



Outline

1. Benchmark
2. S-Parameters (VSWR & isolation)
3. Antenna Efficiency & Peak Gain
4. Radiation patterns
5. Summary

Customer: Barking Labs Corporation

Project Name: FB3

Manufacture: Shanghai Jinghong Communication Technology Co., Ltd.

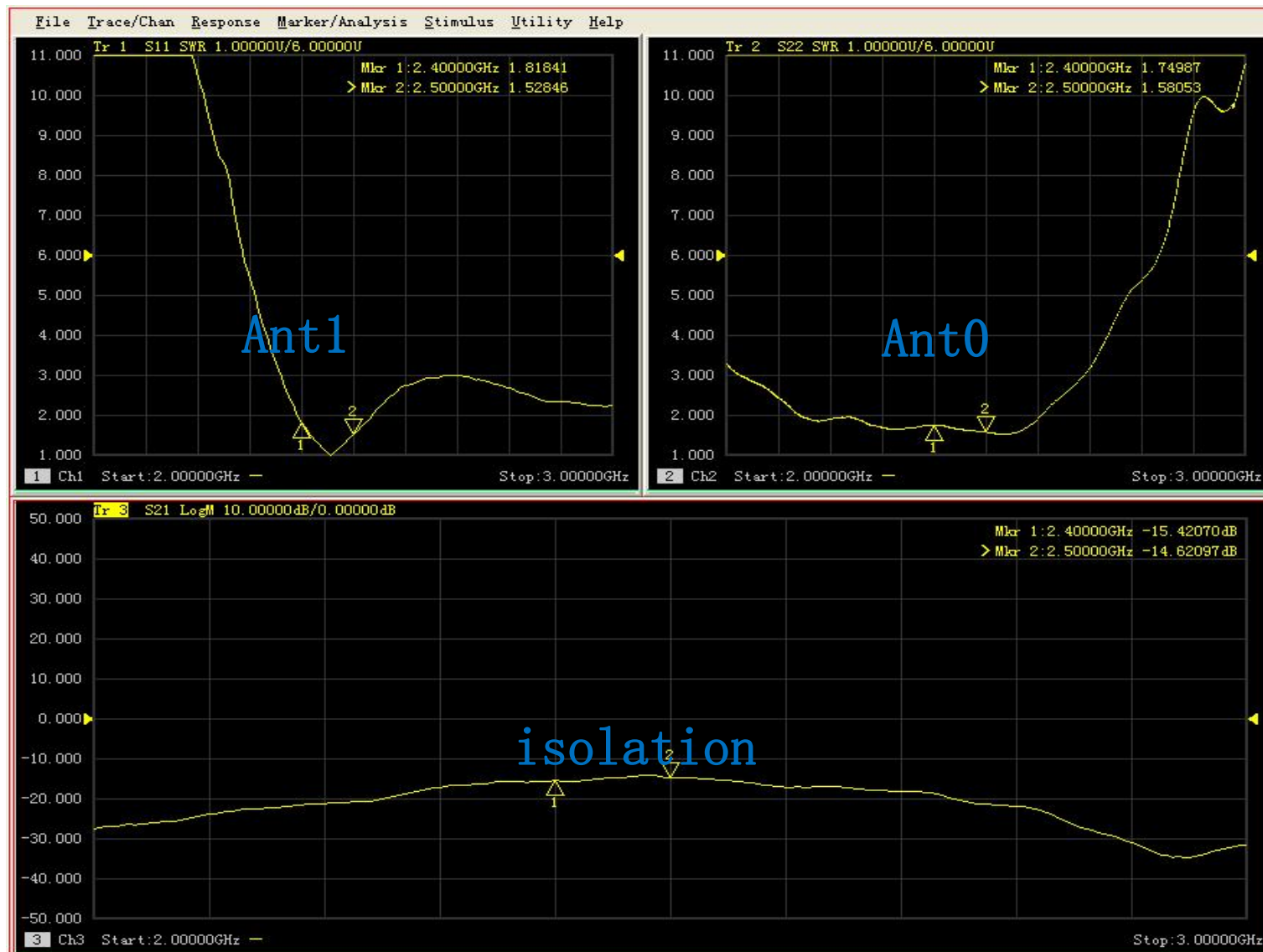
Antenna Type: Dipole

The test equipment list: EM-testing24+E5071C

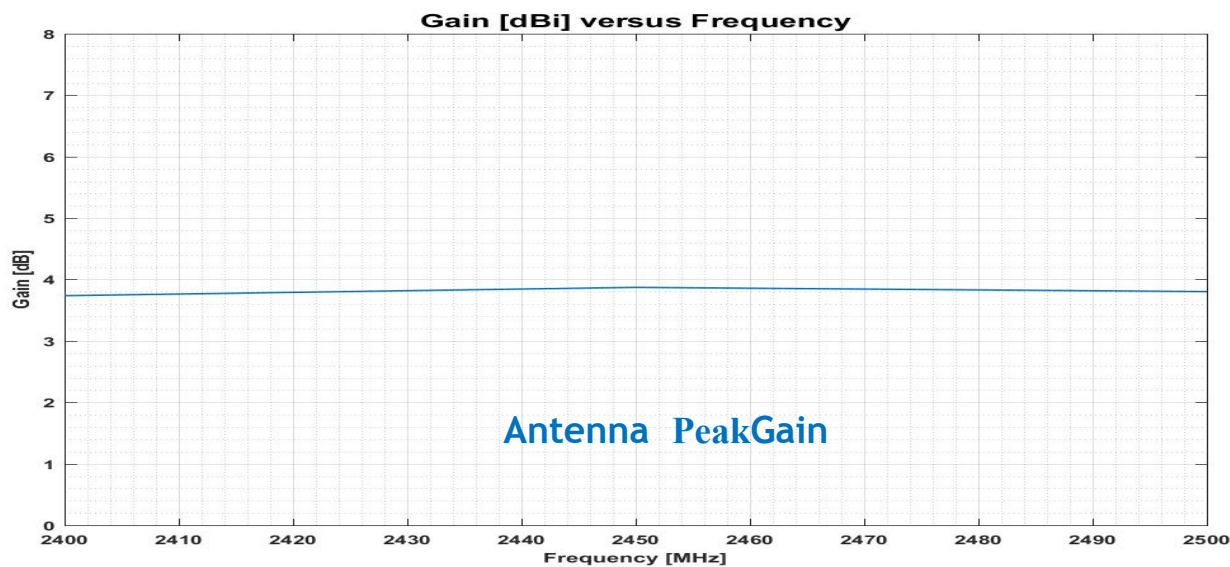
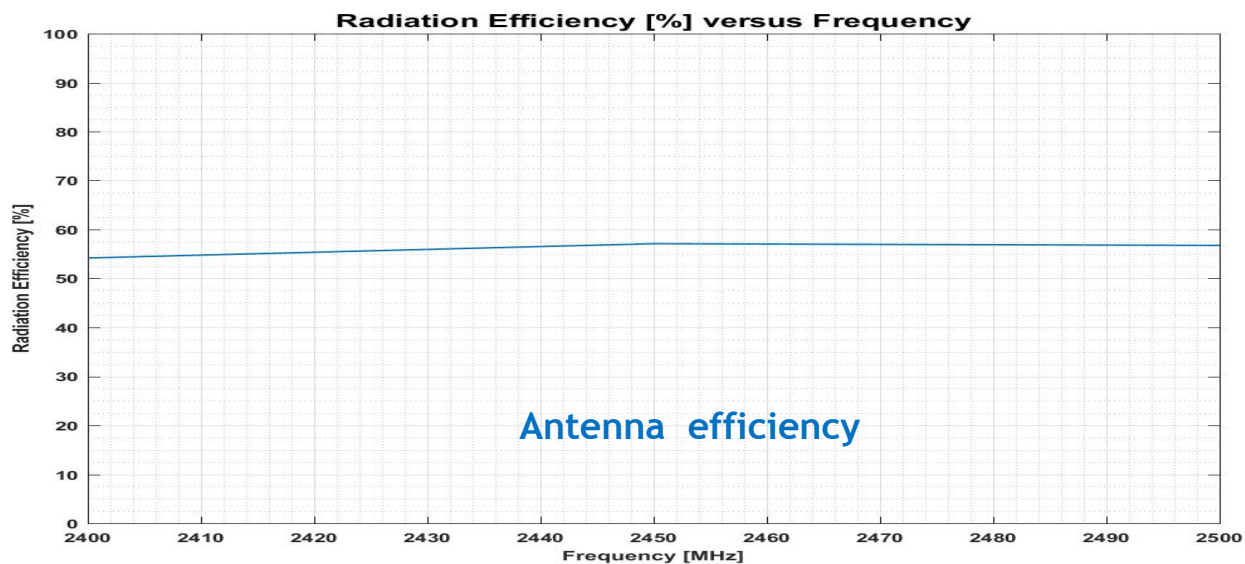
Designer: LZH

