OKLAHOMA MONTHLY CLIMATE SUMMARY
JUNE 2008

OKLAHOMA CLIMATOLOGICAL SURVEY

June was a very active weather month in Oklahoma with a large number of severe storm reports. Heavy rains in all but the extreme northwest and south meant a wet month as well – the 25th wettest June on record, in fact. The Oklahoma Panhandle continued without significant precipitation, still mired in severe drought conditions. The month also finished as the 32nd warmest June on record. There were 34 reported instances of hail at least two inches or greater during the month to go along with 23 instances of winds greater than 70 mph. Not to be outdone, there were 25 reports of flooding, most of which occurred in northeastern Oklahoma.

Precipitation

The wetness of the northeast far overshadowed the rainfall of the rest of the state. The average rainfall in that region was more than six inches above normal and the 4th wettest June since 1895. In contrast, the Panhandle region received an average of a little over an inch, more than an inch below normal and the 19th driest on record for that section of the state. The only dry areas other than the Panhandle were from the southern sections of the state. Boise City had the state's lowest rain total with 0.48 inches while Claremore led the state with 13.58 inches. The Panhandle's year-to-date total was more than six inches below normal which ranked as the 4th driest such period on record. The northeast was more than 14 inches above normal and experienced its 2nd wettest January-June on record.

Temperature

June was undeniably warm despite all the rainfall and finished more than a degree above normal. The bulk of that warmth came from the southwestern one-half of the state which was between 1-3 degrees above normal. The northeast was generally near-normal or below-normal. The month's highest temperature of 108 degrees was recorded at Altus, Beaver and Slapout. The lowest temperature of 43 degrees was reported at Beaver. The year is still above normal, but by less than a half of a degree, and ranked as the 40th warmest on record.

June 2008 Statewide Extremes

Description	Extreme	Station	Day
High Temperature	108°F	Beaver, Altus	2,3
Low Temperature	43°F	Boise City	6
High Precipitation	13.58 in.	Claremore	
Low Precipitation	0.48 in.	Boise City	

June Daily Highlights

June 1-4: June started off hot and steamy with temperatures rising close to 110 degrees at several locations during the first four days. The state's highest recorded temperature of 108 degrees occurred three separate times during this period. Maximum temperatures were not the only culprit as Oklahoma City set records for warmest minimum temperatures on three consecutive days. The heat fueled powerful thunderstorms as well. Severe storms struck northwestern Oklahoma on the first and the third, dropping hail to the size of softballs near Slapout in addition to many more scattered reports of large hail. Winds gusted to over 70 mph in several locations. Most of the heavy rains fell in the northeast, however, with 1-2 inches being reported in that region.

June 5-9: The fifth began with strong winds of over 50 mph in the northwest and ended with more severe storms in the north. These storms contained high winds as their main severe threat. Wind gusts of over 80 mph were reported at three locations with many more reports of over 70 mph. North central Oklahoma saw two days with heavy rains. The Oklahoma Mesonet site at Lahoma recorded over nine inches of rain during the period. Nearly half of that total fell during a heavy downpour on the fifth. Most of the state saw from 1-3 inches of rain during these five days, but a significant portion of the state saw between 3-6 inches. Flooding was reported across a large area of northeastern Oklahoma on the ninth due to heavy rains in that region.

June 10-12: This three-day period was totally free of rain, a welcome respite from the previous stormy conditions. Lows on the 10th were quite mild in the 50s and 60s. High Temperatures throughout the period were mostly in the 90s.

June 13-20: These eight days were marked once again by plenty of severe weather. Large hail and high winds took their toll once again, although flooding was the main severe culprit in the northeast. The largest hail reported by the public was 3.25 inches, about the size of a tea cup. The heaviest rains were once again in the northeast where 3-6 inches fell, hence the flooding reports. Storms occurred each day, but by the afternoon of the 20th the weather had begun to quiet down.

June 21-26: These six days were much more tranquil – and dry – with only a few showers scattered about. Highs ran in the 90s for the most part, although a few triple-digit temperatures did sneak in at a few places. A heavy storm managed to drop well over two inches of rainfall near Vinita.

June 27-30: More storms were on tap for the end of the month, although these were a bit tamer and struck primarily in southeastern Oklahoma. That area received between 2-3 inches, on average. Other than that, the period was seasonable with lows in the 60s and 70s and highs in the 80s and 90s.

June 2008 Statewide Statistics

Temperature

	Average	Depart.	Rank (1895-2008)
Month (Jun)	77.8 ºF	1.3ºF	32nd Warmest
Year-to-Date (Jan-Jun)	55.6ºF	0.4ºF	40th Warmest

Precipitation

	Total	Depart.	Rank (1895-2008)
Month (Jun)	5.63 in.	1.37 in.	25th Wettest
Year-to-Date (Jan-Jun)	21.86 in.	2.71 in.	20th Wettest

Depart. = Departure from 30-year normal

Record Event Reports

Description	Day	Location	Record	Previous Record	Year
Warmest Minimum Temperature (tied)	2	Oklahoma City	74	74	1980
Warmest Minimum Temperature	3	Oklahoma City	76	75	1925
Warmest Minimum Temperature	4	Oklahoma City	78	75	1911
Warmest Minimum Temperature (tied)	7	Oklahoma City	78	78	1980
Daily Rainfall	9	Oklahoma City	3.04 inches	2.56 inches	1995
Daily Rainfall	16	Tulsa	2.20 inches	2.09 inches	2004
Coolest Minimum Temperature	30	McAlester	59	61	2006

June 2008 Severe Weather

Hail (2 inches in diameter or greater)

Size (in.)	Location	County	Day
2.75	1 N Ochelata	Washington	1
2.50	Mannford	Creek	1
4.50	8 NW Slapout	Beaver	3
3.75	9 NNW Logan	Beaver	3
3.75	8 NW Slapout	Beaver	3
3.50	Laverne	Harper	3
3.00	5 W Laverne	Harper	3
3.00	3 W Laverne	Harper	3
2.75	2 W Laverne	Harper	3
2.75	8 NW Slapout	Beaver	3
2.75	8 NNW Logan	Beaver	3
2.75	7 N Slapout	Beaver	3
2.50	7 NW Slapout	Beaver	3
2.50	8 NW Slapout	Beaver	3
2.50	4 N Slapout	Beaver	3
2.75	6 W Arnett	Ellis	8
2.75	9 S Shattuck	Ellis	8
2.75	Harmon	Ellis	8
2.75	5 S Shattuck	Ellis	8
2.00	4 W Mutual	Woodward	8
2.75	3 N Braman	Kay	13
2.75	Oklahoma City	Oklahoma	13
2.75	2 E Tuttle	Grady	13
2.00	Moore	Cleveland	13
3.25	5 S Shattuck	Ellis	14
2.75	4 S Shattuck	Ellis	14
2.50	2 S Shattuck	Ellis	14
2.75	Willow	Greer	16
2.00	Willow	Greer	16
2.00	2 SE Luther	Oklahoma	16
2.75	2 N Kenton	Cimarron	19
2.75	Kenton	Cimarron	19
2.75	7 N Black Mesa Park	Cimarron	19
2.00	Pyramid Corners	Craig	20

Wind Gusts (70 mph or greater)

Speed (m.p.h)	Location	County	Day
73	Red Rock Mesonet	Noble	1
75	21 N Mooreland	Woodward	3
74	21 N Mooreland	Woodward	3
73	6 NW Kaw City	Kay	3
70	Blackwell	Kay	3
82	6 S Cordell	Washita	5
80	5 W Blair	Greer	5

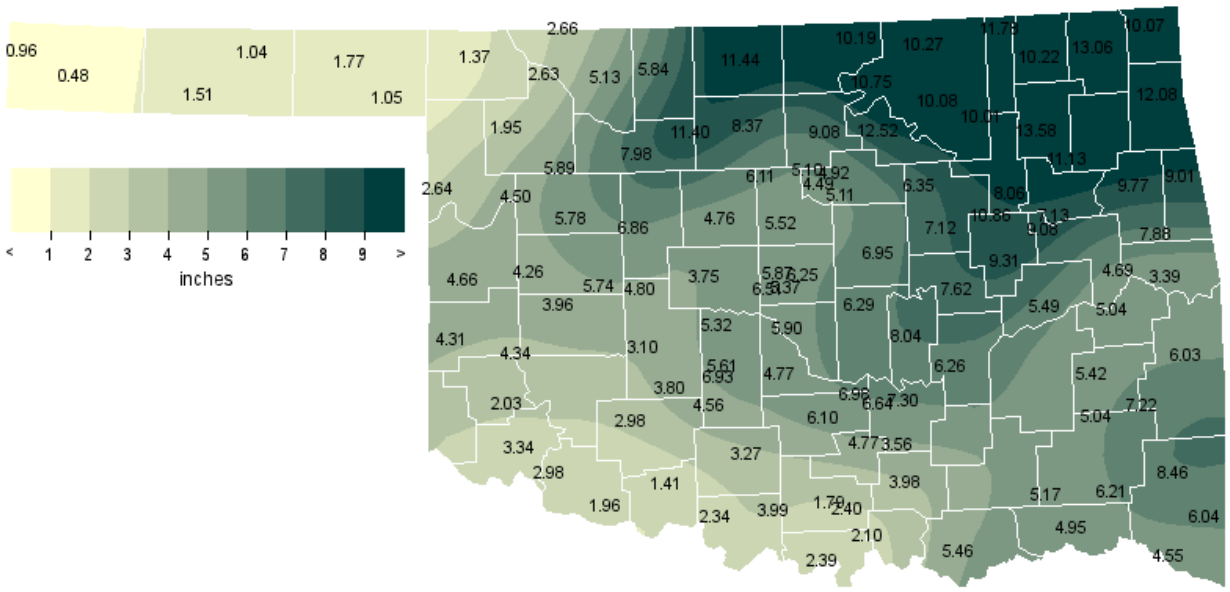
Wind (cont.)

