Vision Document

Introduction:

In this project we plan to create a computerized version of the board game “Ricochet Robots” which will include computer players, and multiple boards and difficulty levels. The game will also allow the user to pause progress and will cater those with color vision problems.

Problem Statement

Currently players of ricochet robots must find other people to play with and must physically meet in order to play the game. They also must maintain the quality of the board and must replace any lost pieces. Our digital version of this game will allow for players to play by themselves against the computer players. It also allows players to play from there device instead of having to meet with others. The digital nature of our game also means that the player doesn’t need to worry about maintaining the parts of the game. Our game will as well allow players with colour blindness to play the game with ease unlike the board version.

Stakeholders & Key Interests

Stake Holders	Key Interests
Players	To play the game
Board game manufacturers	To sell material version of the game
Parents	To have their children occupied for a period of time

Users & User-Level Goals

User	Goals
Player	Select the board, select the difficulty level, select the colour palette, start the game, play against the computer players, save progress to play at another time, resume progress at later time, win or lose game, choose whether to play again or not.

Summary of System Features

The game allows the player to choose a difficult level
The game allows the player to choose the board to play on
The game allows the player to choose the colour palette for the game
The game allows the player to choose the number of human players
The game allows the player to save their progress to resume at another time.
The game provides computer players to play against the human players
The game provides an optional hint on how to start the game
The game can be run on a Linux console without modification

Project Risks

Creating a method of saving the players progress so they can start again at another time may prove difficult depending on the coding ability of the group members and the workload from other courses.

Creating the computer players may prove to be challenging as this is a more complex game requiring more sophisticated game logic for the computer players.

Coordinating the work between all team members in an efficient was may be difficult if communication isn’t well established.