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Remake Project: Nibbler

Nibbler is an arcade game based on Snake but has an added feature of a maze and the food is randomly placed across the maze as opposed to appearing randomly one-by-one in Snake. It still keeps the component of Snake where if it collides with itself then it dies and increases in length as it eats, but adds a new component where if it doesn't eat something within a set time then it will also die. It was released in 1982 by the Chicago-based developer group, Rock-Ola. Rock-Ola was mainly known for developing and manufacturing jukeboxes, but also manufactured pinball machines, slot machines, parking meters, and arcade games. Nibbler was also distributed in Japan by the gaming company Taito in 1983, along with Nibbler they also produced Speed Race, Western Gun, and Space Invaders. Besides being available as an arcade game it was also available on Apple [], Atari 8 bit family, and Amstrad CPC. The home versions of Nibbler were also published in 1983 by Datasoft. In 1983 it was ranked the 13th highest-grossing arcade game.

In my version of Nibbler, I kept the same maze aspect and tried to keep the same character style of the sprite as the original video game. However, in keeping the original sprite I was unable to have it so the snake would grow longer as it ate. I ended up creating two versions of this game in which they have opposite problems. In my NibblerRemake I made it so my snake

wouldn't hit any of the obstacles and had set places for the food, however, since I used a sprite for the snake I couldn't add to its size to the end and if I scaled him bigger then he would start to overlap with the boundaries a bit making it seem like he was going over them. In the BasicSnake2 version, the snake is essentially continuously growing from the top as a rectangle but when it collides with food then the rate at which it grows slows down, creating the illusion that the snake is incrementing by 1 when it eats. However, in this version of the game, I was unable to work out how to get the snake to understand collision within the maze and the walls within them. It does however wrap around the screen like if it goes off the screen at the bottom then it will start to reappear at the top.

Unlike the original version of Nibbler, my BasicSnake2 does not have set food, but rather has a singular food sprite that after it's eaten, another food sprite will randomly appear within the boundaries of the map for the snake to eat. I was also unable to implement the "hunger bar" like in the original Nibbler, where after a certain amount of time, the hunger increases if the snake does not eat, so it eventually starves. I was able to implement the snake "eating itself" and it does keep track of a score at the top left corner. I attempted to implement a way for the snake to know the boundaries by recognizing the color key of the boundaries and becoming transparent when it collided with said boundaries, but I found that my snake would need to be a sprite rather than a rectangle in order to do this. All in all, I ended up sacrificing the ability of walls and obstacles for my snake's ability to grow as I thought the snake continuously growing was THE thing Nibbler was known for. It has a majority of the same look and keeps the essence of Nibbler, but there are some key functions of the game that I was unable to replicate fully in my remake.