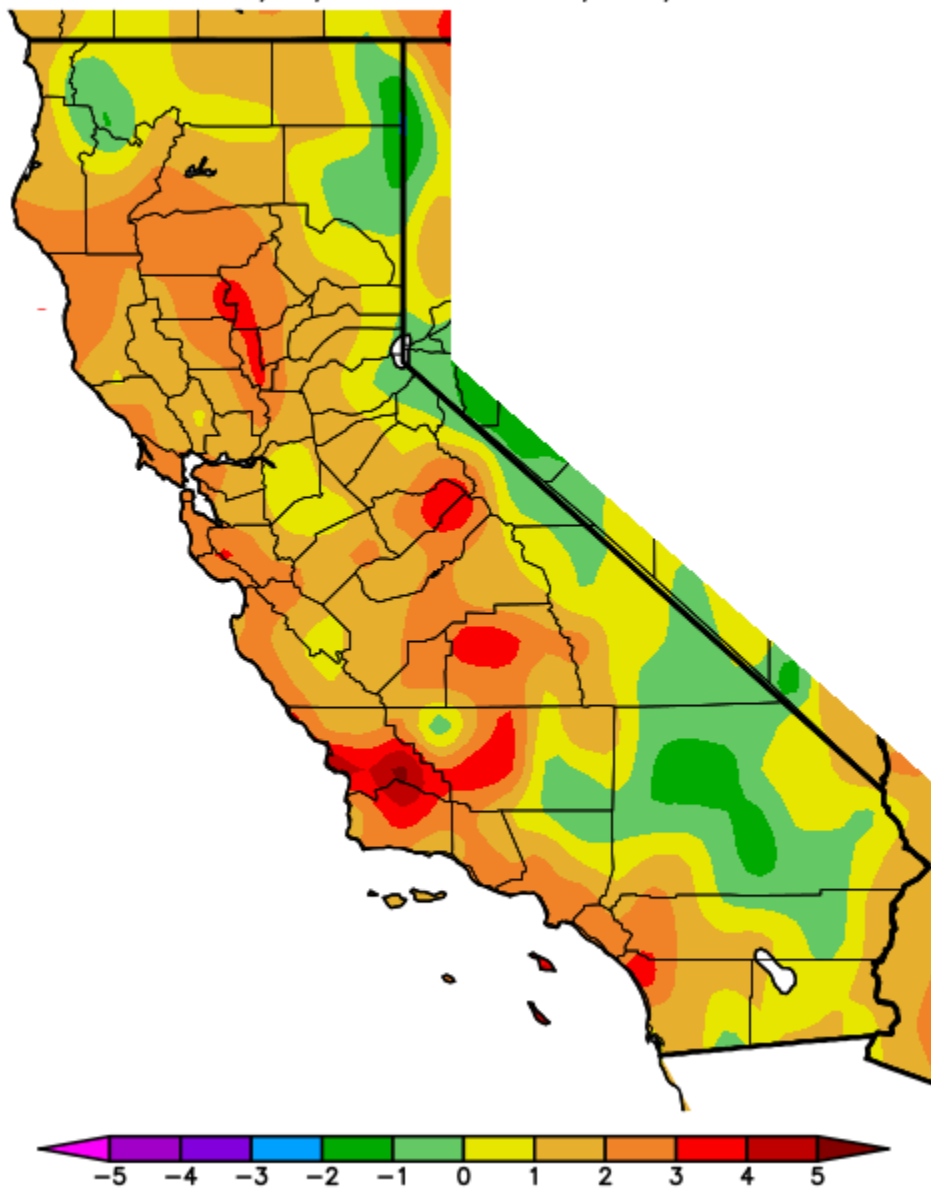
**Hanford** – No daily records tied/set.

**Madera** – No daily records tied/set.

**Merced** – No daily records tied/set.

**Fig 1 – Departure from Average Temperature for this month**

Ave. Temperature dep from Ave (deg F)  
11/1/2023 – 11/30/2023



Generated 12/ 1/2023 at WRCC using provisional data.  
NOAA Regional Climate Centers

**Fig 2 – Percent of Average Precipitation for this month**

Percent of Average Precipitation (%)  
11/1/2023 – 11/30/2023

