



20 dBi Gain, 26.3-40 GHz, WR28 Standard Gain Horn with UBR320 Flange

Rev 1

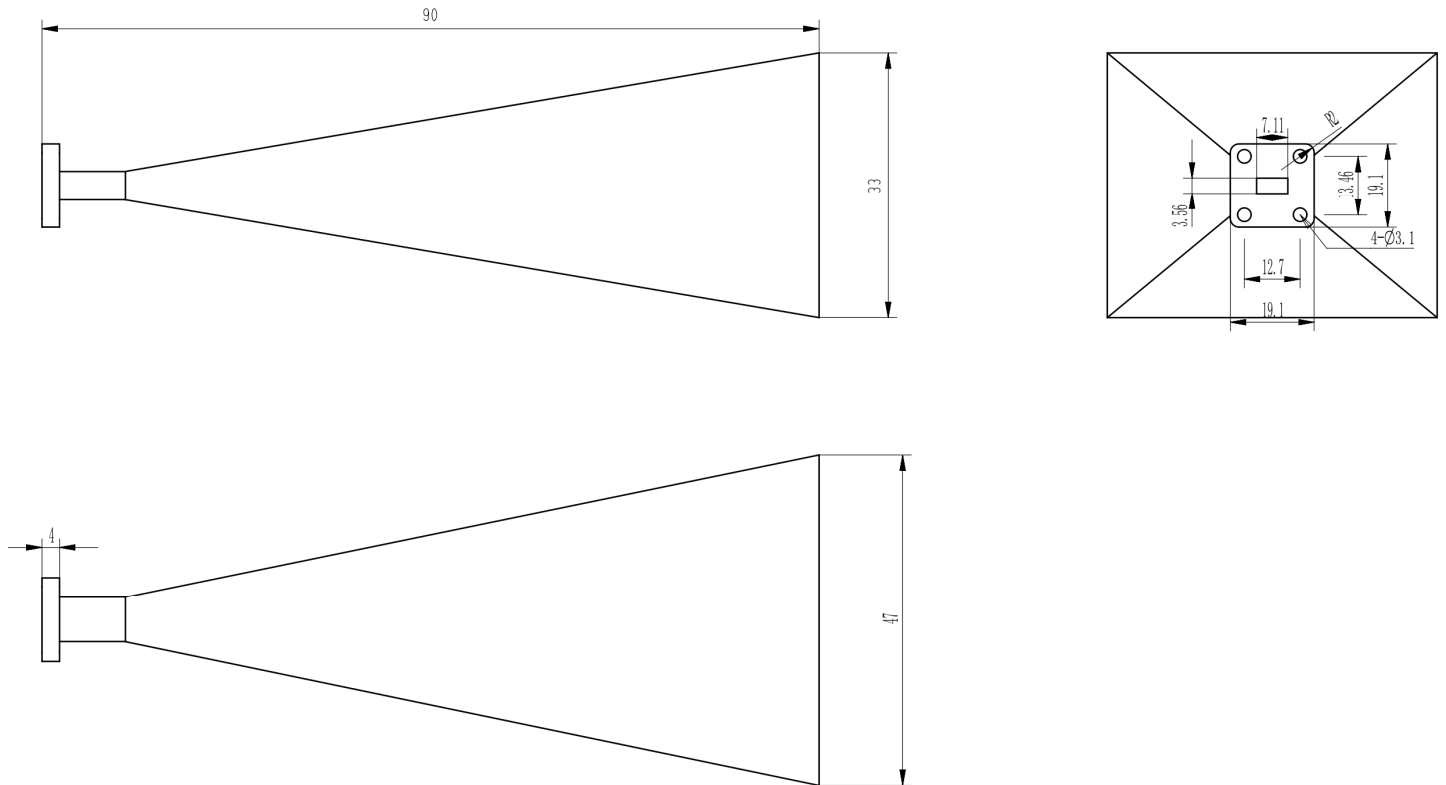
Electrical

Frequency Range	26.3-40 GHz
Norminal Gain	20 dBi
Polarization	Linear
VSWR	1.2 max
3dB Beamwidth	H-Plane: 11.9~17.2 deg, E-Plane: 11.6~17.7 deg
Operating Temperature	-40°C~+70°C