Date: 2022/09/07

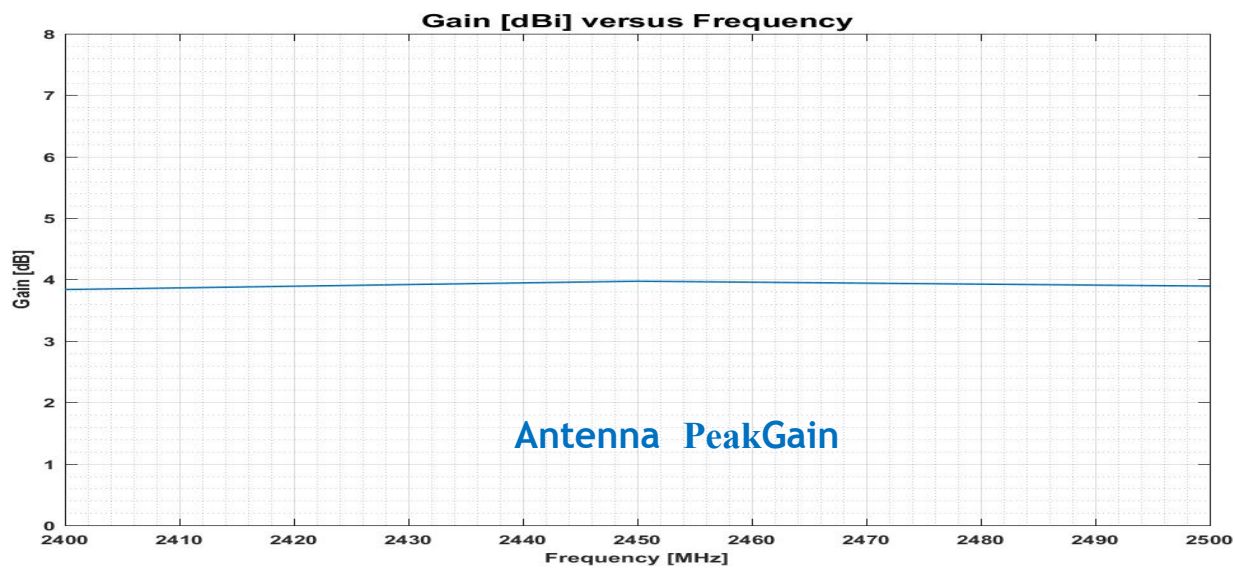
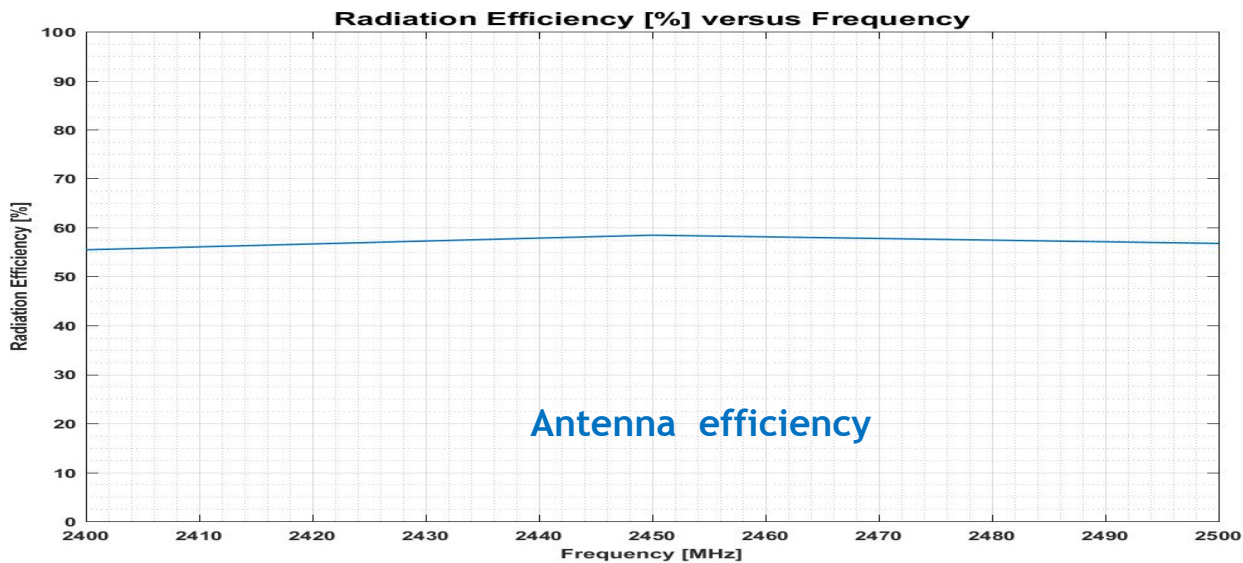
2.S-Parameters(VSWR & isolation)



