

REP Design LLC

Southington, CT 06489

1-(860) 426.1894

n7emw@cox.net

www.repDesign.us

INSTALLATION INSTRUCTIONS:

AMB-Arm-2[®] Second Antenna Bracket with NMO Base with Four Radials (135-512 MHz)

Thank you for your purchase; we appreciate your business and interest in our products.

These instructions describe how to use the AMB-Arm-2 (“ARM”) second antenna bracket with NMO antenna base and four removable groundplane radials for 135-512 MHz. It enables you to mount one or two ADDITIONAL V/UHF antennas to several of our HF/V/UHF antenna mounts and brackets. The ARM is designed for fixed base or stationary mobile as the *groundplane radials are not designed to be used at highway speeds.* It makes a great addition to your “go bag”! Very cool.

The ARM is designed as a simple and quick bolt-on option for several of our antenna mounts or you can use it for your own custom mounting application. Compatible antennas are listed below, and compatible mounts are listed on **page 2**. You can bolt the ARM to a wide variety of metallic and non metallic objects using a ¼ inch bolt or wood screw. The ARM does NOT have to be attached to a groundplane/counterpoise since it comes with four groundplane radials.

What You Get

The following photos show what you get with the ARM, and example installations. The top three photos show what you get (provided 3/32” Allen wrench, not shown in photos) and the bottom three photos show the ARM attached to two of our mounts and brackets. Larger photos are on **page 4**.



Specifications

- **Material of construction:** hand buffed 6061 aluminum, 1/4 inch thick x 1-1/4 inch wide x 13 inches long.
- **NMO mount:** our nicely machined heavy-duty rust proof nut, SO239 connector on the bottom, adjustable NMO brass ring.
- **Groundplane radials:** four removable stainless steel, 18 inches long, for 135-512 MHz, includes Allen wrench for set screws that hold the radials.
- **Compatible Antennas:** V/UHF mobile type antennas from 135-512 MHz, with NMO base.

Refer to the additional **photos and illustrations** in these instructions for installation examples.

The latest version of these instructions with color photos can be found on our **DOWNLOADS** web page, as a PDF file. The version date is at the bottom of each page of our instructions.

Safety First!

*Use caution if you are installing your antenna on a ladder, balcony or other location where the antenna could fall on someone or cause damage if it were to fall. If so, you might want to install an insulated “safety line” in case your antenna/mount comes loose. As with any antenna installation, be careful around thunderstorms and lightning, and you may want to remove your antenna or disconnect the coax BEFORE a storm appears - remember that if you can hear thunder you can be struck by lightning. Be sure that the ends of your groundplane radials are out of the way of people and animals so they do not run into them. Be sure that your antenna and groundplane are not near, above or below power wires. **SAFETY FIRST!***

Tools Needed

No special tools are required. A wrench or pliers can be used to tighten the nut on the bottom of the NMO base and the ¼ inch mounting bolt/wing nut/nut that comes with our compatible antenna mounts and brackets listed below.

Compatible Mounts

The AMB-Arm2 (ARM) is compatible with our mounts and brackets listed below. It can also be bolted to your own installation using a ¼ inch bolt or wood screw (not included with the ARM). Larger photos are on **page 4**.

- **CLAMP-150:** "clamp to anything" portable mount for HF/V/UHF mobile antennas.



- **CLAMP-200:** heavy-duty clamp-on bracket for ladders and railings –vertically and horizontally mounted using our optional **AMB-Bkt-1** and **AMB-Bkt-1T** “L” brackets that bolt to the CLAMP. The right graphic shows our antenna mounting “L” brackets.



- **AMB-BKT-2:** “dual L” bracket for bolting to horizontal surfaces, with tilting feature. Available with a variety of antenna bases (3/8x24 stud, NMO with and without groundplane radials, SO239).



- **AMB-Bkt-Mast-D2.0:** super heavy-duty “L” bracket with three stainless steel u-bolts for mounting antennas to the top of masts with diameters up to 2 inches. With one or two of our AMB-Arm2 brackets you can fit TWO or THREE antennas on one “Mast-D2.0” mount!



