

Description: Bluetooth, WiFi Antenna

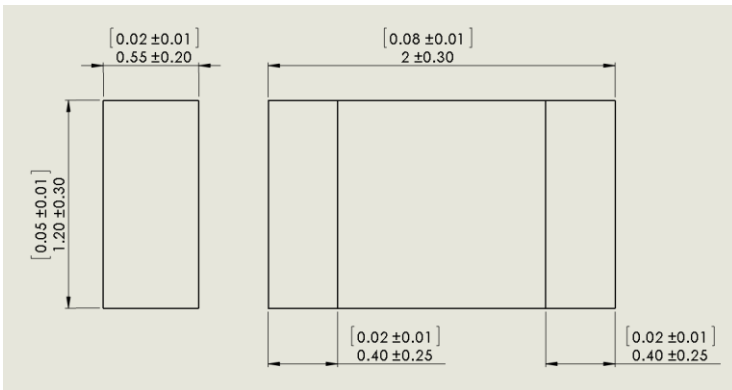
Series: The Blue Dot

PART NUMBER: W3092



Features:

- Chip Antenna
- Frequency:
2400MHz ~ 2483MHz
- Low profile
2.0mm(Length) x 1.2mm(Width)
x 0.55mm(Thickness)



Applications:

- WLAN
- 802.11b/g
- Bluetooth
- Zigbee, ISM 2.4GHz

All dimensions are in mm / inches

Issue: 1612

In the effort to improve our products, we reserve the right to make changes judged to be necessary.

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Suzhou New District
Jiangsu Province, Suzhou 215009 PR China
Tel: 86 512 6807 9998



Description: Bluetooth, WiFi Antenna**Series:** The Blue Dot**PART NUMBER:** W3092**ELECTRICAL SPECIFICATIONS**

Frequency	2400-2483	MHz
Nominal Impedance	50	Ω
VSWR	3	max
Gain (Typ.)	0.89	dBi
Efficiency(Typ.)	55	%
Polarization		Linear

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Description: Bluetooth, WiFi Antenna**Series:** The Blue Dot**PART NUMBER:** W3092**MECHANICAL SPECIFICATIONS**

Weight	0.005 g
Size	2.0x1.2x0.55 mm

ENVIRONMENTAL SPECIFICATIONS

Operating temperature	-40/+105 ° C
High temperature resistance	150 ° C, 1000 hours
Low temperature resistance	-40 ° C, 1000 hours
Humidity	85%R.H. 85±5 ° C, 1000 cycles
Soldering heat resistance	260 ° C 10s
Thermal shock	-40/+105 ° C
Storage condition	
At warehouse	0-30 ° C, <60%R.H.,shoule be used<1 year
On board	-40 ~85 ° C, <85%R.H

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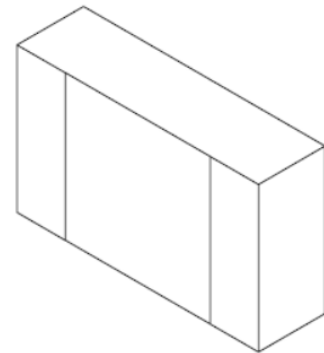
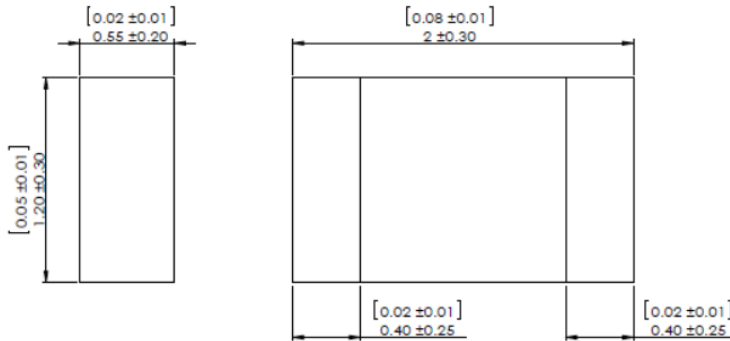
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PART NUMBER: W3092

MECHANICAL DRAWING

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- NOTES:
 1. RoHS COMPLIANT
 2. PART MUST BE CLEAN FROM ANY POLLUTION
 3. VISUAL QUALITY ACCORDING TO PULSE VISUAL STANDARD DOCUMENT PQ.5.030.000 CLASS III.

Please follow Pulse Limits of hazardous substances (RoHS, halogens) in the document "Pulse Hazardous Substances (HS) Limits" and "Vendor Survey Questionnaire, Material Composition (LOM-SAF-0040)".
 No recycling plastics allowed to use.

Functional Characteristic key:
 Process capability studies required, total 0 pcs.
 Process capability studies required and ongoing statistical process control required, total 0 pcs.