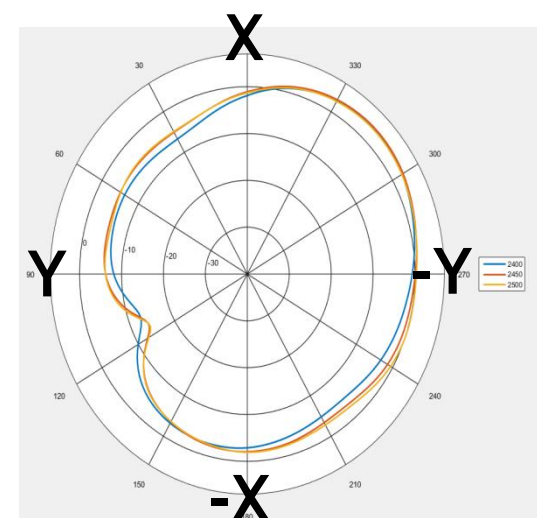
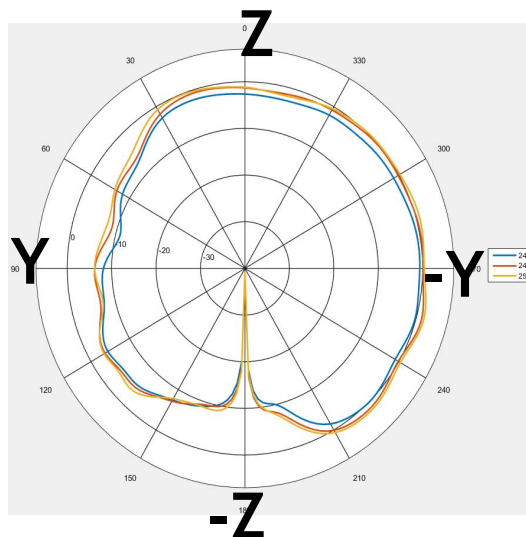
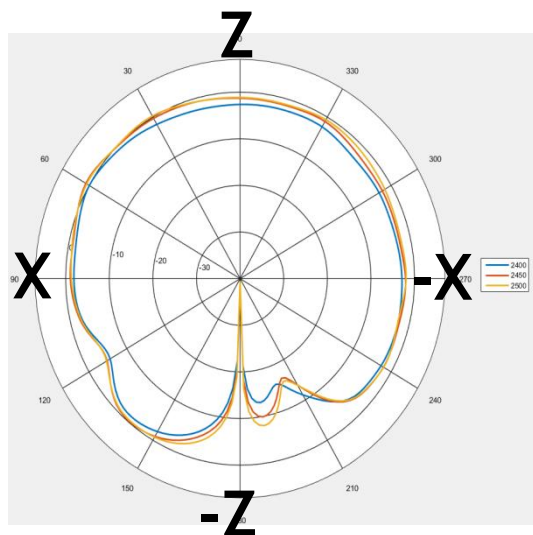
3. Antenna Efficiency & Peak Gain (Ant0)