80	3 W Okarche	Canadian	5
75	5 SW Butler	Custer	5
75	3 S Anadarko	Caddo	5
74	5 W Medford	Grant	5
71	4 WNW Bessie	Washita	5
70	8 E Orienta	Major	5
70	Altus	Jackson	5
71	5 S Adair	Mayes	6
72	6 SE Mutual	Woodward	8
70	Reydon	Roger Mills	9
75	Fort Towson	Choctaw	14
71	4 N Hinton	Caddo	15
70	3 E Elk City	Beckham	16
75	10 N Perryton	Beaver	18
70	4 E Braman	Kay	18
70	Hollis	Harmon	19

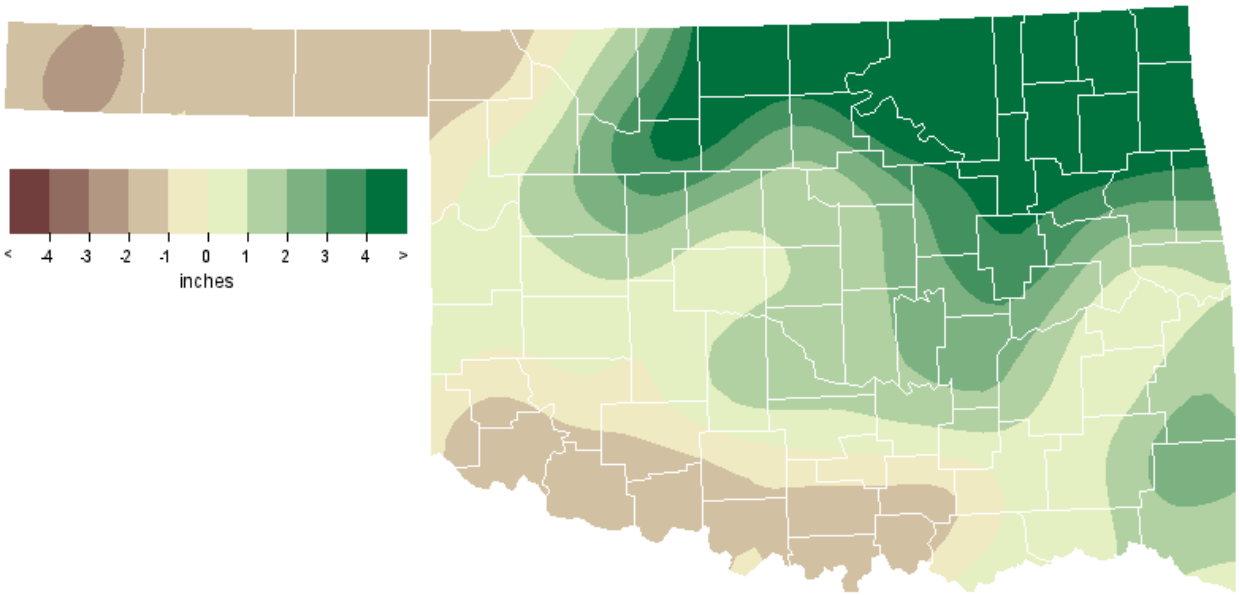
Flooding

Location	County	Day
Sapulpa	Creek	1
Carrier	Garfield	5
Tulsa	Tulsa	6
5 N Cheyenne	Roger Mills	8
2 W Big Cabin	Craig	9
5 E Bartlesville	Washington	9
5 E Hominy	Osage	9
5 N Nowata	Nowata	9
6 SW Big Cabin	Mayes	9
8 N Oneta	Wagoner	9
8 NW Claremore	Rogers	9
Bartlesville	Washington	9
Owasso	Tulsa	9
W Westport	Pawnee	9
Wewoka	Seminole	9
2 W Bristow	Creek	16
5 SSW Broken Arrow	Tulsa	16
7 SE Hectorville	Okmulgee	16
Claremore	Rogers	16
Watova	Nowata	16
Edmond	Oklahoma	17
6 SW Tulsa	Tulsa	18
Fort Gibson	Muskogee	20
Muskogee	Muskogee	20
Vinita	Craig	23

