

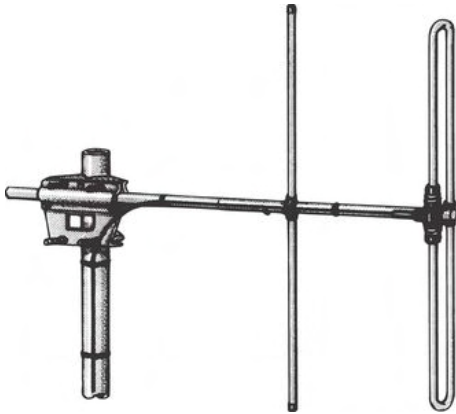
## R 4-3/..., R 4-6/...

Directional Antennas with 3 and 6 dBd Gain for the 80 MHz Band

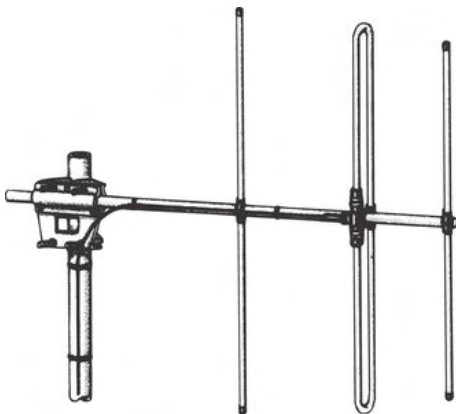
### DESCRIPTION

- R 4-3/... is a two-element Yagi antenna with 3 dBd gain. R 4-6/... is a three-element Yagi antenna with 6 dBd gain. Both antenna types are delivered in two versions – one covering the low end of the band ("l") and one covering the high end of the band ("h"), see specifications below.
- These Yagis incorporate baluns optimized for wide bandwidth and accurate matching. The entire balun unit and feeder cable inlet are completely sealed in a polythene moulding ensuring permanent waterproof connections. The antennas are supplied with a 3 m "tail" of RG 213 terminated with an N-female connector.
- Radiating elements, supporting booms and adjoining metal castings have been constructed in high quality aluminium alloys to prevent corrosion. All metal parts are DC-grounded.
- The antennas are designed for back mounting and are provided with rear extended booms. These antennas can be stacked and fed in phase with a matching harness for increased gain. A mast clamp for fixation on 30-58 mm diameter mast tube is enclosed.

#### R 4-3/...



#### R 4-6/...



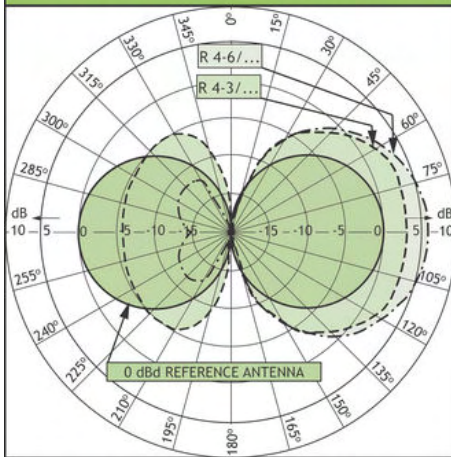
### ORDERING DESIGNATIONS

FREQUENCY	TYPE	PROCDT NO.	TYPE	PROCDT NO.
		2-element Yagi 3 dBd	3-element Yagi 6 dBd	
66 - 76 MHz	-		R 4-6/l	120000022
66 - 78 MHz	R 4-3/l	120000020	-	
75 - 88 MHz	R 4-3/h	120000019	R 4-6/h	120000021

### SPECIFICATIONS

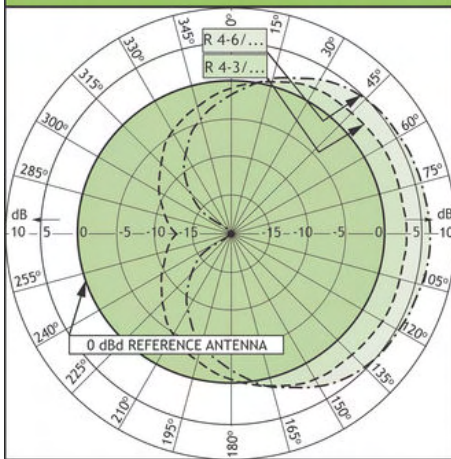
ELECTRICAL		
MODEL	R 4-3/...	R 4-6/...
ANTENNA TYPE	2-element Yagi	3-element Yagi
FREQUENCY	"l": 66 - 78 MHz "h": 75 - 88 MHz	"l": 66 - 76 MHz "h": 75 - 88 MHz
IMPEDANCE	Nom. 50 Ω	
POLARISATION	Vertical or horizontal	
GAIN	5 dBi 3 dBd	8 dBi 6 dBd
FRONT TO BACK RATIO	12 dBd	17 dBd
HALF-POWER BEAMWIDTH	E-plane: 75° H-plane: 150°	E-plane: 70° H-plane: 120°
BAND WIDTH	13 MHz	
SWR	≤ 1.5	
MAX. POWER	150 W	
ANTISTATIC PROTECTION	All metal parts DC-grounded (Connector shows a DC-short)	
MECHANICAL		
TEMP. RANGE	-25°C → +60°C	
CONNECTION	3 m tail of RG 213 terminated with type "N" female connector	
WIND SURFACE	0.162 m <sup>2</sup>	0.203 m <sup>2</sup>
WIND LOAD	205 N @ 160 km/h	257 N @ 160 km/h
COLOUR	"Aluminium"	
MATERIALS	Elements/Boom/Saddle clamps: Aluminium alloys Fittings: Stainless steel	
BOOM LENGTH	Approx. 1.6 m	Approx. 1.8 m
BOOM DIA.	31.8 mm	
MAX. ELEMENT LENGTH	Approx. 2.15 m	
DIA. OF ELEMENTS	19 mm	
WEIGHT	Approx. 4.9 kg	Approx. 5.3 kg
MOUNTING	On 30-58 mm dia. mast tube	

### TYPICAL RADIATION PATTERN (E-PLANE)



If the antennas are mounted for vertical polarisation these curves show the radiation patterns in the vertical plane.

### TYPICAL RADIATION PATTERN (H-PLANE)



If the antennas are mounted for vertical polarisation these curves show the radiation patterns in the horizontal plane (horizontal coverage).



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

23/06/2009