#### Introduction

This is in MPPT (maximum Power point in the charge-discharge follow-up) smart solar controller, Function, as compared with the conventional PWM control, increases of 30% to 60% efficiency. It has Automatic recognition feature, it can charge the is also support features three stages Battery charge and discharge, of many types, such as RS232 communication, it is Our MPPT solar controller E-SMART series.

### Characteristic

- 1. MPPT charging mode, 99 percent of peak efficiency up, than the traditional PWM to save the solar panels of 30% to 60% controller.
- 2. DC12V / 24V / 48V battery System automatic recognition, we want users to use a different system Convenient.
- 3. DC12V / 24V / 48V systems, the maximum PV input voltage up to DC100V.
- 4. charging type: 3 Stage, high-speed charging (MPPT), to charge a certain voltage

Floating charge, it has been protected Our battery, will lead to long-term use era.

- 5. discharge type owns The usual pattern is always off pattern on, it also has the PV voltage sun To control the switch pattern.
- 6. You can automatic client, And then select the battery to be used in ventilation general, sealed lead acid, any one of the four kinds of. Gel, NiCd and custom other battery.
- 7. digital tube display Controller battery voltage, charge current, a variety of host computer display Such models, PV input voltage, battery type, parameters such as battery voltage, Such as, the charging power, charging the current working state
- 8. RS232 communication, and Provides a communication protocol, it is, and it is convenient for the customer Integrated management.
- 9. I was able this controller Infinitely be connected in parallel.
- 10. CE, RoHS Directive Approved certification. Cooperation with the client through other Certification.
- 11. Warranty 2 years. 3-10 Year, it has expanded its technical services.

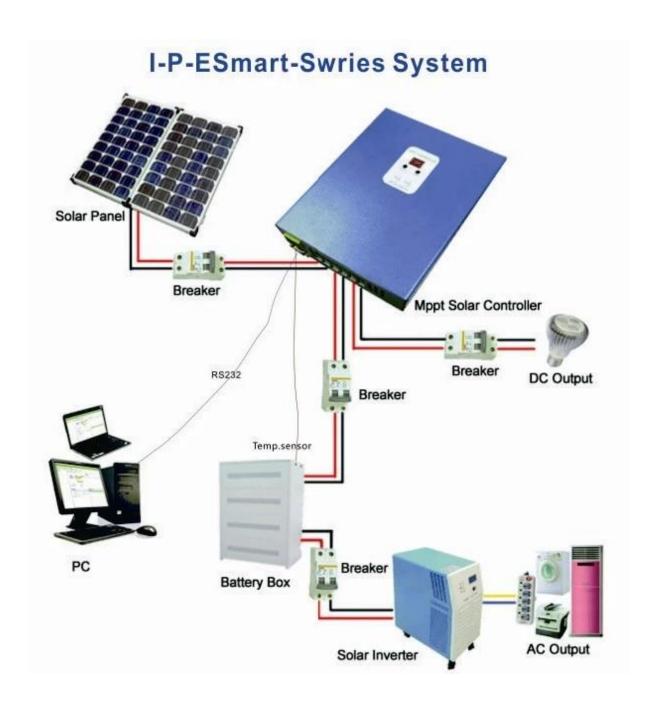
### parameter

MPPT solar controller mode: I-P-E-SMART-12V / 24V / 48V Series		25A	
Charging method	MPPT (maximum power point tracking) Three stages: constant current (MPPT), constant voltage, floating charge		
System type	IDC12\/ / 24\/ /	Automatic recognition	

	12\/ cyctom	DCOV DC1EV
System voltage	12V system	DC9V~DC15V
	24V system	DC18V~DC30V
The second	48V system	DC36V~DC60V
The soft-start	12V / 24V / 48V	≤3S
time	system	
Dynamic	12)//24)//40)/	
response	12V / 24V / 48V	500US
Recovery and	system	
range	12)//24)//40)/	
MPPT efficiency	12V / 24V / 48V	≥96.5%, ≤99%
Input character	system	
Work of MPPT		DC14V~DC100V
	12V system	
Voltage and	24V system	DC30~DC100V
scope	48V system	DC60~DC100V
Low voltage input	12V system	DC14V
Protection point	24v system	DC30V
- Total Control Politic	48V system	DC60V
Low voltage input	12V system	DC18V
Recovery point	24V System	DC34V
, ,	48V system	DC65V
More input	12V / 24V / 48V	
Voltage	system	DC110V
protection point	Jyste	
More input	12V / 24V / 48V	
Voltage recovery	system	DC100V
point		
Largest solar	12V system (W)	355
power	24V system (W)	710
	48V system (W)	1420
CHARGE CHREC	TRESTICS	
Selectable		
battery type	12V / 24V / 48V	Sealed lead acid, Ventilation, gel, NiCd battery
(There is a	system	(Other types of The battery can also be defined))
default type gel	Jystem	(other types of the battery can also be defined))
battery)		
Constant voltage	12V / 24V / 48V	please confirm Charge the voltage corresponding
	system	to the shape of the battery-powered.
Floating charge	12V / 24V / 48V	Please Please check the charging voltage
Voltage	system	depending on the form of a battery-powered.
Rated input	12V / 24V / 48V	25A
current	system	
Current limit	12V / 24V / 48V	30A
protection	system	P07
temperature	12V / 24V / 48V	0.020/ / 90
factor	system	± 0.02% / °C
Temperature	12V / 24V / 48V	14.2V / A magazina tanan anatura af 25.0C\ ± 0.2
compensation	system	14.2V- ( A maximum temperature of 25 °C) * 0.3
output Ripple	12V / 24V / 48V	200m\/ of
(peak)	system	200mV of
Stability of the		
output voltage	12V / 24V / 48V	≤ ± 1.5%
accuracy	system	
	le characteristic	
()()()()()()()()()()()()()()()()()()()		

Output voltage	Basic on the battery voltage			
Low voltage output	busic on the buttery voltage			
Protection point	Default 10.5V; recovery 11V. Custom possible]			
Rated output current	30A			
Output control	Always on, always PV voltage control switch off			
Output control setting mode	Controller of the button or above computer			
display				
LED digital tube display	Battery voltage, charge current			
LED Light Display	Charge the indicator lamp, LOAD indicator light			
PC (communication port)	RS232			
protection				
Input low-voltage protection	Check the input characteristics			
Input overvoltage protection	Check the input characteristics			
Voltage power protection overcharge	Yes			
Low voltage output				
protection	Yes			
•	V			
Rated output current protection	Yes			
Temperature protection	Yes			
Other parameters	40 ID			
noise	≤40dB			
Heat dissipation method of heat	It itself is cooled fan cooling			
component	Import of the EU material, standard.			
Authentication	FCC \ ROHS \ CE			
physical				
Measurement D $\times$ width $\times$ H of (mm)	205 * 168 * 60			
Package size D $\times$ width $\times$ H of	265 * 196 * 110			
(mm)				
N.G (KG)	1.8 kg			
G.N (KG)	2 km			
Type of mechanical protection	IP25			
environment				
Humidity	0~90% RH (non-condensing)			
Advanced	0-3000 meters			
Operating temperature	-20 °C ~ + 50 °C			
Storage temperature	-40 °C ~ + 75 °C			
Atmospheric pressure	Done in 70~~106kPa			

# **Connection diagram**



## **Product picture**











contact information