

FORT CARSON/BUTTS CO

Latitude = 38.68 N

WMO No. 724680

Longitude = 104.70 W

Elevation = 5870 feet

Period of Record = 1967 to 1996

Average Pressure = 24.18 inches Hg

Design Criteria Data

	Design Value	Mean Coincident (Average) Values			
		Wet Bulb Temperature (°F)	Humidity Ratio (gr/lb)	Wind Speed (mph)	Prevailing Direction (NSEW)
Dry Bulb Temperature (T)	(°F)				
Median of Extreme Highs	96	62	47	9.4	S
0.4% Occurrence	93	61	46	8.9	SSE
1.0% Occurrence	90	60	47	8.8	SE
2.0% Occurrence	88	60	50	8.6	SSE
Mean Daily Range	22	-	-	-	-
97.5% Occurrence	16	14	11	6.1	N
99.0% Occurrence	10	9	8	5.7	N
99.6% Occurrence	5	4	6	4.9	N
Median of Extreme Lows	-4	-4	4	4.9	S
	Design Value	Mean Coincident (Average) Values			
		Dry Bulb Temperature (°F)	Humidity Ratio (gr/lb)	Wind Speed (mph)	Prevailing Direction (NSEW)
Wet Bulb Temperature (T_{wb})	(°F)				
Median of Extreme Highs	69	84	103	7.8	SE
0.4% Occurrence	65	81	84	7.1	SSE
1.0% Occurrence	64	81	80	7.1	SSE
2.0% Occurrence	63	80	76	7.2	SSE
	Design Value	Mean Coincident (Average) Values			
		Dry Bulb Temperature (°F)	Vapor Pressure (in. Hg)	Wind Speed (mph)	Prevailing Direction (NSEW)
Humidity Ratio (HR)	(gr/lb)				
Median of Extreme Highs	117	78	0.63	7.0	SSE
0.4% Occurrence	96	72	0.52	6.2	SE
1.0% Occurrence	89	70	0.49	6.7	SSE
2.0% Occurrence	85	69	0.47	6.2	N
Air Conditioning/ Humid Area Criteria	# of Hours	T ≥ 93°F	T ≥ 80°F	T _{wb} ≥ 73°F	T _{wb} ≥ 67°F
		36	734	0	14

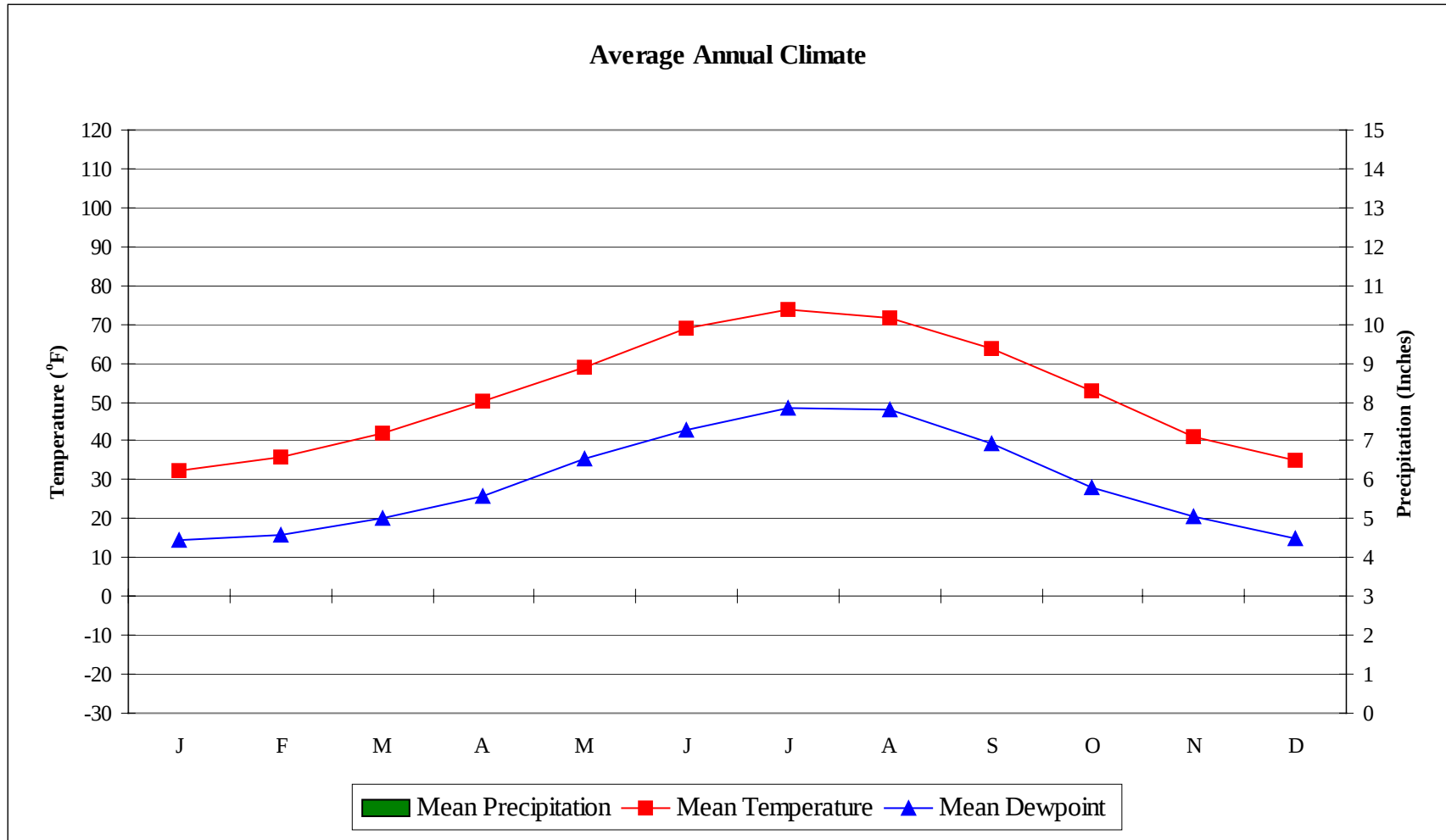
Other Site Data

Weather Region	Rain Rate 100 Year Recurrence (in./hr)	Basic Wind Speed 3 sec gust @ 33 ft 50 Year Recurrence (mph)	Ventilation Cooling Load Index (Ton-hr/cfm/yr) Base 75°F-RH 60% Latent + Sensible
7	2.3	N/A	0.0 + 0.5
Ground Water Temperature (°F) 50 Foot Depth *	Frost Depth 50 Year Recurrence (in.)	Ground Snow Load 50 Year Recurrence (lb/ft ²)	Average Annual Freeze-Thaw Cycles (#)
55.5	38	15	78

*Note: Temperatures at greater depths can be estimated by adding 1.5°F per 100 feet additional depth.

