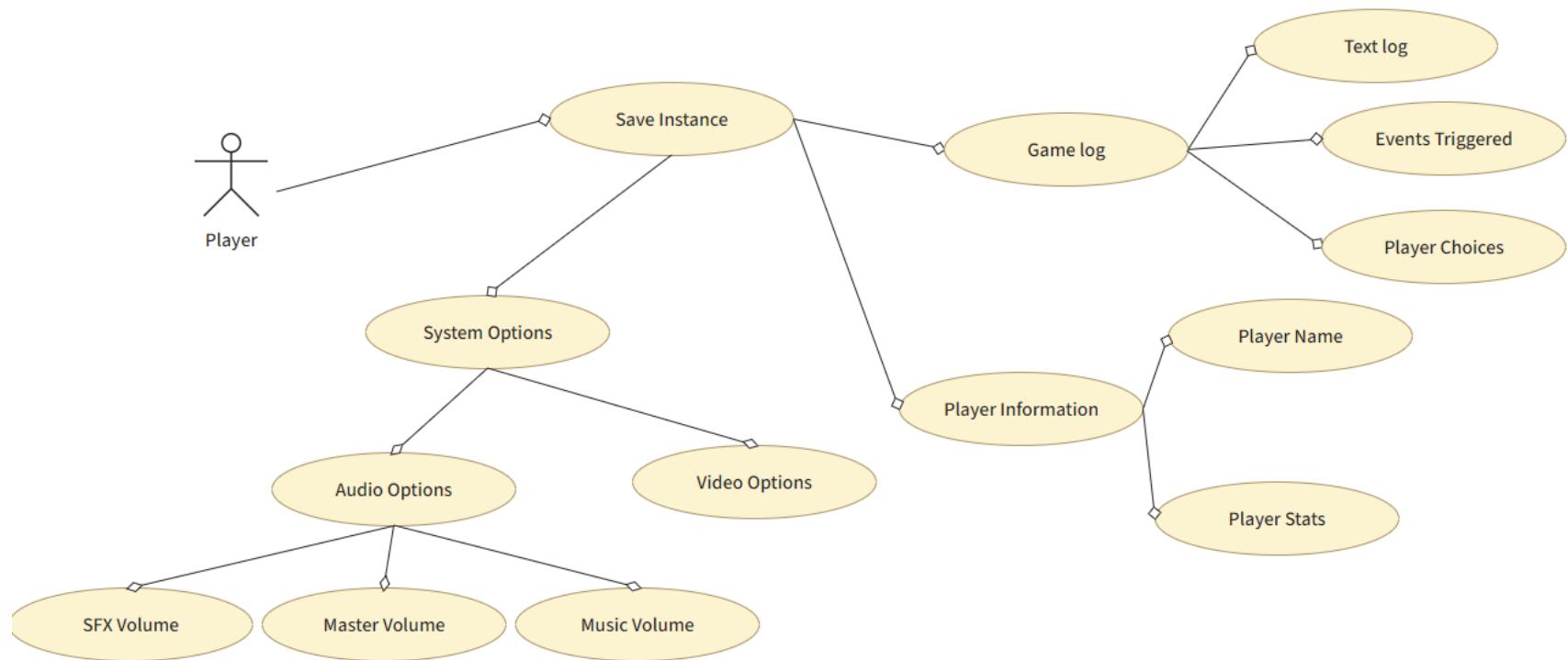


High Level Requirements:

- 1) This application will be coded in python using RenPy library
- 2) At the beginning of the application the user will be able to choose their name and from different preset option designs.
- 3) The application will store a number of different stats that will be stored and viewable to the player that will change based off the decisions they make, ex: stress levels, knowledge, social standing
- 4) The application will have branching paths based off stats and decisions they make: example stress levels were too high and you got sick.
- 5) The application will display choices that the user can pick that lead to different events, However if a stat requirement is not met the option will be grayed out.
- 6) The user must be able to save and load their progress.
- 7) The user must be able to see a text history log.
- 8) The program must be able to add background music based on what scene the user is in.
- 9) The program needs to be able to change the volume of music.
- 10) The program needs to have an auto scroll text feature, and a skip text option.
- 11) The program will need to implement “bad” endings, that will restart you to a previous choice.
- 12) The program will have mini games based off real world computer science constructs
(ex: game with demon mini game, spot the semicolon)
- 13) The program will have a calendar on the top right keeping track of the date throughout
The user’s semester.

Domain Model:



Use Case Diagram:

Main Menu

Basic Course:

After launching the exe file the user will be sent to the main menu. The main menu will have background music playing on a loop.

When on the main menu they will see four buttons that they can click. One of them is a new game button where they will start a new playthrough. They will be prompted with an enter username prompt that will be their name for the rest of the game. The other option that they have is to load the game. From there they will see multiple save files and be able to “load” their previous save states.

