



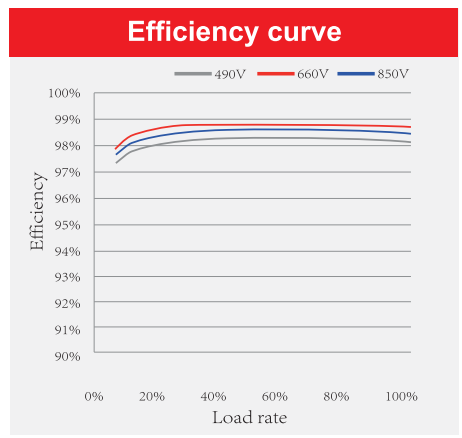
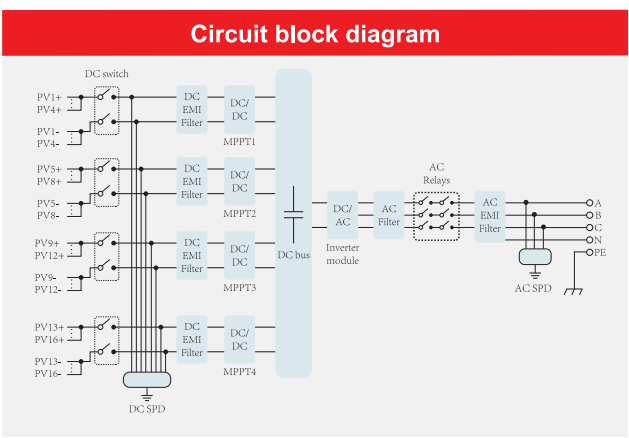
10 YEARS WARRANTY
5 YEARS REPLACEMENT WARRANTY
TERMS & CONDITIONS APPLY

NitroX[®]

50,75,100KW 3Ph-5G

PV Solar On Grid Inverter

- Max. Efficiency 98.9%**
- 4 MPPT For 50 & 75KW**
- 6 MPPT for 100 KW**
- Internal SPDs**
- Zero Export (Optional)**
- RS485/RS232**
- High Power Factor**
- High Surge Endurance**
- IP65 Ingress Protection**



Solarman Smart for enduser

Solarman Business for installers and EPC

Technical Data

Model	NITROX 50KW	NITROX 75KW	NITROX 100KW
Input Side			
Max. DC Input Power (kW)	65	97.5	150
Max. DC Input Voltage (V)		1000	
Start-up DC Input Voltage (V)		250	
MPPT Operating Range (V)		200~850	
Max. DC Input Current (A)	40+40+40+40	40+40+40+40	40+40+40+40+40+40
Max. Short Circuit Current (A)	60+60+60+60	60+60+60+60	60+60+60+60+60+60
Number of MPPT / Strings per MPPT	4/3	4/4	6/4
Output Side			
Rated Output Power (kW)	50	75	100
Max. Active Power (kW)	55	82.5	110
Nominal Output Voltage / Range (V)	3L/N/PE 380V/323V-418V, 400V/340V-440V		
Rated Grid Frequency (Hz)	50 / 60 (Optional)		
Operating Phase	Three phase		
Rated AC Grid Output Current (A)	72.4	108.7	144.9
Max. AC Output Current (A)	79.7	119.6	159.4
Output Power Factor	0.8 leading to 0.8 lagging		
Grid Current THD	>0.99		
DC Injection Current (mA)	<3%		
Grid Frequency Range	47~52 or 57~62 (Optional)		
Efficiency			
Max. Efficiency	98.7%		
Euro Efficiency	98.3%		
MPPT Efficiency	>99%		
Protection			
DC Reverse-Polarity Protection	Yes		
AC Short Circuit Protection	Yes		
AC Output Overcurrent Protection	Yes		
Output Overvoltage Protection	Yes		
Insulation Resistance Protection	Yes		
Ground Fault Monitoring	Yes		
Anti-islanding Protection	Yes		
Temperature Protection	Yes		
Integrated DC Switch	Yes		
Remote software upload	Yes		
Remote change of operating parameters	Yes		
Surge protection	DC Type II / AC Type II		
General Data			
Size (mm)	647.5W×537H×303,5D	700W×575H×297D	838W×568H×323D
Weight (kg)	44.5	60	73.7
Topology	Transformerless		
Internal Consumption	<1W (Night)		
Running Temperature	-25~65°C, >45°C derating		
Ingress Protection	IP65		
Noise Emission (Typical)	<55 dB		
Cooling Concept	Smart cooling		
Max. Operating Altitude Without Derating	2000m		
Designed Lifetime	>20 years		
Grid Connection Standard	CEI 0-21, VDE-AR-N 4105, NRS 097, IEC 62116, IEC 61727, G99, G98, VDE 0126-1-1, RD 1699, C10-11		
Operating Surroundings Humidity	0-100%		
Safety EMC / Standard	IEC/EN 61000-6-1/2/3/4, IEC/EN 62109-1, IEC/EN 62109-2		
Features			
DC Connection	MC-4 mateable		
AC Connection	IP65 rated plug		
Display	LCD 240 × 160		
Interface	RS485/RS232/Wifi/LAN		
Warranty	10 Years Warranty (5 Years Replacement Warranty)(T&C)		

