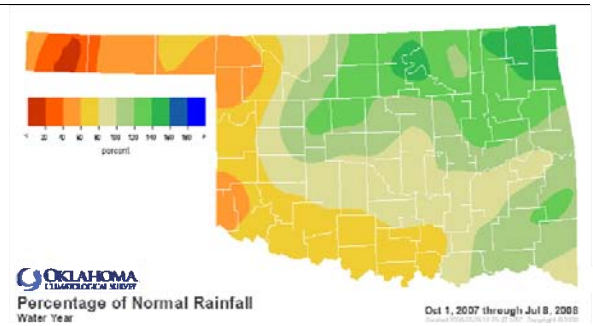
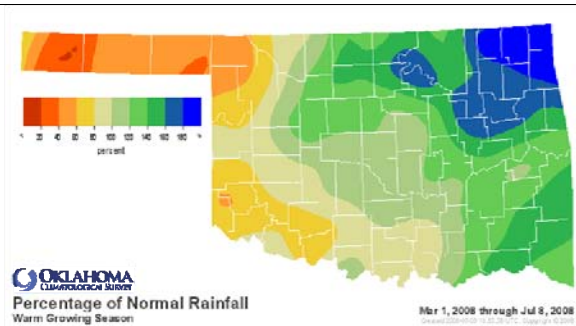


July 10, 2008

## PRECIPITATION

### Preliminary Statewide Precipitation

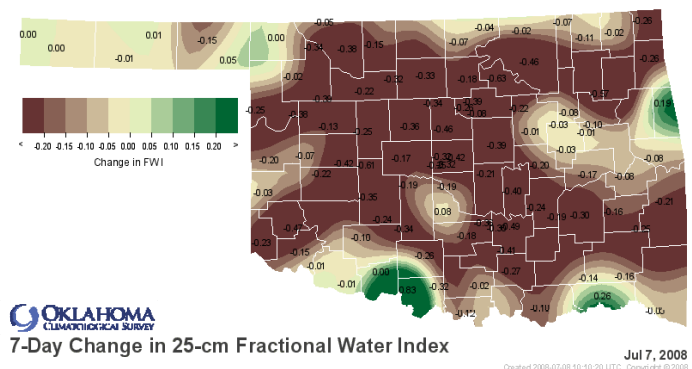
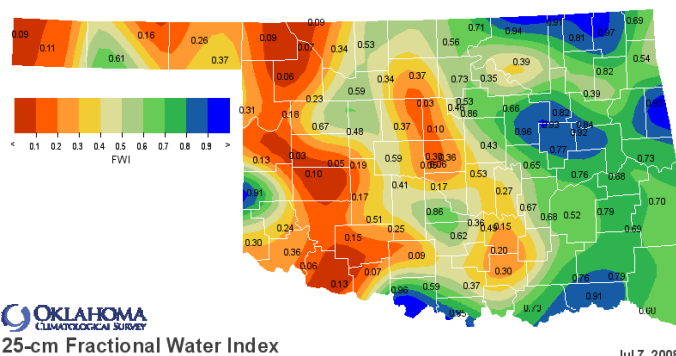
Climate Division (#)	Warm Growing Season March 1—July 8, 2008				Water Year October 1, 2007—July 8, 2008			
	TOTAL RAINFALL (INCHES)	DEPARTURE FROM NORMAL (INCHES)	PERCENT OF NORMAL	RANK SINCE 1921	TOTAL RAINFALL (INCHES)	DEPARTURE FROM NORMAL (INCHES)	PERCENT OF NORMAL	RANK SINCE 1921
Panhandle	4.91"	-5.52"	47%	4th driest	7.40"	-7.44"	50%	5th driest
North Central	17.78"	+2.71"	118%	14th wettest	24.94"	+1.68"	107%	24th wettest
Northeast	32.14"	+13.56"	173%	2nd wettest	44.04"	+12.37"	139%	5th wettest
West Central	13.15"	-1.16"	92%	37th wettest	18.71"	-3.05"	86%	37th driest
Central	20.18"	+2.55"	114%	14th wettest	29.16"	-0.18"	99%	27th wettest
East Central	28.42"	+8.48"	143%	6th wettest	40.05"	+4.00"	111%	23rd wettest
Southwest	11.81"	-2.82"	81%	33rd driest	17.31"	-5.79"	75%	23rd driest
South Central	18.18"	-0.03"	100%	31st wettest	25.87"	-6.32"	80%	27th driest
Southeast	29.40"	+8.45"	140%	7th wettest	44.23"	+3.22"	108%	23rd wettest
<b>Statewide</b>	<b>19.61"</b>	<b>+2.96"</b>	<b>118%</b>	<b>11th wettest</b>	<b>28.00"</b>	<b>-0.08"</b>	<b>100%</b>	<b>32nd wettest</b>



