
GUIDELINES: HOW TO WRITE A BACHELOR'S THESIS AT THE INSTITUTE OF PUBLIC FINANCE

1 Procedure

You have **two months** to write your Bachelor's thesis. You can write your thesis either in German or in English.

At your starting date, we will send you a **topic sheet** via email that contains information on

- the title of your Bachelor's thesis
- at least one paper as a starting point,
- further comments that clarify how you should approach the thesis, and
- your supervisor's name.

The starting literature consists of theoretical or empirical articles that you should discuss in detail. It is your task to complement these initial references with further literature that you choose independently.

After having worked on your thesis for about 14 days, you should set up a **meeting** with your supervisor. In this meeting you should present the additional literature you have chosen, and a first outline of your Bachelor's thesis. You will then get feedback on the literature you have chosen and whether the overall concept for your thesis is sensible and feasible. After this meeting you are expected to continue working on your thesis mainly on your own, although you can discuss important questions with your supervisor via email or in further meetings to be scheduled upon request.

You must submit your Bachelor's thesis (including the signed "Declaration of Authorship") **as a PDF file** on or before the last day of your work period **by email** to

1. your supervisor, and
2. the Office of the Dean of Studies (studiendekanat@wiwi.uni-hannover.de).

For information regarding the submission of printed hard copies in accordance with the faculty's requirements, please visit [the website of the Dean of Studies for Bachelor's thesis at the Faculty of Economics and Management](#).

At the beginning of each summer and winter semester, we offer an **introductory workshop on the fundamentals of academic writing** to all students working on their Bachelor's thesis at the Institute for Public Finance. We strongly recommend your participation in this event. Any **questions regarding formalities** such as formatting, citation styles, etc. **will be exclusively addressed during this workshop**.

2 General Guidelines

The main objective of a Bachelor's thesis is to demonstrate your ability to **independently work on an academic project**. In your Bachelor's thesis, the context of your topic is of great importance. You are expected to cover your topic, or a specified aspect of your topic, in a coherent and conclusive way. To achieve this, it is important that your thesis has a consistent line of argumentation. You should contextualize your arguments by independently interpreting results beyond the original paper, critically questioning model assumptions, and discussing connections to economically relevant issues. Your work must exhibit a clear argumentative structure, with a 'red thread' running through all its parts.

At the start of the work on your thesis you should think about the **topic** in general. Why is it interesting? Why is it important? What has been written on the topic, which questions remain unanswered? The answers to these questions should be the basis of your thesis and you should discuss them already in the introduction. Keep the central theme always in mind throughout the thesis. Every paragraph and every sentence **needs to be relevant** for the discussion of your topic.

Your Bachelor's thesis should be written in a comprehensible and consistent way. Besides the content of your Bachelor's thesis, we will grade your use of **appropriate language and correct spelling and punctuation**. Keep in mind that you are writing an academic paper, i.e., choose a level of language that is appropriate for a scientific text. Avoid colloquial expressions. However, academic writing does not mean complex sentences – in contrast, the writing is often clearer if the sentence structure is kept simple.

In general, it is helpful to ask someone else to read your text before handing it in. This is helpful even if (or especially if) the other person is not familiar with the subject. Finally, read the finished thesis several times over several days to improve the language and the writing.

Your Bachelor's thesis needs to meet academic standards (regarding citations, independency, etc.) In case you do not feel sure about the handling of your sources or the appearance of your work, you can take the starting literature as guidance. At the end of this document, you find recommendations for additional literature on the fundamentals of academic work.

3 Formal Structure length and layout of the Bachelor's thesis

Your Bachelor's thesis should have the following structure:

- Front page
- Table of Contents
- Possibly: List of Figures, List of Tables, and List of Abbreviations
- Main text
- List of References/Bibliography
- Appendix
- Declaration of Authorship (see section 3.8)

The **main part** of your thesis must have between **40,000 and 45,000 characters** (with spaces; including footnotes; without appendix). Depending on

the layout, number of formulas, tables, etc., the length of the thesis is **approximately 25 pages**. Layout suggestion:

Font and Size: Times New Roman: Size 12. Arial: Size 11 or similar. Use the same font for the whole text. Footnotes should be placed at the end of the respective page (Times 10pt, Arial 9pt).

