

Climatology of the United States

No. 20

1971-2000

Station: MATADOR, TX

COOP ID: 415658

Climate Division: TX 2

NWS Call Sign:

Elevation: 2,290 Feet Lat: 34°01N

Lon: 100°50W

Temperature (°F)

Mean (1)				Extremes										Degree Days (1) Base Temp 65		Mean Number of Days (3)					
Month	Daily Max	Daily Min	Mean	Highest Daily(2)	Year	Day	Highest Month(1) Mean	Year	Lowest Daily(2)	Year	Day	Lowest Month(1) Mean	Year	Heating	Cooling	Max >= 100	Max >= 90	Max >= 50	Max <= 32	Min <= 32	Min <= 0
Jan	53.1	27.3	40.2	85	1970	25	47.0	1989	-4	1959	4	29.3	1979	770	0	.0	.0	19.4	3.1	22.0	.0
Feb	58.2	31.6	44.9	93	1979	15	53.2	1976	-4	1948	12	33.2	1978	565	2	.0	.1	20.4	2.0	15.3	@
Mar	66.6	38.4	52.5	100	1971	28	57.4	1974	3	1948	11	47.8	1998	390	2	@	.7	27.6	.4	7.5	.0
Apr	75.4	47.0	61.2	103	1972	13	67.4	1978	22	1973	10	54.5	1997	167	54	@	2.7	29.1	.0	1.3	.0
May	82.6	56.5	69.6	108	2000	25	76.3	1996	32	1954	3	65.2	1976	38	178	1.1	7.2	30.9	.0	.0	.0
Jun	90.2	65.4	77.8	116	1994	28	84.5	1998	46	1964	1	72.9	1982	4	388	3.1	16.6	30.0	.0	.0	.0
Jul	94.8	69.6	82.2	111+	1978	16	87.9	1980	54	1950	14	78.1	1975	0	533	6.9	25.5	31.0	.0	.0	.0
Aug	92.7	68.2	80.5	111	1964	6	85.2	1980	52+	1962	26	76.3	1971	0	478	3.6	23.0	31.0	.0	.0	.0
Sep	85.3	60.7	73.0	106	1977	27	79.9	1998	37+	1989	24	65.3	1974	21	262	1.1	12.2	29.9	.0	.0	.0
Oct	76.2	50.1	63.2	105	1977	1	67.8	1979	22+	1993	31	55.3	1976	115	58	.2	2.2	30.5	@	.6	.0
Nov	63.5	38.0	50.8	91	1980	9	58.0	1999	12+	1991	3	43.3	1972	434	6	.0	.1	25.1	.4	8.4	.0
Dec	54.8	29.7	42.3	85	1955	24	46.9	1980	-5	1989	23	29.7	1983	705	0	.0	.0	20.7	2.2	19.2	.1
Ann	74.5	48.5	61.5	116	Jun 1994	28	87.9	Jul 1980	-5	Dec 1989	23	29.3	Jan 1979	3209	1961	16.0	90.3	325.6	8.1	74.3	.1

+ Also occurred on an earlier date(s)

@ Denotes mean number of days greater than 0 but less than .05

Complete documentation available from: www.ncdc.noaa.gov/oa/climate/normal/usnormals.html

Issue Date: February 2004

(1) From the 1971-2000 Monthly Normals

(2) Derived from station's available digital record: 1947-2001

(3) Derived from 1971-2000 serially complete daily data

Climatography of the United States

No. 20 1971-2000

National Climatic Data Center
Federal Building
151 Patton Avenue
Asheville, North Carolina 28801
www.ncdc.noaa.gov

Station: MATADOR, TX

COOP ID: 415658

Climate Division: TX 2

NWS Call Sign:

