**Vision Document:**

**Introduction:** In this project, our aim is to build a computerised version of "Blokus" game with Java GUI. The game involves 2, 3 or 4 players. One of the players must be a human, the rest are computer players.

**Problem Statement:** Blokus is typically a board game which is played physically with the players who have physical presence in the same location. In this project, we are developing the game so it can be played on a computer which allows the players to play the game without any physical presence next to each other. Moreover, if a player wants, the game can be played with the computer as well. A computerised version of the game will make it more accessible and portable for the users and anyone can play it in their convenient time without having to rely on the availability of other players. This version of the game also allow users to pause the play and resume it at a later time.

**Stakeholders & Key Interests:**

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| **stakeholders** | **Key Interests** |
| Players | -Playing the game smoothly without facing any technical difficulty  - Being able to see points and progress of each player - Being able to pause and resume the game |
| IT Staff | -Making sure the game runs smoothly on users’ computer - Doing regular maintenance and updating the game |
| Sellers | -The performance and quality of the game is up to the mark so the game sellers can market it and sell it |
| Advertisers | - To check the growh and popularity of the game so advertisers can show advertisements in corners of the game while being played (available in free version only) |

**User & User-Level Goals:** In a seprate file named *'Actors and their goals'* as specified by the instructor.

**Summary of System Features:**

* The system shall allow user to select the number of players to play with
* The system shall allow user to choose the strategy setting from Easy, Medium and Hard
* The system shall allow user to pause and resume the game
* The system shall provide users the hint on where to lay a piece
* The system shall display the winner and runners up of the game
* The system shall allow viewing the rule of the game while playing
* The system shall allow user with vison dificiency to play the game
* The system shall allow user to rotate and flip pieces
* The system shall allow users to view the current points of each
* The system shall allow user to reset the game

**Project Risks:**  
 Since, only 4 group members are active right now, given the complexity of the project, it might be difficult for the members to finish the project successfully on time. Moroever, The project requires advanced level of programming knowledge in Java and Java Swing, which most members lack. At the same time, developing algorithm for the 'hard' mode of the game is going to be a challenging task. Similarly, making the game usable for people with color deficiency will require knowledge of AI and no member has any knowledge on it.