

Criterion E

Evaluation of Success Criteria

1. Funnel vertices are accurately calculated
 - a. Met, the Program was able to accurately calculate the vertices for funnel scripts.
Client was able to create accurate vertices in AutoCad
2. Funnel vertices are accurately mapped to faces
 - a. Met, Faces were properly mapped to vertices. Client verified this by counting faces and checking the funnel parameters matched the original inputs using Autocad.
3. Script files which accurately contain faces are created
 - a. Met, Scripts were successfully generated. Client was able to run the scripts on autocad.
4. User can select from three funnel profiles (Sts, Ctc, Stc)
 - a. Met, Client was able to select from the 3 profiles, and create Sts, Ctc, and Sts depending on their selection. Client verified by selecting each of the profiles and checking if the proper profile was generated.
5. Database can insert funnel inputs
 - a. Met, Client was able to successfully insert entries into database, providing the Funnel Library they requested.
6. Database can delete funnel inputs
 - a. Met, Client was able to successfully delete database entries by ID.
7. Database can retrieve funnel inputs
 - a. Met, Client was able to successfully retrieve contents of database entries by ID, and output the contents in a GUI.

8. Database can update script settings.
 - a. Met, Client was able to update script settings by accepting user preferences from a GUI
9. Database can retrieve script settings (which are added to scripts)
 - a. Met, Client was able to retrieve script settings from the database when generating the contents of the script and writing the file.
10. Program is robust
 - a. Met, Program is able to cope with errors during execution, and inform the user about invalid inputs. This led to increased ergonomics and client satisfaction.

Improvements

After my client evaluated my program (appendix 3), I came to the conclusion that these would best improve the program.

1. Embedded Cad Calculations: The primary function of this program is to generate a script that can be run on Cad software, however this program would be superior if it was able to process the script in a 3D model within the program, rather than using an external method to process the 3D model (AutoCad). This would decrease dependency on external sources. The client stated this would increase the usefulness of this program even more.
2. File Path Interface: If the user wants to change/add a file path in Settings, they need to manually copy paste a path and enter it. This can be tedious for users who are not tech-savvy. The client stated that it be better if the program automatically opened file explorer and requested the user find a valid file path. This would make it much easier to navigate and find a location, and improve user satisfaction.

3. **Faster Deletion:** The program is either able to delete database entries individually, or all at once (no inbetween). The client stated it would be better if the program could select multiple entries and delete them. This would decrease the time the user spends deleting entries.