



"Alpha Antenna uses antenna designs that are known to work!"

Alpha Antenna

Model - MOTO

6-40 Meter tunable on 60-80 Meters

500 Watt

Mobile Antenna

USER GUIDE

V1.2

February 6, 2013



"Alpha Antenna uses antenna designs that are known to work!"

Introduction

Thank you for purchasing the MOTO by Alpha Antenna, a 500 Watt mobile system including antenna, matching network, & stainless steel spring for Emergency Response Vehicles, Daily Commercial Fleets, Military, and Amateur Mobile Operators.

Extremely durable 5 foot whip antenna that includes a standard 24x3/8 stud on the Alpha Match that you attach to your mount. To which you then simply attach your coax to the integrated SO-239.

Frequency Coverage – Designed for maximum efficiency on 6 through 40 Meters and tunable on 60-80 Meters

Alpha Antenna uses antenna designs that are known to work! Designed by Amateur Radio Operators at Alpha Antenna, in conjunction with a Certified Commercial Broadcast Engineer, the MOTO from Alpha Antenna uses the best antenna designs in one antenna system.

Technical Specifications

- Weight: 2 pounds
- Configuration: Vertical
- Frequency Coverage: 3.5 to 54 MHz
- Power Rating: 500 watts



"Alpha Antenna uses antenna designs that are known to work!"

Installation Safety

WARNING: INSTALLATION OF THIS PRODUCT NEAR POWER LINES IS DANGEROUS! FOR YOUR SAFETY, FOLLOW THE ENCLOSED INSTALLATION DIRECTIONS. THOUGH THIS ANTENNA IS CONSTRUCTED OF INSULATED WIRE, PROPER CARE MUST BE TAKEN DURING INSTALLATION. INSTALLER ASSUMES ALL LIABILITY FOR PROPERTY AND LIFE SAFETY.

YOU, YOUR ANTENNA, AND SAFETY

Each year, hundreds of people are killed, mutilated, or receive severe and permanent injuries when attempting to install an antenna. In many of these cases, the victim was aware of the danger of electrocution, but did not take adequate steps to avoid the hazard. For your safety, and to help you achieve a good installation, please **READ** and **FOLLOW** the safety precautions below. **THEY MAY SAVE YOUR LIFE!**

1. If you are installing an antenna for the first time, please, for your own safety as well as others, seek PROFESSIONAL ASSISTANCE.
2. Select your installation site with safety, as well as performance, in mind. (Detailed information in Site Selection appears in a separate section of this booklet.) **REMEMBER: ELECTRIC POWER LINES AND PHONE LINES LOOK ALIKE. FOR YOUR SAFETY, ASSUME THAT ANY OVERHEAD LINES CAN KILL YOU.**
3. Call your electric power company. Tell them your plans and ask them to come take a look at your proposed installation. This is a small inconvenience, considering **YOUR LIFE IS AT STAKE.**
4. Plan your installation procedure carefully and completely *before* you begin. Successful rising of a mast or tower is largely a matter of coordination. Each person should be assigned a specific task, and should know what to do and when to do it. One person should be designated as the leader/coordinator of the operation to call out instructions and watch for signs of trouble.
5. When installing your antenna, **REMEMBER: DO NOT USE A METAL LADDER. DO NOT WORK ON A WET OR WINDY DAY. DO DRESS PROPERLY:** shoes with rubber soles and heels, rubber gloves, long sleeved shirt or jacket.
6. If the assembly starts to drop, get away from it and let it fall. Remember, the antenna, mast, cable and metal guy wires are all excellent conductors of electrical current. Even the slightest touch of any of these parts to a power line completes an electrical path through the antenna and the installer – **THAT'S YOU!**
7. If ANY PART of the antenna system should come in contact with a power line, **DON'T TOUCH IT OR TRY TO REMOVE IT YOURSELF. CALL YOUR LOCAL POWER COMPANY.** They will remove it safely. If an accident should occur with the power lines, call for qualified emergency help **IMMEDIATELY.**

α ANTENNA

"Alpha Antenna uses antenna designs that are known to work!"

Antenna Installation



Step 1 – Install your mount to a stable metal part of your vehicle. We recommend our stainless steel Alpha Antenna Jam Mount.

Step 2 – Ensure that the stainless steel whip is screwed into the stainless steel spring on the Alpha Match before cinching the screw on the whips ferrule.

Step 3 – Insert the 24x3/8 stud in the hole of a Mount and attach the wash, lock washer, & nut. Use two wrenches to ensure the bottom nut is tight & DO NOT twist the Alpha Match while tightening.

Step 4 – Attach your coax from your tuner to the SO-239 on the Alpha Match. Do not allow any coax to form a loop by crossing over itself as this may form a choke that can detune the antenna.



"Alpha Antenna uses antenna designs that are known to work!"

SWR Performance

<u>SWR Readings per Band</u>	
SWR	BAND
1.4:1	6 Meters
6.8:1	10 Meters
6.7:1	12 Meters
5.6:1	15 Meters
4.4:1	17 Meters
4.6:1	20 Meters
4.5:1	30 Meters
4.8:1	40 Meters
5.7:1	60 Meters
7.5:1	80 Meters



"Alpha Antenna uses antenna designs that are known to work!"

Have Other Questions?

If you have questions about your antenna, please feel free to contact us.

Support

Email: support@alphaantenna.com

Phone: 1-888-482-3249

WEB: www.alphaantenna.com

αANTENNA

"Alpha Antenna uses antenna designs that are known to work!"

Notes:

αANTENNA

"Alpha Antenna uses antenna designs that are known to work!"