

August 2011

Global Solar Radiation on a Horizontal Surface  
 Hourly Integrated and Daily Totals  
 Instrument: Eppley PSP  
 Watt-Hours per Square Meter

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	0	0	0	0	0	29	123	284	439	554	761	971	820	936	731	633	425	132	55	7	0	0	0	0	6900
2	0	0	0	0	0	31	159	231	493	703	832	921	882	753	610	617	364	143	39	0	0	0	0	0	6778
3	0	0	0	0	0	12	80	269	529	480	501	587	779	724	726	460	139	71	32	0	0	0	0	0	5388
4	0	0	0	0	0	27	150	353	536	710	719	775	604	524	339	311	125	164	54	4	0	0	0	0	5394
5	0	0	0	0	0	16	118	305	476	697	834	930	562	705	483	528	323	169	23	1	0	0	0	0	6170
6	0	0	0	0	0	16	67	307	209	463	336	362	195 ?	?	96 ?	147	164	78	40	0	0	0	0	0	2480 ?
7	0	0	0	0	0	12	102	323	508	682	816	896	896	809	700	577	331	186	43	0	0	0	0	0	6880
8	0	0	0	0	0	15	147	344	538	708	842	928	884	874	817	620	429	195	31	0	0	0	0	0	7372
9	0	0	0	0	0	23	139	306	518	677	835	909	919	723	738	599	407	196	21	0	0	0	0	0	7011
10	0	0	0	0	0	20	149	325	409	554	539	587	845	840	735	568	392	199	32	0	0	0	0	0	6193
11	0	0	0	0	0	19	131	323	521	590	696	602	500	556	648	430	360	140	13	0	0	0	0	0	5531
12	0	0	0	0	0	18	130	309	476	620	767	790	590	479	736	493	362	200	37	0	0	0	0	0	6005
13	0	0	0	0	0	19	125	313	510	658	733	754	737	591	396	249	121	35	16	0	0	0	0	0	5257
14	0	0	0	0	0	13	41	170	399	479	321	259	759	522	408	384	195	56	40	0	0	0	0	0	4044
15	0	0	0	0	0	16	143	338	543	723	826	901	906	777	754	584	356	97	35	0	0	0	0	0	6999
16	0	0	0	0	0	19	124	306	491	647	770	940	739	828	530	460	346	112	26	0	0	0	0	0	6336
17	0	0	0	0	0	29	144	334	541	753	881	933	945	892	780	609	407	194	38	0	0	0	0	0	7480
18	0	0	0	0	0	44	137	244	432	486	722	429	632	802	711	533	352	181	35	0	0	0	0	0	5741
19	0	0	0	0	0	16	132	318	490	683	774	864	885	729	224	341	372	154	22	0	0	0	0	0	6005
20	0	0	0	0	0	15	114	290	504	692	822	828	521	319	184	401	363	158	33	0	0	0	0	0	5242
21	0	0	0	0	0	18	83	297	502	667	805	855	779	685	638	422	220	46	1	0	0	0	0	0	6017
22	0	0	0	0	0	12	69	161	296	529	669	311	402	723	545	405	220	81	22	0	0	0	0	0	4444
23	0	0	0	0	0	13	114	304	532	666	768	436	688	398	382	430	292	146	20	0	0	0	0	0	5188
24	0	0	0	0	0	17	115	310	505	373	792	625	635	557	636	553	276	146	49	0	0	0	0	0	5590
25	0	0	0	0	0	10	121	311	492	622	625	689	721	799	422	417	353	147	20	0	0	0	0	0	5748
26	0	0	0	0	0	9	67	188	449	625	745	669	765	733	516	347	150	38	4	0	0	0	0	0	5306
27	0	0	0	0	0	0	3 ?	?	?	?	?	?	96 ?	82 ?	?	?	40	21	3	0	0	0	0	0	245 ?
28	0	0	0	0	0	8	49	144	247	501	823	882	886	826	707	524	332	129	15	0	0	0	0	0	6073
29	0	0	0	0	0	12	65	140	384	634	713	842	848	606	395	437	87	42	4	0	0	0	0	0	5209
30	0	0	0	0	0	1	27	186	538	462	638	875	888	798	704	525	327	129	22	0	0	0	0	0	6120
31	0	0	0	0	0	14	114	318	524	707	848	928	936	872	752	568	312	117	25	0	0	0	0	0	7035
Avg	0	0	0	0	0	17	106	278	468	611	725	743	718	682	568	472	288	126	27	0	0	0	0	0	5683
S D	0	0	0	0	0	9	40	64	86	99	140	209	210	189	195	118	110	56	14	1	0	0	0	0	1442
S/A	0	0	0	0	0	0.51	0.38	0.23	0.18	0.16	0.19	0.28	0.29	0.28	0.34	0.25	0.38	0.44	0.52	3.46	0	0	0	0	0.25
Min	0	0	0	0	0	0	3	140	209	373	321	259	96	82	96	147	40	21	1	0	0	0	0	0	245
Max	0	0	0	0	0	44	159	353	543	753	881	971	945	936	817	633	429	200	55	7	0	0	0	0	7480
n	0	0	0	0	0	233	365	360	360	360	359	360	360	355	351	360	371	370	304	5	0	0	0	0	4873

Daylight Data Recovery: 0.0% missing; 0.0% untested; 2.7% exceed the 15% QC threshold -- 5006 total daylight measurements.

Instrument: Eppley PSP Serial Number: 31392F3 Calibration Factor: 7.3961 μV/W/m² Calibration Date: 07/2007

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

August 2011

Direct Normal Solar Radiation  
 Hourly Integrated and Daily Totals  
 Instrument: Eppley NIP  
 Watt-Hours per Square Meter

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily	
1	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	*	
2	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	*	
3	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	*	
4	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	*	
5	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	*	
6	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
7	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
8	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
9	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
10	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
11	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
12	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
13	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
14	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
15	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
16	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
17	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
18	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
19	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
20	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
21	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
22	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
23	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
24	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
25	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
26	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
27	0	0	0	0	0	?	?	?	?	?	?	?	?	?	?	?	?	?	?	0	0	0	0	0	?	
28	0	0	0	0	0	*	?	?	?	*	*	?	?	?	?	?	?	?	?	0	0	0	0	0	?	
29	0	0	0	0	0	*	*	*	*	?	?	?	?	*	*	*	*	*	*	0	0	0	0	0	*	
30	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
31	0	0	0	0	0	*	*	*	*	*	*	*	*	*	*	*	*	*	*	0	0	0	0	0	*	
Avg	0	0	0	0	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	0	0	0	0	0	N/A	*
SD	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
S/A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Min	0	0	0	0	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	0	0	0	0	0	N/A	0
Max	0	0	0	0	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	0	0	0	0	0	N/A	0
n	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Daylight Data Recovery: 94.1% missing; 0.0% untested; 5.9% exceed the 15% QC threshold -- 5006 total daylight measurements.

Instrument: Eppley NIP Serial Number: 23398E6 Calibration Factor: 7.1447 μV/W/m² Calibration Date: 07/2007

