



# AT-PA-4060-3820C

40-60GHz Medium Power Amplifier

## 40-60GHz Broadband Amplifier

2022-3-22

Gain=38dB, Pout=+20dBm, NF=5dB, WR-19



### Product Overview

AT-PA-4060-3820C is high power amplifier with +18dBm output power in the frequency of 40-60GHz. The DC power requirement is +5V/500mA. The module is with standard WR-19 waveguide. Other Connector can be available according to request.

The amplifier is with low NF=5dB, which can be use as both power amplifier and low noise amplifier application.

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

### Advantages

- ✓ Frequency: 40-60GHz
- ✓ Psat:+20dBm
- ✓ Small signal gain: 38dB
- ✓ NF=5dB

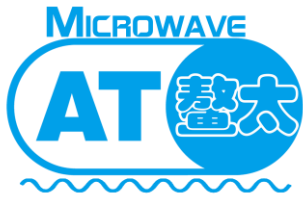
### Application

- ✓ U Band Communication
- ✓ Test Equipment
- ✓ ROF (RF Over Fiber)
- ✓ Radar System

### Key Features

Parameter	Min	Typical	Max
Frequency		40-60GHz	
Gain	36	38dB	
Drain Supply		+5V	+8V
P1dB		+18dBm	
Psat		+20dBm	
NF		5 dB	
Id(NO RF)		500 mA	
Id(Psat)		720mA	
Input Return Loss		-7dB	
Output Return Loss		-7dB	
Spec Temp		25C	





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## Mechanical Information

Item	Description
Input Port	WR-19
Output Port	WR-19
Case Material	Copper
Finish	Gold Plated
Weight (Without Heatsink)	100g
Size:	See outline

## Absolute Maximum Ratings Table

Parameter	Value
Drain Supply	+9V
RF Input Power	+5dBm
Operating Temperature	0 to +50C
Storage Temperature	-65 to +150C

## 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
PN	Stand Module with DC Power Supply
<b>PN-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



