NWS FORM E-5 U.S. DEPARTMENT OF COMMERCE HYDROLOGIC SERVICE AREA:
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
NATIONAL WEATHER SERVICE **SAN JOAQUIN VALLEY - HANFORD , CA**

REPORT FOR:

MONTHLY REPORT OF RIVER AND FLOOD CONDITIONS

MONTH: **AUGUST** YEAR: **2015**

TO: Hydrometeorological Information Center, W/OH12x1
National Weather Service/Office of Hydrology
1325 East-West Highway #7116
Silver Spring, MD 20910

SIGNATURE:

Kevin Durfee
(In Charge of Hydrologic Service Area)

DATE: September 3, 2015

When no flooding occurs, include miscellaneous river conditions, such as significant rises, record low stages, ice conditions, snow cover, droughts and hydrologic products issued (WSOM E-41).

X	An **X** inside this box indicates that no flooding occurred for the month within this hydrologic service area.

Unlike July, northward influxes of monsoonal moisture were scarce over the central California interior this month. In fact, a dry southwesterly flow aloft resided over the HSA for much of August between a semi-permanent upper level trough over the Eastern Pacific and a strong upper level ridge of High pressure centered over west Texas. At times the ridge would retrograde to the Four Corners region and bring triple digit heat to the San Joaquin Valley, lower foothills and the Kern County Desert. This happened between the 15th and the 20th and again between the 24th and the 29th. On three separate occasions, the upper level trough over the Eastern Pacific moved inland, accompanied by a robust onshore flow and a deep intrusion of marine air in the San Joaquin Valley. This occurred from the 4th through the 6th , between the 10th and the 14th and during the last few days of the month. During each of these periods, high temperatures stayed below normal, particularly in the San Joaquin Valley where highs remained well below the century mark (generally low to mid 90s).

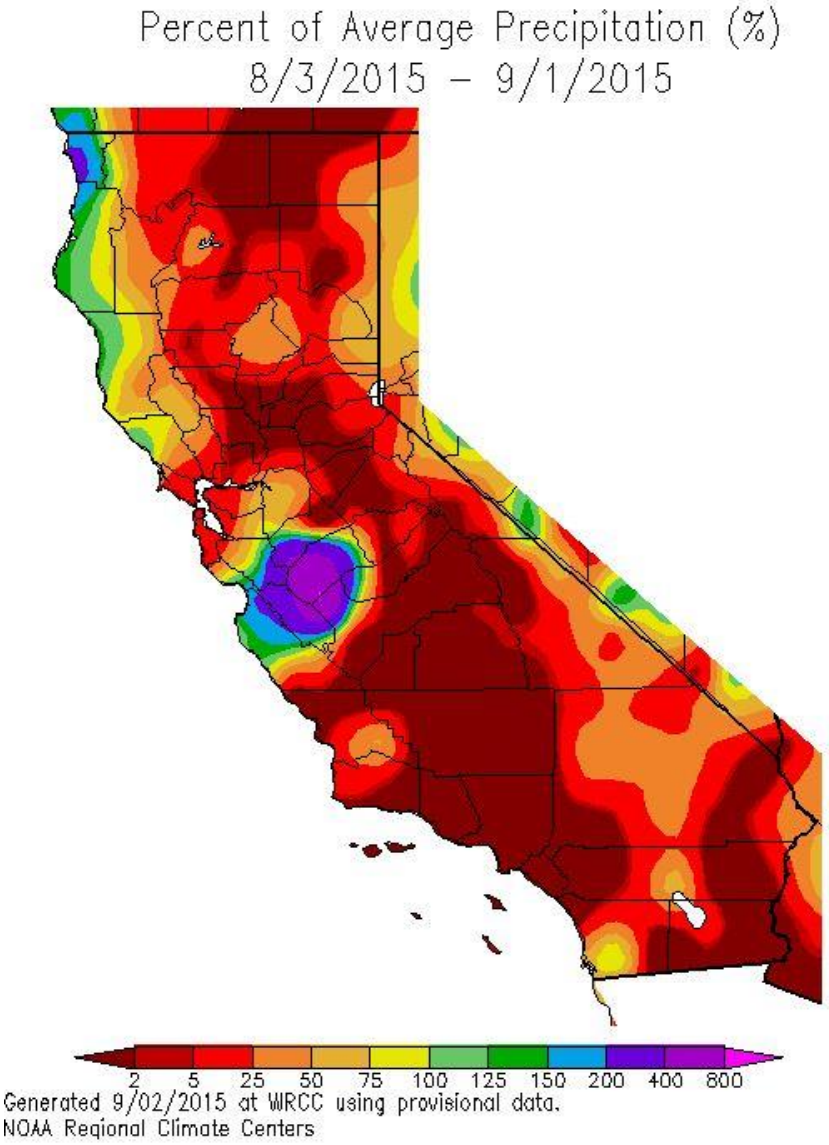
The influxes of monsoonal moisture into central California, as rare as they were this month, were shallow and high based and produced little more than isolated showers and thunderstorms over the Sierra during the first few days of August. This was moisture associated with the remnants of Tropical Storm Guillermo near the Hawaiian Islands and was tapped by the upper level trough over the Eastern Pacific and transported into the HSA by southwesterly winds aloft. The opaqueness of these high clouds blocked the sun and kept high temperatures below 90 degrees in most of the San Joaquin Valley on the 4th and 5th. Monsoonal moisture made another brief visit to the HSA on the 25th and 26th but did little more than produce some sprinkles and isolated light showers in the Kern County mountains and desert on the 25th and isolated afternoon thunderstorms along the Sierra Crest the following day.

Meanwhile, a multitude of wildfires continued to scorch thousands of acres over the Sierra. The largest was the Rough wildfire, which grew to nearly 80,000 acres by the end of the month with only 25 percent containment. The Cabin wildfire was the second largest wildfire, and despite being nearly extinguished by the middle of August, continued to smolder through the end of the month. Smoke from these fires significantly reduced air quality in the high Sierra. A light easterly flow aloft carried smoke from these fires into the foothills and east side of the San Joaquin Valley from the 19th through the 22nd and again during the last two days of August. Smoke from the Cuesta wildfire in San Luis Obispo County was also brought into Kern County by light westerly winds aloft from the early evening hours of the 17th through the 18th.

Water flows remained very low or non-existent on the mainstem rivers this month while water levels in the reservoirs, already historically low, continued to drop; obvious casualties of California's long term drought. By the 1st of September, the water capacity of the major reservoirs in central California ranged from just 5 percent of normal at Hidden Dam and Isabella Dam to 31 percent at Friant Dam, with a month end average of only 12 percent. In summary, precipitation ended up below normal for August throughout the HSA while temperatures averaged slightly above normal.

NO HYDROLOGIC PRODUCTS WERE ISSUED THIS MONTH.

The map below shows the percentage of normal rainfall that occurred in California in August, 2015.



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W/OH12x1
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CNRFC
WFO HNX
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