



## 802.11 Wi-Fi DUAL BAND DIPOLE ANTENNA

### MAIN FEATURES:

- 2.4-5.0 GHz band
- Adhesive mount
- No ground plane required
- RoHS Compliant
- Good Efficiency
- Indoor use



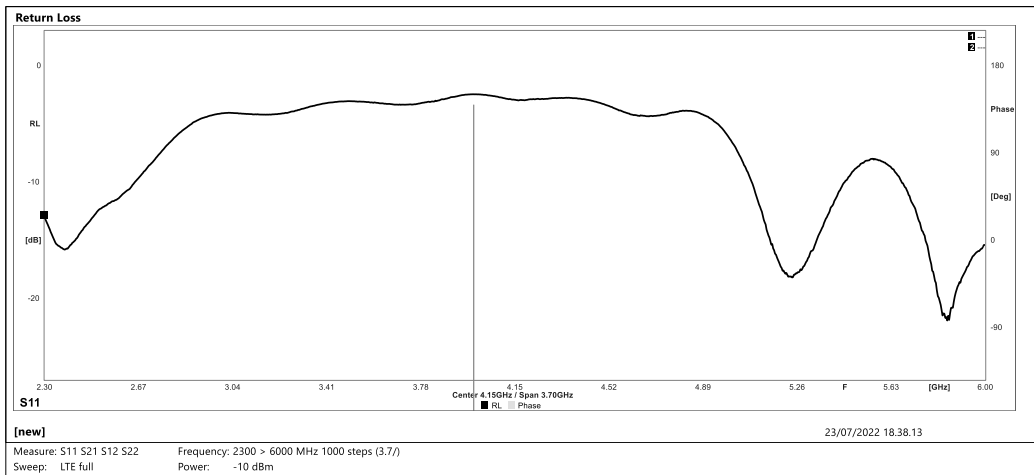
## Wi-Fi Frequency Bands

2400-2480 MHz / 5000-5800 MHz

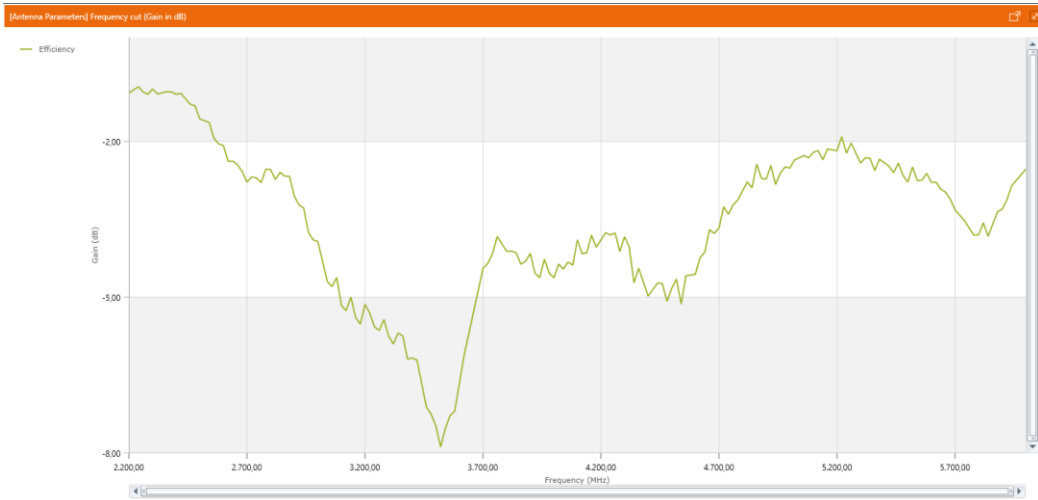
### Parameter

<b>Dimension</b>	35.2x9.6 mm
<b>Operating Temperature</b>	-20/70 °C
<b>Cable type</b>	RG178/microcoax
<b>Cable length</b>	custom
<b>Connector</b>	custom
<b>Nominal impedance</b>	50 Ohm
<b>Gain (peak)</b>	3.6 dBi
<b>Efficiency</b>	>-2 dB

