**Karpagam College of Engineering**

(Electronics and Communication Engineering)

**Name: Jayanthan C**

**Roll No:** 717819L218

Assignment 1:

Smart home in Tinkercad with 2 sensors, an Led, buzzer

**Code:**

int echo=3;

int trigg=5;

int buzz=2;

int PIR=8;

int PIR\_led=12;

int U\_led=13;

int time ;

int distance;

void setup()

{

Serial.begin(9600);

pinMode(PIR\_led, OUTPUT);

pinMode(U\_led, OUTPUT);

pinMode(buzz, OUTPUT);

pinMode(PIR, INPUT);

pinMode(echo, INPUT);

pinMode(trigg, OUTPUT);

}

void loop()

{

if (digitalRead(PIR)==HIGH){

Serial.println("Alerts ");

digitalWrite(PIR\_led,HIGH);

delay(1000);

}

digitalWrite(PIR\_led,LOW);

digitalWrite(trigg,HIGH);

delayMicroseconds(10);

digitalWrite(trigg,LOW);

time=pulseIn(echo,HIGH);

distance= (time\*0.034)/2;

if (distance<=150)

{

Serial.println("Alert");

digitalWrite(U\_led,HIGH);

digitalWrite(buzz,HIGH);

delay(1000);

}

else

{

digitalWrite(U\_led,LOW);

digitalWrite(buzz,LOW);

delay(1000);

}

}

