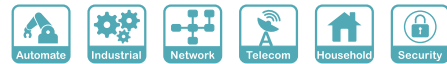




■ Features

- Supporting connection to fuel generators
- Ultra-wide input voltage range: 110V to 300Vac
- Input power factor ≥ 0.99
- Input current harmonic distortion $\leq 5\%$
- Output power factor of 1
- 50Hz/60Hz frequency conversion mode
- Emergency power-off function (EPO)
- USB/RS-232 communication interfaces
- LCD display panel
- Intelligent charging mode, adjustable charging current
- 3-year warranty



■ Applications

- Data center
- Financial institution
- Smart Buildings
- Industrial automation

■ Global Trade Item Identifier

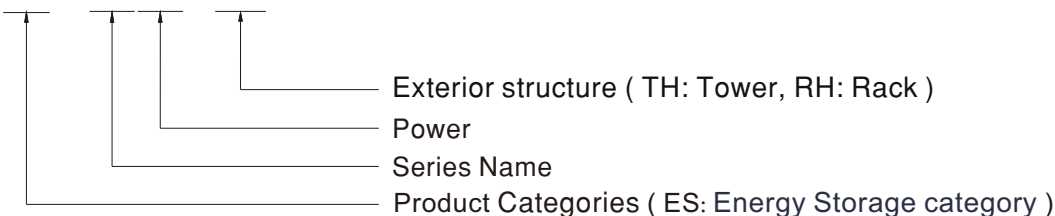
- MW Search: <http://www.meanwell.com.cn/serviceGTIN.aspx>

■ Description

ES-SU3K is a 3KVA online UPS power supply, providing rack type and tower type two appearance structures, using advanced digital control technology, combined with high integrated circuits and optimized design, enhance anti-interference ability, and ensure stable performance. The product has a full load efficiency of up to 94%, an input power factor of over 0.99, and a current harmonic of less than or equal to 5%, which can effectively prevent additional energy loss and reduce grid pollution. Its ultra-wide voltage input range is compatible with unstable power grids and fuel generators, which can easily cope with harsh power environments, reduce the need for frequent switching to battery power, and accurately match the needs of highly sensitive loads such as servers and medical equipment. In addition, the product has built-in EPO emergency power-off function and USB/RS-232 dual communication interfaces, which further strengthens the system security and remote control capabilities. It provides efficient, stable and flexible power protection solutions for key scenarios such as data centers, intelligent manufacturing, and communication base stations.

