

Smart Energy Center



Higher Revenue

Max. efficiency 98.6%



Simple & Easy

17 kg



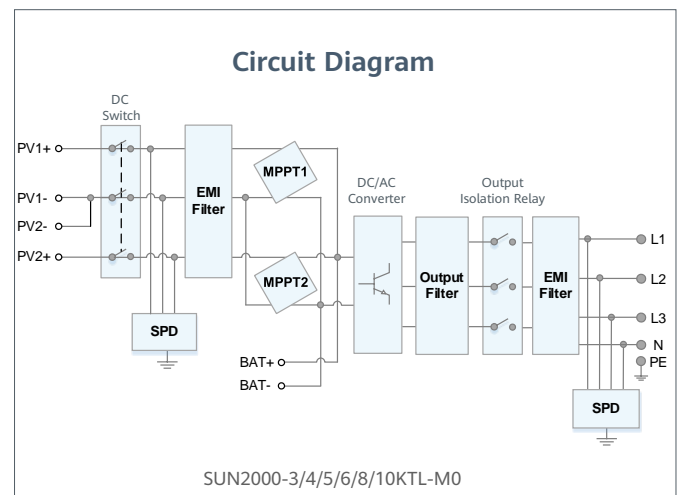
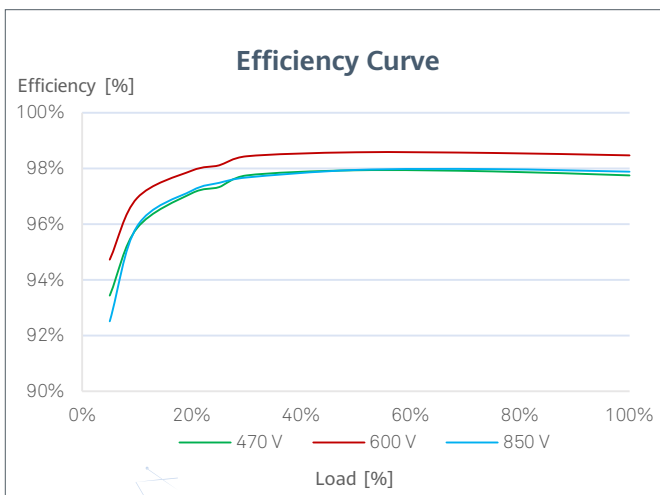
Battery Ready

Plug & Play battery interface



Safe & Reliable

Arc fault protection



SUN2000-3/4/5/6/8/10KTL-M0 Technical Specification

| Technical Specification | SUN2000 -3KTL-M0 | SUN2000 -4KTL-M0 | SUN2000 -5KTL-M0 | SUN2000 -6KTL-M0 | SUN2000 -8KTL-M0 | SUN2000 -10KTL-M0 |
|-------------------------|---------------------|---------------------|---------------------|---------------------|---------------------|----------------------|
|-------------------------|---------------------|---------------------|---------------------|---------------------|---------------------|----------------------|

Efficiency

| | | | | | | |
|------------------------------|-------|-------|-------|-------|-------|-------|
| Max. efficiency | 98.2% | 98.3% | 98.4% | 98.6% | 98.6% | 98.6% |
| European weighted efficiency | 96.7% | 97.1% | 97.5% | 97.7% | 98.0% | 98.1% |

Input

| | | | | | | |
|--------------------------------------|---------------|---------------|---------------|---------------|---------------|---------------|
| Recommended max. PV power | 6,150 Wp | 8,200 Wp | 10,250 Wp | 12,300 Wp | 14,880 Wp | 14,880 Wp |
| Max. input voltage ¹ | 1,100 V | | | | | |
| Operating voltage range ² | 140 V ~ 980 V | | | | | |
| Start-up voltage | 200 V | | | | | |
| Full power MPPT voltage range | 140 V ~ 850 V | 190 V ~ 850 V | 240 V ~ 850 V | 285 V ~ 850 V | 380 V ~ 850 V | 470 V ~ 850 V |
| Rated input voltage | 600 V | | | | | |
| Max. input current per MPPT | 11 A | | | | | |
| Max. short-circuit current | 15 A | | | | | |
| Number of MPP trackers | 2 | | | | | |
| Max. number of inputs | 2 | | | | | |

Output

| Grid connection | Three-phase | | | | | |
|--------------------------------|---|----------|----------|----------|----------|------------------------|
| | Rated output power | 3,000 W | 4,000 W | 5,000 W | 6,000 W | 8,000 W |
| Max. apparent power | 3,300 VA | 4,400 VA | 5,500 VA | 6,600 VA | 8,800 VA | 11,000 VA ³ |
| Rated output voltage | 220 Vac / 380 Vac, 230 Vac / 400 Vac, 3W / N+PE | | | | | |
| Rated AC grid frequency | 50 Hz / 60 Hz | | | | | |
| Max. output current | 5.1 A | 6.8 A | 8.5 A | 10.1 A | 13.5 A | 16.9 A |
| Adjustable power factor | 0.8 leading ... 0.8 lagging | | | | | |
| Max. total harmonic distortion | ≤ 3 % | | | | | |

Features & Protections

| | |
|----------------------------------|-----|
| Input-side disconnection device | Yes |
| Anti-Islanding protection | Yes |
| DC reverse polarity protection | Yes |
| Insulation monitoring | Yes |
| DC surge protection ⁴ | Yes |
| AC surge protection ⁴ | Yes |
| Residual current monitoring | Yes |
| AC overcurrent protection | Yes |
| AC short-circuit protection | Yes |
| AC overvoltage protection | Yes |
| Arc fault protection | Yes |
| Ripple receiver control | Yes |
| DC MBUS to optimizer | No |

General Data

| | |
|------------------------------------|---|
| Operating temperature range | -25 ~ + 60 °C (-13 °F ~ 140 °F) (Derating above 45 °C @ Rated output power) |
| Relative operating humidity | 0 %RH ~ 100 %RH |
| Operating altitude | 0 - 4,000 m (13,123 ft.) (Derating above 3000 m) |
| Cooling | Natural convection |
| Display | LED Indicators; Integrated WLAN + FusionSolar App |
| Communication | RS485; WLAN via Smart Dongle-WLAN; 4G / 3G / 2G via Smart Dongle-4G |
| Weight (incl. mounting bracket) | 17 kg (37.5 lb) |
| Dimension (incl. mounting bracket) | 525 x 470 x 166 mm (20.7 x 18.5 x 6.5 inch) |
| Degree of protection | IP65 |
| Nighttime Power Consumption | < 5.5 W |

Standard Compliance (more available upon request)

| | |
|---------------------------|---|
| Certificate | EN/IEC 62109-1, EN/IEC 62109-2, IEC 62116 |
| Grid connection standards | G98, G99, EN 50438, CEI 0-21, VDE-AR-N-4105, AS 4777, C10/11, ABNT, UTE C15-712, RD 1699, TOR D4, NRS 097-2-1, IEC61727, IEC62116, DEWA 2.0 |

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.

³ C10 / 11: 10,000 VA

⁴ Compatible TYPE II protection class according to EN/IEC 61643-11