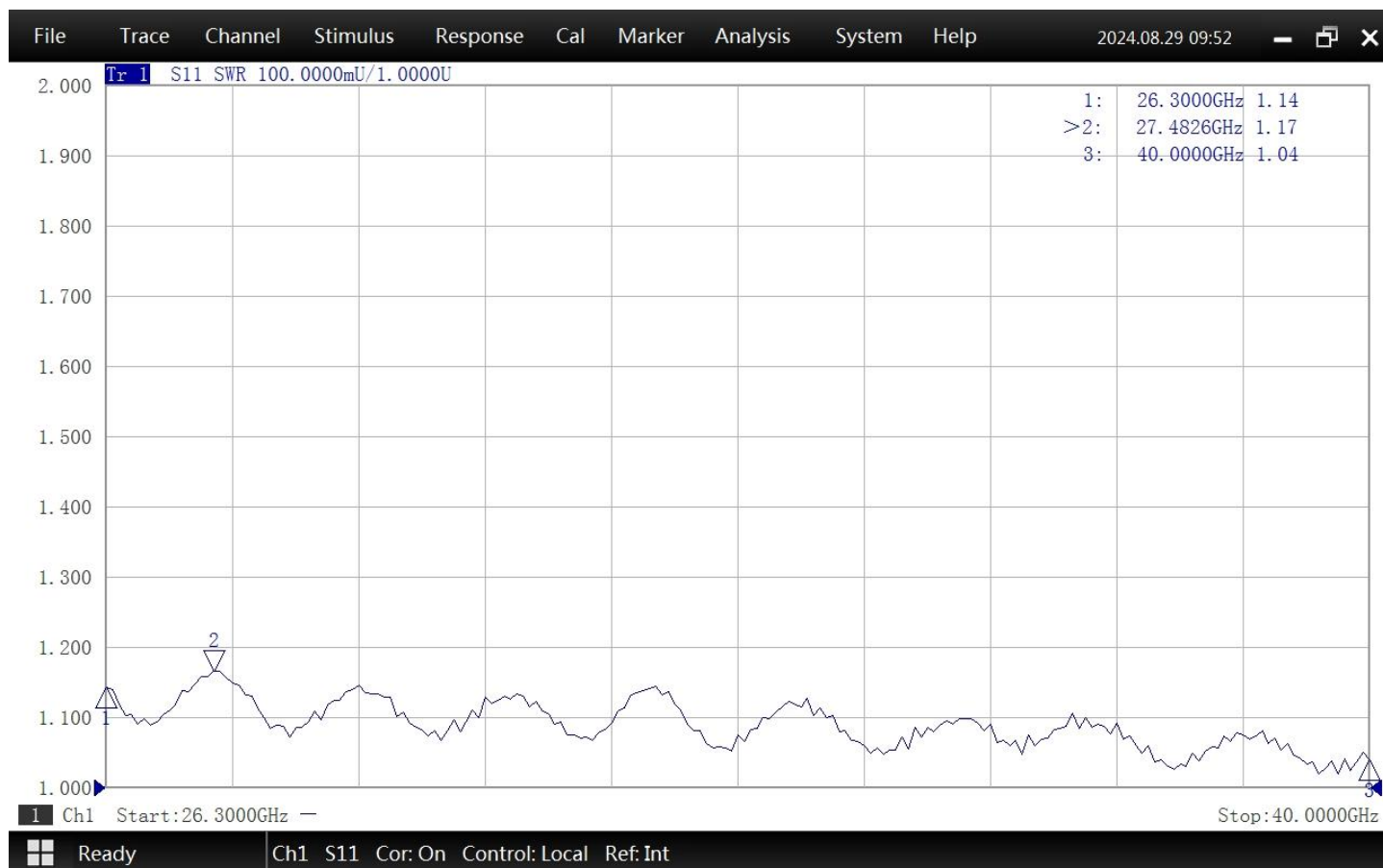
Mechanical

Waveguide Size	WR28
Flange Type	UBR320 Square Cover Flange
Body Material and Finish	Copper, Painted
Net Weight	75g

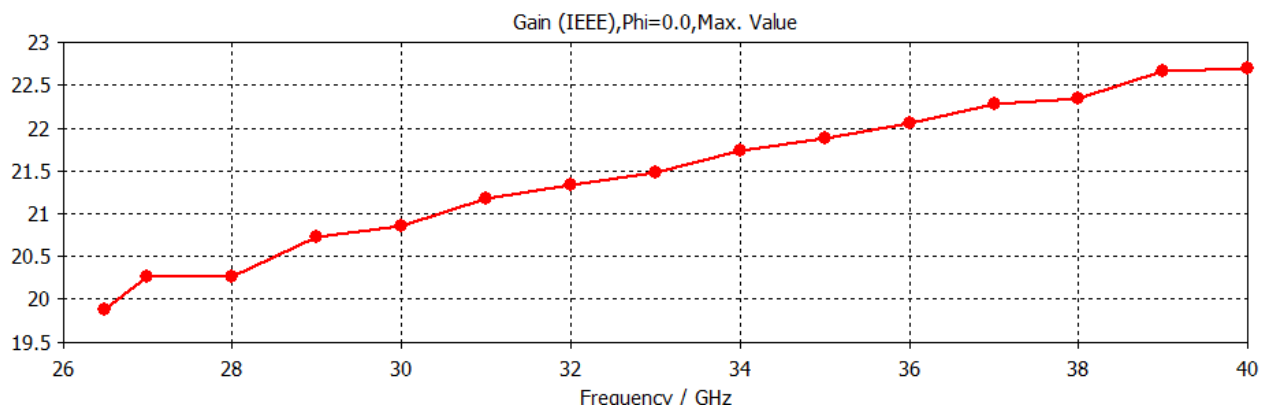
Dimensions(mm)



