



New 2-Port (Active L1 GPS) & (Active Rx-Thuraya) Antenna: P/N: 3GL1RxT-AA-XTT-1
 New 2-Port (Active Rx-Thuraya) & Passive Iridium/Inmarsat Antenna: P/N: 3GRxTRxTxIR-AP-XTT-1
 3.5" Diameter, Flat, Back Mount, Bottom Connector Configuration
 2.6in Dia., Mini-Arinc, & Arinc-743 Versions are also available

FAA Approved Facility

Antenna Mounts/Adapters: <http://www.antcom.com/documents/catalogs/PeripheralAntennaProducts2.pdf>



FAA Approved
TSO Antennas



ANTCOM CORPORATION . 367 Van Ness Way, Suite 602 . Torrance, CA 90501 . Tel: (310) 782-1076 . Fax: (310) 782-1086 . E-mail: antennas@antcom.com . <http://www.antcom.com>

NOTICE OF PROPRIETARY RIGHTS
THIS DOCUMENT CONTAINS PROPRIETARY, TECHNICAL DATA INCLUDING TRADE SECRET INFORMATION IS ANTCOM CORP. DESIGN OR HAS BEEN DEVELOPED BY ANTCOM CORP. YOUR RIGHTS IN THIS USE IS LIMITED TO USE WITH YOUR COMPANY ONLY AND DOES NOT INCLUDE MANUFACTURE OR REPRODUCTION. ANY OTHER USE IS EXPRESSLY PROHIBITED WITHOUT PRIOR WRITTEN CONSENT OF ANTCOM CORP.

REVISIONS

ZONE	REV	DESCRIPTION	DATE	APPROVED
A	REVISED	TOLERANCE DIMS	06/03/14	S.H.
B	THURAYA:	XXXXX ± 18) MHz	12/08/16	S.H.

ELECTRICAL:

	Rx-Thuraya (LHCP), or Rx Inmarsat OmniStar, L6 Galileo, B1 Compass (RHCP)	L1 GPS, E1, E2 Galileo, L1 IRNSS (RHCP)	IRIDIUM, L1 GLONASS (RHCP) or Tx-Globalstar (LHCP)	Tx-Thuraya (LHCP) or Tx-Inmarsat (RHCP)
FREQUENCY:	(1542.5 ± 18) MHz	(1575 ± 17) MHz	(1609 -1626) MHz	(1642.5 ± 18) MHz
RADIATION PATTERN:	HEMISPHERICAL			
VSWR:	< 2.0:1	< 2.0:1	< 2.0:1	< 2.0:1
IMPEDANCE:	50 ohms	50 ohms	50 ohms	50 ohms
ANTENNA GAIN (dBic):	Free Space 4 ft G.P.	Free Space 4 ft G.P.	Free Space 4 ft G.P.	Free Space 4 ft G.P.
@ 90 ° (ZENITH):	+ 2.5 + 1.6 + 3.7 - 1.5 + 3.0 - 0.5 + 3.4 + 0.5			
@ 10 ° Elevation:	- 4.7 - 2.4 - 3.5 - 3.5 - 4.5 - 4.0 - 3.8 - 3.3			
@ 20 ° Elevation:	- 3.8 + 0.7 - 2.6 - 0.9 - 3.3 - 1.2 - 2.7 - 0.6			
@ 30 ° Elevation:	- 2.1 + 2.3 - 0.9 + 0.3 - 1.5 - 0.3 - 1.0 - 0.1			
@ 60 - 90 ° Elevation:	> + 1.0 > + 2.1 > + 2.3 > 0 > + 1.8 > + 2.2 > - 1.5			
BEAM WIDTH (3dB):	90 Deg.	140 Deg.	85 Deg.	140 Deg.
AXIAL RATIO:	3 dB			
LIGHTNING PROTECTION:	DC GROUNDING			
LNA OPTION:	33 dB Gain			
LNA NOISE FIGURE:	3.0 dB			
LNA P1dB Out:	+13 dBm			
LNA DC POWER:	2.5V/20mA, 3V/29mA, 3.3V/35mA, (2.5-24)V/<50mA			
REJECTION @ (-50/+50) MHz	-40 dB / -40 dB			
@ (-100/+100) MHz	< -65 dB			
POWER HANDLING:	100 Watts CW (WITHOUT LNA) , 1 Watt CW (WITH LNA)			

ENVIRONMENTAL:

TEMPERATURE: -67 °F TO +185 °F [-55 °C TO +85 °C]
 ALTITUDE: 70,000 ft.
 VIBRATION: > 30 G's
 LEAKAGE: HERMETICALLY SEALED

FEDERAL & MILITARY SPECIFICATIONS:

FAA TSO-C144, DO-160D, D0-228, MIL-C-5541, MIL-E-5400, MIL-I-45208A, MIL-STD-810, AND SAE J1455

ACCEPTANCE TEST PROCEDURE: ATP-GPS-L1L2-100

SIZE: DIAMETER: 3.515in [89.28]mm
 HEIGHT: 0.895in [22.73]mm

WEIGHT: 9.2 oz. (261g)

FINISH: SKYDROL RESISTANT POLYURETHANE ENAMEL
 BASE IRIDITE PER MIL-C-5541F

MATERIAL: 6061-T6 ALUMINUM ALLOY BASE
 COMPOSITE RADOME, IMPACT, ABRASION, UV, SOLVENT, SKYDROL RESISTANCE, AND FIRE RETARDANT

CONNECTOR: TNC FEMALE
 (OPTION: SMA, TNC, TNC Bulkhead, N, N Bulkhead, MCX, MMCX, SMP, BNC, or Cable)

ENVIRONMENTAL:

TEMPERATURE: -67 °F TO +185 °F [-55 °C TO +85 °C]
 ALTITUDE: 70,000 ft.
 VIBRATION: > 30 G's
 LEAKAGE: HERMETICALLY SEALED

FEDERAL & MILITARY SPECIFICATIONS:

FAA TSO-C144, DO-160D, D0-228, MIL-C-5541, MIL-E-5400, MIL-I-45208A, MIL-STD-810, AND SAE J1455

ACCEPTANCE TEST PROCEDURE: ATP-GPS-L1L2-100

SIZE:

SIZE:	FREQ. BAND:	LNA:
1: 2" SQ.	RxTxT: RxTx-Thuraya; RxTxIR: Rx-Thuraya & Rx-Iridium/L1-GPS	A: WITH 33dB LNA
1.8: 1.8" SQ.	L1RxT: L1-GPS & Rx-Thuraya; L1RxIR: L1-GPS & Rx-Iridium	A2: WITH 22dB LNA
2: 2.6" DIA.	L1RxTxT: L1-GPS & RxTx-Thuraya; L1L2RxTxT: L1L2-GPS & RxTx-Thuraya	P: WITHOUT LNA
3: 3.5" DIA.	L1RxTxIR: L1-GPS & RxTx-Iridium; L1L2RxTxIR: L1L2-GPS & RxTx-Iridium	
4: MINI ARINC, 42; ARINC 743	L1RxTxTIR: L1-GPS & RxTx-Thuraya & RxTx-Iridium/Inmarsat	

QUANTITY REQUIRED:

DESCRIPTION	PARTS LIST	FINISH	REQ.
4 MOUNTING SCREWS: 10-32, 1", Item 579	J507C1032R16	-	3
4 WASHER, CUSTOM C'SINK	3G15P1001-6	-	2
1 GASKET	3G15P1001-3G	-	1

UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES FRACTIONS TOLERANCE ARE ANGLES ± 1/64 .002 .010 ± .1°

TOLERANCE SURF PER AMS Y14.5

REMOVE ALL BURRS	SMOOTH EXTERNAL EDGES .005 TO .015	SMOOTH INTERNAL EDGES PER MIL-C-8878	SMOOTH SURFACES TO .005
1: GLOSS WHITE #17925 PER FED-STD-595B	2: LUSTERLESS GRAY #36320 PER FED-STD-595B	3: OLIVE DRAB GREEN #34031 PER FED-STD-595B	4: LUSTERLESS BLACK #37038 PER FED-STD-595B

DO NOT SCALE DRAWING

ANTCOM CORP. TORRANCE, CALIFORNIA

3.5" Dia., Active L1-GPS & Active Rx-Thuraya ANTENNA

DATE: 03/01/14
 DESIGNED BY: S. HUYNH
 CHECKED BY: S. HUYNH
 APPROVED BY: P. IRAN
 DATE: 02/14/14

DATE: 03/01/14
 DESIGNED BY: S. HUYNH
 CHECKED BY: S. HUYNH
 APPROVED BY: S. HUYNH

SCALE: 1/1 SHEET 1 OF 1

P/N: 3GL1RxT-AA-XTT-1

2. MOUNTING SCREWS & ADHESIVE GASKET ARE SUPPLIED BY ANTCOM

1. DIMENSIONS IN BRACKETS ARE IN MILLIMETERS [mm]

NOTES: UNLESS OTHERWISE SPECIFIED:

CABLE'S LENGTH:	Connector:	COLOR:
X: NO CABLE	S: SMA; B: BNC	-1: GLOSS WHITE #17925 PER FED-STD-595B
M: MAG, N: No Mag,	M: MCX; MM: MMCX	-2: LUSTERLESS GRAY #36320 PER FED-STD-595B
IR: CABLE LENGTH (IN)	N: N; NB: N-Bulkhead	-3: OLIVE DRAB GREEN #34031 PER FED-STD-595B
R: RIGHT ANGLE CON.	T: TNC; TB: TNC-Bulkhead	-4: LUSTERLESS BLACK #37038 PER FED-STD-595B