One important guideline for writing:

Until step 6: no beauty, only efficiency
Until step 3, for the full thesis.
From step 4 & 5 on, for each section separately.
From step 6 on, for each paragraph

Phase I: Try to get your thoughts out of your brain:

1. Brainstorm what you want to write
2. Make a structure
3. Write for each section what should be contained (in a draft mode, nobody cares how that looks, you do not need full sentences here)
    a. Important: you have to be fast here!

Phase II: Writing sentences

4. Write for each paragraph one so-called "point sentence": describe what is the purpose of this paragraph
    a. Take care to write it with view to the reader
    b. Important: be fast. If you don't know what to write at some point, leave it empty and move to another section.
5. Check for each point sentence that you only have one statement/intension in each point sentence
6. Write transitions between paragraphs: take the perspective of the reader, start with information that the reader knows (old information) and lead him to the information you want to convey (new information)
7. Make sentences out of everything

Phase III: Polishing

8. Recheck that you introduced all notions and words that you use and that you always go from old to new information, in particular check for transitions within a paragraph
9. Make sentences short, while preserving the transitions
10. Make sure that the first sentence (or the first two sentences) of each paragraph: convey the point sentence of the paragraph

Phase IV: Final polishing

11. The last sentence of a paragraph enjoys particular attention: it is a useful place for a strong statement w.r.t. the point sentences of the current paragraph

- **FrontPage and info:**
    - Front page with logo, names, etc.
    - Second page with contact info?
- **Executive Summary (Abstract):**

    - A 1 page summary that articulates the following:
        - Establish the research gap
        - What is the **PROBLEM** you are trying to solve? Or what is the research **QUESTION** you are trying to answer?
        - Why is this problem/question **worth** solving/asking?
        - What is our approach?
        - What are our findings?
- **Acknowledgments**
- **Contents**
- **List of figures?**
- **Symbols and Notation (probably not necessary)**
- **1. Introduction (ca. 1 - 2 page):**
    - Establish a research gap:
        - What is the problem, the problem space (PD)?
        - Why is the problem important that is covered in the thesis? What is the problem?
        - Why is it hard? What have others done?
    - How do we tackle the problem?
    - What are our hypothesis?
    - What are our techniques? How do you prove that the solution we came up with is a **GOOD** solution? How can you demonstrate that your solution works?
    - What are our findings?
    - (Definition of terms)
    - (Description of remaining chapters)
- **Problem Statement (ca. 1 - 4 pages):**
    - **Related work (either here or before conclusion):**
        - Describe the field in general and how others have tried to solve this problem
        - In which way is your way better for your hypothesis?
    - Describe in detail the problem you are trying to solve
    - (Hypothesis presentation?)
- **Optional: Preliminaries**
    - Introduce concepts / frameworks that you in your thesis
- **Approach / Methodology:**
    - **Methodology:**
        - How do you solve the problem (described in the problem statement)?
    - **System design:**
        - Requirements and specifications?
        - Describe how you implemented your approach. If it is a software system give diagrams, relevant algorithms etc.
    - **System implementation**
        - Describe the methods that we use, in particular the external methods and tools (background)

        - Describe your approach to solving the problem. Describe any potential weaknesses of your approach
- **Experiments:**
    - **Experimental setup and design choices?:**
        - Describe how you implemented the experiments.
        - Talk about the performance of the Azure instance during experiments
    - **Experimental implementation:**
        - Goal: try to make as concisely clear how you do you what you do
        - Motivate your design choices
        - Describe how you evaluated to show that your approach was successful.
- **Evaluation / Results:**
    - Data analysis
    - Experimental results (objectively describe the results)
- **Interpretations:**
    - Interpretation w.r.t. the hypothesis
- **Conclusion:**
    - Summarize your thesis again as in the introduction. Describe how your evaluation revealed that your system is successful. Describe future work in this area.
- **Future work:**
    - Open problems that should be worked on
- **Appendices (what should go here?):**
    - E.g., detailed graphs
- **References/Bibliography:**