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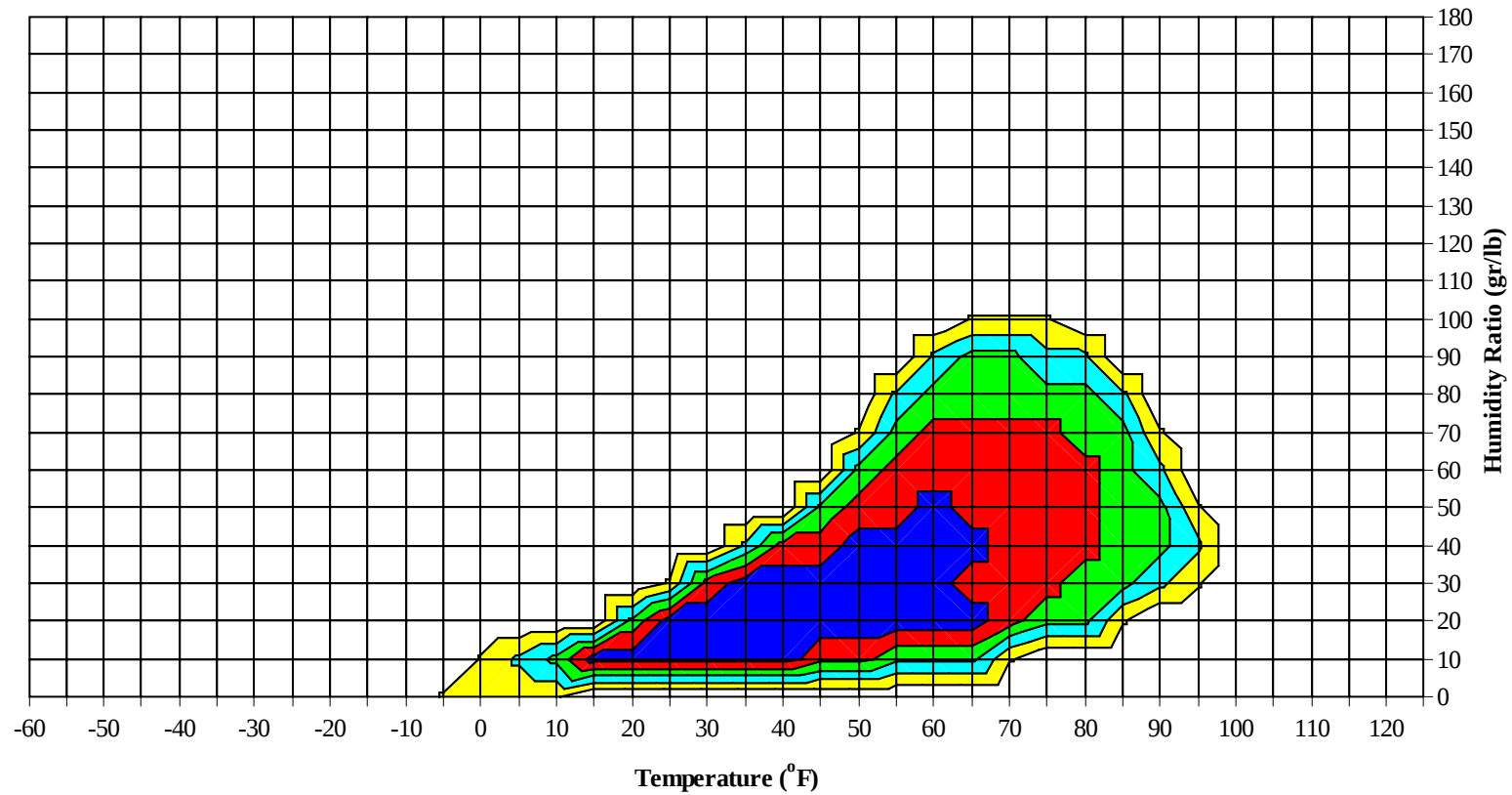


No Precipitation Data Available

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WMO No. 724680

Long Term Psychrometric Summary

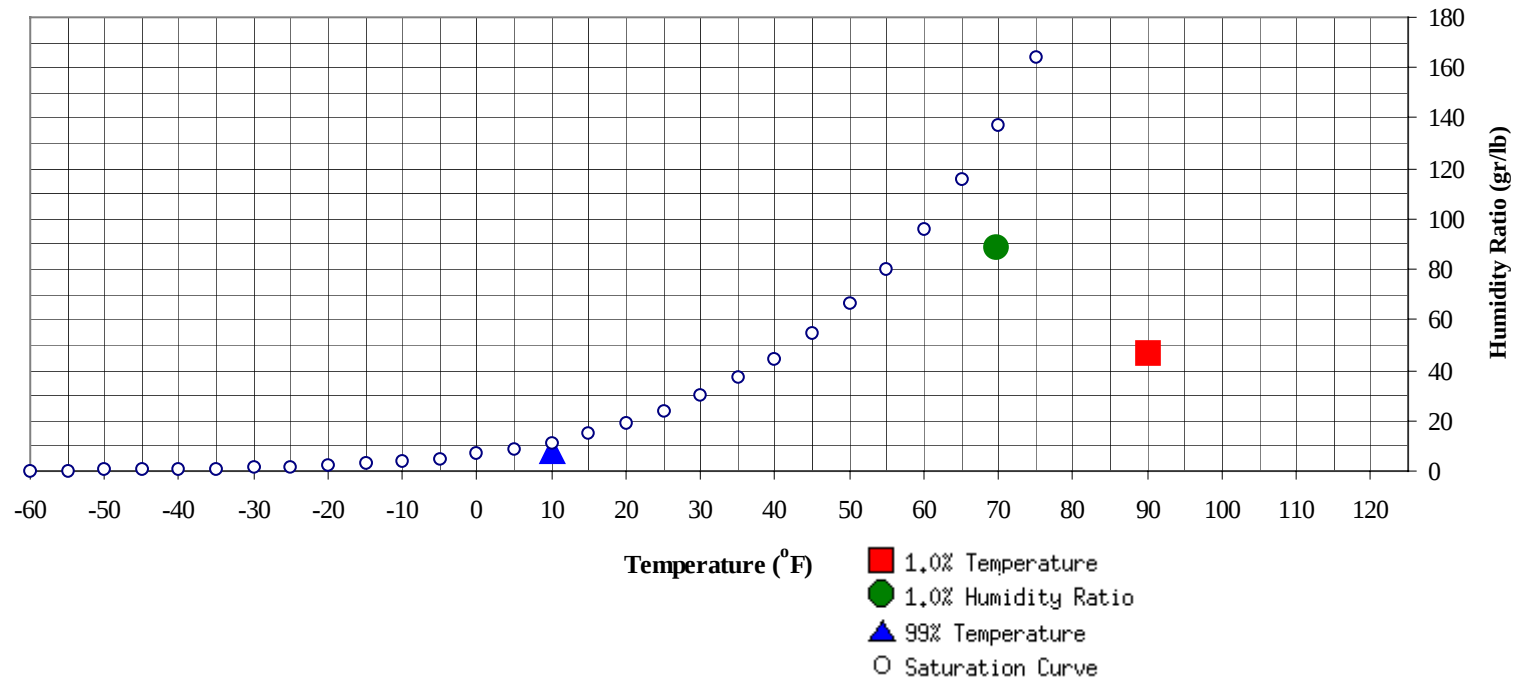


- 50% of all observations
- 80% of all observations
- 95% of all observations
- 97.5% of all observations
- 99% of all observations

