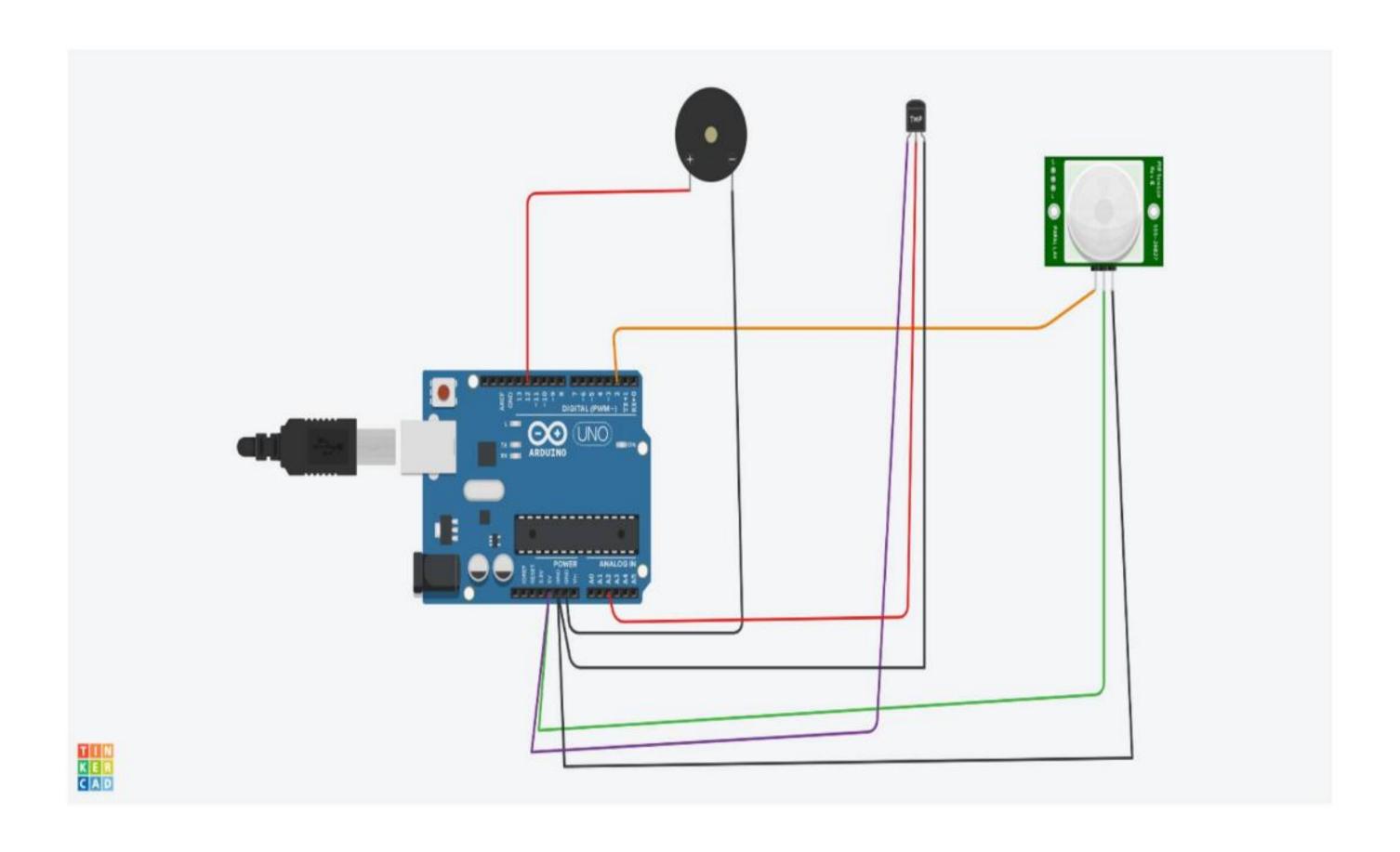
IBM ASSIGNMENT

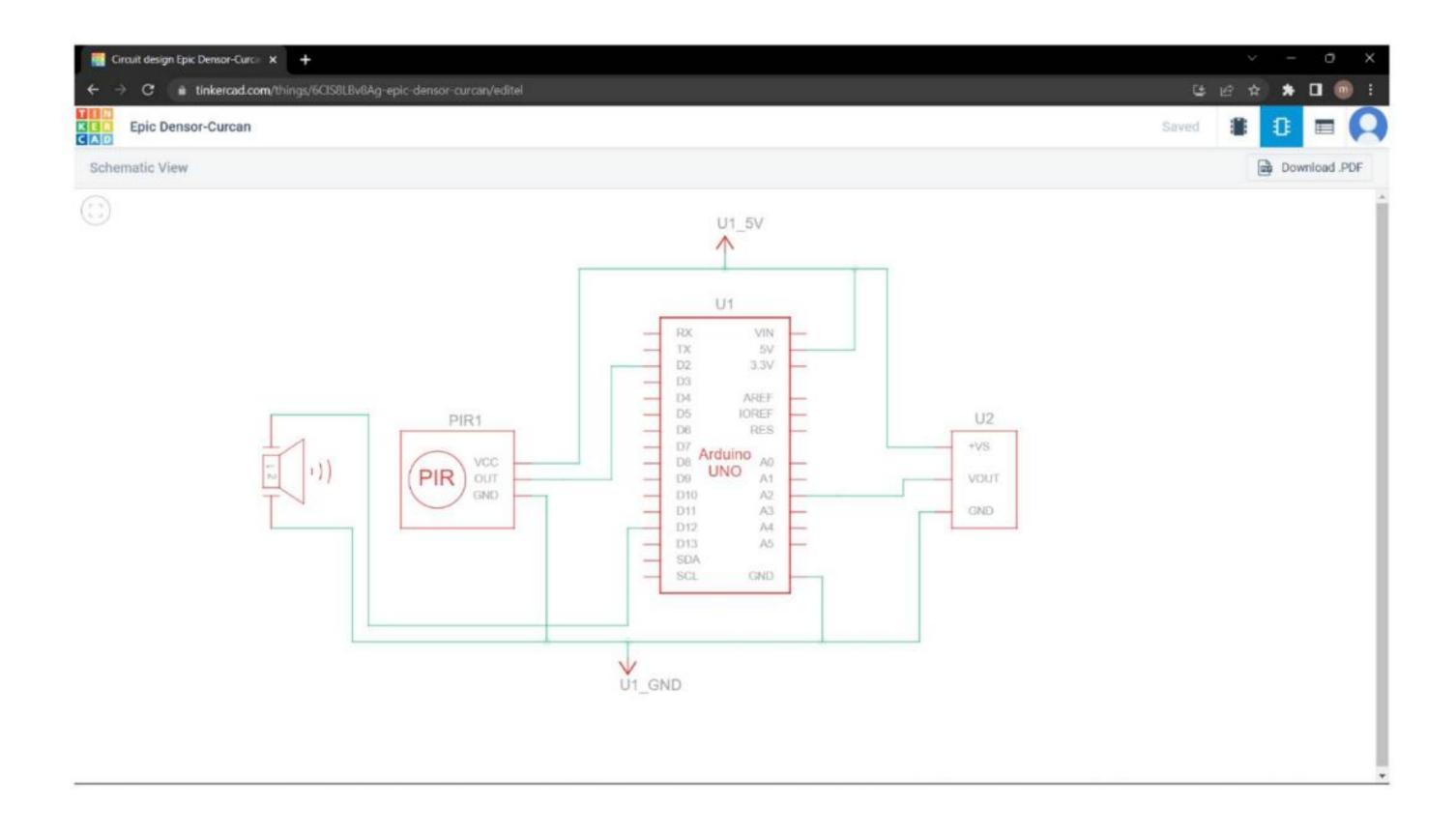
CREATE CIRCUIT WITH PIEZO ALARM, PIR SENSOR, TEMPERATURE SENSOR:

D.Vamsi Krishna 111519106030

CIRCUIT DIAGRAM:



SCHEMATIC DIAGRAM:

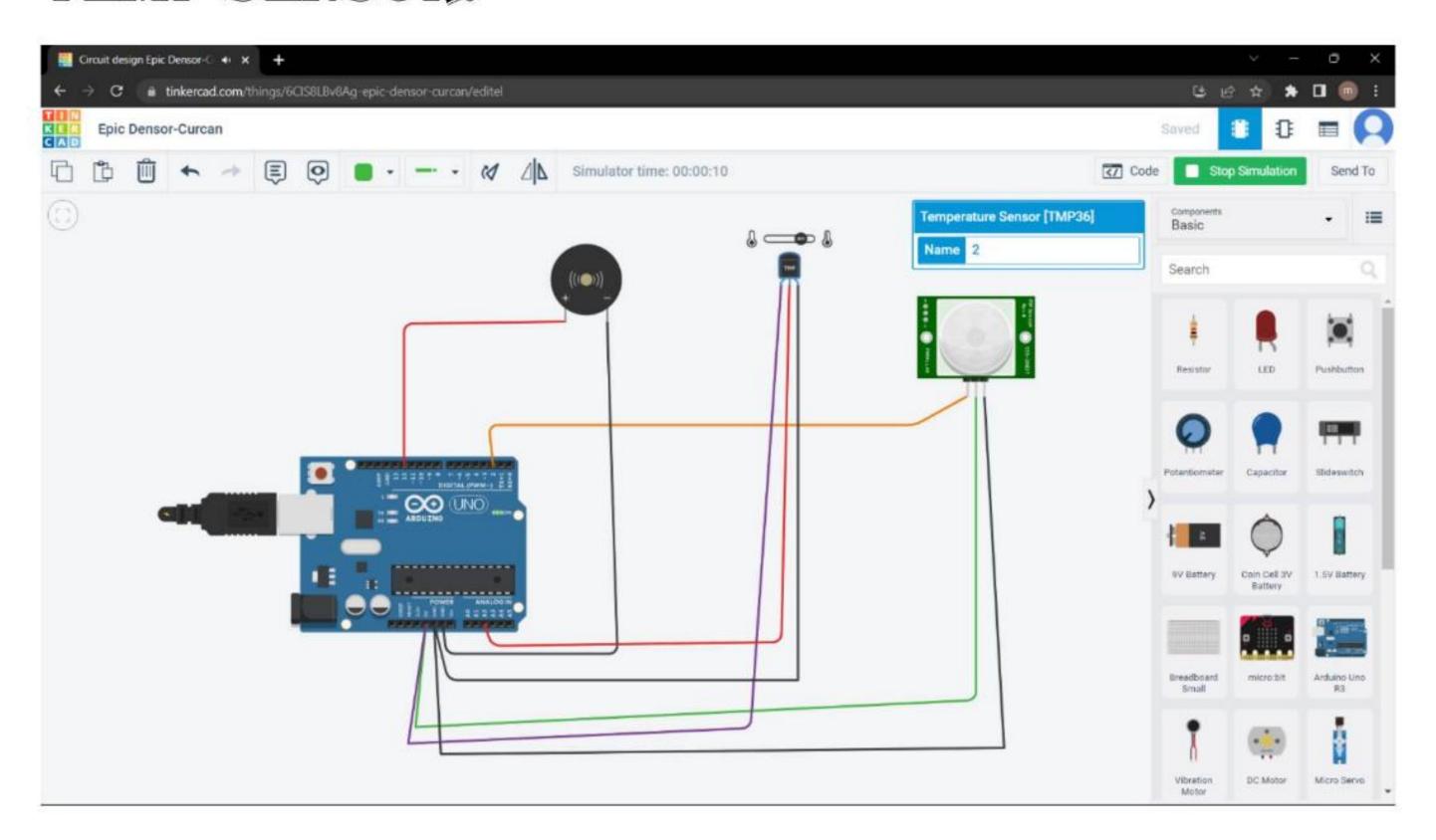


```
SOURCE CODE:
// C++ code
void setup()
 Serial.begin(9600);
 pinMode(2, INPUT);
 pinMode(12, OUTPUT);
vaid loop()
 int motion=digitalRead(2);
 if(motion==1)
  Serial.println("Motion is Detected !");
  tone(12,10);
  delay(1000);
```

```
noTone(12);
 delay(3000);
else
 Serial.println("No Motion!!!");
 delay(1000);
double data=analogRead(A2);
double n=data/1024;
double voltage=n*5;
double offsetvol=voltage-0.5;
double temp=offsetvol*100;
if(temp>60)
 Serial.println("Temperature higher than 60 degrees !!");
 Serial.println(temp);
 tone(12,10);
 delay(1000);
 noTone(12);
```

```
delay(3000);
}
else
{
    Serial.println("Temperature lesser than 60 degrees !!");
    Serial.println(temp);
    delay(1000);
}
```

TEMP SENSOR:



PIR SENSOR:

