|  |
| --- |
| University of Gävle |
| Title of the Thesis |
| Subtitle – if any |
|  |
| *Author 1*  *e-mail address* |
| *Author 2 – if applicable*  *e-mail address* |
| Date |

|  |
| --- |
| Bachelor’s alt. Master’s Thesis, xx credits,  in XX Engineering |
|  |
| Examiner: Name  Supervisor: Name |

**Preface**

*The Preface is a product of the student. In the Preface it is customary to thank those which considerably have contributed to the thesis, e.g. supervisors, discussion partners, proof-readers or others that made large contributions to your work. However, bear in mind that not everybody wishes to be recognized, ask for permission first.*

*The Preface may not exceed one full page!*

**Delete this text box before publishing your thesis!**

**Abstract**

*The Abstract is a summary of the thesis assignment, and should contain all major parts of the work. Nothing which is not found in the report may be presented in the Abstract. However, in the Abstract brief information is presented on, e.g. aim, method, results, and conclusions.*

*The Abstract may not exceed one full page!*

**Delete this text box before publishing your thesis!**

**Table of contents**

*Reference to pages where chapters and subsections may be found.*

**Never edit the text directly in the Table of contents on this page.** (Except if you use Appendices, then you will have to follow the Notice below.)

In this document the Table of contents (ToC) is automatically updated by positioning the cursor somewhere over the ToC surface and left-clicking with the mouse.

1. On the top left corner of the border that appears surrounding the ToC click “Update Table…” (which is also indicated with an icon showing a document with a big red exclamation mark (**!**) on the side.)
2. Select “Update full table” only if you made changes involving removing or adding chapters, or changed a chapter title text. Otherwise, if you only added (or removed) text and figures it is sufficient to select “Update page numbers only”.

**Notice** that the Appendix page numbers may change from e.g. A1 to just 1 when updating. This is fixed by adding the letter A in front of the automatically generated page number in the table below.

**Delete this text box before publishing your thesis!**

1 Introduction 1

2 Theory 2

3 Process and results 3

4 Discussion 4

5 Conclusions 5

References 6

Appendix A A1

Appendix B B1

Appendix C C1

Appendix D D1

1. Introduction

*This chapter should give the reader an introduction to the thesis work, the background, and the aim.*

**Delete this text box before publishing your thesis!**

1. Theory

*Presentation of theories used in the work.*

**Delete this text box before publishing your thesis!**

1. Process and results

*Here the theory is applied on the subject, i.e. you describe* ***what*** *you have done,* ***how*** *you did it, and what results are. The results are presented in an objective and neutral way. Discussions and value-laden words belongs to Chapter 4.*

**Delete this text box before publishing your thesis!**

1. Discussion

*In this chapter the results and the chosen method are discussed, as well as the strengths and weaknesses of the work.*

**Delete this text box before publishing your thesis!**

1. Conclusions

*Here the work should be concluded and the major results presented. Suggestions of continuation and spin-off projects* ***may*** *be brought forward, usually under a separate subsection called “Future Work”.*

**Delete this text box before publishing your thesis!**

References

*Please ask your academic supervisor or examiner which system to use since his varies between different disciplines. As an example, within the computer science, and the electrical and electronics engineering disciplines the IEEE referencing system is used.*

*To get some assistance in reference writing (i.e. formatting) it is quite convenient to browse the internet. A computer science or electrical engineering student may look for the* ***official reference guide of the IEEE: ”IEEE Citation Reference”*** *(which may be a bit rigid in the format) or by using search terms like e.g. ”* *IEEE citation style” to find good on-line guides, and even reference generating tools (e.g. RefME.com) where you enter the type of reference (book, scientific article…) title, author etc. and the tool returns a correctly formatted reference.*

*A comprehensive and easy to use guide, “Citing and referencing - Library Guides at Monash University”, may be found at (guides.lib.monash.edu/citing-referencing).****NOTE!*** *A reference may not be listed here unless it is used and cited in the thesis!*

**Delete this text box before publishing your thesis!**

Below is an example of an IEEE style reference list (*The text within brackets is there for information only and should not be included in the real reference list*):

