

## Technical Data for combined GNSS/GSM Antenna **Model : RT-O-GPSGSM-SG3**



This combined GSM/GNSS antenna offers support for **Quad-band GSM/3G** and the center frequency of the GNSS supports **GPS and GLONASS**.

The antenna is designed for outdoor installation and is IP67 protected.

## Electrical Characteristics

### Dielectric (GNSS) Antenna

Item	Specifications	Post Environmental Tolerance
Center Frequency (CF)	1595 MHz	± 3 MHz
Band Width	CF ± 5 MHz	± 1 MHz
V.S.W.R (in BW)	< 1.5	-
Gain (Zenith)	5 dBic	± 0.5 dB
Polarization	RHCP	-
Impedance	50 Ω	-

### GSM Antenna

Item	Specifications	Post Environmental Tolerance
Frequency range	824 MHz ~ 960 MHz / 1710 MHz ~ 2170 MHz	-
V.S.W.R (5m)	< 2.0	-
Gain (Zenith)	2 dBi	-
Impedance	50 Ω	-
Polarization	Linear	-

### LNA/Filter

Item	Specifications	Post Environmental Tolerance
Gain	28 ± 2 dB	± 2 dB
Noise Figure	< 1.5 dB	-
V.S.W.R	< 2.0	-
Ex-band Out Band Attenuation	12 dB CF + 50 MHz 16 dB CF - 50 MHz	± 1 dB
DC Voltage	2.2 ~ 5 V	
DC Current	5 ~ 15 mA	

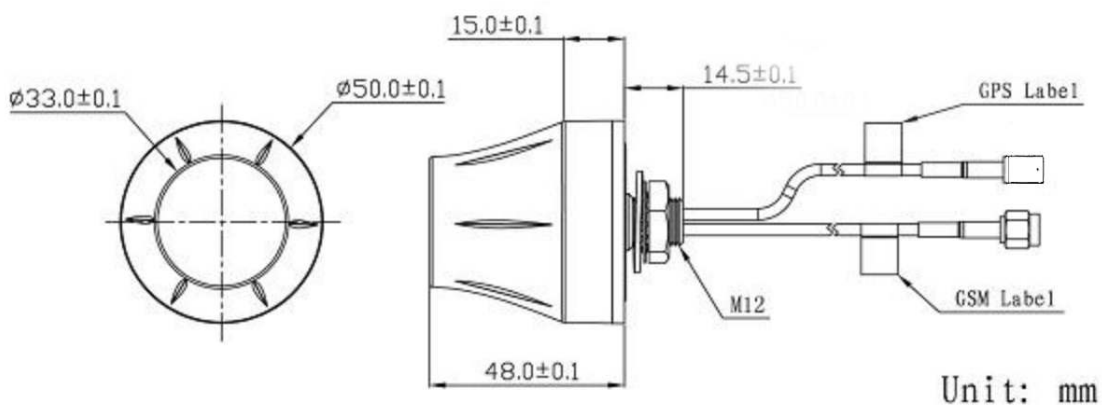
**Mechanical Specifications**

Item	Specifications
Cable	RG174 5 m
Material	ABS
Connector	SMA male for GNSS / SMA male for GSM
Plastic Housing	Black.
Mounting	M12 screw hole

**Environmental Specifications**

Item	Specifications
Ingress Protection	IP67 (exclude cable outlet)
Relative Humidity Range	Up to 95 % RH
Operating Temperature Range	-40 °C ~ +85 °C
Vibration	10 to 55 Hz with 1.5 mm amplitude 2 hours
Environmentally Friendly	ROHS Compliant

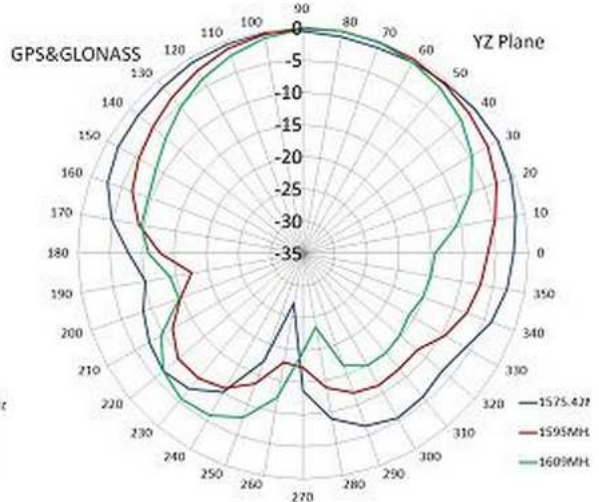
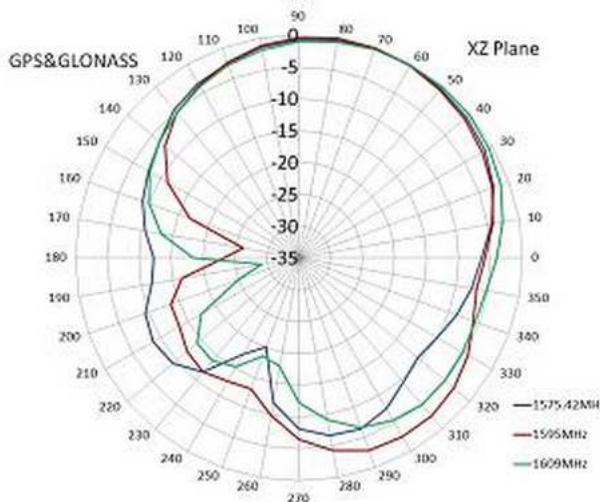
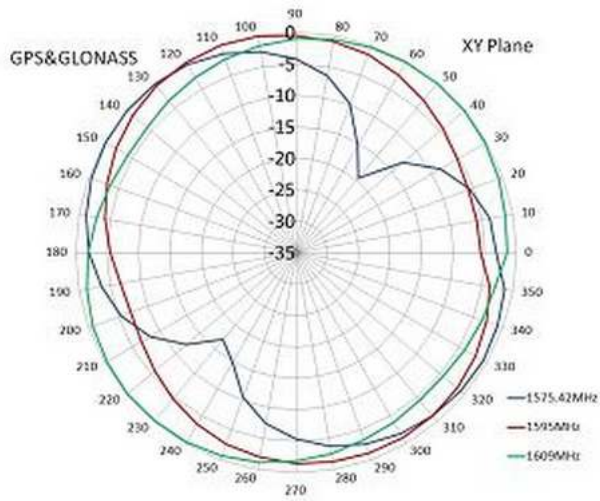
**Dimensions (Unit : mm)**



**Installation:**

The plastic top must face the sky with the cable entry protected for water/moisture. Designed for outdoor use.

**Radiation Pattern:**  
GNSS Antenna



### GSM Antenna

