

Light Navigator

*A simple Arduino project using a 5-position
switch sensor and an 8x8 LED display.*

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Introduction

Using an 8x8 LED display (MAX 7219) and a 5-position switch sensor, we plan to create a basic game. Ultimately in this project, we would like to use the sensor to direct a “unit” represented by a lit LED on the 8x8 board around a maze. The “unit” will be able to move in 8 directions. There are a few steps along the way:

- 1. get the 8x8 display working**
- 2. get the sensor working**
- 3. code the parts to work together**
- 4. (optional) translate control of one of the devices into Assembly**
- 5. create a level**

Depending on how well this project is scoped and how hard each step is, we might have to scale back.

The Microcontroller Platform

Microcontroller here

The Test Device

Test device here

Development tools

Dev tools here

The Experiment

Experiment here

<https://www.parallax.com/sites/default/files/downloads/27801-5-Position-Switch-v1.1.pdf>

Conclusions

Conclusions here

Contributions

Contributions here

Project code

Code here