Typical VSWR

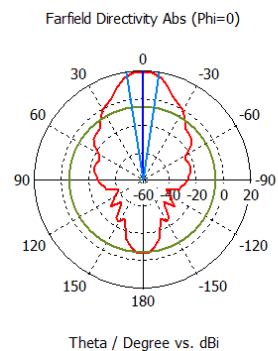


Gain



Simulated Antenna Patterns

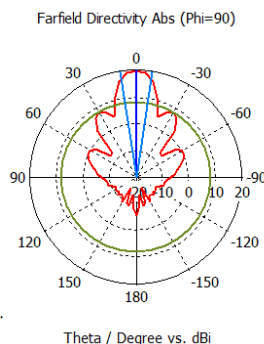
26.5GHz H-Plane



farfield (f=26.5) [1]

Frequency = 26.5
 Main lobe magnitude = 20.0 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 17.2 deg.
 Side lobe level = -25.9 dB

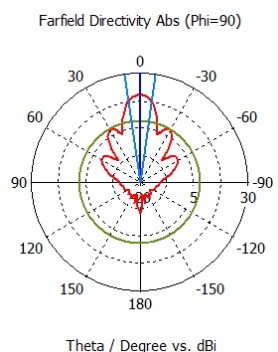
E-Plane



farfield (f=26.5) [1]

Frequency = 26.5
 Main lobe magnitude = 20.0 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 17.7 deg.
 Side lobe level = -11.8 dB

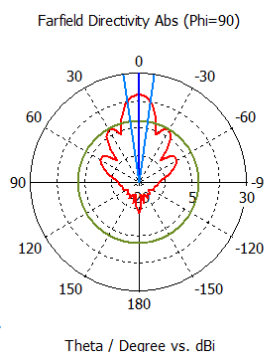
28GHz H-Plane



farfield (f=28) [1]

Frequency = 28
 Main lobe magnitude = 20.5 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 16.7 deg.
 Side lobe level = -12.3 dB

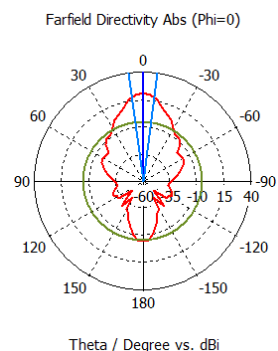
E-Plane



farfield (f=28) [1]

Frequency = 28
 Main lobe magnitude = 20.5 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 16.7 deg.
 Side lobe level = -12.3 dB

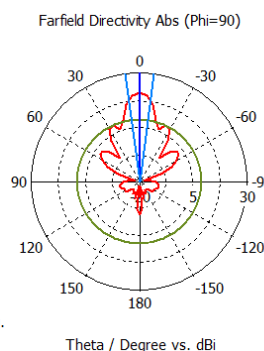
30GHz H-Plane



farfield (f=30) [1]

Frequency = 30
 Main lobe magnitude = 21.0 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 15.0 deg.
 Side lobe level = -26.0 dB

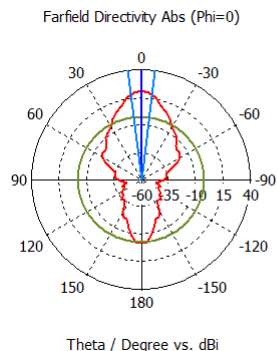
E-Plane



farfield (f=30) [1]

Frequency = 30
 Main lobe magnitude = 21.0 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 15.4 deg.
 Side lobe level = -12.2 dB

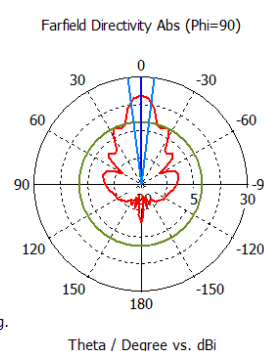
32GHz H-Plane



farfield (f=32) [1]

