

# AH00ICB 4 Antenna Specification

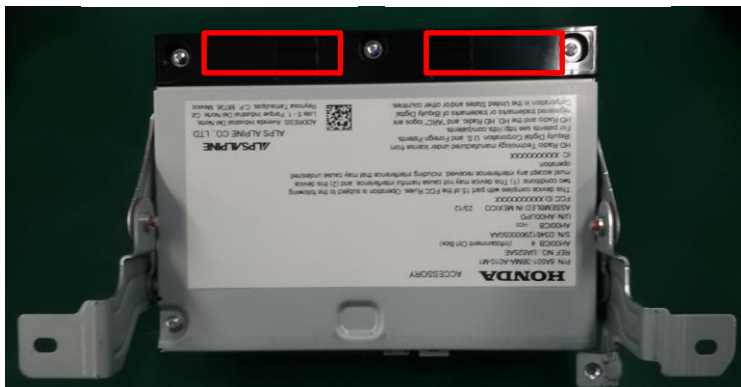
---

# Component placement

【Top View】

2G/5G\_Wifi ANT

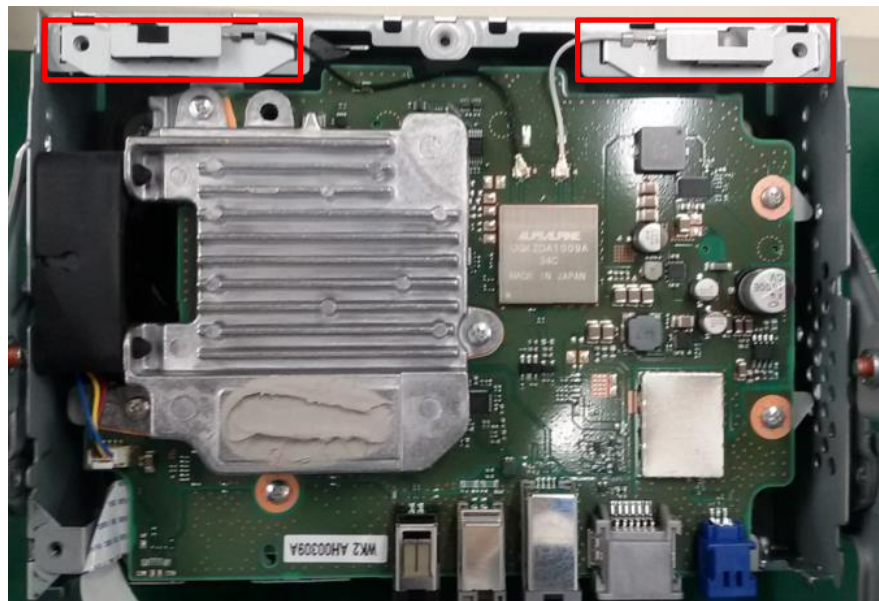
BT+5G\_Wifi ANT



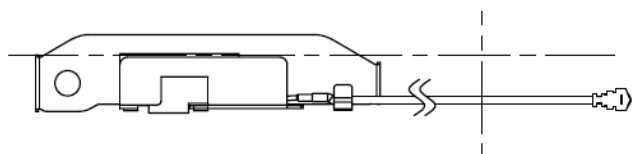
【Product without TOP COVER】

2G/5G\_Wifi ANT

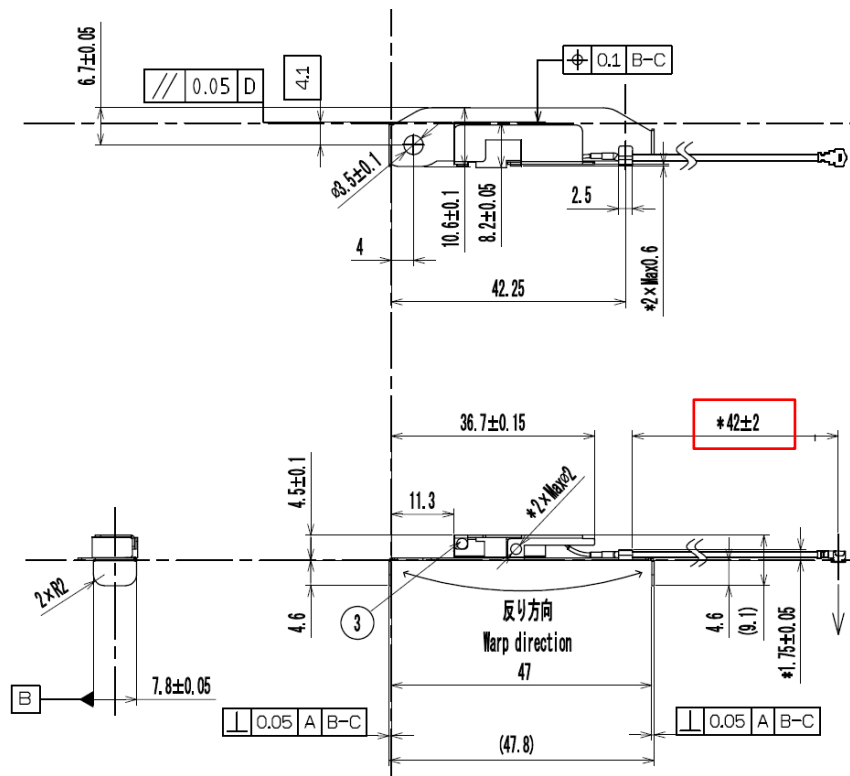
BT+5G\_Wifi ANT



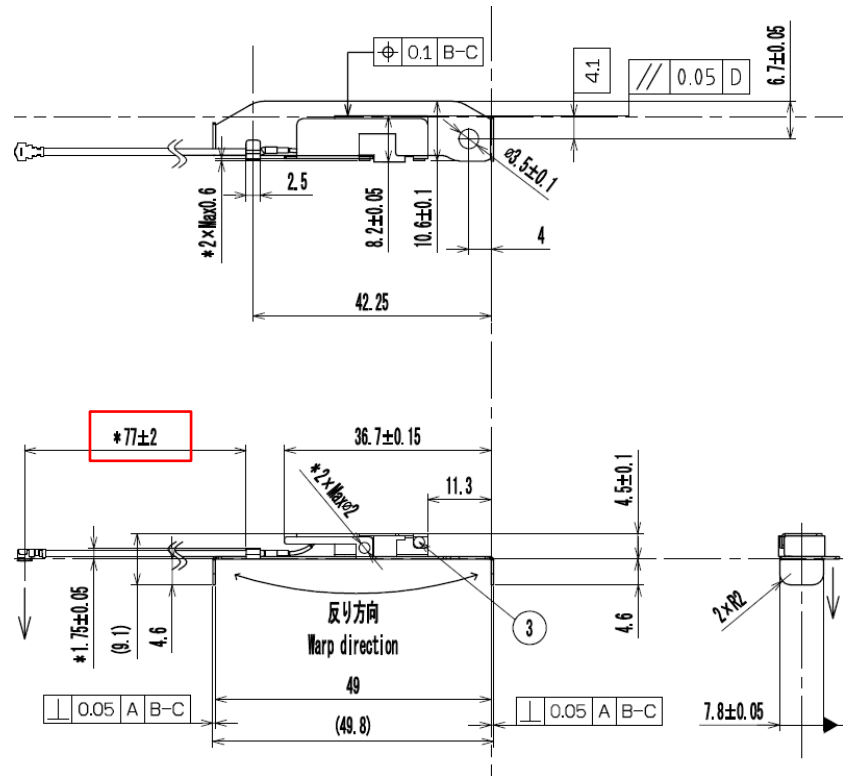
【ANT type: PIFA, Conn.type: U.FL】  
PIFA=planar inverted-F antenna



## BT+5G\_Wifi ANT



## 2G/5G\_Wifi ANT



# Specification

## Antenna Gain specification

| ANT                    | Freq.                             | Gain<br>(Peak)       | Impedance | Comment    |
|------------------------|-----------------------------------|----------------------|-----------|------------|
| BT+5G_Wifi<br>(Chain2) | 2.4GHz-2.5GHz<br>5.15GHz-5.875GHz | -0.2dBi<br>+2.29dBi  | 50 Ohm    | Gain(Peak) |
| 2G/5G_Wifi<br>(Chain1) | 2.4GHz-2.5GHz<br>5.15GHz-5.875GHz | -0.78dBi<br>+2.71dBi | 50 Ohm    | Gain(Peak) |

## Antenna Supplier

Manufacturing Company : NISSEI ELECTRIC CO., LTD.

