

Project 2 Report

The idea behind this project

This project is loosely based on the design of one of my favorite video games. The video game is called “Feel the Snow”. The art style is entirely done via pixel art, which is an art style that utilizes the color of every pixel to create an image. Like the title suggests, the game mostly takes place in cold climates where snow is found everywhere. For project 2, I chose to omit any implication of cold weather to make it easier to create the scene. For project 3, I have to decide whether to change the color schemes and other aspects to depict a cold climate. I wanted to include water in my scene and experiment with how the lighting will interact with it, so I’m not sure if I should do an icy climate or not. While the idea is based on the game described, it looks more like just a generic park right now. I’m not sure if I will bother with trying to base it off of that video game or if I will change it to just be something else. I think it could probably just be a park and that would be fine, but I’m still thinking about whether I want to change some things for Project 3. Ultimately, I plan to build upon this setup for projects 3 and 4.

How I generated my model

The first object I started on was the cylinder. I adjusted the dimensions first to make it seem like the basic wood part of a tree. I eyeballed it and changed the dimensions until it looked right. Then I did the same for the dimensions of the block object to seem like the size of the leaves on top of the tree. Then I made the coordinates of the block dependent on the location of the cylinder so that every instance of the cylinder had a block on top of it. From there I placed a few trees spread out in a straight line. Then I added the grass block to represent the ground and placed more trees, and scattered them around the grass part. I did this similar strategy for the rest of the objects too. For all of them, I added parameters to the objects as needed. However, I think this is a little confusing to work with and there are smarter ways to structure it. For project 3, I would like to convert them all into the “builder pattern” which would be more ideal to use than just cramming a bunch of parameters into it.

How I met project specifications

I met the project specifications by relying on the Project 2 description on the class website. First, I read through everything to get an understanding of how things should generally progress. Then as I worked through different parts of the project, I continually referred back to the relevant sections in the Project 2 description.

Most Difficult Parts of Development

I think the hardest part was just getting everything setup so that the first object showed up correctly on the screen. The first object I implemented was a cylinder, and at first it didn't look much like a cylinder. Once I was able to get it to display correctly, then I worked on getting multiple instances to appear. From there I felt a little more confident about implementing a block object. Early on, I tried to create a sphere object, but didn't get that working correctly so I omitted it from project 2 and just built my main objects from the cylinder and block classes. I also mixed up several parameters for a couple of the object classes at one point by accident. This meant I had to spend additional time figuring out what those parameters were actually doing and then fixing or improving the names so I didn't mix them up again. That was difficult only in the sense that it was tedious.

Unique Things I did in the project

I think the bench is the coolest looking object. I divided the base into 3 parts so that you can see the river from above. I think it still needs to be divided up more since bridges with gaps in them like that normally have a lot more gaps, but for now the bridges only have two gaps each for the base. I also implemented the objects in a way so that most of their characteristics could be easily customized, such as size, color, and location.