

Procedure for Doctoral Dissertation Submission and Defence at the Institute of Computer Science of UT

Documents of the university

1. Procedure for Awarding Doctorates, passed by the Senate as of 20 December 2013, effective as of January 1, 2014

(http://www.ut.ee/sites/default/files/www_ut/oppimine/procedure_for_awarding_doctorates.pdf)

2. Procedure for Publication of Graduation Theses and Dissertations, approved by the Rector on November 5, 2012

(http://www.ut.ee/sites/default/files/www_ut/kehtib_alates_01.01.2015_loputoode_ja_doktorivaitekirjade_avaldamise_kord.pdf)

Procedure before the defence

1. The appropriate procedure before submitting the thesis:
 - 1) Should the PhD student request adding or removing supervisors, a motion needs to be made to the Institute Council. The change must be recorded in the SIS (this is done by the specialist of academic affairs of the institute).
 - 2) The PhD student must have fully completed their curriculum. Completion of the curriculum can be checked at the specialist of academic affairs. The original curriculum can be changed if necessary by submitting a request to the Institute Council.
 - 3) The PhD student is responsible for entering all their publications into ETIS with the status *confirmed*.
 - 4) Should the thesis be defended as a series of publications, the PhD student will need to agree on republication conditions with the original publisher for each article.
2. For the official thesis submission the PhD student must produce the following documents to the secretary of the Defence Council (Research Fellow Kalmer Apinis):
 - 1) An application addressed to the Institute Council requesting to be allowed to defend the dissertation (both electronically and signed as well). The application must also specify the complete official title, *Doctor of Philosophy (computer science)*, of the degree the student is applying for.
 - 2) The dissertation prepared according to the template and guidelines used in the Institute and available at <https://www.cs.ut.ee/en/studying/phd> (electronically; does not need to be in its fully completed final form).

- 3) The student's CV containing the complete list of research publications and any patents that are related to the dissertation (both electronically and signed as well). The CV should contain no gaps in the timeline and all studies – also including those not completed – should be listed. A recommended form for the CV can be found at <http://www.ut.ee/et/1043102>.
- 4) The opinion(s) of the supervisor(s) that contain, among other things, an evaluation of the originality of the dissertation, the contribution of the student, and compliance with the requirements of content and form (both electronically and signed as well).
- 5) A popular scientific summary of up to 2,000 characters in Estonian and English (electronically).

The application, dissertation and CV are recommended to be sent to the secretary of the Defence Council before the official submission for assessing the compliance with formal requirements (electronically).

The documents will pass through a university-level examination and will get an assessment from the Academic Secretary of UT. Procedures by the council can take place only after being assessed by the Academic Secretary (up to 8 workdays after the submission of the documents).

3. Before the dissertation is allowed to be defended, it must go through pre-reviewing by two external reviewers and one internal reviewer. Both external reviewers must be renowned researchers of the field in particular with a PhD degree or an equivalent qualification and without a conflict of interests. A (non-exhaustive) list of potential conflicts of interests is given at the end of this document. Both external reviewers must be outside of UT, at least one of them must be outside of Estonia. Usually, pre-reviewing is done by prospective opponents. The supervisor proposes pre-reviewer candidates, makes a preliminary agreement with them and announces their names to the secretary of the Defence Council for official approval. The rest of the communication with the pre-reviewers can also be done by the supervisor or left to the secretary of the Defence Council (if agreed so).

The dissertation may be sent to pre-reviewers before submitting the dissertation but the council cannot approve the pre-reviewers before the submission.

4. The internal pre-reviewer must be a member with a PhD or equivalent qualification of the academic staff of the Institute other than the supervisor(s). The duties of the internal pre-reviewer are:
 - 1) Check if the official requirements imposed on the content of the thesis are fulfilled (e.g., does the thesis provide an overview of the current situation of the field of research and the position of the problems solved in the thesis therein, a clear formulation of the research problems solved and results obtained, scientific grounds of the results etc.)
 - 2) Attend the PhD student's presentation at the institute seminar (see paragraph 5) and ask questions in order to help to prepare the student for the defence;
 - 3) Recommend the PhD student to make changes to the manuscript if necessary;
 - 4) Write a short (1–2 paragraphs) motivated recommendation to the Council.

The internal reviewer is allowed to be a recent co-author of the supervisor or of the PhD student.

