

868/915MHz Embedded Antenna

TFD-868-915[-X]



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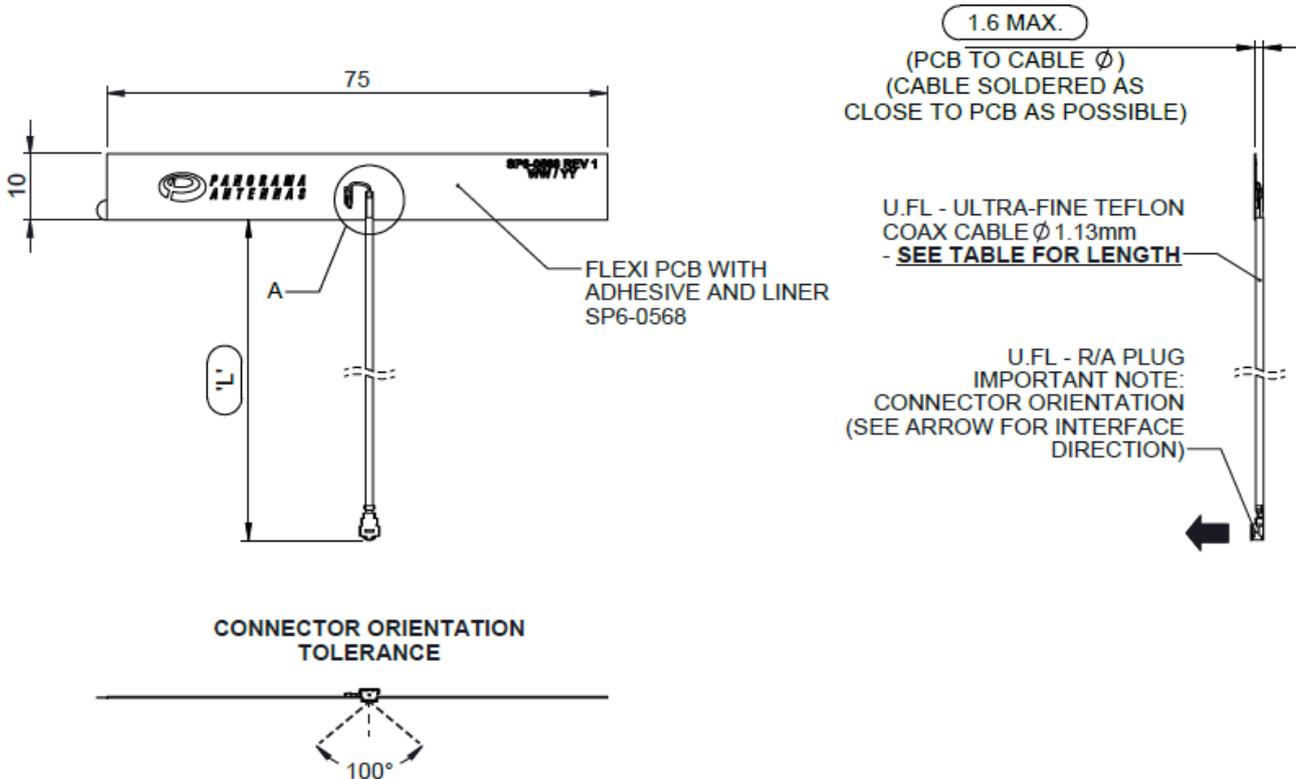
- Supports 868/915MHz ISM bands
- Ultra flexible embedded PCB antenna
- Adhesive mounted
- Fitted 1.13 coax cable with UFL plug

The TFD-868-915[-X] antenna is a ground plane independent flexible PCB (FPCB) dipole antenna with a compact footprint covering 868/915MHz (863-928MHz) developed for embedded applications.

Designed for mounting on non-conductive surfaces the TFD-868-915[-X] range is installed via a high-performance adhesive backing layer and is supplied with integrated C113 cable fitted with a right angle UFL plug.

