

IBM

SIGNS WITH SMART CONNECTIVITY FOR BETTER ROAD SAFETY

ASSIGNMENT- 1

Source code:

```
int t=3;
int e=4;

void setup() {
  Serial.begin(9600);
  pinMode(t,OUTPUT);
  pinMode(e,INPUT);
  pinMode(12,OUTPUT);
} void loop() {
  digitalWrite(t,LOW);
  digitalWrite(t,HIGH);
  delayMicroseconds(10);
  digitalWrite(t,LOW);
  float dur=pulseIn(e,HIGH);
  float dis=(dur*0.0343)/2;
  Serial.print("Distance is: ");
  Serial.println(dis);
  if(dis>=100) {
    digitalWrite(8,HIGH);
    digitalWrite(7,HIGH);
  }
  if(dis>=100)
  {
    for(int i=0; i<=30000; i=i+10)
```

```

{
tone(12,i);
delay(1000);
noTone(12);
delay(1000);
}
}

double a= analogRead(A0);
double t=((a/1024)*5)-0.5)*100;
Serial.print("Temp Value: "); S
Serial.println(t);
delay(1000);
if(t>=100) {
digitalWrite(8,HIGH);
digitalWrite(7,HIGH);
}
if(t>=100)
{
for(int i=0; i<=30000; i=i+10)
{
tone(12,i);
delay(1000);
noTone(12);
delay(1000);
}
}
if(t<100)
{
digitalWrite(8,LOW);
digitalWrite(7,LOW);
}
}

```

CIRCUIT DIAGRAM:

