



3IN1 SOLAR ROOF MONO MODULE SSM-50



Industry leading lowest thermal co-efficient of power



Excellent low iridescence performance



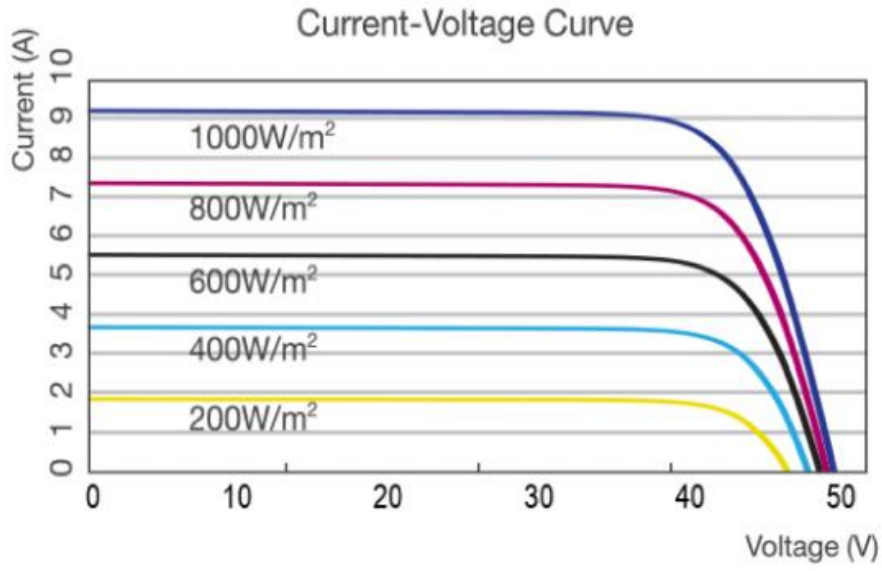
Excellent PID Resistance



Positive tight power tolerance of +5W



Two stage 100% EL inspection warranting defect-free products. Certified to withstand severe environmental conditions.



Light Load
Tile 170 lbs/sq

Impact
Class-4 Resistant

Up to 38%
BTU Reductions

200+mph
Wind Rating

Class A
Fire Rating

Easy
Rapid Installation

Foam
Insulation Value

PACE
Funds Approved

Lifetime
Longevity

No Breaks
Under Foot

Significant
HVAC Savings

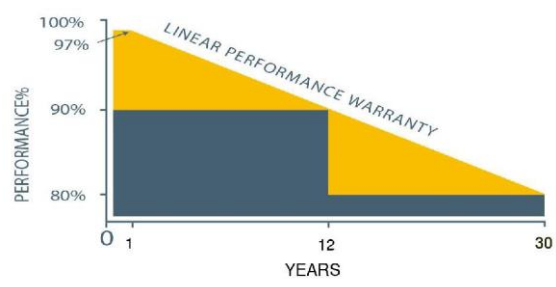
Beautiful
Curb Appeal

System
Roof 400 lbs/sq

Replaceable
Solar Modules

Reduces
Insurance Premium

Resistant
Ultra Violet Rays



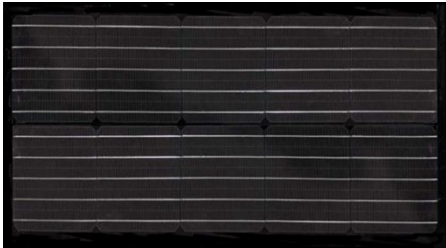
12-YEAR
material & workmanship

30-YEAR
linear power output

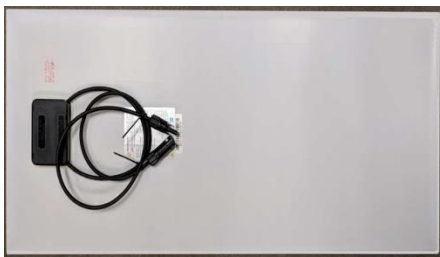


MODULE SPECIFICATIONS

TOP SIDE



UNDER SIDE



Module Manufactured in China by **Fermi Power**

MECHANICAL CHARACTERISTICS

Cell type	Mono crystalline 6 inch , 10(2*5)pcs in series
Glass	High transmission, low Iron, tempered glass
EVA	Ethylene Vinyl Acetal (E/VAC), furnished as rolls or sheets
Backsheet	PVDF/PET Fluorine resin coating furnished as sheets
Junction box	IP65/IP67 rated, 1000V, with bypass diodes
Connectors	1500V QC Solar Corp, Part Number QC4.10-a5c12
Output cable	2000V
Dimensions	33*14.5*0.197 Inch
Weight	6.05 lbs

