



GNSS Antennas

THA-7609A

Low-profile Drone Antenna

THA-7609A Helix Antenna

The THA-7609A Helix Antenna is a high performance GNSS antenna designed for high precision positioning service and offers superior satellite signal tracking, including GPS, GLONASS, GALILEO, BDS, as well as L-Band correction service. It could be used for applications as surveying and mapping, and various UAVs operations as aerial photography, remote sensing, infrastructure inspection, traffic control, and public security.

SPECIFICATION

SIGNAL TRACKING	
GPS	L1/L2/L5
GLONASS	L1/L2
GALILEO	E1/E5a/E5b
BDS	B1/B2/B3
OZSS	L1/L2/L5/L6
SBAS	L1/L5
IRNSS	L5

LNA FEATURE	
Nominal Impedance	50Ω
Polarization	RHCP
Axial Ratio	≤ 3dB
Gain RHCP (maximum)	1166-1278MHz 2.6dBi (@Zenith) 1559-1612MHz 2.8dBi (@Zenith) L-Band 1.5dBi (@Zenith)
Azimuth Coverage	360° (Omni-directional)
LNA Gain	33dB ± 2dB
Noise Figure	≤ 2dB
Output/Input VSWR	≤ 2.0

Operation Voltage	+3.3V to +5V DC
Out of Band Rejection	Upper Band: <1400MHz>30dB <1450MHz>33dB <1700MHz>30dB Lower Band: <1000MHz>41dB <1100MHz>40dB <1130MHz>28dB
Operation Current	55mA
Group Delay Ripple	≤ 5ns

MECHANICAL	
Dimensions	φ43.6*40.8mm
Connector	SMA-J
Weight	≤30.5g
Mounting	3-NO.3-48UNC screws fixed

ENVIRONMENTAL	
Operating Temperature	-40℃ to +70℃
Storage Temperature	-55℃ to +70℃
Humidity	95% non-condensing
Protection	IP67

