A potent storm system-labeled by forecasters as "historic" and "unprecedented" for February-struck Oklahoma on Feb. 26 with all the fury and power of a mature springtime severe weather outbreak. At least nine tornadoes were confirmed during the event, with that total almost guaranteed to creep higher with further investigations by National Weather Service personnel. The total of nine alone shatters the previous February record of six set in both 1975 and 2009. The storm—which previously brought record snows to Southern California-seemed to pinpoint populated areas across the state with a combination

February 2023 Statewide Extremes

| Description | Extreme | Station | Day |
| :---: | :---: | :--- | :---: |
| High Temperature | $87^{\circ} \mathrm{F}$ | Burneyville | 21 |
| Low Temperature | $-1^{\circ} \mathrm{F}$ | Kenton | 17 |
| High Precipitation | 10.1 in. | Broken Bow | -- |
| Low Precipitation | 0.09 in. | Eva | -- |

of tornadoes and damaging straight-line winds. State officials reported at least 55 weather-related injures on the day. One fatality was reported when an EF2 rated tornado struck the small community of Cheyenne in Roger Mills County and destroyed several homes. There were at least two other "strong" EF2 twisters quickly confirmed by NWS investigations. The first was on the ground for 26 miles from Goldsby through the east side of Norman. Emergency Management officials estimate 69 homes damaged in Norman, with 40 of those being destroyed. Apartment complexes housing University of Oklahoma students were also damaged on the southeast side of Norman. The second EF2 touched down just north of Shawnee and remained on the ground for 6 miles. That tornado, along with an

EF1 that touched down just to its west near McCloud, damaged 47 homes in the McCloud and Shawnee areas.

Other confirmed tornadoes struck near Hollis, Lone Grove, Amorita, Tuttle, and western Oklahoma City. There were scattered reports of straight-line winds exceeding 80 mph . The Oklahoma Mesonet site at Fittstown recorded a wind gust of 86 mph at 10:25 p.m. that evening, and a media chase vehicle measured a wind gust of over 111 mph near Hobart. February was not the only month that broke its monthly tornado

February 2023 Statewide Statistics

| Period | Average | Departure | Rank (1895-2023) |
| :---: | :---: | :---: | :---: |
| Month <br> (February) | $44.1^{\circ} \mathrm{F}$ | $2^{\circ} \mathrm{F}$ | 32nd Warmest |
| Season-to-Date <br> (Dec-Feb) | $42^{\circ} \mathrm{F}$ | $2.6^{\circ} \mathrm{F}$ | 20th Warmest |
| Year-to-Date <br> (Jan-Feb) | $43.1^{\circ} \mathrm{F}$ | $3.3^{\circ} \mathrm{F}$ | 14th Warmest |

Precipitation

| Period | Total | Departure | Rank (1895-2023) |
| :---: | :---: | :---: | :---: |
| Month <br> (February) | 2.58 in. | 0.75 in. | 21st Wettest |
| Season-to-Date <br> (Dec-Feb) | 5.66 in. | 0.21 in. | 42nd Wettest |
| Year-to-Date <br> $($ Jan-Feb) | 3.8 in. | 0.41 in. | 34th Wettest |

Departure from 30-year normal
record. In astounding succession, December 2022 and January 2023 also broke their previous records with eight and five tornadoes, respectively. That DecemberFebruary total of 20 tornadoes - with the added chance
of that total possibly rising-obliterated the previous climatological winter record of seven, set back during the winters of 1974-75, 1975-76, and 2008-09.

The statewide average temperature for the month was 44.1 degrees, 1.7 degrees above normal and ranked as the 32nd warmest February since records began in 1895. Temperatures ranged from 87 degrees at Burneyville on Feb. 21 to minus 1 at Kenton on Feb. 17. Prolonged cold snaps were limited during the month. The Oklahoma Mesonet's 120 sites reached at least 80 degrees 32 times across three separate days during February, and 70 degrees 550 times across 11 separate days. The first two months of the year finished with a statewide average of 42 degrees, 1.8 degrees above normal and ranked as the 20th warmest JanuaryFebruary on record. Climatological winter's statewide average was 43.1 degrees, 2.8 degrees above normal and ranked as the 16th warmest such period on record. The highest temperature recorded during Winter 202223 was the 87 degrees at Burneyville on Feb. 21, and the lowest was the minus 7 degrees recorded at four separate locations between Dec. 22-23, 2022.

The statewide average precipitation total of 2.6 inches was 0.91 inches above normal and ranked the month as the 20th wettest February since records began in 1895. Hefty surpluses of 1-3 inches were observed across roughly the southeastern half of the state, with deficits of up to a half-inch across the northwestern half. Broken Bow led the state with a whopping 10.1 inches, 6.3 inches above normal. Eva had the lowest total at 0.09 inches. Twenty-eight of the Oklahoma Mesonet's 120 sites recorded at least 4 inches of rain for the month, and another 20 reported at least 4 inches. January and February combined had a statewide average of 3.82 inches, 0.56 inches above normal and ranked as the 34 th wettest such period on record. The climatological winter finished with a statewide average of 5.68 inches, 0.31 inches above normal and ranked as the 41st wettest December-February on record.

Drought coverage in Oklahoma was reduced by a little more than $10 \%$ during February according to the U.S. Drought Monitor, part of improvements across the southeastern half of the state that were prevalent through winter 2022-23. Drought covered $91 \%$ of the state at the beginning of December 2022, and $85 \%$ at the beginning of February. February's final Drought Monitor showed $75 \%$ of the state in at least moderate drought. The Climate Prediction Center's (CPC) March temperature and precipitation outlooks don't hold many clues other than increased odds of above normal precipitation across the eastern one-third of Oklahoma. CPC's March drought outlook calls for some improvement of drought from central through south central Oklahoma, but persistence across much of the northwestern half of the state.

## FEBRUARY 2023 OBSERVED PRECIPITATION



28-Day Rainfall Accumulation (inches)
Feb 1, 2023 12:00 AM CST - Mar 1, 2023 12:00 AM CST

The accumulated rainfall for February varied from less than an inch in the panhandle and western Oklahoma to 1 to 3 inches in central Oklahoma to a high of 10.10 inches in southeastern Oklahoma at Broken Bow.

FEBRUARY 2023 DEPARTURE FROM NORMAL PRECIPITATION
 Calendar Month to Date

Feb 1, 2023 through Feb 28, 2023

Comparing the February rainfall accumulation to the 1991 to 2020 normal rainfall, sites west of Interstate 44 were below normal by half an inch to normal. East of Interstate 44, most areas received a half and inch to 2 inches above normal rainfall. A swath from Westville to Holdenville received between 2 and 3 inches above normal. McCurtain county was above normal by 4 to 6 inches.

## FEBRUARY 2023 PERCENT OF NORMAL PRECIPITATION



Created 2:42:28 AM March 1, 2023 CST. Copynight 2023

The panhandle and northwestern Oklahoma received between $28 \%$ and $136 \%$ of normal rainfall with Kenton receiving the most at $136 \%$. Across the rest of the state, the western and central ranged from $36 \%$ to $161 \%$ of normal rainfall with Mangum benefiting the most. East of Interstate 44 to Interstate 35 and south were above normal by $130 \%$ to $278 \%$. South central counties ranged from 130 to $158 \%$ above normal.

## FEBRUARY 2023 AVERAGE TEMPERATURE IN DEGREES FAHRENHEIT



Temperatures ranged from the upper 30s in the panhandle to the mid 40 s in across most of the state and upper 50 s in far southeastern counties.

## FEBRUARY 2023 DEPARTURE FROM NORMAL TEMPERATURE



The temperature departures from normal ranged from $1^{\circ} \mathrm{F}$ to $3^{\circ} \mathrm{F}$ in the panhandle. The temperature departures increased to $3^{\circ} \mathrm{F}$ to $4^{\circ} \mathrm{F}$ in western and central Oklahoma. The warmest areas were in eastern and southern Oklahoma with temperature departures of $5^{\circ} \mathrm{F}$.

## MESONET MONTHLY SUMMARY FOR FEBRUARY 2023

PANHANDLE

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> $24-H R$ | DAY |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Arnett | 41.8 | 75 | 28 | 10 | 23 | 651 | 0 | .41 | .34 | 26 |
| Beaver | 39.7 | 76 | 26 | 5 | 17 | 707 | 0 | .15 | .08 | 26 |
| Boise City | 37.0 | 75 | 26 | 3 | 17 | 785 | 0 | .17 | .06 | 17 |
| Buffalo | 40.8 | 77 | 21 | 9 | 23 | 678 | 0 | .28 | .18 | 26 |
| Eva | 36.7 | 78 | 26 | 0 | 23 | 793 | 0 | .09 | .06 | 17 |
| Goodwel1 | 39.0 | 79 | 26 | 2 | 16 | 727 | 0 | .11 | .06 | 26 |
| Hooker | 38.4 | 79 | 26 | 1 | 17 | 744 | 0 | .37 | .22 | 26 |
| Kenton | 36.8 | 74 | 26 | -1 | 17 | 790 | 0 | .49 | .29 | 17 |
| Slapout | 41.2 | 76 | 21 | 8 | 23 | 666 | 0 | .40 | .27 | 26 |

