Scratch Project

- A link to your game/story
- Create a 50-59 second video in which you demonstrate the running of at least one significant feature of your program.
- Identify the purpose of your program and explain what the video illustrates. (Approximately 150 words)
- Describe the incremental and iterative development process you used, focusing on two distinct points in that process. Describe the difficulties and/or opportunities you encountered and how they were resolved or incorporated.
- Describe how each algorithm within your algorithm functions independently, as well as in combination with others, to form a new algorithm that helps to achieve the intended purpose of the program. (Approximately 200 words)

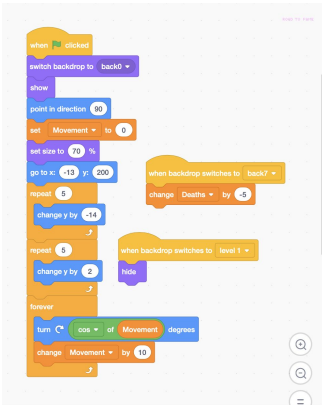
Game Link:
https://scratch.mit.edu/projects/328337378

Gameplay Video:
https://drive.google.com/file/d/11ynGjJE1yyU89wjrF9JqvgGT6d2ag4im/view?usp=sharing
(It's longer than 59 seconds, I couldn't figure out how to trim the length without redownloading it onto my own computer 😔)

Explanation:
The Game that my partner and I have created is a simple platform modeled game. In this program, you follow the storyline of an up and coming influencer on the social media platform Tiktok, and aim to complete all three levels to get to the "end goal". This end goal is having your video featured on the "For You Page" and becoming famous. Thus, being titled "Road to Fame". The video of the gameplay featured here illustrates the main mechanics of the game. As the player, you must use the "wasd" keys or the arrow keys to maneuver your icon through each level. Passing each level requires you as the player to make use of all of the blocks in the game environment. If you fail to pass, you are regenerated at the very beginning of the level and must start over. Unlike other platform games, the game does not count the total amount of deaths. This is to ensure that all players of the game can experience the entertainment of a platform game without being discouraged to quit.

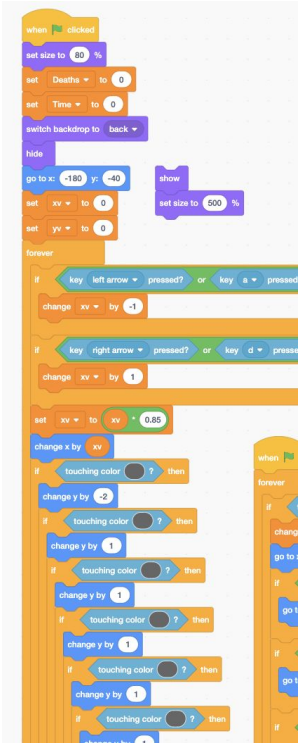
The process we underwent to produce this game first started with learning the basic mechanics of the Scratch program. This was done via the in-class activities provided. From there, we explored the creator's page of Scratch to find a game that we both enjoyed and could find inspiration from. After finding a game, we remixed it and altered the coding, sprites, levels, and backgrounds to fit the tiktok agenda we had in mind. This involved using the pixel art program Piskel to draw the sprites and backgrounds, as well as going through Scratch forums to figure out what some pieces of code meant in its relation to how the game works. First we changed

the title screen, then the player icon to the tik tok logo, our level backgrounds, and then our platform sprites. On difficulty we faced was trying to figure out how to import our new background while keeping the levels. In the end, we had to re-form all of the levels by pasting our blocks directly onto the background so that the code could recognize them. Fortunately, this was not too hard of a task. We used color code in Scratch to add a gray border around our blocks so that whenever our icon touches the blocks, it recognizes it as a platform and stays still. To add more flair to the game, we decided to add music in the background that brought the game together to give an 80's vibe.



Title Screen

This piece of code is for the title screen. The title screen is what players first see when they click to play the game. So to leave an impact, the game title on the title screen tilts left and right. This code shows this feature of the game. It can also be seen on the right of the screenshot that the game's background is set to the backdrop file, and will hide when it switches to level 1. This ensures that backgrounds do not layer on top of each other and cause lag for the player.



Game Blocks

This screenshot showcases the coding for the control algorithm as well as how the block sprites in the game are recognized by the player icon. To move around in the game, an input was added to recognize either the "wasd" keys or arrow keys. As for the blocks, the color coding around the blocks helps the icon to recognize it as a platform and stay still.