

LTE MIMO ANTENNA WITH GPS

The light transit low profile MiMo antenna range has been designed to support the new generation of vehicular LTE routers. The antenna enclosure contains three isolated high performance antenna elements; two ultrawideband elements covering 698-2700MHz support MiMo/diversity at cellular/LTE frequencies and a high performance GPS antenna with an integrated 26dB gain LNA and high quality filtering to combat noise.

The antenna does not require a metalic ground plane, and maintains a high level of performance even when mounted on a non-metalic surface.

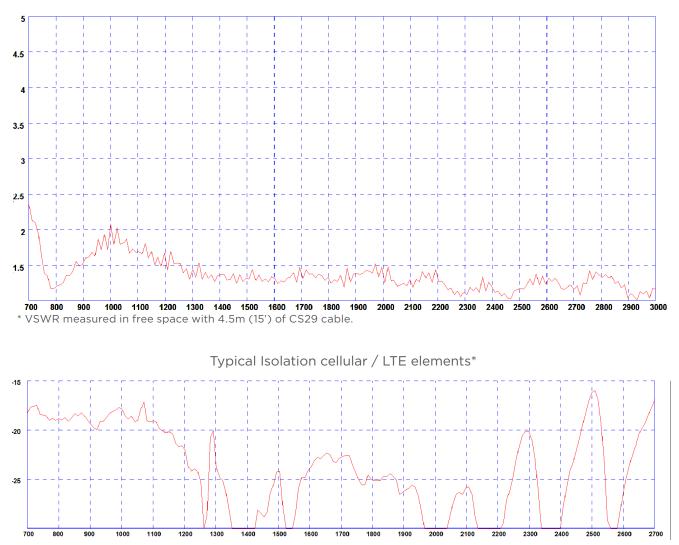
Ordering Information

			Elements 1 & 2	Elements	3, 4 & 5	1.000
TE Part number	Housing colour: White	Housing Colour: Black	2x Cellular Elements (698- 960/ 1710-2700MHz)	2x WLAN Elements (2.4/4.906GHz)	3x WLAN Elements (2.4/4.9- 6GHz)	1x GPS (1575MHz 26dB gain)
1-2823595-1	\checkmark		\checkmark			\checkmark
1-2823595-2		\checkmark	\checkmark			\checkmark
1-2823596-1	\checkmark		\checkmark			
1-2823596-2		\checkmark	\checkmark			
1-2823597-1	\checkmark		\checkmark	\checkmark		
1-2823597-2		\checkmark	\checkmark	\checkmark		
1-2823598-1	\checkmark		\checkmark	\checkmark		\checkmark
1-2823598-2		\checkmark	\checkmark	\checkmark		\checkmark
1-2823599-1	\checkmark		\checkmark		\checkmark	\checkmark
1-2823599-2		\checkmark	\checkmark		\checkmark	\checkmark

LTE MIMO ANTENNA /// DATA SHEET



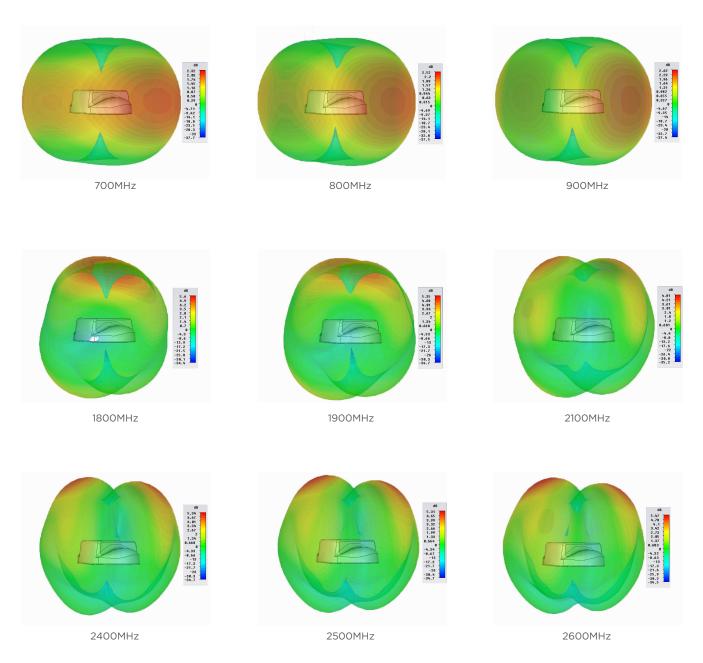




 * Isolation measured in free space with 300mm (1') of cable.



Typical 3D Pattern - Elements 1 & 2



Note: All pattern and gain measurements taken in free space without additional ground plane.



Technical Information

Electrical Data				
	Elements 1 & 2	698-960 / 1700-2700		
Frequency Range (MHz)	Elements 3 & 4	2.4/4.9-6GHz		
	Elements 1 & 2	LTE / Cellular		
Operational Bands	Elements 3 & 4	WiFi		
	Elements 1 & 2: 698-960	2.3dBi		
Peak Gain Isotropic	Elements 1 & 2: 1710-2700	5dBi		
	Elements 3 & 4: 2.4/4.9-6.0GHz	2dBi		
Polarisation		Vertical		
VSWR	Elements 1 & 2	<2.5:1		
Isolation (in free space)	Elements 1 & 2	>15dB		
Impedance		50Ω		
Max Input Power (W)		50		
GPS Data				
Frequency Range (MHz)		1575		
VSWR		<2.0:1 <u>+</u> 4MHZ		
LNA Gain		26dB		
Polarisation		Right Hand Circular		
Operating Voltage		3-7V DC (fed via coax)		
Current (Typical)		14mA		
Mechanical Data				
Dimensione	Height	62mm (2.4")		
Dimensions	Diameter	176mm (6.7")		
Operating Temp		-30°C / +80°C (-22°F / 176°F)		
operating remp				
Material		ASA & diecast aluminium		
		ASA & diecast aluminium IP66		
Material				
Material Ingress Protection		IP66		
Material Ingress Protection Colour		IP66		
Material Ingress Protection Colour Mounting Data		IP66 White		
Material Ingress Protection Colour Mounting Data Mounting type		IP66 White Panel mount		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness		IP66 White Panel mount 6mm (0.236")		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole	Туре	IP66 White Panel mount 6mm (0.236")		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole Cable Data	Type Diameter	IP66 White Panel mount 6mm (0.236") 19mm (3/4")		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole		IP66 White Panel mount 6mm (0.236") 19mm (3/4") RG174		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole Cable Data	Diameter	IP66 White Panel mount 6mm (0.236") 19mm (3/4") RG174 2.8mm (0.11")		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole Cable Data	Diameter Length	IP66 White Panel mount 6mm (0.236") 19mm (3/4") RG174 2.8mm (0.11") 0.3m (11.8")		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole Cable Data GPS Cable	Diameter Length Termination	IP66 White Panel mount 6mm (0.236") 19mm (3/4") RG174 2.8mm (0.11") 0.3m (11.8") FME (female)		
Material Ingress Protection Colour Mounting Data Mounting type Max panel thickness Mounting hole Cable Data	Diameter Length Termination Type	IP66 White Panel mount 6mm (0.236") 19mm (3/4") RG174 2.8mm (0.11") 0.3m (11.8") FME (female) CS29 (double shielded RG58)		

1-1773880-5 CC 0816

