

DESCRIPTION

This class A GaAs module is designed for both military and commercial applications. It is capable of supporting any signal type and modulation format, including but not limited to 3-4G telecom, WLAN, OFDM, DVB, and CW/AM/FM. The latest device technologies and design methods are employed to offer high power density, efficiency, and linearity in a small, lightweight package.

**FEATURES**

Over / Under / Reverse Voltage Protection

High Speed On/Off Control

Temperature Output

Over Temp Shutdown

Forward Power Measurement

Reflected Power Measurement

Optional Heatsink

Specifications subject to change without notice. Typical performance at +12VDC at +25°C in a 50Ω system

RF / ELECTRICAL				
PARAMETER	MIN	TYP	MAX	UNIT
Operating Frequency	800		1000	MHz
P1dB Power Output	+36.0	+37.0		dBm
Gain	41.0	42.0		dB
Gain Flatness		0.0	1.0	dB
Linear Power		+30.0		dBm
Linear Power Test Conditions	W-CDMA @ -55 dBc ACPR			--
Input Return Loss	-14	-16		dB
Operating Voltage	+11		+13	VDC
Current Draw		1.0	2.0	A
Quiescent Current Draw		1.0		A
Switching Time		1.0	2.0	μS

MECHANICAL		
PARAMETER	VALUE	UNIT
Dimensions (L x W x H)	3.75 x 2.5 x 0.553	in
RF Connectors (Input / Output)	SMA-F / SMA-F	--
DC / Control Connector	Circular Locking	--
Cooling	Baseplate Conduction - Optional Heatsink Available	--
Mounting	4-40 Thru Holes	--
Weight	4	oz
Weight with heatsink	14	oz

ENVIRONMENTAL / PROTECTIONS			
PARAMETER	MIN	MAX	UNIT
Operating Temp. (Housing Temp.)	-40	+85	°C
Storage Temp Range	-60	+100	°C
Humidity Range	0-100		%
Altitude	0-30,000		ft.
Shock / Vibration	MIL-STD-810 and equivalents		--
Max RF Input	-2.0		dBm
Load VSWR @ P1dB	Open / Short Output Protection		--
PA Baseplate Shutoff Temperature	+90		°C

DC / CONTROL PINS		
PIN LABEL	NAME	DESCRIPTION
1	GND	Ground
2	TEMP	Temp Monitor: Temp in DegC = (Vout - 0.5V) / 10
3	Amp Enable	TTL On/Off Low=Enable, High=Disable
4	FWD	Forward Power Detection
5	REV	Reverse Power Detection
6	+VDC	Supply Voltage - Range Specified in Datasheet