

# Paper Outline

*The primary objective of this template is to help you organize your thoughts on the contents of a scientific paper. The standard format of a scientific paper is: Introduction, Methods, Results, Discussion and Conclusions. There are many modifications to this (e.g. include a Theory section or combine the Results and Discussion sections). Below is the likely order that one should work through to organize your paper, which can then be translated into the standard format (order). Try to move through each section in order, one follows naturally from the previous. Typically, each bullet point that you write below one of the sections is going to be a paragraph (though maybe not).*

## 1 Primary Objectives

*List the primary objective(s) of the work. Probably one primary objective and several secondary objectives.*

## 2 Results to Fulfill Objectives

*List the primary **results** that will fulfill the objectives. Will the results be shown by a figure, table or in the text?*

## 3 Discussion - Anomalies

*List each discussion item. For each result, was there an anomaly about the result that needed to be described further? Outliner in the data? Simple re-analysis with different starting conditions (e.g. curve fitting)?*

## 4 Discussion - Pertaining to Previous Work

*List each discussion item. For each result, how does it pertain to previous work? Are your results better? If not, why?*

## 5 Discussion - Future Work

*List each extension to this work. How can the work be extended?*

## 6 Describe the Methods

*List each method that needs to be described. A method could be apparatus setup. Data analysis (and statistical tests). Participants (entry criterion, exclusion criterion). You will likely have several points here, again, each point will likely end up being a paragraph.*

## **7 List the areas to Introduce**

Given the results and discussion, what are the main areas that need to be introduced?

### **7.1 Motivation**

### **7.2 Previous Work**

### **7.3 Restate objectives**