Troubleshooting the Galileo

Things break... a lot... here's a good guess on how to fix them...

Restarting the Galileo

- If things break and you have no idea what's going on or how to fix it, try restarting the Galileo. To do this, follow these steps:
 - a. Remove the power cable from the Galileo
 - b. Unplug the USB cable and take out the SD Card
 - c. Plug the power cable back in
 - d. Plug the USB cable back in and put the SD Card back (I usually wait until the Galileo is connected, which you can see in the Arduino IDE, before putting the SD Card back, but this probably isn't necessary)

Killing Python Scripts

- Some of you may notice that your Galileo is running python processes if you try to connect to the terminal via Serial. To stop this, follow these steps:
 - a. Create an empty arduino sketch
 - b. in the setup() function, put the line system("killall python");
 - c. Upload this sketch

Finding the directory of the SD Card

```
#include <SD.h>

void setup() {
    // put your setup code here, to run once:
    SD.begin();
    File testFile = SD.open("thisIsATestFileWithALongName.txt", FILE_WRITE);
    testFile.close();

system("find / 'thisIsATestFileWithALongName.txt' | grep 'thisIsATestFileWithALongName.txt' > /dev/ttyGSO");
}
```

This arduino sketch:

- Creates a file on the SD Card with a really long name
- Runs a unix command to find the file, and prints its directory to the Serial console

You can find this code in the repository

Getting Python Script onto Galileo

- Get the IP Address of the Galileo:
 - Either connect to serial and type ifconfig (pay attention to inet addr under eth0)
 - Run an arduino sketch with the follow line in setup():
 - system("ifconfig > /dev/ttyGS0");
- On Windows:
 - pscp -scp python_file.py root@ip_address:/directory
 - Try to make the directory the same as the top level of your SD Card
- On Mac/Linux:
 - scp python_file.py root@ip_address:/directory