

# CXL 70-3/...

## 3 dBd Gain Base Station and Marine UHF Antenna

### DESCRIPTION

- This collinear UHF antenna with 3 dBd gain is developed for use on board ships as well as on masts, and thanks to the 1" revolving nut mounting system it can be mounted in the mast, in the auxiliary mast as well as on the cross-beam. By means of Procom's flange mount type "FLG", it can also be mounted on deck or rooftop.
- The CXL 70-3/... is in widespread use in connection with
- 450 MHz CELLULAR systems. The antenna makes it possible to extend the – normally land based – CELLULAR telephone system service for maritime use as well, and here the 3 dBd gain of the antenna comes to definite advantage.
- Bear in mind that the higher the antenna is mounted the better coverage.
- Avoid mounting the antenna parallel with and in the neighbourhood of other metal parts, such as masts, supporting wires etc. Free mounting and as high as possible is most preferable, otherwise the SWR and the radiation diagram will be influenced.
- The antenna needs neither loading coils, ground-plane, radials nor other auxiliary arrangements.
- The antenna is a grounded radiator antenna and therefore it shows a DC-short across the coaxial cable.
- A conical glass fibre tube completely encloses the carefully designed radiating element to assure long dependable service in all climates.











### ORDERING DESIGNATIONS

TYPE	PRODUCT NO.	FREQUENCY
CXL 70-3/s	110000141	380 – 410 MHz
CXL 70-3/f	110000140	406 – 430 MHz
CXL 70-3/l	110000142	420 – 450 MHz
CXL 70-3/h	110000139	440 – 470 MHz

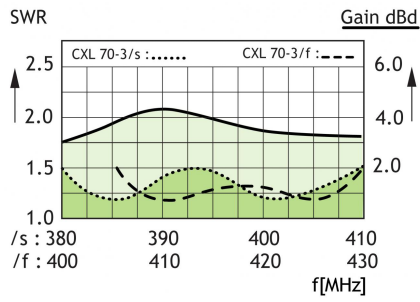
### SPECIFICATIONS

ELECTRICAL	
MODEL	CXL 70-3/...
ANTENNA TYPE	Coaxial, broad-band
FREQUENCY	CXL 70-3/s : 380 – 410 MHz CXL 70-3/f : 406 - 430 MHz CXL 70-3/l : 420 – 450 MHz CXL 70-3/h: 440 - 470 MHz
IMPEDANCE	Nom. 50 Ω
POLARIZATION	Vertical
GAIN	5 dBi 3 dBd
BANDWIDTH	30 MHz
SWR	≤ 1.5
MAX. POWER	150 W
MECHANICAL	
TEMP. RANGE	-30°C → +70°C
CONNECTOR	N-female
WIND SURFACE	0.0337 m <sup>2</sup>
WIND LOAD	43 N @ 160 km/h
COLOUR	Marine white
MATERIALS	Shroud: Polyurethane-coated glass fibre Mounting bracket: Chromed brass
TOTAL HEIGHT	Approx. 1.3 m (dep. on freq.)
DIA.	In top end: 16 mm; in bottom end: 23 mm
WEIGHT	Approx. 1.2 kg
MOUNTING	On 1" RG (G1" - 11) threaded water pipe or on optional mounting brackets (see below)

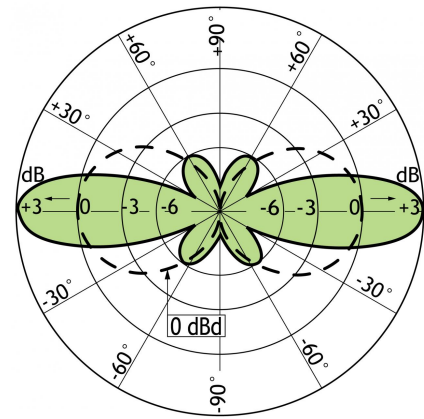
### ACCESSORIES (to be ordered separately)

<b>FLG</b>  G1"-11 (1" RG)	<b>SMR 1</b>  G1"-11 (1" RG)	<b>SMR 2</b>  G1"-11 (1" RG)	<b>YA-Bracket</b>  ø17
<b>LW 1"</b>  G1"-11 (1" RG)	<b>MariFix 1</b>  1"-14 NF ALSO NEED ADT	<b>MariFix 2</b>  1"-14 NF ALSO NEED ADT	<b>ADT</b>  G1"-11 (1" RG) 1"-14 NF

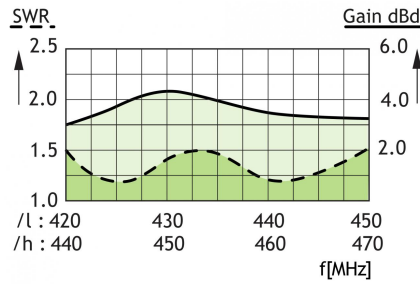
TYPICAL GAIN AND SWR CURVES



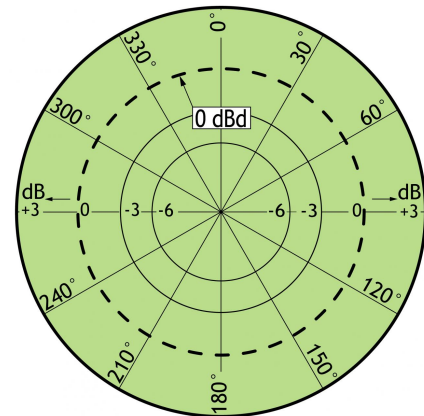
TYPICAL RADIATION PATTERN (E-PLANE)



TYPICAL GAIN AND SWR CURVES



TYPICAL RADIATION PATTERN (H-PLANE)



PROCOM A/S reserve the right to amend specifications without prior notice.  
17/07/13