## SOIL MOISTURE

### Fractional Water Index<sup>1</sup> July 7, 2008

#### 25 CM (~10 INCHES)



<sup>1</sup> The Fractional Water Index ranges from very dry soil having a value of 0 to soil at field capacity illustrated by a value of 1. Specifically, 1.0 to 0.8 equals Enhanced Growth, 0.8 to 0.5 equals Limited Growth, 0.5 to 0.3 equals Plants Wilting, 0.3 to 0.1 equals Plants Dying, and less than 0.1 equals Barren Soil.

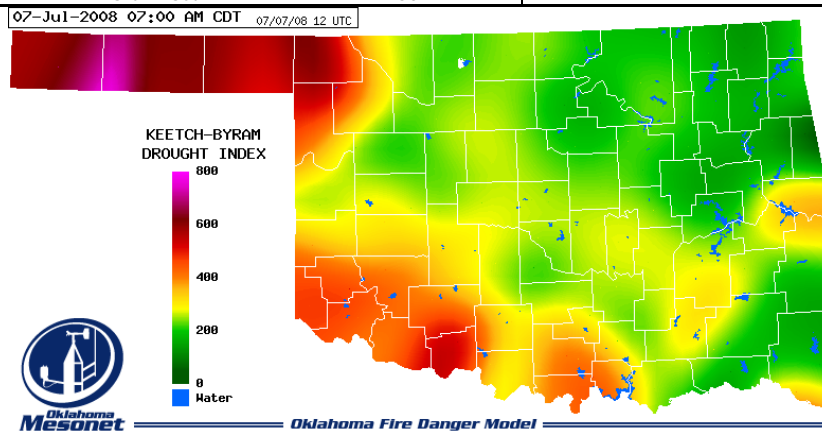
## DROUGHT INDICES

Palmer Drought Severity Index <sup>1</sup>					Standardized Precipitation Index <sup>2</sup> Through June 2008			
CLIMATE DIVISION (#)	CURRENT STATUS 7/5/2008	VALUE		CHANGE IN VALUE	3-MONTH	6-MONTH	9-MONTH	12-MONTH
		7/5	6/7					
Northwest (1)	MODERATE DROUGHT	-2.42	-2.13	-0.29	MODERATELY DRY	MODERATELY DRY	MODERATELY DRY	VERY DRY
North Central (2)	VERY MOIST SPELL	3.83	4.30	-0.47	VERY WET	VERY WET	VERY WET	MODERATELY WET
Northeast (3)	EXTREME MOIST SPELL	4.88	4.71	0.17	EXTREMELY WET	EXTREMELY WET	EXTREMELY WET	VERY WET
West Central (4)	UNUSUAL MOIST SPELL	2.25	2.44	-0.19	NEAR NORMAL	MODERATELY WET	MODERATELY WET	VERY WET
Central (5)	VERY MOIST SPELL	3.46	3.45	0.01	MODERATELY WET	MODERATELY WET	MODERATELY WET	VERY WET
East Central (6)	UNUSUAL MOIST SPELL	2.74	2.39	0.35	MODERATELY WET	VERY WET	MODERATELY WET	VERY WET
Southwest (7)	INCIPIENT DROUGHT	-0.51	1.25	-1.76	NEAR NORMAL	NEAR NORMAL	NEAR NORMAL	NEAR NORMAL
South Central (8)	INCIPIENT DROUGHT	-0.70	-0.15	-0.55	NEAR NORMAL	NEAR NORMAL	NEAR NORMAL	NEAR NORMAL
Southeast (9)	UNUSUAL MOIST SPELL	2.27	2.20	0.07	NEAR NORMAL	VERY WET	MODERATELY WET	MODERATELY WET

