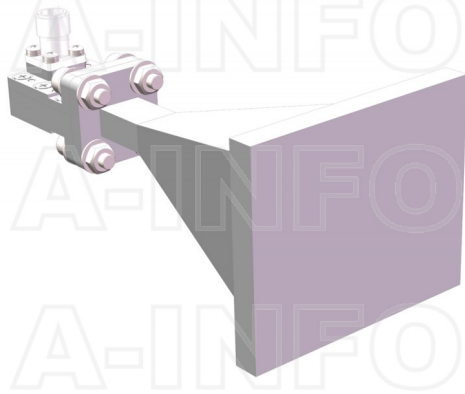


LB-28-20-C-KFSPO Standard Gain Horn Antenna 26.5-40GHz 20dB Gain  
2.92mm Female



Standard Gain Horn Antenna Operating From 26.5GHz to 40GHz With a  
Nominal 20dB Gain With 2.92mm Female Connector

## Product Information

|     |                  |
|-----|------------------|
| SKU | LB-28-20-C-KFSPO |
|-----|------------------|

## Description

Standard Gain Horn Antenna LB-28-20-C-KFSPO, operating from 26.5 to 40GHz with a nominal 20dB gain and low VSWR 1.25:1 with 2.92mm Female connector output. The model LB-28-20-C-KFSPO has uniform gain through its frequency span, providing efficient performance characteristics and directionality. It can handle 20W continuously and 40W peak power. Constructed of lightweight corrosion-resistant aluminum, the horn comes with a specially designed weatherproof radome which provides excellent protection against the rain and dust but has very little loss across the full operating frequency band. This standard gain horn antenna is linearly polarized and ideally suited for EMI testing, direction finding, surveillance, antenna gain and pattern measurements and other applications.

## Technical Specification

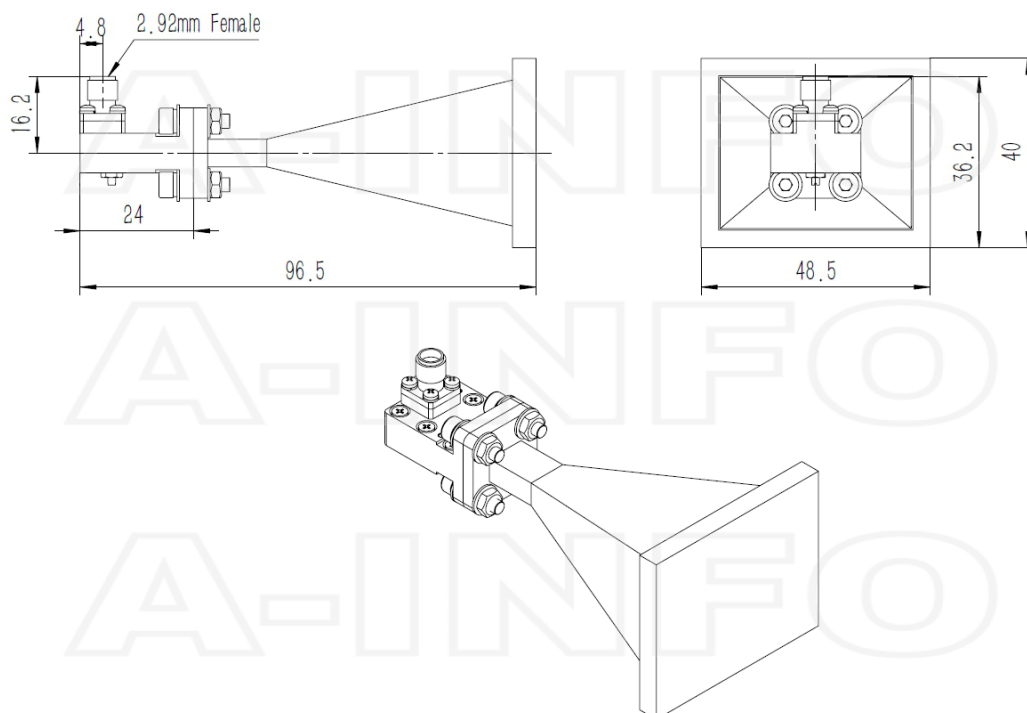
| Electrical Specification           |             | Interface                |                                           |
|------------------------------------|-------------|--------------------------|-------------------------------------------|
| Frequency, Min (GHz)               | 26.5        | Output Type              | Coaxial                                   |
| Frequency, Max (GHz)               | 40          | Connector                | 2.92mm(K)                                 |
| Waveguide Type                     | Rectangular | Connector Gender         | Female                                    |
| Waveguide Size EIA WR              | WR28        | Mechanical Specification |                                           |
| Gain, Typ (dBi)                    | 20          | Figure                   | C Type                                    |
| Polarization                       | Linear      | Body Material            | Cu                                        |
| 3dB Beamwidth, E-Plane, Typ (Deg.) | 16          | Finish                   | Gold Plated and Silver Plated, Gray Paint |
| 3dB Beamwidth, H-Plane, Typ (Deg.) | 18          | Size, W (mm)             | 48.5                                      |
| Cross Pol. Isolation, Typ (dB)     | 40          | Size, H (mm)             | 40                                        |
| VSWR, Typ                          | 1.25:1      | Size, L (mm)             | 96.5                                      |
| Impedance, (Ohm)                   | 50          | Weight, (kg)             | 0.1                                       |
| Power Handling, CW, (W)            | 20          |                          |                                           |
| Power Handling, Peak, (W)          | 40          |                          |                                           |

