

Project three

Experimental interface design

25%	Due:	Apr. 13
	Format:	Polished sketches Report
	Concept:	Mar. 24 25
	Critique:	Apr. 7 8

Overview

The last of your three assignments is meant to provide you with the experience of working on an experimental interface design project. You will have a choice to work on one of two research projects. Support documentation for each project is attached.

This is, predominantly, a thinking design task. Yes, the end result has to exhibit excellent aesthetic judgement. Primarily, however, this project is about creating interesting solutions to interesting problems.

Please develop a set of polished sketches that clearly illustrate your concept for the project.

I fully acknowledge that these requirements may appear vague at first. However, my objective is to give you the most room possible to be innovative,

challenging, challenged, and pushed into previously-unexplored territory.

Project context

I will provide you with descriptions of two different research projects, and you are asked to select one of them as your assignment for COMM 3611. Both alternatives are currently running as research projects out of the University of Alberta. There is potential for further student involvement on these projects throughout the summer, for your sketches to go into implementation, and / or for you to receive publishing credit for your work. I will discuss the logistics of these possibilities personally with you, if and when they develop.

Deliverables

As a final deliverable for this project you will submit one document:

- 1024 x 768
- Landscape
- PDF
- Submit via the Digital Dropbox

In the report, please include:

- Your polished sketches
- Screen-by-screen descriptions of the interaction occurring in your design (c. 250 words)
- A thorough discussion of your idea, backed with relevant literature review where ever applicable (c. 750 words)
- A brief visual discussion of your visual design

Marking criteria

Since this is the last project of the semester, as a base requirement, I would like you to demonstrate that you have learned the fundamentals of interface design, both from our discussions and through the completion (and critiques) of your

previous projects. Thus, I expect your deliverable to be highly polished aesthetically, professional, thoughtful, and well presented.

In addition, this project is about creating interesting solutions to interesting problems. I will be looking for innovation and creativity, emergent out of thinking, research, more thinking, and an exploration of said thinking and research.

Presentation quality is very important in this course.

Please note that up-to a full grade may be deducted for problems in presentation quality and/or if the project has not been executed to spec.

Note: I will not be able to assign a grade to a project that does not have a proper file name.

Process

You are expected to complete extensive written and visual exploration, as well as relevant research for this project. Please use your sketchbook to keep track of all drawings, brainstorming sessions, and research. When doing internet-based research, print and paste reference materials into your sketchbook. Please bring your sketchbook to every class.

Deadlines

Note that this project may have additional, interim deadlines. Please consider these as formal deadlines (like the kind you would have at the end of a project.)

I reserve the right to deduct up to half a grade from the final project for each interim deadline missed.

A. The BigSee

Overview

Large displays are becoming more and more popular (Czerwinski, 2006). Currently, however, researchers have not fully investigated how a big display affects the design of visualizations. Research has used large screens as simply a place to display things for many people to see, or concentrated on the interface and control aspects.

The questions we are asking are slightly different. We will be investigating the following: How do large scale information displays (LSID) affect visualizations of text? For example, is it possible that using a large display will enable us to gain new insights into written works. Also, what can we do visually on a large display that we cannot on a regular one? And finally, are large format displays used in a different manner than regular displays?

Resources

<http://tada.mcmaster.ca/Main/BigSeeLitRev>

<http://tada.mcmaster.ca/view/Main/BigSee>

Your task

There are several possible ways to explore the ideas presented through the BigSee project.

For example, we could explore what answering and sorting our e-mail would look like when working with a LSID. If we had a whole wall, how would you use that screen real estate to handle all of your email.

Or, we could look at a novel such as Frankenstein. How can the big screen help us understand the whole novel quickly? Since we have a whole wall, how can we use it to allow multiple people to interpret one piece?

The specific way you choose to tackle this project, is up to you.

B. Structured Surfaces

Overview

Our goal in the Structured Surfaces project is to extend conventional diagrams – such as maps, timelines, radar plots, and targets – by introducing an additional cognitive layer underneath a given data display.

We provide the user with a graphical surface. The user can then integrate this surface with textual data – from one or more sources. In addition to the surface itself – the graphical area plus data representation(s) – we also provide several tools for interactivity and, in certain cases, dynamic content.

We want to help the user to mentally structure the information. And, perhaps, help discover new relationships between data from diverse textual sources.

Resources

<http://vis.stanford.edu/protovis/>

<http://mbostock.github.com/d3/>

<http://ra.tapor.ualberta.ca/~jitr/>

Your task

I will show you some concepts generated for this project. What I would like from you, are more ideas for possible structured surfaces and scenarios for their uses. If you choose this option for Project 3, please generate three different structured surfaces as your deliverable.

When working on either BS or SS, please consider context, information display, navigation, interaction, and any other issues you can think of.