4G LTE

ST0330-31-X02-A

Amphenol

Datasheet

0.69-0.96GHz, 1.7-2.7GHz

External / In-building



Bar Antenna

Features:

High performing full 4G LTE band antenna with SMA/RP-SMA connector for indoor applications

Applications:

- CPE – Router, Set-top boxes, Gateway
- IoT devices
- 4G LTE Mesh
- Smart Metering
- Robotics

RoHS

Electrical Specifications

Antenna Characteristics

Antenna Type	Radiation Pattern	Polarization	Max. Input Power	Impedance
Bar Antenna	Omni	Linear	2W	50Ω

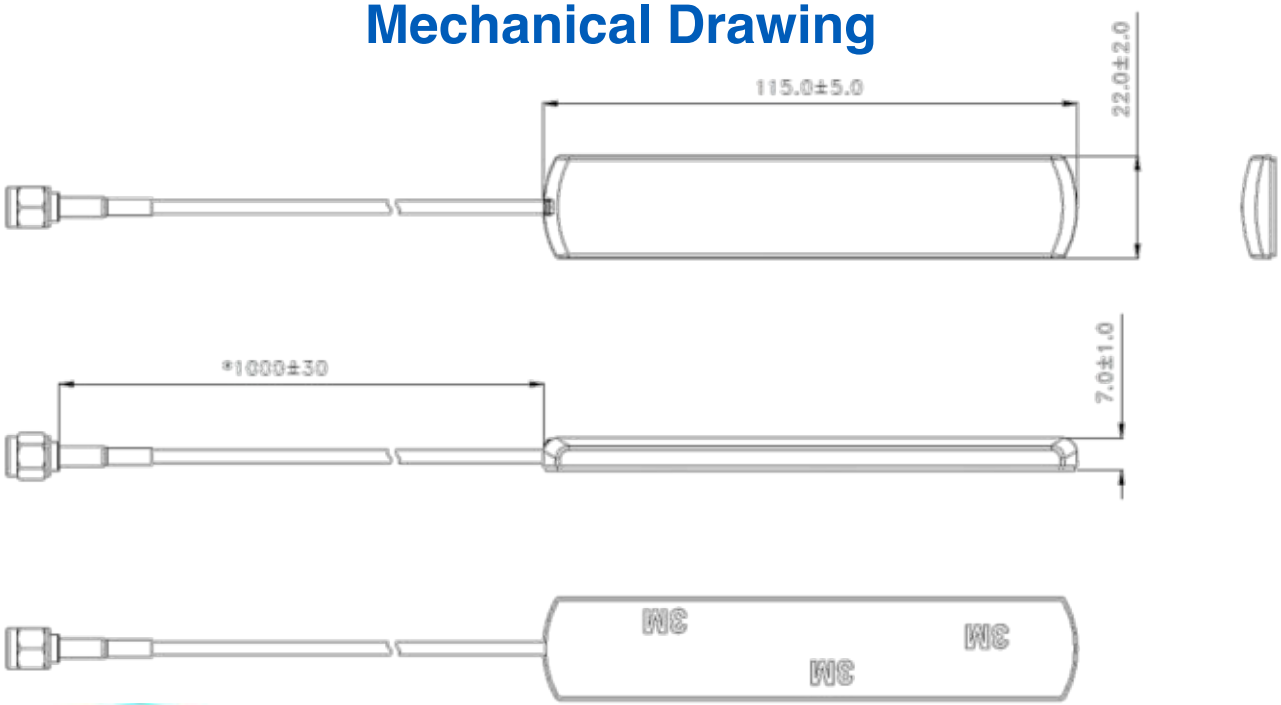
Frequency (GHz)	0.69~0.96	1.71~2.17	2.3~2.7
Return Loss (dB)	< -10	< -10	< -10
Gain, Peak / Average (dB)	2.0 / -2.7	2.1 / -5.4	0.1 / -5.8
Efficiency / Average (%)	55	29	27

Mechanical Specifications

Environmental	
Temperature Range (˚C)	-40 to 85
Humidity	Non-condensing 65°C 95% RH
RoHS Compliant	

Part Number	Length (mm)	Weight (g)	Connector Type	Radome
ST0330-31-002-A	115	25.15	SMA Plug	ABS
ST0330-31-502-A	115	25.15	RP-SMA Plug	ABS