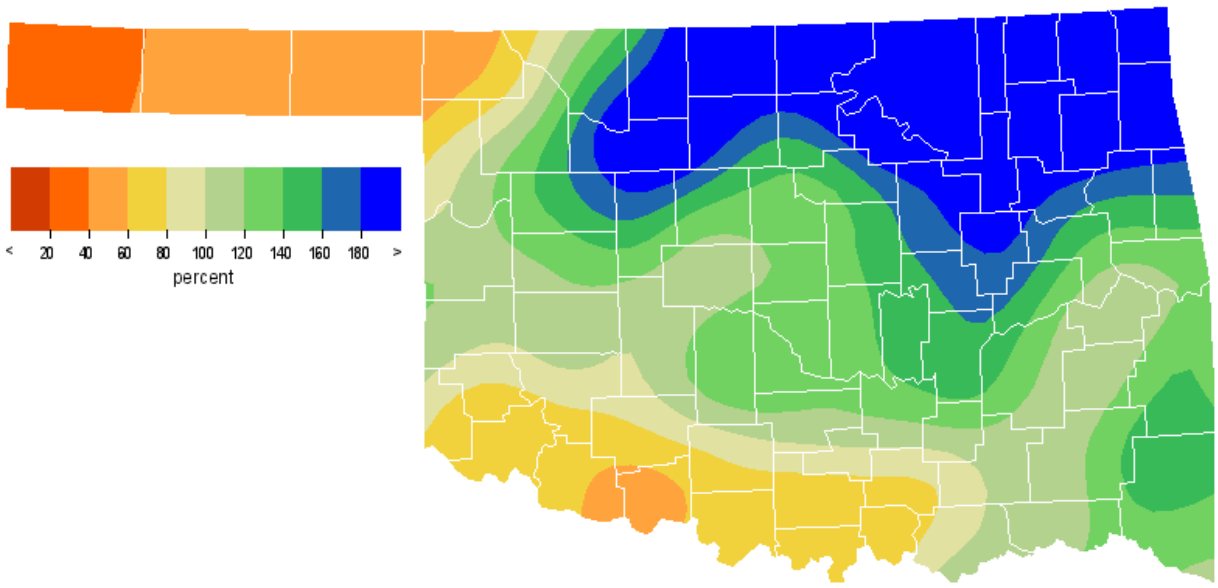
June 2008 Observed Precipitation



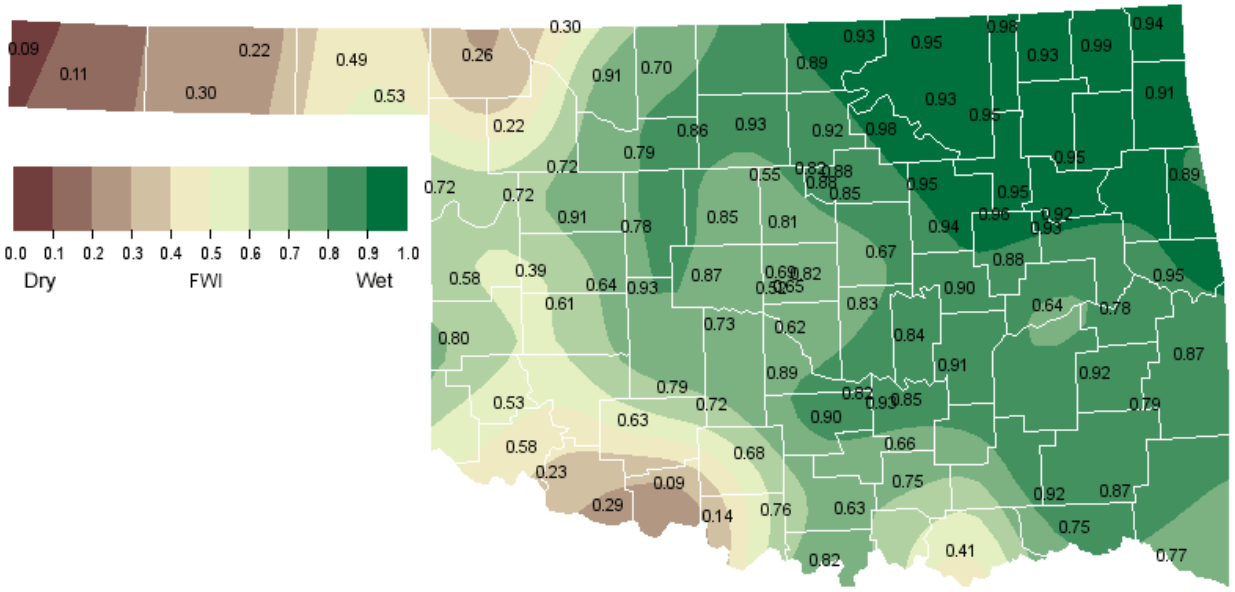
June 2008 Departure from Normal Precipitation



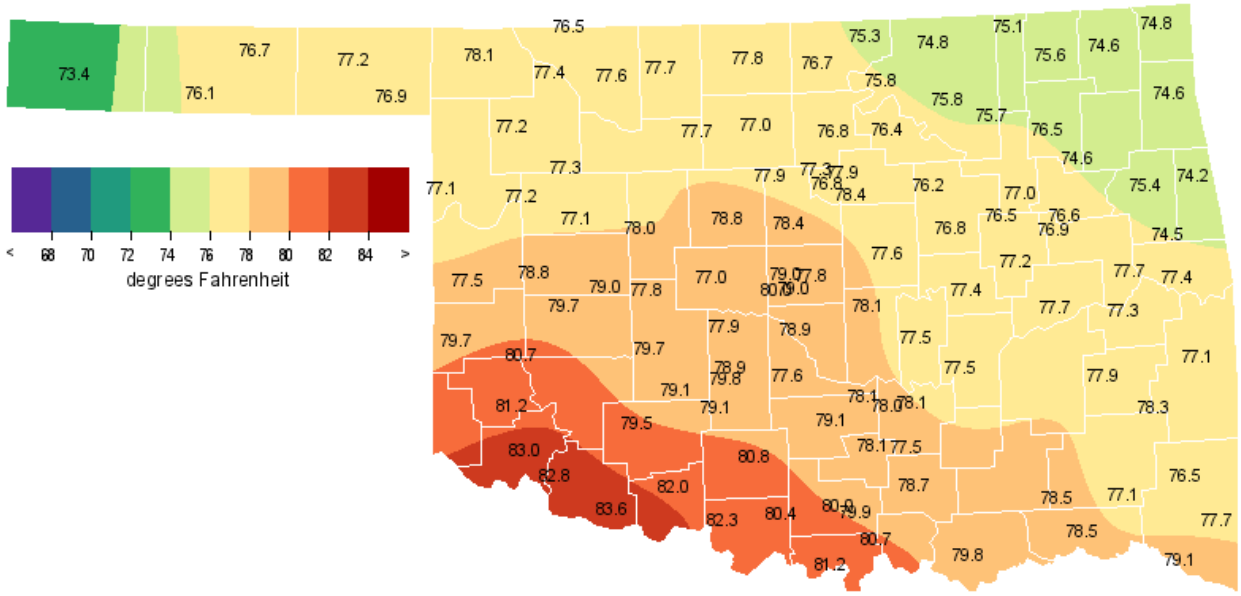
June 2008 Percent of Normal Precipitation



