

Project Development Phase

Sprint 4

Team ID	PNT2022TMID39018
Project Name	Gas leakage monitoring and alerting system for industries

Code:

```
#include
<LiquidCrystal.h>

LiquidCrystal lcd(5,6,8,9,10,11);

int redled = 2;
int greenled = 3;
int buzzer = 4;
int sensor = A0;
int sensorThresh = 400;
void setup()
{
  pinMode(redled, OUTPUT);
  pinMode(greenled,OUTPUT);
  pinMode(buzzer,OUTPUT);
  pinMode(sensor,INPUT);
  Serial.begin(9600);
  lcd.begin(16,2);
}
void loop()
{
  int analogValue = analogRead(sensor);
  Serial.print(analogValue);
  if(analogValue>sensorThresh)
  {
    digitalWrite(redled,HIGH);
    digitalWrite(greenled,LOW);
    tone(buzzer,1000,10000);
    lcd.clear();
    lcd.setCursor(0,1);
    lcd.print("ALERT");
    delay(1000);
    lcd.clear();
    lcd.setCursor(0,1);
```

```
    lcd.print("EVACUATE");  
    delay(1000);  
  }  
  else  
  {  
    digitalWrite(greenled,HIGH);  
    digitalWrite(redled,LOW);  
    noTone(buzzer);  
    lcd.clear();  
    lcd.setCursor(0,0);  
    lcd.print("SAFE");  
    delay(1000);  
    lcd.clear();  
    lcd.setCursor(0,1);  
    lcd.print("ALL CLEAR");  
    delay(1000);  
  }  
}
```