

Bluetooth Pattern Antenna Datasheet

REV 1.1

Model: ccNC basic

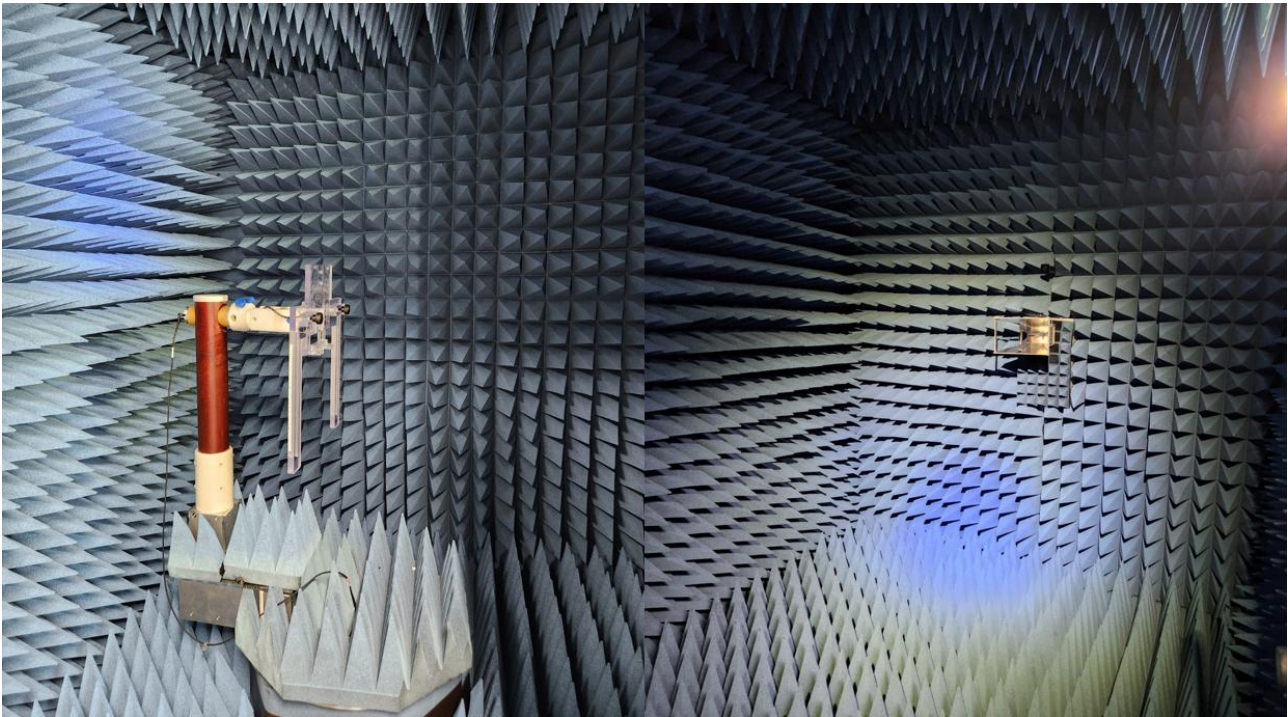
Frequency
2402 ~ 2480MHz

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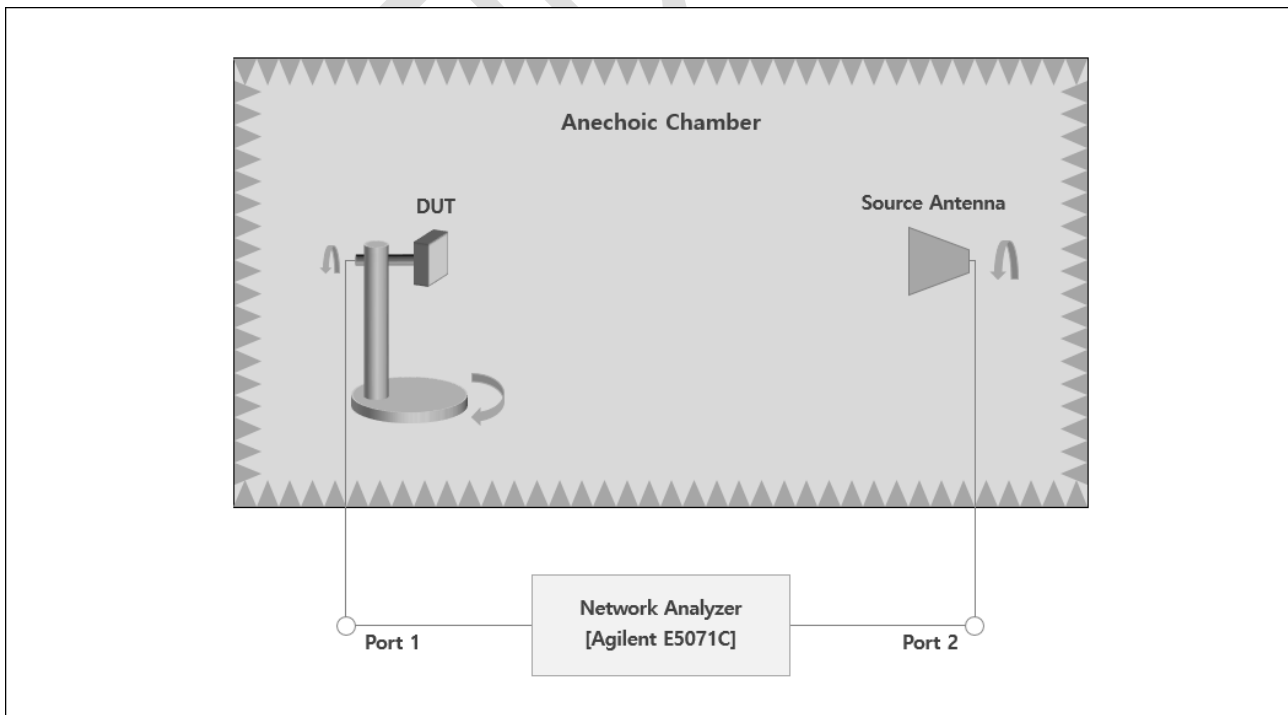
