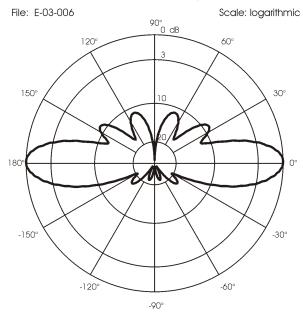
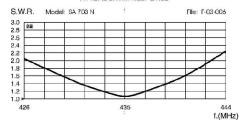
### TYPICAL RADIATION PATTERN in E-plane at 435 MHz



#### TYPICAL S.W.R. RESPONSE





# **SA 703 N**

# Fiberglass Hi-Gain UHF Antenna 430-440 MHz



Installation Manual

## DESCRIPTION

Ground Plane colinear antenna for base station service specially conceived for the 70cm amateur band. It is made of very good quality materials to get the best robustness and the highest performance. Its whip is of brass inserted in a conic fiberglass tube for a total protection against yhe worst climates and its radials are of stainless steel to get the maximum strength. It is supplied with a solid aluminium bracket for an easy and safe installation to the support mast.

## **SPECIFICATIONS**

#### **Electrical Data**

Type :  $3 \times 5/8 \lambda$  Ground Plane Colinear Frequency Range : 430 - 440 MHz @ SWR  $\leq 1.6$  \*

Impedance : 50  $\Omega$ 

Radiation (H-plane) : 360° Omnidirectional Radiation (E-plane) : Beamwidth @ -3 dB = 24°

Radiation angel deg : 0°

Polarization : Linear Vertical Gain : 4.6 dBd - 6.75 dBi

Max Power : 200 Watts

Grounding Protection : All metal parts are DC-grounded, the inner conductor is coupled

capacitively

Connector : N-female, Gold Plated central pin

**Mechanical Data** 

Materials : Fiberglass, Stainless Steel, Chromed Brass, Aluminium

Wind Load / Resistance : 56 N @ 150 Km/h / 180 km/h

Wind Surface : 0.05 m²
Height (approx.) : 1780 mm
Weight (approx.) : 900 gr
Radial Length (approx.) : 170 mm
Mounting Mast : Ø 35-54 mm

## \* Factory tunable upon request. Ask for minimum quantity order.

From 400 MHz to 470 MHz we can provide factory tuned antenna if not available in the table below.

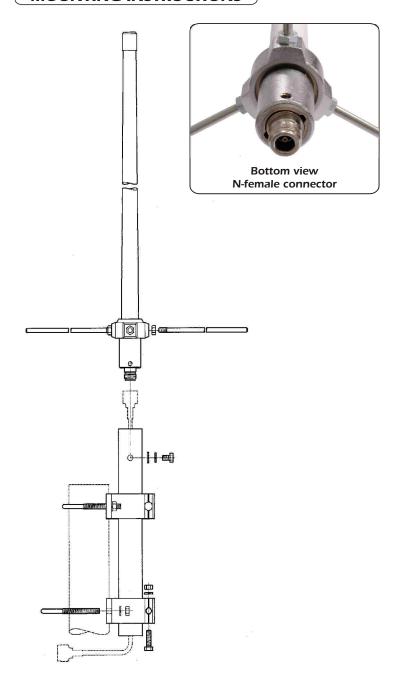
Available	Frequency range	Frequency range
models	@ SWR ≤ 1.6	@ SWR ≤ 2
SA 703 N 410 MHz	405 - 415 MHz	403 - 417 MHz
SA 703 N (standard)	430 - 440 MHz	427 - 443 MHz
SA 703 N USA	440 - 450 MHz	437.5-453.5 MHz
SA 703 N 455 MHz	450 - 460 MHz	446 - 464 MHz
SA 703 N 466 MHz	461 - 471 MHz	456 - 475 MHz



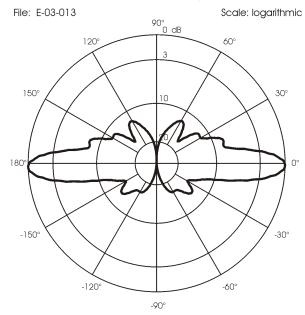
HI-QUALITY ANTENNAS MADE IN ITALY

#### ID164

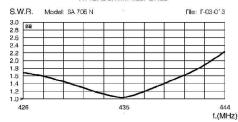
### **MOUNTING INSTRUCTIONS**



### TYPICAL RADIATION PATTERN in E-plane at 435 MHz



#### TYPICAL S.W.R. RESPONSE





# **SA 705 N**

# Fiberglass Hi-Gain UHF Antenna 430-440 MHz



### DESCRIPTION

Ground Plane colinear antenna for base station service specially conceived for the 70cm amateur band. It is made of very good quality materials to get the best robustness and the highest performance. Its whip is of brass inserted in a conic fiberglass tube for a total protection against yhe worst climates and its radials are of stainless steel to get the maximun strength. It is supplied with a solid aluminium bracket for an easy and safe installation to the support mast.

## SPECIFICATIONS )

#### **Electrical Data**

Type :  $5 \times 5/8 \lambda$  Ground Plane Colinear Frequency Range : 430 - 440 MHz @ SWR  $\leq 1.6$  \*

Impedance : 50  $\Omega$ 

Radiation (H-plane) : 360° Omnidirectional Radiation (E-plane) : Beamwidth @ -3 dB = 17°

Radiation angel deg : -1.5°

Polarization : Linear Vertical Gain : 7.1 dBd - 9.25 dBi

Max Power : 200 Watts

Grounding Protection : All metal parts are DC-grounded, the inner conductor is coupled

capacitively

Connector : N-female, Gold Plated central pin

**Mechanical Data** 

Materials : Fiberglass, Stainless Steel, Chromed Brass, Aluminium

Wind Load / Resistance : 81 N @ 150 Km/h / 160 km/h

Wind Surface : 0.07 m²
Height (approx.) : 2790 mm
Weight (approx.) : 1100 gr
Radial Length (approx.) : 170 mm
Mounting Mast : Ø 35-54 mm

## \* Factory tunable upon request. Ask for minimum quantity order.

From 400 MHz to 500 MHz we can provide factory tuned antenna if not available in the table below.

Available	Frequency range	Frequency range
models	@ SWR ≤ 1.6	@ SWR ≤ 2
SA 705 N 403 - 430	403 - 430 MHz	400 - 432 MHz
SA 705 N (standard)	430 - 440 MHz	427 - 443 MHz
SA 705 N USA	440 - 450 MHz	437 - 453 MHz
SA 705 N 455 MHz	450 - 460 MHz	446 - 464 MHz
SA 705 N 466 MHz	461 - 471 MHz	456 - 475 MHz
SA 705 N 495 MHz	490 - 500 MHz	486 - 504 MHz



HI-QUALITY ANTENNAS MADE IN ITALY

### **MOUNTING INSTRUCTIONS**

