Joseph Shaffer

Shaffer.567

CSE 3541

Computer Animation

Lab 5 Read Me

I used the starter package to build my program. The program generates 8 random cube points, but I tried to adapt that so every cube is not closer than 2.5f from all the other cubes, so as to guarantee a more spread out set of cubes.

The sphere should continuously move around the corresponding path of cubes until the program is stopped by the user. The cube should follow the path between cubes by cubic interpolation by using catmull rom. I tried to implement ease-in, ease-out to accelerate and decelerate the sphere between different cubes, but it seems the movement is not consistent and the sphere seems to jump at times. I believe I re-parameterized each arc length, by dividing the distance to each point on an arc length by the total distance of an arc length.

I also believe the object rotates by looking at the next point that it is moving to.