

UXR1K030H

30kW@1000V High-Power Density Charging Module with National Grid Dimensions



The UXR1K030H is a high-power density, fully potted charging module designed for ultra-wide constant power voltage range, ultra-wide voltage range, high full-load operating temperature, and superior efficiency. It complies with National Grid standards, meets the constant power requirements of the Southern Grid, and offers significant energy-saving and environmental protection benefits.

+ Application scenarios

- Public charging station
- Highway service areas
- National Grid standard charging piles
- PV-ESS-charging system

+ Excellent advantages

Super standby mode

Standby power consumption <2W.

Fully potted protection

Enhances reliability and environmental adaptability.

Low noise and ultra-wide constant power range provide a quieter and more comfortable fast-charging experience for users.

Zero reactive power

Built-in circuit reduces reactive power loss in the off state.

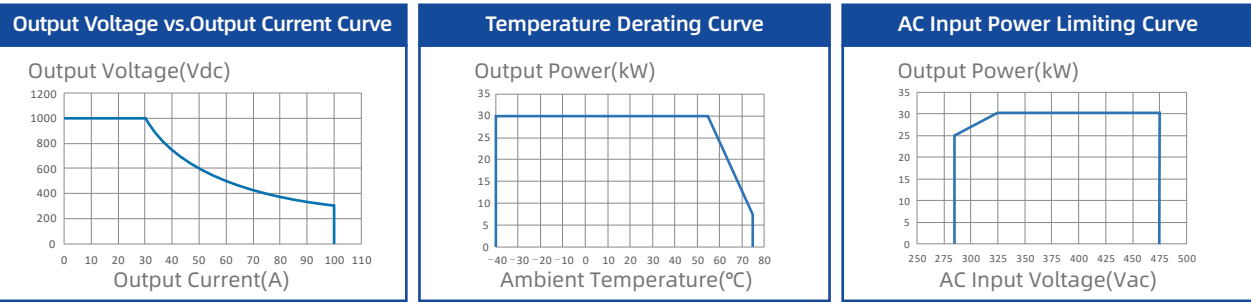
Full load working during ultra-high temperature: 55°C

Reliable operation between -40°C and 75°C, with full-load capability from -40°C to 55°C.

Compatible with National Grid dimensions, enhancing the adaptability of charging pile product iterations.

+ Key features

- Ultra-wide output voltage range of 50-1000Vdc;
- No current retract in low voltage areas for faster charging;
- Ultra-wide constant power output range of 300-1000V at 30kW;
- Built-in residual voltage discharge circuit to reduce system cost and enhance reliability;



Item		Specifications
Basic Specifications	Dimensions	84mm (H) ×218 mm (W) ×459mm (D)
	Weight	≤15 kg
	Efficiency(full load)	≥95.5%
	Standby Power Consumption	Normal standby mode: 13W+/-0.5W Super standby mode: <2W@380Vac
	Cooling Mode	Fan cooling
	Communication Bus Protocol	CAN Bus
	No.of Parallel Modules	≤60 pcs
Input Characteristics	Indicator	Green: normal operation Yellow: alarm Red: fault
	Input Voltage	285Vac ~ 475Vac , 3P + PE
	Input Current	< 60A
	Grid Frequency	45Hz ~ 65Hz
	Power Factor	≥0.95(6kW≤ output power ≤15kW); ≥0.98(15kW≤ output power ≤30kW)
	iTHD	≤5%
Output Characteristics	Output Power	30kW@Output voltage ≥300Vdc
	Voltage Range	50Vdc ~ 1000Vdc, default value: 200Vdc
	Current Range	0A ~ 100A
	Voltage Stabilized Accuracy	≤±0.5%
	Current Stabilized Accuracy	≤±1%
	Current Sharing Imbalance	≤±3%
	Ripple Voltage Peak Value Coefficient	≤1%
Electrical Isolation Method	Electrical Isolation Method	High Frequency Isolation
Environmental Conditions	Operating Temperature	-40°C ~ +75°C, output derating at above 55°C
	Storage Temperature	-40°C ~ + 75°C
	Relative Humidity	≤95%RH, non-condensing
	Altitude	No derating@ 2000m. When altitude ≥ 2000m, operating temperature decreases by 1°C for every 100m. The actual altitude value needs to be set @1000m
	MTBF	> 500,000 hrs
Protection Specifications	Input Over / Undervoltage Protection	Automatic recovery after power-off
	Output Overvoltage Protection	Manual recovery after power-off
	Overcurrent and Short-circuit Protection	Manual recovery after power-off
	Over Temperature Protection	Automatic recovery after power-off