### Additional Information

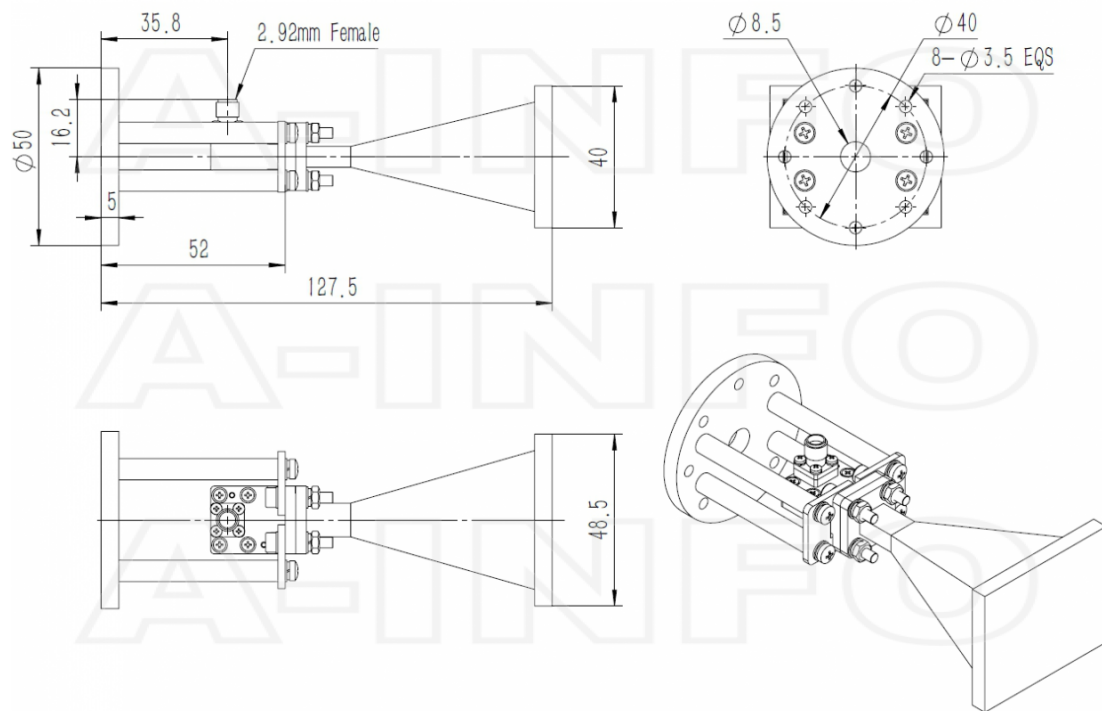
|             |                                          |              |                                                                                                                                 |
|-------------|------------------------------------------|--------------|---------------------------------------------------------------------------------------------------------------------------------|
| Application | Outdoor, Waterproof and Dustproof, Fixed | Solution for | Gain Reference<br>Antenna Measurement<br>Reflector Feed<br>Far-field Measurement<br>System Intergration<br>Material Measurement |
|-------------|------------------------------------------|--------------|---------------------------------------------------------------------------------------------------------------------------------|

### Outline Drawing

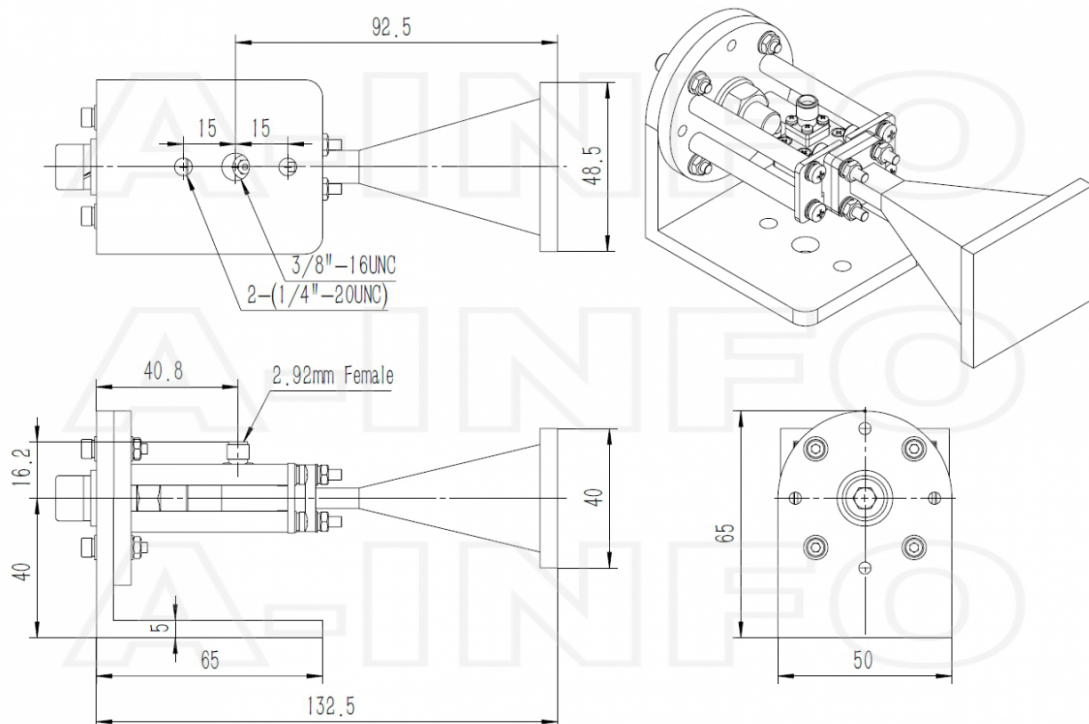
2.92mm-Female Output with Radome (Option, P/N: LB-28-20-C-KFSPO, Outdoor Application)



