



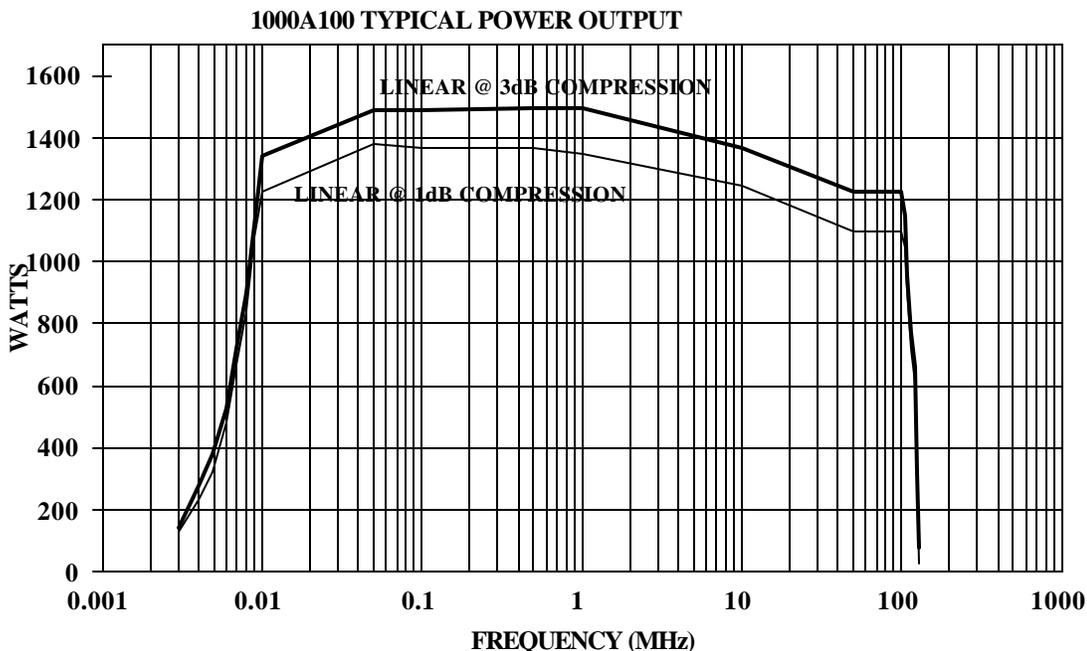
160 School House Road, Souderton, PA 18964-9990 USA  
Phone 215-723-8181 • FAX 215-723-5688

**MODEL 1000A100**  
**M1, M2, M3, M4, M5, M6**  
**1000 WATTS CW**  
**10kHz - 100MHz**

The Model 1000A100 is a self-contained, air cooled, broadband, completely solid state amplifier designed for applications where instantaneous bandwidth and high gain are required. Push-pull MOSFET circuitry is utilized in all high power stages in the interest of lowering distortion and improving stability. The Model 1000A100, when used with an RF sweep generator, will provide a minimum of 1000 watts of swept power.

Special features incorporated into the Model 1000A100 include a front panel power meter for monitoring forward and reflected power, and a internal/external Automatic Level Control (ALC) sensing capability , with front panel control of the ALC threshold. Further features include pulse input capability, RF output level protection, and an internal RF detector which provides an output for use in self-testing or operational modes. Also included is a front panel gain control which permits the operator to conveniently set the desired power output level. Protection is provided by DC current level sensing and individual fusing of all output stages. Computer control is available using the remote control capability provided by our CP2001 and CP3000 accessories. High efficiency switching power supplies provide DC to the high power amplifiers.

Housed in a stylish, contemporary enclosure, the Model 1000A100 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.



**SPECIFICATIONS**  
**Model 1000A100**

**RATED OUTPUT POWER**.....1000 watts

**INPUT FOR RATED OUTPUT**.....1.0 milliwatt maximum

**POWER OUTPUT @ 3dB COMPRESSION**  
*Typical*.....1250 watts  
*Minimum* .....1100 watts

**POWER OUTPUT @ 1dB COMPRESSION**  
*Typical*.....1100 watts  
*Minimum* .....1000 watts

**FREQUENCY RESPONSE**.....10 kHz - 100 MHz instantaneously

**GAIN (at maximum setting)** .....60 dB minimum

**FLATNESS**..... $\pm 1.5$  dB maximum  
 $\pm 0.5$  dB with internal leveling

**GAIN ADJUSTMENT (continuous range)**.....18 dB minimum

**INPUT IMPEDANCE**.....50 ohms, VSWR 1.5:1 maximum

**OUTPUT IMPEDANCE**.....50 ohms, VSWR 2.5:1 maximum

**MISMATCH TOLERANCE**.....Will operate without damage, or oscillation with any magnitude and phase of source and load impedance.  
100% of rated power without foldback up to 6.0:1 mismatch, above which may limit to 500 watts reflected power.  
May limit at rated output.

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

**HARMONIC DISTORTION**.....Minus 20 dBc maximum at specified minimum 1dB compressed power

**THIRD ORDER INTERCEPT POINT**.....68 dBm typical

**RF POWER METER**.....0 - 1200 watts full scale

**PULSE MODE GATING CHARACTERISTICS**  
*Signal (into 50 ohms)*.....+ 2.0 to 6.0 VDC  
*Rise Time*.....0.5 microseconds maximum  
*Fall Time* .....0.5 microseconds maximum  
*RF Rise/Fall Time*.....10 nanoseconds maximum

**PRIMARY POWER**.....See Model Configuration

**CONNECTORS**  
*RF*.....See Model Configuration  
*External Leveling Inputs*.....Type BNC female on front panel  
*Pulse Modulation Inputs*.....Type BNC female on front panel  
*Detected RF Output*.....Type BNC female on front panel  
*Remote Control*.....25 pin female subminiature D

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

**WEIGHT, maximum**.....150 kg (330 lb)

**SIZE (WxHxD)**.....56.1 x 149.9 x 58.4 cm  
22.1 x 59.0 x 23.0 in

**Model Configuration**

Model Number	Input Connector	Output Connector	Primary Power
1000A100	BNC female on front panel	Type "C" female on front panel	180-240VAC, 50-60Hz, single phase 6500 W Max
1000A100M1	BNC female on rear panel	7/16 female on rear panel	180-240VAC, 50-60Hz single phase 6500W max
1000A100M2	BNC female on rear panel	Type "C" female on rear panel	180-240VACm 50-60Hz, single phase
1000A100M3	BNC female on front panel	Type "C" female on front panel	400VAC, 50-60Hz, 3 phase, 5 wire, WYE connected, 6500W max
1000A100M4	BNC female on front panel	Type "C" female on front panel	208VAC, 50-60Hz, 3 phase, Delta connected, 6500W max
1000A100M5	BNC female on rear panel	Type "C" female on rear panel	400VAC, 50-60Hz, 3 phase, 5 wire, WYE connected, 6500W max
1000A100M6	BNC female on rear panel	Type "C" female on rear panel	208VAC, 50-60Hz, 3 phase, Delta connected, 6500W max