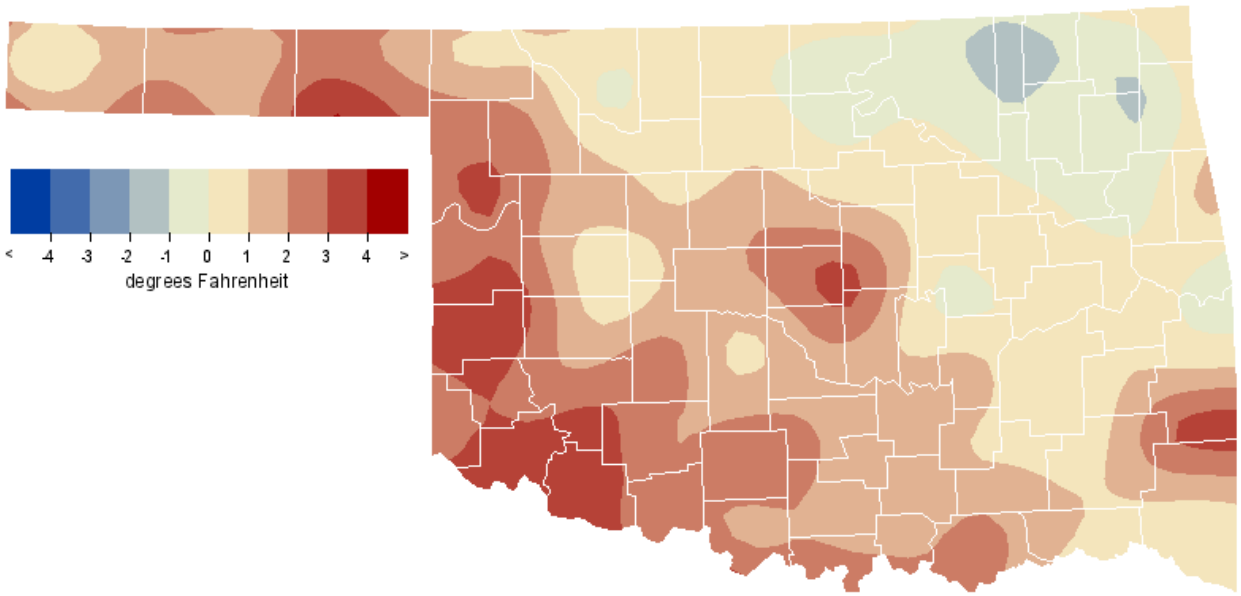
June 2008 Average Soil Moisture at 25cm



June 2008 Average Temperature



June 2008 Departure from Normal Temperature



Mesonet Monthly Summary for June 2008

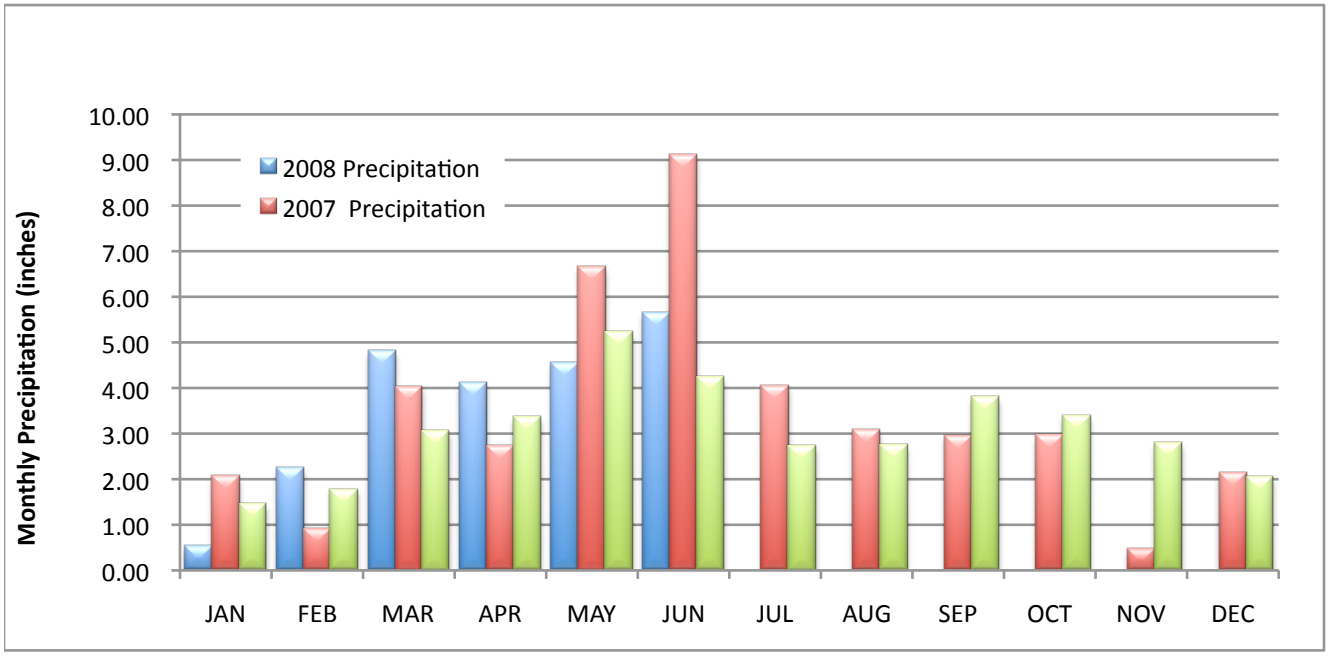
NAME	MEAN TEMP	HIGH TEMP	HIGH DAY	LOW TEMP	LOW DAY	HDD	CDD	TOT PPT	HIGH 24-HR	HIGH DAY
PANHANDLE										
Arnett	77.1	105	2	55	6	0	363	2.64	2.10	8
Beaver	77.2	108	2	53	6	0	367	1.77	.44	18
Boise City	73.3	102	2	43	6	0	249	.48	.37	21
Buffalo	78.2	107	2	52	14	0	395	1.37	.72	3
NORTH CENTRAL										
Alva	77.6	102	4	56	29	0	378	5.13	2.25	8
Blackwell	76.6	94	22	57	10	0	348	*****	*****	***
Breckinridge	77.0	96	3	57	29	0	360	8.37	2.24	9
Cherokee	77.7	101	4	56	29	0	381	5.84	2.00	17
Fairview	*****	***	***	***	***	****	****	7.98	2.74	8
Freedom	77.5	102	4	56	6	0	374	2.63	1.45	17
Lahoma	77.7	101	3	56	10	0	381	11.40	4.30	5
NORTHEAST										
Bixby	76.9	92	22	59	9	1	358	8.06	2.57	16
Burbank	75.8	92	22	57	10	0	323	10.75	2.35	9
Claremore	76.5	92	22	61	10	0	345	13.58	3.40	9
Copan	75.2	92	22	59	10	0	305	11.78	2.61	9
Foraker	74.8	92	22	58	10	0	294	10.27	2.37	9
Inola	74.7	90	22	57	10	1	292	11.13	3.15	9
Jay	74.5	88	25	57	10	2	288	12.08	3.33	9
Miami	74.9	89	22	59	30	0	297	10.07	2.71	20
WEST CENTRAL										
Bessie	79.7	102	3	56	10	0	440	3.96	3.54	9
Butler	78.8	102	3	54	10	0	414	4.26	1.55	9
Camargo	77.2	100	3	52	6	0	367	4.50	2.90	8
Cheyenne	77.6	100	3	56	9	0	377	4.66	2.41	8
Erick	79.7	107	3	51	6	0	442	4.31	1.72	9
CENTRAL										
Acme	79.1	95	27	56	30	0	423	4.56	2.32	9
Bowlegs	77.6	93	15	56	9	0	377	8.04	5.12	9
Bristow	76.8	93	22	54	10	2	354	7.12	2.25	9
Lake Carl Blac	77.3	94	22	56	10	0	369	5.10	1.65	9
Chandler	77.6	92	22	56	10	0	378	6.95	2.90	9
Chickasha	78.8	95	3	56	30	0	415	5.61	3.85	9
El Reno	77.0	93	3	55	30	0	359	3.75	2.39	9
Guthrie	78.5	94	22	58	10	0	404	5.52	3.20	17
Kingfisher	78.8	98	3	53	10	0	413	4.76	1.74	9
Marena	76.8	93	22	55	10	0	355	4.49	1.64	9
Minco	77.9	93	27	56	10	0	388	5.32	4.14	9
Marshall	77.9	97	3	53	10	0	387	6.11	1.81	8
EAST CENTRAL										
Calvin	77.5	92	22	58	30	0	376	6.26	4.02	9
Cookson	74.6	88	22	54	10	1	288	7.88	2.43	9
Eufaula	77.6	92	15	57	10	0	378	5.49	1.79	9
Haskell	77.0	92	22	57	10	0	359	9.08	2.51	16
Hectorville	76.5	90	22	59	10	0	346	10.86	3.83	16
McAlester	77.8	92	15	58	30	0	386	5.79	2.58	9
Okmulgee	77.2	92	22	57	10	1	365	9.31	2.32	16
SOUTHWEST										
Altus	83.1	108	3	57	10	0	542	3.34	1.63	19
Apache	79.0	98	3	56	10	0	421	3.80	1.72	9
Fort Cobb	79.7	100	3	56	10	0	441	3.10	2.25	9
Grandfield	83.6	103	16	60	10	0	557	1.96	.96	5
Hinton	77.9	96	3	56	10	0	387	4.80	2.55	9
Hobart	*****	***	***	***	***	****	****	*****	*****	***
SOUTH CENTRAL										
Ada	78.1	94	15	56	10	0	393	7.30	4.16	9
Ardmore	80.0	96	28	61	30	0	449	2.40	1.58	9
Burneyville	81.2	98	15	60	30	0	486	2.39	1.36	29
Byars	78.1	92	15	57	9	0	393	6.98	4.77	9
Centrahoma	78.8	93	15	59	30	0	413	6.17	3.56	9
Durant	79.7	94	28	64	10	0	442	5.46	2.26	28
Fittstown	77.5	93	22	59	30	0	375	3.56	2.14	9
Ketchum Ranch	80.8	98	15	59	30	0	474	3.27	1.38	9
Lane	*****	***	***	***	***	****	****	*****	*****	***
SOUTHEAST										
Antlers	78.6	93	15	58	30	0	407	5.17	2.08	9
Broken Bow	77.6	92	3	59	30	0	377	6.04	2.83	9
Clayton	*****	***	***	***	***	****	****	5.04	2.33	9
Cloudy	77.2	90	15	60	30	0	366	6.21	2.00	9
Hugo	78.5	91	15	63	30	0	405	4.95	1.74	14

NAME	MEAN TEMP	HIGH TEMP	HIGH DAY	LOW TEMP	LOW DAY	HDD	CDD	TOT PPT	HIGH 24-HR	HIGH DAY
Goodwell	76.1	106	2	46	6	0	333	1.51	1.29	20
Hooker	76.7	108	2	49	6	0	350	1.04	.68	23
Kenton	*****	***	***	***	***	****	****	.96	.34	19
Slapout	76.9	108	2	50	6	0	357	1.05	.60	27
May Ranch	76.5	99	4	57	6	0	346	2.66	1.62	17
Medford	77.8	100	3	58	10	0	384	11.44	3.39	5
Newkirk	75.3	92	22	57	10	0	310	10.19	2.36	5
Red Rock	76.8	93	22	56	10	0	354	9.08	2.11	8
Seiling	77.3	101	3	55	30	0	370	5.89	2.37	8
Woodward	77.2	99	27	56	6	0	366	1.95	.86	17
Nowata	75.6	92	22	57	10	****	****	10.22	3.66	9
Pawnee	76.5	92	22	56	10	0	344	12.52	2.43	1
Porter	76.6	91	22	58	10	0	348	7.13	2.36	9
Pryor	*****	***	***	***	***	****	****	*****	*****	***
Skiatook	75.8	90	22	57	10	0	323	10.01	3.64	9
Vinita	74.6	90	22	58	14	0	287	13.06	3.15	9
Wynona	75.8	92	22	56	10	0	325	10.08	2.24	8
Putnam	77.1	100	3	57	9	0	364	5.78	1.87	5
Retrop	80.7	107	3	55	6	0	472	4.34	1.45	9
Watonga	77.9	100	3	58	10	0	387	6.86	2.27	9
Weatherford	79.0	102	3	56	10	0	420	5.74	2.99	9
Ninnekah	79.7	97	26	58	10	0	442	6.93	3.38	9
Norman	78.9	93	15	58	10	0	417	5.90	3.11	9
Oilton	76.2	93	22	55	30	1	337	6.35	2.56	9
OKC East	78.9	95	22	58	10	0	418	5.37	3.16	9
OKC North	79.0	94	3	58	10	0	420	5.87	3.41	9
OKC West	80.0	95	3	59	10	0	450	6.51	3.35	9
Okemah	77.4	91	22	56	10	0	371	7.62	2.60	9
Perkins	78.3	94	3	57	10	0	400	5.11	2.26	9
Shawnee	78.1	93	15	58	10	0	394	6.29	2.77	9
Spencer	77.8	93	22	57	10	0	383	6.25	3.76	9
Stillwater	77.8	94	22	57	10	0	385	4.92	1.72	9
Washington	77.6	92	3	55	10	0	379	4.77	2.58	9
Sallisaw	77.5	91	2	58	10	0	374	3.39	1.16	9
Stigler	77.3	91	15	58	10	0	369	5.04	1.97	9
Stuart	77.7	92	22	58	10	0	380	6.76	3.32	9
Tahlequah	75.4	89	22	57	10	2	313	9.77	2.76	9
Webbers Falls	77.7	91	22	59	30	0	381	4.69	1.85	9
Westville	74.2	87	22	56	10	2	279	9.01	2.51	9
Hollis	*****	***	***	***	***	****	****	*****	*****	***
Mangum	81.2	107	3	50	10	0	485	2.03	1.03	16
Medicine Park	79.6	98	3	57	10	0	438	2.98	1.77	5
Tipton	82.8	103	3	60	10	0	534	2.98	1.40	5
Walters	82.1	101	27	58	30	0	512	1.41	.91	5
Madill	80.6	97	28	61	30	0	468	2.10	.88	9
Newport	80.0	97	27	61	30	0	451	1.79	.96	9
Pauls Valley	79.1	94	15	57	10	0	422	6.10	3.42	9
Ringling	80.4	97	27	61	10	0	463	3.99	1.46	9
Sulphur	78.1	92	15	59	30	0	393	4.77	2.40	9
Tishomingo	78.7	94	28	60	30	0	410	3.98	1.51	17
Vanoss	78.0	93	15	58	10	0	390	6.64	4.64	9
Waurika	82.3	100	15	60	10	0	518	2.34	.75	28
Idabel	79.1	93	7	62	30	0	424	4.55	1.82	9
Mt Herman	76.6	90	22	57	30	0	348	8.46	4.14	14
Talihina	78.3	93	15	57	30	0	398	7.22	3.01	28
Wilburton	77.9	92	15	57	30	0	387	5.42	1.83	9
Wister	77.1	91	15	58	30	0	363	6.03	1.82	9

