



## 7-430MHz Wide Band Portable Antenna

# HVT-100

(M connector type)

## Operation Instructions

To use this antenna properly, read the instruction thoroughly before using it. This antenna (7-430MHz) is designed for amateur radio communication only. Keep this manual carefully at hand for later use.

### ⚠ Notes for Using the Antenna

To avoid inviting accidents, follow the below notices.

1. This antenna is designed to use the car body or the metal handrail as the ground earth when the portable use. Do not install the antenna fixed and on to the transceiver all the time due to the issues of the product strength and waterproof. This antenna is prohibited from using for mobile.
2. Do not touch the antenna during transmission. Touching the antenna during transmission may cause to electrify.
3. When the antenna is fixed and detached, be careful not to hit on your face and body with the antenna.

### ● Descruotion

1. The HVT-100 can be operated on wide band 7-430MHz. It is OK to use the HVT-100 only when portable operation.
2. It is easy to adjust frequency by up-down of the rod element.
3. 144MHz band can be operated at both 1/4 wave and 5/8 wave by the length of the rod element.

### ● Installation place (example)

1. Set the bracket where the grounding earth can be taken. (gutter mount, trunk lid etc)
2. Install the antenna at the car roof by the magnet base.
3. Set the magnet base on the wood table and install the antenna with approx. 10m ground wire.
4. Install the antenna at the metal handrail where the grounding earth can be taken.

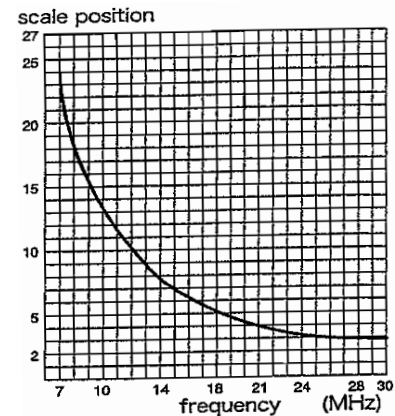
### ● Attention

1. Please install the antenna vertically to have better performance.
2. The SWR may be not lower than 1.5 depending on the conditions. In that case, please use the antenna tuner.

### ● Adjustment

1. Please confirm the antenna body position in the right chart.
2. Loosen the set screw as a half turn by hand. (Keep the rod element retracted.)
3. Slide the antenna body to the request frequency and fix it with the set screw by hand. Make the rod element full length.

\*Do not use any tools such as pliers when fasten the set screw. The antenna may be damaged.



4. Transmit and measure the SWR. If the tuning frequency is lower than the request frequency, make the rod element short or make the antenna body down.
5. If the tuning frequency is higher than the request frequency, make the antenna body up.

\*The SWR may be not lower than 1.5 depending on the conditions. In the case, please change the installation conditions. We also recommend using the antenna tuner.

6. When adjusting 50MHz band, put the antenna body down and make the rod element full length.
7. When adjusting 144/430MHz bands, put the radial element to M connector. Screw the antenna and fix the radial element. When adjust 144MHz band, shorten the antenna body (1/4 wave) or make the rod element full length. When adjusting 430MHz, make the antenna body retracted.

### ● Specifcations

Frequency : 7-430MHz band  
Max. Power rating : 130W (SSB)  
Impedance : 50 Ω  
Length : 0.5-1.77m  
Weight : 300g  
Connector : M-P

Type : 1/4 wave reduced type (HF Band), 1/4 wave (50/144MHz), 5/8 wave (144/430MHz)

\* 144MHz band can be operated at both 1/4 wave and 5/8 wave by the length of the rod element.

Accessory : Radial element

Though these products purchased are manufactured under strict quality control, if damage is caused by transporting, ask your dealer promptly.

Design and specifications of these products will be changed for future improvement without advance notice.

