

CG 200 Computer Graphics Assignment 1

Photo-Realistic Images with POV-Ray

1. Requirement

In this experiment, each student has to create and render his/her own scene. The generic theme for the scene is “**My Zootopia**”, which can be anything associated with zoo animals, or the successful Disney movie. The theme is intentionally open-ended, so that your creativity will not be restricted. Each student is required to design, model and beautify his/her own scene. Every scene generated must consist of objects of different shapes. It is up to you how to render them and what expressive tools to use for them. Beside the compulsory requirements listed below, you can add to your scene whatever you want. The better/complex your picture looks, the higher your grade can be. So, inspire, create and have fun!

You can use your own machine for running the POV-Ray but the final image **MUST** be rendered and presented in the Lab.

2. ASSESSMENT

During the practical sessions in Week 5 (Starting on 5 September), you must demonstrate your raytraced image and show the scene definition file to your tutor at **your enrolled practical session**. Time stamps will be checked to ensure that they are done **before 9am on 5 September. NO REPORT IS NEEDED**. You must be ready to show the tutor your ability to change any part of a scene. So simply copying from the sample files will not be good enough. **Failing to turn up at your practical session and hence miss the demonstration will result in a mark of Zero for this assignment and a “F-IN” for the unit.**

You must achieve the following requirements:

1. At least 7 different shapes (not objects) must be used. For example, many spheres in the scene with different radius and locations will be considered as 1 shape, but a car might consist of many shapes, depending on how it is modelled. You are encouraged to try shapes modeled by splines or polygonal meshes.
2. At least 6 different textures or surface finishings must be used in your scene. Bumpy and transparent objects are highly desirable.
3. At least 3 different light sources should be used.
4. A simple animation of up to 30 frames is required.