SUN2000-150K-MG0
Smart PV Controller



Arc Fault Protection

PV Ground-Fault Protection

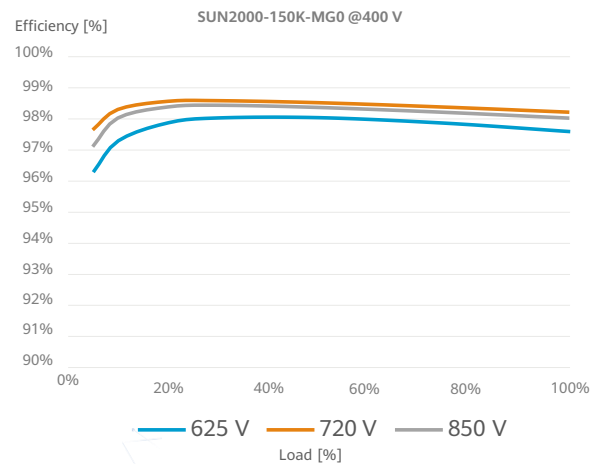
PID Recovery

Smart String Level Disconnector

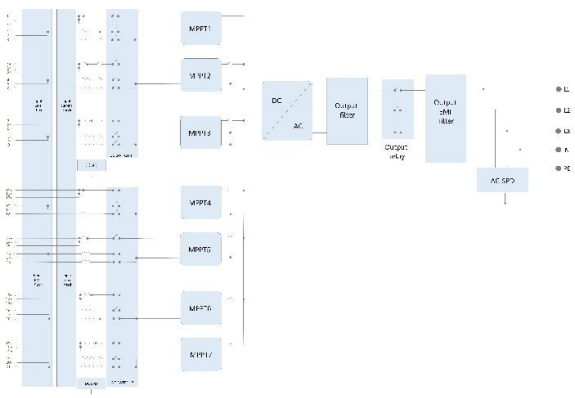
Smart Connector Temperature Detector

MBUS

Efficiency Curve



Circuit Diagram



SUN2000-150K-MG0
Technical Specification

Technical Specification	SUN2000-150K-MG0
Efficiency	
Max. efficiency	98.6% @400V, 98.8% @480V
European efficiency	98.4%
Input	
Max. Input Voltage [1]	1,100 V
Max. Current per MPPT	48A
Max. Current per Input	23A
Max. Short Circuit Current per MPPT	66A
Start Voltage	200 V
MPPT Operating Voltage Range [2]	200 V ~ 1,000 V
Number of MPP trackers	7
Max. input number per MPP tracker	3
Output	
Nominal AC Active Power	150,000 W
Max. AC Apparent Power	165,000 VA
Max. AC Active Power (cosϕ=1)	165,000 W
Nominal Output Voltage	380 V/400 V/480Vac
Rated AC Grid Frequency	50 Hz / 60 Hz
Nominal Output Current	227.9 A @380 V, 216.5 A @400 V, 180.4A @480Vac
Max. Output Current	253.2 A @380 V, 240.5 A @400 V, 200.5A @480Vac
Adjustable Power Factor Range	0.8 leading... 0.8 lagging
alternating current THDi	< 1%
Protection	
Anti-islanding Protection	Yes
AC Overcurrent Protection	Yes
DC Reverse-polarity Protection	Yes
PV-array String Fault Monitoring	Yes
DC Surge Arrester	Type Ⅱ/Ⅰ (Optional)
AC Surge Arrester	Type Ⅱ
DC Insulation Resistance Detection	Yes
Residual Current Monitoring Unit	Yes
Smart String Level Disconnector	Yes
Arc Fault Protection	Yes
Terminal Temperature Detection	Yes
PID Recovery	Yes
PV Ground-Fault Protection	Yes
Communication	
Display	LED indicators; WLAN adaptor + FusionSolar APP
RS485	Yes
USB	Yes
Smart Dongle-4G	Smart Dongle – 4G / WLAN (Optional)
Monitoring BUS (MBUS)	Yes (isolation transformer required)
General Data	
Dimensions (W x H x D)	1,000 x 710 x 395 mm
Weight (without mounting plate)	≤ 99 kg
Operating Temperature Range	-25°C ~ 60°C
Cooling Method	Smart Air Cooling
Max. Operating Altitude	4,000 m (13,123 ft.)
Relative Humidity	0 ~ 100%
DC Connector	Amphenol HH4
AC Connector	Waterproof Connector + OT/DT Terminal
Protection Degree	IP66
Topology	Transformerless
Standard Compliance (more available upon request)	
Certificate	EN 62109-1/-2, IEC 62109-1/-2, IEC 62116, IEC 61727, IEC 60068, IEC 61683
Grid Connection Standards	VDE-AR-N4105, EN 50549-1, EN 50549-2, RD 661, RD 1699, C10/11

1. The maximum input voltage is the upper limit of the DC voltage. Any higher input DC voltage would probably damage inverter.
2. Any DC input voltage beyond the operating voltage range may result in inverter improper operating.