NORTH CENTRAL

| NAME | $\begin{aligned} & \text { MEAN } \\ & \text { TEMP } \end{aligned}$ | $\begin{aligned} & \text { HIGH } \\ & \text { TEMP } \end{aligned}$ | dAY | $\begin{aligned} & \text { LOW } \\ & \text { TEMP } \end{aligned}$ | dAY | HDD | CDD | $\begin{aligned} & \text { TOT } \\ & \text { PPT } \end{aligned}$ | $\begin{aligned} & \text { HIGH } \\ & 24-\mathrm{HR} \end{aligned}$ | dAY |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Alva | 40.7 | 76 | 28 | 11 | 1 | 680 | 0 | 1.13 | . 92 | 26 |
| Blackwel1 | 40.8 | 73 | 28 | 14 | 1 | 677 | 0 | 1.27 | . 58 | 26 |
| Breckinridge | 41.3 | 74 | 28 | 13 | 1 | 664 | 0 | 1.23 | . 46 | 14 |
| Cherokee | 41.0 | 75 | 28 | 14 | 23 | 672 | 0 | 1.57 | . 86 | 26 |
| Fairview | 42.5 | 78 | 28 | 15 | 1 | 630 | 0 | . 70 | . 39 | 26 |
| Freedom | 40.8 | 75 | 6 | 10 | 23 | 678 | 0 | 49 | . 34 | 26 |
| Lahoma | 41.4 | 73 | 28 | 15 | 23 | 660 | 0 | 1.21 | . 53 | 26 |
| May Ranch | 41.0 | 74 | 6 | 9 | 23 | 673 | 0 | . 47 | . 27 | 26 |
| Medford | 40.1 | 73 | 28 | 15 | 23 | 697 | 0 | 1.16 | . 67 | 26 |
| Newkirk | 41.3 | 72 | 28 | 13 | 3 | 662 | 0 | 1.44 | . 64 | 26 |
| Red Rock | 42.3 | 76 | 28 | 14 | 1 | 636 | 0 | . 96 | . 46 | 8 |
| Seiling | 41.1 | 77 | 28 | 10 | 17 | 669 | 0 | . 60 | . 38 | 26 |
| Woodward | 42.0 | 76 | 6 | 10 | 23 | 643 | 0 | . 54 | . 43 | 26 |

NORTHEAST

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> 24-HR | DAY |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Bixby | 45.3 | 79 | 28 | 19 | 1 | 552 | 0 | 5.05 | 1.36 | 8 |
| Burbank | 42.1 | 76 | 28 | 13 | 1 | 642 | 0 | .84 | .39 | 14 |
| Copan | 42.5 | 76 | 28 | 13 | 1 | 630 | 0 | 2.11 | .97 | 8 |
| Foraker | 41.7 | 75 | 28 | 14 | 1 | 652 | 0 | 1.18 | .56 | 8 |
| Inola | 44.1 | 77 | 28 | 20 | 1 | 585 | 0 | 5.30 | 1.30 | 8 |
| Jay | 44.5 | 76 | 28 | 17 | 1 | 574 | 0 | 5.41 | 1.14 | 8 |
| Miami | 43.3 | 75 | 28 | 15 | 1 | 609 | 0 | 3.36 | .99 | 8 |
| Nowata | 42.3 | 78 | 28 | 12 | 1 | 636 | 0 | 2.54 | .77 | 8 |
| Wynona | 43.4 | 79 | 28 | 15 | 1 | 605 | 0 | 1.71 | .74 | 8 |
| Pawnee | 43.5 | 78 | 28 | 13 | 1 | 603 | 0 | 1.15 | .42 | 14 |
| Porter | 45.8 | 79 | 28 | 19 | 1 | 537 | 0 | 4.95 | 1.50 | 8 |
| Pryor | 43.7 | 76 | 28 | 18 | 1 | 596 | 0 | 3.99 | 1.14 | 8 |
| Skiatook | 44.1 | 77 | 28 | 16 | 1 | 585 | 0 | 3.71 | 1.11 | 8 |
| Talala | 43.3 | 77 | 28 | 17 | 1 | 609 | 0 | 3.07 | .94 | 8 |
| Tulsa | 45.2 | 78 | 28 | 18 | 1 | 553 | 0 | 3.46 | 1.13 | 7 |
| Vinita | 42.7 | 76 | 28 | 14 | 1 | 623 | 0 | 3.41 | 1.07 | 7 |
|  |  |  |  |  |  |  |  |  |  |  |

