

### Product Features:

- 24V, 48V, 130V Input
- 1 KVA / 800 Watts Output
- 2 KVA / 1600 Watts Output
- 100-120 VAC Range
- 208-240 VAC Range
- Standard 19"/23", 2U Rackmount
- High Efficiency
- Pure Sine Wave Output
- Low EMI/RFI Emissions
- Utility Bypass Function
- Intelligent Microprocessor-Based Control
- Output Overload Protection
- RS-232 Communication Port
- SNMP Communication Option
- User-Friendly LCD and LED Displays
- Smart Software for Power Management
- Internal "Over Temperature" Protection
- Input Reverse Polarity Protection
- Battery High/Low Voltage Protection
- UL/cUL Approved (60950)

### Applications:

- Telecommunications Equipment
- Networking Equipment
- Utility Systems Control
- Fire Alarm Systems
- Building Management Systems
- Mission Critical Inter-Agency Communication
- SCADA Networks

## Majorsine® Series Utility and Telecom Inverters



### Product Overview

Majorsine Power Inverters feature the integrated utility bypass, and can be cascaded for redundancy. Designed for long Mean Time Between Failure, these inverters provide the dependable AC power that your networks demand.

The compact 2U rackmount package makes this model the right selection for limited space applications. 19 inch and 23 inch brackets included.

Majorsine Power Inverters are designed and built for full reliability at any location. These intelligent, dependable inverters provide economical AC power for all your network needs.

### Options

#### SNMP Remote Communication Option:

Remote monitoring is a prime consideration and requirement to manage multiple network elements from a central location.

Remote access is established by simply installing the plug-n-play card, configuring your network IP address, and attaching the network interface cable.



#### Locking - Hardwire Adapter:

Reliable locking NEMA 5-15 plug to secure load circuits to the output sockets of the inverter. Heavy-duty design locks the plug in place to prevent disconnecting critical loads.



## Power Solutions for Critical Applications

## Specifications – 208 to 240 VAC Output Range

	MAJORSINE1000i-48-2U	MAJORSINE2000i-48-2U
<b>DC Input</b>		
Voltage	40-60 VDC	40-60 VDC
Rated Current	25 Amps	50 Amps
Protection	Fuse and DC Breaker	Fuse and DC Breaker
Efficiency	>85% (full linear load), 48 VDC I/P, 230 VAC O/P	>85% (full linear load), 48 VDC I/P, 230 VAC O/P
<b>Output (Backup)</b>		
Capacity	1KVA / 800W	2KVA / 1600W
Voltage	208, 220, 230, 240 VAC	208, 220, 230, 240 VAC
Voltage Regulation	±2%	±2%
Frequency	50/60Hz ± 0.2Hz	50/60Hz ± 0.2Hz
Wave Form	Pure Sine Wave	Pure Sine Wave
THD (linear load)	3% 230 V/100%	3% 230 V/100%
THD (SPS load)	5% 230 V/100%	5% 230 V/100%
Crest Factor	3:1	3:1
Receptacles	(4) IEC 320 outlets – C13	(4) IEC 320 outlets – C13
<b>Utility Power (Bypass)</b>		
Voltage	Nominal 230 VAC	Nominal 230 VAC
Frequency	50/60± 5 Hz	50/60± 5 Hz
Protection	AC Circuit Breaker	AC Circuit Breaker
<b>Interface</b>		
Communication	SNMP / RS232 / Dry-contact	SNMP / RS232 / Dry-Contact
LED Display	Inverter ON Overload DC Abnormal Fault	Inverter ON Overload DC Abnormal Fault
LCD Display	Inverter ON Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.	Inverter On Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.
<b>Protection</b>		
Short	For 1 second; Switch to Bypass, then shutdown	For 1 second; Switch to Bypass, then shutdown
Overload	105-125% for 3 minutes 126-150% for 3 seconds; >150% for 1 second; Switch to bypass	105-125% for 3 minutes 126-150% for 3 seconds; >150% for 1 second; Switch to bypass
Temperature	55±5°(Inside the case)	55±5°(Inside the case)
<b>Environment</b>		
Operating Temperature	0° to 50° C	0° to 50° C
Storage Temperature	-20° to 70° C	-20° to 70° C
Humidity	0 – 90 % Relative Humidity (Non-Condensing)	0 – 90 % Relative Humidity (Non-Condensing)
Acoustic Noise	46 dBA @ 1 M	46 dBA @ 1 M
<b>Safety</b>		
Safety	CE Approved	CE Approved
EMI / RFI	FCC Class B, CISPR Class B	FCC Class B, CISPR Class B
<b>Mechanical</b>		
Dimensions	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount
<b>Weight</b>	7kg / 15.4 lbs	8kg / 17.6 lbs