Mod	Explanation
01	FIRST RELEASE

 99 HUOJU RD, SUZHOU NEW DISTRICT SUZHOU 215009 P. R. CHINA WWW.PULSEING.COM/ANTENNAS	Sheet number General Tolerance Customer number	1/1 ISO-2768-F			
	Scale 50:1 (A3)	Drawn Chkd Apprd	WnZhu 20160318	Document number W3092	Part Version P01
Product(s) W3092 Item Name W3092 ASSEMBLY					01 18-Mar-16 WnZhu Mod Date Name

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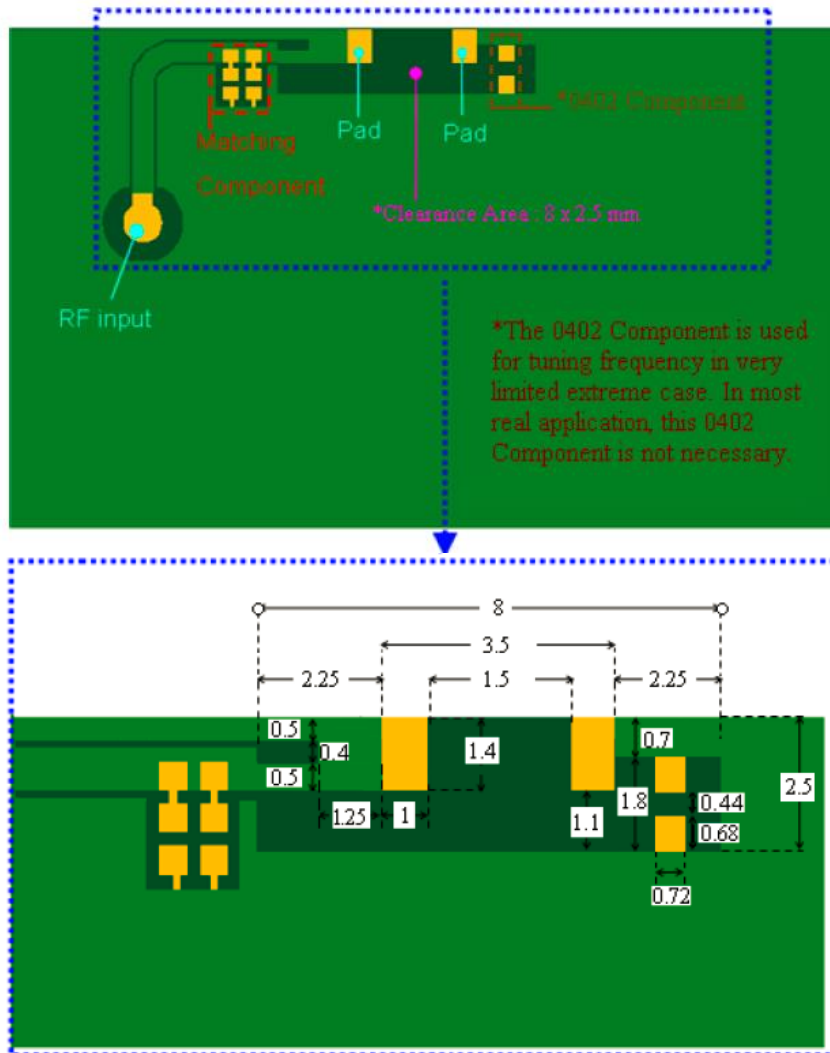
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OTHER SPECIFICATIONS

Recommended PCB layout(Unit:mm)



***Clearance 8mm × 2.5mm : All metallization should be removed from all PCB layers.**

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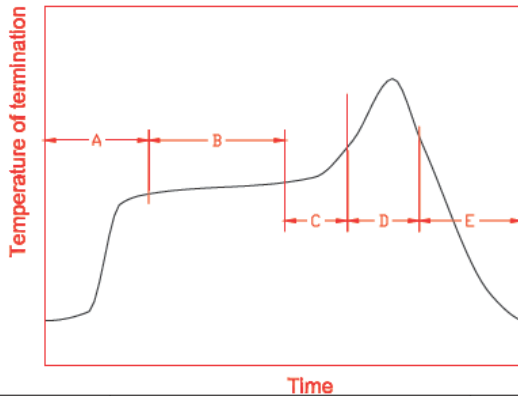
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OTHER SPECIFICATIONS

Recommended reflow soldering



		Time	
A	1 st rising temperature	The normal to Preheating temperature	30s to 60s
B	Preheating	140°C to 160°C	60s to 120s
C	2 nd rising temperature	Preheating to 200°C	20s to 40s
D	Main heating	if 220°C	50s~60s
		if 230°C	40s~50s
		if 240°C	30s~40s
		if 250°C	20s~40s
		if 260°C	20s~40s
E	Regular cooling	200°C to 100°C	1°C/s ~ 4°C/s

*reference: J-STD-020C

- (1) Soldering gun procedure**
 Note the follows, in case of using solder gun for replacement.
 (a) The tip temperature must be less than 350°C for the period within 3 seconds by using soldering gun under 30 W.
 (b) The soldering gun tip shall not touch this product directly.
- (2) Soldering volume**
 Note that excess of soldering volume will easily get crack the body of this product.

