

**Team Members:**      **Dan Jonovic** – Team Leader  
                                 **Andrew Dias** – BWIG  
                                 **Nick Balge** – BSAC  
                                 **Whitney Johnson** –Communications

**Advisor:**                      Professor Mitch Tyler

**Client:**                         Dr. Bikash Pattnaik

**Next meeting:** 10/16/08, 9:30pm

**Problem Statement:**

Electroretinogram (ERG) is the measurement of voltage across the retina in response to light flash. The investigator uses a modified system to register voltage across a small piece of retina isolated from mouse. For facilitating this recording it is important to design a computer interface which not only registers voltage response but drives all the ancillary inputs like light source, solution valve openers and stores output as simple files in Excel for further analysis. This is important as this is a viable model for retina research and also for trial of pharmaceutical lead compounds.

**Team Goals:**

- Mid-semester Presentation
- Finish report
- Finalize PDS
- Begin developing new GUI

**Individual Goals:**

Dan                      Focus on entirely new program design and design matrix.  
Andrew                Critique of current design & expanded problem statement.  
Nick                     Develop ‘tweak’ design as well as GUI overhaul.  
Whitney                Focus on background & importance of project.

**Summary of Accomplishments:**

We established our presentation and the points that each of us needs to develop upon or the report.

**Difficulties:**

There is a lot of information to present – it’s a challenge to optimize the effectiveness of the presentation. Also, the presentation and report require a significant amount of time in the short term.

## Project Schedule:

| Week               | Date                       | Topic   | Activities / Deliverables  |
|--------------------|----------------------------|---|--|
| 1                  | September 5, 2008          | Introduction and course expectations<br>Course advisors<br>Room 1610 Engr Hall                        | Form teams; select project; contact client; email team roles to advisor  |
| 2                  | September 12, 2008         | Design process and Product design specifications (PDS) guidelines                                     | Literature search; meet with client  |
| 3                  | September 19, 2008         |   | Develop understanding of project; post preliminary PDS on web site; post team photo on web site  |
| 4                  | September 26, 2008         |   | Brainstorm   |
| 5                  | October 3, 2008            |   | Work on design   |
| 6                  | October 10, 2008           | Oral presentation guidelines  | Decide on design alternatives; work on presentation  |
| 7                  | October 17, 2008           | ORAL PRESENTATIONS<br>Note: All students should plan to be present for the full class period.         | Put PowerPoint presentation on team web site by 10:00 am   |
| 8                  | October 22, 2008           |   | By 4:00 pm: deposit notebook and written report including PDS in 2135 ECB; email report to advisor and client; fully update web site                       |
| 8                  | Friday<br>October 24, 2008 | Tong Distinguished Entrepreneurship Lecture   | Submit peer/self evaluations by email by 10:00 am; decide on final design  |
| 9                  | October 31, 2008           |   | Work on design   |
| 10                 | November 7, 2008           |   | Work on design   |
| 11                 | November 14, 2008          |   | Work on design   |
| 12                 | November 21, 2008          | Poster presentation guidelines  | Work on design, Work on poster presentation  |
| THANKSGIVING BREAK |                            |   |  |
| 13                 | December 5, 2008           | FINAL POSTER PRESENTATIONS<br>Note: All students should plan to be present for the full class period. |  |
| 14                 | December 10, 2008          |   | Hand in written report to advisor and client and post it on web site; submit design notebooks; complete final update of web site; submit client evaluation |
| 14                 | December 12, 2008          |   | Submit peer/self evaluations by email by 10:00 am; final meeting with advisor  |

## Activities:

|                     |                     |   |       |
|---------------------|---------------------|---|-------|
| 10/10/08            | Team                | Team Meeting: divided work for presentation, developed a flow chart of necessary features | 2.00h |
| 10/10/08-10/14/08   | Team (Individually) | Develop individual portions of presentation and practice                                  | 1.00h |
| 10/14/08            | Team                | Meeting to run through presentation   | 2.00h |
| 10/15/08 – 10/16/08 | Team (Individually) | Develop individual aspects of the presentation and practice for the next meeting          | 1.00h |

## Expenses:

There are no expenses to report so far.