CIS 410/510 Eye Tracking Methodology and Applications
Class Project
A.Hornof 5-26-09

Final Project Due June 4

Final Project Writeups Should Include

- Introduction (goals/motivation/hypotheses of study, properly referenced)
- Background (what's been done by others already, properly referenced)
- Research question or Hypothesis (clear statement of exactly what you will study)
- Experimental Design ()
- Methodology
    - Participants (who were your participants and how you recruited them)
    - Stimulus or Materials (one or two screenshots of your display)
    - Apparatus (what equipment and software were used)
    - Procedure(s) (what exactly each participant experienced, and was asked to do)
- Results (the data, what was observed)
- Discussion (an interpretation of the results)
- Conclusion (reposition the work in the bigger context of the field)

The paper should be 10 to 15 pages long, double-spaced 12 pt Times (or similar typeface), and follow the "good writing" standards discussed in the course syllabus.

Presentations

Please also prepare a five-minute presention of your project that you will present to the rest of the students on the last day of class. This does not need to be fancy or elaborate, but should quickly convey what you didn, and should cover whatever bullets discussed above are most interesting for your project.

Evaluation Criteria for Final Writeup

Introduction: Is there a clear motivation for the project? The general idea of the project should be introduced in the context of the field of study in which it is being situated, with a brief statement of the general goals of that field, so the reader can understand the relevance of this work.

Background: Is the work properly situated in the context of previous work? You must reference at least six papers that in some way directly relate to the question you are asking. Use the APA citation style or whatever style is used in your field.

Research Question or Hypothesis: It is important to state a clear research question that the project is investigating. The question can be either scientific or artistic, but it must be precise, not open-ended, clearly stated, and clearly relevant. You must also clarify exactly what you will look for in the eye movement data, and how that will directly answer your research question.

Experimental Design: This should be intimately related to your Research Question or Hypothesis, and should clearly state the design or composition of the experiment, such as what were the factors and levels of the factors, how blocks were organized and ordered, and whether the experiment was within- or between-subject.

Methodology: This should describe your experiment in enough detail so that another student in the class could read your paper and execute your experiment. If there is substantial implementation that was done, then you should explain what that was.

Results: Is it is easy for the reader to understand exactly what was observed? Ideally this would include statistical analyses of data such as reaction times, accuracy, and a range of different eye movement measures. If your number of participants is small (such as if you only conducted a "pilot study") you should still be able to write about the trends that you are seeing.

Discussion: This should clearly state whether the hypotheses were supported, what this means for the immediate, and the implications for bigger research questions. How did the eye movement data in particular answer questions that would have been difficult to answer without that data?

Conclusion: Can you clarify what this study means, and how it contributes to, the bigger context of the field in which it is situated?