Mechanical Drawing



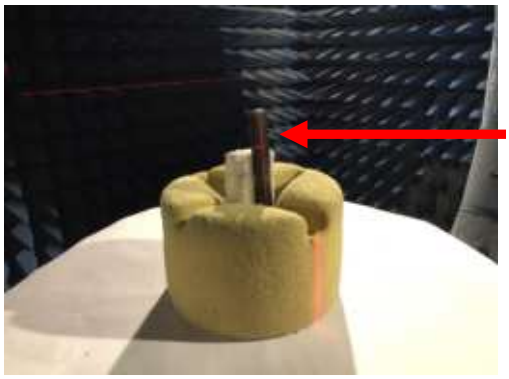

SMA Plug

ST0330-31-002-A

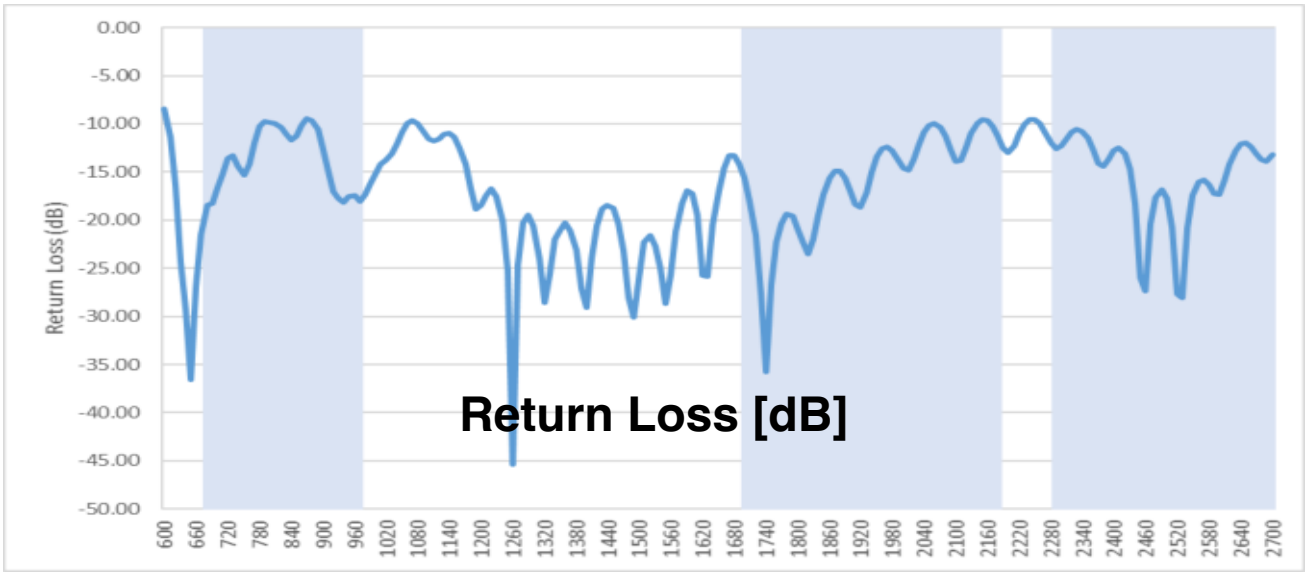

RP-SMA Plug

ST0330-31-502-A

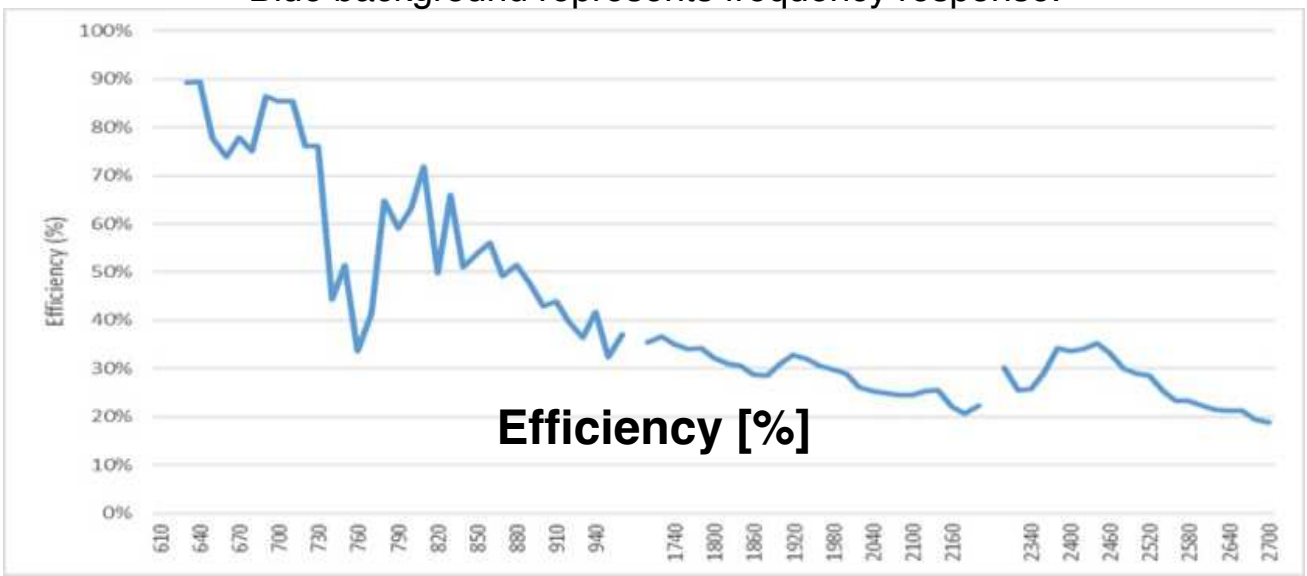
Charts in Free Space



Test setup, measurement performed in 3D Anechoic Chamber

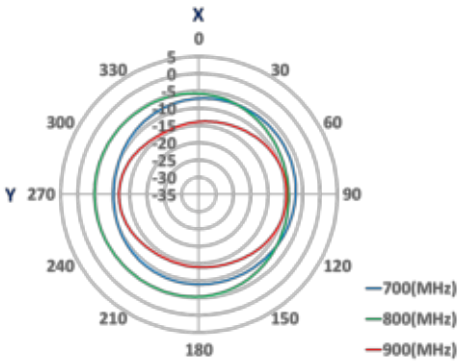


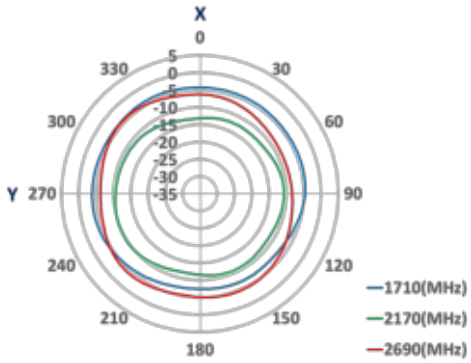
Blue background represents frequency response.



