

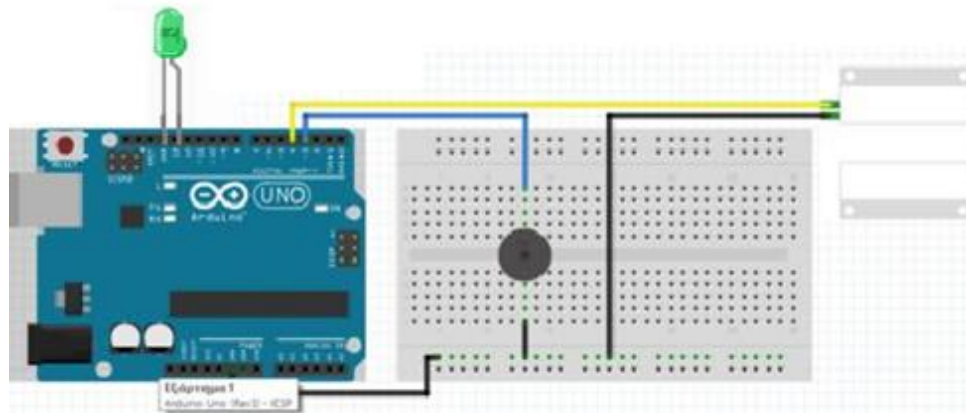
Application: Tutorial on Door & Window magnetic sensor

This is a simple tutorial to set up the door magnetic sensor, to know if someone came or opens the door; it will play some welcoming sound.

COMPONENT NEEDED:

- Door & Window Magnetic Sensor Switch MC-38
- Arduino UNO & USB
- Arduino IDE
- Jumper wire
- Buzzer x 1
- Led x 1

CONNECTION:



Magnetic Sensor	Arduino Uno
Wire 1	GND
Wire 2	D4

**Note: Since the switch is non polar, you can plug in the wires any way.*

LED:

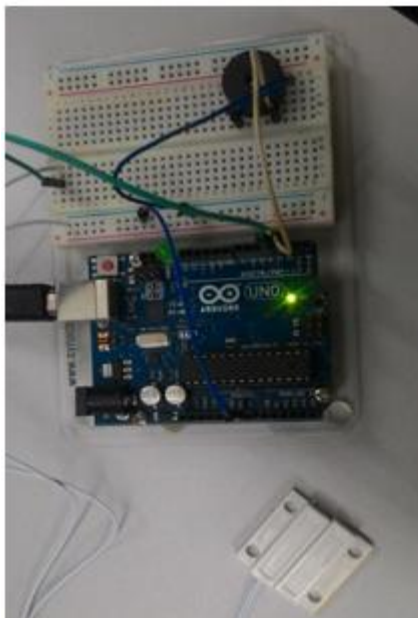
Connect the **positive pin** (The Longer Lead) of the LED to pin **13** of the Arduino.
Connect the **negative pin** (The Shorter Pin) of the LED to pin **GND** (Ground) of the Arduino. Pin 13 and GND should be next to each other.

Buzzer:

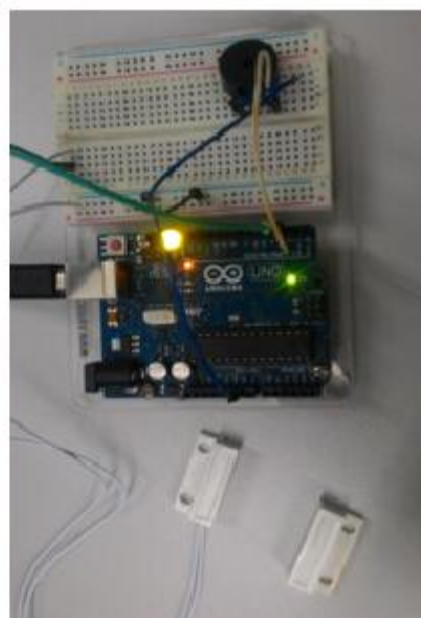
Connect 1 leg to GND, another leg to pin 3 of the Arduino.

1. Connect the circuit as shown in figure above.
2. Open your Arduino IDE.
3. Select the right board type and COM port.
4. Upload the sketch. You can get the sketch from *Application_Sketch*.
5. Once the code of this example has run, move a magnet away and closer to the sensor and watch how the LED reacts!

RESULT:



When door is close.



When door is open.

CONCLUSION:

- When the door is close (move the magnet closer to the sensor), the LED and buzzer will have no reacts.
- When the door is open (move the magnet away from the sensor), the LED will light up and the buzzer will make some sound.