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Diffuse Solar Radiation (Shadow Band) on a Horizontal Surface**  
**Hourly Integrated and Daily Totals**  
**Instrument: Eppley PSP**  
**Watt-Hours per Square Meter**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	0	0	0	0	0	27	103	151	220	285	311	210	239	188	151	110	97	79	37	7	0	0	0	0	2215
2	0	0	0	0	0	22	75	198	192	193	198	198	228	259	261	279	152	104	37	0	0	0	0	0	2398
3	0	0	0	0	0	12	79	210	229	393	475	547	478	390	292	259	137	71	32	0	0	0	0	0	3604
4	0	0	0	0	0	23	74	117	135	152	250	358	335	288	247	223	124	140	46	3	0	0	0	0	2515
5	0	0	0	0	0	18	83	135	198	233	206	346	488	408	362	259	161	119	23	1	0	0	0	0	3039
6	0	0	0	0	0	17	66	251	209	420	336	359	161	56 ?	58 ?	147	164	78	39	0	0	0	0	0	2361
7	0	0	0	0	0	12	89	175	188	216	229	224	247	247	263	205	170	114	40	0	0	0	0	0	2418
8	0	0	0	0	0	14	61	99	119	135	139	150	217	172	234	200	167	94	21	0	0	0	0	0	1822
9	0	0	0	0	0	20	65	123	124	180	156	168	151	232	202	126	100	76	19	0	0	0	0	0	1741
10	0	0	0	0	0	15	56	101	217	298	360	415	352	265	240	198	124	78	23	0	0	0	0	0	2745
11	0	0	0	0	0	17	71	110	132	327	488	562	481	469	350	228	159	103	13	0	0	0	0	0	3511
12	0	0	0	0	0	17	96	167	208	249	278	336	435	371	242	236	163	105	29	0	0	0	0	0	2932
13	0	0	0	0	0	20	73	121	187	322	275	326	349	459	360	249	121	35	16	0	0	0	0	0	2913
14	0	0	0	0	0	13	40	164	308	417	289	232	508	468	341	306	192	56	38	0	0	0	0	0	3372
15	0	0	0	0	0	12	52	79	89	110	158	162	187	249	175	133	155	74	29	0	0	0	0	0	1664
16	0	0	0	0	0	18	70	129	188	272	308	244	244	199	187	197	203	92	24	0	0	0	0	0	2375
17	0	0	0	0	0	15	43	58	88	138	112	93	97	93	88	77	64	47	19	0	0	0	0	0	1030
18	0	0	0	0	0	35	97	136	221	263	261	335	349	216	162	170	136	66	23	0	0	0	0	0	2468
19	0	0	0	0	0	11	46	77	172	210	247	344	261	220	207	232	126	61	21	0	0	0	0	0	2236
20	0	0	0	0	0	14	57	110	160	172	205	266	305	242	183	273	189	98	26	0	0	0	0	0	2302
21	0	0	0	0	0	18	64	141	155	178	265	262	337	336	376	279	185	43	1	0	0	0	0	0	2640
22	0	0	0	0	0	12	69	160	235	375	462	302	371	426	311	188	139	74	20	0	0	0	0	0	3143
23	0	0	0	0	0	12	55	70	85	111	237	275	254	248	195	158	135	70	18	0	0	0	0	0	1925
24	0	0	0	0	0	15	49	86	124	190	287	284	284	303	238	157	161	104	39	0	0	0	0	0	2321
25	0	0	0	0	0	11	45	80	127	149	242	316	343	277	236	236	139	96	20	0	0	0	0	0	2319
26	0	0	0	0	0	11	58	126	189	239	338	439	386	382	361	282	148	38	4	0	0	0	0	0	3001
27	0	0	0	0	0	0	3 ?	?	?	?	?	40 ?	71 ?	66	?	33 ?	39	21	3	0	0	0	0	0	276 ?
28	0	0	0	0	0	9	49	138	220	327	160	135	143	141	132	132	108	62	13	0	0	0	0	0	1769
29	0	0	0	0	0	12	65	140	235	244	372	349	370	420	374	274	86	42	4	0	0	0	0	0	2988
30	0	0	0	0	0	1	26	175	390	407	459	263	198	191	163	137	101	58	16	0	0	0	0	0	2587
31	0	0	0	0	0	10	36	54	64	70	68	66	66	68	69	93	82	65	18	0	0	0	0	0	828
Avg	0	0	0	0	0	15	62	129	180	242	272	278	288	269	235	196	136	76	23	0	0	0	0	0	2370
S D	0	0	0	0	0	7	21	46	68	98	107	123	122	121	92	69	38	28	12	1	0	0	0	0	751
S/A	0	0	0	0	0	0.45	0.34	0.36	0.38	0.41	0.39	0.44	0.42	0.45	0.39	0.35	0.28	0.36	0.51	3.59	0	0	0	0	0.32
Min	0	0	0	0	0	0	3	54	64	70	68	40	66	56	58	33	39	21	1	0	0	0	0	0	276
Max	0	0	0	0	0	35	103	251	390	420	488	562	508	469	376	306	203	140	46	7	0	0	0	0	3604
n	0	0	0	0	0	219	365	360	360	360	360	362	366	363	357	363	372	371	304	5	0	0	0	0	4889

Daylight Data Recovery: 0.0% missing; 0.0% untested; 2.3% exceed the 15% QC threshold -- 5006 total daylight measurements.

Instrument: Eppley PSP Serial Number: 31393F3 Calibration Factor: 7.6820 μV/W/m² Calibration Date: 07/2007

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Dry Bulb Temperature (Roof)**  
**Hourly and Daily Averages**  
**Instrument: CSI HMP-35C**  
**Degrees Celsius**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	23.1	23.4	23.5	23	23	22.9	23.4	24.7	26.7	28	29.3	30.1	30.9	31.6	32.1	32.1	31.7	30.5	29.7	28.3	27.3	26.7	26.1	25.5	27.2
2	25.1	25.1	24.8	24.3	23.8	23.5	24.3	25.6	27.4	29	30.2	31.3	32.4	32.5	32.9	32.6	32.9	32	31.1	29.6	28.2	27.2	26.7	26.3	28.3
3	26	25.5	25.2	25.4	25.5	25.5	26.2	27.4	29	29.7	30.3	31.6	33.1	33.8	34.7	34.7	33.6	32.8	32.3	31.4	29.9	28.7	28.3	28.3	29.5
4	27.9	27.6	27.1	26.7	26.3	25.9	26.3	27.4	29	30.8	31.7	32.5	32.6	32.2	31.5	30.2	28.9	28.3	27.6	26.6	26.2	25.9	25.7	25.5	28.3
5	25.4	25.2	25	24.8	24.6	24.8	25.4	26.5	27.2	28.4	28.6	28.8	28.4	28.4	28.6	28.7	28	27.4	26.6	26.1	25.6	25.5	25.8	26.1	26.7
6	25.6	24.9	25	25.2	25.3	25.3	25.8	26.7	27.3	28.2	28.2	28.2	27.7	25.9	24.6	25.1	25.8	26.1	26	25.8	26	25.6	25.1	25.1	26
7	25.3	25.2	25.1	25	24.8	24.5	24.8	26.2	28	29.3	30	30.8	31.8	32.6	33.1	33.4	33.1	32.8	31.9	30.7	29.9	29.4	29.1	28.6	29
8	27.8	27.3	26.5	25.7	25.3	25.2	25.7	27.2	28.8	30.3	31.6	32.4	33	33.7	34.3	34.7	34	33.1	30.7	29	28.5	28.1	28	27.6	29.5
9	27.3	27.1	26.9	26.6	26.5	26.2	26.3	27.1	28.5	30.3	31.5	32.4	33.6	33.6	33.9	34.1	34	33.5	32.1	30.8	29.5	28.8	28.3	28.1	29.9
10	28	27.2	26.3	25.5	24.3	23.4	24.6	27.2	28.5	29.7	29.8	30.1	31.2	31.8	32.4	32.9	32.8	32.3	30.7	29.2	28.2	27.7	27.4	27.1	28.7
11	26.4	25.8	25.1	24.3	24	23.4	23.9	26.3	28.3	29.7	30.5	30.8	30.5	30.5	30.3	29.8	29.6	27.8	26.7	26.2	25.8	25.8	25.8	24.8	27.2
12	24.4	24.1	23.8	24	23.8	23.5	24.4	26.4	27.3	28.1	28.7	28.7	28.3	28.1	28.7	28.6	28.1	27.6	26.9	26	25.6	25	24.9	24.5	26.2
13	24.2	24.3	24.1	24	23.9	23.9	25.2	26.8	27.9	28.4	28.8	29.5	29.7	29.7	29.4	29.2	28.6	27.8	27.3	26.8	26.6	26.5	26.2	26	26.9
14	25.8	25.3	25	25	25	24.9	25.2	25.8	27.1	27.8	27.9	26.3	27.4	28	28.8	28.9	28.5	27.4	25.8	24.5	24.1	23.6	23.9	23.7	26.1
15	23.8	23.1	22.3	21.8	20.4	20	20.3	21.9	23.8	24.8	25.5	26.6	27.6	28.3	28.9	29.1	29.3	28	25.7	23.4	23.3	22.8	21.9	21	24.3
16	20.8	20.7	20.5	20.5	20.6	20	20.5	22.7	24.7	25.9	27	28.1	28.8	29.6	29.6	30	29.8	29	26.8	25.5	25.2	24.4	23.9	23.4	24.9
17	23.1	22.2	21.4	21.6	21.2	20.5	22	25.3	26.6	27.9	28.5	29.1	29.2	29.3	29.1	28.7	28	27.4	25.9	24.7	24.1	23.3	22.7	22	25.2
18	20.7	20.5	21	21.2	20.6	19.9	21.7	23.9	25.7	27	27.3	28	28.3	29.8	30	29.6	28.9	28	26.7	25.8	25.4	25.1	24.5	24.2	25.2
19	23.7	23.6	23.4	22.8	22.7	22.3	23.4	25	26.5	28.1	28.9	29.6	29.3	29.3	27.9	27.8	28.2	27.7	26.6	26	25.7	25.7	25.2	24	26
20	23.3	22.3	22.1	21.9	21.4	21.1	21.9	24.3	26.3	27.3	28.5	29.8	29.6	29.2	27.3	25.5	27.5	27.9	27.1	25.9	25.4	24.9	24.6	24.2	25.4
21	24.1	23.9	23.6	23.4	23.4	23.5	23.9	25.1	27.1	28.8	30	30.4	31	31.6	31.7	31.6	29.6	28.5	27.9	26.4	26.1	25.6	25.3	25.4	27
22	25.4	24.7	24	23.3	23	22.5	22.5	23.2	24.2	26	27.4	27.6	27.4	28.7	29.3	28.5	27.9	26.7	25.6	24.5	23.8	23.4	23.1	23	25.2
23	22.1	21.9	21.6	21.7	21.6	20.4	20.8	23.2	25.8	27.1	27.7	26.9	28.2	27.1	26.9	26.9	26.8	26.3	24.9	24.2	24.1	24.2	24.3	24	24.5
24	23.5	23.1	22.5	21.4	20.9	20.6	21.6	25	26.7	27.2	27.8	28.3	28.4	28.6	28.9	28.7	27.7	27.2	26.6	25.8	25.3	24.8	24.5	24.7	25.4
25	24.6	24.6	24.5	23.9	23.4	23.5	24.2	26.2	27.8	28.8	30.2	30.9	30.9	29.4	29.4	29.2	30.7	30.4	29.4	28.3	27.5	26.9	26.5	26.1	27.4
26	25.9	25.4	25	24.9	24.3	24.5	25	26.3	27.1	29.2	29.7	30	30.2	30.3	29.8	29.2	28.4	27.9	27.2	26.5	25.2	24.4	24.7	24.5	26.9
27	25.3	25.3	24.8	24.7	25	24.8	24.9	24.5	24.5	24.6	24.5	24.3	24.6	24.6	24	23.5	23.3	23.5	23.6	22.9	22.8	22.3	21.5	21.6	24
28	22.3	23	24	24.2	23.9	23.7	24.2	24.4	24.8	25.7	27.1	28.8	29.9	31	31.5	31.4	31.4	30.7	29	27.6	26.5	25.5	25.2	24.7	26.7
29	24	23.2	22.9	22.6	22.3	22.5	22.8	23.3	24.6	27.6	28.4	27.5	27.8	26.8	24.8	24.4	22.7	21.9	21.7	21.4	21.5	21.3	20.9	21	23.7
30	21.1	20.9	20.9	20.9	20.7	20.4	21	21.3	23.6	24.3	25.1	25.5	25.7	25.9	26.3	26.1	24.9	23.9	22.6	21.4	20.7	20.3	19.8	19.5	22.6
31	19.1	18.9	18.2	17.9	17.5	17.6	18.4	20.6	22.4	24.2	24.7	25.2	25.6	25.7	25.6	25.2	24.3	23.2	22	20.9	20	18.9	18.4	18	21.4
Avg	24.4	24	23.7	23.5	23.2	22.9	23.6	25.1	26.6	27.8	28.6	29	29.5	29.6	29.5	29.4	29	28.3	27.2	26.2	25.6	25.1	24.8	24.5	26.3
S D	2.2	2.1	2	2	2.1	2.1	2	1.9	1.7	1.8	1.9	2.1	2.3	2.5	2.8	3	3	3	2.8	2.7	2.4	2.4	2.5	2.5	2
S/A	0.09	0.09	0.09	0.08	0.09	0.09	0.09	0.07	0.07	0.07	0.07	0.07	0.08	0.08	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.08
Min	19.1	18.9	18.2	17.9	17.5	17.6	18.4	20.6	22.4	24.2	24.5	24.3	24.6	24.6	24	23.5	22.7	21.9	21.7	20.9	20	18.9	18.4	18	21.4
Max	28	27.6	27.1	26.7	26.5	26.2	26.3	27.4	29	30.8	31.7	32.5	33.6	33.8	34.7	34.7	34	33.5	32.3	31.4	29.9	29.4	29.1	28.6	29.9
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: CSI HMP-35C    Serial Number: P0520031    Calibration Factor: 1.00 deg C/mV    Calibration Date: 03/1988

