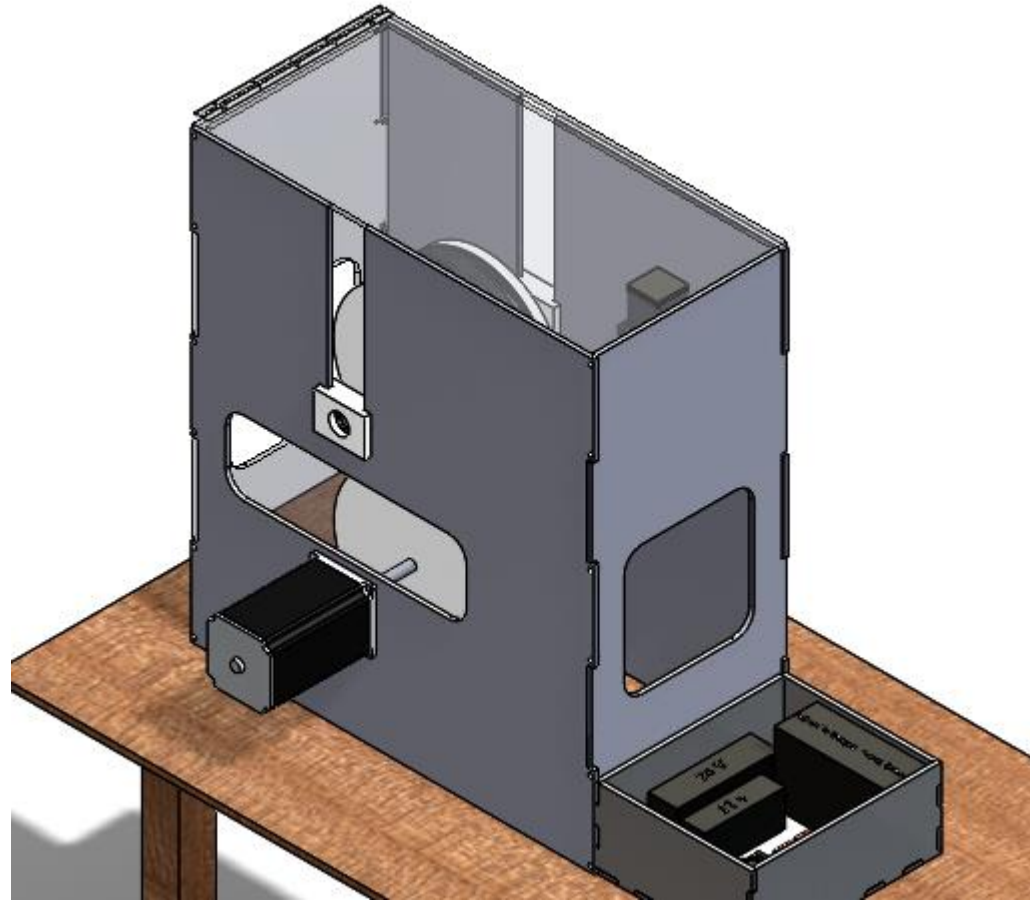
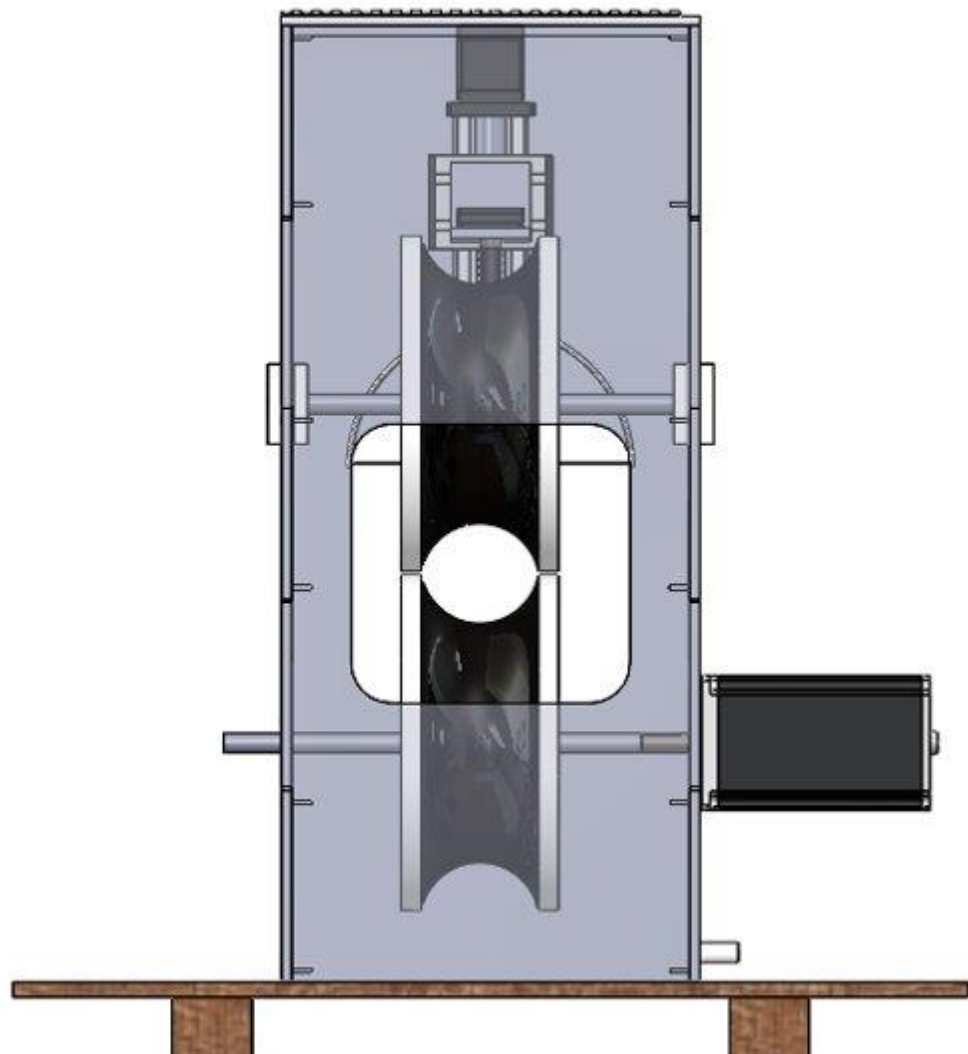
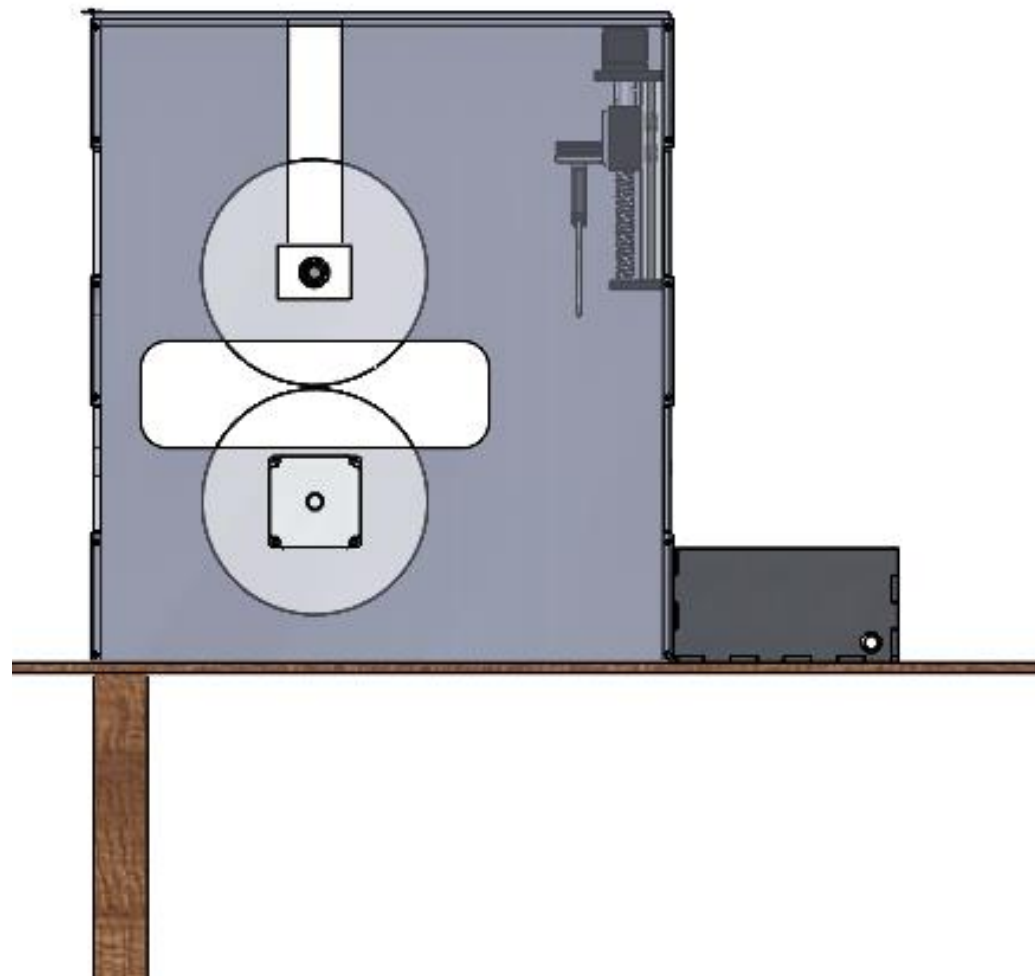


