## **2023 Climate Summary – Georgia**

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In 2023, Georgia experienced excessive heat, tornadoes, rapid-onset drought, and a hurricane, as well as plenty of days of normal weather. Overall, 2023 was the 6<sup>th</sup> warmest year on record in Georgia, tying with 2020 on a record extending back to 1895. This year's rainfall accumulation was below normal in the northern and western parts of the state, but precipitation levels were normal when analyzed statewide. The year started in La Nina conditions, shifted to ENSO-neutral in February, and shifted into El Nino in June. The El Nino pattern continued through the end of the year.



The three-month period of January, February, and March was the warmest on record, and each month individually ranked within the top 20 warmest. Severe weather was prevalent at the start of the year with twenty-five tornadoes observed in January, one tornado in February, and six in March. January was wet, ranking as the 12<sup>th</sup> wettest January on record. February, however, was dry, measuring almost a full inch below normal. March rainfall amounts were closer to normal. Drought conditions were present in the entire southern half of the state at the start of the year but improved throughout January and only lingered in the southern two corners of the state in February and March.

In contrast to the first three months of the year, April, May, and June marked a three-month period of cooler than normal temperatures. Although April was slightly warmer than normal, cooler temperatures in May and June pulled the three-month average temperature to 0.7 F below normal. In June, Canadian wildfires that had been present since March intensified. At several points throughout the summer, smoke was transported across the continental US and resulted in PM<sub>2.5</sub> exceedances in Georgia. April and June both received greater than 1 inch above normal precipitation levels, while March received a relatively normal amount of precipitation. Moderate drought (D1)

dissipated from April through May, and from May to June only small areas of Abnormally Dry (D0) conditions were present in Georgia.

In July through September, Georgia returned to warmer than normal temperatures. The three-month period was the 13<sup>th</sup> warmest on record. July 2023 was the 16<sup>th</sup> warmest July on record and August was the 8<sup>th</sup> warmest on record. Although the first two months of summer broke heat records throughout the state, September experienced normal average temperatures. Notably, on August 30<sup>th</sup> Hurricane Idalia made landfall as a Category 3 storm in Florida and traveled across South Georgia, where the hurricane spawned at least three tornadoes. St. Simons Island measured their highest wind gust on record of 67 mph, and Baxley, Georgia measured 8.19" of rain. The months of July and September both recorded approximately an inch below normal rainfall, but Hurricane Idalia briefly broke the dry trend of the season during August. Drought remained minimal in July and August but started to expand in September.

The three-month period of October, November, and December was slightly warmer than normal with the average temperature measuring 1.9 F warmer than the historical average. Each of these three months had a positive temperature anomaly, but December was the most notable with an average temperature 3.4 F above normal. October and November were both drier than normal, while a normal amount of rain fell in December. Drought intensified rapidly from late September through October and into November. Northwest Georgia reached Extreme Drought (D3) in October and Exceptional Drought (D4) in November. The last time Georgia experienced D4 was in December of 2016. Fortunately, the D4 improved to D3 by the end of November, and by the end of December almost no D3 remained. However, almost the entire northern half of the state was still experiencing drought conditions at the end of December. As a result of this drought, a few small wildfires broke out in Northwest Georgia and caused  $PM_{2.5}$  exceedances on the  $22^{nd}$  and  $23^{rd}$  of December.

## Citations:

NOAA National Centers for Environmental information, Climate at a Glance: Statewide Rankings, published January 2024, retrieved on January 10, 2024 from <a href="https://www.ncei.noaa.gov/access/monitoring/climate-at-a-glance/statewide/rankings">https://www.ncei.noaa.gov/access/monitoring/climate-at-a-glance/statewide/rankings</a>