**RF Homing Robot**

My RF Homing Robot is based off this one:

<http://www.robowarner.com/robot/rdfbotarduino>

which was based off his earlier project using a Boe-Bot and a PIC microcontroller and Basic: <http://www.robowarner.com/sciencefair/homingbots>

The creator also based his robot from this project - which is not a robot, but explains

how RF direction finding works.

<http://theleggios.net/wb2hol/projects/rdf/tdoa1.htm>

It should be noted there are a few different ways to do RF direction finding, and this is just one.

It should also be noted this does not give a range, it is just a bearing to the source signal. IF a range is also needed, then the Doppler Effect can be used.

This is more than what this simple project does.

(Other projects also based off of RF direction finding:

<http://www.ragingcomputer.com/2012/05/arduino-robotic-directional-wifi-scanning>

This one scans for wifi, and points a directional antenna near the strong signal)

Some differences between my robot and the one from Robo Warner.

1. He is using modified FRS radios, I am going to use one of the low power AFSK 433mhz radios. I think that since the system is looking for a un-modulated source, this should work, as these seem like pretty dumb transmitters, give them power and they transmit.
2. He is using a Boe-Bot frame, with 360 degree servos. I am going to use a cheap frame from China, with motors and gear boxes. This will change the sketch slightly as I will need to use a motor driver.
3. I am planning on using PVC to mount my antenna, and a metal coat hanger