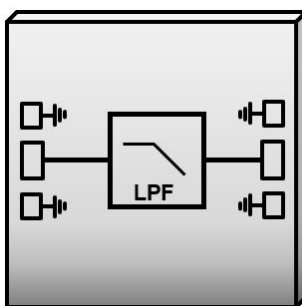


## Typical Applications

- Communication Systems
- Point to Point Radio
- Fiber Optics
- Test Equipment
- Wideband Military & Space

## Series Features

- Cutoff frequencies from 4-10GHz
- 50Ω Matched DC coupled RF Ports
- Die Size: 1.00 x 0.75 x 0.1 mm; Matches AGATNxx, AGBPFxxx, AGBSFxxx, and AGTRMxxx series MMICs



## AGLPFxxx Series Parts

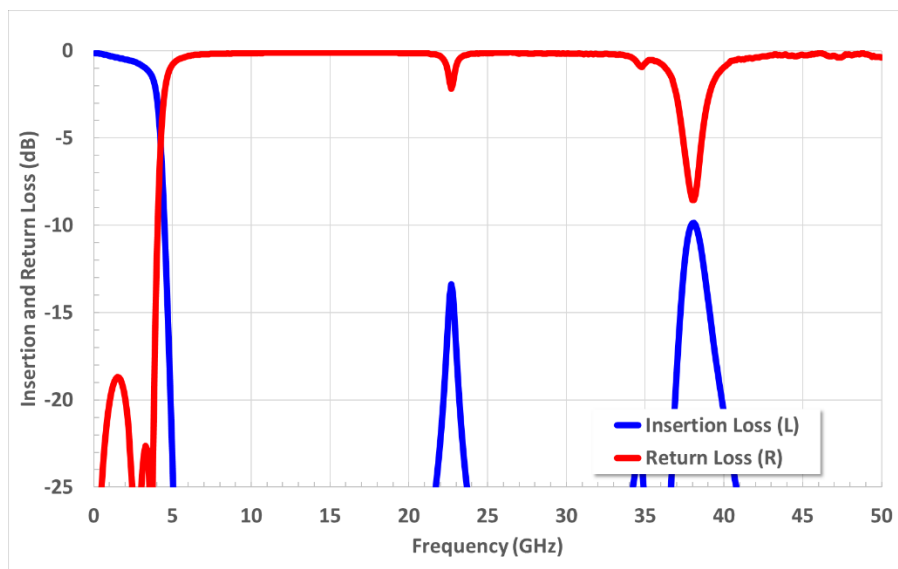
Part Number	Description	Page No.
AGLPF040	4GHz Lowpass Filter	<a href="#">2</a>
AGLPF080	8GHz Lowpass Filter	<a href="#">3</a>
AGLPF100	10GHz Lowpass Filter	<a href="#">4</a>

## Features

- Frequency Range: DC – 4GHz
- Passband Loss: 2.50dB @ 4GHz
- Rejection: 20dB @ 5.0GHz
- 50Ω Matched DC coupled RF Ports

## Performance Graphs

### Insertion and Return Loss (Measured)



### Electrical Specifications (TA = +25°C)

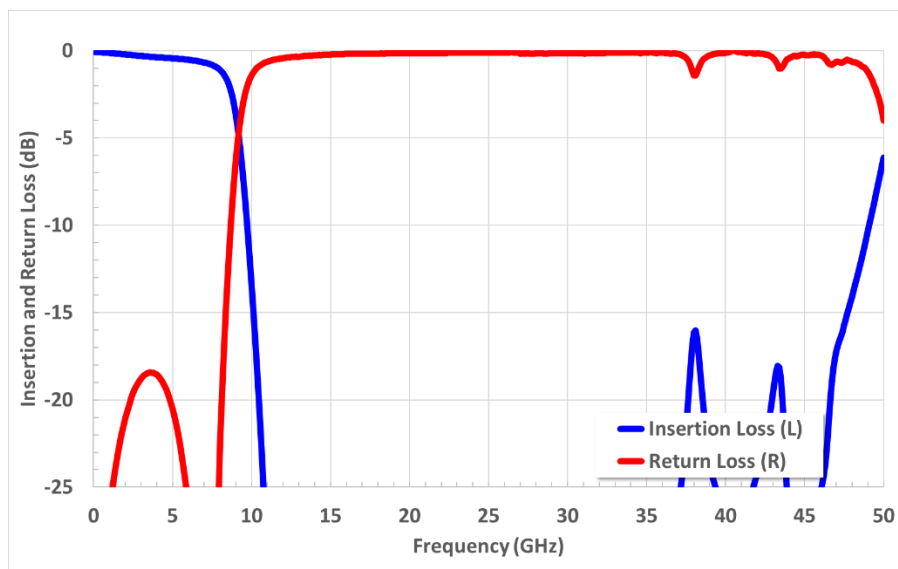
Parameter	Units	Minimum	Typical	Maximum
Frequency	GHz	DC		4.0
Passband Loss	dB			2.50
Passband Return Loss	dB		25	
Rejection 20dB Point	GHz		5.0	
Rejection 40dB Point	GHz		5.5	
Package Type			Die	

## Features

- Frequency Range: DC – 8GHz
- Passband Loss: 1.1dB @ 8GHz
- Rejection: 20dB @ 10.5GHz
- 50Ω Matched DC coupled RF Ports