-Headquarters

1509 Okubo-cho, Nishi-ku, Hamamatsu-shi,  
Shizuoka-ken 432-8006 Japan

TEL. +81-53-485-4705 FAX. +81-53-485-5444

<https://www.nissei-el.co.jp/company/group/>

Test Software: HFSS

Date of test: August 26, 2021

Representative  
Test engineer: NISSEI ELECTRIC CO.,LTD / Engineering Dept.  
Shinpei Matagawa

# Radiation Pattern

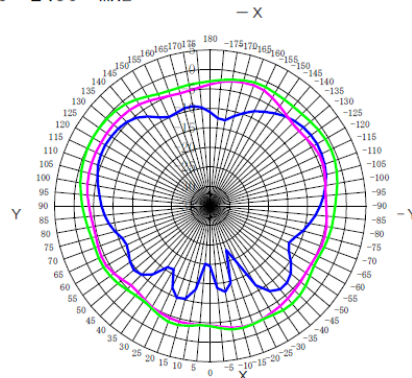


H [dBi]

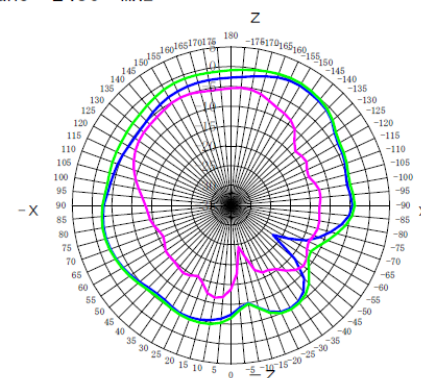
V [dBi]

H+V [dBi]

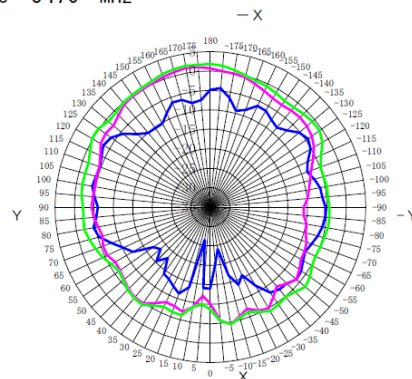
XY Plane 2450 MHz



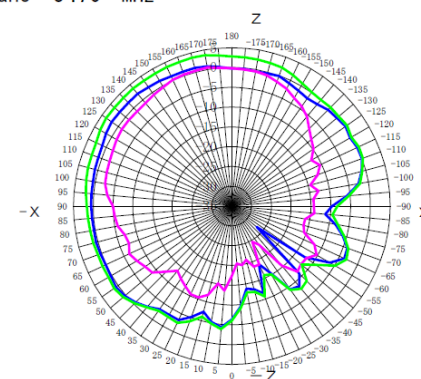
ZX Plane 2450 MHz



XY Plane 5470 MHz

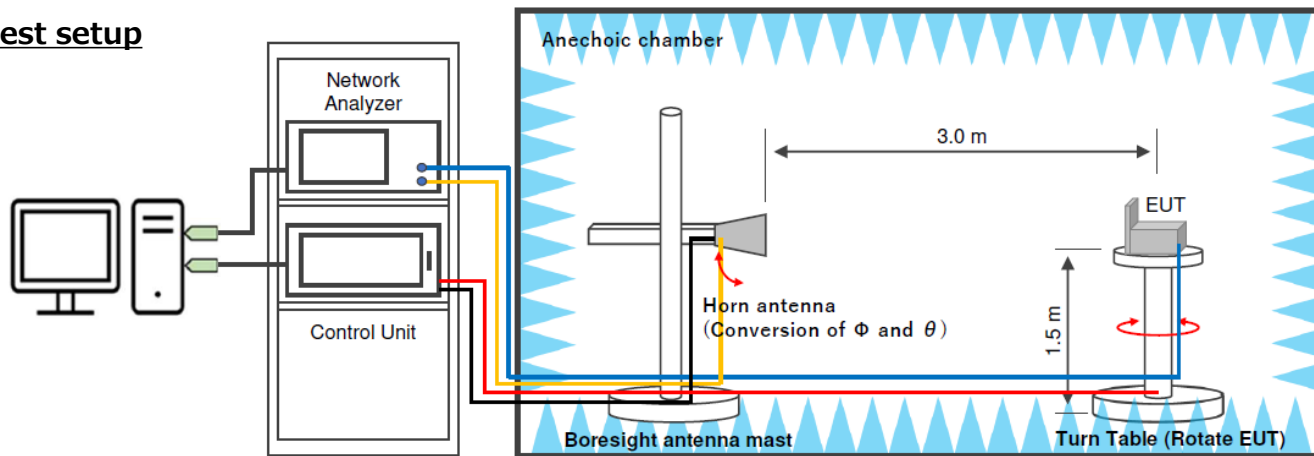


ZX Plane 5470 MHz



# Test setup

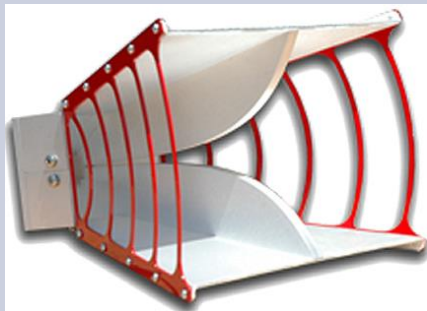
## Test setup



## Equipment List

| Device                              | Type/Model | Serial     | Manufacturer              |
|-------------------------------------|------------|------------|---------------------------|
| Anechoic chamber                    | -          | 602477-0   | NISSEI ELECTRIC CO., LTD. |
| Turn Table                          | -          | 602477-0   | NISSEI ELECTRIC CO., LTD. |
| Control Unit                        | -          | 602544-1   | NISSEI ELECTRIC CO., LTD. |
| Boresight antenna mast              | -          | 602477-0   | NISSEI ELECTRIC CO., LTD. |
| Horn antenna                        | 3115       | 9107-3687  | ETS-Lindgren              |
| Horn antenna 2GHz for Cal.          | 3160-03    | 1096       | ETS-Lindgren              |
| Port Cable 0.1GHz~18.5GHz           | MCCA011    | -          | NISSEI ELECTRIC CO., LTD. |
| Ferrite Cable 2.5m - 0.1GHZ~18.5GHz | X10511A    | -          | NISSEI ELECTRIC CO., LTD. |
| Network Analyzer                    | N5230C     | MY48100176 | Keysight                  |

## Horn Antenna - 3155 Double-Ridged Guide Antenna



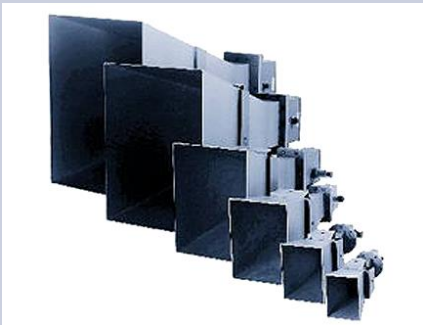
### Key future

- Range 750 MHz to 18 GHz
- Uniform Gain
- Individually Calibrated
- Low VSWR Continuous Power Handling Capability 300W

### Physical specifications

- Height: 15.9 cm (6.26 in)
- Length: 27.9 cm (10.98 in)
- Width: 24.4 cm (9.61 in)
- Weight: 1.8 kg (3.97 lb)

## Horn Antenna 2GHz for Cal. - 3160 Pyramidal Standard Gain Antenna



### Key future

- Constant Antenna Factor Over Frequency
- Complete with Feed, Waveguide, Mount
- Increased Power Dissipation
- Optimal Beam Width
- Low VSWR

### Physical specifications

- Height: 26.65 cm (10.49 in)
- Depth: 64.14 cm (25.25 in)
- Width: 34.65 cm (13.64 in)
- Weight: 4.55 kg (10.03 lb)