

Autumn remained a reluctant visitor during October as the jet stream retreated far to the north, leaving Oklahoma to bask in near summerlike heat. According to preliminary data from the Oklahoma Mesonet, the statewide average temperature finished at 66.9 degrees, 6 degrees above normal, to rank as the fourth warmest October since records began in 1895. High temperatures reached into the 80s and 90s somewhere in the state on 30 of October's 31 days. Several stations climbed into triple-digits across the northwest on the 16th and 17th. Slapout reached 102 degrees on the 16th and Buffalo equaled that mark on the 17th – the highest temperature ever recorded in the state that late in the calendar year.

### October 2016 Statewide Extremes

Description	Extreme	Station	Day
High Temperature	102°F	Slapout, Buffalo	16, 17
Low Temperature	26°F	Kenton	7
High Precipitation	8.33 in.	Blackwell	--
Low Precipitation	0.20 in.	Kenton	--

Both readings topped the previous record of 101 degrees at Healdton back on Oct. 17, 1972. The heat extended all the way to Halloween where highs in the 80s and 90s provided pleasant trick-or-treat weather that evening. Low temperatures did dip below freezing at times, although those instances were uncommon. The month's lowest temperature of 26 degrees was recorded by the Kenton Mesonet site on the sixth. October's heat continued to add to a very warm 2016 with the first 10 months of the year ranked as the seventh warmest on record at 2.4 degrees above normal.

The state was largely devoid of significant precipitation during the month. The Mesonet's statewide average of 1.85 inches was 1.69 inches below normal to rank as the 37th driest October on record. The Panhandle suffered through its 14th driest October with an average of a quarter-inch while the southeast averaged 0.96 inches, their 15th driest at 4 inches below normal. Only the northeast, where heavy rains fell along the Kansas border from Osage to Ottawa counties, managed a surplus with an average of 4.55 inches. That exceeds normal by nearly an inch and ranks as the 33rd wettest October for that region. Blackwell led the Mesonet with 8.33 inches. Approximately 350 miles to the west, the Kenton Mesonet site barely had a sip of water with 0.02

inches. Of the 121 Mesonet sites, 47 recorded less than an inch of rainfall during the month, and 73 recorded less than 2 inches. The first two months of climatological fall, September and October, ended as the 44th driest across the state with a deficit of 1.84 inches. The Panhandle and the southeast once again stood out in the statistics with a ranking of 12th driest for both during that period. The January-October statistics look much tamer with the wet spring and early summer included, but still ended with a deficit of nearly 3 inches, the 46th driest such period on record. The year has been much drier across eastern Oklahoma where the east central, northeast and southeast regions experienced their 33rd, 45th and 37th driest January-October on record. The southwest saw its 16th wettest, however, with a surplus of over 5 inches.

### October 2016 Statewide Statistics

#### Temperature

	Average	Depart.	Rank (1895-2016)
Month (Oct)	66.8°F	5.9°F	4th Warmest
Season-to-Date (Sep-Oct)	70.9°F	4.4°F	9th Warmest
Year-to-Date (Jan-Oct)	65.3°F	2.3°F	7th Warmest

#### Precipitation

	Total	Depart.	Rank (1895-2016)
Month (Oct)	1.85 in.	-1.69 in.	37th Driest
Season-to-Date (Sep-Oct)	5.40 in.	-1.67 in.	47th Driest
Year-to-Date (Jan-Oct)	29.26 in.	-2.67 in.	59th Driest

Depart. = departure from 30-year normal

The lack of precipitation and excessive heat prompted drought's return in the northwest and intensification in the southeast. Drought was somewhat relieved in the northeast thanks to areas of heavy rain, but dry conditions spread from the far western Panhandle through northwestern Oklahoma. At the beginning of the month, 19 percent of the state was considered in at least moderate drought by the U.S. Drought Monitor, and 23 percent was considered to be abnormally dry. By month's end, those amounts had risen to 25 percent and 28 percent, respectively.

## OCTOBER 2016 DAILY SUMMARIES

**OCTOBER 1-6:** October took off with increasing temperatures and an increase in daily rainfall amounts. The warmest temperatures in the state climbed from 88 degrees in Hooker to 95 degrees in Freedom over the six-day stretch. The coolest maximum temperatures increased from the mid-70s to the low 80s from the 1st through the 3rd. As the warm front stalled out, some areas were only able to heat up into the mid-low 70s the remaining three days. The highest minimum temperatures increased from 60 degrees to 73 degrees. The coolest temperatures were 42 degrees in Nowata on the 1st, 45 degrees in Eva on the 2nd, 48 degrees in Nowata on the 3rd, 41 degrees in Kenton on the 4th, 31 degrees in Kenton on the 5th, and 37 degrees in Eva on the 6th. The highest reported daily rainfall amounts increased from trace amounts on the 1st to 7.15 inches in Blackwell on the 6th. Half an inch to nearly three inches was common in north-central, northeast, and central Oklahoma on the 4th and in east-central and northeast Oklahoma on the 5th. Some of the passing rainfall was accompanied with strong to severe thunderstorms. Flooding was reported in Texas County on the 2nd; in Garfield, Oklahoma, and Grant County on the 4th; and in Kay, Grant, and Noble County on the 6th. Waukomis measured a 70 mph wind gust on the 4th. On the 6th, 2.50 inch hail fell in Elk City and 2.50 – 2.75 inch hail fell in Seiling. The highest daily average wind speeds in the state were 13 mph, 15 mph, 24 mph, 22 mph, 14 mph, and 20 mph each consecutive day. Aside from the 70 mph gust in Waukomis, the next highest wind gust was 62 mph in Foraker on the 4th and in Ketchum Ranch on the 6th.