June 2008 Mesonet Precipitation Comparison

Climate Division	Precipitation (inches)	Departure from Normal (inches)	Rank since 1895	Wettest on Record (Year)	Driest on Record (Year)	Jun-07
Panhandle	1.35	-1.58	19th Driest	7.70 (1962)	0.01 (1924)	2.30
North Central	6.88	2.94	13th Wettest	10.08 (2007)	0.43 (1933)	10.08
Northeast	10.77	6.15	4th Wettest	11.34 (1948)	0.08 (1933)	11.21
West Central	4.93	1.07	27th Wettest	9.25 (1989)	0.32 (1910)	6.99
Central	5.80	1.23	30th Wettest	12.96 (2007)	0.00 (1914)	12.96
East Central	7.34	2.48	19th Wettest	12.69 (1935)	0.00 (1914)	8.00
Southwest	2.93	-1.23	43rd Driest	10.57 (2007)	0.56 (1933)	10.57
South Central	4.20	-0.44	50th Wettest	9.99 (2007)	0.00 (1914)	9.99
Southeast	5.91	1.21	32nd Wettest	11.00 (1945)	0.00 (1914)	7.84
Statewide	5.63	1.37	25th Wettest	9.10 (2007)	0.46 (1933)	9.10

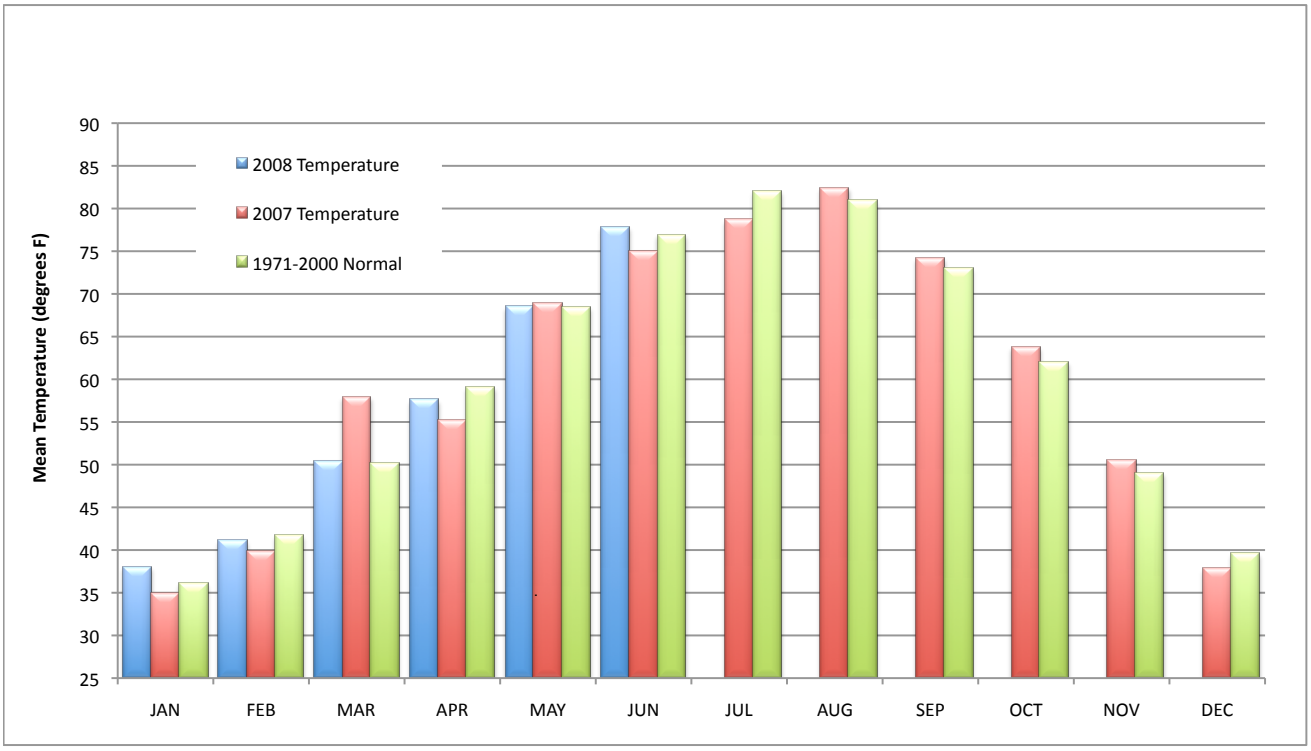
2007 and 2008 Statewide Precipitation Monthly Totals vs. Normal



June 2008 Mesonet Temperature Comparison

Climate Division	Average Temp (F)	Departure from Normal (F)	Rank since 1895	Hottest on Record (Year)	Coldest on Record (Year)	Jun-07 (F)
Panhandle	76.5	2.1	25th Warmest	82.0 (1953)	67.7 (1903)	71.8
North Central	77.1	0.3	55th Warmest	85.7 (1953)	69.7 (1903)	74.2
Northeast	75.6	-0.1	56th Warmest	83.7 (1953)	68.9 (1903)	75.2
West Central	78.6	2.2	26th Warmest	85.6 (1953)	69.1 (1903)	73.8
Central	78.1	1.3	30th Warmest	84.4 (1953)	69.9 (1903)	75.7
East Central	76.6	0.4	49th Warmest	84.4 (1953)	69.8 (1903)	76.0
Southwest	81.0	2.6	18th Warmest	86.7 (1953)	71.5 (1903)	75.6
South Central	79.5	1.8	23rd Warmest	85.2 (1953)	71.1 (1903)	76.5
Southeast	77.9	1.5	35th Warmest	83.9 (1953)	70.3 (1903)	76.5
Statewide	77.8	1.3	32nd Warmest	84.6 (1953)	69.8 (1903)	75.0

2007 and 2008 Statewide Temperature Monthly Averages vs. Normal



Mesonet Extremes for June 2008

Climate Division	High Temp (F)	Day	Station	Low Temp (F)	Day	Station	High Monthly Rainfall (inches)	Station	High Daily Rainfall (inches)	Day	Station
Panhandle	108	2nd	Beaver	43	6th	Boise City	2.64	Arnett	2.10	8th	Arnett
North Central	102	4th	Freedom	55	30th	Seiling	11.44	Medford	4.30	5th	Lahoma
Northeast	92	22nd	Burbank	56	10th	Pawnee	13.58	Claremore	3.66	9th	Nowata
West Central	107	3rd	Retrop	51	6th	Erick	6.86	Watonga	3.54	9th	Bessie
Central	98	3rd	Kingfisher	53	10th	Marshall	8.04	Bowlegs	5.12	9th	Bowlegs
East Central	92	22nd	Haskell	54	10th	Cookson	10.86	Hectorville	4.02	9th	Calvin
Southwest	108	3rd	Altus	50	10th	Mangum	4.80	Hinton	2.55	9th	Hinton
South Central	100	15th	Waurika	56	10th	Ada	7.30	Ada	4.77	9th	Byars
Southeast	93	15th	Antlers	57	30th	Wilburton	8.46	Mt Herman	4.14	14th	Mt Herman
Statewide	108	2nd	Beaver	43	6th	Boise City	13.58	Claremore	5.12	9th	Bowlegs

July Climatological Outlook

July in Oklahoma means summer. By the beginning of the month, the jet stream and its accompanying weather systems have retreated to the U.S.-Canadian border. The western arm of a broad area of high pressure at the earth's surface, centered in the central Atlantic Ocean, has migrated northward and spreads across the state. Winds are persistently from the south, but not as strong as during preceding months. As a result, the seventh month of the year is the Oklahoma's warmest with an average temperature of 82 degrees and is the 4th driest month with a statewide-averaged precipitation of 2.73 inches.