### 2.92mm-Female Output with Round Mounting Bracket (Option, P/N: LB-28-10-C-MB)

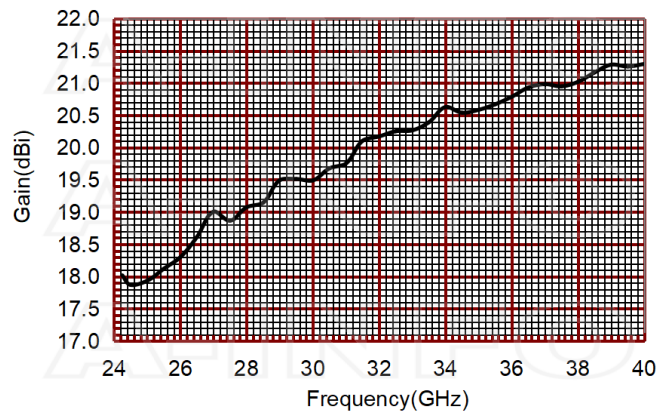


### 2.92mm-Female Output with L Type Mounting Bracket & Radome (Option, P/N: LB-28-10-C-MBL & LB-28-20-C-KFSPO, Outdoor Application)

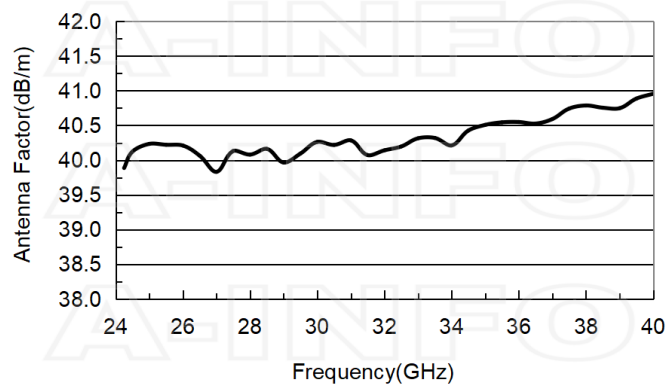


## Typical Test Results

### Gain



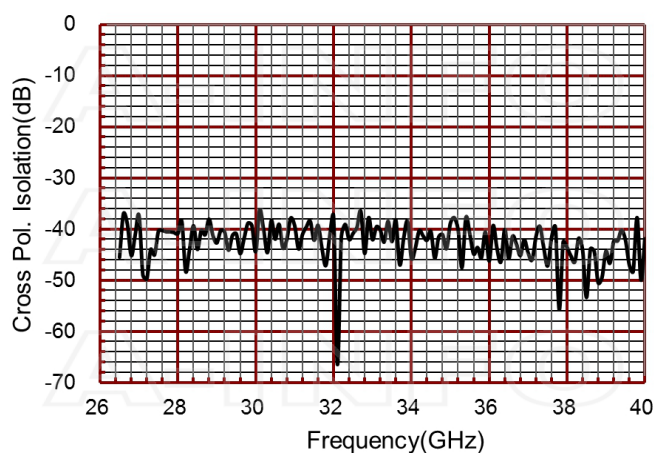
### Antenna Factor



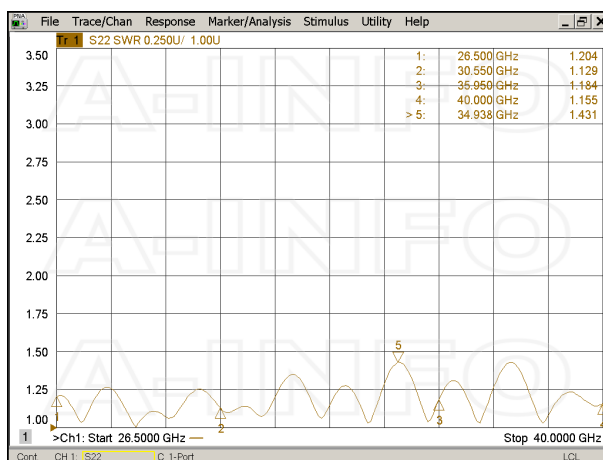
### Antenna Factor (Table)

| Frequency (GHz) | Gain (dBi) | Antenna Factor (dB/m) |  | Frequency (GHz) | Gain (dBi) | Antenna Factor (dB/m) |
|-----------------|------------|-----------------------|--|-----------------|------------|-----------------------|
| 26.50           | 18.61      | 40.06                 |  | 33.50           | 20.39      | 40.32                 |
| 27.00           | 19.01      | 39.83                 |  | 34.00           | 20.63      | 40.21                 |
| 27.50           | 18.87      | 40.13                 |  | 34.50           | 20.54      | 40.43                 |
| 28.00           | 19.07      | 40.08                 |  | 35.00           | 20.58      | 40.51                 |
| 28.50           | 19.14      | 40.16                 |  | 35.50           | 20.67      | 40.54                 |
| 29.00           | 19.49      | 39.97                 |  | 36.00           | 20.79      | 40.55                 |
| 29.50           | 19.51      | 40.09                 |  | 36.50           | 20.93      | 40.53                 |
| 30.00           | 19.49      | 40.26                 |  | 37.00           | 20.98      | 40.59                 |
| 30.50           | 19.68      | 40.22                 |  | 37.50           | 20.95      | 40.74                 |
| 31.00           | 19.75      | 40.28                 |  | 38.00           | 21.02      | 40.79                 |
| 31.50           | 20.10      | 40.07                 |  | 38.50           | 21.16      | 40.75                 |
| 32.00           | 20.17      | 40.14                 |  | 39.00           | 21.28      | 40.75                 |
| 32.50           | 20.25      | 40.20                 |  | 39.50           | 21.26      | 40.89                 |
| 33.00           | 20.27      | 40.31                 |  | 40.00           | 21.30      | 40.96                 |

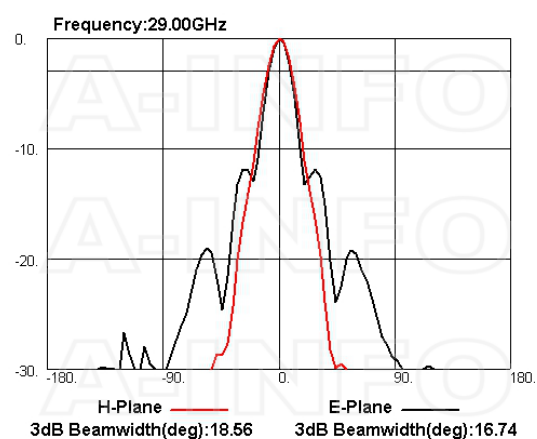
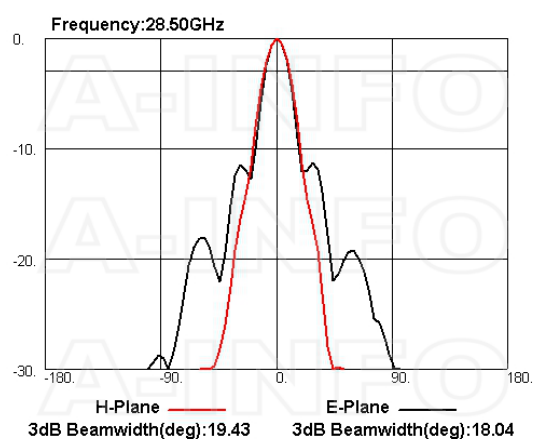
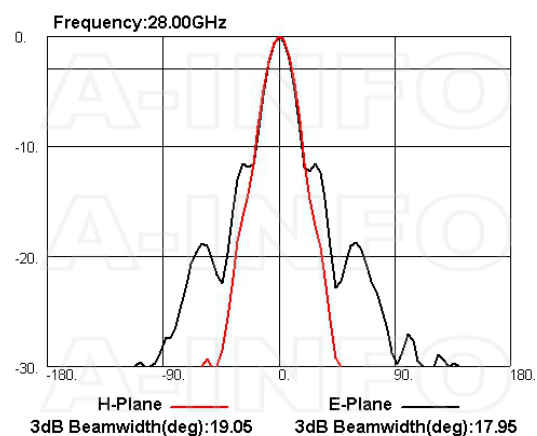
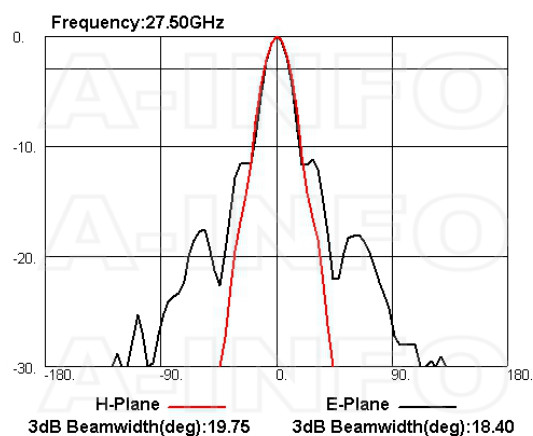
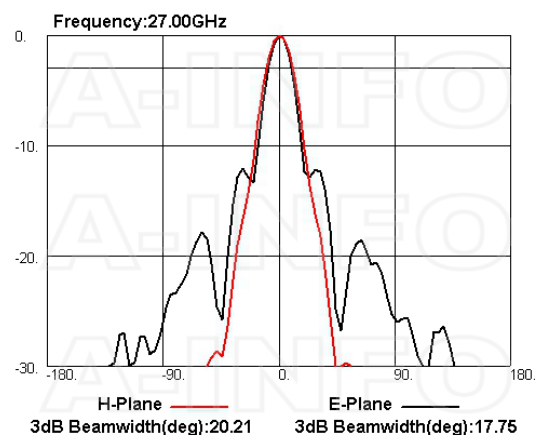
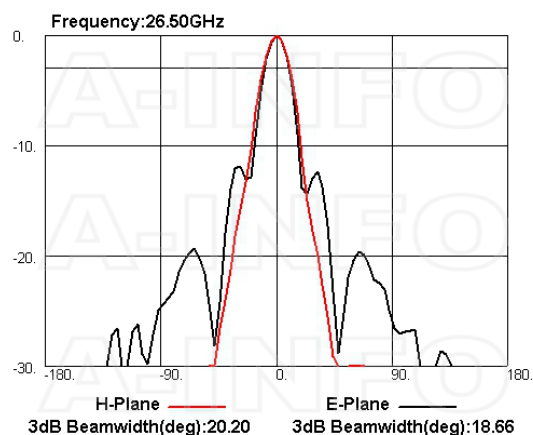
### Cross Polarization Isolation