**OCTOBER 7-8:** A strong cold front entered the state which brought much cooler temperatures to the area. The highest temperature a Mesonet site reached was 82 degrees in Broken Bow on the 7th and 81 degrees in Buffalo on the 8th. This was nearly 15 degrees cooler than the previous day's highest maximums. The lowest maximum temperature recorded was 63 degrees in the northeast on the 7th and 70 degrees in Watonga the following day. The highest minimum temperatures fell from 56 degrees in Idabel to a chilly 48 degrees in southeast Oklahoma over these two days. The coolest temperatures ranged from 26 degrees in Kenton to 33 degrees in Eva and Buffalo. The front stirred up additional thunderstorms and produced as much as 1.49 inches in Eufaula on the 7th before moving out of the state. Daily average wind speeds were less than 19 mph on the 7th and less than 14 mph on the 8th.

**OCTOBER 9-11:** Light showers continued, but temperatures warmed. The warmest maximum temperatures increased each day, climbing from the low 80s to the mid-90s by the 11th. The coolest daily maximum temperatures increased from 69 degrees in Cheyenne to 81 degrees in Jay and Vinita. The warmest minimum temperatures were in the upper 50s to low 60s and the coolest minimum temperatures were between 35 degrees in Wister on the 9th and 44 degrees in Antlers on the 11th. The areas that received the most rainfall were the panhandle on the 9th, northwest and north-central Oklahoma

on the 10th, and north-central and northeast Oklahoma on the 11th. The highest amounts of rainfall were between a couple tenths of an inch and half an inch. Daily average wind speeds were 2-15 mph on the 9th, 2-20 mph on the 10th, and 3-21 mph on the 11th. The highest wind gust during this period was 51 mph in May Ranch on the 11th.

**OCTOBER 12-13:** Another cold front entered northwest Oklahoma and widespread thunderstorms moved over the region. High temperatures were between 55 degrees in Kenton and 89 degrees in Durant on the 12th, and between 50 degrees in Watonga and 82 degrees in Valliant on the 13th. The highest minimum temperatures were in the mid to upper 60s and the lowest minimum temperatures were in the mid to upper 30s in the panhandle. Northeast Oklahoma received the greatest rainfall on the 12th with Miami measuring 2.92 inches, followed by Vinita with 1.84 inches and Jay with 1.32 inches. Rain intensity decreased the next day and the highest rainfall amount was .67 inches in Tipton. Daily average wind speeds were less than 18 mph on the 12th and less than 12 mph on the 13th.

**OCTOBER 14-17:** Some lingering light showers fell in eastern Oklahoma before exiting the state on the 14th. The highest amount of rainfall that day was .39 inches in Pryor. Skies cleared the following three days and a warming trend ensued. The highest temperatures in the state occurred in northwest Oklahoma and in the panhandle, increasing from 89 degrees on the 14th to 102 degrees by the 17th. The lowest maximum temperatures increased from 64 degrees in Cookson to 84 degrees in Cookson yet again three days later. The highest minimum temperatures were in eastern Oklahoma and increased from 62 degrees to 75 degrees. The coolest temperatures in the state were 41 degrees in Beaver on the 14th, 49 degrees in Boise City and Kenton on the 15th, 41 degrees in Kenton and Beaver on the 16th, and 51 degrees in Kenton and Boise City on the 17th. A number of daily temperature records were broken during this warm period which included the following: daily highest maximum temperature in Guymon on the 15th with 94 degrees; daily highest minimum temperature in Oklahoma City on the 17th with 71 degrees; daily highest maximum temperature and daily highest minimum temperature in Tulsa on the 17th with 90 degrees and 75 degrees, respectively; and daily highest minimum temperature in McAlester on the 17th with 73 degrees. Daily wind speeds were a little high, averaging less than 17 mph on the 14th, less than 24 mph on the 15th, less than 22 mph on the 16th, and less than 26 mph on the 17th.

**OCTOBER 18-20:** A cold front entered the state and moved southeast before eventually stalling out. On the 19th, showers and thunderstorms developed as a result of the passing front. The heaviest rainfall that day was in Waurika, which measured 2.73 inches. Wilburton measured the highest amount the following day with .74 inches. The highest maximum temperatures decreased from 92 degrees in Antlers and Lane on the 18th to a brisk 77 degrees in Idabel and Broken Bow

on the 20th. The lowest maximum temperatures occurred in the panhandle and fell from the low 70s to the low 60s. The highest minimum temperatures plummeted 20 degrees from 73 degrees in Talihina on the 18th to 53 degrees in Durant on the 20th. The lowest minimum temperatures were in the low-mid 30s in the panhandle. Daily average wind speeds were 4-13 mph on the 18th, 4-15 mph on the 19th, and 5-15 mph on the 20th. The highest wind gust was 46 mph in McAlester on the 19th.

**OCTOBER 21-25:** Despite a weak cold front on the 24th, the state experienced a rain-free period during these five days. As the front stalled out, dense fog formed in west-central Oklahoma. The warmest daily temperatures measured at our Mesonet sites were 82 degrees in Kenton and Eva on the 21st, 88 degrees in Hooker and Beaver on the 22nd, 86 degrees in Freedom and Durant on the 23rd and 24th, respectively, and 88 degrees in Eva and Hooker on the 25th. The lowest minimum temperatures were primarily in the low-mid 70s, except on the 21st when portions of northeast Oklahoma only warmed to the mid-60s. The highest minimum temperatures increased from 47 degrees in Durant and Medicine Park on the 21st to 65 degrees in Tulsa on the 25th. The coolest temperature during this period was 31 degrees in the panhandle on the 21st, 22nd, and 24th. The lowest minimum temperature on the 23rd was 38 degrees in Wister and the lowest minimum temperature on the 25th was a much warmer 50 degrees in Eva and Wister. The highest daily average wind speeds were 16 mph in Cheyenne on the 21st, 20 mph in Cheyenne on the 22nd, 14 mph in Boise City and Cheyenne on the 23rd, 10 mph in Boise City on the 24th, and 17 mph in Cheyenne, Beaver, and Watonga on the 25th.

