



# Mobile Antenna Specification

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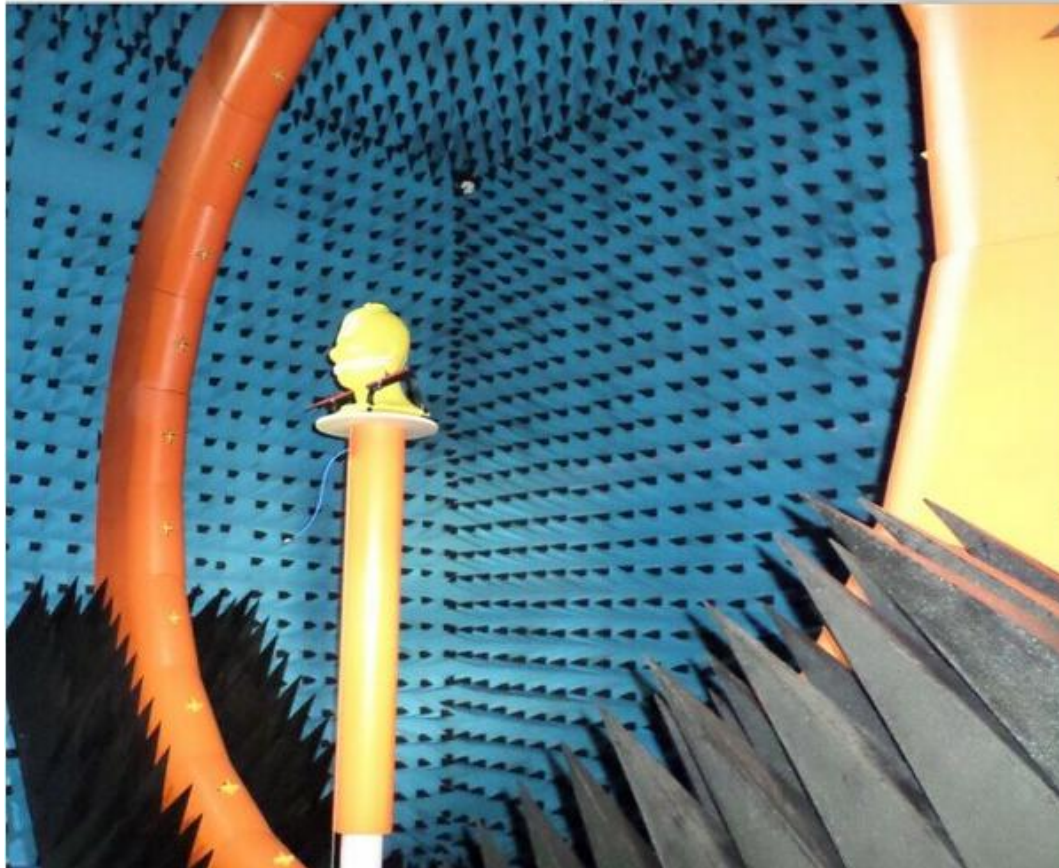
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# Test equipment

