Setting up a Base Station CB

When setting up a base station (fixed location) CB, you have two basic choices of CBs:

1. **Base Station CB** – A base station CB is a table-top model with a built-in power supply.
   
   Advantages of a base station:
   - Has a built-in power supply. Just plug it into an outlet.
   - Usually feature-rich with a variety of knobs and switches.
   - Easy to access the controls.
   - Decent sized speaker for good audio.

   Disadvantages of a base station:
   - Costs more.
   - Difficult to find, and not many models to choose from.
   - Not portable.
   - Takes up a lot of space.

2. **Mobile CB** – You can take a CB that was designed for vehicles, and instead use it in your home.
   
   Advantages of a mobile CB:
   - Costs less.
   - Many models to choose from.
   - Can be transferred to a vehicle.

   Disadvantages of a mobile CB:
   - Must use an external power supply to power the radio.
   - Controls are close together.
   - Speaker usually fires downward, which does not provide the best audio. An external speaker can be used for better audio.

The main reasons to use a mobile CB in your home is because they cost less and you can buy them locally. If you really want a true base station CB, you will probably have to mail-order it and pay substantially more. In case you are wondering, Cobra no longer manufactures a base station CB. There is very little demand for base station CBs nowadays.

This document focuses on setting up a mobile CB in your home.
There are only two things you need in order to use a mobile CB in your home:

1) A power supply
2) An antenna

You might also consider purchasing an external speaker for better sound, but this is optional.

**Power Supply**

Mobile CBs run on 12 volts DC, which they get from your car battery. To use a mobile CB in your home, you need a power supply that provides 12 volts DC. Here are the specific requirements of a suitable power supply:

- **Voltage output**: Between 12 to 14 volts DC
- **Current output**: Minimum 4 amps for the 148GTL, minimum 3 amps for all other models

The 148GTL has a higher power requirement because it needs extra power for operation on single sideband.

A suitable power supply can be found at Radio Shack, etc.

**Antenna**

This is the difficult part about setting up a base station. Indoor antennas provide very poor range and are NOT recommended.

Mobile antennas (for use on a vehicle) are NOT recommended. Mobile antennas are designed to be used with a large metal structure (the body of a car). If you take away the metal structure, the antenna will not work properly.

The best antenna to use is a CB base station antenna. Base station antennas get excellent range, but they are big (typically 18 feet tall). They must be mounted similar to the way you would mount a TV antenna. Many people do not want to go to the trouble and expense of installing a true base station antenna. If you live in an apartment or condominium, it may not even be an option.

If you do go to the trouble to install a base station antenna, you will be very happy with the performance of your CB.

An alternative that may provide suitable performance is to use a “no-ground-plane” antenna. This type of mobile antenna is specially designed for fiberglass motor homes and boats. fiberglass vehicles lack a metal body which is required for proper operation of traditional mobile antennas.

You might try using Radio Shack part number 21-977, which is a 4-foot no-ground-plane fiberglass antenna. No-ground-plane CB antennas can also be found at retailers that carry boating and RV supplies. Get one at least 3 feet tall. Try mounting the antenna to a gutter on your house.