WEST CENTRAL

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> $24-$ HR |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DAY |  |  |  |  |  |  |  |  |  |
| Bessie | 43.8 | 80 | 21 | 16 | 17 | 593 | 0 | .81 | .27 |
| Butler | 43.1 | 80 | 28 | 12 | 11 | 613 | 0 | .69 | .34 |
| Camargo | 41.2 | 76 | 6 | 11 | 11 | 667 | 0 | .66 | .45 |
| Cheyenne | 43.6 | 77 | 21 | 14 | 23 | 598 | 0 | .35 | .22 |
| E1k City | 43.8 | 82 | 21 | 16 | 17 | 595 | 0 | .63 | .24 |
| Erick | 43.3 | 83 | 21 | 12 | 17 | 609 | 0 | .41 | .24 |
| Putnam | 42.2 | 78 | 28 | 14 | 23 | 637 | 0 | .51 | .30 |
| Watonga | 43.1 | 75 | 28 | 15 | 23 | 613 | 0 | 1.08 | .38 |
| Weatherford | 43.4 | 77 | 28 | 16 | 17 | $* * *$ | $* * *$ | .89 | .27 |
|  |  |  |  |  |  |  |  |  |  |

CENTRAL

| NAME | $\begin{aligned} & \text { MEAN } \\ & \text { TEMP } \end{aligned}$ | $\begin{gathered} \text { HIGH } \\ \text { TEMP } \end{gathered}$ | DAY | $\begin{aligned} & \text { LOW } \\ & \text { TEMP } \end{aligned}$ | DAY | HDD | CDD | $\begin{aligned} & \text { TOT } \\ & \text { PPT } \end{aligned}$ | $\begin{aligned} & \text { HIGH } \\ & 24-\mathrm{HR} \end{aligned}$ | DAY |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Acme | 44.7 | 80 | 21 | 16 | 1 | 568 | 0 | 2.31 | . 89 | 7 |
| Bristow | 44.5 | 77 | 28 | 16 | 1 | 574 | 0 | 3.56 | 1.06 | 7 |
| Chandler | 45.5 | 78 | 28 | 17 | 1 | 546 | 0 | 2.43 | . 98 | 7 |
| Chickasha | 44.3 | 80 | 21 | 17 | 1 | 579 | 0 | 1.90 | . 62 | 7 |
| E1 Reno | 42.6 | 77 | 28 | 12 | 1 | 627 | 0 | 1.30 | . 33 | 14 |
| Guthrie | 44.0 | 76 | 28 | 15 | 1 | 589 | 0 | 1.29 | . 38 | 8 |
| Kingfisher | 42.1 | 75 | 28 | 14 | 1 | 641 | 0 | 1.31 | . 27 | 8 |
| $\begin{aligned} & \text { Lake Carl } \\ & \text { B1ac } \end{aligned}$ | 42.2 | 77 | 28 | 11 | 1 | 638 | 0 | 1.26 | . 49 | 8 |
| Marena | 43.2 | 77 | 28 | 15 | 1 | 610 | 0 | 1.10 | . 33 | 8 |
| Minco | 43.7 | 77 | 21 | 17 | 1 | 598 | 0 | 1.46 | . 40 | 8 |
| Marshall | 42.1 | 76 | 28 | 15 | 1 | 642 | 0 | 1.02 | . 35 | 8 |
| Yukon | 43.6 | 76 | 28 | 16 | 1 | 600 | 0 | 1.48 | . 29 | 14 |
| Norman | 44.9 | 76 | 21 | 16 | 1 | 562 | 0 | 2.19 | . 82 | 7 |
| Oilton | 43.8 | 77 | 28 | 13 | 1 | 594 | 0 | 2.55 | . 78 | 7 |
| OKC East | 44.5 | 76 | 28 | 15 | 1 | 573 | 0 | 1.93 | . 66 | 7 |
| Okemah | 45.3 | 76 | 28 | 20 | 1 | 552 | 0 | 3.93 | . 91 | 8 |
| Perkins | 43.9 | 77 | 28 | 15 | 1 | 590 | 0 | 1.68 | . 42 | 8 |
| Seminole | 46.1 | 77 | 21 | 18 | 1 | 530 | 0 | 3.68 | . 98 | 7 |
| Shawnee | 44.7 | 74 | 21 | 18 | 1 | 568 | 0 | 3.48 | 1.22 | 7 |
| Spencer | 45.1 | 77 | 28 | 16 | 1 | *** | *** | 2.01 | . 71 | 7 |
| Stillwater | 43.0 | 77 | 28 | 14 | 1 | 616 | 0 | 1.15 | . 37 | 14 |
| Washington | 45.4 | 79 | 21 | 16 | 1 | 549 | 0 | 3.06 | 1.13 | 7 |

