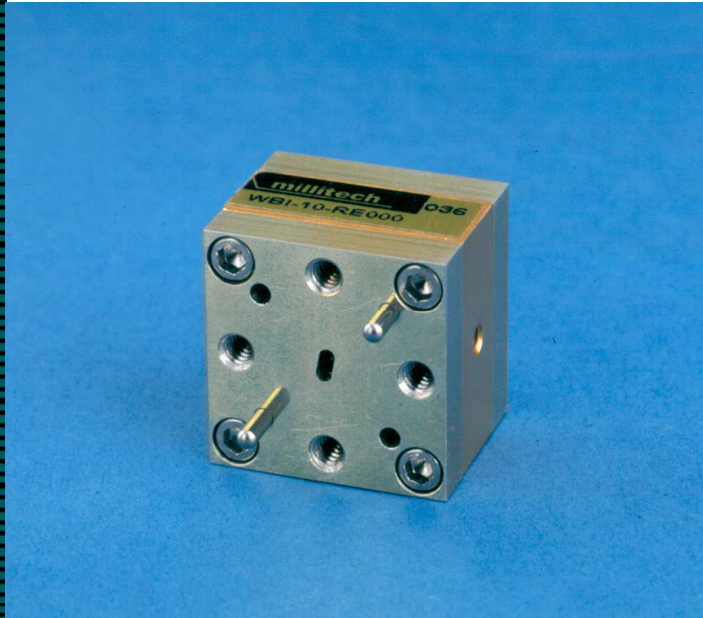


SERIES WBI

WIDEBAND ISOLATORS



FEATURES:

- 74% bandwidth in WR-10
- Low insertion loss
- High isolation
- Compact size
- Cryogenically coolable (option)
- Hi-rel versions available

APPLICATIONS:

- Radioastronomy
- Wideband subsystems
- Instrumentation/test sets
- Plasma diagnostics

DESCRIPTION

Millitech series WBI isolators are the lowest loss, smallest size, wide bandwidth isolators available in the industry, making them ideally suited for applications requiring small size and wide bandwidth. Other inherent attributes are low insertion loss, high isolation, and flat frequency response.

These isolators are offered in two configurations: E- to H-plane and E- to E-plane. This feature eliminates the need for waveguide twists and is ideal for applications where space is limited. A more detailed description of these configurations can be found on the following pages.

Series WBI isolators feature lower insertion loss and a more compact size than the series FBI fullband isolators and are a wider bandwidth than the JFD junction isolators.

The WBI isolators can be cryogenically cooled to 77K for lower insertion loss performance. An option for testing at LN_2 temperature is provided in the "How to Order" section.

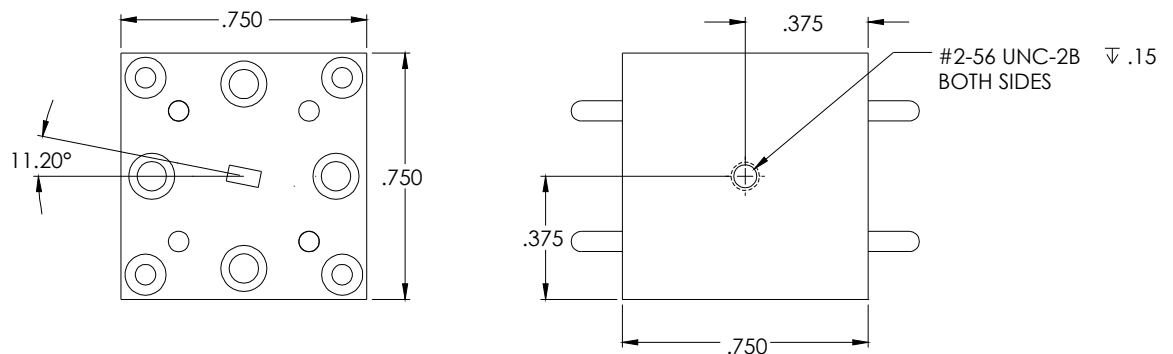
ELECTRICAL SPECIFICATIONS*1

Model Number	WR-10
Operational frequency range (GHz)	82 - 110
Insertion loss (dB) (max) ^{*2}	1.3
Insertion loss at 77K (dB) (typ)	0.6
Isolation (dB) (min) ^{*2}	20
VSWR (max) ^{*2}	1.5:1

*1 – At ambient temperature only.

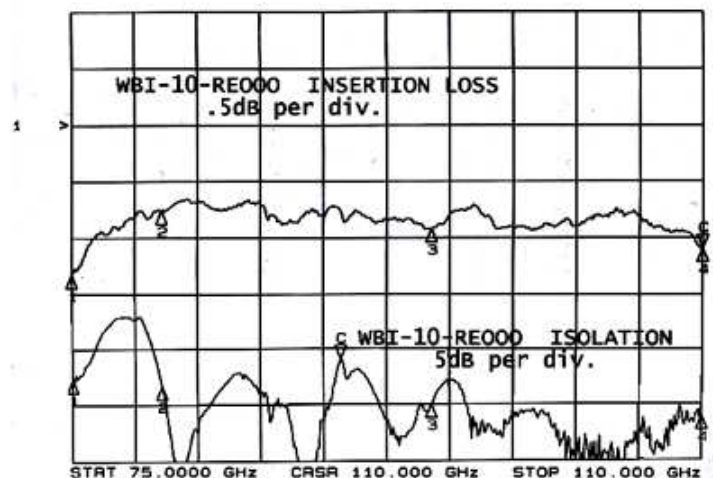
*2 – Includes mismatch due to port configuration.

Note: Can be tuned for cryogenic operation.

OUTLINE DRAWING (WBI-10-RE000)*


*The outlines shown may not reflect the latest information. Please contact Millitech for current outline drawings.

Note: All dimensions are in inches.

ACTUAL DATA


Millitech, Inc. • 29 Industrial Dr. East • Northampton, MA 01060

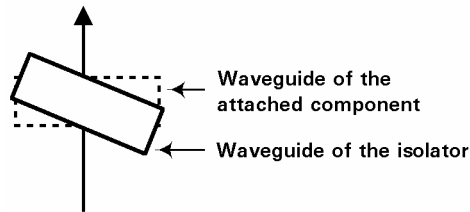
Ph. (413) 582-9620 • Fax (413) 582-9622

Email: info@millitech.com • Web Site: www.millitech.com

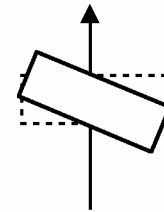
CONFIGURATIONS

E- to E-plane Configuration

Input Port

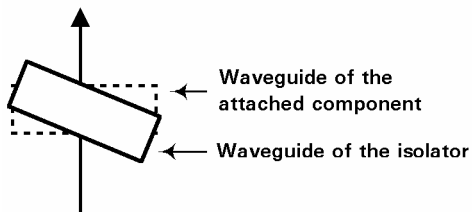


Output Port

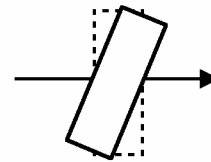


E- to H-plane Configuration

Input Port



Output Port



MECHANICAL SPECIFICATIONS

Model Number	WBI-10
Flange MIL.F-3922	/67B-010

HOW TO ORDER

Specify Model Number WBI-10-RBCØØ
B = Input-to-Output Configuration E – E- to E-plane H – E- to H-plane
C = Cooling Options C - Cryogenically tested at 77K Ø – Standard testing

To Order: series WBI in WR-10 with a round flange with an input-to-output configuration of E- to E-plane

Specify: WBI-10-REØØØ