## Performance Graphs

### Insertion and Return Loss (Measured)



### Electrical Specifications (TA = +25°C)

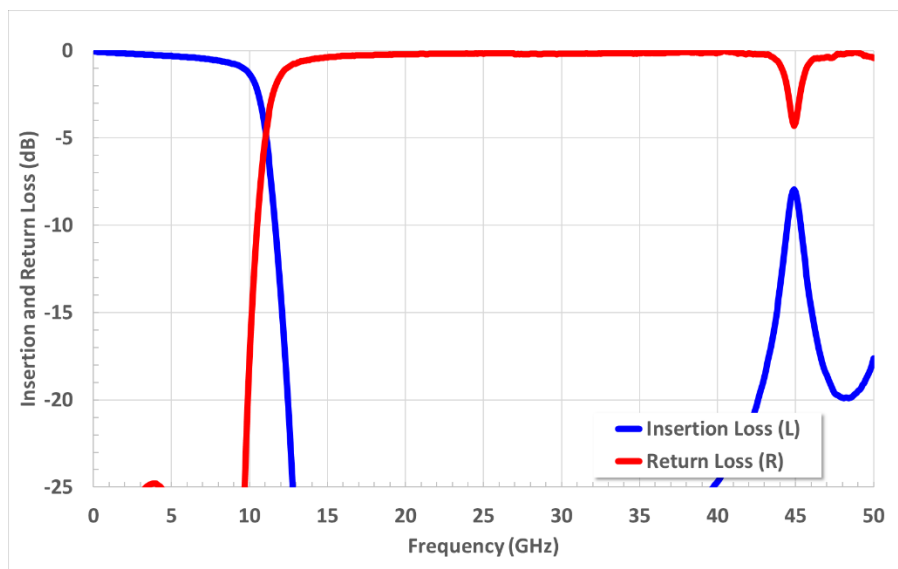
Parameter	Units	Minimum	Typical	Maximum
Frequency	GHz	DC		8.0
Passband Loss	dB			1.1
Passband Return Loss	dB		25	
Rejection 20dB Point	GHz		10.5	
Rejection 40dB Point	GHz		11.3	
Package Type			Die	

## Features

- Frequency Range: DC – 10GHz
- Passband Loss: 1.3dB @ 10GHz
- Rejection: 20dB @ 12.5GHz
- 50Ω Matched DC coupled RF Ports

## Performance Graphs

### Insertion and Return Loss (Measured)



### Electrical Specifications (TA = +25°C)

Parameter	Units	Minimum	Typical	Maximum
Frequency	GHz	DC		10.0
Passband Loss	dB			1.3
Passband Return Loss	dB		25	
Rejection 20dB Point	GHz		12.5	
Rejection 40dB Point	GHz		13.4	
Package Type			Die	

## Outline Drawing (DXF outline available)



## Pad Descriptions

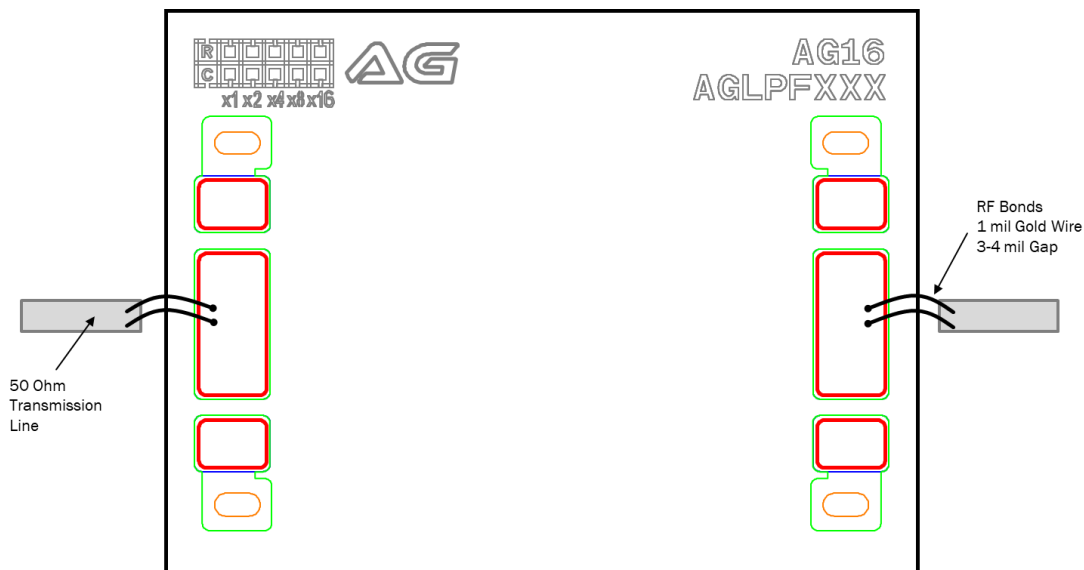
Pad	Function	Pad Size	Description
1	RFIN	101x200μm	DC coupled 50Ω Matched
2	RFOUT	101x200μm	DC coupled 50Ω Matched
Die Bottom	GND	Backside	Epoxy/Solder to Baseplate

## Absolute Maximum Ratings

Parameter	Rating
Drain Bias Voltage (VDD)	No Bias
RF Input Power (RFIN)	+20dBm*
Channel Temperature	150°C
Storage Temperature	-65 to 150°C
Operating Temperature	-55 to 85°C

\*To be tested

## Assembly Diagrams



## Assembly Notes:

1. Die Thickness is 100 $\mu$ m
2. Bondpad metallization: 7 $\mu$ m gold
3. Backside metallization: 4.5 $\mu$ m gold
4. Silver Epoxy or AuSn Eutectic attach MMIC



## Die Packaging Information

- GP-4 (Gel-Pak)