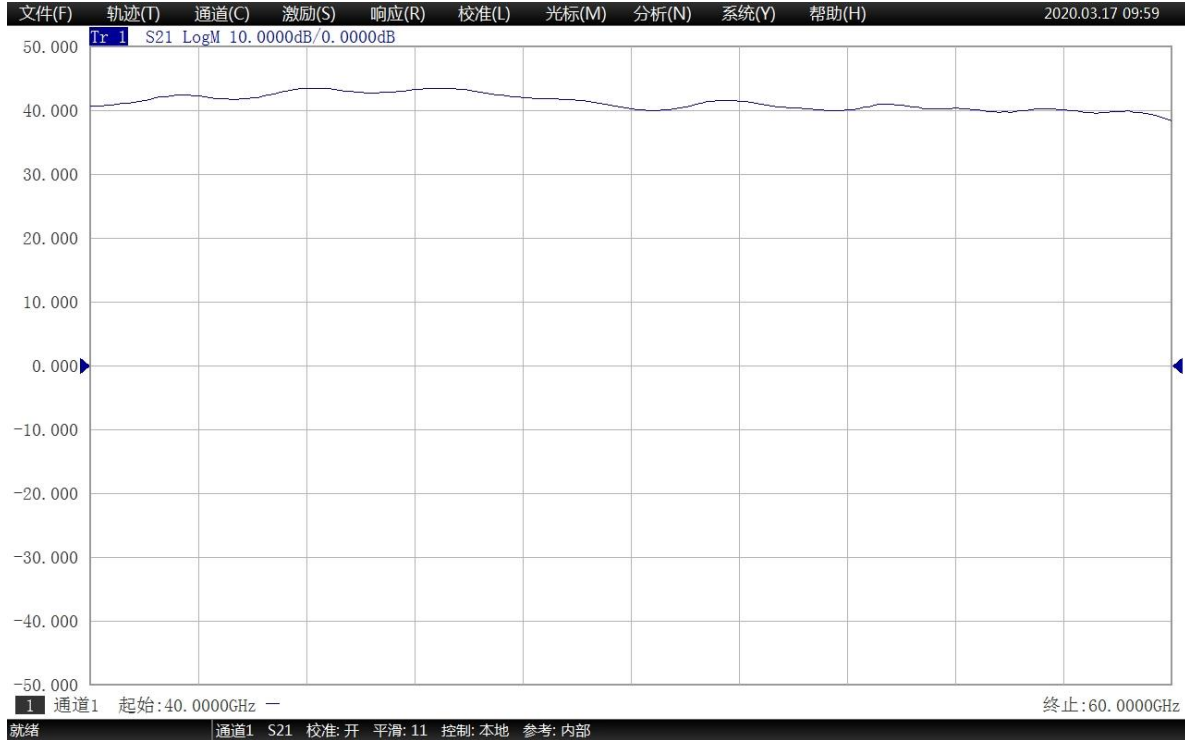


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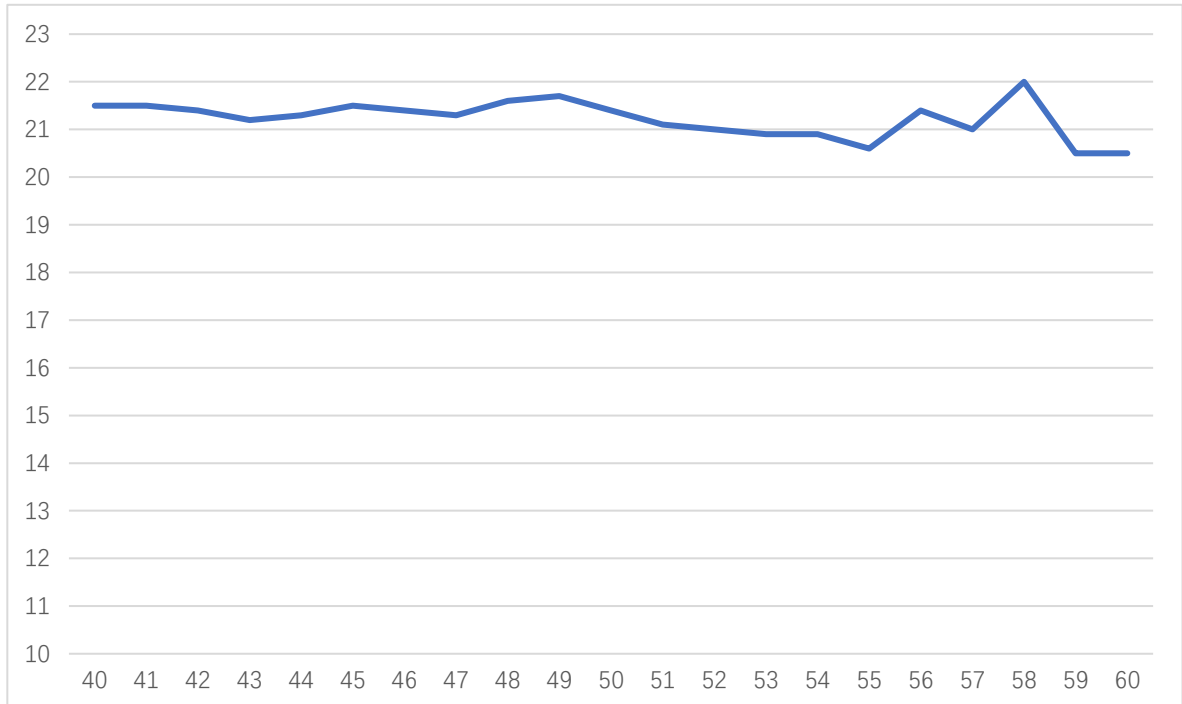
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## Test Data:

Vd=+5V, Id=0.5A NO RF, Id=0.72A at Psat, 25C



Gain vs Frequency



Pout vs Frequency





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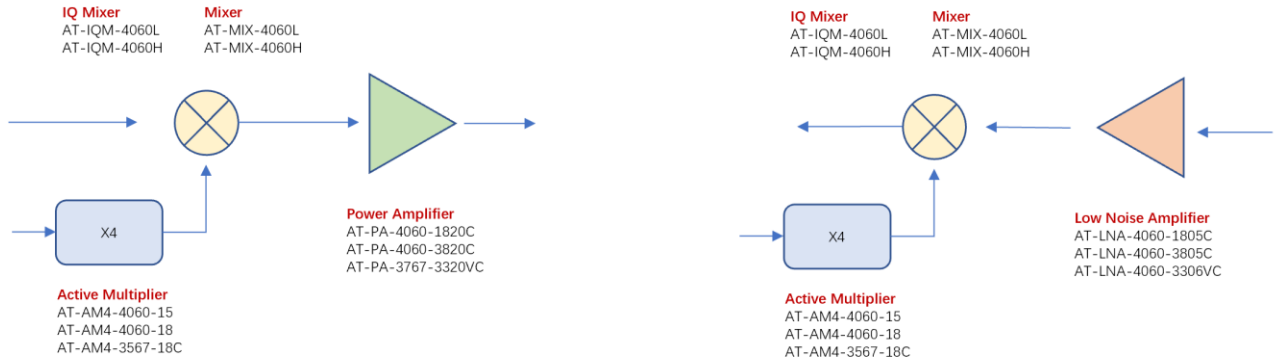
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NF vs Frequency



### U Band 40-60GHz



### Dimension: (unit in mm)