Temperature
Mean: 82.0 degrees
Hottest June: 1954, 88.6 degrees
Coolest June: 1906, 76.4 degrees
Hottest location: Waurika, 85.1 degrees
Coolest location: Boise City, 77.2 degrees
Hottest recorded: 120 degrees, Alva, July 18, 1936
Altus, July 19, 1936
Tishomingo, July 26, 1943
Coldest recorded: 41 degrees, Goodwell, July 15, 1915

Oklahoma's hottest July, at least since record keeping began in 1892, occurred in 1954. That month produced the highest statewide-averaged temperature (88.6 degrees) of any month during the period of record. The thermometer indicated 120 degrees at Alva July 18, 1936, at Altus July 19, 1936, and at Tishomingo July 26, 1943. The lowest July statewide-averaged monthly temperature on record was 76.4 degrees in 1906. The lowest temperature ever reported in Oklahoma during July is 41 degrees at Goodwell, July 15, 1915. Humidity, vegetation, and elevation contribute to the variations in temperature across the state. The higher elevation and somewhat drier air in the panhandle lead to cooler nights and a greater range in daily temperatures than in other parts of the state. The more humid air in the southeast typically warms less in the daytime, but also retains more heat through the night. Southwestern Oklahoma suffers the most from the heat.

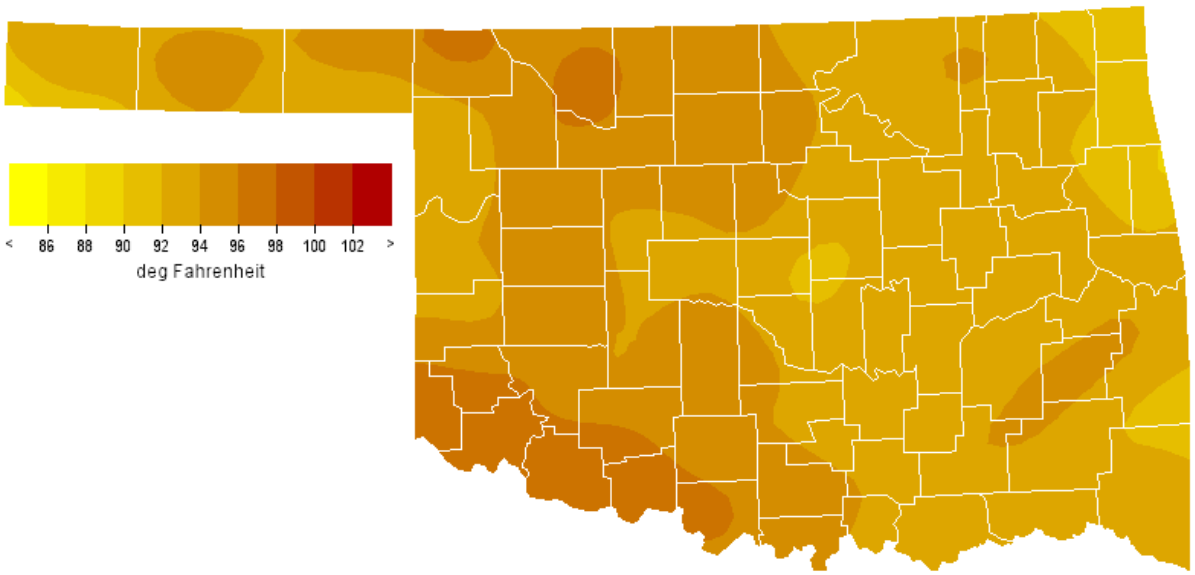
Precipitation
Precipitation Mean: 2.73 inches
Wettest year: 1950, 9.26 inches
Driest year: 1980, 0.41 inches
Wettest location: Carnasaw Fire Tower (McCurtain County), 4.50 inches
Driest location: Altus and Reydon, 1.77 inches
Most recorded: 18.83 inches, Wewoka, 1950

July precipitation, all rainfall unless you count an occasional hailstorm, is primarily a result of localized events. While the panhandle enjoys its summer rainy season and rain certainly doesn't disappear from north central Oklahoma, the forested southeast, though drier than it is in other months, still receives more precipitation than other parts of the state. The wettest July, based on a statewide average of rainfall, was 1950 (9.26 inches). The driest July occurred in 1980 (0.41 inches).

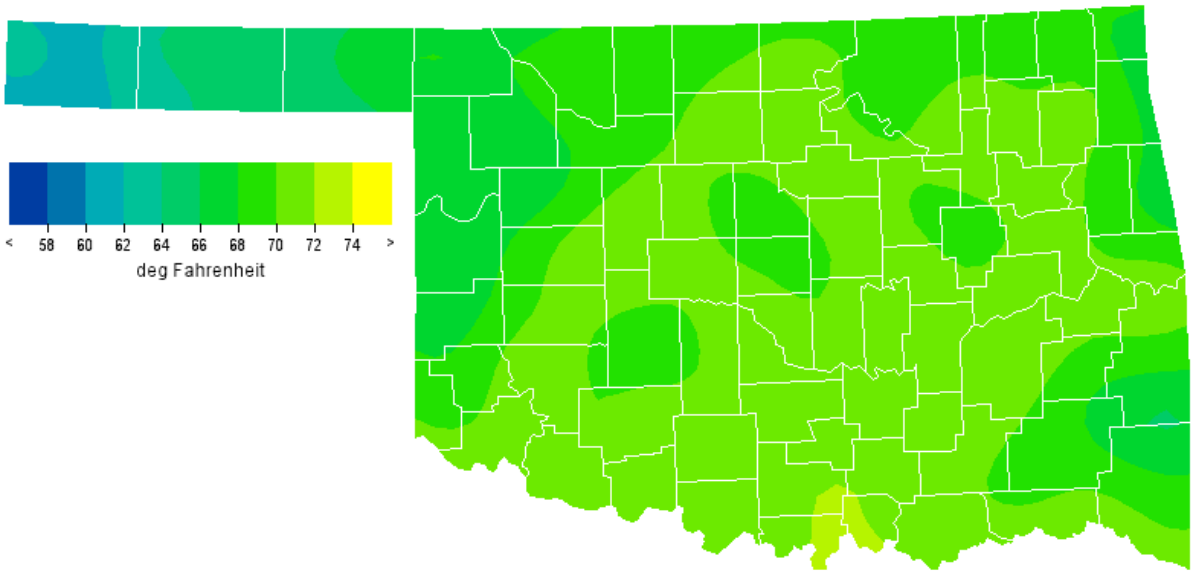
Oklahoma averages only 2.1 tornadoes in July each year. Since 1950, the July record for tornadoes is seven in 1956. Fifteen of those 52 months have been free of confirmed tornadoes. In the absence of well-organized systems, the vast majority of recorded July tornadoes have been of the weaker variety, and multiple occurrences on the same day are extremely rare. Only one fatality has been attributable to a tornado since 1950, that occurring in Murray County in 1955. Lightning, thunderstorm-induced winds, locally heavy rain, and, of course, heat are more likely to provide Oklahoma with its "weather misery" during the month.