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Psychrometric Summary of Peak Design Values



99% Dry Bulb	(°F)	MCHR (gr/lb)	Enthalpy (btu/lb)	1.0% Humidity Ratio	(gr/lb)	MCDB (°F)	MCWB (°F)	MC Dewpt (°F)	Enthalpy (btu/lb)
	10	8.1	3.6		88.9	69.6	61.7	57.9	30.6

1.0% Dry Bulb	(°F)	MCHR (gr/lb)	MCWB (°F)	Enthalpy (btu/lb)
	90	47.1	59.8	29.0

FORT CARSON/BUTTS CO

WMO No. 724680

Dry-Bulb Temperature Hours For An Average Year (Sheet 1 of 5)

Period of Record = 1967 to 1996

Temperature Range (°F)	January					February					March				
	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)
	01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00		
95 / 99															
90 / 94															
85 / 89															
80 / 84															
75 / 79															
70 / 74		1		1	48.4		1		1	47.1			1	0	1 49.7
65 / 69		2	0	2	44.1		4	1	5	44.4			5	1	6 46.8
60 / 64		9	1	10	42.4		11	2	13	42.0			13	3	17 44.6
55 / 59	0	12	3	16	40.0	1	21	7	30	39.7	0	24	9	33	42.3
50 / 54	2	25	8	35	37.7	1	28	14	43	37.4	3	33	18	54	40.5
45 / 49	6	28	15	49	35.2	4	29	24	57	34.9	10	32	28	71	38.2
40 / 44	12	33	28	74	32.3	15	31	33	79	32.4	18	34	34	86	35.7
35 / 39	25	34	34	93	29.5	28	27	37	93	29.6	30	31	41	102	33.5
30 / 34	39	31	48	117	26.5	43	24	38	106	26.9	46	26	41	113	30.9
25 / 29	54	27	40	120	23.1	49	21	29	99	23.5	59	21	36	117	28.2
20 / 24	37	16	27	80	19.1	34	13	20	68	19.7	42	16	19	77	24.4
15 / 19	31	13	17	61	15.1	25	6	9	40	15.5	24	8	9	40	20.2
10 / 14	18	10	12	41	10.5	7	4	5	16	10.6	9	3	5	16	15.7
5 / 9	14	5	9	28	6.0	7	2	2	12	5.7	4	2	1	8	11.5
0 / 4	6	1	5	12	0.9	3	1	1	6	1.0	3	0	1	4	6.5
-5 / -1	3	0	1	4	-3.1	1	1	1	3	-3.3	0			0	3.3
-10 / -6	2	0	0	2	-6.8	1	0	0	1	-6.1					
-15 / -11						0		0	0	-12.3					
-20 / -16															
-25 / -21															

Caution: This summary reflects the typical distribution of temperature in a typical year. It does not reflect the typical moisture distribution. Because wet bulb temperatures are averaged, this summary understates the annual moisture load. For accurate moisture load data, see the long-term humidity summary and the ventilation and infiltration load pages in this manual.

FORT CARSON/BUTTS CO

WMO No. 724680

Dry-Bulb Temperature Hours For An Average Year (Sheet 2 of 5)

Period of Record = 1967 to 1996

Temperature Range (°F)	April					May					June				
	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)
	01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00		
95 / 99												1		1	61.6
90 / 94							1		1	56.2		14	4	18	59.4
85 / 89		0		0	53.5		3	1	4	54.4	0	29	11	40	58.5
80 / 84		2	0	2	51.7	0	12	4	16	53.7	2	42	21	66	57.8
75 / 79		10	2	12	50.7	1	31	13	44	53.0	9	45	36	89	56.9
70 / 74	0	20	8	28	48.2	4	41	25	70	51.7	18	40	44	102	55.3
65 / 69	1	32	16	50	46.4	10	41	35	86	50.3	34	29	45	109	53.6
60 / 64	6	34	23	63	44.6	20	38	43	101	48.6	53	19	35	107	52.0
55 / 59	14	36	33	83	42.4	36	31	48	114	46.8	57	10	23	89	49.9
50 / 54	24	31	40	95	40.4	56	22	39	117	44.7	41	6	15	62	47.4
45 / 49	38	26	37	102	38.2	56	13	21	90	41.8	18	3	5	26	43.8
40 / 44	51	20	34	105	35.6	36	10	11	58	38.3	6	1	1	8	39.9
35 / 39	50	14	22	86	32.4	19	4	6	29	34.7	1	0	0	1	36.2
30 / 34	34	10	15	60	29.1	9	1	3	13	30.8					
25 / 29	16	3	6	24	24.8	0			0	25.9					
20 / 24	4	1	2	8	20.2										
15 / 19	1	0	0	1	16.0										
10 / 14	0		0	0	11.4										
5 / 9	0			0	8.0										
0 / 4															
-5 / -1															
-10 / -6															
-15 / -11															
-20 / -16															
-25 / -21															

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Dry-Bulb Temperature Hours For An Average Year (Sheet 3 of 5)

Period of Record = 1967 to 1996

Temperature Range (°F)	July					August					September				
	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)
	01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00		
95 / 99		5	1	6	61.8		1	0	1	61.4					
90 / 94		29	7	36	60.6		14	2	16	60.6		2	0	2	58.7
85 / 89	0	50	19	69	60.4		44	11	55	60.3		12	3	15	57.9
80 / 84	4	56	31	91	60.4	1	58	25	83	59.9	0	34	8	42	56.2
75 / 79	16	49	44	109	59.6	7	55	41	102	59.3	1	48	18	67	55.0
70 / 74	37	33	50	119	58.4	26	38	53	116	58.1	6	45	34	85	53.8
65 / 69	54	17	45	116	57.0	46	21	54	121	56.6	16	32	46	94	52.4
60 / 64	74	8	40	122	55.4	80	11	44	136	54.6	37	27	47	110	50.5
55 / 59	52	2	11	65	52.8	66	5	15	86	52.6	59	16	39	114	48.8
50 / 54	11	0	0	11	49.8	21	1	4	26	49.6	58	12	24	94	46.0
45 / 49	0	0		0	46.5	1	0	0	1	45.7	36	6	13	54	42.4
40 / 44						0	0		0	42.0	16	3	5	24	38.5
35 / 39											9	1	3	13	34.2
30 / 34											4	1	1	6	30.6
25 / 29											0			0	27.0
20 / 24															
15 / 19															
10 / 14															
5 / 9															
0 / 4															
-5 / -1															
-10 / -6															
-15 / -11															
-20 / -16															
-25 / -21															

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Dry-Bulb Temperature Hours For An Average Year (Sheet 4 of 5)

