9 dBd HD LTE omni antenna 695-870MHz, low PIM



DESCRIPTION

The 4240 Series colinear antennas are designed for LTE/GSM applications where a durable and high performance antenna is required. The centre fed dipole design and feed network gives a stable radiation pattern across a wide bandwidth, and allows tilted beam designs to be effectively employed without large pattern distortions. High quality materials and manufacturing techniques are employed to ensure that the antenna has excellent intermodulation performance & wide bandwidth characteristics for multi-channel trunked radio communication systems. The antenna has been designed to withstand lightning strike.

SPECIFICATIONS

Electrical	
Frequency	695 - 870 MHz
Max. Input Power	400 W
Omni Deviation	< ± 1 dB
Polarisation	Vertical
Peak Instantaneous Power (PIP)	25 kW
3 dB Beamwidth, E-Plane	8° ±1°
3 dB Beamwidth, H-Plane	Omnidirectional
Impedance	50 Ω
Gain	9 dBd (11.2 dBi)
VSWR	< 1.5:1
Passive Intermodulation	-153dBc (3rd Order, 2 x Tx @ 43dBm)
Lightning Protection	Lightning current handling capability: 200 kA According to EN 62305-1 (Test pulse 10/350 µs)
Antistatic Protection	All metal parts DC-grounded (Connector shows a DC-short)

Mechanical		
Connection(s)	7/16 DIN(f)	
Materials	Antenna Base: Aluminium Shroud: GRP tube 53mm dia.	
Mounting Section	Al. tube 63.5 mm dia. x 350 mm long	
Dimensions	2990 (l) x 53 (dia.) mm / 117.72 (l) x 2.09 (dia.) in.	
Wind Load	254 N (160km/h)	
Weight	10.5 kg / 23.15 lb	
Mounting Bracket	2141.01.00.00 (up to ø120mm) (Ordered Separately)	ETC-250 (ø50 to ø76mm) (Ordered Separately)

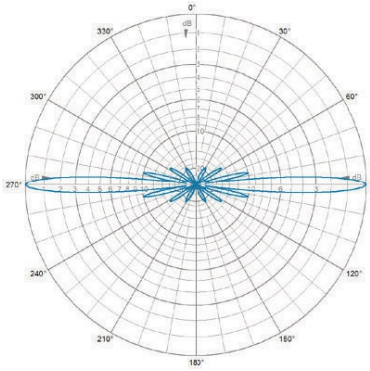
Environmental	
Survival Wind Speed	300 km/h
Ingress Protection	IP56

ORDERING

Model	Product No.	Description	Frequency
9 dBd HD LTE omni antenna 695-870MHz, low PIM	4240.09-780-T0	0° Electrical Tilt	695 - 870 MHz
9 dBd HD LTE omni antenna 695-870MHz, low PIM	4240.09-780-T3	3° Electrical Tilt	695 - 870 MHz
9 dBd HD LTE omni antenna 695-870MHz, low PIM	4240.09-780-T6	6° Electrical Tilt	695 - 870 MHz
Galvanised steel parallel bracket 38-120mm (PAIR)	2141.01.00.00		
Extruded Parallel Tube Clamp, 50 - 76mm	ETC-250		

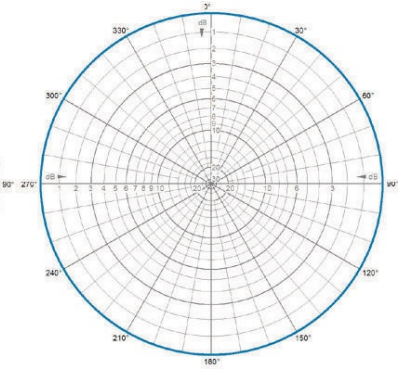
DIAGRAM

RADIATION PATTERNS



E-Plane | 780 MHz

RADIATION PATTERNS



H-Plane | 780 MHz