

AMP2120-3 SOLID STATE HIGH POWER AMPLIFIER

FEATURES

Designed for EMI/RFI, lab, CW/Pulse and all 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



ELECTRICAL SPECIFICATIONS: 50Ω, 25°C

Parameter	Specification	Notes
Operating Frequency Range	1.0 - 18.0 GHz	
Power Output @ Psat	20 Watt Min / 25 Watt Typ	CW or Pulse
Power Output @ P1dB	8 Watt Typ	
Power Gain	43 dB Min	0dBm or less for rated Pout
Power Gain Flatness	4.0 dB p-p Max	Constant input power
Gain Adjustment Range	>20 dB Typ	Local or remote capable
Input Return Loss	-10 dB Max	
2-Tone Intermodulation (IMD)	-30 dBc Typ	33dBm/Tone, Δ = 1MHz
Harmonics	-20 dBc Typ	At rated Pout
Non-Harmonic Spurious	-60 dBc Max	Non-harmonics
Operating Voltage	100 - 240 VAC	47 - 63Hz
Power Consumption	500 Watt Max	At rated Pout
Input Power Protection	+10 dBm Max ¹	
Load VSWR Protection	4 : 1: Max ²	Foldback @ preset limit
Sample Port (optional)	-40 dB	N-Female

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	481 x 133 x 560 mm	3U, excluding handles
Weight	20 Kg. Max	
RF Connectors Input / Output / Sample	N-Female	Front or rear panel
AC Power / Interface Connector	IEC 60320-C14 / 9-Pin D-Sub	Or equivalent (rear panel)
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 up to -0.5dB

e

AMP2120-3 SOLID STATE HIGH POWER AMPLIFIER

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	10-points standard ⁵

⁵ Consult the factory if additional points are required.

OUTLINE DRAWING SHOWN WITH OPTIONAL LCD DIGITAL CONTROLLER

