APPROVAL SHEET

客 户 (Customer)	
日 期 (Date)	2024-7-9
品名规格 (Description)	IPEX-FPC-L60mm 2.4-5.8G
料 号 (Part No.)	

供应商承认签章：		
工程 ENGINEERING DEPARTMENT	品 保 QC DEPARTMENT	业 务 SALES DEPARTMENT
陈湘柳	徐晓宣	

客户承认签章：			
工程 ENGINEERING DEPARTMENT	品 保 QC DEPARTMENT	生 产 MANUFACTORY DEPARTMENT	采 购 PURCHASING DEPARTMENT

批示: ☐ 接受 ☐ 有条件接受
Instructions: ☐ accepted ☐ conditional acceptance

※ 感谢给予敝公司送样承认之机会.如惠蒙承认通过,烦请将此表签回敝公司.
OWE GRATITUDE TO GIVE US THE OPPORTUNITY OF SAMPLE APPROVAL.PLEASE RETURN THIS FROM TO US AFTER YOURS ACCEPT.

Electrical Specifications

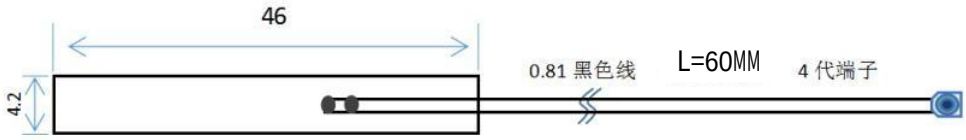
电 性 能 指 标		Electrical Specifications	
频率范围	2400-5800MHZ	Frequency Range	24005800MHZ
电压驻波比	≤1.5	VSWR	≤1.5
输入阻抗	50 Ω	Input Impedance	50 Ω
最大输入功率	50W	Maximum Input Power	50W
机 械 指 标		Mechanical Specifications	
连接器接口	IPEX MHF4	Antenna Color	IPEX MHF4
线材	RG0.81	Cable	RG0.81
线材颜色	黑色	Cable Color	黑色
接口形式	I-PEX	Input connector	I-PEX
长度	6 0 mm	Length	6 0 mm
工作温度	-40℃~+85℃	Working Temperature	-40℃~+85℃
工作湿度	20~80%	Working Humidity	20~80%

实物图片:

RoHS Compliant

REV	DESCRIPTION	DATE	APPROVED
A0			

FPC板



0.81黑色线

要求:

1. 线材外被无破皮.损伤
2. 成品须100%测试导通OK
3. 成品须100%全检OK.
4. 采用环保制程.符合ROHS要求.
5. 端子拉力: 1.5KG~.
6. 未注公差请以一般公差为准.

测试条件:

高压: 200V DC
导通: 0.5 OHM MAX
高压时间: 1mS
绝缘阻抗: 10M OHM MIN

长度单位: mm

No.	Name	Description	Q'ty	Part No.
2	FPC板	L34.5*7*0.26黑色FPC板	1	1601-0034
1	线材	0.81黑-48-锡-FEP	1	1301-0004

一般公差(GENERAL TOLERANCES)

尺寸(Dimension)		角度(Angles)	
0-1	±0.1	X°	±1°
1-10	±0.3	X.X°	±0.5°
10-30	±0.8		
30-100	±1		
100-300	±2		

(UNLESS OTHERWISE SPECIFIED)

版本(REV) A0	图形名称(Draw Name) 组立图			客户料号(CUS No.)
比例(Scale)	产品名称(Product Name) OPEN-FPC-0.81黑-L185MM			产品料号(Product No.)
绘图(Draw Name) 陈淑尊	单位(UNIT) mm	幅面(Size) A4	页/次(Sheet) 1/1	首版日期 (Original Date) 2021.8.30
审核(Checked)				
核准(APPROVED)				

1. Scope:

This specification covers FEP insulated High-Frequency coaxial cable for internal wiring of electronic equipment.

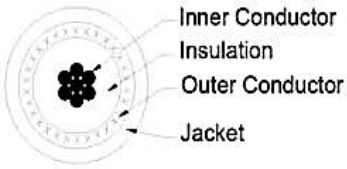
USE: Internal wiring of Class 2 Circuits of Electronic Equipment.

2. Construction :

Item		Unit	Spec. Value
Inner Conductor	Material	---	Silver plated copper
	Construction	No./mm	7/0.05
	Dia.(approx)	mm	0.15
Insulation	Material	---	FEP
	Nom. Thickness	mm	0.13
	Dia.(approx)	mm	0.41±0.05
	Color	---	Natural
Outer Conductor	Type	---	Braid
	Material	---	Tinned copper
	construction	CarrierxEndsxmm	8/5/0.05
	Coverage	---	Min.90%
	Dia.(approx)	mm	0.66
Jacket	Material	---	FEP
	Nom. Thickness	mm	0.08
	Color	---	Upon your request
	Dia.(approx)	mm	0.81±0.10

