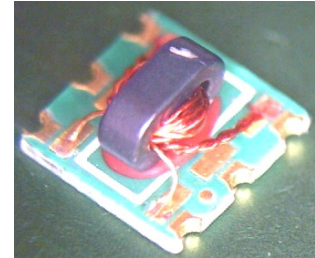


Transformer, 1:1 Transmission Line 5MHz - 1200MHz

Rev. V2

Features

- Surface mount
- 1:1 Impedance ratio
- 260°C reflow compatible
- RoHS* compliant, Pb-Free
- Available on tape and reel.



Electrical Specifications: $Z_0 = 75\Omega$, $T_A = 25^\circ\text{C}$, $P_{in} = 0\text{dBm}$

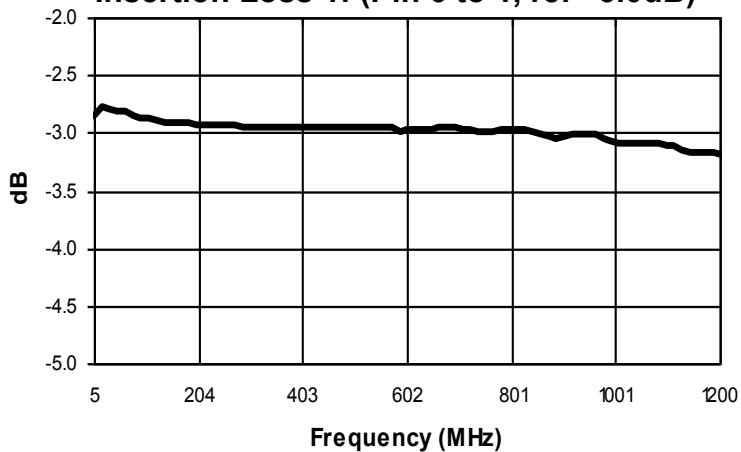
Parameter	Conditions	Units	Min	Typ	Max
Frequency Range		MHz	5		1200
Impedance		Ω		75	
Impedance Ratio				1:1	
Insertion Loss	5 - 1200MHz	dB	-	0.2	0.8
Amplitude Balance	5 - 1200MHz	dB	-0.9	0.7	0.9
Phase Balance	5 - 200MHz	$^\circ$	-4.0	3.0	4.0
	200 - 1200MHz	$^\circ$	-9.0	7.0	9.0
Input Return Loss	5 - 200MHz	dB	20	21	-
	200 - 400MHz	dB	18	23	-
	400 - 1000MHz	dB	16	20	-
	1000 - 1200MHz	dB	14	20	-

Transformer, 1:1 Transmission Line 5MHz - 1200MHz

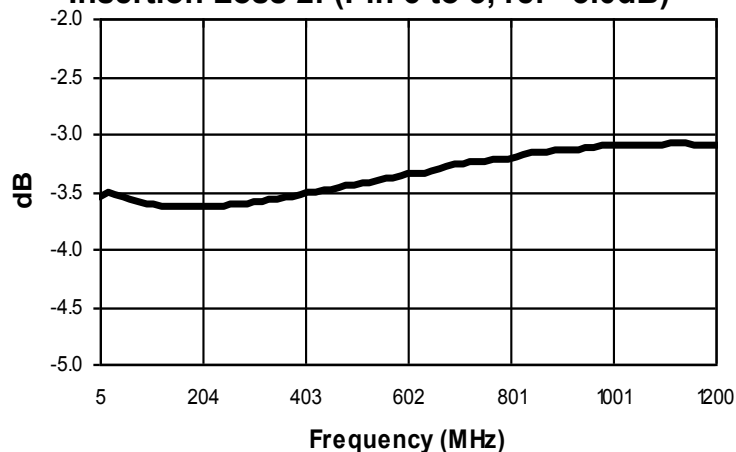
Rev. V2

Electrical Specifications: $Z_0 = 75\Omega$, $T_A = 25^\circ\text{C}$, $P_{in} = 0\text{dBm}$