Tornadoes
Average July Tornadoes: 2
Most: 7 (1956)

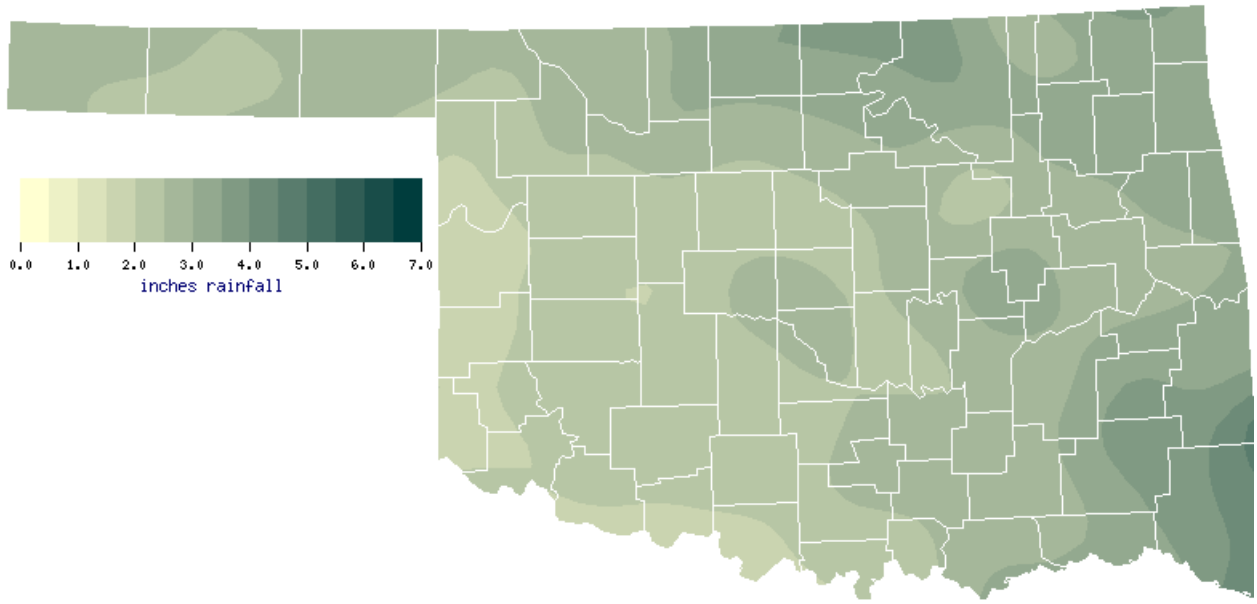
July Normal Daily Maximum Temperature (1971-2000)



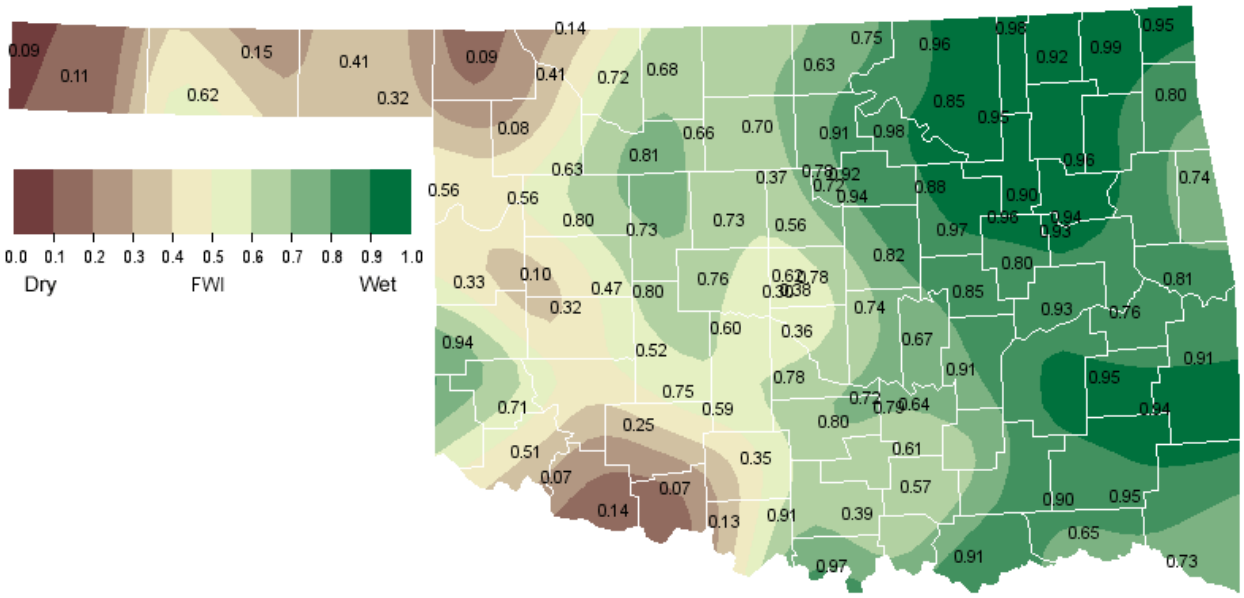
July Normal Daily Minimum Temperature (1971-2000)



July Normal Precipitation (1971-2000)



July 1, 2008 Soil Moisture Conditions at 25cm



July 2008 Drought Indices

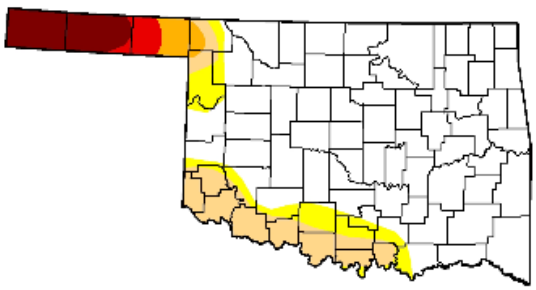
U.S. Drought Monitor

Oklahoma

July 1, 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	5.3
Last Week (06/24/2008 map)	76.2	23.8	11.9	8.6	6.8	5.3
3 Months Ago (04/08/2008 map)	81.5	18.5	11.1	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 (10/02/2007 map)	95.6	4.4	0.0	0.0	0.0	0.0
One Year Ago (07/03/2007 map)	96.9	3.1	0.0	0.0	0.0	0.0



Intensity:

- D0 Abnormally Dry
- D1 Drought - Moderate
- D2 Drought - Severe
- D3 Drought - Extreme
- D4 Drought - Exceptional

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

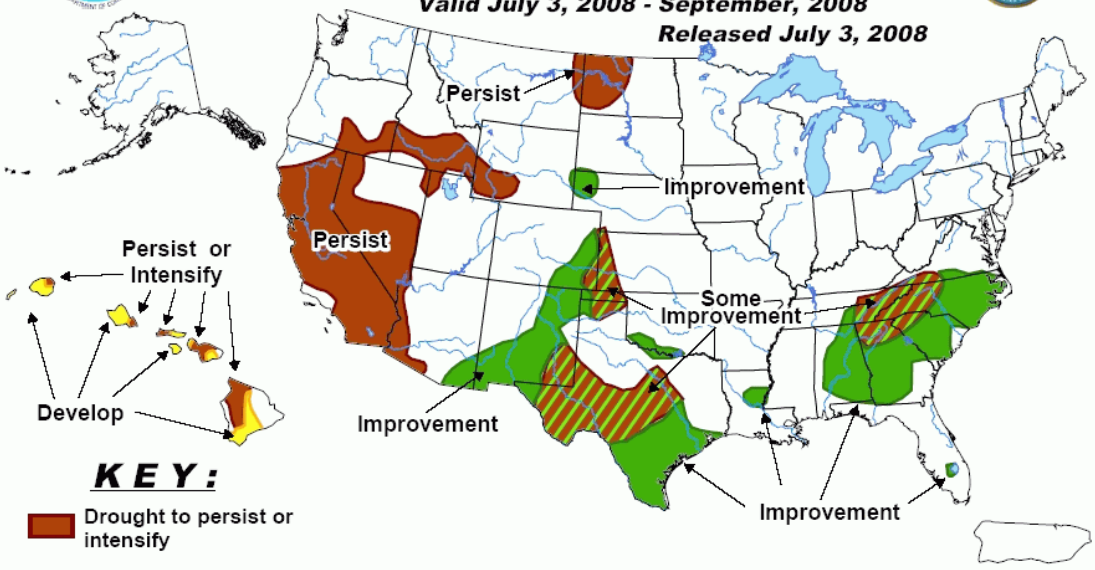
http://drought.unl.edu/dm

USDA · National Drought Mitigation Center

Released Thursday, July 3, 2008
Author: Rich Tinker, CPC/NOAA

U.S. Seasonal Drought Outlook

Drought Tendency During the Valid Period
Valid July 3, 2008 - September, 2008
Released July 3, 2008

