

## Features

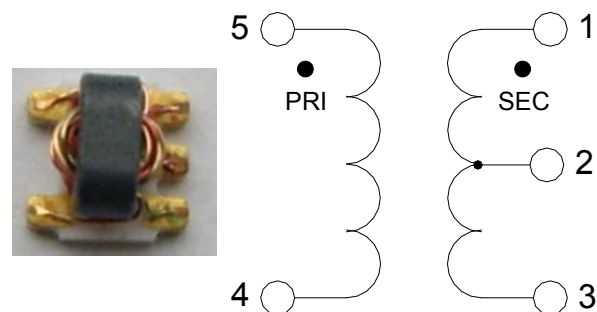
- 1:3 Impedance Ratio
- Surface Mount Package
- Tape and Reel Packaging Available
- RoHS\* Compliant & 260°C Reflow Compatible

## Description

The MABA-009484-ETC31T is a RoHS compliant 1:3 RF flux coupled transformer in a surface mount package (SM-22).

Typical applications include single to balanced mode conversion.

## Schematic



## Pin Configuration

Pin #	Function	Pin #	Function
1	Secondary Dot	4	Primary
2	Secondary CT	5	Primary Dot
3	Secondary		

## Electrical Specifications: Freq. = 2 - 500 MHz, $T_A = 25^\circ\text{C}$ , $Z_0 = 50 \Omega$ , $P_{IN} = 0 \text{ dBm}$

Parameter	Freq. Test Conditions (MHz)	Units	Min.	Typ.	Max.
Insertion Loss	2 - 500	dB	—	0.7	2
	5 - 300			0.6	1
Amplitude Balance	2 - 500	dB	—	0.3	1
Phase Balance	2 - 500	°	—	—	1
Input Return Loss	2 - 400	dB	20	27	30
	400 - 500		16	18	25

## Ordering Information

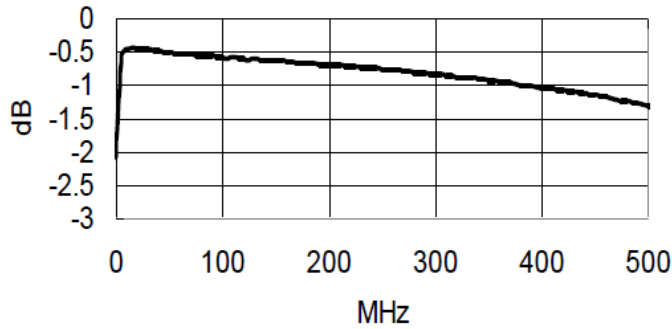
Parameter	Package
MABA-009484-ETC31T	2000 piece reel

## Absolute Maximum Ratings

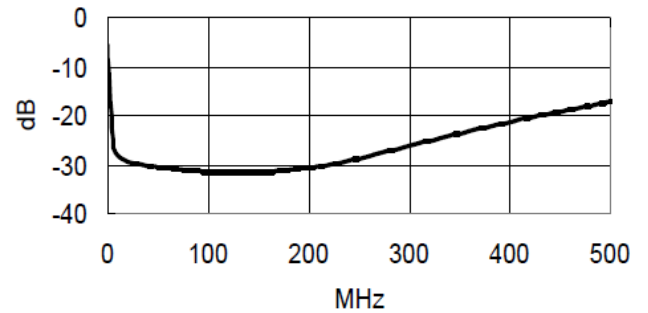
Parameter	Absolute Maximum
RF Power	250 mW
DC Current	50 mA
Operating Temperature	-40°C to +85°C
Storage Temperature	-55°C to +125°C