Spacing: 1.5-2.0 for the main text; 1.0 for footnotes, full justification.

Margins: 3.0-3.5cm left and right, 2.0-2.5cm top and bottom.

3.1 Front Page

The front page should comply with the requirements specified by the Dean of Studies. Please note the information provided by the Dean of Studies Office and the [checklist for submission](#).

3.2 Table of Contents

At the beginning of the Bachelor's thesis there should be a table of contents with corresponding page numbers. The sub-division of sections should be in relation to the length of your Bachelor's thesis, i.e., two levels are usually enough. If you divide a section, it needs to have at least two sub-sections (e.g., after 1.1 there is always 1.2). The headings of sections and sub-sections in the table of contents must be identical to the headings in the text. The table of contents should include the page number (right aligned) on which each section begins.

3.3 List of Abbreviations

Abbreviations should be used sparingly and consistently. All abbreviations should be introduced in the first instance with the word written out in full: "Multinational enterprises (MNEs) are ...". If an abbreviation is common (i.e., if it is in a dictionary) you do not have to introduce it. You need not specify parameters and variables of economic or econometric models in the list of abbreviations.

3.4 List of Figures and List of Tables

You need to create a particular list if you use multiple tables or figures in the text. All tables and figures have to be listed with the same title as in the main text. All tables and figures have to be consecutively numbered and state their source explicitly. The corresponding page numbers have to be right-aligned. In general, you have to use a new page per list. Please also note the information in section 4.3.

3.5 Main text

This section consists of the introduction, the main part and the conclusion (note that these are not suitable headings.).

Put special emphasis on the **introduction**. The introduction should motivate the topic. You should also address the theoretical or practical importance of the research. Tell the reader why it is interesting and why it is relevant in the contemporary academic or political debate.

In general, the introduction should:

- motivate the topic (why is the topic important, interesting, attention-grabbing, why it is relevant in the contemporary academic or political debate).
- narrow down your topic (what exactly does your thesis deal with).
- provide a short overview of the relevant literature that goes beyond the few intensively discussed papers in the main part.
- summarize the most important findings of your thesis. explain the structure and central theme of your thesis.

The **main part** should provide a well-rounded discussion of your topic. In the course of this, you should present and discuss the main findings of your starting literature. It is important that the different parts of your thesis work well together. In choosing further literature (in addition to the references given to you) you are mostly free to focus on those articles that you find most important or relevant for the topic of your thesis. However, you should ensure that your additional references are from "high-quality" sources. The best way to guarantee this is to choose papers that have already been published in peer-reviewed international journals. If you want to use a working paper as a key source, make sure that it is included in a large Working Paper Series (such as NBER, CEPR, CESifo) and/or that it is from well-known authors that have already published successfully in good international journals. Check if the working paper has been published (if it is published, you should use the published version!). It is also possible to complement your starting literature with your own independent empirical or theoretical analysis. In any case, you should discuss your choice of additional literature or independent analyses with your supervisor.

During the discussion of the independently selected papers, you should work out the key connections between the different papers.

- What are the key assumptions and the main results of the papers?
- In which aspects do the papers agree, in which do they disagree?
- What are superficial, insignificant differences that can be left out of the discussion?

Your further literature does not necessarily have to be a scientific study, it can also be from other sources (such as international organizations or political entities). In this case, it is especially important that you point out the relations to your starting literature.

Use your own words when explaining the argumentation of another author. The closer your explanation is to the argumentation of the original literature, the harder it is to document your own work. By **reasonably cutting down** your starting literature, you can show your understanding of the topic. Carefully weigh which of your findings are of no importance and thus not noteworthy, which findings are of low relevance and thus should only be introduced briefly and which findings play a central role.

Importantly, you should provide a detailed intuitive explanation for the results of the papers that you are using in your thesis. It is also important to **critically examine** your findings. Therefore, in addition to the literature discussed in detail, you need to present other findings from the literature. In addition, make sure to point out the **implications for economic policy**.

In the **conclusion**, you summarize your findings and provide the reader with a short outlook. You can derive policy implications from your thesis or point out the need for further research on some specific questions. The conclusion should not exceed two pages.