Power Solutions for Critical Applications

Specifications – 100 to 120 VAC Output Range

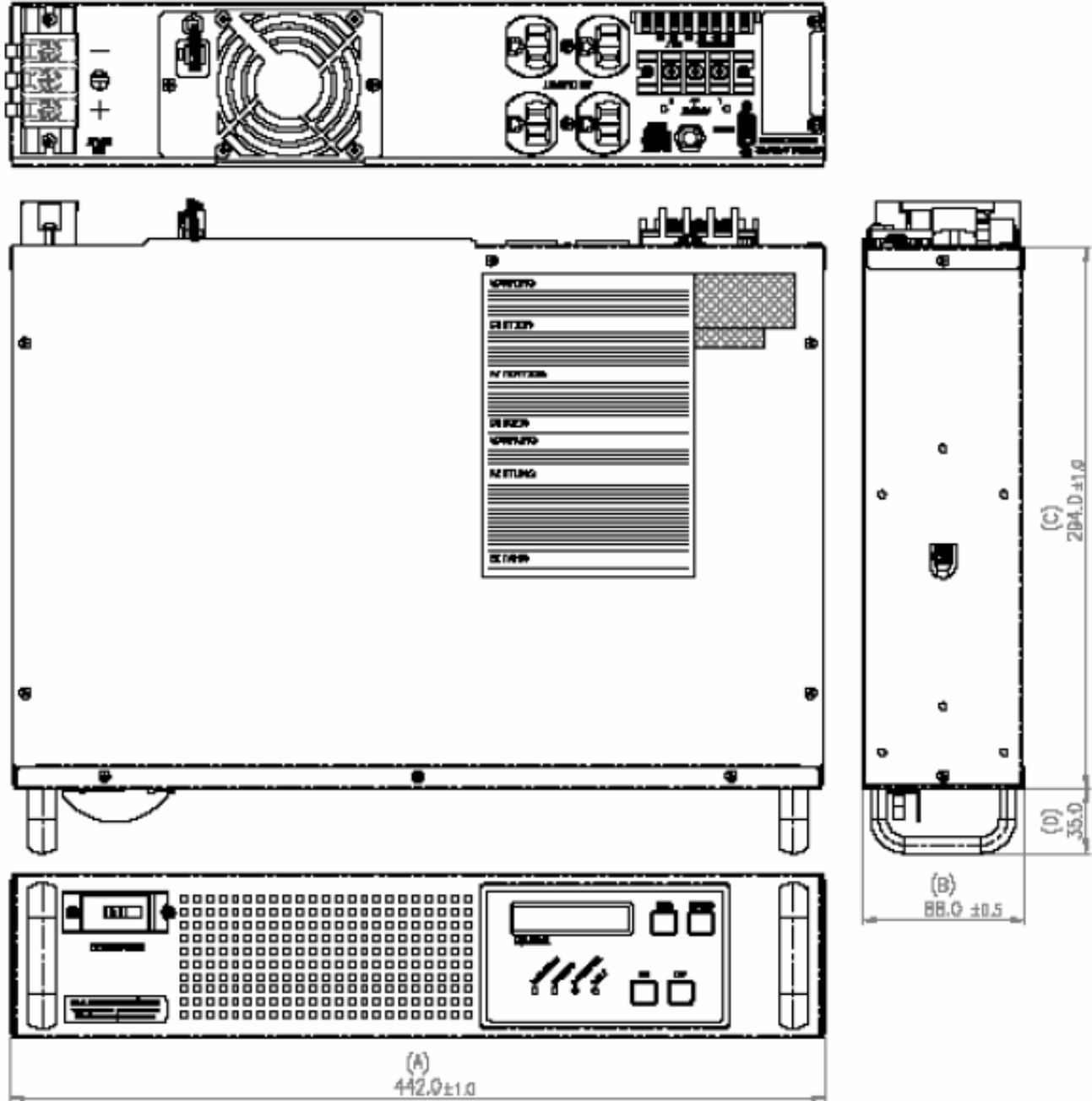
	MAJORSINE1000-24-2U	MAJORSINE1000-48-2U	MAJORSINE2000-48-2U
<b>DC Input</b>			
Voltage	20-30 VDC	40-60 VDC	40-60 VDC
Rated Current	50 Amps	25 Amps	50 Amps
Protection	Fuse and DC Breaker	Fuse and DC Breaker	Fuse and DC Breaker
Efficiency	>85% (full linear load), 24 VDC I/P, 120 VAC O/P	>85% (full linear load), 48 VDC I/P, 120 VAC O/P	>85% (full linear load), 48 VDC I/P, 120 VAC O/P
<b>AC Output (Load)</b>			
Capacity	1KVA / 800W	1KVA / 800W	2KVA / 1600W
Voltage	100, 110, 115, 120 VAC	100, 110, 115, 120 VAC	100, 110, 115, 120 VAC
Voltage Regulation	±2%	±2%	±2%
Frequency	50/60Hz ± 0.2Hz	50/60Hz ± 0.2Hz	50/60Hz ± 0.2Hz
Wave Form	Pure Sine Wave	Pure Sine Wave	Pure Sine Wave
THD (linear load)	3% 120 V/100%	3% 120 V/100%	3% 120 V/100%
THD (SPS load)	5% 120 V/100%	5% 120 V/100%	5% 120 V/100%
Crest Factor	3:1	3:1	3:1
Receptacles	(4) NEMA 5-20 R outlets	(4) NEMA 5-15 R outlets	(4) NEMA 5-20 R outlets
<b>Utility Power (Bypass)</b>			
Voltage (Nominal)	120 VAC	120 VAC	120 VAC
Frequency	50/60± 5 Hz	50/60± 5 Hz	50/60± 5 Hz
Protection	AC Circuit Breaker	AC Circuit Breaker	AC Circuit Breaker
<b>Interface</b>			
Communication	SNMP / RS232 / Dry-contact	SNMP / RS232 / Dry-contact	SNMP / RS232 / Dry-Contact
LED Display	Inverter ON Overload DC Abnormal Fault	Inverter ON Overload DC Abnormal Fault	Inverter ON Overload DC Abnormal Fault
