# SWT-22188-SB

# WR-22 to 0.188" Diameter Circular Waveguide Mode Transition

**Model SWT-22188-SB** is a WR-22 to 0.188" Diameter Circular waveguide mode transition. The mode transition is manufactured by either EDM machining or electro-forming techniques to ensure high accuracy and a quality surface finish. The mode transition only induces a fraction of a dB insertion loss and offers a return loss of 32 dB or better. The nominal operating frequency is 43 to 50 GHz.



# **Mechanical Specifications:**

Item	Specification
Waveguide Size	WR-22 Waveguide with UG-383/U Flange
Waveguide Size	0.188" Diameter Circular Waveguide with UG-383/U-M Flange
Material	Brass
Finish	Gold Plated
Weight	0.8 Oz
Insertion Length	1.5"
Outline	WT-QC-188-A

## **ECCN**

EAR99

#### **FEATURES**

- Rugged Waveguide Configuration
- Low Insertion Loss
- Insturmentation Grade

### **APPLICATIONS**

- Test Labs
- Test Instrumentation
- Sub-Assemblies

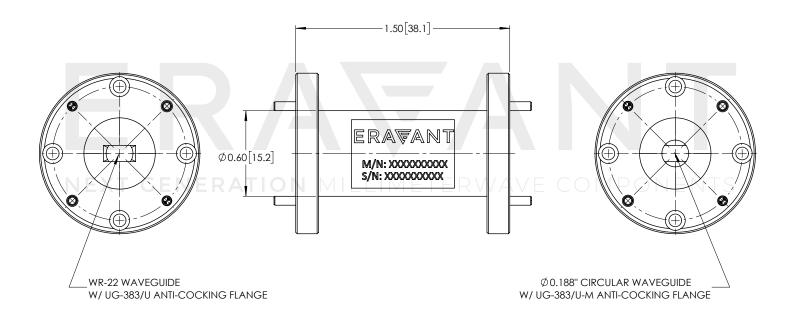
**SUPPLEMENTAL DETAILS** 

NEXT GENERATION MILLIMETERWAVE COMPONENTS



## **Mechanical Outline:**

Unless otherwise specified, all dimensions are in inches [millimeters])



#### NOTE:

- On condition that test data is provided it is collected from a sample lot. Actual data may vary slightly from unit to unit. All testing is performed under +25 °C room temperature.
- On condition that simulated test data is provided, actual measured data may slightly vary.
- Eravant reserves the right to change the information presented without notice.

#### **CAUTION:**

- If a waveguide is present, any foreign objects in the waveguide will cause performance degradation and may damage or destroy the unit.
- For 1 mm connectors proper torque should be applied: 4.0 ± 0.15 inch-pounds (0.45 ± 0.02 Nm).
  Torque wrench model <u>SCH-06004-S1</u> is highly recommended.
- For 1.35 mm, 1.85 mm, 2.4 mm, 2.92 mm, and SMA connectors proper torque should be applied: 8.0 ± 0.15 inch-pounds (0.90 ± 0.02 Nm). Torque wrench model <u>SCH-08008-S1</u> is highly recommended.