- One climate division (the Northwest) is currently experiencing drought conditions, according to the PDSI.
- Five climate divisions have undergone PDSI moisture decreases since June 7.
- One climate division (the Northwest) is experiencing long-term dry conditions, according to the SPI.

### Keetch-Byram Drought Fire Index<sup>3</sup>

MESONET STATION	COUNTY	CLIMATE DIVISION	CURRENT VALUE 7/7/2008	
Boise City	Cimarron	Northwest	695	<ul style="list-style-type: none"> <li>• Stations currently above 600 (July 7) = 3</li> <li>• Stations above 600 on June 10 = 3</li> </ul>
Hooker	Texas	Northwest	603	
Goodwell	Texas	Northwest	601	



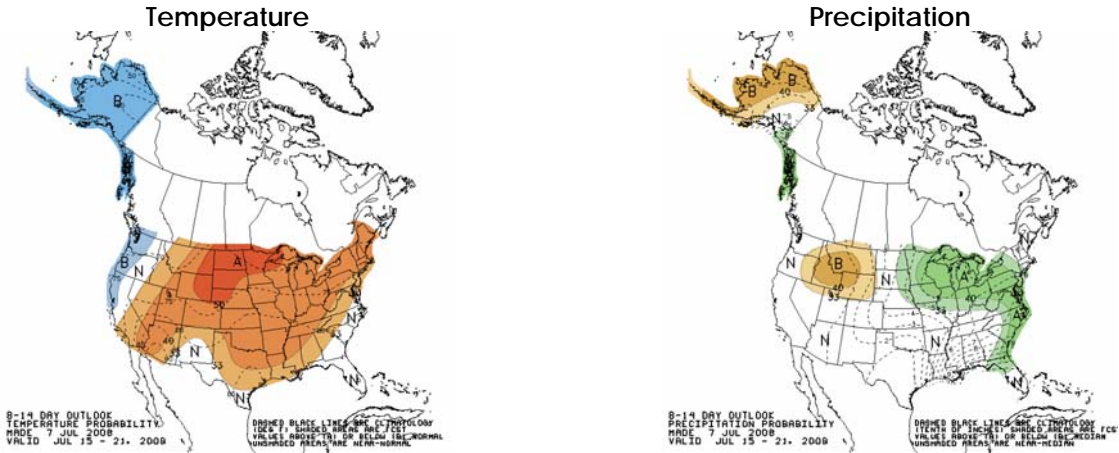
<sup>1</sup> The Palmer Drought Severity Index, the first comprehensive drought index developed in the United States, is calculated based on precipitation, temperature, and soil moisture. Though widely used by government agencies and states to trigger drought relief programs, the PDSI may underestimate or overestimate the severity of ongoing dry periods.

<sup>2</sup> The Standardized Precipitation Index, more sensitive than the PDSI, provides a comparison of precipitation over a specified period with precipitation totals from that same period for all years included in the historical record. The 3-month SPI provides a seasonal estimation of precipitation while the 6-month SPI can be very effective in showing precipitation over distinct seasons.

<sup>3</sup> The Keetch-Byram Drought Index measures the state of near-surface soil moisture (within the uppermost eight inches of soil) as well as the amount of fuel available for fires. KBDI values of 600 and above are often associated with more severe drought and increased wildfire occurrence.

