SWC-34KF-R1-V and SWC-34KM-R1-V

WR-34 Band Waveguide to 2.92mm Connector Adapter, Right Angle, Thermal Vacuum Safe

SWC-34KF-R1-V and **SWC-34KM-R1-V** are right angle (90°) WR-34 waveguide to coax adapters that cover the frequency range of 22 to 33 GHz. They are designed and manufactured for instrumentation grade quality and thermal vacuum compatibility, allowing for an efficient transition between the rectangular waveguide and 2.92 mm (K) coax connector.



Electrical Specifications:

| Parameter | Minimum | Typical | Maximum |
|---------------------------|---------|---------|---------|
| Frequency Range | 22 GHz | | 33 GHz |
| Insertion Loss | | 0.35 dB | 0.5 dB |
| Return Loss | 17 dB | 20 dB | |
| Specification Temperature | | +25°C | |
| Operating Temperature | -40°C | | +85°C |

Mechanical Specifications:

| Item | Specification | | |
|--------------|--|--|--|
| Waveguide | WR-34 Waveguide with UG-1530/U Flange | | |
| Coaxial Port | 2.92 mm (K) Female for Model Number: SWC-34KF-R1-V | | |
| Coaxial Port | 2.92 mm (K) Male for Model Number: SWC-34KM-R1-V | | |
| Material | Aluminum | | |
| Finish | Gold Plated | | |
| Weight | 0.5 Oz | | |
| Outline | WC-3R | | |

ECCN

EAR99

FEATURES

- · Thermal Vacuum Safe
- Broad Band Coverage
- Lower Insertion Loss and VSWR
- Instrumentation Grade
- DC Open Circuit

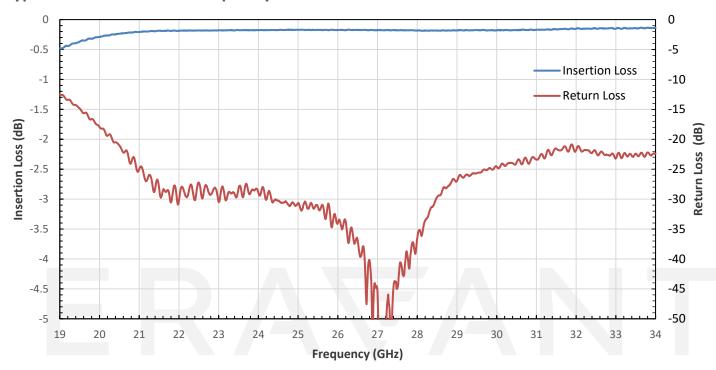
APPLICATIONS

- Thermal Vacuum Chamber
- Test Lab
- Instrumentations
- Sub-assemblies

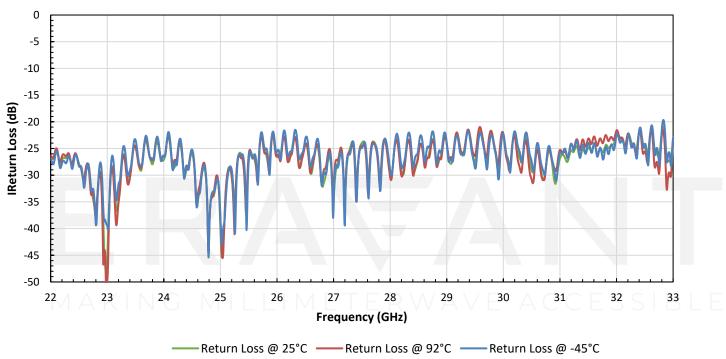
SUPPLEMENTAL DETAILS



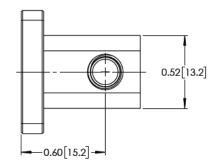
Typical Performance vs. Frequency

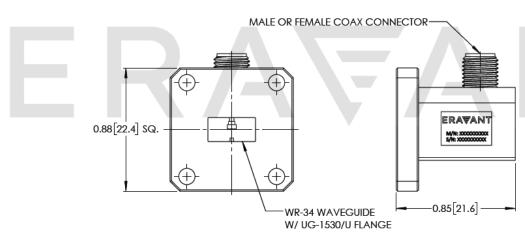


Thermal Vacuum Testing (TVAC) Performance @ 10⁻⁶ Torr



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.
- Unit cost does not include TVAC testing. TVAC testing to demonstrate the thermal stability of the unit can be provided at a separate cost.
- Eravant reserves the right to change the information presented without notice.

CAUTION:

- · Any foreign objects in the waveguide will cause performance degradation and may damage or destroy the unit.
- 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.

MAKING MILLIMETERWAVE ACCESSIBLE