WR-15 Waveguide 20 dB Broadwall Coupler, UG-385/U Round Cover Flange, H-Plane Coupled Port, 50 GHz to 75 GHz, Brass Copper

Waveguide Couplers Technical Data Sheet PE-W15CP001-20

The PE-W15CP001-20 is a millimeter-wave directional waveguide coupler that operates in the frequency range of 50 to 75 GHz (V Band). This V band component offers a nominal coupling level of 20 dB, mean coupling accuracy of +/- 1, coupling flatness of 1.5 dB, and has a maximum VSWR level of 1.2:1. The design is made of gold brass copper and incorporates a multi-hole configuration that results in typical directivity of 30 dB. Common applications for this millimeter wave component involve test setups where power reflection measurements are required that might involve power sampling and frequency monitoring with minimal signal loss to the main transmission path. This H plane coupler uses integrated WR-15 waveguide ports with UG 385/U flanges. Pasternack offers a complete family of waveguide millimeter wave directional couplers that are in-stock for same day shipment.

Features

- 20 dB Nominal Coupling Level
- H-Plane Waveguide Coupler
- 50 GHz to 75 GHz Frequency Range
- Body and Flanges made of Brass Copper
- Gold Waveguide
- 1.2:1 VSWR

Applications

- Test Benches
- Radar
- Satellite
- Microwave Radio
- Attenuation Measurements
- Power Measurements
- Source Leveling

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	50		75	GHz
Coupler				
Nominal Coupling Level		20		dB
Coupling Accuracy			±1	dB
Directivity		30		dB
Insertion Loss			1	dB
Main Line VSWR			1.2:1	
Secondary Line VSWR			1.2:1	
Coupling Flatness			±1.5	dB
Termination				

Mechanical Specifications

Size	
Length	3.5 in [88.9 mm]
Width	1 in [25.4 mm]
Height	0.83 in [21.08 mm]
Weight	0.512 lbs [232.24 g]

Click the following link (or enter part number in “SEARCH” on website) to obtain additional part information including price, inventory and certifications: WR-15 Waveguide 20 dB Broadwall Coupler, UG-385/U Round Cover Flange, H-Plane Coupled Port, 50 GHz to 75 GHz, Brass Copper PE-W15CP001-20

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Interface

Waveguide Size	WR-15
Flange Type	Round Cover
Flange Designation	UG-385/U
Flange Material and Plating	Brass Copper, Gold
Coupler Body Material and Plating	Brass Copper, Gold

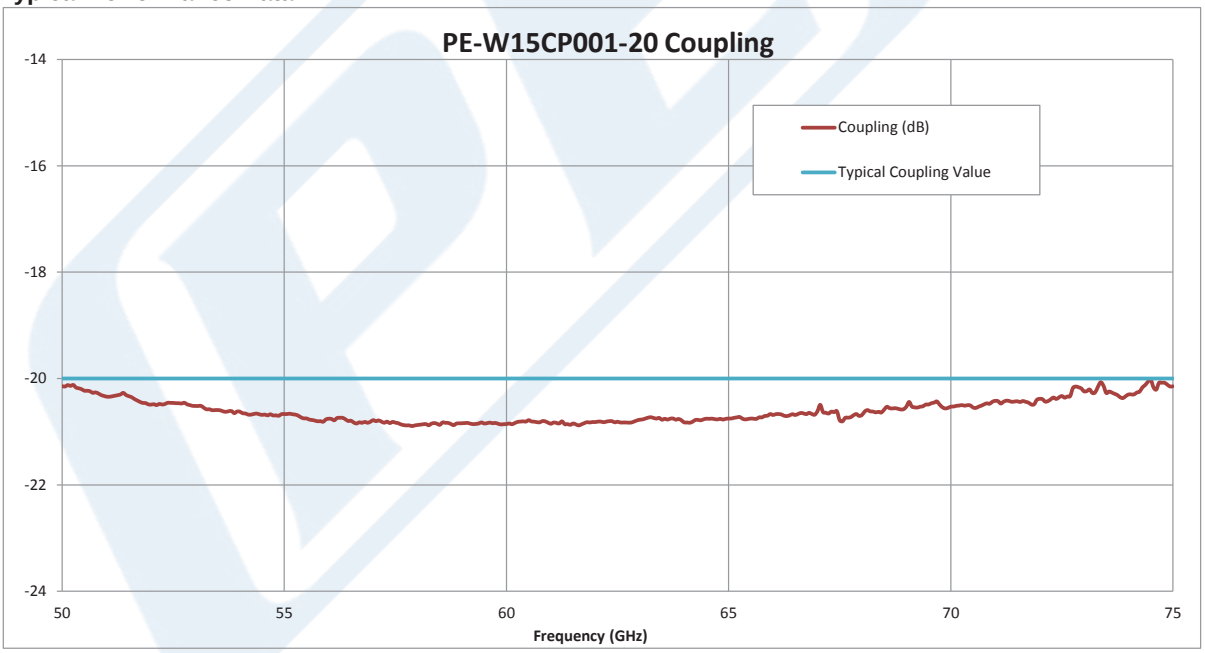
Environmental Specifications

Compliance Certifications (see product page for current document)