1 Test Environment and Method

1.1 Test Environment



[Anechoic Chamber]

1.2 Test Method



[Anechoic chamber Configuration]

1.3 Test Equipment

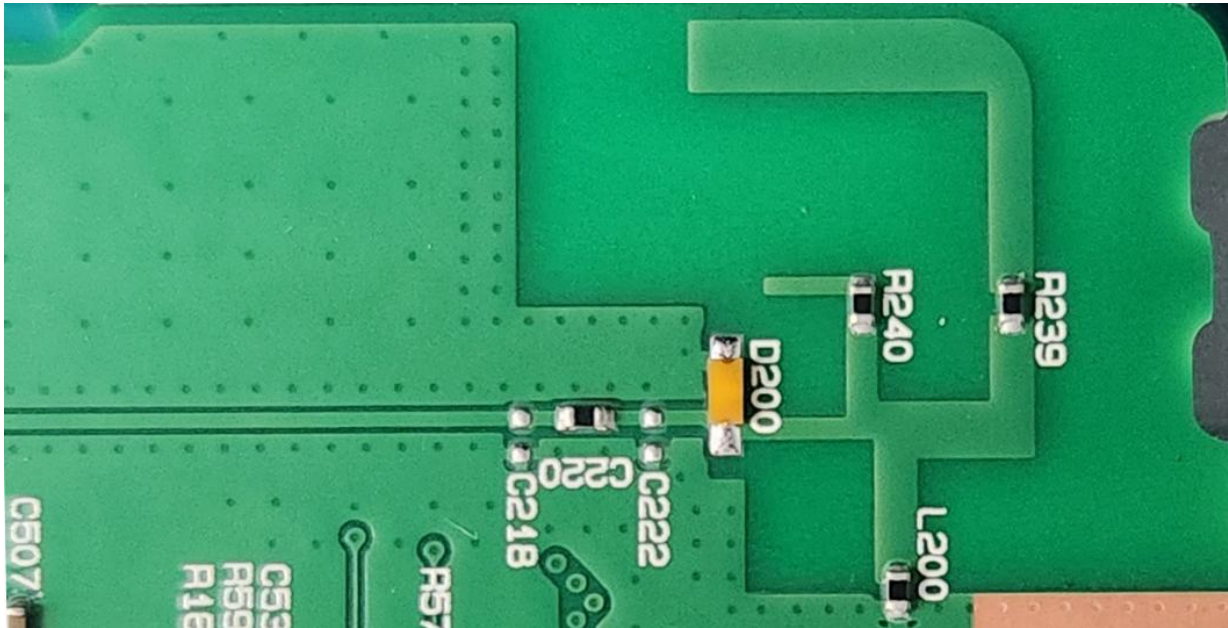


[Test Tool and Equipment setting]



