

GPS Whip Active Antenna

MODEL: GA-85A

Compact & Sensitive GPS antenna with Excellent Signal Amplification for Mobile Applications



- High performance
- Out-band filtering & rejection
- Voltage: 1.5~3.1 V DC
- Provides excellent signal amplification
- 9.3(Dia.) × 52 (L) mm
- IPX6

GA-85A is the integration of a high performance GPS whip antenna and a state-of-the-art low noise amplifier into a very low profile/ extremely compact/ fully waterproof enclosure which, when connected to a GPS receiver with 1.5~3.1V DC antenna power, provides excellent signal amplification and out-band filtering & rejection, provide 1.5~3.1V input Voltage is available.

FEATURES:

- Compact Construction/ Low Profile/
- Omni-Directional Antenna Patterns
- Excellent Temperature Stability
- Low Noise Figure
- High Sensitivity

APPLICATIONS:

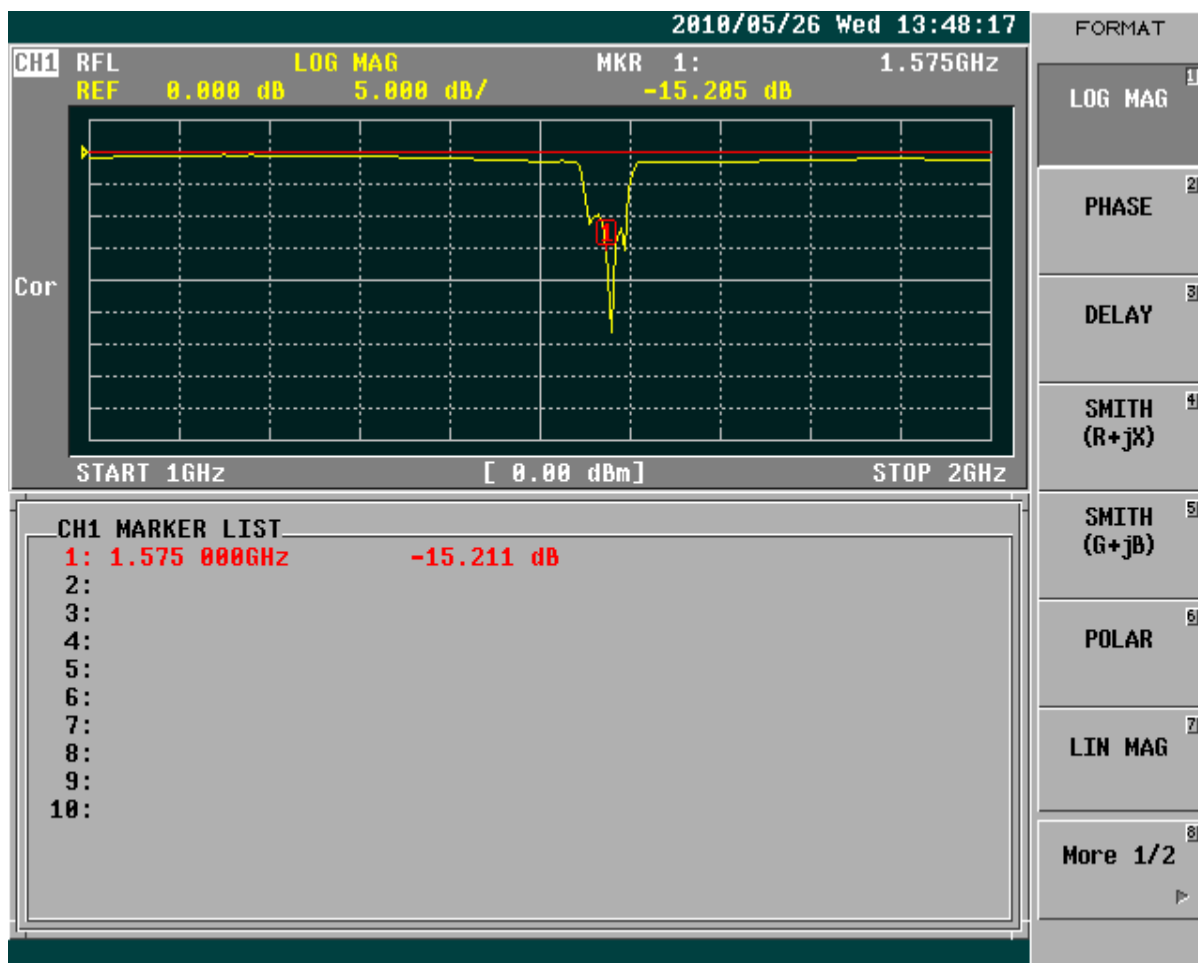
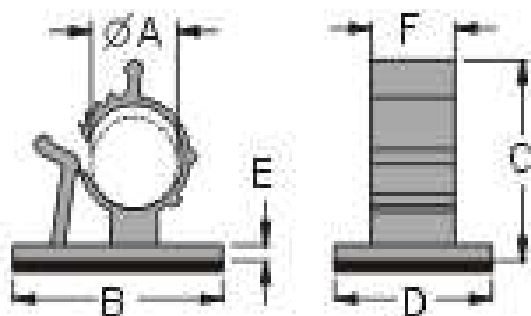
- Automobile GPS
- Bluetooth Receiver
- Car Tracking Navigation System
- AVL / Fleet Management Systems
- External Antenna for Handheld GPS
- External Antenna for PDA Navigator

