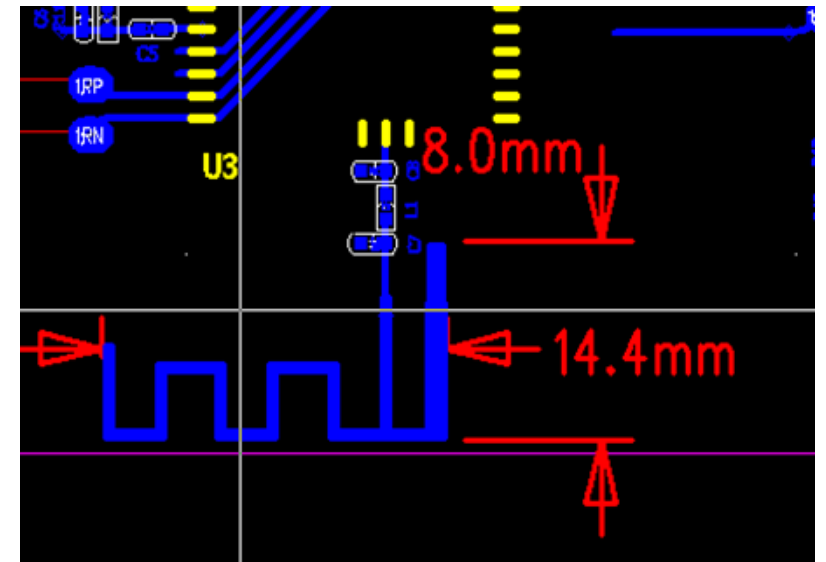


Product specification

Topway EM Enterprise Ltd.

8F., Block B, Building 6, Baoneng Science and technology park, Qingxiang RD., Qinghu Industrial Park, Longhua New District, Shenzhen, China 518109

1.Type of antenna:PCB Antenna
(Antenna module on the system board)

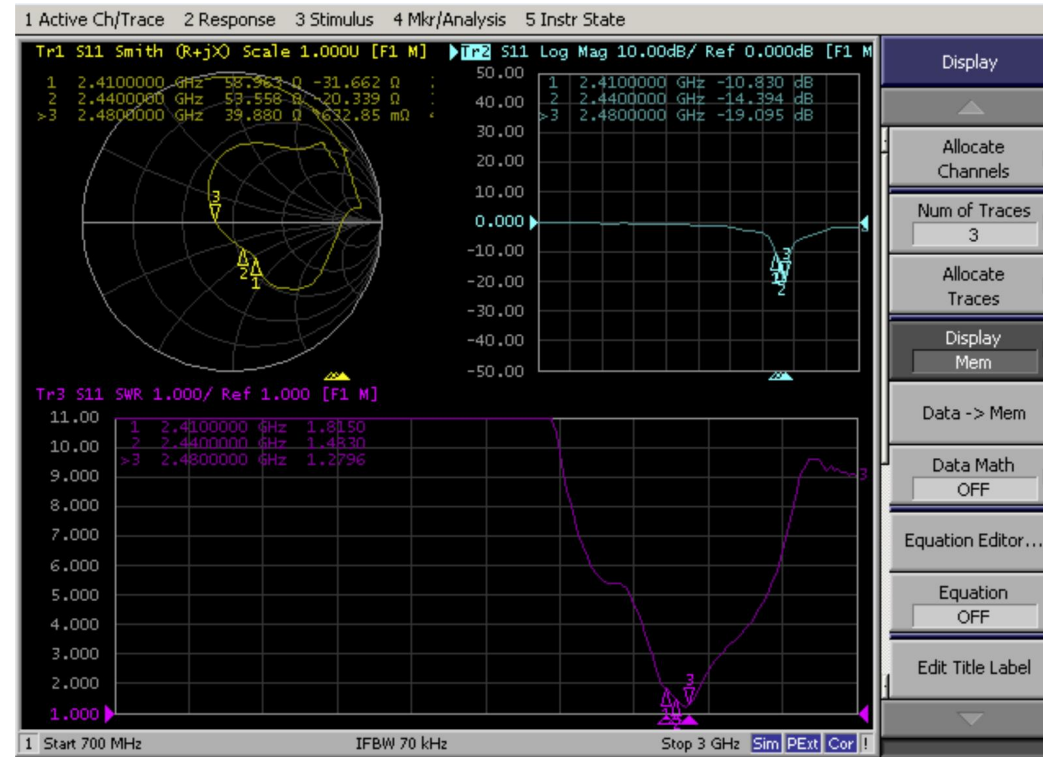


2.Electrical Characteristics

| No. | Item | Specifications |
|-----|--------------------|------------------|
| 1 | Frequenc Range | 2400 ~ 2500MHz |
| 2 | Band Width | 100MHz typ. |
| 3 | The average gain | -3dBi |
| 4 | V.S.W.R | ≤ 2.0 |
| 5 | Polarization | Linear |
| 6 | Azimuth Beam width | Omni-directional |
| 7 | Impedance | 50 Ω |