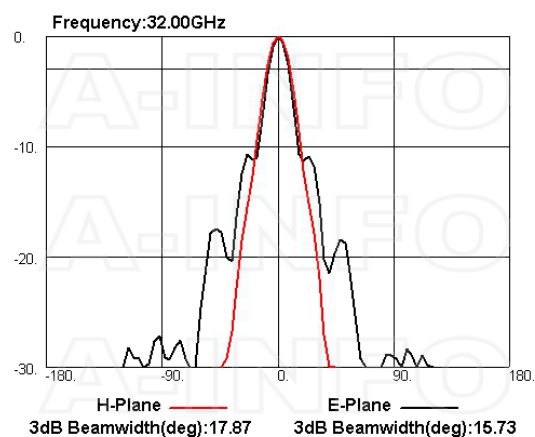
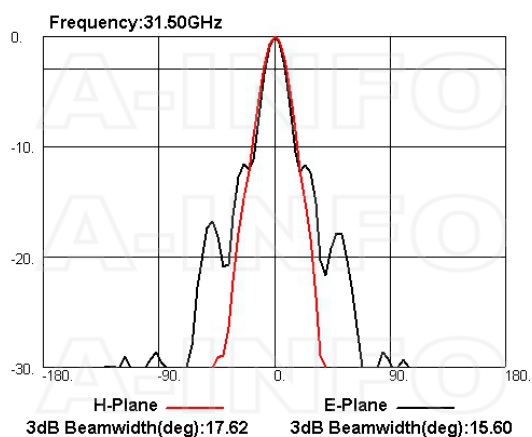
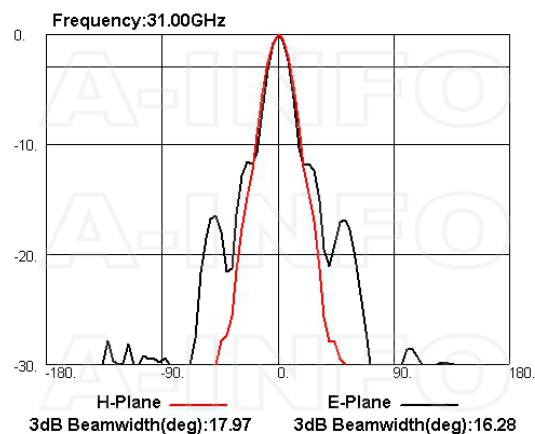
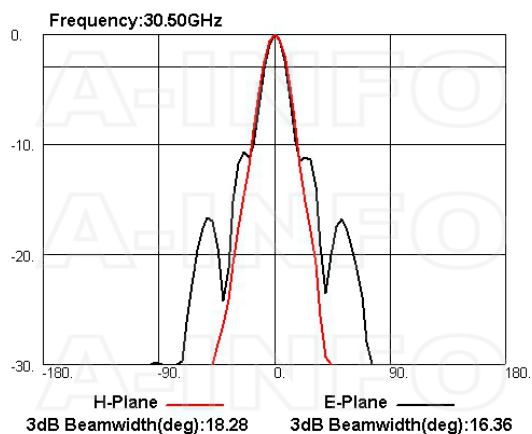
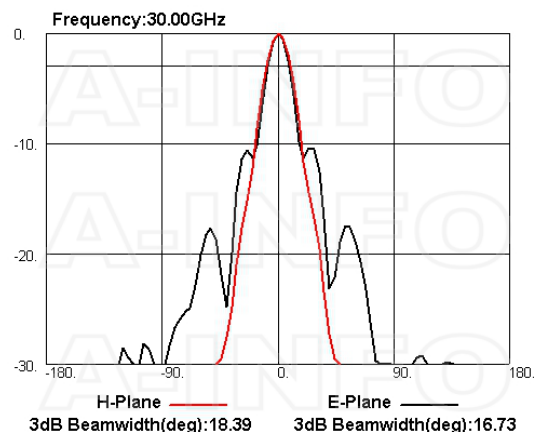
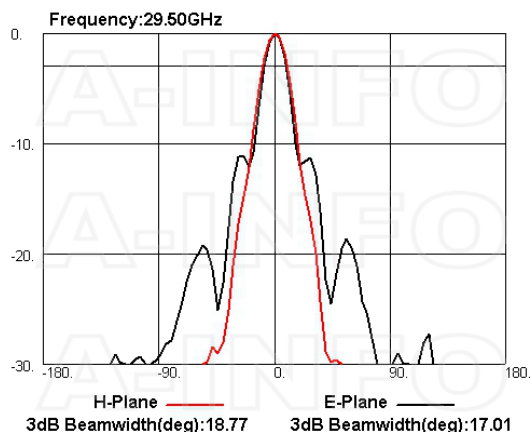


