## Hungarian University of Agriculture and Life Sciences



**guidelines for the style and content requirements for PhD theses and dissertations**

**1. The subject and aim of the dissertation**

The subject of the dissertation is a scientific task connected to the selected PhD programme that has sufficient financial and personal capacities. Strictly confidential matters cannot be regarded as potential topics for the dissertation.

The aim of dissertation is to:

- 1) prove that the PhD student possesses the overall knowledge of the field of their studies required to earn a PhD title and is familiar with and able to use the information techniques and instruments and has a comprehensive view as well as a set of tools for solving problems

- 2) prove the student’s ability to solve a particular scientific programme.

- 3) produce a dissertation in a form which meets the requirements for content and style.

**2. Content requirements of the dissertation**

The general content requirements of a dissertation are as follows:

- It deals with a topical scientific problem according to the present level of scientific/ technical development and practical methods.

- It includes a description of the topic, an analytical and critical literature review and the objectives.

- It includes the required analyses (materials and methods, required models, experiment(s), examinations, tests, studies, computer programmes, calculation(s) and a detailed description of measurements including the conditions of reproducibility, data collection and processing, etc.) and illustrative tools (graphs, drawings, tables).

- It draws a conclusion on the basis of the work done outlining its and novel scientific achievements.

- It includes consequences and suggestions for practical usage and/or further research directions concerning the topic.

- It includes a bibliography and, if necessary, documents as a proof of results.

- It includes an English summary .

- It should be the own work of the PhD student of the proper high standard expected.

The structure of the dissertation should be as follows:

- Contents (using decimal numbering to denote chapters, sub-chapters, sections and the numbered appendices, if any)

- List of legend and abbreviations if necessary due to their volume

-Introduction (the importance of the topic, problems to solve)

- Objectives to achieve

 - Literature overview

 - Materials and methods

 - Results and their discussion

 -Conclusions and recommendations

 -New scientific results

 - Summary (a short summary in English of the introduction, literature review, results, conclusions and recommendations)-

- Appendices:

 - A1: Bibliography (list of literature consulted)

 - from A2-further appendices (all other materials needed for the discussion of the topic but due to their volume, their in-text position would impede understandability such as flow charts, computer programs, any calculations needed to achieve the results, collection of documents, photos and drawings folded if larger than A4 size)

**3. Style requirements**

The dissertation has to be prepared with double-sided pages using a word processor with the following criteria:

 - Size: A4

 - bound in false leather (dark green)

 - Margins: 2 cm except on the left: 2.5 cm

 - Font type and size: Times New Roman 12 aligned (it can differ in the case of tables, pictures, figures)

 -Length: maximum 120 pages in natural sciences and 150 pages in social sciences without appendices

Chapter titles must be written in capital letters and set to the middle. Sub-chapters and sections have to be written in small letters and set to the left not containing more than four decimals.

Spelling must adhere to the current guidelines .

The terms and measures applied (name, symbol) or other signals have to comply with today's professional, international requirements and/or have to be explained when first used or in the list of abbreviations so as to avoid any misinterpretation.

The use of units of measure must be in line with the effective regulation (at present Act XLV of 1991 on measurements)

Illustrations and tables have to be understandable by themselves, and in-text they must be placed in the most appropriate places (except for tables included in the appendix). The number and title have to be below the figures adjusted to the middle. The titles of tables always appear above and set to the left explained by in-text references at all times.

The source of literature consulted must always be referenced in the proper place. The suggested style of reference is the first data and date (so-called Harvard) system: in the text, the first data and date of publication of the referenced work can appear both in brackets ( ) or parenthesis [ ]. If the first data –usually the name of the author(s) becomes part of a sentence, only the date is in the bracket. If there are more references to the same data, these items of the same year are marked by a, b, c small letters. In the case of more than two authors, after the first one write "et al." (Latin for *and others*).

Bibliography has to meet the requirements of the second appendix with the necessary bibliographical data in alphabetical order. If there are more works of the same author, then the date of publication is decisive while arranging them in order starting from the oldest one. In such cases the individual works of the author comes first followed by their other works with co-authors. Several works by the same author must be listed in chronological order.

The order of binding is as follows: external cover, internal title page with the back cover, contents, text, bibliography, further appendices and acknowledgements-if any.

External cover: In the middle: Doctoral (PhD) dissertation, at the bottom after one another: Name, Place of Campus (Gödöllő, Budapest, Kaposvár, Keszthely), and Year. The internal cover differs. Above at the top: MATE logo, followed by Hungarian University of Agriculture and Life Sciences. In the middle: the title. At the bottom after one another: Name, Place of Campus (Gödöllő/ Budapest/ Kaposvár/Keszthely), and Year. The reverse side of the internal cover can be found in Appendix 1.

**4 The Theses**

The text on the external cover, made from white cardboard, is the same as that of the dissertation, except that the title should be "The Thesis of the PhD dissertation".

The text on the internal cover and on the back of the inside cover should be the same as in the dissertation. The internal cover: above at the top: MATE logo, followed by Hungarian University of Agriculture and Life Sciences. In the middle: the title. At the bottom after one another: Name, Place of Campus (Gödöllő/ Budapest/ Kaposvár/Keszthely), and Year. The back cover of the internal cover can be found in Appendix 1.

Size: B5,

Binding: paper (white),

Margin: 2 cm, on the left: 2.5 cm,

Font type and size: Times New Roman 12, aligned (different in the case of figures and tables)

The work should be divided as follows:

 - Background of the work and its aims.

 - Materials and methods.

 - Results and discussion

 - Conclusion and recommendations

 New scientific results

 - The publications of the author in the research field (books, articles, lectures, posters, etc.)

Theses must also be submitted in English or in another foreign language accepted by the school.

**5. Submission**

The following documents have to be submitted:

-The dissertation in **3 copies** (printed, intertwined and bound with the original signatures). For information **on a different number of copies** please see Appendix 1 ‘Notes’.

-‘Theses’ in English in **15** copies (printed, intertwined and bound with the photocopied signatures, 10 copies in the case of online defence.

-The dissertation and its theses in English must be sent to the Doctoral and Habilitation Centre **electronically in pfd files**.

**5. The official review of the dissertation**

The dissertation will be evaluated by one internal and one external reviewer with respect to its format and content. Based on these reviews, the dissertation will or will not be allowed for defence. If any of the two reviews is negative, a third review has to be made.

Appendix 3 contains the recommended key aspects of review.

The candidate must respond to the opinion of the reviewers in writing before the public defence, which has to be submitted to the Doctoral and Habilitation Centre. Public defence can only be organised after receiving the official replies to the reviewers’ questions.

**Appendix 1. Sample for the internal title page**

**The PhD School**

Name:...............................................

Discipline: ................................................

Head: Name

 Lecturer's/researcher's position, scientific degree/title

 MATE, Institute/Department of ….

Supervisor(s): Name

 Lecturer's/researcher's position, scientific degree/title

 Name of organisation (university, research institute etc.)

 Name of the organisational unit if necessary

|  |  |
| --- | --- |
| .............................................Approval of the Head of Doctoral School  | .............................................Approval of the Supervisor(s) |

***(NB: The doctoral dissertation has to be submitted in four copies bound with the original signatures and the ten theses with the photocopied signatures to the Office of the PhD School concerned.)***

**Appendix 2. The references and the structure of the bibliography**

**A/**The bibliographical data in the case of books and magazines as well as their parts should be given as follows:

1. **Books (university course books), if the numbers of the authors do not exceed three:**

ECO, U. (1991): Hogyan írjunk szakdolgozatot? Budapest: Gondolat. 255 p.

1. **Books (university course books), if the numbers of the authors are more than three, but there is no editor:** As in the first case, but ‘et al’ (et alii) should be written after the name of the first author:

KOVÁCS J. et al.: A gépszerkesztés.........

1. **Books (university course books), if the number of authors is more than three and there is an editor:**

TIBOLD V. (Szerk.) (1977): Gépek üzemeltetése a mezőgazdaságban. s.l.: Mezőgazdasági Kiadó, 500 p.

1. **Corporate author:**

Magyar Tudományos Akadémia (1994): A magyar helyesírás szabályai. Tizenegyedik kiadás. Tizenegyedik (példaanyagában átdolgozott) lenyomat. Budapest: Akadémiai Kiadó,428 p.

1. **The book is part of a series:**

TORDAI Z. (1988): A józan ész dicsérete. [Budapest: Magvető Könyvkiadó.] (Gyorsuló idő) 125 p. [The title of the series, if any, and the issue should be placed at the end in brackets ( ).]

1. **Publication in an edited book:**

KINDLER J. (1987): A kockázat döntéselméleti megközelítése. 13-24. p. In: VÁRI A. (Szerk.): *Kockázat és társadalom*. Budapest: Akadémiai Kiadó, 243 p. (The title of the original document is *italicised*.)

The pages of part of a book or an article should be properly referenced as follows: p. 230–280.

References to a conference publication: Name of the conference, number (if any), year of organisation, venue and the data necessary for identification.

The same applies to referencing a lecture at a conference as in the case of parts of books. The title and sub-title of the publication, other data and pages where it can be read.

E.g..: TAKÁCS (1991) A hybrid character recognition algorithm. In: CONFERENCE ON INTELLIGENT SYSTEMS (6.)(1991)(Veszprém). Fundamentals and European Cooperation in research an education of intelligent systems: Proceedings. Veszprém, NJSZT és OCG. p. 71-81.

1. **Articles in a magazine/journal:**

KLOSTERKÖTTER, W. (1972): Der Umweltfaktor Lärm als Komponente kumulativer Umwelteinwirkungen. In: *Arbeitsmedizin – Sozialmedizin - Arbeitshygiene*, 7 (10) 281-286. p.

[The title of the original document is *italicised,*  the year, and if any, and the issue in brackets ( ).]

1. **Standards:**

MSZ ISO 690:1990 Bibliographic references with the year of publication

1. **Laws and other legal sources:**

Follow the Appendix of 12/1997. (29 December) Ministry of Law Decree and make a reference with titles.

1. **Electronic publications:**

Such a publication can only be applicable if it can be found by search engines. Refer to the author(s), title, page number and URL. The date (year, month, day) of the search must also be displayed.

Castles, I. (2000): The Human Development Report. UN. E. (CIV. 3.) 2001/18 Appendix 1. <http://www.un.org/Depts/und/statcom/sc2001docs/2001-18e.pdf/>. Search engine: Google. Key words: human development. Date of search: 2014.05.10.

1. **CD:** Vargáné, S. Sz., Kozák, J., Varga, S., Karsainé, K. M. (2000): Effect parent body weight on reproduction and progeny growth and liver production geese. [1-3. p.] In: Abstracts and Proceedings. XXI. World's Poultry Congress. Montreal, Canada August 20-24, 2000 [CD:\Abstracts\aug24\KOZAK\_1]

**B/** The title and/or scientific degree of the authors (e.g. dr.) and position (e.g. head of department) need not be referred to in the bibliography.

**C/** The volume (number of pages) in the book should be displayed as it makes identification easier (E.g. the same book with the same text was published in the same year but the second, revised edition has a different paging).

**D/** In the case of several authors and one publication the following can happen:

1. Fellow authors: the publication is a unity that cannot be divided, i.e. the common work of the authors. The contribution and the patent are equal if there is no other agreement between the parties so any of them can perform in defence of their work. (Most articles follow this pattern).
2. Co-authors: the publication is common work that can be divided into individual separate parts. Contributions are based on the share(s) of the authors with patent. (In such cases, usually on the reverse side of the internal cover page the name of the authors with the number of their chapters are displayed).

**E/** In case any of the following data is absent, the following style should be used:

If the place of publication is unknown: [s.l]. "sine loco"

If the publisher is unknown: [s.n.]"sine nomine”

If the year of publication is unknown: [n.a.] "not applicable” or [s.a.]"sine anno"

**F/** The short version of "N.N" meaning "Anonymous" cannot be used for an unknown author. In this case, the first letter of the data beginning with the title should be taken into consideration for alphabetical order.

**G/** The data (corporate author, title of the journal, place of publication, publisher etc.) can only be abbreviated if it still makes identification possible. For journal titles, internationally accepted abbreviations (e.g. Web of Science, Scopus, PubMed) may be used. For publishers omit Plc, Ltd. and &Sons ( e.g. Wiley-not John Wiley &Sons).

**H/** If the data does not occur in the title, but somewhere in the book, then this data should be presented in parenthesis: [ ].

**I/** If the document tis non-applicable or difficult to reach (limited to certain places) or some data necessary for identification are missing, the place must be identified, e.g. ‘Available at the research Institute of Soil Sciences and Agrichemistry of the Hungarian Academy of Sciences:’

**J/** The bibliography of sources with no authors or editors has to be created in alphabetical order based on the sources without articles.

**K/** Examples for references in the text:

First data and date (the so-called Harvard-system):

"Based on my research my results cannot justify the earlier results published (ABCD 1968), either, likewise other authors (FGHI 1993, KLMN et al. 1994)."

When the name of the author (as data) is part of the text:

"Based on my research my results cannot justify the earlier data published by ABCD (1968) likewise FGHI (1993) and KLMN et al. (1994)."

The appointed DOI administrator, the employee of Kosáry Domokos Library and Archives, places the DOI identification registered with the DataCite Agency on each page of the electronic version of the defended dissertation in the headings aligned to the right.

**Appendix 3. Suggested structure and main aspects of the official review**

**I. General part**

Evaluation on format:

A1. The binding and binding order, length.

A2. Is there decimal numeration of the table of contents?

A3. Is there an alphabetised bibliography and does the candidate refer to individual sources?

F4. The execution of the text, illustration, tables and other appendices.

The reviewer decides according to his or her statements on the continuation of the evaluation, or he/ she proposes the rejection of the dissertation because of serious insufficiencies and mistakes in format.

Evaluation on structure:

S1. Does the structure meet the requirements as laid down in the Guidelines?

S2. Is the text properly structured (separate sections, chapters, sub-chapters)?

Evaluation on content:

T1. Has the candidate evaluated the importance of the topic correctly?

T2. Have the objectives been set earlier in the "Introduction" correct and has the candidate achieved them?

T3. Have the tasks specified in the "Introduction" been correct and has the candidate fully fulfilled them?

T4. Knowledge of literature related to the topic and specified tasks as well as their proper use.

T5. Has the candidate concluded the necessary analysis, research (measuring, data processing, etc.), calculations and prepared the necessary models, illustrations and tables?

T6. Has the candidate concluded the necessary evaluation(s) and are there any new scientific results, conclusions or recommendations?

T7. Are there any professionally objectionable solutions, evaluations, results, conclusions or proposals, and if any, how do they influence the whole work?

T8. The possibilities of utilization (practical application) and further development of the topic.

T9. Can the candidate's dissertation be considered as a PhD-level work?

1. **Details**

H1. Enumeration of noted shortcomings with their titles and/or contents.

H2. Enumeration of noted mistakes with their titles and/or contents, page number and paragraph (line(s)).

**III. Statement**

List of the new scientific results accepted by the reviewer or recommendations to modify or unify them.

The reviewer's statement about whether he or she finds the dissertation of the candidate suitable for defence in public. In the case of a negative evaluation, a detailed scientific explanation has to be given.

**IV. Questions**

In the case of acceptance of the dissertation: 2-5 questions which have to be answered by the candidate at the public defence. The questions must be related to the topic and the key objections to the contents.

**V. The layout of review**

The official review has to be sent in a printed, original and signed copy and also electronically (scanned, in pdf via e-mail) to the Doctoral and Habilitation Centre.