**OCTOBER 26:** Strong to severe storms developed in eastern and south-central Oklahoma on the 26th. In addition to quarter sized hail in some areas, severe wind gusts between 70 and 80 mph were reported in Sulphur. The top three Mesonet rainfall amounts were 1.28 inches in Sulphur, 1.00 inch in Perkins, and .95 inches in Stillwater. High temperatures were between 69 degrees in Eufaula and Westville and 88 degrees in Eva and Hooker. Lows were between 43 degrees in Eva and 62 degrees in central and northeast Oklahoma. Daily average wind speeds were generally less than 10 mph.

**OCTOBER 27-29:** Rainfall was negligible, but fog returned to central, north-central, and southern Oklahoma on the 27th. Maximum temperatures increased from a range between 66 and 86 degrees on the 27th to a range between 80 and 94 degrees on the 29th. The highest minimum temperatures were in the low to mid-60s and the lowest minimum temperatures were between the upper 30s and mid-upper 40s. More specifically, the warmest temperature reading during this period was 94 degrees on the 29th and occurred at many of the Mesonet's panhandle sites. The coolest temperature was 39 degrees in Eva on the 27th. Guymon broke its daily high temperature record on the 27th and 28th with 84 and 91 degrees, respectively. McAlester broke its daily high

temperature record on the 28th as well with 85 degrees and again on the 29th with 86 degrees. Daily average wind speeds were less than 14 mph on the 27th, 3-18 mph on the 28th, and 4-19 mph on the 29th. The highest wind gust was 41 mph in Breckinridge on the 29th.

**OCTOBER 30-31:** October ended with one last dry cold front moving into the region. The highest maximum temperatures were 89 degrees in Broken Bow, Valliant, and Idabel on the 30th and 92 degrees in Beaver and Slapout on the 31st. The lowest maximum temperatures took a significant dip post-cold front, measuring 62 degrees in Talihina on the 30th before climbing back up to 82 degrees in Fittstown, Jay, Vinita, and Shawnee the following day. The highest minimum temperature was 62 degrees both days and the lowest daily minimum temperature increased from 36 degrees in Kenton to 45 degrees in Erick and El Reno. McAlester broke one last record on the 31st which was the daily highest temperature record at 87 degrees. The highest daily average wind speeds in the state were 11 mph in Weatherford and Minco on the 30th and 18 mph in Cheyenne, Freedom, Goodwell, and Watonga on the 31st. Beaver reported the highest wind gust of 42 mph on the last day of the month.

## OCTOBER 2016 SEVERE WEATHER

### Flooding

Location	County	Day
6 NE Hough	Texas	2
Enid	Garfield	4
Valley Brook	Oklahoma	4
5 NNE Medford	Grant	4
3 NE Enid	Garfield	4
Ponca City	Kay	6
3 NNW Ponca City	Kay	6
2 N Lamont	Grant	6
5 E Billings	Noble	6
1 E Lamont	Grant	6
1 N Red Rock	Noble	6

### Wind Gusts (70 mph or Greater)

Speed (mph)	Location	County	Day
70.00	Waukomis	Garfield	4
73.00	5 N Sulphur	Murray	26
70.00	1 N Sulphur	Murray	26
80.00	4 NNE Sulphur	Murray	26

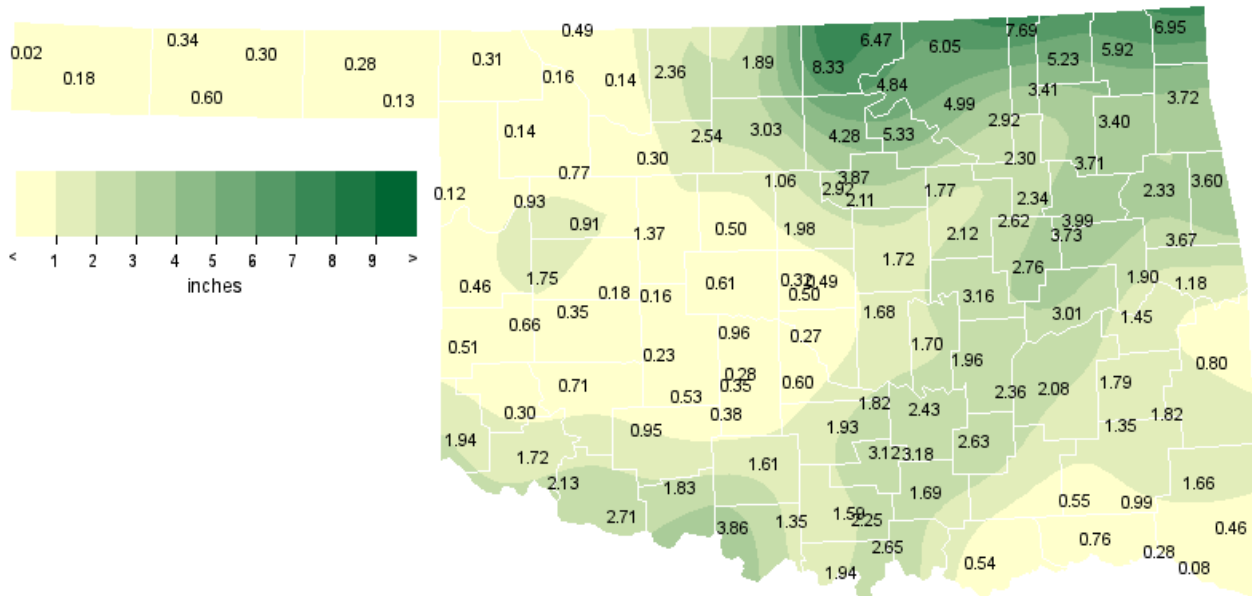
### Hail (2 inches in Diameter or Greater)

