

Checkpoint 2 Documentation

Features of Minimum Viable Product (MVP) + Task Breakdown

1. 5x5 grid representing players' guessing attempts
 - a. Implement the graphical representation of the grid
 - b. Ensure numbers can be inputted by the user
 - c. Ensure alphabetic letters and symbols (i.e. &, *, @...) are ignored or considered invalid input
2. Button for setting user-desired text color preferences upon game startup
 - a. Set up button for listening
 - b. Implement a list of values from which the user may select a color preference
 - c. Save the preferred option
 - d. Load the saved option upon game start up
 - e. Set default text color as black if no known selection was made
3. Button to submit a guess
 - a. Add a button for event listening below the guessing grid
 - b. Validate input again before comparing with the correct guessing number
 - c. Trigger some type of feedback for the user i.e. "guess submitted!" or have the feedback appear visually on the grid
 - d. Send the user to the success screen if their guess is the correct number
4. Button to receive a hint
 - a. Place a button on the screen for optional hints (opportunity for monetization model here)
 - b. Provide a message to the user about the number of hints left and/or what number is in the correct position (if any)
 - c. The hints button could very well be replaced or added in addition to a color-coded scheme where the digits are highlighted in various colors based on their positioned correctness (based on user-value, this feature is not included in the MVP).
5. Button to share your score after winning
 - a. A success page built out for when the user correctly guesses
 - b. Add a button for the option to share your score with others via text
 - c. Minimally, users should be able to see their own score and reflect on their gameplay in this way
6. Colors and layouts that are engaging but not too distracting or overwhelming to the eye
 - a. Utilization of colors like black, red, blue, and green
 - b. Ensure users are allowed to choose their text color based on user-desired text color preferences button (MVP requirement #2)

Mapping Between App Features + Values

Feature #1: *5x5 grid representing players' guessing attempts*

- The game *Numbly* revolves around a functioning grid that users can input guesses into and subsequently see their guesses. This feature is crucial for storing guesses and having users see their guess before and after submitting. The grid represents how many guesses a user has left as well, meaning that they must see the grid graphically to understand the gameplay altogether.

Feature #2: *Button for setting user-desired text color preferences upon game startup*

- Users of any age want to feel that a game is interactive and that they may have input in how the game is presented to them. By allowing users to choose their favorite color to be set as the default text color, it affords a sense of control and interactivity that otherwise would not be created without this user-inputted system setting.

Feature #3: *Button to submit a guess*

- A button for submitting a guess reinforces *Numbly's* emphasis on simplicity and user engagement by giving players a clear, intuitive way to interact with the game, keeping the focus on the puzzle-solving experience.

Feature #4: *Button to receive a hint*

- Offering hints supports accessibility and fairness, ensuring that players of different skill levels and ages can enjoy the game without feeling stuck. This aligns with *Numbly's* value of creating a fun yet challenging experience without the time-consuming nature of other games on the market.

Feature #5: *Button to share your score after winning*

- Encouraging social interaction and friendly competition, this feature promotes community and replicability, motivating players to challenge friends and celebrate successes in-person and miles away from one another. Users may reflect on their scores and challenge themselves and others to solve the puzzle faster and in fewer guesses than before. Because *Numbly* focuses on solving problems and improving cognitive function in a time-friendly fashion, it is a perfect way to connect with others and sharpen your skills.

Feature #6: *Colors and layouts that are engaging but not too distracting or overwhelming to the eye*

- By prioritizing aesthetics that are visually appealing, but not distracting, this feature supports inclusivity of all gamers and enhances experiences for a broad audience. *Numbly* ensures that both young and old players can enjoy the game comfortably, and the intuitive layout of the game invites players from all skill levels to play.