

FMWCT1084 DATA SHEET

20 dB WR-112 Waveguide Crossguide Coupler with UG-51/U Square Cover Flange and SMA Female Coupled Port from 7.05 GHz to 10 GHz in Bronze

The FMWCT1084 is a 20 dB WR-112 four port crossguide coupler with one coupled port terminated (making it a three port coupler) and a coax adapter on the opposite coupled port. This coupler can be mounted directly into the waveguide signal path, connected via coax to allow signal sampling / monitoring. The coupler has a typical VSWR of 1.05:1 and are made of bronze with brass UG-51/U Square Cover flanges. The FMWCT1084 is part of a family of cross guide couplers offered by Fairview with coupling values ranging from 20 to 50 dB. There is also a full family of top wall (broad wall) couplers. For the three port version of this coupler (terminated but no coax adapter) please see the FMWCT1028. For the four port version of this coupler (no termination, no coax adapter) please see the FMWCP1063.

Electrical Specifications

Description	Min	Тур	Мах	Units
Frequency Range	7.05		10	GHz
Impedance		50		Ohms
Coupler				
Nominal Coupling Lev	el	20		dB
Directivity		45		dB
Insertion Loss		0.1		dB
Main Line VSWR		1.05:1		
Termination				
Input Power (CW)			5	Watts

1.25:1



Features:

- Three Port
- Crossguide Waveguide Coupler
- Terminated
- 20 dB Nominal Coupling Level
- SMA Female Coax Adapter
- 7.05 GHz to 10 GHz Frequency Range
- Waveguide Body made of Bronze with Brass Flanges
- Low VSWR

Applications:

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

Mechanical Specifications

VSWR

Waveguide to Coax Adapters

Interface Waveguide Size Flange Type Flange Designation Flange Material and Plating RF Connector Type Coupler Body Material and Plating

WR-112 Square Cover UG-51/U Brass SMA Female Bronze

Bronze

Coupler Body Material and Plating Termination Body Material and Plating

Environmental Specifications

Compliance Certifications (see product page for current document)

Plotted and Other Data

Notes:

Fax: (972) 649-6689 www.fairviewmicrowave.com sales@fairviewmicrowave.com

Tel: 1-800-715-4396 / (972) 649-6678

Fairview Microwave 1130 Junction Dr. #100 Allen, TX 75013





10.0

Typical Performance Data

7.05 GHz

3.0			VSWR			
2.8						
2.6						
2.4						
2.2						
2.0						
1.8						
1.6						
1.4						
1.2						
1.0						
7.05 GHz	7.5	8.0	8.5	9.0	9.5	10.0
0 dB			Coupling Val	Je		
-5.0						
-10.0						
-15.0						
-20.0						
-25.0						
-30.0						
-35.0						
-40.0						
-45.0						
-50.0						

8.5

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8.0

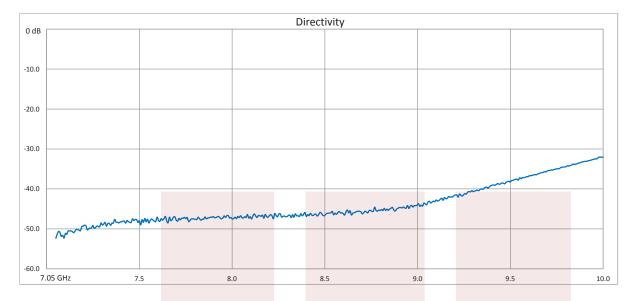
7.5

9.0

9.5







20 dB WR-112 Waveguide Crossguide Coupler with UG-51/U Square Cover Flange and SMA Female Coupled Port from 7.05 GHz to 10 GHz in Bronze from Fairview Microwave is in-stock and available to ship same-day. All of our RF/microwave products are available off-the-shelf from our ISO 9001:2008 certified facilities in Allen, Texas. Fairview Microwave is RF on-demand.

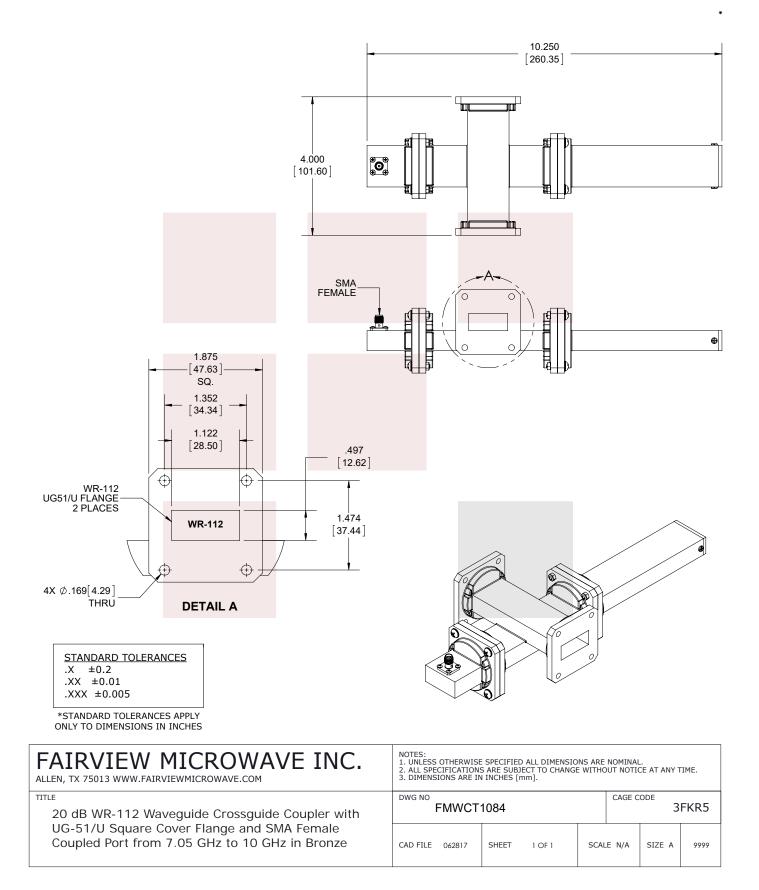
For additional information on this product, please click the following link: 20 dB WR-112 Waveguide Crossguide Coupler with UG-51/U Square Cover Flange and SMA Female Coupled Port from 7.05 GHz to 10 GHz in Bronze FMWCT1084

URL: https://www.fairviewmicrowave.com/20db-wr112-waveguide-crossguide-coupler-ug51-square-sma-10ghz-fmwct1084-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. Fairview Microwave reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Fairview Microwave does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Fairview Microwave does not assume any liability arising out of the use of any part or documentation.







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