SPECIFICATIONS:

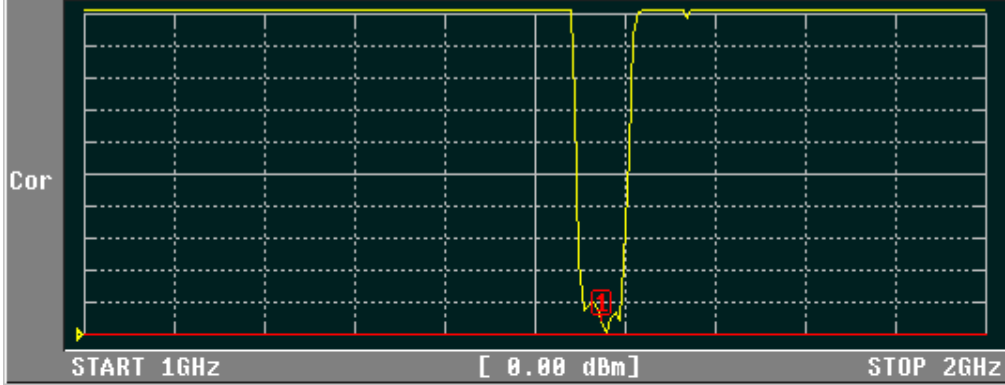
Physical Condition	
Construction	TPE rubber
Dimension	9.3(Dia.) × 52 (L) mm
Weight	2 grams
Environmental Conditions	
Operation temperature	-30°C to +80°C
Storage temperature	-30°C to +80°C
Relative Humidity	95% non-condensing
Connector	
Cable & Connector	RG174-5M-SMA / SMB / SMC / TNC / BNC / MMCX / MCX / GT5 / GT16 / HFC---

Low Noise Amplifier

Center Frequency	1575.42 MHz +/- 1.023 MHz
Gain	15+/-3dB
Bandwidth	10 MHz min. @S11$\leq -10\text{ dB}$
Noise Figure	1.5dB Typ.
Filter	25dB @ $f_0 \pm 50\text{MHz}$
	35dB @ $f_0 \pm 100\text{MHz}$
	* $f_0 = 1575.42\text{MHz}$
Supply Voltages	1.5~3.1V DC
Current Consumption	5mA
Output Impedance	50 ohm
Output VSWR	2.0 max.
Mounting	A:7.9~10.3 mm / B:25.4mm / C:22.2mm / D:19.1mm / E:1.6mm / F:10.2mm



CH1 RFL SWR MKR 1: 1.575GHz
REF 1.000 1.000 / 1.423



CH1 MARKER LIST

- 1: 1.575 000GHz 1.423
- 2:
- 3:
- 4:
- 5:
- 6:
- 7:
- 8:
- 9:
- 10:

- SWR
- REAL
- IMAG
- PHASE -∞, +∞
- LOG MAG & PHASE
- LOG MAG & DELAY
- LIN MAG & PHASE
- More 2/2

2.4G Antenna

MODEL: TH-240A



1. GENERAL DESCRIPTION

Model No
TH240A-SMA(M)

Below is a table summarizing the antenna design specification.

