**TIC TAC TOE GAME PROJECT**

**Theory of Game:**

A player can choose between two symbols with his opponent, usual games use “X” and “O”. If first player chooses “X” then the second player have to play with “O” and vice versa. A player marks any of the 3x3 squares with his symbol (may be “X” or “O”) and his aim is to create a straight line horizontally or vertically or diagonally with two intensions:

• Create a straight line before his opponent to win the game.

• Restrict his opponent from creating a straight line first.

In case logically no one can create a straight line with his own symbol, the game results a tie.

Hence there are only three possible results – a player wins, his opponent (human or computer) wins or it’s a tie.

**Objectives:**

1. Check win function
2. Board function
3. Main function

**Check win function:**

This function determines whether the player 1 has won or the player 2 or it’s a draw and will display the result of the game. Switch case statements will be used in this function to determine results.

**Board function:**

This function provides the grid which will be used as a playing board. Arrays can be used to make a 3 by 3 grid**.**

**Main function:**

Main logical and arithmetic operations occurred in this function. It will also ask the player if they want to play more or quit.