Period of Record = 1967 to 1996

Temperature Range (°F)	October					November					December				
	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)	Hour Group (LST)			Total Obs	M C W B (°F)
	01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00			01 To 08	09 To 16	17 To 00		
95 / 99															
90 / 94															
85 / 89		0		0	52.8										
80 / 84		6	0	6	52.2										
75 / 79		22	2	24	50.6		1		1	49.8					
70 / 74		34	9	42	49.3		7		7	48.0					
65 / 69	2	35	17	55	47.6		17	1	19	45.6			3	3	44.2
60 / 64	9	35	31	74	45.8	1	23	6	30	43.2			11	1	42.4
55 / 59	21	34	42	97	43.6	4	28	12	45	41.3	0	19	4	23	40.0
50 / 54	37	28	45	111	41.2	10	27	23	61	38.8	3	26	12	41	37.4
45 / 49	49	19	38	106	39.0	19	33	29	82	36.2	9	30	19	58	34.6
40 / 44	51	14	27	92	36.0	31	28	36	95	33.5	24	32	33	89	32.0
35 / 39	35	11	20	65	32.9	36	25	37	98	30.7	34	35	41	110	29.3
30 / 34	27	6	11	45	29.5	48	25	42	115	28.1	42	32	42	116	26.6
25 / 29	10	1	4	15	25.0	46	13	30	90	24.4	49	24	45	118	23.4
20 / 24	4	1	1	6	20.1	22	8	13	44	19.9	37	14	24	76	19.3
15 / 19	1	1	1	3	16.5	13	3	8	24	15.7	22	9	13	44	15.2
10 / 14	1	0	0	1	12.4	6	1	2	9	11.1	15	7	8	29	10.8
5 / 9	0		0	0	7.8	1	0	0	1	5.9	7	3	3	13	6.1
0 / 4						0	0		0	2.7	3	1	1	5	1.3
-5 / -1						0			0	-4.0	1	1	1	4	-3.2
-10 / -6											1	0	1	3	-6.2
-15 / -11											0	0		0	-11.8
-20 / -16											0	0		0	-16.5
-25 / -21											0			0	-20.0

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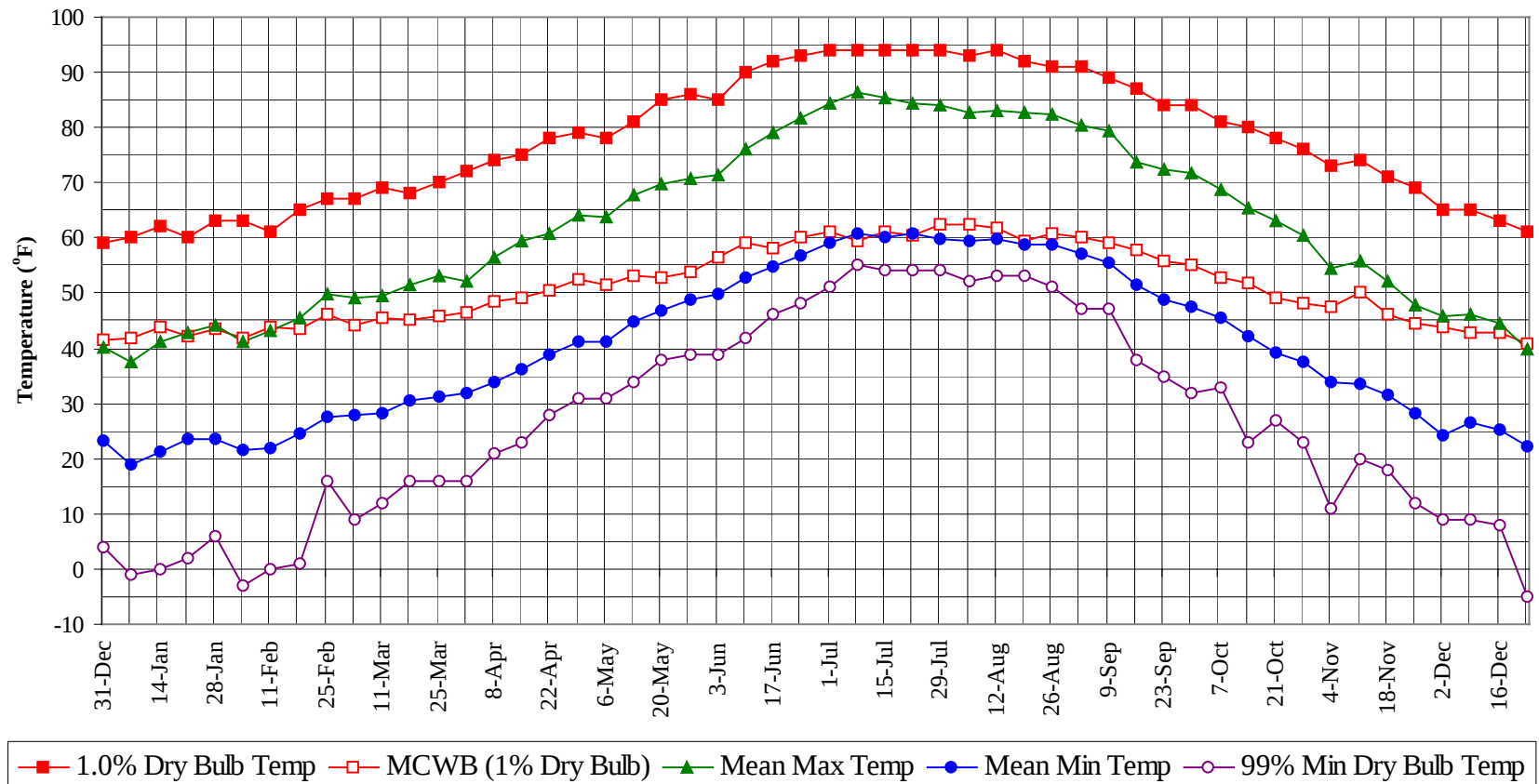
Dry-Bulb Temperature Hours For An Average Year (Sheet 5 of 5)

