```
#include <ESP8266WiFi.h>
1
2
      #include <PubSubClient.h>
 3
      const char* ssid = "FITM WiFi";
      const char* password = "";
4
 5
6
      #define mqtt server "m11.cloudmqtt.com"
      #define mqtt port 11915
7
      #define mqtt user "upnkpelr"
8
      #define matt password "GHZ0Xc72wZx-"
9
      float oldTemp = 0.0;
10
      WiFiClient espClient;
11
      PubSubClient client(espClient);
12
      void setup() {
13
        pinMode(D1, OUTPUT);
14
        Serial.begin(115200);
15
      // Lcd.setCursor(2, 0);
16
      // Lcd.print("nuttapun");
17
        delay(10);
18
19
        Serial.println();
20
        Serial.print("Connecting to ");
21
22
        Serial.println(ssid);
23
        WiFi.begin(ssid, password);
24
25
26
        while (WiFi.status() != WL_CONNECTED) {
27
          delay(500);
          Serial.print(".");
28
29
        }
30
        Serial.println("");
31
        Serial.println("WiFi connected");
32
33
        Serial.println("IP address: ");
        Serial.println(WiFi.localIP());
34
35
        client.setServer(mqtt server, mqtt port);
36
        client.setCallback(callback);
37
38
      }
39
40
41
```

```
void loop() {
42
43
        if (!client.connected()) {
          Serial.print("Attempting MQTT connection...");
44
          if (client.connect("iotsub", mqtt user, mqtt password)) {
45
            Serial.println("connected");
46
            client.subscribe("/checkPIR");
47
48
          } else {
            Serial.print("failed, rc=");
49
50
            Serial.print(client.state());
            Serial.println(" try again in 5 seconds");
51
            delay(5000);
52
            return;
53
54
          }
55
        }
        client.loop();
56
57
      }
58
59
      void callback(char* topic, byte* payload, unsigned int length) {
        //Serial.print("Message arrived [");
60
        //Serial.print(topic);
61
        String msg = "";
62
        String to = "";
63
64
        int i = 0;
        while (i < length) msg += (char)payload[i++];</pre>
65
      // Serial.println(msg);
66
        to = topic;
67
      // Serial.print(to);
68
69
        if (to == "/checkPIR") {
70
          Serial.println(msg);
          if (msg.toFloat() == 1) {
71
            digitalWrite(D1, HIGH);
72
73
          } else {
            digitalWrite(D1, LOW);
74
75
          }
76
        }
77
      }
78
```