Plotted and Other Data

Notes:

Typical Performance Data



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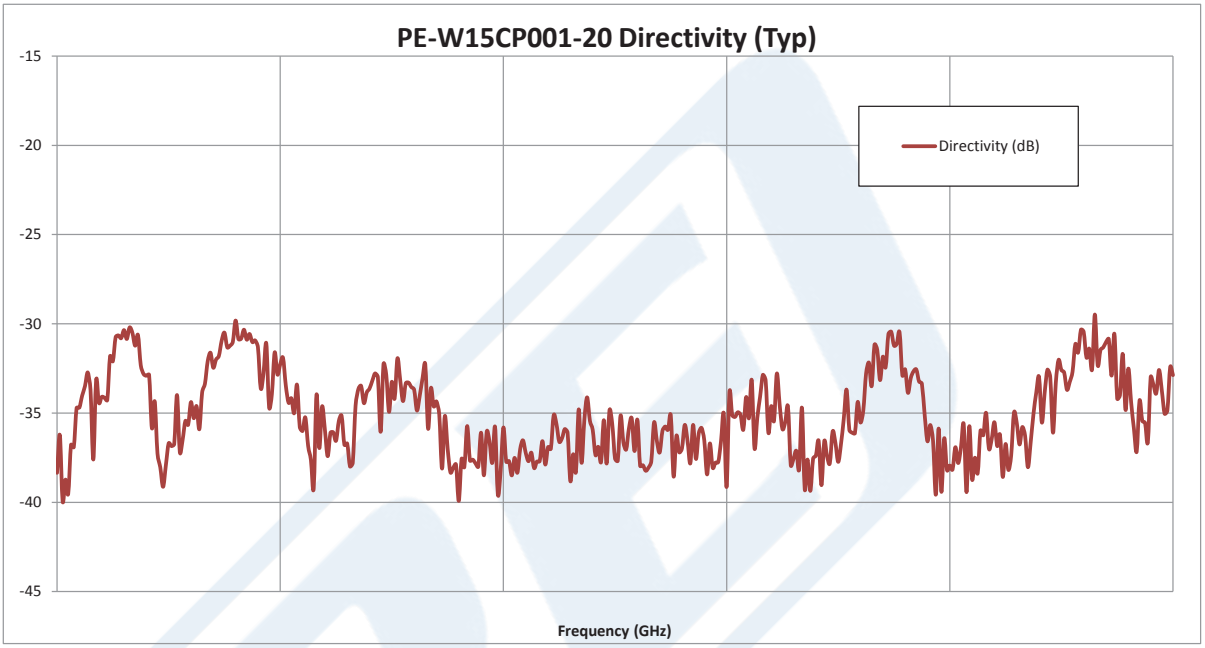

