



Pre-Mission Preparation

CodeX has a built-in light sensor. What real-world projects can it be used for?

Answers will vary. Possible answers:

- Turning on outside lights when it is dark.
- Alarm – if a light comes on in the dark.

Mission Objective #1 (Use the Toolbox to answer this question.)

The light sensor is a a _____ .
It can measure both b and c
wavelengths. The light sensor converts light
intensity to a d _____ .

- a. Sensitive electronic device
- b. Infrared
- c. visible
- d. Digital output signal

Mission Objective #2

Change the light shining on the sensor. Write down your observations:

Answers will vary →

| Amount of light | Value from reading the sensor |
|---------------------------|-------------------------------|
| Room light | 10220 |
| Bright light (flashlight) | 64880 |
| Dark light (covered) | 65 |

Post-Mission Reflection

What real-world applications use light sensors?

Answers will vary. Can be similar to the pre-mission answer.

You have now completed 10 coding missions and several remix projects. Reflect on your experience learning to program.

What have been the challenges in learning to program?

Answers will vary – good time for class discussion!

What have been the rewards in learning to program?

Answers will vary – good time for class discussion!