## CPSC 349: Front-End Web Engineering – Spring 2020

## Homework 8, due 6 May 2020

In the Tic-Tac-Toe tutorial you followed at the Reactjs.org site, you built a Tic-Tac-Toe game that calculated who was the winner, disallowed moves after someone had won, and had a time machine that allowed a user to back up and try different combinations of moves.

In doing so, you learned some basic features about ReactJS. The game, though, lacked some other basic features, such as:

- 1. It only allowed 3 x 3 grids (which IS the standard).
- 2. it didn't list the coordinates of each move (row, col).
- 3. It didn't **bold** the currently selected move in the move list.
- 4. It hardcoded the creation of the grid, instead of using two for loops.
- 5. It sorted the moves in descending order (which actually makes sense most of the time) It didn't highlight the squares that caused the winning move.
- 6. It didn't display a message about draws (aka Cats' games).

In this homework assignment, you will correct each of these deficiencies. Note, they are listed in order of increasing difficulty.

For extra credit, you can add AI to your game so the computer plays against you. If you allow the computer to go first, the game will be more difficult for you to win.

## Submission

Turn in the code for this homework by uploading your code to a public Github repository. You may discuss this homework assignment with others, however, the work you submit must have been completed by own.

To complete your submission, **print the following sheet**, fill out the spaces below, and submit it to the professor in class by the deadline. Failure to follow the instructions exactly will incur a 10% penalty on the grade for this assignment.

Your name: Ariosto Kuit			
Portfolio:		ariostokuit	.github.io
		owing items and place a checkmar % penalty on the grade for this ass	k in the correct column. Each item incorrectly gnment
Finished	Not finished		
•	$\times$	Prompt the user for the size of th	e Tic-Tac-Toe game and use that size
	,	List the coordinates of each move	e in your Time machine in (row, col) format.
		Bold the currently selected move	e in the Time machine.
		Use two for loops to create the g	rid, instead of hardcoding it.
1		Allow the option of sorting the Tir	ne machine in ascending/descending order.
		Highlight the squares that caused	the winning move in red.
		Display the appropriate message	if the game ends in a draw.
<u>-</u> 2		Add Al to your game so the comp	outer plays against you. (extra credit).
/		Your game runs with no run-time	errors in the React developer tools console
		Your code was built using Parcel	-
/		Push your code to a public Githu	b repository.
Commer	hts:	s://github.com/ariosto	okuit/ReactTicTacToe
		-	

Fill out and print this page, and submit it on the day this project is due.