■ Drive Model Encoding

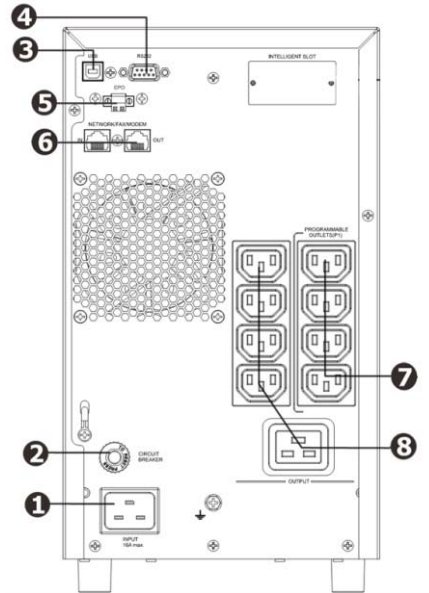
ES - SU3K - TH



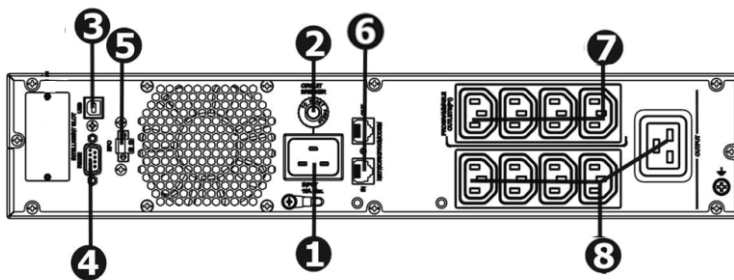
Specification		ES-SU3K-TH	ES-SU3K-RH
INPUT			
Nominal Voltage		110~300Vac(Based on load at 50%); 160~300Vac(Based on load at 100%)	
Frequency Range		40~70Hz	
Power Factor		≥0.99@nominal voltage(100%load)	
THDi		≤5%@100% resistive load	
Battery			
Battery Type		Lead-acid/lithium-ion batteries	
Numbers		6	
Charging Voltage (FV)		82.2Vdc±1%	
Charing Current (CC)		8A(1/2/4/6/8A adjustable through LCD)	
OUTPUT			
Power		3KVA/3KW	
Output Voltage		200/208/220/230/240Vac	
AC Voltage Regulation		±1%	
Frequency	AC Mode	47~53Hz/57~63Hz	
	Battery Mode	50/60±0.1Hz	
Waveform	Battery Mode	Pure Sinewave	
Harmonic Distortion		≤2%THD(Linear Load); ≤5%THD(Non-linear Load)	
Transfer Time	AC to Battery	0	
	Online to Bypass	4ms(Typical)	
	ECO to Battery	8ms(Typical),10ms(max)	
Efficiency	ECO Mode@full charged battery	97%	
	AC Mode @full charged battery	94%	
	Battery Mode	91%	
SAFETY & EMC			
SAFETY STANDARDS		EN IEC 62040-1:2019/A11:2021,YD/T1095-2018	
EMC EMISSION	Parameter	Standard	Test Level / Note
	Conducted emission	EN IEC 62040-2:2018	Class A
	Radiated emission	EN IEC 62040-2:2018	Class A
	Harmonic current	EN IEC 61000-3-12:2011	Class A
	Voltage flicker	EN IEC 61000-3-11:2019	Clause 5
EMC IMMUNITY	Parameter	Standard	Test Level / Note
	ESD	EN 61000-4-2:2008	Level 3, 4KV air ; Level 2: 4KV contact
	RS	EN 61000-4-3:2006	Level 3
	EFT	EN 61000-4-4:2012	Level 4,1KV
	Surge	EN 61000-4-5:2014	Level 4,1KV/Line-Line 2KV/Line-Earth
	Conducted	EN 61000-4-6:2013	Level 3
	Magnetic Field	EN 61000-4-8:2009	Level 4
	Voltage Dips and Interruptions	EN IEC 61000-4-11:2020	100% residual voltage for 0.5cycle; 100% residual voltage for 1cycle; 100% residual voltage for 250cycle; 30% residual voltage for 25cycle
OTHER			
Communication interface		RS232/USB	
Phase		single phase with ground	
Display		LCD	
Operating temperature		0~40°C	
Humidity		20-90% relative humidity(non-condensing)	
Elevation		1000m	
Struture		Tower	Rack
Weight		7.4kg	10.5kg
Size		421*190*318mm	600*438*88mm
NOTE			
1. Derate capacity to 80% when the output voltage is adjusted to 200VAC/208VAC 2. if the UPS is installed or used in a place where the altitude is above than 1000m. the outout power must be derated one percent per 100m. ※ Product Liability Disclaimer : For detailed information ,please refer to https://www.meanwell.com/serviceDisclaimer.aspx			

