

**DEFENDER**

Unlike any other UPS

# QUARTS

MULTI-FUNCTIONAL INVERTER



- Long time operation in low heat dissipation
- Pure sine wave
- Built-in adjustable and powerful charger up to 60 Amp for long backup time
- AC, DC and optional off grid solar panel connection
- 48 VDC for QUARTS 8K for easy battery installation
- Transformer - robust design for harsh environment
- DC start function and automatic self-diagnostic function
- Suitable for all AC loads including sensitive electronics and heavy-duty equipment
- High efficiency, low harmonic distortion
- Optional remote control panel

## DEFENDER QUARTS 800 W/1600 W/2400 W/4000 W/6000 W/8000 W INVERTER SELECTION GUIDE

MODEL	QUARTS 800	QUARTS 1600	QUARTS 2400	QUARTS 4000	QUARTS 6000	QUARTS 8000	
<b>CAPACITY</b>	800 W	1600 W	2400 W	4000 W	6000 W	8000 W	
<b>INPUT</b>							
<b>Voltage</b>	Nominal Voltage	220 VAC or 120 VAC				230 VAC only	
	Acceptable Voltage Range	120 - 270 VAC or 60 - 135 VAC				120 - 270 VAC	
	Low Line Transfer	120 VAC $\pm$ 2 % or 60 VAC $\pm$ 2 %				120 VAC $\pm$ 2 %	
	Low Line Comeback	130 VAC $\pm$ 2 % or 65 VAC $\pm$ 2 %				130 VAC $\pm$ 2 %	
	High Line Transfer	270 VAC $\pm$ 2 % or 135 VAC $\pm$ 2 %				270 VAC $\pm$ 2 %	
	High Line Comeback	260 VAC $\pm$ 2 % or 130 VAC $\pm$ 2 %				260 VAC $\pm$ 2 %	
<b>Frequency Range</b>	50 Hz / 60 Hz (45 Hz - 70 Hz)						
<b>OUTPUT</b>							
<b>Voltage</b>	220 VAC (230 VAC or 240 VAC re-settable via LCD panel) 115 VAC (115 VAC or 120 VAC re-settable via LCD panel)						
<b>AC Voltage Regulation (Batt. Mode)</b>	< 3 % RMS for entire battery voltage range						
<b>Frequency Range (Batt. Mode)</b>	50 Hz or 60 Hz $\pm$ 0.1 Hz						
<b>Power Factor</b>	0.67		0.8		1		
<b>Waveform (Batt. Mode)</b>	Pure Sine Wave						
<b>Transfer Time (Typical)</b>	< 8 ms						
<b>BATTERY</b>							
<b>Battery Voltage</b>	12 VDC	24 VDC	24 VDC	24 VDC	48 VDC		
<b>Max. Charging Current (Adjustable)</b>	40 A	50 A		60 A			
<b>CONTROL PANEL</b>							
<b>LED Display</b>	Normal status (Green LED), Warning status (Yellow LED), Fault (Red LED)						
<b>LCD Display</b>	UPS status, Input, Output, Output voltage regulation, Load level, Battery voltage, Battery level, Temperature, Model						
<b>ALARM</b>							
<b>Battery Mode</b>	Sounding every 4 seconds						
<b>Low Battery</b>	Sounding every second						
<b>Overload</b>	Sounding every 2 seconds						
<b>Fault</b>	Continuously sounding						
<b>PHYSICAL</b>							
<b>Dimension, D X W X H (mm)</b>	149 x 298 x 390	190 x 298 x 450		235 x 390 x 550		260 x 355 x 600	
<b>Net Weight (kgs)</b>	12	24	31.5	45	46	53.6	
<b>ENVIRONMENT</b>							
<b>Humidity</b>	0-90 % RH @ 0- 40°C (non-condensing)						
<b>Noise Level</b>	Less than 55dB @ 1 meter						

\* Product specifications are subject to change without further notice

