

**Global Solar Radiation on a Horizontal Surface  
Hourly Integrated and Daily Totals  
Watt-Hours per Square Meter  
Mississippi Valley State Unive - September 1997**

Field: GHI

Hour 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	6	106	273	469	635	798	885	842	757	707	542	317	130	1	0	0	0	0	0	6465	
2	0	0	0	0	0	5	94	273	468	640	816	840	346	521	572	432	146	84	7	0	0	0	0	0	5242	
3	0	0	0	0	0	5	85	250	446	597	671	807	487	56	183	256	259	102	4	0	0	0	0	0	4207	
4	0	0	0	0	0	4	114	332	546	734	890	965	964	890	749	555	327	112	3	0	0	0	0	0	7184	
5	0	0	0	0	0	3	85	295	486	603	570	659	721	796	597	457	265	83	2	0	0	0	0	0	5622	
6	0	0	0	0	0	4	66	202	467	662	794	851	703	684	541	469	260	78	1	0	0	0	0	0	5782	
7	0	0	0	0	0	4	90	284	474	678	780	859	867	818	666	474	254	78	1	0	0	0	0	0	6326	
8	0	0	0	0	0	3	96	209	460	649	773	652	654	298	88	84	54	24	2	0	0	0	0	0	4047	
9	0	0	0	0	0	2	60	223	458	623	753	851	765	570	438	364	154	45	1	0	0	0	0	0	5306	
10	0	0	0	0	0	3	80	261	482	660	577	431	782	581	678	502	284	81	1	0	0	0	0	0	5402	
11	0	0	0	0	0	3	98	304	514	698	780	847	940	582	667	475	272	76	0	0	0	0	0	0	6255	
12	0	0	0	0	0	2	68	277	505	686	848	858	783	828	683	489	268	70	0	0	0	0	0	0	6363	
13	0	0	0	0	0	2	97	292	464	700	722	820	691	854	686	487	239	48	0	0	0	0	0	0	6101	
14	0	0	0	0	0	3	57	117	463	664	767	853	828	806	588	328	230	51	0	0	0	0	0	0	5754	
15	0	0	0	0	0	2	87	281	485	648	765	825	785	756	628	411	192	37	0	0	0	0	0	0	5902	
16	0	0	0	0	0	2	80	224	485	649	780	841	842	768	628	436	228	52	0	0	0	0	0	0	6015	
17	0	0	0	0	0	1	73	266	470	644	772	839	839	692	599	236	126	38	0	0	0	0	0	0	5596	
18	0	0	0	0	0	0	72	229	441	618	747	746	824	654	407	343	217	43	0	0	0	0	0	0	5341	
19	0	0	0	0	0	1	72	249	446	618	754	820	816	736	567	354	214	50	0	0	0	0	0	0	5698	
20	0	0	0	0	0	1	65	242	442	618	768	817	835	738	591	420	206	31	0	0	0	0	0	0	5774	
21	0	0	0	0	0	0	33	203	380	585	721	730	635	704	389	372	190	40	0	0	0	0	0	0	4983	
22	0	0	0	0	0	1	59	254	359	453	702	757	782	644	445	216	126	21	0	0	0	0	0	0	4819	
23	0	0	0	0	0	0	34	128	105	147	281	197	111	91	93	135	37	6	0	0	0	0	0	0	1364	
24	0	0	0	0	0	1	29	41	52	61	189	140	120	175	204	123	58	6	0	0	0	0	0	0	1199	
25	0	0	0	0	0	0	19	50	77	56	115	175	197	148	164	43	13	4	0	0	0	0	0	0	1061	
26	0	0	0	0	0	1	56	?	236	?	473	?	665	803	865	850	765	621	427	207	33	0	0	0	0	5999
27	0	0	0	0	0	1	60	234	304	632	747	617	736	661	474	404	184	28	0	0	0	0	0	0	5080	
28	0	0	0	0	0	1	70	232	?	445	629	761	845	778	788	593	338	146	27	0	0	0	0	0	5653	
29	0	0	0	0	0	0	68	250	464	650	789	869	857	773	622	416	190	35	?	0	?	0	0	0	0	5984
30	0	0	0	0	0	1	62	227	429	606	736	819	789	736	542	352	132	19	0	0	0	0	0	0	5449	
Avg	0	0	0	0	0	2	71	231	419	584	699	736	706	629	514	365	193	51	1	0	0	0	0	0	5199	
S/D	0	0	0	0	0	2	22	67	122	172	181	213	222	231	186	133	80	31	2	0	0	0	0	0	1469	
S/A	0	0	0	0	0	0.81	0.31	0.29	0.29	0.3	0.26	0.29	0.32	0.37	0.36	0.36	0.41	0.62	1.93	0	0	0	0	0	0.28	
Min	0	0	0	0	0	0	19	41	52	56	115	140	111	56	88	43	13	4	0	0	0	0	0	0	1061	
Max	0	0	0	0	0	6	114	332	546	734	890	965	964	890	749	555	327	130	7	0	0	0	0	0	7184	

