

# PA2500M LOW NOISE BROADBAND AMPLIFIER

#### MULTIPLE APPLICATIONS

Electromagnetic Compatibility (EMC) testing Instrumentation Antenna field measurements Communication systems

- **BROADBAND PERFORMANCE**30 dB of flat gain from 1 MHz to 2.5 GHz
- OPTIONAL BUILT-IN BATTERY
   More than 20 hours of operation in the field
- READY FOR THE TOUGHEST ENVIRONMENT Wide operating temperature range. IP65 / IP60 compliant



The **PA2500M** low noise broadband amplifiers by **The EMC Shop** offer exceptional performance at a very competitive price. Covering a bandwidth of more than 11 octaves, they provide outstanding flatness, 30 dB of gain, very low noise figure, and an optional built-in battery for more than 20 hours of field operation.

These amplifiers are ideal for Electromagnetic Compatibility (EMC) testing and certification. The low noise figure and high gain of the **PA2500M** permits the visualization of signals that would otherwise appear below the noise floor in a radiated emissions test.

Designed and manufactured in the U.S.A., the **PA2500M** conforms to the European RoHS requirements and is ECCN EAR99.

### ELECTRICAL SPECIFICATIONS (VALID OVER THE ENTIRE TEMPERATURE RANGE)

	PA2500MA (external dc power)			PA2500MB (internal battery)			UNIT
	Min	Тур	Max	Min	Тур	Max	
Frequency range	1		2500	1		2500	MHz
Gain	30	31.5	33	30	31.5	33	dB
Input & output impedance		50			50		ohm
Input VSWR			2:1			2:1	dB
Output VSWR			2:1			2:1	dB
P1dB	15	20	21	15	20	21	dBm
Noise figure > 50 MHz	1.5	2.2	3.5	1.5	2.2	3.5	dB
Non-harmonic spurious			-70			-70	dBc
Operating supply voltage	8	12	15	15	16.5	18	V dc
Current consumption (depends on dc voltage and battery charge level)		150		65 (15 V)		550 (15 V)	mA
ESD & transient protection	Yes, RF input, RF output and DC						
Reverse polarity protection	Yes, non destructive						
Maximum input/ reverse output power			17			17	dBm
Maximum input/output dc voltage			10			10	V dc

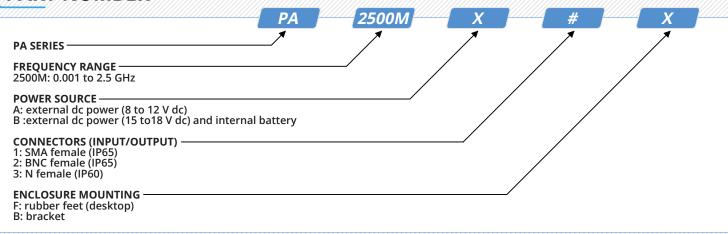
## MECHANICAL AND ENVIRONMENTAL SPECIFICATIONS

	PA2500MA (external dc power)	PA2500MB (internal battery)	UNIT			
Operating temperature	-30 to 85	0 to 50	°c			
DC supply connector	Waterproof circular connector with threaded lock					
Dimensions (excl. connectors and feet)	W: 4.25 (108.0), H: 2.31 (58.61), D: 6.73 (171.0) no bracket; 7.52 (191.0) with bracket					
Weight	1.45 (0.65)	2.5 (1.1)	lb (kg)			
IP rating	IP65 with BNC and SMA connectors / IP60 with N connect					

## **ACCESSORIES**

External ac adaptor: 90 to 264 V ac, 47 to 63 Hz; European and US plugs; CE and UL approved.

## PART NUMBER



#### LOW NOISE BROADBAND AMPLIFIER PA2500M

## Typical Measured Performance at 25 °C