[Test Equipment]

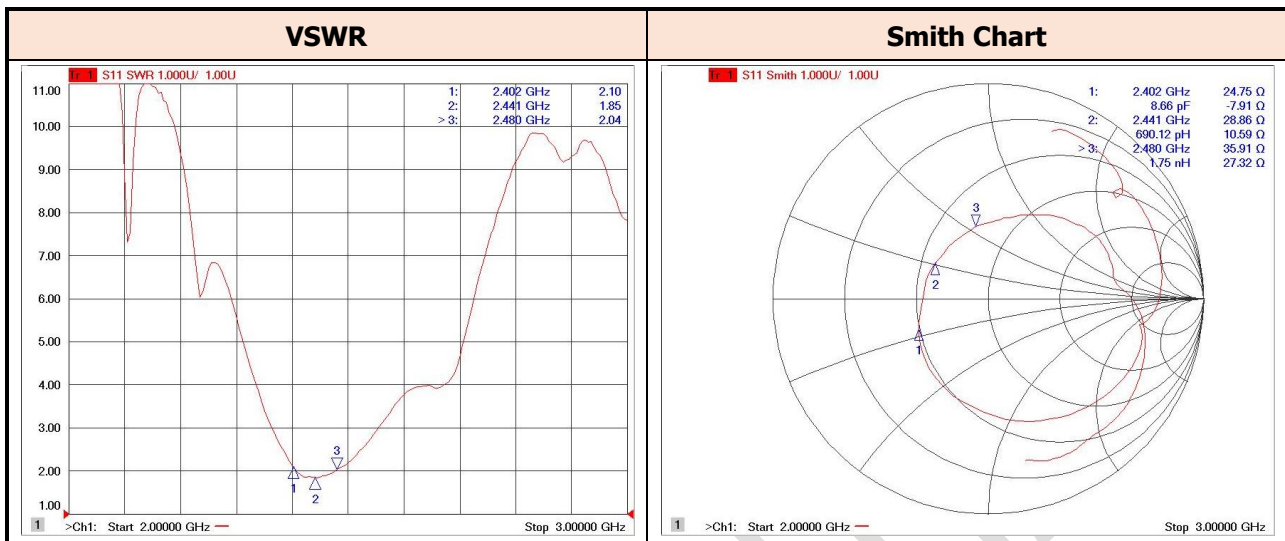
2 Antenna Information



[ccNC Basic Bluetooth Antenna]

3 Antenna Electrical Characteristics

3.1 VSWR



3.2 Antenna Peak Gain Table

Band (GHz)	Frequency (MHz)	Peak Gain (dBi)		
		Vertical	Horizontal	Total
2.400 ~ 2.485	2400	1.49	-0.45	3.02
	2425	3.82	0.89	4.21
	2445	3.87	0.70	4.22
	2465	3.63	0.52	3.98
	2485	2.92	0.24	3.33