Daylight Data Recovery: 0% missing; 20% exceed the 15% QC threshold -- 41663 total daylight 5-minute measurements.

Note: Fractional values that do not appear in the hour columns are included in the calculation for daily values.

Data and Flag	Hour Column	Day Column
<value>*	20% < Missing < 100%	10% < Missing < 100%
<value>?	20% < Fail QC < 100%	10% < Fail QC < 100%
<blank>*	100% Missing	100% Missing
<blank>?	100% Fail QC	100% Fail QC

Station:	MV
Latitude:	33.50° N
Longitude:	90.33° W
Elevation:	52 Meters AMSL
Time Zone:	-6

Instrument:	PSP
Calibration Constant:	8.50 uV/Wm-2
Serial Number:	18038F3
Calibration Date:	9/13/96

**Direct Normal Solar Radiation**  
**Hourly Integrated and Daily Totals**  
**Watt-Hours per Square Meter**  
**Mississippi Valley State Unive - September 1997**

Field: DNI

Hour 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	3	125	272	422	482	540	537	474	474	538	447	263	153	0	0	0	0	0	0	4732
2	0	0	0	0	0	6	155	320	430	491	520	435	93	227	384	326	92	47	4	0	0	0	0	0	3529
3	0	0	0	0	0	3	82	209	322	315	232	242	201	1	5	12	127	56	0	0	0	0	0	0	1806
4	0	0	0	0	0	19	374	646	774	827	851	868	864	853	835	784	688	474	40	0	0	0	0	0	8898
5	0	0	0	0	0	0	81	358	457	338	137	155	243	509	388	353	252	100	1	0	0	0	0	0	3371
6	0	0	0	0	0	2	18	116	388	511	500	493	343	405	389	464	347	157	3	0	0	0	0	0	4136
7	0	0	0	0	0	2	112	280	430	419	463	534	576	616	591	515	351	170	2	0	0	0	0	0	5062
8	0	0	0	0	0	2	117	66	402	468	377	215	221	15	0	0	0	0	0	0	0	0	0	0	1883
9	0	0	0	0	0	0	19	160	338	384	391	456	344	158	115	120	12	4	2	0	0	0	0	0	2502
10	0	0	0	0	0	0	73	329	501	470	263	173	458	364	656	682	585	316	4	0	0	0	0	0	4873
11	0	0	0	0	0	15	358	611	722	771	717	724	804	426	657	646	571	296	2	0	0	0	0	0	7321
12	0	0	0	0	0	4	44	289	646	721	763	653	610	776	741	684	563	277	0	0	0	0	0	0	6772
13	0	0	0	0	0	15	359	578	618	743	560	555	388	709	751	695	473	178	0	0	0	0	0	0	6622
14	0	0	0	0	0	8	22	22	481	428	618	704	613	661	475	199	363	95	0	0	0	0	0	0	4691
15	0	0	0	0	0	7	283	526	626	646	629	646	504	498	601	362	64	1	0	0	0	0	0	0	5394
16	0	0	0	0	0	5	197	291	540	624	657	675	690	680	634	554	413	155	0	0	0	0	0	0	6115
17	0	0	0	0	0	4	190	452	574	641	668	671	614	527	447	102	63	39	0	0	0	0	0	0	4993
18	0	0	0	0	0	0	135	286	486	561	585	500	529	425	265	301	291	92	0	0	0	0	0	0	4454
19	0	0	0	0	0	1	164	374	493	552	596	611	613	587	478	353	329	104	0	0	0	0	0	0	5258
20	0	0	0	0	0	0	88	341	470	511	606	606	577	570	554	464	350	70	0	0	0	0	0	0	5206
21	0	0	0	0	0	0	0	131	223	429	438	418	255	477	172	325	253	77	0	0	0	0	0	0	3200
22	0	0	0	0	0	0	88	236	141	173	485	450	485	356	192	13	4	0	0	0	0	0	0	0	2624
23	0	0	0	0	0	0	0	7	0	0	5	1	0	0	0	1	0	0	0	0	0	0	0	0	15
24	0	0	0	0	0	0	1	0	0	0	1	1	1	3	5	0	0	0	0	0	0	0	0	0	13
25	0	0	0	0	0	0	0	0	1	0	2	1	3	1	11	0	0	0	0	0	0	0	0	0	19
26	0	0	0	0	0	2	335	645	762	813	830	838	833	816	783	716	564	186	0	0	0	0	0	0	8125
27	0	0	0	0	0	0	138	332	100	593	625	352	575	586	410	554	437	142	0	0	0	0	0	0	4843
28	0	0	0	0	0	0	228	527	649	720	743	670	639	732	631	451	278	115	0	0	0	0	0	0	6383
29	0	0	0	0	0	0	226	568	697	790	834	874	881	868	824	761	607	220	0	0	0	0	0	0	8151
30	0	0	0	0	0	0	216	419	550	634	672	675	627	591	469	300	100	21	0	0	0	0	0	0	5276
Avg	0	0	0	0	0	3	141	313	442	502	510	491	469	464	433	373	281	118	2	0	0	0	0	0	4542
S/D	0	0	0	0	0	5	113	194	218	228	239	247	249	263	263	253	213	112	7	0	0	0	0	0	2301
S/A	0	0	0	0	0	1.47	0.8	0.62	0.49	0.45	0.47	0.5	0.53	0.57	0.61	0.68	0.76	0.95	3.72	0	0	0	0	0	0.51
Min	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	13
Max	0	0	0	0	0	19	374	646	774	827	851	874	881	868	835	784	688	474	40	0	0	0	0	0	8898

