

Fig. 1: 2-Axis Adjustable Mast Bracket BOM

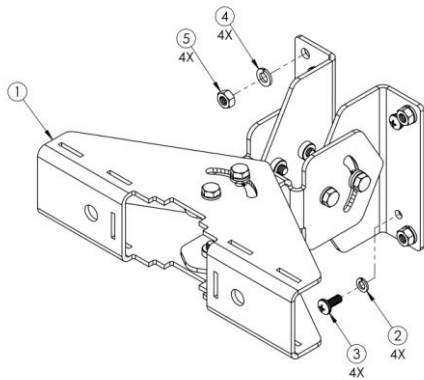


Fig. 2: 2-Axis Adjustable Mast Bracket Shown With Horizontal Alignment at 0°

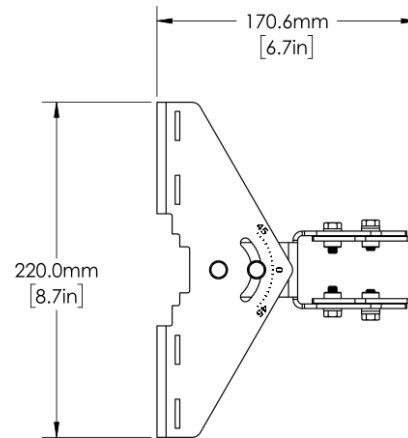
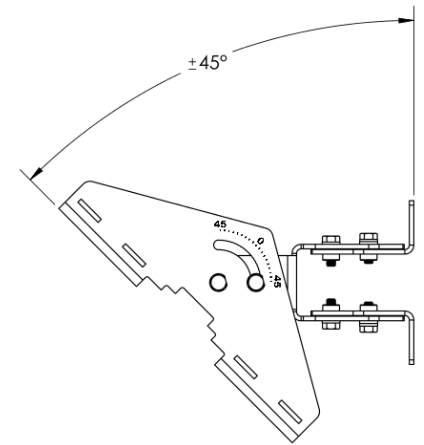


Fig. 3: 2-Axis Adjustable Mast Bracket Shown With Horizontal Alignment at 45°



ITEM	QTY	DESCRIPTION
1	1	ANTENNA MAST BRACKET, ADJUSTABLE, METRIC, MBK-14
2	4	WASHER, M5, SPLT LK, SS
3	4	SCREW, PPH, M5-0.8 X 12L, DIN 127B SS
4	4	WASHER, M6, SPLT LK, STEEL
5	4	NUT, HEX, M6x1, DIN 934, CLASS 8, STEEL

Step Task

- 1 The 2-Axis Adjustable Mast Bracket can be wall mounted (using appropriate M10 hardware or equivalent, supplied by the customer), or it can be pole mounted using the MBC-07 Mast Bracket Clamp with U-Bolt hardware or strapping/banding for metal poles (strap mounts). Note that the U-Bolt hardware or strapping is to be supplied by the customer. See Fig. 1 for the 2-Axis Adjustable Mast Bracket BOM. Refer to Antenna Installation Guide. See Fig. 8 for mounting using M6 hardware, and Fig. 9 (backwards compatibility with MBK-08) for mounting using M5 hardware. .

Step Task

- 2 The 2-Axis Adjustable Mast Bracket is shown with horizontal alignment at 0° mechanical tilt in Fig. 2, and 45° mechanical tilt in Fig. 3.

DISCLAIMER:

The installation, maintenance, or removal of an antenna requires qualified, experienced personnel. You must refer to the appropriate local safety codes and ensure proper electrical and electromagnetic compatibility before proceeding with the installation. All local codes shall take precedence over information in this document. Antenna systems should be inspected once a year by qualified personnel to verify proper installation, maintenance, and condition of equipment. Communication Components Antennas Inc. disclaims any liability or responsibility for the results of improper or unsafe installation.