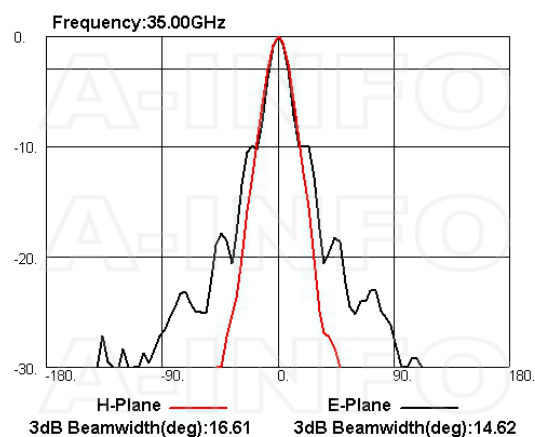
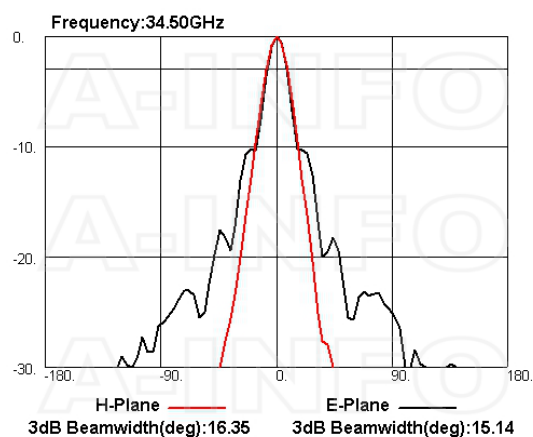
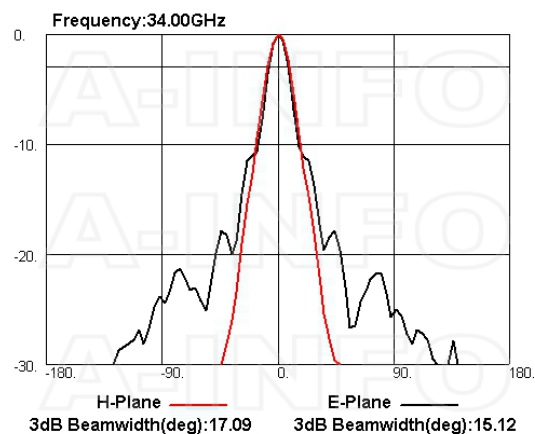
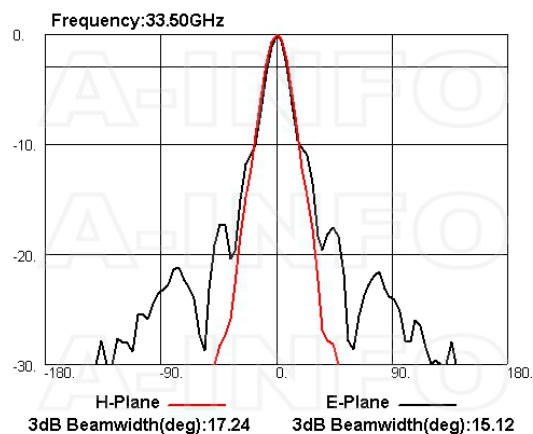
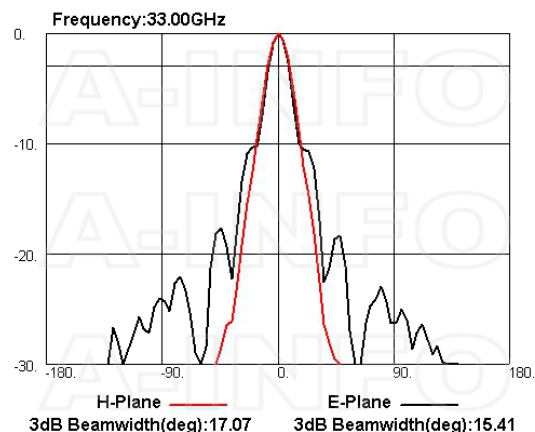
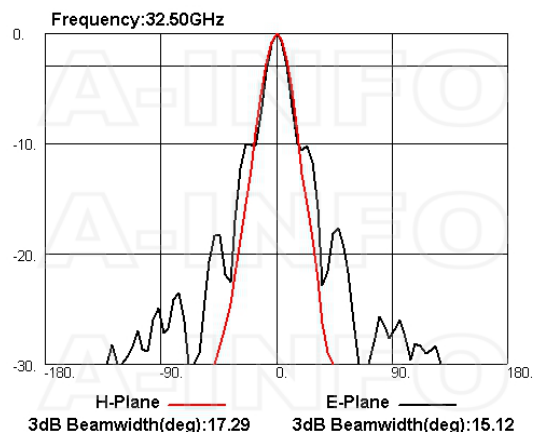
### VSWR

