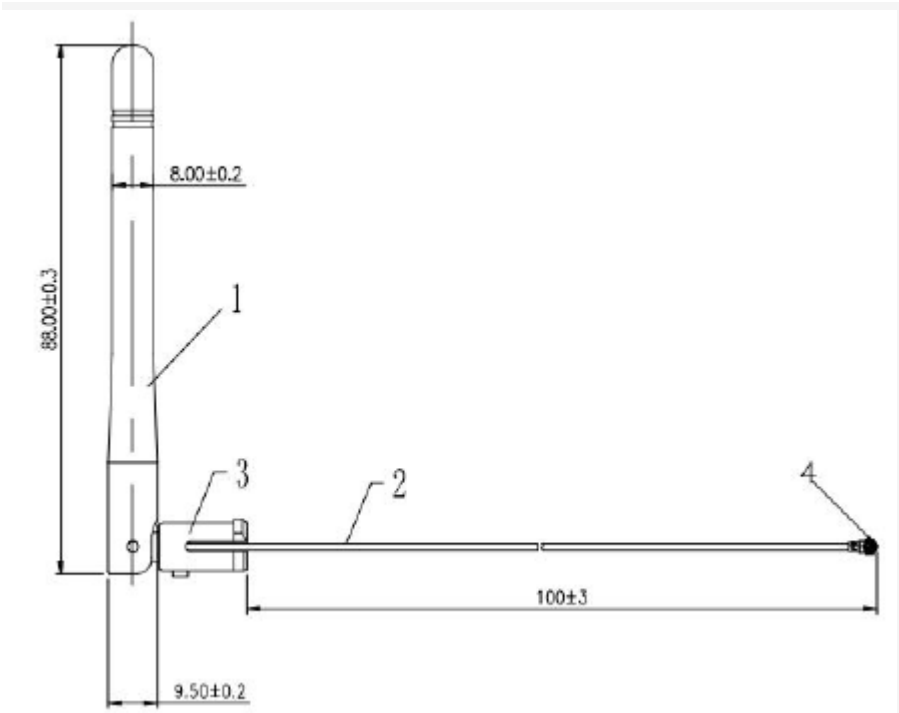


1. Antenna Description:

Antenna type	PIFA antenna
Model	MP038
Frequency range	2400-2500MHz, 5745-5825MHz
Manufacturer	Shenzhen Zhishanglian Technology Co., Ltd
Address	Building A2, Qiangrongdong Industrial Zone, No.723, Zhoushi Road, Jiuwei Community, Hangcheng Street, Baoan District, Shenzhen, China
ANT Peak Gain	2400-2500MHz: 3.38 dBi 5745-5825MHz: 4.75 dBi

2. Antenna Photo:



3. Test Equipment & Conditions

3.1 Test instrument

VSWR is tested using Agilent E5071B connected to a hand mechanism, and the status is free space.

3.2 Test environment and methods

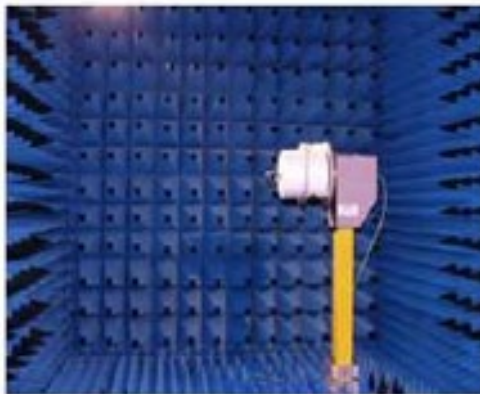
Dark room specifications: ETS-743

TD-SCDMA test equipment: StarPoint SP6010/Agilent 8960

LTE-TDD/FDD-SCDMA test equipment: StarPoint SP8011/CMW500

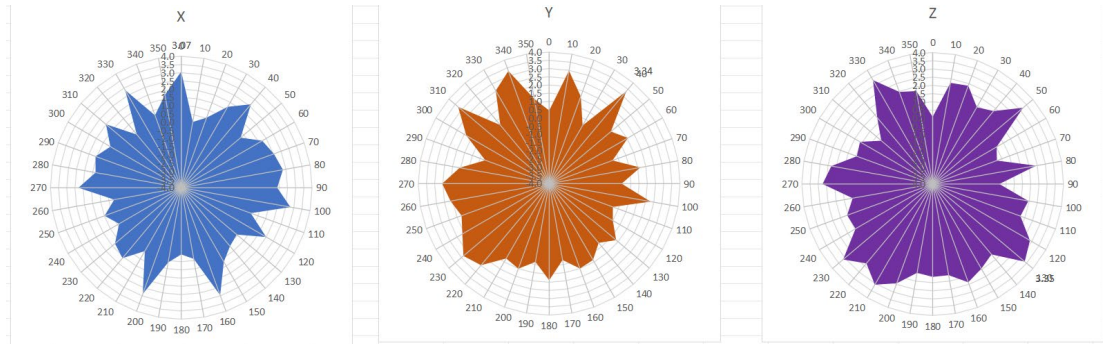
WCDMA/GSM/CDMA test equipment: Agilent 8960

Passive efficiency testing equipment: Agilent Technologies E5071B

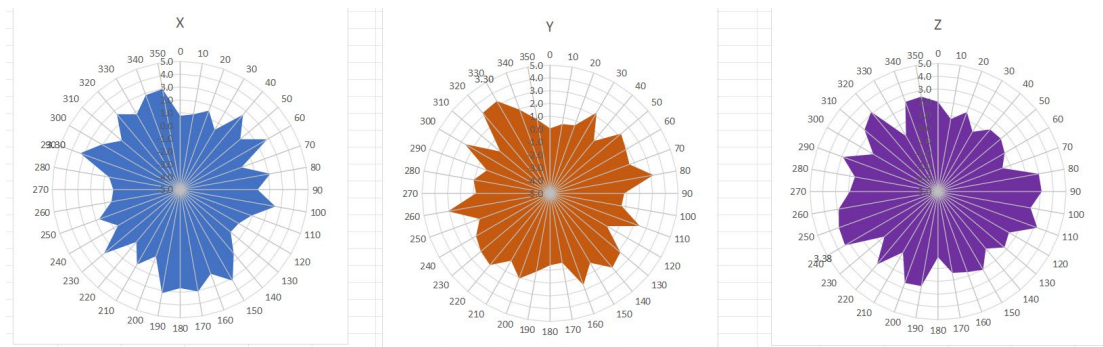


4 . Antenna Radiation Pattern

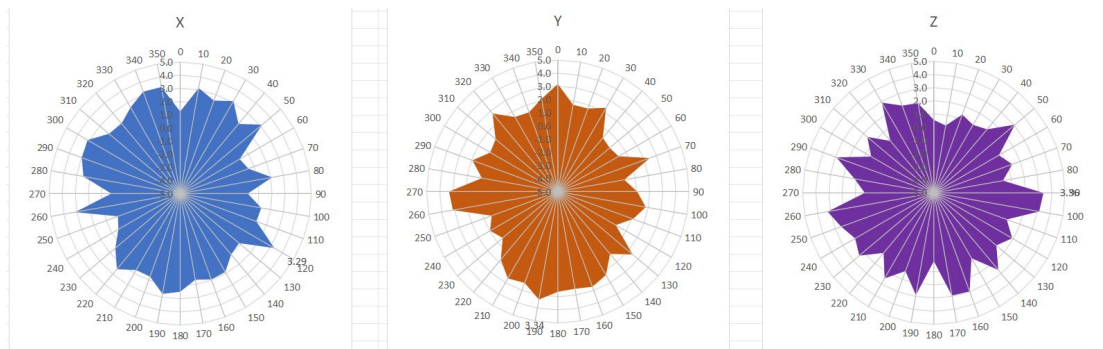
2400MHz



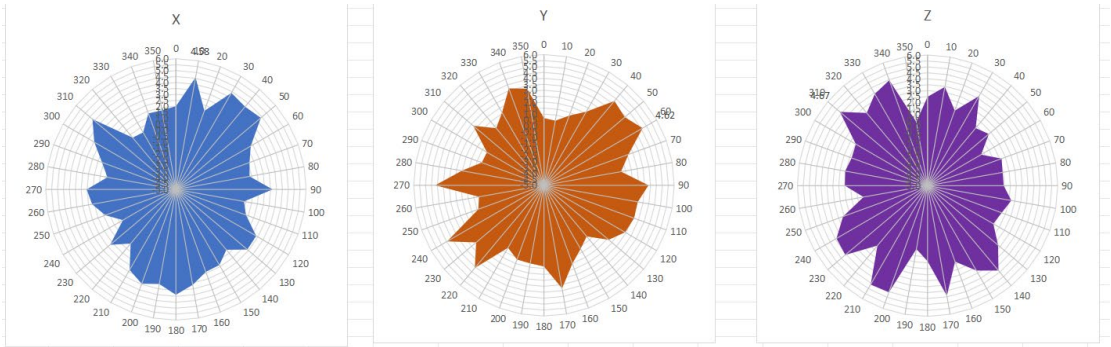
2450MHz



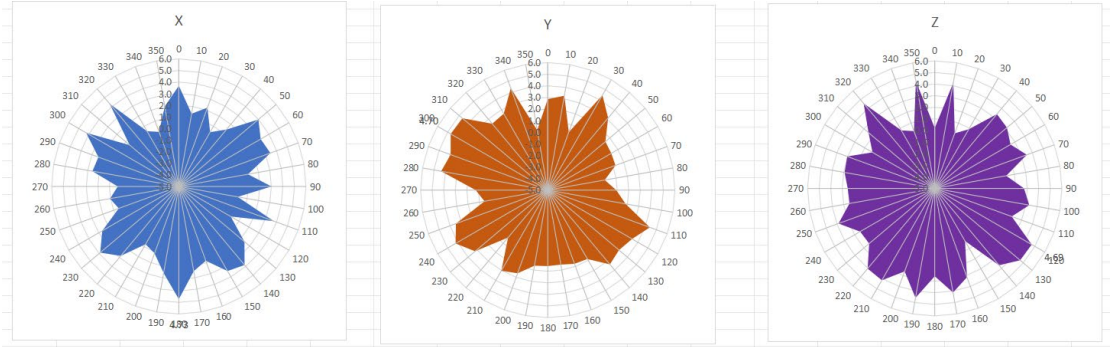
2500MHz



5745MHz



5785MHz



5825MHz