Fig. 4: 2-Axis Adjustable Mast Bracket Shown With Vertical Alignment at 45°

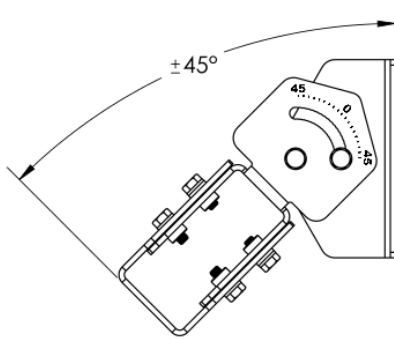


Fig. 5: 1-Axis Adjustable Mast Bracket Shown (After 2- Axis Hardware Has Been Removed)

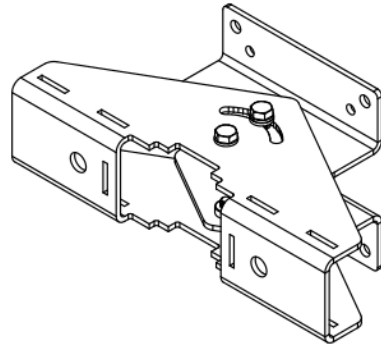


Fig. 6: 1-Axis Adjustable Mast Bracket Shown With Horizontal Alignment at 0°

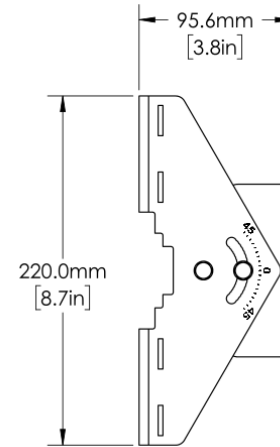
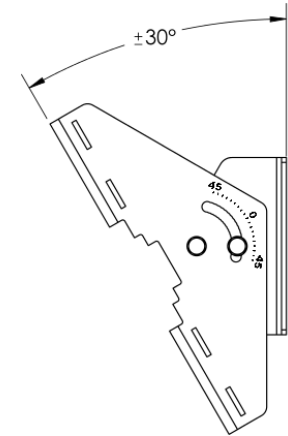


Fig. 7: 1-Axis Adjustable Mast Bracket Shown With Horizontal Alignment at 30°



Step Task

- 3 The 2-Axis Adjustable Mast Bracket is shown with vertical alignment at 45° mechanical tilt in Fig. 4.

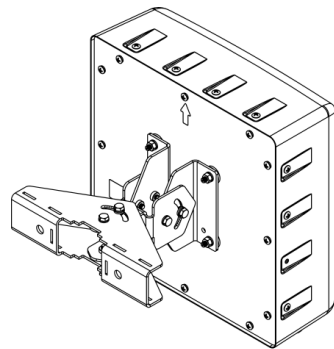
Step Task

- 4 If only 1-axis adjustment is required, remove the hardware for the 2-axis Adjustable Mast Bracket and reassemble as shown in Fig. 5, in order to make the 1-Axis Adjustable Mast Bracket. Note that when the antenna is mounted using the 1-Axis Adjustable Mast Bracket, it can only be adjusted for $\pm 30^\circ$ alignment due to proximity of the antenna surface it is to be mounted on.
- 5 The 1-Axis Adjustable Mast Bracket is shown with horizontal alignment at 0° in Fig. 6, and 30° mechanical tilt in Fig. 7.

DISCLAIMER:

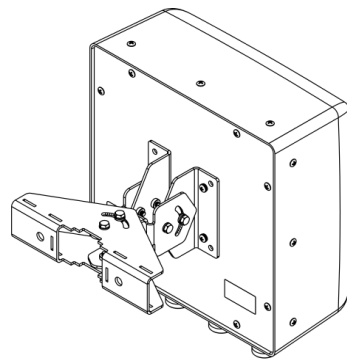
The installation, maintenance, or removal of an antenna requires qualified, experienced personnel. You must refer to the appropriate local safety codes and ensure proper electrical and electromagnetic compatibility before proceeding with the installation. All local codes shall take precedence over information in this document. Antenna systems should be inspected once a year by qualified personnel to verify proper installation, maintenance, and condition of equipment. Communication Components Antennas Inc. disclaims any liability or responsibility for the results of improper or unsafe installation.

