



Literature Review Assignment

Due by 11:59 PM Friday, September 13, 2024

General Guidelines

- Literature Review should be 2-4 pages including References, but not including Title page.
- Times New Roman, double spaced, 1-inch margins, headings to divide material
- 10-point type for the text portion and 12 point can be used for headings and titles
- Label all images and figures using numbers with a title and a descriptive caption of what the figure/table represents (check IEEE Editorial Style for formatting)
- Table titles are put above and center of the table; figure captions are placed below the figure
- IEEE Editorial Style Manual for Authors: <https://ieeauthorcenter.ieee.org/wp-content/uploads/IEEE-Editorial-Style-Manual.pdf>
- Purdue Online Writing Lab:
 - https://owl.purdue.edu/owl/research_and_citation/ieee_style/ieee_overview.html

Required Sections in the Document

- Title Page
 - Identifying information includes project title, author (ORS scholar) name, mentor name, faculty advisor name, lab name if available, and date submitted.
- Introduction
 - Describe the general area of your assigned research project
 - Cite works that are most recent and most relevant to your project. Use IEEE style for citations/references; use EndNote or Mendeley (highly recommended) or Zotero as citation tool. If you need help with literature search or using a citation software, please reach out to Bette Finn at GT library. (Literature search workshop materials posted in the shared Dropbox folder.)
- Background and Significance
 - Explain what is lacking, missing, or inadequate in the research area
 - Provide an overview of work other researchers have done in the area for background and context. Include appropriate citations

Note: Graphs, diagrams, figures, tables, photos, etc. are not required, yet can be effective, but do not overuse. Refer to them in the text and cite appropriately when they are not created/generated by you/your work.

- References (need to have cited at least 3-5 references)
 - Follow standard IEEE guidelines for formatting and citing references

Submission

Email the document to shanthi@ece.gatech.edu as a PDF attachment by the due date. Include "ORS 2024-25 Literature Review Assignment" in the subject of the email.

Note:

Adherence to expected format will be noted as part of your ORS performance evaluation. This includes the following:

- Formatting guidelines
- Type of document (PDF is the only accepted file type)
- Mode of submission (by email, and as a PDF attachment – not a shared PDF link)
- Timeliness of submission (document should be received by the due date/time specified)
- Completeness of the assignment (all required sections should be present in the document)



Writing Tips for Technical Reports

- When using technical vocabulary, remember that your audience may not be familiar with the terms, thus simplify when possible or add a non-technical synonym when possible
- Omit redundant or excessive detail
- Be straightforward and direct
- Eliminate personalization, editorializing
- Define all acronyms and abbreviations – write out acronyms first time followed by acronym in ()
- Numbers
 - Single digit numbers are spelled out
 - When a number is at the beginning of sentence it is always spelled out
 - Give numerical values in statements and avoid ambiguous words
- Avoid colloquial expressions
- Do not force complex words
- Avoid conversational tone
 - INSTEAD OF THIS: set up (used as a noun) USE THIS: apparatus
 - INSTEAD OF THIS: write up USE THIS: report, essay, document
- Use action verbs
 - INSTEAD OF THIS: talk about USE THIS: discuss
 - INSTEAD OF THIS: go with USE THIS: select
- Parallelism
- Use IEEE Citation
- Use tables and graphs that are easy to understand
- Refer to tables and graphs in text
- Stay away from pronouns:
 - INSTEAD OF THIS: When you apply a greater electric field
 - USE THIS: When the electric field is more intense OR With increasing electric field
 - Active vs. passive voice, what does your PhD mentor use? Easier to be concise with active voice, but passive voice is often required for technical writing
- Edit, edit again, Edit again for repetitiveness

Using Sources

- General References: referring to a study or many studies rather than a specific page number – example: Several studies have shown the association between undergraduate research and college persistence (cite several sources)
- Paraphrase: summarizing/explaining in own words something specific from a source / should include page number
- Direct Quotation: infrequently used for technical writing and if used should be just a phrase, in quotation marks, rather than complete sentences
- List ALL the sources used for the report
- http://www.ieee.org/documents/style_manual.pdf

Check for the following

- Is the descriptive information complete?
- Are all required components covered?
- Is the format and font appropriate?
- Is technical content at appropriate level?