Project Vision Document

1. Introduction

In this project, we aim to build a game called, "Kingdomino" which is essentially a board game played by 2 or 4 players. There must be at least one human player involved in the game. The objective of this game is for players to build their own empires out of game tiles of different types that range from forests, beaches, wastelands, and etc.

2. Problem Statement

It is not always possible to play Kingdomino with 1, 2 or 3 other players in person. Given the current pandemic and people having to distance and isolate themselves, it is difficult to play a game that requires more than one person to work. Hence, in order to reduce the requirement of players required to play Kingdomino, our group is looking to build this game in a way such that a singular player can play with other players simulated by the computer and as a result make the game work.

3. Stakeholders and Key Interests

Stakeholders	Key Interests
Human Player	Having the ability to play the game with other human players and/or computers and being able to see their points and their kingdoms
Game Developers	

4. Users and User Level Goals

User	User-Level Goals
Human Player	Take a turn, Start a game, restart the game, save a game, choose computer difficulty, choose numbers of players, choose type of players, view instructions, view score, view tiles, select tiles, arrange tiles, be able to change theme color, choose color.

5. Summary of System Features

- The system shall start a 2 or 4 players game.
- The system shall allow restarting a game, saving a game, or loading a saved game
- The system shall allow to enable color-blind mode
- The system shall allow computer difficulty selection.
- The system shall allow viewing of instructions.
- The system shall calculate and view points.
- The system shall provide hints during a player's turn.

6. Project Risks

Designing and building this game with multiple difficulties for the computer to simulate could pose a difficulty. The project could also potentially run into an operational risk if there is a lack of communication and cooperation between the team members. The team could additionally run into more operational risks if there is a lack of clarity of roles and responsibilities in the project. Other potential project risks include technical risks due to the high complexity in implementation of the game.