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

Prepared by: Afshin M. Andreas, NREL

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Relative Humidity (Roof)**  
**Hourly and Daily Averages**  
**Instrument: CSI HMP-35C**  
**Percent**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily	
1	?	?	?	?	?	?	104.8 ?	102.6	98.7	95.3	90.1	85.4	82.7	79	75.7	73.5	77.5	83.5	87.4	93.6	98.6	101.1	103.5	105 ?	91 ?	
2	?	?	?	?	?	?	?	101.3	90.2	85	81.5	73.9	69.9	70.9	70.7	70.3	64.6	66.7	72.7	81.8	95.7	99.2	101.5	104.4 ?	82.4 ?	
3	?	?	?	104.6 ?	103.4	103.1	101.1	96.9	88.6	86.7	85.9	81.9	72.3	71.1	65.4	64.4	67.8	70.1	72.6	78	88.6	89.7	88.7	93.1	84.5 ?	
4	97.5	98.2	97	97.1	97.3	96.9	96.1	93	88.9	81.6	77.3	75	75.4	81.7	86.6	91	94.7	95.5	95.3	101.1	103.9	103.6	104.1	104.6	93	
5	104.8	104.1	103.7	104.1	104.6	102.9	100.1	95.2	90.3	85.1	85	85.7	87.6	88.7	88.5	88.6	92	95.2	98.8	101.3	103.4	103.6	101	98.7	96.4	
6	100.7	103	103.9	104.1 ?	103.7	104.9	104.4	101.8	97.6	94.4	93.2	93.3	95.8	103.2 ?	?	?	103.1	102.6	102.2	103	103.1	102.1	103.9	104.6 ?	101.3 ?	
7	?	104.3	104.3	104.6	104.9 ?	?	?	102.8	97.9	94.7	93.7	89.7	87	83.6	81.4	80.5	81.9	84.7	89.1	94.2	96.8	98	99.4	100.6	94 ?	
8	101.6	101.4	101.6	103.1	103.2	102.6	100.3	95.3	90.6	84.8	78.5	75	72.7	69.4	65	61.1	68.4	74.5	88	89.4	90.3	94.2	95.8	98.1	87.7	
9	103.7 ?	?	?	?	?	?	?	102.3	97.2	91	81.8	76.7	74.1	71.6	70.9	69.3	67.7	68.1	72.5	80.8	86.6	93.4	94.8	94.8	96.8	83.9 ?
10	91.7	86.7	88	89	93.5	97	94.2	85.3	80.8	74.9	75.7	75.4	62.9	65.9	57.9	48.5	52.9	58.8	71.9	78.8	85.3	98.2	100.9	102.1	79.8	
11	100.7	99.6	98.9	99	96.1	95.4	94	84.3	78.6	71.4	66.4	64.9	66.6	68.1	64.7	66.3	70.3	77.7	79.3	80.9	87.3	88.2	87.3	93.1	82.5	
12	95.3	97.8	99.9	100.4	100	99.6	96.5	89.1	84.3	72.5	67.5	68.2	67.4	67.4	66	66.5	69.4	71.8	75	78.7	81.9	84.4	86.6	90.5	82.4	
13	92.7	92.8	94.7	96.2	98.5	100.7	96.8	90.7	83.2	80.6	74.6	74.5	72.3	73.6	75.3	76.2	80.2	82.6	85.6	88	88.6	89.9	92.5	94.2	86.5	
14	94.9	96.2	97.9	98.1	98.1	98.9	99.3	99	93.4	91.2	91.8	102.1	96.9	93.9	89.9	89.4	92.2	98.4	97.4	98.8	102	104.2	102.7	103.8	97.1	
15	104.9 ?	?	?	?	?	?	?	103.6 ?	98.6	92.7	91.9	93.3	87.3	83.1	80.9	77.7	73.6	70.6	76	84.7	94.4	95.5	97	101	104.6	90.1 ?
16	105 ?	104.8	104.9 ?	?	?	?	?	103.7 ?	97.6	87.8	80	77.1	71.1	68.1	63.2	62.6	61.7	64.2	67.5	84.2	89.8	91.1	94.8	97.4	100.5	84.6 ?
17	101.3	104 ?	?	?	?	?	?	104 ?	97.5	87	76.6	69.6	66.2	66.6	66.4	69.8	72.2	75.8	79.1	86.4	93.2	96.1	98.2	101.6	103.8	85.8 ?
18	?	?	?	?	?	?	?	?	103.6 ?	97	91.1	86.8	82.5	76.9	63.2	68.2	74.3	77.4	84.3	86.1	95.3	98.8	100	101.8	102.5	87.6 ?
19	104.3 ?	?	?	?	?	?	?	104 ?	101.1	94.1	86.5	81.4	78.7	79.9	80.6	82.8	84.6	82.1	86.3	91	95.9	96.9	97.8	100.2	103.8 ?	91.2 ?
20	?	?	?	?	?	?	?	?	98.8	91.8	86.4	78	71.9	71.9	76.6	91.1	100.9	92.1	87.7	90.6	96.4	99.8	101.2	100.6	102.5	90.5 ?
21	103.4	104.3 ?	?	?	?	?	?	?	101.3 ?	95.4	86.5	83.2	80.8	79.3	75.8	75.7	77.1	87.8	92.4	95.7	99.4	102	104.2	104.9 ?	104	92.3 ?
22	103.5	103	101.8	102.3	102.5	104.5	104.7	102.9	100.9	96.4	90.7	86.5	85.2	73.6	63.8	75.6	72.5	73.4	79.6	84.4	89.7	92.5	93.7	93	90.7	
23	97.6	100.1	99.9	98	98.4	101.8	100.9	91.4	75.6	62.2	61.9	63.7	60.2	63	63.6	63.5	65	67	71.3	77.4	80.3	81.3	76.7	77.7	79.1	
24	81.1	83	87.7	95.1	98.5	100.1	99.9	89.1	81.2	78.9	75.9	72.7	74.9	73.4	71.5	72.9	79.6	79.5	85.4	90.4	94.6	99.5	103.6	?	85.6	
25	?	?	?	?	?	?	?	?	102 ?	96.3	89.7	82.9	81.8	81.9	86	87.2	83.7	84.8	87.5	90.8	95.4	99.2	102.5	104.3	104.8 ?	91.8 ?
26	?	?	?	?	?	?	?	?	?	99.4	89.8	90	85.6	87.8	90.5	94	96.2	99.4	101.5	100.6	101.6	103.9	104.8 ?	104.7	104.6	97.1 ?
27	104.5	103.9	101.8	103.5	102.7	103	102.1	102.9	103.2	102.1	102.2	102.3	101.9	100.8	101.5	101.6	101.5	101.3	101	100.9	98.2	98.1	101.5	100.4	101.8	
28	95.9	91.2	85	83.6	85.3	86.1	81.1	79.4	77.8	73	66.9	59.5	55.1	51.8	57.1	62.6	64.7	68.9	77.9	83.2	90.7	96.5	98.1	99.9	78	
29	102.9	104.7 ?	?	?	?	?	?	?	?	101.7 ?	94.1	92.8	96.1	95.4	96.6	98.3	97.3	98.6	98.3	98.3	97.2	97.4	98.5	100.1	101.2	98.3 ?
30	97.2	95.6	96.1	97.7	99	97.2	91.8	95	80	70.7	67.7	66.4	64.7	62.2	56.9	56.2	67.1	73.3	79.8	88.1	93	95.7	97.7	98.7	82.8	
31	98.6	98.4	101.5	102.3	103.2	103.2	100.4	92.9	83.6	66.3	62.5	58.6	56.9	60.2	57.9	54.7	66.9	79.1	85.1	91.8	97	101.1	102.4	102.8	84.5	
Avg	99.3	98.9	98.3	99	99.6	99.9	99.4	96.2	90.3	83.9	80.7	78.4	76.5	75.9	74.5	75.1	78.5	81.9	86.6	91.3	94.9	97.2	98.5	99.8	88.8 ?	
S D	5.7	6.2	6	5.7	4.8	4.6	5.5	6.3	7.7	9.6	10.4	11.4	11.9	12.5	12.9	14	13.2	11.9	9.2	7.8	6.3	5.8	6.5	5.9	6.5	
S/A	0.06	0.06	0.06	0.06	0.05	0.05	0.06	0.07	0.08	0.11	0.13	0.15	0.16	0.17	0.17	0.19	0.17	0.15	0.11	0.09	0.07	0.06	0.07	0.06	0.07	
Min	81.1	83	85	83.6	85.3	86.1	81.1	79.4	75.6	62.2	61.9	58.6	55.1	51.8	56.9	48.5	52.9	58.8	71.3	77.4	80.3	81.3	76.7	77.7	78	
Max	105	104.8	104.9	104.6	104.9	104.9	104.8	103.6	103.2	102.1	102.2	102.3	101.9	103.2	101.5	101.6	103.1	102.6	102.2	103	103.9	104.8	104.9	105	101.8	
n	246	232	204	205	208	202	238	333	362	372	372	372	372	367	360	360	370	372	372	372	371	365	365	323	7719	

