



深圳市红心科技电子有限公司

产品承认书

SPECIFICATION FOR APPROVAL

公司名称: _____

品 名: _____ FPC 天线 _____

料 号: _____ HX-FPC58-238-75A-QCWKJ _____

客户料号: _____

规 格: _____ 详见规格书 _____

日 期: _____ 2025-05-07 _____

客户回签:

| 工 程 部 | 品 质 部 | 批 准 |
|-------|-------|-----|
| | | |

深圳市红心科技电子有限公司

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|-------|-------|-----|
| 庄伟峰 | 张欢 | 刘卢 |
| | | |

1. Antenna parameters

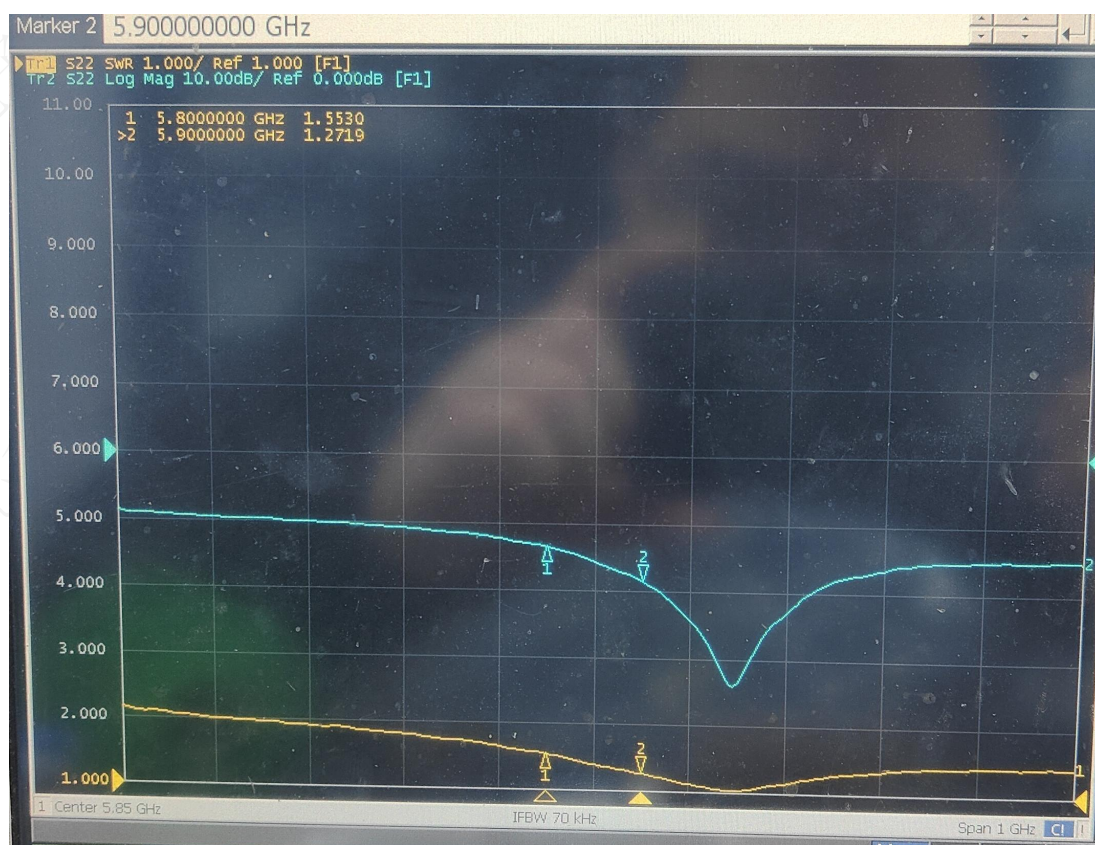
| Design Specifications | Typical | Units |
|---------------------------|-----------|-------|
| 天线形式 | FPC 天线 | |
| 工作频率 (working Frequency) | 2400-2500 | MHZ |
| 增益(Gain) | 5 | DBi |
| 天线效率 (Antenna efficiency) | 35~80 | % |
| 电压驻波比 (VSWR) | <1.8 | |
| 极化方式 (Ploriaztion) | 垂直极化 | |
| 辐射方向 (Radiation pattern) | 全向 | |
| 馈电阻抗 (impedance) | 50 | ohm |
| 功率容量 (Power handling) | 33 | dbm |
| 天线接口 (Interface) | 焊接 | |
| 天线尺寸 (Overall dimensions) | 23*8 | mm |
| 重量 (Weight) | 无要求 | |
| 工作温度 (Operatin Temp) | -30-70 | ℃ |
| 储存温度 (Storing Temp) | -30-70 | ℃ |

2. Physical picture of the antenna



- Note: 1. The antenna parameters are tested based on the simulated environment. There may be performance deviations for different products
2. The antenna function is rather sensitive. If there are any changes to the surrounding structure of the main body, please notify us for assessment

3. VSWR (Voltage Standing Wave Ratio) /Return Loss /Smith Chart (Smith's circle diagram)

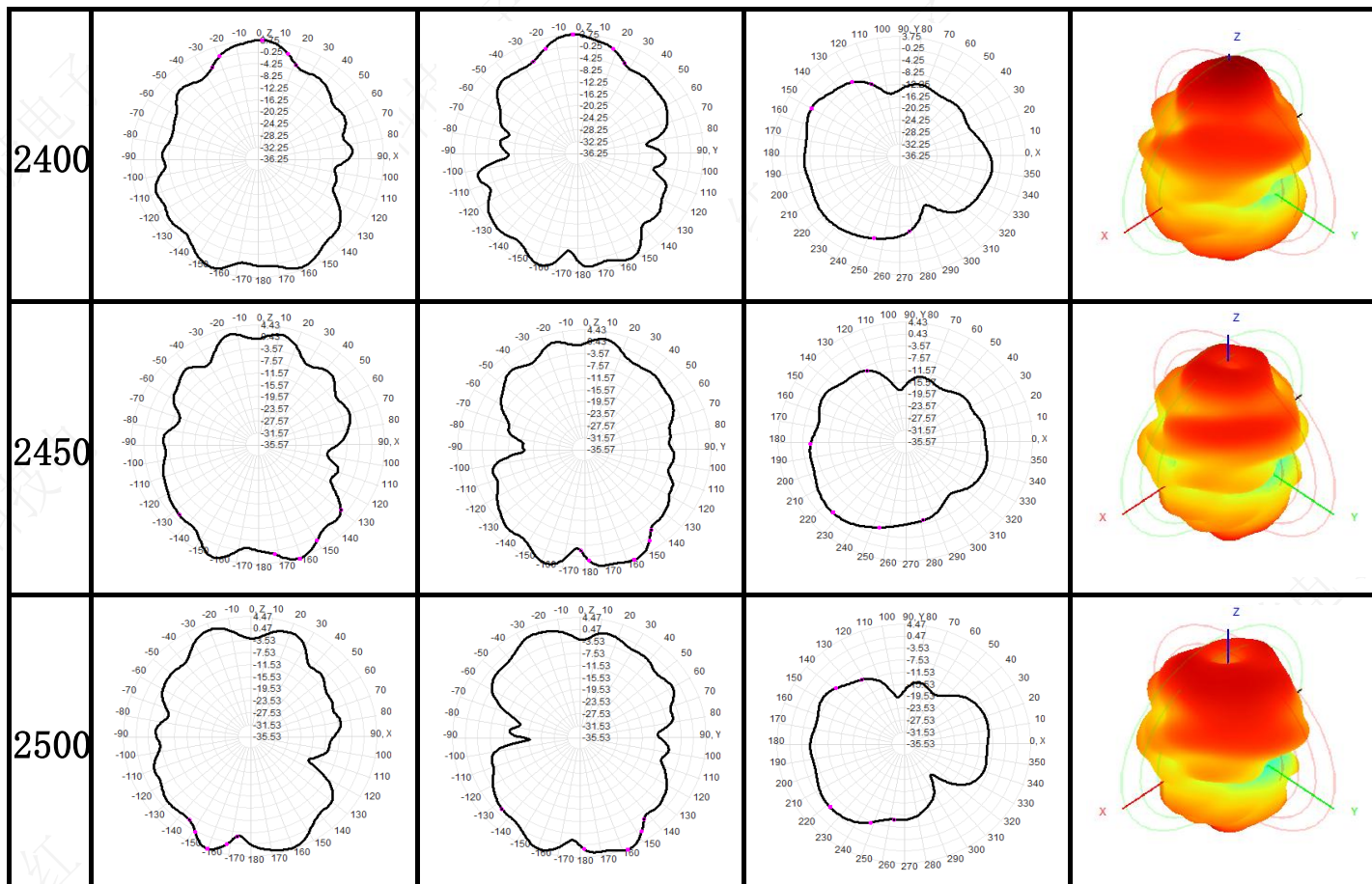


4. Antenna gain, Efficiency and radiation pattern

Gain and efficiency:

| Frequency ID | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 |
|-----------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| Frequency (MHz) | 2400.0 | 2410.0 | 2420.0 | 2430.0 | 2440.0 | 2450.0 | 2460.0 | 2470.0 | 2480.0 | 2490.0 | 2500.0 |
| Gain (dBi) | 4.30 | 4.49 | 4.76 | 5.04 | 5.47 | 5.80 | 5.84 | 5.74 | 5.69 | 5.50 | 5.45 |
| Efficiency (%) | 46.45 | 47.36 | 48.94 | 49.20 | 50.82 | 52.92 | 53.65 | 53.10 | 54.07 | 52.41 | 52.34 |

Antenna radiation map



5. Dimensions and Specifications

