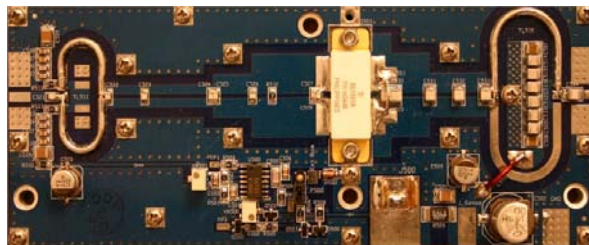


Solid State Broadband High Power Pallet Amplifier

470-860 MHz – 50W

The RPAP470860M50 is a 50W pallet amplifier for the 470-860 MHz band. This linear Class AB pallet amplifier features LDMOS transistors providing typical Peak-Sync output power of 75W. 50 Ohms input and output allows this pallet amplifier to be used as both an output PA with 75W of output power or as a driver with 30W of output power. Thermal tracking allows for superior performance in providing high gain, efficiency, and power in a small pallet footprint, making this ideal for television applications



Key Features:

- 50 Watts Class AB
- 75W Pk-Sync @ -54dBc IMD
- 30W Pk-Sync @ -60dBc IMD
- 13 dB Gain
- 16 Watts (avg.) Digital Power out
- Selectable internal/external bias

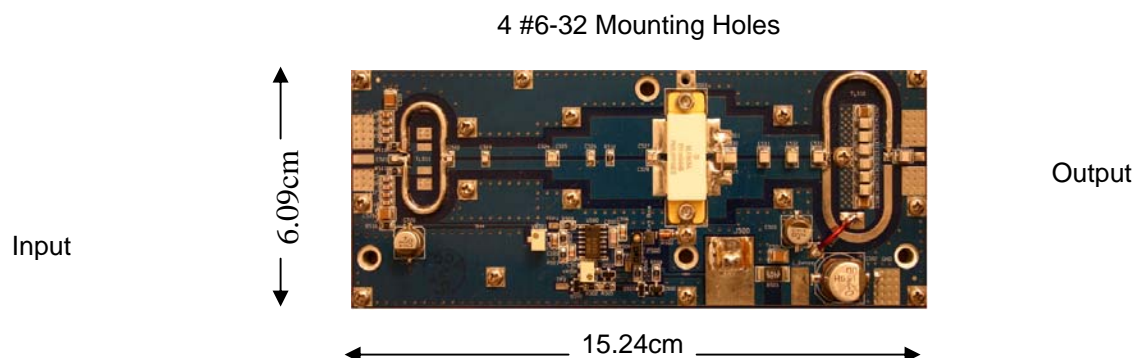
Absolute Maximum Ratings:

Parameters	Value
Supply Voltage	+34 Vdc
Bias current	2.0 Amp
Drain Current	12 Amp
Load Mismatch All Phase angles	3:1
Baseplate Temp	+70° C
Storage Temp	-40° - +105° C

Electrical Specifications: (V_{supply} = +28Vdc, I_{dq} = 1.0A, T_{BASE} = 25° C)

Parameter	Min	Typ	Max	Unit
Frequency	470		860	MHz
P _{out} P1dB	125	150		Watts
Linear Power Out, Pk-Sync	50	75		Watts
Gain	12	13		dB
Power In		2.5	4.0	mW
Drain current, P _{out} = 10W Pk-Sync		10		Amps
Input VSWR			3:1	
2 nd Harmonic		-20		dBc
3 rd Harmonic		-35		dBc
Baseplate Operating Temp	0		+70	°C

Reference Circuit



Dimensions: 6.09cm x 15.24cm x 2.54cm, 2.4" x 6.0" x 1.0"

Reference circuit size (not to scale)

Ordering Information

Part Number	RPAP470860M50
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Richardson Electronics
40W267 Keslinger Road
P.O. Box 393
LaFox, IL 60147
Telephone: (800) 737- 6937
(630) 208-3637
Fax: (630) 208-2550
Internet: rfwireless.rell.com
E-Mail: rlc@rell.com

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