3. Characteristics :

Test Item	Unit	Specified Value	Note
Appearance	-	Faultless in visible	-
Temperature rating	℃	150	-
Voltage rating	V	250	-
Inner conductor resistance(at 20℃)	Ω/km	Max.1400	At 20℃
Insulation resistance 1> (at 20℃)	MΩ-km	Min.1000	At 20℃
Dielectric strength	-	Dielectric core : No breakdown at AC1.5KV for 0.15sec.	Spark test
	-	Jacket : No breakdown at AC 1.5KV for 0.15sec.	Spark test
	-	No breakdown at AC 500V for 1min	Outer conductor to inner conductor
Capacitance	Pf/m	97±14.5	At 1KHz
Characteristic impedance (at D-TDR)	Ω	50±4	TDR method
Attenuation (Max.)	dB/m	4.03	0.9GHz
		4.60	1.5GHz
		5.18	1.9GHz
		5.87	2.4GHz
		6.67	3.0GHz
		7.94	4.0GHz
		9.09	5.0GHz
		9.89	5.8GHz
		10.24	6.0GHz

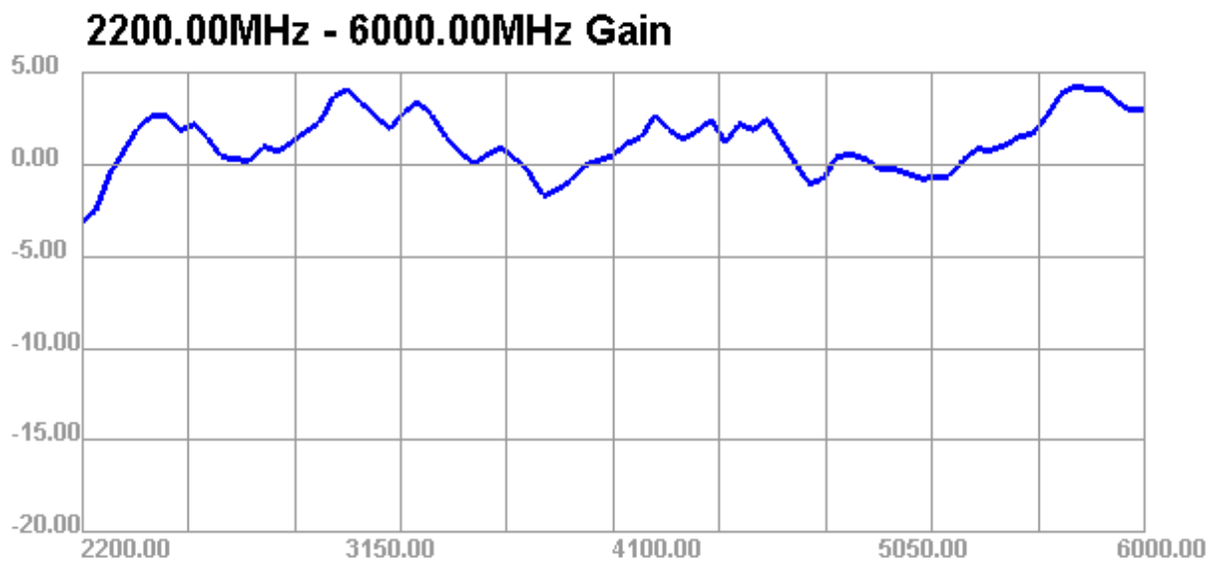


Cross-section of cable

IPEX端子：

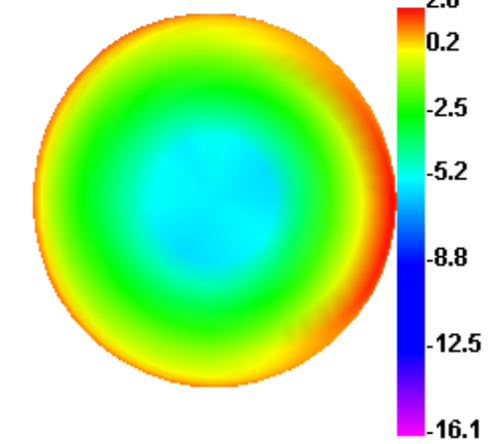
Passive Test For 2.4-5.8										
Freq (MHz)	Effi (%)	Effi (dB)	Gain (dBi)	Gain (dBd)	UHIS (%)	DHIS (%)	Max (dB)	Min (dB)	Attenut Hor	Attenut Ver
2200	17.86	-7.48	-3.18	-5.33	9.156	8.701	-3.18	-22.79	44.82	43.93
2250	27.5	-5.61	-2.48	-4.63	20.199	7.298	-2.48	-21.08	45.23	44.53
2300	40.14	-3.96	-0.5	-2.65	26.907	13.23	-0.5	-20.34	45.78	45.31
2350	53.52	-2.71	0.73	-1.42	32.785	20.734	0.73	-17.72	46.38	45.92
2400	72.25	-1.41	1.99	-0.16	42.586	29.667	1.99	-16.08	46.87	46.67
2450	90.26	-0.45	2.63	0.48	52.108	38.152	2.63	-20.38	47.72	47.63
2500	93.56	-0.29	2.62	0.47	54.394	39.17	2.62	-19.04	47.75	47.52
5100	50.55	-2.96	-0.24	-2.39	28.052	22.501	-0.24	-17.57	55	54.91
5150	47.98	-3.19	-0.5	-2.65	25.793	22.183	-0.5	-18.07	54.78	54.67
5200	44.62	-3.51	-0.77	-2.92	23.39	21.225	-0.77	-17.83	54.75	54.81
5250	45.56	-3.41	-0.72	-2.87	23.692	21.872	-0.72	-19.28	54.73	54.93
5300	44	-3.57	-0.65	-2.8	22.971	21.028	-0.65	-17.21	54.5	54.73
5350	52.3	-2.81	0.23	-1.92	27.109	25.193	0.23	-14.72	55.24	55.51
5400	60.59	-2.18	0.83	-1.32	30.342	30.247	0.83	-14.75	55.55	56.05
5450	55.38	-2.57	0.76	-1.39	26.997	28.383	0.76	-14.01	55.31	56.11
5500	52.43	-2.8	1.02	-1.13	25.316	27.112	1.02	-15.7	55.63	56.65
5550	56.41	-2.49	1.49	-0.66	25.951	30.458	1.49	-16.59	56.59	57.66
5600	57.48	-2.4	1.68	-0.47	24.193	33.285	1.68	-18.08	57.26	57.88
5650	59.86	-2.23	2.62	0.47	21.921	37.939	2.62	-18.26	57.84	58.26
5700	67.58	-1.7	3.82	1.67	21.261	46.323	3.82	-15.22	57.82	58.3
5750	66.61	-1.76	4.21	2.06	18.817	47.79	4.21	-15.62	57.87	58.19
5800	62.16	-2.06	4.11	1.96	18.41	43.75	4.11	-21.53	57.78	58.22
5850	70.15	-1.54	4.11	1.96	25.506	44.641	4.11	-12.12	58.5	59.08
5900	71.24	-1.47	3.42	1.27	30.455	40.788	3.42	-8.22	58.59	59.29
5950	76.18	-1.18	2.92	0.77	36.672	39.505	2.92	-7.56	59.52	60.37
6000	80.96	-0.92	2.94	0.79	40.972	39.989	2.94	-7.7	61.25	62.09

