## WRITING A SCIENTIFIC REPORT

## A. What is a final project report ?

A final project report is a structured way of communicating the outcomes of your practical work.

The structure of a typical Final project report includes the following sections:

* Aim and Hypothesis - Why you conducted the practical work.
* Method - How you conducted the practical work and how any data processed.
* Results - What was the data, process or product obtained from the practical work.
* Discussion - How your results addressed your aim and hypothesis.
* Conclusion -  What was the overall outcome of your practical wok and how do your finding relate to the larger body of scientific knowledge.

You can apply the common report writing techniques outlined below, after always checking the specific details of your assignment.

## B. Final project report structure

## 1. Title

## The title describes the purpose of the practical work in precise terms.

2. Abstract

The abstract provides a brief overview of the practical work, including key results and conclusions.

Keep your abstract short, i.e. about one paragraph or 250 to 300 words. It must be clear enough that the reader can understand a summary of the report without needing to read the rest of it.

3. Introduction about 500 words

Theintroduction is where you introduce the reader to the broader context of your practical work and then narrow down to the hypothesis, aims or research question you intend to address.

You should also succinctly explain relevant theory and discuss any relevant laws, equations or theorems.

4. Reviewing the literature on the problem

A literature review is a survey of scholarly sources on a specific topic. It provides an overview of current knowledge, allowing you to identify relevant theories, methods, and gaps in the existing research.

5. Method

The method section is where you describe what you actually did during the practical work. You need to describe the actions you took in a way that someone from your field has enough information to replicate the process and achieve a similar result.

You must also include any unplanned changes to the original process which occurred during the execution of the experiment. A great way to keep track of this is to use a lab notebook during the practical work to note any change you make.

6. Result

The results section is where you present a summary of the data collected during your experiments. This section is not just a copy of the raw data from your lab notebook. Rather, it may involve calculation, analysis and the drawing up of tables and figures to present your data.

7. **C**onclusion

Students often make the mistake of thinking a conclusion section is identical to a discussion section.

The conclusion section is where you summarise your report. A conclusion is usually one paragraph or 200 to 300 words. In this way a conclusion is very similar to an abstract, but with more emphasis on the results and discussion.

8.References

When in-text citations are incorporated into your lab report (typically in the introduction or discussion) you must always have the full references included in a separate reference list. The reference list is a separate section that comes after your conclusion (and before any appendices).