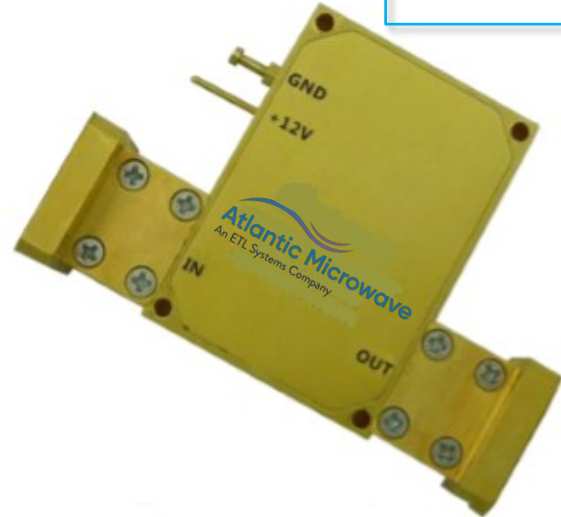


# Low Noise Amplifier

26.5-40GHz

- Radar Systems
- Communication Systems
- Receiver Systems



RF Parameters							
	Min.	Typ.	Max.	Min.	Typ.	Max.	Unit
Frequency Range	26.5		32	32		40	GHz
Gain	45	48		40	45		dB
Gain Flatness		±2.0			±3.0		dB
Gain Variation Over Temperature (-45C~+85C)		±2.0			±3.0		dB
Noise Figure		3.0	4.0		3.5	4.5	dB
Input VSWR		2.0			2.2		:1
Output VSWR		2.0			2.2		:1
Output Power for 1 dB Compression (P1dB)	18	21		16	19		dBm
Saturated Output Power (Psat)		23			20		dBm
OIP3		26			23.5		dBm
Isolation S12		-60			-60		dB
Supply Current (Idd) (Vcc=+12V)		420	500		420	500	mA

Physical Specifications			
Weight	60g	Impedance	50 ohms
Input / Output Connectors	WR28	Material	Copper
Finish	Standard: Gold 40 micron; Nickel 220 micron thickness	Package Sealing	Epoxy Sealing



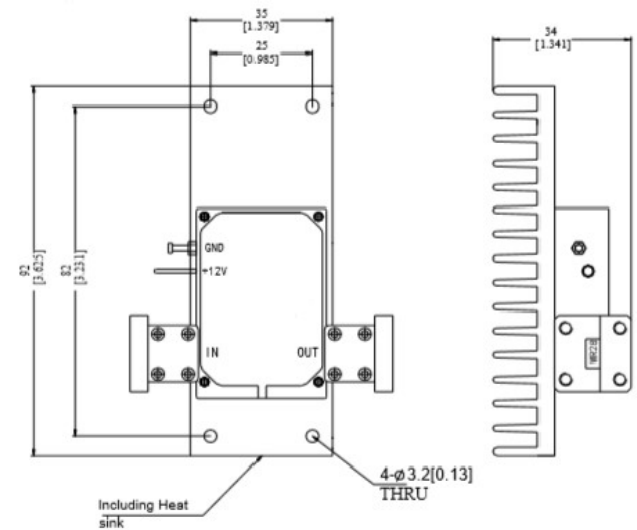
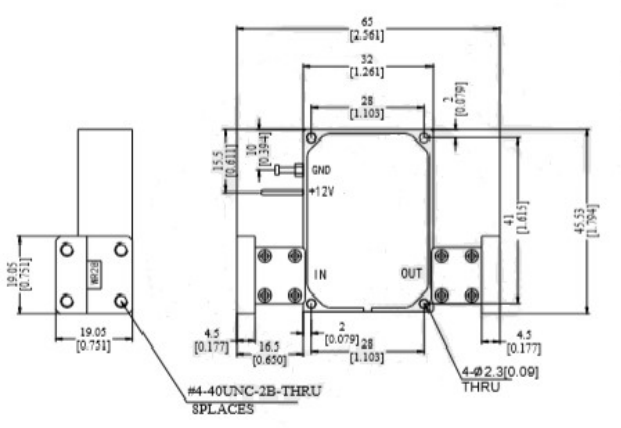
Absolute Maximum Ratings	
Operating Voltage	+15V
RF Input Power	-20dBm

Biasing Up Procedure	
Step 1	Connect Ground Pin
Step 2	Connect input and output
Step 3	Connect +12V biasing

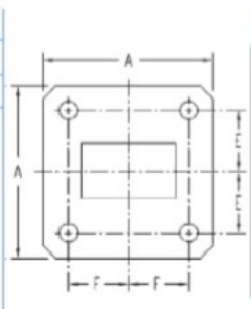
Power Off Procedure	
Step 1	Turn off +12V biasing
Step 2	Remove RF connection
Step 3	Remove Ground

Environmental	
Operating Temperature	-45°C to +85°C
Storage Temperature	-55°C to +125°C
Altitude	30,000 ft. max
Vibration	25g rms (15 degree 2KHz) endurance, 1 hour per axis
Humidity	100% RH at 35°C, 95% RH at 40°C max.
Shock	20g for 11msc half sine wave, 3 axis both directions

All Dimensions in mm (inches)  
Heat Sink required during operation (Sold separately)



	WR28	WG22	R320
	UG599/U		
Dimensions	inches	mm	
A	0.75	19.05	
E	0.265	6.73	
F	0.250	6.35	
Hole Dia.	0.116	2.98	



Note 1: The specification provided is at nominal bias voltage and at 25°C unless otherwise specified  
 Note 2: The specification is subject to regular reviews and will be updated from time to time as part of our continuing product development and improved spec accuracy.  
 Note 3: Operation beyond the quoted limits stated above may cause instantaneous and permanent damage.