EAST CENTRAL

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> R4- | DAY |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Cookson | 46.6 | 77 | 28 | 20 | 1 | 515 | 0 | 4.08 | 1.18 | 8 |
| Eufaula | 47.3 | 78 | 28 | 21 | 1 | 495 | 0 | 3.86 | 1.41 | 8 |
| Haskell | 45.3 | 78 | 28 | 19 | 1 | 551 | 0 | 4.95 | 1.42 | 8 |
| Hectorville | 46.1 | 79 | 28 | 18 | 1 | 530 | 0 | 4.78 | 1.20 | 8 |
| Holdenville | 46.2 | 76 | 28 | 20 | 1 | 528 | 0 | 5.20 | 1.22 | 8 |
| McAlester | 47.4 | 79 | 28 | 22 | 1 | 494 | 0 | 4.52 | 1.24 | 8 |
| Okmulgee | 45.6 | 78 | 28 | 19 | 1 | 542 | 0 | 4.83 | 1.47 | 8 |
| Sallisaw | 47.3 | 80 | 28 | 23 | 3 | 497 | 0 | 4.19 | 1.57 | 8 |
| Stigler | 47.8 | 77 | 28 | 23 | 1 | 482 | 0 | 3.69 | 1.06 | 8 |
| Stuart | 47.5 | 76 | 28 | 21 | 1 | 490 | 0 | 4.45 | 1.14 | 15 |
| Tahlequah | 45.6 | 77 | 28 | 20 | 1 | 543 | 0 | 5.75 | 1.77 | 8 |
| Webbers Falls | 46.1 | 80 | 28 | 22 | 1 | 529 | 0 | 3.45 | 1.21 | 8 |
| Westville | 46.1 | 76 | 28 | 19 | 1 | 529 | 0 | 6.22 | 1.19 | 8 |

SOUTHWEST

| NAME | $\begin{aligned} & \text { MEAN } \\ & \text { TEMP } \end{aligned}$ | $\begin{aligned} & \text { HIGH } \\ & \text { TEMP } \end{aligned}$ | DAY | $\begin{aligned} & \text { LOW } \\ & \text { TEMP } \end{aligned}$ | DAY | HDD | CDD | $\begin{aligned} & \text { TOT } \\ & \text { PPT } \end{aligned}$ | $\begin{aligned} & \text { HIGH } \\ & 24-H R \end{aligned}$ | DAY |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Altus | 44.8 | 83 | 21 | 16 | 17 | 567 | 0 | *** | . 56 | 8 |
| Apache | 44.2 | 81 | 21 | 17 | 1 | 583 | 0 | 1.95 | . 43 | 26 |
| Fort Cobb | 43.7 | 82 | 21 | 16 | 17 | 597 | 0 | 1.47 | . 41 | 8 |
| Grandfield | 46.1 | 83 | 21 | 19 | 17 | 529 | 0 | 1.84 | . 55 | 7 |
| Hinton | 42.3 | 77 | 21 | 16 | 1 | *** | *** | 1.05 | . 29 | 14 |
| Hobart | 43.8 | 82 | 21 | 15 | 17 | 593 | 0 | . 83 | . 32 | 8 |
| Holl is | 44.4 | 85 | 21 | 13 | 17 | 576 | 0 | . 75 | . 34 | 26 |
| Mangum | 44.1 | 85 | 21 | 9 | 17 | 586 | 0 | 1.59 | . 53 | 8 |
| Medicine Park | 45.8 | 81 | 21 | 19 | 1 | 537 | 0 | 1.84 | . 51 | 8 |
| Tipton | 45.1 | 81 | 28 | 17 | 17 | *** | *** | 1.30 | . 48 | 8 |
| Walters | 46.2 | 82 | 21 | 21 | 1 | 527 | 0 | 2.12 | . 74 | 7 |

## SOUTH CENTRAL

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> $24-$ HR | DAY |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Ada | 46.7 | 78 | 28 | 21 | 1 | 512 | 0 | 4.75 | 1.24 | 15 |
| Ardmore | 48.1 | 85 | 21 | 23 | 1 | 479 | 4 | 3.72 | 1.19 | 22 |
| Burneyville | 47.8 | 87 | 21 | 19 | 3 | 488 | 5 | 2.98 | .80 | 8 |
| Byars | 47.0 | 77 | 21 | 20 | 1 | 504 | 0 | 3.02 | .61 | 7 |
| Centrahoma | 47.5 | 79 | 28 | 21 | 3 | 492 | 1 | 3.36 | 1.17 | 8 |
| Durant | 49.2 | 83 | 21 | 24 | 1 | 450 | 8 | 3.45 | 1.06 | 8 |
| Fittstown | 47.0 | 80 | 21 | 21 | 1 | 505 | 1 | 3.93 | .97 | 22 |
| Ketchum Ranch | 46.6 | 81 | 21 | 21 | 1 | 515 | 1 | 2.32 | .74 | 7 |
| Lane | 47.9 | 80 | 21 | 23 | 1 | 481 | 1 | 4.13 | 1.14 | 8 |
| Madill | 48.1 | 85 | 21 | 22 | 3 | 478 | 6 | 2.77 | .86 | 8 |
| Newport | 48.1 | 85 | 21 | 23 | 1 | 478 | 5 | 3.59 | 1.06 | 22 |
| Pauls Valley | 46.7 | 82 | 21 | 21 | 1 | 512 | 0 | 2.68 | .63 | 15 |
| Ringling | 47.7 | 85 | 21 | 23 | 17 | 488 | 4 | 2.94 | 1.13 | 15 |
| Sulphur | 46.5 | 81 | 21 | 19 | 3 | 520 | 2 | 4.60 | 1.00 | 22 |
| Tishomingo | 46.9 | 82 | 21 | 21 | 3 | 508 | 2 | 2.98 | .83 | 8 |
| Waurika | 47.7 | 86 | 21 | 22 | 17 | 488 | 3 | 2.63 | .66 | 7 |

