Policy Iteration Agent Report

The second question asks us to implement a policy iteration agent. We edit four functions, initRandomPolicy(), evaluatePolicy(), improvePolicy() and train().

The below output is tested against a user Choose location to put your O based on the following scheme. 0|1|2 3|4|5 6|7|8 Your move: 0 Playing move: O(0,0) 10111 IIIII $\Pi\Pi\Pi$ Playing move: X(1,1) 10111 | |X| | $\Pi\Pi\Pi$ Choose location to put your O based on the following scheme. 0|1|2 3|4|5 6|7|8 Your move: 2

Playing move: O(0,2)

0 0
X
Playing move: X(0,1)
0 X 0
X
Choose location to put your O based on the following scheme.
0 1 2
3 4 5
6 7 8
Your move: 6
Playing move: O(2,0)
0 X 0
X
0
Playing move: X(2,1)
0 X 0
X
O X
X won!

The below output was tested against the provided test cases

Against Defensive agent:
X won!
Wins: 45 Losses: 0 Draws: 5
Against Aggressive agent:
X won!
Wins: 50 Losses: 0 Draws: 0
Against Random agent:
X won!

Wins: 49 Losses: 0 Draws: