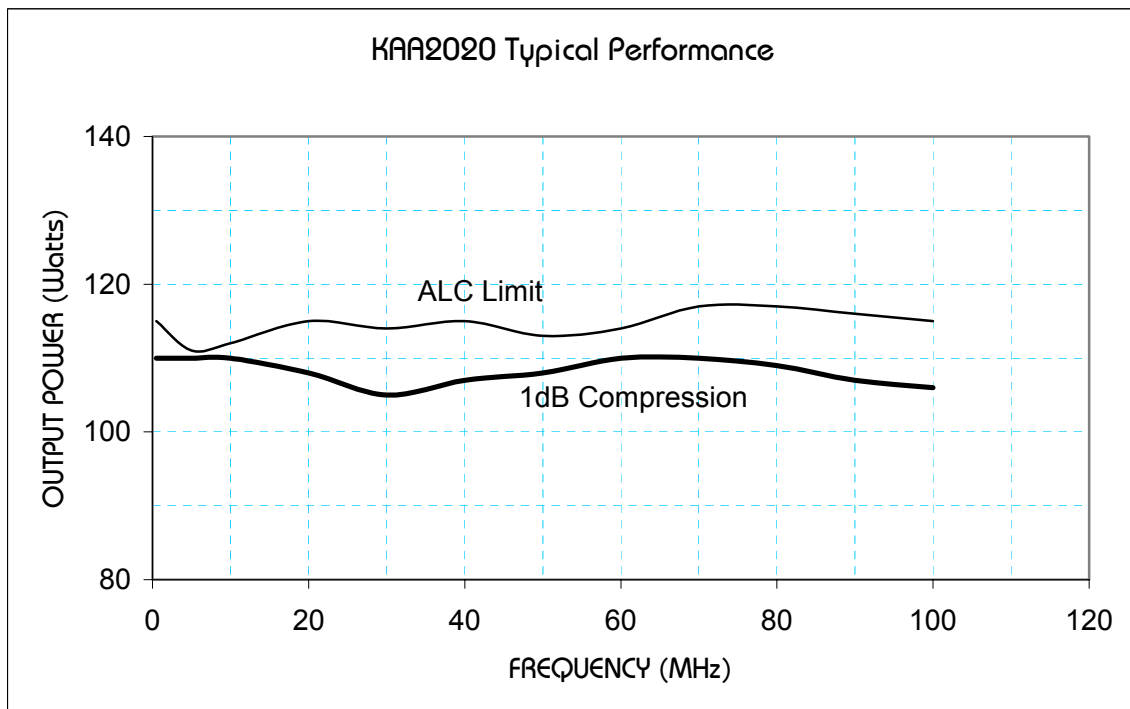


**MODEL KAA2020**  
**100 WATTS CW**  
**500 kHz - 100 MHz**

The Model KAA2020 is a Class AB wideband RF power amplifier delivering in excess of 100 Watts CW power into a 50-Ohm load over the frequency range of 500 kHz to 100 MHz. Power gain is a minimum of 50 dB. GPIB control requires the optional IEEE488.2/RS232 Interface Controller Module.

The system features forward and reflected power indication on a front panel-mounted, analog meter; Automatic Level Control (ALC); RF gain control; overdrive protection; full VSWR protection; input blanking, and over-temperature protection. On the basic model these features, plus remote power on/off control, are accessible for hard-wire remote operation through a 25-pin, D-subminiature connector. For a detailed description of these features refer to "SPECIAL FEATURES – KAA & KAW-SERIES SINGLE BAND RF POWER AMPLIFIERS".

The Model KAA2020 is a 19-inch rack-mount unit, 7 inches high and 20 inches deep. Construction is completely modular; all subassemblies are readily removable. Forced-air cooling is by a highly reliable, tube-axial fan mounted on the rear panel. The amplifier operates from 95-132 or 187-265 V<sub>AC</sub>, 47-63 Hz line. The system may be placed in 'stand-by' mode with the BLANKING switch, which greatly reduces energy consumption and heat generation.



**SPECIFICATIONS**  
**Model KAA2020**

RATED POWER OUTPUT .....	100 Watts
INPUT FOR RATED OUTPUT .....	1.0 mW maximum
POWER OUTPUT @ 1dB COMPRESSION .....	100 Watts minimum
FLATNESS .....	± 2.0 dB maximum unleveled, ± 0.5 dB leveled
FREQUENCY RESPONSE .....	500 kHz - 100 MHz instantaneously
GAIN .....	50 dB minimum
GAIN ADJUSTMENT RANGE .....	20 dB typical
INPUT IMPEDANCE .....	50 Ohm nominal
OUTPUT IMPEDANCE .....	50 Ohm nominal
MISMATCH TOLERANCE .....	infinite
PROTECTION .....	VSWR, over-temperature, overdrive
MODULATION CAPABILITY .....	Will faithfully reproduce AM, FM, or pulse modulation appearing on the input signal
HARMONIC DISTORTION .....	-10 dBc maximum
SPURIOUS OUTPUTS .....	-70 dBc maximum
FRONT PANEL METER .....	0 - 100 Watt forward power, top scale % limit SET point reflected power, bottom scale
CONTROLS .....	[AC LINE]ON/OFF, [RF CTRL]ON/OFF (blanking) [METER]FLWD/REFL [ALC]FAST/SLOW (Autom. Level Control) [VSWR]RESET MAN/AUTO, ALC, RF GAIN
INDICATORS .....	SYSTEM, BLANKING, [METER]MODE, [ALC] MODE, VSWR, TEMP, REMOTE ACTIVE
REMOTE INTERFACE (optional) .....	IEEE-488.2 & RS-232
RF CONNECTORS .....	Type N female
REMOTE CONTROL .....	IEEE488.2: 24-pin female, RS-232: 25-pin D-Subminiature female
REMOTE INTERLOCK .....	BNC female
OPERATING TEMPERATURE .....	-10 to 40 °C
COOLING .....	Forced air (self contained fans)
PRIMARY POWER .....	95 - 265 V <sub>r</sub> , 47 - 63 Hz, 700 VA maximum
SIZE (W x H x D) .....	48.3 x 17.8 x 50.8 cm, 19 x 7 x 20 in.
WEIGHT .....	17.7 kg, 39 lb.

**MODEL CONFIGURATIONS**

MODEL NUMBER	OPTIONS
KAA2020	Standard
KAA2020M1	IEEE488.2/RS232