Classic Sizing Tool

PV Module Data		
Power	325	Watts
VOC	37.6	Volts
VMP	30.6	Volts
ISC	8.22	Amps
IMP	7.87	Amps
VOC Temp Coef %	0.33	C
VMP Temp Coef %	0.45	Amps

Environmental Data		
Coldest Ambient Temperature	-22	F
Hottest Ambient Temperature	115	F
Nominal Battery Volts	48	Volts

PV Array		
Number Of Modules In Series	3	
Number Of Parallel Strings	4	
Total Modules	12	
Rated PV Array Power	3900	Watts
Anticipated Array Power @ 115 F	3530	Watts
Rated PV Array Current	31.48	Amps
Battery Charging Current @ 57.6V	67.7	Amps
VMP (Maximum Power Point Voltage	91.8	Volts
VOC (Open Circuit Voltage)	112.8	Volts
VMP @ -22 F	114.6	Volts
VOC @ -22 F	133.2	Volts

Charge Controllers

	CLASSIC 150/LITE	CLASSIC 200/LITE	CLASSIC 250/LITE
Max Operating Voltage	150	200	250
Max None Operating VOC (HyperVOC) @ 48V Nominal Bat Voltage	198	248	298
Maximum Number Of Modules In Series Configuration	3	4	5
Max Number Of Modules In Series Using HyperVOC	4	5	6
Max Allowable Output Current Per Classic Based On This Current	83	70	55
Max Allowable Wattage Per Classic Based On This Configuration	4847	4080	3212
Present PV Array Wattage Of This Configuration	3900	3900	3900

Design Check

Max VOC	**OK**	**OK**	**OK**
Temp The Classic Enters HyperVOC	-103 F°	-344.2 F°	-587.2 F°
Array Power (Wattage)	**OK**	**OK**	**EXCESSIVE**
Classics Required	**0.9**	**1**	**1.3**

NOTE: MidNite Solar recommends a second controller be added after 1.2
WARNING: MidNite Solar makes no representation, warranty or assumption of liability regarding the use of the String Calculator. This tool uses data provided by other parties (such as PV module specs) and makes calculations based on assumptions which may or may not prove to be valid.

www.midnitesolar.com
17722 - 67th Ave NE, Arlington, WA. 98223 PH: 360-403-7207 FAX: 360-691-6862