



COAXIAL STRIPLINE

Power Splitter/Combiner **ZC3PD-E18673+**

Mini-Circuits

50Ω 3 Way-0° 18 to 67 GHz 1.85mm Female 12W DC Pass

KEY FEATURES

- Wideband, 18 to 67 GHz
- Low Insertion Loss, 1.8dB typ.
- 12W Power Handling
- High Isolation, 36dB typ.
- Low Amplitude Unbalance, 0.4dB typ.

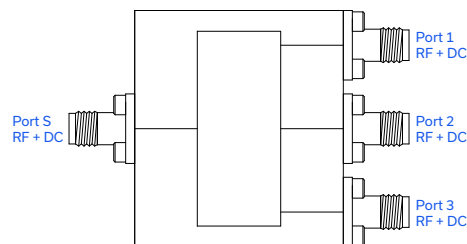


Generic photo used for illustration purposes only

PRODUCT OVERVIEW

Mini-Circuits' ZC3PD-E18673+ is a wideband 3-way 0° power splitter/combiner. It provides coverage from 18 to 67 GHz (Ka band & V band), supporting a wide range of applications including 5G, Defense, Instrumentation and many more. This model provides 12W power handling as a splitter and very low insertion loss across the entire operating frequency range, minimizing power dissipation and delivering excellent signal power transmission from input to output. The ZC3PD-E18673+ comes housed in a case measuring 1.5 x 1.7 x 0.5" with 1.85mm female connectors.

FUNCTIONAL DIAGRAM



ELECTRICAL SPECIFICATIONS AT +25°C

Parameter	Frequency (GHz)	Min.	Typ.	Max.	Units
Frequency Range		18		67	GHz
Insertion Loss (above theoretical 4.8 dB)	18-40	—	1.3	2.0	dB
	40-50	—	1.8	2.4	
	50-67	—	2.3	3.1	
Isolation	18-40	16	35	—	dB
	40-50	16	37	—	
	50-67	16	38	—	
Phase Unbalance (Relative to 0°)	18-40	—	4	—	(±) Degree
	40-50	—	4	—	
	50-67	—	10	—	
Amplitude Unbalance	18-40	—	0.3	—	(±) dB
	40-50	—	0.4	—	
	50-67	—	0.5	—	
VSWR (Port S)	18-40	—	1.13	1.7	:1
	40-50	—	1.12	1.8	
	50-67	—	1.10	1.9	
VSWR (Ports 1-3)	18-40	—	1.12	1.7	:1
	40-50	—	1.13	1.8	
	50-67	—	1.11	1.9	

Absolute Maximum Ratings are on page 3.

REV. OR
ECO-017333
ZC3PD-E18673+
MCL NY
230331





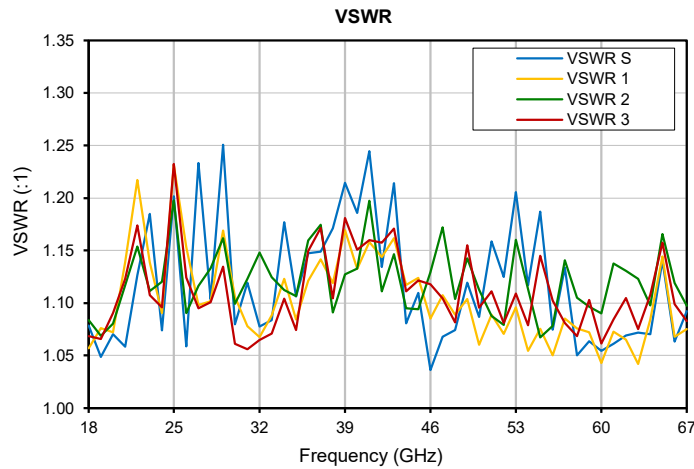
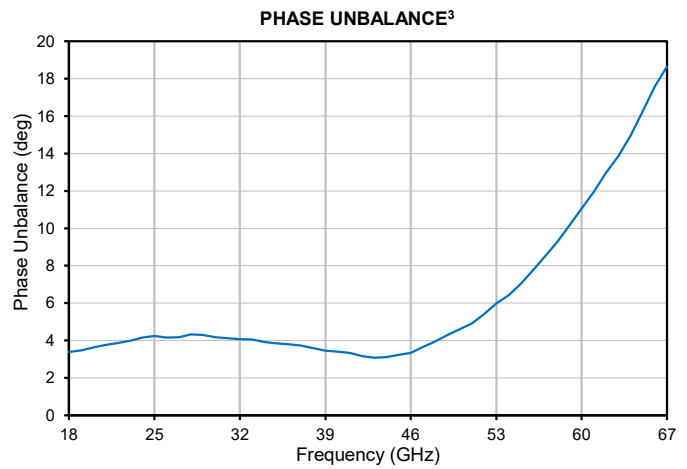
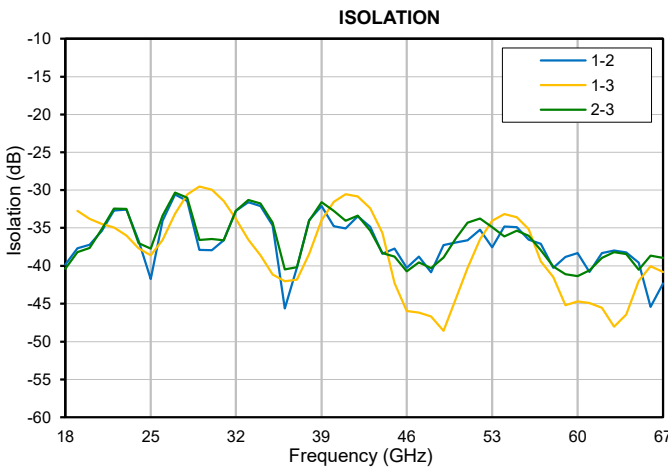
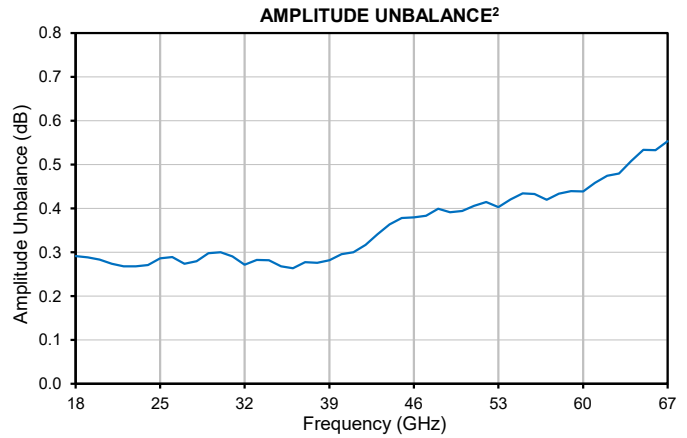
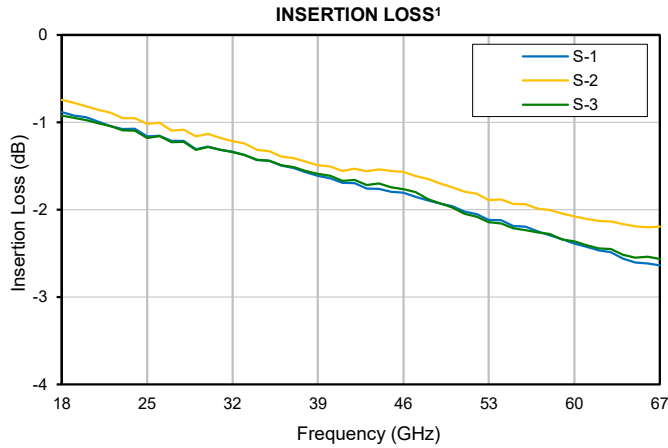
COAXIAL STRIPLINE

Power Splitter/Combiner **ZC3PD-E18673+**

Mini-Circuits

50Ω 3 Way-0° 18 to 67 GHz 1.85mm Female 12W DC Pass

TYPICAL PERFORMANCE GRAPHS



Note:

