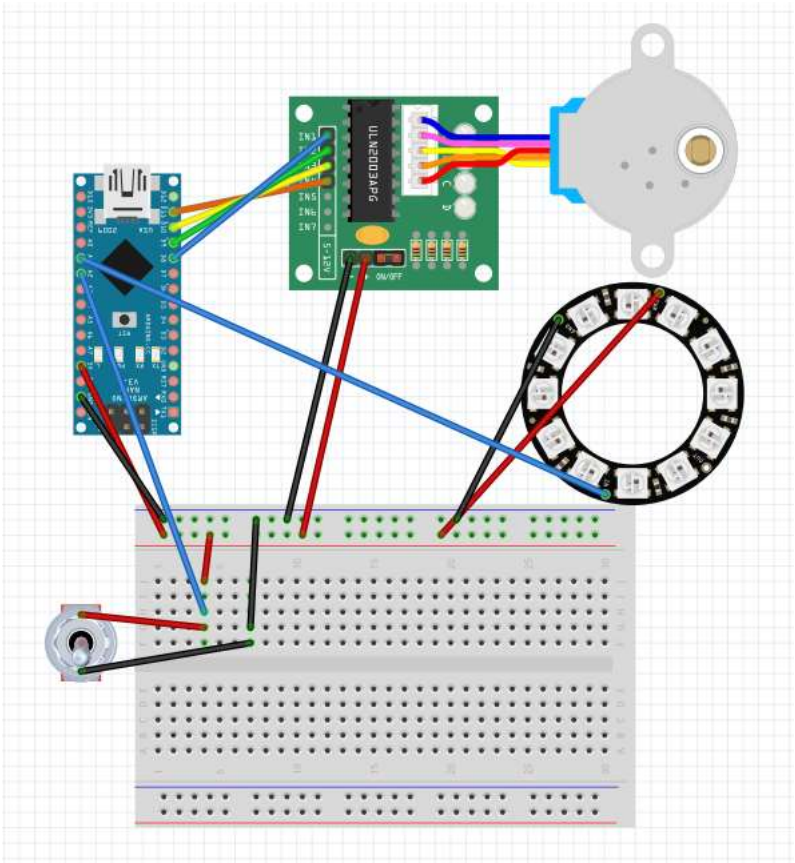

Circuit on breadboard including switch, Arduino, stepper motor, neopixel ring

Code for Arduino

```
#include <Stepper.h>
#include <ezButton.h>
#include <Adafruit_NeoPixel.h>
#define LED_PIN A1
ezButton toggleSwitch(A2);
const int stepsPerRevolution = 500;  // change this to fit the number of steps per revolution
// initialize the stepper library on pins 8 through 11:
Stepper myStepper(stepsPerRevolution, 8, 9, 10, 11);
int numOfPixels = 12;        // number of LEDs in the ring
int pixelPin = A1;           // pin for data signal from Nano       // number of LEDs (in the ring)
Adafruit_NeoPixel pixels(numOfPixels, pixelPin, NEO_GRB + NEO_KHZ800); // pixels object

void setup() {
  // set the speed at 60 rpm:
  myStepper.setSpeed(60);
  // intialize pixel pin as output
  pinMode(pixelPin, OUTPUT);
  toggleSwitch.setDebounceTime(50);
  // initialize the serial port:
  Serial.begin(9600);
}
void loop() {
  toggleSwitch.loop();

  int state = toggleSwitch.getState();
  Serial.println(state);
  if (state == HIGH) {
    for(int i = 0; i < 7; i++){
      pixels.setPixelColor(i, pixels.Color(255, 0, 0));
    }
    pixels.show();
    myStepper.step(stepsPerRevolution);
  } else {
    for(int i = 0; i < 7; i++){
      pixels.setPixelColor(i, pixels.Color(0, 0, 0));
    }
    pixels.show();
  }
}
```

Working, completed project