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

COOP ID: 505519

Lon: 134°39W

Station: LITTLE PORT WALTER, AK

Climate Division: AK 1 NWS Call Sign:

Temperature (°F) Degree Days (1) Mean (1) Mean Number of Days (3) **Extremes** Base Temp 65 Max Max Max Max Min Min Highest Lowest Daily Daily Highest Lowest Month(1) Month(1) Cooling >= >= >= <= <= <= Month Mean Year Day Year Year Day Year Heating Max Min Daily(2) Daily(2) Mean Mean 90 70 50 32 32 0 37.3 28.8 33.1 54+ 1985 22 40.9 1981 0 1966 2 26.6 1982 990 0 .0 .0 .3 6.3 21.7 0. Jan 39.1 29.8 34.5 58 1995 4 41.7 1977 3 1968 2 24.8 1979 855 0 .0 .0 .4 3.7 18.6 0. Feb Mar 42.2 31.5 36.9 57+ 1998 22 40.8 1981 5 1955 2 33.1 1972 857 0 .0 .0 .7 1.0 19.6 0. 34.5 30 1972 Apr 47.3 40.9 66+ 1995 43.6 1995 18 1966 10 35.8 723 0 .0 0. 8.0 .0 9.5 0. May 53.4 39.1 46.3 72 1983 30 50.3 1993 24 1950 2 41.6 1971 581 0 .0 .1 23.9 .0 1.4 .0 58.9 44.3 55.1 32 47.2 51.6 80 +1991 20 1993 1955 6 1975 402 0 .0 1.1 29.0 .0 .0 .0 Jun Jul 62.3 48.7 55.5 79 1993 16 60.0 1993 37+ 1984 24 52.6 1973 295 2.6 31.0 .0 .0 0 .0 .0 1975 62.3 49.0 55.7 88 1990 12 59.1 1977 39 1960 30 52.5 290 0 .0 2.2 31.0 .0 .0 .0 Aug .2 Sep 57.1 45.2 51.2 73 1993 1 54.9 1995 31+ 1992 13 48.0 1992 416 0 .0 .1 29.5 .0 .0 2 48.0 23 41.5 1985 Oct 49.6 39.7 44.7 61 1976 1980 1984 31 631 0 .0 .0 16.3 .1 2.6 .0 42.5 33.7 38.1 57+ 1993 13 42.2 2000 4 1985 26 30.6 1985 808 0 .0 .0 2.5 12.2 .0 Nov 1.6 Dec 39.0 30.7 34.9 54 1959 1 40.1 1989 4+ 1970 2 28.6 1977 936 0 .0 .0 .8 4.1 18.9 .0 Feb Aug Jul Jan 49.3 37.9 43.6 88 1990 12 60.0 1993 0 2 24.8 1979 7784 0 .0 6.1 173.4 104.7 .0 1966 16.8 Ann

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

Issue Date: May 2005 030-A

(1) From the 1971-2000 Monthly Normals

14 Feet Lat: 56°23N

Elevation:

- (2) Derived from station's available digital record: 1949-2001
- (3) Derived from 1971-2000 serially complete daily data

⁺ Also occurred on an earlier date(s)

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

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

COOP ID: 505519

Station: LITTLE PORT WALTER, AK

Climate Division: AK 1 NWS Call Sign: Elevation: 14 Feet Lat: 56°23N Lon: 134°39W

