



hopeSunHV 250KTL



High-efficiency

- 12 MPPTs with Max. efficiency 99.01%
- Compatible with 500Wp + bifacial modules
- Highly-precise intelligent string detection



User Friendly

- Active and reactive power regulation
- Compatible with weak grid situation
- Remote firmware upgrade



Reliability

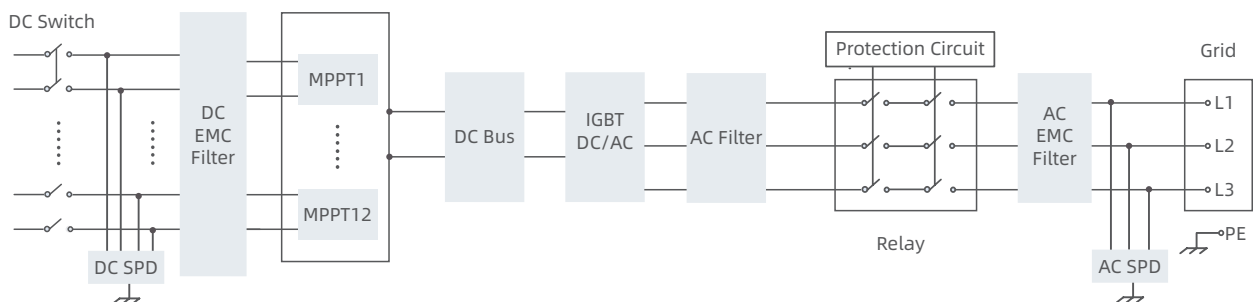
- Built-in Type II DC&AC SPD
- Built-in PID recovery function (optional)
- Compatible in harsh environmental conditions



Low Cost

- Compatible with Aluminium cable
- PLC communication to reduce cost
- Night SVG function (optional)

Topological Graph



Technical Parameters

Model	hopeSunHV 250KTL
DC Input	
Max. Input Voltage	1500V
Starting Voltage	500V
MPPT Voltage Range	500 ~ 1500V
MPPT Range Full Load	820 ~ 1320V
Max. Input Current Per MPPT	12 * 30A
Max. Short-circuit Current	12 * 45A
Number of DC Inputs	12 * 2
Number of MPP Trackers	12
AC Output	
Rated Output Power	250kW
Max. Output Power	255kW
Rated Output Voltage	800V (3P + PE)
Operating Voltage Range	680 ~ 800V
Rated Output Current	180.4A
Max. Output Current	184A
Rated Grid Frequency	50Hz / 60Hz
Power Factor	>0.99 (0.8 leading ~ 0.8 lagging)
Harmonic (THD)	<3% (at rated power)
Efficiency	
Max. Efficiency	99.01%
European Efficiency	98.52%
Protection	
Surge Protection	DC type II / AC type III
Insulation Impedance Detection	Yes
Residual Leakage Current Detection	Yes
PV String Fault Detection	Yes
PV Reverse Polarity Protection	Yes
Anti-Islanding Protection	Yes
Output Overcurrent Protection	Yes
DC Switch	Yes
General Parameters	
Dimensions (W*H*D)	1090*809*337.5mm
Weight	≤115kg
Protection Degree	IP66
Operating Temperature Range	-25 ~ +60°C
Cooling System	Smart air cooling
Standby Power Consumption	<10W
Topology	Transformerless
Operating Altitude	4000m (>3000m derating)
Display	LED indicator
Communication	RS485 / PLC
DC Connection Type	MC4
AC Connection Type	OT / DT terminal