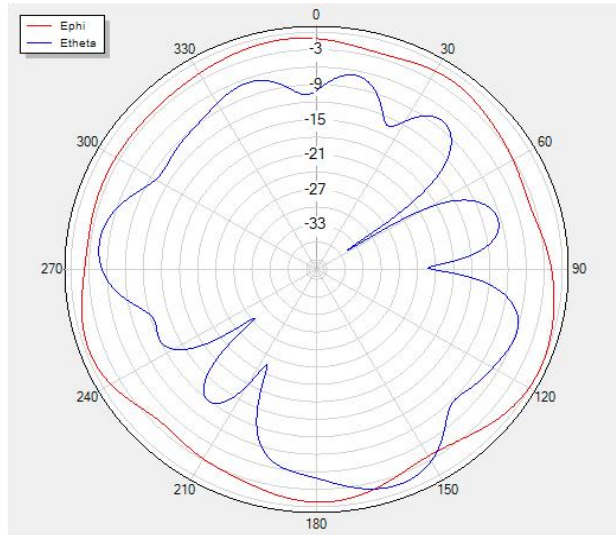
All the technical data and information contained herein are subject to change without prior notice

3. Return Loss

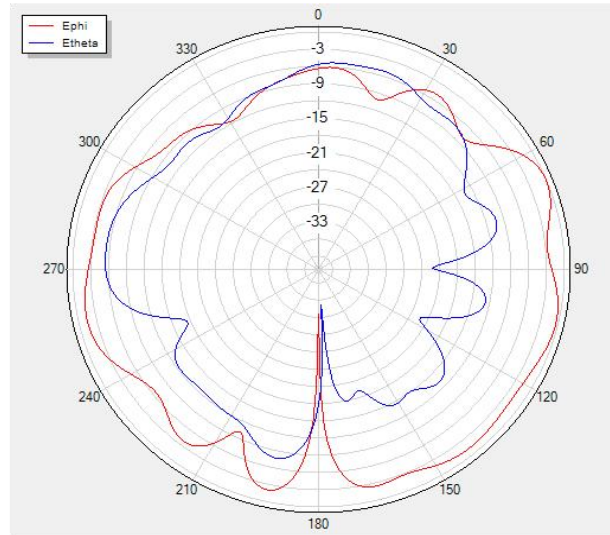


4. Radiation Pattern

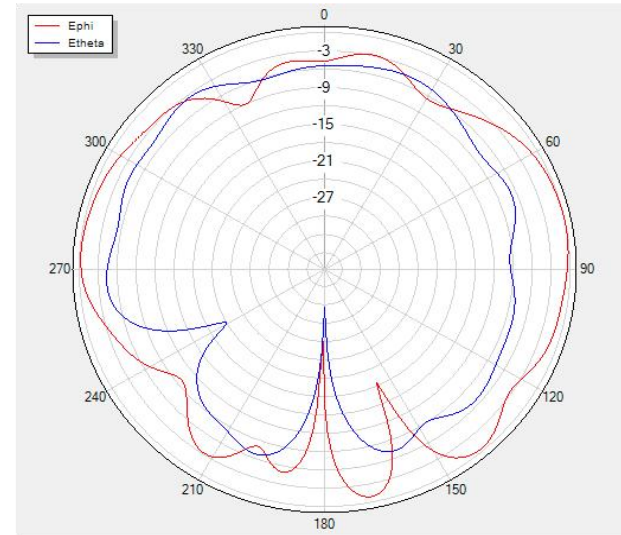
Theta=90 freq=2440MHz



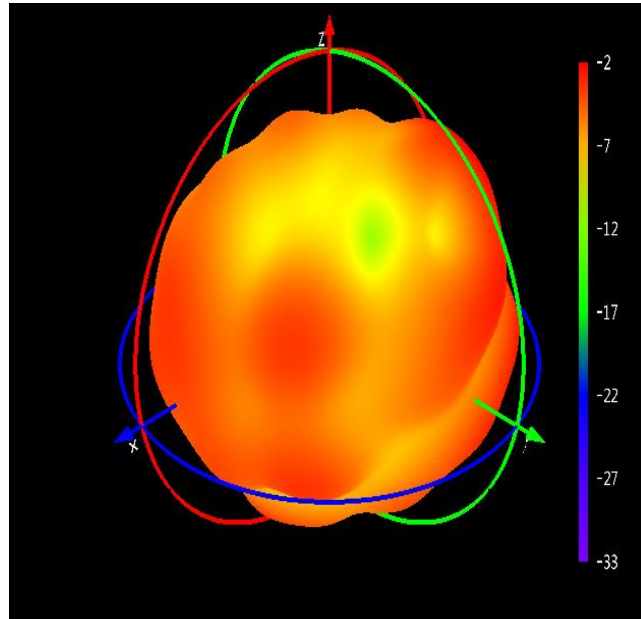
Phi=90 freq=2440MHz



Phi=0 freq=2440MHz



3D Radiation Pattern



| | | | |
|-----------------|-------|-------|-------|
| Frequency (MHz) | 2400 | 2450 | 2500 |
| Avg. Gain (dBi) | -6.82 | -5.3 | -3 |
| Efficiency (%) | 20.81 | 29.52 | 50.16 |