Assignment 6: Reflection and Programming Concepts

Reflection:

I encountered issues with allowing the user to click stuffing options. I wanted to allow the user to click a stuffing option and receive feedback that the option was clicked by changing the button to have a checkmark on it. However, I also wanted the user to be able to click the button again to "unclick" the option in case they change their minds. First, I had trouble writing code that allowed the website to know which state the button was in currently. However, after Googling, I found that creating a variable would solve this problem. This was the first time I used a variable in this project, and I was able to learn the usefulness of it and how it can be used in Javascript code. Now I can more easily implement this concept into future code. However, I encountered another bug afterwards. I realized that the buttons were not able to "reset" and be able to be clicked again after being unclicked. I went back and looked at my code and for each line of code, I talked aloud about what it was doing. By doing this, I realized I forgot to set the imagetracker back to "u" for "unclicked" in the else statement. I learned that this method of going line by line in my code was really helpful. In the future, I will use this approach when I encounter a bug in my code and I cannot tell what it is.

Another issue I ran into was approaching assignment 6B. I really struggled with writing code to allow users to add items to the cart and allow them to remove the items. Because it is my first time coding in these languages, I was unfamiliar with how to approach these next steps. Therefore, I went to office hours twice, watched Youtube videos on the topic, and Googled possible resources. I felt as if doing this helped. I learned a lot more about Javascript concepts such as lopping and local storage from the videos. However I did still struggle a lot when writing the code. I experimented a lot with the different methods I learned. I tried my best and my code is commented in the Javascript file. In the future, I hope to continue learning Javascript concepts so that I can possibly be able to complete similar assignments to this one in the future.

Programming Concepts:

- 1. **Function:** A Javascript concept I learned in this assignment was using functions. This allowed me to achieve a diverse number of goals for my website. There were many tasks I wanted to incorporate into my website that would not be run until called, and a function was perfect for this. For example, I used a function to change the image of the item whenever a new color was clicked. I also used a function to provide feedback to the user whenever he/she clicked on a particular stuffing option. For instance, when the user clicks on a particular stuffing option, the button will change to one with a checkmark on it.
- If/Else: I also learned to use If and Else statements in this assignment. For example, I
 wanted to change the picture of the item depending on what color the user picked.
 Therefore, I needed to incorporate some true/false statements into my Javascript code. I

- used if statements to change the product image to a specific image if one button was pressed, but change to another image if another button was pressed.
- 3. Variables: Variables allowed me to easily store a particular value, and retrieve it in the future. For example, when a user clicked on a stuffing choice, I wanted the website to provide feedback to the user that they clicked on it by changing the button visual. However, I also wanted the user to be able to click on the button again to "unclick" the option. Using a variable was very helpful in this situation because I was able to create an "image tracker" variable that tracked which state the button was in. If it was in a clicked stage, I wanted it to switch to unclicked when clicked again, and vice versa, and variables allowed me to do this.
- 4. **Parameters and Arguments:** I was able to also learn and use this concept in my code. When I was creating the function to change the product image depending on the color the user chose, I put a parameter in the function "color." Then, I put in arguments such as "purple," "green," or "yellow," when I was calling the function. This allowed me to have greater control over the function and output a different picture depending on the argument all within one function.
- 5. **getElementByID:** I used getElementByID many times in my Javascript for the homework, and it was very helpful. It allowed me to return the element with the inputted ID. For example, in my product type page, I wanted users to be able to receive feedback when they clicked on a specific product type by creating a box around the product they clicked. I was able to put an ID within documentgetElementById() such as "showclick1" which allowed me to return the element I wanted that had that specific ID in the HTML code.
- 6. **Mathematical operators:** I learned that in Javascript, there are many mathematical operators. For example, == means is equal to, while = would set a value. I used == in my if statements in my function picture change because I wanted to test if 2 values were equal with a true/false statement. However, I used = when I created the variable imagetracker because I wanted to set it to a value.