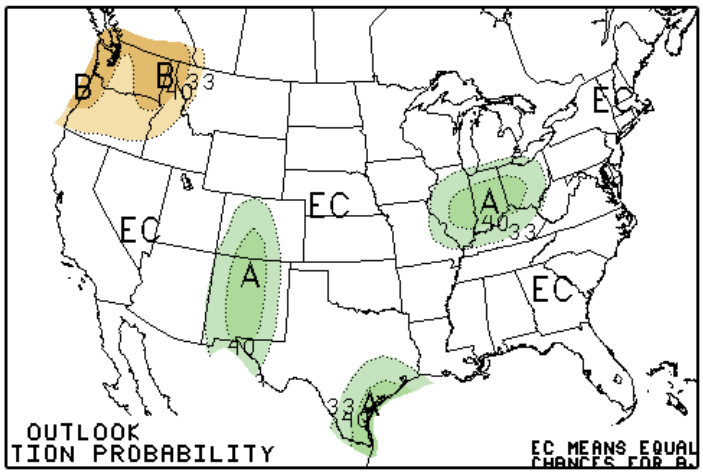


KEY:

- Drought to persist or intensify
- Drought ongoing, some improvement
- Drought likely to improve, impacts ease
- Drought development likely

Depicts large-scale trends based on subjectively derived probabilities guided by short- and long-range statistical and dynamical forecasts. Short-term events -- such as individual storms -- cannot be accurately forecast more than a few days in advance. Use caution for applications -- such as crops -- that can be affected by such events. "Ongoing" drought areas are approximated from the Drought Monitor (D1 to D4 intensity). For weekly drought updates, see the latest U.S. Drought Monitor. NOTE: the green improvement areas imply at least a 1-category improvement in the Drought Monitor intensity levels, but do not necessarily imply drought elimination.

July 2008 U.S. Precipitation Forecast



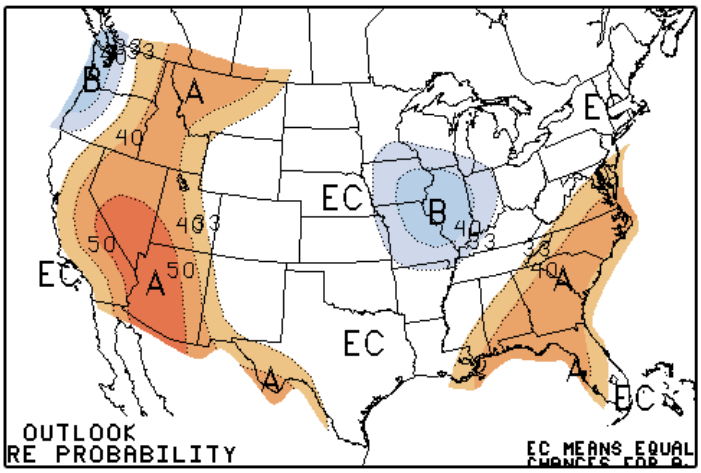
Percent Likelihood of Above or Below Average Precipitation*

5% - 10%
0% - 5%
A = Above

0% - 5%
5% - 10%
B = Below

*EC indicates no forecasted anomalies due to lack of model skill.

July 2008 U.S. Temperature Forecast



Percent Likelihood of Above and Below Average Temperatures*

10% - 20%
5% - 10%
0% - 5%
A = Above

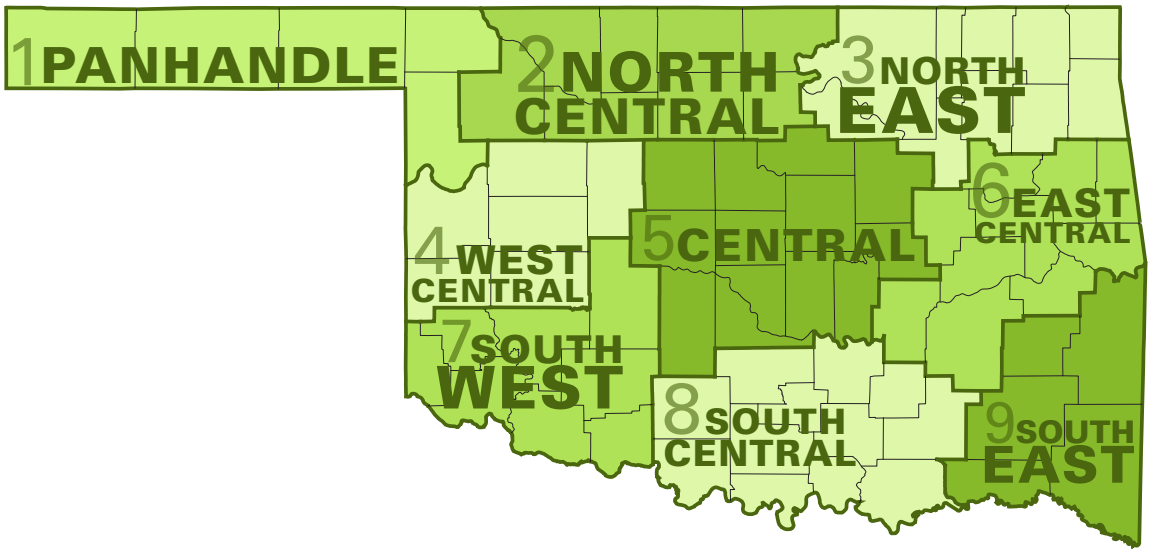
0% - 5%
5% - 10%
B = Below

*EC indicates no forecasted anomalies due to lack of model skill.

July Climate Normals

Climate Division	Max. Temperature (ºF)	Min. Temperature (ºF)	Avg. Temperature (ºF)	Precipitation (inches)
1	94.2	65.6	79.9	2.50
2	94.9	69.4	82.2	2.98
3	92.8	69.9	81.4	3.14
4	94.4	69.2	81.8	2.10
5	93.7	70.5	82.1	2.53
6	92.7	70.1	81.5	2.97
7	96.0	70.1	83.1	2.12
8	94.3	71.1	82.7	2.53
9	93.4	69.0	81.2	3.59
Statewide	94.0	69.6	81.8	2.73

Oklahoma Climate Divisions



Interpretation Information

Mean Daily Temperature: Calculated from an average of the daily maximum and minimum temperatures. Daily averages are summed for each day, and then divided by the number of valid data points – typically the number of days in the month. Although this may differ from the "true" daily average, it is consistent with historical methods of observation and comparable to the normals and extremes for stations and regions of the state.

Degree Days: Degree Days are calculated each day of the month for which there is a temperature report and the mean temperature for the day is less than (Heating Degree Days) or greater than (Cooling Degree Days) 65 degrees. Daily values are summed to arrive at a monthly total. HDD/CDD are qualitative measures of how much heating/cooling was required to maintain a comfortable indoor temperature. Missing observations may result in an artificially high or low value.

Severe Weather Reports: Only the most significant events are listed. Tornadoes of F2 or greater strength (on the 0-5 Fujita scale), hail of two inches diameter or greater, and wind speeds of 70 miles per hour or above are listed. National Weather Service defines storms as severe when they produce a tornado, hail of three-quarters inch or greater, or wind speeds above 57 miles per hour (50 knots). For additional reports, contact the Oklahoma Climatological Survey, Storm Prediction Center, or your local National Weather Service forecast office.

Soil Moisture: The soil moisture variable displayed is the Fractional Water Index (FWI), measured at a depth of 25 cm. This unitless value ranges from very dry soil having a value of 0, to saturated soils having a value of 1.

Additional Resources

Sunrise / Sunset tables
U.S. Naval Observatory**:** http://aa.usno.navy.mil/data

Severe Storm Reports
Storm Prediction Center: http://spc.noaa.gov/climo/

National Climatic Data Center (more than about 4-5 months old):
http://www4.ncdc.noaa.gov/cgi-win/wwcgi.dll?wwEvent~Storms

Seasonal Outlooks
Climate Prediction Center:
http://www.cpc.ncep.noaa.gov/products/OUTLOOKS_index.html

Climate Calendars and other local weather and climate information
Oklahoma Climatological Survey: http://climate.mesonet.org or
http://climate.ok.gov/
E-mail (ocs@ou.edu) or telephone (405/325-2541)

OKLAHOMA CLIMATOLOGICAL SURVEY

Oklahoma Climatological Survey is the State Climate Office for Oklahoma

Dr. Ken Crawford, Director and State Climatologist

Editor
Gary D. McManus, Assistant State Climatologist

Contributors
Gary D. McManus
Dr. Mark A. Shafer, Director of Climate Services
Derek S. Arndt, Associate State Climatologist
Howard Johnson, Associate State Climatologist (Ret.)

Design
Stdrovia Blackburn, Graphic Design Manager
Ada Shih, Student Graphic Designer

For more information, contact:
Oklahoma Climatological Survey
The University of Oklahoma
120 David L. Boren Blvd., Suite 2900
Norman, OK 73072-7305
tel: 405-325-2541
fax: 405-325-2550
e-mail: ocs@ou.edu
http://climate.ok.gov