Alternate Course:

Options button is clicked

When the option button is clicked they will have the option to change the music volume, sfx volume, or the master volume. They will also have the option to change the game’s window size from full screen and window mode. After completely changing what the user will then click on the return to main menu button where they can press of any of the four buttons.

Exit button is clicked

When the exit button is clicked the program itself will terminate and the window will be closed.

Start Game

Basic Course:

After either starting a new game or loading a save state, the user will now have entered into the game itself. From here the User continue clicking the text to read through the game’s dialogue. The game will provide the User have choice prompts on the character

trait screen that will effect the user's stats. The user will select their traits by clicking on the buttons and will be taken to the prologue screen..

Alternate Course:

User clicks save game:

While in game there will be a buttons of the UI giving you different options. One of these is save game, when the user clicks that they will be redirected to a save game menu that when you click in a slot will save your game:

User clicks load game:

While in game the user will click on the load game button and be redirected to a load game screen. Here they will see the user's save states that they inputted. If the user clicks on it they will be able to load the game from where they saved it

User clicks exit game:

While on the main menu screen the user can click the exit game button. A pop up will ask if they are sure they want to close the game if they say yes the game will exit, and if they say no it will redirect them back to the game

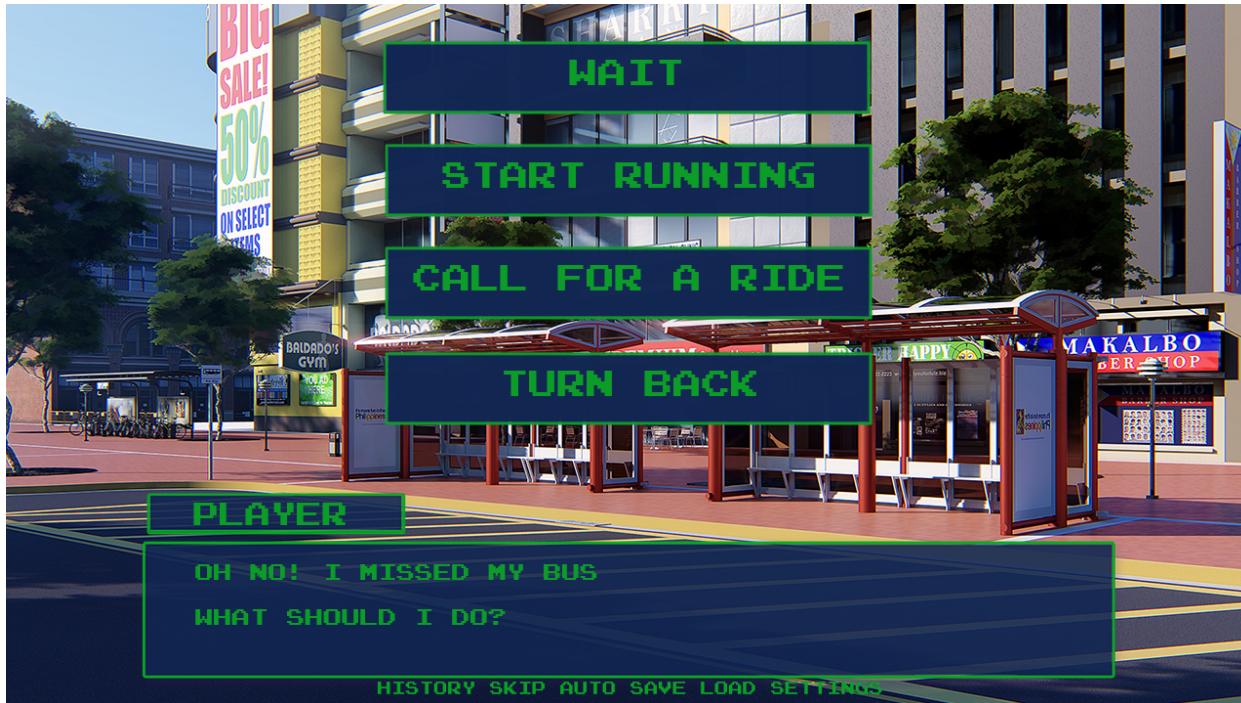


Storyboard so far:

New game -> Enter username -> Start game -> Brief introduction on main character -> prepare to go to new student orientation -> on the walk home to the bus daydream about who the main character was, what highschool they went to, why they chose to go to this college and ended up choosing programming -> miss bus due to daydreaming -> end up late to new student orientation -> meet best friend character (name subject to change) who will be one of the main characters in the game -> go back home -> get first prompt of what you want to do stay up researching the school, head out to a local diner, or go to bed early -> attend first day of school -> (rest is wip)

