## Computer Animation I Opposites

The goal of this project is to have you create an image that explores the idea of *opposites*.

The requirements are:

- you must build all of the models you use.
- every ray that is traced through the camera should hit an object (in other words, you'll probably have to build an environment).

The assignment is due in two parts.

## DUE Monday October 1<sup>st</sup> at the beginning of class:

Hand in a sketch of the image your are creating. I should be able to tell from the sketch what particular opposites you are working with, and what the individual objects are that make up the scene. Your sketch should also make clear the important compositional elements in your scene (frame balance, use of lines, points of attention, etc). Annotate your drawing with words if necessary, and keep a copy for yourself to use as a reference.

## DUE Wednesday October 3<sup>rd</sup> at the beginning of class:

A folder with your name in the class *hand-ins* folder. Your folder should contain your content folder, which should have the standard hierarchical structure of a Lightwave content folder (*Images, Objects, and Scenes* subfolders). Inside the respective subfolders should be all of your models, your scene file, and your rendered final image. Put the latter in the *Images* folder, in case you didn't guess that.

Project Notes, Tips, etc.

If you're having trouble coming up with an interesting relationship to visualize, consider the following: rural/urban, organic/inorganic, dark/light, anarchy/monarchy, female/male, north/south, legal/illegal, pro/con, atheist/believer, left/right, etc.

Spend a lot of time getting your sketch right. Play with compositional ways of exploring the idea of opposites.

Make a list of the models you need and give yourself a time limit on building each one (snowman: 30 minutes. matchstick: 10 minutes). This will help keep the assignment tractable.

You can always build rough versions of your models, lay them out in a scene, then go build higher-resolution versions. Save new versions of models under different names and use the **replace object** option in Lightwave to swap out the new for the old. This will preserve the transformations you have applied in Lightwave (so build the new models the same size as the old ones).

## **Opposites (continued)**

More notes:

- always work from a sketch.
- aim for a clear, easy to read composition. Build your models to read clearly, too.
- re-read the **composition tips** section in Kerlow, page 194.
- decide on your lens length relatively early. Do you want a wide-angle lens? Telephoto? Why? Note: if you want to use focal length measurements that correspond to 35mm SLR cameras in the real world, make sure you set the aperture height in the camera properties panel to size 135 (35mm SLR). Do this before you start changing the focal length.
- use real measurements to build your objects since the lens is imitating the math of the real world.
- use multiple orthographic views to put your objects in the proper relative arrangement, then use the camera view to finish them off. The scene only has to look good from the camera, after all!
- If you want, feel free to move the existing light around to better suit your composition, however, we will be lighting these scenes in the future so please don't spend time doing so for this assignment.
- If you want to have shadows in your scene, find the **Rendering** menu on the left, and pop-up the **Render Options** dialog box. Click the **ray trace shadows** box to enable them. This is also where the ray trace reflection box lives, if you want to have reflective objects in your scene...
- email questions to your classmates at cs174f01@lists.hampshire.edu.
- email questions to Dan at dhayes@hampshire.edu.
- email questions to me at perry@hampshire.edu.
- Make use of Dan's lab hours.
- Don't forget about the Lightwave online manual.