SB 3000-11 / SB 3800-11

Powerful

- Efficiency of up to 95.6%
- OptiCool active temperature management
- The best tracking efficiency with OptiTrac MPP tracking

Safe

- Galvanic isolation
- Integrated ESS DC switch-disconnector (optional)

Flexible

- For outdoor and indoor installation
- Suitable for PV array grounding
- Integrated grid management functions with reactive power provision

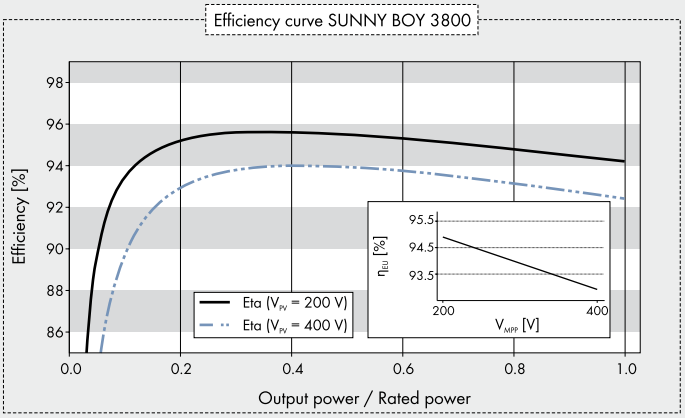
Simple

- SUNCLIX DC plug-in system

SUNNY BOY 3300 / 3800

The All-rounder with Integrated Grid Management Functions

It is robust, easy-to-handle, and, thanks to its galvanic isolation, it can be used in all kinds of AC grids: the Sunny Boy 3300/3800. Due to its suitability for PV array grounding, it can be combined with all module types. The die-cast aluminum enclosure, with the OptiCool active cooling system, guarantees the highest yields and a long service life, even under extreme conditions. Thanks to reactive power provision, it supports grid stability, and it is flexible and can be applied to different plant sizes.



Accessories

RS485 interface
485PB-NR

Bluetooth Piggy-Back
BTPBINV-NR

Grounding set "positive"
ESHV-P-NR

Grounding set "negative"
ESHV-N-NR

* Does not apply to all national appendices of EN 50438

** If ESS is deselected, the number of string inputs is reduced to 2

● Standard features ○ Optional features – Not available

Data at nominal conditions

Technical data	Sunny Boy 3300	Sunny Boy 3800
Input (DC)		
Max. DC power (@ cos φ = 1)	3 820 W	4 040 W
Max. input voltage	500 V	500 V
MPP voltage range / rated input voltage	200 V – 400 V / 200 V	200 V – 400 V / 200 V
Min. input voltage / start input voltage	200 V / 250 V	200 V / 250 V
Max. input current	20 A	20 A
Max. input current per string	16 A	16 A
Number of independent MPP inputs / strings per MPP input	1 / 3**	1 / 3**
Output (AC)		
Rated power (@ 230 V, 50 Hz)	3 300 W	3 800 W
Max. apparent AC power	3 600 VA	3 800 VA
Nominal AC voltage / range	220 V, 230 V,240 V/180 V – 265 V	220 V,230 V,240 V 180 V – 265 V
AC power frequency / range	50 Hz, 60 Hz / -4.5 Hz ... +4.5 Hz	50 Hz, 60 Hz / -4.5 Hz ... +4.5 Hz
Rated power frequency / rated grid voltage	50 Hz / 230 V	50 Hz / 230 V
Max. output current	18 A	18 A
Power factor at rated power	1	1
Displacement power factor, adjustable	0.8 overexcited ... 0.8 underexcited	0.8 overexcited ... 0.8 underexcited
Feed-in phases / connection phases	1 / 1	1 / 1
Efficiency		
Max. efficiency / European efficiency	95.2 % / 94.4 %	95.6 % / 94.7 %
Protective devices		
Input-side disconnection device	○	○
Ground fault monitoring / grid monitoring	● / ●	● / ●
DC surge arrester (type II), can be integrated	–	–
DC reverse polarity protection / AC short-circuit current capability / galvanically isolated	● / ● / ●	● / ● / ●
All-pole sensitive residual-current monitoring unit	–	–
Protection class (as per IEC 62103) / overvoltage category (as per IEC 60664-1)	I / III	I / III
General data		
Dimensions (W / H / D)	450 / 352 / 236 mm (17.7 / 13.9 / 9.3 inches)	450 / 352 / 236 mm (17.7 / 13.9 / 9.3 inches)
Weight	38 kg / 83.6 lb	38 kg / 83.6 lb
Operating temperature range	-25°C ... +60°C / -13°F... +140°F	-25°C ... +60°C /-13°F ... +140°F
Noise emission (typical)	40 dB(A)	42 dB(A)
Self-consumption (at night)	0.1 W	0.1 W
Topology	LF transformer	LF transformer
Cooling concept	OptiCool	OptiCool
Degree of protection (as per IEC 60529)	IP65	IP65
Degree of protection of connection area (as per IEC 60529)	IP65	IP65
Climatic category (as per IEC 60721-3-4)	4K4H	4K4H
Maximum permissible value for relative humidity (non-condensing)	100%	100%
Features		
DC connection	SUNCLIX	SUNCLIX
AC connection	Connector	Connector
Display	Text line	Text line
Interface: RS485 / *Bluetooth*	○ / ○	○ / ○
Warranty: 5 / 10 / 15 / 20 / 25 years	● / ○ / ○ / ○ / ○	● / ○ / ○ / ○ / ○
Multi-function relay	–	–
Certificates and approvals (more available on request)	CE, VDE0126-1-1, VDE-AR-N 4105	
Certificates and approvals (planned)	G83 / 1-1, CER / 06 / 190, RD 1663 / 2000, RD 661 / 2007, PPC, AS4777, EN 50438*, PPDS, UTE C15-712-1, C10 / 11	
Type designation	SB 3300-11	SB 3800-11