Assets and Design Decisions: Team10

Assets:

- 1. Paulisia Low Poly City (CS21B013 BODALA SRI VARSHITHA) Link
- 2. 3D Anime Game Character Female (CS21B047 TADISETTI HEMA SRI) Link
- 3. SimplePoly City Low Poly Assets(@CS21B053 VELAGALA SWETHA REDDY)
- 4. Scrollfree

(Unused, but tried) assets and packages:

- Nature Starter Kit 2 (CS21B045 SANTHOSI R M)
- 2. EasyRoads3D (CS21B043 S DHANANJAYAN)
- 3. Ukraine free Road(CS21B043 S DHANANJAYAN)
- RoadArchitect(CS21B045 SANTHOSI R M)
- 5. 3D Anime Game Character Male(CS21B047 TADISETTI HEMA SRI)
- 6. Character Elf(CS21B047 TADISETTI HEMA SRI)
- Basic Motions 3D(CS21B043 S DHANANJAYAN)
- 8. Basic Bandit(CS21B047 TADISETTI HEMA SRI)
- 9. Fantasy Forest Environment- Free Demo(CS21B043 S DHANANJAYAN)

Design Decisions:

1. We decided to follow a common/preagreed folder structure recommended by Unity so as to make Version Control easier. The folder structure is attached below:

2. We decided to make our own coin, clone and finish line assets. This is because a) we couldn't find assets that match what we wanted, b)they were simple enough to make.

- 3. We decided to use free assets from Unity store for the environment and Character due to time constraints.
- 4. I decided to have 9 players, a cam for each of them and a main camera which shows which players are alive. I also decided to use the keys 1 to 9 to switch between the players/cams and 0 for the main camera. Pros: The players and their movements are independent of each other. The main camera helps the user to identify which player to choose next for playing the game. Cons: Too many cameras and keys for control, might be confusing for the user.
- 5. I decided to not have the player cam as a child Game Object of the player and instead have it as a separate gameObject. This is because having a camera on a rigidBody object can be buggy in Unity.
- 6. I decided to account for the coin-collection from the player end(not from the coin end) because there are more coins than players(Thus more repetition).
- 7. However, I decided to have the script for player spawning/cloning in the spawner and not in the player because a)The players/clones are already placed appropriately where they have to be born. Thus, a spawner is already related to its new players. c) we don't know which player will consume the copy potion. So, the clones are not related to the player who consumes the potion. Rather, they're related to the position of the position only. c)Also, the number of copy potions are less than the number of players, thus reducing repetition.
- 8. Ideally, the user should only access the cameras of only the players who are alive. But there's no guarantee that they will. So, I decided to not kill/destroy the player gameObject or their camera gameObject upon reaching the end because then there would be a cascade of errors when their corresponding keys are pressed.