

Project 2: Meshedit

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Local Operations

- FaceBevel: Fully Implemented
- EraseEdge: Fully Implemented
- EdgeCollapse: Almost fully implemented. MeshEdit seems to get stuck in computing the normal of the face. Confirmed all halfedges have neighbors, and each element is associated with a halfedge, and there are no lingering elements undeleted.
- EdgeFlip: Fully Implemented
- EdgeSplit: Fully Implemented

Global Operations

- Triangulation: Fully implemented
- Linear Subdivision: Fully implemented
- CatmullClarkSubdivision: Fully Implemented
- LoopSubdivision: Almost (90% ?) implemented. Similar issue to previous with EdgeCollapse. Able to confirm all vertices have reasonable coordinates, and are associated with a halfedge. Still hangs on computing face normal.

Model

I made an elephant. Note that it's viewed here in a web viewer, since my multiple Catmull-Clark Subdivisions really killed the meshedit viewer.

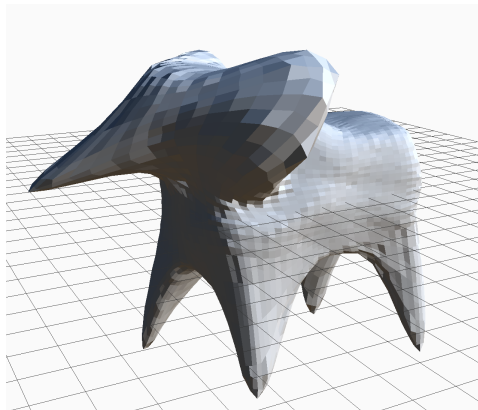


Figure 1: Smooth elephant