Speed (mph)	Location	County	Day
2.50	Elk City	Beckham	6
2.50	Seiling	Dewey	6
2.75	Seiling	Dewey	6

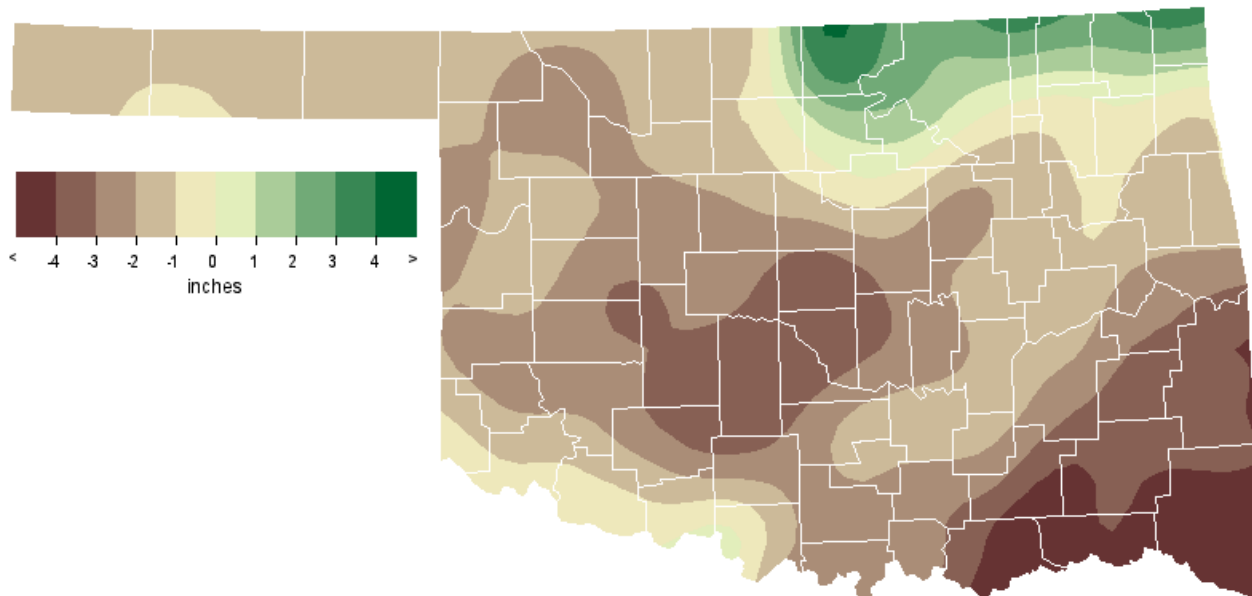
### Significant Tornadoes (EF2 or Greater)

