



U. S. DEPARTMENT OF COMMERCE, WEATHER BUREAU  
 IN COOPERATION WITH HICKORY CHAMBER OF COMMERCE  
 CLIMATOGRAPHY OF THE UNITED STATES NO. 20 - 31

CLIMATOLOGICAL SUMMARY

STATION HICKORY, N. C.

LATITUDE 35° 45' N  
 LONGITUDE 81° 21' W  
 ELEV. (GROUND) 1165 Ft.

MEANS AND EXTREMES FOR PERIOD 1932 - 1961

Month	Temperature (°F)							** Mean degree days	Precipitation Totals (Inches)						Mean number of days					Month			
	Means			Extremes					Mean	Greatest daily	Year	Snow, Sleet			Precip. .10 inch or more	Temperatures							
	Daily maximum	Daily minimum	Monthly	Record highest	Year	Record lowest	Year					Mean	Maximum monthly	Year		Greatest daily	Year	90° and above	Max.		Min.		
																			below 32°		and below 32°	below 32°	and below 0°
(a)	30	30	30	30		30		30	30	30		30	30		30	30	30	30	30				
Jan.	51.1	31.1	41.1	79	1944	1	1940	740	4.12	2.71	1936	1.3	10.9	1940	8.0	1944	7	0	1	18	0	Jan.	
Feb.	53.2	31.6	42.4	81	1948	3	1958	630	4.16	2.28	1946	2.5	15.5	1936	10.0	1948	7	0	*	16	0	Feb.	
Mar.	60.4	37.2	48.8	90	1945	6	1960	512	4.72	3.04	1952	1.7	21.0	1960	12.5	1942	8	*	0	11	0	Mar.	
Apr.	70.0	46.8	58.4	91	1960	21	1950	220	3.83	2.74	1934	T	T		T		7	*	0	2	0	Apr.	
May	79.4	55.0	67.2	97	1953	35	1960	66	3.51	2.11	1960						7	3	0	0	0	May	
June	86.6	63.4	75.0	103	1954	45	1954	0	4.02	3.30	1947						7	12	0	0	0	June	
July	88.2	66.2	77.2	105	1952	51	1933	0	5.34	3.42	1951						9	15	0	0	0	July	
Aug.	86.7	65.9	76.3	101	1954	50	1952	0	5.63	7.92	1940						8	13	0	0	0	Aug.	
Sep.	82.0	59.6	70.8	101	1954	34	1947	30	3.74	5.25	1959						6	5	0	0	0	Sep.	
Oct.	73.2	47.8	60.5	96	1954	23	1952	172	3.41	3.25	1947	T	T		T		5	1	0	1	0	Oct.	
Nov.	60.6	37.2	48.9	86	1950	10	1950	490	3.19	2.43	1946	T	1.0	1950	1.0	1950	5	0	0	12	0	Nov.	
Dec.	51.2	30.4	40.8	76	1956+	7	1957	754	3.99	3.15	1961	1.2	9.0	1935	8.0	1935	7	0	1	20	0	Dec.	
Year	70.3	47.7	59.0	105	1952	1	1940	3614	49.66	7.92	1940	6.7	21.0	1960	12.5	1942	83	49	2	80	0	Year	

(a) Average length of record, years.

+ Also on earlier dates, months, or years.

T Trace, an amount too small to measure.

\* Less than one half.

\*\* Base 65°F

CLIMATE OF HICKORY, NORTH CAROLINA

HICKORY is the principal city of Catawba County, in the western part of the North Carolina Piedmont. The Catawba River system runs along the northern border of the County; Hickory is located in the broad, fertile valley lying south of the river. The valley is mostly between 900 and 1200 feet above mean sea level; the highest elevations within Catawba County are about 2000 feet.

The climate of Hickory is greatly modified by the sheltering effect of the mountains, especially the main ridge of the Appalachians, extending northeast-southwest only about fifty miles away at the nearest point on the northwest. This mountain barrier tends to hold back the periodic outbursts of cold air which move southeastward across the Great Plains in winter, so that the shallower of these outbreaks are turned aside without ever reaching Hickory, while the stronger and deeper are modified in crossing the high ridge. Thus the coldest weather which occurs at Hickory is only a few degrees colder than that of the lower lying areas to the east. In fact, the records indicate that there are fewer days at Hickory when the temperature fails to rise above freezing than at some points in Piedmont and eastern North Carolina.

The average length of freeze-free growing season at Hickory is around 210 days. The average date of last occurrence in spring of a temperature as low as 32 degrees is April 4; of 28 degrees, March 22; of 20 degrees, February 21. The average date of first occurrence in autumn of 32 degrees is October 31; of 28 degrees, November 13; of 20 degrees, November 29. The chance of having a freeze after the last week in April or before the first week in October is only about one in ten. These figures are based on observations at Hickory, and some variations exist from place to place even at similar elevations and in the same general area.

Summer days are often warm in Hickory, but nights cool rapidly, so that the average temperature at sunrise is not above the middle sixties even at the warmest time of year. Daytime heat is rarely extreme; while 100 degree temperatures have been recorded at one time or another in June, July, August and September, such occurrences are rare. Thus, several years may pass without any 100 degree weather.

Precipitation is abundant in Hickory, and unusually well distributed throughout the year. No month of the year averages as little as three inches, and none as much as six inches. The greatest amounts of rain fall, on an average, in July and August, when the greatest amounts of water are required by crops, as well as for industrial and personal use. October and November, the harvest months, are normally the driest.

Some snow falls in Hickory nearly every winter, but the amounts are rarely large. An accumulation of an inch or more on the ground occurs, on an average, only two or three times a season, and this usually melts within a few days. An accumulation of as much as twelve inches on the ground has occurred only once in the thirty years covered by this summary.

Winter rain and snow usually come as a result of moving low pressure systems, while summer rains more often result from local thunder-showers. Occasionally these thunderstorms produce strong winds or hail, but neither is likely to affect more than a few square miles; the likelihood of a given point in Catawba County being struck by hail or damaging winds is very small. Autumn rainfall is sometimes increased by the movement of a tropical storm through the eastern part of the State, but the passage of such a storm far enough inland to cause damaging winds in Hickory is very rare.

Prevailing winds at Hickory are from the southwest in spring and summer, and from the northeast in fall and winter. The average speed of the wind at the earth's surface is about eight miles per hour.

The sun shines more than half the daylight hours in Hickory, with the greatest amount of sunshine in late spring and early summer and the least in winter. Relative humidity averages about 70 percent around the year, with the highest humidities occurring in the late summer and the lowest in spring.

CHARLES B. CARNEY  
 Meteorologist in Charge

ALBERT V. HARDY  
 State Climatologist

Weather Bureau Airport Station  
 Raleigh-Durham Airport  
 North Carolina

*M82.2173*  
*U158702*  
*no. 20-31*  
*N.C. - Hickory*

Average Temperature (°F)

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Ann'l
1932	49.2	50.6	47.4	58.8	66.2	75.2	80.4	76.3	71.6	61.0	47.0	43.8	60.6
1933	48.6	42.4	49.8	58.2	71.3	78.0	77.6	76.2	74.8	61.2	49.8	47.8	61.3
1934	43.8	36.6	46.9	59.0	67.7	76.6	79.6	76.7	72.6	60.7	51.8	47.4	59.4
1935	40.6	43.2	54.4	57.4	66.0	75.0	77.0	77.0	71.8	62.0	53.2	35.4	59.4
1936	36.4	39.3	52.0	55.6	70.4	76.2	80.2	77.2	73.2	62.2	48.4	43.2	59.5
1937	48.8	42.4	48.8	58.0	67.4	76.6	76.8	77.4	68.4	55.7	46.2	40.8	58.9
1938	40.2	46.8	55.0	58.4	67.3	71.9	76.0	78.0	71.4	61.1	52.7	41.5	60.0
1939	43.2	46.2	52.7	58.0	66.7	77.6	76.2	75.8	74.2	63.4	47.8	43.2	60.4
1940	29.8	41.0	45.8	57.0	65.5	74.8	75.4	74.3	68.4	60.7	49.0	45.0	57.2
1941	41.6	38.5	44.9	61.8	69.8	74.5	77.4	77.2	74.0	66.9	50.7	45.2	60.2
1942	40.4	38.9	51.2	61.9	67.8	76.0	79.0	75.4	71.2	61.8	51.4	40.5	59.6
1943	43.8	45.4	47.8	57.2	68.9	79.3	76.4	77.7	68.2	60.4	49.6	43.4	59.8
1944	41.6	46.0	49.3	58.1	70.6	77.2	75.1	76.8	72.2	60.4	48.0	36.5	59.2
1945	39.5	42.5	57.8	61.1	64.0	73.2	76.8	75.5	72.9	59.0	50.2	35.4	58.2
1946	40.1	45.0	56.0	61.2	65.8	74.7	76.1	74.1	69.7	60.6	53.0	44.5	60.1
1947	43.0	35.4	41.6	60.8	67.4	73.1	73.9	77.8	71.4	63.1	46.4	41.0	57.9
1948	38.7	43.0	52.8	62.6	67.8	75.8	79.0	75.6	69.3	57.8	52.1	43.9	59.5
1949	48.6	47.5	51.2	57.7	67.6	75.8	79.2	75.7	67.8	63.5	47.4	40.6	60.2
1950	49.1	44.0	45.6	55.5	68.5	73.7	74.9	73.8	67.9	61.8	45.1	35.4	57.9
1951	38.5	41.0	48.6	55.8	66.1	74.2	77.1	76.5	70.2	61.4	43.2	41.1	57.8
1952	44.9	42.4	47.4	57.2	66.6	78.6	79.6	75.3	69.0	55.8	47.6	38.5	58.7
1953	43.1	43.4	49.8	56.0	71.2	75.7	77.0	76.0	68.4	61.5	48.1	38.4	59.2
1954	39.3	45.0	45.7	60.9	61.5	74.0	78.2	77.9	73.0	62.2	44.5	37.0	58.3
1955	38.6	40.3	50.9	61.3	68.7	69.5	78.5	78.3	71.2	58.8	36.4	38.3	58.3
1956	36.8	43.6	47.2	55.3	67.7	74.4	77.4	77.1	68.2	60.4	46.6	49.1	58.7
1957	39.5	45.3	47.3	61.0	68.5	73.4	76.6	76.9	71.6	54.8	49.0	42.0	58.7
1958	33.9	33.0	43.9	56.3	66.7	73.4	77.7	76.1	69.5	57.8	51.8	36.3	56.4
1959	37.5	43.5	45.3	58.7	69.0	72.9	76.7	77.7	69.9	70.2	47.4	46.3	58.2
1960	39.8	37.4	35.6	60.0	63.9	73.3	75.6	76.3	69.6	60.0	48.5	35.3	56.3
1961	35.2	42.5	30.7	51.1	61.8	70.8	74.9	74.2	72.0	58.2	32.5	38.9	57.0

Total Precipitation (Inches)

