



20 dBi Gain, 21.7-33 GHz, WR34 Standard Gain Horn with 2.92mm Female Port

Rev 1

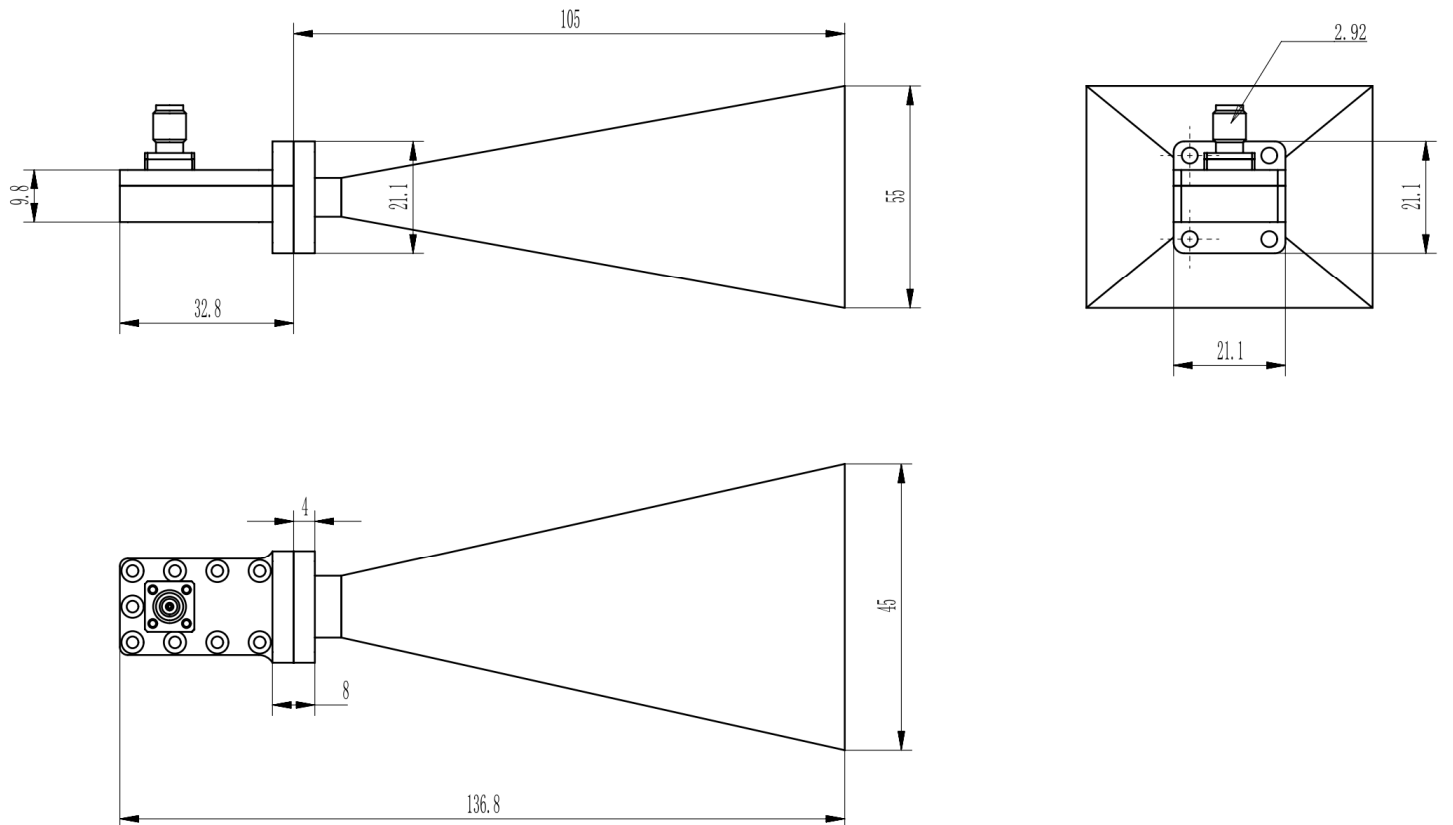
Electrical

Frequency Range	21.7-33 GHz
Norminal Gain	20 dBi
Polarization	Linear
VSWR	1.3 max
3dB Beamwidth	E-Plane: 12.5~17.8 deg, H-Plane: 11.1~15.8 deg
Operating Temperature	-40°C~+70°C