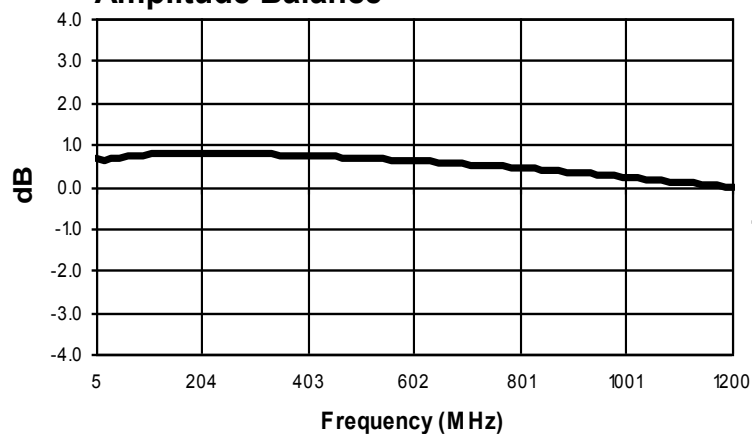
Insertion Loss 1: (Pin 6 to 1, ref -3.0dB)



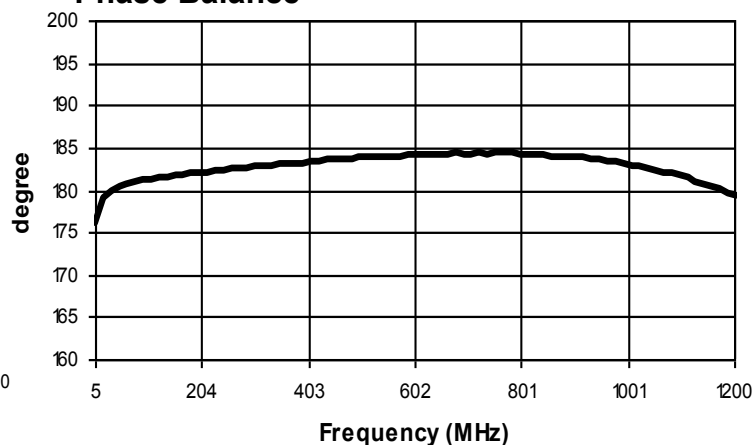
Insertion Loss 2: (Pin 6 to 3, ref -3.0dB)