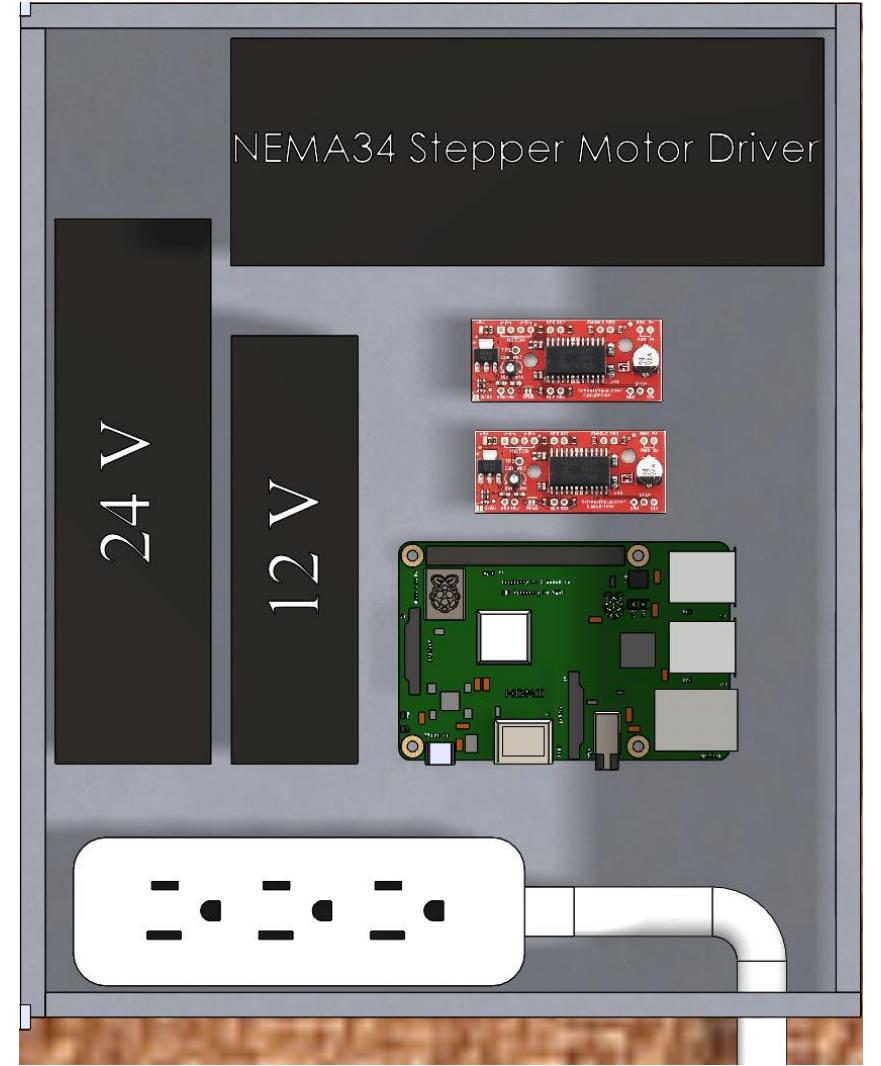
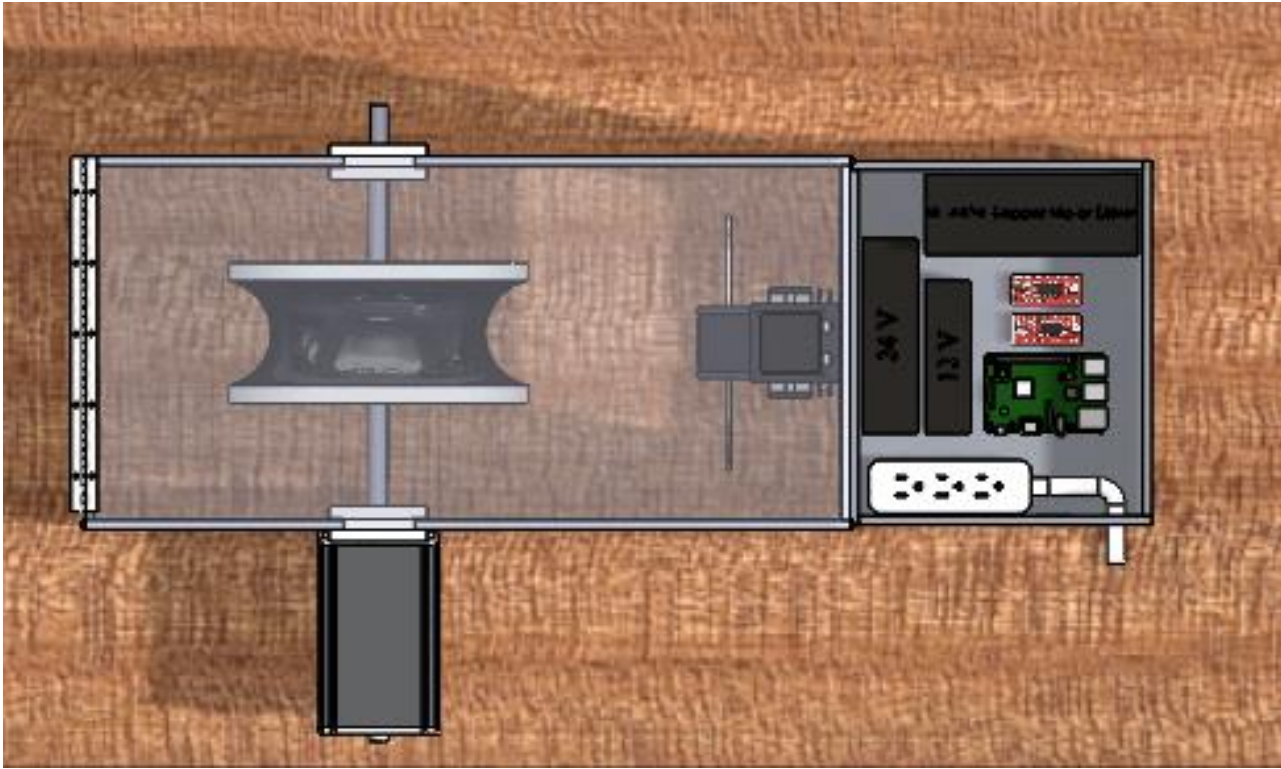
Current Design

Rennie, Ian and Kyle

Current Design







Coding

Alyssa

Code

```
1 import RPi.GPIO as GPIO, time
2 GPIO.setmode(GPIO.BOARD)
3 GPIO.setup(31, GPIO.OUT)
4 GPIO.setup(29, GPIO.OUT)
5 p = GPIO.PWM(31, 400)
6
7 def SpinMotor(direction, num_steps):
8     GPIO.output(29, direction)
9     while num_steps > 0:
10         p.start(1)
11         time.sleep(0.01)
12         num_steps -= 1
13     p.stop()
14     GPIO.cleanup()
15     return True
16
17 direction_input = input('Please enter 0 or C for Open or Close:')
18 num_steps = int(input('Please enter the number of steps: '))
19 if direction_input == 'C':
20     SpinMotor(False, num_steps)
21 else:
22     SpinMotor(True, num_steps)
```

Videos of motors

- https://www.youtube.com/watch?v=R_E5P81DNC4
- <https://www.youtube.com/watch?v=4VtSG9OYsJc>

Up Next:

- Optimize Large Motor with Micro stepping
- Code Keypad
- Code LCD Screen