1.1 Electrical Properties

Parameter	Description
Frequency Band	2.4 GHz
Nominal Impedance	50 ohm
Polarization	Vertical
Return Loss	Please See Data-1
V.S.W.R	2.0 : 1
Gain	2db
Note: Gain includes the cable loss	

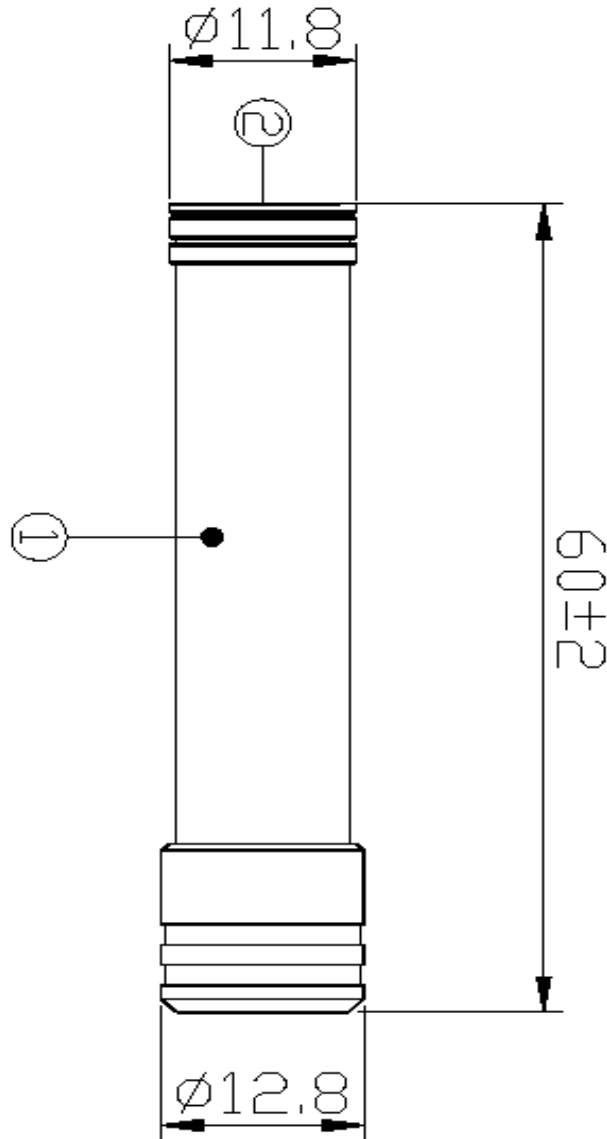
1.2 Mechanical Properties

Parameter	Description
Antenna Type	External Antenna
Antenna Material	PU
Touch Type	Screw Type
Connector Type	SMA 180°(Male)

Antenna Dimensions	60mm ±2
Antenna Color	Black
Operating Temperature Range	-20°C~+60°C
Storage Temperature Range	-30°C~+70°C