LCD Display	Inverter ON Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environmental Temp. Utility status Short circuit Over Temp.	Inverter ON Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.	Inverter On Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.
<b>Protection</b>			
Short	For 1 second; Switch to Bypass, then shutdown	For 1 second; Switch to Bypass, then shutdown	For 1 second; Switch to Bypass, then shutdown
Overload	105-125% for 3 minutes; 126-150% for 3 seconds; >150% for 1 second; Switch to bypass	105-125% for 3 minutes 126-150% for 3 seconds; >150% for 1 second; Switch to bypass	105-125% for 3 minutes 126-150% for 3 seconds >150% for 1 second; Switch to bypass
Temperature	55 ± 5°(Inside the case)	55 ± 5°(Inside the case)	55 ± 5°(Inside the case)
<b>Environment</b>			
Operating Temperature	0° to 50° C	0° to 50° C	0° to 50° C
Storage Temperature	-20° to 70° C	-20° to 70° C	-20° to 70° C
Humidity	0 – 90% Relative Humidity (Non-Condensing)	0 - 90%Relative Humidity (Non-Condensing)	0 - 90% Relative Humidity (Non-Condensing)
Acoustic Noise	46 dBA @ 1 M	46 dBA @ 1 M	46 dBA @ 1 M
<b>Safety</b>			
Safety	UL / cUL	UL / cUL	UL / cUL
EMI / RFI	FCC Class A	FCC Class A	FCC Class A
<b>Mechanical</b>			
Dimensions	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount
<b>Weight</b>	7kg / 15.4lbs	7kg / 15.4 lbs	8kg / 17.6 lbs

