

BROADBAND LOW NOISE AMPLIFIER ABL1800-33-3525

Features:

- > Broad band, low noise, and high gain
- ➤ Low VSWR, unconditional stable
- > Small size, low cost
- > SMA female connector I/O
- ➤ Operating temperature -40~+85°C, storage temperature -55~+85°C



General Description

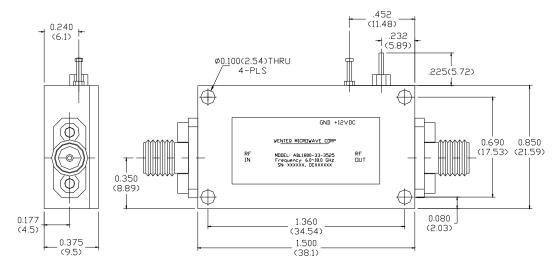
ABL1800-33-3525 is a two stage GaAs MMIC broadband low noise amplifier module operating in the frequency of 6.0 to 18.0GHz. The amplifier provides 35dB of small signal gain with 2.5dB typical noise figure and excellent gain flatness, as well as good VSWR at both input and output. The amplifier requires only a single positive DC power supply, its built-in DC voltage regulator allows for different DC voltage supply application. This amplifier is ideal for telecommunication infrastructures, microwave radio, test instruments and military applications

Electrical Specifications

Parameters	Units	Specifications		
		Minimum	Typical	Maximum
Frequency Range	GHz	6.0		18.0
Small Signal Gain @25°C	dB	32.0	35.0	38.0
Noise Figure @25°C	dB		2.5	3.0
P-1dB Compression Point	dBm	+17.0	+18.0	
Output IP3	dBm	+25.0	+28.0	
Gain flatness	dB		+/-2.0	
Gain Variation	dB		+/-1.5	
Input VSWR			1.8:1	2.5:1
Output VSWR			1.7:1	2.5:1
Reverse Isolation	dB	45.0		
Non-Harmonic Spurious	dBc			-60.0
Operating Temperature	°C	-45		+85
Survival Temperature	°C	-55		+125
DC Voltage	V	+10.0		+12.0
DC Supply Current	mA	170 mA	200 mA	250 mA
In/Out connectors		SMA Female		
Size	inches	1.5"x0.85"x0.375"		

BROADBAND LOW NOISE AMPLIFIER ABL1800-33-3525

Mechanical Structure:



Note: All units in inches (mm).

Housing Material and Surface Finish:

Body and cover material: aluminum

Surface finish: nickel plated Connector material: Copper

Connector surface finish: gold plated

Absolute Maximum Ratings

DC Voltage	+15V
RF Input Power	+15dBm
Storage Temperature	-55~+125°C
Operating Temperature	-45~+75°C

Revision History:

Revision	Date	Description	Comments
A00	08/20/2017	Initial Release	



Electrostatic sensitive device, please observe precautions for handling this amplifier.