

FORMAL LAB REPORT FORMAT

The following is a guide for all formal lab reports in this course. You need not limit yourself to this outline. If additional information is warranted then please add it.

1. Title page

- Title, names of group members, class, teacher, date submitted

2. Introduction & Background

- important concepts essential to understand your experiment
- your choice of experimental model
- list of lab objectives: independent variable, dependent variable, control factors, etc.
- include what is already known with citations
- indicate what you hope to learn (purpose)
- clearly identify your hypothesis
- **caveat:** This introduction section will take some research. Do not “wing it” by making up info from your head!

3. Materials used in the lab

4. Procedure

- a brief description of the procedure to show how the lab was conducted
- describe methods for control variables
- describe methods for collecting the data

5. Results (present the data)

- construct data tables & charts to present the data collected
- must include titles and labels for all tables & charts

6. Analysis (process the data)

- construct all graphs needed to show results, must include titles and labels
- answer all questions from the lab handout & include all equations & calculations

7. Discussion & Conclusions

- state a valid conclusion & explain
- explain any unexpected results & why those results may have been obtained
- evaluate the data to determine if it supports your hypothesis using specific reference to the data
- evaluate the procedure, making suggestions for improvement if needed
- identify weaknesses & state realistic improvements