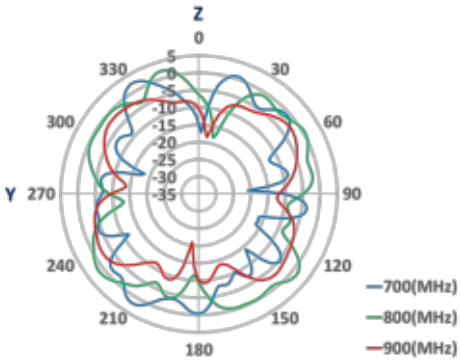
Radiation Pattern - Free Space

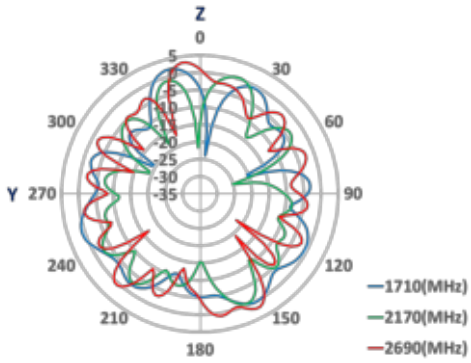
XY - Pane



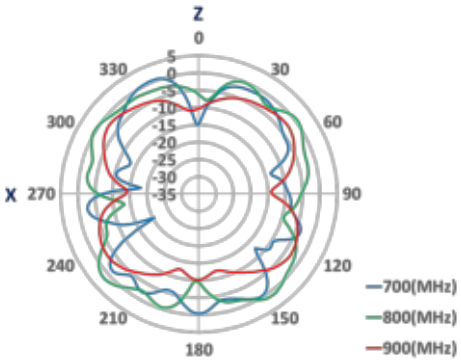


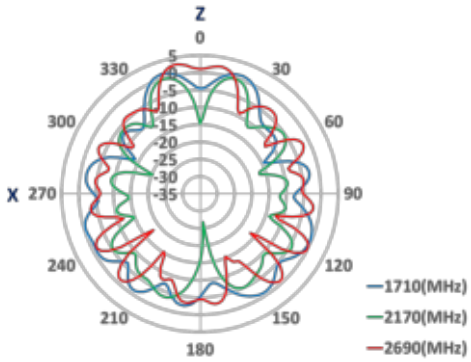
YZ - Plane





XZ - Plane





Revisions				
Rev	Description	Date	ECN	Approval
A	Initial Release	2022-10-25	ST0330-31-002-A-RA00	ATC
B	RF Performance update	2023-01-02	ST0330-31-002-A-RB00	ATC

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