Daylight Data Recovery: 0% missing; 20% exceed the 15% QC threshold -- 41663 total daylight 5-minute measurements.

Note: Fractional values that do not appear in the hour columns are included in the calculation for daily values.

Data and Flag	Hour Column	Day Column
<value>*	20% < Missing < 100%	10% < Missing < 100%
<value>?	20% < Fail QC < 100%	10% < Fail QC < 100%
<blank>*	100% Missing	100% Missing
<blank>?	100% Fail QC	100% Fail QC

Station: MV  
Latitude: 33.50° N  
Longitude: 90.33° W  
Elevation: 52 Meters AMSL  
Time Zone: -6

Instrument: NIP  
Calibration Constant: 7.46 uV/Wm-2  
Serial Number: 25792E6  
Calibration Date: 9/13/96

**Diffuse Solar Radiation on a Horizontal Surface**  
**Hourly Integrated and Daily Totals**  
**Watt-Hours per Square Meter**  
**Mississippi Valley State Unive - September 1997**

Field: DHI

Hour 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	6	90	167	217	253	283	334	338	294	262	253	221	98	1	0	0	0	0	0	2816
2	0	0	0	0	0	4	71	152	211	253	326	395	233	289	255	226	105	79	7	0	0	0	0	0	2604
3	0	0	0	0	0	4	74	175	258	346	437	550	311	50	161	227	211	91	5	0	0	0	0	0	2900
4	0	0	0	0	0	4	51	71	74	79	83	83	84	82	72	65	54	33	2	0	0	0	0	0	837
5	0	0	0	0	0	3	73	156	216	339	428	484	462	311	277	239	167	67	2	0	0	0	0	0	3223
6	0	0	0	0	0	4	58	154	235	258	320	347	344	302	233	186	126	53	1	0	0	0	0	0	2623
7	0	0	0	0	0	4	73	177	216	342	340	319	286	242	195	159	123	53	1	0	0	0	0	0	2528
8	0	0	0	0	0	3	80	181	221	278	402	406	410	261	77	74	47	22	2	0	0	0	0	0	2464
9	0	0	0	0	0	2	53	154	247	311	372	379	407	412	333	289	142	40	1	0	0	0	0	0	3141
10	0	0	0	0	0	2	71	144	180	291	330	255	320	243	158	92	67	33	1	0	0	0	0	0	2186
11	0	0	0	0	0	2	42	68	82	93	112	122	140	178	150	93	65	32	0	0	0	0	0	0	1178
12	0	0	0	0	0	2	56	144	119	123	145	195	164	120	110	90	67	30	0	0	0	0	0	0	1366
13	0	0	0	0	0	2	43	78	90	127	193	261	289	207	110	85	63	24	0	0	0	0	0	0	1572
14	0	0	0	0	0	2	54	97	173	321	189	156	221	209	214	218	102	36	0	0	0	0	0	0	1991
15	0	0	0	0	0	2	45	85	119	148	183	195	278	290	171	195	164	32	0	0	0	0	0	0	1909
16	0	0	0	0	0	2	52	106	171	168	184	186	173	160	149	123	88	31	0	0	0	0	0	0	1592
