

Specification for Approval

CONTENTS

Customer:	N/A	Vendor:	N/A
Customer P/N:	N/A	HL P/N:	N/A
Product model:	HSELAQ_01_54MG_35	HL Device Name:	N/A
Pcb antenna brand:	Fuxiang	Approval Date:	2025-3-29
Manufacturer	HANSHOW PTE. LTD.		
Address	138 ROBINSON ROAD #02-33 OXLEY TOWER SINGAPORE(068906)		

Internal Approval		
Approved By:	Checked By:	Prepared By:
		Zhang Bin
Customer Approval		

Revision:

Date	Rev	Description of Changes
2024-10-18	A	Initial Release

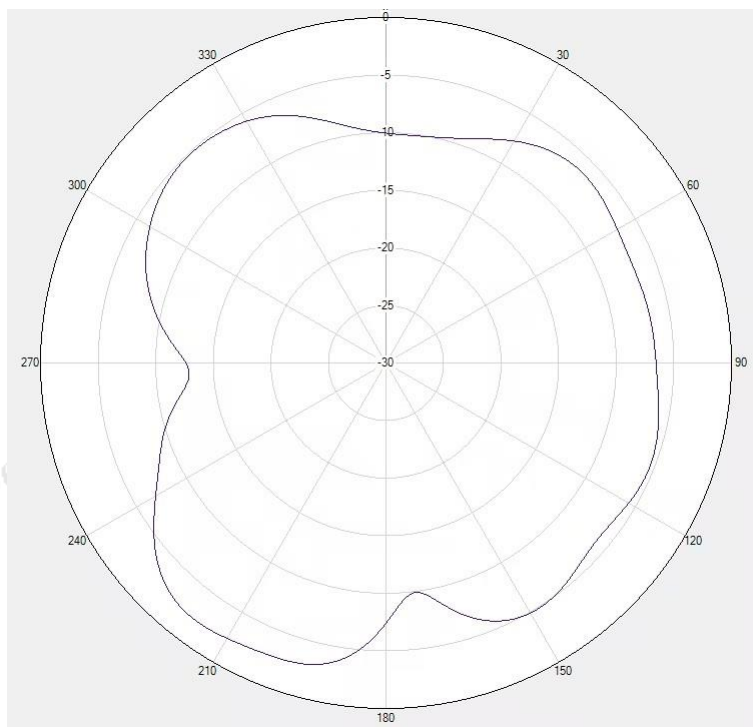
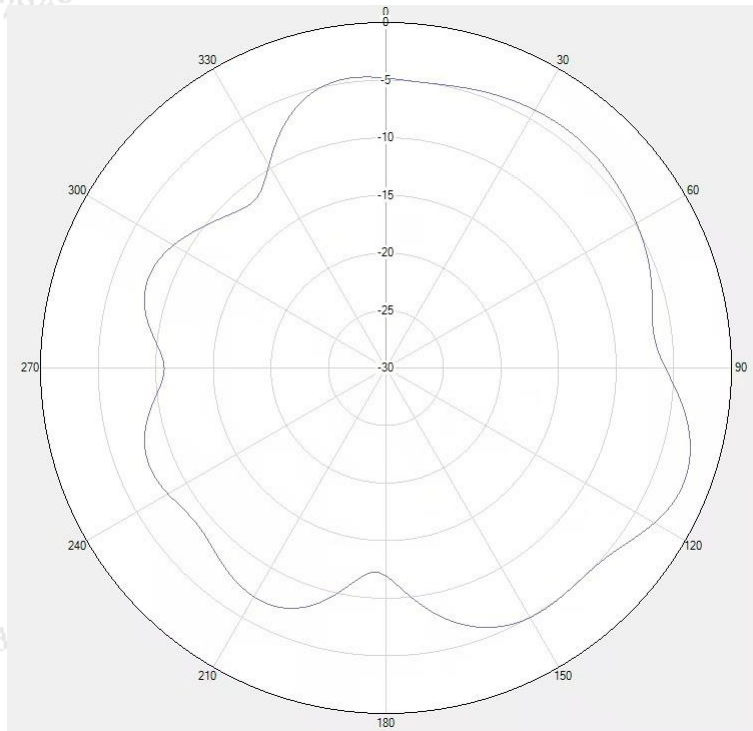
1、Products Electrical		
PCB Antenna		
1	Antenna Model	PCB IFA Antenna
2	Frequency Range	2400-2500MHz
3	VSWR (or return loss)	<2 (<-9.5dB)
4	Broadband	>100MHz
5	Impedance	50 ohm
6	Gain	-1.1dbi
7	Polarization	LP

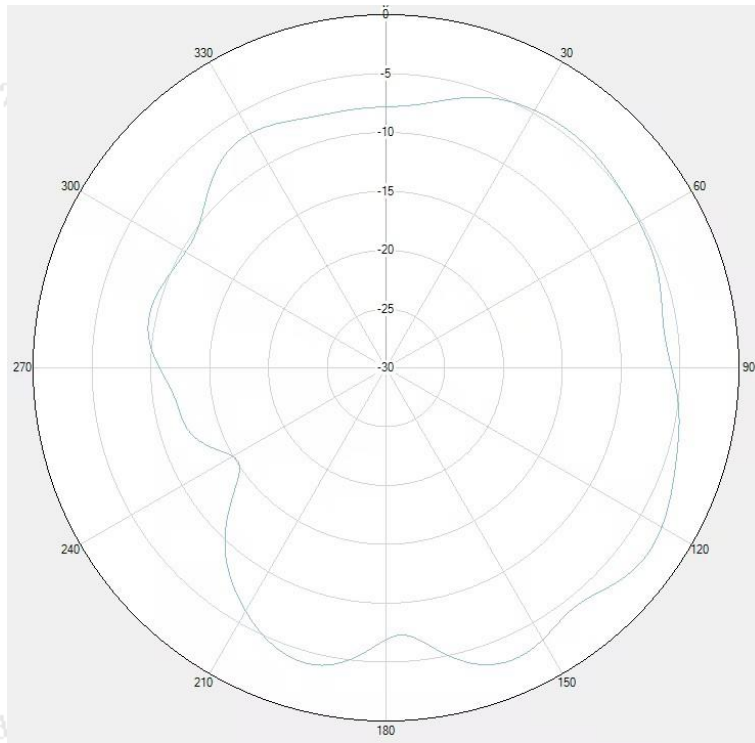
2、Antenna Test Data

2.1 Return loss

Frequency (GHz)	S11 (dB)	S22 (dB)
2.400000	-1.6134	-1.6134
2.450000	-1.7504	-1.7504
2.460000	-1.8004	-1.8004
2.470000	-1.8865	-1.8865
2.480000	-2.2981	-2.2981

2.2 RADIATION PATTERNS 2450MHz





2.3 GAIN AND EFFICIENCY

Frequency (MHz)	Efficiency (%)	Gain (dBi)
2400	24.6	-1.1
2410	25.0	-1.4
2420	26.4	-1.2
2430	28.3	-1.2
2440	31.5	-1.1
2450	31.8	-1.3
2460	30.2	-1.4
2470	29.0	-1.7
2480	28.6	-1.8
2490	27.5	-1.3
2500	26.2	-1.5

3、PCB ANTENNA (MM)

