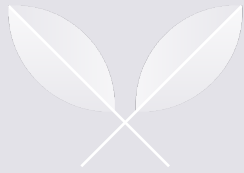


IFN649



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Assignment1



Devices & Applications

- My laptop: MacBook M1
- Raspberry Pi 4
- Arduino UNO Board
- Bluetooth Module (HC-05)
- Temperature and Humidity Sensor (DHT-11)
- (Bluetooth Analyzer ,Windows)

C++: Communication with Sensor & Teensy board

- DHT-11
- Setup() activate the program: initialize variables, pin modes, start using libraries etc.
- Loop() is called repeatedly
- Delay() function is used to pause the execution

Python: Bluetooth

- `import serial`
- `import time`
- `import string`
- `ser = serial.Serial("/dev/rfcomm0", 9600)`
- `ser.write(str.encode('Start\r\n'))`
- `while True:`
 - `if ser.in_waiting > 0:`
 - `rawserial = ser.readline()`
 - `cookedserial = rawserial.decode('utf-8').strip('\r\n')`
 - `print(cookedserial)`

MQTT on AWS

- MQTT
 - *Communication between machines*
 - *Transmission data within a IoT network efficiently*
- MQTT with Cloud Computing
 - *Remote developing, connection, and managing*
- AWS EC2
 - *Various of Virtual Machine (Instance)*