System and Unit Test
Game of Cards
Team WildCard
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System Test scenarios:

Sprint 1 user stories:
- As a user, I want to have a functional user interface that allows me to pick a card game to play and modify settings.
    - Launching GameOfCards.exe and choosing the graphics and resolution settings.
    - The user should be greeted with a menu that includes: Play, Options, Credits, and Quit.
        - The user can click on any of these with their mouse to go to its respective menus. If…
            - The play button is clicked, we are taken to another menu where we can choose either to play Chance or Blackjack.
                - The user can click Chance to play Chance.
                - Or, they can click Blackjack to play Blackjack.
            - The options button is clicked, we are taken to a menu where we can change the sound settings.
            - The credits button is clicked, we are taken to a menu where it lists the developers of the game (us!).
            - The quit button is clicked, the application ends and GameOfCards closes.
    - All scenes have a back button where the user can go back to the previous scene.

Sprint 2 user stories:
- As a user, I want to have an engaging original single player card game called *Chance*.
    - Clicking on Play then Chance should bring the user to the Chance game.
    - The user can click on: Rules, Swap Card, Next Round, End Turn, Restart Game, and Back. If…
        - Rules is clicked, a graphic containing the rules will pop up.
        - Swap Card is clicked, you will randomly select one of your cards located at the bottom of the screen and swap it with one of the dealer's cards. Your score will change because of the swap.
        - Next Round is clicked, the turn has ended and you are moving onto the next round.

- ■ End Turn is clicked, you end your turn and the game determines who is the winner of the round.
- ■ Restart Game is clicked, the game has ended and you want to start another.
- ■ Back is clicked, the game ends and the user is taken back to the play menu.

Sprint 3 user stories:
- ● As a user, I want to play *Blackjack*.
  - ○ Clicking on Play then Blackjack should bring the user to the Blackjack game.
  - ○ The user can click on Rules, Hit, Stand, Play Again, and Back. If…
    - ■ Rules is clicked, a graphic containing the rules will pop up.
    - ■ Hit is clicked, you draw one card that gets added to your hand sum.
    - ■ Stand is clicked, you don't draw a card and end your turn. The dealer chooses to draw if they choose.
    - ■ Play Again is clicked, the game has ended and the game will restart.
    - ■ Back is clicked, the game ends and the user is taken back to the play menu.

Sprint 4 user stories:
- ● As a user, I want a full game experience that includes music, sound, and other additional effects.
  - ○ Launching GameOfCards.exe and choosing the graphics and resolution settings.
  - ○ The user should be presented with music in the main menu.
  - ○ Upon clicking Play and then Chance or Blackjack, the user should be able to hear sound effects for drawing cards as well as some other sound effects.

Unit tests (Located in GameOfCards > Assets > Testing)**:**
- ● BlackJackUnitTest
  - ○ Tests Blackjack.cs and CardStack.cs.
- ● ChanceUnitTest
  - ○ Tests Chance.cs and CardStack.cs.
  - ○ Tests that Chance.cs can start a game, calculates hand scores and determine who wins a current round.
- ● DeckUnitTest
  - ○ Tests CardStack.cs.
  - ○ Tests that player hands can be created, hold onto cards, draw cards, and can be shuffled.
- ● MusicUnitTest
  - ○ Tests Sound.cs and AudioManager.cs.

- ○ Tests that check to see if songs can be loaded in and that AudioManager can be created.
- ● UIUnitTest
  - ○ Tests System.Button and System.Text.
  - ○ Tests that buttons and text can be created.