# Lab 3 Instructions, Selection, Group B

CS 133JS, Beginning Programming: JavaScript

#### Overview

The objective of this lab is to give you practice using:

- if, else-if, else statements.
- switch case statements.

- Comparison operators.
- Logical operators.

#### Part 1: Exercises

Do the exercises in the CS133|S\_Lab03\_Part1\_Selection Exercises document.

### Part 2: Web Pages

For each of these pages:

- Put the code that does processing or calculations in a function in a .js file.
- Use prompt functions in a script element in the web page to get user input.
- Use getElementById and innerHTML to show output on the web page.

## I. Store Discount

Create a web page that determines the discount to be given by an online store. This is the criteria:

- Members get a 10% discount.
- Seniors (65 or over) get a 5% discount.

Create a web page that prompts the user to enter:

- a. Whether they are a member (yes or no).
- b. Their age.

A senior who is a member will get a combined discount of 15%. Show the correct discount on the web page.

### II. Beverage Labeling

Create a web page that determines the correct labeling for a fruit beverage. There are three categories of beverage:

- Fruit juice: must be undiluted fruit juice and less than 4% added sweetener.
- Fruit drink: must contain at least 5% fruit juice.
- Fruit flavored drink: can have just about anything in it.

Create a web page that prompts the user to enter:

- a. The percentage of fruit juice in the drink.
- b. The percentage sweetener.

The correct labeling for the beverage will be shown on the web page.

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### III. State Tax

Create a web page that determines what tax rate should be applied depending on the state where the purchase is made. The page will prompt for:

a. The name of the state (a string).

Use a switch case statement to determine the tax rate and show it on the web page.

- Here is a list of tax rates: <a href="http://www.tax-rates.org/taxtables/income-tax-by-state">http://www.tax-rates.org/taxtables/income-tax-by-state</a>
- Your switch case should include at least <u>six</u> states that have a state tax.
- For any state that isn't in your switch case, display "unknown state".

## **Submitting your lab work on Moodle**

### **Beta Version**

Post the following in the *Lab Beta forum*:

- 1. The web pages you created for part 2. (Zip the files for you web pages and attach them to the post.)
- 2. A code review of your lab partner's web page for part 2. (Review one of your lab partners' web pages using the Code Review Form provided.)

# **Code Review**

1. Submit a copy of the code review above to the *Lab Code Review assignment*.

### **Production Version**

Based on the review and helpful advice from your lab partner, you may revise your web page. On the code review from your lab partner, complete the "Production" column to show what you revised. Upload the following to the *Lab Production Version* assignment:

- 1. The html and .js files you completed for part 1.
- 2. The web pages<sup>1</sup> you created for part 2.
- 3. The code review <u>from</u> your lab partner with the <u>"Prod" column filled in by you</u>.

<sup>&</sup>lt;sup>1</sup> For each web page upload a .js and a .html file.