

3 dBd Omnidirectional Base Station and Marine Antenna for the 1800 MHz Band

DESCRIPTION

- Vertically polarized, omnidirectional base station and marine antenna.
- Approximately 3 dBd gain.
- Provided with the sturdy "LW" mast mount – a lightweight, multipurpose, epoxy-coated mounting bracket made of non-corrosive aluminium.
- The accompanying U-bolts and fittings are made of stainless steel.
- To be mounted on vertical or horizontal mast tubes, 16 to 54 mm in outer diameter.
- The cable can be led either on the outside or along the inside of the mast tube.
- Large bandwidth with respect to both SWR and gain.
- Highly suitable for duplex operation with large spacing between the TX and the RX frequencies, e.g. the DCS-1800/PCN cellular system.
- The antenna element is sealed in a high-quality, conical glass fibre tube.
- All metal parts in the antenna are DC-grounded to reduce the noise caused by atmospherical discharge.
- Consequently, the antenna shows a DC-short across the coaxial cable.
- The CXL 1800-3LW is a vibration-proof, lightweight, slim-line, corrosion resistant, modern style base station and marine antenna.



ORDERING

Type	Product No.
CXL 1800-3LW	100000175

SPECIFICATIONS

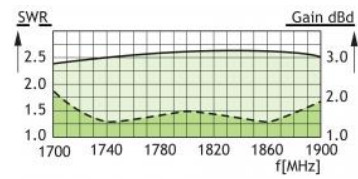
Electrical	
Model	CXL 1800-3LW
Frequency	1710 - 1880 MHz
Antenna Type	Collinear, broad-band
3 dB Beamwidth, H-Plane	Omnidirectional
Polarisation	Vertical
3 dB Beamwidth, E-Plane	30 °
Impedance	50 Ω
Gain	3 dBd (5.2 dBi)
SWR	< 2.0:1
Maximum Input Power	100 W
Antistatic Protection	All metal parts DC-grounded (Connector shows a DC-short)
HCM Code(s)	

Mechanical	
Wind Area	0.02 sq. m / 0.22 sq. ft
Connection(s)	N(f)
Materials	Shroud: Polyurethane-coated glass fibre Mounting bracket: Seawater resistant aluminium, epoxy-coated Clamps: Stainless steel
Colour	White (RAL 9003)
Height	700 mm / 27.56 in.
Wind Load	25 N (160km/h)
Dia. At Top End	12 mm / 0.47 in.
Weight	0.6 kg / 1.32 lb
Dia. At Bottom End	16 mm / 0.63 in.
Mounting	On 16 to 54 mm dia. mast tube

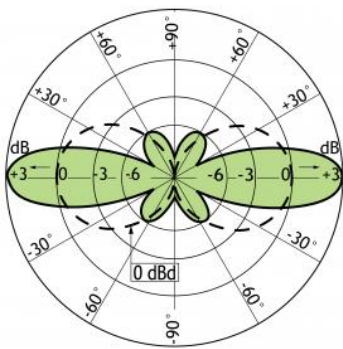
Environmental	
Operating Temperature Range	-30°C to +70°C

DIAGRAM

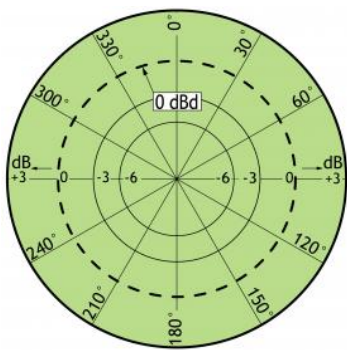
TYPICAL GAIN AND SWR CURVES



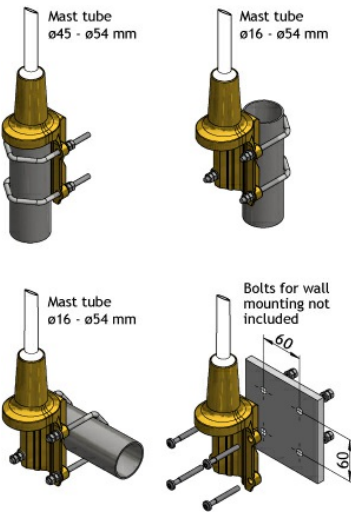
TYPICAL RADIATION PATTERN



TYPICAL RADIATION PATTERN (H-PLANE)



MULTI-PURPOSE MOUNTING BRACKET



PLEASE NOTE

The antenna is delivered with a DC-connection between the antenna element and the mounting bracket.