

Final Programming I Project – TicTacToe JAVA Edition

Implementations:

- All the basic options
- Advanced functions
- CPU mode (AI Mode in-game)

Brief outline:

All the code was written or adapted to fit my needs. Originally written in Visual Studio Code and later adapted to comply with all of the project guidelines and specifications, and function perfectly in Eclipse's console.

Runtime Instructions:

The game "TicTacToe JAVA Edition" is only available to be played in the Eclipse console, or in virtually any other console with the necessary Java Runtime Environment (JRE) packets installed, with the command `"java -jar "file directory\file name""`.

The user will be welcomed to the game, asked if they would like to see the instructions, and later prompted to select a game mode. An exit command "exit" at this point will terminate execution.

Game Modes:

- Multiplayer:
The game will ask the players to select their respective names and chips, only available to be chosen once upon the first run.
The game will proceed to show the game board and ask Player 1 for their first move.
The first player to have three chips in a row will win, and the win will be noted.
The users will be asked if they want to play again. If they re-launch the game, a scoreboard with the current statistics will be shown. After it is dismissed, they will either be asked if they want to read the instructions (only if they previously declined to do so), or directly select their desired game mode. If the user declines to re-launch the game, the program will end.
- AI Mode:
The game will ask the user what player they would like to continue as, either Player 1 or 2. If the usernames and chips had been previously selected, the game will automatically start, else the user will be prompted to fill in the data for their user of choice (the other user's data will remain null and will not be used during the game runtime).
The AI is not actual Artificial Intelligence, it will select a random position on which to place its chip.
Whichever player places three chips in a row first, either the user or the AI, the win will be noted.
If the user chooses to play another game, the scoreboard will be shown. After the user dismisses it, they will either be asked if they want to check the instructions (only if they previously declined to do so), or directly their selection for the next desired game mode. If the user declines to re-launch the game, the program will end.
- At any point during a game, the user may exit to the menu by typing "exit" instead of a board location, and subsequently the program by typing "exit" in the main menu. In any feature complete terminal, the user may also directly quit the program with the command "Ctrl + C" at any given point.