

Guidelines for the Doctoral Thesis

Faculty

Doctoral Thesis

The doctoral thesis is the culmination of advanced studies and rigorous research in a field of study. It is the pinnacle of the student's doctoral program. Although the thesis is indisputably significant, it is also important to remember that the doctoral thesis is just one of many steps along the student's career path and should therefore be well-defined and manageable.

At the University of Toronto, the term 'thesis' is generally used to refer to the culminating project for either a Master's or a doctoral degree. At other institutions and in other countries, the term 'dissertation' is more commonly used at the doctoral level. This document uses the term 'thesis' to refer to a doctoral thesis, but supervisors or departments may prefer the term 'dissertation'.

Doctoral thesis writers have often written a Master's thesis (or a Major Research Paper) earlier in their careers. A doctoral thesis will have elements in common with those projects while also needing to offer a higher degree of originality and a broader scope.

The doctoral thesis has been historically written as a unified work, similar in form to a scholarly monograph; this traditional format remains the norm in some disciplines. In other disciplines, the traditional thesis has been replaced by a publication-based thesis in which a series of scholarly publications on the same research problem are combined into a coherent whole. Today, there is a growing acceptance of more flexible formats and structures that aim to enhance professional practice or that include creative scholarly artefacts such as film, audio, visual, and graphic representations. There is also growing recognition of the need to welcome Indigenous forms of knowledge building and dissemination. Regardless of format or structure, all doctoral theses must meet the fundamental requirements of demonstrating academic rigour and making a distinct contribution to the knowledge in the field.

The decision about the structure and format of the student's doctoral thesis should be made by the supervisor and the supervisory committee members and be informed by the practices in the specific discipline and the student's academic and professional goals. In some fields, the decision about structure and format is relatively easy to make while in others the decision requires careful consideration from all involved parties.

The following guidelines have been designed to help students, supervisors, and supervisory committee members by identifying the required academic criteria of the doctoral thesis and by describing the various available formats and structures. Supervising faculty members are encouraged to clearly communicate the required academic criteria and expected format of the doctoral thesis early in the student's doctoral program to facilitate the student's writing process.

Key Criteria of the Doctoral Thesis

Regardless of the format of the doctoral thesis, certain criteria must be met. For the thesis to be acceptable, the student must do the following:

- Demonstrate how the research makes an original contribution by advancing knowledge in the field
- Show a thorough familiarity with the field and an ability to critically analyze the relevant literature
- Display a mastery of research methods and their application
- Offer a complete and systematic account of their scholarly work
- Present the results and analysis of their original research
- Document sources and support claims
- Locate their work within the broader field or discipline
- Write in a style that respects the norms of academic and scholarly communication

Most doctoral writers understand that their thesis will need to meet these criteria without necessarily understanding *how* they will do so. A central element of writing a thesis is coming to understand how to write an extended text that meets these criteria. With guidance—from the supervisor, the supervisory committee, from peers, and from institutional writing support—these criteria will ultimately help the student to understand when they have met their thesis writing goals.

Formats of the Doctoral Thesis

Traditional Thesis

The traditional, or monograph-style, thesis format reflects the original conception of a thesis as a "book" presenting the candidate's research project. The traditional format is organized as a single narrative describing the research problem, the context of the research, the methods used, the findings, and the conclusions. The organization of a traditional thesis is generally organic. If the thesis deals with experimental research, it may be structured with an introductory chapter, a literature review chapter, a method chapter, some number of findings chapters, and a discussion/ concluding chapter. If the thesis is based on non-experimental research, the form is likely to be determined by the exigencies of the particular topic. After doctoral studies are complete, a traditional thesis will often be revised into a scholarly monograph or a number of research articles, but the form in which it is presented for the final oral exam is not itself intended for publication. This style of thesis remains the norm in the Humanities and in many Social Science disciplines.

Publication-Based Thesis

The publication-based thesis (PBT), also referred to as the manuscript or article-based thesis, is a coherent work consisting of a number of scholarly publications focusing on the same research problem. The PBT, which takes many forms, generally includes an introductory section, the publishable manuscripts, and a cumulative discussion or conclusion chapter. To promote coherence, the introduction and cumulative concluding chapters clearly explain how these separate manuscripts fit together into a unified body of research. The opening and closing chapters—which act as bookends to

the publishable articles—are integral to the purpose of these theses. In these sections, the writer will set out the broad contours of the problem and its significance, review the relevant literature and contextualizing material, and draw the ultimate conclusions about the implications of the whole research project. As the PBT is a relatively new type of thesis structure designed to meet different professional demands, its form is necessarily different in different contexts. For instance, in some fields, the articles may appear in the thesis in their precise published form; in others, the articles may need to be adapted to better serve the needs of the full thesis. The student and supervisor/supervisory committee will need to establish a clear understanding from the outset about the internal structuring of the PBT.

Although departmental requirements and norms may vary, below are some general guidelines that may be helpful for those writing PBT.

- The number of articles required for inclusion is usually three, although the number depends on the articles' scope, scientific quality and significance, and publishing forum, as well as the author's independent contribution to any co-authored articles included in the thesis.
- Publication of manuscripts, or acceptance for publication by a peer-reviewed journal, does not guarantee that the thesis will be found acceptable for the degree sought.
- Published-based theses may include published, in press or in review manuscripts or articles that have not yet been submitted for publication. Normally, the thesis and examination committees must deem the articles as publishable if the articles are not published at the time of defence.
- In some departments, the publication-based thesis includes each individual manuscript in a form that is identical to the published/submitted version, including the reference list. In other departments, students are permitted or required to adapt the articles into a form more suitable for inclusion in the thesis.
- Publication-based theses can include co-authored publications and, in such cases, a detailed statement on individual student contributions to each article must be clearly articulated. Students are strongly recommended (and, in some units, required) to have their contributions approved by the authors of the articles in question.
- No two student theses will be allowed to be identical.
- In the case of multiple-authored articles, the expectation is that the thesis writer will be the first or co-first author. In rare cases, a supervisor may decide that a paper can be included when the thesis writer is not a first author, provided that their contribution to the paper is substantial. In all cases, the parts of the PBT that are not written for publication (the Introduction, Discussion, Conclusions and Future Recommendations chapters) must be entirely the work of the thesis writer.

Multimodal Thesis

All doctoral theses must contain a written component; however, other elements may be included in addition to the written text. Some examples of other elements that may be included with the written text are films or videos, electronically interactive word/image-based texts, poems, novels or sections of

a novel, play scripts, short stories, documentation of performances, or pieces of art. In multimodal theses, the creative element should be integrated into the theoretical context in order to show explicitly how the thesis, as a whole, leads to new insights and contributions. In all other respects, the thesis must conform to the same standards required for all doctoral theses. It should make an original contribution to knowledge, demonstrate appropriate research methods and training, and be worthy of publication in whole or in part.

Portfolio Thesis

The portfolio thesis is a form of thesis in which a certain amount of publishing will “equal” a thesis, without requiring a separate text to be written. This type of thesis is also known as a stapler thesis or a Ph.D. by publication, a name that highlights the absence of an actual thesis. This form of thesis is currently rare at the University of Toronto.

Professional Doctoral Thesis in Practice

At the University of Toronto, the professional doctoral thesis in practice includes the identification and investigation of a problem in practice, the application of theory, research and policy analysis to the problem of practice, translating research into practice, and a proposed plan for action to address the problem of practice. The professional doctoral thesis in practice is expected to have meaningful generative impact on practice and policy.

Appendix

Ontario Council of Academic Vice-Presidents' (OCAV) Doctoral Degree Expectations for Doctoral Students in Ontario

EXPECTATIONS	DOCTORAL DEGREE
	<i>This degree extends the skills associated with the Master's degree and is awarded to students who have demonstrated:</i>
Depth and Breadth of Knowledge	A thorough understanding of a substantial body of knowledge that is at the forefront of their academic discipline or area of professional practice;
2. Research and Scholarship	a. The ability to conceptualize, design, and implement research for the generation of new knowledge, applications, or understanding at the forefront of the discipline, and to adjust the research design or methodology in the light of unforeseen problems; b. The ability to make informed judgments on complex issues in specialist fields, sometimes requiring new methods; and c. The ability to produce original research, or other advanced scholarship, of a quality to satisfy peer review, and to merit publication;
3. Level of Application of Knowledge	The capacity to i) Undertake pure and/or applied research at an advanced level; and ii) Contribute to the development of academic or professional skills, techniques, tools, practices, ideas, theories, approaches, and/or materials;
4. Professional Capacity/autonomy	a. The qualities and transferable skills necessary for employment requiring the exercise of personal responsibility and largely autonomous initiative in complex situations; b. The intellectual independence to be academically and professionally engaged and current; c. The ethical behavior consistent with academic integrity and the use of appropriate guidelines and procedures for responsible conduct of research; and d. The ability to evaluate the broader implications of applying knowledge to particular contexts.
5. Level of Communication Skills	The ability to communicate complex and/or ambiguous ideas, issues and conclusions clearly and effectively;
6. Awareness of Limits of Knowledge	An appreciation of the limitations of one's own work and discipline, of the complexity of knowledge, and of the potential contributions of other interpretations, methods, and disciplines.