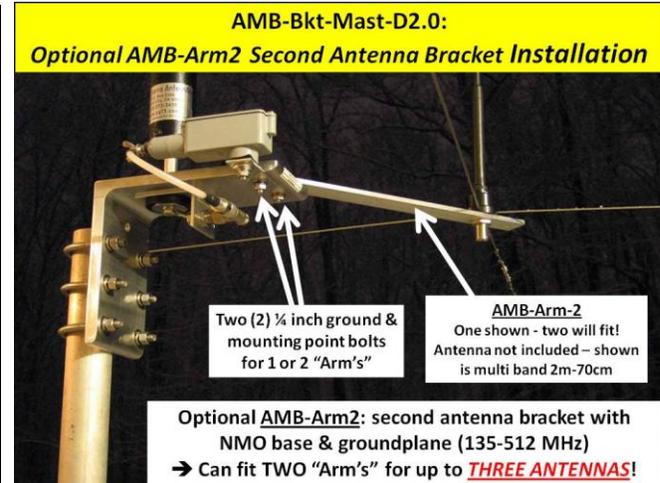
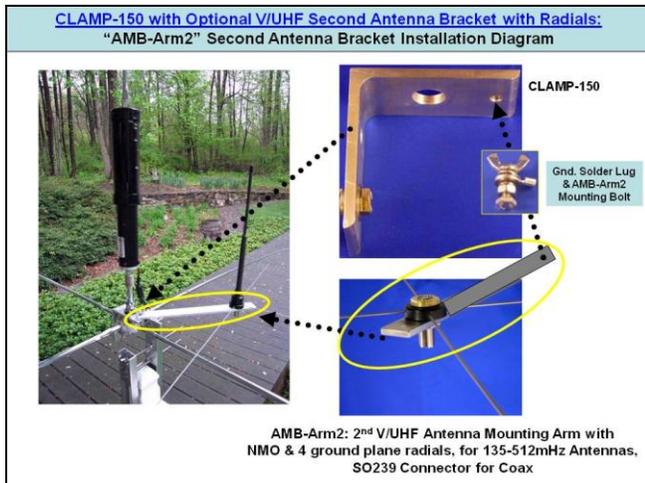
Installing the ARM

The ARM comes with a ¼ inch mounting hole on the end opposite from the antenna base. This goes onto a ¼ inch bolt that comes with our mounts and brackets listed above. Place flat and lock washers over the ARM, and tighten the nut or wing nut that comes with our mounts and brackets. See the two installation illustrations below.

One ARM will fit each of our compatible mounts and brackets; except our AMB-Bkt-Mast-D2.0 will fit ONE or TWO ARMs as it has two ¼ inch bolts.

The four stainless steel radials can be cut for a specific band or left as-is for multi band antennas for 135-512 MHz. They are installed and removed easily using the provided Allen wrench. You will note that the hole for the NMO base is drilled **OFF CENTER** so that the Allen wrench can be inserted into the set screws **WITHOUT REMOVING** the antenna base. To install or remove the radials, simply loosen the large nut on the bottom of the NMO base and rotate it to loosen each of the four set screws – you do NOT have to remove the set screws, just loosen them (avoid losing them!).

The **left illustration** below shows how the ARM attaches to our CLAMP-150 and most of our “L” bracket type mounts. The **right illustration** shows how one or two ARMs will fit on our AMB-Bkt-Mast-D2.0 super heavy duty “L” bracket for mounting antennas to the top of masts up to 2 inches in diameter. With the “Mast-D2.0” you can fit one HF/V/UHF antenna using one of our several antenna bases PLUS one or two V/UHF mobile antennas on the ARMs!



Maintenance

The ARM requires little maintenance. If used near salt water be sure to wash it with soap and water as soon as practical after exposure, as you would your own vehicle. You can "polish" the bare aluminum with #0000 (very fine) steel wool - be sure to completely remove any steel wool debris so it does not short out your antenna - this can be done by vacuuming or wiping with a damp rag. Periodically check the mounting hardware, radial set screws and antenna/base to be sure they are tight.

Spare parts, accessories, downloads and related products.

Let us know if you need spare parts or are looking for something that we do not yet provide – your idea could become a new product! As a specialty company, we are looking for unique ideas to serve the amateur and two-way radio community.

Warranty Summary

All products include a two (2) week "return for any reason" and six (6) month manufacturing defects limited warranty. If you should need to return your product please contact us IN ADVANCE to obtain a return authorization number. Please refer to the complete warranty that is enclosed with your order and on our web site.

→ see larger photos on the next page

Photos & Installation Examples

The following photos show larger images of the ARM with some of our compatible mounts.

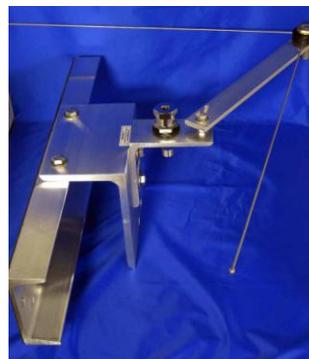
1. Photo of **AMB-Bkt-Mast-D2.0** with one ARM – will also fit a second ARM for a total of **THREE ANTENNAS!**



2. Photos of **CLAMP-150** “clamp to anything” mount. The left and right photos show a High Sierra Sidekick HF screwdriver antenna with a 2m-70cm multi band antenna. The middle photo shows a Buddipole™ dipole in “L” configuration with a 2m-70cm antenna.



3. Photos of **CLAMP-200** heavy-duty “clamp-on” mount for railings and ladders, mounted horizontally. In the left photo the ARM is removed but shown in the right photo. The ARM also works with a vertically mounted CLAMP (e.g. RV ladders) with our AMB-Bkt-1 or AMB-Bkt-1T “L” bracket antenna mounts that come with a variety of antenna bases – the right photo shows an **AMB-Bkt-1** with **3/8x24 stud base**.



Thank you for purchasing our products or viewing our instructions. **HAPPY DX!**