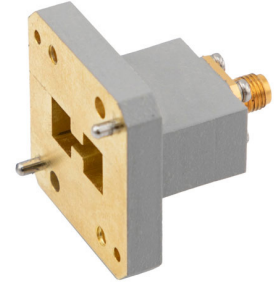


WRD-650 to SMA Female Waveguide to Coax Adapter UG Square Cover with 6.5 GHz to 18 GHz in Copper Alloy



**FMWCA1117**

**Features**

- 6.5 GHz to 18 GHz Frequency Range
- WRD-650 Double Ridge Waveguide Interface
- UG Square Cover Flange
- SMA Female RF Interface
- Comprehensive waveguide offering also include E-Bends, H-Bends, Sections, Filters, Terminations, Couplers, and more.

**Applications**

- Test Benches
- Radar
- Satellite
- Microwave Radio Systems
- Military and Space
- Communication Systems

**Description**

The FMWCA1117 is an end launch double ridge waveguide to coaxial adapter operating at a frequency range of 6.5 GHz to 18 GHz. This adapter offers a WRD-650 waveguide interface size coupled with a precision tolerance Square Cover flange. The FMWCA1117 is constructed of copper alloy and painted gray to ensure durability. The coaxial connector offered by this adapter uses an SMA Female connector.

**Configuration**

Waveguide Size	WRD-650
Flange	UG Square Cover
RF Connector	SMA Female
Impedance	50 Ohms
Body Geometry	End Launch

**Electrical Specifications**

Description	Minimum	Typical	Maximum	Units
Frequency Range	6.5		18	GHz
VSWR		1.5:1		
Insertion Loss			0.5	dB
Input Power (CW)			50	Watts

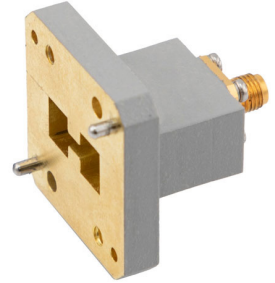
**Mechanical Specifications**

<b>Size</b>	
Length	1.36 in [34.54 mm]
Width	0.91 in [23.11 mm]
Height	1.378 in [35 mm]
Weight	1 lbs [453.59 g]

<b>RF Connector</b>	
Connector Type	SMA Female

<b>Waveguide Interface</b>	
Waveguide Type	WRD-650
Flange Type	Square Cover
Flange Designation	UG
Body Material and Plating	Copper Alloy

## WRD-650 to SMA Female Waveguide to Coax Adapter UG Square Cover with 6.5 GHz to 18 GHz in Copper Alloy



### FMWCA1117

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#### Environmental Specifications

##### Temperature

**Compliance Certifications** (see [product page](#) for current document)

#### Plotted and Other Data

##### Notes:

- Values at +25 °C, sea level unless stated otherwise

#### Typical Performance Data

WRD-650 to SMA Female Waveguide to Coax Adapter UG Square Cover with 6.5 GHz to 18 GHz in Copper Alloy 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 Lewisville, Texas. Fairview Microwave is RF on-demand.

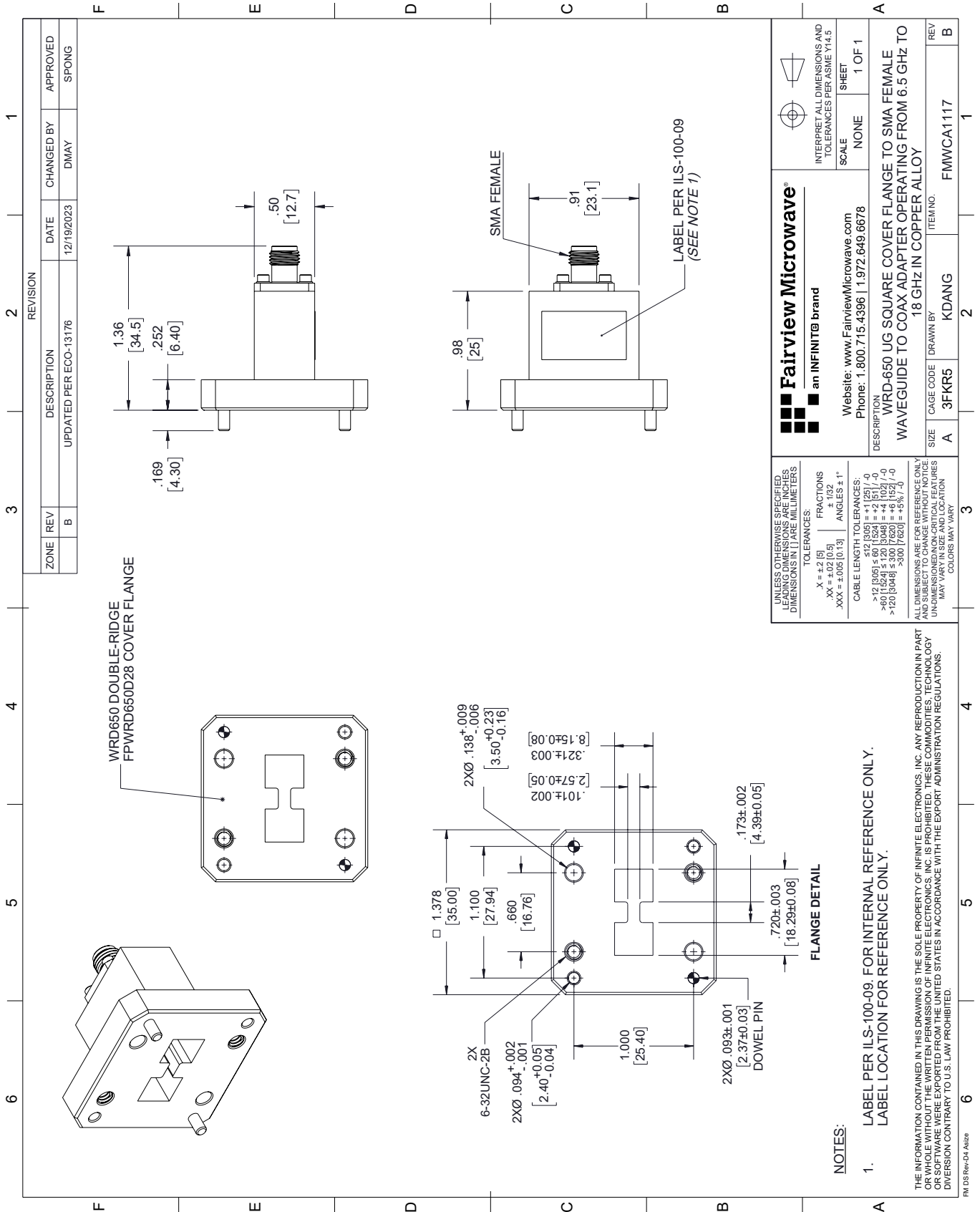
For additional information on this product, please click the following link: [WRD-650 to SMA Female Waveguide to Coax Adapter UG Square Cover with 6.5 GHz to 18 GHz in Copper Alloy FMWCA1117](#)

URL: <https://www.fairviewmicrowave.com/wrd650-sma-female-end-launch-waveguide-coax-adapter-ug-square-fm-wca1117-p.aspx>

The information contained within 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 liability arising out of the use of any part or document.

# FMWCA1117 CAD Drawing

WRD-650 to SMA Female Waveguide to Coax Adapter UG Square Cover with 6.5 GHz to 18 GHz in Copper Alloy



ZONE	REV	DESCRIPTION	DATE	CHANGED BY	APPROVED
	B	UPDATED PER ECO-13176	12/19/2023	DMAY	SPONG

**Fairview Microwave®**  
 an INFINIT® brand

Website: [www.FairviewMicrowave.com](http://www.FairviewMicrowave.com)  
 Phone: 1.800.715.4396 | 1.972.649.6678

DESCRIPTION: WRD-650 UG SQUARE COVER FLANGE TO SMA FEMALE WAVEGUIDE TO COAX ADAPTER OPERATING FROM 6.5 GHz TO 18 GHz IN COPPER ALLOY

SCALE: NONE  
 SHEET: 1 OF 1

INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5

SIZE	A	3FKR5	3
CAGE CODE	DRAWN BY: KDANG		
ITEM NO.	FMWCA1117		