



Republic of the Philippines  
Pampanga State University  
Apalit Campus  
Sitio Tagulod, Sampaloc, Apalit Pampanga



# BEYOND THE BRINK

## A QUEST FOR THE TREE OF LIFE

Prepared by:

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**BSIT-2B**

Course/Year/Section

Submitted to:

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Instructor



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## BB TEAM



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*Programmer*



**Lopez, Geraldine N.**

*Project Manager*



**Balderama, Earl Jerald**

*Programmer*



**Viray, Marby**

*Designer*



**Ignacio, Shannell M.**

*Designer*



**Yutuc, Justine M.**

*Designer*



## I. INTRODUCTION

**Beyond the Brink: Quest for the Tree of Life** is an adventure and science fiction game about a young scientist's journey to find a cure for a deadly disease that has affected the world. His main goal is to find the Tree of Life, a magical tree that can heal all sickness and save his sick mother. Along his journey, he explores dangerous places, fights monsters, and meets characters who help him. In the end, his courage and kindness earn him the Golden Potion, the cure that brings hope back to humanity. The game teaches that love, hope, and determination can overcome any challenge. This documentation records the team's weekly progress in developing the game.

The project is developed as part of the team's **Game Development coursework**, aiming to demonstrate skills in programming, design, animation, and teamwork. The development process is divided into weekly tasks to ensure steady progress and complete documentation of every activity. This documentation provides a clear record of the team's accomplishments, challenges, and improvements throughout the creation of the game.

## II. PROJECT OVERVIEW

**Theme/Genre:** Adventure, Science Fiction

**Objective of the Game:**

The main goal of the game is to find the **Tree of Life** and obtain the cure that can save humanity from a deadly disease which is the Golden Potion. Players take on the role of a young scientist who must explore different maps such as the Dungeon, Abandoned Village, and Forest. Along the way, the player completes quests, fights monsters, collects items, and interacts with non-player characters (NPCs) who guide and help in the mission. The ultimate goal is to return home with the cure, heal the scientist's mother, and restore hope to the world.

**Target Audience:**

The game is designed for players who enjoy adventure and science fiction games.

**Tools and Software Used:**

- a. **Graphics and Animation:** Aseprites, Pixil, Pixelorama
- b. **Programming Language:** Java
- c. **Compiler/IDE:** IntelliJ
- d. **Project Management:** OnlineGanttChart (weekly task tracking to ensure steady progress)



### III. WEEKLY PROGRESS

#### A. Week 1 Documentation (October 20-24, 2025)

Task No.	Task Description	Status
1.	Distribution of Tasks	Accomplished
2.	Importing the 1st World Map (Dungeon)	Accomplished
3.	Testing Collision for 1st World Map (Dungeon)	Accomplished
4.	Importing Main Character	Accomplished
5.	Implementing Basic Movement of Main Character ( ↑ ↓ → ← or W, A, S, D)	Accomplished
6.	Setting Up Camera Settings (It follows the player movement)	Accomplished

#### Details and Progress

During the first week of development, the team concentrated on establishing the core setup of the game environment and the essential movement mechanics of the main character. The first world map, referred to as the Dungeon, was successfully imported into the project. The main character was also integrated, and basic movement functions were implemented to allow navigation using directional keys. The camera system was configured to follow the player's movement, ensuring a smooth gameplay experience. Each team member contributed according to their assigned responsibilities, which helped maintain organization and efficiency throughout the development process.

#### Challenges Encountered:

- **Collision Sensitivity Issue:**

While testing, the team noticed that the player collides with walls even when still far from them. This made it hard to move properly because the player stops too early. The team also encountered that the player can sometimes walk outside the map or through wall areas even though they have the collision system so it means it is not yet fully functional. Although



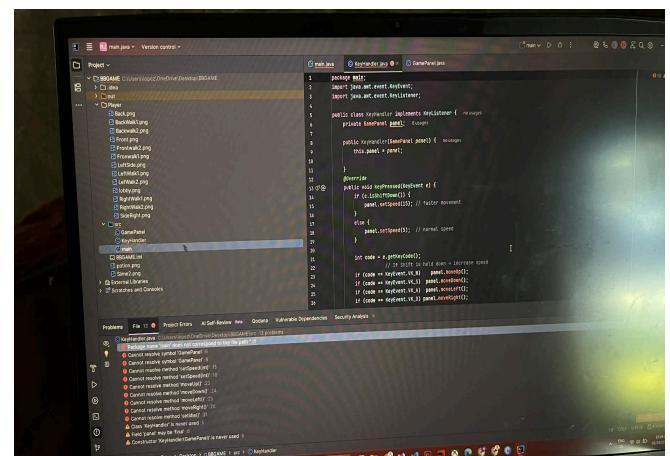
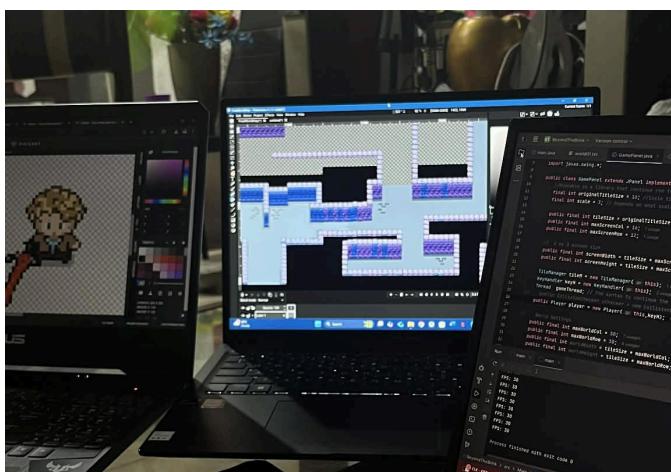
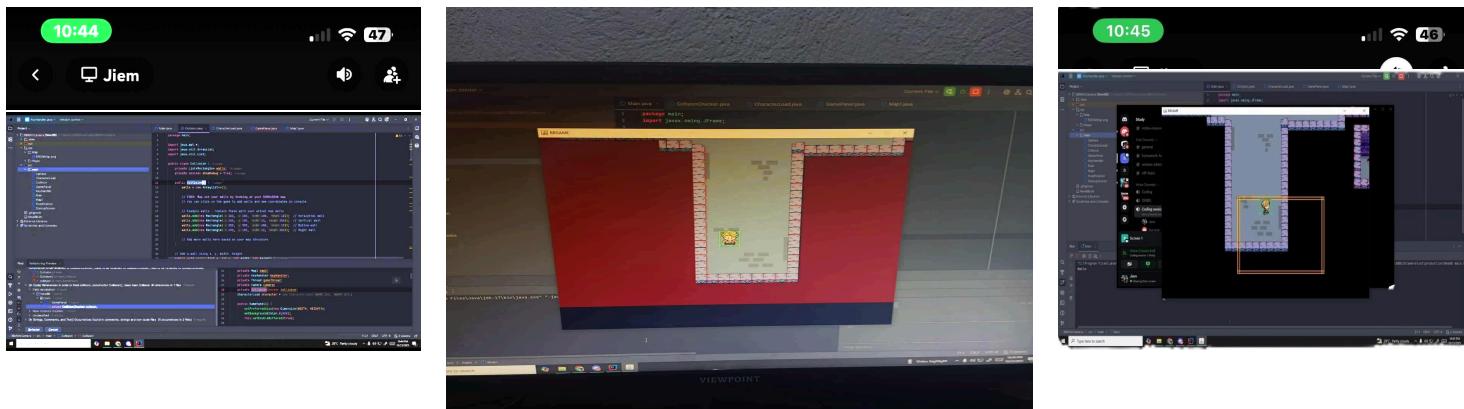
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improvements were made, the collision system remains under observation and will continue to be refined in Week 2 to ensure complete functionality.

**Solution:**

- The team used trial and error to test and adjust the collision settings many times.
- The team added a rectangle guide around the player to clearly see the collision area. This helped the team understand how close the player should be before hitting a wall.
- The collision system is still being tested, and it plans to fix it completely in Week 2.





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## B. Week 2 Documentation (October 26-31, 2025)

Task No.	Task Description	Status
1.	Importing the Loading Screen	Accomplished
2.	Implementing Start up screen	Accomplished
3.	Collision of 1st World Map (Dungeon)	Accomplished
4.	Basic Attack using sword for Main Character	Accomplished
5.	Implementing Damage and Attribute System	Accomplished
6.	Testing Damage Calculation	Accomplished
7.	Implement Settings Menu (with Pause, Exit)	Accomplished

### Details and Progress

During Week 2, the team focused on improving gameplay and player interaction. A loading screen and a start-up screen were added to make the game more user-friendly at the start. Also in terms of collision, the team refined the collision system for the Dungeon map to ensure smoother movement and prevent the player from clipping through walls. A settings menu was also added so players can pause or exit the game at any time.

The main character can now perform a basic sword attack. At this stage:

- Only the player can attack and defeat monsters.
- Monsters cannot attack or deal damage to the player yet.

### Challenges Encountered

- Some walls in the Dungeon map still allowed the player to pass through.
- The player sprite shrinks temporarily when attacking, affecting the look of the animation.
- Buttons were not properly placed, making them confusing to use.



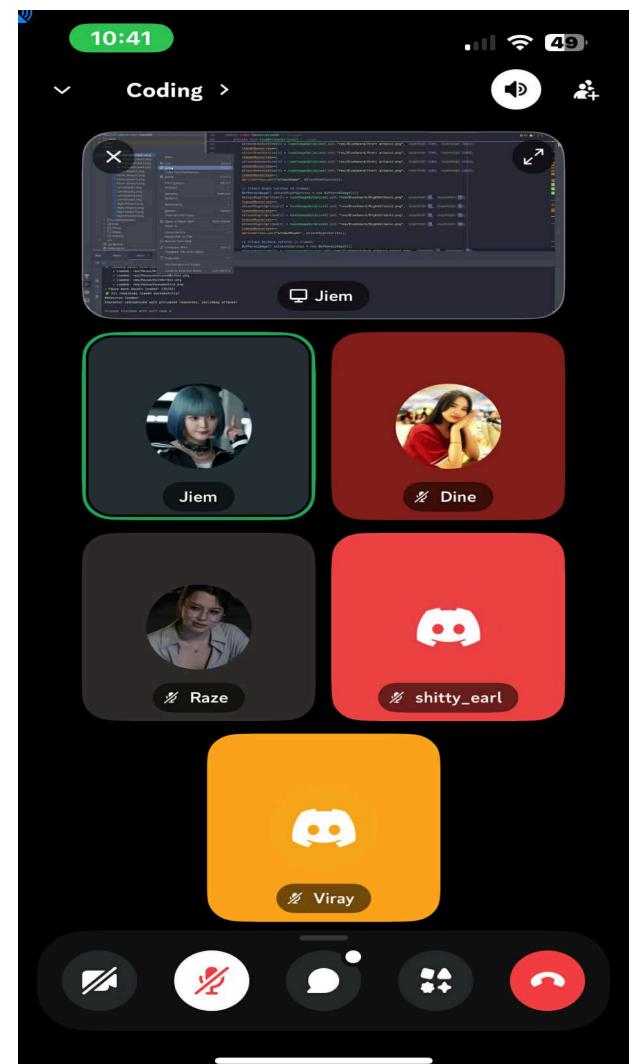
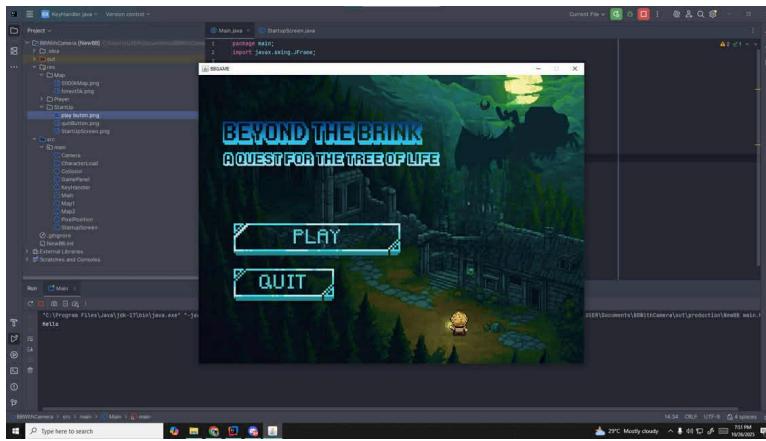
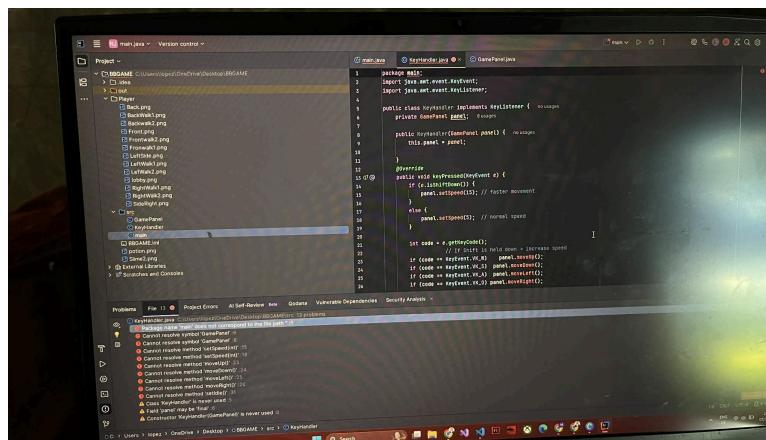
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- Only the player can attack, wherein monsters do not deal damage to the player yet.
- Integrating the settings menu with pause and exit required careful testing.

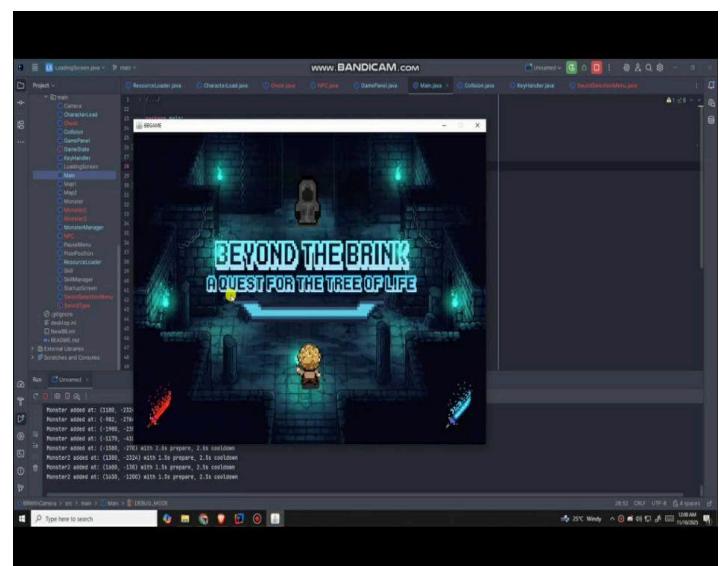
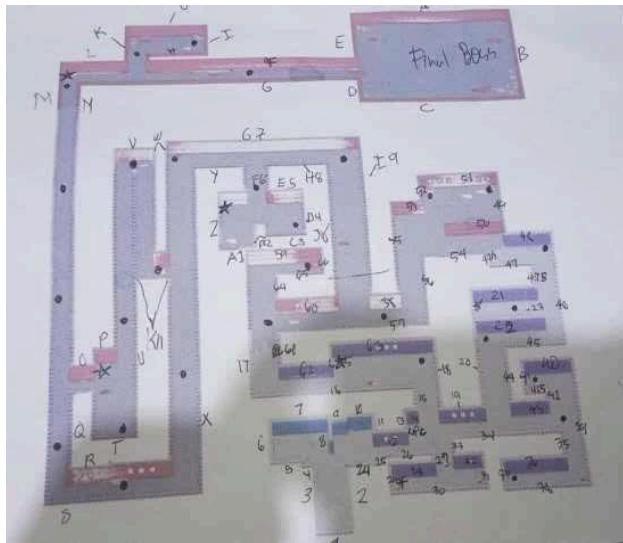
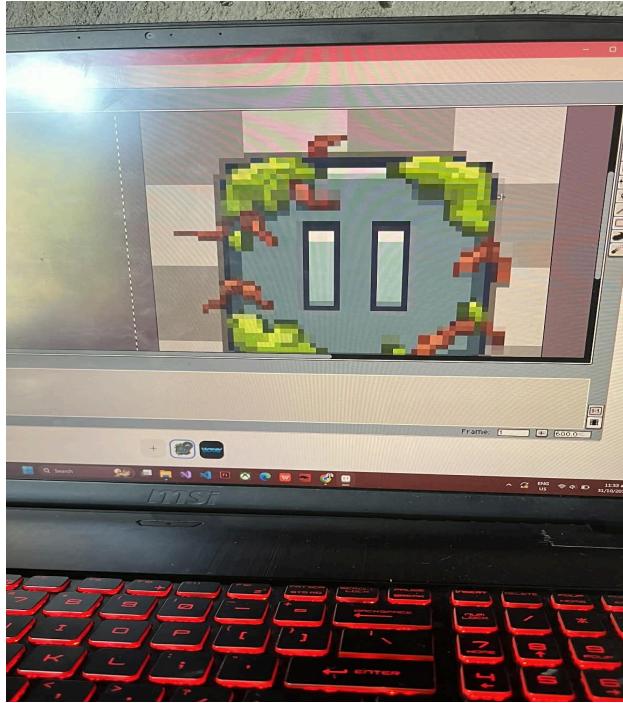
## Solutions Implemented

- Adjusted the collision boundaries so the player cannot pass through walls.
- Fixed the attack animation so the sprite stays the correct size.
- Rearranged and aligned the buttons for better visibility and usability.
- Tested the player's attack and damage system to make it consistent.
- Ensure that the settings menu works properly with pause and exit features through trial and error placing.





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**C. Week 3 Documentation (November 3–7, 2025)**

Task No.	Task Description	Status
1.	Adding Portal Transitions between Maps	<i>Not fully done (only a button implemented)</i>
2.	Importing Monsters (Dungeon + Forest)	<i>Partially done (Dungeon only)</i>
3.	Basic AI for Monsters (movement + chase)	<b>Accomplished</b>
4.	Animation for skills	<b>Accomplished</b>
5.	Adding Dead Monster Frame and Damage Text	<b>Accomplished</b>
6.	Integrating Health and Mana Bar (MC and Monster)	<i>Partially done (Monster only)</i>
7.	Adding EXP and Level-up System	<i>Not yet done</i>
8.	Implementing Potions (Health Potion, Golden Potion)	<i>Not yet done</i>
9.	Implementing Damage Calculation	<b>Accomplished</b>
10.	Implementing Skill System (icons, effects, animation)	<b>Accomplished</b>
11.	Importing the 2nd World Map (Abandoned Village × Forest)	<b>Accomplished</b>
12.	Testing Collision for 2nd World Map (Abandoned Village × Forest)	<b>Accomplished</b>



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## Details and Progress

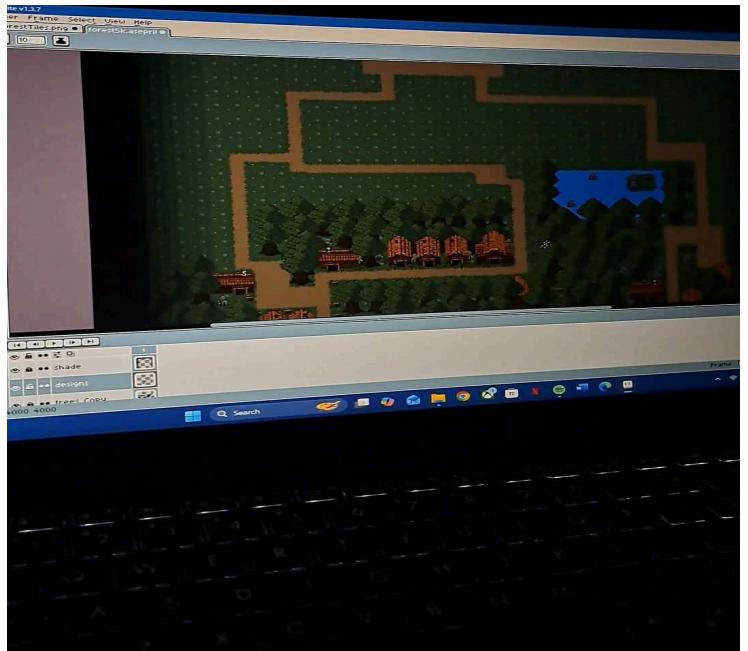
During Week 3, the team focused on expanding the game world and improving combat and skill mechanics. For Portal and Map transition, a button was added to move between maps, but full portal transitions are not yet implemented. The Dungeon monsters were imported, and basic AI was added to allow them to move and chase the player. Forest monsters were not yet added. The team also implements player skill animations, including visual effects and icons for skills. Also, dead monster frames and damage text were added to show when monsters take damage or are defeated. In terms of health bars, monster health bars were added and the player's health and mana bars will be added in future updates. The team tested the Damage calculation for attacks. In addition, the second map, Abandoned Village / Forest was imported, and collision testing was completed to prevent the player from moving through walls or outside the map boundaries.

## Challenges Encountered

- Some monsters were positioned outside the playable area.
- Some monsters moved in the opposite direction of the player, behaving unpredictably.

## Solutions

- Adjusted monster placement to prevent them from spawning outside the map, though further refinement is needed.
- The team tested the code for monster AI and recorded unexpected movement patterns for future fixes.





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A screenshot of a game development environment. The interface shows a project structure with files like ResourceLoader.java, GamePanel.java, and Main.java. The main window displays a 2D game map with a character at the bottom left and several enemies. A code editor window is open, showing Java code for resource loading and game logic. The terminal at the bottom shows command-line output related to game assets and resources.

A screenshot of a game development environment. The interface shows a project structure with files like ResourceLoader.java, CharacterLoad.java, Main.java, and KeyHandler.java. The main window displays a 2D game map with a character at the bottom left and several enemies. A code editor window is open, showing Java code for resource loading and game logic. The terminal at the bottom shows command-line output related to game assets and resources.

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#### D. Week 4 Documentation (November 10–14, 2025)

Task No.	Task Description	Status
1.	Adding Blocked Effects	Not yet done
2.	Integrating Boss in Forest and Dungeon	Not yet done
3.	Integrate Final Boss Frames and Freeze Frames	Not yet done
4.	Boss Skill and DOT Frame Animation	Not yet done
5.	Finding background music to use	Not yet done
6.	Implementing Sound Effects and Background Music	Not yet done
7.	Implement Game Over and Victory Screens (triggered when MC dies or boss defeated)	Not yet done
8.	Implement Quest / Objective Display (shows player goals and missions)	Not yet done
9.	Collision for 2nd World Map (Abandoned Village Forest)	Accomplished

#### Details and Progress

For Week 4, the focus was planned on boss integration, sound design, and user interface improvements. However, most of these were not yet implemented due to ongoing debugging and adjustments from the previous week's tasks. Also, we were only able to finish the collision for the 2nd World Map (Abandoned Village Forest) before development was paused. The team's professor advised to stop working on the Game Development project because of a hectic class schedule and overlapping tasks from other subjects.

#### E. Week 5 Documentation (November 17–21, 2025)

Task No.	Task Description	Status
1.	Fine-tuning Animations (Attack, Damage, Death)	Not accomplished
2.	Game Debugging	Not accomplished



## F. Week 6 Documentation (November 24-28, 2025)

Task No.	Task Description	Status
1.	Final Testing, and Presentation Preparation	<i>Not accomplished</i>

## IV. CONCLUSION

From Week 3 to Week 4, several tasks were not finished due to time constraints and scheduling issues. The team originally planned to continue these unfinished parts such as boss integration, sound effects, quest display, and animation polishing during Weeks 5 to 6. Those weeks were meant for debugging, testing, and finalizing the game to ensure that everything would work smoothly before submission. However, because the teacher instructed the team to pause the development due to a hectic academic schedule, the group was not able to complete the remaining features. As a result, the game *Beyond the Brink: Quest for the Tree of Life* remains unfinished and not fully developed. Despite this, the team was still able to accomplish a lot including map imports, collisions, basic attacks, monster AI, and skill systems. These completed parts show the team's effort, teamwork, and creativity throughout the project. The experience helped everyone learn more about game development, especially in areas like coding, animation, and problem-solving. In conclusion, while the game was not finished, the project still reflects the team's dedication, patience, and collaboration. If given more time, the team is confident that the game could be completed with full features, smoother gameplay, and improved performance.