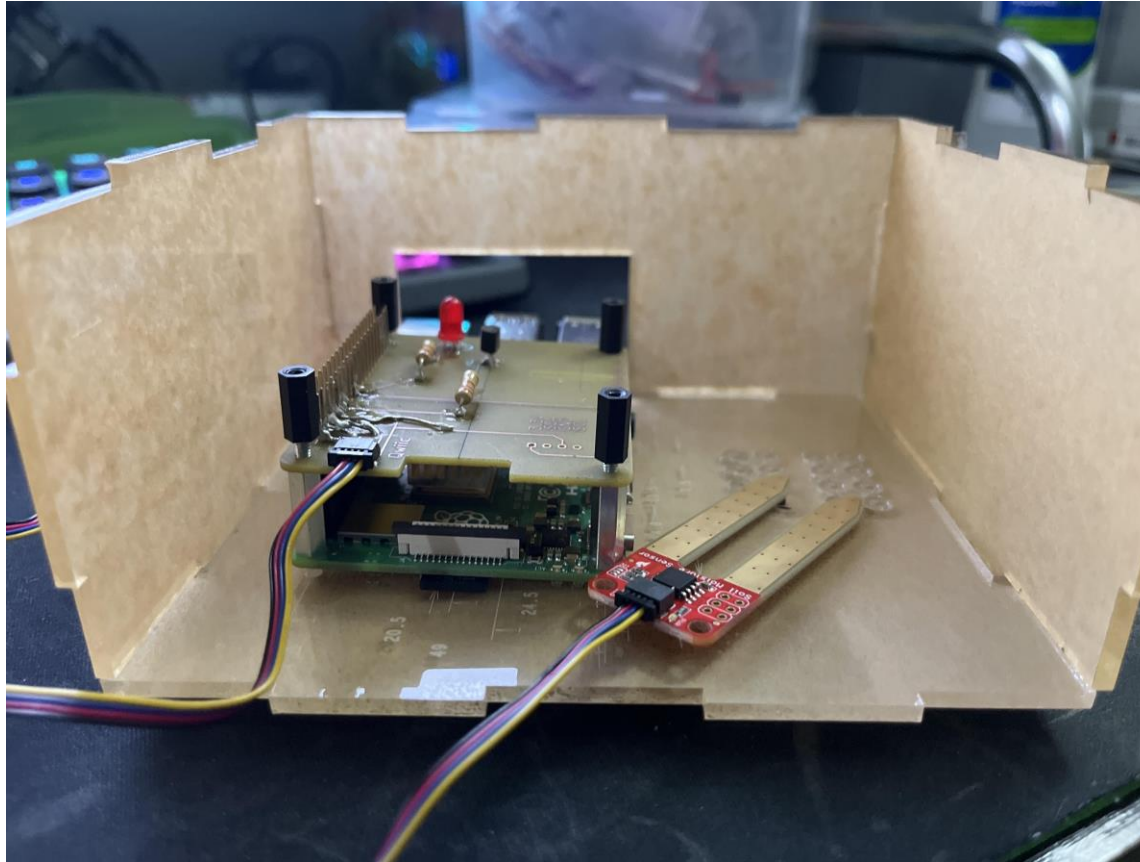


CENG-317 Project

Mi Nam Alcantara (n01451260)

2023

Enclosed Hardware & I2C Address



Bill Of Materials

Important Purchases

- Stacking Header
- Qwiic Socket
- Qwiic Cable
- 16mm Standoff
- M2.5 Screw
- Soil Moisture Sensor

# Bill Of Materials								
Part	Price in CAD	Quantity	Shipping Cost	Duty	Tax	Subtotal Paid	Subtotal propose to order	Expected Arrival Date
2N4124 PNP Transistor from Parts kit	0.70	1				\$ 0.70		Semester 1
5mm Red LED from Parts kit	0.26	1				\$ 0.26		Semester 1
220 Ohm Resistor from Parts kit	0.02	1				\$ 0.02		Semester 1
2.2 kOhm Resistor from Parts kit	0.02	1				\$ 0.02		Semester 1
Raspberry Pi Extreme Kit	144.95	1				\$ 144.95		Semester 2
SD card reader	7.91	1				\$ 7.91		Semester 2
SenseHat	43.16	1				\$ 43.16		Semester 2
Network adapter	20.99	1				\$ 20.99		Semester 2
Ethernet cable	9.49	1				\$ 9.49		Semester 2
Stacking Header	4.24	1			0.55	4.79		*Reading Week*
Qwiic socket	0.81	1			0.11	0.92		*Reading Week*
Qwiic Cables	12.88	1			1.67	14.55		*Reading Week*
16mm Standoff	1.11	4			0.58	5.02		*Reading Week*
M2.5 Screw	0.26	4			0.14	1.18		*Reading Week*
Leadfree Solder	96.11	0.02]		Reading Week
PCB	6.62	1				\$ 6.62		Reading Week
Laser Cutting	1/min	TBD				\$ 1.00		Reading Week
3D Printing	0.15/gram	TBD				\$ 0.15		Reading Week
SparkFun Qwiic Soil Moisture Sensor	13.67	1				\$ 13.67		

Project Schedule

1	Week	URL	Assignees	Status
2	Project Proposal	https://github.com/alcantaraMinam1260/hardware-project/issues/1	alcantaraMinam1260	Done
3	Hardware Selection	https://github.com/alcantaraMinam1260/hardware-project/issues/2	alcantaraMinam1260	Done
4	Mobile Project Report	https://github.com/alcantaraMinam1260/hardware-project/issues/3	alcantaraMinam1260	Done
5	3d Printing Tutorial	https://github.com/alcantaraMinam1260/hardware-project/issues/4	alcantaraMinam1260	Done
6	Proof Of Purchase/KiCad	https://github.com/alcantaraMinam1260/hardware-project/issues/5	alcantaraMinam1260	Done
7	Mobile App Presentation	https://github.com/alcantaraMinam1260/hardware-project/issues/6	alcantaraMinam1260	Done
8	Reading Week		alcantaraMinam1260	Done
9	Soldering/Laser Cutting		alcantaraMinam1260	Done
10	PCB Assembly		alcantaraMinam1260	Done
11	Coding		alcantaraMinam1260	Done
12	Mobile App integration with Sensors		alcantaraMinam1260	Todo
13	Testing		alcantaraMinam1260	Todo
14	Demonstration		alcantaraMinam1260	Todo
15	Project Presentation		alcantaraMinam1260	Todo
16	Group Final Presentation		alcantaraMinam1260	Todo
17	Capstone Presentation		alcantaraMinam1260	Todo

Reading/Writing To Sensor

Course Knowledge Utilized

- TECH 101, CENG150 (Electric Circuits)
- TECH 104, CENG 153 (Programming)