EF-Rating	County (Start/End)	Day
None		

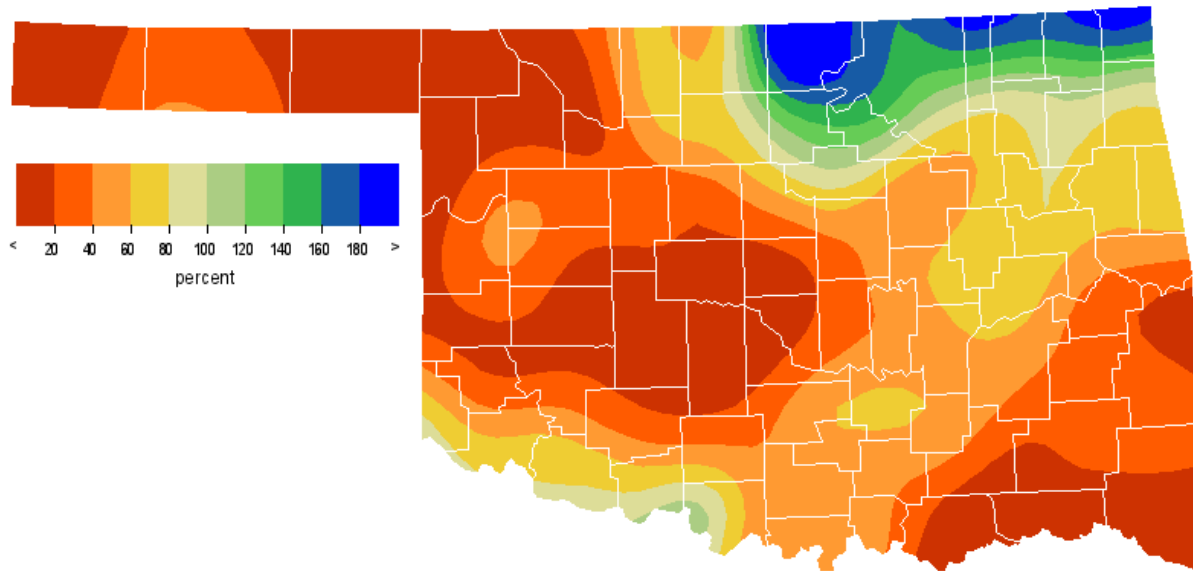
## OCTOBER 2016 OBSERVED PRECIPITATION



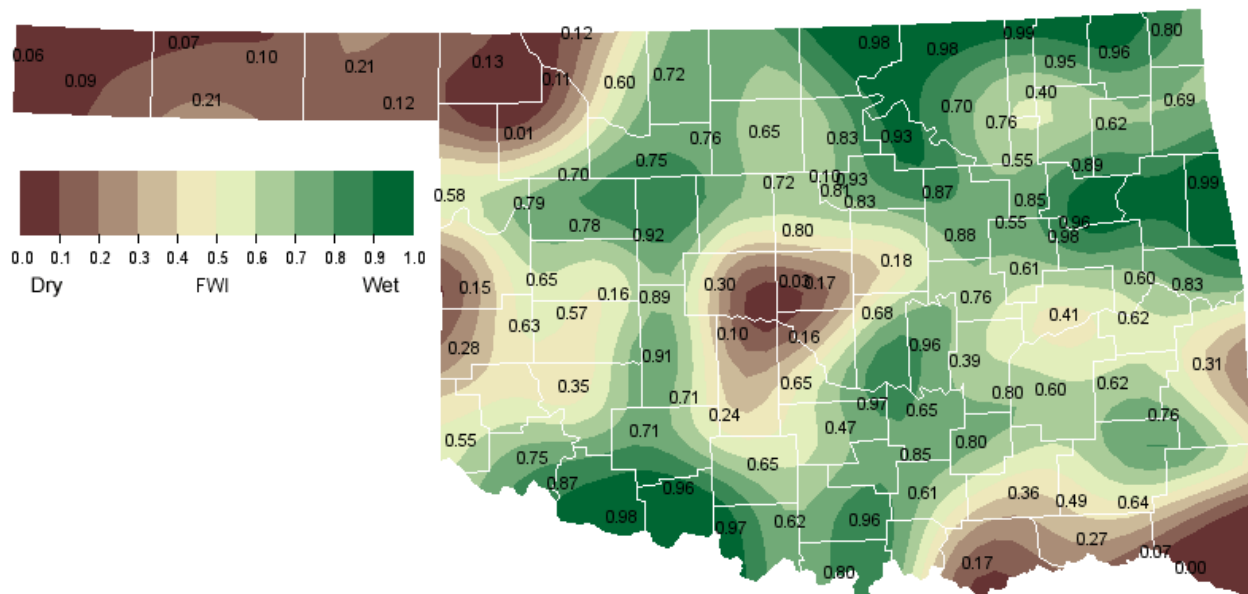
## OCTOBER 2016 DEPARTURE FROM NORMAL PRECIPITATION



