



VDI Directional Coupler Specifications

Waveguide Band	WR15	WR12	WR10	WR8.0	WR6.5	WR5.1	WR4.3	WR3.4
Standard Frequency Coverage (GHz)	50-75	60-90	75-110	90-140	110-170	140-220	170-260	220-330
Directivity (typ.) (dB)	20	20	20	20	20	20	20	20
Insertion Loss (typ.) (dB)	2	2	2	2	2	2	2	2.5
Coupling Factor (typ.) (dB)	12, 22	12, 22	12, 22	12, 22	12, 22	12, 22	12, 22	12.5, 22.5
Divisional Ratio (typ.) (dB)	10, 20	10, 20	10, 20	10, 20	10, 20	10, 20	10, 20	10, 20
Product Name	WR2.8	WR2.2	WR1.5	WR1.0				
Standard Frequency Coverage (GHz)	260-400	330-500	500-750	750-1100				
Directivity (typ.) (dB)	20	20	15-20	10-20				
Insertion Loss (typ.) (dB)	2.5	3.5	3.5	9				
Coupling Factor (typ.) (dB)	12.5, 22.5	13.5, 23.5	13.5, 23.5	19, 29				
Divisional Ratio (typ.) (dB)	10, 20	10, 20	10, 20	10, 20				

*All waveguide flanges are UG-387/U-M.

General Notes:

- VDI offers directional couplers with 10dB and 20dB Divisional Ratios. Customers must indicate desired divisional ratio value on the PO.
- Typical divisional ratio expected to be within +/-1dB of specified value for WR15 to WR4.3 models and +/-2dB of specified value for WR3.4 to WR1.0 models. Performance may be reduced at band edges.
- Coupler data will not be provided. Contact VDI for coupler testing costs.
- Delivery may increase due to additional testing

How to Order:

Part Number: WRAADC-BB

AA = Output Waveguide Band (15, 12, 10, 8.0, ... for WR15, WR12, WR10, WR8.0, ... waveguide bands respectively)

BB = Divisional Ratio Option

Examples:

WR5.1DC-20 - 140-220GHz Directional Coupler with 20dB Divisional Ratio

WR10DC-10 - 75-110GHz Directional Coupler with 10dB Divisional Ratio

3 Port Coupler

