

Formal Report Format

Total report points:

Submit as 1 pdf file through Canvas. Late reports are either not accepted or penalized at a loss of 20% per day.

Note: Do not provide any of your lab data or report components to a lab partner (if any) or other students in class. If students share any lab data or report components (calculations, graphs, et.), all persons involved will receive a zero grade for their lab work and report.

Note: All sections should be typed except for your handwritten calculations. All sections should be presented in the same order presented below. All section headings (ex. Purpose) should be listed in bold-font and underlined. Do not include blank spaces between sections. Use all spaces and print with minimum number of pages. Points will be deducted from reports that have wasted space.

- 1) Title page (Experiment's title, Your Name, Partner's Name (if any), Due Date)
- 2) **Purpose:**
 - a. List the main purpose of the experiment as shown in the write up.
- 3) **Raw Data:**
 - a. Include table(s) of your raw data and/or reaction observations (if any). Tables should be neat with border lines and a table number and heading. (ex. Table 1. Absorbance data).
 - b. All numerical data should be expressed in proper significant figures.
- 4) **Data Summary:**
 - a. Include your data summary table(s). Tables should be neat with border lines and a table number and heading. (ex. Table 1. Absorbance data).
 - b. All numerical data should be expressed in proper significant figures.
 - c. If this section is not turned in, you will lose considerable number of points.
- 5) **Conclusion:**
 - a. Conclusion is the most important section of your report. Conclusion should be presented in bullet style format. Present each bullet point in the same order that each finding is presented in your data summary tables.
 - b. Conclusive statements should be expressed quantitatively in full sentence format and avoiding pronouns like "we" or "I" (Use passive language). Be concise and quantitative as you support the purpose of the experiment while listing only the important (ultimate) result with its standard deviation (SD) if you have conducted multiple trials. For example, list "The average density of the unknown liquid was 0.93 g/mL (SD=0.04 g/mL, %error=1.5%). The values that you refer to and list here should be included in your data summary table(s).
- 6) **Appendix:**
 - a. **Sample Calculations:** Present a sample calculation for every type of calculation in a neat and organized manner. This section should be handwritten.
 - b. **Graphs:** Include all graphs here. Graphs should have proper format as discussed in the Excel graphing exercise.
 - c. **Post Laboratory Problems:** Rewrite (Type) each problem statement and show your handwritten answers for each problem presented. All steps leading to final answer should be shown in a neat and organized manner.