Elevation: 2,290 Feet Lat: 34°01N

Lon: 100°50W

Precipitation (inches)																								
	Precipitation Totals									Mean Number of Days (3)				Precipitation Probabilities (1) Probability that the monthly/annual precipitation will be equal to or less than the indicated amount										
	Means/ Medians(1)		Extremes							Daily Precipitation				Monthly/Annual Precipitation vs Probability Levels These values were determined from the incomplete gamma distribution										
Month	Mean	Med-ian	Highest Daily(2)	Year	Day	Highest Monthly(1)	Year	Lowest Monthly(1)	Year	>= 0.01	>= 0.10	>= 0.50	>= 1.00	.05	.10	.20	.30	.40	.50	.60	.70	.80	.90	.95
Jan	.67	.44	1.43	1990	19	2.20	1999	.00+	1998	3.3	1.5	.4	.1	.00	.00	.07	.18	.30	.44	.61	.82	1.12	1.62	2.12
Feb	.90	.75	1.45	1961	21	2.56	1997	.01	1991	4.1	2.5	.6	.1	.02	.05	.14	.25	.38	.55	.77	1.05	1.47	2.20	2.95
Mar	1.21	.65	3.12	2000	22	6.49	2000	.00	1997	4.5	2.5	.5	.2	.01	.06	.19	.35	.54	.77	1.06	1.44	2.00	2.95	3.93
Apr	1.81	1.60	3.05	1997	25	8.42	1997	.00+	1996	5.1	3.6	1.1	.4	.00	.11	.39	.66	.96	1.31	1.72	2.23	2.95	4.15	5.34
May	3.16	2.87	3.73	1954	11	6.78	1995	.40	2000	7.3	4.9	2.3	1.0	.73	1.02	1.48	1.89	2.31	2.75	3.24	3.83	4.60	5.82	6.98
Jun	3.60	3.20	5.11	1985	5	9.57	1985	.09	1994	6.8	5.0	2.3	1.0	.48	.78	1.29	1.79	2.32	2.90	3.57	4.39	5.51	7.34	9.10
Jul	2.10	1.68	2.90	1961	9	6.37	1996	.06	1980	5.2	3.3	1.4	.7	.15	.28	.55	.83	1.16	1.53	1.98	2.55	3.34	4.67	6.00
Aug	2.41	2.38	4.15	1995	3	7.64	1995	.00	2000	6.7	4.2	1.4	.6	.14	.38	.75	1.11	1.48	1.90	2.38	2.97	3.78	5.11	6.39
Sep	3.11	2.76	3.96	1985	29	7.83	1991	.00	2000	6.5	4.4	1.9	1.0	.04	.19	.55	.97	1.46	2.05	2.79	3.74	5.10	7.43	9.78
Oct	2.09	1.12	5.30	1983	20	9.72	1983	.00	1992	5.0	3.2	1.3	.5	.02	.10	.31	.58	.90	1.31	1.81	2.48	3.44	5.13	6.83
Nov	.99	.88	1.90	1961	2	2.85	1992	.00+	1999	4.2	2.2	.7	.2	.00	.00	.16	.32	.49	.69	.93	1.23	1.65	2.35	3.04
Dec	.85	.61	2.75	1959	15	3.70	1991	.00+	1996	3.7	2.3	.5	.1	.00	.00	.16	.33	.49	.66	.85	1.09	1.41	1.93	2.43
Ann	22.90	21.71	5.30	Oct 1983	20	9.72	Oct 1983	.00+	Sep 2000	62.4	39.6	14.4	5.9	14.58	16.12	18.14	19.69	21.09	22.45	23.87	25.46	27.40	30.26	32.75

+ Also occurred on an earlier date(s)

Denotes amounts of a trace

@ Denotes mean number of days greater than 0 but less than .05

** Statistics not computed because less than six years out of thirty had measurable precipitation

(1) From the 1971-2000 Monthly Normals

(2) Derived from station's available digital record: 1947-2001

(3) Derived from 1971-2000 serially complete daily data

Complete documentation available from:
www.ncdc.noaa.gov/oa/climate/normals/usnormals.html

Climatography of the United States

No. 20 1971-2000

National Climatic Data Center
Federal Building
151 Patton Avenue
Asheville, North Carolina 28801
www.ncdc.noaa.gov

Station: MATADOR, TX

COOP ID: 415658

Climate Division: TX 2

NWS Call Sign:

Elevation: 2,290 Feet

Lat: 34°01N

Lon: 100°50W

Snow (inches)																							
Snow Totals															Mean Number of Days (1)								
Means/Medians (1)					Extremes (2)										Snow Fall >= Thresholds					Snow Depth >= Thresholds			
Month	Snow Fall Mean	Snow Fall Median	Snow Depth Mean	Snow Depth Median	Highest Daily Snow Fall	Year	Day	Highest Monthly Snow Fall	Year	Highest Daily Snow Depth	Year	Day	Highest Monthly Mean Snow Depth	Year	0.1	1.0	3.0	5.0	10.0	1	3	5	10
Jan	3.1	1.7	#	#	8.0	1973	7	12.0	1983	8	1994	31	1	1997	1.2	.9	.4	.3	.0	2.0	.7	.4	.0
Feb	2.8	1.0	#	#	9.0	1978	17	17.5	1978	9	1978	17	2	1978	1.3	1.1	.2	.1	.0	1.6	.7	.3	.0
Mar	.5	.0	#	0	3.0	1989	21	4.0	1989	3	1989	21	#+	1999	.3	.3	@	.0	.0	.2	@	.0	.0
Apr	.1	.0	#	0	2.0	1993	15	2.0	1993	1	1983	5	#+	1983	@	@	.0	.0	.0	.0	.0	.0	.0
May	.0	.0	0	0	.0	0	0	.0	0	0	0	0	0	0	.0	.0	.0	.0	.0	.0	.0	.0	.0
Jun	.0	.0	0	0	.0	0	0	.0	0	0	0	0	0	0	.0	.0	.0	.0	.0	.0	.0	.0	.0
Jul	.0	.0	0	0	.0	0	0	.0	0	0	0	0	0	0	.0	.0	.0	.0	.0	.0	.0	.0	.0
Aug	.0	.0	0	0	.0	0	0	.0	0	0	0	0	0	0	.0	.0	.0	.0	.0	.0	.0	.0	.0
Sep	.0	.0	0	0	.0	0	0	.0	0	0	0	0	0	0	.0	.0	.0	.0	.0	.0	.0	.0	.0
Oct	.1	.0	#	0	1.5	1976	29	1.5	1976	1+	1991	31	#+	1991	.1	@	.0	.0	.0	.1	.0	.0	.0
Nov	1.6	.0	#	0	9.5	1980	17	21.4	1980	11	1980	17	1	1980	.5	.4	.2	.1	.0	.2	.1	.0	.0
Dec	1.9	.2	#	#	7.0	1992	14	8.5	1971	7	1992	14	1	1992	1.1	.8	.2	.1	.0	1.0	.3	.1	.0
Ann	10.1	2.9	N/A	N/A	9.5	Nov 1980	17	21.4	Nov 1980	11	Nov 1980	17	2	Feb 1978	4.5	3.5	1.0	.6	.0	5.1	1.8	.8	.0

+ Also occurred on an earlier date(s) #Denotes trace amounts

@ Denotes mean number of days greater than 0 but less than .05

-9/-9.9 represents missing values

Annual statistics for Mean/Median snow depths are not appropriate

(1) Derived from Snow Climatology and 1971-2000 daily data

(2) Derived from 1971-2000 daily data

Complete documentation available from:

www.ncdc.noaa.gov/oa/climate/normals/usnormals.html

**Climatography
of the United States
No. 20
1971-2000**

Station: MATADOR, TX

COOP ID: 415658

Climate Division: TX 2

NWS Call Sign:

Elevation: 2,290 Feet

Lat: 34° 01N

Lon: 100° 50W

Freeze Data									
Spring Freeze Dates (Month/Day)									
Temp (F)	Probability of later date in spring (thru Jul 31) than indicated(*)								
	.10	.20	.30	.40	.50	.60	.70	.80	.90
36	4/23	4/18	4/15	4/13	4/11	4/08	4/06	4/03	3/30
32	4/13	4/09	4/06	4/03	4/01	3/29	3/27	3/23	3/19
28	4/06	3/30	3/26	3/22	3/18	3/14	3/10	3/06	2/27
24	4/02	3/24	3/17	3/12	3/07	3/02	2/24	2/18	2/09
20	3/15	3/06	2/28	2/22	2/17	2/12	2/07	1/31	1/22
16	3/08	2/24	2/16	2/09	2/02	1/26	1/19	1/10	12/27
Fall Freeze Dates (Month/Day)									
Temp (F)	Probability of earlier date in fall (beginning Aug 1) than indicated(*)								
	.10	.20	.30	.40	.50	.60	.70	.80	.90
36	10/12	10/18	10/21	10/24	10/27	10/30	11/02	11/06	11/11
32	10/24	10/29	11/02	11/05	11/08	11/11	11/14	11/18	11/23
28	10/30	11/04	11/08	11/11	11/14	11/17	11/21	11/25	11/30
24	11/08	11/16	11/22	11/26	12/01	12/05	12/10	12/16	12/24
20	11/17	11/25	12/01	12/06	12/10	12/15	12/19	12/25	1/02
16	11/15	11/27	12/05	12/12	12/19	12/26	1/03	1/12	1/26
Freeze Free Period									
Temp (F)	Probability of longer than indicated freeze free period (Days)								
	.10	.20	.30	.40	.50	.60	.70	.80	.90
36	213	208	205	202	199	196	193	190	185
32	238	232	228	224	221	217	214	210	204
28	263	255	250	245	241	236	231	226	218
24	305	292	283	276	268	261	254	245	232
20	331	319	310	302	295	288	280	272	259
16	>365	355	335	324	315	306	298	289	276

* Probability of observing a temperature as cold, or colder, later in the spring or earlier in the fall than the indicated date.

0/00 Indicates that the probability of occurrence of threshold temperature is less than the indicated probability.

Derived from 1971-2000 serially complete daily data

Complete documentation available from:

www.ncdc.noaa.gov/oa/climate/normal/usnormals.html

**Climatography
of the United States
No. 20
1971-2000**

Station: MATADOR, TX

COOP ID: 415658

Climate Division: TX 2

NWS Call Sign:

Elevation: 2,290 Feet Lat: 34°01N Lon: 100°50W

Degree Days to Selected Base Temperatures (°F)													
Base	Heating Degree Days (1)												
Below	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Ann
65	770	565	390	167	38	4	0	0	21	115	434	705	3209
60	617	435	250	84	9	0	0	0	5	44	301	553	2298
57	529	360	177	48	3	0	0	0	1	21	231	466	1836
55	472	313	136	31	1	0	0	0	0	11	190	409	1563
50	335	212	60	8	0	0	0	0	0	2	107	277	1001
32	39	20	0	0	0	0	0	0	0	0	3	22	84

Base	Cooling Degree Days (1)												
Above	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Ann
32	292	381	635	877	1163	1374	1556	1501	1231	966	565	340	10881
55	12	30	57	218	452	684	843	788	541	265	62	14	3966
57	7	21	36	175	392	624	781	726	481	213	43	9	3508
60	2	12	16	121	305	534	688	633	396	142	23	3	2875
65	0	2	2	54	178	388	533	478	262	58	6	0	1961
70	0	0	0	17	85	254	379	327	153	16	0	0	1231

Growing Degree Units (2)																								
Base	Growing Degree Units (Monthly)												Growing Degree Units (Accumulated Monthly)											
	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
40	149	238	421	647	925	1137	1316	1264	998	729	354	176	149	387	808	1455	2380	3517	4833	6097	7095	7824	8178	8354
45	76	146	289	502	770	987	1161	1109	848	575	240	96	76	222	511	1013	1783	2770	3931	5040	5888	6463	6703	6799
50	33	80	181	360	615	837	1006	954	698	430	141	45	33	113	294	654	1269	2106	3112	4066	4764	5194	5335	5380
55	7	38	96	241	463	687	851	799	552	290	70	15	7	45	141	382	845	1532	2383	3182	3734	4024	4094	4109
60	0	13	47	138	317	538	696	644	411	174	29	0	0	13	60	198	515	1053	1749	2393	2804	2978	3007	3007
Base	Growing Degree Units for Corn (Monthly)												Growing Degree Units for Corn (Accumulated Monthly)											
50/86	126	178	283	414	592	753	866	835	652	458	235	139	126	304	587	1001	1593	2346	3212	4047	4699	5157	5392	5531

