

rf/microwave instrumentation

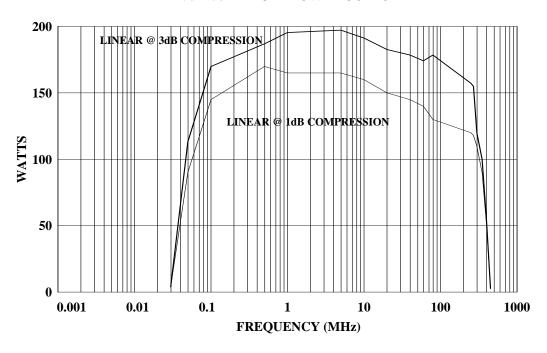
Model 150A250, M1 through M6 150 Watts CW

The Model 150A250 amplifier is a self-contained, broadband unit designed for laboratory applications where instantaneous bandwidth, high gain and moderate power output are required. Utilization of push-pull MOSFET circuitry lowers distortion, improves stability and allows operation into any load impedance without damage. The Model 150A250, when used with an RF sweep generator, will provide a minimum of 150 watts of swept power.

There is a digital display on the front panel to indicate the operate status and fault conditions when an over temperature, power supply, or amplifier fault has occurred. The unit can be returned to operate when the condition has been cleared. The 150A250 includes digital control for both local and remote control of the amplifier. This 8-bit RISC microprocessor controlled board provides both IEEE-488 (GPIB) and asynchronous, full duplex RS-232 control of all amplifier functions.

Housed in a stylish, contemporary enclosure, the Model 150A250 provides readily available RF power for typical applications such as RF susceptibility testing, antenna and component testing, watt meter calibration, and use as a driver for higher power amplifiers.

150A250 TYPICAL POWER OUTPUT



SPECIFICATIONS, MODEL 150A250

RATED POWER OUTPUT	150 watts minimum
INPUT FOR RATED OUTPUT	1.0 milliwatt maximum
POWER OUTPUT @ 3Db COMPRESSION Nominal	155 watts
FLATNESS	± 1.5 dB maximum
FREQUENCY RESPONSE	100 kHz – 250 MHz instantaneously
GAIN	52 dB minimum
GAIN ADJUSTMENT RANGE	20 dB minimum
INPUT IMPEDANCE	50 ohms, VSWR 1.5:1 maximum
OUTPUT IMPEDANCE	50 ohms, VSWR 2.0:1 maximum
MISMATCH TOLERANCE*	100% of rated power without foldback. Will operate without damage or oscillation with any magnitude and phase of source and load impedance. See Application Note #27
MODULATION CAPABILITY	Will faithfully reproduce AM, FM, or pulse modulation appearing on the input signal
HARMONIC DISTORTION	Minus 20 dBc maximum at 120 watts
THIRD ORDER INTERCEPT POINT	58 dBm typical
PRIMARY POWER	90-135/180-270 VAC auto ranging 47-63Hz, single-phase. 1000 watts maximum
REMOTE INTERFACES	IEEE-488, RS-232
CONNECTORS RF input RF output Remote Control IEEE-488	Type N female
RS-232	·
COOLING	Forced air (self contained fans)
REMOTE INTERLOCK	15 pin subminiature D
WEIGHT, maximum	See Model Configuration
SIZE (WxHxD)	See Model Configuration

MODEL CONFIGURATION

Model Number	RF Input	RF Output	Weight	Size (W x H x D)	
150A250	Type N Female, front	Type N Female, front	31.75kg (70lb)	50.3 x 25.2 x 46.06cm	
				19.8 x 9.9 x 18.1in	
150A250M1	Type N Female, rear	Type N Female, rear	31.75kg (70lb)	50.3 x 25.2 x 46.0cm	
				19.8 x 9.9 x 18.1in	
150A250M2	Same as 150A250 without enclosure for rack mounting		22.15kg (49.0lb)	48.3 x 22.25 x 43.2cm	
		-		19 x 8.75 x 17in	
150A250M3	Same as 150A250M1 without enclosure for rack mounting		22.15 (49.0lb)	48.3 x 22.25 x 43.2cm	
				19 x 8.75 x 17in	
150A250M4 T _y	Type N Female, front	Type N Female, rear	31.75kg (70lb)	50.3 x 25.2 x 46.06cm	
			- , ,	19.8 x 9.9 x 18.1in	
150A250M5	See Individual Specification Sheet				
150A250M6	Same as 150A250M4 without enclosure for rack mounting				