1. Insertion loss is loss above theoretical loss (4.8dB)
2. Amplitude unbalance is average unbalance between any ports
3. Phase unbalance is average unbalance between any ports





COAXIAL STRIPLINE

Power Splitter/Combiner **ZC3PD-E18673+**

Mini-Circuits

50Ω 3 Way-0° 18 to 67 GHz 1.85mm Female 12W DC Pass

ABSOLUTE MAXIMUM RATINGS¹

Parameter	Ratings	
Operating Case Temperature	-50 °C to +100 °C	
Storage Temperature	-50 °C to +100 °C	
Input Power	as splitter ²	12 W
	as combiner	0.8 W
DC Passing as splitter	350mA	

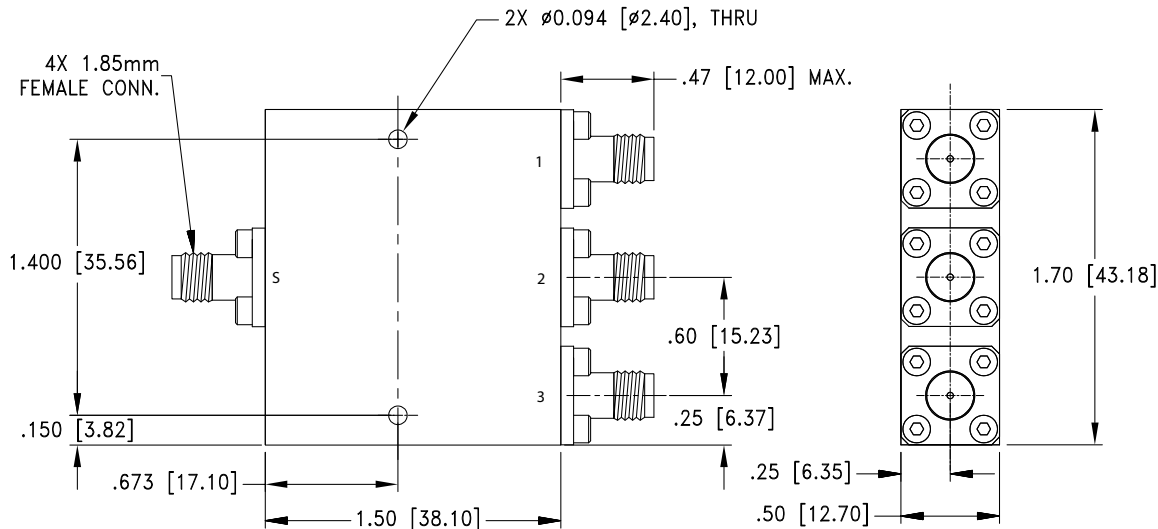
1. Permanent damage may occur if any of these limits are exceeded.

2. At 25°C. Derate linearly to 2.8 W at +100 °C

CONNECTOR SPECIFICATIONS

Description	Marking on DUT	Connector
S (Sum Port)	S	1.85 mm Female
Port (1 to 3)	1,2,3	1.85 mm Female

CASE STYLE DRAWING



Weight: 80 grams

Dimensions are in inches [mm]. Tolerances: 2 Pl. ±.03; 3 Pl. ±.015 inches

PRODUCT MARKING*: ZC3PD-E18673+

*Marking may contain other features or characters for internal lot control.

ADDITIONAL INFORMATION IS AVAILABLE ON OUR DASHBOARD

[CLICK HERE](#)

Performance Data	Data Table
	Swept Graphs
Case Style	UU2412-3
RoHs Status	Compliant
Environmental Ratings	ENV103

NOTES

- Performance and quality attributes and conditions not expressly stated in this specification document are intended to be excluded and do not form a part of this specification document.
- Electrical specifications and performance data contained in this specification document are based on Mini-Circuit's applicable established test performance criteria and measurement instructions.
- The parts covered by this specification document are subject to Mini-Circuits standard limited warranty and terms and conditions (collectively, "Standard Terms"); Purchasers of this part are entitled to the rights and benefits contained therein. For a full statement of the standard terms and the exclusive rights and remedies thereunder, please visit Mini-Circuits' website at www.minicircuits.com/terms/viewterm.html