Wireless communications test set: CMW500

Network Analyzer: Agilent 5071B

Anechoic Chamber : SATIMO SG24

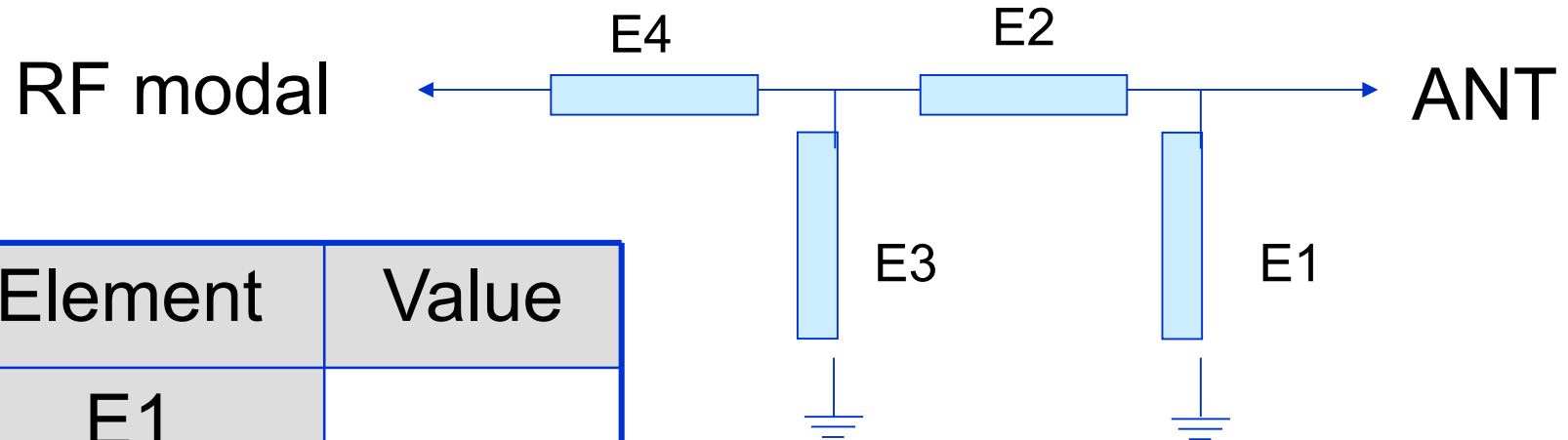


# Antenna information

|               |                |
|---------------|----------------|
| Customer      | Boat of wealth |
| Antenna model | FPC            |
| Antenna type  | PIFA           |
|               |                |

|                          |          |           |
|--------------------------|----------|-----------|
| frequency range<br>(MHz) | 1575. 42 | 2400–2500 |
| VSWR                     | <3. 5    | <3. 5     |

# Matching circuit (No modification)



| Element | Value |
|---------|-------|
| E1      |       |
| E2      |       |
| E3      |       |
| E4      |       |

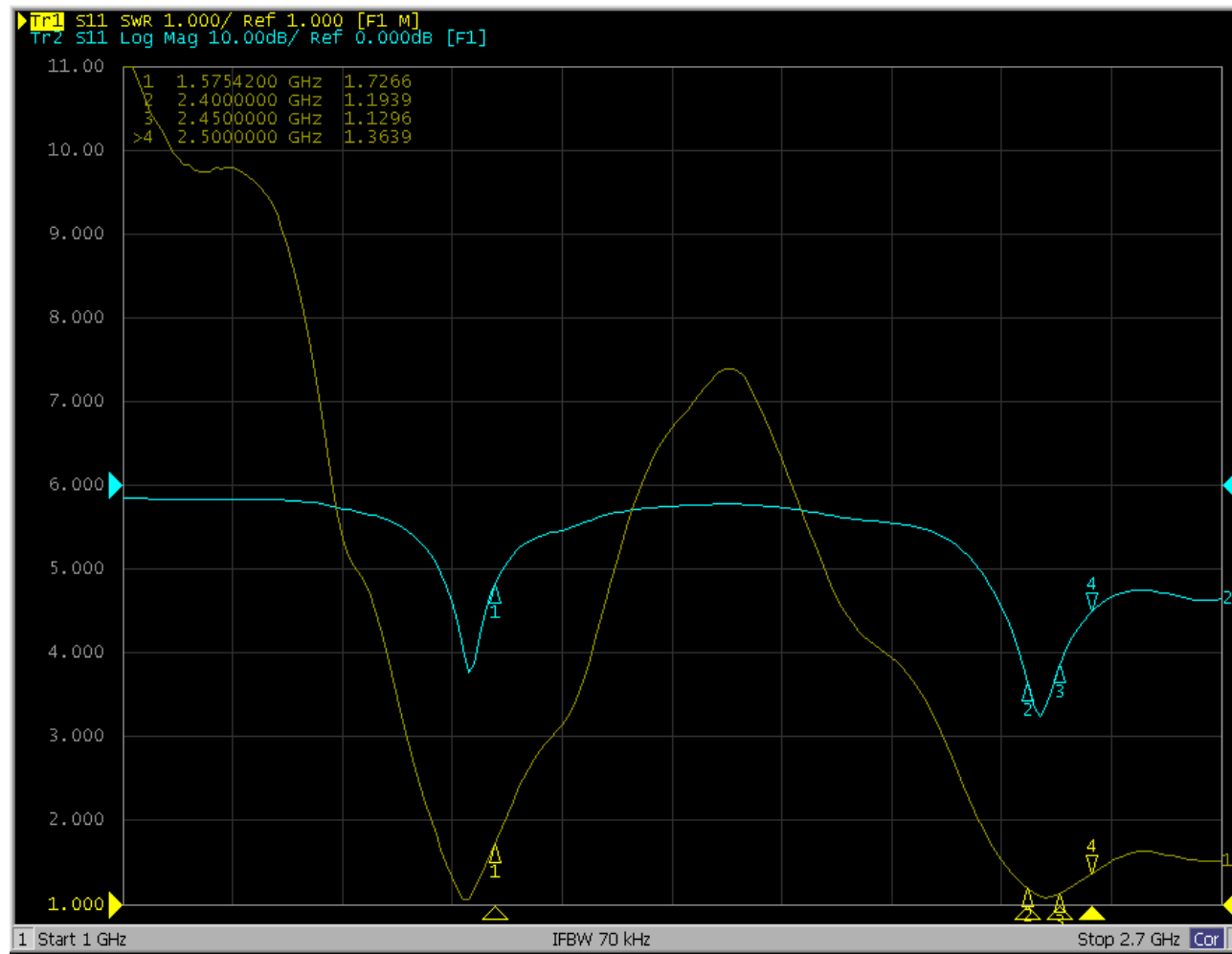
## Antenna dimension drawing



# test data

(Passive efficiency test data)

S11 parameters



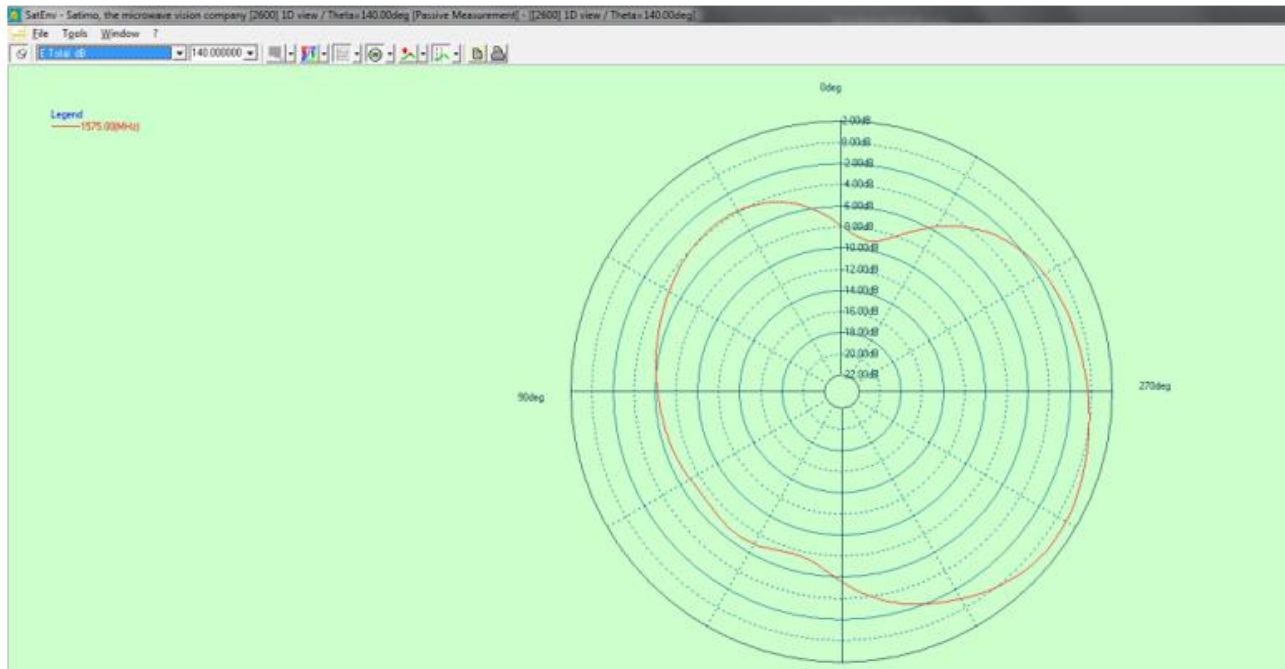
## BT/WIFI efficiency and gain

| WIFI      |                   |                   |
|-----------|-------------------|-------------------|
| Frequency | Efficiency<br>(%) | Gain Max<br>(DBD) |
| 2400MHZ   | 38.65%            | 0.33              |
| 2410MHZ   | 38.28%            | 0.33              |
| 2420MHZ   | 40.41%            | 0.41              |
| 2430MHZ   | 41.04%            | 0.34              |
| 2440MHZ   | 42.11%            | 0.36              |
| 2450MHZ   | 42.21%            | 0.32              |
| 2460MHZ   | 43.24%            | 0.23              |
| 2470MHZ   | 45.87%            | 0.26              |
| 2480MHZ   | 44.73%            | 0.28              |
| 2490MHZ   | 44.50%            | 0.33              |
| 2500MHZ   | 43.77%            | 0.34              |