Data Recovery: 0.0% missing; 0.0% untested; 13.5% failed QC -- 8928 total measurements.

Instrument: CSI HMP-35C    Serial Number: P0520031    Calibration Factor: 0.10 %/mV    Calibration Date: 01/1999

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

Prepared by: Afshin M. Andreas, NREL

**August 2011**

**Dry Bulb Temperature (CR10)**  
**Hourly and Daily Averages**  
**Instrument: CSI**  
**Degrees Celsius**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	23.3	23.1	23.2	23.2	23	23	23.4	25.3	28.7	31.5	34.4	36.6	38.2	38.2	39.1	39.6	39.5	37.9	34.7	31.7	29	27.4	26.3	25.5	30.2
2	25.1	25	24.9	24.4	23.9	23.4	24.1	27.2	29.4	33.6	36	37.9	39.1	39.3	39.1	39.1	38.9	37.6	34.8	31.8	29.4	27.9	26.8	26	31
3	25.4	25.2	25	25	25.2	25.3	25.6	27.1	30.7	34.4	35.2	36.2	37.6	38.3	38.9	39.3	38	35.7	34.3	33	31.5	29.6	28.7	28.3	31.4
4	28	27.6	27.4	27	26.6	26.1	26.7	29.4	32.8	36.3	38.2	39.2	39.7	39	37.7	35.9	33.9	31.9	31	29	27.2	26.3	25.8	25.4	31.2
5	25.1	25	24.8	24.5	24.3	24.2	24.9	27.2	29.8	32.3	34.7	35.3	35.4	34.4	34.7	34.3	33.9	32.7	30.6	28	26.5	25.6	25.4	25.5	29.1
6	25.5	25.1	24.9	24.7	24.4	24.4	24.8	26.5	29	30.3	31.7	31.8	31.4	28.6	26.2	25.5	25.9	26.4	26.7	26.6	26.2	26.1	25.5	25.1	26.8
7	25	25	25	24.9	24.9	24.7	24.8	26.8	30.6	33.6	35.1	36	36.4	36.8	37.4	38.3	38.3	37.5	35.9	33.5	31.4	30.1	29.5	29.1	31.3
8	28.4	27.8	27.1	26.4	25.6	25.2	25.7	28.7	32.6	35.4	37.6	39.2	39.5	38.9	39.2	40	40.1	39	36.7	32.7	29.8	28.5	27.8	27.5	32.5
9	27.1	26.9	26.6	26.4	26	25.8	26.5	29	32	34.8	37	37.8	38.4	38.5	38.1	38.9	39	38.7	36.5	33.2	30.8	29.2	28.3	27.9	32.2
10	28	27.7	26.9	26	24.8	23.4	23.7	28.1	31.5	34	36.2	36.3	36.7	37.3	37.6	38.2	38.2	37.5	35.4	31.7	29	27.7	27.2	26.8	31.2
11	26.3	25.7	25.1	24.5	23.8	23.5	23.7	26.6	30.4	33.7	35.5	37	37.1	36.5	36.5	36.1	35.7	34.5	30.8	27.8	26.3	25.6	25.4	24.8	29.7
12	23.7	23.1	22.5	22.4	22.7	22.7	23.4	26.4	30	32.5	33.8	34.7	34.2	33.2	33	33.8	33.5	32.5	30.8	28	26.2	25.1	24.4	24	28.2
13	23.5	23.2	23.1	22.9	22.7	22.6	23.6	27	30.4	32.6	33.8	34.5	34.6	34	33.7	32.9	31.7	30.1	28.8	27.8	27.2	26.9	26.6	26.1	28.4
14	25.8	25.4	25	24.7	24.6	24.5	24.8	25.5	27.6	30.3	31.5	30	29	31	32	32.5	32.5	30.9	28.9	26.9	25.2	24.3	23.9	23.9	27.5
15	23.8	23.8	23	22.3	21.4	20.5	20.6	23.4	27.1	29.9	31.6	32.9	33.5	33.5	33.7	34.1	34.1	32.6	30.3	26.6	24.1	23.1	22.1	21.1	27
16	20.4	19.8	19.6	19.6	19.7	19.7	20.2	23.1	27.2	30.1	32.2	33.9	34.7	34.5	34.3	34.4	34.8	34.2	31.4	28	25.9	24.6	23.1	22.2	27
17	21.7	21.6	20.9	20.6	20.5	20	20.9	25.3	30.1	32.9	34.7	35.4	35.6	34.7	34.5	34.7	34.4	33.6	31.4	27.5	24.9	23.3	22.1	21.3	27.6
18	20.5	19.7	19.4	19.4	19.5	19.4	20.3	22.9	27.4	31.1	32.9	34.1	33.3	33.6	35.1	35.5	34.5	33.5	31.6	28.2	26.2	25.1	24.4	23.7	27.1
19	23.1	22.7	22.7	22.5	22.2	21.9	22.6	26.8	31.2	34.3	36.8	38	37.4	35.8	33.8	31.3	31.8	32.7	30.6	27.8	26.3	25.9	25.5	24.8	28.7
20	24	23.3	22.5	21.9	21.5	21	21.2	24.4	29.7	33.7	36.4	38.1	38.2	35.6	33	28.7	29.1	31.2	30.6	28.1	26.2	25.1	24.4	23.9	28
21	23.5	23.3	22.9	22.7	22.7	22.9	23.4	25.1	28.9	32.9	35.6	36.8	36.9	36.6	36.5	36.5	35.2	32.3	30	28	26.4	26	25.7	25.4	29
22	25.4	25.2	24.8	24.1	23.6	23.1	22.8	23.3	24.8	27.6	30.9	32.5	31.2	32	33.8	34.7	32.8	31.1	28.6	26.2	24.3	23.2	22.5	22.1	27.1
23	22	21.8	21.6	21.5	21.4	20.8	20.4	23.3	27.9	31.8	34.9	34.9	34.3	33.3	31.3	31.7	31.5	30.6	28.8	25.8	24.5	24.2	24	23.8	26.9
24	23.3	22.5	21.7	20.8	19.8	19	19.7	24.3	29.4	32.3	32.4	33.7	33.7	33	32.9	33.3	33.1	30.9	29.9	27.7	26.1	25.2	24.5	24.3	27.2
25	24.4	24.3	24.3	24	23.5	23.2	23.7	26.9	30.7	33.1	34.8	35.5	36.2	34.5	33.9	33.5	34.9	35.4	33.3	30.7	29	27.8	26.9	26.3	29.6
26	25.7	25.3	24.9	24.7	24.5	24.3	24.6	25.9	28.4	32.6	35.4	36.1	35.7	35.8	35.3	34.4	32.6	30.6	28.9	27.5	26.3	25	24.6	24.6	28.9
27	24.7	25.1	25	24.7	24.7	24.8	24.7	24.6	24.6	24.6	24.6	24.5	24.4	24.5	24.4	24	23.7	23.6	23.6	23.3	22.8	22.3	21.8	21.4	24
28	21.2	21.5	21.9	23.1	23.6	23.7	23.9	24.5	25.5	27.1	29.5	32.2	34.2	35.2	36.3	36.8	37	36	33.5	29.9	27.8	26.2	24.8	24.1	28.3
29	23.4	22.9	22.4	22.3	22.2	22.2	22.4	23.3	24.8	29.6	34	34.9	34.6	33.9	31.8	29.9	28.3	25.3	23.5	22.5	22	21.9	21.4	21.1	25.9
30	21.3	21.4	21.2	21.1	20.8	20.4	20.5	21	23.6	26.6	28.2	29.7	30.6	30.6	30.9	31.3	30.8	29.3	26.7	23.5	21.4	20.2	19.3	18.7	24.5
31	18.2	18	17.6	17.2	16.8	16.4	17.1	20.7	24.4	27.1	29.1	29.9	30.4	30.2	30.2	30.2	29.9	27.9	25.7	22.3	20.1	18.5	17.6	17.1	23
Avg	24.1	23.8	23.5	23.2	22.9	22.7	23.1	25.5	28.7	31.7	33.7	34.7	34.9	34.6	34.4	34.2	33.8	32.7	30.8	28.2	26.4	25.4	24.7	24.2	28.4
S D	2.4	2.4	2.3	2.2	2.2	2.3	2.2	2.2	2.5	2.8	3	3.2	3.4	3.3	3.5	3.9	3.9	3.5	3	2.8	2.6	2.6	2.7	2.3	
S/A	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.09	0.09	0.09	0.09	0.09	0.1	0.1	0.1	0.11	0.12	0.12	0.11	0.11	0.1	0.1	0.11	0.11	0.08
Min	18.2	18	17.6	17.2	16.8	16.4	17.1	20.7	23.6	24.6	24.6	24.5	24.4	24.5	24.4	24	23.7	23.6	23.5	22.3	20.1	18.5	17.6	17.1	23
Max	28.4	27.8	27.4	27	26.6	26.1	26.7	29.4	32.8	36.3	38.2	39.2	39.7	39.3	39.2	40	40.1	39	36.7	33.5	31.5	30.1	29.5	29.1	32.5
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: CSI Serial Number: Internal Temp Calibration Factor: N/A Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Wind Speed**  
**Hourly and Daily Averages**  
**Instrument: NRG MAX-40**  
**Meters per Second**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	0.1	0.2	0.1	0.7	0.3	1	1.8	1.4	2.1	1.8	1.8	1.7	1.6	1.9	1.6	1.9	1.9	2	1.8	1.4	1.3	0.4	0.2	0.5	1.2
2	0.6	0.8	0.9	0.1	0.2	0	0	1.1	1.2	2.4	1.9	1.6	1.5	1.8	1.6	2.7	2.3	1.7	0.6	0.3	1.5	1.3	1.1	0.2	1.1
3	0.5	0.7	0.6	0.8	0.8	1.3	1.4	1.9	2.2	1.9	1.9	2.1	2.8	3.1	4.2	3.9	3.3	1.5	1.2	0.9	0.7	0.9	0.8	0.6	1.7
4	0.8	1.5	2.2	1.5	1.4	1.5	1.6	2.1	1.4	1.7	2	1.7	1.9	2.4	2.6	3.4	3.3	3	2.5	1.8	1.5	1.5	1.7	1.6	1.9
5	1.4	1.4	1.3	1.5	1.5	2.2	2.6	3	3.3	2.7	3.6	3.7	3.5	3.4	3	3.4	3.8	3.3	2.6	2	1.2	2	1.9	1.9	2.5
6	0.5	0.8	0.7	1.3	0.6	0.4	0.7	2.3	2.8	3.3	3.5	4	3.8	2.5	1.6	1.2	2.7	2.7	3.3	2.3	2.3	1.5	1.2	1.2	2
7	1.4	1.9	2.1	1.3	1.1	1.3	1.5	2.1	2.6	3.3	3.7	4.1	3.6	3.9	3.5	3.7	3.2	2.9	1.9	1.4	1.4	1.7	1.9	1.4	2.4
8	1.7	1.4	1.7	0.8	1.2	2	1.9	1.7	2.2	2.5	2.2	2.3	2.9	3	3.6	3.4	3.3	1.8	1.2	1.7	1.4	1.3	1.4	1.2	2
9	1.4	1.2	0.5	0.3	0.3	0.8	1.3	1.8	2.1	2.2	3.3	3.3	2.9	3.7	4.1	4	3.6	3	1.3	0.5	0.2	0.2	1	1.5	1.9
