

The RF Line
Integrated
Power Amplifier

... designed for wideband linear applications in the 1.0 to 200 MHz frequency range. Contains an all hybrid amplifier module — Motorola's own proven reliable circuitry, used in millions of operating units over twenty years — utilizing Motorola's class A transistors. Designed for high reliability with such standard features as a high-quality power supply, EMI/RFI filter, stainless steel hardware and many MIL-STD components. Each unit undergoes 24-hour burn-in prior to final test and Q/A.

- All Class "A"
- Operates from 115 Vac Power Source
- Frequency Range — 1.0 to 200 MHz
- Output Power — 3.1 Watts Minimum
- Gain — 35 dB Typ
- Linearity — +53 dBm Typ ITO
- Noise Figure — 5.0 dB Typ @ f = 100 MHz
- 50 Ohm Input/Output Impedance
- Heavy Duty Machined Housing
- Forced Air Cooling
- Thermally Protected
- 220 Vac Model Available, P/N PAE0200-34-3.1L

PAA0200-34-3.1L

4.0 WATTS
1.0-200 MHz
LINEAR POWER
AMPLIFIER



CASE 389R-01, STYLE 1

ELECTRICAL CHARACTERISTICS

Symbol	Characteristics	Test Conditions	Min	Typ	Max	Unit
P_g	Power Gain	f = 100 MHz	33.5	35	36.5	dB
f_r	Frequency Response	f = 1.0-200 MHz	—	± 1.0	± 1.5	dB
P_{o1dB}	Power Output, 1.0 dB Compression	f = 100 MHz f = 200 MHz	3.1 2.5	4.0 3.1	— —	W
NF	Noise Figure	f = 100 MHz f = 200 MHz	— —	5.0 6.0	6.5 7.5	dB
ITO	Third Order Intercept Point	f = 100 MHz f = 200 MHz	+ 51 + 46	- 53 - 48	— —	dBm
VSWR	Input (Ref. = 50 Ω) Output (Ref. = 50 Ω)	f = 1.0-200 MHz f = 1.0-200 MHz	— —	1.5:1 1.5:1	2.0:1 2.0:1	—
VSWR Load	VSWR Survival	$P_o = 3.0$ W f = 1.0-200 MHz	—	—	30:1	—
P_{in}	AC Input	$V_{in} = 115$ Vac, 1.0ϕ, 60 Hz	—	50	60	W