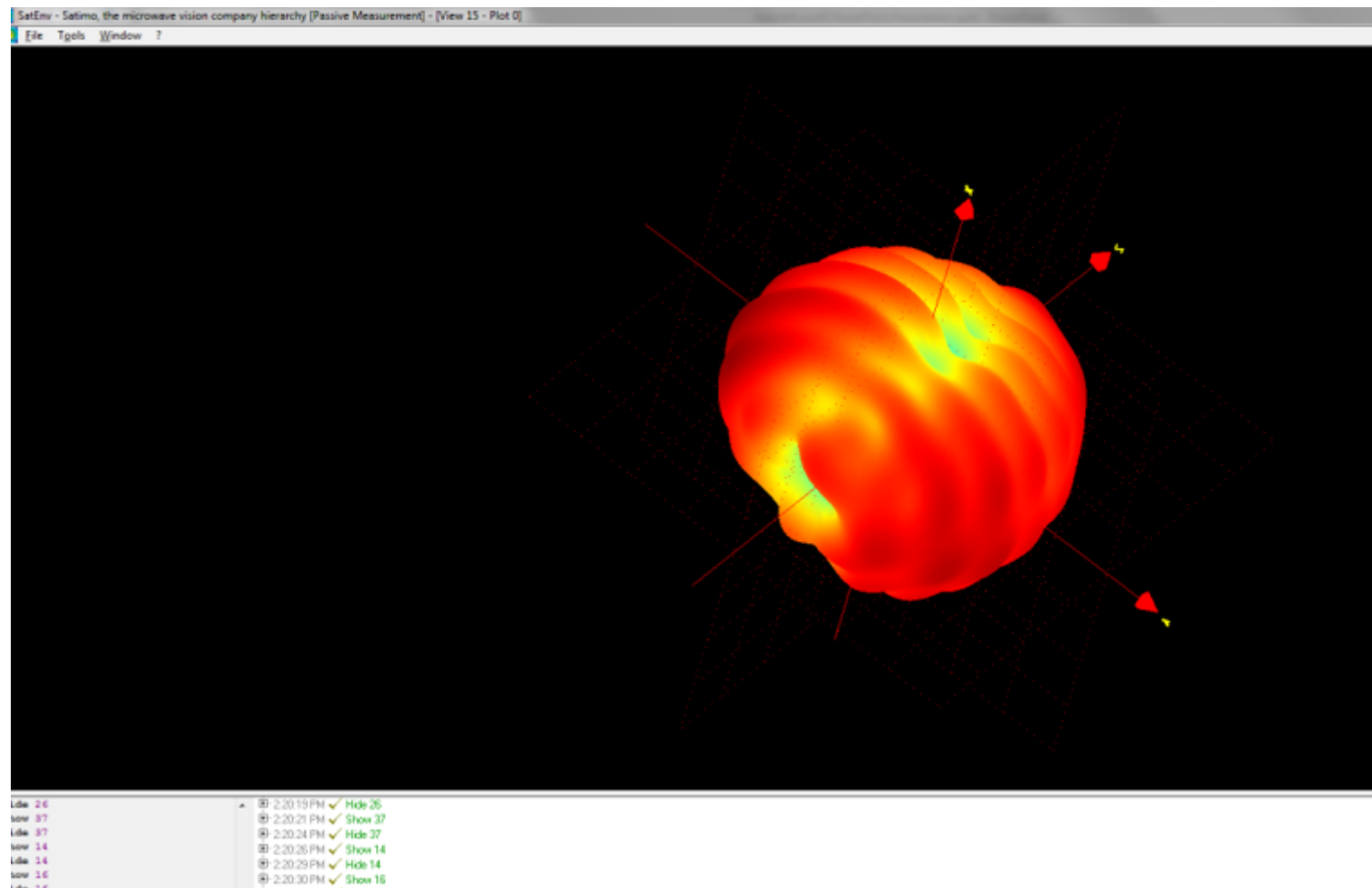
## GPS efficiency and gain

| GPS       |                   |                   |
|-----------|-------------------|-------------------|
| Frequency | Efficiency<br>(%) | Gain Max<br>(DBD) |
| 1550MHZ   | 34.58%            | -1.83             |
| 1555MHZ   | 34.49%            | -1.21             |
| 1560MHZ   | 34.37%            | -1.30             |
| 1565MHZ   | 35.17%            | -1.37             |
| 1570MHZ   | 36.38%            | -1.48             |
| 1575MHZ   | 37.69%            | -2.19             |
| 1580MHZ   | 39.11%            | -2.14             |
| 1585MHZ   | 38.46%            | -2.29             |
| 1590MHZ   | 37.54%            | -2.21             |
| 1595MHZ   | 36.97%            | -1.80             |
| 1600MHZ   | 35.53%            | -1.65             |

