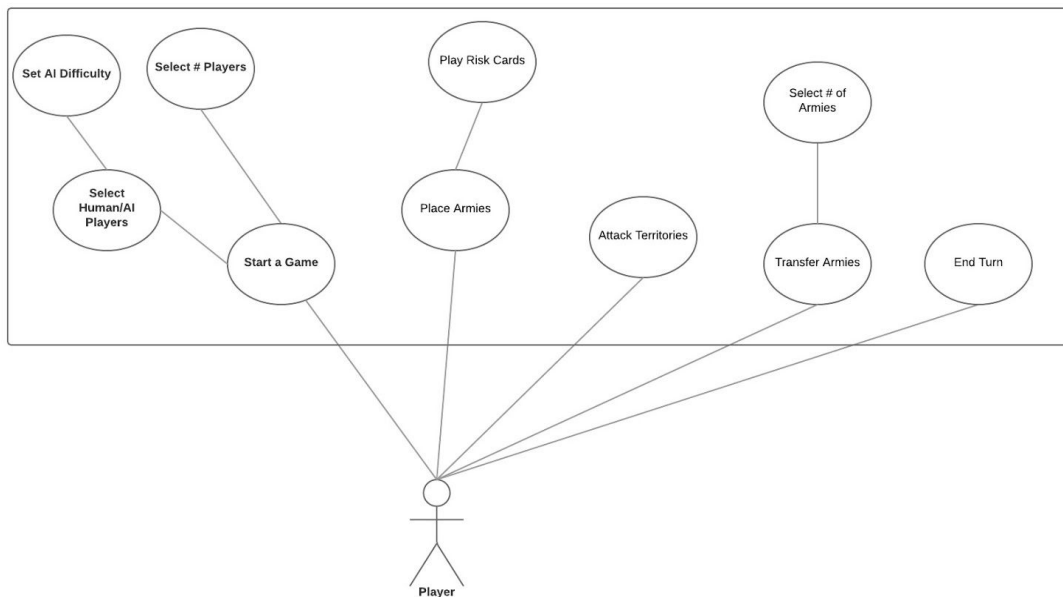


Our program recreates the traditional board game Risk in a format that can be played on a computer. Users are given the option to play with up to 5 friends on the same machine or play by themselves against computer players. They are provided with a graphical game board that allows them to visualize the game they are currently playing. Ultimately, the user is able to play through a standard game of Risk and come out victorious.

RISK USE CASE DIAGRAM

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Risk essentially consists of two phases: the setup and the battle phase. In the setup, the players are given a set amount of armies based on the number of players partaking in the game. They then take turns claiming territories on the map by placing a single army on an open territory. After every territory on the map has been occupied, players continue taking turns placing single armies on their own territories until every player has placed all of the armies that they were allotted to them at the beginning of the game. The game then enters what we call the battle or main phase which is the core of the game. At the beginning each turn during this phase,

the players are given an amount of armies determined by factors such as the number of territories they currently own, continents under their control, and the risk cards in their possession. They are then given options to attack opposing territories, fortify their own territories, and transfer armies between adjacent owned territories. Players can choose to end their turn at any point after their turn has started, thus starting the turn of the subsequent player. The game continues this cycle until one player owns all the territories of the world and is the victor.

SETUP

When the program is first run, press the Start Game button to initialize a game.



Use Set Number of Players to determine the number of total players (2-6) and AI players (0-6) in the game, then you may choose to enter names for the players in the boxes (any left blank will be generated)



Each player takes turns claiming territories by pressing Move/Add Armies then selecting an unclaimed territory by pressing the Add Army button on that territory. As shown below, the current player is only able to choose any unclaimed territory



Once all territories have been claimed, the players keep placing armies by adding them to their owned territories until they run out of armies (listed next to their name).

GAMEPLAY (EACH TURN)

Receiving Armies: Automatically calculated, the player receives 1 army for each 3 territories they control (rounded down) plus bonuses for controlling entire continents (or a minimum 3 armies). This number is listed next to the player's name.

Placing armies: When a player has armies, they place them on their territories the same way as in the setup. A player cannot end their turn with armies left to place.

Attacking: A player can attack as many times as they want during a turn by pressing the Attack button and selecting the territory they wish to attack from (left) and to (right).



The player then selects how many armies to attack with (1-3)

Roll Dice: After a number of attackers is selected, the player presses the Roll Dice button to determine the outcome. The outcome is automatically calculated, and the territory is conquered if no defending armies remain. Shown below, 3 Irkutsk armies conquered Siberia.



RISK Cards: Players get 1 RISK card each turn they conquer a territory (up to a max of 5 cards). Each card has a Soldier, Horse, or Cannon icon. Pressing Risk Cards displays the player's cards (the player shown below has none)



If the player has a valid combination of 3 cards to turn in (3 of one type, or 1 of each type), then they may choose to press Trade In to discard the set and gain bonus armies to place on the board. Each time a player redeems their cards the number of bonus armies goes increases.

Transfer Armies: Pressing Move/Add Armies when the player has no armies to add allows them to select a territory to move from, the number of armies to move, and the adjacent territory to move them to.

WINNING

When a player loses their last territory, they are eliminated. Once all but one player have been eliminated, that player is the winner (shown below, blue wins)



Citation:

Official RISK rules - <http://www.hasbro.com/common/instruct/risk.pdf>