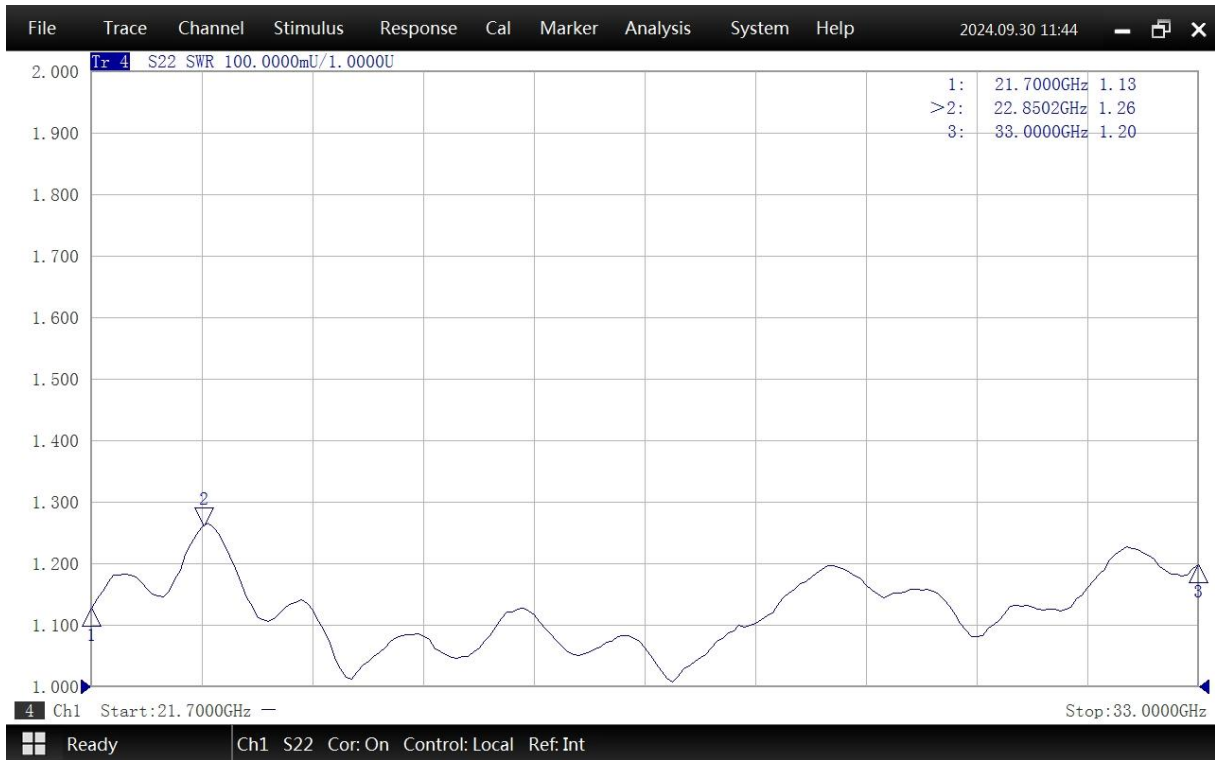
Mechanical

Waveguide Size	WR34
Flange Type	UBR260 Square Cover Flange
Body Material and Finish	Copper, Painted
RF Connector	2.92mm Female
Net Weight	Approx 170g

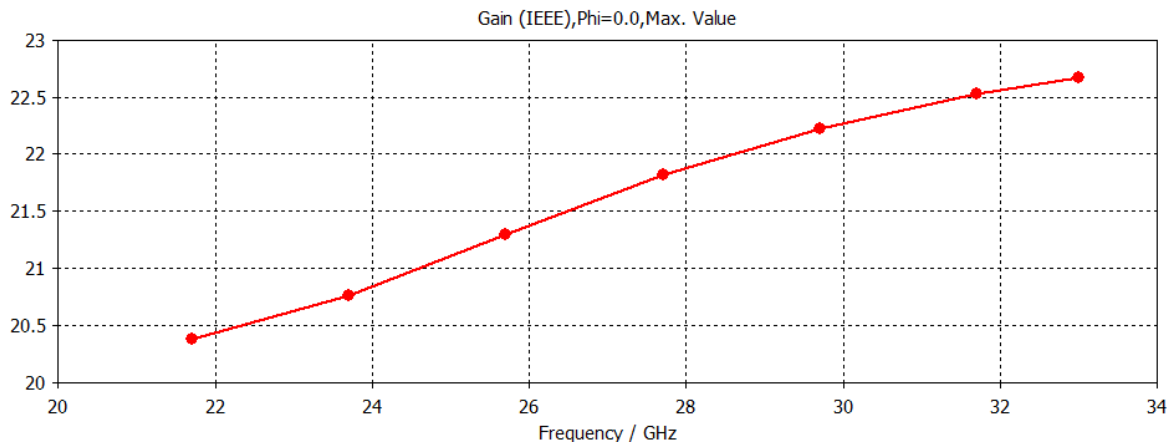
Dimensions(mm)



