**Design Document for Celsius to Fahrenheit Conversion Table (Week 10 - Assignment #2)**

**Overview**

This application is a simple two column table with a header line that displays the values of Celsius to Fahrenheit temperatures from freezing point to boiling point. The program uses two double variables to perform the calculation needed to get Celsius to convert to Fahrenheit equivalent. A list box is used to display the data row by row and the user can scroll through the list to get all their required numbers.

**Components and Processing**

There are two *double* variables in the program, named *Fahrenheit* and *Celsius*

The list box is initialized with a header line that establishes which unit is on which side (C on the left, F on the right)

To list all the values from 0 to 100, I used a *for* loop that starts by initially setting the *Celsius* variable to 0, then it will count to 100, iterating one time each loop with a post-fix operator to avoid an infinite loop. The app performs a calculation inside the for loop that is the pre-established formula for changing Celsius to Fahrenheit. It will do this as many times as it needs to, adding a new list box item each time the calculation is performed and then resetting.

**Input and Output**

The program does not take in any input from the user, but the program will display on load the values of Celsius and Fahrenheit from 0 to 100 for the user. In the future, I could add text box controls that allow the user to specify ranges that they want to see (e.g. only show 10 to 50 Celsius to Fahrenheit)

**Testing**

Errors presented on testing:

* Assuming the user does not modify the code, the program will list 0 to 100 and run properly. However, the program can be overloaded and crash if the user somehow modifies the max limit on the for loop to over 1000