```
int mq2Pin = A0;       // MQ2 analog output
int flamePin = 2;      // Flame sensor digital
output
int buzzer = 8;        // Buzzer pin
int redLED = 9;        // Red LED pin
int greenLED = 10;     // Green LED pin

int smokeLevel = 0;
int flameDetected = HIGH; // HIGH = No
fire, LOW = Fire

void setup() {
  pinMode(flamePin, INPUT);
  pinMode(buzzer, OUTPUT);
  pinMode(redLED, OUTPUT);
  pinMode(greenLED, OUTPUT);
  Serial.begin(9600);
}

void loop() {
  smokeLevel = analogRead(mq2Pin);      //
```

```
Read smoke level
  flameDetected = digitalRead(flamePin); // Read flame sensor

  Serial.print("Smoke Level: ");
  Serial.print(smokeLevel);
  Serial.print(" | Flame: ");
  Serial.println(flameDetected == LOW ? "🔥 Fire Detected" : "No Fire");

  if (smokeLevel > 400 || flameDetected == LOW) {
    digitalWrite(buzzer, HIGH);   // Alarm ON
    digitalWrite(redLED, HIGH);   // Red LED ON
    digitalWrite(greenLED, LOW);  // Green LED OFF
  } else {
    digitalWrite(buzzer, LOW);    // Alarm OFF
    digitalWrite(redLED, LOW);    // Red LED OFF
```

```
    digitalWrite(greenLED, HIGH); // Green
LED ON
  }

  delay(500);
}
```