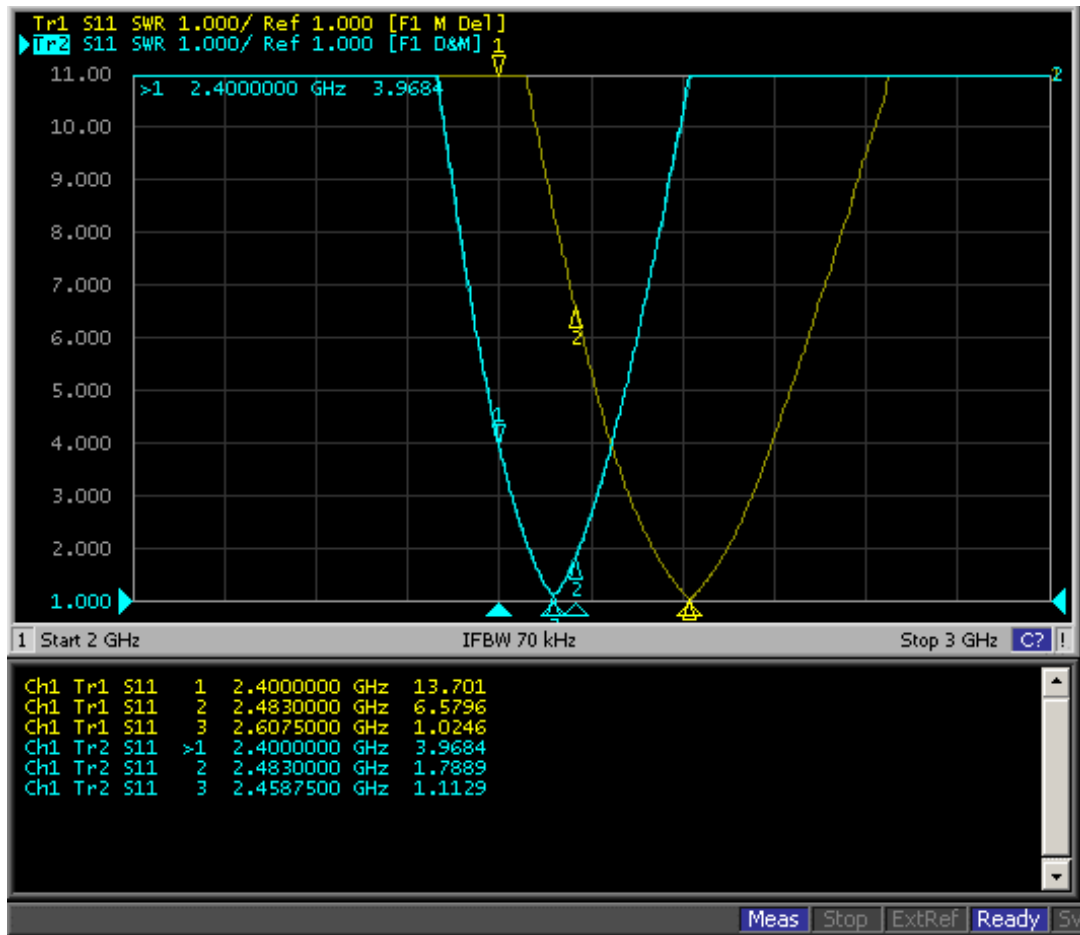
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CHARTS

VSWR



Yellow: 0ohm resistor only
 Blue: 0 ohm + 1.1pF capacitor

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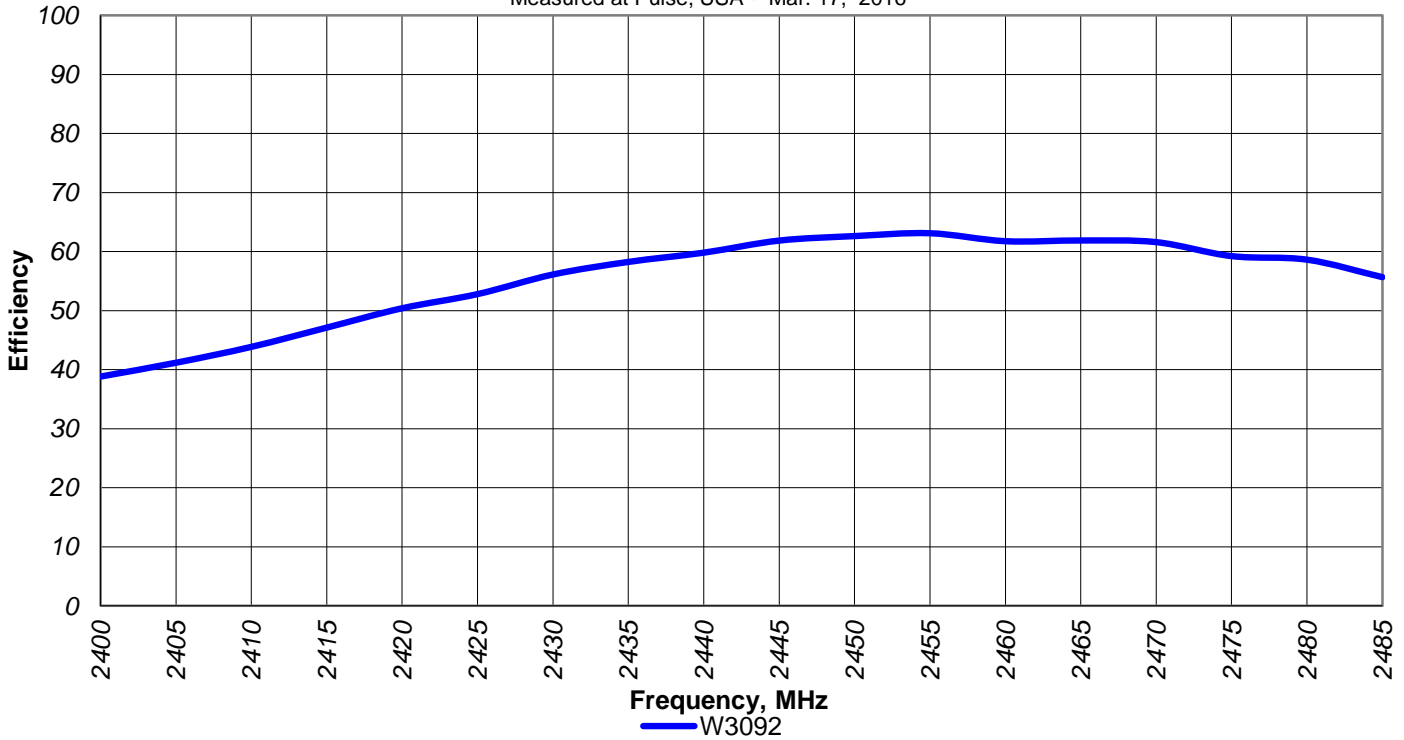
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CHARTS

Efficiency

Efficiency vs Frequency
W3092 EVT (WiFi) Free space
Measured at Pulse, USA - Mar. 17, 2016



with 1.1pF tuning capacitor

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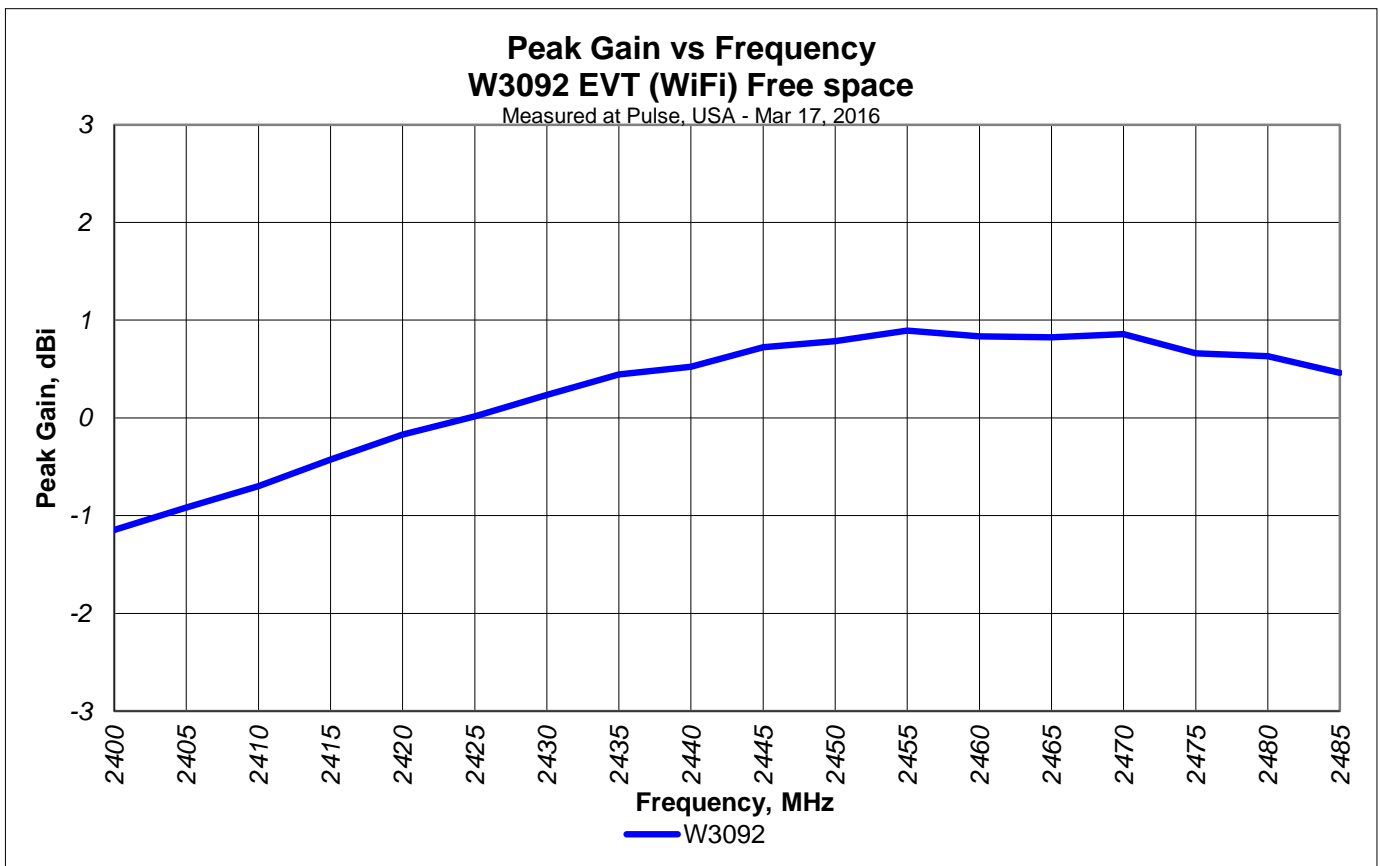
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CHARTS

Gain



with 1.1pF tuning capacitor

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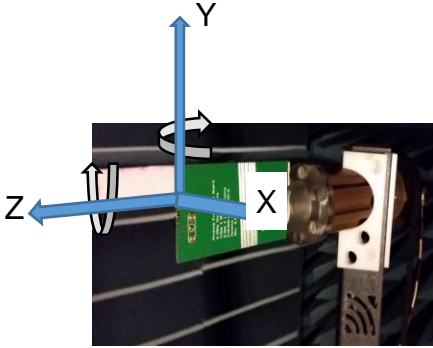


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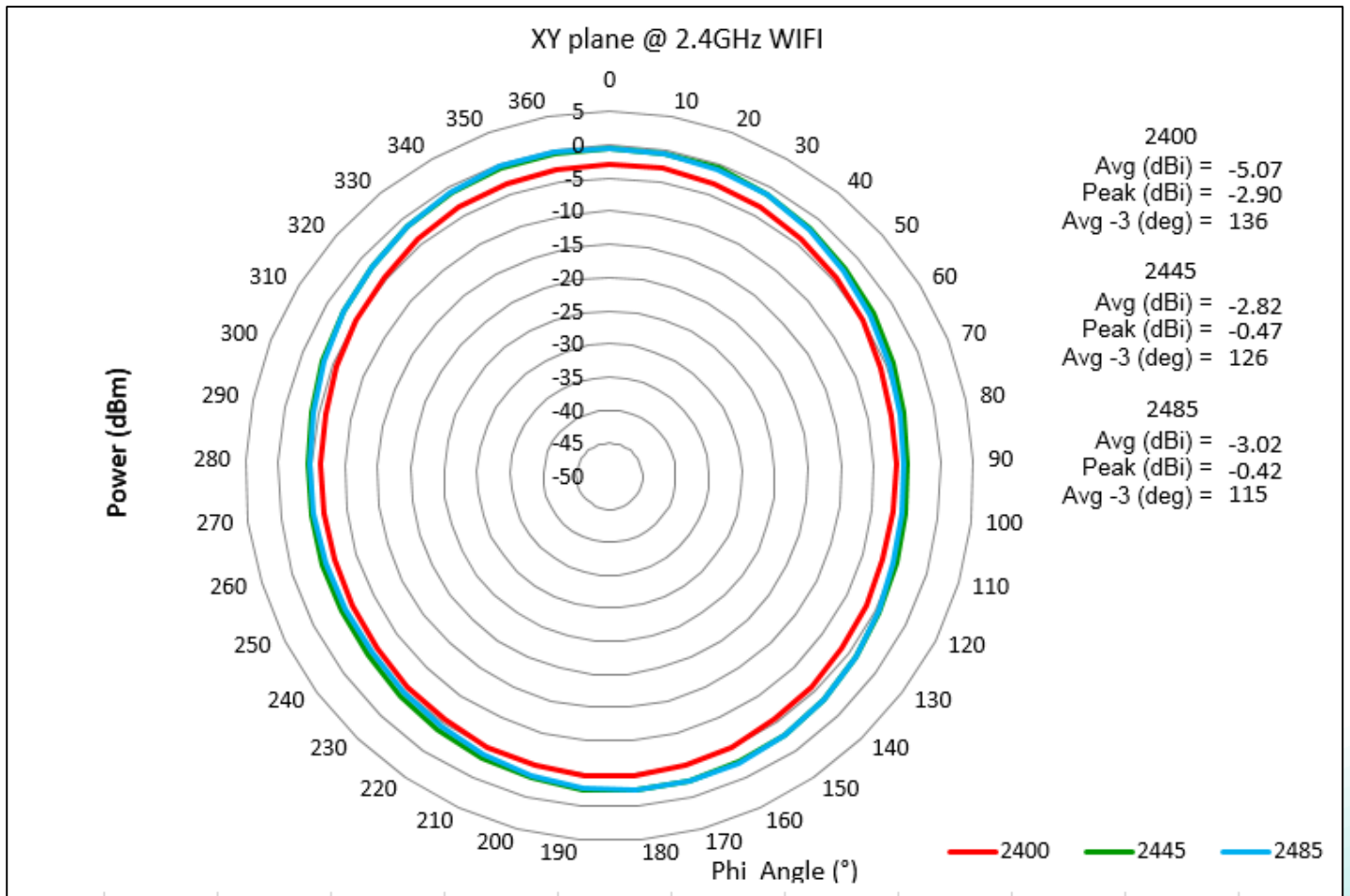
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CHARTS



Radiation pattern



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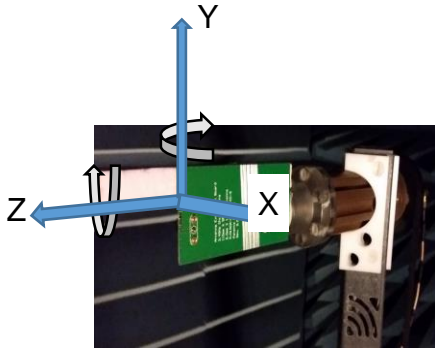
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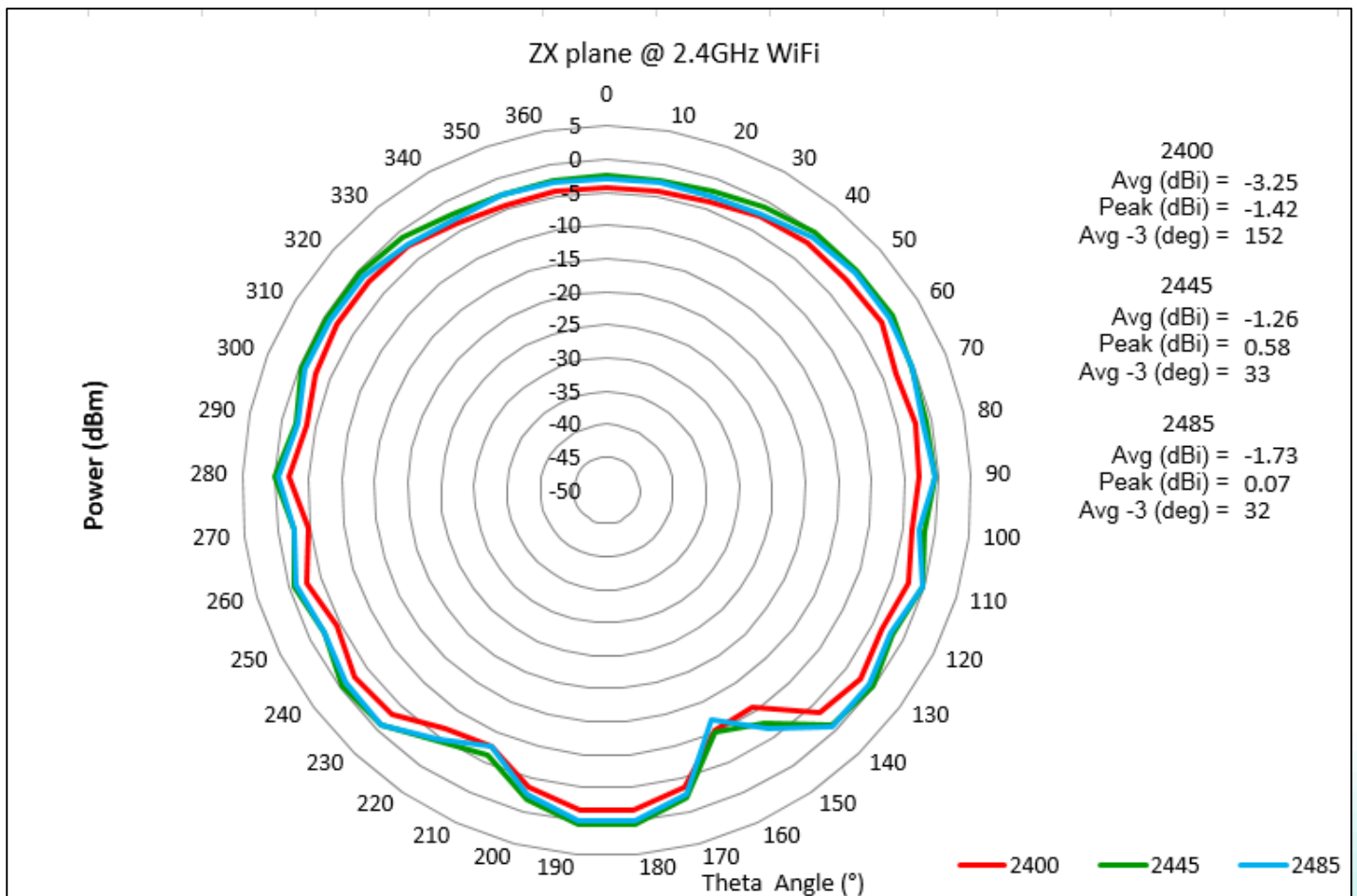
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Radiation pattern



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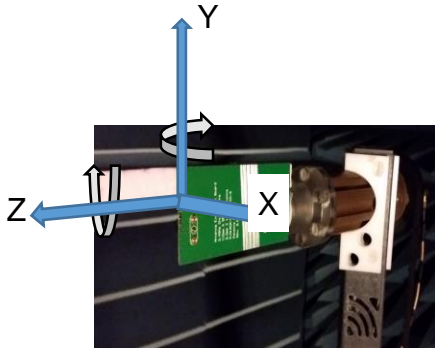
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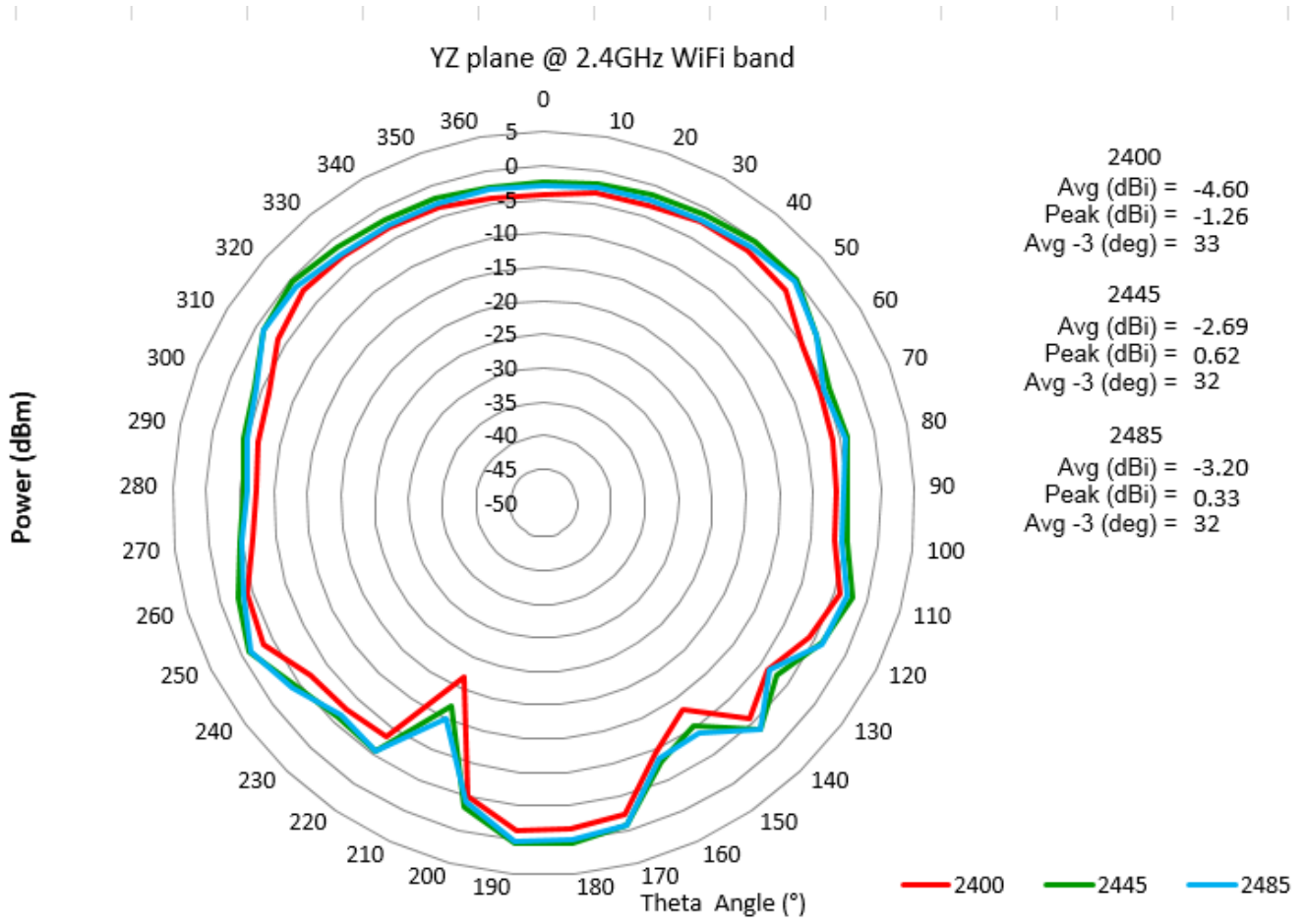
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CHARTS



Radiation pattern



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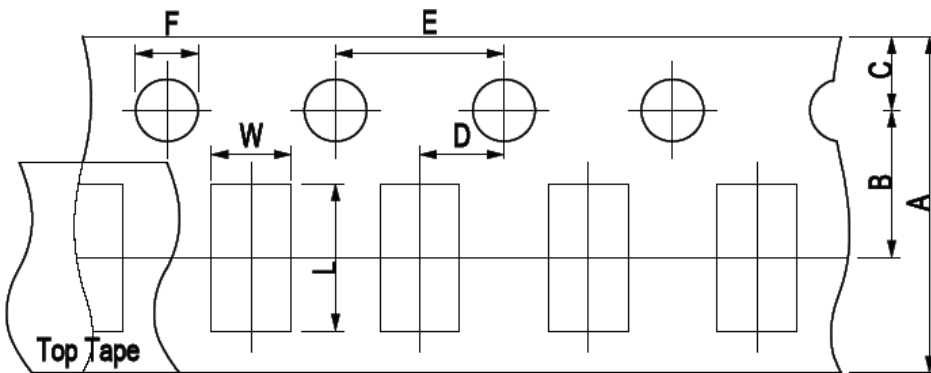
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PACKAGING

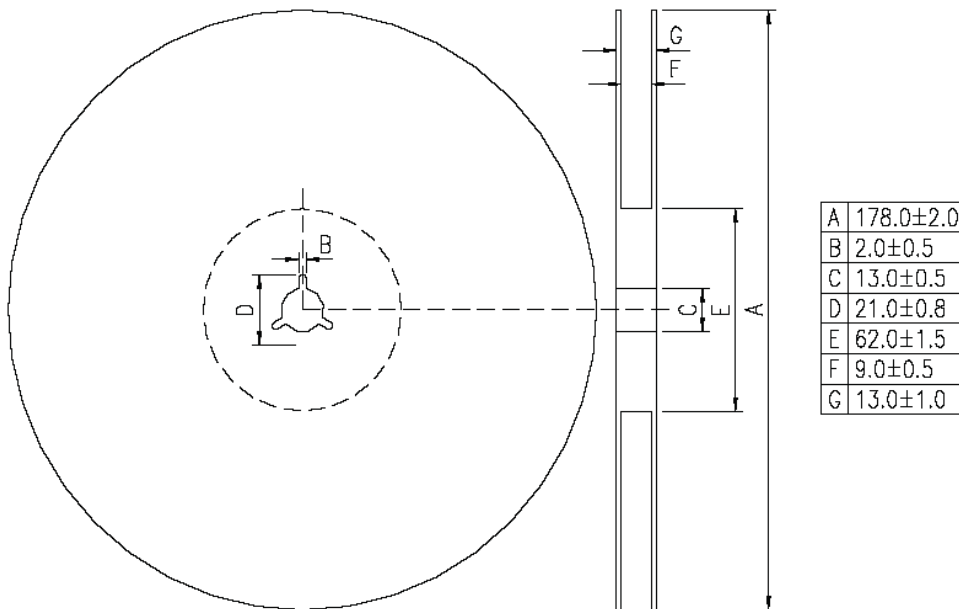
Taping Package and Label Marking: (unit: mm)

- (1) Quantity/Reel: 5000pcs/Reel
- (2) Carrier tape dimensions



Type	A	B	C	D	E	F	L	W
ACA2012	8.00±0.30	3.50±0.05	1.75±0.10	2.00±0.05	4.00±0.10	1.50±0.10	2.30±0.10	1.55±0.10

(3) Taping reel dimensions



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