

Sturdy, 0 dBd, Omnidirectional lightning protected Base Station Antenna for the TETRA Bands

DESCRIPTION

- CXL 70-1HD/...-PT is an 0 dBd, vertically polarized, omnidirectional base station antenna for the TETRA bands with two models.
- The antenna has been approved to withstand lightning (10/350 μ s impulses/200 kA) according to EN 62305-1.
- The antenna is provided with our sturdy type "HD" mast mount - a heavy-duty, multipurpose mounting bracket made of non-corrosive aluminium. The accompanying U-bolts and fittings are made of stainless steel.
- The antenna can be mounted on mast tubes of 58 to 105 mm in outer diameter. Furthermore, the construction of the mount makes it possible to lead the cable either along the inside or on the outside of the mast tube.
- The antenna element is sealed in a high-quality, conical glass fibre tube with low wind load, ensuring undisturbed performance in all climates.
- To substantially reduce noise caused by atmospherical discharges, all metal parts in the antenna are DC-grounded. Consequently, the antenna shows a DC-short across the coaxial cable.
- CXL 70-1HD/...-PT is a vibration-proof, slim-line, corrosion-resistant, modern style base station antenna.



SPECIFICATIONS

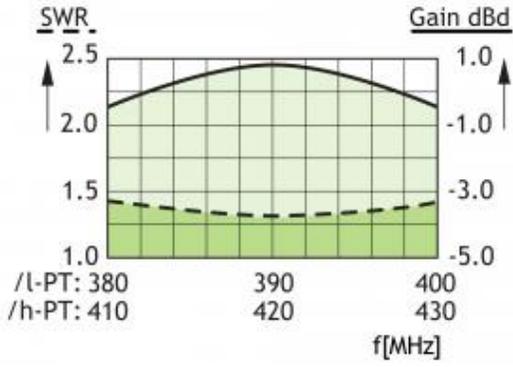
Electrical	
Model	CXL 70-1HD/...-PT
Frequency	380 - 400 MHz 410 - 430 MHz
Antenna Type	Coaxial dipole, broad-banded
Max. Input Power	250 W
Polarisation	Vertical
Pattern Type	Omnidirectional
3 dB Beamwidth, E-Plane	80 °
3 dB Beamwidth, H-Plane	Omnidirectional
Impedance	50 Ω
Gain	0 dBd (2.2 dBi)
VSWR	< 1.5:1
Lightning Protection	200 kA (Test pulse 10/350 μ s)
Antistatic Protection	All metal parts DC-grounded (Connector shows a DC-short)
HCM Code(s)	HCM000ND00, 040DE00
Mechanical	
Connection(s)	N(f)
Materials	Radome : Polyurethane-coated glass fibre Mounting bracket : Seawater resistant aluminium, epoxy-coated
Colour	White (RAL 9003)
Wind Area	0.085 sq. m / 0.91 sq. ft
Wind Load	107 N (160 km/h)
Height	Approx. 1400 mm / 55.12 in.
Weight	Approx. 4.4 kg / 9.70 lb.
Mounting	On 58 to 108 mm / 2.28 - 4.25 in. dia. mast tube

Environmental	
Operating temperature range	-55 °C to +70 °C
Environmental	ETSI EN 300 019-2-4 Class 4.1 E.
Survival Wind Speed	200 km/h

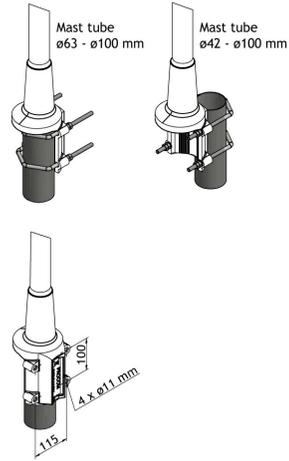
ORDERING

Model	Product No.	Frequency
CXL 70-1HD/l-PT	100000358	380-400 MHz
CXL 70-1HD/h-PT	100000379	410-430 MHz

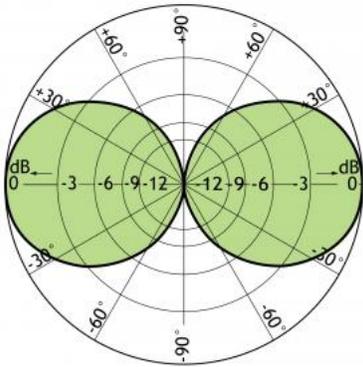
TYPICAL GAIN AND VSWR CURVE



MULTI-PURPOSE MOUNTING BRACKET



TYPICAL RADIATION PATTERN (E-PLANE)



MOUNTING DESCRIPTION FOR GROUND CONNECTION



TYPICAL RADIATION PATTERN (H-PLANE)