Application Information	
O4Version	4.95.303
TotalTime	6m 10s 800ms
AdditionalInfor	NULL

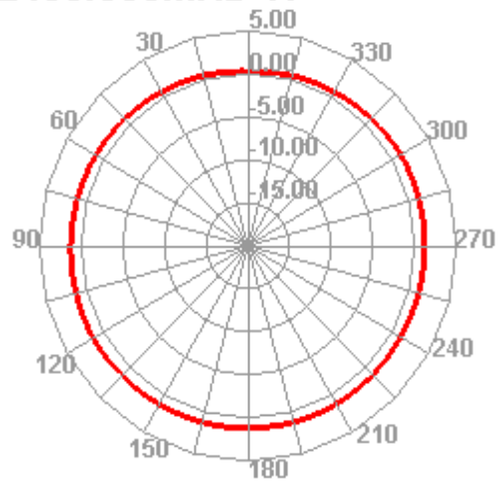


2200.00MHz - 6000.00MHz Efficiency

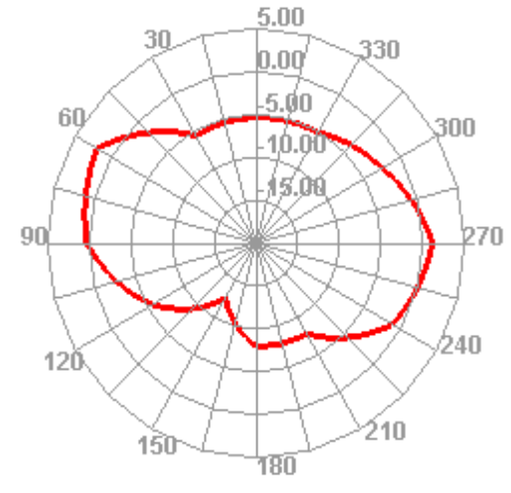
2400.000MHz



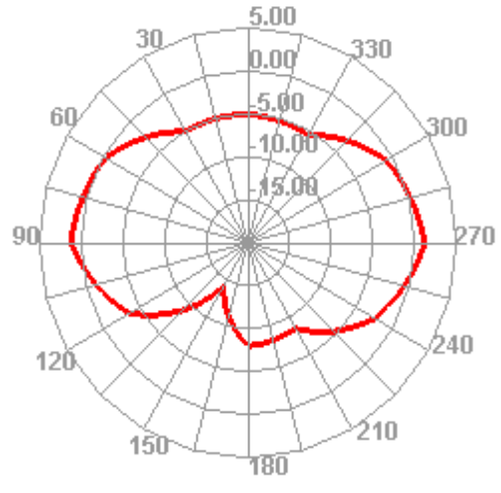
2400.000MHz H

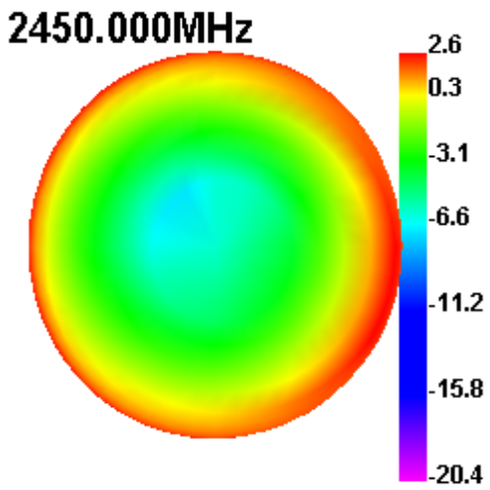


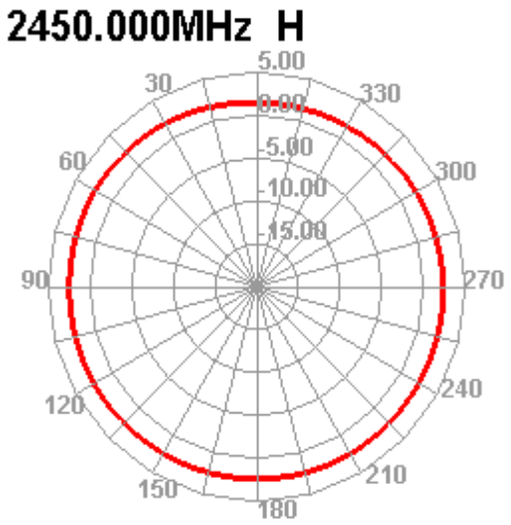
2400.000MHz E1

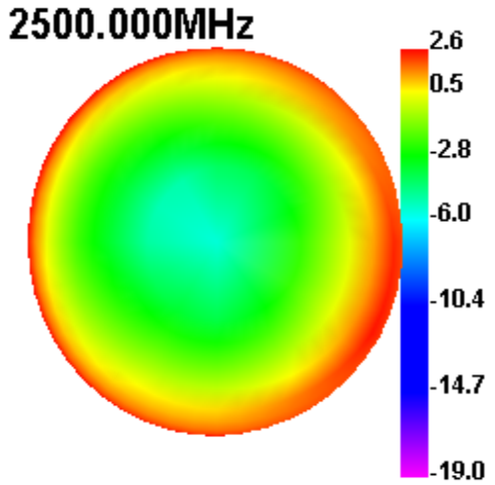


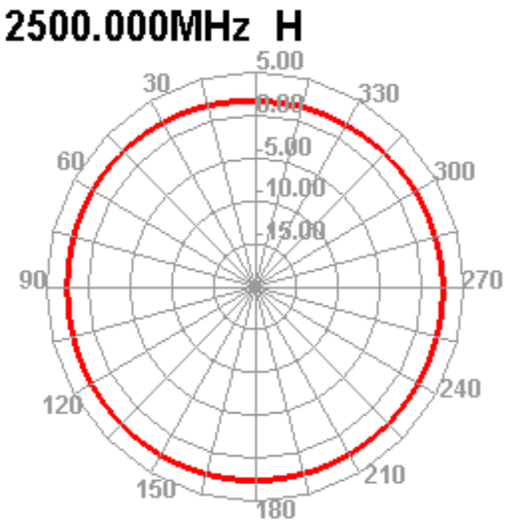
2400.000MHz E2

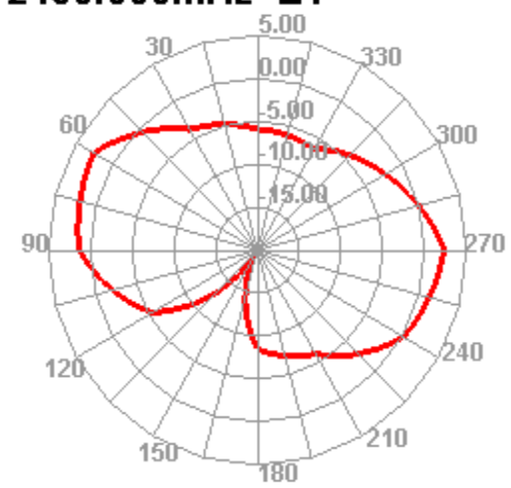


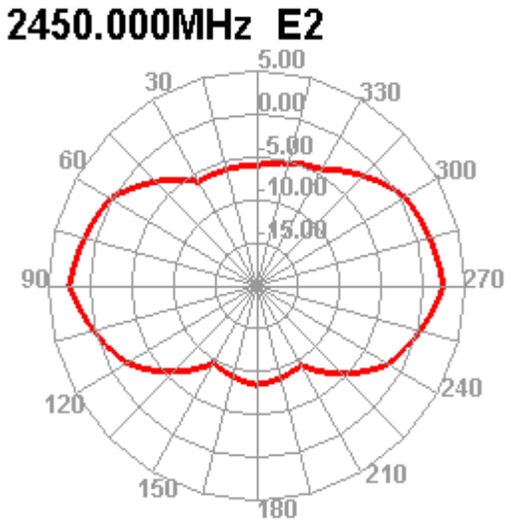

2450.000MHz
2.6
0.3
-3.1
-6.6
-11.2
-15.8
-20.4


2450.000MHz H
5.00
0.00
-5.00
-10.00
-15.00
30
330
60
300
90
270
120
240
150
210
180

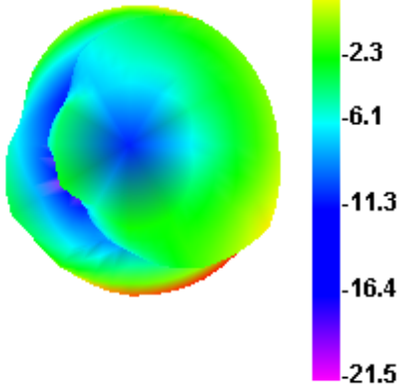

2500.000MHz
2.6
0.5
-2.8
-6.0
-10.4
-14.7
-19.0

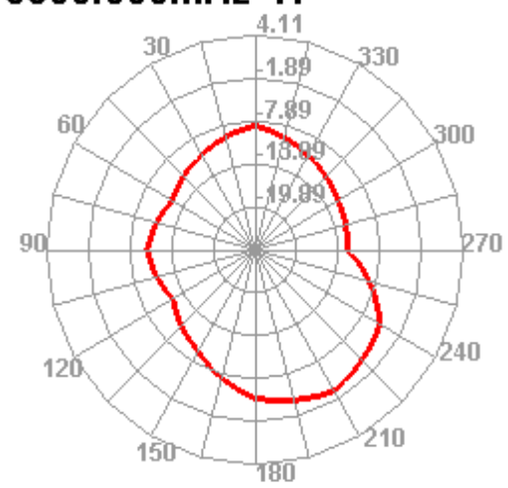

2500.000MHz H
5.00
0.00
-5.00
-10.00
-15.00
30
330
60
300
90
270
120
240
150
210
180

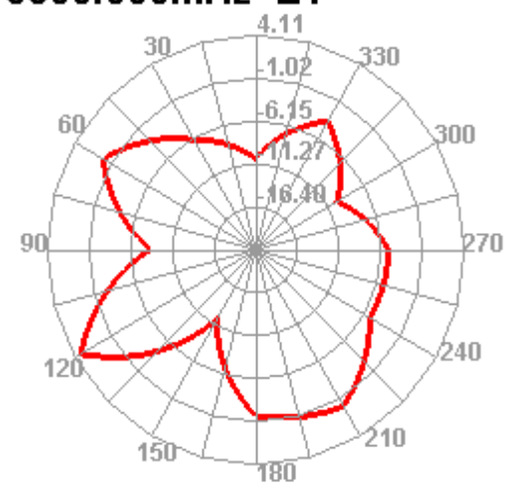

2450.000MHz E1
5.00
0.00
-5.00
-10.00
-15.00
30
330
60
300
90
270
120
240
150
210
180

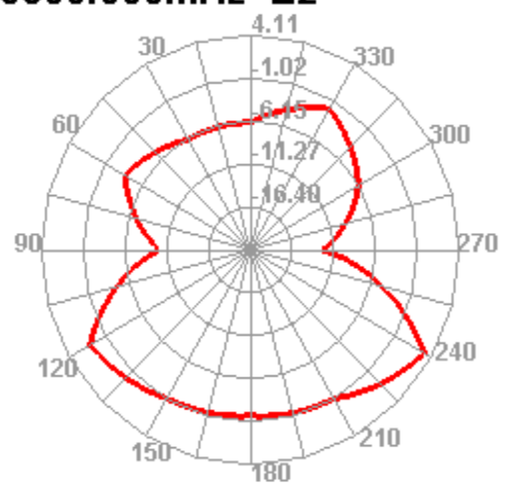

2450.000MHz E2
5.00
0.00
-5.00
-10.00
-15.00
30
330
60
300
90
270
120
240
150
210
180