10	2.8	1.8	1.6	1.1	0.3	0.4	0.3	1	0.7	0.8	1	1.4	2	2.8	2.9	3.3	3.4	2.9	1.5	0.8	1	1.6	1.3	1.6	1.6
11	1.2	1.2	0.9	0.9	1.3	1	1.3	2.2	2.4	2.5	2.1	2.4	2.4	1.9	2.4	2.2	2.2	2.3	2	1.6	0.9	1.1	0.5	0	1.6
12	0	0	0.2	1.1	0.6	0.6	0.8	1	2	3.5	3.3	3.6	3.5	3.4	3.6	3.3	3.9	3.4	2.3	1.3	0.8	0.7	0.7	0.3	1.8
13	0.3	0.5	0.2	0.4	0	0.5	1	2.4	3.2	3.6	4.2	4.2	4.9	5.5	5.4	4.7	4.4	3.4	3.1	2.5	2.8	2.3	0.9	0.8	2.5
14	0.8	0.8	0.5	0.9	0.5	0.7	1.3	1.7	3.9	4.5	3.4	2.4	4.5	3.9	3.6	3.5	3.5	2.7	2.4	1.7	1.7	1.2	1.6	1.1	2.2
15	1.3	3.2	1.4	1.1	1	0.5	1	1.4	2.5	2.5	2.7	2.2	2.5	3.4	3.4	4	3.7	3.1	2.9	1	0.9	0.6	0.3	0.5	2
16	0.1	0.2	0.8	0.9	1.3	1.1	1.1	1.1	2.4	2.7	2.5	3.1	2.7	3.2	3	2.5	2.3	2.2	2.2	1.7	0.7	0	0	0	1.6
17	0.4	0	0.7	0.4	0.1	0	0.1	0.6	2.1	2.7	3.4	2.7	3.1	3.4	3.4	3.6	3.2	2.7	2.5	2.2	1	0.3	0.5	0.1	1.6
18	0	0	0	0	0	0	0	0	0.8	1	1.8	2.7	3	2.3	2.7	3.8	4	3.1	2.1	1.4	0.8	1.1	0.3	0.1	1.3
19	0	0.7	0.7	0.6	1	0.1	0	0.8	0.8	1	1.6	2.4	3.5	4.1	3.6	3.8	3.3	2.7	2.3	1.6	1.3	1.2	0.6	0.7	1.6
20	1.4	1.5	0.6	0.3	0.1	0.1	0	0.2	0.7	0.9	1.2	1.6	2.4	2.1	1.2	1.7	2.4	2	2	2.1	1.7	0.9	0.7	0.7	1.2
21	0.8	0.2	0.1	0.1	0.1	0	0.3	1.6	2.3	2.1	2.6	3.5	3.7	4.1	4.5	5.3	4.5	3.5	3.5	1.9	2.3	1.6	2.3	1.9	2.2
22	2.2	2.5	2.7	2	2.3	1.8	3	2.9	2.6	2.8	3.2	3.1	2.7	2.9	2.9	3.1	2.5	3.1	2.5	1.5	1	0.7	0.2	0.2	2.3
23	0	0.4	0.5	0.5	0.5	0.2	0.3	1.3	1.4	1	1.6	1.6	2.2	2.7	2.4	3.1	2.7	2.6	2.9	2.3	1.9	2.1	2.4	1.5	1.6
24	1.1	0.4	0.3	0	0.1	0	0	0.5	1.6	2	3.4	3.5	4	4.3	4	4.9	4.6	4.2	3.3	1.8	1.8	0.9	1.4	1.6	2.1
25	1.5	1.5	1.1	0.2	0.3	0.9	1.5	2.3	2.9	3.8	3.5	3.7	4.4	4.1	3.2	2	2.8	2.9	2.2	1.9	2.1	1.6	0.6	0.1	2.1
26	0.3	0	0.1	0	0.1	0.2	0.2	0.8	2.3	2.2	3.7	4	4.4	5.3	5.1	5.4	5	4.9	4.8	4.9	4.8	4.6	5.5	5.7	3.1
27	6.4	7.3	7.3	6.8	6.5	7.5	9.5	10.4	11.9	11.7	11.5	11.7	10.7	10.8	11.3	11.2	8.9	8.6	9	9.8	9.9	10.3	11.1	10.9	9.6
28	9.9	9.1	6.9	5.9	5.5	4.4	4.4	4.1	3.2	3.5	3.5	2.8	2.3	2.3	2.9	2.7	2.6	1.8	0.9	0.9	0.5	0	0	0	3.3
29	0	0.1	0.2	0.5	0	0	0.5	1	1.1	1.3	2.4	3.4	3.4	4	4	4.2	4.4	4	3.3	3.4	2.6	2.3	1.7	1.5	2.1
30	1.7	1.5	1	0.8	1.1	2.4	1.1	1.8	4.2	3.9	3.7	4.1	4	3.8	3.7	3.9	3.7	2.9	2.3	1.7	1.2	1.1	0.8	1.1	2.4
31	1.2	1.6	1.5	1.6	1	1.3	0.9	1.4	2.9	3.1	3.9	3.4	3.5	3.4	3.9	4	3.1	2.8	1.5	0.8	0.3	0.5	0.6	0.9	2
Avg	1.4	1.4	1.3	1.1	1	1.1	1.3	1.9	2.5	2.7	3	3.2	3.4	3.5	3.5	3.7	3.5	3	2.5	2	1.7	1.5	1.5	1.3	2.2
SD	2	2	1.7	1.5	1.5	1.5	1.8	1.8	2	1.9	1.8	1.6	1.6	1.7	1.7	1.3	1.3	1.5	1.7	1.8	1.8	2.1	2.1	1.5	1.5
S/A	1.47	1.38	1.34	1.36	1.45	1.37	1.34	0.96	0.78	0.7	0.59	0.57	0.48	0.46	0.5	0.47	0.36	0.42	0.59	0.86	1.02	1.21	1.41	1.55	0.66
Min	0	0	0	0	0	0	0	0	0.7	0.8	1	1.4	1.5	1.8	1.2	1.2	1.9	1.5	0.6	0.3	0.2	0	0	0	1.1
Max	9.9	9.1	7.3	6.8	6.5	7.5	9.5	10.4	11.9	11.7	11.5	11.7	10.7	10.8	11.3	11.2	8.9	8.6	9	9.8	9.9	10.3	11.1	10.9	9.6
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: NRG MAX-40 Serial Number: 0 Calibration Factor: 0.76171 m/s/mV Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Wind Direction**  
**Hourly and Daily Averages**  
**Instrument: NRG Vane**  
**Degrees from North**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	319	9	316	357	317	344	349	3	12	12	42	71	50	48	67	45	68	96	120	134	141	144	166	218	52
2	230	230	242	251	249	320	236	265	285	295	296	324	325	283	266	255	284	308	320	93	119	138	145	195	277
3	196	212	221	202	216	196	200	210	243	241	231	234	247	242	242	234	217	213	196	206	265	300	148	134	227
4	193	212	230	234	240	259	261	275	292	342	349	4	10	32	56	59	57	42	48	36	35	50	42	51	19
5	53	44	49	48	58	69	68	66	59	59	57	54	60	56	55	59	67	61	64	66	62	73	96	84	62
6	60	42	55	69	71	83	60	84	95	105	99	102	109	125	142	134	126	123	122	139	158	165	148	167	114
7	196	194	194	206	214	198	202	203	203	221	230	225	224	222	228	223	219	213	214	202	193	192	208	253	215
8	241	258	260	246	244	261	267	278	271	280	283	256	245	237	241	258	252	236	68	75	79	99	131	142	251
9	142	143	138	190	185	195	222	219	222	223	219	223	232	233	242	222	230	232	230	232	206	202	204	247	222
10	269	291	282	278	267	309	305	356	2	28	244	203	177	174	180	183	189	190	193	190	187	187	176	192	206
11	199	200	211	236	263	278	312	326	357	6	17	4	330	341	0	13	44	54	73	73	71	88	95	0	7
12	74	54	47	60	60	30	32	38	52	87	99	94	104	101	90	103	121	120	121	118	122	100	123	123	97
13	135	125	115	81	64	92	107	118	122	127	136	128	122	129	137	150	144	154	137	140	145	146	145	141	134
14	141	136	134	125	142	133	139	134	149	141	147	145	130	146	146	149	146	168	172	175	189	215	237	223	152
15	211	242	274	331	285	270	286	275	259	255	272	255	247	245	243	238	243	256	296	310	299	276	233	240	258
16	259	235	251	266	269	281	298	314	322	316	299	299	290	293	306	307	329	333	79	101	103	124	39	9	308
17	18	17	351	42	40	0	8	37	63	60	64	72	87	90	99	93	94	90	96	104	125	357	43	55	82
18	355	127	141	0	303	309	341	311	275	91	88	73	114	125	88	96	121	142	126	123	139	145	159	160	112
19	201	145	129	130	136	210	181	192	295	23	52	86	94	90	108	102	108	102	104	117	113	99	210	184	104
20	228	207	340	330	326	272	312	343	324	301	29	77	90	133	120	56	81	91	94	88	108	118	141	136	95
21	138	136	173	147	149	148	183	189	185	206	185	182	184	177	172	181	183	188	199	205	191	200	195	202	186
22	203	227	236	232	260	255	267	268	275	311	338	358	13	22	339	52	56	62	39	44	38	26	66	76	329
23	327	303	310	328	335	323	346	356	16	25	53	79	65	121	99	91	89	73	71	77	90	100	103	104	77
24	114	111	64	41	26	5	348	70	79	88	99	90	98	104	119	120	114	126	132	137	140	149	159	167	115
25	173	188	203	230	204	188	160	188	191	192	199	192	162	162	197	191	169	162	165	162	153	156	154	137	178
26	139	249	344	340	352	65	41	68	84	73	91	91	84	93	84	80	75	79	76	68	66	52	50	44	73
27	53	55	58	55	60	50	58	55	104	119	117	119	122	119	105	80	23	343	331	330	328	325	319	312	55
28	311	303	299	298	292	299	297	287	288	301	305	305	294	250	241	230	254	250	235	221	17	42	208	0	291
29	0	15	67	60	69	46	115	70	94	88	90	76	86	87	94	98	83	103	99	93	100	82	104	88	91
30	63	55	62	60	73	62	75	53	95	98	98	101	96	86	84	98	90	101	84	82	101	99	71	61	87
31	61	59	49	50	48	52	41	51	81	90	101	89	80	88	93	100	95	99	100	92	66	22	29	21	81
Avg	263	264	292	354	311	354	0	25	100	102	104	106	113	124	126	118	113	113	101	95	104	91	106	40	92
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: NRG Vane    Serial Number: 0    Calibration Factor: 0.1408 deg/mV    Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.