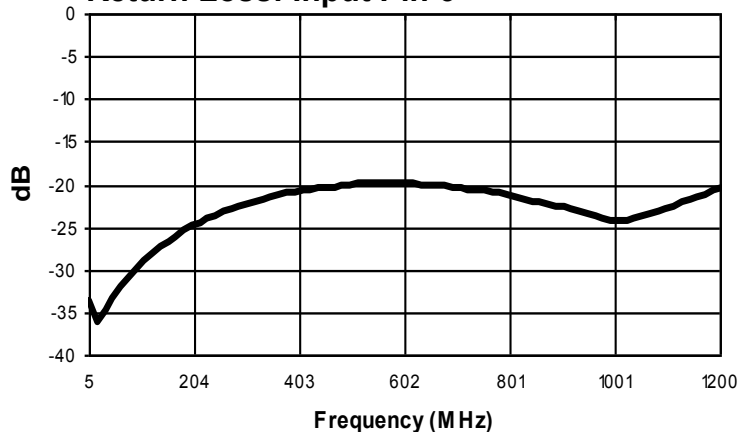
Amplitude Balance



Phase Balance



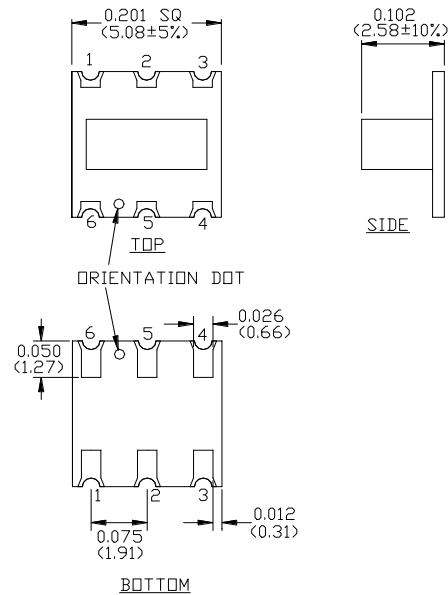
Return Loss: Input Pin 6



Transformer, 1:1 Transmission Line 5MHz - 1200MHz

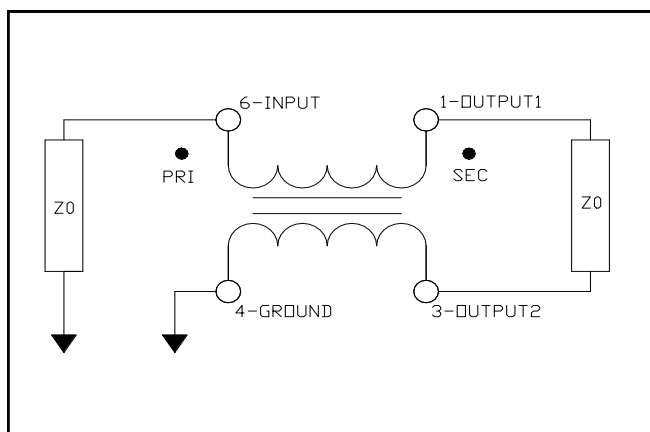
Rev. V2

Outline Drawing

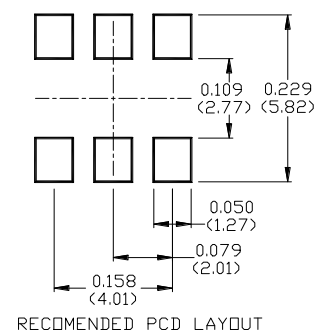


1. Dimensions in mm.
2. Tolerance: ±0.2mm unless otherwise noted.
3. Model number and lot code printed on reel.
4. Plating finish: ENIG on both sides

Application Circuit



Recommended Footprint



Tape & Reel Information

Parameter	Units	Value
Qty per reel	-	2000
Reel size	mm	330
Tape width (W)	mm	12.00
Pitch (P ₁)	mm	8.00
A ₀	mm	5.3
B ₀	mm	5.3
K ₀	mm	2.7
Orientation	-	F53
Reference Application note ANI-019 for orientation		

Ordering Information

Part Number	Description
MABA-011031	Tape & Reel

Recommended Maximum Ratings

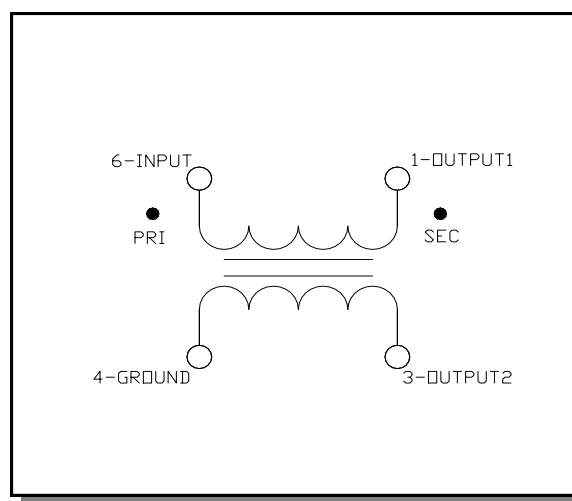
Parameter	Units	Min	Max
Input Power	mW		+24dBm (250mW)
DC Current	mA		30
Operating Temperature Range	°C	-40	+85

Temperature data available on request

Pin Configuration

Pin No.	Function
1	Secondary Dot (output1)
2	Not Used (Ground)
3	Secondary (output2)
4	Primary (ground)
5	Not Used (Ground)
6	Primary Dot

Schematic



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