5800.000MHz

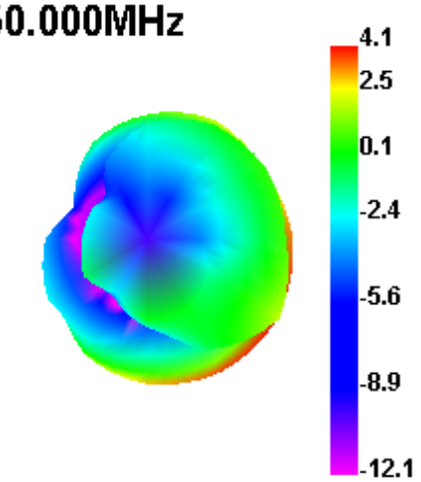


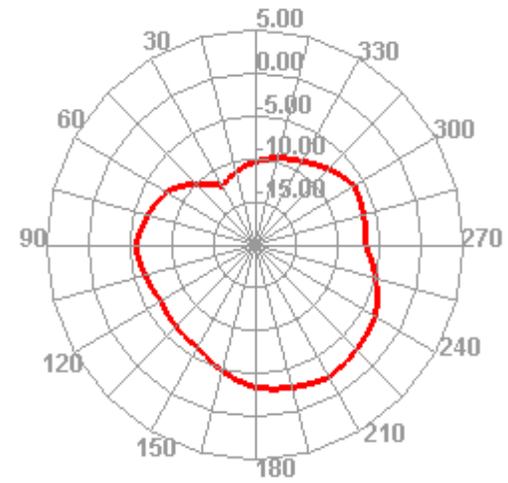


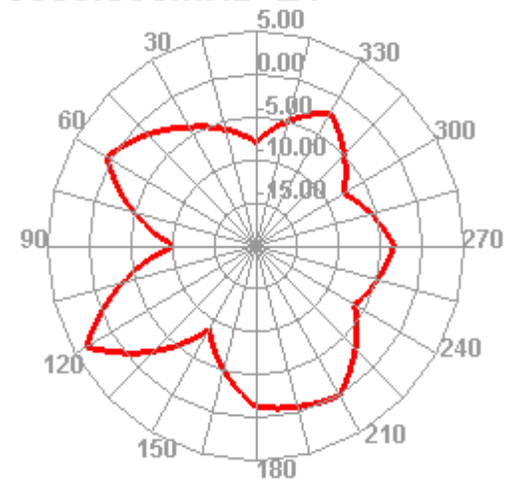


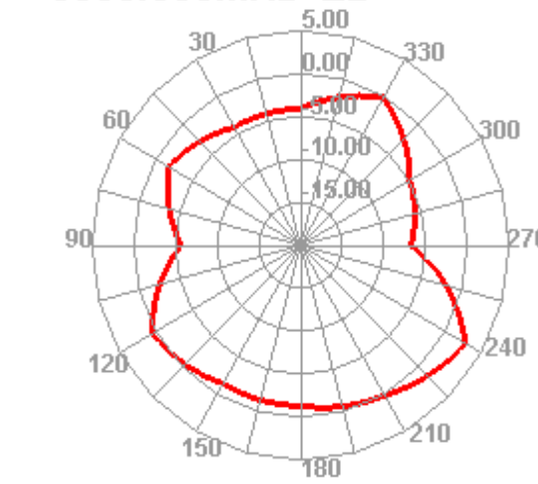


5850.000MHz

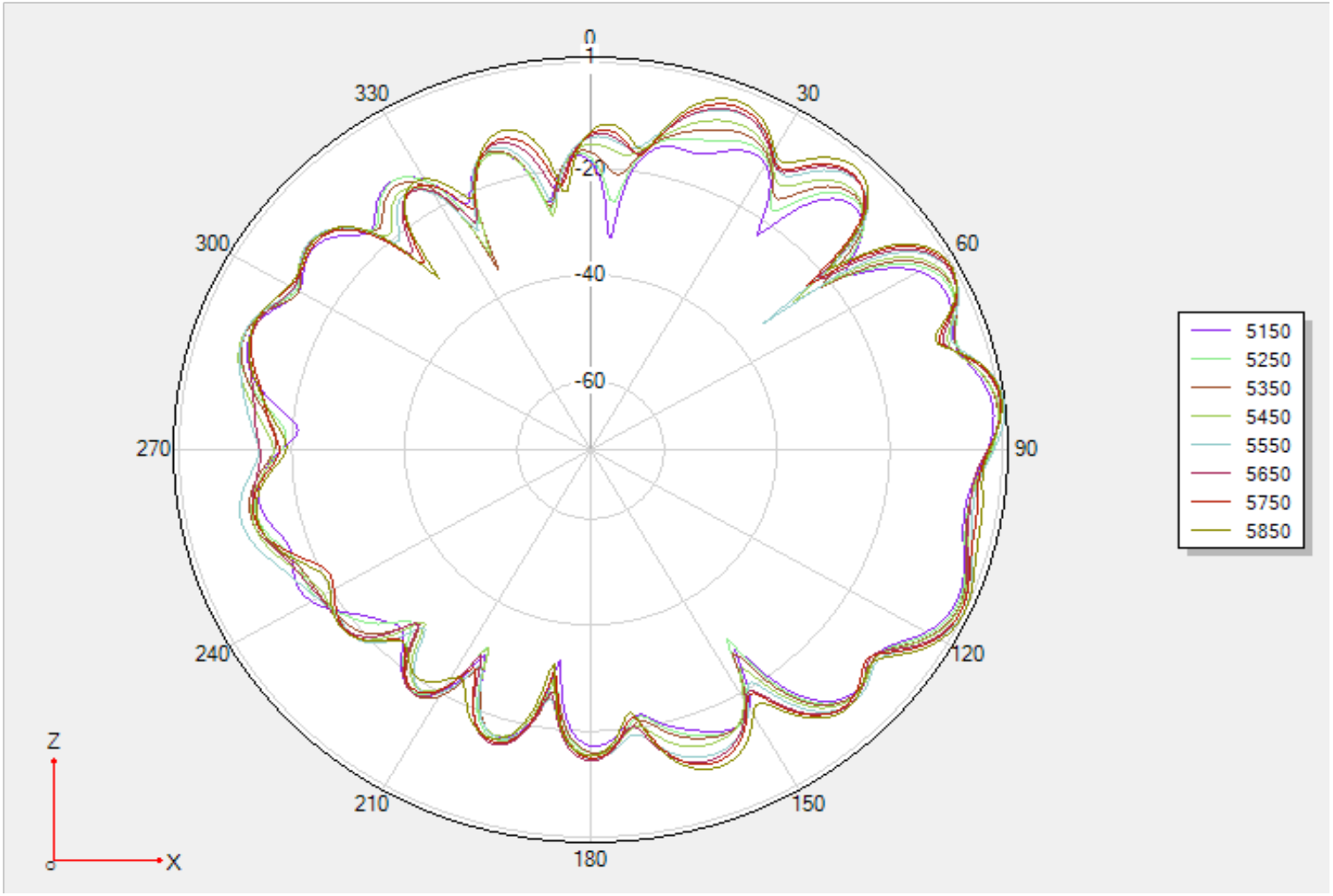




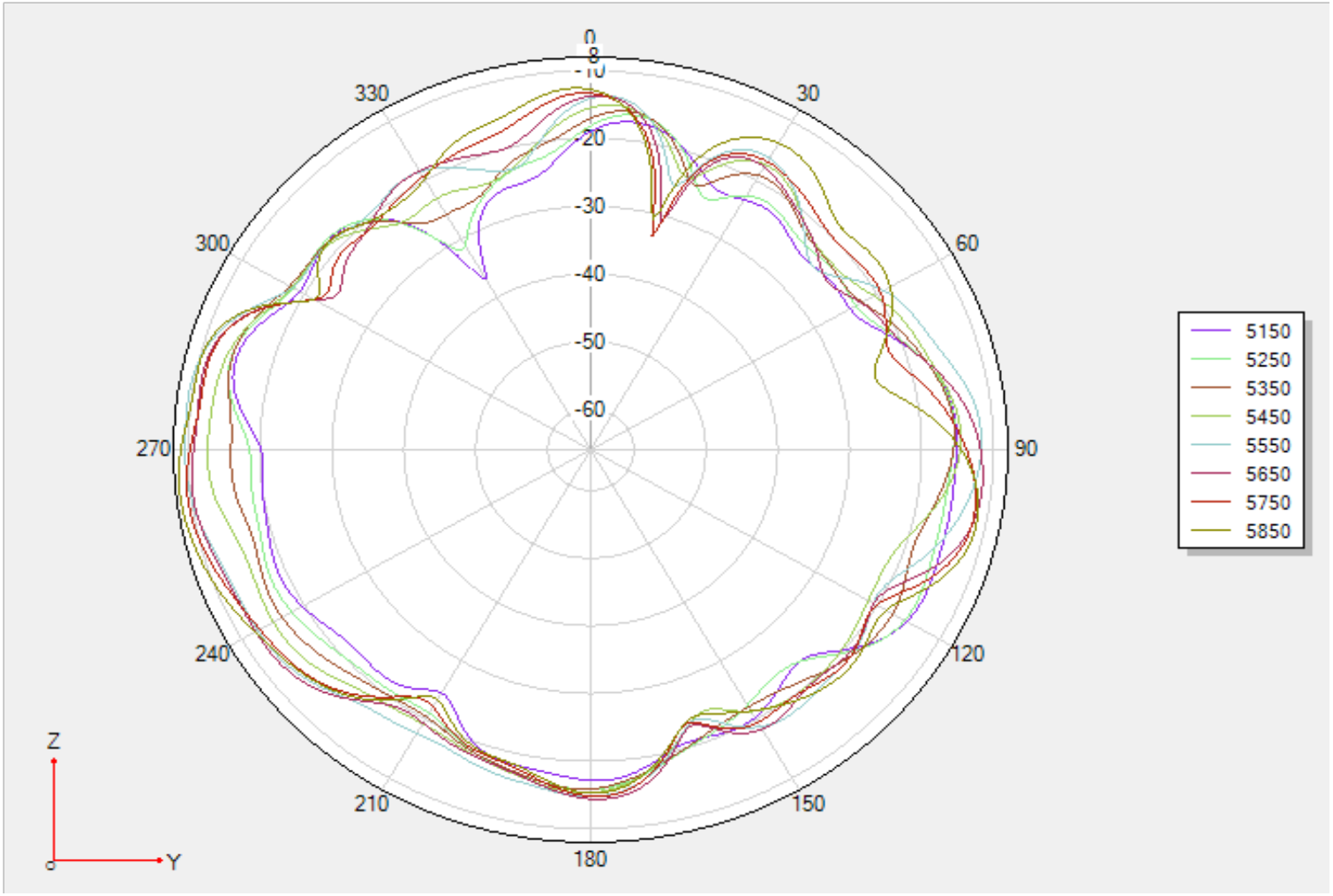




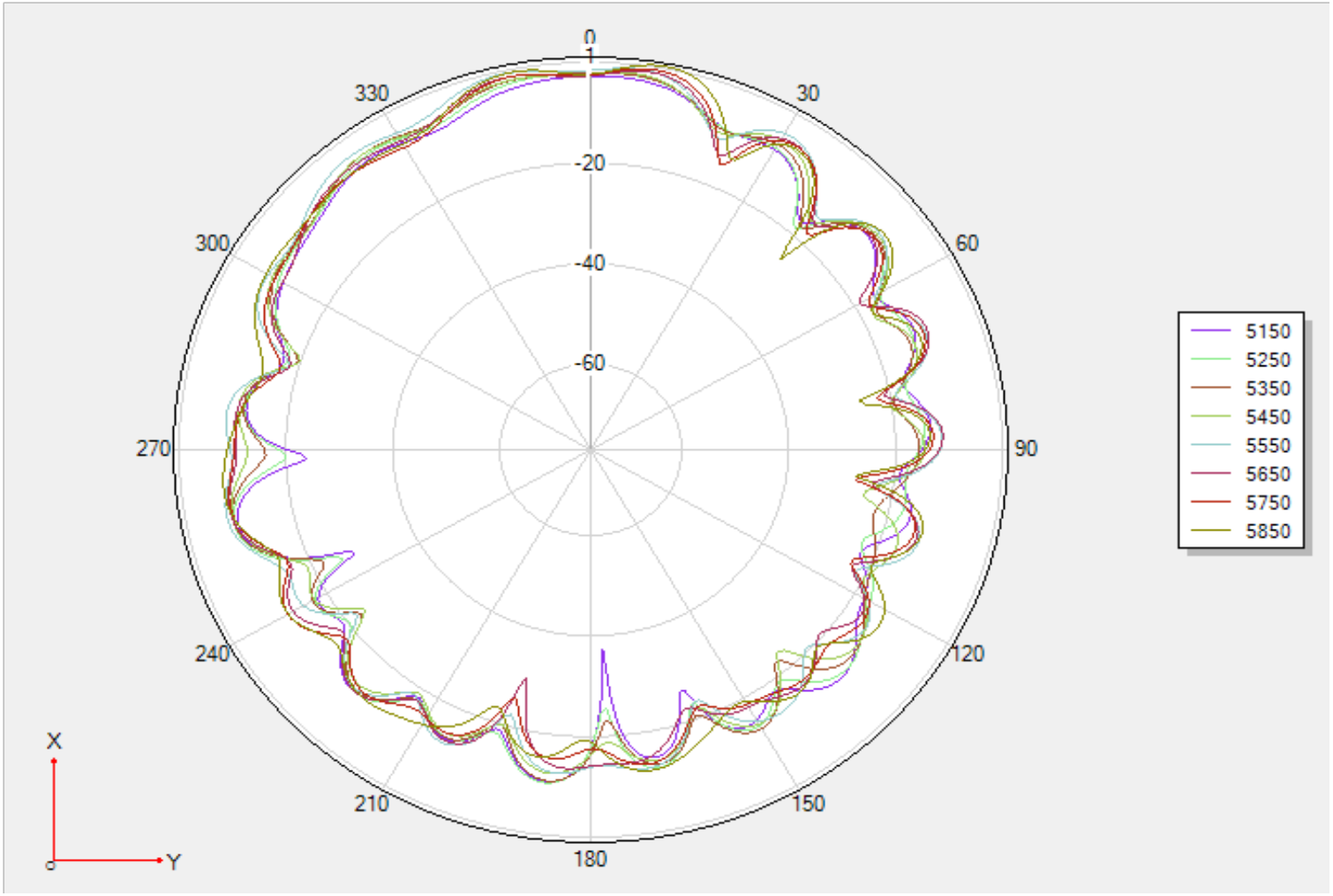
