

## E Band LNA, 20dB Gain, NF=4dB



### Product Overview

AT-LNA-7186-2004 is a low noise amplifier operating in the 71-86 GHz frequency range. The LNA is packaged in a waveguide module using industry standard WR-12.

MMIC technology LNA Chip is used, which ensures reliable and repeatable unit-to-unit result. Higher gain amplifier can be achieved.

More information, please visit [www.atmicrowave.com](http://www.atmicrowave.com).

### Advantages

- ✓ Frequency: 71-86GHz
- ✓ High Gain: 20dB
- ✓ NF: 4dB
- ✓ Single Supply

### Application

- ✓ E Band Communication
- ✓ FOD (Foreigner Objects Debris)
- ✓ Test Equipment
- ✓ ROF (RF Over Fiber)
- ✓ Radar System

### Key Features

Parameter	Min	Typical	Max
Frequency		71-86GHz	
Gain	17	20dB	
Gain Flatness		+/-3dB	
Noise Figure		4dB	6dB
Output P1dB		0 dBm	
Psat		+3dBm	
Drain Supply		+5V/80mA	+8V
Input Return Loss		-5dB	
Output Return Loss		-5dB	
Spec Temp		25C	





# AT-LNA-7186-2004

71-86GHz 20dB Gain, NF 4dB Low Noise Amplifier

## Mechanical Information

Item	Description
Input Port	WR-12
Output Port	WR-12
Case Material	Copper
Finish	Gold Plated
Weight (Without Heatsink)	189g
Size:	SEE OUTLINE

## Absolute Maximum Ratings Table

Parameter	Value
Drain Supply	+8V
RF Input Power	-5dBm
Operating Temperature	0 to +50C
Storage Temperature	-55 to +105C

## Notes:

1. Datasheet may be changed according to update of MMIC, Raw materials , process, and so on.
2. This data is only for reference, not for guaranteed specifications.
3. Please contact AT Microwave team to make sure you have the most current data.

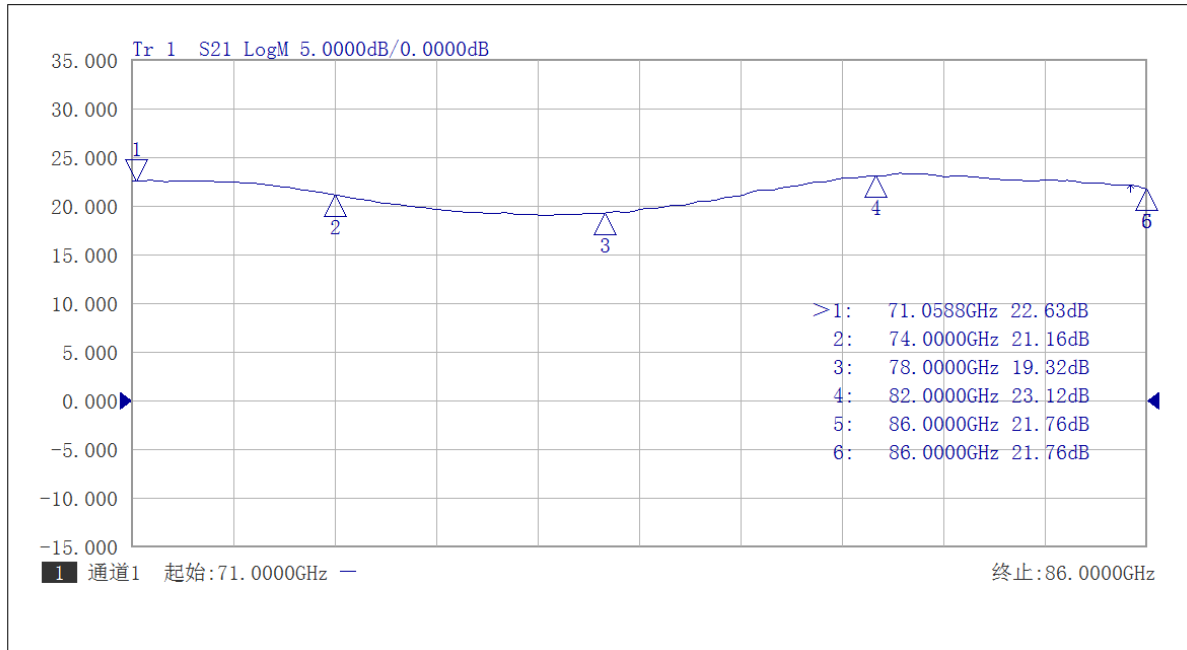
## Part Number Selection Guide

Item	Description
AT-LNA-7186-2004	Stand Module with DC Power Supply
<b>AT-LNA-7186-2004-LCBT</b>	<b>L</b> ow Cost, <b>C</b> ompact <b>B</b> ench- <b>T</b> op, +220V Supply with AC/DC Adapter

