AMT3407 14 – 18GHz Filter



## **Key Features:**

Pass band frequency: 14 – 18GHz

Centre insertion loss : 2dBIn-band standing wave : 1.8

Stop-band suppression: 40dBc@5 ~ 10GHz;

40dBc@23 ~ 26GHz; 40dBc@28 ~ 36GHz;

• Chip dimensions: 6.95mm x 2.75mm x 0.381mm

Applications: wireless communication, transceiver module, radio telecommunication etc.

## **Description:**

AMT3407 is a high performance ceramic band-pass filter, this chip is designed with ground through metal vias on the back technology. Pass band frequency range is 14 - 18GHz, in-band insertion loss is less than 2dB, in-band standing wave less than 1.8.

# **Absolute Maximum Ratings (Ta = 25°C)**

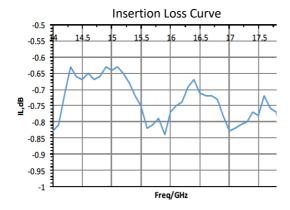
Symbol	Parameter	Value	Remark
Pin	Input signal power	35dBm	
Та	Operation Temperature	-55 ~ +85°C	
Tstg	Storage Temperature	-65 ~ +150°C	

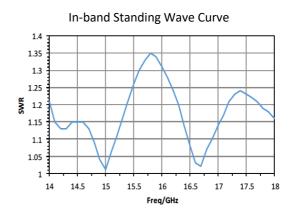
[1] Operation outside any of the Absolute Maximum Ratings may cause permanent device damage.

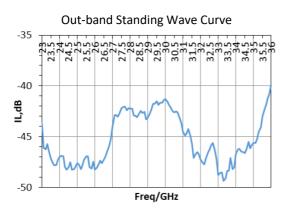
#### **Electrical Characteristics (Ta = 25°C)**

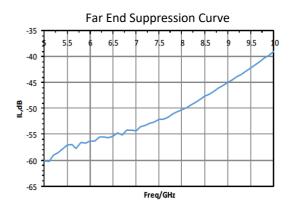
Symbol	Parameter		<b>Test Conditions</b>	Value			Unit
				Min	Typical	Max	
IL <sub>0</sub>	Centre insertion loss			ı	1	2	dB
SS		5 ~ 10GHz		40	45		
	Out-band suppression	23 ~ 26GHz	F : 5 ~ 36GHz	40	45	-	dBc
		28 ~ 36GHz		40	42		
VSWR	In-band standing wave			-	1.4	1.8	-
B <sub>1</sub>	In-band fluctuation			-	0.5	1	dB

# **Typical Test Curve**

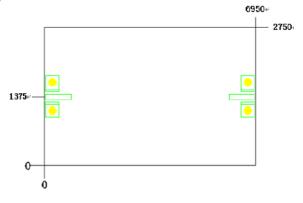








# Chip Dimensions (Unit: $\mu$ m)



## **Chip Layout Diagram**