Period of Record = 1967 to 1996

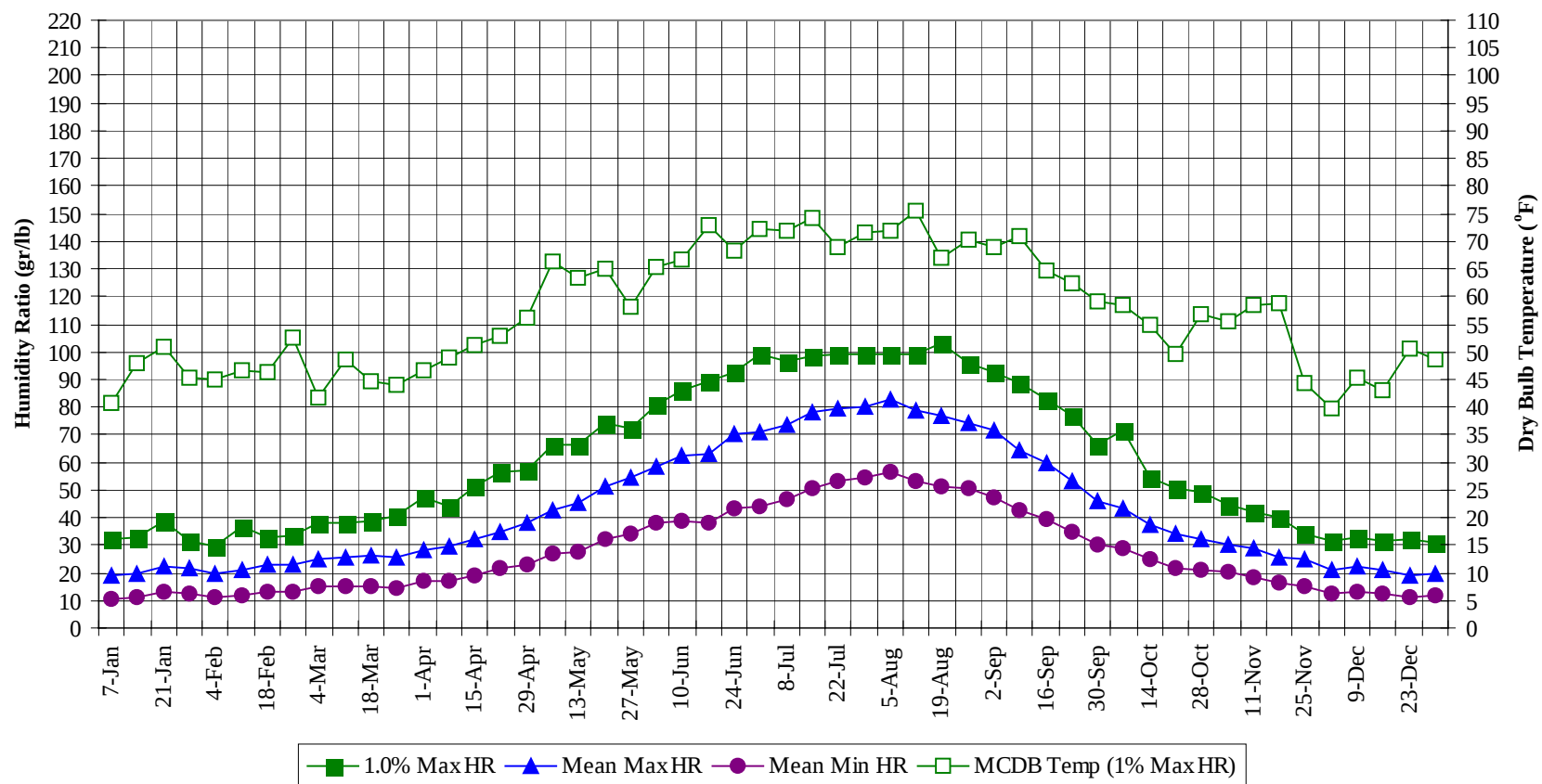
Annual Totals					
Temperature Range (°F)	Hour Group (LST)			Total Obs	M C W B (°F)
	01 To 08	09 To 16	17 To 00		
95 / 99		8	1	9	61.7
90 / 94		61	14	76	60.2
85 / 89	1	141	44	187	59.6
80 / 84	9	215	90	315	58.5
75 / 79	38	265	156	459	56.8
70 / 74	102	268	224	593	54.6
65 / 69	188	250	268	706	52.1
60 / 64	318	251	283	851	49.5
55 / 59	352	247	256	855	45.9
50 / 54	298	239	254	790	41.8
45 / 49	263	219	239	721	37.8
40 / 44	264	200	248	712	34.3
35 / 39	263	174	239	676	30.8
30 / 34	275	149	234	658	27.7
25 / 29	229	101	168	499	23.8
20 / 24	138	60	95	294	19.6
15 / 19	89	33	50	172	15.4
10 / 14	46	22	29	96	10.8
5 / 9	28	11	16	54	6.0
0 / 4	11	4	7	22	1.0
-5 / -1	5	2	2	10	-3.2
-10 / -6	3	1	1	5	-6.3
-15 / -11	0	0	0	0	-12.1
-20 / -16	0	0		0	-16.5
-25 / -21	0			0	-20.0

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Annual Summary of Temperatures



