Assignment # 2, CSCI 480
Fall 2015

Due date: Friday, Oct 30, midnight.

- Finish the ray tracer provided on the website in the folder `raytracer_minimal`. There are several sections of code marked with "`pass`" so that they will still compile, but do nothing. Finish each of these as illustrated in the lecture notes:

  camera: `lookAt`

  light: `PointLight`

  material: `Image, Reflector`

  shape: `Plane, PlaneIntersection, Cube, QuadricOfMyChoice`

  world: `MyWorld`

- You should implement a single quadric of your choice, but not the ellipsoid. You do *not* have to implement rotation for this quadric, but you should be able to move it to random locations.
- You should implement a `MyWorld` class that illustrates all of the features you implemented.
- Write modular, well-documented code.
- Create some fascinating images. Use your noise function, or some images from it, as procedural or image textures.
- Create a `main.py` file, which, when run, will open a pygame window and create your most interesting image. This will save me time grading and trying to figure out the parameters I need to call your function, etc.
- Zip your code and best images together (don't use tar or anything else–I will be writing scripts to unzip and then run `main.py`) and submit to Canvas by the due date.