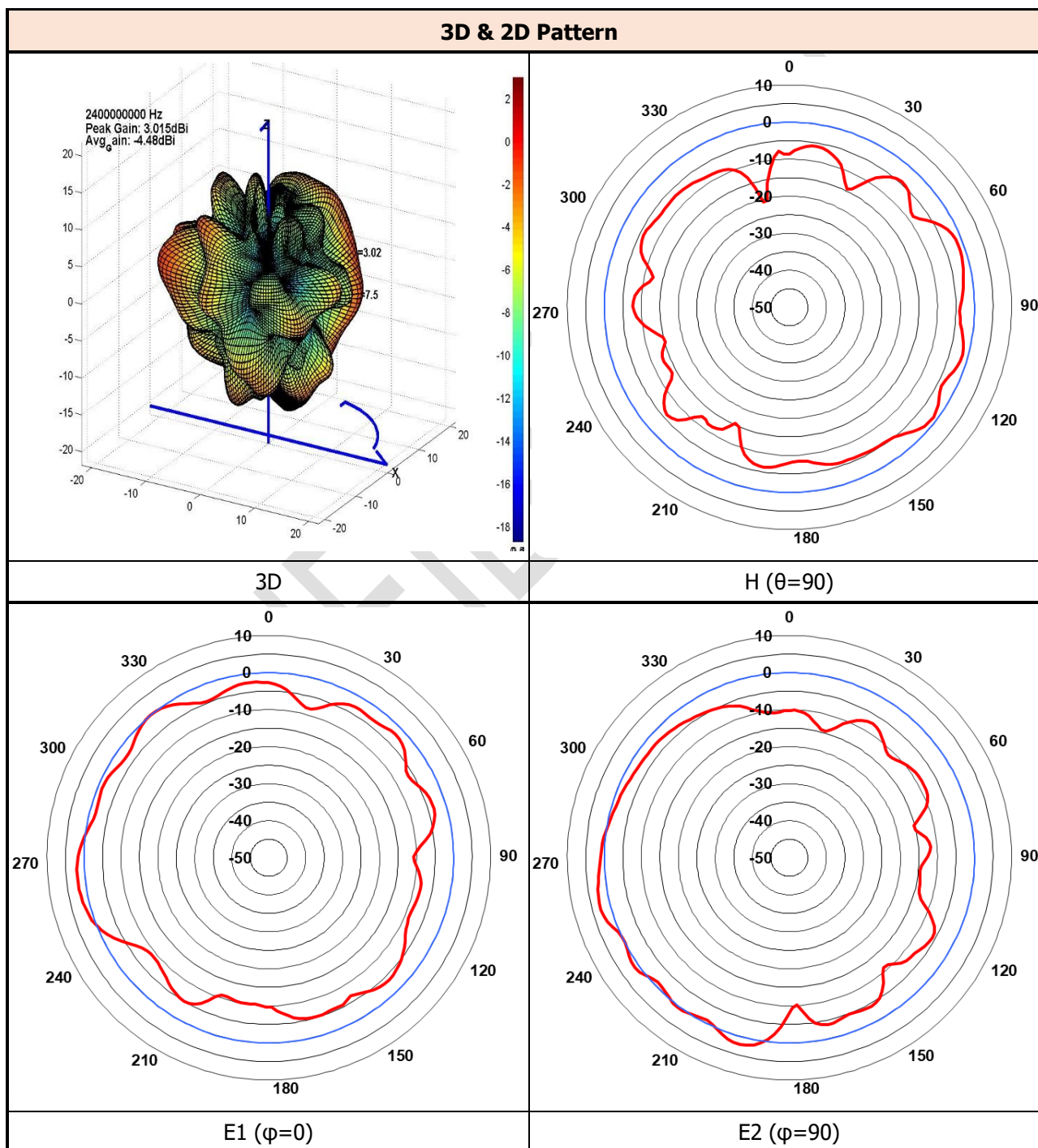
3.3 Antenna Passive Radiation test result

Freq. [MHz]	Eff. [%]	3D Gain				H (θ=90)			E1 (φ=0)			E2 (φ=90)		
		Avg.	Peak	θ	φ	Avg.	Peak	φ	Avg.	Peak	θ	Avg.	Peak	θ
		[dBi]	[dBi]	[Deg]	[Deg]	[dBi]	[dBi]	[Deg]	[dBi]	[dBi]	[Deg]	[dBi]	[dBi]	[Deg]
2,400	35.6	-4.49	3.02	105	270	-6.00	-1.10	128	-3.41	2.08	266	-3.01	2.86	258
2,425	43.7	-3.60	4.21	105	330	-4.27	1.12	130	-1.90	2.48	324	-2.32	3.24	256
2,445	42.0	-3.77	4.22	105	330	-4.07	1.00	130	-1.80	2.52	324	-2.31	2.84	256
2,465	39.5	-4.04	3.98	105	330	-4.25	0.52	108	-2.04	2.06	324	-2.46	2.48	254
2,485	34.8	-4.59	3.33	105	330	-4.64	0.13	110	-2.73	1.46	324	-3.13	1.79	254

