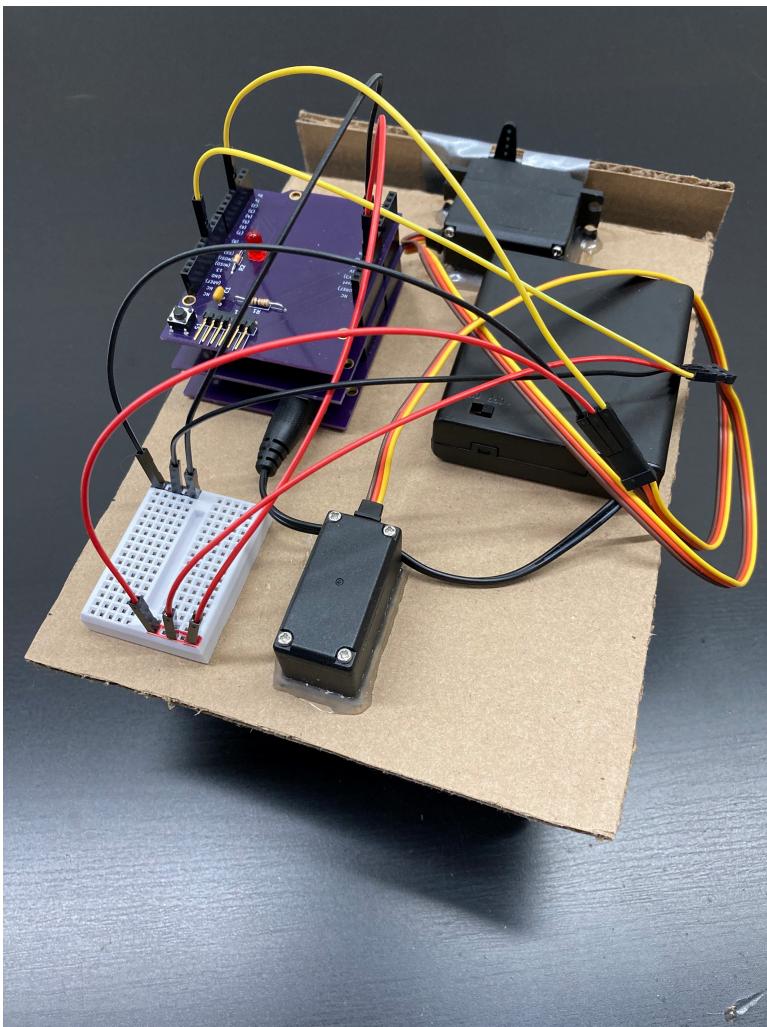
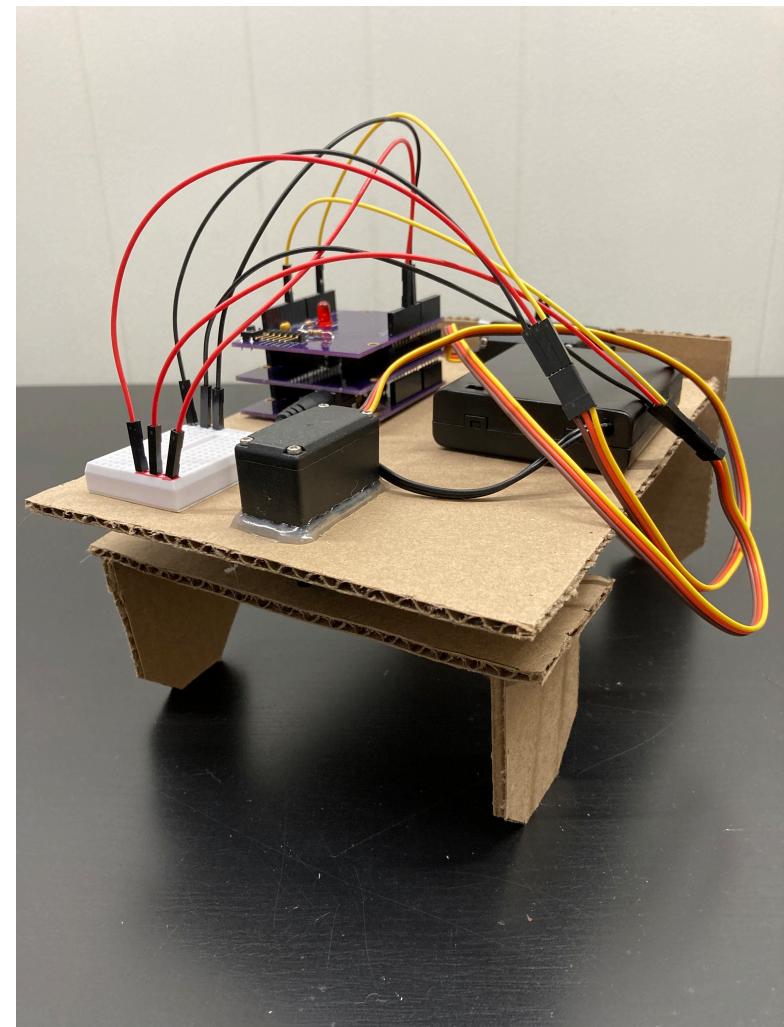


Your robot is ready to compete!

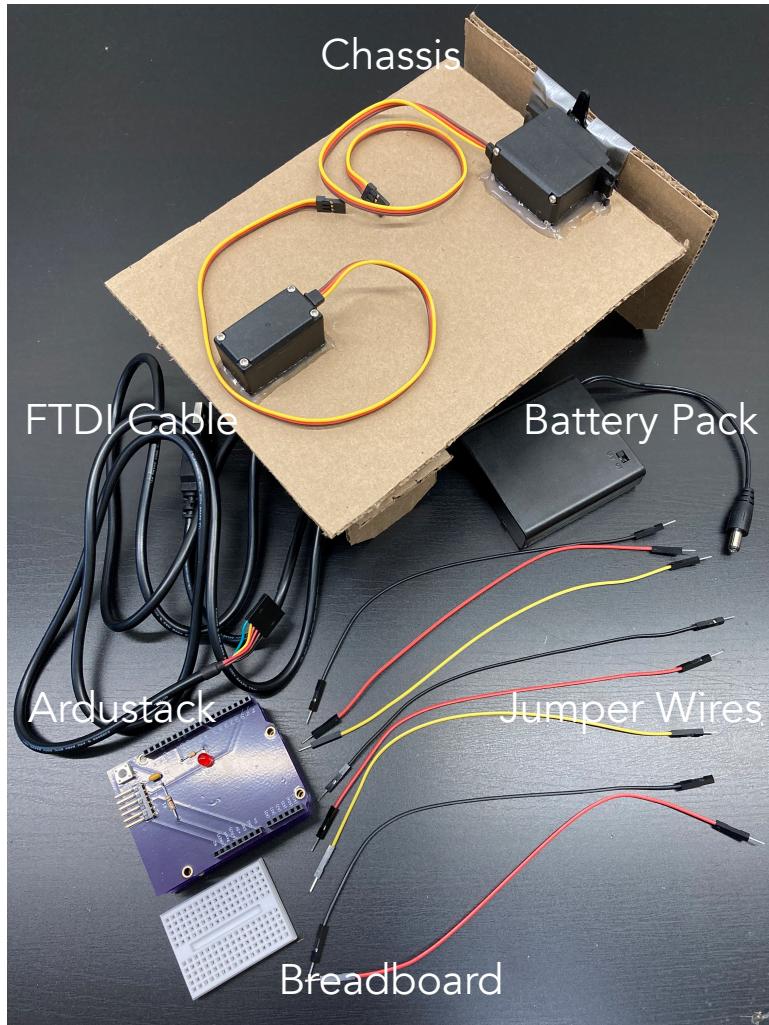


## Rumble-Bot Assembly



Completed view

Check that all parts are present



Choose Tools > Board: "Arduino Uno" and Tools > Port "/dev/ttyUSB0"

```
robot-sw | Arduino 1.8.19
File Edit Sketch Tools Help
Upload
robot-sw
#include <Servo.h>
Servo headServo;
Servo tailServo;

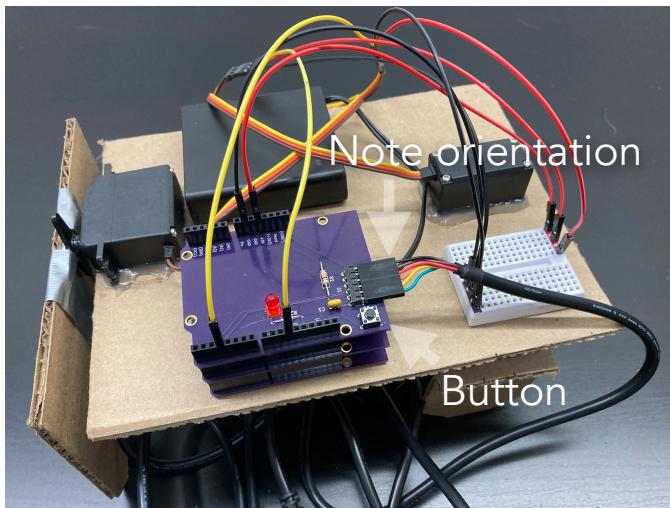
void setup() {
  // servo setup
  headServo.attach(3);
  tailServo.attach(11);
  delay(1000);
  // slowly sweep head servo to 100
  while(headServo.read()<100) {
    headServo.write(headServo.read()+1);
    delay(50);
  }
}
```

Upload the sketch to the Ardustack by selecting Sketch > Upload

Detach the FTDI cable and attach the battery jack. Set the battery switch "ON."

