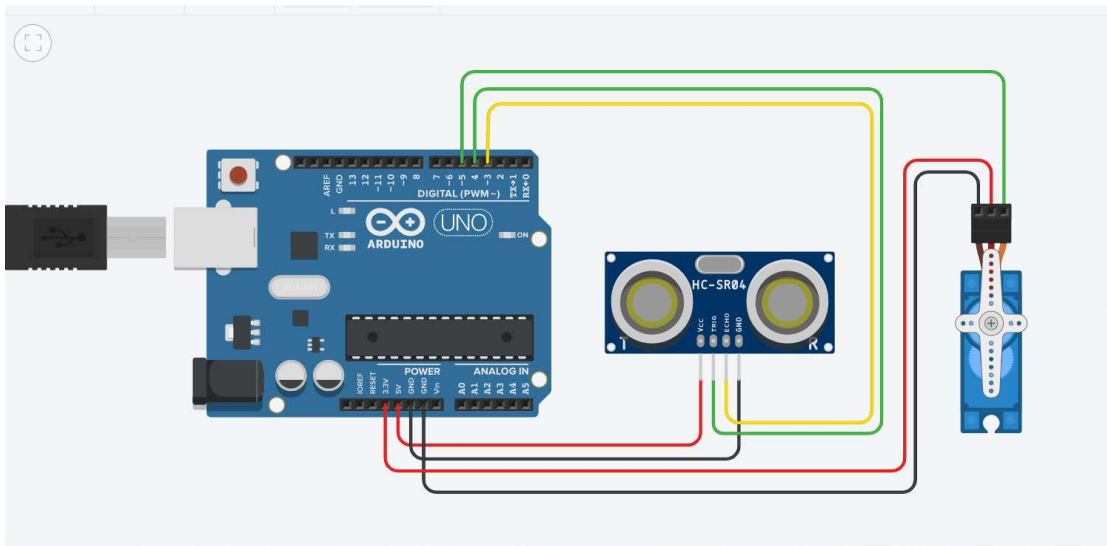


ASSIGNMENT-3

Name: Shreyansh Kumar

Reg no: 19BEC1246

Circuit Diagram:



Programme Code:

```
// C++ code
#include<Servo.h>
Servo s;
void setup()
{
    Serial.begin(9600);
    pinMode(4, OUTPUT);
    pinMode(3, INPUT);
    s.attach(5);
    s.write(0);
}

void loop()
{
    digitalWrite(4, LOW);
```

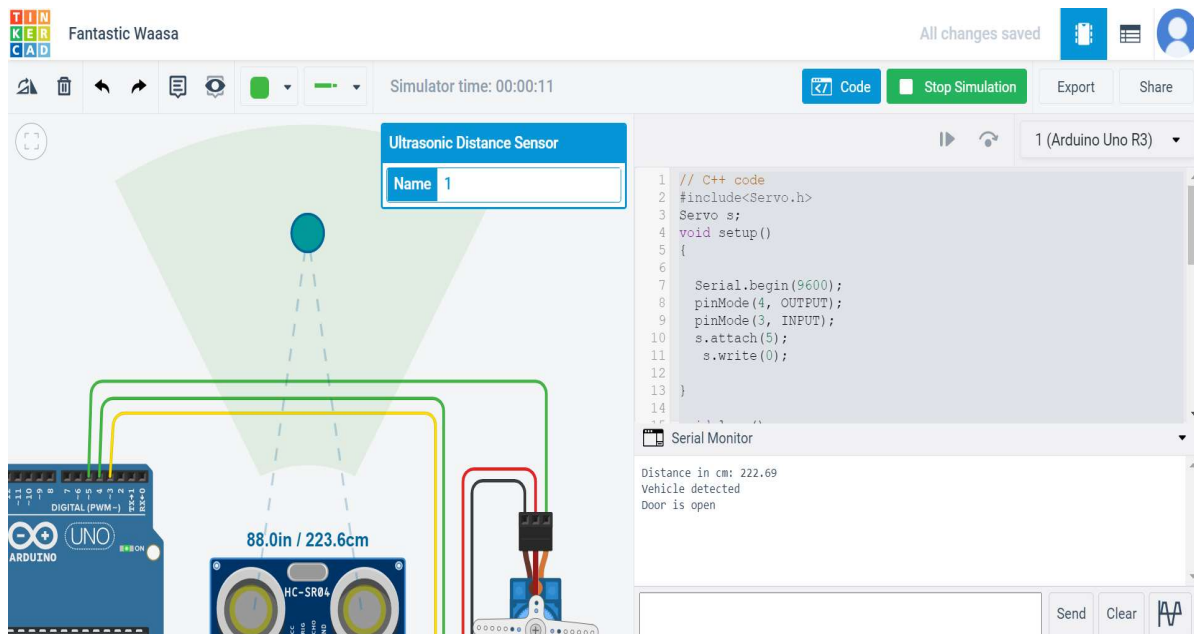
```

digitalWrite(4, HIGH);
delayMicroseconds(10);
digitalWrite(4, LOW);
float dur = pulseIn(3, HIGH);
float dis = (dur * 0.0343)/2;
Serial.print("Distance in cm: ");
Serial.println(dis);
delay(2000);

if(dis<=325)
{
  Serial.println("Vehicle detected");
  Serial.println("Door is open");
  s.write(90);
  delay(10000);
  s.write(0);
  //delay(1000);
}
else
{
  Serial.println("Vehicle not detected");
  Serial.println("Door is closed");
  //delay(1000);
}

```

Output:



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Fantastic Waasa

All changes saved

Simulator time: 00:00:48

Code

Stop Simulation

Export

Share

Ultrasonic Distance Sensor

Name 1

Code

```
1 // C++ code
2 #include<Servo.h>
3 Servo s;
4 void setup()
5 {
6
7     Serial.begin(9600);
8     pinMode(4, OUTPUT);
9     pinMode(3, INPUT);
10    s.attach(5);
11    s.write(0);
12 }
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```

Serial Monitor

Door is closed
Distance in cm: 328.18
Vehicle not detected
Door is closed
Distance in cm: 328.18
Vehicle not detected
Door is closed
Distance in cm: 328.18

Send Clear