## Typical Performance Curves

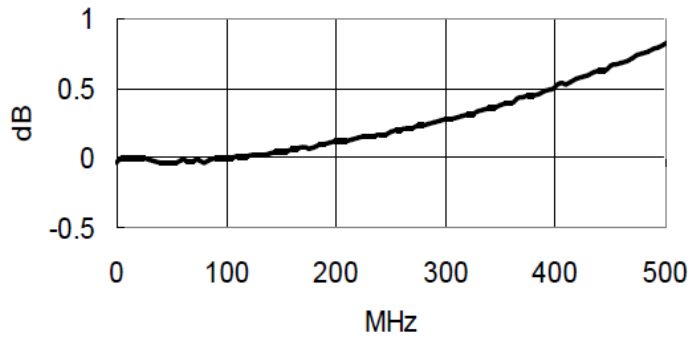
*Insertion Loss*



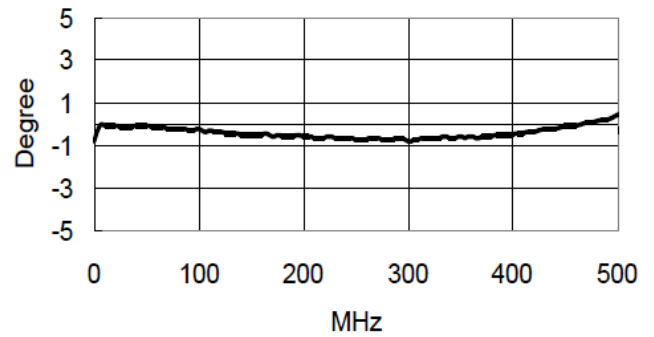
*Input Return Loss*



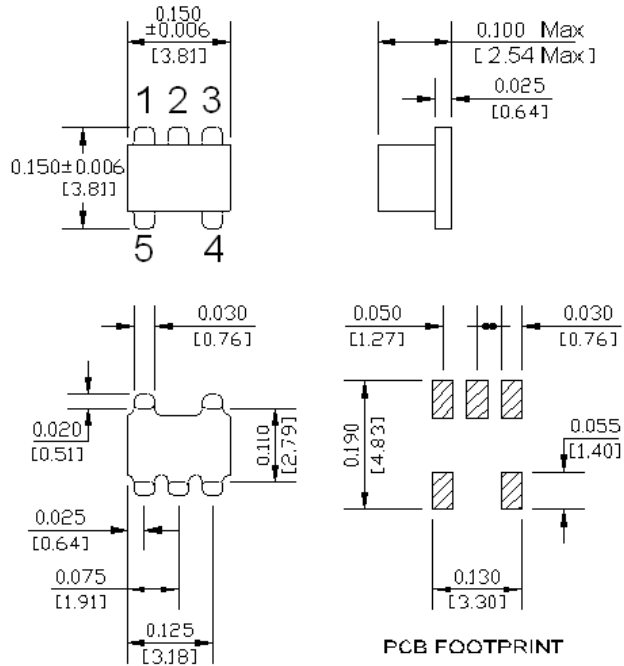
*Amplitude Balance*



*Phase Balance*

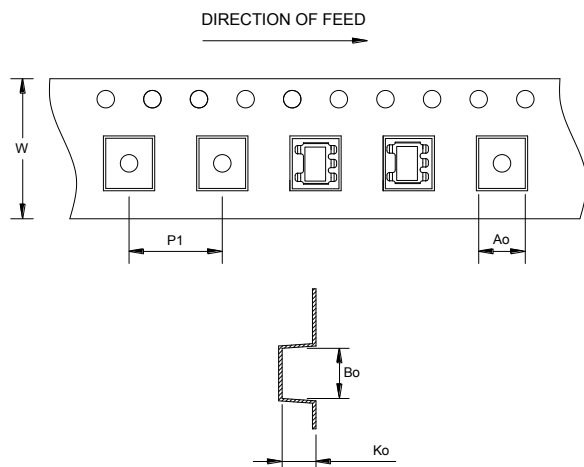


## Outline Drawing



Dimensions are inches (millimeters)  $\pm 0.015$  (0.38) unless otherwise specified.  
 Drawing not to scale.

## Tape & Reel Information



## Dimensions

Item	Dimension (mm)
$A_o$	4.00 +/-0.1
$B_o$	4.00 +/-0.1
$K_o$	2.90 +/-0.1
$W$	12.00 +/-0.3
$P1$	8.00 +/-0.1

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