Long Term Humidity and Dry Bulb Temperature Summary

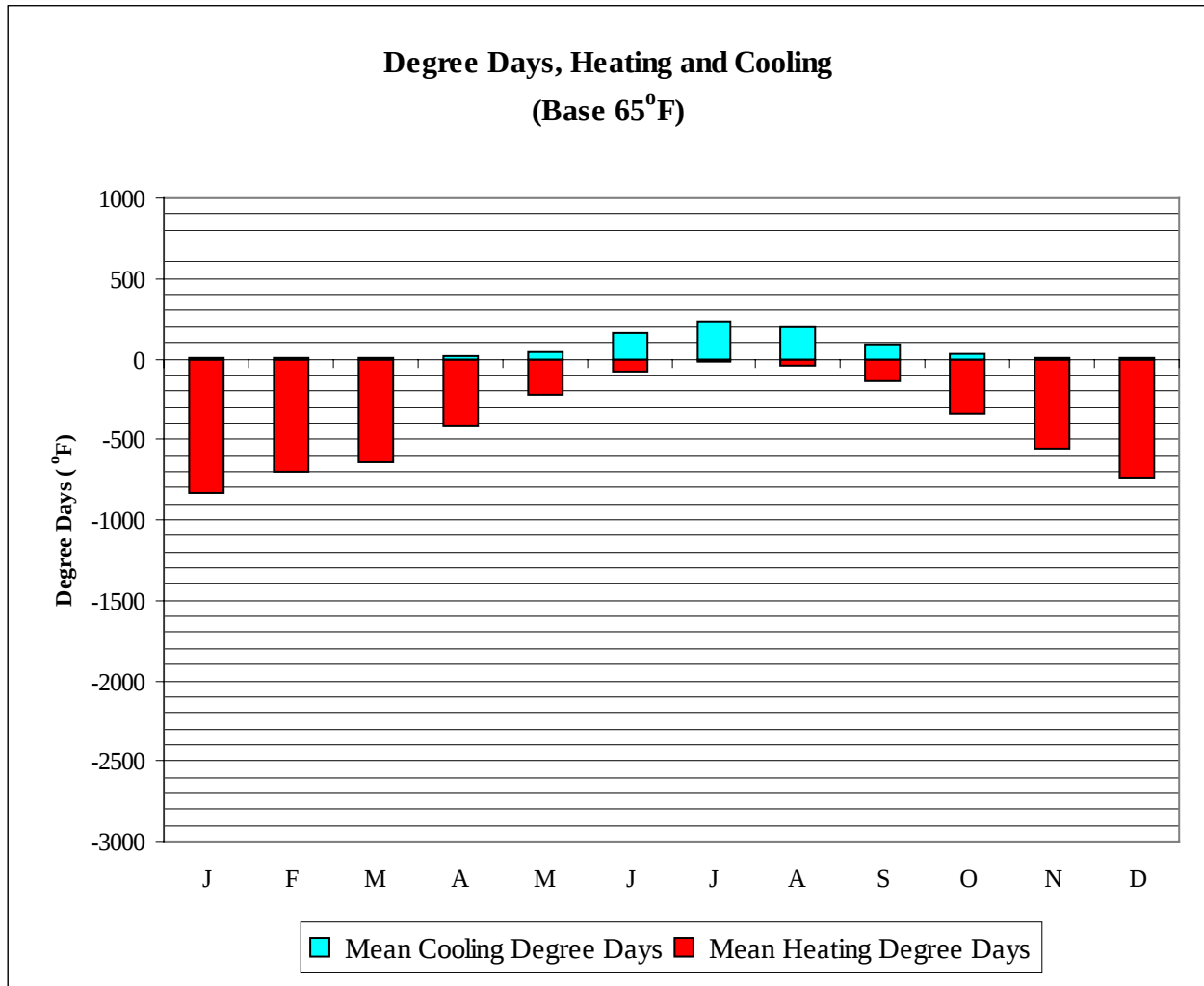


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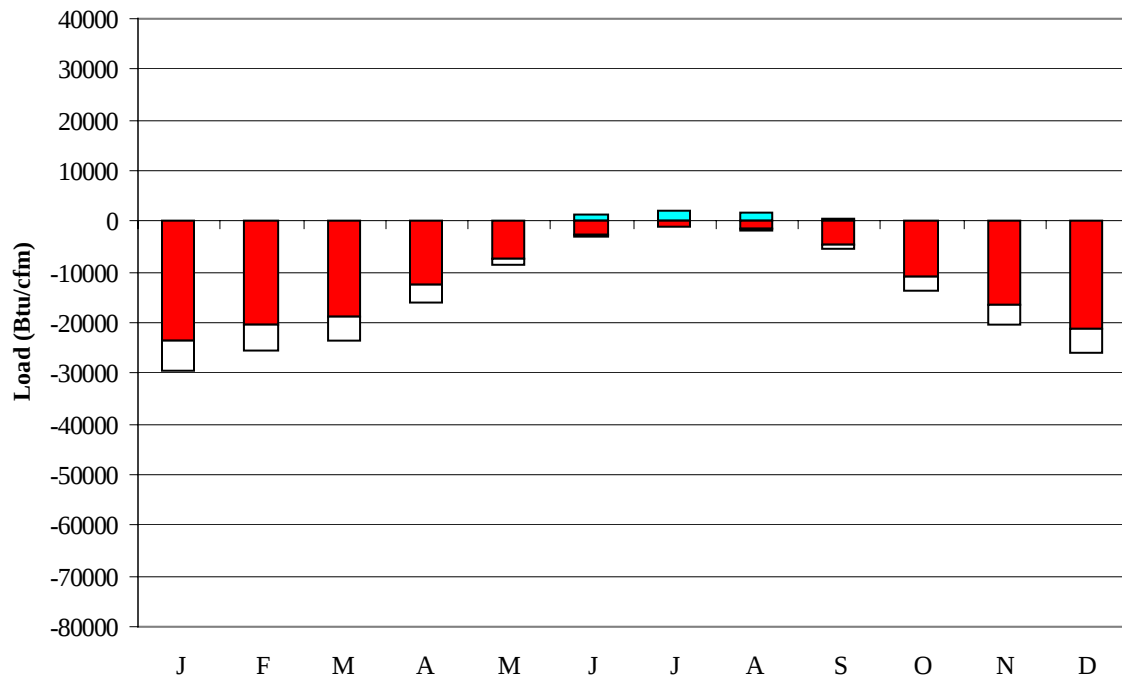
Long Term Dry Bulb Temperature and Humidity Summary

Week Ending	1.0% Temp (°F)	MCWB @ 1% Temp (°F)	Mean Max Temp (°F)	Mean Min Temp (°F)	99% Temp (°F)	1.0% HR (gr/lb)	MCDB @ 1% HR (°F)	Mean Max HR (gr/lb)	Mean Min HR (gr/lb)
7-Jan	60.0	41.8	37.4	19.0	-1.0	32.2	40.6	19.1	10.7
14-Jan	62.0	43.8	41.3	21.2	0.0	32.9	47.8	19.5	11.1
21-Jan	60.0	42.3	42.7	23.6	2.0	38.5	51.0	22.3	13.2
28-Jan	63.0	43.4	44.1	23.5	6.0	31.5	45.5	21.8	12.2
4-Feb	63.0	42.0	41.3	21.7	-3.0	29.4	44.9	19.4	11.2
11-Feb	61.0	43.8	43.1	22.0	0.0	37.1	46.6	20.9	11.5
18-Feb	65.0	43.4	45.5	24.7	1.0	32.9	46.3	22.8	13.1
25-Feb	67.0	46.1	49.9	27.4	16.0	33.6	52.7	23.2	13.3
4-Mar	67.0	44.1	49.0	27.9	9.0	37.8	41.7	24.8	15.2
11-Mar	69.0	45.5	49.3	28.2	12.0	37.8	48.6	25.8	15.4
18-Mar	68.0	45.1	51.6	30.5	16.0	38.5	44.7	26.2	15.4
25-Mar	70.0	45.8	53.2	31.1	16.0	40.6	44.0	25.5	14.7
1-Apr	72.0	46.6	52.3	31.8	16.0	47.6	46.8	28.0	16.9
8-Apr	74.0	48.4	56.6	34.0	21.0	44.1	48.9	29.3	17.2
15-Apr	75.0	49.0	59.4	36.2	23.0	51.1	51.2	32.0	19.3
22-Apr	78.0	50.6	60.9	39.0	28.0	56.7	52.7	35.1	21.9
29-Apr	79.0	52.4	64.0	41.2	31.0	57.4	56.0	37.8	22.8
6-May	78.0	51.6	63.7	41.3	31.0	66.5	66.4	42.9	27.0
13-May	81.0	53.0	67.6	44.9	34.0	66.5	63.4	45.3	27.9
20-May	85.0	52.8	69.9	46.8	38.0	74.2	65.1	51.0	32.1
27-May	86.0	53.8	70.8	48.8	39.0	72.1	58.2	54.3	34.3
3-Jun	85.0	56.5	71.3	49.9	39.0	80.5	65.3	58.4	38.2
10-Jun	90.0	59.1	75.9	52.8	42.0	86.1	66.8	62.2	39.0
17-Jun	92.0	58.0	79.1	54.8	46.0	89.6	73.0	63.1	37.9
24-Jun	93.0	60.3	81.8	56.8	48.0	92.4	68.3	70.2	43.4
1-Jul	94.0	61.1	84.5	59.1	51.0	99.4	72.1	70.7	43.8
8-Jul	94.0	59.5	86.3	60.8	55.0	96.6	71.8	73.9	46.5
15-Jul	94.0	61.0	85.4	60.1	54.0	98.7	74.2	78.2	50.4
22-Jul	94.0	60.6	84.5	60.8	54.0	99.4	69.0	79.3	53.2
29-Jul	94.0	62.3	84.0	59.8	54.0	99.4	71.6	80.3	54.5
5-Aug	93.0	62.4	82.9	59.6	52.0	99.4	72.0	82.7	56.6
12-Aug	94.0	61.8	83.1	59.8	53.0	99.4	75.5	79.0	53.2
19-Aug	92.0	59.6	82.7	58.9	53.0	102.9	66.9	76.7	51.1
26-Aug	91.0	60.7	82.3	58.7	51.0	95.9	70.2	74.2	50.4
2-Sep	91.0	60.1	80.4	57.0	47.0	92.4	68.8	71.7	47.3
9-Sep	89.0	59.1	79.3	55.5	47.0	88.9	71.1	64.6	42.8
16-Sep	87.0	57.9	73.7	51.5	38.0	82.6	64.8	59.4	39.7
23-Sep	84.0	55.7	72.3	48.7	35.0	77.0	62.4	53.4	34.6
30-Sep	84.0	55.1	71.6	47.5	32.0	66.5	59.0	46.1	30.3
7-Oct	81.0	52.9	68.6	45.6	33.0	71.4	58.5	43.1	28.7
14-Oct	80.0	51.7	65.5	42.0	23.0	54.6	54.9	37.3	24.7
21-Oct	78.0	49.1	63.0	39.0	27.0	50.4	49.5	34.0	21.6
28-Oct	76.0	48.2	60.6	37.6	23.0	49.0	56.8	32.3	21.2
4-Nov	73.0	47.4	54.4	34.0	11.0	44.8	55.5	30.2	20.3
11-Nov	74.0	50.2	55.7	33.5	20.0	42.0	58.5	29.1	18.7
18-Nov	71.0	46.3	52.1	31.5	18.0	39.9	58.7	25.7	16.3
25-Nov	69.0	44.5	47.7	28.3	12.0	34.3	44.2	24.7	15.3
2-Dec	65.0	44.0	46.0	24.4	9.0	31.9	39.9	21.2	12.2
9-Dec	65.0	43.0	46.2	26.4	9.0	32.9	45.5	22.2	13.4
16-Dec	63.0	42.9	44.5	25.2	8.0	31.5	42.9	21.2	12.2
23-Dec	61.0	40.7	40.0	22.1	-5.0	32.2	50.4	19.1	11.1
31-Dec	59.0	41.6	40.2	23.2	4.0	30.8	48.7	19.6	12.1



