

Climate Summary for Florida – January 2025

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Summary

- Average monthly temperatures in January were well below normal in Florida.
- Monthly precipitation totals were generally below to near normal in January, except for parts of Northeast Florida which were above normal. On January 21-22, historic snowfall and a wintry mix of snow, sleet, and freezing rain affected the Panhandle and northern Florida.
- By the end of January, approximately 17% of the state was in moderate drought (D1) and 45% was abnormally dry (D0), according to the U.S. Drought Monitor.
- La Niña conditions emerged in the tropical equatorial Pacific Ocean during December 2024 and are expected to persist through February-April (59% chance) before transitioning to ENSO-neutral likely during March-May 2025 (60% chance).

Average monthly temperatures in January were well below normal across Florida. Average monthly temperature departures from normal ranged from -6.1 °F in Gainesville to -1.9 °F in Miami for the month (see Table 1 and Appendix 1 for select cities). A cold Arctic outbreak affected much of the state during the week of January 20, stretching as far south as Naples in Southwest Florida. Southeast Florida missed out on the worst of the cold but also experienced below average temperatures. **Gainesville** tied for its coldest January on record, with a monthly average temperature of 48.7 °F, which ties with 2003. The lowest temperatures of the month arrived on January 22-23 in the western Panhandle, when the minimum temperature departures from normal were ranged from -24 °F to -31 °F below normal. Warming occurred during the last few days of the month, with mean temperatures rebounding to well above normal. Select daily low maximum temperature records tied or broken during the month are provided in Appendix 3.

Table 1. January average temperatures and departures from normal (°F) for selected cities.

Station	Mean Temperature	Departure from Normal
Pensacola	47.7	-5.5
Tallahassee	47.1	-5.1
Jacksonville	48.4	-5.8
Orlando	56.6	-4.0
Tampa	57.3	-4.7
Miami	66.7	-1.9
Key West	68.3	-2.3



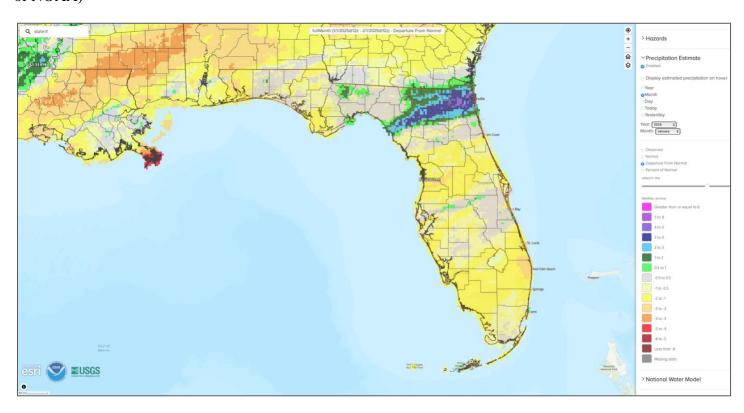


Monthly precipitation totals were generally below to near normal in January, except for parts of Northeast Florida which were above normal. The monthly precipitation departures from normal ranged from -0.94 inches in Miami to +3.32 inches in Jacksonville (see Table 2 and Appendix 1 for select locations). On January 21-22, a wintry mix of snow, sleet, and freezing rain fell across the Florida Panhandle and northern Florida with the highest accumulations of snowfall occurring in the western and northern parts of the Panhandle. The highest snowfall totals reported are between 9" and 10" mostly in the western Panhandle counties in and north of Pensacola. These totals rival the current state snowfall record of 4.0" in Milton, Fla. set on March 6, 1954. Locations further east around Tallahassee received a mix of sleet and snow, and places along the coast like Apalachicola saw freezing rain. Additional snowfall measurements observed during this event are provided in Appendix 3.

Table 2. January precipitation totals and departures from normal (inches) for selected cities.

Station	Total Rainfall	Departure from Normal	Total Snowfall
Pensacola	5.45	+0.42	8.9
Tallahassee	4.49	+0.08	1.9
Jacksonville	6.60	+3.32	0.1
Orlando	1.57	-0.91	NA
Tampa	3.17	+0.52	NA
Miami	0.89	-0.94	NA
Key West	1.79	-0.04	NA

Figure 1. A graphical depiction of the monthly rainfall departure from normal (in inches) for January (courtesy of NOAA)



La Niña Advisory.

La Niña conditions emerged in December 2024 in the tropical equatorial Pacific Ocean. La Niña conditions are expected to persist through February-April 2025 (59% chance) and transition to ENSO-neutral during March-May 2025 (60% chance). Since this La Niña developed relatively late in the season, temperatures in our region have been driven more by other weather and climate patterns, including a series of cold fronts and a strong polar vortex that led to well below normal temperatures in January. While this La Niña is expected to be a weak event, it can still exert its influence on our weather and climate over the next few months, which typically call for warmer and drier conditions during winter in Florida.

Hazardous Weather Events in January.

According to the Local Storm Reports issued by the local National Weather Service offices serving Florida, there were 240 individual local reports of hazardous weather events recorded across the state during the month of January (see Table 3 for a breakdown by event type). Many local storm reports of snow and wintry precipitation were submitted during the historic snowstorm. One injury was reported in Nassau County on the 22^{nd} due to a car accident on I-95 due to icy road conditions. The historic snowstorm shut down portions of I-10 in the Panhandle and closed schools across the region for several days as thawing of snow and ice occurred slowly as the cold temperatures lingered.

Table 3. Breakdown of storm reports submitted in Florida during the month of January (compiled from Iowa State University/Iowa Environmental Mesonet).

Report Type	Number of Reports
Heavy Rain	22
Hail	3
Marine Thunderstorm Wind	4
Non-Thunderstorm Wind Gust	18
Thunderstorm Wind Damage	8
Thunderstorm Wind Gust	23
Snow	154
Sleet	6
Freezing Rain	2

Daily Record Events in January.

Table 4. Summary of daily records broken in Florida in January (source: NCEI Daily Weather Records).

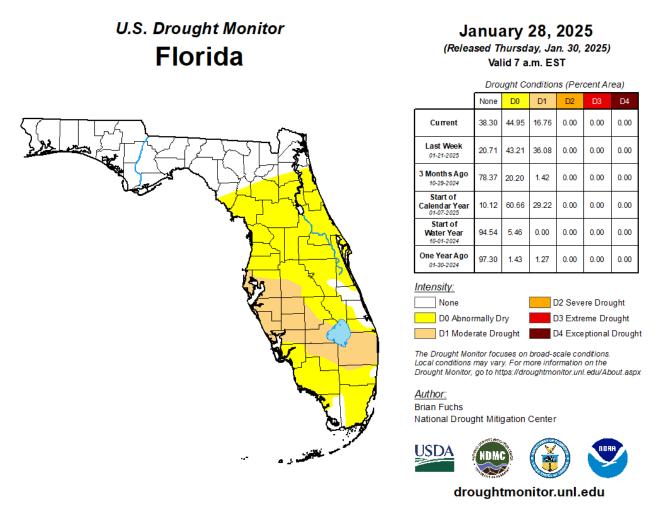
Category	Number of Records	
Highest daily max. temp.	1	
Highest daily min. temp.	1	
Lowest daily max. temp.	58	
Lowest daily min. temp.	14	
Highest daily precipitation	16	
Total	90	

Drought-Related Impacts.

Drought improved in the Panhandle but moderate drought affected parts of the Peninsula during the month. In mid-January, about 26% of the state was in moderate drought (D1) and roughly 56% of the state was abnormally dry (D0), according to the U.S. Drought Monitor. By the end of the month, moderate drought (D1) affected about 17% of the state and 45% of the state remained abnormally dry (D0) (Figure 2 below).

As of January 31, the Lake Okeechobee water level was 14.41 ft. above sea level (Feet-NGVD29), which is below average for this time of year. At the first of the month, the water level was 15.12 ft. above sea level.

Figure 3. A graphical depiction of the latest drought conditions in Florida according to the U.S. Drought Monitor (courtesy of the National Drought Mitigation Center, University of Nebraska-Lincoln).



Agriculture-Related Impacts.

The cold temperatures and wintry precipitation in January led to problems with some crops. Snow delayed field work for some producers, and numerous reports of crop damage were made, such as to strawberries, leafy greens, citrus, and others. Snow and ice damaged some trees and blueberry bushes in northern Florida. Pasture conditions were mostly fair but did decline with the freezing temperatures and snow. As temperatures warmed near the end of the month, pasture conditions began to improve. Cattle conditions were mostly good throughout the month. Sugarcane planting and harvest progressed well, and producers have started to prepare for rice planting. For more information, consult the Crop Progress - State Stories, which is published by the USDA's National Agricultural Statistics Service December through March.

Appendix 1. Additional January departures from normal data for select Florida locations (source: NWS).

Station	Average Temperature (°F)	Departure from Normal (°F)	Total Rainfall (in.)	Departure from Normal (in.)
Gainesville	48.7	-6.1	2.50	-0.79
Sarasota	59.1	-3.3	1.08	-1.71
Melbourne	57.4	-4.3	1.59	-1.04
Fort Myers	61.5	-3.2	0.54	-1.89
West Palm Beach	64.3	-2.0	0.94	-2.53

Appendix 2. Select daily record low maximum temperatures broken during January (compiled from NOAA).

Location	Date	Record (°F)	Broken/Tied	Last
Fort Lauderdale	8	59	Broken	63 in 2006
Lake City	21	42	Broken	43 in 1984
Marianna	21	38	Broken	45 in 2024
Apalachicola	22	38	Broken	43 in 1940
Ocala	22	42	Broken	50 in 1985
Tampa	22	46	Tied	46 in 1985
Pensacola	22	37	Broken	45 in 1966
Orlando	22	47	Broken	48 in 1985
Gainesville	22	38	Broken	46 in 2022
Tampa	22	46	Broken	49 in 1985
Crestview	22	37	Broken	50 in 2014
Jacksonville	22	34	Broken	41 in 2022
Tallahassee	22	42	Broken	44 in 2022
Bradenton	23	47	Broken	49 in 1985
Clermont	23	44	Broken	50 in 1960
Daytona Beach	23	50	Broken	55 in 1961
Deland	23	44	Broken	53 in 2014
Hastings	23	40	Broken	46 in 2022
Kissimmee	23	46	Broken	54 in 1960
Niceville	23	38	Broken	46 in 1966
Orlando	23	49	Broken	50 in 1960
Tampa	23	49	Broken	52 in1960
Clermont	24	46	Broken	50 in 2016

Appendix 3. Select preliminary snowfall totals, in inches, generally from 7:00 am EST January 21 through 9:00 am EST January 22, compiled from the Weather Prediction Center and NWS offices.

Station	Total Snowfall (in)
1 NE Ferry Pass	10.0
Milton	9.8
Pace	9.0
Pensacola Intl AP	8.9
Bellview 1 W	8.0
Pensacola Beach	7.5
Crestview	9.0
Bonifay	6.0
Defuniak Springs	4.75