



APPROVAL SHEET


PM560			
NO	MODEL	FREQUENCY	
1	HWI-BT-PM560	Bluetooth	2402 ~ 2484 MHz

SUPPLIER			CUSTOMER		
Engineer	Review	Approved	Engineer	Review	Approved
					



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HISTORY SHEET

ITEM	F-PCB Type ANTENNA	Developed by	Hwan. Choi	
Part Name	HWI-BT-PM560	Director		
Rev. No.	Date	Description		Etc.
0	2022-12-16	Initial Version		
1	2023-01-26	Pattern Change		

ANTENNA SPECIFICATION

1. MODEL: HWI-BT-PM560

2. APPLICATION:

This specification is provided for Bluetooth ANTENNA.

3 ANTENNA used condition

Portable Fixing Movement Out-door In-door Etc()

4. ANTENNA Drawing

#3. Attached : Drawing paper

5. Electrical specification and performance

Satisfied next data with real used or similar environment conditions.

No.	ELECTRICAL DATA	SPECIFICATIONS		REMARK
5. 1	FREQUENCY RANGE	Bluetooth	2402 ~ 2484 MHz	
5. 2	IMPEDANCE	50 Ω NOMINAL		
5. 3	V. S. W. R	Bluetooth	Less than 1.5 : 1	#1. Attached
5. 4	PEAK GAIN(Min)	Bluetooth	≥ 3.6dBi	#2. Attached
5. 5	RADIATION PATTERN	OMNI - DIRECTIONAL		
5. 6	POLARIZATION	LINEAR		

6. Hardware specification and mechanical

No.	MECHANICAL	SPECIFICATIONS		REMARK
6. 1	FCCL	Halogen Free CCL		
6. 2	INK	IR INK		Black
6. 3	Marking INK	INK (S-200W WITH HD-3)		White
6. 4	TAPE	TESA4982		
6. 5	Plating Thickness (Soft-ENIG)	Cu	8~12μm	
		Ni	1~3μm	
		Au	Min 0.03μm	
6. 6	PET	0.188 T		
6. 7	Dimension	18 X 15 X 0.43mm		

7. SINUSOIDAL VIBRATION

Vibration Frequencies : 5- 55 Hz (1 cycle)
Sweep Rate : 1 cycle/min
Maximum Amplitude : A - 1 mm
Maximum Acceleration : 2 g

Measuring method

Antenna is combined in the test equipment.

The vibration is done X and Y direction (left, right, up and down) according to below image.

It continued for 2 hours each direction.

8. OPERATING TEMPERATURE

Temperature : - 30℃ / +60℃

Demands : Set Antenna and Cable for 72 hours each temperature.

No visual and mechanical changes.

The fitting and mold will be unchanged mechanically during the test.

The antenna shall satisfy the electrical data

9. HUMIDITY

Condition : 90% ~ 95% / +60℃

Measuring method

Antenna is placed in climatic chamber for 72 hours.

Antenna is taken out from the chamber and measured after another 24 hours in room temperature

Demands : No visual and mechanical changes.

The fitting and mold will be unchanged mechanically during the test.

The antenna shall satisfy the electrical data.

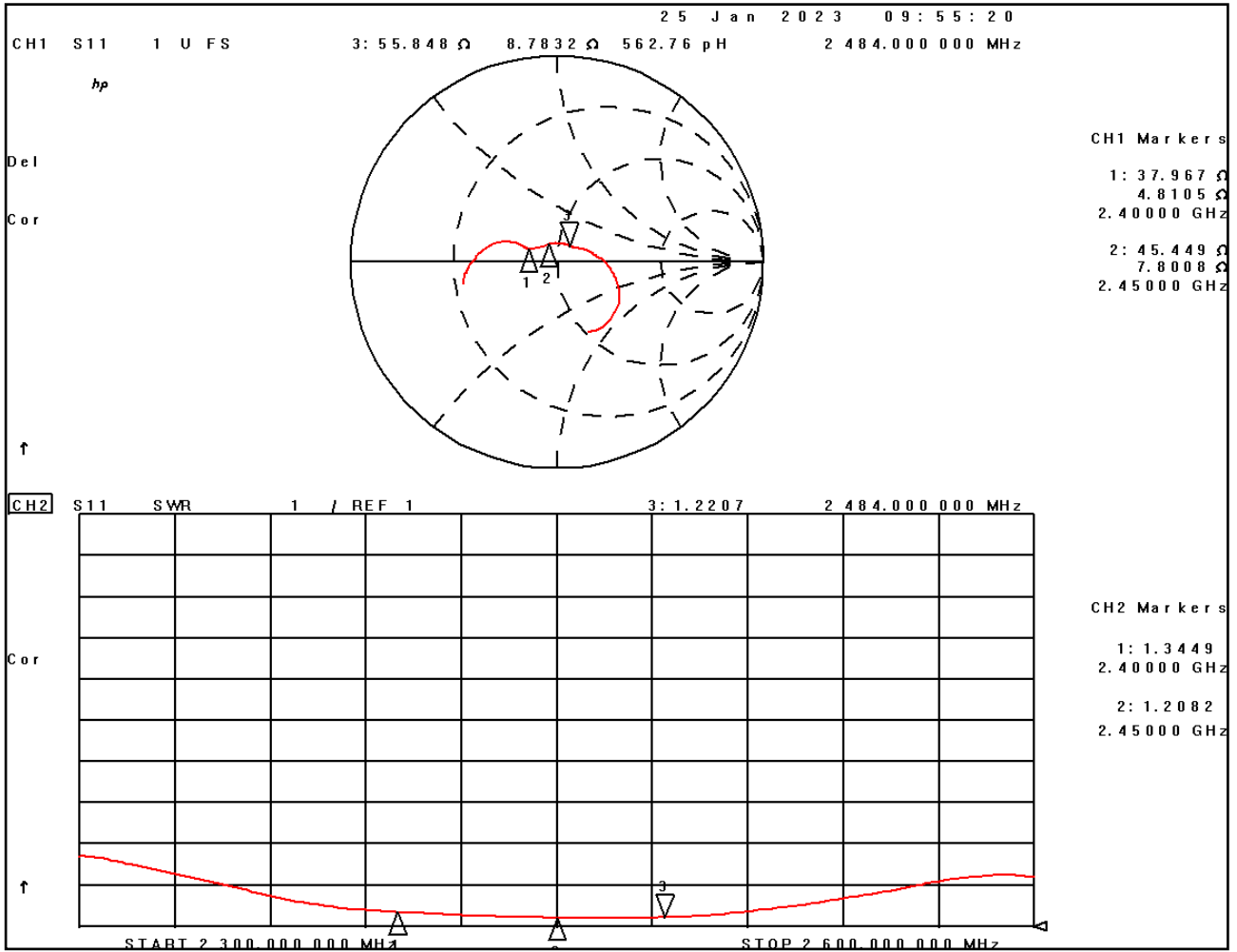
10. TEST and Q/C

This specification is according to fixed demands and suitable Hanwool technology Q/C provision.

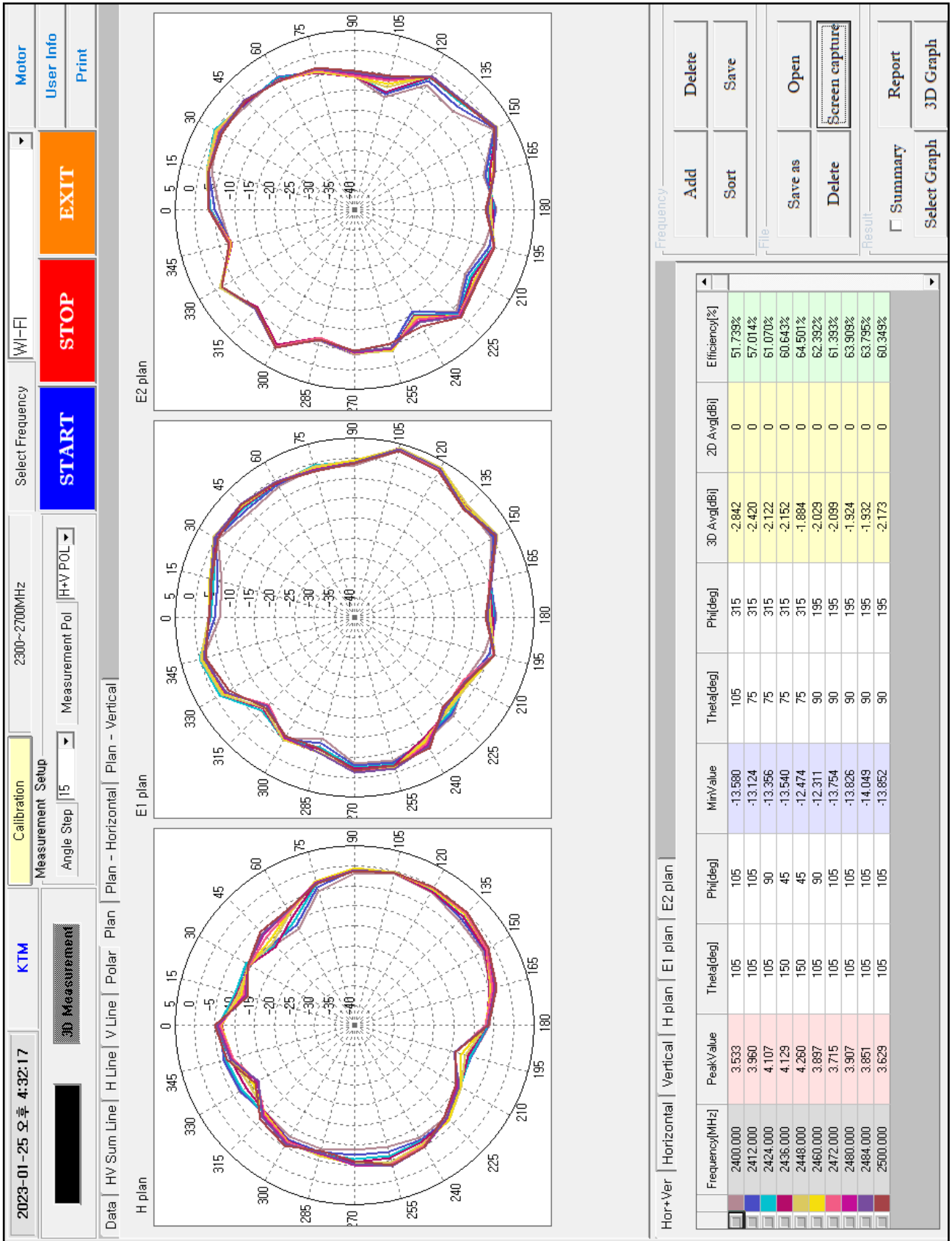
But it is possible to skip No. 7~9 demands, after consultation with buyer.

DQ No.	HW-230126-20	Modify No.		Write	Hwan. Choi
Supply to	POINT MOBILE CO., LTD	Date	2023-01-26	Approval	Chang-gi. Nam

- #1. Attached : VSWR



- #2. Attached : RADIATION PATTERN(GAIN)_Bluetooth

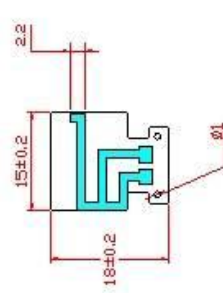


- #3. Attached : Drawing paper

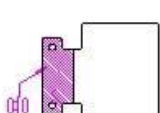
No	△	Revision Note	Checked	Date
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Pattern :

TOP



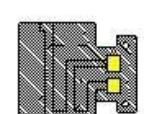
BOTTOM



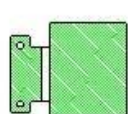
보강패드 적용

INK : Black INK

TOP

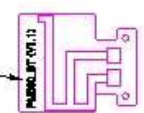


BOTTOM



Silk print : White Color

TOP



PM560_BT (V1.1)

1. 표시는 패틴 Area임.
2. 표시는 금도금 Area임.

SOFT ENIG NI : 1~3 μm

3. 표시는 무광 INK 영역임.
4. 표시는 TESA4982 영역임.
5. 1/2 OZ, 1/2 MIL 적용.
6. 보강판 0.2T 적용.

1	1		q'ty	Finish
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No		Material Description	Model	PM560
Scale	Unit	Part Name	FPCB	
1/1	mm	TITLE	Checked by	H,CHOI
Drawn by	Angle	_J.O.LIM	Approved by	포인토바일
N/A	N/A	230126-51	Hanwool Technology	