5. Before the dissertation is allowed to be defended, the PhD student must make a presentation on the topic of the dissertation at the institute seminar (usually on Thursdays after the institute meeting at 3.15–4.00 p.m). An appropriate time must be agreed with the supervisor, the internal reviewer and the secretary of the Defence Council at least a week in advance.
6. Based on the recommendations made by the pre-reviewers, the PhD student makes changes to the manuscript if necessary. The amended manuscript must be approved by the pre-reviewers if so requested. The PhD student delivers the approved manuscript to the secretary of the Defence Council. After that, no changes are allowed in the content of the dissertation. (The cover, the title page and last pages containing the list of previously printed dissertations are created by the publisher.)
7. A PhD thesis has two opponents unless the institute council decides otherwise. The supervisor proposes opponent candidates and confirms potential defence dates with them. The opponents must be internationally renowned researchers of the respective area, having a PhD degree or an equivalent qualification and without a conflict of interests. A (non-exhaustive) list of potential conflicts of interests is given at the end of this document. At least one opponent must be from outside of Estonia. The supervisor must provide the names of the opponent candidates and potential defence dates agreed with them to the secretary of the Defence Council for official approval. If desired, the supervisor may propose additional temporary members to the council. If the supervisor has been in contact with pre-reviewers, their written opinions must also be delivered to the secretary.
8. If the Institute Council has decided to allow the dissertation to be defended and the time, date and location have been confirmed (in the case of an e-meeting, at least 3 workdays, and in the case of an ordinary meeting, at least 5 workdays after receiving the final version of the dissertation), the PhD student inserts the necessary data in the title page and makes a contract with UT Press and the University for printing the dissertation. At least 7 weeks before the defence date, the student must provide UT Press with the following documents:
 - 1) The final version of the dissertation that must follow the official format of UT dissertations (as a pdf-file);
 - 2) Excerpt from the Institute Council's approval of the defence;
 - 3) Letter of warranty by the Institute for financing the printing of the requested number of copies. The number of printed copies of each particular dissertation is decided by the head of the institute.
 - 4) Popular-scientific summaries in Estonian and English (electronically).

The official time for printing a dissertation is 3 weeks, but in the case of a sufficiently timely agreement, it can be printed within 1–2 weeks. One must take into account the UT requirement that a hard copy, as well as the final pdf-file, of the dissertation must be delivered to the UT library a month before the defence date the latest.

9. When printed copies arrive from the UT Press, the PhD student delivers 20 copies to the secretary of the Defence Council. The secretary will arrange the sending of the official copies

of the dissertation to the opponents. The rest of the copies will remain with the PhD student – it is traditional to hand them out to the audience at the defence.

The PhD student does not normally have to send the file to the UT library or bring a hard copy there. This is done by the UT Press.

10. The remaining official communication with the opponents will be handled by the secretary of the Defence Council who will introduce the procedure of the defence (cf. below) and the deadline of providing the opinion (3 days before the defence). The secretary of the Defence Council also initiates booking their travel tickets and accommodation, as well as payment. If meeting the opponents upon arrival is desired, it will be done by the supervisor.

Procedure of the defence

1. Opening statement by the Head of the Defence Council.
2. Presentation by the secretary of the Defence Council introducing the academic CV of the doctoral candidate and confirming the defence prerequisites and formal requirements of the defence procedure.

The defence can proceed only if the following persons are present at the session:

- 1) the doctoral candidate;
- 2) at least one opponent;
- 3) at least 6 members of the Council with a mandate, including the additional members.

Participation in the session is also allowed via a real-time two-way audio-visual communications channel (e.g. Skype or video conference).

3. Presentation by the doctoral candidate (*lectio praecursoria*) to introduce the main results of the dissertation (30 min) and potential quick questions about the presentation.
4. Statements by the opponents and academic debate between them and the doctoral candidate.
5. General academic debate with participation from the Council and the audience, including talks by the supervisor(s).
6. Final remarks by the doctoral candidate (1 min).
7. A closed discussion with participation by the Council members, the secretary, the opponents and the supervisors, where the Council decides whether or not to award the degree.
8. Announcement of the decision.

Potential conflicts of interest to be avoided

1. No pre-reviewer or opponent may have any close relations with the PhD student or the supervisor(s).
2. No external pre-reviewer or opponent may have had common financial interests or scientific collaboration with the PhD student (e.g., co-authored papers published or under preparation, supervisory function in the dissertation).
3. Recent co-authors of a supervisor (less than 5 years since the (online) publication date of the latest common work or co-work under preparation) should be avoided as external pre-reviewers or opponents as much as possible. Likewise should people who have had common financial interests or common supervisees with supervisors during the last 5 years, as well as the supervisors' former supervisors and supervisees, be avoided as external pre-reviewers or opponents. The council may reject pre-reviewer or opponent candidates because of suspicion about conflicts of interest.