

Series: Internal PCB

TECHNICAL DATA SHEET

Description: 2.4-2.5GHz PCB Antenna with

coax feed

PART NUMBER:W3525BXXX



Features:

- 2400-2500 MHz
- Size: 10.7 x 47.7 x 0.8 mm
- · Gain 1.5dBi
- Radiation pattern Omni
- Cable length, see page 2
- Connector U.FL compatible
- RoHS Compliant

Applications:

- 2.4GHz ISM band radios
- · WiFi, Bluetooth, BLE, ZigBee
- Devices requiring internal antenna
- Security, IoT, Monitoring, Industrial applications

All dimensions are in mm / inches

Issue: 2003

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

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This document covers all product variants of the following product family

Part Number	Cable Length	Adhesive Tape	Adhesive Tape Cable type		Frequency	Max Gain
W3525B039	3.9" / 100 mm	N.A.		I-PEX MHF or euivalent, Compatible with U.FL	2.4 GHz	2 dBi
W3525B052	5.2" / 132.1 mm	N.A.	d4 42 C C-bl-			
W3525B100	10" / 254 mm	N.A.	Ø1.13mm Coax Cable,			
W3525B039T	3.9" / 100 mm	3M 467 (T=0.05mm)	Gray color			
W3525B0150T	150 mm	3M 467 (T=0.05mm)				
W3525B0250	250 mm	N.A.				

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ELECTRICAL SPECIFICATIONS

Antenna Type	Dipole PCB+Cable		
Frequency	2400-2500MHz		
Nominal Impedance	50 Ω		
VSWR	2.5:1		
Radiation Pattern	Omni		
Gain	1.5dBi		
Efficiency	55%		
Polarization	Vertical		
Power Withstanding	1W		

MECHANICAL SPECIFICATIONS

Overall Length

Antenna Material

Connector type

Cable type

10.7x47.7x0.8mm

PCB

I-PEX or equivalent

MI-113 Gray

ENVIRONMENTAL SPECIFICATIONS

Operating Temperature -40° C~+85 $^{\circ}$ C Storage Temperature -40° C~+85 $^{\circ}$ C RoHS Compliant Yes

OTHER SPECIFICATIONS



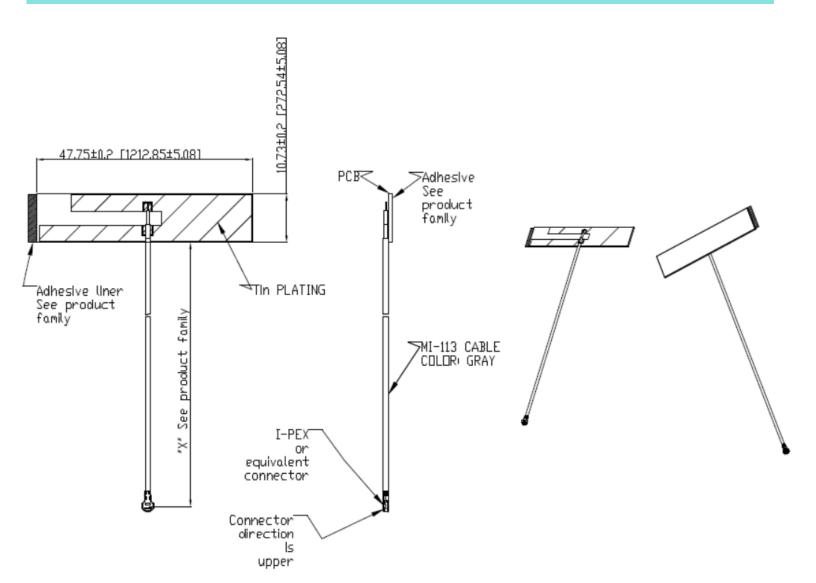
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MECHANICAL DRAWING



Part Number	Frequency(GHz)	Max Gain(dBi)	Impedance(ohm)	PWB Length(in/mm)	Cable Length(in/mm)	Adhesive Tape
W3525B039	2.4	2	50	1.87/47.7	3.9/100	N/A
W3525B052	2.4	2	50	1.87/47.7	5.2/132.1	N/A
W3525B100	2.4	2	50	1.87/47.7	10/254	N/A
W3525B039T	2.4	2	50	1.87/47.7	3.9/100	Required

Dimension unit: mm/inch

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ROHS



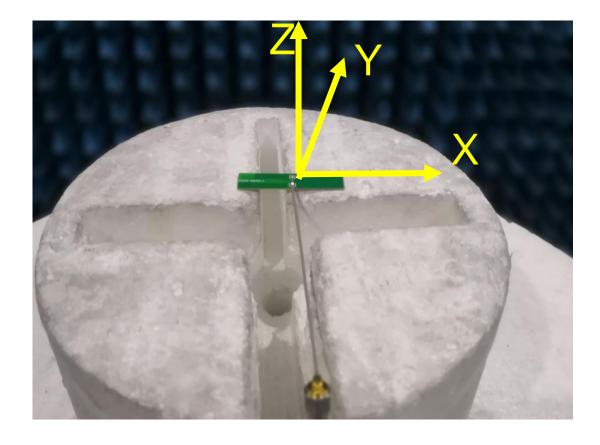
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TEST SETUP





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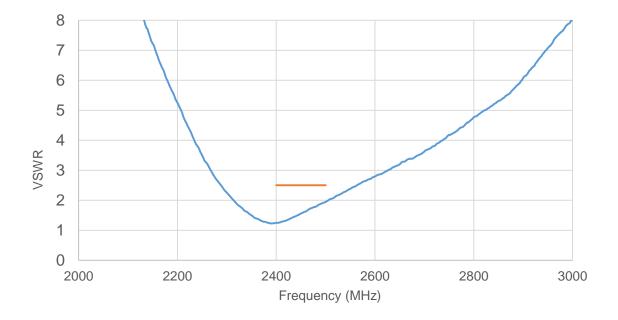
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CHARTS

VSWR





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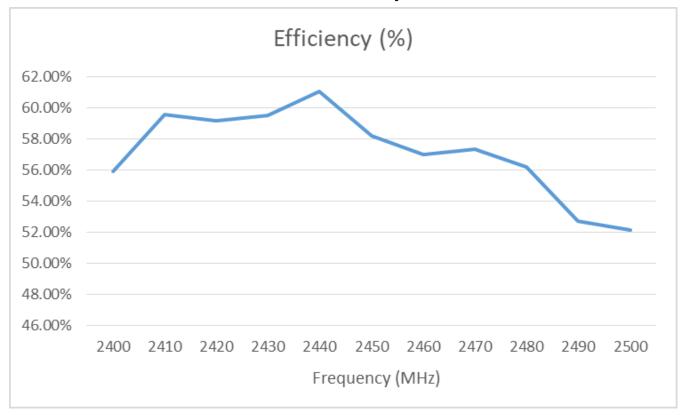
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CHARTS

Efficiency



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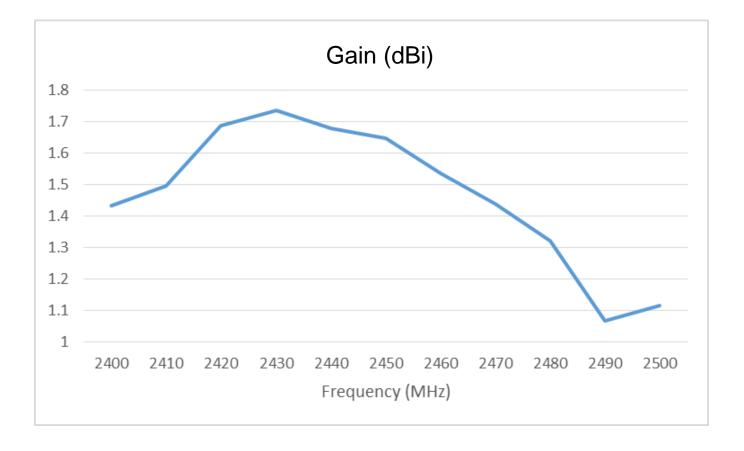
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CHARTS

Gain







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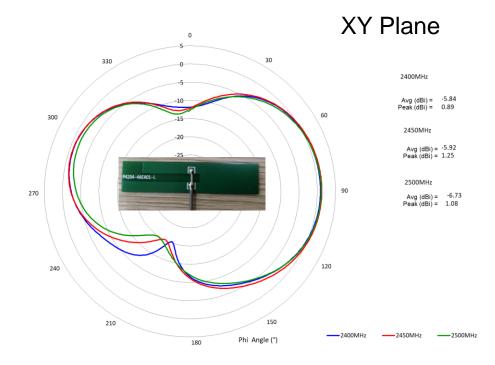
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CHARTS

Free Space Radiation Pattern







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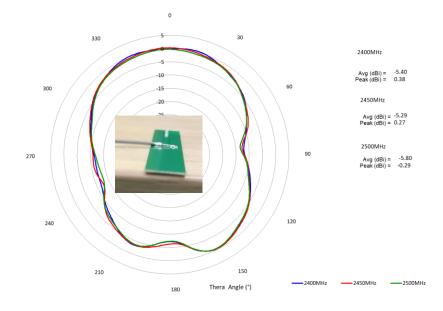
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CHARTS

Free Space Radiation Pattern

XZ Plane









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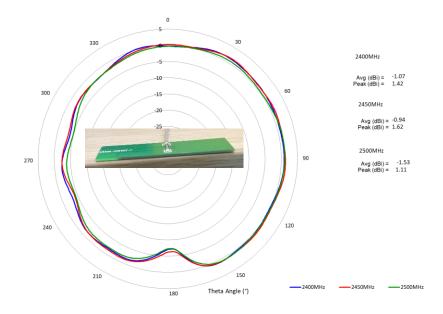
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CHARTS

Free Space Radiation Pattern

YZ Plane







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PACKAGING

For W3525B039 and W3525B039T and W3525B052
10pcs antennas packing packed in 1 sealed bag
10pcs sealed bags (total 100pcs antennas) packed in 1 foam bag
12pcs foam bags (total 1200pcs antennas) packed in 1 carton
460x235x140mm

For W3525B100

5pcs antennas packing packed in 1 sealed bag 20pcs sealed bags (total 100pcs antennas) packed in 1 foam bag 12pcs foam bags (total 1200pcs antennas) packed in 1 carton 460x235x140mm