Fig. 8: 2-Axis Adjustable Mast Bracket Mounted on Antenna with M6 HW



M6 HARDWARE
SQ 90.8MM BOLT PATTERN

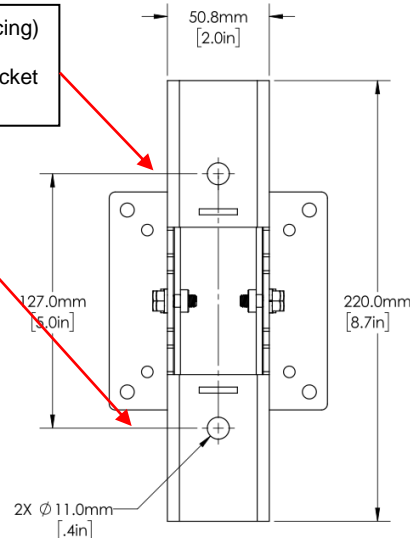
Fig. 9: 2-Axis Adjustable Mast Bracket Mounted on Antenna with M5 HW



M5 HARDWARE
SQ 70.8 MM BOLT PATTERN
BACK COMPATIBLE WITH MBK-08

Fig. 10: Wall Mounting Pattern Using Adjustable Mast Bracket MBK-08

Use the (5.0 in. spacing) holes in the MBK-14 Adjustable Mast Bracket as a template.



Step Task

- 6 When using M6 hardware for mounting, assemble the Adjustable Mast Bracket to the antenna, and torque the M6 hardware to 8.0 N·m (5.8 ft-lbs). See Fig. 8 for a view of the 2-Axis Adjustable Mast Bracket mounted on the antenna.
- 7 When using M5 hardware for mounting, assemble the Adjustable Mast Bracket to the antenna, and torque the M5 hardware to 2.5 N·m (1.8 ft-lbs). See Fig. 9 for a view of the 2-Axis Adjustable Mast Bracket mounted on the antenna.

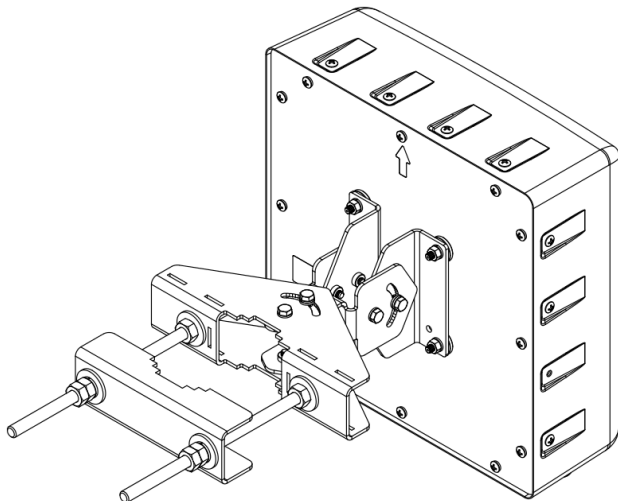
Step Task

- 8 If wall mounting the antenna, use the rear of the 2-Axis Adjustable Mast Bracket as a template for the wall mounting pattern as shown in Fig. 10. Follow steps 5 and 6 if the 1-Axis Adjustable Mast Bracket is desired.
- 9 Lift the antenna up to the wall mounting location to continue assembly. Mount the antenna with the Adjustable Mast Bracket to the wall using the M10 or equivalent hardware (supplied by the customer). Secure the antenna and Adjustable Mast Bracket to the wall and torque all mounting fasteners to the appropriate value for the mounting hardware utilized.

DISCLAIMER:

The installation, maintenance, or removal of an antenna requires qualified, experienced personnel. You must refer to the appropriate local safety codes and ensure proper electrical and electromagnetic compatibility before proceeding with the installation. All local codes shall take precedence over information in this document. Antenna systems should be inspected once a year by qualified personnel to verify proper installation, maintenance, and condition of equipment. Communication Components Antennas Inc. disclaims any liability or responsibility for the results of improper or unsafe installation.

