

## LAB #6

# Vim tutorial, Finish class exercises, and Functions

### (2 pts) VIM practice:

Go to this helpful vim tutorial and practice application:

<http://www.openvim.com/tutorial.html>

Click on the practice tab and go through each command listed in the right pane (notice a scroll bar in that pane for more commands)

### (5 pts) Finish class exercises:

First, we are going to finish writing the checks for bad integer values and floating point values.

- Write the functionality to determine if a number is a **good integer value**, and if it isn't continue to prompt the user until a good value is given.
- Write the functionality to determine if a number is a **good floating point value**, and if it isn't continue to prompt the user until a good value is given.

Now, let's learn a new concept: **functions**

- Reuse
- Reduce
- Readability

We will write a function to contain our code for determining if an input is a good integer value.

- What is a function?
- How do we write one in python?
- What is the difference in calling it a `is_good_int()` versus `is_bad_int()`?
- What if we want to write our own `is_digit()` called `my_is_digit()`?

**(5 pts) Change your turtle program from lab #5** to contain a main function, as well as functions for each one of these shapes drawn by the turtle. **Now, prompt the user for which shape they want to draw and then draw only that shape.**

**Ask the user if they want to continue**, and if they do, then clear the screen and ask them which shape they want to draw again. Continue this until the user doesn't want to draw anymore shapes!

1. An equilateral triangle
2. A square
3. A hexagon (six sides)
4. An octagon (eight sides)

**Make sure you handle when the user doesn't enter a good input** for continuing and/or a specific shape they can choose to draw.