

OCTOBER 2008 WEATHER SUMMARY

*By Gary Sanger, Climate Services Focal Point
Brian Ochs, Meteorologist Intern
WFO San Joaquin Valley – Hanford*

October was overall a warm and dry month. However, during the first week and last day of the month there was precipitation and cooler temperatures and even a period during the second week of the month with cooler than normal, but dry and windy weather. An upper-level ridge over California at the beginning of October warmed temperatures to above normal on the 1st and 2nd. October began quite warm with highs mostly in the mid 90s on the 1st for much of the forecast and warning area, including the San Joaquin Valley and the Kern County portion of the Mojave Desert, and then temperatures began to cool a little (mostly mid to upper 80s for highs) on the 2nd. A trough reached California on the 3rd, with temperatures throughout the San Joaquin Valley plunging into the mid-upper 70s (a drop of 8-11 degrees from the previous day), and further cooling into the mid 70s for the next two days. Light precipitation fell in the valley within the Hanford warning/forecast area with amounts up to a tenth of an inch, while heavier amounts from 0.70 inch to just above 1.00 inch fell in the Sierra Nevada and nearby foothills.

After the trough that remained over the region on the 4th and 5th of the month was replaced by high pressure, temperatures warmed back to near to slightly above normal from the 6th until the 8th before another low pressure system approached central California by the 9th. This time there was no precipitation associated with this low pressure; the effects were mainly below normal temperatures for the next four days with the warmest highs only in the mid 60s to near 70 that occurred in the valley. From the 9th until the 11th there were several stations in the mountain passes, canyons, and deserts that recorded gusty winds up to 55 mph due to passage of the low pressure system. On the morning of the 11th temperatures reached to around freezing in several locations throughout the San Joaquin Valley; this was the day for when our first frost advisory for the fall 2008 season was issued.

High pressure began to redevelop over the region by the 12th when temperatures began to steadily increase until temperatures peaked again as high as the lower 90s in the valley on the 17th. Temperatures in the deserts were in the 60s prior to arrival of this high pressure system, and then quickly warmed to the 80s. Temperatures remained above normal with highs mostly in the 80s in the valley and desert and the mid 60s to mid 70s for most of the higher elevations from the 13th until near the end of the month. There was little change in temperatures during this period due to the persistence of high pressure. The air became quite dry starting the third week of the month so that low temperatures were able to fall to around normal values instead of remaining above normal; this continued until almost the end of the month.

The next series of low pressure systems approached the Hanford forecast and warning area by the early morning hours of the 30th. Even on the 30th temperatures remained

mostly in the 80s in the valley and desert along with increased cloud cover since warm air remained ahead of the trough. The southern end of the San Joaquin Valley experienced gusty winds and blowing dust during the much of the daylight hours of the 30th (winds in Bakersfield gusted to over 35 mph) before the next and last low pressure system for the month that brought measureable rainfall in the valley on the 31st arrived. On the last day of the month there were rainfall amounts as high as 0.15 inch in the valley, and amounts ranged from around a half inch to just above an inch for much of the foothills and higher elevations of the Sierra Nevada. Prior to the rainfall that occurred on the last day of the month, there were new minimum temperature records set in Fresno and Bakersfield. Fresno had a low of 61 (prior record was 59 set in 1983), and Bakersfield had a low of 65 (beating the old record of 58 set in 1987).