

For my project I propose a board game that accompanies the Mathemalchemy exhibit, similar to the Comic book. This board game would be called "Mathemalchemy Quest" and it would feature the different locations in the exhibit and questions that relate to the math used. For example, in Knotical Bay a question card might have a picture of a knot and ask a player to identify it. Moving past the stack of books, players would have to answer questions related to math history, such as "Even though Pascal's triangle is named after French mathematician Blaise Pascal, who is believed to have first conceived the idea?" To which the answer would be "Jia Xian". I think this board game would allow people to interact with the exhibit more and to feel more engaged with it.

How to play:

Objective: The objective of the game is to be the first player to traverse the board and make it back to the "START" square.

Materials Needed:

1. Game board (representing different areas of the Mathemalchemy exhibit)
2. Player tokens (different colored pieces)
3. Chance Deck
4. Question Decks (Blue deck for Knotical Bay, red deck for The Lighthouse, green deck for Zeno's Path, purple deck for Prime Park, and a yellow deck for The Book Stack)

Game Setup:

1. Place the game board on a flat surface.
2. Shuffle each deck and place them within reach of all the players
3. Each player chooses a token and places it on the starting space of the game board.
4. Determine who goes first (you can use a dice roll or any other method).

Gameplay:

1. Players take turns rolling the dice and moving their tokens counter clockwise along the game board.

2. Different color spaces indicate different actions that must be taken.
3. When a player lands on a colorful space, they must draw a card from the related Question deck to answer a question that corresponds to the area they landed on. If they answer correctly, they can move forward an additional space. If they answer incorrectly, they stay on the same space.
4. When a player lands on a gray space, they must draw a card from the Chance deck which may be good or bad. For example, it could say "Miss a turn" or "Move forward two spaces".
5. The first player to return to the "START" square wins the game