SOUTHEAST

| NAME | MEAN <br> TEMP | HIGH <br> TEMP | DAY | LOW <br> TEMP | DAY | HDD | CDD | TOT <br> PPT | HIGH <br> $24-H R$ | DAY |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Antlers | 48.1 | 83 | 28 | 19 | 18 | 473 | 0 | 5.54 | 1.36 | 8 |
| Broken Bow | 49.9 | 83 | 21 | 24 | 18 | 424 | 1 | 10.10 | 4.35 | 8 |
| Clayton | 48.4 | 80 | 28 | 21 | 18 | 464 | 0 | 6.10 | 1.51 | 8 |
| Cloudy | 48.5 | 79 | 28 | 22 | 18 | 462 | 0 | 7.28 | 2.49 | 8 |
| Hugo | 50.0 | 81 | 21 | 23 | 1 | 426 | 5 | 6.19 | 1.88 | 7 |
| Idabel | 50.9 | 82 | 21 | 25 | 18 | 398 | 3 | 9.78 | 4.30 | 8 |
| Mt Herman | 48.5 | 77 | 21 | 25 | 18 | 462 | 0 | 7.97 | 3.14 | 8 |
| Talihina | 48.2 | 80 | 28 | 20 | 18 | 470 | 0 | 6.40 | 2.02 | 8 |
| Valliant | 50.0 | 81 | 21 | 23 | 18 | 421 | 1 | 7.59 | 3.31 | 8 |
| Wilburton | 48.1 | 79 | 28 | 23 | 1 | 473 | 0 | 4.86 | 1.21 | 8 |
| Wister | 47.5 | 82 | 28 | 20 | 18 | 491 | 0 | 6.20 | 1.97 | 8 | INCHES



## TABLE OF 2023 STATEWIDE PRECIPITATION MONTHLY TOTALS AND NORMALS IN INCHES

| Year | Jan | Feb | Mar | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{2 0 2 3}$ | 1.17 | 2.58 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| $1991-2020$ | 1.57 | 1.69 | 2.78 | 3.59 | 4.93 | 4.26 | 3.20 | 3.23 | 3.32 | 3.36 | 2.32 | 2.11 |

FEBRUARY 2023 MESONET PRECIPITATION COMPARISON

| Climate Division | Precipitation <br> (inches) | Departure from <br> Normal (inches) | Rank since 1895 | Wettest on Record <br> (Year) | Driest on <br> Record (Year) | Feb-22 <br> (inches) |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Panhandle | 0.27 | -0.36 | 36th Driest | $2.95(1911)$ | $0.00(1904)$ | 0.28 |
| North Central | 0.98 | -0.31 | 60th Wettest | $3.97(1911)$ | $0.01(1904)$ | 1.04 |
| Northeast | 3.20 | 1.15 | 14th Wettest | $5.90(1985)$ | $0.10(1963)$ | 1.92 |
| West Central | 0.67 | -0.43 | 58th Driest | $4.04(2013)$ | $0.00(1991)$ | 0.72 |
| Central | 2.09 | 0.28 | 30th Wettest | $4.91(1938)$ | $0.04(1947)$ | 1.63 |
| East Central | 4.61 | 2.03 | 12th Wettest | $8.92(1938)$ | $0.10(1947)$ | 2.58 |
| Southwest | 1.47 | 0.08 | 40th Wettest | $3.68(1997)$ | $0.01(1916)$ | 1.12 |
| South Central | 3.37 | 0.98 | 18th Wettest | $7.48(1938)$ | $0.08(1996)$ | 2.32 |
| Southeast | 7.09 | 3.72 | 6th Wettest | $10.98(2018)$ | $0.34(1895)$ | 3.87 |
| Statewide | 2.58 | 0.75 | 21st Wettest | $4.57(1938)$ | $0.18(1996)$ | 1.70 |

