

Droneport Antenna

RigExpert 5.8 GHz Minigun



RigExpert® 5.8 GHz Minigun Droneport Antenna is a rectangular 485x40x25 mm tube being a Highly Directional High Gain slot antenna array to be used with drone controllers. This antenna requires no tuning or counterpoise.

Mounting

This antenna can be mounted vertically away from the drone controller with the bracket being fixed to any suitable support like vertical or horizontal pipe, thick tree branch, etc. The bracket is screwed onto the mounting flange at the bottom.

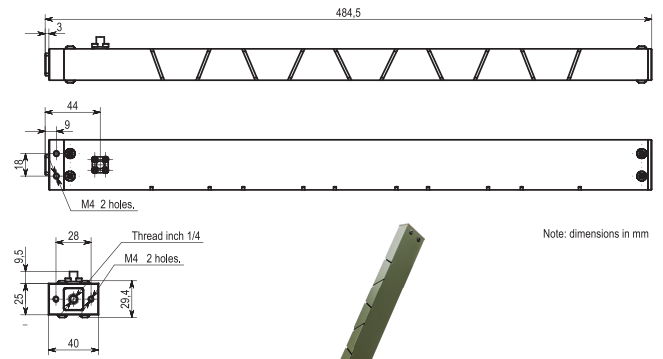
It uses the flange for a 1/4" stainless screw or bolt with the usual stainless washer and Grover spacer.

Another option is to mount this antenna on a tripod in an open area. Mount the antenna with the slots facing the desired drone control direction. The optimum coverage is achieved by tilting the antenna approximately 30 degrees backward.

RF connection

The short piece of low-loss 50 Ohm coaxial cable connects this antenna to the drone controller. Plug the cable into the antenna SMA connector, then tighten the rotating sleeve. The rest of the connector, as well as the cable, should remain stationary. Connect the other end of the coax with the SMA connector to the drone controller.

This slot antenna array has directional patterns in the horizontal and vertical planes. Due to a narrow vertical pattern to achieve the best signal from the drone, this antenna should be tilted if necessary.

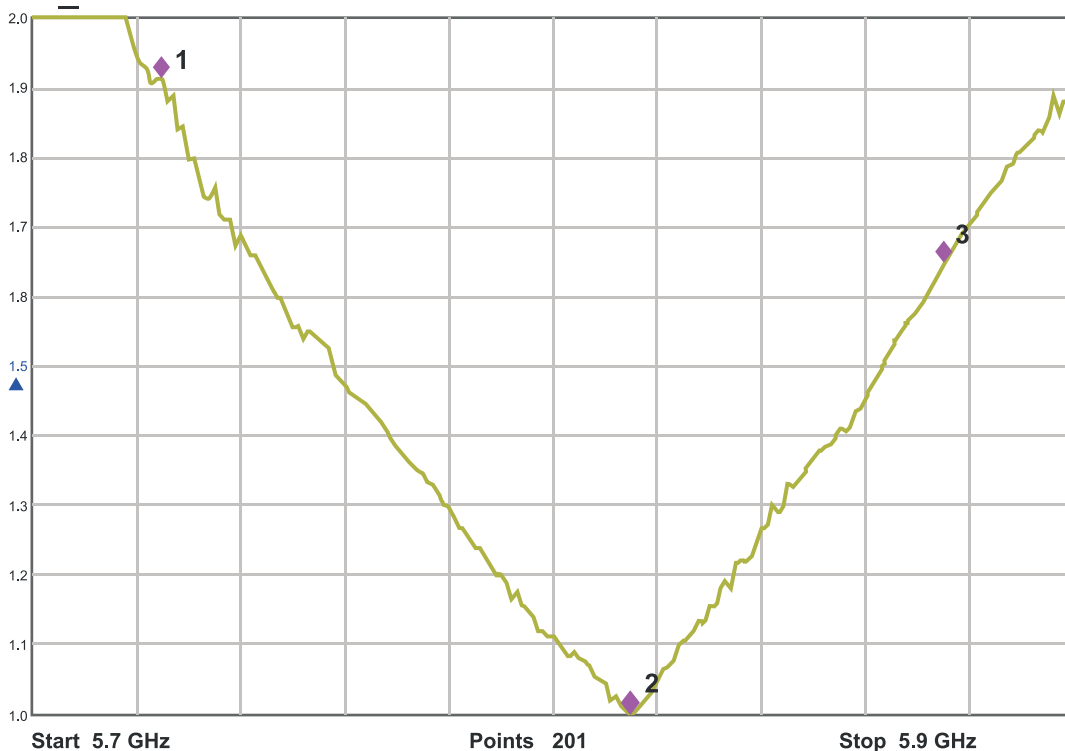


Note: dimensions in mm



Operation

1. Get the antenna from the box.
2. Mount the antenna on a tripod (this mounting method is preferred).
3. Tilt the antenna backward with the slots facing the drone control area.
4. Do not install it near large metal objects or structures to avoid antenna pattern distortion. Do not install the antenna where buildings, trees, or other objects cover the direction of the controlled drone. Try to install the antenna in free space.
5. Connect the low-loss coax with SMA connectors to the antenna and drone control unit.
6. Switch the drone control unit ON and start the drone.



M1	5.725 GHz	1.91
M2	5.815 GHz	1.00
M3	5.875 GHz	1.65