## OCTOBER 2016 PERCENT OF NORMAL PRECIPITATION



## OCTOBER 2016 AVERAGE SOIL MOISTURE AT 25CM



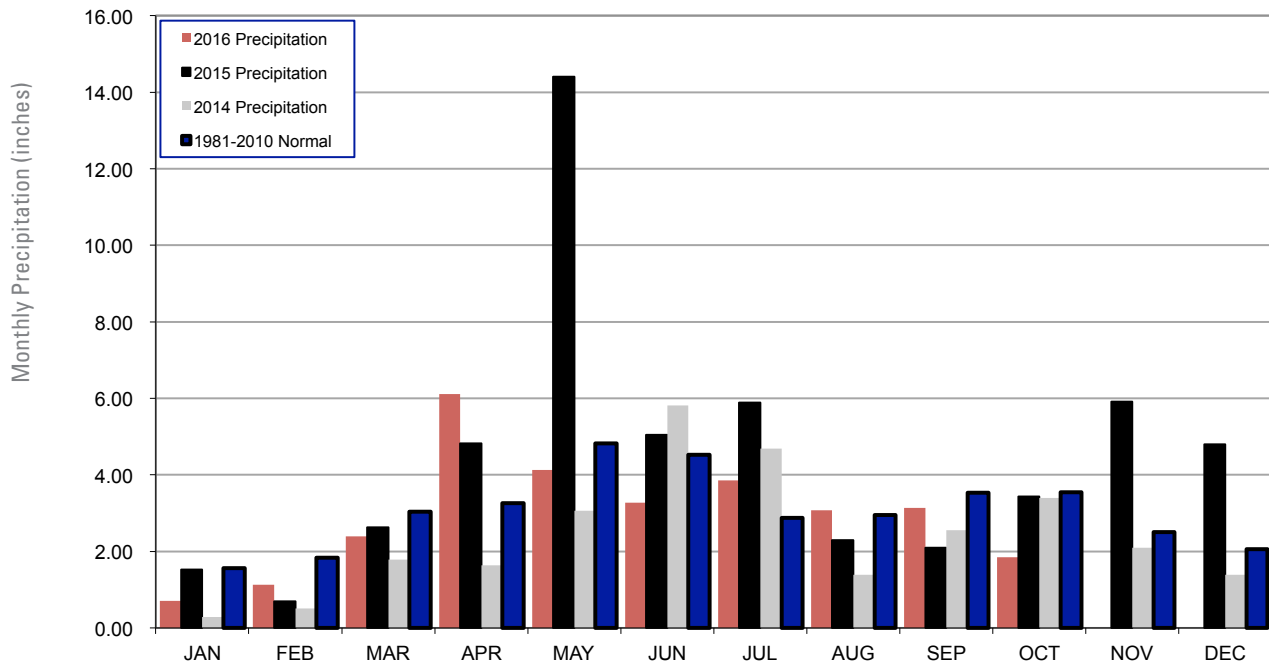


# MESONET MONTHLY SUMMARY FOR OCTOBER 2016

PANHANDLE										NORTH CENTRAL										NORTHEAST										WEST CENTRAL										CENTRAL										EAST CENTRAL										SOUTHWEST										SOUTH CENTRAL										SOUTHEAST																																																																																																																																																																																																																																																																																											
NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY	NAME	MEAN TEMP	HIGH TEMP	LOW TEMP	DAY	DAY	HDD	CDD	TOT PPT	HIGH 24-HR	DAY																																																																																																																																																																																																																																								
PANHANDLE										NORTH CENTRAL										NORTHEAST										WEST CENTRAL										CENTRAL										EAST CENTRAL										SOUTHWEST										SOUTH CENTRAL										SOUTHEAST																																																																																																																																																																																																																																																																																											
Arnett	65.9	98	17	36	8	72	99	.12	.06	10	Goodwell	63.8	96	16	32	7	123	85	.60	.48	9	Alva	65.4	94	17	36	21	86	98	.14	.05	4	May Ranch	66.1	100	17	38	13	75	110	.49	.21	2	Bixby	67.6	89	17	39	21	57	136	2.34	.85	6	Porter	67.7	88	5	41	21	53	135	3.99	1.45	7	Blackwell	65.1	101	17	35	8	104	106	.28	.16	9	Medford	66.1	93	17	37	21	72	108	1.89	.96	6	Burbank	66.1	90	17	35	21	73	118	3.03	1.37	6	Newkirk	66.1	90	17	40	21	68	102	6.47	4.74	6	Boise City	61.2	95	17	31	7	155	37	.18	.17	9	Red Rock	66.8	92	17	36	21	69	125	4.28	2.86	4	Buffalo	65.7	102	17	33	8	89	110	.31	.28	9	Seiling	65.3	93	17	36	21	88	98	.77	.67	6	Eva	61.8	98	17	31	7	155	56	.34	.21	10	Woodward	66.8	99	17	37	8	76	131	.14	.12	9																																																																																																																																																																																												
WEST CENTRAL										CENTRAL										EAST CENTRAL										SOUTHWEST										SOUTH CENTRAL										SOUTHEAST																																																																																																																																																																																																																																																																																																																									
Bessie	66.6	93	17	42	21	62	111	.35	.23	13	Erick	65.2	95	17	34	21	84	90	.51	.44	13	Acme	67.4	90	17	35	21	60	134	.38	.16	13	Ninnekah	67.8	91	17	38	21	52	140	.35	.17	6	Cookson	67.1	87	19	37	21	60	124	3.67	2.33	5	Norman	67.8	89	5	39	21	51	137	.27	.20	6	Eufaula	68.6	89	19	42	21	44	157	3.01	1.49	7	Oilton	66.2	89	5	33	21	78	117	1.77	1.18	6	Haskell	67.0	88	5	39	21	61	124	3.73	1.00	7	Oklahoma City	67.7	89	17	39	21	53	135	.50	.33	4	Hectorville	68.5	90	5	40	21	49	158	2.62	1.26	6	Oklahoma City	68.7	90	17	44	21	44	160	.32	.16	4	Holdenville	68.3	88	5	42	21	48	151	1.96	.78	19	Okemah	67.5	88	17	38	21	56	132	3.16	1.22	4	McAlester	69.1	90	19	41	21	46	173	2.08	.96	19	Perkins	68.2	92	5	38	21	55	156	2.11	1.00	26	Okmulgee	67.0	90	5	36	21	65	127	2.76	.85	7	Shawnee	67.2	87	17	41	21	54	123	1.68	1.02	4																																																																																																																																																																						
SOUTHWEST										SOUTH CENTRAL										SOUTHEAST																																																																																																																																																																																																																																																																																																																																																							
Altus	67.3	92	17	39	21	49	121	1.72	1.50	6	Hollis	67.1	93	17	40	21	50	115	1.94	1.75	6	Ada	67.9	88	5	41	21	53	144	2.43	.62	26	Mangum	66.8	95	17	35	21	60	115	.30	.16	13	Ardmore	69.3	89	5	46	21	****	****	2.25	.76	7	Medicine Park	68.0	91	17	47	21	44	136	.95	.51	13	Burneyville	69.5	90	5	42	21	40	180	1.94	1.04	7	Tipton	68.3	94	17	39	21	43	145	2.13	1.36	6	Byars	68.6	89	5	43	21	46	156	1.82	.82	19	Walters	****	***	***	***	***	****	****	.71	.49	13	Centrahoma	68.8	90	5	40	21	46	164	2.63	1.02	7	Lane	69.0	92	18	40	9	****	****	****	.42	20	Durant	70.7	91	5	43	22	21	198	.54	.33	7	Madill	69.6	90	5	45	21	37	180	2.65	1.19	7	Fittstown	67.5	87	5	44	21	53	131	3.18	1.73	19	Newport	69.9	92	5	44	21	34	185	1.59	.82	7	Ketchum Ranch	68.5	90	17	44	21	41	149	1.61	.95	19	Pauls Valley	69.4	91	5	43	21	****	****	****	1.93	.68	19	Antlers	68.1	92	18	36	22	48	143	.55	.20	7	Ringling	69.3	90	17	44	21	38	170	1.35	.51	19	Broken Bow	68.2	91	18	37	22	35	135	.46	.18	13	Sulphur	68.3	89	5	41	21	48	151	3.12	1.28	26	Clayton	69.1	91	18	39	9	39	166	1.35	.59	19	Tishomingo	68.1	88	5	42	22	46	142	1.69	1.31	7	Cloudy	68.7	89	18	41	22	33	146	.99	.24	13	Waurika	69.6	92	5	43	21	36	179	3.86	2.73	19	Hugo	70.2	91	18	42	22	26	189	.76	.34	7	Wilder	66.8	91	19	35	22	59	114	.80	.29	7	Idabel	69.5	91	18	37	22	30	169	.08	.03	7	Mt Herman	68.7	87	18	42	21	34	150	1.66	.79	26	Talihina	68.2	90	18	37	22	47	146	1.82	.54	26	Valliant	69.9	91	6	37	22	29	181	.28	.13	7	Wilburton	68.8	90	18	39	9	44	160	1.79	.74	20