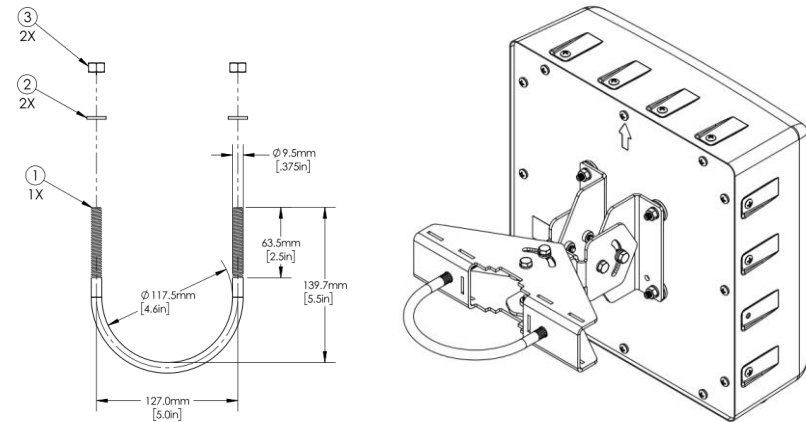
Fig. 11: Antenna Mounted on Vertical Mast When Using Bracket Clamp MBC-07



Step Task

- 9 If pole mounting the 2-Axis Adjustable Mast Bracket, the optional MBC-07 Mast Bracket Clamp can be utilized as shown in Fig. 11 to mount the Adjustable Mast Bracket on a 2" to 4.5" mast. Additionally, U-Bolt hardware or strap mounts (supplied by the customer) can be utilized to mount the Adjustable Mast Bracket on a mast.
- 10 When mounting the antenna to a mast while using the optional MBC-07 Mast Bracket Clamp, lift the antenna up to the mast location to continue assembly. Mount the antenna with the Adjustable Mast Bracket to the mast using the M10 hardware supplied with the Mast Bracket Clamp MBC-07. Secure the antenna and Adjustable Mast Bracket to the mast and torque all mounting fasteners to 20 N·m (15 ft-lbs).

Fig. 12: Antenna Mounted on Vertical Mast Using U-Bolt BOM



ITEM	QTY	DESCRIPTION
1	1	U-BOLT, 3/8"-16 X 2 1/2" THREAD LENGTH, 4 5/8" ID, 5 1/2" H, STEEL, ROHS HOT DIP GALV
2	2	NUT, HEX, 3/8"-16, STEEL, ROHS HOT DIP GALV
3	2	WAHSER, 3/8, SPLT LK, STEEL, ROHS HOT DIP GALV

Step Task

- 11 The optional U-Bolt hardware (supplied by the customer) can be utilized as shown in Fig. 12 to mount the Adjustable Mast Bracket on a 4" mast. See Fig. 12 for the U-Bolt Configuration BOM.
- 12 When mounting the antenna to a mast while using the optional U-Bolt configuration, lift the antenna up to the mast location to continue assembly. Mount the antenna with the Adjustable Mast Bracket to the mast using appropriate 3/8" U-Bolt hardware or equivalent (supplied by the customer). Secure the antenna and Adjustable Mast Bracket to the mast and torque all mounting fasteners to the appropriate value for the mounting hardware utilized.

DISCLAIMER:

The installation, maintenance, or removal of an antenna requires qualified, experienced personnel. You must refer to the appropriate local safety codes and ensure proper electrical and electromagnetic compatibility before proceeding with the installation. All local codes shall take precedence over information in this document. Antenna systems should be inspected once a year by qualified personnel to verify proper installation, maintenance, and condition of equipment. Communication Components Antennas Inc. disclaims any liability or responsibility for the results of improper or unsafe installation.