2023 STATEWIDE TEMPERATURE MONTHLY TOTALS VS. NORMAL IN DEGREES FAHRENHEIT


TABLE OF 2023 STATEWIDE TEMPERATURE MONTHLY TOTALS AND NORMALS IN DEGREES FAHRENHEIT

| Year | Jan | Feb | Mar | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{2 0 2 3}$ | 41.9 | 44.1 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| $\mathbf{1 9 9 1 - 2 0 2 0}$ | 38.3 | 42.4 | 51.2 | 59.5 | 68.4 | 77.3 | 81.9 | 80.8 | 72.9 | 61.3 | 49.4 | 40.1 |

FEBRUARY 2023 MESONET TEMPERATURE COMPARISON

| Climate Division | Average <br> Temp (F) | Departure <br> from <br> Normal (F) | Rank since 1895 | Hottest on Record <br> (Year) | Coldest on <br> Record (Year) | Feb-22 <br> (F) |
| :--- | ---: | :---: | :---: | :---: | :---: | :---: |
| Panhandle | 39.1 | 0.7 | 47th Warmest | $47.3(1954)$ | $23.6(1899)$ | 33.8 |
| North Central | 41.3 | 1.7 | 36th Warmest | $49.6(1930)$ | $25.3(1978)$ | 35.8 |
| Northeast | 43.6 | 2.9 | 28th Warmest | $49.4(1976)$ | $25.4(1905)$ | 37.3 |
| West Central | 42.9 | 1.8 | 36th Warmest | $50.9(1954)$ | $26.2(1905)$ | 37.4 |
| Central | 44 | 1.6 | 40th Warmest | $51.5(1954)$ | $27.5(1905)$ | 39.4 |
| East Central | 46.5 | 3.3 | 25th Warmest | $52.5(2017)$ | $29.5(1905)$ | 40.3 |
| Southwest | 44.3 | 0.7 | 48th Warmest | $52.4(1954)$ | $28.0(1905)$ | 40 |
| South Central | 47.5 | 2.2 | 36th Warmest | $54.3(1976)$ | $30.3(1899)$ | 41.3 |
| Southeast | 48.9 | 4.2 | 15th Warmest | $53.6(2017)$ | $31.9(1905)$ | 42.1 |
| Statewide | 44.1 | 2 | 32nd Warmest | $50.6(1954)$ | $27.6(1905)$ | 38.5 |

MESONET EXTREMES FOR FEBRUARY 2023

| Climate Division | High Temp (F) | Day | Station | Low <br> (F) | Day | Station | High Monthly Rainfall (inches) | Station | High Daily Rainfall (inches) | Day | Station |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panhandle | 79 | 26th | Hooker | -1 | 17th | Kenton | 0.49 | Kenton | 0.34 | 26th | Arnett |
| North Central | 78 | 28th | Fairview | 9 | 23rd | May Ranch | 1.57 | Cherokee | 0.92 | 26th | Alva |
| Northeast | 79 | 28th | Porter | 12 | 1st | Nowata | 5.41 | Jay | 1.50 | 8th | Porter |
| West Central | 83 | 21st | Erick | 11 | 11th | Camargo | 1.08 | Watonga | 0.45 | 26th | Camargo |
| Central | 80 | 21st | Acme | 11 | 1st | Lake Carl Blackwell | 3.93 | Okemah | 1.22 | 7th | Shawnee |
| East Central | 80 | 28th | Webbers Falls | 18 | 1st | Hectorville | 6.22 | Westville | 1.77 | 8th | Tahlequah |
| Southwest | 85 | 21st | Hollis | 9 | 17th | Mangum | 2.12 | Walters | 0.74 | 7th | Walters |
| South Central | 87 | 21st | Burneyville | 19 | 3rd | Burneyville | 4.75 | Ada | 1.24 | 15th | Ada |
| Southeast | 83 | 21st | Broken Bow | 19 | 18th | Antlers | 10.10 | Broken Bow | 4.35 | 8th | Broken Bow |
| Statewide | 87 | 21st | Burneyville | -1 | 17th | Kenton | 10.10 | Broken Bow | 4.35 | 8th | Broken Bow |