4 Radiation Pattern

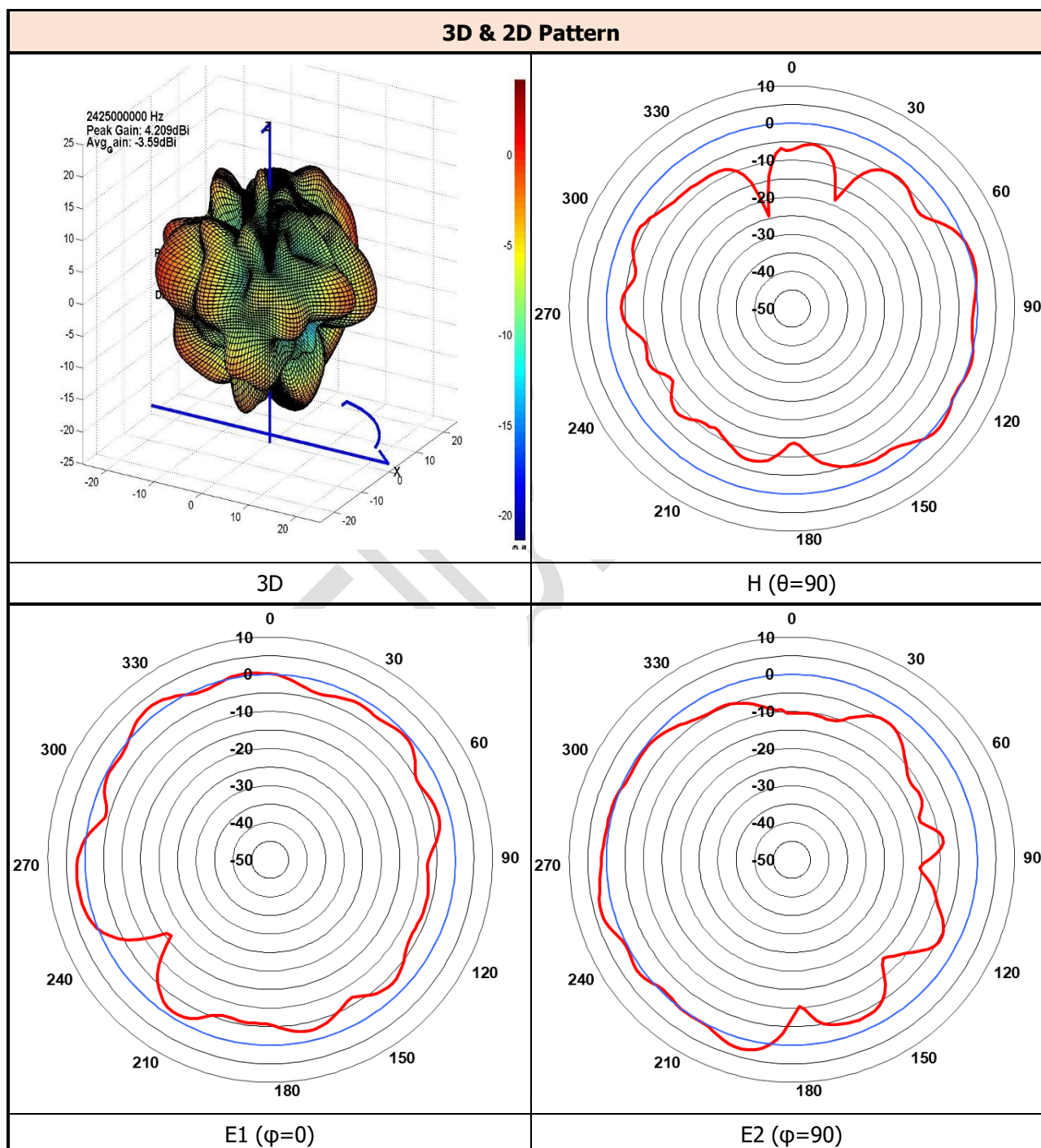
4.1 Pattern @ 2400 MHz

Frequency (MHz)	Peak Gain (dBi)		
	Vertical	Horizontal	Total
2400	1.49	-0.45	3.02



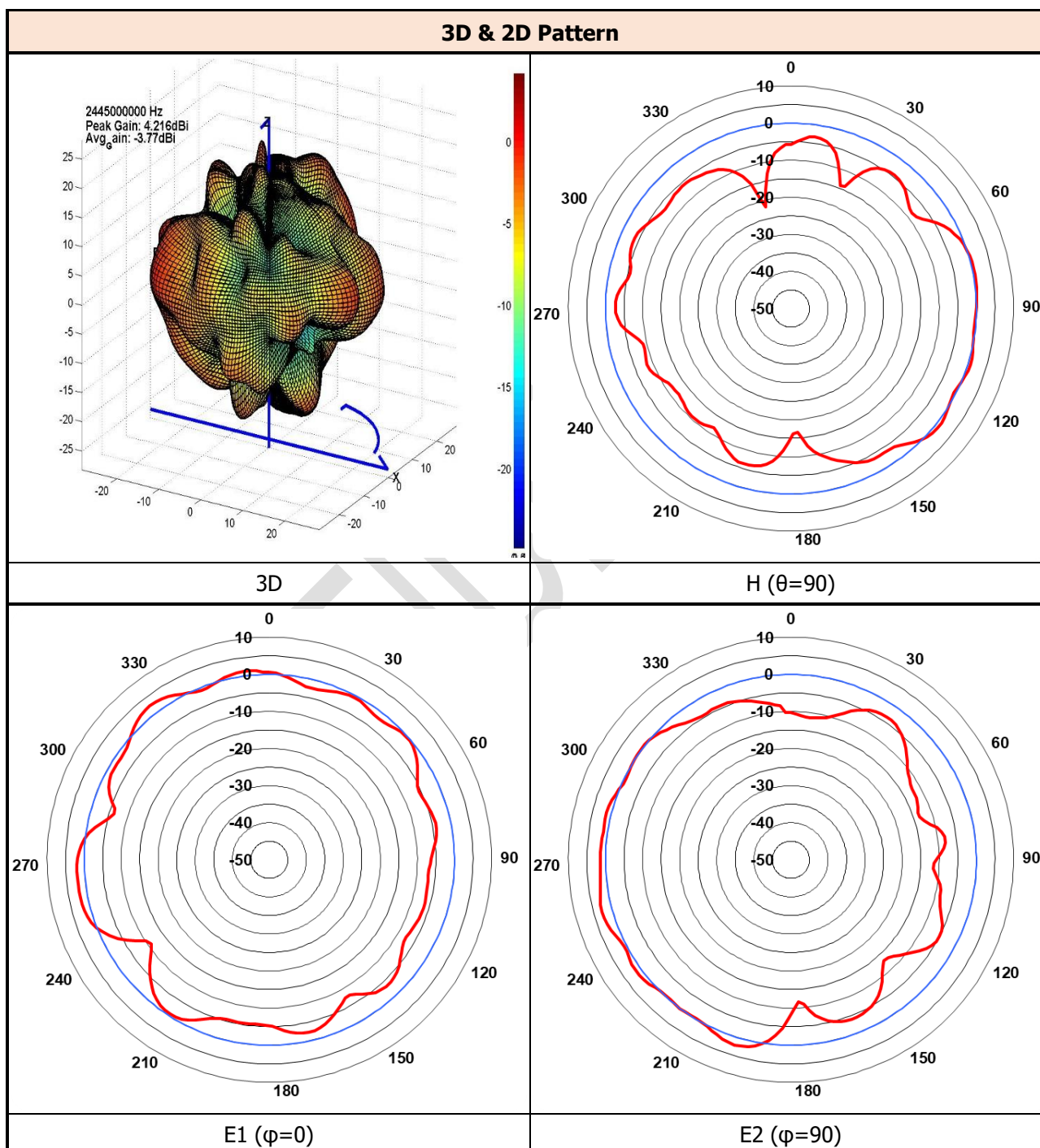
4.2 Pattern @ 2425 MHz

Frequency (MHz)	Peak Gain (dBi)		
	Vertical	Horizontal	Total
2425	3.82	0.89	4.21



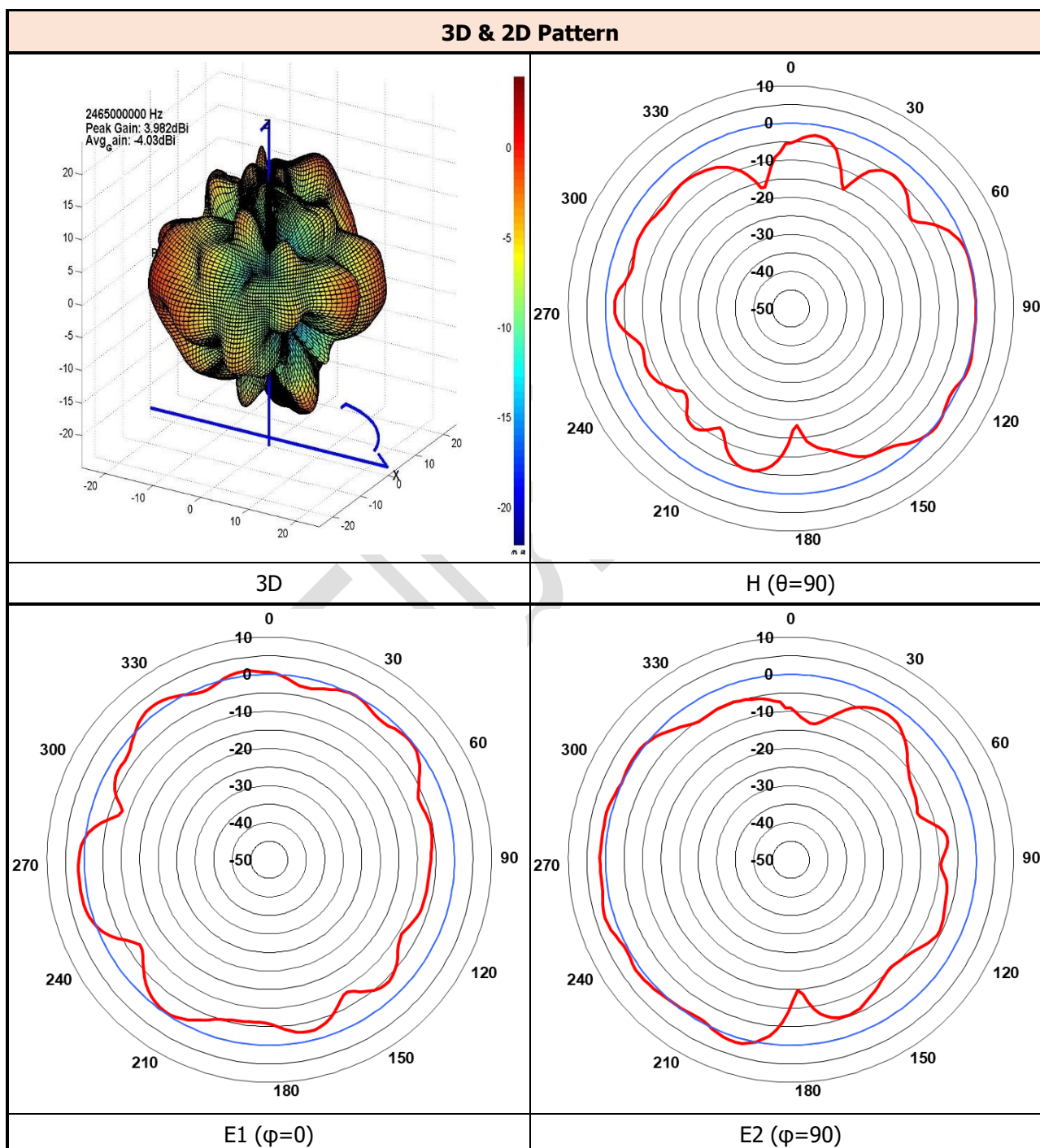
4.3 Pattern @ 2445 MHz

Frequency (MHz)	Peak Gain (dBi)		
