Name – Parag Gattani

Program No. – 14

Program Title – Irrigation

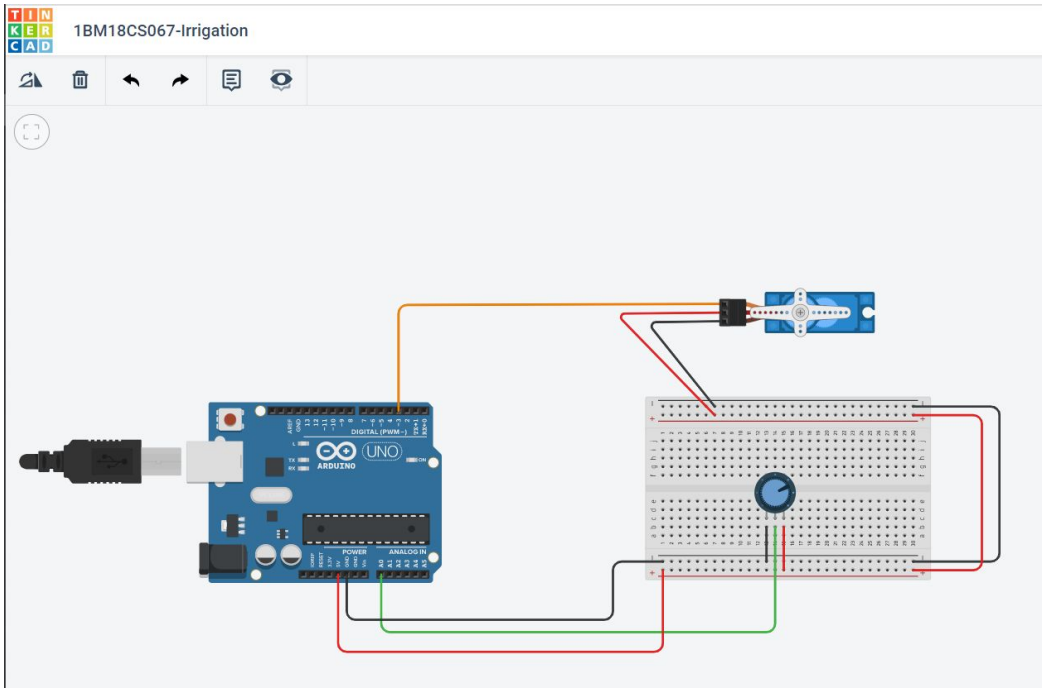
AIM

Design a display system to print the RED,BLUE and Green colors (RGB Led and LCD).

HARDWARES REQUIRED

- Arduino Board, Breadboard Small, Potentiometer
- Micro Servo

CIRCUIT DIAGRAM



WRITE-UP

Name - Parag Gattani
USN - 1BM18CS067

04/11/2020

Exp. 14

Irrigation

Aim

Design a display system to print the RED, BLUE, and GREEN colors (RGB LED and LED)

Hardware Required

Arduino Board, Breadboard, Potentiometer, Microservo

Code

```
# include<Servo.h>
Servo myservo;
int pos=0;
int sensorPin = A0;
int sensorValue = 0

void setup()
{
    myservo.attach(3);
    Serial.begin(9600);
}

VOID loop()
{
    sensorValue = analogRead(sensorPin);
    Serial.println(sensorValue);
    if (sensorValue > 500)
    {
        for(pos=0; pos<=180; pos+=1)
        {
            myservo.write(pos);
```

```
        delay(15);
    }
    for (pos = 180; pos >= 0; pos -= 1)
    {
        myservo.write(pos);
        delay(15);
    }
    delay(1000);
}
```

CODE

```
#include <Servo.h>

Servo myservo;  // create servo object to control a servo

// twelve servo objects can be created on most boards


int pos = 0;    // variable to store the servo position



int sensorPin = A0;    // select the input pin for the potentiometer

int sensorValue = 0;  // variable to store the value coming from the sensor

void setup() {

myservo.attach(3);  // attaches the servo on pin 9 to the servo object

Serial.begin(9600);

}

void loop() {

 // read the value from the sensor:

sensorValue = analogRead(sensorPin);

Serial.println (sensorValue);

if(sensorValue>500)

{
```

```
 for (pos = 0; pos <= 180; pos += 1) { // goes from 0 degrees to 180 degrees

   // in steps of 1 degree

   myservo.write(pos);              // tell servo to go to position in variable 'pos'

   delay(15);                       // waits 15ms for the servo to reach the position

 }

 for (pos = 180; pos >= 0; pos -= 1) { // goes from 180 degrees to 0 degrees

   myservo.write(pos);              // tell servo to go to position in variable 'pos'

   delay(15);                       // waits 15ms for the servo to reach the position

 }

}

delay (1000);

}
```

OUTPUT

Designed a display system to print the RED,BLUE and Green colors (RGB Led and LCD).