Power Solutions for Critical Applications

Specifications – 100 to 120 VAC Output Range

	MAJORSINE1000-125-2U	MAJORSINE2000-125-2U
<b>DC Input</b>		
Voltage	100-150 VDC	100-150 VDC
Rated Current	10 Amps	20 Amps
Protection	Fuse and DC Breaker	Fuse and DC Breaker
Efficiency	>85% (full linear load), 125 VDC I/P, 120 VAC O/P	>85% (full linear load), 125 VDC I/P, 120 VAC O/P
<b>AC Output (Load)</b>		
Capacity	1KVA / 800W	2KVA / 1600W
Voltage	100, 110, 115, 120 VAC	100, 110, 115, 120 VAC
Voltage Regulation	±2%	±2%
Frequency	50/60Hz ± 0.2Hz	50/60Hz ± 0.2Hz
Wave Form	Pure Sine Wave	Pure Sine Wave
THD (linear load)	5% 120 V/100%	5% 120 V/100%
THD (SPS load)	3% 120 V/100%	3% 120 V/100%
Crest Factor	3:1	3:1
Receptacles	(4) NEMA 5-15 R outlets	(4) NEMA 5-20 R outlets
<b>Utility Power (Bypass)</b>		
Voltage (Nominal)	120 VAC	120 VAC
Frequency	50/60± 5 Hz	50/60± 5 Hz
Protection	AC Circuit Breaker	AC Circuit Breaker
<b>Interface</b>		
Communication	SNMP / RS232 / Dry-contact	SNMP / RS232 / Dry-Contact
LED Display	Inverter ON Overload DC Abnormal Fault	Inverter ON Overload DC Abnormal Fault
LCD Display	Inverter ON Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.	Inverter On Output Voltage & Frequency Input Voltage Load Percentage DC Voltage System Model Internal Environment Temp. Utility status Short circuit Over Temp.
<b>Protection</b>		
Short	For 1 second; Switch to Bypass, then shutdown	For 1 second; Switch to Bypass, then shutdown
Overload	105-125% for 3 minutes 126-150% for 3 seconds; >150% for 1 second; Switch to bypass	105-125% for 3 minutes 126-150% for 3 seconds; >150% for 1 second; Switch to bypass
Temperature	55±5° (Inside the case)	55±5°(Inside the case)
<b>Environment</b>		
Operating Temperature	0° to 50° C	0° to 50° C
Storage Temperature	-20° to 70° C	-20° to 70° C
Humidity	0 – 90 % Relative Humidity (Non-Condensing)	0 - 90 % Relative Humidity (Non-Condensing)
Acoustic Noise	46 dBA @ 1 M	46 dBA @ 1 M
<b>Safety</b>		
Safety	UL / cUL	UL / cUL
EMI / RFI	FCC Class A	FCC Class A
<b>Mechanical</b>		
Dimensions	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount	17.32"W x 11.81"D x 3.46"H (440x300x88mm) 2U Rackmount
<b>Weight</b>	7kg / 15.4 lbs	8kg / 17.6 lbs

Mechanical Drawing



H= 3.50" (88 mm)  
 W= 17.4" (442 mm)  
 D= 11.57" (294 mm)