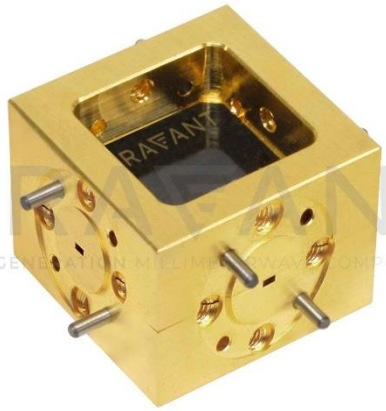
SWX-14422420-05-4B

Waveguide Crossguide Coupler, G Band, 20 dB

SWX-14422420-05-4B is a four-port, split block crossguide coupler that is offered for power sampling where directivity is of no concern. Compared to a multi-hole directional coupler, crossguide couplers offer lower insertion loss and a smaller form factor and insertion length. This model operates between 140 to 220 GHz with a 20 dB typical coupling level and 2 dB nominal insertion. The input, output, and coupled ports are all WR-05 waveguides with UG-387/U-M anti-cocking flanges.



Electrical Specifications:

Parameter	Minimum	Typical	Maximum
Frequency	140 GHz		220 GHz
Insertion Loss*		2 dB	
Coupling		20 dB	
Directivity		10 dB	
Return Loss		18 dB	
Specification Temperature		+25°C	
Operating Temperature	-40°C		+85°C

*Performance may be reduced at band edges.

Mechanical Specifications:

Item	Specification
Waveguide Ports	WR-05 Waveguide with UG-387/U-M Anti-Cocking Flange
Material	Aluminum
Finish	Gold Plated
Weight	0.9 Oz
Outline	WX-BG-4-F4-A

ECCN

EAR99

FEATURES

- Full Band Operation
- Low Insertion Loss
- Moderate Directivity
- Four Port Configuration

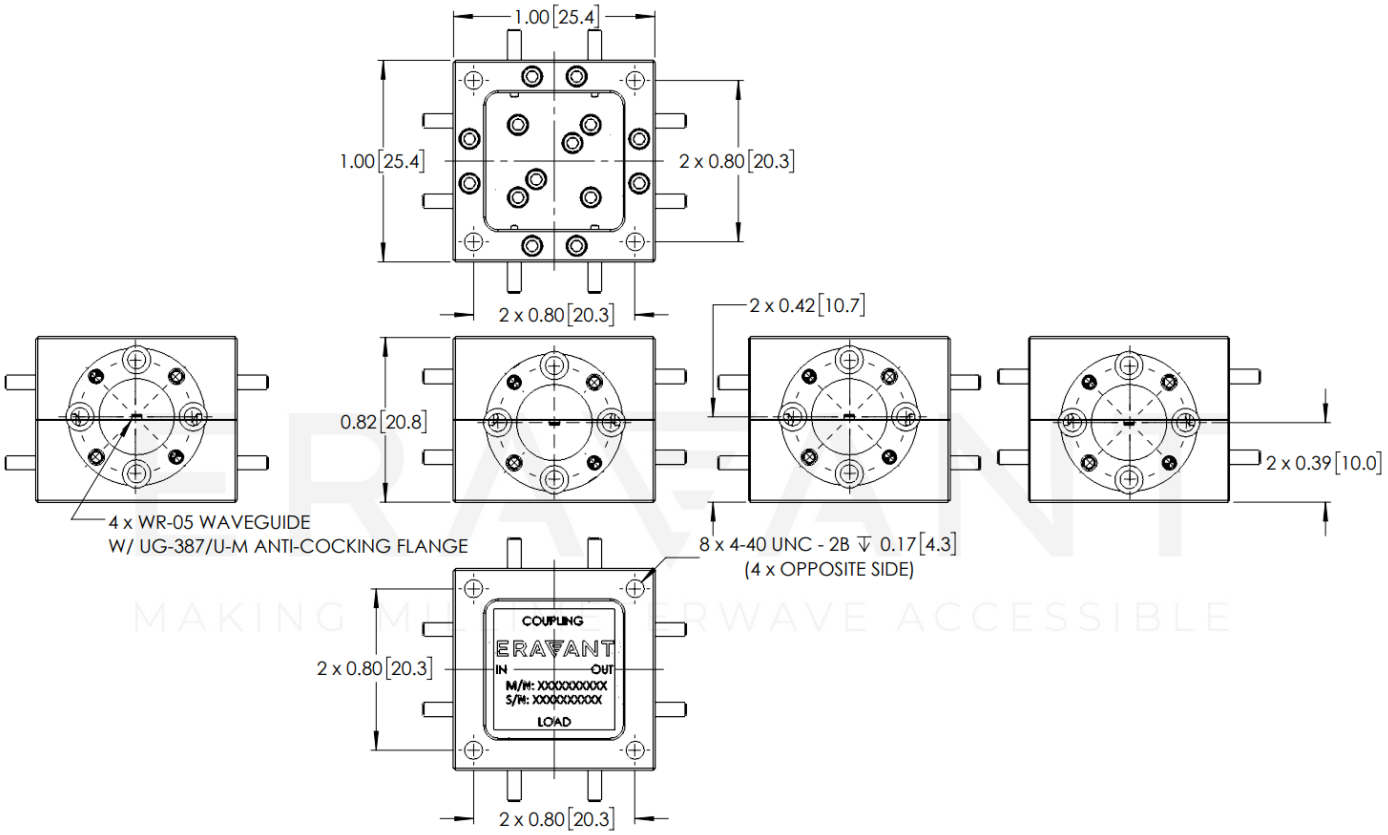
APPLICATIONS

- Test Labs
- Instrumentations
- Sub-assemblies

SUPPLEMENTAL DETAILS

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.