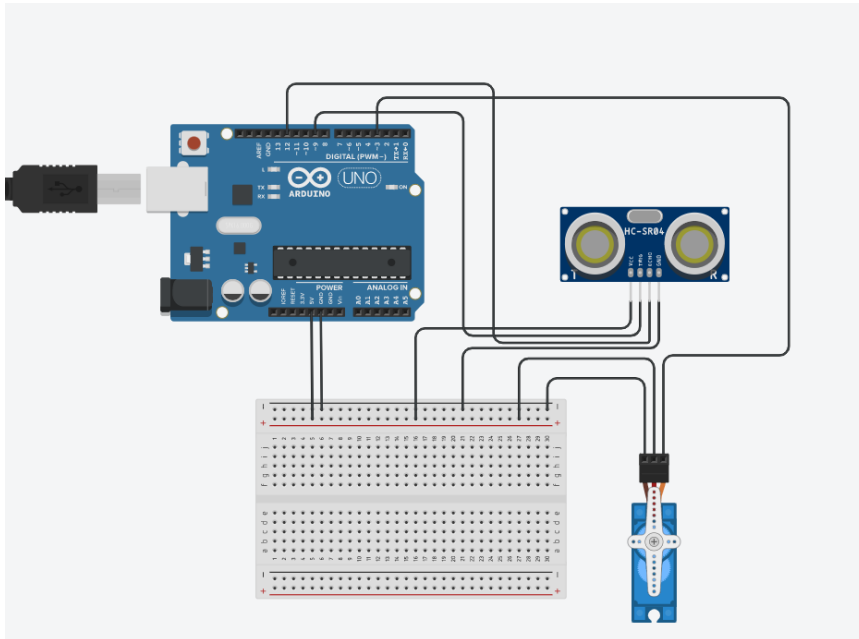


ASSIGNMENT-2

CIRCUIT DIAGRAM:



CODE:

```
#include<Servo.h>
```

```
Servo s;
```

```
void setup()
```

```
{
```

```
  pinMode(12, INPUT);
```

```
  pinMode(9, OUTPUT);
```

```
  s.attach(3);
```

```
  s.write(0);
```

```
  Serial.begin(9600);
```

```
}
```

```
void loop()
```

```
{
```

```
  digitalWrite(9, LOW);
```

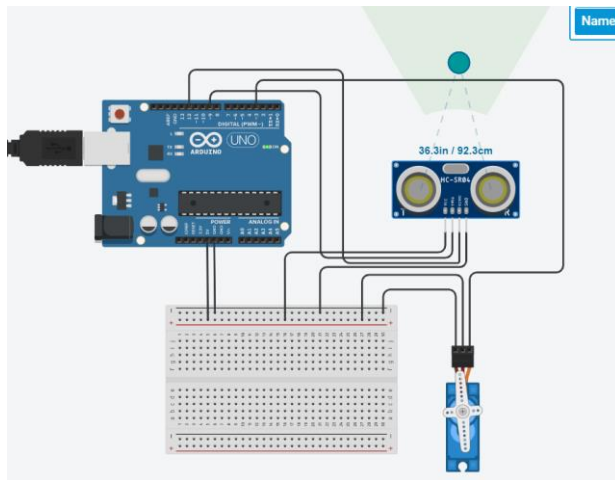
```
  digitalWrite(9, HIGH);
```

```
  delayMicroseconds(10);
```

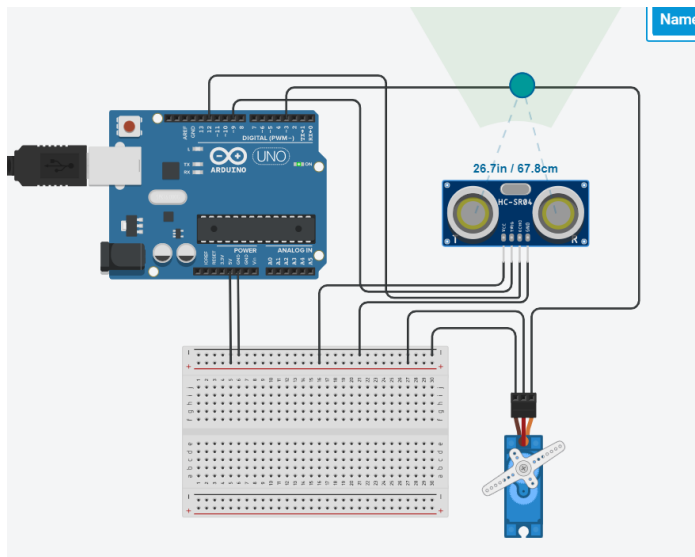
```
digitalWrite(9,LOW);  
float dur = pulseIn(12, HIGH);  
float dis = (dur * 0.0343)/2;  
Serial.println(dis);  
s.write(0);  
if(dis <= 76)  
{  
  for(int i=0;i<=180;i++)  
  {  
    s.write(i);  
    delay(0);  
  }  
  
  delay(3000);  
  for(int j=180;j>=0;j--)  
  {  
    s.write(j);  
    delay(0);  
  }  
  delay(3000);  
}  
else  
{  
  s.write(0);  
}  
}
```

RESULTS:

1. When distance is above 76 cms:



2. when the distance is below 76 cms:



LINK:

https://www.tinkercad.com/things/juJHSFZngR0-brilliant-kasi-jofo/editel?sharecode=zi3yPt2KLjVEXgU-TS7uOhuj47CUqayK-wGQ_mNmIHs