

# PCB CO2 Detector

☀ Status	Not Started
👤 Assign	
📅 Due	
☰ Description	

```
#include "Arduino.h"
// Pin definitions
const int mq135Pin = A0;
const int redLEDPin = 7;
const int greenLEDPin = 8;
const int buzzerPin = 10;

// CO2 threshold
const int co2Threshold = 136; // Adjust this value based on your desired threshold for high CO2 concentration

void setup() {
  pinMode(mq135Pin, INPUT);
  pinMode(redLEDPin, OUTPUT);
  pinMode(greenLEDPin, OUTPUT);
  pinMode(buzzerPin, OUTPUT);

  Serial.begin(9600); // Initialize the serial communication at 9600 baud rate
}

void loop() {
  int mq135Value = analogRead(mq135Pin); // Read the analog value from the MQ-135 sensor
  Serial.print("MQ-135 Analog Value: ");
  Serial.println(mq135Value); // Print the MQ-135 analog value

  if (mq135Value > co2Threshold) { // High CO2 concentration
    digitalWrite(greenLEDPin, LOW); // Turn off green LED
    digitalWrite(redLEDPin, HIGH); // Turn on red LED
    digitalWrite(buzzerPin, HIGH); // Turn on buzzer
  } else { // Normal CO2 concentration
    digitalWrite(greenLEDPin, HIGH); // Turn on green LED
    digitalWrite(redLEDPin, LOW); // Turn off red LED
    digitalWrite(buzzerPin, LOW); // Turn off buzzer
  }
  // DEBUG Purposes:
  // digitalWrite(greenLEDPin, HIGH); // Turn on green LED
  // digitalWrite(redLEDPin, HIGH); // Turn off red LED
  // digitalWrite(buzzerPin, HIGH); // Turn off buzzer

  delay(1000); // Delay for 1 second before reading the sensor again
}
```