**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Peak Wind Speed (1-Minute Gust)**  
**Hourly and Daily Averages**  
**Instrument: NRG MAX-40**  
**Meters per Second**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	0.5	0.6	0.5	1.3	0.7	2	3.5	3	4.2	3.5	3.4	3.1	3.3	3.8	3.1	3.4	3.4	3	3.1	2.3	2.3	1.3	0.9	1.4	2.4
2	1.4	2.1	2	0.3	0.8	0.3	0.2	2.4	2.7	4.6	4.3	3.7	3.4	3.9	3.6	4.8	5	3.5	1.7	0.7	2.5	2.4	2.2	1	2.5
3	1.5	1.8	1.7	2	1.8	2.6	2.6	3.7	4.1	3.7	3.4	3.7	5.1	6	7.2	7.3	5.8	3	2.4	2	1.8	2.1	1.7	1.4	3.3
4	1.8	3.3	3.9	3.1	3	3.1	3.6	4.3	3.1	3.3	4.1	3.6	3.6	4.5	4.7	6.2	5.6	5.9	4.4	3.5	3.4	3.2	3.5	3.4	3.8
5	3.4	3.1	2.9	3.1	3.2	4.3	4.7	5.2	5.7	5	6.2	6.3	6.6	5.9	5.4	5.8	6.5	5.8	4.6	3.9	2.8	3.8	4	3.9	4.7
6	1.5	1.7	1.5	2.7	1.7	1.5	1.7	3.8	4.7	5.4	5.8	6.2	6	4.2	3.3	2.4	4.6	4.6	5.4	4	4.3	3.2	2.4	2.7	3.6
7	2.8	3.3	3.8	3	2.5	2.6	3	4.2	4.4	5.9	6.5	6.7	6.3	6.7	6.1	6.7	5.8	5.2	3.5	2.6	2.5	3	3.4	3	4.3
8	3.3	3.2	3.6	1.8	2.6	3.7	3.9	3.4	4.2	4.7	4.2	4.8	5.4	5.8	7	6.2	5.9	3.3	2.7	3.1	2.5	2.2	2.5	2.1	3.8
9	2.5	2.2	1.5	1.2	1.2	1.9	2.7	3.4	3.9	4	6.1	6	5.7	6.9	7.6	7.1	6.6	5.3	2.5	1.3	0.8	0.9	2.1	3.2	3.6
10	5.3	3.9	3.4	2.8	1.1	1.2	1.2	2.2	1.8	2	2.4	2.8	3.9	5	5.2	5.4	6.1	4.9	2.7	1.8	2.2	3.1	2.9	3.2	3.2
11	2.5	2.6	2.2	2.2	2.9	2.7	2.9	4.6	4.3	4.8	4.1	4.7	4.8	4.1	4.8	3.9	4	4.1	3.4	3	2	2.6	1.5	0	3.3
12	0.1	0.2	0.5	2.1	1.6	1.4	1.6	2.2	3.7	5.7	5.8	6.2	5.7	6	6	5.6	6.1	5.6	3.8	2.6	1.9	1.5	1.9	1.2	3.3
13	1.2	1.4	0.8	0.7	0.3	0.9	2	4.1	5.5	5.7	7	7	8.2	8.8	8.7	8.5	7.5	5.6	5.4	4.4	4.6	4.2	2.1	1.9	4.4
14	1.9	2	1.7	2	1.7	1.9	2.6	3.3	6.5	7.3	5.8	4.3	7.2	6.6	5.9	5.8	5.8	5	4.1	3.2	3.2	2.5	2.9	2.3	4
15	2.8	6.2	3.4	2.9	2.1	1	2.2	3.1	4.7	4.6	5.2	4.4	4.8	6	6.3	6.7	6.6	5.9	5.7	2.1	2	1.4	0.8	1.1	3.8
16	0.5	0.7	1.6	1.8	2.7	2.6	2.9	3.1	4.7	5.1	4.9	6.1	5.7	6.6	6	5.3	4.5	4	3.8	2.8	1.5	0.1	0	0.1	3.2
17	1.1	0.2	1.4	1.2	0.4	0	0.4	1.6	3.7	4.9	5.9	5	5.5	5.9	5.7	5.9	5.4	4.5	4	3.7	2	0.8	1.2	0.4	2.9
18	0	0.1	0	0	0.1	0.1	0.1	0.1	1.9	2.2	3.4	4.5	5	4.1	5	6	6.6	5.5	3.6	2.6	1.7	2.2	1.2	0.7	2.3
19	0.2	1.7	1.7	1.5	2.2	0.3	0.3	1.7	2	2.5	3.3	4.4	5.5	6.8	5.9	6.2	5.3	4.4	4	3	2.4	2.5	1.4	1.8	3
20	2.8	2.9	1.3	1	0.3	0.3	0.4	0.9	1.7	2.4	2.9	3.2	4.6	3.9	2.8	3.2	4.4	3.4	3.7	3.5	2.8	1.8	1.5	1.5	2.4
21	1.6	0.7	0.6	0.4	0.8	0.3	1.1	3.1	3.9	4.1	4.5	6.1	6.4	7.1	7.7	9.4	8	6.1	6.1	3.6	4.2	3.2	3.7	3.7	4
22	4	4.8	5.2	3.8	4.3	3.9	5.5	5.9	5.9	5.7	5.7	5.5	5	5.5	5.4	6	4.7	5.3	4.7	2.9	2.3	1.8	0.6	0.8	4.4
23	0	0.9	1.2	1.4	1.4	0.9	0.9	2.4	3	2.4	3.1	3	4	4.8	4	5	4.6	4.4	4.7	4.3	3.9	3.9	4.3	2.8	3
24	2.5	1.3	1	0.2	0.2	0.2	0.1	1.3	3	4.3	6	6.1	6.1	7.1	6.8	8.5	7.6	7.1	5.4	3.3	3.2	2.2	3.2	3.7	3.8
25	3.5	3.1	2.4	0.7	0.9	2	3.1	4.5	4.9	6.6	6.5	6.8	7.8	7.1	6	3.8	5.1	5.6	4.2	3.5	3.8	3.4	2	0.5	4.1
26	1.3	0.2	0.3	0.2	0.5	0.7	1	1.8	3.9	3.7	6.2	6.6	7.1	8.4	8.3	9.2	8.8	8.9	8.4	8.4	8	8.7	9.7	9.6	5.4
27	11.7	12.8	12.7	12	11.9	13.3	16.2	18.1	20.5	20.8	20.4	20.1	17.9	18.2	19	18.9	15.6	16.7	17.5	17.4	18.5	17.8	19.3	19.2	16.9
28	18.1	15.3	12.4	10.3	9.6	7.7	7.7	7	5.6	6.1	6	5.2	4.3	4.5	5.1	4.9	4.3	3	1.7	1.7	1.3	0.2	0.1	0	5.9
29	0	0.3	0.7	1.2	0.2	0.1	1.4	2.3	2.5	2.9	4.3	5.6	5.9	6.8	6.9	7.1	8.3	6.9	5.7	6	4.8	4.1	3.1	2.9	3.7
30	3.3	2.9	2	1.7	2.3	4.4	2.4	3.5	7.3	6.9	6.2	7.1	7	6.8	6.5	6.9	6.4	5.6	4.6	3.4	2.4	2.2	2	2.4	4.4
31	2.4	2.9	2.6	2.7	2	2.3	2.1	2.7	4.9	5.7	6.8	6.2	6.5	6.4	6.8	7	5.8	5.2	3.2	2	1.2	1.6	1.7	2	3.9
Avg	2.8	2.8	2.6	2.3	2.2	2.3	2.7	3.6	4.6	5	5.5	5.6	5.9	6.3	6.2	6.4	6.2	5.4	4.5	3.6	3.3	3	2.9	2.7	4.1
SD	3.6	3.3	2.9	2.6	2.5	2.7	3	3.1	3.2	3.2	3.1	3	2.5	2.6	2.8	2.9	2.2	2.5	2.8	2.9	3.1	3.2	3.5	3.5	2.5
S/A	1.3	1.18	1.12	1.12	1.18	1.17	1.12	0.84	0.71	0.64	0.56	0.53	0.43	0.41	0.45	0.45	0.35	0.46	0.62	0.8	0.95	1.04	1.21	1.31	0.61
Min	0	0.1	0	0	0.1	0	0.1	0.1	1.7	2	2.4	2.8	3.3	3.8	2.8	2.4	3.4	3	1.7	0.7	0.8	0.1	0	0	2.3
Max	18.1	15.3	12.7	12	11.9	13.3	16.2	18.1	20.5	20.8	20.4	20.1	17.9	18.2	19	18.9	15.6	16.7	17.5	17.4	18.5	17.8	19.3	19.2	16.9
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: NRG MAX-40 Serial Number: 0 Calibration Factor: 0.76171 m/s/mV Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Station Pressure**  
**Hourly and Daily Averages**  
**Instrument: Viasala PTA-427**  
**Millibars**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily	
1	1014	1014	1013	1013	1013	1013	1014	1014	1014	1014	1013	1013	1012	1012	1011	1011	1010	1010	1010	1010	1010	1011	1010	1010	1012	
