



QX³ Inverter Series

QX³10000 · QX³13000 · QX³15000 · QX³18000

Three phases

2/3 MPP trackers

Integrated data-logger and web server

IP 65

Simple installation Plug & Play

Homogenous yields



DC Input:	QX³10000	QX³13000	QX³15000	QX³18000
Recommended DC power (+15% acc. ISE)	12.000 W	15.000 W	17.000 W	20.000 W
Maximum input voltage		1.000 V		
Minimum input voltage/Start input voltage		Input A/(B): 250 V/280 V		
Minimum input voltage*	Input B: 120 V		Input C: 120 V	
MPP voltage range	350-800 V	320-800 V	360-800 V	400 - 800 V
Rated input voltage		690 V		
Maximum current per input (A/B) **		18 A		
Maximum short circuit current per input		20 A		
Start feeding-in at		30 W		
Number of independent MPP inputs	2		3	
Strings per MPP input		2		
DC terminal type		SUNCLIX		
DC Overvoltage category		III		
AC Output:	QX³10000	QX³13000	QX³15000	QX³18000
Rated output power (230 V/50 Hz, cos(φ)=1)	10.000 W	13.000 W	15.000 W	17.000 W
Maximum apparent AC power	10.000 VA	13.000 VA	15.000 VA	17.000 VA
AC connection		3/N/PE		
AC nominal output voltage range		3x 400 V/3x 230 V +/- 20%		
Power factor range, adjustable cos(φ)		0,9 ind. ... 1 ... 0,9 kap.		
Operating range at nominal frequency		50 Hz/47,5 Hz-51,5 Hz		
Maximum output current	3x 20 A	3x 22 A	3x 22 A	3x 25 A
Maximum short circuit current	3x 20 A	3x 22 A	3x 22 A	3x 25 A
Maximum permitted fusing		Circuit breaker 32 A, characteristic B		
Distortion factor at cos(φ) = 1		< 3%		
Self-consumption at night		< 2 W		
AC Overvoltage category		III		

Efficiency	QX³10000	QX³13000	QX³15000	QX³18000
Maximum efficiency		98%		
European efficiency		97,5%		
Protection and protective devices	QX³10000	QX³13000	QX³15000	QX³18000
Topology		transformerless		
Protection class		I		
Earth fault detection		integrated		
Residual current monitoring		integrated, sensitive to universal current		
Overload behaviour		operating point adjustment		
Overtemperature behaviour		operating point adjustment		
Input isolator		integrated		
Overvoltage protection-input		integrated, type 3 as per EN61643-11		
Overvoltage protection-output		integrated, type 3 as per EN61643-11		
Automatic disconnection device		as per VDE 0126-1-1		
Environmental conditions	QX³10000	QX³13000	QX³15000	QX³18000
Ingress protection		IP 54/connection area IP 65		
Cooling concept		variable speed, temperature-controlled fan		
Operating temperature range		-20 bis +60 °C		
Maximum ambient temperature at rated power	50 °C	45 °C	45 °C	40 °C
Climatic category		4K4H according to IEC 721-3-4 ***		
Maximum operating altitude		2000 m above sea level		
Noise emission		≤ 50 dB (A)		
Standards and approvals	QX³10000	QX³13000	QX³15000	QX³18000
EMC emission		EN 61000-6-3: 2001		
EMC immunity		EN 61000-6-2: 2005		
Equipment safety		EN 62109-1, -2		
Grid compliance		VDE-AR-N 4105		
General Data	QX³10000	QX³13000	QX³15000	QX³18000
Dimensions in mm (W x H x D)		455 x 612 x 213 mm (without plugs)		
Weight (approx.)	43 kg	45 kg	45 kg	45 kg
Display		liquid crystal display, 128 x 64 pixel		
Communication interfaces		(internal) RS 485, USB, Ethernet, solar radiation, S0 as per DIN EN 62053-31 class B		
Data storage		24 hours: 5-min values 30 days: hourly values 20 years: daily values		
Relay contact		2x potential-free contact		
Warranty		5 years		

*) This value is valid if one input has exceeded the start input voltage.

**) It is permitted to exceed this limit as long as the maximum short circuit current is not exceeded.

***) The device is designed for an outdoor use. Direct sunlight and precipitation (rain, snow hail) hast to be avoided on site.

