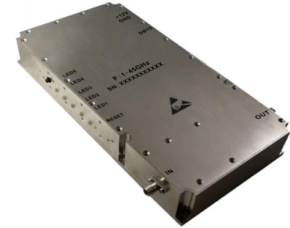




Wide Band Power Amplifier 1GHz~45GHz

Features

- Gain: 33dB Typical
- Saturated Output Power: 30dBm Typical
- Supply Voltage: +15V
- 50 Ohm Matched Input / Output
- Size:



Typical Applications

- Wireless Infrastructure
 - Military & Aerospace
 - Fiber Optics
- RF Microwave & VSAT
Test Instrument

Parameter	Min.	Typ.	Max.	Min.	Typ.	Max.	Units
Frequency Range	1-30		30-45				GHz
Gain		35			30		dB
Gain Flatness		±4			±7		dB
Gain Variation Over Temperature (-45 ~ +85)		±3			±3		dB
Input Return Loss		10			8		dB
Output Return Loss		12			8		dB
Output 1dB Compression Point (P1dB)		29			26		dBm
Saturated Output Power (Psat)		30			27		dBm
Isolation S12		-65			-65		dB
Supply Current (Vcc=+15V)		600	800		600	800	mA
Input Max Power (No damage)	Psat – Gain						dBm

Weight		Impedance	50ohms
Input / Output Connectors	2.92-Female	Material	Aluminum/copper
Finish	Standard: Gold 40 micron; Nickel 220 micron thickness	Package Sealing	Epoxy Sealing (Standard)
	Option: Gold 80 micron; Nickel 180 micron thickness		Hermetically Sealed (Option with extra charge)



Absolute Maximum Ratings

Supply Voltage	+18V
RF Input Power (RFIN)	Psat-Gain

Biasing Up Procedure

Step 1	Connect Ground Pin
Step 2	input and output with 50 Ohm source/load. (in band VSWR<1.9:1 or >10dB return loss)
Step 3	Connect +15V biasing

Power OFF Procedure

Step 1	Turn off +15V biasing
Step 2	Remove RF connection
Step 3	Remove Ground Pin

Environmental Specifications

Operational Temperature	-45°C~+85°C
Storage Temperature	-55°C~+125°C
Altitude	30,000 ft. (Epoxy Sealed Controlled environment)
	60,000 ft. 1.0psi min (Hermetically Sealed Un-controlled environment) (Optional)
Vibration	Acceleration Spectral Density 6 (m/s) Total 92.6 RMS
Humidity	100% RH at 35°C, 95%RH at 40°C
Shock	20G for 11msec half sine wave, 3 axis both directions

Outline Drawing:

All Dimensions in mm (inches)