2	1010	1009	1009	1009	1009	1009	1009	1009	1010	1010	1009	1009	1009	1008	1007	1007	1007	1007	1007	1007	1007	1007	1007	1007	1007	1008
3	1006	1006	1006	1006	1006	1006	1006	1006	1006	1006	1006	1006	1005	1005	1004	1004	1004	1003	1004	1004	1004	1004	1004	1004	1005	
4	1004	1004	1004	1004	1005	1005	1006	1007	1007	1007	1008	1008	1008	1008	1008	1009	1009	1010	1010	1011	1011	1012	1012	1013	1008	
5	1013	1013	1012	1012	1013	1013	1015	1015	1015	1016	1015	1015	1015	1015	1016	1015	1015	1015	1015	1015	1015	1015	1015	1015	1015	
6	1015	1015	1015	1014	1015	1015	1015	1015	1015	1015	1015	1014	1014	1014	1013	1013	1012	1012	1011	1011	1012	1011	1010	1010	1013	
7	1009	1009	1008	1008	1008	1008	1008	1008	1008	1008	1007	1007	1006	1005	1004	1003	1003	1002	1003	1003	1003	1003	1003	1003	1006	
8	1003	1002	1002	1002	1002	1003	1003	1003	1003	1004	1004	1003	1003	1003	1002	1002	1002	1002	1003	1003	1003	1003	1004	1003	1003	
9	1003	1002	1002	1001	1001	1002	1002	1002	1002	1003	1002	1002	1001	1001	1000	1000	1000	1000	1000	1001	1001	1002	1002	1002	1001	
10	1002	1002	1002	1002	1003	1003	1004	1005	1005	1005	1006	1006	1005	1005	1005	1004	1004	1004	1005	1005	1005	1006	1006	1005	1004	
11	1005	1005	1005	1005	1006	1006	1007	1008	1008	1009	1009	1009	1009	1009	1009	1009	1009	1009	1009	1010	1011	1011	1011	1012	1008	
12	1011	1011	1011	1011	1012	1013	1013	1014	1015	1015	1015	1015	1015	1015	1015	1015	1015	1015	1015	1015	1015	1016	1016	1016	1014	
13	1015	1015	1015	1015	1016	1016	1016	1016	1016	1017	1017	1016	1015	1015	1014	1014	1014	1014	1013	1013	1013	1013	1013	1013	1015	
14	1012	1011	1011	1010	1010	1010	1010	1010	1009	1009	1009	1008	1007	1007	1006	1005	1005	1005	1005	1005	1005	1004	1004	1004	1007	
15	1004	1004	1003	1002	1003	1003	1004	1005	1005	1005	1005	1004	1004	1004	1004	1003	1004	1004	1005	1006	1006	1007	1007	1007	1004	
16	1007	1007	1007	1007	1008	1009	1009	1010	1011	1011	1011	1011	1011	1011	1011	1011	1012	1013	1013	1014	1015	1015	1016	1016	1011	
17	1016	1016	1016	1016	1017	1017	1018	1019	1019	1019	1020	1020	1019	1018	1018	1018	1017	1017	1017	1017	1017	1017	1017	1018	1018	
18	1017	1017	1017	1017	1017	1017	1017	1017	1017	1017	1017	1016	1016	1015	1015	1014	1013	1013	1013	1013	1013	1013	1013	1013	1015	
19	1012	1012	1011	1011	1011	1011	1012	1012	1012	1012	1012	1012	1011	1011	1010	1010	1009	1009	1009	1010	1011	1011	1011	1011	1011	
20	1011	1011	1011	1011	1012	1012	1012	1013	1014	1014	1014	1014	1014	1014	1014	1014	1013	1013	1014	1014	1015	1015	1014	1014	1013	
21	1014	1014	1014	1014	1014	1014	1015	1015	1015	1015	1014	1014	1013	1012	1011	1010	1010	1010	1010	1010	1010	1010	1010	1010	1012	
22	1010	1009	1009	1009	1009	1009	1010	1010	1010	1011	1011	1011	1011	1010	1010	1010	1010	1011	1011	1011	1012	1013	1013	1013	1010	
23	1013	1013	1013	1013	1014	1014	1015	1015	1015	1016	1016	1016	1016	1015	1015	1015	1015	1015	1015	1016	1017	1017	1017	1017	1015	
24	1017	1016	1016	1016	1016	1016	1016	1017	1017	1018	1017	1017	1016	1015	1014	1014	1014	1014	1014	1014	1015	1015	1015	1014	1015	
25	1014	1013	1013	1014	1014	1014	1014	1014	1014	1014	1014	1014	1014	1013	1013	1012	1011	1012	1013	1014	1014	1013	1013	1013	1013	
26	1013	1012	1012	1012	1012	1012	1013	1013	1013	1013	1013	1012	1012	1011	1010	1009	1009	1008	1008	1007	1007	1006	1005	1004	1010	
27	1002	1000	998	997	995	993	991	988	985	983	980	976	973	969	964	959	958	961	966	970	975	979	982	985	980	
28	988	990	991	993	994	996	997	998	999	1000	1001	1001	1001	1001	1001	1001	1002	1002	1003	1004	1005	1005	1006	1006	999	
29	1006	1006	1006	1006	1007	1007	1008	1009	1010	1010	1011	1010	1010	1010	1011	1011	1011	1011	1011	1012	1012	1013	1013	1014	1010	
30	1014	1014	1014	1014	1014	1014	1015	1016	1016	1017	1017	1017	1017	1017	1017	1017	1017	1017	1017	1017	1017	1018	1018	1018	1016	
31	1019	1018	1019	1018	1018	1019	1019	1020	1020	1020	1021	1020	1020	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	
Avg	1010	1009	1009	1009	1009	1010	1010	1010	1011	1011	1011	1010	1010	1009	1009	1008	1008	1008	1009	1009	1010	1010	1010	1010	1010	
SD	6	6	6	6	6	6	6	7	7	7	8	8	9	9	10	10	11	10	9	9	8	8	7	7	7	
S/A	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	
Min	988	990	991	993	994	993	991	988	985	983	980	976	973	969	964	959	958	961	966	970	975	979	982	985	980	
Max	1019	1018	1019	1018	1018	1019	1019	1020	1020	1020	1021	1020	1020	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	1019	
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928	