17	0	0	0	0	0	1	45	102	135	154	170	189	249	222	261	181	107	32	0	0	0	0	0	0	1850
18	0	0	0	0	0	0	53	123	164	194	223	260	316	272	211	177	122	32	0	0	0	0	0	0	2146
19	0	0	0	0	0	1	49	116	164	200	220	234	230	218	210	161	108	38	0	0	0	0	0	0	1950
20	0	0	0	0	0	1	50	120	172	233	227	238	292	237	184	169	93	21	0	0	0	0	0	0	2037
21	0	0	0	0	0	0	29	143	247	258	326	311	362	286	252	194	110	31	0	0	0	0	0	0	2551
22	0	0	0	0	0	1	45	176	276	311	264	325	317	325	291	203	112	19	0	0	0	0	0	0	2666
23	0	0	0	0	0	0	30	112	93	129	244	173	97	79	81	117	32	5	0	0	0	0	0	0	1194
24	0	0	0	0	0	1	25	37	46	54	166	124	106	153	183	106	50	5	0	0	0	0	0	0	1057
25	0	0	0	0	0	0	17	44	68	49	101	157	172	129	139	37	12	3	0	0	0	0	0	0	926
26	0	0	0	0	0	1	23	?	50	?	59	?	68	78	83	83	80	76	67	49	15	0	0	0	733
27	0	0	0	0	0	0	34	106	228	186	209	275	212	169	174	132	62	15	0	0	0	0	0	0	1803
28	0	0	0	0	0	1	34	76	?	91	103	118	226	193	182	151	122	75	16	0	0	0	0	0	1388
29	0	0	0	0	0	0	37	67	85	80	76	68	63	57	54	46	35	9	0	0	0	0	0	0	678
30	0	0	0	0	0	0	35	96	131	147	160	205	226	255	225	211	110	17	0	0	0	0	0	0	1818
Avg	0	0	0	0	0	2	50	116	160	197	230	251	246	211	181	151	96	34	1	0	0	0	0	0	1924
S/D	0	0	0	0	0	1	18	42	67	94	104	115	103	88	71	66	49	23	1	0	0	0	0	0	718
S/A	0	0	0	0	0	0.82	0.36	0.36	0.42	0.48	0.45	0.46	0.42	0.42	0.39	0.44	0.51	0.7	1.97	0	0	0	0	0	0.37
Min	0	0	0	0	0	0	17	37	46	49	76	68	63	50	54	37	12	3	0	0	0	0	0	0	678
Max	0	0	0	0	0	6	90	181	276	346	437	550	462	412	333	289	221	98	7	0	0	0	0	0	3223

Daylight Data Recovery: 0% missing; 22% exceed the 15% QC threshold -- 41663 total daylight 5-minute measurements.

Note: Fractional values that do not appear in the hour columns are included in the calculation for daily values.

Data and Flag	Hour Column	Day Column
<value>*	20% < Missing < 100%	10% < Missing < 100%
<value>?	20% < Fail QC < 100%	10% < Fail QC < 100%
<blank>*	100% Missing	100% Missing
<blank>?	100% Fail QC	100% Fail QC

Station: MV  
Latitude: 33.50° N  
Longitude: 90.33° W  
Elevation: 52 Meters AMSL  
Time Zone: -6

Instrument: PSP  
Calibration Constant: 9.04 uV/Wm-2  
Serial Number: 25818F3  
Calibration Date: 9/13/96