

Sinus Series

On – Line “Double Conversion” Technology

1 phase in-1 phase out

1kVA to 3kVA

- ▶ Microprocessor Controlled Online Double Conversion Technology
- ▶ Pure sinewave output less than 3% THD
- ▶ Wide input voltage range $\pm 27\%$ of nominal
- ▶ Smart RS-232 communication port
- ▶ Internal SNMP Slot Card Option
- ▶ Management software compatible
- ▶ Input Power Factor Correction PFC (>0.98)
- ▶ Overload & short circuit protection
- ▶ Cold start (DC power on)
- ▶ Genius battery management (GBM)
- ▶ Compact size, light weight & low noise
- ▶ Rack version available



Sinus Series Technical Specifications

MODEL	SS 210		SS 220		SS 230	
Capacity (kVA)	1		2		3	
INPUT						
Voltage	160VAC - 280VAC					
Frequency	50/60 Hz ±5%					
Power Factor	0,98%					
OUTPUT						
Output Power Factor	0,7					
Voltage	220VAC / 230 / 240VAC					
Voltage Regulation	±%2					
Frequency	50/60 Hz (Auto detection)					
Frequency Regulation	± 0,5%					
Harmonic Distortion	<3% (for linear loads)					
Crest Factor	3:1					
Output Waveform	Sinusoidal					
Overload Capacity	100%-120% for 60 seconds, 120%-150% for 10 seconds					
Whole efficiency	up to 88%					
Inverter efficiency	>90%					
Transfer Time	0ms					
Outlets	2 pcs IEC C13 & 1 pc Schuko Outlets		3 pcs IEC C13 & 1 pc Schuko Outlets		3 pcs IEC C13 & 1 pc Schuko Outlets	
BATTERY						
Type	Maintenance-free lead acid batteries					
Recharge Time	8 hours (to 90% of full capacity)					
Voltage	36VDC		72VDC		96VDC	
Internal Battery	3 pcs 12V 7Ah		6 pcs 12V 7Ah		8 pcs 12V 7Ah	
Back Up Time	Full Load	6 min				5 min
	Half Load	15 min				12 min
DISPLAY						
LED Display	Utility, Inverter, Bypass Mode, Fault, Overload, Battery Low, Self-test, Load/Battery Level					
ALARMS						
	Line Failure, Battery Low, Transfer to Bypass, Failure Events					
PROTECTION						
	short circuit, over temperature, overload, high voltage, battery low					
COMMUNICATION						
Interface (Communication Ports)	RS-232 Standard					
Monitoring and Management Software	Standard					
ENVIRONMENT						
Temperature	0°C - 40°C					
Humidity	0% - 95%					
Noise Level (1m Distance)	<45dBA					
Protection Class	IP20					
PHYSICAL SPECIFICATIONS						
Tower Type						
Net Weight (kg)	15		29		35	
Dimensions (mm) WxDxH	147x401x223		130x475x360		190x450x360	
19" Rack Mount Type						
Net Weight (kg)	16		28		37	
Dimensions (mm) WxDxH	483x390x88		483x485x130		483x460x192	
STANDARDS						
Standards	EN 62040-1-1 (safety), EN 62040-2(EMC)					
ACCESSORIES						
Optional	Internal & External SNMP, Dry Contact Board, USB Board, Internal Additional Charger for External Batteries, External Manual Bypass Panel					