

The AB026040G4040AC is a 10W high gain Solid State Broadband High Power Amplifier. This amplifier module utilizes the latest high power RF GaN transistors and also features built in control with protection functions to ensure high reliability. This amplifier is suitable for communications, automotive and EMC testing. The amplifier comes with an industry leading warranty.

**Features**

- 26.5GHz-40.0GHz frequency range
- Psat 41dBm type, 40 dBm min
- Power gain 44dB Type.
- Built-in control and protection circuits
- Solid-state Class AB Broadband design
- Ultra-broadband
- Portable
- High reliability and efficiency

**ELECTRICAL SPECIFICATIONS(T=25°C, Load VSWR ≤ 1.2)**

Description	Symbol	Min	Typ	Max	Unit
Operating Frequency	BW	26.5		40	GHz
Output Power CW@ Pin=-4 dBm	Psat	40	41		dBm
Power Gain @ Pin=-4dBm	Gp		40		dB
Power Gain Flatness @ Rated Pin=-4dBm	ΔGp		±0.5		dB
Small signal Gain @ Pin=-30dBm	G <sub>SS</sub>		55		dB
Small signal Flatness@1GHz	ΔG <sub>SS</sub>		± 1.5		dB
Small signal Flatness@K-band	ΔG <sub>SS</sub>		± 4.0		dB
Input Power for Rated Psat	P <sub>IN</sub>		-4	0	dBm
Harmonics @ Pin=-4dBm	2 <sup>nd</sup>			-20	dBc
Spurious Signals@ Pin=-4dBm	Spur			-55	dBc
Operating noise*	NF		N/A		dB
Input VSWR	VSWR <sub>i</sub>			2	N/A
Input VSWR	VSWR <sub>o</sub>			2	N/A
Operating Voltage	VAC	100	120	240	V
Current Consumption @ Pout= 10-15W	IDD		6		A

**Note\*:** contact our sales for further information.

**PROTECTION AND WARNING FUNCTION**

- Over-current protection
- Over-temperature protection
- Over-voltage protection

**MECHANICAL SPECIFICATIONS**

In built Heatsink  
 Length\* Width\*Height: 19 x 15 x 3.5 in  
 Weight: 30 lb  
 RF Connector Input: 2.92, Female  
 RF Connector Output: WR42

**ENVIRONMENTAL SPECIFICATIONS (Design to Meet)**

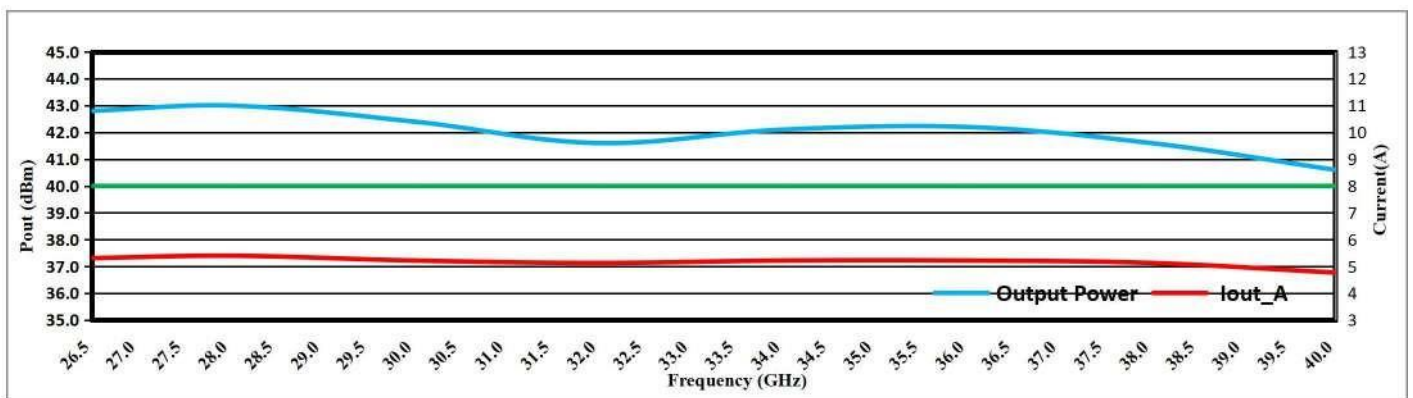
Module Operation Temperature* <sup>1</sup>	-20* <sup>1</sup>	+55	°C
Storage Temperature Range	-50	+70	°C
Relative-Humidity		95	%
Altitude* <sup>2</sup>	N/A		
Vibration/Shock* <sup>2</sup>	N/A		

**Notes** \*1: Module Operation Temperature can be extended to -40 ~+60°C, Contact Sales for update.  
**Notes** \*1: Should Supply Adequate Heat Dissipation, Enough Fan and Heat-Sink is necessary during the Temp Test.  
**Notes** \*2: Altitude /Vibration are designed with considerations, but without tests and experiments.

**LIMITS**

Input RF drive level without damage	$Pin \leq 0$	dBm
Load VSWR @ POUT = 10W	$VSWR \leq 5:1$ [Design To Meet]	N/A
Thermal Degradation	85°C @ heatsink	°C

**Typical Data Plots** (Temp: 25C, Load VSWR less than or equal to 1.2)



Output Power & Current (Pin: -4dBm)