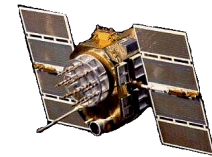




Active or passive L1/L2 GPS Antenna, P/N: 4G1215A-XNT-1

(3.4" x 2.2") Mini Arinc Configurations



ISO 9001:2008/FAA Approved Facility

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

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

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4xR.50 [R12.70]
2xR1.75 [R44.45]

3.40 [86.36]
2.00 [50.80]
2.20 [55.88]
1.60 [40.64]

4x ϕ .14 [ϕ 3.56] Thru
 ϕ .31 [7.9] x .82"
✓ for 6-32 Mounting Screws

Spherical R6.00 [R152.40]
R.375 [R9.53] (BLEND)

1.01 [25.73]
0.25" [6.37] (MCX/MMCX),
0.46" [11.68] (SMA/R-SMA),
0.57" [14.53] (TNC), 0.83" [21.00] (TNC-BH),
0.72" [18.29] (N, N-BH)

0.30 [7.62]
TNC FEMALE CONNECTOR
(OPTION: SMA, TNC Bulkhead, N, N Bulkhead, MCX, MMCX, or Cable)
Clearance Hole: 0.4" Dia.
for SMA, MCX, & MMCX Con.
0.52" Dia. for TNC Con.
0.63" Dia. for N Con.

O-Ring

NAMEPLATE APPROXIMATE LOCATION

SIZE: FREQ. BAND LNA:
1. 2" SQ 1215: L1/L2 A: with +33dB LNA; A2: with 20 dB LNA; A27: with +27 dB LNA
1.9: 1.9" SQ 15: L1 ONLY A4: with +40 dB LNA; AL: WITH LNA/LIMITER
2. 2.6" DIA. P: WITHOUT LNA
3. 3.5" DIA. PL: WITHOUT LNA AND THINNER (HEIGHT = 0.61")
4. MINI ARINC

CABLES LENGTH: CONNCTOR: COLOR:
X: NO CABLE. S: SMA; RS: R-SMA; P: PINS -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
: CABLE LENGTH (IN) N, NB: N, N-Bulkhead -3: OLIVE DRAB GREEN #34031 PER FED-STD-595B
R: RIGHT ANGLE CON. T, TB: TNC, TNC-Bulkhead -4: LUSTERLESS BLACK #37038 PER FED-STD-595B

NOTES: UNLESS OTHERWISE SPECIFIED:
1. DIMENSIONS IN BRACKETS ARE IN MILLIMETERS [mm]
2. O-RING, AND MOUNTING SCREWS ARE SUPPLIED BY ANTCOM CORPORATION

SPECIFICATIONS

ELECTRICAL:

	L1: (1575.42 ±12) MHz			L2: (1227.60 ±12) MHz		
FREQUENCY:						
RADIATION PATTERN:	HEMISPHERICAL					
POLARIZATION:	RHCP			RHCP		
VSWR:	< 1.5:1			< 1.5:1		
IMPEDANCE:	50 ohms			50 ohms		
ANTENNA GAIN (dBic):	Free Space	16 in G.P.	4 ft G.P.	Free Space	16 in G.P.	4 ft G.P.
@ 90° (ZENITH):	+4.6	+0.3	+2.9	+1.8	+1.9	+5.3
@ 10° Elevation:	-2.5	-3.1	-1.8	-4.2	-3.1	-2.3
@ 20° Elevation:	-1.1	-1.1	+0.7	-2.9	-1.1	+0.4
@ 30° Elevation:	+0.5	+0.9	+1.7	-2.0	+0.5	+2.3
@ 60 - 90° Elevation:	> 3.6	+3.1/+0.3	> 2.1	> 0.9	+3.1/+1.9	> 3.2
BEAM WIDTH (3dB):	103 Deg.	120 Deg.	146 Deg.	108 Deg.	120 Deg.	74 Deg.
AXIAL RATIO:	2 dB			2 dB		
LIGHTNING PROTECTION:	DC GROUNDING					
LNA GAIN:	33 dB			35 dB		
LNA NOISE FIGURE:	3.0 dB			3.0 dB		
LNA P1dB Out:	+13 dBm			+13 dBm		
LNA DC POWER:	2.5V/20mA, 3V/29mA, 3.3V/35mA, (2.5-24)V/<50mA					
REJECTION @ (-50/+50) MHz	-41 dB / -59 dB			-40 dB / -40 dB		
@ (-100/+100) MHz	< -65 dB			< -65 dB		
POWER HANDLING:	1 Watt CW, Optional: 10 Watts 1 Microsec Pulse (-AL-)					

MECHANICAL:

SIZE: WIDTH: 2.20 in. [55.88 mm], LENGTH 3.40 in. [86.36 mm], HEIGHT: 1.01 in. [25.65 mm], 0.90" [22.86mm] (Optional for Passive)

WEIGHT: 8.03 oz. (227 g)

FINISH: SKYDROL RESISTANT POLYURETHANE ENAMEL BASE IRIDITE PER MIL-C-5441

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

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

ENVIRONMENTAL:

TEMPERATURE: -67 °F TO +185 °F [-55 °C TO +85 °C]

ALTITUDE: 70,000 ft.

VIBRATION: > 30 G's

LEAKAGE: HERMETICALLY SEAL

FEDERAL & MILITARY SPECIFICATIONS:

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

QTY	DESCRIPTION	PART NO	FINISH	REV
4	MOUNTING SCREWS for -PL- ONLY: (6-32, 3/4")	91500A151	-	5
4	MOUNTING SCREW: (6-32, 1")	91500A153	-	4
				3
1	O-RING	2-031/N756-75	-	1

QUANTITY REQUIRED

QTY	DESCRIPTION	PART NO	FINISH	REV
4	MOUNTING SCREWS for -PL- ONLY: (6-32, 3/4")	91500A151	-	5
4	MOUNTING SCREW: (6-32, 1")	91500A153	-	4
				3
1	O-RING	2-031/N756-75	-	1

PARTS LIST

UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES FRACTIONS DECIMALS ANGLES ± 1/64 .005 .005 ± 1°

TOLERANCE .5MM PER ANG Y14.5 REMOVE ALL BURRS BREAK EXTERNAL EDGES .005 TO .010 FILLER IS .005 TO .010 SOLDER FINISHES PER MIL-STD-883C DIA'S ON A COMMON E-20005 MACHINED SURFACES 125

DO NOT SCALE DRAWING

ANTCOM CORP. TORRANCE CALIFORNIA
OUTLINE DRAWING
L1/L2 ACTIVE, OR PASSIVE
GPS ANTENNA
D 13CVE1 4G1215A-XNT-1
SCALE 1/1 SHEET 1 OF 1

NMO Connector Option is Now Available for Some Antennas