



Reliable frequency transformation

3, 6 kVA/kW

FEATURES

- IGBT 3-level topology
- Output Power Factor 1.0, + Critical Loads
- State-of-the-art DSP Digital Signal Processor
- Active Power Factor Corrector (APFC), input P.F. up to 0.99
- Output with Isolation Transformer
- Wide input range (110 ~ 295V)
- Optional battery backup
- Smart fans, lower noise and longer life
- User-friendly interface LCD display and UPS status LEDs
- Communications RS232, USB, smart slot (SNMP, dry contacts, modbus)

Complete protection



Blackouts



Spikes



Harmonics



Transient



Frequency variation



Sags/swells



Surges



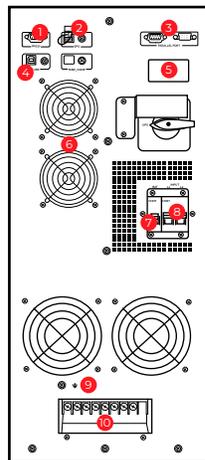
Under-Voltage



Noise

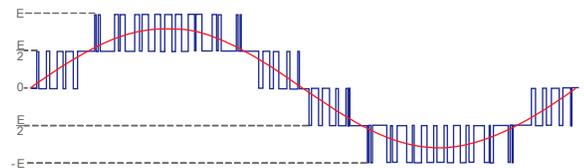
Converter Rear Panel

- 1 RS232 communication port
- 2 Emergency Power Off switch (EPO)
- 3 Parallel ports
- 4 USB communication port
- 5 Intelligent slot (SNMP, dry contact, Modbus)
- 6 Fans
- 7 Battery breaker
- 8 Input breaker
- 9 Ground terminal
- 10 Input/Output/battery terminal block



3-level topology

Frequency converters include a 3-level IGBT topology, increasing their operating efficiency.



Applications

Recommended for equipment with 50 Hz frequencies, such as PLCs, power supplies, variable speed drives, control equipment and more.

Frequency Converter		
MODEL	FC3K	FC6K
Power capacity	3 kVA / 3kW	6 kVA / 6 kW
Topology (Online)	Double conversion	
INPUT		
Nominal voltage	(L1, L2 + GND) 208/220/230/240 VAC	
Voltage range	(110 ~ 295) VAC	
Frequency	(40 - 70) Hz 50/60 Hz (auto-sensing)	
Power factor	≥ 0.99 typical	
Total Harmonic Distortion (THDi)	≤ 3%	
Input connection type	Hardwire terminal block (L1, L2 + GND)	
OUTPUT		
Output voltage 240/120V default (180° phase displacement)	*208/220/230/240 VAC @ L1-L2 110/115/120 VAC @ L1-N1, L2-N2	
Voltage regulation	±1%	
Frequency (Battery mode)	50/60 Hz +/- 0.1 Hz	
Power factor	1.0	
Waveform	Pure sine wave	
Total Harmonic Distortion (THDv)	≤ 1%	
Overload capacity	105% ~110% @ 10min, 110% ~ 125% @ 1min, 126% ~ 150% @ 30 sec	
Output type connection	Iso Transformer; Hardwire terminal block (L1, N1, L2, N2,+GND)	
Efficiency	90% typical	
BACKUP TIME (Optional)		
Battery type	Lead Acid Batteries (VRLA), maintenance free	
Backup time 50% load Internal battery	40 min (9Ah12V x 20)	18 min (9Ah12V x 20)
Backup time 100% load Internal battery	18 min (9Ah12V x 20)	7 min (9Ah12V x 20)
External battery Bank connector	Hardwire terminals	
SYSTEM		
Display & LED Indicators	LCD + LED Indicators integrated + Audible alarms	
ENVIRONMENT		
Noise	≤ 55dB @ 3.8 ft (1 m)	≤ 58dB @ 3.8 ft (1 m)
Humidity	0 - 95% (non-condensing)	
Operation Temp.	(32 ~ 104)°F ; (0 ~ 40) °C	
IP Level	IP 20	
PHYSICAL		
Dimensions (Width x Depth x Height)	(10.31 x 28.03 x 28.81) in (262 x 712 x 732) mm	
Weight (with batteries)	249.12 lb. /113 Kg	282.19 lb. / 128 Kg
MANAGEMENT		
Communication ports	RS232, USB, EPO, parallel ports, Intelligent slot (SNMP, dry contacts, Modbus)	
SNMP card	Optional accessory	
CONFORMITY & STANDARDS		
Safety Certification	IEC, CE	

**Product specifications are subject to change without further notice
*USA-V2512-REV1.02