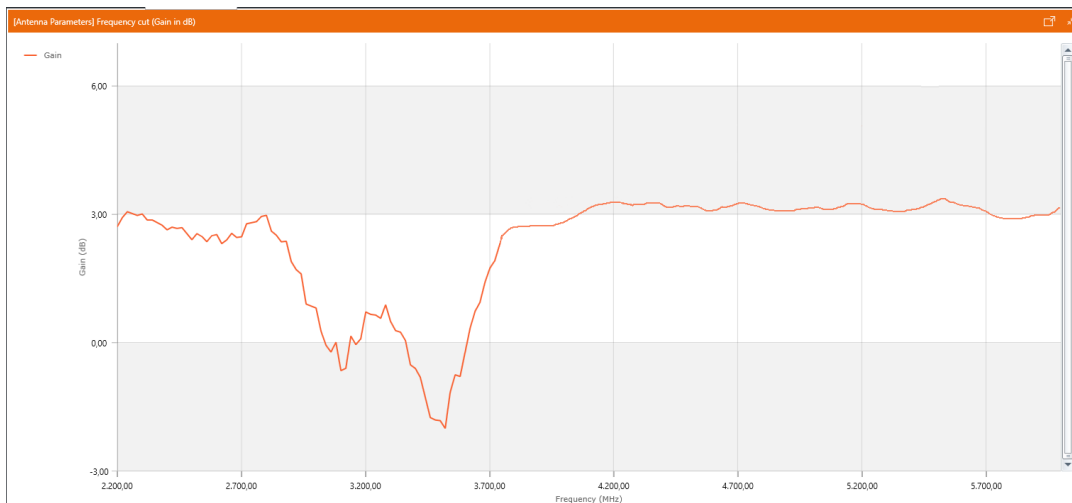
# S11 DIAGRAM



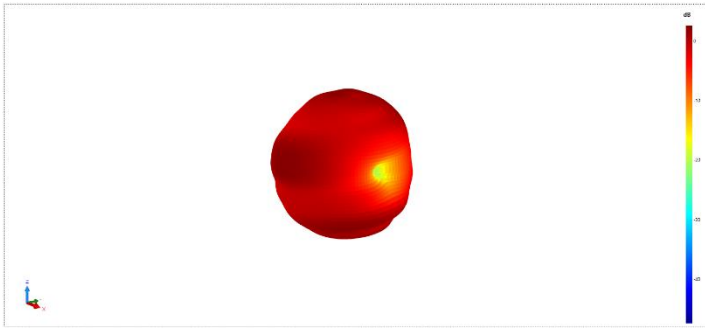
# EFFICIENCY DIAGRAM



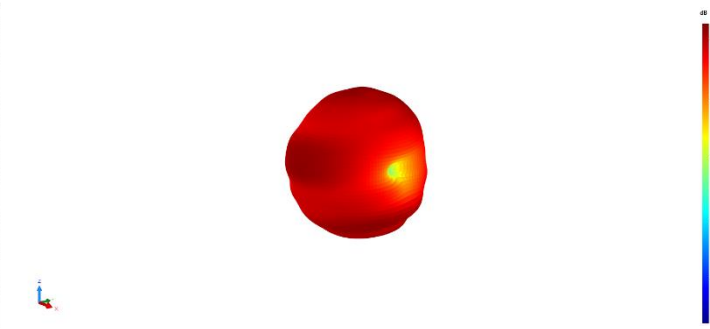
# GAIN DIAGRAM



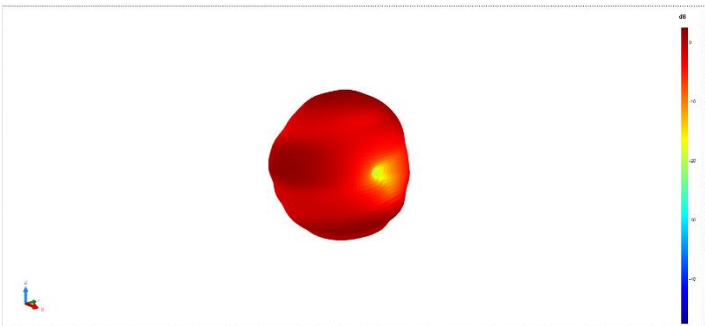
# 3D PATTERNS Gain (dBi)



