

The screenshot shows the Arduino IDE interface with the following details:

- Title Bar:** Select Board
- File Menu:** File, Open, Save, Print, Preferences, Help
- Code Area:** The code is titled "DEF-eindproject-groep5.ino". It contains C++ code for an Arduino project. The code reads analog input from pin A0, checks if it's above a threshold (4), and then turns an LED on (HIGH) or off (LOW) accordingly. It also prints the sensor value to the Serial Monitor.

```
12 const int analogPin = A0; // Pin waar de spanningsdeler is aangesloten
13 const int ledPin = 13; // Pin waar de LED is aangesloten
14 const int threshold = 4
15 ;
16 // Drempelwaarde voor 6-bits resolutie
17
18 // the setup routine runs once when you press reset:
19 void setup() {
20   // initialize serial communication at 9600 bits per second:
21   Serial.begin(9600);
22
23   // Zet de LED pin als output
24   pinMode(ledPin, OUTPUT);
25 }
26
27 // the loop routine runs over and over again forever:
28 void loop() {
29   // read the input on analog pin 0:
30   int sensorValue = analogRead(analogPin);
31
32   // print out the value you read:
33   Serial.println(sensorValue);
34
35   // Check if the sensor value is greater than the threshold
36   if (sensorValue > threshold) {
37     // Zet de LED aan
38     digitalWrite(ledPin, HIGH);
39   } else {
40     // Zet de LED uit
41     digitalWrite(ledPin, LOW);
42   }
43
44   delay(1); // delay in between reads for stability
45 }
```

- Status Bar:** Ln 1, Col 1 × No board selected