



REFERENCE		SI-ESF-M-NE- 10W	
<b>ELECTRICAL CHARACTERISTICS</b>			
		<b>STC</b>	
Maximum Power	[Pmpp]	Wp	10
Power selection	[Pmpp]	Wp	0/0,3
Voltage at Maximum Power	[Vmpp]	Volts	17,60
Current at Maximum Power	[Impp]	Amperes	0,57
Open Circuit Voltage	[Voc]	Volts	22,60
Short Circuit Current	[Isc]	Amperes	0,61
Maximum System Voltage	[Vsyst]	Volts	715
Maximum Series Fuse Rating	[Icf]	Amperes	10
Efficiency	[ηm]	%	9,88
Form Factor	[FF]	%	72,77
		<b>NMOT</b>	
Maximum Power	[Pmpp]	Wp	7
Voltage at Maximum Power	[Vmpp]	Volts	16,02
Current at Maximum Power	[Impp]	Amperes	0,46
Open Circuit Voltage	[Voc]	Volts	20,66
Short Circuit Current	[Isc]	Amperes	0,49
<b>MECHANICAL CHARACTERISTICS</b>			
Dimensions	(X)	mm	350
	(Y)	mm	290
	(Z)	mm	25
	(area)	m <sup>2</sup>	0,10
Weight		kg	1,49
Frame		Material	Al-6063-T5
		mm	25
Front		Material	Glass
		mm	3,2
Encapsulant		Material	EVA
		mm	0,38
Cells		Type	sc-Si
		Size	78 x 21,9
		Quantity	36
Encapsulant		Material	EVA
		mm	0,38
Rear		Material	TPT
		mm	0,5
<b>JUNCTION BOX</b>			
Protection	Grade	IP	65
Diodes	Bypass	Quantity	1
Cables	(+/ -)	Quantity	2
		Length	900
		Section	4
Connectors	(+/ -)	Type	MC-T4
		Quantity	2
<b>THERMAL CHARACTERISTICS</b>			
Temperature coefficient of short circuit current α	[Isc]	%/° C	0,0814
Temperature coefficient of open circuit voltage β	[Voc]	%/° C	-0,391
Temperature coefficient of maximum power γ	[Pmpp]	%/° C	-0,5141
Temperature coefficient of current at maximum power	[Impp]	%/° C	0,1
Temperature coefficient of voltage at maximum power	[Vmpp]	%/° C	-0,38
Nominal Module Operating Temperature	[NMOT]	° C	47±2
<b>TOLERANCES</b>			
Working temperature		° C	-40/+85
Dielectric Isolation Voltage		V/DC	3000
Relative humidity		%	0 ~ 100
Wind resistance		Pa	2400
Mechanical load-bearing capacity		Pa	5400
Maximum hail resistance		Ø	28
		m/s	23
Conductivity at ground		Ω	≤ 0.1
Resistance		Ω	≥ 100
<b>CLASSIFICATIONS</b>			
Application		Class	A
Electrical protection		Class	II
Fire resistance		Class	C
Pollution		Degree	1
Material		Group	I
Safety		Factors	1.5
<b>GUARANTEES</b>			
Manufacturing Defects		Years	12
Performance	90% of rated power	Years	12
	80% of rated power	Years	25