# WEATHER/DROUGHT FORECAST

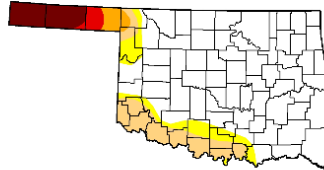
## 8- to 14-Day Outlook July 15-21, 2008



### U.S. Drought Monitor Oklahoma

July 8, 2008  
Valid 7 a.m. EST

Drought Conditions (Percent Area)	None					
	D0-D4	D1-D4	D2-D4	D3-D4	D4	
Current	75.5	24.5	18.0	8.6	6.8	5.4
Last Week (07/01/2008 map)	75.5	24.5	18.0	8.6	6.8	5.3
3 Months Ago (04/15/2008 map)	87.8	12.2	8.6	0.0	0.0	0.0
Start of Calendar Year (01/01/2008 map)	83.4	16.6	7.1	0.0	0.0	0.0
Start of Water Year (10/01/2007 map)	95.6	4.4	0.0	0.0	0.0	0.0
One Year Ago (07/10/2007 map)	97.1	2.9	0.0	0.0	0.0	0.0



**Intensity:**  
■ D0 Abnormally Dry    ■ D3 Drought - Extreme  
■ D1 Drought - Moderate    ■ D4 Drought - Exceptional  
■ D2 Drought - Severe

The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. See accompanying text summary for forecast statements

<http://drought.unl.edu/dm>

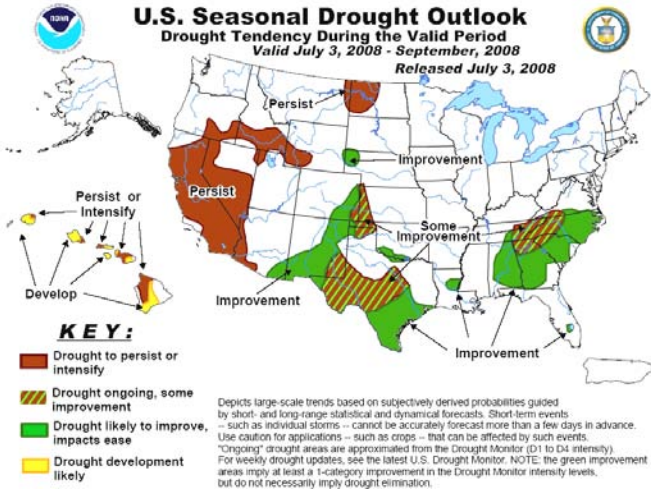
**Released Thursday, July 10, 2008**  
 Author: Rich Tinker, CPC/NOA

### Regional Drought Summary & Outlook:

July 8—Heavy tropical rains of 5 to 10 inches doused far southern Texas, bringing dramatic drought improvement perhaps a bit too quickly to the region. Rainfall was lighter and more scattered farther north across south-central Texas, generally keeping D2 to D4 conditions intact though localized improvement was noted. Similarly, patches of moderate to locally heavy rains from central New Mexico northeastward into southwestern Nebraska were enough to improve dryness and drought in a few areas, specifically northeastern Colorado, northwestern Kansas, and parts of the Texas Panhandle, but were not enough to significantly alter the drought landscape relative to last week. Meanwhile, it was a dry week across most of southeastern New Mexico, central and northeastern Texas, and much of Oklahoma, where D0 to D2 conditions persisted or expanded slightly.

According to the latest Drought Outlook, improvement is on tap for southern and eastern Texas with more limited relief for central Texas. Showers increased over southern and eastern Texas near the start of July, and extended-range forecasts suggest improvement during the first half of July due to a more favorable upper air pattern. Later in the season there is an overall climatological increase in the odds for rain from tropical activity. However, the water supply situation, including groundwater levels, should see little improvement unless a tropical weather system strikes the area. To the west, with the typical onset of the summer monsoon during the first week in July, the Southwest can expect to see a gradual increase in rainfall amounts from southeastern Arizona and the Mogollon Rim area into New Mexico and far western Texas.