3. Antenna Efficiency & Peak Gain (Ant1)

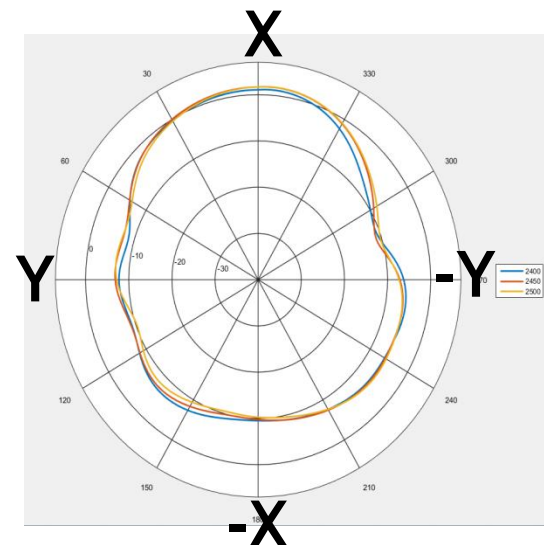
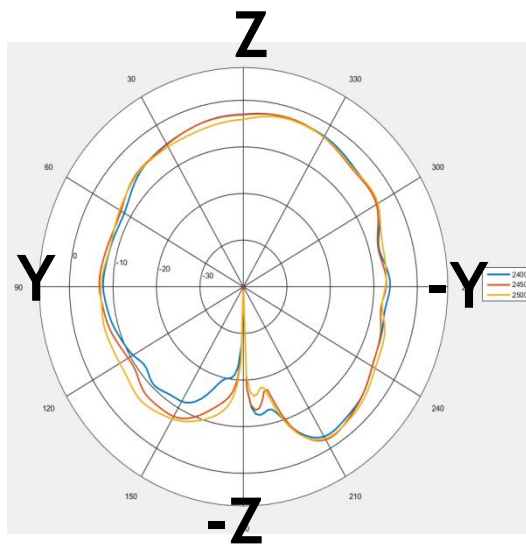
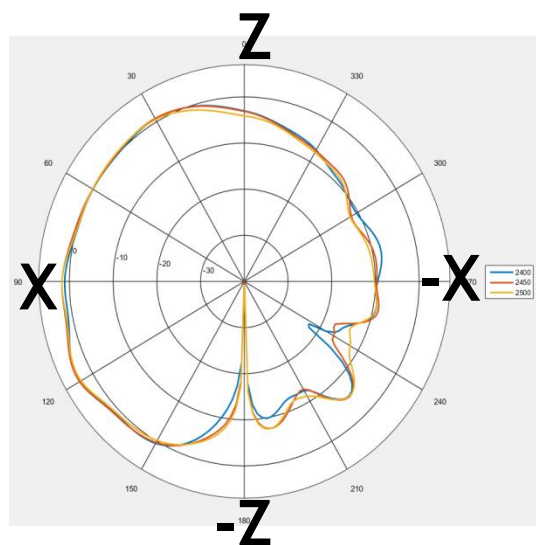


4. Radiation patterns (Ant0)



Frequency	2400MHz			2450MHz			2500MHz		
	ZX Plane	ZY Plane	XY Plane	ZX Plane	ZY Plane	XY Plane	ZX Plane	ZX Plane	ZX Plane
Max Gain (dB)	3.76	-2.39	1.16	3.87	-1.93	1.75	3.81	-2.13	1.77
Average Gain (dB)	-5.41	-6.67	-6.94	-5.29	-6.89	-6.91	-5.41	-6.25	-6.97