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Ann'l
1932	5.77	2.33	5.46	1.91	3.71	6.85	.69	10.31	1.42	12.94	7.69	6.64	65.72
1933	2.16	3.96	2.80	2.80	4.96	2.38	4.73	3.38	1.90	1.20	3.02	3.32	34.44
1934	2.51	4.48	8.07	4.46	3.26	2.00	7.65	9.64	4.30	4.19	5.66	2.41	58.63
1935	3.98	3.29	5.54	3.68	2.85	1.67	7.68	1.27	3.06	2.44	3.75	3.01	42.22
1936	10.95	5.74	6.44	7.21	.17	2.09	6.47	6.57	3.41	5.76	1.09	7.16	63.06
1937	10.65	3.02	1.51	4.41	1.95	4.75	4.89	5.40	1.45	7.73	2.12	2.46	50.34
1938	2.33	1.24	3.60	2.54	3.60	2.71	6.87	2.99	2.25	.83	4.75	2.83	36.54
1939	4.66	9.33	3.06	1.90	1.80	3.22	8.24	6.03	.33	2.11	1.11	3.36	45.15
1940	2.99	4.30	3.26	2.47	2.58	2.46	2.72	15.10	.64	2.39	3.90	3.79	46.60
1941	2.17	1.19	3.84	4.00	1.29	5.76	10.96	4.78	1.77	.84	2.58	4.15	43.33
1942	3.14	4.66	4.14	1.41	4.48	4.22	3.62	3.57	6.46	1.80	2.08	7.88	47.46
1943	3.88	2.11	4.90	3.51	3.72	3.61	8.97	2.75	2.33	.75	1.61	3.02	42.96
1944	3.56	5.55	8.03	4.90	3.51	1.32	7.04	2.87	7.50	3.99	2.89	2.28	53.44
1945	2.19	4.32	3.26	2.95	3.16	2.02	6.76	1.01	10.97	2.84	2.87	5.94	48.29
1946	4.05	4.45	4.79	3.11	4.31	3.63	2.03	4.15	3.55	3.50	3.54	2.67	43.78
1947	5.36	1.10	3.02	3.77	5.04	6.73	4.44	5.25	4.53	9.53	6.33	1.74	56.84
1948	4.37	5.19	5.78	2.83	4.89	3.43	2.15	12.05	3.20	1.75	8.46	5.12	59.22
1949	3.80	3.45	3.26	4.22	3.45	3.17	7.12	11.03	4.79	4.75	1.10	2.26	52.40
1950	2.53	2.55	6.47	1.23	6.49	7.34	2.19	3.71	3.16	3.56	1.56	3.22	44.01
1951	1.54	3.45	4.53	4.89	.79	4.84	7.73	6.14	2.32	.71	3.06	6.61	46.61
1952	4.53	4.32	10.84	3.53	3.19	3.78	1.25	9.36	1.14	1.34	2.31	2.73	48.32
1953	4.41	5.26	5.95	1.35	3.15	5.96	2.92	3.96	5.47	.33	2.05	5.56	46.37
1954	8.32	2.43	2.87	1.86	4.64	1.53	2.31	2.16	.23	1.59	5.20	4.18	40.32
1955	1.17	4.46	5.68	5.17	4.63	4.28	3.18	3.22	2.88	3.17	1.84	.53	37.21
1956	1.53	6.81	3.58	5.68	2.69	1.06	4.95	4.52	8.29	3.22	1.32	4.15	47.80
1957	4.03	6.39	2.96	4.74	4.08	12.53	3.35	1.84	8.97	2.97	7.46	3.25	62.57
1958	4.10	3.87	4.52	9.08	4.20	3.63	4.93	4.26	1.62	2.62	2.37	5.56	50.76
1959	3.73	3.15	4.98	5.69	4.39	5.14	5.85	8.02	7.15	8.33	1.84	4.22	62.49
1960	4.54	7.41	4.30	4.59	3.67	2.88	5.42	4.96	6.50	3.55	1.01	1.40	50.23
1961	2.86	5.80	4.03	5.07	4.56	5.51	5.95	8.21	.47	1.55	3.46	8.35	53.82

## STATION HISTORY

Daily observations of maximum and minimum temperature and total precipitation have been made within the city of Hickory since 1913. Since 1944 the records have been kept by the Hickory Daily Record.