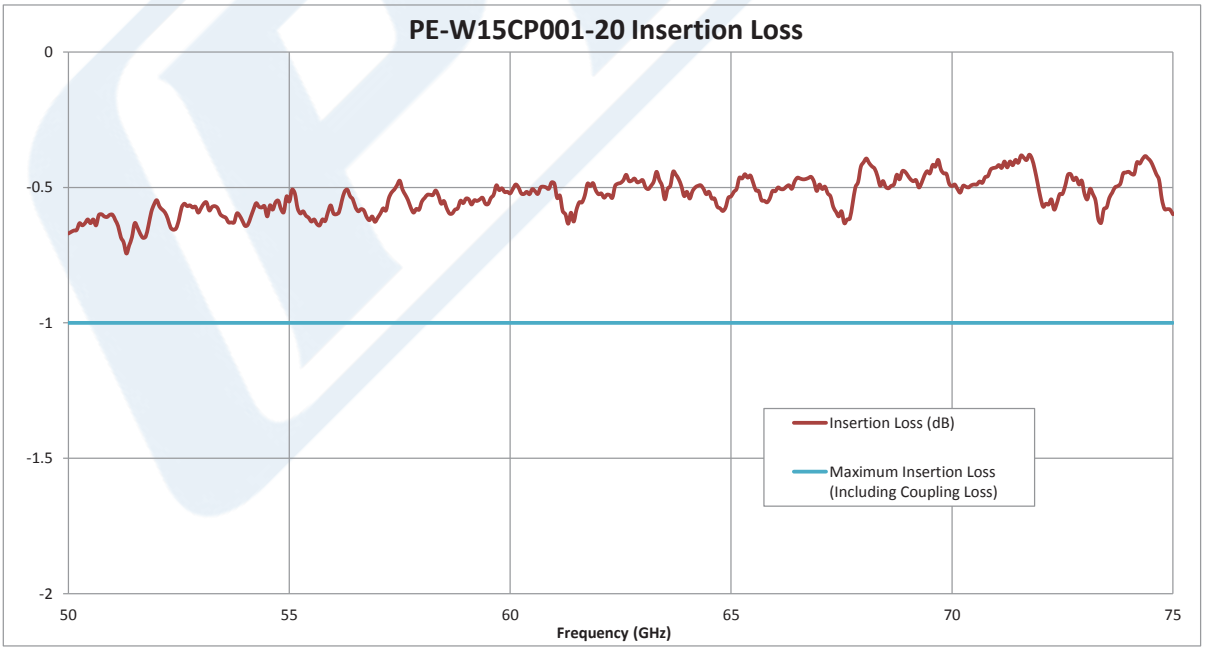

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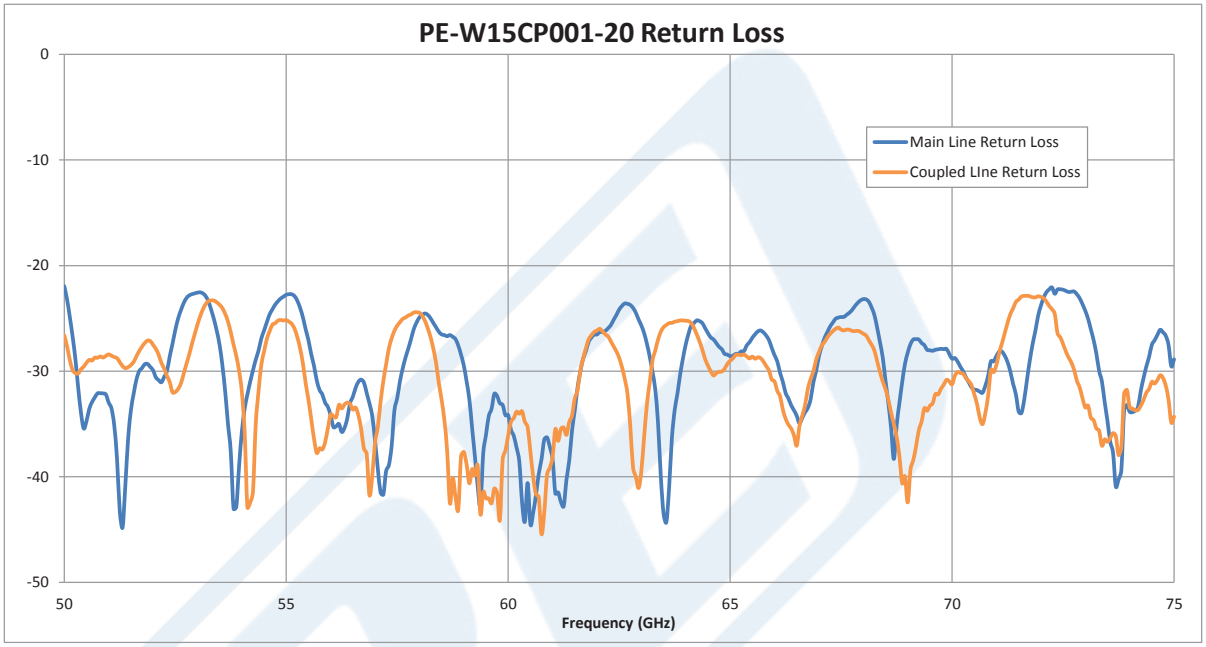

WR-15 Waveguide 20 dB Broadwall Coupler, UG-385/U Round Cover Flange, H-Plane Coupled Port, 50 GHz to 75 GHz, Brass Copper from Pasternack Enterprises has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99.4% availability and are part of the broadest selection in the industry.

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URL: https://www.pasternack.com/wr-15-20db-directional-waveguide-coupler-ug-385-h-bend-pe-w15cp001-20-p.aspx

The information contained in this document is accurate to the best of our knowledge and representative of the part described herein. It may be necessary to make modifications to the part and/or the documentation of the part, in order to implement improvements. Pasternack reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Pasternack does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Pasternack does not assume any liability arising out of the use of any part or documentation.