5G Phi 0 2D图


0
30
60
90
120
150
180
210
240
270
300
330
-20
-40
-60
5150
5250
5350
5450
5550
5650
5750
5850
Z
X

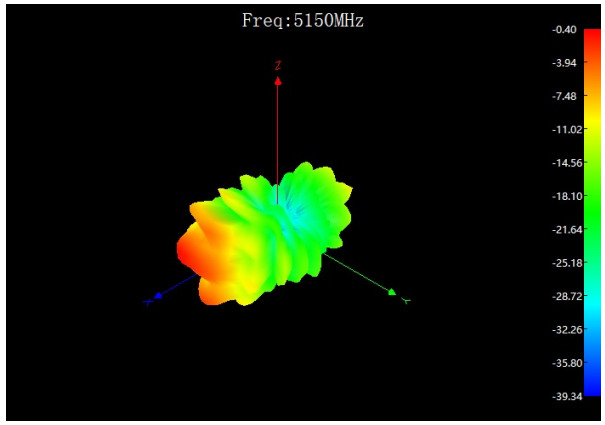
5G Phi 90 2D图

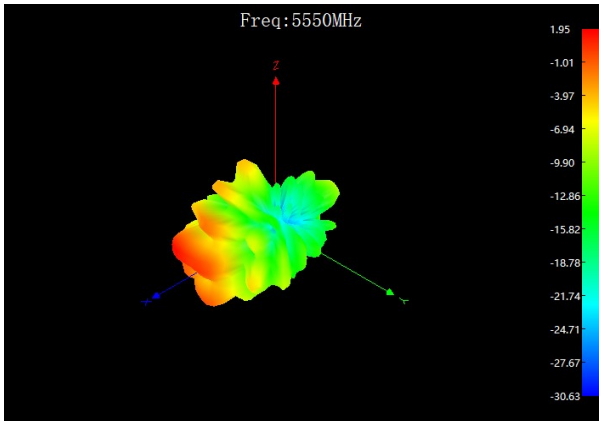

0
-10
-20
-30
-40
-50
-60
30
60
90
120
150
180
210
240
270
300
330
Z
Y
5150
5250
5350
5450
5550
5650
5750
5850