Technical Drawing

TFD-868-915-VARUFL Shown



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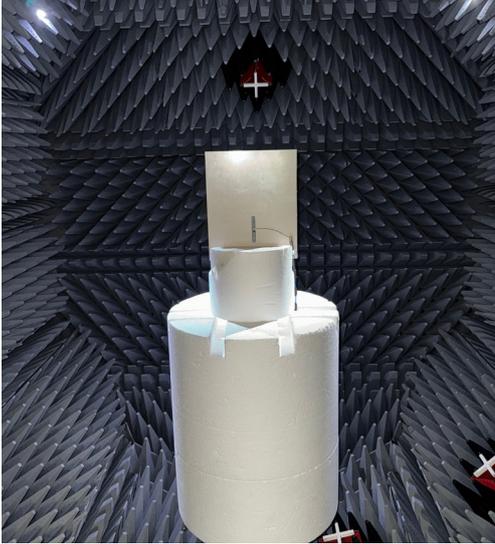
Part No.		TFD-868-915-005UFL	TFD-868-915-01UFL	TFD-868-915-02UFL
Electrical Data				
Frequency Range (MHz)		863-928		
Typical VSWR		<2.5:1		
Typical Peak Gain*	863-870MHz	0.33		
	902-928MHz	0.66		
Typical Efficiency*	863-870MHz	66%		
	902-928MHz	68%		
Polarisation		Linear		
Pattern		Omni-directional		
Impedance		50Ω		
Max Input Power (W)		5		
Mechanical Data				
Dimensions (mm)	Length	75 (2.96")		
	Width	10 (0.39")		
	Thickness	1.6 (0.06")		
Material		Flexible PCB substrate with adhesive backing		
Operating Temp (°C)		-40° / 176°F (-40° / +80°C)		
Colour		Black		
Cable Data				
Type		C113		
Diameter (mm)		1.13 (0.04")		
Length (mm)		50 (2")	100 (4")	200 (8")
Termination		R/A UFL Plug		

*VSWR, peak gain and efficiency measured on 2.5mm (0.1") ABS sheet with 100mm (4") cable. Efficiency is average across stated bands. VSWR stated across 90% of relevant frequency bands.

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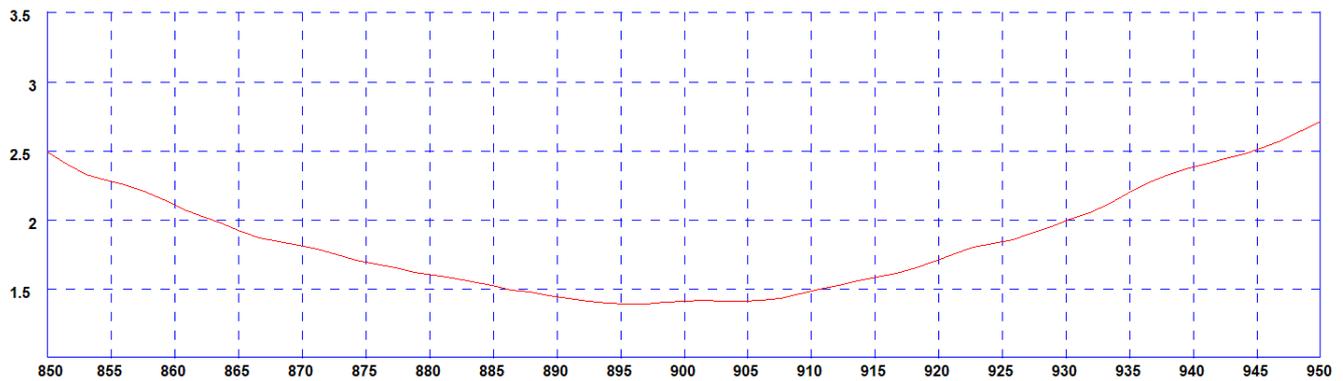
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Electrical Data in
Free Space - ISM

Measurement Conditions	ISM Antenna				
Measured in 3D anechoic chamber on a 2.5mm (0.1") ABS sheet	Frequency Range (MHz)	ISM Bands	Antenna Element	Peak Gain (dBi)	Efficiency (%)
	863-870	868MHz	ISM	0.33	66
	902-928	915MHz	ISM	0.66	68

