



# PA0023-100W 20 - 3000MHz Dual Band SSPA System

## FEATURES

- Rack mounted system
- Ultra-broadband, class AB linear LDMOS and GaN design
- Dual Band, One input - Two Outputs**
- Suitable for all single channel modulation standards
- Built-in protection circuits
- High reliability and ruggedness

## ELECTRICAL SPECIFICATIONS

Parameter	Specification		Notes
	A	B	
Band Designation	20 - 1000 MHz	1000 - 3000 MHz	
Operating Frequency Range	20 - 1000 MHz	1000 - 3000 MHz	
Power Output CW.	100 Watt Min		CW
Power Gain	50 dB Min		
Power Gain Flatness	4.0 dB p-p Max		Constant input power
Input Return Loss	10 dB Min		Relative to 50 Ohm
2-Tone Intermodulation (IMD)	-30 dBc Typ		40dBm/Tone, Δ = 1MHz
Harmonics	-20 dBc Typ		At rated Pout
Non-Harmonic Spurious	-60 dBc Max		
Operating Voltage	100 - 240 VAC		
Power Consumption	1000 Watt Max		At rated Pout
Max Input Power	+8 dBm		Without damage
Load VSWR Protection	10 : 1		

## ENVIRONMENTAL CHARACTERISTICS

Parameter	Specification	Notes
Operating Case Temperature	0 to +50 °C	
Storage Temperature	-40 to +85 °C	
Relative Humidity	5 to 95 %	Non Condensing

## MECHANICAL SPECIFICATIONS

Parameter	Specification	Notes
Dimensions W x H x D	483 x 178 x 560 mm	4U, excluding handles
Weight	30 Kg. Max	
RF Connectors In/Out A / Out B	Type-N Female	Front Panel Standard
AC Power / Interface Connector	IEC 60320-C14 / 9-Pin D-Sub	
Cooling	Built in Fan Cooling	
<b>OPTIONAL:</b> Digital Monitor & Control FWD, REV, VSWR, GAIN, ALC, V & I, TEMP	Ethernet RJ-45 TCP/IP, RS422/485 Optional GPIB Interface	Remote Bluetooth application

## Applications

- Test and Measurement
- Electronic Warfare
- Radar
- Broadband Jamming
- Public Safety

## Quality & Certifications

- AS9100 Rev C
- ISO9001:2008
- Mil-STD-790 Certificate
- RoHS compliance
- Conflict Minerals Compliant



MtronPTI SSHA Products: <http://www.mtronpti.com>

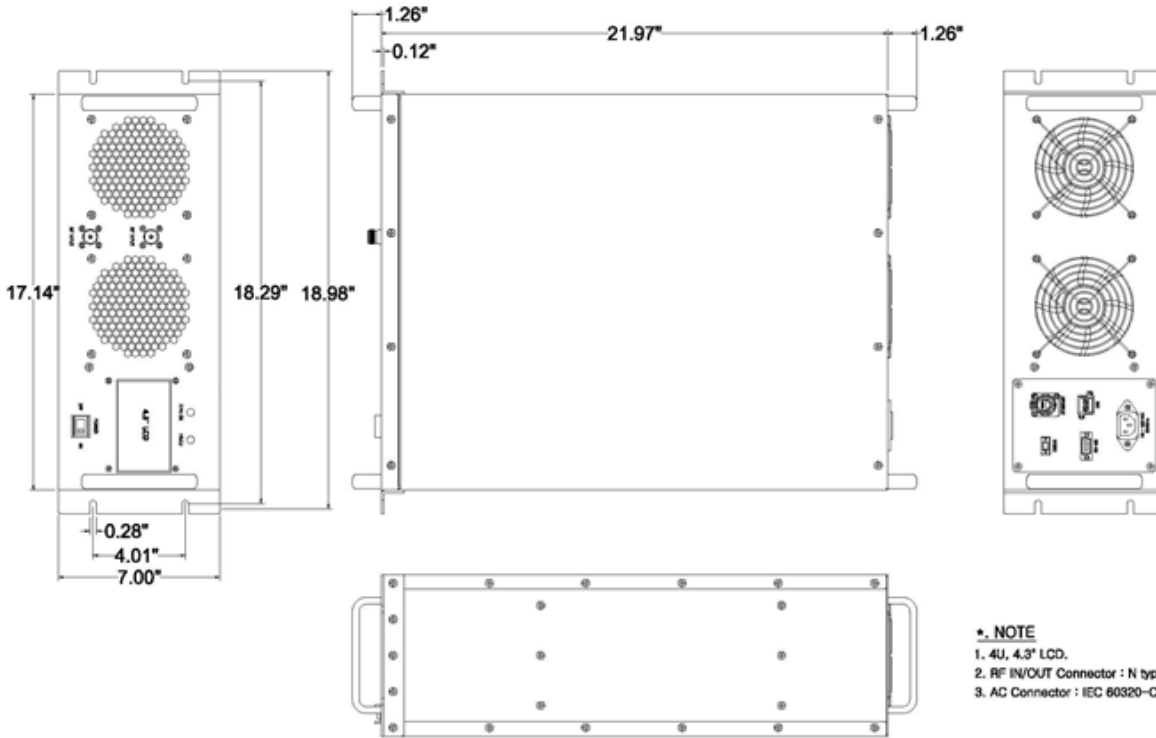


# Connect with MtronPTI

[mtronpti.com](http://mtronpti.com)

## Orlando

2525 Shader Rd  
Orlando, FL 32804 USA  
Phone: 407-298-2000  
Fax: 407-293-2979



- \*. NOTE**
1. 4U, 4.3" LCD.
  2. RF IN/OUT Connector : N type Female
  3. AC Connector : IEC 60320-C14

**Experienced**  
MtronPTI continues nearly fifty years of service to aerospace, defense communication and control, Internet and mobile infrastructure, lab and field instrumentation EMs.

### Vertically integrated

MtronPTI provides High reliability, High Power Solid State Power Amplifier solutions for demanding applications. Our design and manufacturing capabilities cover 50KHz to 47GHz frequency range with power levels of 1W to 4kW for CW & Pulse application modules and over 10kW for such systems. Synergy between our engineering manufacturing- from concept, simulation, electrical & mechanical layouts to assembly & testing capabilities allow for quick engineering & manufacturing responses to customer requests.

### One-on-one technical relationships

Each project is unique in design, environmental, schedule and cost requirements. MtronPTI engineers work with your designers to select the best approach. Six sigma and AS9100 Rev C quality systems ensure reliable solutions.

### Long term support

MtronPTI uses Rapid Process Feedback, Lean Manufacturing and Demand Flow Technology for right product, right time, on specification. MtronPTI also manages the supply chain: aligning forecasts, qualifying purchased component suppliers and working with distributors, hubs and portals to make sure every time the production line reaches for an MtronPTI part, it'll be there.