4. Radiation patterns (Ant1)



Frequency	2400MHz			2450MHz			2500MHz		
	ZX Plane	ZY Plane	XY Plane	ZX Plane	ZY Plane	XY Plane	ZX Plane	ZX Plane	ZX Plane
Max Gain (dB)	-0.6	3.84	2.64	-0.1	3.97	2.33	-0.15	3.89	2.34
Average Gain (dB)	-3.63	-1.37	-3.57	-3.36	-1.36	-3.13	-3.2	-2.07	-2.37



5.Summary

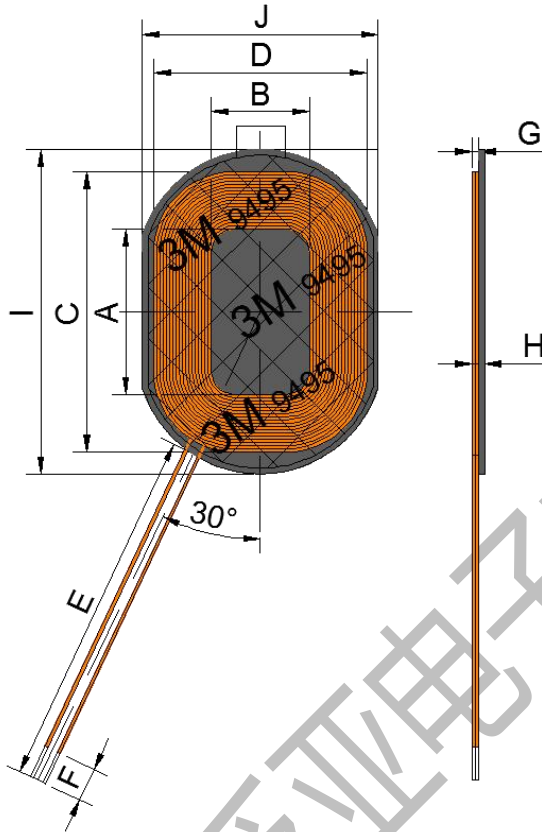
1. The measurements are as follows:

Item	Frequency (MHz)	2400	2450	2500
Ant0	Peak Gain (dBi)	3.76	3.87	3.81
	Efficiency (%)	54.18	57.10	56.76
Ant1	Peak Gain (dBi)	3.84	3.97	3.89
	Efficiency (%)	55.45	58.43	56.73

SPECIFICATION

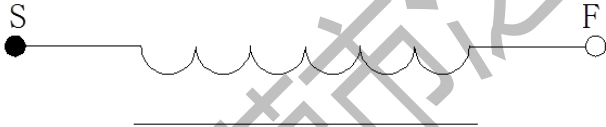
ANTENNA TYPE :	LOOP COIL	Rev: A.1	CUST:	753
			Fine P/N:	FYD753002-TX
			CUST P/N:	

一、 DIMENSION:(mm)



A	12±0.5
B	7±0.5
C	24±1
D	19.5 +0.6/-0.7
E	20±3
F	2-4
G	0.75±0.15
H	2.15 Max
I	26 +0.2/-0.4
J	20.5 +0.2/-0.4

二、 SCHEMATIC DIAGRAM:



三、 Winding Specification:

NO.	TERMINAL	WIRE	Turns	Winding Direction
1	S F	Litz 0.1*10P	32Ts	α

四、 ELECTRICAL CHARACTERISTICS:

TEMPERATURE:25±10°C, RELATIVE HUMIDITY:65±20%

NO.	ITEM	TERMINAL	SPECIFICATION	TEST FREQUENCY	TEST EQUIPMENTS
1	IND.	S-F	32.5uH ± 10%	100KHz/1.0V	LCZ METER 1062B
2	DCR	S-F	≤520m Ω		TH2810

PREPARED BY/DATE	CHECKED BY/DATE
2022/07/05	2022/07/05