Fig. 13: Antenna Mounted on Vertical Mast When Using Strap Mounts

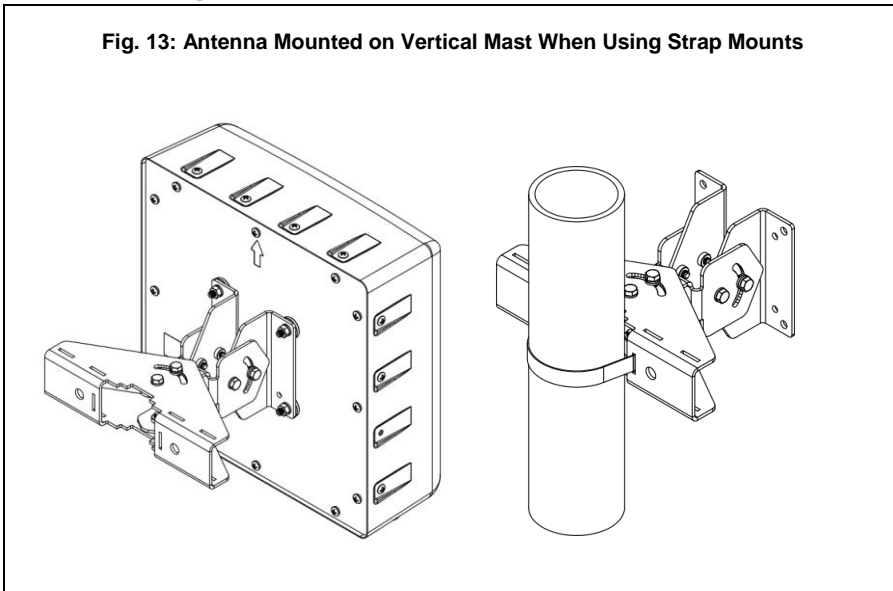
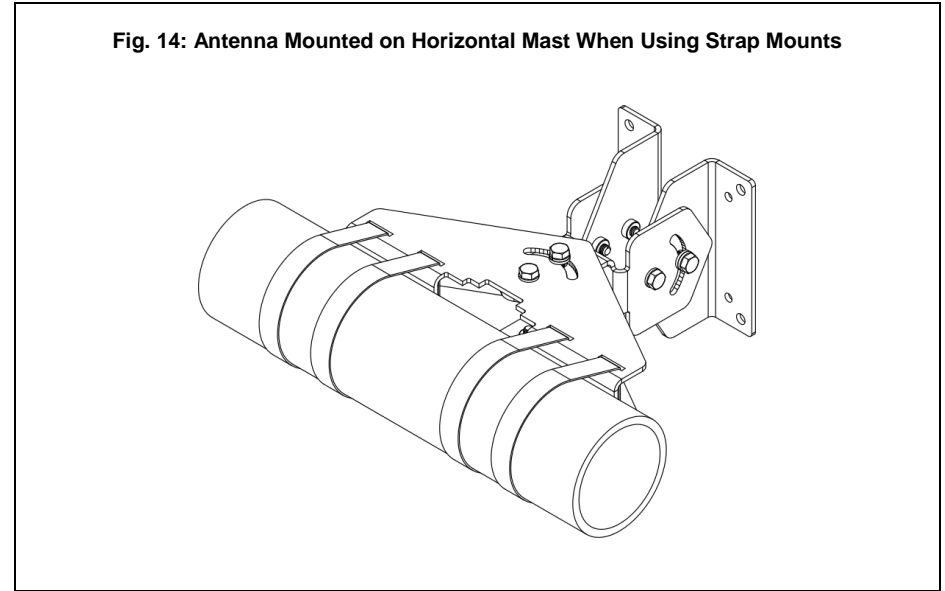


Fig. 14: Antenna Mounted on Horizontal Mast When Using Strap Mounts



Step	Task
13	For indoor installations only, the optional strap mounts (supplied by the customer) can be utilized as shown in Fig.13 and Fig. 14 to mount the Adjustable Mast Bracket on a 2" to 4" mast.
14	When mounting the antenna to a mast while using the optional strap mounts, lift the antenna up to the mast location to continue assembly. Insert the strap mounts (supplied by the customer) through the slots in the Adjustable Mast Bracket as shown in Fig. 13 and Fig. 14, and tighten the strap mounts to the appropriate requirement.
15	Horizontal and vertical alignment can be made by loosening the adjustment bolts on the Adjustable Mast Bracket and moving the antenna. See Step 2-3 and Step 5 for adjustment details.
16	Loosen the adjustment bolts, and align the antenna in the direction specified by the site engineer. Once alignment is complete, retighten the adjustment bolts to 10 N·m (7.4 ft-lbs).

DISCLAIMER:

The installation, maintenance, or removal of an antenna requires qualified, experienced personnel. You must refer to the appropriate local safety codes and ensure proper electrical and electromagnetic compatibility before proceeding with the installation. All local codes shall take precedence over information in this document. Antenna systems should be inspected once a year by qualified personnel to verify proper installation, maintenance, and condition of equipment. Communication Components Antennas Inc. disclaims any liability or responsibility for the results of improper or unsafe installation.