(1) Derived from the 1971-2000 Monthly Normals

(2) Derived from 1971-2000 serially complete daily data

Note: For corn, temperatures below 50 are set to 50, and temperatures above 86 are set to 86

Complete documentation available from:
www.ncdc.noaa.gov/oa/climate/normals/usnormals.html

Notes

- a. The monthly means are simple arithmetic averages computed by summing the monthly values for the period 1971-2000 and dividing by thirty. Prior to averaging, the data are adjusted if necessary to compensate for data quality issues, station moves or changes in station reporting practices. Missing months are replaced by estimates based on neighboring stations.
- b. The median is defined as the middle value in an ordered set of values. The median is being provided for the snow and precipitation elements because the mean can be a misleading value for precipitation normals.
- c. Only observed validated values were used to select the extreme daily values.
- d. Extreme monthly temperature/precipitation means were selected from the monthly normals data.
Monthly snow extremes were calculated from daily values quality controlled to be consistent with the Snow Climatology.
- e. Degree Days were derived using the same techniques as the 1971-2000 normals.
Complete documentation for the 1971-2000 Normals is available on the internet from:
www.ncdc.noaa.gov/oa/climate/normal/usnormals.html
- f. Mean "number of days statistics" for temperature and precipitation were calculated from a serially complete daily data set.
Documentation of the serially complete data set is available from the link below:
- g. Snowfall and snow depth statistics were derived from the Snow Climatology.
Documentation for the Snow Climatology project is available from the link under references.

Data Sources for Tables

Several different data sources were used to create the Clim20 climate summaries. In some cases the daily extremes appear inconsistent with the monthly extremes and or the mean number of days statistics. For example, a high daily extreme value may not be reflected in the highest monthly value or the mean number of days threshold that is less than and equal to the extreme value. Some of these difference are caused by different periods of record. Daily extremes are derived from the station's entire period of record while the serial data and normals data were for the 1971-2000 period. Therefore extremes observed before 1971 would not be included in the 1971-2000 normals or the 1971-2000 serial daily data set. Inconsistencies can also occur when monthly values are adjusted to reflect the current observing conditions or were replaced during the 1971-2000 Monthly Normals processing and are not reconciled with the Summary of the Day data.

- | | |
|---|---|
| <ol style="list-style-type: none">a. Temperature/ Precipitation Tables<ol style="list-style-type: none">1. 1971-2000 Monthly Normals2. Cooperative Summary of the Day3. National Weather Service station records4. 1971-2000 serially complete daily datab. Degree Day Table<ol style="list-style-type: none">1. Monthly and Annual Heating and Cooling Degree Days Normals to Selected Bases derived from 1971-2000 Monthly Normals2. Daily Normal Growing Degree Units to Selected Base Temperatures derived from 1971-2000 serially complete daily data | <ol style="list-style-type: none">c. Snow Tables<ol style="list-style-type: none">1. Snow Climatology2. Cooperative Summary of the Dayd. Freeze Data Table
1971-2000 serially complete daily data |
|---|---|

References

U.S. Climate Normals 1971-2000, www.ncdc.noaa.gov/normal.html
U.S. Climate Normals 1971-2000-Products Clim20, www.ncdc.noaa.gov/oa/climate/normal/usnormalsprods.html
Snow Climatology Project Description, www.ncdc.noaa.gov/oa/climate/monitoring/snowclim/mainpage.html
Eischeid, J. K., P. Pasteris, H. F. Diaz, M. Plantico, and N. Lott, 2000: Creating a serially complete, national daily time series of temperature and precipitation for the Western United States. J. Appl. Meteorol., 39, 1580-1591,
www1.ncdc.noaa.gov/pub/data/special/serialcomplete_jam_0900.pdf