### U.S. Seasonal Drought Outlook Drought Tendency During the Valid Period Valid July 3, 2008 - September, 2008 Released July 3, 2008



## CROP REPORT

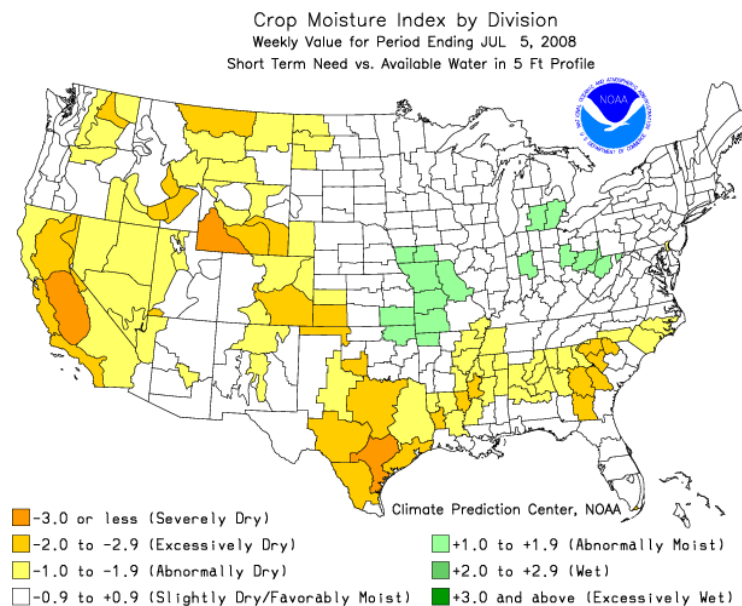
July 7, 2008—Weather across the state included warm temperatures for much of the week with a few scattered showers occurring in some areas. The Panhandle region received .42 inches of rain last week but remains in a severe drought. Small grain harvest has been nearly completed. Small grain producers have now moved to plowing their harvested fields. Topsoil and subsoil moisture conditions declined slightly, but both remain mostly adequate to short. There were 6.2 days suitable for fieldwork.

With nearly all of the state's small grain acreage harvested by week's end, farmers' attention has turned to working the harvested ground. As of Sunday, winter wheat harvested had reached 98 percent, up 5 percentage points from the previous week, and six points ahead of the five-year average. Forty-three percent of the state's winter wheat acreage had been plowed by week's end. Rye harvested was nearly complete, 13 points ahead of normal. Forty-four percent of the state's rye acres had been plowed by week's end, an increase of 21 points from the previous week but one point behind the five-year average. Oats harvested reached 87 percent last week, a six-point increase from the previous week and three points ahead of normal. Thirty-nine percent of the state's oat acres had been plowed, an increase of thirteen points from last week but 11 points behind normal.

Dry weather allowed farmers to catch up on row crop activities. Row crop conditions remain mostly within the good to fair range. Corn silking was at 44 percent, up 10 percentage points from the previous week, but eight points behind normal. Seventeen percent of corn was in the dough stage, five points behind normal. Sorghum planted increased 20 percentage points from the previous week to reach 86 percent complete, seven points behind the five-year average. Over half the sorghum was emerged, up six points from the previous week, but 27 points behind normal. A small percentage of the state's sorghum was heading. Soybeans seedbed preparation was nearly complete at 96 percent, an increase of two percentage points from the previous week and equal to the five-year average. Soybeans planted were at 79 percent, up 15 points from the previous week, but six points behind normal. Just over two-thirds of the state's soybeans were emerged by week's end, 11 points behind normal. Ten percent of soybeans were blooming. Sixty-three percent of the peanuts in the state were pegging, an increase of three points from the previous week, but one point behind normal. Thirty percent of peanuts were setting pods, an increase of 18 points from the previous week and 16 points ahead of normal. Cotton squaring reached 42 percent, one percentage point ahead of the five-year average.

Hay cutting and baling continued at an increased rate last week. Alfalfa hay second cutting increased 3 points from the previous week to reach 95 percent complete, four percentage points ahead of normal. Nearly half of the alfalfa had been cut at least three times. Alfalfa conditions remained mostly in the good to fair range. Other hay first cutting reached 69 percent by week's end, an increase of seven points from the previous week but 10 points below normal. Other hay condition remained mostly in the fair to good range. Nearly all watermelons were running by week's end, an increase of six percentage points from the previous week, but four points behind normal. Seventy-two percent of watermelons were setting fruit with 11 percent harvested.

