6.8 Line follower

6.8.1 Tasks:

1. Write the program to control the robot follow the line (actually above the edge between black and white area). Some programming hints you can find in prog. 1 :

Program 1: Line Follower.

```
1    #include "RobotMovingFunctions.h"
2    const int LIGHT_SENSOR_PIN = A0;
3    const int SURFACE_BRIGHTNESS_REFERENCE = 400;
4
5    void setup()
6    {
7      setIOpins();
8      pinMode(LIGHT_SENSOR_PIN , INPUT);
9    }
10
11   void loop()
12   {
13     int light_sensor_value = analogRead(LIGHT_SENSOR_PIN );
14     if ( light_sensor_value < treshold_value )
15     {
16        // do this if robot is over the black line
17     }
18     else
19     {
20        // do this if robot is over white area
21     }
22   }
```

6.8.2 Questions:

1. What is the program function to get the `light_sensor_value`?
2. Determine the movements of the robot if the robot is over the black area and if the robot is over the white area.

6.8.3 Summary:

6.8.3.1 <++> <++>

6.8.4 Issues:

6.8.4.1 <++> <++>