GUI:





```
1 # Define the list of standard coin denominations
2 denominations = [1, 5, 10, 25]
3
4 # Function to make change from standard coins using dynamic programming
5 def make_change(amount, denominations):
6     # Initialize a dictionary to store the number of coins needed for each amount
7     num_coins = {0: 0}
8
9     # Iterate over the denominations in descending order
10    for coin in sorted(denominations, reverse=True):
11        # Iterate over the amounts from 1 to the target amount
12        for i in range(1, amount + 1):
13            # If the current denomination can be used to make change
14            if i >= coin:
15                # Check if the current denomination plus the number of coins needed for the remaining
16                # amount
17                # is less than the number of coins needed for the current amount from the previous
18                # iteration
19                if num_coins[i - coin] + 1 < num_coins.get(i, float("inf")):
20                    # Update the number of coins needed for the current amount
21                    num_coins[i] = num_coins[i - coin] + 1
22
23    # Return the number of coins needed for the target amount
24    return num_coins[amount]
```

PLAYER

MAN, I WONDER WHERE THIS ERROR IS?

HISTORY SKIP AUTO SAVE LOAD SETTINGS

SETTINGS

SKIP

UNSEEN TEXT []
AFTER CHOICES []
TRANSITIONS [X]

START

LOAD

SETTINGS

TEXT SPEED



MUSIC VOLUME



ABOUT

AUTO FORWARD



EFFECTS VOLUME



HELP

QUIT

DIALOGUE VOLUME



MUTE ALL

RETURN

SAVE

PAGE 1

START

LOAD

SETTINGS

ABOUT

HELP

QUIT

RETURN



< 1 2 3 4 5 6 7 8 9 >

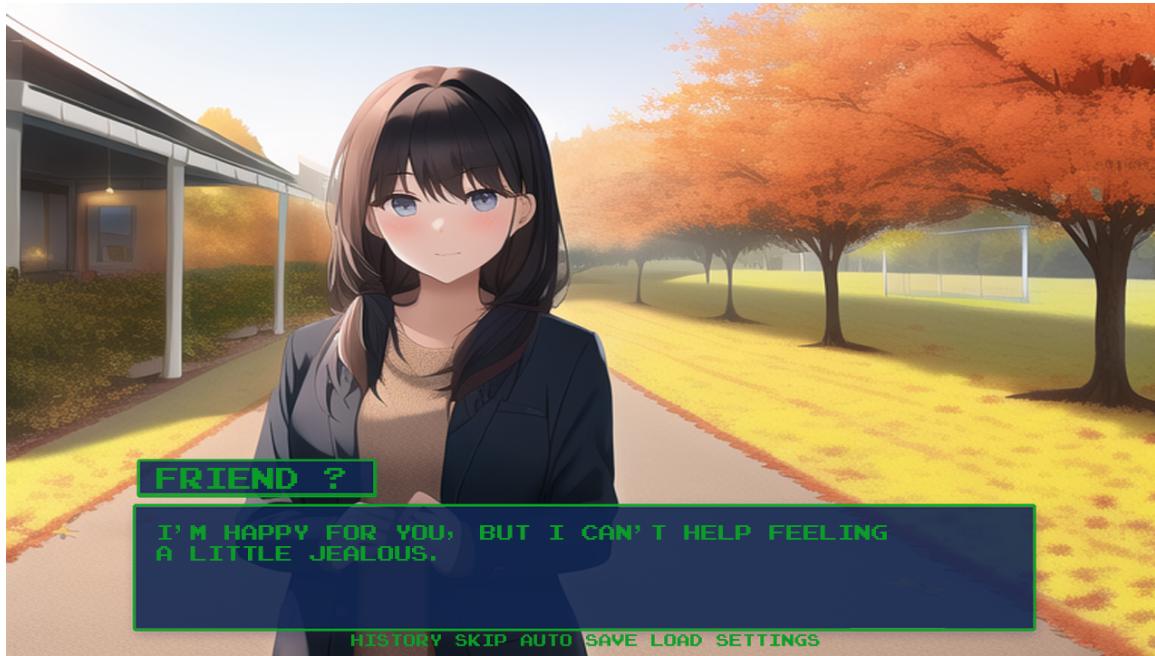
EXIT CSP?

YES, TO IST I GO

NO, I LIKE HAYRIDES

©SYSERROR 2022-23

NEW GAME CONTINUE OPTIONS EXIT



FRIEND ?

I'M HAPPY FOR YOU, BUT I CAN'T HELP FEELING
A LITTLE JEALOUS.

HISTORY SKIP AUTO SAVE LOAD SETTINGS

SAVE

PAGE 1

START

LOAD

SETTINGS

ABOUT

HELP

QUIT

RETURN



2022.05.28
19:45



2022.08.27
00:12



2022.09.27
14:67



< 1 2 3 4 5 6 7 8 9 >