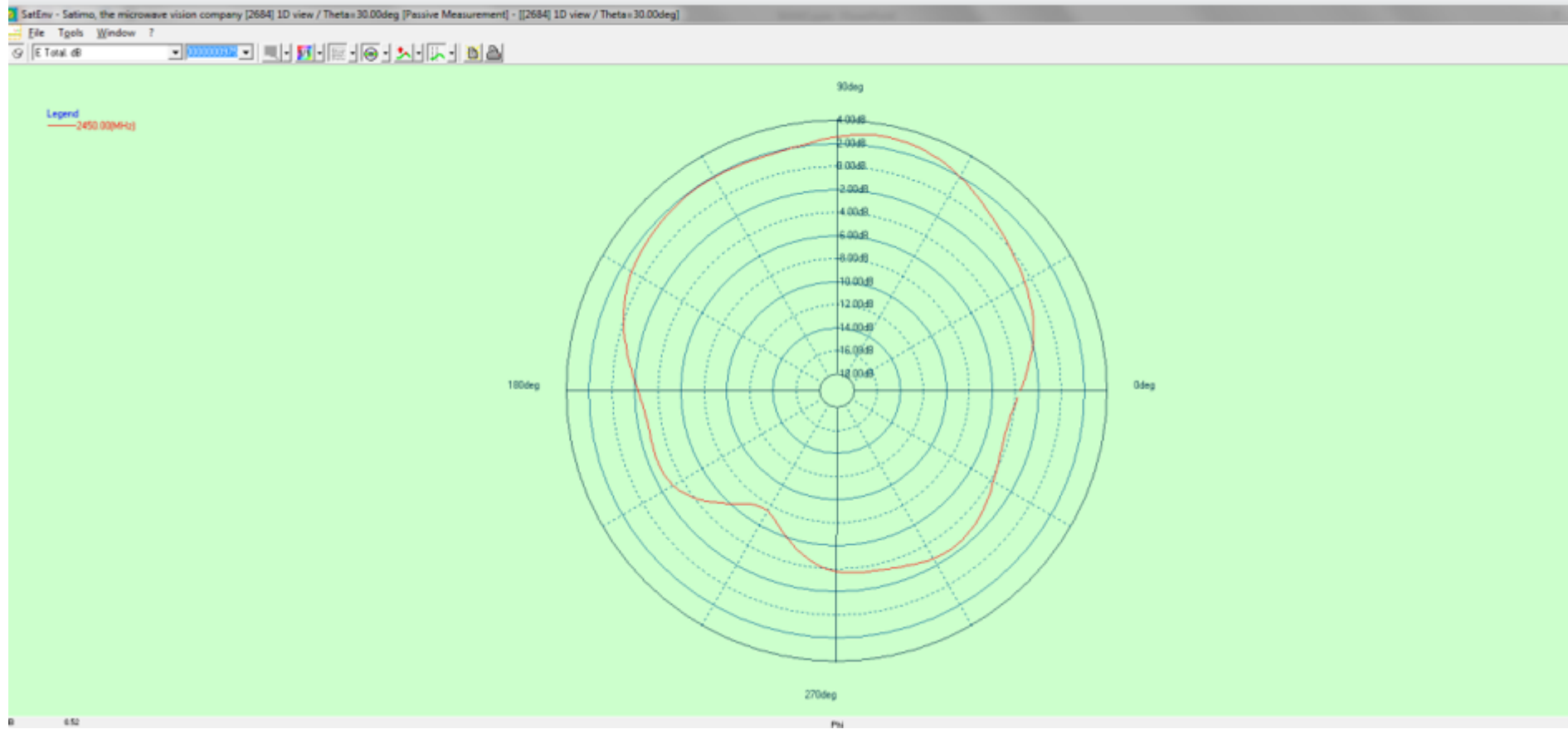
# GPS test direction map



# GPS test direction map



# BT/WIFI test direction map



# BT/WIFI test direction map

