

Technical specification for 3KVA UPS

- **True On Line Double Conversion.**
- **Rated power 3 KVA**
- **Warranty:** not less than two years (UPS & Batteries)
- **Brand:** European or well-known Brand
- **Quantity:** 4

TECHNICAL PARAMETERS		PARAMETER DESCRIPTION	
Type		Single phase, True sine wave Online UPS, Tower type	
Input		230V±10% V AC, Single phase-three wire (Phase+Neutral+Ground) 50±5% Hz Power factor : ≥ 0.97	
Output		3 KVA 220V±10% V AC, Single phase-three wire (Phase+Neutral+Ground), 50±5% Hz ≤ 0.75 to ≥ 0.95 (Lag)	
Voltage Regulation		≤ ±2%	
Inverter Efficiency		≥ 85%	
Crest factor		≥ 3:1	
Overload Capability		110%: ≥05 Minutes 125%: ≥01 Minutes 150%: ≥10 Seconds	
Current Harmonic distortion(THDI)		< 5% at Full load	
Control Switch (MCB/Fuse/Isolator)		• Input ON/OFF • Output ON/OFF • Battery • Maintenance Bypass Switch	
Protections		UPS shall trip on following faults: • Input AC Under/Over voltage • Output overload / Short circuit • DC Under/Over voltage • Over temperature	
Indications & Alarms			
Alarms (Audible for Trouble/fault)		Mains fail Charger fail DC Under/Over voltage	Battery Low/ Discharging Output overload Over temperature
Metering: LCD Display		Input/Mains Voltage UPS Output Voltage UPS Output /Load Current	Charger / Battery Voltage Battery Charging / Discharging Current
Environment		0-55°C & 95% RH	
Batteries specifications		VRLA Sealed, maintenance free	
Battery life time		≥ 5 years	
Backup time		≥ 10 min. at full Load	

Technical specification for 6KVA UPS

- **True On Line Double Conversion.**
- **Rated power 6 KVA**
- **Warranty:** not less than two years (UPS & Batteries)
- **Brand:** European or well-known Brand
- **Quantity:** 4

TECHNICAL PARAMETERSs	PARAMETER DESCRIPTION	
Type	Single phase, True sine wave Online UPS, Tower type	
Input	230V±10% V AC, Single phase-three wire (Phase+Neutral+Ground) 50±5% Hz Power factor : ≥ 0.97	
Output	6 KVA 220V±10% V AC, Single phase-three wire (Phase+Neutral+Ground), 50±5% Hz ≤ 0.75 to ≥ 0.95 (Lag)	
Voltage Regulation	≤ ±2%	
Inverter Efficiency	≥ 85%	
Crest factor	≥ 3:1	
Overload Capability	110%: ≥05 Minutes 125%: ≥01 Minutes 150%: ≥10 Seconds	
Current Harmonic distortion(THDI)	< 5% at Full load	
Control Switch (MCB/Fuse/Isolator)	• Input ON/OFF • Output ON/OFF • Battery • Maintenance Bypass Switch	
Protections	UPS shall trip on following faults: • Input AC Under/Over voltage • Output overload / Short circuit • DC Under/Over voltage • Over temperature	
Bypass	Automatic bypass and maintenance bypass switch	
Indications & Alarms		
Alarms (Audible forTrouble/fault)	Mains fail Charger fail DC Under/Over voltage	Battery Low/ Discharging Output overload Over temperature
Metering: LCD Display	Input/Mains Voltage UPS Output Voltage UPS Output /Load Current	Charger / Battery Voltage Battery Charging / Discharging Current
Environment	0-55°C & 95% RH	
Batteries specifications	VRLA Sealed, maintenance free	
Battery life time	≥ 5 years	
Backup time	≥ 10 min. on full Load	

Technical specification for 10KVA UPS

- True On Line Double Conversion.
- Rated power **10 KVA**
- **Warranty:** not less than two years (UPS & Batteries)
- **Brand:** European or well-known Brand
- **Quantity:** 1

TECHNICAL PARAMETERS	PARAMETER DESCRIPTION	
Type	Single phase, True sine wave Online UPS, Tower type	
Input	230V±10% V AC, Single phase-three wire (Phase+Neutral+Ground) 50±5% Hz Power factor : ≥ 0.97	
Output	10 KVA 220V±10% V AC, Single phase-three wire (Phase+Neutral+Ground) 50±5% Hz ≤ 0.75 to ≥ 0.95 (Lag)	
Voltage Regulation	≤ ±2%	
Inverter Efficiency	≥ 85%	
Crest factor	≥ 3:1	
Overload Capability	110%: ≥05 Minutes 125%: ≥01 Minutes 150%: ≥10 Seconds	
Current Harmonic distortion(THDI)	< 5% at Full load	
Control Switch (MCB/Fuse/Isolator)	• Input ON/OFF • Output ON/OFF • Battery • Maintenance Bypass Switch	
Protections	UPS shall trip on following faults: • Input AC Under/Over voltage • Output overload / Short circuit • DC Under/Over voltage • Over temperature	
Bypass	Automatic bypass and maintenance bypass switch	
Indications & Alarms		
Alarms (Audible for Trouble/fault)	Mains fail Charger fail DC Under/Over voltage	Battery Low/ Discharging Output overload Over temperature
Metering: LCD Display	Input/Mains Voltage UPS Output Voltage UPS Output /Load Current	Charger / Battery Voltage Battery Charging / Discharging Current
Environment	0-55°C & 95% RH	
Batteries specifications	(12V 9Ah) VRLA Sealed, maintenance free	
Battery life time	≥ 5 years	
Backup time	≥ 10 min. on full Load	
Communication (optional)	RS232, SNMP card	

- Bill of Quantities

item	Quantity	note
3 KVA UPS	4	
6 KVA UPS	4	
10 KVA UPS	1	SNMP card shall be provided

- No need ext. Battery Pack for all
- Two separate offers (technical and financial includes sales tax) should be submitted
- UPS manual with highlighted required specifications should be submitted.
- Training proposal should be submitted for at least five (5) CARC employees to maintain the offered UPS includes location, material and hours needed for such training.

The training shall cover UPS theory, location of subassemblies, safety, battery considerations and UPS operational procedures.

- Reference standards: EN 62040-1, EN 6240-2, EN 62040-3