										Pı	recipi	tation	(incl	nes)										
	Me	ans/	P	recip	itatio	on Total						ays (3)	Precipitation Probabilities (1) Probability that the monthly/annual precipitation will be equal to or less than the indicated amount Monthly/Annual Precipitation vs Probability Levels										
	Medi	ans(1)				Extremes	3			Daily Precipitation				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	23.63	19.62	13.52	1986	25	61.67	1985	10.99	1996	22.2	20.1	12.8	8.0	8.99	11.19	14.34	16.96	19.44	21.98	24.73	27.91	31.97	38.20	43.89
Feb	18.98	19.15	6.62	1963	22	35.21	1991	.63	1989	18.8	16.8	11.1	7.4	4.75	6.54	9.30	11.75	14.17	16.72	19.57	22.95	27.37	34.36	40.91
Mar	18.02	17.69	8.53	1987	28	37.20	1986	5.62	1982	20.0	18.5	11.6	6.4	7.35	9.00	11.33	13.25	15.06	16.90	18.88	21.16	24.06	28.48	32.50
Apr	14.87	14.08	8.41	1982	19	26.21	1999	3.86	1979	19.2	16.9	9.3	5.0	6.05	7.41	9.34	10.92	12.42	13.94	15.58	17.46	19.86	23.52	26.85
May	11.86	11.97	7.35	1992	3	27.53	1992	3.35	1990	16.5	13.8	7.5	4.2	3.51	4.64	6.33	7.79	9.21	10.69	12.32	14.24	16.73	20.61	24.22
Jun	8.01	8.13	7.35	1951	10	20.88	1987	.73	1982	13.6	11.0	5.3	2.5	1.94	2.69	3.86	4.90	5.94	7.03	8.25	9.70	11.60	14.62	17.45
Jul	7.88	8.47	9.55	1969	9	17.25	1979	1.60	1996	13.1	10.1	4.6	2.4	1.88	2.61	3.77	4.79	5.82	6.90	8.11	9.55	11.44	14.44	17.26
Aug	13.20	13.65	10.34	1955	13	32.61	1998	2.23	1989	15.0	12.1	7.1	4.1	2.46	3.64	5.57	7.36	9.19	11.15	13.39	16.09	19.67	25.44	30.94
Sep	22.12	21.24	10.99	1978	19	40.93	1981	3.71	1986	18.7	16.6	11.1	7.5	8.24	10.31	13.28	15.76	18.11	20.52	23.14	26.17	30.04	35.99	41.43
Oct	33.58	30.77	11.20	1974	22	69.35	1974	20.71	1981	25.3	23.5	16.4	11.3	17.67	20.41	24.10	27.02	29.71	32.38	35.20	38.40	42.37	48.32	53.62
Nov	27.87	27.91	12.51	1993	25	52.98	1987	9.74	1973	23.6	21.7	15.4	9.9	11.84	14.36	17.90	20.80	23.51	26.26	29.22	32.62	36.91	43.45	49.38
Dec	25.51	24.86	14.84	1964	6	58.37	1997	5.06	1983	23.1	21.1	14.4	9.4	10.20	12.55	15.88	18.63	21.23	23.87	26.72	30.01	34.19	40.59	46.41
Ann	225.53	225.43	14.84	Dec 1964	6	69.35	Oct 1974	.63	Feb 1989	229.1	202.2	126.6	78.1	172.78	183.29	196.59	206.58	215.38	223.82	232.49	242.01	253.46	269.94	284.07

⁺ Also occurred on an earlier date(s)

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

[#] 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: 1949-2001

⁽³⁾ Derived from 1971-2000 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

COOP ID: 505519

Station: LITTLE PORT WALTER, AK

Climate Division: AK 1 NWS Call Sign: Elevation: 14 Feet Lat: 56°23N Lon: 134°39W