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PE-W15CP001-20 CAD Drawing

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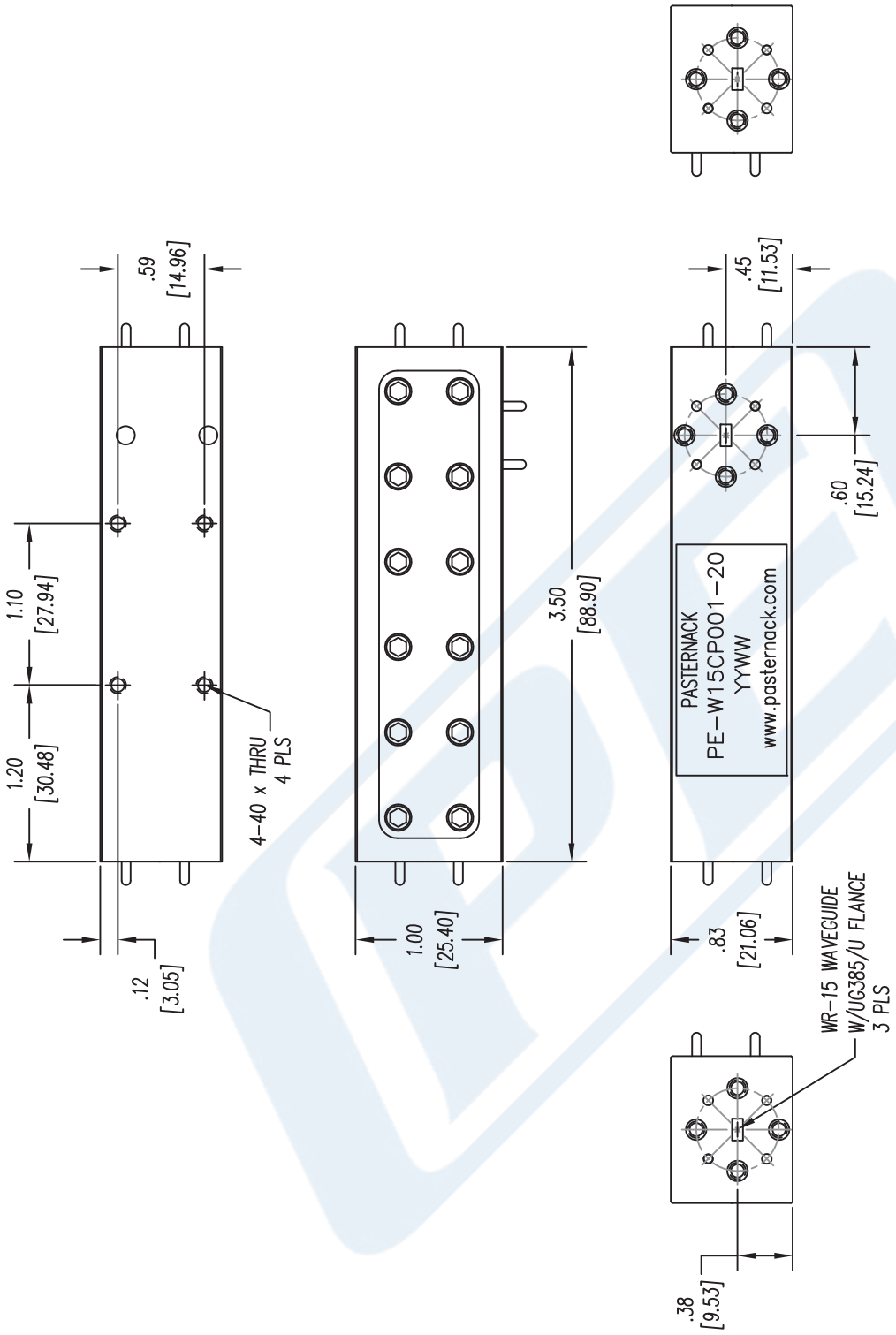

UNLESS OTHERWISE SPECIFIED:
DIMENSIONS ARE IN: inches
TOLERANCES ARE: [mm]
.XX ± .02 [±.51]
.XX ±.005 [±.13]

* THESE DIMENSIONS AND TOLERANCES SUPERSEDE NOTE #1 ON TITLE BLOCK.

NOTES:
1. UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.
2. ALL SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE AT ANY TIME.
3. DIMENSIONS ARE IN INCHES [mm].

DWG TITLE
PE-W15CP001-20

FSCM NO. 53919

CAD FILE 041615 | SCALE N/A | SIZE A | 2233

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