

Metal Surface Mount WIFI 6E Antenna

SWA425A- 2400-2500 / 5150-7125MHz



Features & Applications:

- WIFI 6E bands
- WiFi antenna is designed for use on metal surface
- I-PEX MHF 4L connector with 95mm cable
- Cable and connector can be customized
- Soft sponge as the antenna carrier
- IoT, M2M, Automation, Security

ELECTRICAL SPECIFICATIONS @ 25°C

General Specifications

Antenna type	Nominal Impedance	Polarization	Radiation pattern
PIFA	50Ω	Linear	Omni

Frequency (MHz)	2.4~2.5GHz, 5.150~7.125 GHz
Return Loss	<-5dB
Efficiency (%) (pasted on non-metal)	2.4 – 2.5GHz band: 50% 5.150 – 7.125GHz band: 50%
Efficiency (%) (pasted on metal)	2.4 – 2.5GHz band: 60% 5.150 – 7.125GHz band: 50%
Gain (dBi) (pasted on non-metal)	0.5 ± 0.5dBi @ 2.4~2.5GHz 4 ± 1dBi @ 5.150~6GHz 2 ± 1dBi @ 6~7.125GHz
Gain (dBi) (pasted on metal)	3 ± 1dBi @ 2.4~2.5GHz 4.5 ± 1dBi @ 5.150~6GHz 3 ± 1dBi @ 6~7.125GHz

MECHANICAL SPECIFICATIONS

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Dimension (Radiator) (Length x Width x Height)	Color	Cable OD	Connector Type	Cable length
29mm x 26.8mm x 3.65mm	Black	1.13mm	IPEX MHF 4L	95mm

ENVIRONMENTAL SPECIFICATIONS

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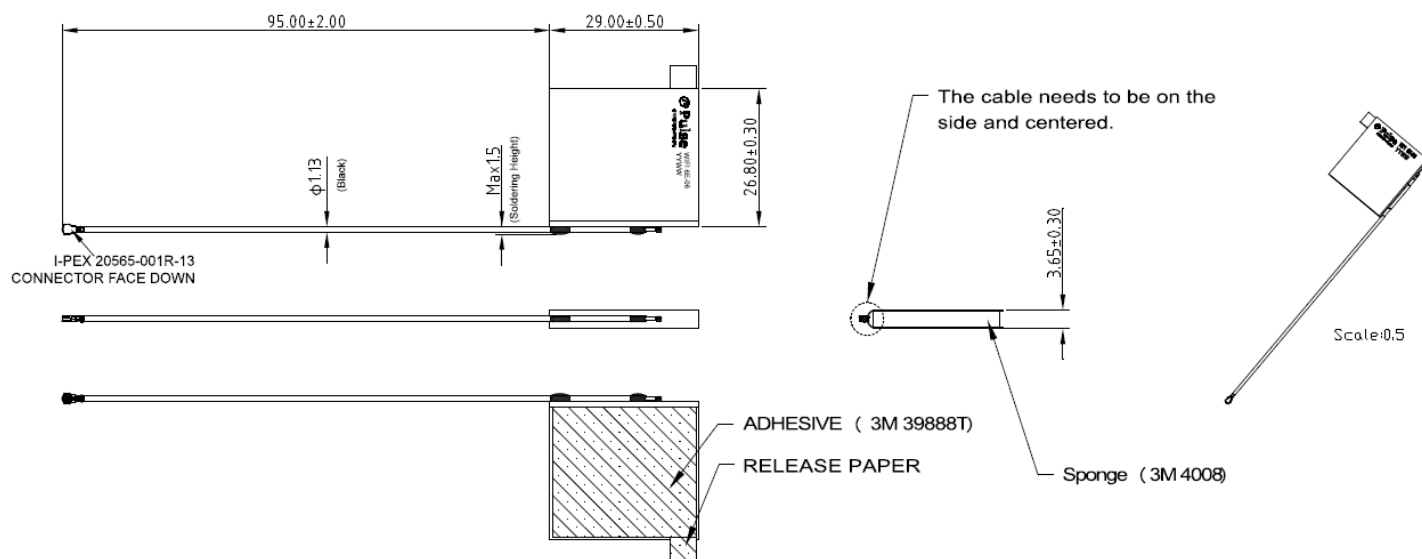
Storage Temperature	Operating Temperature	Ingress Protection	RoHS Compliant
-40/+85° C	-40/+85° C	N/A	Yes

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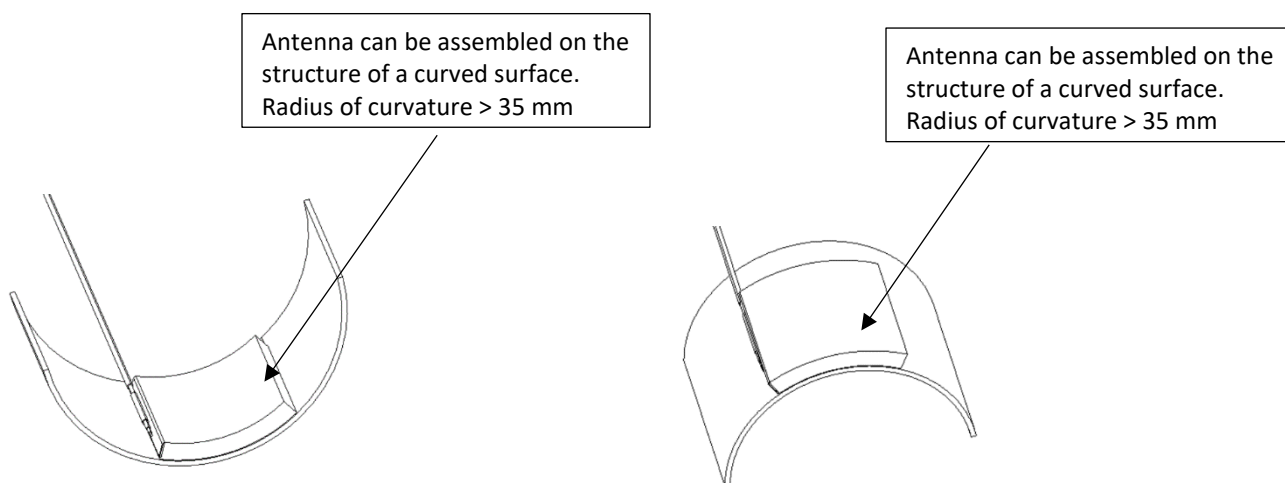
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Mechanical Drawing

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Units: mm

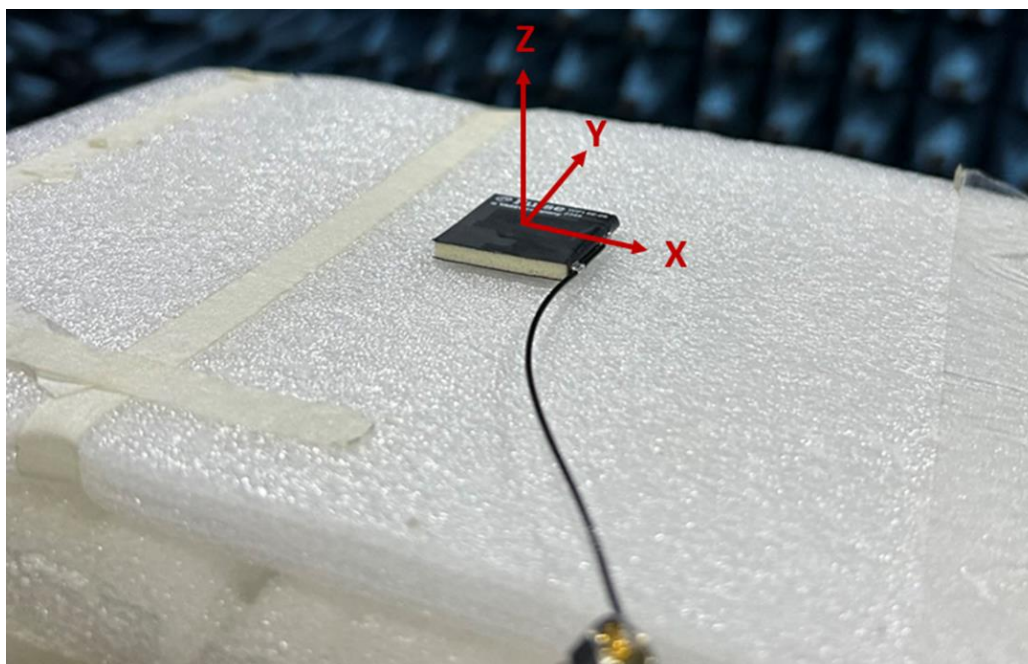


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Test setup (pasted on non-metal)

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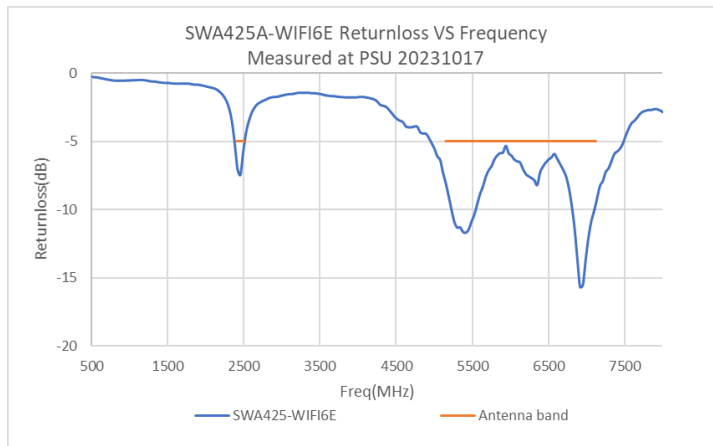


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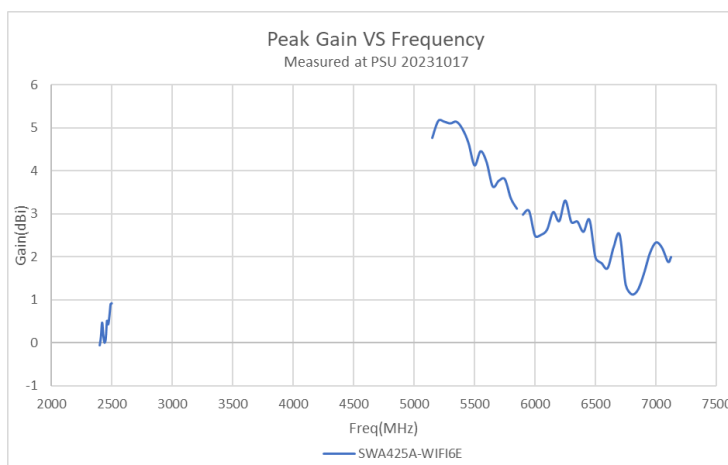
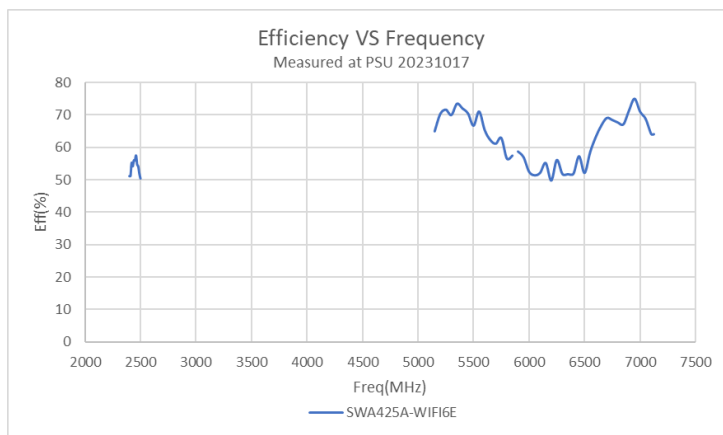
Charts- Antenna Return loss (pasted on non-metal)

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Charts – Efficiency & Peak Gain (pasted on non-metal)

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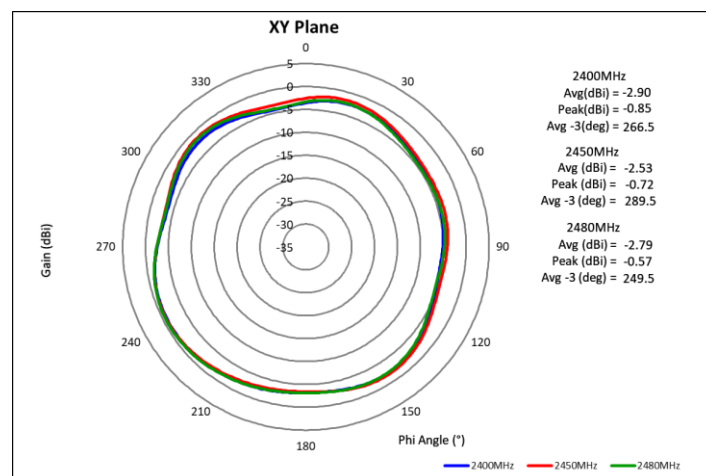
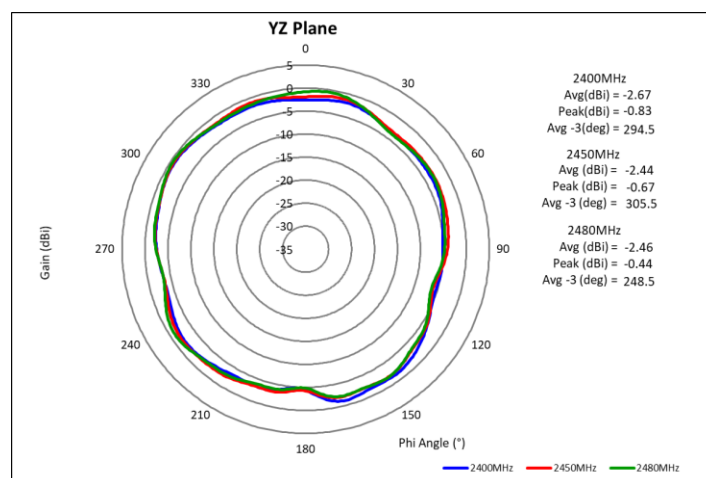
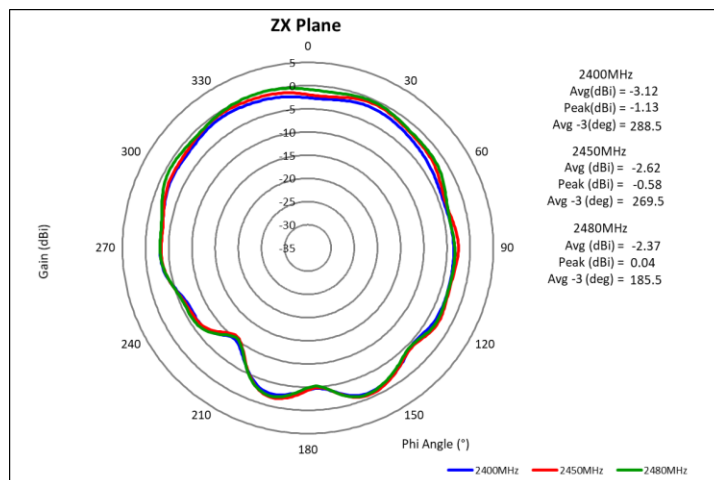
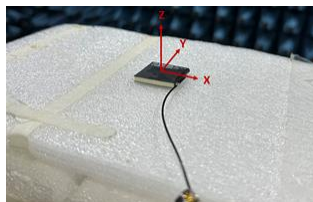
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Charts – Antenna Radiation Gain Pattern (pasted on non-metal)

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2400,2450,2480MHz



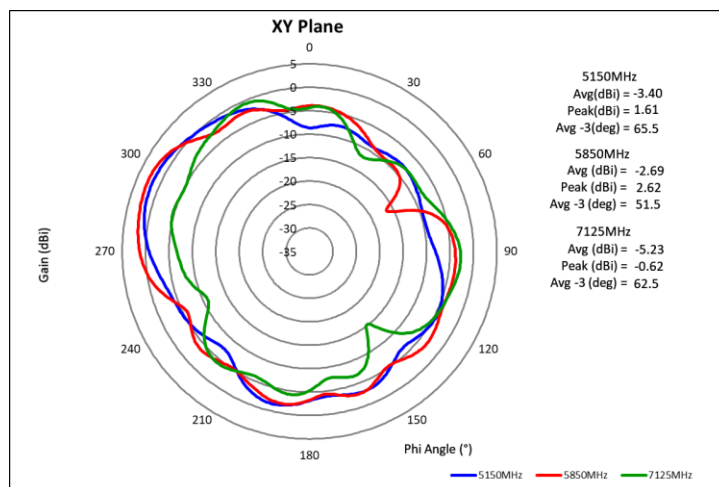
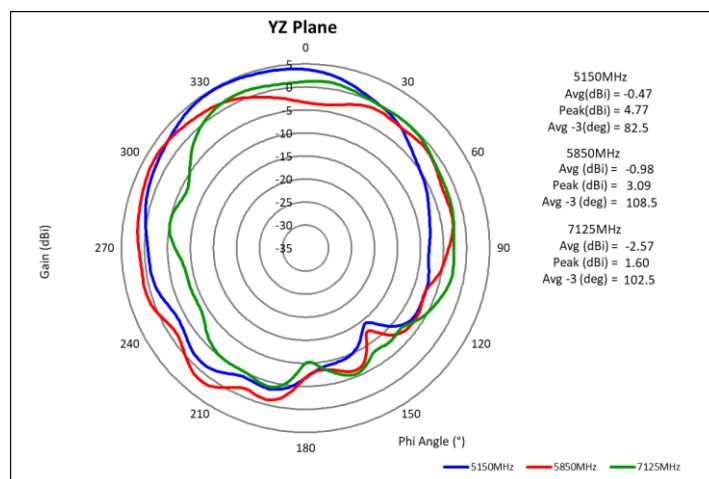
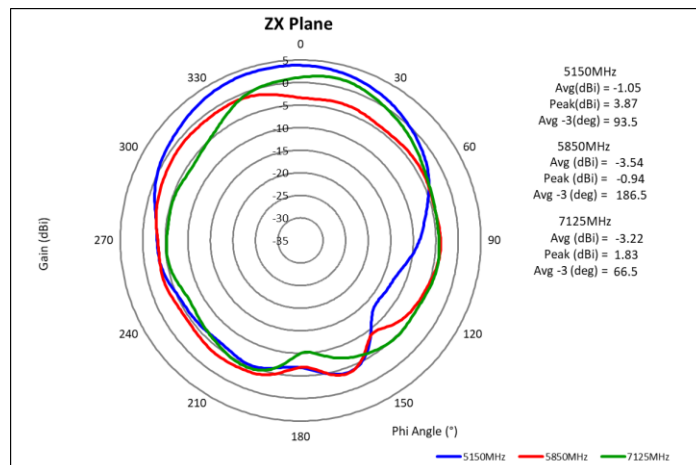
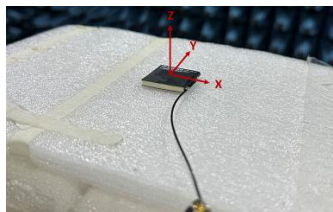
Metal Surface Mount WIFI 6E Antenna

SWA425A– 2400-2500 / 5150-7125MHz

Charts – Antenna Radiation Gain Pattern (pasted on non-metal)

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5150,5850,7125MHz

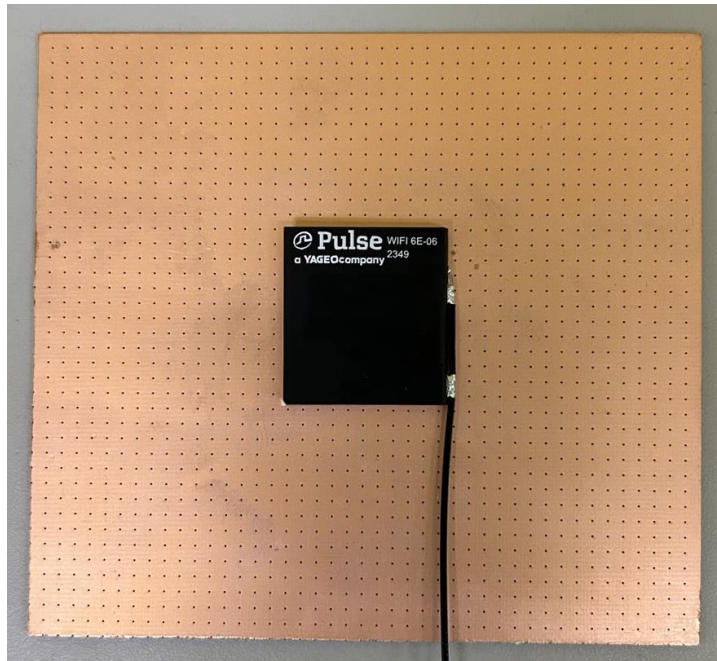


Metal Surface Mount WIFI 6E Antenna

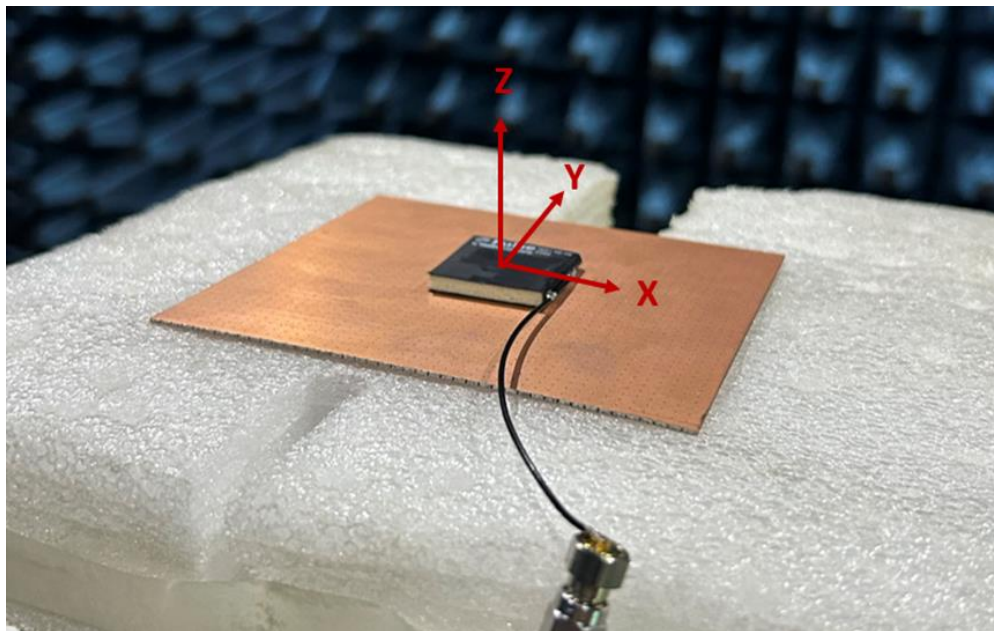
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Test setup (pasted on metal)

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Antenna assembled
centered on the ground
plane (110mm*100mm)

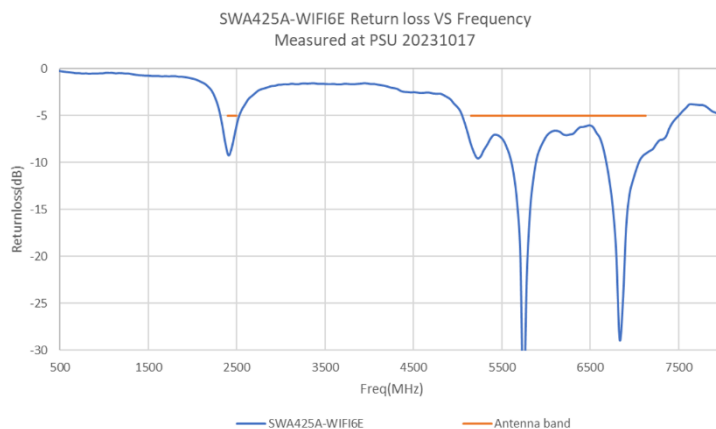


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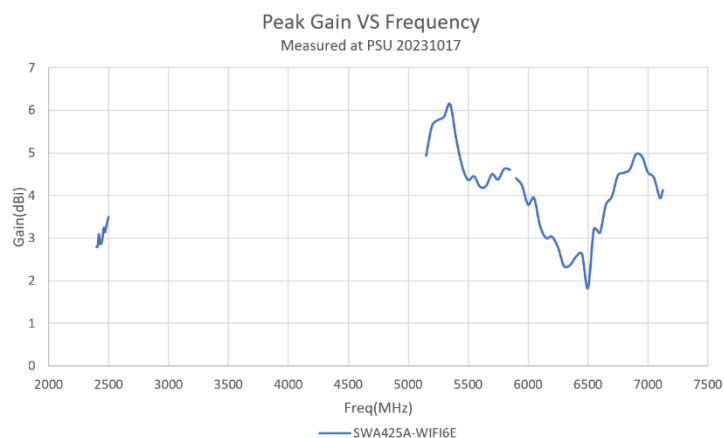
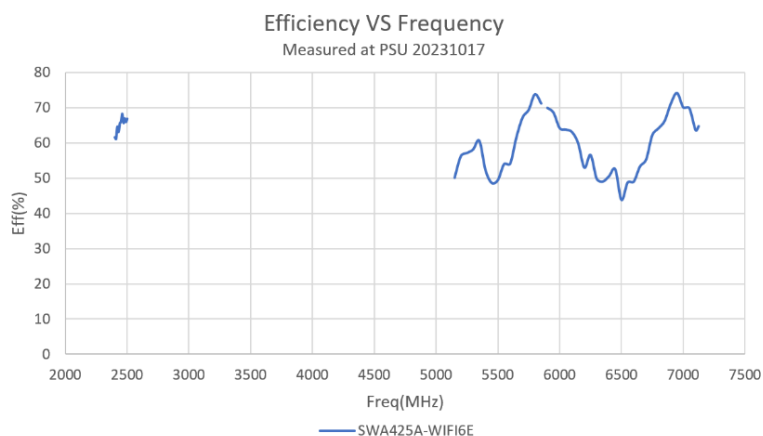
Charts- Antenna Return loss (pasted on metal)

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Charts – Efficiency & Peak Gain (pasted on metal)

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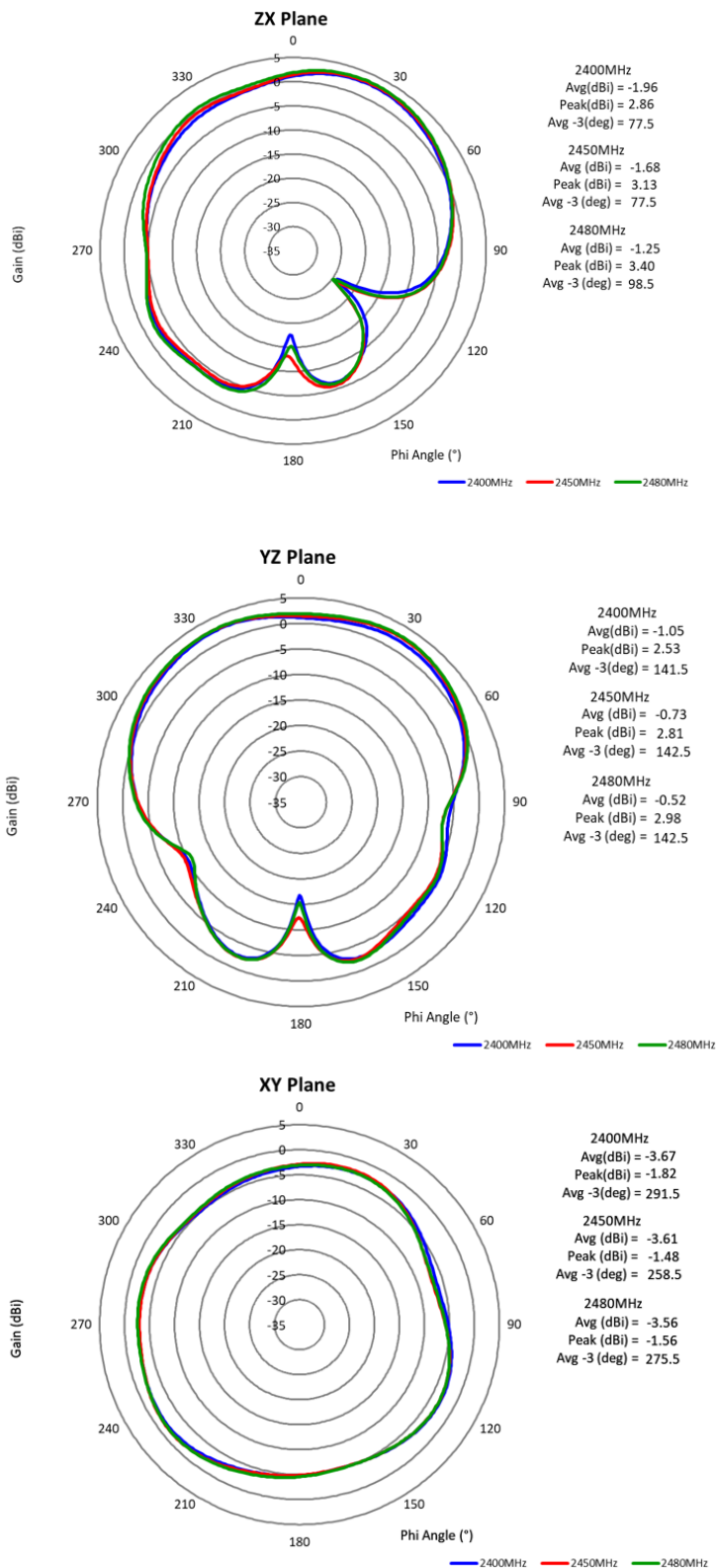
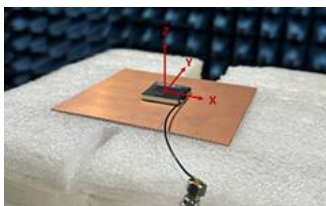
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Charts – Antenna Radiation Gain Pattern (pasted on metal)

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2400,2450,2480MHz



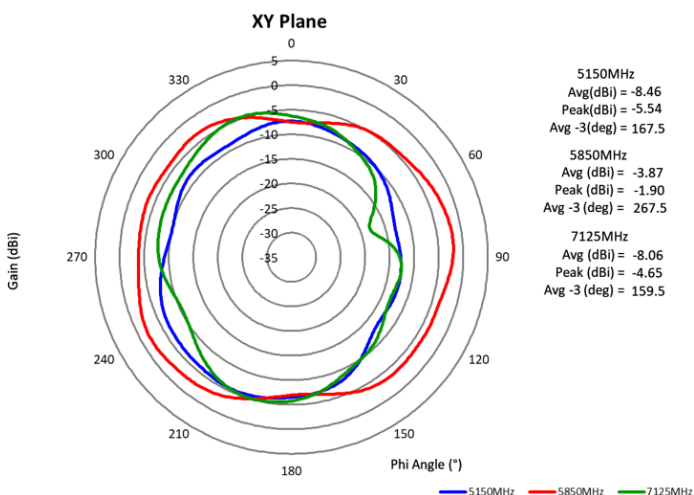
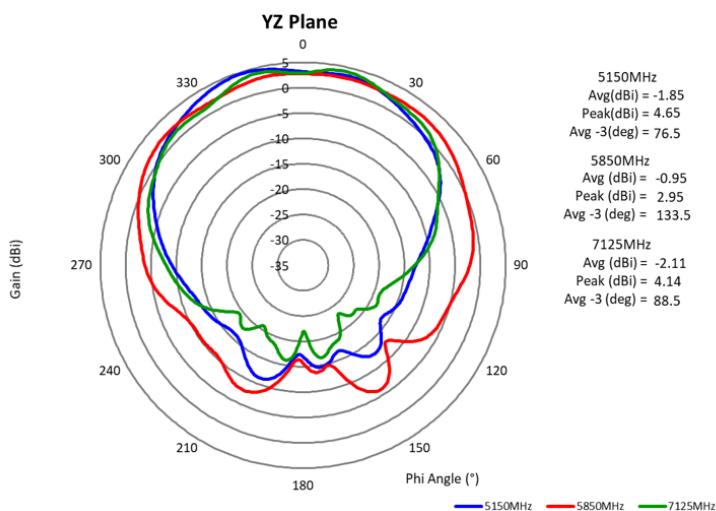
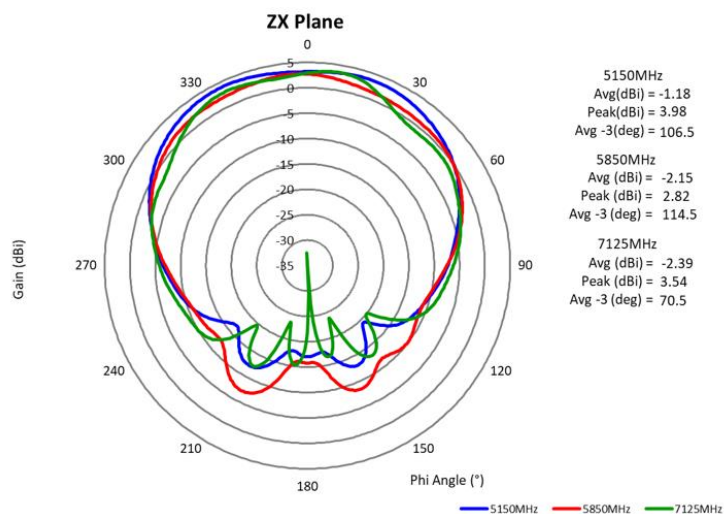
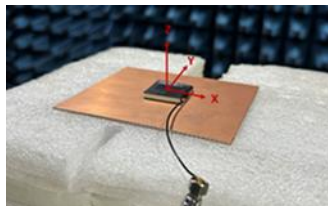
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PACKAGING

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1. 10 Pcs/PE bag
2. 5 PE bags in a group
3. 60 groups in a box
4. Total 3000 PCS/ box

Package box: 460mm*235mm*140mm.



For More Information:

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