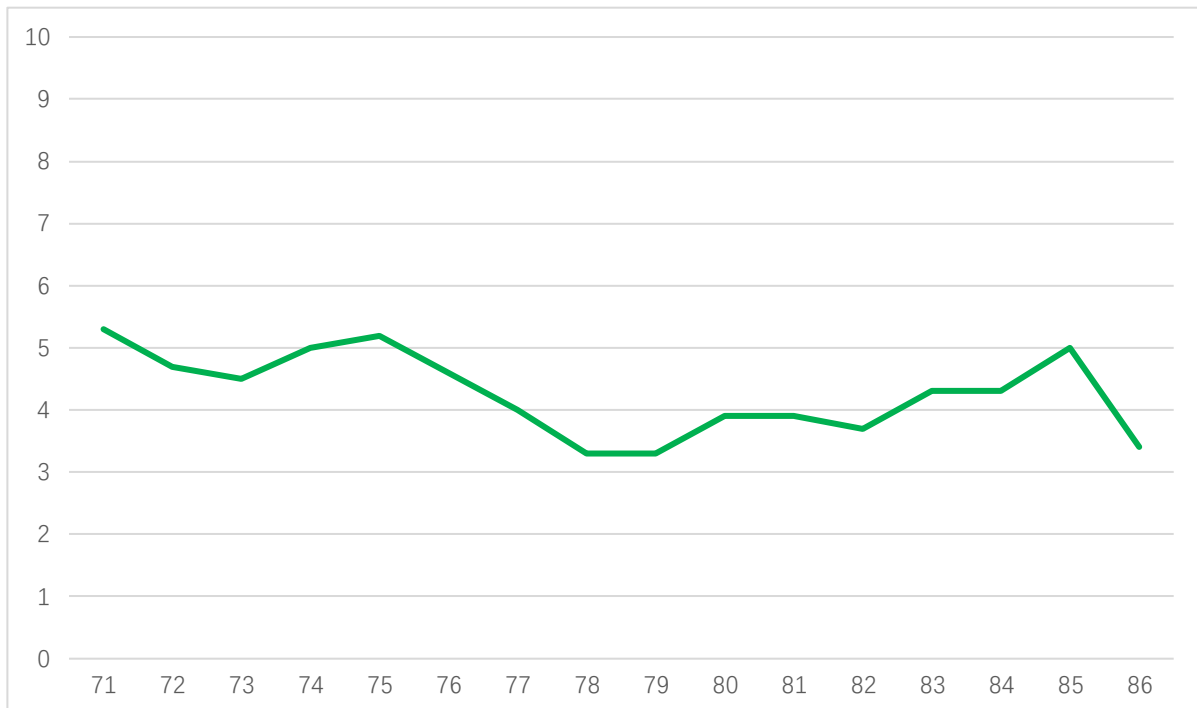


### Test Data (25C)

Please note that test curves will vary slightly from unit to unit.



Gain vs Frequency



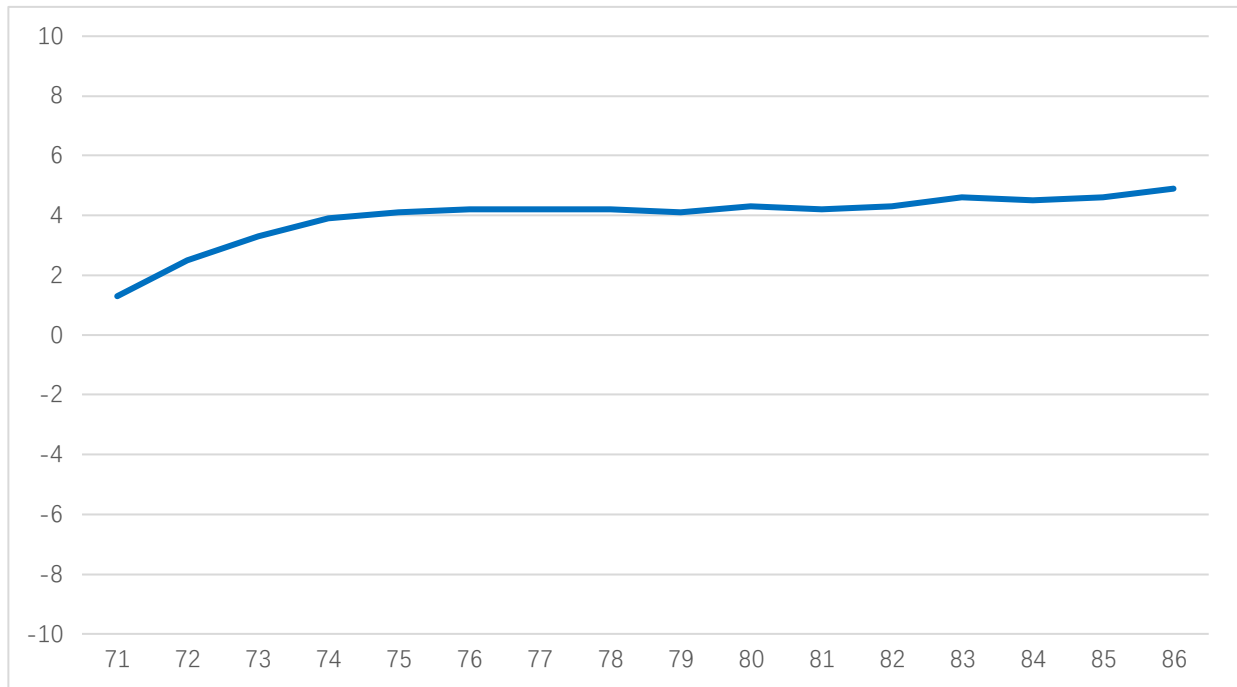
NF vs Frequency





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Psat vs Frequency



**Dimension: (mm)**