	Vertical	Horizontal	Total
2445	3.87	0.70	4.22



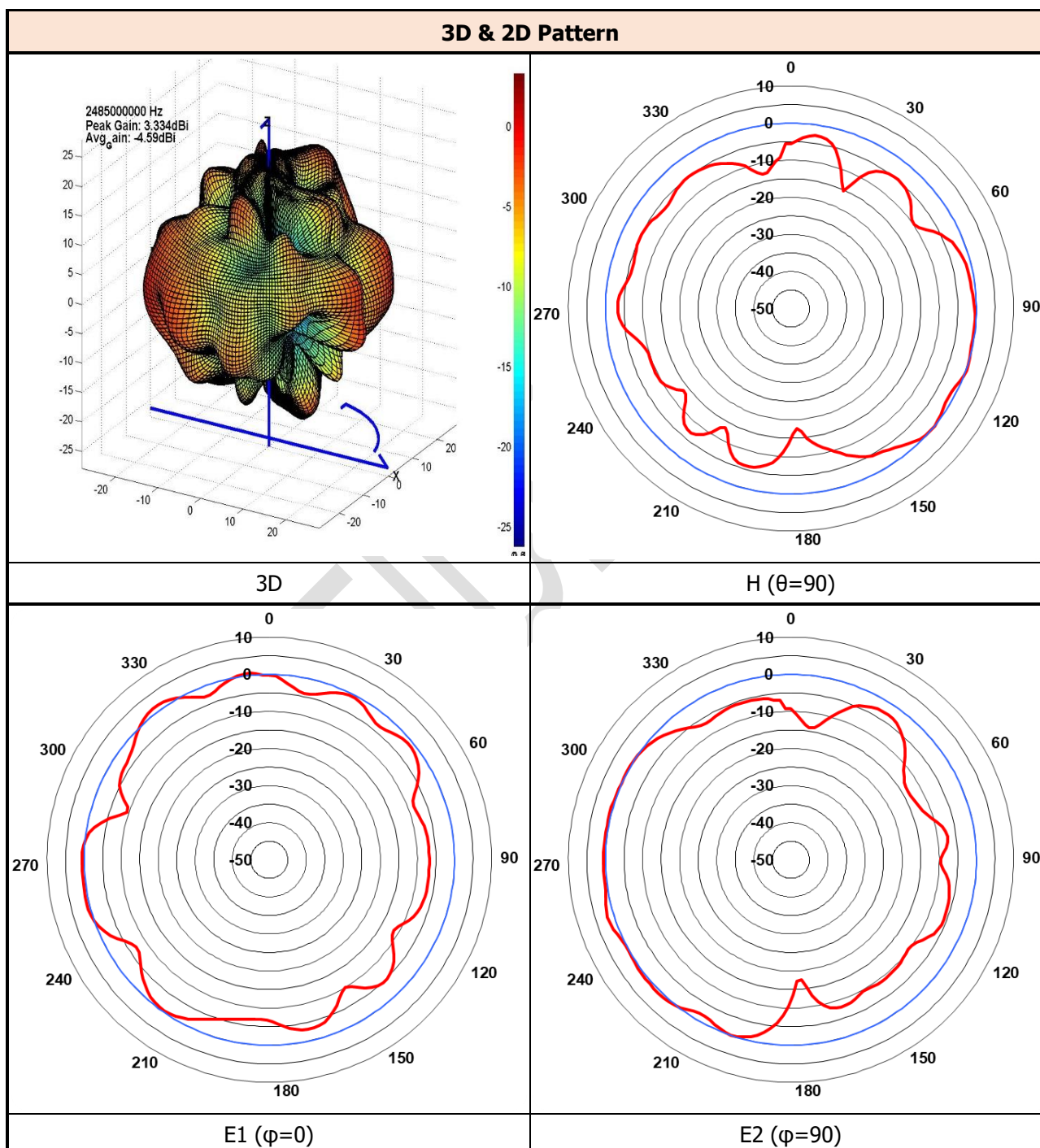
4.4 Pattern @ 2465 MHz

Frequency (MHz)	Peak Gain (dBi)		
	Vertical	Horizontal	Total
2465	3.63	0.52	3.98



4.5 Pattern @ 2485 MHz

Frequency (MHz)	Peak Gain (dBi)		
	Vertical	Horizontal	Total
2485	2.92	0.24	3.33



5 Revision History

Revision	Date	Descriptions
1.0	2024-11-26	Initial Release
1.1	2025-05-02	Added 1. Test Environment and method & 2. Antenna information

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