General suggestions for report writing

GENERAL

- 1. Part of your job as researcher/engineers-to-be would be to outline your ideas, methods, results etc. in a representative way. Therefore, your report should be easy to read and follow. There should be a sensible order of contents together with a meaningful connection between following sentences, paragraphs and sections.
- 2. Important results, information, figures, tables, equations etc. should be presented in the main text of the report. You could put the calculations (if necessary!) and/or any other further information in the appendices.
- 3. Present your important and/or final results as in tables or figures than in the text body easier for readers to find and understand. (Different types of figures could be used based on the case and your preferences, like multiple curves)
- 4. When you present a number, think about its decimals (precision). For example, 23.34578% is not meaningful when we have many estimations/simplifications/generalization. Better to use 23% or 23.3%.
- 5. Based on numerous tests, reading comprehension is improved by about 20 percent when text is set flush-left, ragged-right as compared to justified text. Uneven spacing used between words eventually tires the eyes and limits the length of time text can be read without straining. Therefore, instead of justifying paragraphs it is recommended to either set them flush-left, ragged-right or use hyphenation (for MS Office users: one PAGE LAYOUT tab).

WORDS AND TERMS TO AVOID IN ENGINEERING WRITING

- 6. In general, write reports in third person. The terms "I," "we," or "our" should never appear anywhere in the text. If these terms are found, rewrite the sentence to eliminate them. Search for "I," "we," or "our" and edit them out.
- 7. Avoid the use of abbreviations such as don't instead of do not!
- 8. For introducing an abbreviation in the text, it is recommended, for instance, to write it as either PUB (Prediction in Ungauged Basins) OR Prediction in Ungauged Basins (PUB). Thereafter, you should always mention it in the text as PUB.
- 9. Avoid the use of the word "this," especially in sentences such as:
 - This shows what can be done.
 - This indicates good performance.
 - Use of the word "this" may be acceptable in sentences such as:



This situation is deplorable. Only if the "situation" is unambiguous.

This mechanism is too complex. Only if the "mechanism" is unambiguous.

- 10. Avoid misuse of the word "since." "Since" is used in a time sense (e.g., since 1900), and not as a substitute for "because" or "as."
- 11. Use of the words "which" and that." In general, "which" informs and "that" defines.

Use "which" with unrestrictive clauses. Unrestrictive clauses inform, but do not change the meaning of the sentence. If the sentence works without the clause, use "which" with commas before and after the clause.

When David retired from UC Berkeley, which is one of the schools in the region, he started his own consulting firm.

Use "that" with restrictive clauses. Restrictive clauses limit or define the preceding noun. "That" is used in sentences that do not work without the clause.

Organizations that fund charitable works are exempt.

- 12. Avoid overusing favorite words or expressions. For example words such as "existing," "major," "significant," "typical," and word phrases such as "in order to" and "in the manner of".
- 13. Avoid hyperbole (excessive exaggeration) in engineering writing. For example:

The plant was operated stupendously well.

The sentence should be written as:

The plant was operated well.

- 14. Percent versus % percent should be written out in the text. In tables, use of the symbol, %, is acceptable. In figure captions and table titles, "percent" should be written out. The term "percentage" is not used with numbers, as it is a relative term (e.g., a large percentage).
- 15. Avoid the use of mixed metaphors. Mixed metaphors are two words or expressions that are quite different in meaning, but are used together as though they were similar or identical in an implied comparison. For example:

The proposed plan has as much vision as a stump.

Because mixed metaphors are difficult to use effectively, and may be difficult for some readers to understand the intended meaning, they should not be used in engineering reports.

FORMATTING & LAYOUT

16. A report should have a cover page including the project title (and subtitle if needed), author's name, report number, date, and any other needed or relevant information. It is nice to have a picture* related to the report on the cover page, but it is optional.



- * If you are using a picture for the cover page, it should have a caption and source like any other figures that are presented in your report. Its relevance to the project and report should be briefly mentioned in the caption.
- 17. As you prepare different parts of your report at various times, integrate its layout before submission; the report has to be CONSISTENT (font size, page margins, grammar structure, verb time tenses, referencing system and so on).
- 18. All pages should have page numbers.
- 19. It is recommended that all headings* and sub-headings should be numbered as follow:

[Cover page: Title, authors' info, date, etc.]

Abstract [+key words]

Acknowledgement

Table of contents

- 1. Introduction
 - 1.1. Problem description
 - 1.2. Objectives0
- 2. Methods
 - 2.1. Study Area
- 3. Results and discussions

3.1. ...

3.1.1. ...

4. References

Appendix 1

Appendix 2

- * There are also some optional (but recommended ones) parts such as Acknowledgment, Acronyms and Abbreviation, List of Figures, List of Tables and Equations.
- 20. All tables and figures need captions. For the table it will be above and for the figure below. If they are extracted from any sources, the source has to be cited in the end of the caption plus in the reference list.
- 21. Figures/tables should stand alone, i.e., not require a reading of the manuscript to comprehend them, suggesting that you should have an explanatory caption (see below).



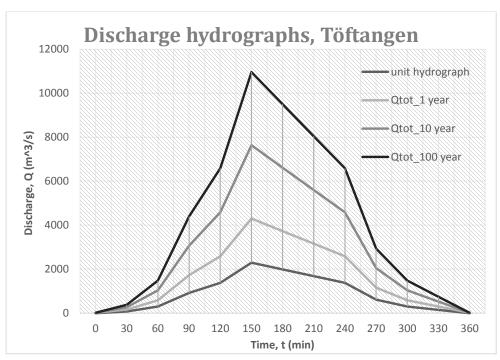


Figure X. For the project site Töftangen, discharge hydrographs for 1, 10, and 100 year return period are presented based on the unit hydrograph.

22. When you mention an equation you have to explain the meaning of different variables and their units – stand alone.

CITATIONS

23. When you define something, or use data or information from other sources than your own calculations/findings, you HAVE TO mention (cite) the source(s) both within the text and also in the reference list in the end and before appendices. Harvard Referencing System is recommended. It is available at http://libweb.anglia.ac.uk/referencing/harvard.htm.

For further and more detailed information you could have a look at "A Guidance Manual on the Preparation of Technical Reports, Papers, and Presentations" available at https://www.academia.edu/5498392/A Guidance Manual on the Preparation of Technical Reports Papers and Presentations.

