

## ABSTRACT

*Internet connection has become one of the needs of the community at this time, but not all people are able to use an internet connection. Which where there are still some areas that have not been reached by an internet connection.*

*Grid antennas can be used to capture internet connection signals with a range that varies according to specifications, grid antennas can also reduce the cost of internet usage. Grid antenna is an antenna that functions to capture the internet connection signal from the wifi transmitter antenna. In the installation of a grid antenna, the position of the antenna grid with the wifi transmitter antenna is needed, and it is very difficult to adjust it conventionally, because if the antenna position is not suitable, the signal quality received by the grid antenna is not optimal.*

*In this study, the writer implements the dc motor angle control to adjust the angle on the grid antenna with the fuzzy logic method, so that the direction of the antenna can return to the position that corresponds to the wifi transmitter antenna when the direction changes. The workings of this tool is that if the angular direction of the antenna changes, the direction of the antenna will automatically return to the predetermined position. In this study, the best system response was obtained with Rise Time 1.68 seconds, Overshoot 12.8%, Settling Time 2.89 seconds, and Error 0.37%.*

**Keywords :** *control, position, angle, wifi, Antenna, Grid, Fuzzy Logic.*