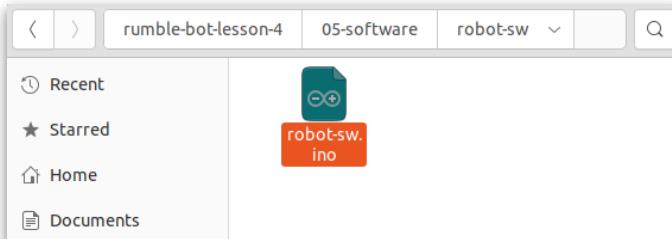


Plug the FTDI cable as shown. **The black wire should be farthest from the button.**



Plug the USB side of the FTDI cable into the computer

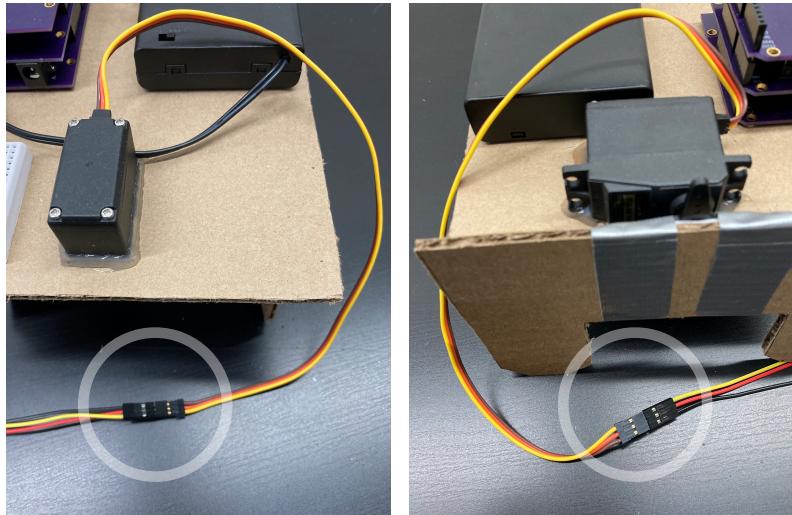
Open the robot software sketch



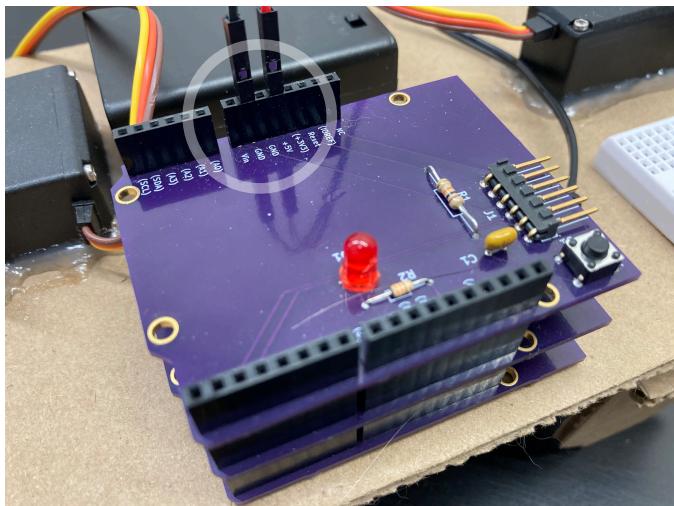
Use double-sided tape to attach the Ardustack, battery pack, and breadboard to the chassis



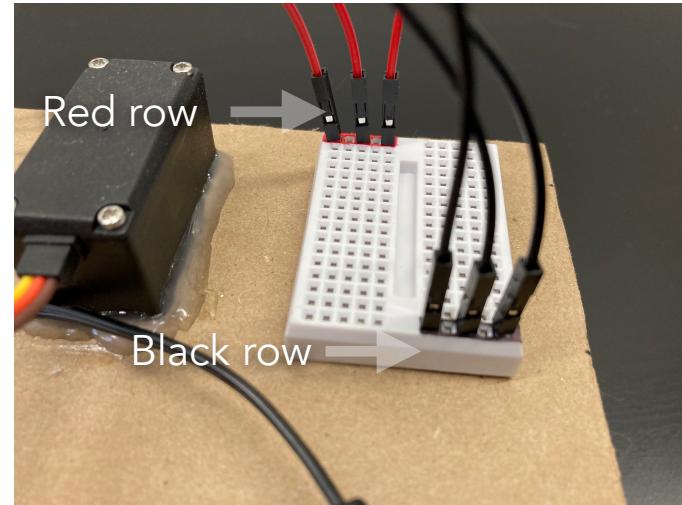
Attach wires to servos:  
Black (GND) to Brown; Red (+5V) to  
Orange; and Yellow (Control) to Yellow



Attach wires to Ardustack:  
Black to GND and Red to +5V



Connect servo and Ardustack +5V (red)  
and GND (black) wires to the  
breadboard as shown



Attach the servo control wires (yellow)  
to Ardustack; front servo to (3) and  
back servo to (MOSI)

