

Solar Electric Output Variation in Five-Minute Meteorological Data at the Rush and York NYS Mesonet Stations

Highlighted Cells Represent a Difference Between Successive 5-Minute Periods Greater than Half the Maximum Observed Solar Radiation

Date/Time	Rush NYS Mesonet Station					York NYS Mesonet Station				
	Insolation [W/m ²]	Insolation Delta	Insolation % of Max Delta	PV-USA MW Load	NOCT MW Load	Insolation [W/m ²]	Insolation Delta	Insolation % of Max Delta	PV-USA MW Load	NOCT MW Load
2017-07-18 11:00:00 EDT	747	12	1%	336	420	869	56	5%	391	489
2017-07-18 11:05:00 EDT	758	11	1%	341	426	886	17	2%	399	498
2017-07-18 11:10:00 EDT	761	3	0%	342	428	686	200	18%	309	386
2017-07-18 11:15:00 EDT	775	14	1%	349	436	389	297	27%	175	219
2017-07-18 11:20:00 EDT	793	18	2%	357	446	929	540	50%	418	523
2017-07-18 11:25:00 EDT	805	12	1%	362	453	733	196	18%	330	412
2017-07-18 11:30:00 EDT	814	9	1%	366	458	538	195	18%	242	303
2017-07-18 11:35:00 EDT	838	24	2%	377	471	565	27	2%	254	318
2017-07-18 11:40:00 EDT	865	27	3%	389	487	881	316	29%	396	496
2017-07-18 11:45:00 EDT	909	44	4%	409	511	206	675	62%	93	116
2017-07-18 11:50:00 EDT	956	47	5%	430	538	618	412	38%	278	348
2017-07-18 11:55:00 EDT	782	174	17%	352	440	918	300	28%	413	516
2017-07-18 12:00:00 EDT	841	59	6%	378	473	806	112	10%	363	453
2017-07-18 12:05:00 EDT	214	627	62%	96	120	595	211	20%	268	335
2017-07-18 12:10:00 EDT	262	48	5%	118	147	382	213	20%	172	215
2017-07-18 12:15:00 EDT	784	522	51%	353	441	891	509	47%	401	501
2017-07-18 12:20:00 EDT	874	90	9%	393	492	598	293	27%	269	336
2017-07-18 12:25:00 EDT	876	2	0%	394	493	513	85	8%	231	289
2017-07-18 12:30:00 EDT	907	31	3%	408	510	908	395	37%	409	511
2017-07-18 12:35:00 EDT	838	69	7%	377	471	972	64	6%	437	547
2017-07-18 12:40:00 EDT	197	641	63%	89	111	996	24	2%	448	560
2017-07-18 12:45:00 EDT	285	88	9%	128	160	980	16	1%	441	551
2017-07-18 12:50:00 EDT	954	669	66%	429	537	942	38	4%	424	530
2017-07-18 12:55:00 EDT	906	48	5%	408	510	526	416	38%	237	296
2017-07-18 13:00:00 EDT	926	20	2%	417	521	980	454	42%	441	551
2017-07-18 13:05:00 EDT	940	14	1%	423	529	916	64	6%	412	515
2017-07-18 13:10:00 EDT	934	6	1%	420	525	902	14	1%	406	507
2017-07-18 13:15:00 EDT	556	378	37%	250	313	912	10	1%	410	513
2017-07-18 13:20:00 EDT	851	295	29%	383	479	963	51	5%	433	542
2017-07-18 13:25:00 EDT	958	107	11%	431	539	325	638	59%	146	183
2017-07-18 13:30:00 EDT	963	5	0%	433	542	893	568	52%	402	502
2017-07-18 13:35:00 EDT	939	24	2%	423	528	974	81	7%	438	548
2017-07-18 13:40:00 EDT	1019	80	8%	459	573	908	66	6%	409	511
2017-07-18 13:45:00 EDT	973	46	5%	438	547	518	390	36%	233	291
2017-07-18 13:50:00 EDT	969	4	0%	436	545	947	429	40%	426	533
2017-07-18 13:55:00 EDT	961	8	1%	432	541	982	35	3%	442	552
2017-07-18 14:00:00 EDT	979	18	2%	441	551	949	33	3%	427	534
2017-07-18 14:05:00 EDT	893	86	8%	402	502	290	659	61%	131	163
2017-07-18 14:10:00 EDT	953	60	6%	429	536	264	26	2%	119	149
2017-07-18 14:15:00 EDT	947	6	1%	426	533	871	607	56%	392	490
2017-07-18 14:20:00 EDT	822	125	12%	370	462	992	121	11%	446	558
2017-07-18 14:25:00 EDT	167	655	64%	75	94	987	5	0%	444	555
2017-07-18 14:30:00 EDT	178	11	1%	80	100	956	31	3%	430	538
2017-07-18 14:35:00 EDT	715	537	53%	322	402	889	67	6%	400	500
2017-07-18 14:40:00 EDT	855	140	14%	385	481	953	64	6%	429	536
2017-07-18 14:45:00 EDT	435	420	41%	196	245	939	14	1%	423	528
2017-07-18 14:50:00 EDT	754	319	31%	339	424	952	13	1%	428	536
2017-07-18 14:55:00 EDT	844	90	9%	380	475	427	525	49%	192	240
2017-07-18 15:00:00 EDT	836	8	1%	376	470	264	163	15%	119	149
2017-07-18 15:05:00 EDT	829	7	1%	373	466	749	485	45%	337	421
2017-07-18 15:10:00 EDT	173	656	64%	78	97	839	90	8%	378	472
2017-07-18 15:15:00 EDT	446	273	27%	201	251	852	13	1%	383	479
2017-07-18 15:20:00 EDT	620	174	17%	279	349	877	25	2%	395	493
2017-07-18 15:25:00 EDT	468	152	15%	211	263	726	151	14%	327	408
2017-07-18 15:30:00 EDT	608	140	14%	274	342	303	423	39%	136	170
2017-07-18 15:35:00 EDT	454	154	15%	204	255	856	553	51%	385	482
2017-07-18 15:40:00 EDT	168	286	28%	76	95	833	23	2%	375	469
2017-07-18 15:45:00 EDT	220	52	5%	99	124	821	12	1%	369	462
2017-07-18 15:50:00 EDT	639	419	41%	288	359	799	22	2%	360	449