	Mean Cooling Degree Days (°F)	Mean Heating Degree Days (°F)
JAN	0	834
FEB	0	705
MAR	2	644
APR	15	411
MAY	47	220
JUN	162	72
JUL	237	21
AUG	203	36
SEP	92	133
OCT	25	347
NOV	3	562
DEC	0	742
ANN	789	4727

Average Ventilation and Infiltration Loads
(Outside Air vs. 75°F, 60% RH summer; 68°F, 30% RH winter)



■ Average Sensible Cooling Load ■ Average Sensible Heating Load
■ Average Latent Cooling (Drying) Load ■ Average Latent Heating (Humidifying) Load

	Average Sensible Cooling Load	Average Sensible Heating Load	Average Latent Cooling Load	Average Latent Heating Load
	(Btu/cfm)	(Btu/cfm)	(Btu/cfm)	(Btu/cfm)
JAN	0	-23682	0	-5707
FEB	0	-20244	0	-5106
MAR	1	-18888	0	-4832
APR	27	-12606	0	-3280
MAY	184	-7319	0	-1212
JUN	1258	-2756	13	-397
JUL	2075	-990	23	-119
AUG	1554	-1577	23	-84
SEP	524	-4627	4	-652
OCT	69	-10811	0	-2719
NOV	1	-16477	0	-4015
DEC	0	-21280	0	-4804
ANN	5693	-141257	63	-32927

Average Annual Solar Radiation – Nearest Available Site

(Source: National Renewable Energy Laboratory, Golden CO, 1995)

City: COLORADO SPRINGS
 State: CO
 WBAN No: 93037
 Lat(N): 38.82
 Long(W): 104.72
 Elev(ft): 6172

Stn Type: Secondary
 SHADING GEOMETRY IN DIMENSIONLESS UNITS
 Window: 1
 Overhang: 0.5
 Vert Gap: 0.315

AVERAGE INCIDENT SOLAR RADIATION (Btu/sq.ft./day), Percentage Uncertainty = 9		Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Year
HORIZ	Global	800	1070	1420	1790	1960	2200	2110	1910	1630	1270	880	720	1480
	Std Dev	49	54	97	97	113	136	117	107	104	97	49	42	41
	Minimum	690	950	1170	1530	1740	1950	1930	1650	1360	1010	800	640	1410
	Maximum	890	1150	1610	2000	2210	2440	2350	2120	1820	1420	990	800	1550
Clear Day	Diffuse	260	350	500	610	710	670	660	600	470	350	280	240	480
	Global	1010	1370	1870	2380	2680	2790	2710	2430	2000	1500	1080	900	1900
	Global	200	260	350	440	560	640	590	470	360	280	220	180	380
	Diffuse	200	260	350	420	480	500	480	430	360	280	220	180	350
Clear Day	Global	180	230	310	420	600	730	660	470	330	260	190	160	380
	Global	580	740	940	1140	1220	1340	1340	1220	1050	860	620	530	970
	Diffuse	250	320	430	520	570	580	570	530	440	350	270	230	420
	Global	780	990	1250	1470	1580	1600	1560	1470	1290	1050	810	710	1210
Clear Day	Global	1450	1450	1300	1090	860	790	820	1000	1270	1510	1450	1430	1200
	Diffuse	360	420	490	530	540	520	520	520	480	420	370	330	460
	Global	2110	2120	1900	1440	1050	880	940	1230	1670	2010	2080	2060	1620
	Global	580	710	870	1010	1030	1110	1000	990	960	840	630	530	860
Clear Day	Diffuse	250	330	440	530	580	590	580	530	450	350	270	230	430
	Global	780	990	1250	1470	1580	1600	1560	1470	1290	1050	810	710	1210

Average Annual Solar Heat and Illumination – Nearest Available Site

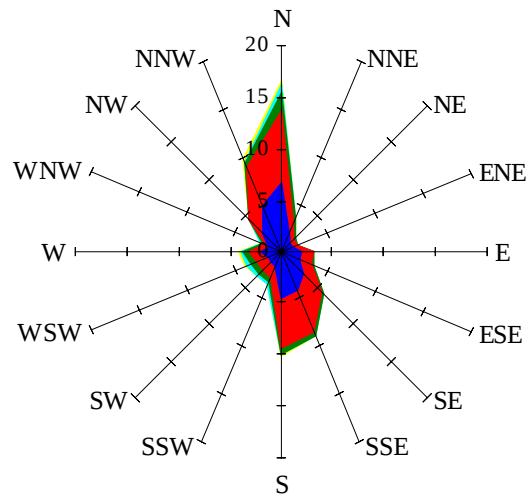
(Source: National Renewable Energy Laboratory, Golden CO, 1995)