Electrical Data in
Free Space - ISM

Typical VSWR*



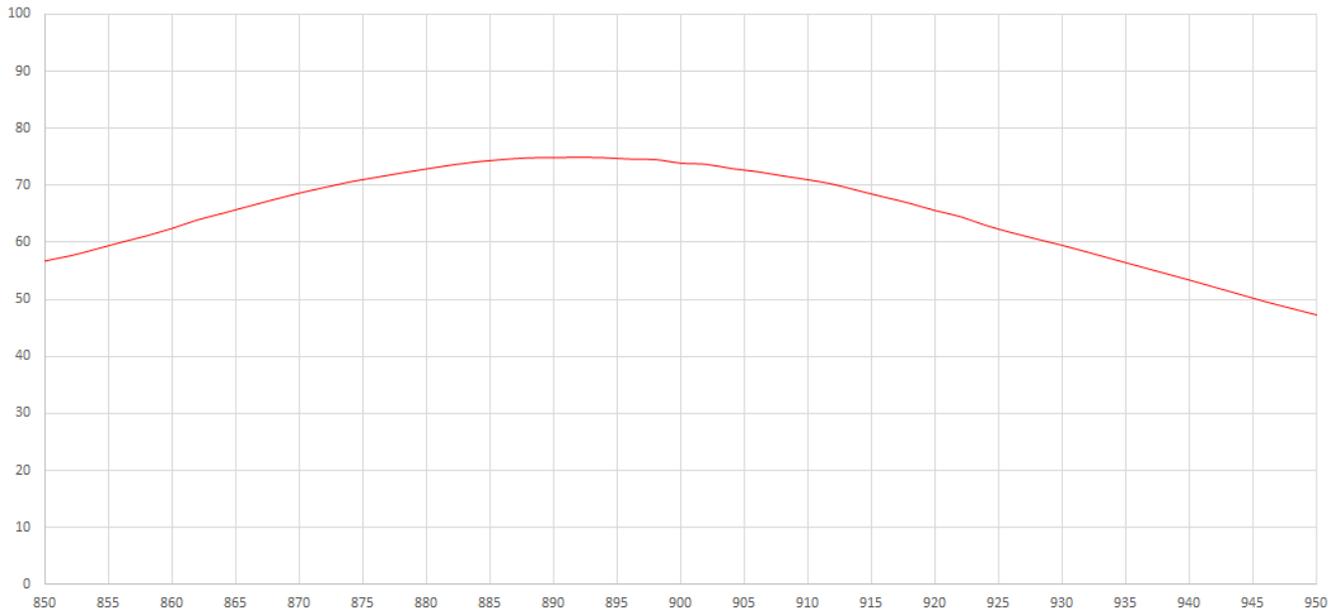
*VSWR measured on 2.5mm (0.1") ABS sheet with 100mm (4") cable

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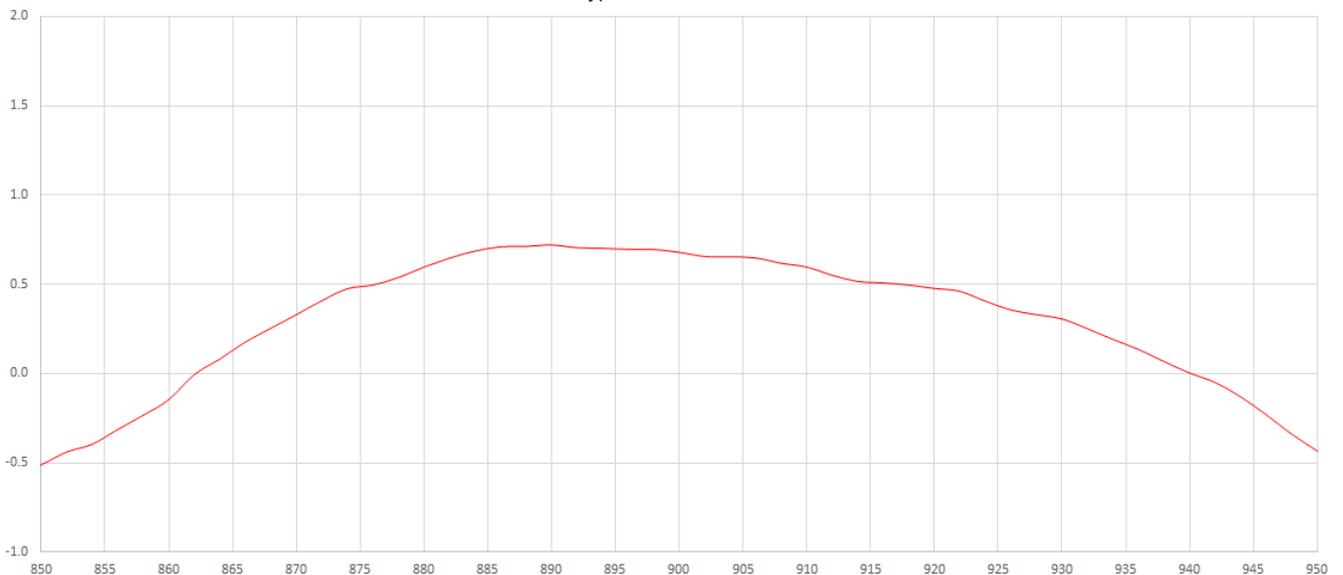
Electrical Data in
Free Space - ISM