2. Appearance

NO.	NAME	FINISH	Q, TV
01	Core tube	Black	01
02	SMA male	Golden plating	01

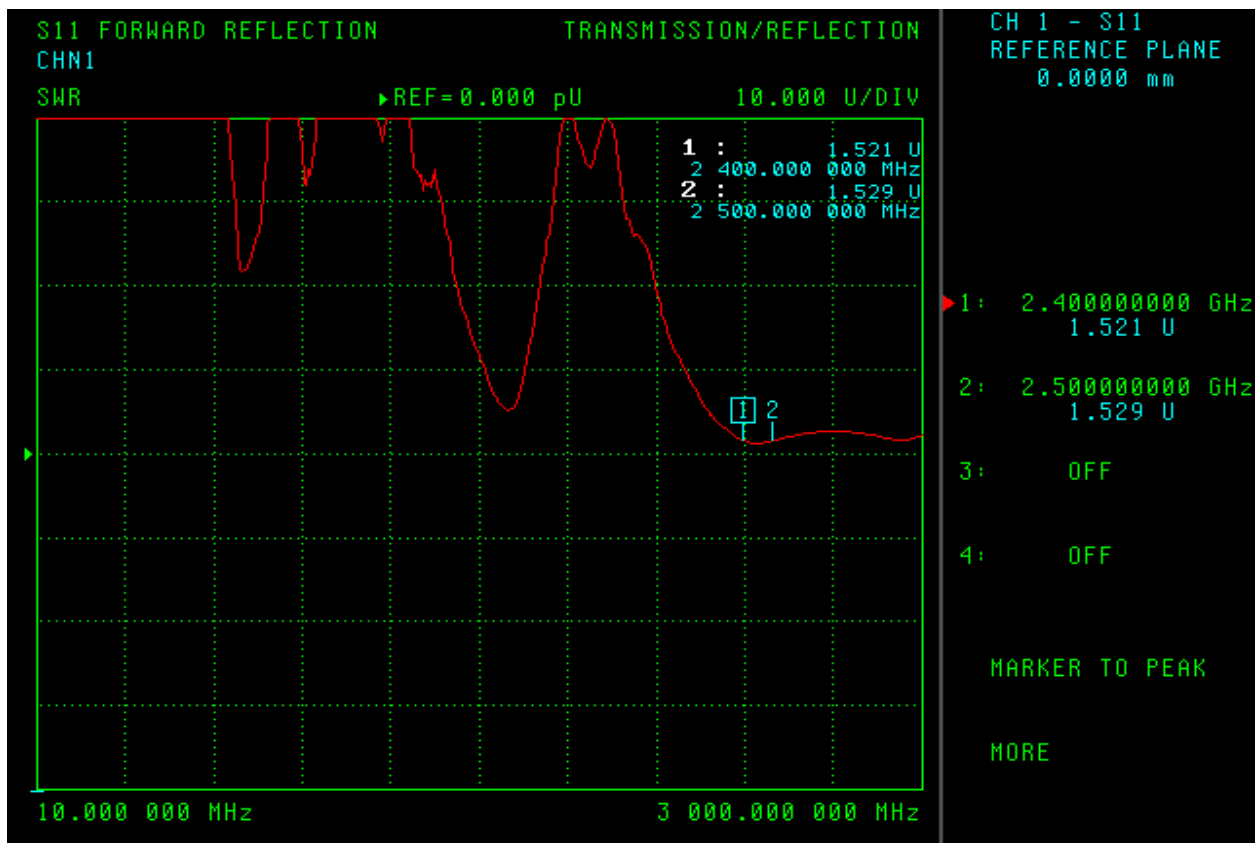
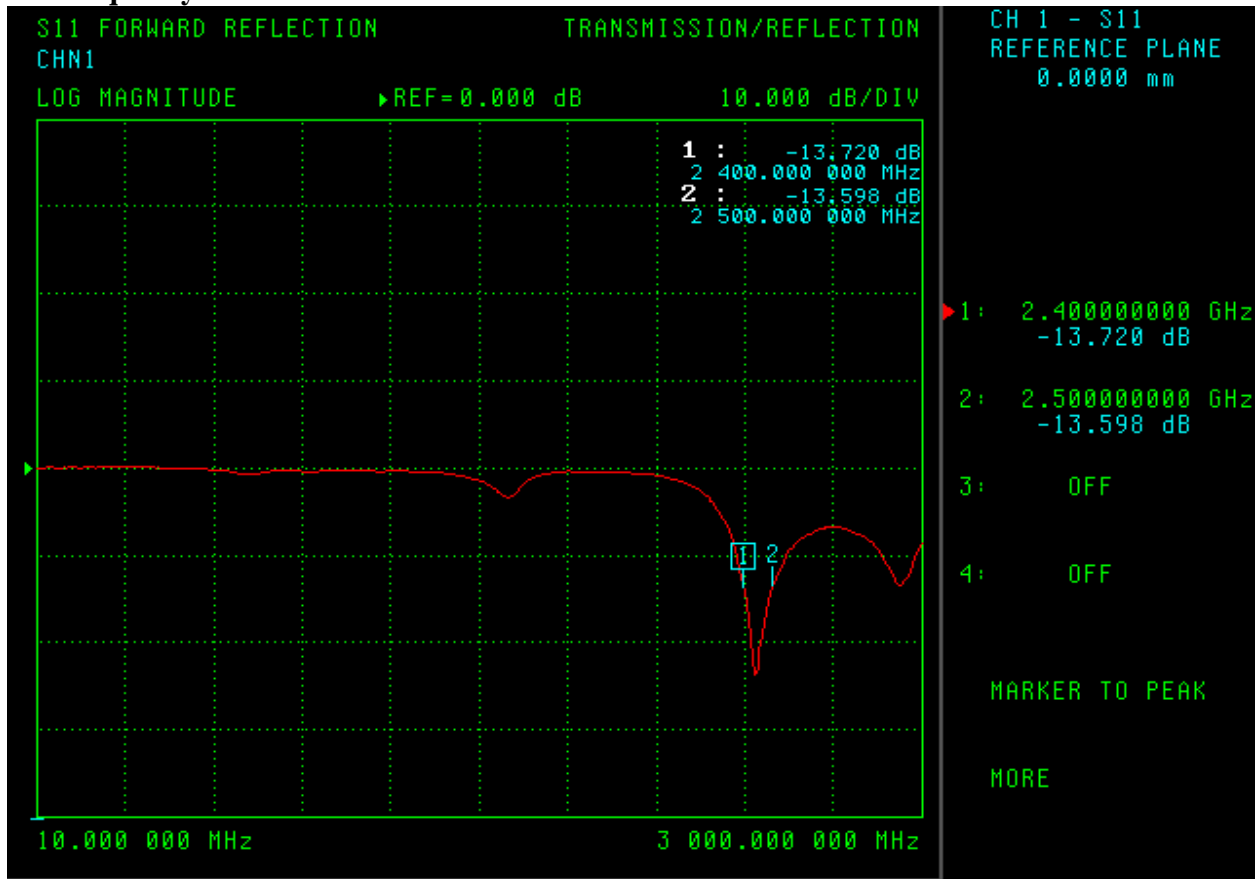


