Some rendering programs require that all surface normals point in the same direction. (ie: On a closed cube, all normals point outwards). You can use the points on the faces to determine the direction of the normal, by making sure that all points are either in clockwise or counter-clockwise order.

How do you go about orienting all normals in the same direction, given a set of points, edges and faces? Say that you had a cube with all faces that have their normals facing outwards, except for one face. What's the best way to realize that face is "flipped", and should have it's points re-ordered? I thought I had a good way of telling this, but then realized that the algorithm I had would only tell you if you had points in clockwise order for a 2d polygon. I'd like something for 3d data.

Any hints, tips, references would be appreciated.

Steve

Where humor is concerned there are no standards -- no one can say what is good or bad, although you can be sure that everyone will. -- John Kenneth Galbraith

------- These opinions are my own.