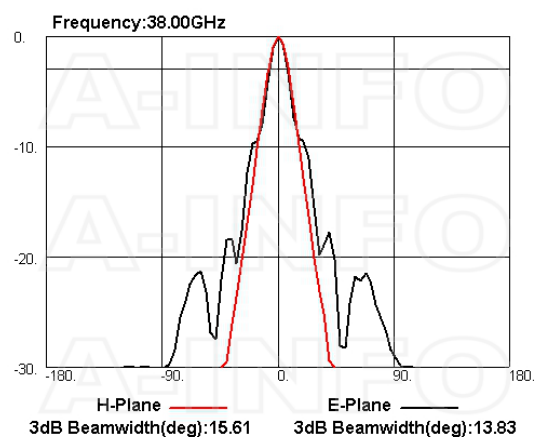
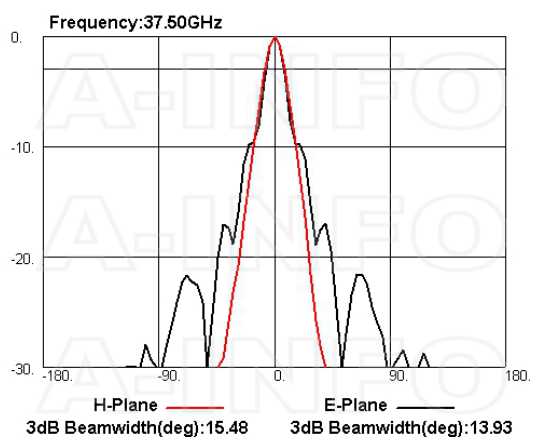
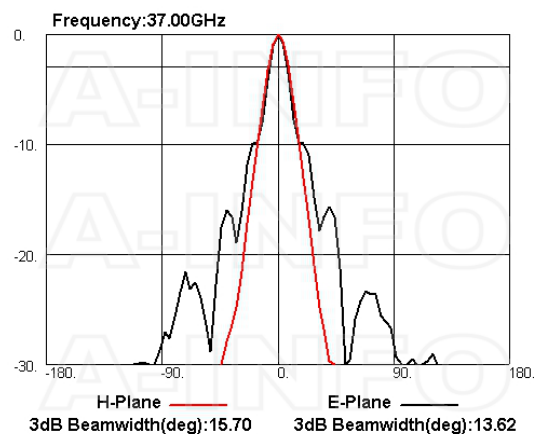
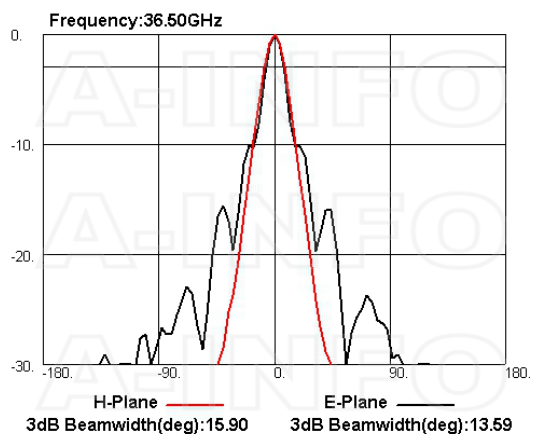
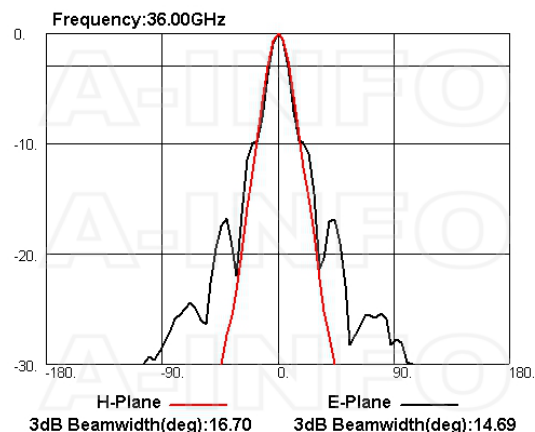
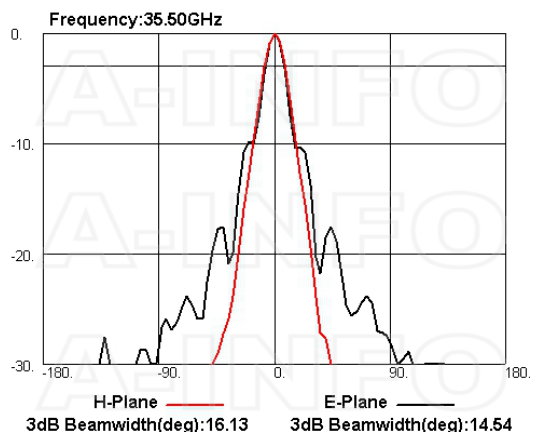


