# COMP 560 Assignment 2- Reinforcement Learning

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https://github.com/tmam101/TicTacToe

**Implemented solution**

Main takes in the parameters and creates a board that is used to play games. The board takes the number of trials (games), and begins learning. During the learning process, we begin by filling empty cells at random, regardless of the reward function. After the first ⅓ of the trials, we choose moves based on the highest reward value. If full, we choose the cell with the next highest reward value. When each move is chosen, the board checks to see if someone has won. If so, we increment the reward of every cell that the winning player used to win. If the board is filled and the game ends in a draw, no cells are rewarded.

**Contributions**

Thomas: choose move function, reward function
Tony: win checking, console input, argmax used in choose move
Ellie: choose move function, reward function