Pasture and range conditions remained mostly in the good to fair range in spite of recent warm weather. Livestock conditions were rated mostly in the good to fair range with mostly light to moderate insect activity.





## RESERVOIR STORAGE

- 6 reservoirs are currently operating at less than full capacity (compared to 4 four weeks ago).
- 26 reservoirs have experienced lake level decreases.

<b>Storage in Selected Oklahoma Lakes &amp; Reservoirs</b>					
<i>July 9, 2008</i>					
<i>Lake or Reservoir</i>	<i>Normal Pool Elevation</i>	<i>Previous Elevation</i>	<i>Current Elevation</i>	<i>Change in Elevation</i>	<i>Current Flood Control Storage</i>
	(feet)	06/10/2008 (feet)	07/09/2008 (feet)	(feet)	(acre-feet)
<b>North Central</b>					
Fort Supply	2004.00	2003.94	2004.21	0.27	12,676
Great Salt Plains	1125.00	1125.86	1125.35	(0.51)	2,937
Kaw*	1013.00	1026.98	1024.15	(2.83)	698,335
<b>Northeast</b>					
Birch	750.50	758.16	751.49	(6.67)	20,376
Copan	710.00	722.93	714.04	(8.89)	22,947
Fort Gibson	554.00	565.38	562.93	(2.45)	200,487
Grand	745.00	746.93	747.96	1.03	142,041
Hudson	619.00	628.96	624.45	(4.51)	64,582
Hulah	733.00	753.16	743.26	(9.90)	55,169
Keystone	723.00	735.14	731.49	(3.65)	733,191
Oologah	638.00	649.85	646.60	(3.25)	307,065
Skiatook	714.00	720.94	716.50	(4.44)	77,008
<b>West Central</b>					
Canton	1615.40	1616.82	1615.50	(1.32)	794
Foss	1642.00	1642.62	1641.90	(0.72)	(668)
<b>Central</b>					
Arcadia	1006.00	1008.46	1005.95	(2.51)	(89)
Heyburn	761.50	765.88	761.79	(4.09)	294
Thunderbird	1039.00	1040.37	1039.37	(1.00)	2,257
<b>East Central</b>					
Eufaula*	587.00	587.38	588.60	1.22	170,087
Tenkiller	632.00	634.81	635.24	0.43	42,540
<b>Southwest</b>					
Fort Cobb	1342.00	1343.09	1342.16	(0.93)	74,456
Lugert-Altus	1559.00	1556.81	1553.48	(3.33)	(31,767)
Tom Steed	1411.00	1410.66	1409.86	(0.80)	(7,098)
<b>South Central</b>					
Arbuckle	872.00	872.87	871.76	(1.11)	(557)
McGee Creek**	175.90	176.55	176.36	(0.19)	5,911
Texoma*	619.00	618.13	618.03	(0.10)	(74,586)
Waurika*	951.40	951.97	951.30	(0.67)	189,186
<b>Southeast</b>					
Broken Bow*	602.50	602.85	602.82	(0.03)	4,679
Hugo*	406.00	407.34	406.77	(0.57)	10,892
Pine Creek*	442.50	442.88	443.75	0.87	6,113
Sardis	599.00	599.40	599.33	(0.07)	4,578
Wister	478.00	478.88	478.28	(0.60)	2,149

\* indicates seasonal pool operation

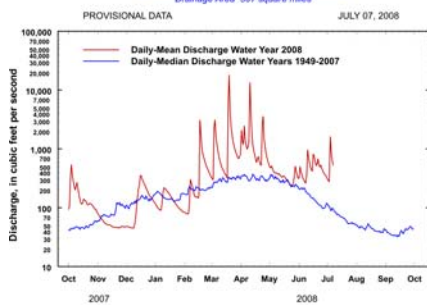
\*\* elevation in meters

negative numbers in red, parentheses

# STREAMFLOW CONDITIONS

## Baron Fork at Eldon

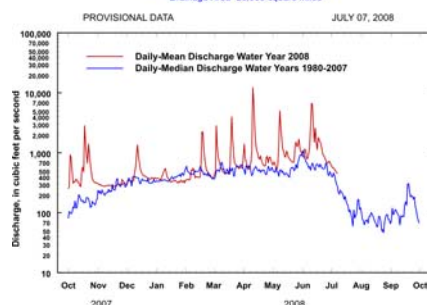
*Baron Fork at Eldon, Oklahoma*  
Station No. 07197000 Northeast Oklahoma  
Drainage Area 307 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*

## Canadian River at Purcell

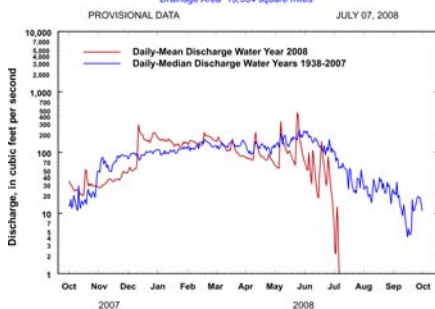
*Canadian River at Purcell, Oklahoma*  
Station No. 07229200 Central Oklahoma  
Drainage Area 25,939 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*

## Cimarron River near Waynoka

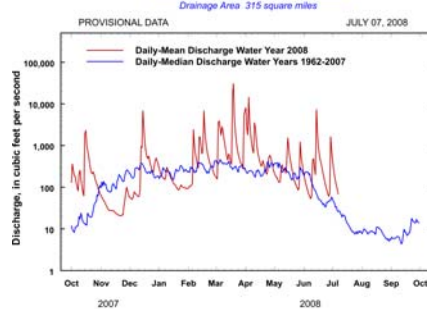
*Cimarron River near Waynoka, Oklahoma*  
Station No. 07158000 Northwest Oklahoma  
Drainage Area 13,334 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*

## Glover River near Glover

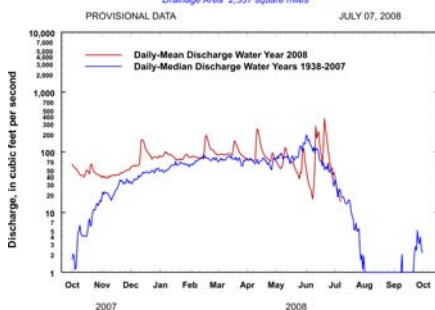
*Glover River near Glover, Oklahoma*  
Station No. 07337900 Southeast Oklahoma  
Drainage Area 315 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*

## North Fork of the Red River near Carter

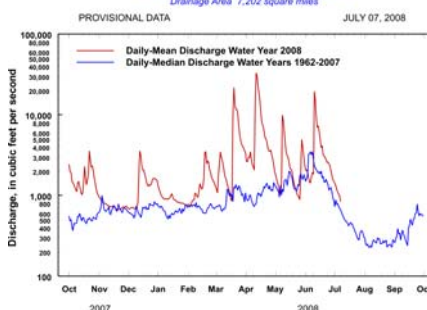
*North Fork of the Red River near Carter, Oklahoma*  
Station No. 07301500 Southwest Oklahoma  
Drainage Area 2,337 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*

## Washita River near Dickson

*Washita River near Dickson, Oklahoma*  
Station No. 07331000 South-Central Oklahoma  
Drainage Area 7,202 square miles



*Comparison of daily discharges for water year 2008  
and period of record  
Data from U.S. Geological Survey*



Water Bulletin information/data courtesy of National Weather Service, Climate Prediction Center, Oklahoma Climatological Survey, State Department of Agriculture, Food, and Forestry, Agricultural Statistics Service, U.S. Army Corps of Engineers, U.S. Department of Agriculture/Forest Service, U.S. Geological Survey, Western Drought Coordination Council, and National Drought Mitigation Center. For more information, visit [www.owrb.state.ok.us](http://www.owrb.state.ok.us) and <http://www.mesonet.ou.edu/public>.