In your Bachelor's thesis, you are expected to make a substantial own contribution. A simple summary of the starting literature is not sufficient. This contribution can be in the form of selecting, comparing, and critically discussing the literature, and/or conducting an independent analysis. For all parts of your Bachelor's thesis, it holds that you have to base statements and assessments on arguments and not on simply referring to sources that advance this specific view.

3.6 Appendix

Make sure to integrate calculations, tables, graphics, etc., **necessary for the understanding of your Bachelor's thesis in your main text**. Only use an appendix for information that is not essential for the understanding of the text, but may be of interest for the reader (scrutinize whether the appendix is really necessary). The appendices should be listed in the table of contents. You have to tell the reader when to refer to which appendix. To do this, include a reference to the appendix ("see Appendix 1") at the relevant place in the text.

3.7 List of References/Bibliography

The list of references has to contain all references included in your paper. References not included in the text should not be included in the list of references. Please use appropriate software (e.g. Zotero) to create the bibliography and for in-text citations. Order publications alphabetically by authors. If you used more than one publication by a single author, you have to list the publications chronologically according to the dates of publication. Should an author have more publications within the same year, distinguished them by small letters (e.g., Slemrod, 2006a, and Slemrod, 2006b). The key to a good list of references is consistency in design and complete presentation of all relevant information (all authors, complete title, year of publication, if applicable edition, volume number of the journal...).

Here are some examples:

- **An Article in a Scholarly Journal:**
Buettner, T., M. Overesch, U. Schreiber und G. Wamser (2012): The Impact of Thin-Capitalization Rules on the Capital Structure of Multinational Firms. *Journal of Public Economics*, 96, 930-938.
- **Working Paper:**
Ruf, M., und A. Weichenrieder (2013): CFC Legislation, Passive Assets and the Impact of the ECJ's Cadbury-Schweppes Decision. CESifo Working Paper No. 4461.
- **Chapters in Edited Volumes:**
Persson, T. und G. Tabellini (1995): Double-Edged Incentives: Institutions and Policy Coordination. In: Grossman, G. und K. Rogoff (Hrsg.), *Handbook of International Economics*, Vol. III., Elsevier, Amsterdam.
- **Books:**
Slemrod, J. und C. Gillitzer (2014): *Tax Systems*. MIT Press, Cambridge (MA, USA).

- **Web pages:**
Daniel Davies (2016): Gaps and holes: How the Swiss cheese was made. Published on April 8, 2016, <http://crookedtimber.org/2016/04/08/gaps-and-holes-how-the-swiss-cheese-was-made/>, retrieved June 22, 2016.

3.8 Declaration of Plagiarism

Every thesis has to contain a declaration of authorship signed by the student. You can find the suggested phrasing on the [website of the Dean of Studies Office](#).

4 Formal Layout

4.1 References

The careful documentation of sources is crucial for an academic paper. Whenever you draw on the work of another person or institution with new thoughts, you must document your source (try to cite the author who expressed the idea first). You do not have to cite standard knowledge from textbooks or scripts. The relation between the reference and your own reasoning should be apparent from the context. Often this requires an additional explanation, for example, "A critical review of some of the most common empirical methods used to measure the magnitude of tax evasion can be found in Slemrod and Weber (2012)."

Use short citations, i.e., the **Harvard citation** style since this is standard practice in economics. In the text, refer simply to the last name of the author(s) followed by the year and, if necessary, the precise page number – then there is no need for a footnote. In the Harvard citation method, the focus is either on the author (author and year are mentioned at the beginning of a sentence/paragraph) or on the information (author and year are given at the end of the sentence/paragraph). For example:

Focus on author:

- An alternative approach is discussed by Boadway et al. (1998). The authors show that ...
- ... (see Wolff 2010).
- The pioneering study by Feldstein (1976) found a ...
- Whinston (1983, p. 16) shows that ...

Focus on information:

- After strong increases in the 1980s and 1990s, wealth growth in the US slowed significantly between 2001 and 2007 (Wolff, 2010).
- The main function of the capital market is the allocation of the capital stock of the economy (Fama, 1970)

Indirect quotations which refer to a specific passage in the text must include the page number (e.g.: In contrast, Slemrod (2009, p. 17) defines [...] as [...]). If the key finding of a source is summarized, it is not necessary to provide the page number in the citation. Ensure that you use **"and"**, **"/"** or **"&"** consistently to separate the names of two authors in short quotations, e.g., Ruf **and** Weichenrieder (2013) or Slemrod/**Gillitzer** (2014) or Persson **&** Tabellini (1995).

In the case of short citations for sources with three or more co-authors, usually only the surname of the first author is mentioned followed by an "et al." (short for "et alia", meaning "and others"), e.g., Buettner et al. (2012) instead of Buettner, Overesch, Schreiber and Wamser (2012). However, please note that the names of all authors are listed in complete form in the bibliography.

Verbatim quotations are usually unnecessary and should never be used to avoid formulating your own expression. Therefore, use verbatim quotations very sparingly and only where the author makes an especially memorable statement. Verbatim quotes are to be marked with quotation marks. If you remove or modify words in a quote, this change must be labeled as such. Minor omissions are identified by two points (one word) or three points (two or more words).

4.2 Footnotes

If you want to make comments or add explanations in addition to the reference, use a **footnote**. For example, you can put a fundamentally different opinion, which is not further investigated, or an example to a general statement in a footnote. However, your reader should understand the text without reading the footnotes. If a footnote refers to a word, place it behind this word; if it refers to a sentence, place it at the end of the sentence after the full stop. If an entire paragraph is based on a reference, you can clarify this with a footnote at the end of the paragraph (e.g., "See Desai et al. (2004)"). Each footnote is a complete sentence.

4.3 Figures, Tables, Equations

All **figures and tables** must be numbered consecutively (e.g., Table 1, Table 2, Figure 1, ...). In addition, tables and figures must have a title and should be included in the body of the paper. You have to refer to each figure or table in the text. Explain their content in the text. Think about appropriate units, e.g. use percentages (it is often easier to understand a number as 2.3 percent rather than 0.023).. Details and explanations that are necessary or helpful for understanding the elements in the graph or table can be listed in a note below the graph or table.

For each table and figure, you need to state its **source** (below the table/figure). If you have created a graph or table by yourself, then clarify it by "Source: own calculations" (possibly supplemented by "on the basis of ..."). State the data sources that you have used to compile graphics and tables. (e.g. source: DESTATIS 2021).

You should not use screenshots of **tables** (e.g. with regression results) from the original paper, but type them yourself (use Excel, for example) and reformat them according to your requirements. This allows you to only present the information that is relevant for your thesis. Figures which contain specific data can be copied from the article (but quote the source!).

You should also write down **equations** by yourself using a formula editor (integrated in all regular word processing programs). All equations should be indented and numbered. Since your thesis should be understandable without reading the original article, you must clearly define all the symbols and variables that occur in the equations. Make sure that the reader can understand everything without looking at the original papers that you discuss in your thesis.

4.4 Additional information

- Use either "%" or "percent" consistently throughout your text.
- For Bachelor's thesis in English: Use British or American English consistently.

5 Literature Research

Your Bachelor's thesis needs to be based on the **academic literature**. To find relevant articles, you can use, for example, [Google Scholar](#) or **EconLit**.

Also, the list of references of your starting literature may help you to find further relevant articles.

Make sure that you use the most recent version of a paper. If you find an interesting working paper, check whether it is already published (example.g., on <https://ideas.repec.org>). Published articles can be found in the "Electronic Journals Library" on <https://opac.tib.eu/DB=1/LNG=DU> . Try to assess the quality of any work before using and citing it, for example by looking at journal rankings (e.g. Handelsblatt, VWL ranking <https://www.forschungsmonitoring.org>, or VHB-JOURQUAL <https://vhbonline.org/vhb4you/vhb-jourqual/vhb-jourqual-3/tabellen-zum-download>) or the *impact factor*.

If you are not sure about **academic writing** conventions, you can consult any handbook on this topic. There are also some helpful online resources, e.g. the standard textbook on academic writing by Strunk and White (<https://faculty.washington.edu/heagerty/Courses/b572/public/StrunkWhite.pdf>) or Theisen, M. R. (2011): *Wissenschaftliches Arbeiten*, 15., aktualisierte Auflage, Verlag Vahlen, München.

Good luck!