**Proposal**

Project Name: **Local Area Network Sudoku game.**

**Introduction:**

**Sudoku** is a logic-based, combinatorial number-placement puzzle. The objective is to fill a 9×9 grid with digits so that each column, each row, and each of the nine 3×3 sub-grids that compose the grid (also called "boxes", "blocks", "regions", or "sub-squares") contains all of the digits from 1 to 9.

You can play this game by LAN with someone else or in single mode. When it is on multiplayer mode winner will be decided by in 5 minutes who solves puzzle or when time is over the player who fills the most cell correctly. Only two players can play by LAN. Each player can see the opponent’s board. In single mode player can choose difficulty mode.

**Help:**

Difficulty mode has 3 options (Easy, Medium, and Hard). Difficulty modes will be depending on Sudoku solving techniques. It has a help option. Help option checks whether player can fill that cell with that number or can’t. Player’s filled numbers are in different color from computer numbers. Player can control this game by keyboard with mouse.

**Difficulty:**

There are lots of Sudoku solving techniques so putting the first few numbers on the board will resemble the difficulty. Depending on 1 direction scanning technique on board filling cells will be easier. First few cells are easier to fill using 1 direction scan. Last cells can be more complicated then player should use 2 directions or some other kind of technique to solve it.