

# Marinr GPS Antenna

## MODEL: MA-700B

Concinnity and Solid design for GPS Marine Antenna  
with Advanced technology

**Garmin compatible Marine GPS Antenna**



GPS Antenna : 90.5mm(Dia) × 108.5mm(H)

**MA700** is designed for the Marine Vessels mast or tall buildings that require long extra cables without signal constraint to the GPS receivers. **MA700** is not only hidden in a durable and waterproof cover, but also cable is protected by a base which can prevent damage. The special design for **MA700** is really delicate, compact and reliable. Besides that have concinnity and compacted design for base. It is the integration of the high performance GPS patch antenna and a low noise amplifier into an extremely fully waterproof enclosure and when connected to a GPS receiver with 2.5~5.5VDC antenna power, it can provide excellent antenna signal amplification and out-band filtering with rejection for that receiver at 3V DC or 5V DC input Voltage.

### Specifications

Antenna Element	
Center Frequency	1575.42 MHz +/-1.023 MHz
Polarization	R.H.C.P. (Right Handed Circular Polarization)
Absolute Gain @ Zenith	+5 dBi typical
Gain @ 10° Elevation	-1 dBi typical
Axial Ratio	3 dB max.
Output VSWR	1.5:1 max.
Output Impedance	50 ohm
Low Noise Amplifier	
Center Frequency	1575.42 MHz +/- 1.023 MHz
Power Gain	28 +/-4.5dB
Bandwidth	2 MHz min.

Noise Figure	1.5 max.
Outer Band Attenuation	20 dB min. @ Fo +/-50 MHz
Supply Voltages	2.5 to 5.5V DC
Current Consumption	13mA@ 3.0V DC,18mA@ 5.0V DC
VSWR	1.5 max.
Output Impedance	50 ohm
<b>Overall Performance: (antenna element, LNA &amp; coax cable)</b>	
Center Frequency	1575.42 MHz
Gain	30 +/-4.5dB
Noise Figure	2.0 max.
Bandwidth	2 MHz min.
Axial Ratio	3 dB max.
VSWR	1.5 max.
Output Impedance	50 ohm
<b>Environmental Conditions</b>	
Operating Temperature	-30°C to +80°C
Storage Temperature	-40°C to +100°C
Relative Humidity	40% to 95% non-condensing
Water Resistance	100% waterproof IPX7
<b>Physical Constructions</b>	
Constructions	Enclosure Center feeds TNC connector for antenna output
Dimensions	Antenna : 90.5mm(Dia.) × 108.5mm(H)
Weight	150 grams (without cable)
Standard Mounting	Concinnity and Solid design
<b>Cable &amp; Connector</b>	
RF	TNC(M)-10 meter RG58/U –BNC(M) other types (optional)
Cable Pulling strength	12Kg for 5sec.
Connector available	30CM-TNC(F) other types (optional)

\* This specification is subject to change without prior notice

Data Updated: Jan 06, 2007

**User selectable datum \*Pole mount to 1"-14 UNS threaded mast**

