

Project 3: Pyramid

In this task, I was given to draw a Pyramid using C# programming in Unity3D. To accomplish this task, I drew cubes stacked one on each other in decreasing sizes as we go from bottom to top.

Further in the code, I initialized maximum height of the pyramid. Then I declared a “for loop” for x and z as I am forming the cube at the origin.

Since in this, I only want to make the cubes on the edges, that’s only possible when x is equal to positive length or when x is equal to negative length or when z is equal to negative length or when z is equal to positive length. “z” is counted as a “y” in this case.

Then I included the “if” condition which says if the absolute value of x equals to length or if the absolute value of z equals to length, “Tools.MakeCube (x, height, z);” will make a cube.

Since I added “Tool.cs” file to the scene to make the pyramid, I will use that file in this “Pyramid.cs” to make the cubes for the Pyramid. Since each time we go up (from bottom to top), the length is going to get decreased by 1 so I included “length = maxHeight – height” so each time we go up the pyramid, length will be one time smaller than the previous one. If we talk about the mathematical computation of length, it will be like, 10-0, 10-1, 10-2,so on.