Tic-tac-toe, alternatively called noughts and crosses, X's and O's, and many other names, is a pencil-and-paper game for two players, O and X, who take turns marking the spaces in a 3×3 grid, usually X going first. The player who succeeds in placing three respective marks in a horizontal, vertical, or diagonal row wins the game or In Tic-Tac-Toe a game can end with a player winning (getting 3 of his pieces in row) or end in a draw (no spaces left on the board with no-one winning)
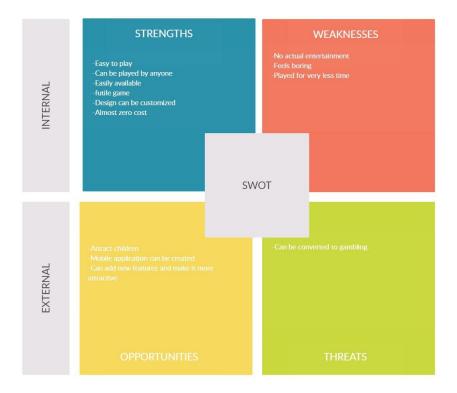
Basic system requirements

- Operating system (any)
- GCC compiler
- CMake

Defining Our System

The game can be generalized to an m,n,k-game in which two players alternate placing stones of their own colour on an m×n board, with the goal of getting k of their own colour in a row.

Cost and Features

The cost of the game depends on the requirements of players. It can be modelled as a 3D game which requires heavy software tools, we can add music, we can make it an online game which requires database, or it can as simple as entering from keypad of a old model mobile phone.

SWOT analysis:

INTERNAL

STRENGTHS
-Easy to play
-Can be played by anyone
-Easily available
-futile game
-Design can be customized
-Almost zero cost

WEAKNESSES
-No actual entertainment
-Feels boring
-Played for very less time

EXTERNAL

OPPORTUNITIES
-Attract children
-Mobile application can be created
-Can add new features and make it more attractive

THREATS
-Can be converted to gambling.

As we are planning to design a simple game with a very basic user interface (UI), the cost required is zero if a computer available.

SWOT Analysis

4W's and 1'H

Who:

- Children and young inquisitive teenagers who enjoy challenging themselves.

What:

- The tic tac toe game aims to improve the user's quick and strategic decision making skills, by helping them think of the optimal solution for victory

When:

- When you feel the necessity to sharpen your stratergic skills.

Where:

- This game can be played anywhere and is supported by most of the platforms without the use of internet.

How:

- This is a two player game, take turns in making your move and enjoy!