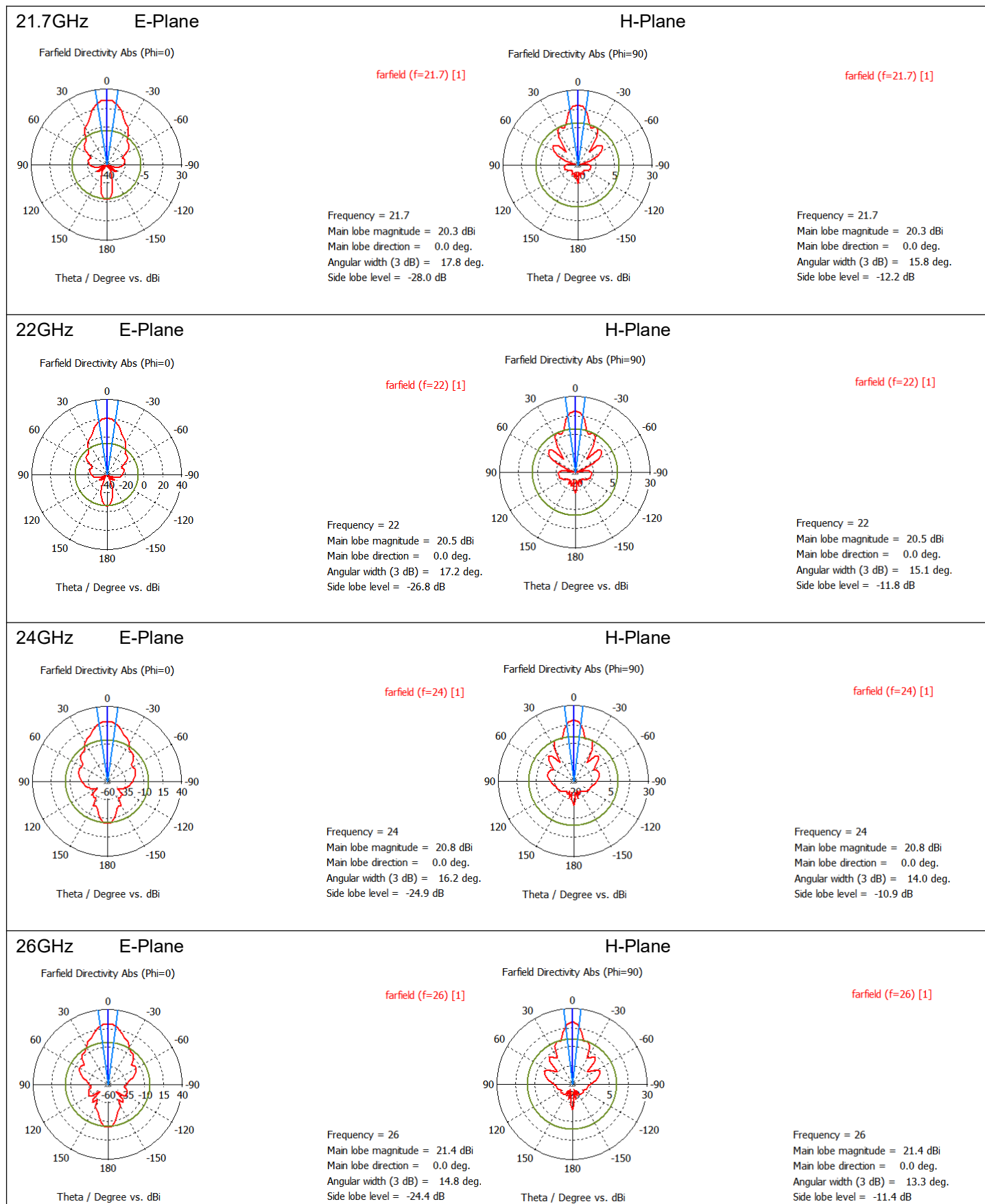
Typical VSWR



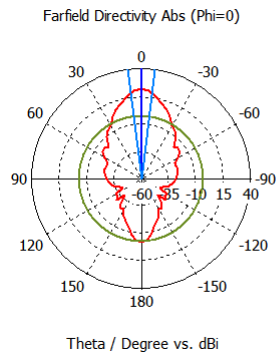
Gain



Simulated Antenna Patterns



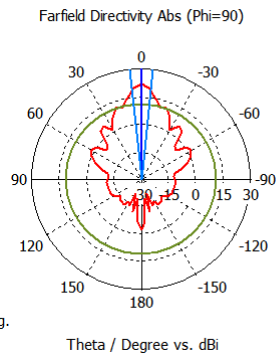
28GHz E-Plane



farfield (f=28) [1]

Frequency = 28
 Main lobe magnitude = 21.9 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 14.0 deg.
 Side lobe level = -24.6 dB

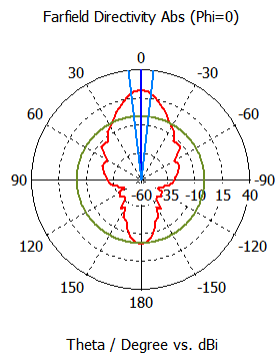
28GHz H-Plane



farfield (f=28) [1]

Frequency = 28
 Main lobe magnitude = 21.9 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 12.2 deg.
 Side lobe level = -10.7 dB

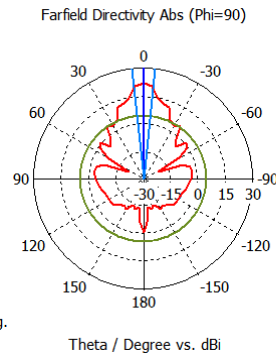
30GHz E-Plane



farfield (f=30) [1]

Frequency = 30
 Main lobe magnitude = 22.3 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 13.1 deg.
 Side lobe level = -23.4 dB

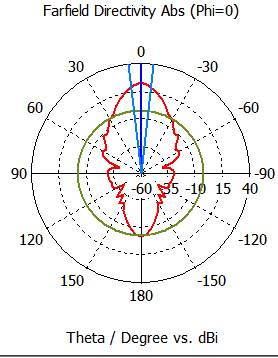
30GHz H-Plane



farfield (f=30) [1]

Frequency = 30
 Main lobe magnitude = 22.3 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 11.8 deg.
 Side lobe level = -17.6 dB

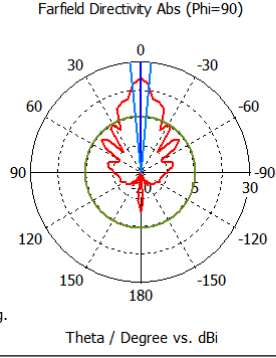
32GHz E-Plane



farfield (f=32) [1]

Frequency = 32
 Main lobe magnitude = 22.7 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 12.7 deg.
 Side lobe level = -24.7 dB

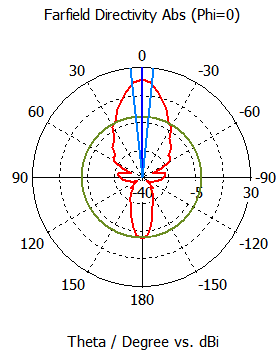
32GHz H-Plane



farfield (f=32) [1]

Frequency = 32
 Main lobe magnitude = 22.7 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 11.2 deg.
 Side lobe level = -17.2 dB

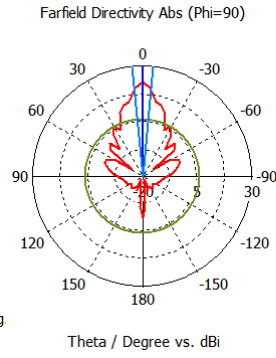
33GHz E-Plane



farfield (f=33) [1]

Frequency = 33
 Main lobe magnitude = 22.7 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 12.5 deg.
 Side lobe level = -23.9 dB

33GHz H-Plane



farfield (f=33) [1]

Frequency = 33
 Main lobe magnitude = 22.7 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 11.1 deg.
 Side lobe level = -16.6 dB