AVERAGE TRANSMITTED SOLAR RADIATION (Btu/sq.ft./day) FOR DOUBLE GLAZING, Percentage Uncertainty = 9		Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Year
HORIZ	Unshaded	510	730	1010	1300	1430	1610	1550	1390	1170	880	580	450	1050
NORTH	Unshaded	140	180	240	300	360	410	380	310	250	200	150	130	250
	Shaded	130	170	220	270	330	370	340	290	230	180	140	120	230
EAST	Unshaded	400	520	670	820	870	960	970	880	750	610	430	360	690
	Shaded	370	470	590	720	760	830	830	760	660	550	390	340	610
SOUTH	Unshaded	1100	1070	900	700	520	460	480	620	850	1080	1090	1080	830
	Shaded	1080	1000	720	450	340	330	330	370	610	960	1060	1070	690
WEST	Unshaded	400	500	610	720	730	790	710	700	680	590	430	370	600
	Shaded	360	450	550	630	630	680	610	610	610	530	400	340	530

AVERAGE INCIDENT ILLUMINANCE (klux-hr) FOR MOSTLY CLEAR AND MOSTLY CLOUDY CONDITIONS, Percentage Uncertainty = 9		March					June				
		9am	11am	1pm	3pm	5pm	9am	11am	1pm	3pm	5pm
HORIZ.	M.Clear	44	76	84	66	28	52	87	102	97	69
	M.Cloudy	29	51	59	45	18	35	65	78	66	46
NORTH	M.Clear	10	13	14	12	8	18	15	16	16	13
	M.Cloudy	10	15	17	14	7	15	17	17	17	14
EAST	M.Clear	83	57	14	12	8	87	72	28	16	13
	M.Cloudy	39	36	17	14	7	45	52	26	17	14
SOUTH	M.Clear	45	76	84	66	28	11	30	44	39	17
	M.Cloudy	24	45	53	39	14	11	27	37	30	16
WEST	M.Clear	10	13	25	70	74	11	15	16	53	82
	M.Cloudy	10	15	22	41	28	11	17	17	38	48
M.Clear	(% hrs)	42	42	34	31	31	60	59	52	36	31
		Sept					Dec				
		9am	11am	1pm	3pm	5pm	9am	11am	1pm	3pm	5pm
HORIZ.	M.Clear	33	71	87	80	48	18	45	50	31	2
	M.Cloudy	19	47	60	54	32	12	31	35	21	2
NORTH	M.Clear	8	13	15	14	11	6	10	10	8	1
	M.Cloudy	8	15	17	16	11	5	10	11	8	1
EAST	M.Clear	79	72	26	14	11	52	41	10	8	1
	M.Cloudy	29	42	23	16	11	20	24	11	8	1
SOUTH	M.Clear	25	59	75	68	39	49	90	95	69	8
	M.Cloudy	12	36	48	43	22	19	45	52	33	3
WEST	M.Clear	8	13	15	56	81	6	10	24	55	11
	M.Cloudy	8	15	17	37	39	5	10	18	27	4
M.Clear	(% hrs)	58	59	56	49	45	47	47	44	45	50

Wind Summary - December, January, and February

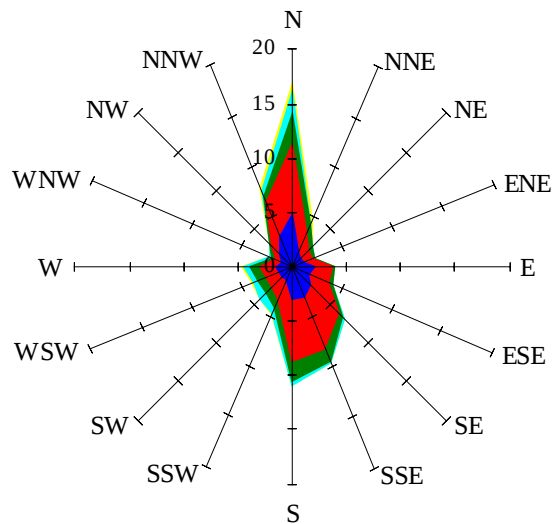
Labels of Percent Frequency on North Axis



Percent Calm = 14.86

Wind Summary - March, April, and May

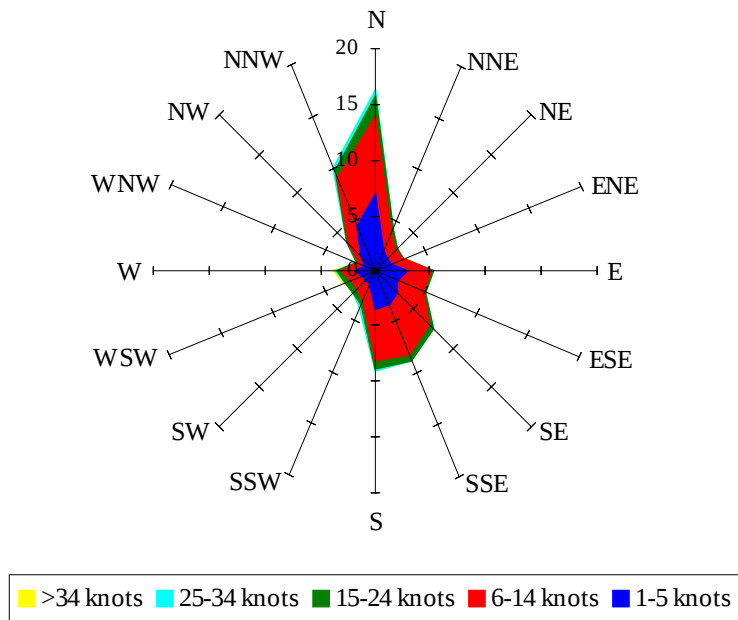
Labels of Percent Frequency on North Axis



Percent Calm = 8.55

Wind Summary - June, July, and August

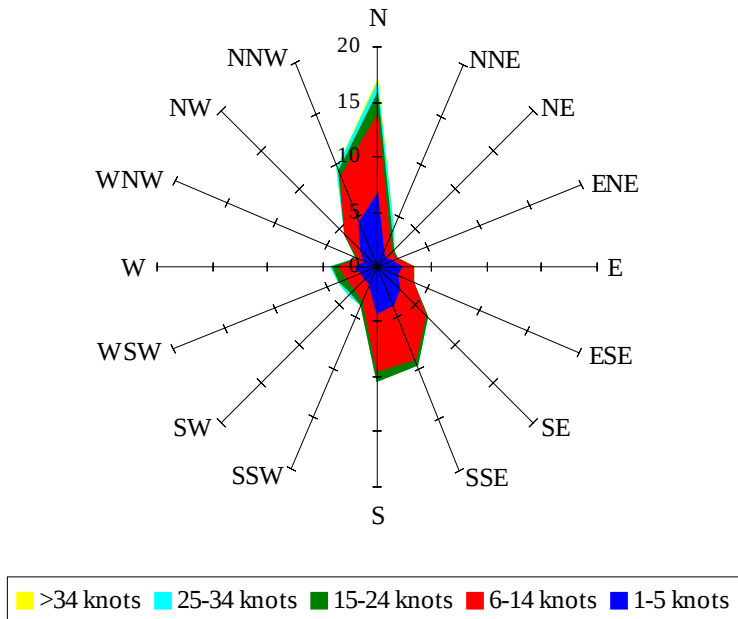
Labels of Percent Frequency on North Axis



Percent Calm = 10.43

Wind Summary - September, October, and November

Labels of Percent Frequency on North Axis



Percent Calm = 10.69