UL & ULC

UL 1703 ULC ORD-C 1703

Leakage Current Test	21	5.4
Dielectric Voltage Withstand Test	26	5.9
Wet Insulation Test	27	5.1
Impact Test	30	5.13
Humidity Test	36	5.18
Mechanical Loading Test	41	5.23
Wiring Compartment Securement	42	5.24

TEMPERATURE COEFFICIENTS

Temperature Coefficient for Voc (β):	-0.29	%/°C
Temp Coefficient of Isc (α Isc):	0.05	%/°C
Temperature Coefficient of Pmax(γ):	-0.39	%/°C

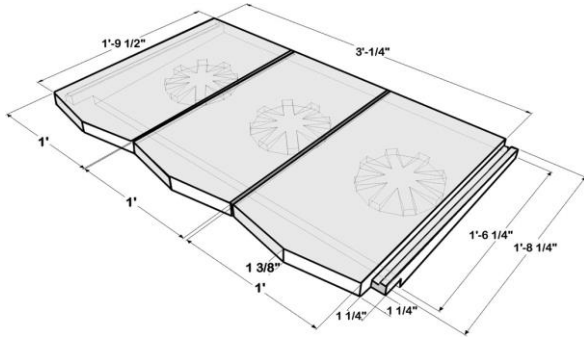
SPECIFICATIONS

Nameplate Rating:	50	Wp(25°C)
Max Power @ STC (Pmp):	52.5	Wp(25°C)
Power Tolerance:	0/+5	-/+ W
Open Circuit Voltage @ STC(Voc):	6.61	V(25°C)
Short Circuit Current @ STC(Isc):	9.63	A(25°C)
Voltage Max Power @ STC (Vmp):	5.49	V(25°C)
Nominal Operating Cell Temperature:	43±3	°C
Voltage @ Max Power & NOCT (NOCT and 800 w/m²):	5	V
Current Max Power @ STC (Imp):	9.24	A(25°C)
Current @ Max Power & NOCT (NOCT and 800 w/m²):	7.40	A
Maximum overcurrent device rating:	10	A
Maximum system voltage rating:	1000	V

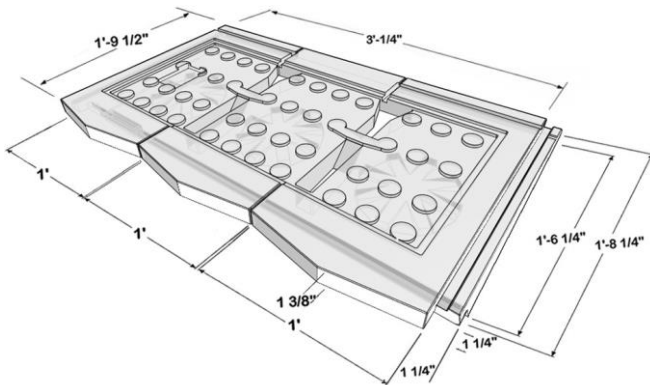
Connectors: 1500 V QC Solar Corp, Part Number QC4.10-a5c12



TRI - TILE SPECIFICATIONS



SOLAR TILE SPECIFICATIONS



Tiles Manufactured in the **USA** by **3 IN 1 ROOF**

Color Options;

Twelve stimulating shades inspire beauty on any structure.



ADDITIONAL TESTING & CERTIFICATIONS

Surface Burning Characteristics:

Properties	Method	Value
Spread of Flame Intermittent Burning Brand	UL 790	Class A
Spread of Flame Intermittent Burning Brand	ASTM E108	Class A

Geopolymer Top Coating

Properties	Method	Value
Portland Cement Blend	Factory Spray Finish	75m
Primer Coat	Factory Spray Finish	35m
Color Coat	Factory Spray Finish	40m
Warranty	ASTM G155-05a	25 years
Extended Warranty	ASTM G155-05a	50 years
UV Reflectance	ASTM C1371-04a ASTM C1549-09 ASTM E1980-11	see report see report see report
Salt Spray	ASTM B117	see report
Compression Tensile:	ASTM D1623-09 ASTM D1621-16	see report see report
Concrete Tile	TAS 112	see report

System Performance

Properties	Method	Value
Wind and Wind Driven Rain	TAS 100	see report
Wind Resistance	RAS 127	200+ mph
Static Uplift Resistance	TAS 101 TAS 102	see report see report

ADDITIONAL APPROVALS

Florida Product Approval #19997
Bahamas Code Approval #MOPW/BC /24/14
MiamiDade NOA (# pending)

Contact us: info@3in1roof.com | 833-3N1-ROOF



ISO 9001
ISO 14001
OHSAS
18001

