

## Features

- Online Double Conversion
- Inverter with 3 level IGBT technology for higher efficiency and minimized interference to grid
- Power Factor 1.0
- Dual DSP control for top performance
- Dual input design for mains and bypass
- Cold start function(cold start from batteries)
- Self-load test function
- Built-in battery and flexible battery configuration
- ECO mode and EPO function
- Double bypass: Electronic and Maintenance
- AC/AC efficiency up to 94%,
- 2 Optional slot for SNMP and dry contact
- Intelligent Monitoring System for Batteries
- Anti-corrosion resistant coating for all PCB boards
- Easy onsite parallel slot modification (up to 4 units)
- Easy mobility and accommodation (wheels and anchors)

## Solves the following power quality issues

- High Voltage Surge
- Low Voltage Surge
- Sustained High Voltage
- Sustained Low Voltage
- Electric Noise
- Voltage Spikes
- Power Failure
- Frequency Variations
- Harmonic Distorsion

## Applications

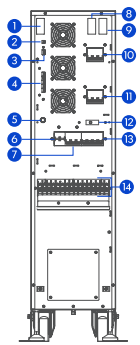
- Sites / computer rooms
- Telecommunications
- Instrumentation Equipment
- Audio and Video Equipment
- Intelligent Buildings
- Shopping Centers
- Security Systems
- Electronic Banking
- Robotics

## Optional

- Voltage transformer for coupling to the electrical power system or load voltage
- External battery bank for extended backup
- Industronic voltage conditioner to protect the UPS and extend battery life
- Voltage Surge Suppressor

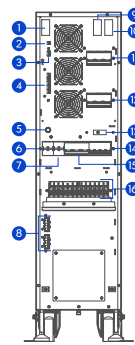


## UPS-IND 1300 MI Specs



UPS IND 1310 MI

- 1 Smart Slot 2
- 2 RS485
- 3 Dry Contact 2
- 4 Dry Contact 1
- 5 Cold Start
- 6 Battery Braker
- 7 Output Braker
- 8 Smart Slot 1
- 9 Parallel Port
- 10 Input Braker
- 11 Bypass Braker
- 12 Gate Controlled Switch
- 13 Bypass Maintenance Braker
- 14 Wiring Terminals



UPS IND 1315 MI / 1320 MI

- 1 Smart Slot 2
- 2 RS485
- 3 Dry Contact 2
- 4 Dry Contact 1
- 5 Cold Start
- 6 Battery Braker 1
- 7 Battery Braker 2
- 8 External Battery Port
- 9 Smart Slot 1
- 10 Parallel Port
- 11 Input Braker
- 12 Bypass Braker
- 13 Gate Controlled Switch
- 14 Bypass Maintenance Braker
- 15 Output Braker
- 16 Wiring Terminals

Model UPS-IND HF	1310 MI	1315 MI	1320 MI
<b>Input</b>			
Capacity (W/ VA)	10000/10000	15000/15000	20000/20000
Overload Protection	Thermal magnetic input circuit breaker and Thermal magnetic bypass circuit breaker		
Voltage Range (Vac)	156 a 260 (Line to Line): -29%, +18%		
Phase	Three Phase Star, 3 Phases + Neutral + Ground, optional: Delta (3 Phases + Ground)		
Frequency Range (Hz)	40 ~ 70		
Input Power Factor	≥ 0.99 at full load		
THDi	≤ 3%		
<b>Output</b>			
AC to AC Maximum Efficiency	94%		
Overload Protection	Thermal magnetic output circuit breaker		
Output Power Factor	1.0		
Voltage (Vac)	110/190, 115/200, 120/208 or 127/220		
Voltage Regulation Range (Vac)	+/- 1%		
Frequency (Hz)	60 +/- 0.1% (Battery mode), Optional: 50 Hz		
Waveform	Pure Sinusoidal Wave		
Harmonic Distortion THDv	≤ 1% (Linear load), ≤ 4% (Non linear load)		
Transfer Time (ms)	0.0 ms(True On Line)		
Connection Type	Three Phase Star, 3 Phases + Neutral + Ground, optional: Delta (3 Phases + Ground)		
Overload	< 105% continuous, 105% to 110% 60 min., 110% to 125% 10 min., 125% to 150% 60 s., > 150% immediate switch to Bypass		
<b>Battery Bank</b>			
Voltage (Vdc)	+/- 96 ~ +/- 120 (adjustable)		
Battery Capacity	20 x 9Ah 12 V	32 x 9Ah 12 V	40 x 9Ah 12 V
Battery Type	Lead Acid (Sealed & Maintenance Free)		
Full load backup time (min)	5 min Standard (Extended Time available upon request)		
Maximum Load Current (A)	Adjustable 1 to 10	Adjustable 1 to 20	
Battery Bank	Internal: with space for 60 Batteries (3 packs of 20)		
<b>Physical &amp; Mechanical</b>			
Audible Noise (dB)	< 55, at 1 meter		
Operating Temperature (°C)	-5 - 40		
Relative Humidity	0 - 95% without Condensation		
Maximum Operating Altitude (m.a.s.l.)	2,000 at 100%		
Cabinet	Baked electrostatic Epoxy coated Steel		
Dimensions, height x width x depth (mm)	1000 x 300 x 800		
UPS Weight (kg)	65 / 119 (with batteries)	65 / 152 (with batteries)	65 / 173 (with batteries)
<b>Technology</b>			
Inverter	3 level IGBT technology for higher efficiency and minimized interference to grid		
Rectifier	High Efficiency PFC type with IGBT technology		
Output Isolation Transformer	Optional		
Battery Status	Real Time Online/Discharge Information		
Thermal Dissipation (kBTU / h)	2.05	3.07	4.10
Internal Bypass	Two Bypass Modes: Automatic Static & Manual Bypass Switch for Maintenance		
Paralleling	By Capacity and/or Redundancy N + 1 (up to 4 units)		
Certifications	CE-62040-1, CE 62040-2, ISO 9001:2015, NOM		
Communications Interface	RS485 + EPO, 5 dry contact output signals, 1 dry contact input, RS232, SNMP network card		
Digital Touch Screen	Displays: Input and output voltage, Load capacity, Battery voltage, Operating Status Mimic and LEDs Indicators		
Alarms	Low Battery, Abnormal Input, UPS Failure, etc.		
Protection	Low Battery, Overload, Short Circuit, Over Temperature, etc.		

The specifications are subject to changes and modifications without prior notice, due to our commitment of continuous improvement of reliability, design and functionality of our products