2DV505 - Current Topics within Computer Science - Final Report

This document specifies instructions that must be followed to prepare and submit both midterm (Iteration 2) and final (Iteration 3) draft of the report. Read and follow all instructions carefully.

- The text in the submitted repot must be your own and not written by anyone else including software tools such as copilot, ChatGPT and other such Generative AI based tools.
- You are not allowed to copy from other including books articles, blogs, wikis)!
- Each submission will pass through a plagiarism/clone detection system before correction. A **submission receives a grade F (fail) if plagiarism is detected**, and we initiate a formal investigation.
- Font size and style
 - Use Times New Roman font style
 - For the report title use the font size 12, for all other text including section headings, font size must be 10.

• Submission:

- o Your report must be submitted as a single PDF file.
- Names and LNU Student IDs of all group members must be specified in the report.
- Submission must be made by everyone in a group.
- Further details about the report structure are given on next pages, read them carefully.
 - Number of pages specified for each section may differ slightly, up to 1-2 extra paragraphs.

Final Report Structure for Option 1: Research Paper Review

1. Abstract (150 words)

A brief summary of the research papers reviewed, their connections, and key findings.

2. Introduction (0.5 - 1 page)

- o Introduce the research area, including a brief background.
- State the objective of the review, explaining the relevance of the selected papers.
- Provide an overview of the main themes or research questions addressed by the papers.

3. Analysis of Each Paper (2.5 pages)

For each of the selected 5 papers, cover the following:

- Key research questions or hypotheses.
- Methodologies used.
- Results and findings.
- Critical analysis of the paper's strengths and weaknesses. (Aim for half a page per paper, ensuring consistent coverage.)

4. Discussion of Connections Between Papers (1.5 pages)

- Identify and analyze any patterns, similarities, and differences between the papers.
- Discuss the broader significance of these connections in the context of the research area.
- Highlight any gaps in the literature that the papers collectively reveal.

5. Conclusion (0.5 page)

- Summarize key insights and contributions from the review.
- o Offer potential future research directions based on the findings.

6. References (not part of the 6-page limit)

List all research papers reviewed.

Final Report Structure for Option 2: Research Question (RQ)

1. Abstract (150 words)

A concise summary of the research question, approach, and key findings.

2. Introduction (0.5 – 1 page)

- Present the research questions and topic.
- o Explain the significance and motivation behind the RQs.
- Briefly introduce the approach or methodology followed and key results/findings related to the RQs

3. Approach or Method (1 page)

- Provide a detailed description of the methodology or approach used to study and answer the RQ.
- Justify why this approach is suitable.

4. Results (2.5 page)

- Present the findings related to the RQs.
- o Include relevant data or analysis supporting the results.

5. Discussion (1.5 pages)

- o Interpret the results, discussing their implications.
- Reflect on the process, challenges, and limitations of the study.
- Compare findings with existing literature (referencing supporting articles).

6. Conclusion (0.5 page)

- o Briefly restate the targeted problem and goals of the study
- Summarize your key findings/results and arguments.
- Discuss potential future work or unanswered questions.

7. References (not part of the 6-page limit)

Include the supporting research articles used.

See next page for Grading Rubric!

Grading Rubric

Total Points: 100

Reports are likely to be graded based on the following criteria:

1. Abstract (5 points)

- o Is the abstract concise yet comprehensive?
- o Does it accurately reflect the content of the report?

2. Introduction (10 points)

- Does the introduction clearly present what is required by the Introduction sections, e.g., the research area and objectives?
- o Is the significance of the topic or research question well-motivated?

3. Analysis of Papers/Methodology (20 points)

- For Option 1: Is each paper analyzed critically, covering key points like methodology and results?
- o For Option 2: Is the research method appropriate and well-justified?

4. Results (20 points)

- Are the findings clearly presented and backed by evidence?
- o Is there a clear link between the results and the research question (for Option 2)?

5. Discussion (20 points)

- Are connections between papers (Option 1) or interpretations of results (Option 2) insightful?
- Does the discussion address the broader significance of the findings and potential limitations?

6. Conclusion (10 points)

- Does the conclusion effectively summarize the key takeaways?
- Are future directions or open questions identified?

7. Report Structure, Writing, and Clarity (10 points)

- o Is the report well-organized and easy to follow?
- Are arguments presented clearly with logical flow?

8. References and Citations (5 points)

- o Are all references properly cited?
- o Is the selection of research papers/articles appropriate and relevant?