										Snov	w (incl	hes)													
						Sno	ow To	tals									Mea	n Nu	mber	of Day	ys (1)				
	Mean	s/Medi	ans (1)	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	29.4	30.9	12	8	25.0	1974	18	83.2	1974	79	1974	22	42	1972	8.4	6.7	3.5	1.9	.5	20.7	18.8	17.3	12.7		
Feb	24.2	21.4	16	7	20.3	1974	20	59.7	1979	84	1972	22	68	1972	6.2	5.4	3.1	1.9	.4	17.4	16.1	15.0	12.6		
Mar	15.3	11.1	15	4	14.0	1971	23	52.5	1971	117	1972	10	86	1972	4.5	3.7	2.0	1.1	.3	16.9	15.6	14.6	11.5		
Apr	2.1	.2	6	0	6.0	1972	20	30.0	1972	72	1972	23	65	1972	.9	.9	.3	.1	.0	6.8	6.4	6.1	5.5		
May	#	.0	#	0	.3	1999	5	.3	1999	54	1972	1	20	1972	@	.0	.0	.0	.0	1.2	1.1	1.0	.9		
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	.3	.0	#	0	3.5	1992	18	3.9	1992	4	1992	18	0	0	.2	.1	@	.0	.0	.2	@	.0	.0		
Nov	11.3	4.1	1	0	14.0	1990	13	63.1	1990	38	1990	13	22	1990	3.5	2.9	1.2	.6	.2	6.5	3.9	2.7	1.5		
Dec	23.7	23.5	7	5	19.0	1972	15	63.0	1975	48	1990	3	27	1990	7.1	5.7	3.0	1.4	.3	16.6	13.6	12.1	8.7		
Ann	106.3	91.2	N/A	N/A	25.0	Jan 1974	18	83.2	Jan 1974	117	Mar 1972	10	86	Mar 1972	30.8	25.4	13.1	7.0	1.7	86.3	75.5	68.8	53.4		

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

- (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

[@] 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

Climatography of the United States No. 20 1971-2000

Elevation:

14 Feet

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

COOP ID: 505519

Lon: 134°39W

Lat: 56°23N

Station: LITTLE PORT WALTER, AK

Climate Division: AK 1

NWS Call Sign:

				Free	ze Data									
			Spri	ng Freeze D	ates (Month/	Day)								
Temp (F)		P	robability of	later date	in spring (thr	u Jul 31) tha	an indicated	(*)						
Temp (F)	.10	.20	.30	.40	.50	.60	.70	.80	.90					
36	6/12	6/06	6/02	5/30	5/26	5/23	5/20	5/16	5/10					
32	5/21	5/15	5/10	5/07	5/03	4/30	4/26	4/21	4/15					
28	4/21	4/11	4/04	3/29	3/23	3/17	3/11	3/04	2/23					
24	4/04	3/23	3/13	3/05	2/26	2/18	2/10	1/31	1/15					
20	3/13	2/28	2/19	2/11	2/04	1/27	1/18	1/06	0/00					
16	2/26	2/12	2/01	1/22	1/10	12/20	0/00	0/00	0/00					
			Fa	ll Freeze Da	tes (Month/D	ay)								
Tomp (F)	Probability of earlier date in fall (beginning Aug 1) than indicated(*)													
Temp (F)	.10	.20	.30	.40	.50	.60	.70	.80	.90 10/17 11/14 12/11 1/08 0/00					
36	9/20	9/25	9/28	10/01	10/04	10/06	10/09	10/12	10/17					
32	10/02	10/10	10/15	10/20	10/24	10/28	11/02	11/07	11/14					
28	10/27	11/04	11/10	11/14	11/19	11/23	11/28	12/04	12/11					
24	11/02	11/13	11/21	11/27	12/04	12/10	12/17	12/26	1/08					
20	11/16	11/29	12/08	12/16	12/24	1/01	1/10	1/23	0/00					
16	11/29	12/13	12/23	1/03	1/17	0/00	0/00	0/00	0/00					
			•	Freeze I	ree Period									
Temp (F)			Probability	of longer th	an indicated	freeze free p	eriod (Days)							
Temp (r)	.10	.20	.30	.40	.50	.60	.70	.80	.90					
36	149	142	137	133	129	125	121	116	110					
32	205	194	186	179	173	167	160	152	141					
28	277	265	255	247	240	233	225	215	203					
24	351	321	306	294	283	272	261	248	230					
20	>365	>365	>365	332	318	308	298	288	275					
16	>365	>365	>365	>365	>365	>365	341	319	300					

^{*} 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.

