



160 School House Road, Souderton, PA 18964-9990 USA
Phone 215-723-8181 • FAX 215-723-5688

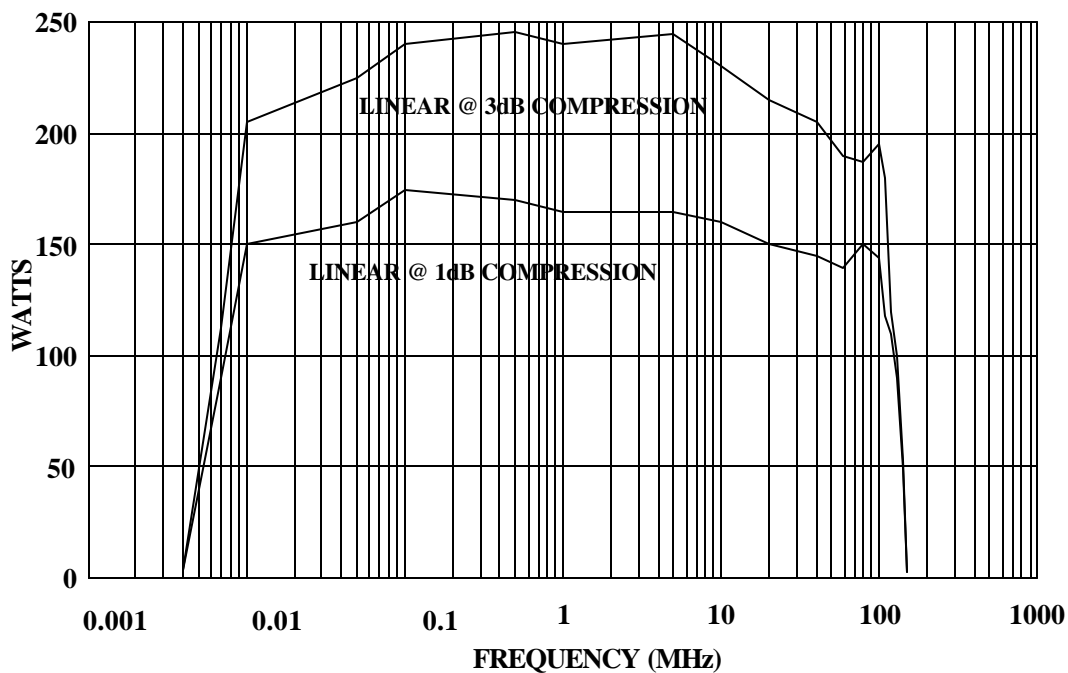
MODEL 150A100B
M1, M2, M3, M4
150 WATTS CW
10 kHz - 100 MHz

The Model 150A100B 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 150A100B, 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 150A100B 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 150A100B 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.

150A100B TYPICAL POWER OUTPUT



SPECIFICATIONS
Model 150A100B

RATED POWER OUTPUT.....150 watts

INPUT FOR RATED OUPUT.....1.0 milliwatt maximum

POWER OUTPUT @ 3db COMPRESSION

Nominal.....220 watts

Minimum.....180 watts

POWER OUPUT @ 1db COMPRESSION

Nominal.....155 watts

Minimum.....125 watts

FLATNESS.....± 1.5 dB maximum

FREQUENCY RESPONSE10 kHz - 100 MHz instantaneously

GAIN52 dB minimum

GAIN ADJUSTMENT RANGE.....18 dB minimum

INPUT IMPEDANCE50 ohms, VSWR 1.5:1 maximum

OUTPUT IMPEDANCE50 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.

MODULATION CAPABILITY..... Will faithfully reproduce AM, FM, or pulse modulation appearing on the input signal

NOISE FIGURE (above 1.0 MHz).....6 dB typical

HARMONIC DISTORTION.....Minus 20 dBc maximum at 125 watts

THIRD ORDER INTERCEPT POINT58 dBm typical

PRIMARY POWER90-135/180-270 VAC auto ranging 47-63Hz, single-phase.
1000 watts maximum

REMOTE INTERFACES..... IEEE-488, RS-232

CONNECTORS

RF..... See Model Configurations

REMOTE CONTROL

IEEE-488..... 24 pin male

RS-232 9 pin Subminiature D (male)

REMOTE INTERLOCK 15 Pin Subminiature D

COOLING..... Forced air (self contained fans)

MODEL CONFIGURATIONS

MODEL NUMBER	RF INPUT	RF OUTPUT	WEIGHT	SIZE (WxHxD)
150A100B	Type "N" female on front panel	Type N female on front panel	31.75 kg (70.0 lb)	50.3 x 25.2 x 46.0 cm 19.8 x 9.9 x 18.1 in
150A100BM1	Type "N" female on rear panel	Type N female on rear panel	31.75 kg (70.0 lb)	50.3 x 25.2 x 46.0 cm 19.8 x 9.9 x 18.1 in
150A100BM2	Same as 150A100B with enclosure removed for rack mounting		22.15 kg (49.0 lb)	48.3 x 22.25 x 43.2 cm 19.0 x 8.75 x 17 in
150A100BM3	Same as 150A100BM1 with enclosure removed for rack mounting		22.15 kg (49.0 lb)	48.3 x 22.25 x 43.2 cm 19.0 x 8.75 x 17 in
150A100BM4	Same as 150A100B and harmonic distortion is -25 dBc at 100 watts		31.75 kg (70.0 lb)	50.3 x 25.2 x 46.0 cm 19.8 x 9.9 x 18.1 in

* See Application Note #27