



Wallace State Office Building

502 E 9th St, Des Moines, IA 50319

(515) 281.5321

www.lowaAgriculture.gov

IOWA MONTHLY WEATHER SUMMARY – JANUARY 2019

<u>General Summary</u>: lowa temperatures averaged 18.7 degrees or 0.7 degrees below normal while precipitation totaled 1.28 inches or 0.36 inches above average. Along with 1885, this ranks as the 43rd wettest January in 147 years of statewide observational records. It was also the 71st coldest January. A colder January last occurred in 2018; a wetter January was last recorded in 2017.

Temperatures: The unseasonable warmth observed in December continued through the first half of the month with the first week of January experiencing the warmest conditions statewide. January's warmest days occurred from the 5th through the 7th. Average temperatures were between 18 to 25 degrees above normal across much of lowa; daytime highs across the southern half of lowa were between 55 and 60 degrees. Overall, 15 days were unseasonably warm statewide; 14 days were unseasonably cool. January was trending warmer than average for much of Iowa until a destabilization in the Polar Vortex led to an extreme cold outbreak across much of the upper Midwest. The last three days of the month were bitterly cold statewide as a result of an Arctic air intrusion. Daytime highs, overnight lows and wind chill values were the lowest observed since 1996. Multiple overnight lows and record low daytime highs were also broken. The coldest conditions were reported near sunrise on the 30th with temperatures ranging from the -20s in southern Iowa to -30s in northern Iowa. Wind chill readings plummeted into the -50s in northern Iowa; Estherville Municipal Airport (Emmet County) reported a wind chill temperature of -59 degrees. In terms of monthly temperature extremes, a high of 64 degrees was observed on the 7th in Keokuk (Lee County), 30 degrees above average. The coldest overnight low of -35 degrees was reported at Manchester (Delaware County), Maquoketa (Jackson County) and Vinton (Benton County) on the 31st; this reading was around 45 degrees below average. A new all-time record low of -30 degrees was set in Cedar Rapids (County) on the 30th. This reading broke the previous record of -29 degrees set on January 15th, 2009.

<u>Heating Degree Day Totals</u>: Home heating requirements, as estimated by heating degree day totals, averaged 2% less than last January and 2% more than normal. Degree day totals for the winter season thus far have averaged 5% greater than last season at this time and 2% more than normal.

<u>Precipitation</u>: January was an active month in terms of winter systems moving through the state. A strong winter storm moved through the southern two-thirds of lowa with snow totals ranging from 8 – 12 inches January 12th and 13th. Stations in Davis, Des Moines and Page counties reported snow totals above 10 inches. Another winter system moved through the following weekend (22nd and 23rd) with northeastern lowa reporting snow totals approaching 12 inches. Cresco (Howard County) observed 11.3 inches, 11.0 inches above average. One final storm system moved through lowa on January 27th into the morning hours of the 28th. Most of the northeastern two-thirds of lowa saw measurable snowfall, ranging from 2 – 4 inches in central and southeastern lowa to near ten inches in the northeast. Bellevue (Jackson County) reported 10.5 inches, 9.6 inches above average; New Hampton (Chickasaw County) and Muscatine (Muscatine County) observed 9.0 inch totals, 8.4 and 8.7 inches above normal, respectively. This winter storm was the precursor to the Arctic air intrusion that brought dangerously cold air into the state beginning on January 29th. Monthly precipitation totals (rain plus liquid equivalent of snow) varied from only 0.10 inches at Sioux City (Woodbury), 0.61 inches below average to 3.67 inches at Burlington (Des Moines County), 2.27 inches

above average. The statewide average snowfall was 13.5 inches or 5.8 inches above normal. Lowden (Cedar County) reported 30.2 inches of snow, 18.7 inches above average. This ranks as the 9th highest January total in 132 years of statewide observational records. Through the end of January, the season-to-date total snow accumulation is 21.3 inches, slightly above the normal total of 19.0 inches.

Justin Glisan, Ph.D.
State Climatologist of Iowa
Iowa Dept. of Agriculture & Land Stewardship
Wallace State Office Bldg.
Des Moines, IA 50319
Telephone; (515) 281-8981

E-mail: <u>Justin.Glisan@IowaAgriculture.gov</u>

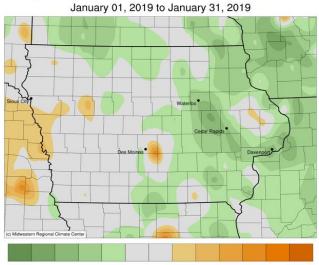


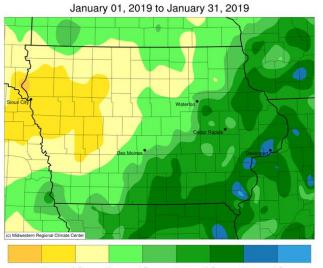
January 2019 WEATHER BY DISTRICTS

	TEMPERATURE (F)		HEATING DEGREE DAYS			YS	PRECIPITATION (inches)				
											SNOWFALL
	January 2019		January 2019		Since Jul., 1, 2018		January 2019		Since Nov.1, 2018		Jan 2019
DISTRICT	Average	Departure*	Average	Departure*	Average	Departure*	Average	Departure*	Average	Departure*	Average
Northwest	16.5	+0.1	1504	+14	4603	+87	0.24	-0.43	3.30	+0.20	3.0
North Central	15.3	-0.3	1541	+29	4609	+74	0.79	-0.04	4.36	+0.44	13.2
Northeast	15.2	-1.8	1544	+55	4511	+63	1.79	+0.77	6.14	+1.35	18.7
West Central	20.4	+1.1	1383	-14	4248	+69	0.23	-0.55	3.47	-0.03	2.4
Central	18.5	-0.6	1442	+33	4205	+50	1.10	+0.18	5.16	+0.78	12.5
East Central	18.2	-2.4	1451	+67	4134	+104	2.19	+1.04	6.84	+1.54	22.3
Southwest	22.7	+0.3	1311	+1	3989	+127	1.00	+0.19	4.58	+0.59	12.1
South Central	21.8	-0.5	1339	+31	3947	+126	2.07	+1.18	6.34	+1.80	18.8
Southeast	21.2	-2.3	1358	+60	3931	+196	2.61	+1.34	7.30	+1.64	17.1
STATE	18.7	-0.7	1442	+38	4230	+90	1.28	+0.36	5.19	+0.88	13.5

* Departures are computed from 1981-2010 normals. The weather data in this report are based upon information collected by the U. S. Dept. of Commerce, NOAA National Weather Service.

Average Temperature (°F): Departure from 1981-2010 Normals Accumulated Precipitation (in): Departure from 1981-2010 Normals





Stations from the following networks used: WBAN, COOP, FAA, GHCN, ThreadEx, CoCoRaHS, WMO, ICAO, NWSLI, Midwestern Regional Climate Center (HMATE: MRCC Application Tools Environment Generated at: 2/1/2019 8:38:24 AM CST

-0.5 0 0.5 1 1.5 2
Stations from the following networks used: WBAN, COOP, FAA, GHCN, ThreadEx, CoCoRaHS, WMO, ICAO, NWSLI, Midwestern Regional Climate Center cli-MATE: MRCC Application Tools Environment Generated at: 24/2019 8:34-46 AM CST

Accumulated Snowfall (in)

January 01, 2019 to January 31, 2019