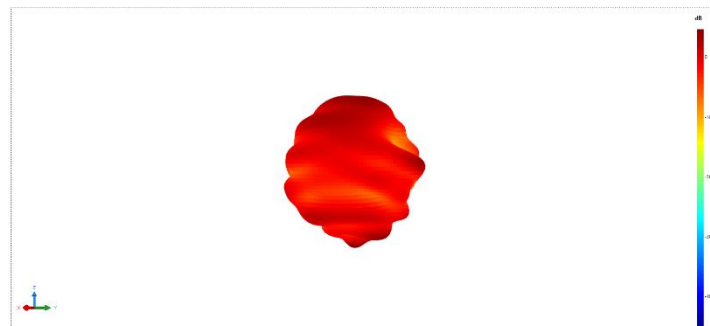
2400 MHz



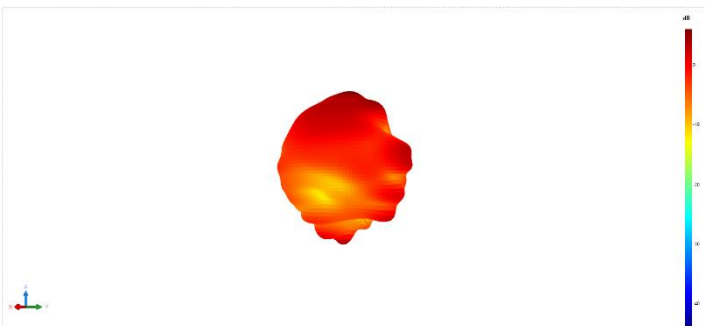
2440 MHz



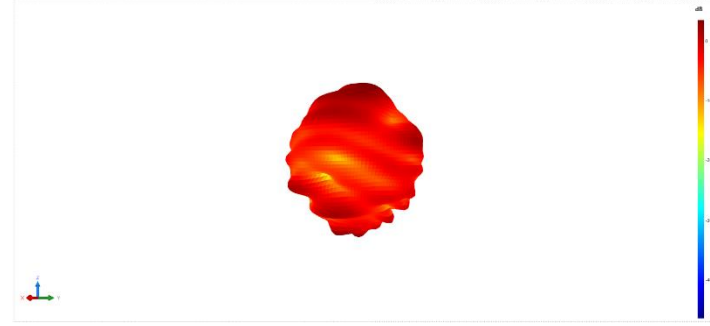
2480 MHz



5000 MHz



5400 MHz

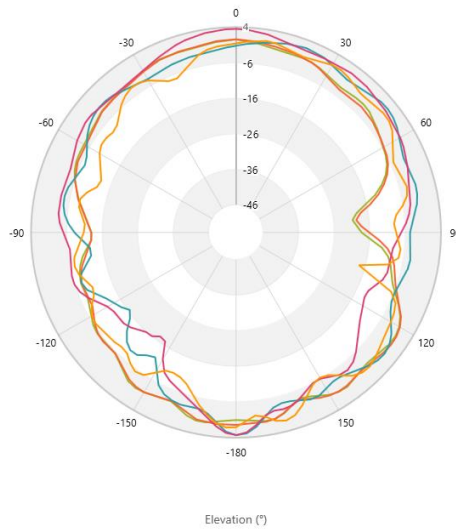


5800 MHz

# POLAR PATTERNS

[Gain] Elevation cut (Gain in dB)

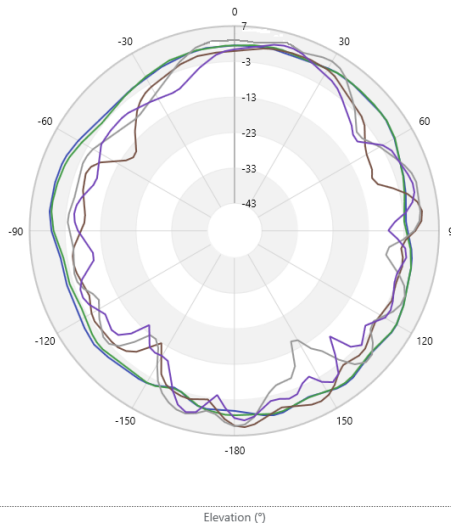
- 2400 MHz 0° E Total
- 2480 MHz 0° E Total
- 5000 MHz 0° E Total
- 5400 MHz 0° E Total
- 5800 MHz 0° E Total



