

**Areswatt New Energy** 

AW-P0600-T1

AW-PO600-T2



# **Smart PV Optimizer**

## **Product features**



## **Power Generation Optimization**

Through module-level power optimization, each PV module operates in its ideal working state, resolving system mismatch issues and increasing power generation by 5-25%. Module-level MPPT (Maximum Power Point Tracking) ensures maximum output even under partial shading, dust, or module degradation conditions.



### Intelligent Management

Creates a 1:1 virtual power station for real-time monitoring and quick module location. View voltage, current, power, electricity generation, and temperature data for each module in real time, with support for dynamic display of operational data and full life cycle monitoring, improving O&M efficiency by more than 50%.





## Flexible System Design

Allows installation of up to 25% more PV modules in a single string, enabling oversized string design and reducing system installation costs. More installed PV panels equal higher power generation, providing more flexible system design solutions.



### **Multi-layer Protection**

Supports multiple shutdown methods: on-site manual shutdown, high temperature auto shutdown, and cloud platform remote shutdown. Module-level rapid shutdown system reduces system voltage to safe voltage (below 80V) within 30 seconds, fully compliant with NEC 2017&2020(690.12) regulations.



#### **Innovative Design**

Innovative split design with four-way outlet enhances installation flexibility, saves wires, and avoids 180-degree bending. Supports both clip and bolt installation methods, with installation completed in just 30 seconds. IP68 protection rating with operating temperature range of -40°C to +85°C, adaptable to various harsh environments.





## **Technical Parameters**



Model	AW-PO600-T1	AW-PO600-T22
Input Parameters		
Rated Power	600W	750W
Maximum Input Power	650W	900W
MPPT Voltage Range	12-80V	
Maximum Input Current	16A	22A
Overvoltage Level	II.	
Output Parameters		
Voltage Range	0-80V	
Maximum Output Current	16A	22A
Maximum Voltage in Disconnected State	1V	
Maximum System Voltage	1500V	
Efficiency		
Maximum Efficiency	99.60%	
Weighted Efficiency	99.00%	
Structure Parameters		
Dimensions (W*D*H)	120*33*155mm	
Input/Output Connectors	MC4/Compatible with MC4/Customizable	
Input Cable Length	0.6m/1.2m/Customizable	
Output Cable Length	0.75m/Customizable	
Ingress Protection Rating	IP68	
Environment Parameters		
Temperature Range*	-40°C~+85°C	
Relative Humidity Range	0~100%	
Highest Altitude	4000m	
Other Parameters		
Communication Method	HPLC	
User Interface	WEB+APP	
Certification		
Safety	IEC 62109-1, EN 62109-1, NEC 2017&2020(690.12)	
EMC	IEC/EN 61000-6-1/-2/-3/-4	