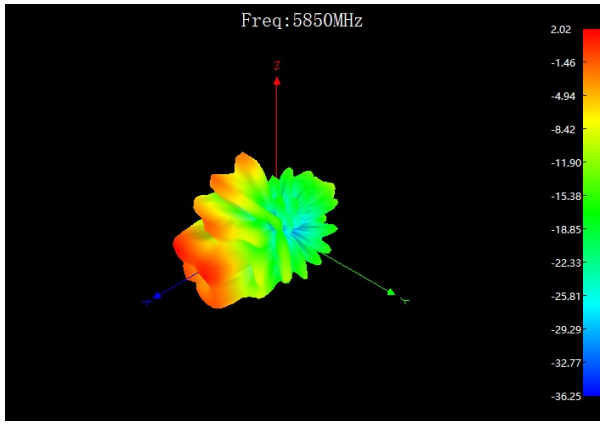
5G Theta 90 2D图



5G 3D场型图：


Freq:5150MHz
-0.40
-3.94
-7.48
-11.02
-14.56
-18.10
-21.64
-25.18
-28.72
-32.26
-35.80
-39.34


Freq:5550MHz
1.95
-1.01
-3.97
-6.94
-9.90
-12.86
-15.82
-18.78
-21.74
-24.71
-27.67
-30.63


Freq:5850MHz
2.02
-1.46
-4.94
-8.42
-11.90
-15.38
-18.85
-22.33
-25.81
-29.29
-32.77
-36.25