Frequency = 32
 Main lobe magnitude = 21.5 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 14.1 deg.
 Side lobe level = -23.6 dB

E-Plane

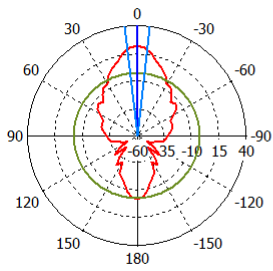


farfield (f=32) [1]

Frequency = 32
 Main lobe magnitude = 21.5 dBi
 Main lobe direction = 0.0 deg.
 Angular width (3 dB) = 14.3 deg.
 Side lobe level = -12.2 dB

34GHz H-Plane

Farfield Directivity Abs (Phi=0)



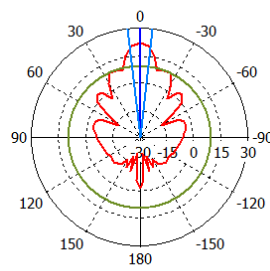
Theta / Degree vs. dBi

farfield (f=34) [1]

Frequency = 34
Main lobe magnitude = 21.9 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 13.4 deg.
Side lobe level = -24.2 dB

E-Plane

Farfield Directivity Abs (Phi=90)



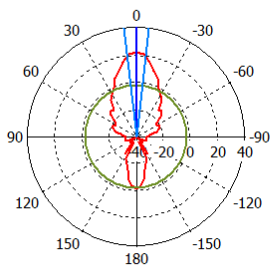
Theta / Degree vs. dBi

farfield (f=34) [1]

Frequency = 34
Main lobe magnitude = 21.9 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 13.5 deg.
Side lobe level = -12.4 dB

36GHz H-Plane

Farfield Directivity Abs (Phi=0)



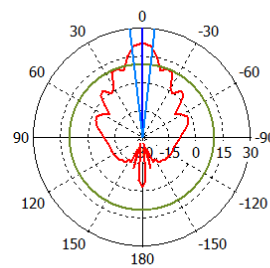
Theta / Degree vs. dBi

farfield (f=36) [1]

Frequency = 36
Main lobe magnitude = 22.3 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 12.8 deg.
Side lobe level = -24.6 dB

E-Plane

Farfield Directivity Abs (Phi=90)



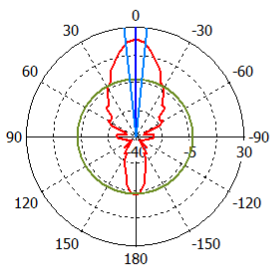
Theta / Degree vs. dBi

farfield (f=36) [1]

Frequency = 36
Main lobe magnitude = 22.3 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 12.9 deg.
Side lobe level = -11.9 dB

38GHz H-Plane

Farfield Directivity Abs (Phi=0)



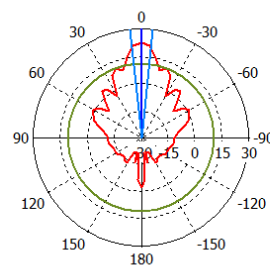
Theta / Degree vs. dBi

farfield (f=38) [1]

Frequency = 38
Main lobe magnitude = 22.6 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 12.3 deg.
Side lobe level = -25.3 dB

E-Plane

Farfield Directivity Abs (Phi=90)



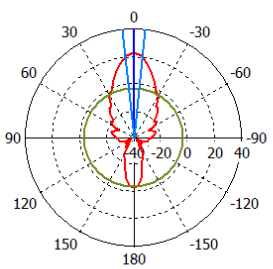
Theta / Degree vs. dBi

farfield (f=38) [1]

Frequency = 38
Main lobe magnitude = 22.6 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 12.3 deg.
Side lobe level = -11.6 dB

40GHz H-Plane

Farfield Directivity Abs (Phi=0)



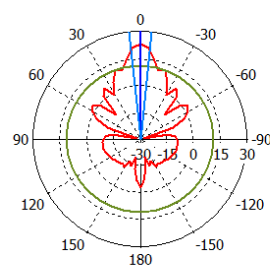
Theta / Degree vs. dBi

farfield (f=40) [1]

Frequency = 40
Main lobe magnitude = 23.1 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 11.9 deg.
Side lobe level = -26.3 dB

E-Plane

Farfield Directivity Abs (Phi=90)



Theta / Degree vs. dBi

farfield (f=40) [1]

Frequency = 40
Main lobe magnitude = 23.1 dBi
Main lobe direction = 0.0 deg.
Angular width (3 dB) = 11.6 deg.
Side lobe level = -12.0 dB