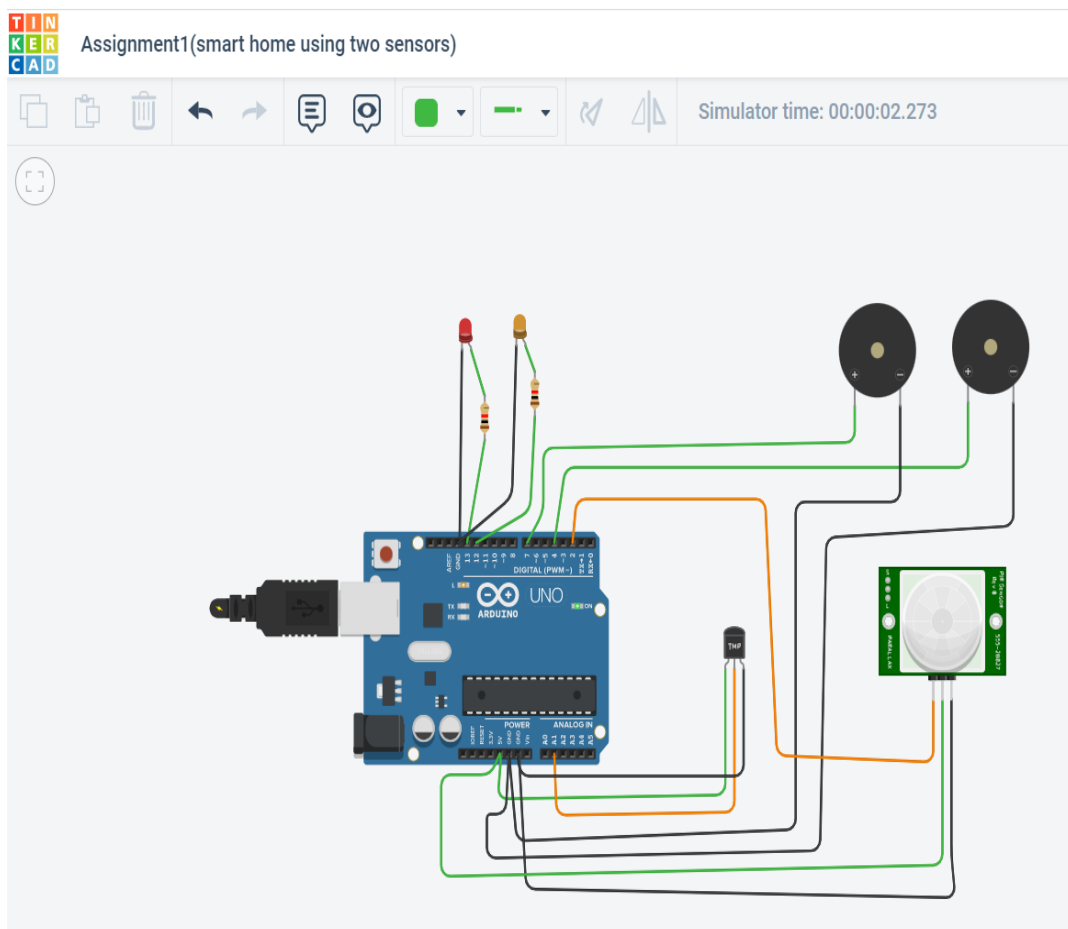NAME: SUGAPRIYA A

ROLLNO:91761914040

BATCH: B1-1M3E

ASSIGNMENT-1

(Make a smart home in tinkercad, using 2+ sensors, led, buzzer in single code and circuit)

CIRCUIT DIAGRAM:

Assignment1(smart home using two sensors)

Simulator time: 00:00:02.273

SOURCE CODE:

// C++ code

//

void setup()

```
{
  Serial.begin(9600);
  pinMode(12, OUTPUT);
  pinMode(13, OUTPUT);
  pinMode(7, OUTPUT);
  pinMode(4, OUTPUT);
  pinMode(2, INPUT);
}

void loop()
{
  double a=analogRead(A1);
  Serial.print("adc value:");
  Serial.println(a);
  double v= a/1024;
  double tvalue=v*5;
  Serial.print("temperature value in voltage:");
  Serial.println(tvalue);
          double o= tvalue-0.5;
          double t= o*100;
          Serial.print("temperature value is");
          Serial.println(t);
          if (t>=50)
          {
            digitalWrite(7,HIGH);
```

```arduino
        digitalWrite(13,HIGH);
      }
      else
      {
        digitalWrite(7,LOW);
        digitalWrite(13,LOW);
      }


  int m= digitalRead(2);
  Serial.print("motion detected");
  Serial.println(m);
  if (m==1)
  {
    Serial.println("yes");
    digitalWrite(12,HIGH);
    digitalWrite(4,HIGH);
  }
  else
  {
    Serial.println("no");
    digitalWrite(12,LOW);
    digitalWrite(4,LOW);
  }
}
```