Assignment 0

In this assignment we asked to search for an app that allow us to save the following data:

1) Geography location: coordinates: Lat, Lon, Alt

2) Time and Date

3) ID device name

4) Name of network SSID

5) Media access control address (MAC address)

6) Frequency

7) Reception power signal

- We chose to use WiGLE WIFI Application.

- We wrote a code that get a folder with csv files (app files) and converted the data from the files to organized and sorted (by location) table for example:

Time, ID, Lat, Lon, Alt, #WIFI Networks (up to 10), SSID1, MAC1, Frequency1, Signal1, SSID2, MAC2, Frequency2, Signal2….

- We kept the strongest 10 WIFI networks to each location if there are more than 10 (could be less).

We wanted to get only csv files, files that are not in the right format will be ignore, this is how:

```
1.  for (int i = 0; i < files_names.length; i++) {
2.      if (files_names[i].startsWith("WigleWifi") && files_names[i].endsWith(".csv")) {
3.          File file = new File(folder + "/" + files_names[i]);
4.          Reading.WigleFile.read(file);
```

We converted the sorted data of all the files to one csv file and to KML file with JavaApiForKML Jar that can be open by Google Earth software their you can see all the WIFI networks.