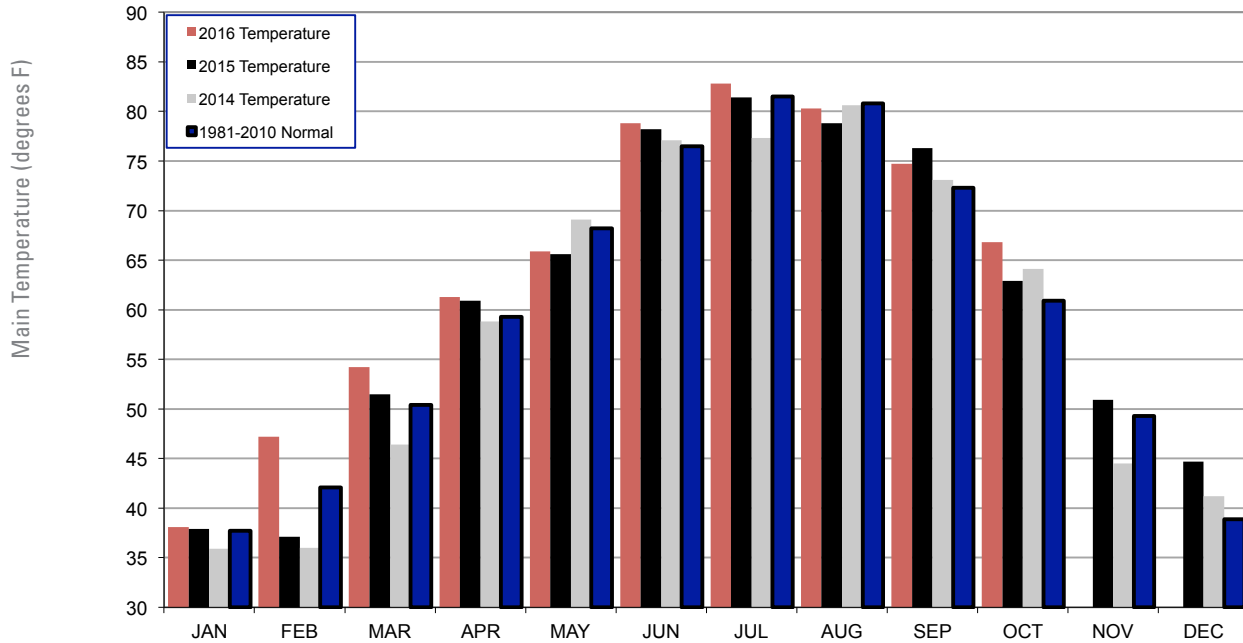
## 2014, 2015 AND 2016 STATEWIDE PRECIPITATION MONTHLY TOTALS VS. NORMAL



### October 2016 Mesonet Precipitation Comparison

Climate Division	Precipitation (inches)	Departure from Normal (inches)	Rank since 1895	Wettest on Record (Year)	Driest on Record (Year)	Oct-15 (inches)
Panhandle	0.25	-1.45	14th Driest	6.84 (1923)	0.03 (2001)	4.05
North Central	2.38	-0.53	51st Wettest	8.97 (1998)	0.00 (1952)	1.45
Northeast	4.55	0.77	33rd Wettest	14.98 (1941)	0.05 (1952)	1.72
West Central	0.79	-1.97	21st Driest	9.57 (1923)	0.00 (1952)	2.36
Central	1.33	-2.42	25th Driest	13.34 (1941)	0.03 (1952)	2.99
East Central	2.51	-1.93	47th Driest	14.00 (1941)	0.15 (1963)	3.05
Southwest	1.20	-1.95	34th Driest	11.03 (1983)	0.00 (1952)	3.44
South Central	2.17	-2.20	44th Driest	14.83 (1981)	0.09 (1921)	6.18
Southeast	0.96	-4.00	15th Driest	12.89 (1984)	0.20 (1924)	4.11
Statewide	1.85	-1.69	37th Driest	10.75 (1941)	0.14 (1952)	3.26

## 2014, 2015 AND 2016 STATEWIDE TEMPERATURE MONTHLY TOTALS VS. NORMAL



### October 2016 Mesonet Temperature Comparison

Climate Division	Average Temp (F)	Departure from Normal (F)	Rank since 1895	Hottest on Record (Year)	Coldest on Record (Year)	Oct-15 (F)
Panhandle	63.8	6.4	3rd Warmest	65.9 (1963)	50.1 (1925)	60.8
North Central	66.2	6.5	4th Warmest	68.9 (1963)	51.6 (1925)	62.5
Northeast	66.2	6.0	6th Warmest	70.2 (1963)	53.9 (1925)	61.8
West Central	65.6	5.3	5th Warmest	68.5 (1963)	52.1 (1925)	63.1
Central	67.5	6.1	5th Warmest	70.2 (1963)	55.0 (2009)	63.6
East Central	67.9	6.2	5th Warmest	70.9 (1963)	55.5 (1976)	63.7
Southwest	67.3	4.8	6th Warmest	70.2 (1963)	55.4 (1925)	65.3
South Central	68.0	4.7	8th Warmest	71.0 (1963)	56.8 (1976)	65.4
Southeast	68.8	6.8	2nd Warmest	69.8 (1963)	55.3 (1976)	64.5
Statewide	66.8	5.9	4th Warmest	69.5 (1963)	54.6 (1925)	63.4

