



SOFAR

255KTL-HV

255 kW

THREE-PHASE

- 12 MPPTs with max. efficiency up to 99.02%
- Built-in Anti-PID
- Type II SPD for both DC and AC
- AC / DC dual power supply redundant design, 24-hour status monitoring

TWELVE MPPTS

- I-V curve scanning function
- IP66 and C5 protection design for outdoor
- Compatible with Al and Cu AC cables
- Touch free commissioning and remote firmware upgrade

Datasheet

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Input (DC)	
Max. input voltage (V)	1500
Rated input voltage (V)	1160
Start-up voltage (V)	550
MPPT operating voltage range (V)	500 – 1500
Full power MPPT voltage range (V)	800 – 1300
Number of MPP trackers	12
Number of DC inputs	24
Max. input MPPT current (A)	30*12
Max. input short circuit current (A)	50*12
Output (AC)	
Rated output power (kW)	255
Max. output current (A)	184
Rated grid voltage	3 / PE, 800 Vac
Grid voltage range	640 – 920 Vac
Rated frequency	50 / 60 Hz
Grid frequency range	45 – 55 Hz / 55 – 65 Hz (according to local standard)
Active power adjustable range	0 – 100%
THDi	< 3%
Power factor	1 default (adjustable +/-0.8)
Performance	
Max. efficiency	99.02%
European efficiency	98.70%
Protection	
DC reverse polarity protection	Yes
Anti-islanding protection	Yes
Leakage current protection	Yes
Ground fault monitoring	Yes
PV-array string fault monitoring	Yes
Zero voltage ride through	Yes
DC switch	Optional
Anti-PID function	Yes
Input / output SPD	PV: type II standard, AC: type II standard
Communication	
Communication	RS485 / WiFi / Bluetooth, optional: Ethernet
General Data	
Ambient temperature range	-30°C – 60°C
Self-consumption at night (W)	< 2
Topology	Transformerless
Degree of protection	IP66
Allowable relative humidity range	0 – 100%
Max. operating altitude	5000 m (>4000 m derating)
Weight (kg)	99
Cooling	Smart forced air cooling
Dimension (mm)	1100.5*713.5*368
Display	LCD, App via Bluetooth
Standard warranty	10 years, optional: up to 20 years
Standard	
EMC	EN 61000-6-2, EN 61000-6-4, EN 61000-3-11, EN 61000-3-12
Safety standards	IEC 62109-1 / 2, IEC 62116, IEC 61727, IEC 61683, IEC 60068 (1, 2, 14, 30)
Grid standards	AS/NZS 4777, VDE V 0124-100, V 0126-1-1, VDE-AR-N 4105, CEI 0-21/CEI 0-16, UNE 206 007-1, EN 50549, G99, EN 50530