Typical Efficiency*



*Efficiency measured on 2.5mm (0.1") ABS sheet with 100mm (4") cable

Typical Peak Gain*



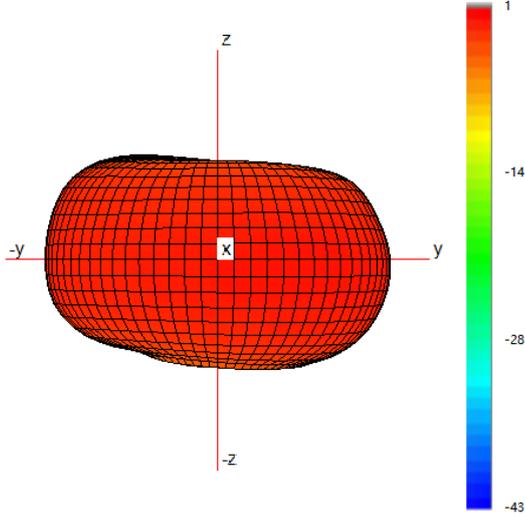
*Peak gain measured on 2.5mm (0.1") ABS sheet with 100mm (4") cable

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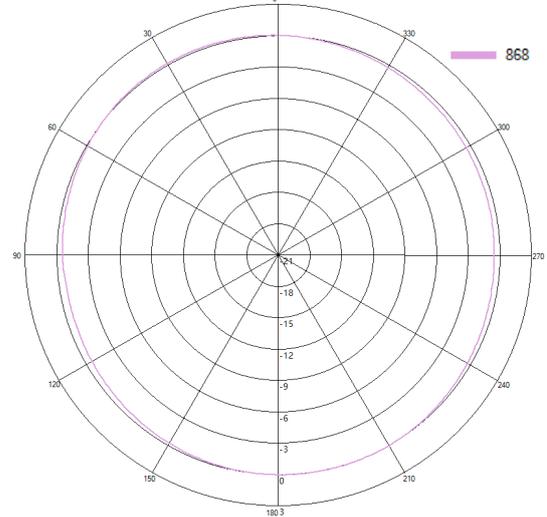
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3D Pattern Data in
Free space - Cell

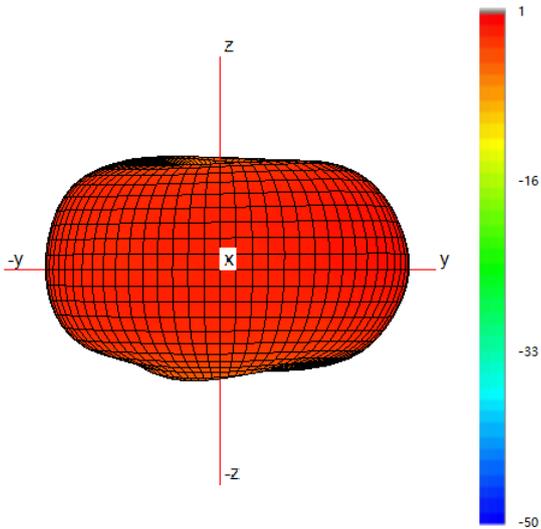
Typical 3D Pattern- 868 MHz



Typical H Plane - Pattern- 868MHz



Typical 3D Pattern- 915 MHz



Typical H Plane- Pattern- 915MHz