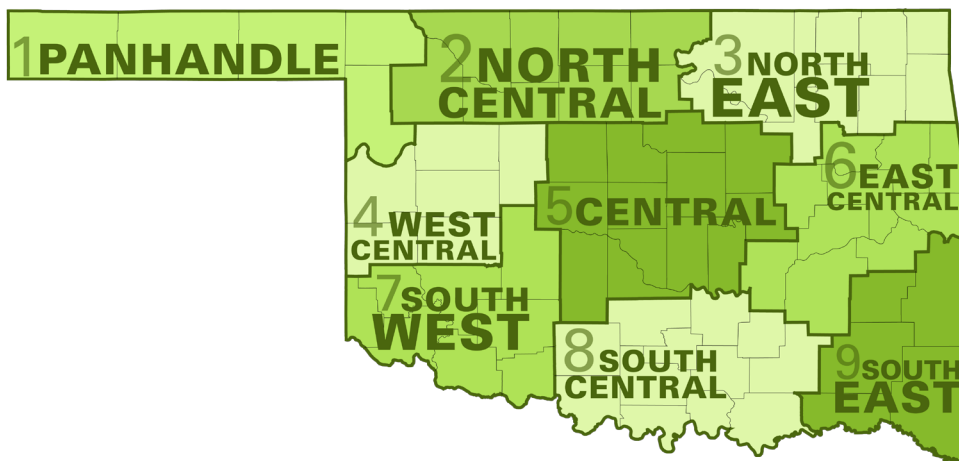
## RECORD EVENT REPORTS OCTOBER 2016

Description	Day	Location	Record	Previous Record	Year
Daily High Temperature	15	Guymon	94	89	2010
Daily Warmest Minimum Temperature	17	Oklahoma City	71	68	1934
Daily Warmest Temperature	17	Tulsa	90	90	2005
Daily Warmest Minimum Temperature	17	Tulsa	75	73	1998
Daily Warmest Minimum Temperature	17	McAlester	73	69	1971
Daily High Temperature	27	Guymon	84	80	1999
Daily Warmest Temperature	28	McAlester	85	82	2004
Daily High Temperature	28	Guymon	91	86	2001
Daily Warmest Temperature	29	McAlester	86	83	1974
Daily Warmest Temperature	31	McAlester	87	86	1977

## MESONET EXTREMES FOR OCTOBER 2016

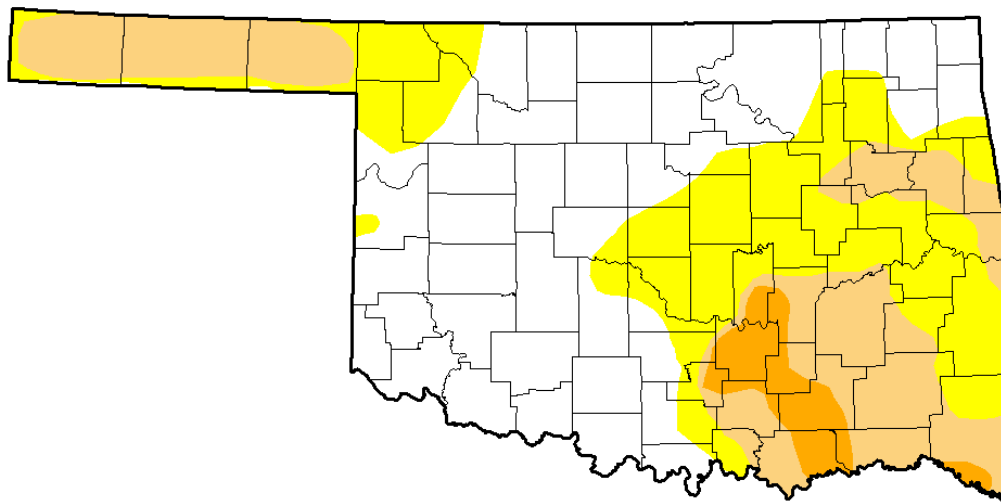
Climate Division	High Temp (F)			Low Temp (F)			High Monthly Rainfall (inches)		High Daily Rainfall (inches)		
	Day	Station	Day	Day	Station	Station	Day	Station			
Panhandle	102	17th	Buffalo	26	7th	Kenton	0.60	Goodwell	0.48	9th	Goodwell
North Central	100	17th	May Ranch	35	21st	Breckinridge	8.33	Blackwell	7.15	6th	Blackwell
Northeast	90	17th	Burbank	34	21st	Nowata	7.69	Copan	5.01	6th	Copan
West Central	97	17th	Cheyenne	33	21st	Camargo	1.75	Butler	1.15	6th	Watonga
Central	94	17th	Kingfisher	32	21st	Bristow	3.87	Stillwater	2.70	6th	Stillwater
East Central	92	19th	Webbers Falls	35	21st	Tahlequah	3.73	Haskell	2.33	5th	Cookson
Southwest	95	17th	Mangum	35	21st	Mangum	2.71	Grandfield	2.02	6th	Grandfield
South Central	92	5th	Waurika	40	21st	Centrahoma	3.86	Waurika	2.73	19th	Waurika
Southeast	92	18th	Antlers	35	22nd	Wister	1.82	Talihina	0.79	26th	Mt Herman
Statewide	102	17th	Buffalo	26	7th	Kenton	8.33	Blackwell	7.15	6th	Blackwell

### Oklahoma Climate Divisions



# U.S. Drought Monitor Oklahoma

October 25, 2016  
(Released Thursday, Oct. 27, 2016)  
Valid 8 a.m. EDT



Intensity:

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

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

Author:  
David Simeral  
Western Regional Climate Center



<http://droughtmonitor.unl.edu/>

## 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 November 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 November 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/wwwcgi.dll?wwEvent~Storms>

### SEASONAL OUTLOOKS

Climate Prediction Center:

[http://www.cpc.ncep.noaa.gov/products/OUTLOOKS\\_index.html](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/>



Oklahoma Climatological Survey is the State Climate Office for Oklahoma

Dr. Kevin Kloesel Director

Dr. Chris Fiebrich Associate Director

### EDITOR

Gary D. McManus State Climatologist

### CONTRIBUTORS

Gary D. McManus State Climatologist

Dr. Mark A. Shafer Associate State Climatologist

Monica Deming Assistant State Climatologist

### DESIGN

Ada Shih Creative Director

Jay Price Graphic Design Student Intern

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:** 405-325-7282

**E-MAIL:** [ocs@ou.edu](mailto:ocs@ou.edu)

**WEBSITE:** <http://climate.ok.gov>