

# RoHS Compliant



E-Series 4-Way 0° Power Divider  
2 – 1000 MHz

MAPD-007246-ES4700  
V1P

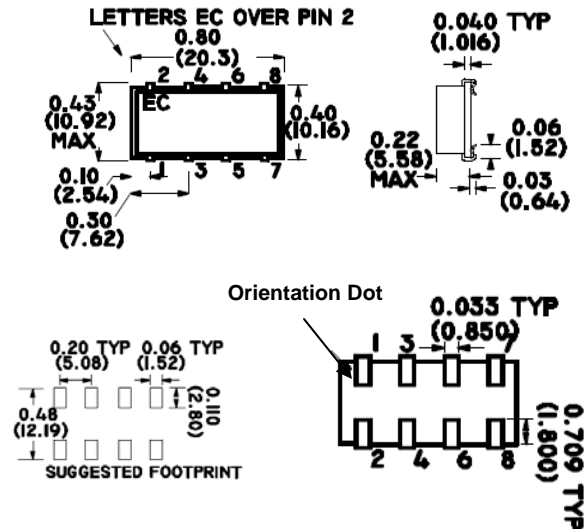
## Features

- Surface mount
- Wide frequency range
- 4-Way—0°
- Lead Free
- RoHS\* Compliant and is 260°C reflow compatible.
- Available on Tape and Reel, reel quantity 2000

## Description

M/A-COM's MAPD-007246-ES4700 is a RoHS compliant 4 Way 0° Power Divider in a low cost, surface mount package. Ideally suited for high volume cellular and wireless applications. Parts are packaged in tape & reel.

## SM-46 package



## Pin Configuration

Pin No.	Function
1	Ground
2	Port 1
3	Input
4	Port 2
5	Ground
6	Port 3
7	Ground
8	Port 4

## Absolute Maximum Ratings<sup>1,2</sup>

Parameter	Absolute Maximum
Maximum Power Rating	1 Watt
Internal Load Dissipation	0.125 Watt
Pin Temperature (10 Sec)	260°C
Operating Temperature	-0°C to +70°C
Operating Temperature <sup>2</sup>	-40°C to +85°C
Storage Temperature	-55°C to +125°C

1. Exceeding any one or combination of these limits may cause permanent damage to this device.
2. M/A-COM does not recommend sustained operation near these survivability limits.

## Ordering Information

Part Number	Package
MAPD-007246-ES4700	300 piece reel

Note: Reference Application Note M513 for reel size information.

**This PRELIMINARY Data Sheet contains information regarding a product M/A-COM has under development. Performance is based on measured results and target specifications. Commitment to produce in volume is not guaranteed.**

\* Restrictions on Hazardous Substances, European Union Directive 2002/95/EC.

1

**ADVANCED:** Data Sheets contain information regarding a product M/A-COM Technology Solutions is considering for development. Performance is based on target specifications, simulated results, and/or prototype measurements. Commitment to develop is not guaranteed.  
**PRELIMINARY:** Data Sheets contain information regarding a product M/A-COM Technology Solutions has under development. Performance is based on engineering tests. Specifications are typical. Mechanical outline has been fixed. Engineering samples and/or test data may be available. Commitment to produce in volume is not guaranteed.

• **North America** Tel: 800.366.2266 • **Europe** Tel: +353.21.244.6400  
 • **India** Tel: +91.80.4155721 • **China** Tel: +86.21.2407.1588  
 Visit [www.macomtech.com](http://www.macomtech.com) for additional data sheets and product information.

M/A-COM Technology Solutions Inc. and its affiliates reserve the right to make changes to the product(s) or information contained herein without notice.

E-Series 4-Way 0° Power Divider  
2 – 1000 MHz

MAPD-007246-ES4700  
V1P

**Electrical Specifications:**  $T_A = 25^\circ\text{C}$ ,  $Z_0 = 50\Omega$  <sup>1</sup>

Parameter	Test Conditions	Frequency	Units	Min	Typ	Max
RF Frequency	—	2 - 1000	MHz	—	—	—
Insertion Loss	$F_L$ — $f_U$	2 - 20	dB	—	0.5	0.8
		20 - 500	dB	—	0.7	1.1
		500 - 1000	dB	—	0.8	1.5
Isolation	$F_L$ — $f_U$	2 - 20	dB	20	35	—
		20 - 500	dB	20	35	—
		500 - 1000	dB	15	23	—
Input & Output Return Loss	$F_L$ — $f_U$	2 - 1000	dB	15.0	—	—
Amplitude Unbalance	$F_L$ — $f_U$	2 - 20	dB	—	—	0.1
		20 - 500	dB	—	—	0.2
		500 - 1000	dB	—	—	0.5
Phase Unbalance	$F_L$ — $f_U$	2 - 20	Degrees	—	—	1°
		20 - 500	Degrees	—	—	5°
		500 - 1000	Degrees	—	—	10°