

The goal of the assignment was to merge two or more clean 3D scans of ourselves or our classmates then 3D print the result. Fulfilling the requirements was my only goal as well, since I assumed the process would be either difficult or tedious.

Despite using the Kinect to scan Harry, Bhakti, and me, I ended up only using the files for Harry's scan and mine because Bhakti's scan resolution was too high and continued to crash Meshmixer. Slicing the models vertically and merging them again was more of an experiment so I could get comfortable using Meshmixer. It was more difficult than I'd expected, mostly because of the confusing interface. While trying to match up the sliced busts, I noticed that the 3D scan for Harry's bust had many holes on the surface and was hollow.

Fixing Harry's 3D scan file was what took the most time. None of the tutorials I had looked up for Meshmixer were able to fix the holes. In fact, most of them made the problem worse. I ended up asking the tech for help and he suggested that I try fixing the file in Netfabb instead. Thankfully, Netfabb was able to fill up most of the errors, but I couldn't get the bottom of the bust to close so I sliced it off in OpenSCAD and merged the two halves in OpenSCAD.

Since I didn't use support material on my past few 3D prints, I decided to use support material this time. I have mixed feelings about it-- while it does hold up the print and keep the shapes from warping, it is so difficult to get off. It also leaves marks on the prints. Next time, I should probably try generating my own support material using Meshmixer.