

Powering the future

ATW5000 Series Heavy Duty Inverter



- » Heavy duty ferroresonant design
- » True sine wave output with THD < 1%
- » Integrated Static Transfer Switch
- » Support for parallel redundant operation
- » Available in several rack mount and tower configurations

The ATW5000 Series inverters are built with a heavy duty ferroresonant transformer that allows them to operate in the most difficult industrial environment conditions, powering loads like electrical engines, emergency lighting, air conditioning equipment or other high crest factor non-linear loads.

Featuring a built-in Static Transfer Switch and capable of functioning in parallel configurations, the ATW5000 will provide the highest level of protection and quality power to any type of load, under all operating situations.

Technical Specifications

Inverter

Electrical

- Input voltage
 - Nominal: 48Vdc, 110Vdc or 220Vdc
 - Operating: -18% - +25% Unin
- Output frequency:
 - Nominal: 50Hz
 - Maximum variation: $\pm 0.1\%$
- Power:
 - ATW5000-48: 4-10KVA
 - ATW5000-110: 4-30KVA
 - ATW5000-220: 4-60KVA
- Power factor: 0.8
- Efficiency: > 85%
- Output voltage:
 - Nominal: 110Vac / 120Vac, 220Vac / 230Vac / 240Vac
 - Maximum variation: $\pm 2\%$ Unout
- Crest factor: 3:1
- Dynamic response time: < 30ms
- Isolation:
 - 2kV input - ground
 - 2kV input - output
 - 2kV output - ground
- THD: < 1% linear load, < 5% non-linear load
- Overload: 150% - 1 min., 125% - 10 min.
- MTBF: >100.000 hours

STS

- AC input voltage range: -25% +20% Unin
- Frequency range: $\pm 10\%$
- Operating mode: online (load supplied primarily by inverter) and offline (load supplied primarily by AC line). The operating mode is factory set and can be chosen upon ordering.
- Transfer time: 4ms

User interface

- LCD: all parameters, alarms
- LED indicators: Operating mode (On, Bypass), AC Input, DC Input, Overload, Fail
- Audio: Internal speaker for alarms
- Dry contacts: Inverter Load, Bypass Load, Line Fail, DC Fail, Overload, Inverter Fault
- RS232 and RS485, optional external Ethernet interface with web monitoring software
- Parallel Port

Environmental

- Operating temperature: -10 - +50°C
- Storage temperature: -40 - +85°C
- Humidity: 0 - 95% non-condens
- Altitude: -500 - +2800m
- Cooling: forced
- Ingress protection rating: IP20

Protection

- Overtemperature
- Overload
- Output shortcircuit
- Reversed polarity
- Input overvoltage
- Input low voltage
- STS Overvoltage
- STS Low voltage

Agency Compliance

Safety

- EN 60950-1

EMI

- EN55022

Immunity

- EN 61000