**ASSIGNMENT-1**

Circuit Code

int trigger\_pin=2;

int echo\_pin=3;

int buzzer\_pin=10;

int time;

int distance;

float x,y,z,temp;

void setup()

{ Serial.begin(9600);

pinMode(trigger\_pin,OUTPUT);

pinMode(echo\_pin,INPUT);

pinMode(buzzer\_pin,OUTPUT);

pinMode(8,INPUT);

pinMode(5, OUTPUT);

pinMode(6,OUTPUT);

pinMode(A5,INPUT);

pinMode(A4,INPUT);

Serial.begin(9600);

}

void loop()

{

x=digitalRead(8);

y=analogRead(A5);

z=analogRead(A4);

Serial.println(x);

Serial.println(y);

Serial.println(z);

temp=(double)z /1024;

temp=temp\*5;

temp=temp-0.5;

temp=temp\*100;

if ( (x>0) )

{

if ((y<550)&&(temp<550)&&(temp550)&&(temp>30))

{

digitalWrite(5,LOW);

digitalWrite(6,HIGH);

}

else if((y>550)&&(temp550)&&(temp

{

digitalWrite(5,HIGH);

digitalWrite(6,HIGH);

}

else if((y<550)&&(temp550)&&(temp>30))

{

digitalWrite(5,LOW);

digitalWrite(6,HIGH);

}

}