## Oklahoma Climate Divisions



| Climate Division | Counties |
| :--- | :--- |
| Panhandle - Division 1 | Beaver, Cimarron, Ellis, Harper, and Texas |
| North Central - Division 2 | Alfalfa, Garfield, Grant, Kay, Major, Noble, Woods, and Woodward |
| Northeast - Division 3 | Craig, Delaware, Mayes, Nowata, Osage, Ottawa, Pawnee, Rogers, Tulsa, and Washington |
| West Central - Division 4 | Beckham, Blaine, Custer, Dewey, Roger Mills, and Washita |
| Central - Division 5 | Canadian, Cleveland, Creek, Grady, Kingfisher, Lincoln, Logan, McClain, Okfuskee, Oklahoma, Payne, <br> Pottawatomie, and Seminole |
| East Central - Division 6 | Adair, Cherokee, Haskell, Hughes, McIntosh, Muskogee, Okmulgee, Pittsburg, Sequoyah, and Wagoner |
| Southwest - Division 7 | Caddo, Comanche, Cotton, Greer, Harmon, Jackson, Kiowa, and Tillman |
| South Central - Division 8 | Atoka, Bryan, Carter, Coal, Garvin, Jefferson, Johnston, Love, Marshall, Murray, Pontotoc, and Stephens |
| Southeast - Division 9 | Choctaw, Latimer, LeFlore, McCurtain, and Pushmataha |

## U.S. Drought Monitor Oklahoma



February 21, 2023
(Released Thursday, Feb. 23, 2023) Valid 7 a.m. EST

|  | Drought Conditions (Percent Area) |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | None | D0-D4 | D1-D4 | D2-D4 | D3-D4 | D4 |
| Current | 19.22 | 80.78 | 74.65 | 56.47 | 36.64 | 8.86 |
| Last Week 02-14-2023 | 14.97 | 85.03 | 80.07 | 66.94 | 36.58 | 8.07 |
| 3 Months Ago 11-22-2022 | 0.00 | 100.00 | 97.68 | 87.88 | 64.46 | 19.77 |
| $\begin{gathered} \text { Start of } \\ \text { Calendar Year } \\ \text { 01-03-2023 } \end{gathered}$ | 1.82 | 98.18 | 89.73 | 80.92 | 56.13 | 11.65 |
| Start of Water Year 09-27-2022 | 0.00 | 100.00 | 99.88 | 94.44 | 64.44 | 17.25 |
| One Year Ago 02-22-2022 | 6.69 | 93.31 | 86.65 | 73.94 | 52.05 | 290 |

Intensity:


The Drought Monitor focuses on broad-scale conditions
Drought Monitor, go to https://droughtmonitor.unl. edu/About. aspx
Author:
Richard Heim
NCEI/NOAA
USDA

droughtmonitor.unl.edu

Drought condition intensity levels used for the US Drought Monitor are None, D0 Abnormally Dry, D1 Moderate Drought, D2 Severe Drought, D3 Extreme Drought, and D4 Exceptional Drought.

The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. For more information on the Drought Monitor go to https://droughtmonitor.unl.edu/About.aspx.

## U.S. DROUGHT MONITOR FOR OKLAHOMA DROUGHT CONDITIONS (PERCENT AREA)

FEBRUARY 21, 2023 (RELEASED THURSDAY, FEB. 23, 2023)
VALID 7 A.M. EST

| Period | None | D0-D4 | D1-D4 | D2-D4 | D3-D4 | D4 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Current | 19.22 | 80.78 | 74.65 | 56.47 | 36.64 | 8.86 |
| Last Week <br> 02-14-2023 | 14.97 | 85.03 | 80.07 | 66.94 | 36.58 | 8.07 |
| 3 Months Ago <br> 11-22-2022 | 0.00 | 100.00 | 97.68 | 87.88 | 64.46 | 19.77 |
| Start of Current Year <br> 01-03-2023 | 1.82 | 98.18 | 89.73 | 80.92 | 56.13 | 11.65 |
| Start of Water Year <br> 09-27-2022 | 0.00 | 100.00 | 99.88 | 94.44 | 64.44 | 17.25 |
| One Year Ago <br> 02-22-2022 | 6.69 | 93.31 | 86.65 | 73.94 | 52.05 | 2.90 |

## 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.

## ADDITIONAL RESOURCES

## SUNRISE / SUNSET TABLES

U.S. NAVAL ObSERVATORY: https://aa.usno.navy.mil/data/

## SEVERE STORM REPORTS

Storm Prediction Center: https://spc.noaa.gov/climo/

National Centers for Environmental Information:
https://www.ncdc.noaa.gov/stormevents/

SEASONAL OUTLOOKS
Climate Prediction Center:
https://www.cpc.ncep.noaa.gov/products/OUTLOOKS_index.php/
CLIMATE CALENDARS AND OTHER LOCAL WEATHER AND CLIMATE INFORMATION Oklahoma Climatological Survey:
https://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
CONTENT AND LAYOUT ASSISTANT
Andrea Dawn Melvin Outreach Program Manager, K20

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