CUSTOMER'S		MODEL	PARTS NUMBER	FREQUENCY	UNIT	SCALE	DATE	VERSION
TOLERANCE		1 XX±0.15	NAME	2.4GHz	W/M		20100914	1
SURFACE ROUGHNESS		√√	APPEARANCE					



Third angle projection

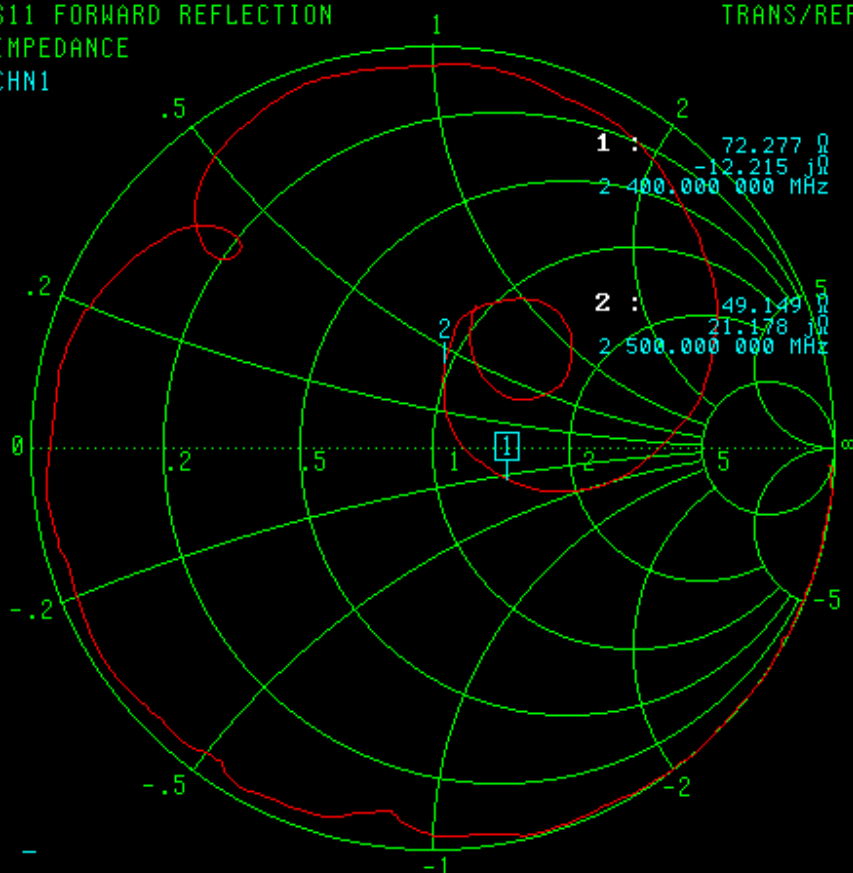
3. Frequency



S11 FORWARD REFLECTION
IMPEDANCE
CHN1

TRANS/REFL

CH 1 - S11
REFERENCE PLANE
0.0000 mm



10.000 000 MHz - 3 000.000 000 MHz

1 :
2 :

1: 2.400000000 GHz
72.277 Ω
-12.215 $j\Omega$
2: 2.500000000 GHz
49.149 Ω
21.178 $j\Omega$

3: OFF

4: OFF

MARKER TO PEAK

MORE