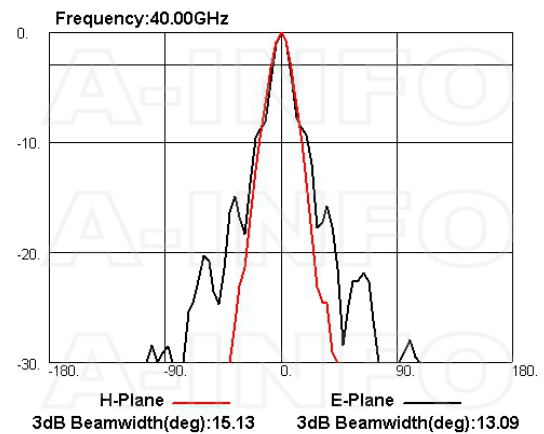
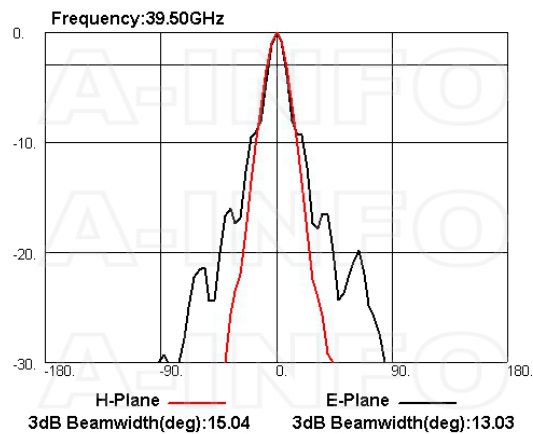
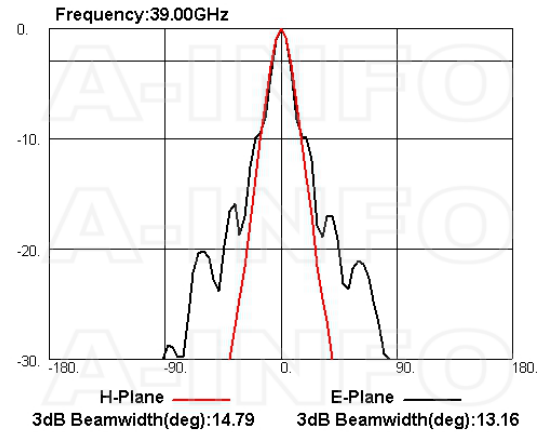
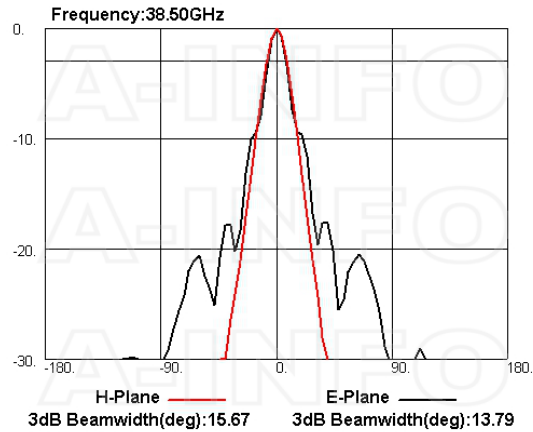
### Pattern











### Related Products



LB-28-10-C-MB Round Type  
Mounting Bracket



LB-28-10-C-MBL L Type  
Mounting Bracket



LB-28-10-C-MA Stinger Type  
Mounting Bracket



Tripod\_15Kg Al Alloy Tripod



3033HL Wooden Tripod



3033QM Wooden Tripod  
Metalfree



Carrying Case\_LB-28-20-C Al  
Alloy Carrying Case



M3x12 Hex\_Pack WR28 Flange  
Assembly Pack



2.92M-2.92M-A050-500 Flexible  
Cable Assembly 500mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-1000 Flexible  
Cable Assembly 1000mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-1500 Flexible  
Cable Assembly 1500mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-2000 Flexible  
Cable Assembly 2000mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-3000 Flexible  
Cable Assembly 3000mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-5000 Flexible  
Cable Assembly 5000mm DC-  
40GHz 2.92mm Male to 2.92mm  
Male



2.92M-2.92M-A050-10000  
Flexible Cable Assembly  
10000mm DC- 40GHz 2.92mm  
Male to 2.92mm Male

### Similar Products



LB-28-20-A Standard Gain Horn  
Antenna 26.5-40GHz 20dB Gain  
Rectangular Waveguide Interface



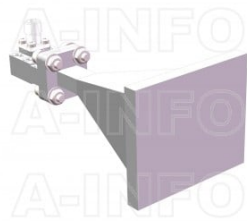
LB-28-20-ASPO Standard Gain  
Horn Antenna 26.5-40GHz 20dB  
Gain Rectangular Waveguide  
Interface



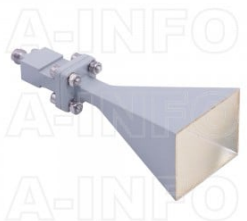
LB-28-20-C-KF Standard Gain  
Horn Antenna 26.5-40GHz 20dB  
Gain 2.92mm Female



LB-28-20-C-2.4F Standard Gain  
Horn Antenna 26.5-40GHz 20dB  
Gain 2.4mm Female



LB-28-20-C-2.4FSPO Standard  
Gain Horn Antenna 26.5-40GHz  
20dB Gain 2.4mm Female



LB-28-20-C-E2.4F Standard Gain  
Horn Antenna 26.5-40GHz 20dB  
Gain Endlaunch 2.4mm Female



LB-28-20-C-E2.4FSPO Standard  
Gain Horn Antenna 26.5-40GHz  
20dB Gain Endlaunch 2.4mm  
Female

About this Datasheet

|                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                                                                                                                                                                |                                                                                                                                                         |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"><li>• Product Information</li></ul> <p>Product Link:<br/><a href="https://www.ainfoinc.com/lb-28-20-c-kfspo-standard-gain-horn-antenna-26-5-40-ghz-20db-gain-2-92mm-female">https://www.ainfoinc.com/lb-28-20-c-kfspo-standard-gain-horn-antenna-26-5-40-ghz-20db-gain-2-92mm-female</a><br/>Data subject to change without notice.<br/>© A-INFO INC. 2023. All Rights Reserved</p> | <ul style="list-style-type: none"><li>• Contact Us</li></ul> <p>Address:dd<br/>60 Tesla, Irvine, CA 92618,<br/>USA</p> <p>Website:<br/><a href="http://www.ainfoinc.com">www.ainfoinc.com</a></p> <p>Email:<br/><a href="mailto:sales@ainfoinc.com">sales@ainfoinc.com</a></p> | <ul style="list-style-type: none"><li>• Phone &amp; Fax</li></ul> <p>Phone:<br/>+1-949-639-9688<br/>+1-949-639-9608</p> <p>Fax:<br/>+1-949-639-9670</p> |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------|