# COS 125 Design Document

Here is a template that you can use for your design document. Remember that the design document is the blueprint for your project. It is also your preliminary effort to define the project and outline its parts. You can change your project. In practice, this would mean rewriting the design document as you made changes to the project. Because of time limitations in the course, we only write one design document. You will address the various changes that you made in your review document which you will write after you finish the project.

A cover page should have these items

**Design Document**

**NAME OF THE PROJECT**

**Your Name**

**Date the Document Was Finished**

**Dates of Any Revisions That Were Released**

*Try to think of an original name for your project. Try to make it descriptive as well.*

# SECTION 1. INTRODUCTION

Describe in very general terms what game you are implementing and a brief overview of how it will work. You should also describe your target audience. In other words, who is most likely to play the game? Would college students, K-12 students or some other group have a special interest in the game. Also describe what the primary purpose of the game is. In other words, is the game primarily for entertainment, education or for some other reason.

# SECTION 2. OVERVIEW OF THE GAME

Describe the game. What are the rules? Does the game keep score, track time or do some other record keeping? If it is a relevant concept, describe how does the player “wins” the game. Under what circumstances does the game end? Does it keep track of high scores? Can the user save the game and return to it later? Tell whether it is a graphics game or a text game. Tell whether your game uses sound in any way.

# SECTION 3. THE USER INTERFACE

Give a description of what the user will see and how the user plays the game. Does the user use the mouse, the keyboard and/or other input devices? How many different screens will there be. Sketch the screens if you can. You can supply screen shots of any screen that you have already implemented. Describe how the user moves from screen to screen. If you use music or sounds, describe what you are using.

# SECTION 4. ARCHITECTURE OF THE GAME

Describe the large scale design of the game. How many major pieces does it have? For example, there might be a database of users (players), a file storing the high scores and the players who achieved them, a collection of images, some calculation engines, a music or sound generator, some artificial intelligence engines, etc. Does your game use online resources while the player is playing?

# SECTION 5. SCOPE OF EFFORT

Give some idea of the size of the project. How many files will you use of each type? How many functions, screens and images will your program have? What other ways of measuring the program do you think are relevant to scoping out the size of the effort? Will the program have a large database of any sort?

# SECTION 6. IMPLEMENTATION PLAN AND TIMELINE

Try to figure out the steps that you should take to create the game. How many versions will you build and what will each version be capable of doing? Try to estimate how many hours of work each version will take. How will you get it done in time to submit it by the deadline? How many hours will you on the project each day between the date you start and the deadline. Try to detail what you will do each day and how much time that will take.

# SECTION 7. RESOURCES USED

Describe the resources that your game will use. For example, if you are using a graphics package tell us what the package is. You might have a text based package or use ASCII art. In any event describe any tools that you plan to use and any modules that you plan to use. For the modules indicate its name, function and source.

# SECTION 8. CONCLUDING REMARKS

Give us any additional information that is relevant to understanding your game. Also give a description of any tools or techniques that you plan to use in the construction of the game.

# SECTION 9. BIBLIOGRAPHY

List any books, manuals or other resources that you used to construct the design document and/or which you plan to use in the construction of the game.

# SECTION 10. WORK ASSISTANCE STATEMENT

As usual, write a work assistance statement for the document.

## Some final thoughts about the design document.

The document must be professional in appearance. Use a word processor and make sure to use the spelling checker and grammar checker. Be sure to give credit to anyone and any source that you use. While it is OK to look at other people’s games for inspiration, we want you to be as original as possible and invent a game that you are really interested in building. Try to be as original and creative as possible. Don’t be afraid to think big.