*Härunder visas ett exempel på hur en referenslista kan se ut:*

1. G. O. Young, “Synthetic structure of industrial plastics (Book style with paper title and editor),” in *Plastics*, 2nd ed. vol. 3, J. Peters, Ed. New York: McGraw-Hill, 1964, pp. 15–64.
2. W.-K. Chen, *Linear Networks and Systems* (Book style). Belmont, CA: Wadsworth, 1993, pp. 123–135.
3. H. Poor, *An Introduction to Signal Detection and Estimation*. New York: Springer-Verlag, 1985, ch. 4.
4. B. Smith, “An approach to graphs of linear forms (Unpublished work style),” unpublished.
5. E. H. Miller, “A note on reflector arrays (Periodical style—Accepted for publication),” *IEEE Trans. Antennas Propagat*., to be published.
6. J. Wang, “Fundamentals of erbium-doped fiber amplifiers arrays (Periodical style—Submitted for publication),” *IEEE J. Quantum Electron*., submitted for publication.
7. C. J. Kaufman, Rocky Mountain Research Lab., Boulder, CO, private communication, May 1995.
8. Y. Yorozu, M. Hirano, K. Oka, and Y. Tagawa, “Electron spectroscopy studies on magneto-optical media and plastic substrate interfaces (Translation Journals style),” *IEEE Transl. J. Magn.Jpn*., vol. 2, Aug. 1987, pp. 740–741 [*Dig. 9th Annu. Conf. Magnetics* Japan, 1982, p. 301].
9. M. Young, *The Technical Writers Handbook*. Mill Valley, CA: University Science, 1989.
10. J. U. Duncombe, “Infrared navigation—Part I: An assessment of feasibility (Periodical style),” *IEEE Trans. Electron Devices*, vol. ED-11, pp. 34–39, Jan. 1959.
11. S. Chen, B. Mulgrew, and P. M. Grant, “A clustering technique for digital communications channel equalization using radial basis function networks,” *IEEE Trans. Neural Networks*, vol. 4, pp. 570–578, July 1993.
12. R. W. Lucky, “Automatic equalization for digital communication,” *Bell Syst. Tech. J.*, vol. 44, no. 4, pp. 547–588, Apr. 1965.
13. S. P. Bingulac, “On the compatibility of adaptive controllers (Published Conference Proceedings style),” in *Proc. 4th Annu. Allerton Conf. Circuits and Systems Theory*, New York, 1994, pp. 8–16.
14. G. R. Faulhaber, “Design of service systems with priority reservation,” in *Conf. Rec. 1995 IEEE Int. Conf. Communications*, pp. 3–8.
15. W. D. Doyle, “Magnetization reversal in films with biaxial anisotropy,” in 1987 *Proc. INTERMAG Conf.*, pp. 2.2-1–2.2-6.
16. G. W. Juette and L. E. Zeffanella, “Radio noise currents n short sections on bundle conductors (Presented Conference Paper style),” presented at the IEEE Summer power Meeting, Dallas, TX, June 22–27, 1990, Paper 90 SM 690-0 PWRS.
17. J. G. Kreifeldt, “An analysis of surface-detected EMG as an amplitude-modulated noise,” presented at the 1989 Int. Conf. Medicine and Biological Engineering, Chicago, IL.
18. J. Williams, “Narrow-band analyzer (Thesis or Dissertation style),” Ph.D. dissertation, Dept. Elect. Eng., Harvard Univ., Cambridge, MA, 1993.
19. N. Kawasaki, “Parametric study of thermal and chemical nonequilibrium nozzle flow,” M.Sc. thesis, Dept. Electron. Eng., Osaka Univ., Osaka, Japan, 1993.
20. J. P. Wilkinson, “Nonlinear resonant circuit devices (Patent style),” U.S. Patent 3 624 12, July 16, 1990.
21. IEEE Criteria for Class IE Electric Systems (Standards style), IEEE Standard 308, 1969.
22. Letter Symbols for Quantities, ANSI Standard Y10.5-1968.
23. R. E. Haskell and C. T. Case, “Transient signal propagation in lossless isotropic plasmas (Report style),” USAF Cambridge Res. Lab., Cambridge, MA Rep. ARCRL-66-234 (II), 1994, vol. 2.
24. E. E. Reber, R. L. Michell, and C. J. Carter, “Oxygen absorption in the Earth’s atmosphere,” Aerospace Corp., Los Angeles, CA, Tech. Rep. TR-0200 (420-46)-3, Nov. 1988.
25. (Handbook style) *Transmission Systems for Communications*, 3rd ed., Western Electric Co., Winston-Salem, NC, 1985, pp. 44–60.
26. *Motorola Semiconductor Data Manual*, Motorola Semiconductor Products Inc., Phoenix, AZ, 1989.
27. (Basic Book/Monograph Online Sources) J. K. Author. (year, month, day). Title (edition) [Type of medium]. Volume (issue). Available: http://www.(URL)
28. J. Jones. (1991, May 10). Networks (2nd ed.) [Online]. Available: http://www.atm.com
29. (Journal Online Sources style) K. Author. (year, month). Title. Journal [Type of medium]. Volume (issue), paging if given. Available: http://www.(URL)
30. R. J. Vidmar. (1992, August). On the use of atmospheric plasmas as electro­magnetic reflectors*. IEEE Trans. Plasma Sci.* [Online]. 21(3). pp. 876—880. Available: http://www.halcyon.com/pub/journals/21ps03-vidmar

Appendix A

In the appendices, material is placed which is not needed for the immediate comprehension of the work. For example, extensive calculations, computer programs and data listing, and peripheral information may be placed in the appendix section.

Appendices are treated as documents of their own, which implies that figures and tables are numbered in a new series in each appendix, starting with 1, i.e. Fig. 1, Table 1 och (1).

Appendix B

If needed.

Appendix C

If needed.

Appendix D

If needed.