## 2400-5000 MHz ELEVATION 0°

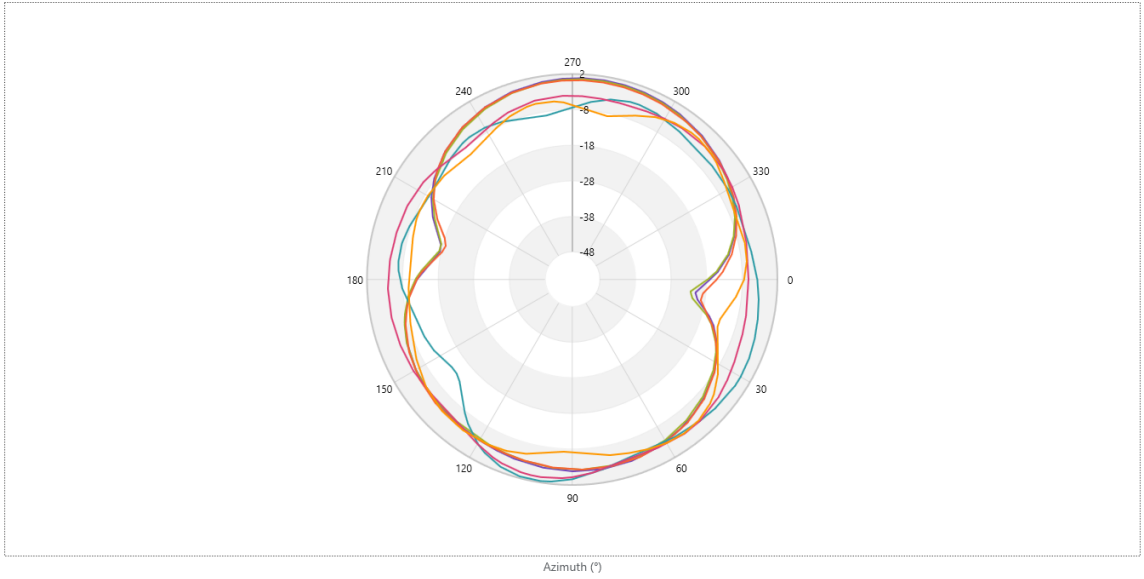
[Gain] Elevation cut (Gain in dB)

- 2400 MHz 90° E Total
- 2480 MHz 90° E Total
- 5000 MHz 90° E Total
- 5400 MHz 90° E Total
- 5800 MHz 90° E Total



## 2400-5000 MHz ELEVATION 90°

- 2400 MHz 90 ° E Total
- 2440 MHz 90 ° E Total
- 2480 MHz 90 ° E Total
- 5000 MHz 90 ° E Total
- 5400 MHz 90 ° E Total
- 5800 MHz 90 ° E Total



## 2400-5000 MHz AZIMUTH 90°

## EFFICIENCY DIAGRAM (dB)

## GAIN DIAGRAM (dBi)

## COAXIAL LINE CHARACTERISTICS

	Dielectric strength (Kv/Minute)	Insulation Resistance (M $\Omega$ m.km)	Impedance ( $\Omega$ m)	Capacitance (pF/m)	Speed (%)
Rg178	1.0	>3000	50+/-2	95.8+/-5	69.5
	Voltage rate	Series conductor resistance ( $\Omega$ m/m)	Impedance ( $\Omega$ m)	Capacitance (pF/m)	Speed (%)
microcoax	30 Vrms	0.89	50+/-2	98.3+/-5	70

## ATTENUATION CONSTANT dB/m

	1000 MHz	1800 MHz	2400 MHz	5200 MHz	6000 MHz
Rg178	0.18	0.26	0.29	0.45	0.49
microcoax	3.0	4.3	4.9	7.7	8.7

All measurement are done of the antenna mounted on a PET panel 1.5mm thick with VNA Copper Mountain M5065A and Starlab MVG multiprobe chamber