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: Viasala PTA-427 Serial Number: 493926 Calibration Factor: 0.104 mBar/mV + 800 mBar Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

Prepared by: Afshin M. Andreas, NREL

**Elizabeth City State University**  
**36.28 N Latitude 76.22 W Longitude 26 Meters AMSL Time Zone -5**

**August 2011**

**Battery Voltage (CR10)**  
**Hourly and Daily Averages**  
**Instrument: CSI**  
**Volts DC**

Day	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Daily
1	12.6	12.6	12.6	12.5	12.5	12.5	12.8	13.2	13.1	13.1	13	13	13	13	12.9	12.9	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.6	12.8
2	12.6	12.6	12.6	12.6	12.6	12.5	12.9	13.2	13.1	13	13	12.9	12.9	12.9	12.9	12.9	13	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.8
3	12.6	12.6	12.6	12.6	12.6	12.6	12.7	13.1	13.1	13	13	13	13	13	12.9	12.9	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.7	12.8
4	12.6	12.6	12.6	12.6	12.6	12.5	12.9	13.1	13	13	12.9	12.9	12.9	13	13	13	13	13	12.8	12.7	12.7	12.7	12.7	12.6	12.8
5	12.6	12.6	12.6	12.6	12.6	12.5	12.8	13.2	13.1	13	13	13	13	13	13	13	13.1	13	12.8	12.7	12.7	12.7	12.7	12.7	12.8
6	12.7	12.7	12.7	12.6	12.6	12.6	12.6	13.2	13.1	13.1	13.1	13.1	13.1	13	12.8	12.8	13.1	13.2	12.9	12.8	12.7	12.7	12.7	12.7	12.8
7	12.7	12.6	12.6	12.6	12.6	12.6	12.8	13.2	13.1	13	13	13	13	13	13	13	13	13	12.9	12.8	12.7	12.7	12.7	12.7	12.8
8	12.7	12.6	12.6	12.6	12.6	12.6	12.9	13.1	13	13	12.9	12.9	12.9	12.9	12.9	12.9	12.9	12.9	12.7	12.7	12.7	12.7	12.7	12.6	12.8
9	12.6	12.6	12.6	12.6	12.6	12.6	12.9	13.1	13.1	13	13	13	13	13	13	13	13	13	12.8	12.7	12.7	12.7	12.7	12.6	12.8
10	12.6	12.6	12.6	12.6	12.6	12.5	13	13.2	13.1	13	13	13	13	13	13	13	13	13	13	12.8	12.7	12.7	12.7	12.7	12.8
11	12.6	12.6	12.6	12.6	12.6	12.5	13	13.2	13.1	13	13	13	13	13	13	13	13	13	13	12.8	12.7	12.7	12.7	12.7	12.8
12	12.7	12.6	12.6	12.6	12.6	12.6	12.9	13.2	13.1	13.1	13	13	13	13.1	13.1	13.1	13.1	13	12.8	12.7	12.7	12.7	12.7	12.7	12.9
13	12.7	12.7	12.7	12.6	12.6	12.6	12.9	13.2	13.1	13.1	13	13	13	13	13.1	13.1	13	12.8	12.8	12.7	12.7	12.7	12.7	12.7	12.9
14	12.7	12.7	12.6	12.6	12.6	12.6	12.6	13	13.2	13.1	13.1	13.1	13.1	13.1	13.1	13.1	13.1	13.1	12.9	12.8	12.7	12.7	12.7	12.7	12.9
15	12.7	12.7	12.6	12.6	12.6	12.6	13	13.3	13.2	13.1	13.1	13	13.1	13.1	13	13	13.1	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.9
16	12.7	12.7	12.6	12.6	12.6	12.6	13	13.3	13.2	13.1	13.1	13	13	13	13	13	13	13	12.8	12.8	12.7	12.7	12.7	12.7	12.9
17	12.7	12.7	12.6	12.6	12.6	12.6	13	13.2	13.1	13	13	13	13	13	13	13	13	13	12.9	12.8	12.7	12.7	12.7	12.7	12.9
18	12.6	12.6	12.6	12.6	12.6	12.6	13.1	13.3	13.1	13.1	13.1	13	13	13	13	13	13	13	12.9	12.8	12.7	12.7	12.7	12.7	12.9
19	12.7	12.7	12.6	12.6	12.6	12.6	13	13.2	13.1	13	13	13	13	13	13.1	13.1	13.1	12.9	12.8	12.8	12.7	12.7	12.7	12.7	12.9
20	12.7	12.6	12.6	12.6	12.6	12.6	13	13.2	13.1	13	13	12.9	13	13	13.1	13.2	13.1	13	12.8	12.8	12.7	12.7	12.7	12.7	12.9
21	12.7	12.7	12.6	12.6	12.6	12.6	12.9	13.2	13.1	13	13	13	13	13	13	13	13	13	12.9	12.8	12.7	12.7	12.7	12.7	12.8
22	12.7	12.6	12.6	12.6	12.6	12.6	12.7	13.2	13.2	13.2	13.1	13.1	13.1	13.1	13	13	13.1	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.9
23	12.7	12.7	12.6	12.6	12.6	12.6	13	13.3	13.1	13.1	13	13	13	13.1	13.1	13.1	13.1	13	12.8	12.8	12.7	12.7	12.7	12.7	12.9
24	12.7	12.7	12.6	12.6	12.6	12.6	13	13.2	13.1	13.1	13.1	13	13.1	13.1	13.1	13.1	13.1	13.1	13.1	12.8	12.8	12.7	12.7	12.7	12.9
25	12.7	12.7	12.7	12.7	12.6	12.6	13	13.2	13.1	13	13	13	13	13	13	13.1	13	12.9	12.8	12.8	12.7	12.7	12.7	12.7	12.9
26	12.7	12.7	12.6	12.6	12.6	12.6	12.8	13.2	13.1	13	13	13	13	13	13	13	13.1	12.8	12.8	12.7	12.7	12.7	12.7	12.7	12.8
27	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.7	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.6
28	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.9	13.2	13.1	13.1	13	13	13	13	13	13	13	12.8	12.7	12.7	12.7	12.7	12.6	12.8
29	12.6	12.6	12.6	12.6	12.6	12.6	12.6	13.1	13.2	13.1	13	13	13	13	13.1	13.1	13	12.8	12.7	12.7	12.7	12.7	12.7	12.6	12.8
30	12.6	12.6	12.6	12.6	12.6	12.6	12.6	13	13.2	13.2	13.1	13.1	13.1	13.1	13.1	13.1	13.1	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.9
31	12.7	12.6	12.6	12.6	12.6	12.6	13.2	13.3	13.2	13.2	13.1	13.1	13.1	13.1	13.1	13.1	13.1	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.9
Avg	12.6	12.6	12.6	12.6	12.6	12.6	12.9	13.1	13.1	13	13	13	13	13	13	13	13	12.9	12.8	12.7	12.7	12.7	12.7	12.7	12.8
S D	0	0	0	0	0	0	0.2	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0	0	0	0	0	0.1
S/A	0	0	0	0	0	0	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0	0	0	0	0	0	0
Min	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.6	12.6	12.6	12.6	12.6	12.6	12.7	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.5	12.6
Max	12.7	12.7	12.7	12.7	12.6	12.6	13.2	13.3	13.2	13.2	13.1	13.1	13.1	13.1	13.1	13.2	13.2	13.1	12.8	12.8	12.7	12.7	12.7	12.7	12.9
n	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	8928

Data Recovery: 0.0% missing; 0.0% untested; 0.0% failed QC -- 8928 total measurements.

Instrument: CSI    Serial Number: Battery    Calibration Factor: N/A    Calibration Date: 06/1995

Data & Flag	Hour Column	Day Column
<value> *	> 20% Missing	> 10% Missing
<value> ?	> 20% Fail QC	> 10% Fail QC
<blank> *	> 90% Missing	> 90% Missing
<blank> ?	> 90% Fail QC	> 90% Fail QC

Note: Daily values with a missing flag (\*) are not used in monthly statistics.

Prepared by: Afshin M. Andreas, NREL