Wifi Jammer Using Esp8266

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Abstract

It is a irritate when a phone rings in a private-meeting, however, it is even-more worrying and even dangerous when mobile-phones are illegally-used by inmates in prisons to conduct and arrange their criminal-activities. So too overcome these reasons WiFi jammer is used, the jammer effectively disables any type of digital activity between some area. Esp8266 is low-cost and portable Wi-Fi hardware that has been used to make this project. It can work with 2.4GHZ networks only. When the device pass the packet to the network then nearest netowrk will be disable.

1 Objective

The two main objectives for WiFi Jammer are as follow:
i: To disable any WiFi in device's nearest range.
ii: Esp8266 can creates it's own WiFi host network.

2 Development Platform

Tools:
Arduino IDE
Hardware:
Esp8266

2.1 Need Of WiFi Jammer

when a phone rings in an exceedingly private meeting, however, it's even more worrying and even dangerous when mobile phones are illegally used by inmates in prisons to conduct and arrange their criminal activities. Also, some form of areas like schools and college's exam hall is restricted to use any devices but still, however, some people are uses that. With the ESP8266 board, the boundaries of what may be through with low-cost Wi-Fi hardware has been pushed even further than before.
Therefor I build the WiFi jammer to freeze the network for devices.
This device can disable 2.4GHZ network in between it's range.

3 Functionality

i: It will create it's own host network when we connect that network then we have connected to that devices and use it to disable the network.
ii: It can also generate the fake SSIDs to create network traffic.
iii: The web interface is used to scan and attack the networks.

3.1 Test Cases

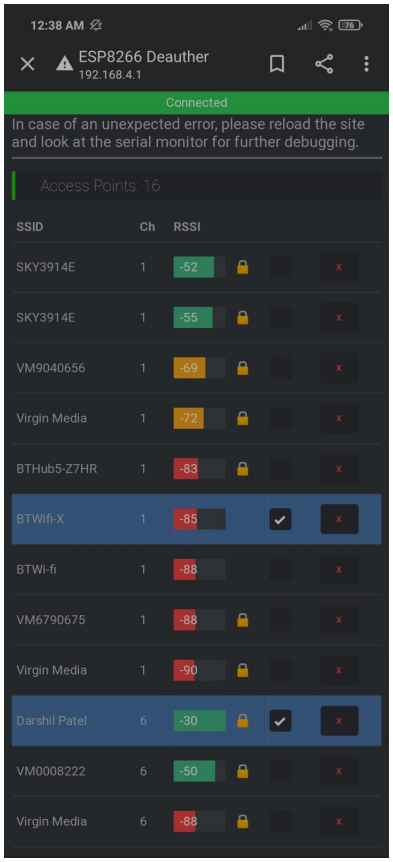


Figure 1: Scan And Select The Network

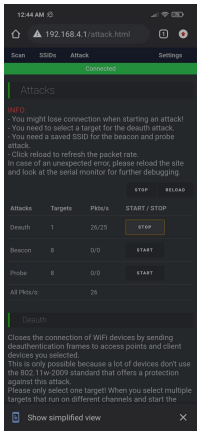


Figure 2: Attack The Network By Passing The Packets

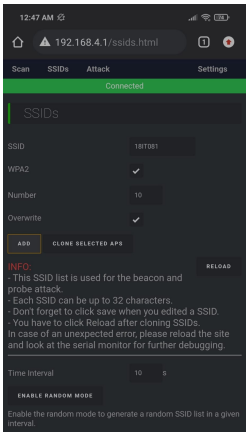


Figure 3: Create New SSIDs

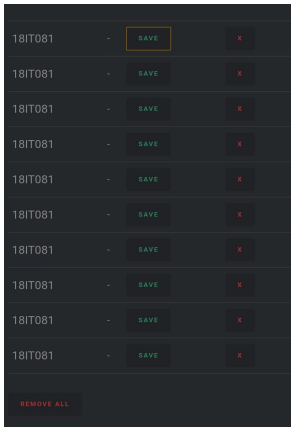
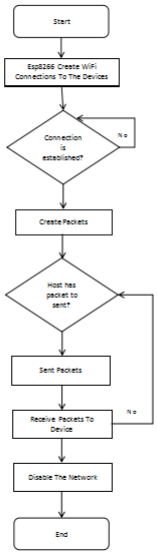


Figure 4: Generate SSID's As Per Entered Detail

4 Flow Of Work



5 Future Enhancements

Make an application that works with this hardware. It can not capture some numbers of WPA networks so that work on this problem.

6 Conclusion

While micro-controllers don't offer a full software system to figure with sort of a Raspberry Pi,
While the Esp8266 board can't capture the numerous WPA handshakes it generates from nearby networks while in operation by itself, it's a perfect companion tool for capturing WPA handshakes in Kali for later operations..

6.1 References

1: AWS Developers Club,Amazon,Leicester.