



# Technical Specifications SM-19 Antenna

## Mechanical Data:

Size in mm (LxWxH)	58 x 48 x 15
Weight	65gram without cable
Cabel	3m RG174/U Standard, other length on request
Pulling Strength	6kg for 5 sec. With molded plastics on connector end for strain relief
Connector available	MMCX(m) Standard. BNC, TNC, FME (to be adapted), GT5, MCX (OSX), SMA, SMB or SMC in straight or right angle type
Mounting	magnetic & screw mount

## Environmental Conditions:

Operating Temp.	-40°C ~ + 85°C
Storage Temp.	-40°C ~ + 85°C
Relative Humidity	95% non-condensing
Water resistance	100% Waterproof

## Antenna Element:

Center Frequency	1575.42 +/- 1.023 MHz
Polarization	R.H.C.P:
Absolute Gain	+ 5dBi typical
Gain @ 10° Elevation	-1 dBi typical
Axel Ratio	3 dB max
Output VSWR	1.5 max
Output Impedance	50Ω

## Low Noise Amplifier:

Center Frequency	1575.42 ~ +/- 1.023 MHz
Power Gain	14 dB typical
Bandwidth	2 MHz min
Noise Figure	1.7 max
Outer Band Attenuation	12dB @ FO +/- 140MHz
Supply Voltages	+2.5 ~ +5.0 V DC
Current Consumption	5.5mA +/- 1mA at 3.3V.
Output Impedance	50 Ω

## Overall Performance:

(Antenna element, LNA & Coax cable)	
Center Frequency	1575.42 +/- 1.023 MHz
Gain	14 dB min
Noise Figure	2.0 max
Axel Ratio	3 dB max.
Bandwidth	2 MHz min.
VSWR	2.0 max
Output Impedance	50Ω

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