Mechanism Dimension

ES-SU3K-TH



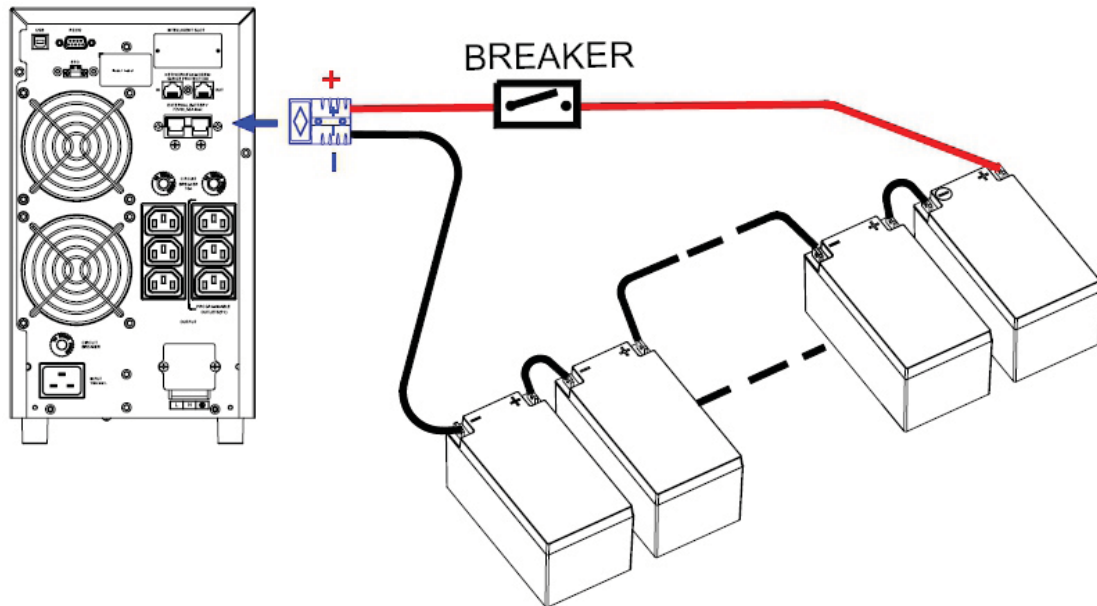
ES-SU3K-RH



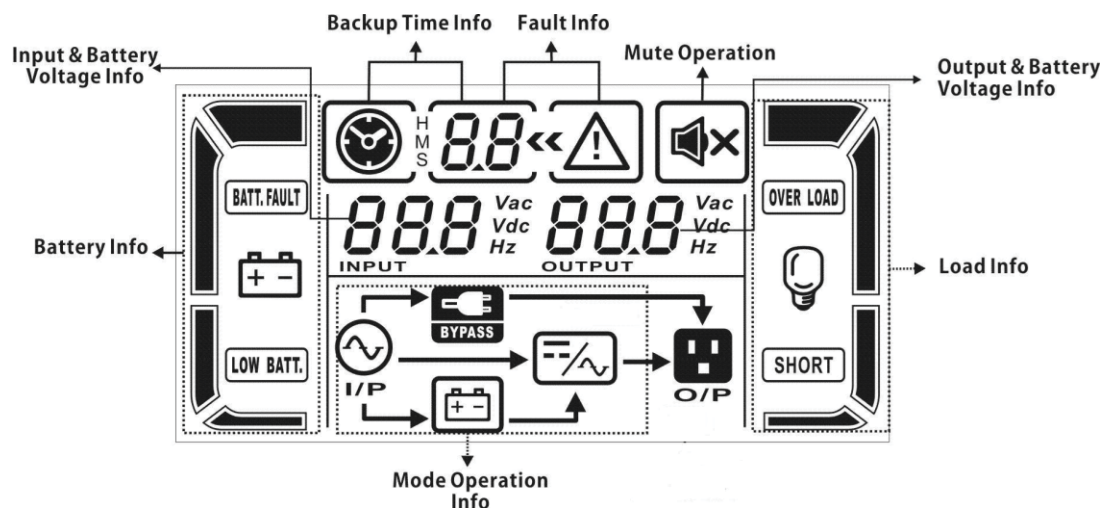
1. AC input
2. Input circuit breaker
3. USB communication port
4. RS-232 communication port
5. EPO port
6. Modem/Phone/Network surge protection
7. Programmable outlets: connect to non-critical loads
8. Output receptacles











Connecting the battery: When connecting the battery box, be sure to confirm that the polarity of the battery is correctly connected.

Required specifications of circuit breaker: voltage $\geq 1.25 \times$ battery voltage / number of groups, current $\geq 50A$
Please select the appropriate battery size and connection quantity according to the needs of the birth time and the specifications of the UPS.



■ LCD Panel



Diaplay	Function
Backup time information	
 8.8	Indicates battery diacharge time in munber H:hours, M: mintes, S: seconds
Fault information	
	Indicates that the warning and fault occurs
8.8	Indicates the fault codes
Mute operation	
	Indicates that the UPS alarm is disabled
Output & Battery voltage information	
888 ^{Vac} _{Vdc Hz} OUTPUT	Indicates the output voltage, frequency or battery voltage Vac: output voltage, Vdc: battery voltage, Hz: frequency
Load information	
	Indicates the load level by 0-25%、 26-50%、 51-75%、 and 76-100%。
OVER LOAD	Indicates overload
SHORT	Indicates the load or the output is short
Load information	
P1	Indicates that programmable management outlets are working
Mode operation information	
	Indicates the UPS connected to the mains
	Indicates thebattery is working
	Indicates the bypass circuit is working
ECO	Indicates the ECO mode is enabled
	Indicates the Inverter circuit is working
	Indiactes the output is working
Battery information	
	Indicates the battery capacity by 0-25%、 26-50%、 51-75%、 和 76-100%。
BATT. FAULT	Indicates the battery is not connected
LOW BATT.	Indicates low battery level and low battery voltage
Input & Battery voltage information	
888 ^{Vac} _{Vdc Hz} INPUT 12	Indicates the input voltage or frequency or battery voltage Vac: Input voltage, Vdc: battery voltage, Hz: input frequency

■ Audible Alarm

Description	Buzzer status
Battery Mode	Sounding every 4 seconds
Low Battery	Sounding every second
Overload	Sounding twice every second
Fault	Continuously sounding
Bypass Mode	Sounding every 10 seconds

■ LCD display wording index

Abbreviation	Display content	Meaning
ENA	ENA	Enable
DIS	DIS	Disable
ESC	ESC	Escape
HLS	HLS	High loss
LLS	LLS	Low loss
BAT	BAT	battery
CF	CF	Converter
TP	TP	Temperature
CH	CH	Charger
FU	FU	Bypass frequency unstable
EE	EE	EEPROM error
EP	EP	EPO

■ Accessories List

	Object	Number
1	User Manual	1
2	Monitoring software CD-ROMs	1
3	USB cable	1
4	Computer cables	1
5	Battery cable	1
6	Vertical tripod (only Rack)	2
7	Cabinet mounting brackets (only Rack)	2