REVENGE ODYSSEY

REPORT

Session 2022 - 2026

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Table Of Content

2022-CS-134 (Tayyaba Afzal)

Game Idea

A team of vigilantes works together to seek justice for victims who cannot fight for themselves. The player controls different characters in each level, solving unique cases through teamwork, puzzle-solving, and action sequences. Inspired by the **K-drama "Taxi Driver,"** the game allows players to relive the tragic backstories of the characters and participate in intense missions for justice.

Genre

The game is a **stealth-based** with elements of **and mystery.** Players must **navigate the school**, collecting evidence while avoiding enemies. Green arrows guide them to easily findable evidence, but enemies pose a constant threat. If an enemy collides with the player, the collected evidence is stolen and hidden in a new location, forcing the player to search again. As levels progress, enemies increase, making stealth and strategy essential. The game challenging players to **outsmart enemies, manage time wisely, and reach the rooftop with all evidence to win.**

Art Style

The art style for our game is heavily inspired by the K-drama **"Taxi Driver"**, maintaining a **realistic** yet stylized look to reflect the gritty nature of the **revenge-driven** storyline. The focus is on immersive, cinematic visuals that blend the harsh reality of each mission with smooth gameplay optimized for mobile platforms.

Map Design

School Environment

Layout

- Two floors: First, and Second.
- Rooftop accessible at the end of the game.

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o   Playground backward of building.

Locations

o   Classrooms.

o   Waiting Room.

o   Computer lab.

o   Teacher's Office

o   Playground

o   Washrooms and Storeroom

o   Rooftop for final evidence submission.

Aesthetic

o   Realistic school-themed textures and lighting.

o   Interactive objects like desks, lockers, doors, Benchers, Chairs, Tables, Blackboard, Kitchen appliances.

Players

Types

The Agilest (Victims):

o   One players.

o   Mission: Collect evidence, keys, and reach the rooftop.

The Brutes (Bullies):

o   Three players.

o   Mission: Stop Agilest from completing their tasks.

Roles

- The Agilest: Task-focused, strategic.

- The Brutes: Saboteurs and attackers.

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Their Mechanics

The Agilest

Abilities

- o Movement.
- o Pick/ Drop Object
- o Open/Close Drawer
- o Freeze camera rotation

Interactions

- o Open locked doors using evidence by giving it to a teacher.
- o Progress Tracker: Monitor assigned tasks and completed tasks.
- o Health Bar: Decreases during fights, non-replenishable.

The Brutes

Abilities

- o Movement on map on different locations.

Interactions

- o Push the player to seal evidence and hide on any other location.

Common Mechanics

Movement

- o Third-person controller for navigating the school environment.

Non-Playable Characters (NPCs)

- **School Students:**
  - o Various NPCs are present in the school environment.
  - o They **move around dynamically**, performing daily activities.
  - o Others are walking in hallways, sitting, or playing outside.
- **Behavior & Interactions:**

- NPCs do **not interfere** with the player's objectives.

- They create a **lively and immersive atmosphere** in the school.

- Some NPCs might react **subtly** if the player moves too close.

Mission

The Agilest

- Collect evidence, notes, recordings, and keys.

- Submit all evidence on the rooftop to win.

The Brutes

- Prevent agilest from completing their mission by:

    - Blocking paths.

Core Gameplay Loop

- **Game Start:**

    - Player spawns in front of the **school building.**

    - Green arrows highlight **easily findable evidence** to collect.

- **Evidence Collection:**

    - Player moves around collecting **scattered evidence.**

    - **Green arrows** guide the player toward each piece.

- **Enemy Interaction:**

    - If the **enemy collides** with the player:

        - The **collected evidence** is stolen.

        - Enemy **hides** the evidence in a new location.

        - Player must **find and collect it again.**

    - If the player **collides with the enemy three times** in a row, they lose.

- **Winning & Losing Conditions:**

  o **Lose if:**

    ▪ **Three enemy collisions** occur.

    ▪ **Timer runs out.**

  o **Win if:**

    ▪ All evidence is collected.

    ▪ Player reaches the **rooftop.**

    ▪ If even one evidence is missing, the final destination remains locked.

Level Propagation

1. **Three Levels Designed:** The game consists of **three levels**, each increasing in difficulty.

2. **Dynamic Evidence Placement:**

   o The hiding spots for evidence **change** with each level.

   o Players must search in **new locations** every time.

3. **Increased Enemy Presence:**

   o **More enemies** are introduced as levels progress.

4. **Challenging Gameplay:**

   o Each level demands **quicker reflexes** and **smarter movement.**

5. **Final Goal Remains the Same:**

   o Collect all evidence and **reach the rooftop** to win.
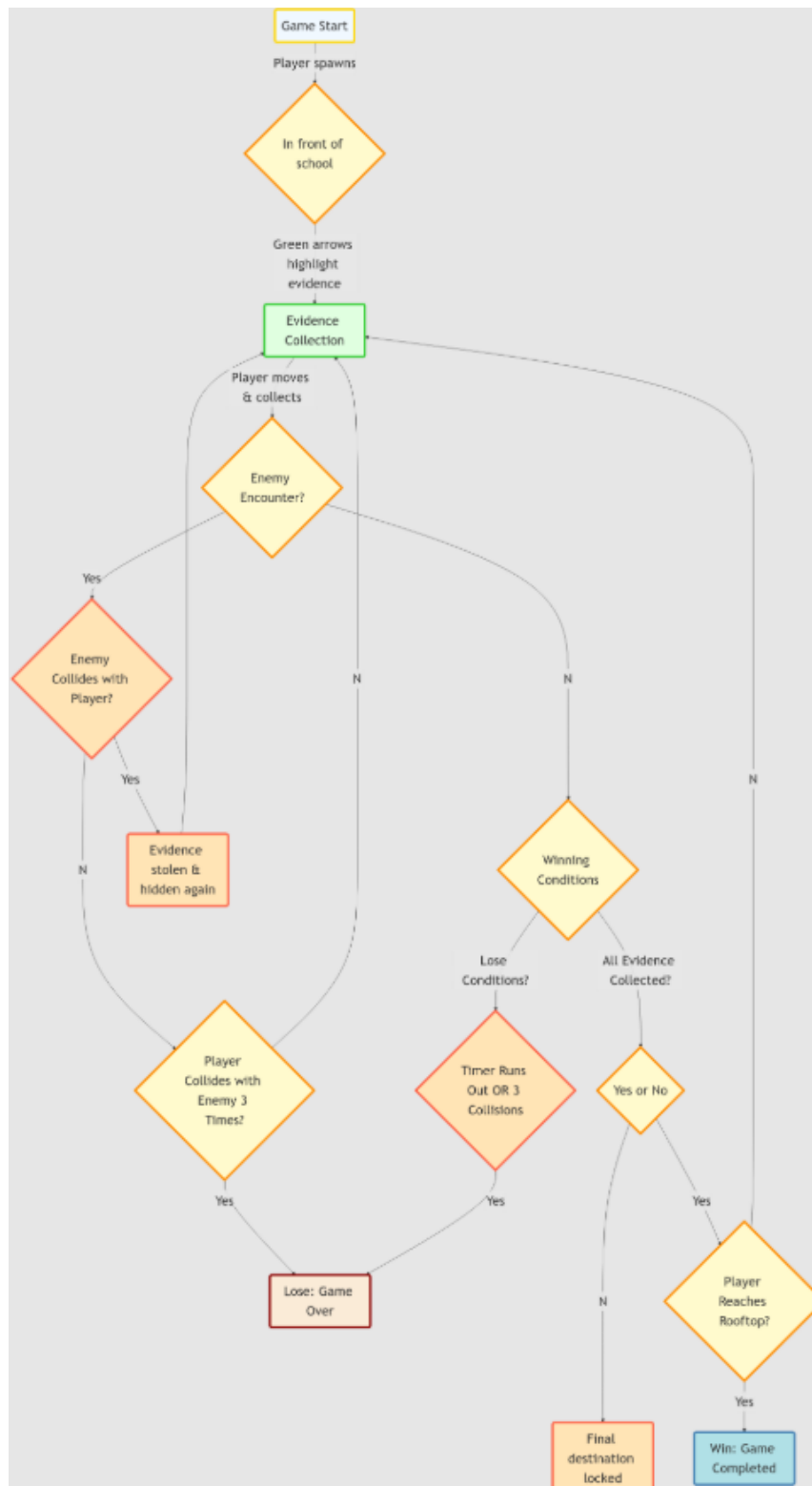

Flow Diagram

Fig.1 Complete Flow diagram of game loop

User Interface (UI)

- **Main Menu UI:**

The game starts with a **main menu** displaying three options:

  - **Play** – Starts the game.

  - **Options** – Opens a settings panel.
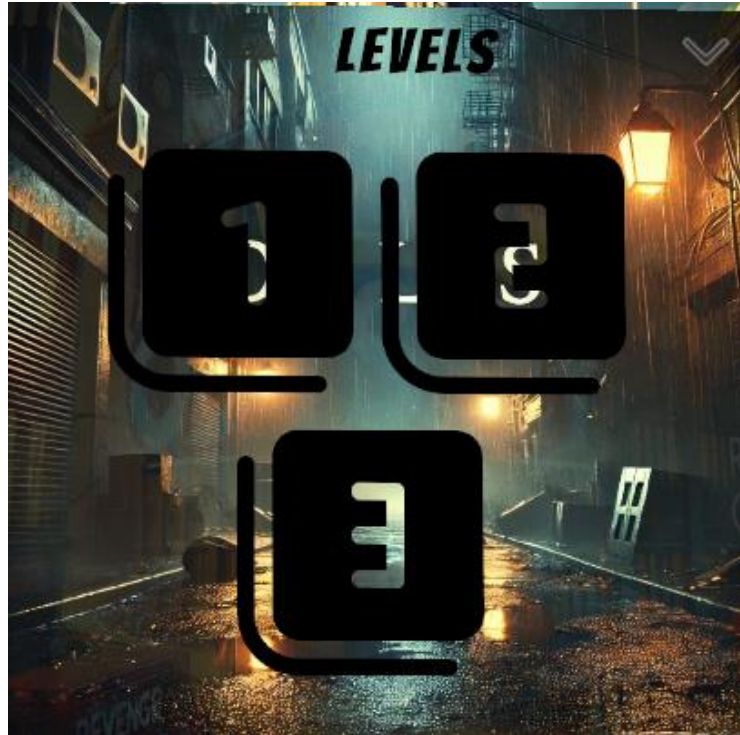
  - **Exit** – Closes the game.

- **Options Panel:**

  - Shows all Controls**.**

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- **Level Selection UI:**

    o   After clicking **Play**, a new screen appears to **select levels.**

    o   Displays locked/unlocked levels based on progress.

- **In-Game UI:**

    o   **Progress Bar** – Tracks task completion within the level.

    o   **3-Star System** – Represents available chances/lives.

    o   **Timer** – Displays remaining time to complete tasks.

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Cut Scene

Introduction

- Backstory explaining how Agilest were bullied by Brutes.

- Sets the stage for revenge and the game mission.

Third-Person Controller

- Players control their characters from a third-person perspective.

- Smooth navigation through the school environment.

- Interaction prompts for tasks like collecting items.

Optimization Techniques

1. **Use Low-Poly Models & Compressed Textures** – Reduces rendering load for smooth performance.

2. **Implement Object Pooling** – Reuses objects like NPCs and collectibles instead of creating new ones.

3. **Enable Frustum Culling** – Renders only what the player sees, improving efficiency.

4. **Optimize Collisions** – Use simple colliders and limit physics calculations.

5. **Reduce Real-Time Lighting** – Use baked lighting and minimal dynamic shadows to lower GPU usage.