

WR-03 Noise Source with TTL, 10 dB ENR

STZ-22427410-03-IT2 is a WR-03 noise source that delivers 10 dB nominal ENR across the frequency range of 220 to 270 GHz. The RF port has WR-03 Waveguide with UG-387/U-M Anti-Cocking Flange and the DC bias port is equipped with a female BNC connector, which is readily available for standard noise figure meter and noise figure analyzer interfaces. The noise source is designed with improved port return loss for more reliable and accurate noise figure measurements. The module can work also in either CW or pulse AM mode up to 1 kHz depending on the driving signal. The noise source features TTL triggering signal port for automatic test systems and a toggle switch to manually turn the module on and off. A Calibration Certificate for ENR values will be included.



Electrical Specifications:

| Parameter | Minimum | Typical | Maximum |
|---------------------------|---------------------|---------------------|---------------------|
| Input Frequency | 220 GHz | | 270 GHz |
| ENR | | 10 dB | |
| ENR Flatness | | ±3 dB | |
| AM Modulation Rate | | 1 kHz | |
| Return Loss | | 13 dB | |
| DC Voltage | +15 V _{DC} | +28 V _{DC} | +30 V _{DC} |
| DC Current | | 70 mA | |
| Specification Temperature | | +25°C | |
| Operating Temperature | 0°C | | +50°C |

Mechanical Specifications:

| Item | Specification | | |
|----------------|---|--|--|
| RF Output Port | WR-03 Waveguide with UG-387/U-M Anti-Cocking Flange | | |
| Bias Port | BNC (F) | | |
| TTL Port | SMA (F) | | |
| Power Switch | Toggle | | |
| Material | Aluminum / Brass | | |
| Finish | Gold Plated | | |
| Outline | TZ-W03-A | | |

ECCN

EAR99

FEATURES

- · Precision Calibrated
- Excellent Return Loss

APPLICATIONS

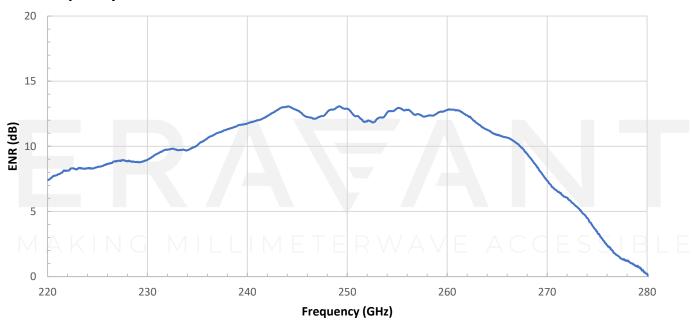
- Test Lab
- Instrumentations



Included Accessory Components:

| Item | Eravant Model Number | Quantity |
|--|----------------------|----------|
| Waveguide Screwdriver, 3/32 Hex Head | SWH-332-DS | 1 |
| Waveguide Flange Hardware Kit | | 1 |
| USB Flash Drive with Calibration/Test Data | | 1 |

ENR vs. Frequency



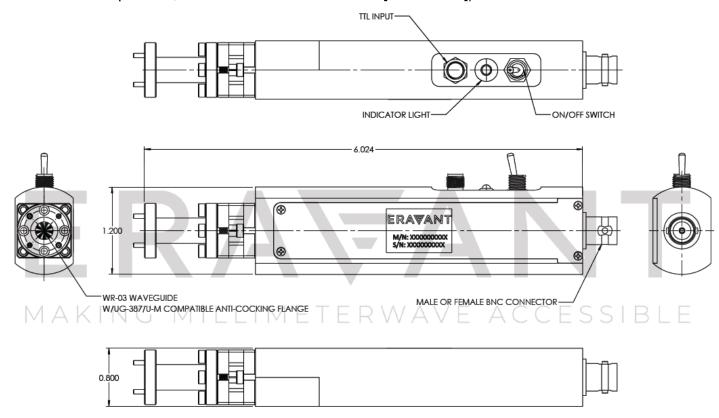
ERAFANT

MAKING MILLIMETERWAVE ACCESSIBLE



Mechanical Outline:

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



NOTE:

- All data presented is collected from a sample lot. Actual data may vary unit to unit.
- All testing was performed under +25°C case temperature.
- Eravant reserves the right to change the information presented without notice.
- Other mechanical configurations are available under different model numbers.

CAUTION:

- Exceeding absolute maximum ratings shown will damage the device.
- The device is static sensitive. Always follow ESD rules when working with the device.

MAKING MILLIMETERWAVE ACCESSIBLE

Appendix: Case View with Included Components



ERAFANT

MAKING MILLIMETERWAVE ACCESSIBLE