



Advanced Active Power PFC Online UPS 10KVA - 400KVA



with Predictive Analysis Technology



**REGENERATIVE
LOAD HANDLING**



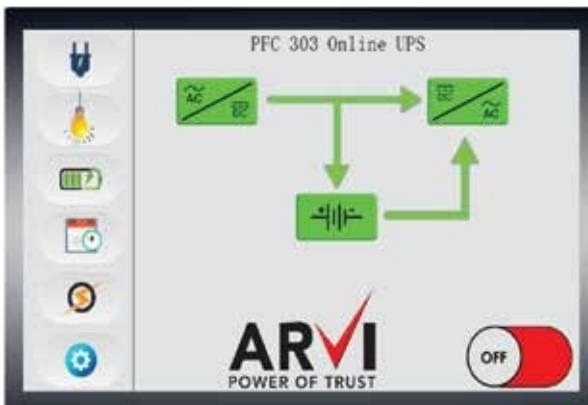
**27TH YEAR OF OEM
MANUFACTURING AND EXPORT**



**100% INDIGENOUSLY DESIGNED
IN THE IN-HOUSE R&D**



TFT, touch screen, color display



Graphical display of UPS status, load percentage and battery levels

- Input voltage
- Output voltage
- Battery voltage
- Output power in KVA
- Output power in KW
- Output PF
- Output frequency
- Load percentage
- Over-temperature warning

Predictive self analysis

Monitoring

Diagnosis

Preventive action



The uptime is significantly enhanced using the intelligent DSP based Predictive Self Analysis built-in in the UPS. Using 16 sensors, the UPS periodically carries-out Self Analysis of various parameters and initiates alarm for preventive and corrective action well in advance and facilitates high uptime of machines and process.



**GSM based
SMS pre-trip alert for
initiating necessary
preventive action.**

SNMP-simple network monitoring protocol

Remote ups monitoring software interface

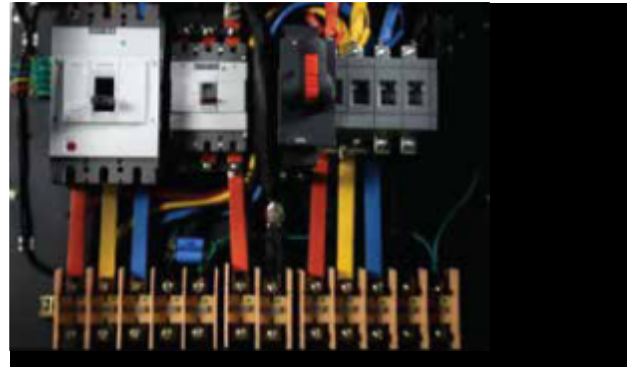
Monitor the UPS mains input voltage, output voltage, battery voltage, load percentage etc from a remote location.

SNMP feature facilitates the user to carry-out preventive action remotely without physically reaching the UPS. Pre-trip alarm pops on the monitoring screen prompting the user/system admin/maintenance engineer to initiate preventive action. Without the SNMP feature, the pre-trip alarms are often unnoticed as the UPS is located away from the users and can cause ungraceful shutdown of machines/servers/process.

100% Indigenous design



IGBT based PFC rectifier



Industrial Grade
Designed for Harsh Environment

100% Indigenous Factory - With In-House R&D.

- Office, hospitals, educational and financial institutes
- Analytical and research labs
- Data centres and IT servers
- Digital and offset printing
- Environmental chamber

Uninterrupted Premium Quality Power using Power-Conditioning topology

The factors contributing to the pre-mature failure of electrical gadgets and eventually the system failure is not limited only to voltage fluctuations but also the poor quality of power. Hence, importance should not only be given for power availability but also for quality power availability.

**PFC-303 is a complete
Power-conditioner & Power Factor Corrector**
Optimises the product life & process uptime by 35%-40%.

- Constant voltage, frequency, High Grade Premium quality power.
- Galvanic isolation at the output.
- Operating ambient temperature 0-45 degrees.
- Overload handling capability of 150% for 1 minute.
- High surge handling capability.



Optimise production process to improve Productivity and profitability...

Galvanic isolation offers

Comprehensive Protection and High Availability.

Mains grade raw power contains impurities and large percentages of harmonics injected into the line by various non-linear loads. The common problem of neutral drift can produce considerable increase in output voltage and permanently destroy your critical loads and data.

Isolation transformers increase load protection and ensure human safety by isolating the AC leakage current from developing a potential between the input and ground. Isolated output enhances the attenuation of common mode noise by increasing the impedance between the input and output.

Provides protection of loads against lightning. Galvanic isolation via transformer is the only way to safely protect loads from lightning. It provides protection from high energy transients, which are clamped at the AC input from propagating to the output.



Galvanic Isolation for Comprehensive Power Protection

Advanced Active Power PFC Online UPS

Features

- Power Factor Corrected
- Digital Signal Processor
- Isolation Transformer
- SNMP
- Autobypass

Power Factor Correction

- Reduces the running cost in terms of electricity bill
- Prevents the overrating of electrical wire
- Reduce reflected harmonics back to the source
- Savings in sizing of utility transformer & generator

Technology

- DSP technology IGBT inverter
- IGBT converter

Topology

Bifilar PWM switching

Interface

- SNMP compatible User-friendly LCD display
- True RMS reading
- Fault condition
- Status display
- Event logging

Ideal Power-conditioner

- Constant Frequency source
- Premium Quality Galvaically isolated Power
- Power Factor Corrector

Technical Specifications

10KVA - 400KVA PFC303 series Online UPS

TECHNOLOGY		DSP based, IGBT convertor, IGBT inverter UPS
RATING		10KVA - 400KVA
DC BUS		192VDC - 384VDC
INPUT		
Input Voltage		415VAC, 3Ø & N
Input Voltage Window		330VAC - 470VAC
Input Frequency		45-55Hz
Input PFC	100% load	> 0.95
Power walk in		Softstart for 0-20seconds powerwalk-in.
RECTIFIER		
Type		IGBT based full bridge
Voltage Regulation (±) 1%		
Ripple Voltage		< 2%
Converter Protection		Advanced Electronic Protection for device safety backed up, with MCB's/ MCCBs & fast acting fuses
INVERTER		
Inverter	Type	IGBT based MPWM with instantaneous Sinewave Control
Output PF		0.8 lagging to unity
Nominal	Voltage	415VAC, 3Ø, P-P / 230VAC, 1Ø, P-N
Regulation		(±) 1%
Frequency		50 Hz ± 0.1Hz
Waveform		True Sinewave
Total Harmonic	Linear Load	< 2%
Distortion	Non Linear Load	< 5%
Transient Response		Remains within +/- 5% & recover to normal within 20 msec
Over Load	100%	Continuous
Capacity	110%	10 Minutes
	150%	1 Minute
Crest Factor		3:1
Mode of Operation		Designed for Continuous operation
ISOLATION		True Online with complete galvanic isolation.
Inverter Protection		Advanced Electronic Protection for device safety backed up with MCB's/ MCCBs & fast acting fuses, high speed pulse by pulse electronic device protection over voltage/ under voltage protection, Electronic over current trip.
BYPASS		
Manual Bypass		Provided
ALARMS		
		• Input / Low / Fail • Output overload • Over temperature • Battery low
LED Indications (Single LED with multi function)		• Mains on • UPS on • Battery Low • Overload
		• Input Voltage • Output Voltage • Load current • Output Frequency • Battery Voltage