

AMP20042 SOLID STATE HIGH POWER AMPLIFIER

FEATURES

Designed for EMI/RFI, lab, CW/Pulse and all EW communication applications
 Small form factor, rack mounted system
 Class A/AB Linear design
 High Power Advanced technology devices
 Instantaneous ultra-wide bandwidth
 Built-in protection circuits, with extensive monitoring
 Local LCD & remote flexible interfaces
 High efficiency, with unprecedented reliability and ruggedness
 LEGACY PN: AMP2042



ELECTRICAL SPECIFICATIONS

Parameter	Specification	Notes
Operating Frequency Range	500 - 3000 MHz	
Power Output	25 Watt Min	CW
Power Gain	44 dB Min	
Power Gain Flatness	3.0 dB p-p Max	
Input Return Loss	-10 dB Min	Relative to 50 Ohm
2-Tone Intermodulation (IMD)	-30 dBc Typ	34dBm/Tone, $\Delta = 1\text{MHz}$
Harmonics	-20 dBc Typ	At rated Pout
Non-Harmonics Spurious	-60 dBc Max	
Operating Voltage	100 - 240 VAC	
Power Consumption	200 Watt Max	At rated output
Input Power Protection	+10 dBm Max ¹	
Load VSWR Protection	4 : 1: Max ²	Foldback @ preset limit

¹ Units with optional digital monitor and control, for basic units <10 Sec without damage

² Units with optional digital monitor and control, for basic units <1 minute at rated Pout

ENVIRONMENTAL CHARACTERISTICS

Parameter	Specification	Notes
Operating Ambient Temperature	0 to +50 °C	
Storage Temperature	-40 to +85 °C	
Relative Humidity	up to 95 %	Non Condensing
Altitude	3000 meters	
Shock & Vibration	Normal transport ³	

³ MIL Spec available for quotation

MECHANICAL SPECIFICATIONS

Parameter	Specification	Notes
Dimensions W x H x D (with Option DMC)	430 x 133.3 x 560 mm	3U, excluding handles
Dimensions W x H x D (Benchtop)	210 x 100 x 300 mm 242 x 110 x 384 mm	Excluding brackets Including brackets
Weight	(2U/9 kg.) (3U/12kg.)	
RF Conn. In / Out / Sample	N-Female	Front or rear panel
Interface Connector	9-Pin D-Sub	Rear panel
AC Power	IEC 60320-C14	Or equivalent
Cooling	Built in Fan Cooling	Variable speed
OPTIONAL: Digital Monitor & Control (DMC ⁴) FWD, REV, VSWR, GAIN, ALC, V & I, TEMP, Optional Safety Interlock (INT)	Ethernet RJ-45 TCP/IP, RS422/485, USB Optional GPIB Interface Open=STBY/Short=RFON	IEEE rear panel BNC-F rear panel

⁴ Option DMC - LCD Controller option may reduce output power by 0.5 dB typical. Please consult the factory for more information.

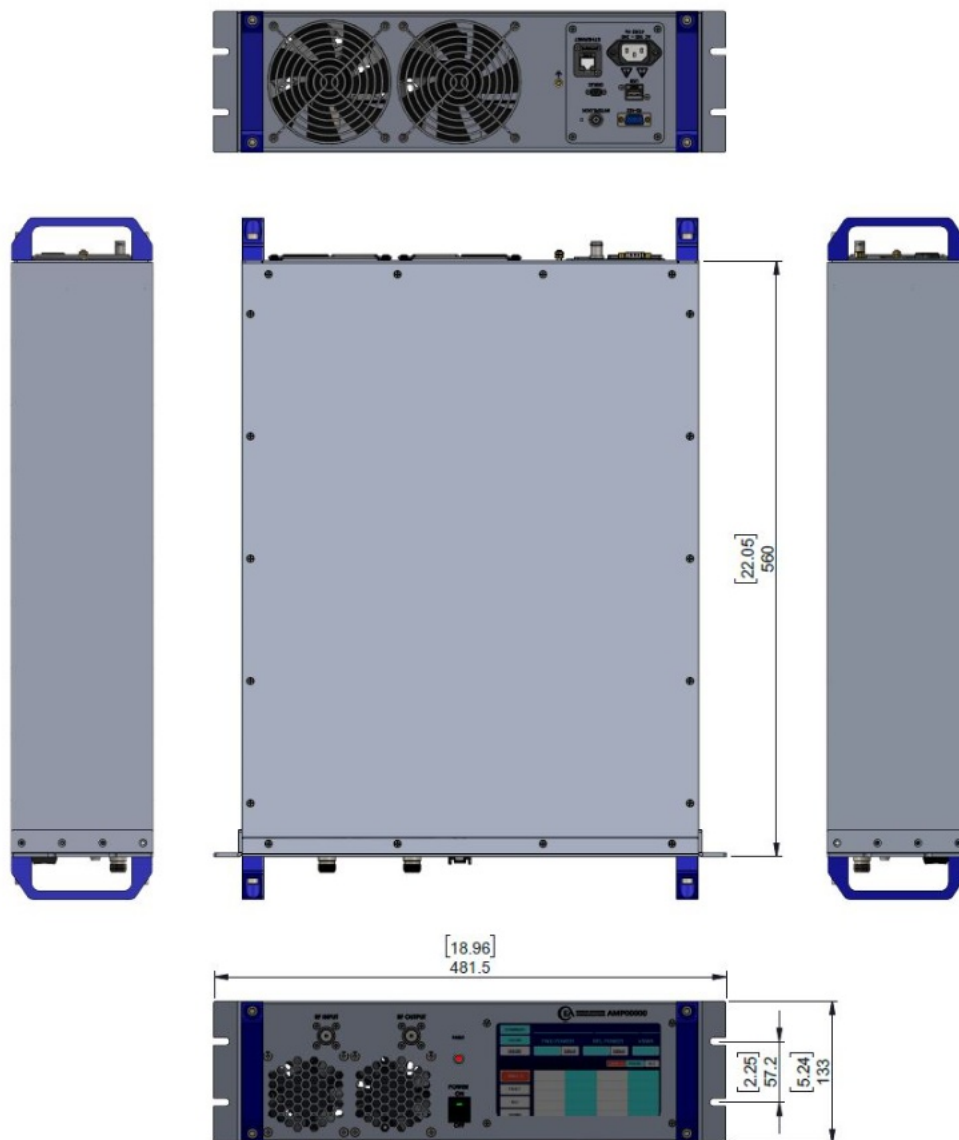
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AVAILABLE SPECIAL OPTIONS

Parameter	Specification	Notes
Option FRS: Forward RF Sample	-40dB, Type N-Female	Front or rear panel
Option RRS: Reflected RF Sample	-40dB, Type N-Female	Front or rear panel
Option GPIB: GPIB remote control	GPIB IEEE-488 Remote capability	
Included CPM: Calibrated Power Monitoring (With purchase of Option DMC)	Offset correction entry for +/- 0.2dB accuracy	11-points standard ⁵

⁵ Consult with factory if additional points would be required.

OUTLINE DRAWING 3U-SHOWN WITH OPTIONAL LCD DIGITAL CONTROLLER



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OUTLINE DRAWING
2U, Benchtop (No display with DMC)

