

This is a guide to help you understand how to write a lab report.

The first two pages give you information on what to write for each section.

The last two pages contain a template the you can fill out if you would like.

Please contact me if you are struggling with writing the lab report.

First and Last Name
Date
Course

Title of Your Lab

PART 1: INTRODUCTION

Purpose:

Answer the question: "What am I trying to find out by doing this experiment?" in 2-3 sentences.

Question:

"What question are you trying to answer by doing this lab?"

Hypothesis:

This is your guess BEFORE you do the lab about what you think will happen. Use an "If, then, because statement..."

Example: **If** I grow a plant in sunlight and in darkness, **then** I think the plant in the dark will not grow **because** I know plants need sunlight to perform photosynthesis.

If = what you are changing in the experiment (sunlight or dark)

Then = what you think will happen because of the change (the plant in the dark will not grow)

Because = the reason why you think that change will happen (because plants need sunlight for photosynthesis)

Variables:

Independent Variables: what are you changing in your experiment (sunlight vs. dark)

Dependent Variables: what you are measuring in your experiment (plant growth)

Controlled Variables: the variable that is kept the same to ensure a "fair" test. (same soil, water)

PART 2: MATERIALS AND PROCEDURES

Materials: List all of the materials you used

Procedure:

- 1) Write down the steps of your lab like you are writing a recipe.
- 2) Number each step
- 3) Imagine that your friend is going to follow your procedure so make sure to be clear.

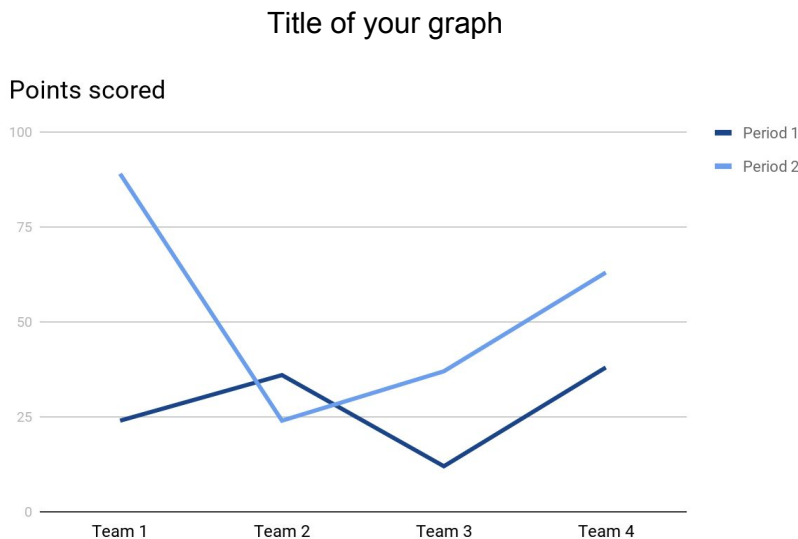
PART 3: DATA COLLECTION

Create a data table for your data. Make sure to label all columns and rows.

Don't forget your labels

| | | |
|--|--|--|
| | | |
| | | |
| | | |

Graph your data below: choose the correct graph for your data (bar, line, histo, pie, scatterplot). See the fact sheet to help you choose the correct graph. Remember to label your graph and both axis.



PART 4: ANALYSIS AND CONCLUSION

Analysis:

Describe the data and results of your experiment using words. Discuss your variables, explain the trends in the data, discuss data points to explain the outcome of an experiment, explain what your graph is showing you.

Conclusion:

Answer the following questions: describe what happened in the lab, what have you learned in this lab? Was your hypothesis supported or not supported by your experiment, why or why not? Discuss sources of error (what could have gone wrong). If you did this experiment again, what could you change to make it better?

First and Last Name
Date
Course

Title of Your Lab

PART 1: INTRODUCTION

Purpose:

Question:

Hypothesis:

If _____, then _____, because _____.

Variables:

Independent Variables:

Dependent Variables:

Controlled Variables:

PART 2: MATERIALS AND PROCEDURES

Materials:

Procedure:

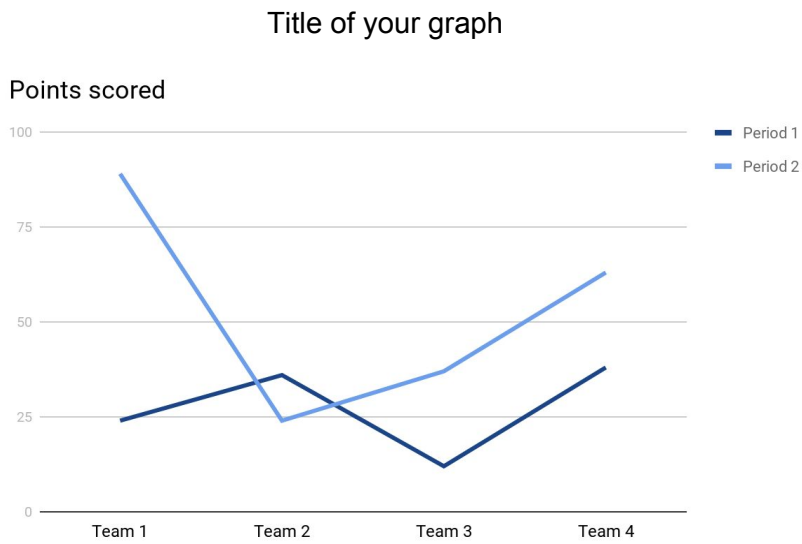
- 1)
- 2)
- 3)
- 4) etc.

PART 3: DATA COLLECTION

Data: Title

| Label | Label | Label |
|-------|-------|-------|
| | | |
| | | |
| | | |

Graph of Data:



PART 4: ANALYSIS AND CONCLUSION

Analysis:

Conclusion: