

MONTHLY CLIMATE SUMMARY, DECEMBER 2013

NIU WEATHER SERVICE: DE KALB, ILL.

Day	Record HI	Record LO	Average HI	Average LO	Obs. HI	Obs. LO	Obs. Avg.	GDD	HDD	CDD	Precip. (in)	Snowfall (in)
1	63	4	38	26	48	24	36	0	29	0	0	0
2	64	-5	38	24	42	30	36	0	29	0	0	0
3	66	-14	38	23	40	33	36.5	0	28.5	0	0.01	0
4	69	-4	36	21	46	36	41	0	24	0	0.02	0
5	64	-4	35	21	52	24	38	0	27	0	0.03	0
6	65	-7	35	18	24	12	18	0	47	0	0	0
7	66	-9	34	19	16	4	10	0	55	0	0	0
8	63	-8	34	21	17	4	10.5	0	54.5	0	0	0
9	59	-18	34	20	22	14	18	0	47	0	0.18	2.7
10	56	-18	35	19	16	-7	4.5	0	60.5	0	T	T
11	60	-15	34	19	22	7	14.5	0	50.5	0	0.2	2.4
12	55	-10	33	17	19	-10*	4.5	0	60.5	0	T	0.2
13	60	-19	32	18	17	1	9	0	56	0	0	0
14	58	-12	33	21	29	12	20.5	0	44.5	0	0.19	1.2
15	59	-14	35	20	28	8	18	0	47	0	T	0.2
16	58	-17	34	19	12	6	9	0	56	0	T	0.3
17	57	-13	31	18	19	7	13	0	52	0	0.04	0.9
18	56	-12	29	15	33	10	21.5	0	43.5	0	T	0.5
19	55	-17	29	15	31	12	21.5	0	43.5	0	0	0
20	57	-19	30	15	37	24	30.5	0	34.5	0	0.23	0
21	57	-18	31	16	32	25	28.5	0	36.5	0	0.06	0
22	55	-12	31	16	32	25	28.5	0	36.5	0	0.34	0.9
23	58	-17	31	16	29	8	18.5	0	46.5	0	0.04	0.5
24	55	-22	29	14	8	-10	-1	0	66	0	T	T
25	60	-13	27	12	19	-9	5	0	60	0	T	0.1
26	56	-22	28	12	24	10	17	0	48	0	0.03	0.5
27	55	-20	30	17	31	11	21	0	44	0	T	T
28	64	-24	33	18	38	18	28	0	37	0	0	0
29	63	-12	32	17	41	29	35	0	30	0	0	0
30	59	-13	31	14	41	-5	18	0	47	0	T	T
31	57	-14	33	18	5	-6	-0.5	0	65.5	0	0.04	0.7

*Tied record low

Temperature

1981-2010 AVG. HI: 35.6(F)
 1981-2010 AVG. LOW: 17.9(F)
 1981-2010 AVG. TEMP.: 25.3(F)
 December 2013 AVG. HI: 28.1(F)
 December 2013 AVG. LO: 11.2(F)
 December 2013 AVG. TEMP.: 19.6(F)

Precipitation

December 2013 TOTAL: 1.41 in.
 December AVG.: 2.17 in.
 December 2013 SNOW: 11.1 in.
 December SNOW AVG: 10.0 in.
 2013 liquid-eq. YEAR TO DATE: 41.28 in.
 liquid-eq. YEAR TO DATE AVG.: 36.79 in.
 2013-14 Seasonal SNOW TO DATE: 12.4 in.
 Seasonal SNOW TO DATE AVG.: 11.2 in.

Degree Days

COOLING: 12/13: 0
 1/13-Now: 729.5
 HEATING: 12/13: 1406.5
 7/13-Now: 2875
 GROWING: 12/13: 0
 1/13-Now: 2833

Discussion

December's mean temperature of 19.6°F was 5.7 degrees cooler than the historical mean, with an average high and low also at least five degrees below average. December's highest temp was on 5th at 52°F, the lowest was -10°F set on both the 12th and 24th. This ties the record low for Dec. 12th. December highs and lows were overall below normal, with 14 days of highs and 8 days of lows above average. Of the days below normal, twelve highs and thirteen lows were over 10°F below their daily historical mean. Three of these highs and five lows were over 20 degrees below daily average. Liquid Equivalent precipitation total for the month of December was 1.41 in. which is 0.76 in. less than historical mean. Total snowfall, on the other hand, was 1.1 inches above average at 11.1". The 2013 year's liquid equivalent precipitation stands at 41.28 inches, just about 4.5" above average. The '13-'14 seasonal snow is 12.4" which is just over an inch above the historical mean. There was also a large accumulation of Heating Degree Days, 1405.5, this month due to the below average temperatures.

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This summary was prepared by Richard Mediccotti, 3 January 2014. Forecast information (updated once daily at approx. 7:30 am): (847) 848-4082.

Climate Website: <http://climate.niu.edu>

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December 2013 Daily Highs and Lows with 1981-2010 Average Highs and Lows

Prepared by Richard Medicott, NIU Weather Director