Complete documentation available from:

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

COOP ID: 505519

Station: LITTLE PORT WALTER, AK

Climate Division: AK 1 NWS Call Sign: Elevation: 14 Feet Lat: 56°23N Lon: 134°39W

	Degree Days to Selected Base Temperatures (°F)														
Base						Heatin	g Degree 1	Days (1)							
Below	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Ann		
65	990	855	857	723	581	402	295	290	416	631	808	936	7784		
60	835	715	718	573	426	256	149	144	267	476	658	781	5998		
57	742	631	625	483	335	176	80	77	180	383	568	688	4968		
55	680	575	563	423	277	130	47	44	127	321	508	626	4321		
50	531	438	408	275	148	48	6	5	33	177	364	471	2904		
32	117	74	16	0	0	0	0	0	0	1	31	65	304		

Base						Coolin	g Degree l	Days (1)					
Above	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Ann
32	150	143	166	267	442	588	728	734	574	393	213	152	4550
55	0	0	0	0	6	28	62	65	10	0	0	0	171
57	0	0	0	0	2	14	33	35	3	0	0	0	87
60	0	0	0	0	0	4	9	10	0	0	0	0	23
65	0	0	0	0	0	0	0	0	0	0	0	0	0
70	0	0	0	0	0	0	0	0	0	0	0	0	0

										Gro	wing	Degre	e Uni	ts (2)										
Base	Growing Degree Units (Monthly)												Growing Degree Units (Accumulated Monthly)											
	Jan Feb Mar Apr May Jun Jul Aug Sep Oct Nov Dec											Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
40	7	7	13	61	202	360	490	495	344	163	41	12	7	14	27	88	290	650	1140	1635	1979	2142	2183	2195
45	0	0	0	7	68	212	335	340	194	55	3	0	0	0	0	7	75	287	622	962	1156	1211	1214	1214
50	0	0	0	0	9	78	181	185	67	6	0	0	0	0	0	0	9	87	268	453	520	526	526	526
55	0	0	0	0	0	12	52	53	3	0	0	0	0	0	0	0	0	12	64	117	120	120	120	120
60	0	0	0	0	0	0	1	5	0	0	0	0	0	0	0	0	0	0	1	6	6	6	6	6
Base			•	Gro	wing Deg	gree Unit	s for Co	rn (Mont	thly)			•			Gr	owing D	egree Ur	its for C	orn (Acc	umulate	d Month	ly)		
50/86	0	0	0	9	68	144	209	217	116	28	0	0	0	0	0	9	77	221	430	647	763	791	791	791

(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

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.

Compete documentation for the 1971-2000 Normals is available on the internet from:

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

f. Mean 'number of days statistics' for temperature were calculated from a serially complete daily data set. A serial dataset was not available for precipitation,

To ensure that a station's data was adequate to estimate these statistics, the following criteria were used:

- 1. A station must have 80% of its data for the 1971-2000 time period.
- 2. Only months with at least 21 days are used.
- 3. There must be a least 21 months (meeting criteria 2.) in the sample.
- g. Snowfall and snow depth statistics were derived daily values quality controlled to be consistent with 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 differences 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 are 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. Other inconsistencies may appear from comparing statistically modeled values such as degree days to observed temperatures.

- a. Temperature/ Precipitation Tables
 - 1. 1971-2000 Monthly Normals
 - 2. Cooperative Summary of the Day
 - 3. National Weather Service station records
 - 4. 1971-2000 serially complete daily data

- c. Snow Tables
 - 1. Cooperative Summary of the Day
- d. Freeze Data Table

1971-2000 serially complete daily data

- b. Degree Day Table
 - 1. Monthly and Annual Heating and Cooling Degree Days Normals to Selected Bases derived from 1971-2000 Monthly Normals
 - 2. Daily Normal Growing Degree Units to Selected Base Temperatures derived from 1971-2000 serially complete daily data

References

- U.S. Climate Normals 1971-2000, www.ncdc.noaa.gov/normals.html
- U.S. Climate Normals 1971-2000-Products Clim20, www.ncdc.noaa.gov/oa/climate/normals/usnormalsprods.html Snow Climatology Project Description, www.ncdc.noaa.gov/oa/climate/monitoring/snowclim/mainpage.html