THESE MOUNTING STRUCTURES
CAN BE FREE STANDING OR ALONG THE SIDE OF A BUILDING.
(REFER TO MANUFACTURER'S INSTALLATION INSTRUCTIONS.)


Tower
Self Supporting Style


Telescopic Mast


Guy wires should be equally spaced in at least three directions. Use at least three guy wires for each 10 foot section of mast.


SHAKESPEARE COMPANY LLC COLUMBIA, SC 29223

# TIPS ON HOW TO SAFELY INSTALL YOUR CB BASE STATION / MAST MOUNTED ANTENNA 

IN ACCORDANCE WITH THE RECOMMENDATIONS OF THE U.S. CONSUMER PRODUCT SAFETY COMMISSION. THESE SAFETY RECOMMENDATIONS ARE FOR USE WITH CITIZENS BAND BASE STATION ANTENNAS.
(SEE INDIVIDUAL ASSEMBLY INSTRUCTION SHEET FOR REQUIRED MAST SIZE.)


## INSTALLATION INSTRUCTIONS

## You, your antenna, and safety

Each year, hundreds of people are killed, mutilated, or receive severe 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. Consult your dealer. He can explain which mounting method to use for the size and type of antenna you are about to install.
2. Select your installation site with safety, as well as performance in mind. (Detailed information on the 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 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 raising of a mast or tower is largely a matter of coordination. Each person should be assigned to a specific task and should know what to do and when to do it. One person should be designated as the "boss" 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
Increase your personal safety - dress properly - shoes with rubber soles and heels, rubber gloves, long sleeves shirt or jacket.
6. If the assembly starts to drop, get away from it and let it fall. REMEMBER: 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 antennas 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.
8. If an accident should occur and a victim is in contact with live wires, DO NOT TOUCH! Move the victim away from contact by using dry wooden boards, wood broomsticks, dry rope, sheets, or blankets. If their breathing has ceased, apply artificial respiration.

Have someone call for medical help.

## SITE SELECTION

Before attempting to install your antenna, think where you can best place your antenna for safety and performance.

To determine a safe distance from wires, power lines, and trees:

1. Measure the height of your antenna
2. Add this length to the length of your tower or mast
3. Then, double this total for the minimum recommended safe distance

If you are unable to maintain this safe distance, STOP! GET PROFESSIONAL HELP. Most antennas are supported by pipe masts attached to the chimney, roof, or side of the house. Generally, the higher the antenna is above ground, the better it will perform. Good practice is to install your vertical antenna about 5 to 10 feet above the roof line and away from power lines and obstructions. Remember that the FCC limits your antenna height to 60 feet. If possible, find a mounting place directly above your set, where the antenna wire can take a short, vertical drop on the outside of the house for entry through a wall or window near the set. Your dealer carries a complete line of installation hardware.


The safe distance from power lines should be at least twice the height of your antenna and the mast combined.

## INSTALLATION OF THIS PRODUCT NEAR POWER LINES IS DANGEROUS. FOR YOUR SAFETY, FOLLOW THE INSTALLATION DIRECTIONS.

## General Installation Instructions For Mast Mounted Antennas

1. Assemble your new antenna on the ground at the installation site. Keep the assembly instructions that come with it separate.
2. On the ground, clamp the antenna to the mast, pull enough coaxial cable, and connect it to the antenna.
3. To insure that a mast does not fall the "wrong way" if it should get away during installation or takedown, durable non conductive rope should be secured at each two foot level as the mast is raised. The boss should stand in a position where he can yank or pull the ropes if needed to deflect the falling mast away from hazards (such as power lines) into a "safe fall" (such as a driveway). The ropes are tied taut at the base of the mast after installation and in place at the various levels.
4. Install the selected mounting bracket.
5. If you are going to use the guy wire installation instead of a mounting bracket:

- Install guy anchor bolts
- Estimate length of guy wire and cut
- Attach a mast using guy ring

6. Carefully take the antenna and mast assembly to the mounting bracket and insert. Tighten the clamp bolts. In case of guyed installation, it will be necessary to have at least a second person to hold the mast upright while the guy wires are attached and tightened to the anchor bolts.
7. Install self-adhering "DANGER" label packed in the antenna hardware kit at eye level on your mast.
8. Install a ground rod to drain off static electricity build up and connect the ground wire to the mast and ground rod. Use special ground rods and not a spare piece of pipe. (See "Example of Antenna Grounding".)
9. Drill a hole in the wall (CAREFUL! There are wires in that wall!) near set just large enough to permit entry of the cable.
10. Push the cable through the hole and form a rain drip loop close to where it enters the house.
11. Put a small amount of caulking around the cable where it enters the house to keep out drafts.
12. Install static electricity discharge unit.
13. Connect the antenna cable to set.

EXAMPLE OF ANTENNA GROUNDING AS PER NATIONAL ELECTRICAL CODE INSTRUCTIONS

CHOOSE A PROPER SUPPORT AND MOUNTING METHOD


For tripods, Telescoping Mast, or Towers, refer to manufacture's installation instructions (Water pipes are not a suitable mast for antenna installations.)

There are three types of supporting structures commonly used in antenna installations.
See Below For Illustrations of these and various mounting methods.

TRIPOD


## ROOF MOUNTING

The swivel feature of "universal" type mounting brackets makes a convenient antenna mount for flat or peaked roofs. One clamp type bracket is used with 3 or 4 guy wires equally spaced around the mast and anchored to the roof or eaves by eyebolts. Apply roofing compound around the base of the bracket, screws and eyebolts for moisture sealing.


The safe distance from power lines should be at least twice the height of your antenna and the mast combined.


## CHIMNEY MOUNTING

The chimney is often an easy and convenient mounting place. But the chimney must be strong enough to support the antenna in high winds. Do not use a chimney that has loose bricks or mortar. A good chimney mount makes use of a 5 to 10 foot 1-1/4" diameter steel mast, and a heavy duty two strap clamp-type bracket. Install the upper bracket just below the top course of bricks, and the lower bracket 2 or 3 feet below the upper bracket. For maximum strength, space the brackets as far apart as possible.

Note: Guy wires are highly desirable on chimney mounts.


## SIDE OF HOUSE MOUNTING

Where roof overhang is not excessive, the side of the house provides a convenient mounting. Position the brackets over a stud if possible, one above the other, and space 2 or 3 feet apart. For metal siding, first mark mounting holes, then drill pilot holes through the siding to accept mounting screws.
(CAREFUL! There are wires in that wall!)

The safe distance from power lines should be at least twice the height of your antenna and the mast combined.

