



Morningside
Graduate School of
Biomedical Sciences

Preparing for your
Doctoral Dissertation
and Graduation

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Introduction

This document describes the procedure for

- Setting the Dissertation Timeline
- Scheduling the Dissertation Defense
- Preparation of the Dissertation

For Detailed policies on requirements for Completion, selecting a Dissertation Examination Committee, and conducting a Dissertation Defense, please refer to the Student Handbook.

Setting the Dissertation Timeline – Basic Biomedical Sciences and Biophysical, Chemical and Computational Biology

A student who has concluded that their dissertation research is nearly complete must propose a timeline for completion, and meet with the dissertation advisor and the TRAC for review and approval of the proposed timeline.

At the TRAC meeting, the student must present:

- A draft of the dissertation abstract
- An outline of the dissertation, including a detailed outline of the Introduction and Discussion
- A summary of published work that will be included in the dissertation
- Any data that are unpublished or previously unseen by the TRAC and that will be included in the dissertation. These data should be presented in publication-ready form where possible.
- A proposed date range for the dissertation defense
- A proposed list of external examiners who meet the qualifications

The TRAC will **Approve** or **Defer** to a later timeline.

- Approval of the student's proposed dissertation timeline indicates that: The student is not required to complete additional research or data analysis
- There are no outstanding obligations defined as required by the dissertation advisor or the TRAC, that would prevent the student from focusing entirely on dissertation completion
- The student has presented a draft of the dissertation abstract and a detailed outline, and the TRAC has provided feedback
- The student has identified potential external examiners, and the TRAC has deemed these appropriate

If the TRAC Approves, the student must return the completed TRAC approval of proposed dissertation timeline form (GSBS70) to the Morningside Graduate School of Biomedical Sciences office as soon as approval has been granted. **Providing the form to the office will NOT initiate any actionable deadlines.**

If the TRAC Defers to a later date, the TRAC must communicate the expectations for completion to the student, including research or analyses that remain to be completed, and the expected status (submitted or accepted) of publications authored by the student before the defense timeline can be set. The TRAC may recommend an expected timeline. The TRAC must also communicate to the student whether a TRAC meeting will be required for approval of the revised timeline, whether approval can be achieved via email, or whether a meeting with the TRAC chair is sufficient.

The student should submit a regular TRAC Meeting report (GSBS07) with a brief post meeting report that outlines the TRAC's expectations for completion. When the student has completed the assigned work and approval from the TRAC is obtained, the student must submit a TRAC approval of proposed dissertation timeline form (GSBS70).

Enrollment Status and Stipend leading up to the Dissertation Defense Examination During the TRAC-approved timeline for dissertation preparation, the student remains enrolled and supported by stipend. If a student takes a Leave of Absence (LOA) after TRAC approval of the dissertation exam timeline, but prior to the defense, the defense examination must be completed prior to the expiration of the LOA. If the dissertation exam is not successfully completed within this timeframe, the student will be withdrawn, and no degree will be issued.

Basic Biomedical Sciences and Biophysical, Chemical, and Computational Biology Forms:

<https://www.umassmed.edu/gsbs/academic-student-affairs/resources--forms/forms/>

Setting the Dissertation Timeline – Population Health Sciences

A student who has concluded that their dissertation research is nearly complete must propose a timeline for completion and meet with the dissertation advisor and the TRAC for review and approval of the proposed timeline.

At the TRAC meeting, the student must present:

- A summary of published work that will be included in the dissertation
- Any manuscripts from the dissertation (either published, submitted, or under review by co-authors).
- A proposed timeline for completion of dissertation and date range for the dissertation defense

Preparation for the Defense Examination

- The student will schedule the defense examination (DE).
- The student will submit the DE Committee Selection Form (GSBS14) at least 30 days prior to the DE.
- The student will submit the Request for Posting of Dissertation Defense (GSBS11) along with an ~250-word research summary at least 21 days prior to the defense.
- The student will distribute the final copy of the dissertation to the DEC at least 21 days prior to the DE.
- Within 7 days of receipt, the DEC Chair will review the dissertation for general acceptability. Graduate School staff will provide the DEC Chair with the Checklist for Dissertation Examination Committee (DEC) Chair Review of Submitted Theses (GSBS83) to evaluate the suitability of the Dissertation document for oral examination.

If acceptable, the defense notice will be posted and electronically distributed by the Morningside Graduate School of Biomedical Sciences within 2 weeks of the defense. The defense notice will not be posted until confirmation that the defense can move forward has been received from the DEC chair.

If the Dissertation document is unacceptable, the DEC Chair will inform the student and the dissertation advisor and will provide a written summary to all members of the DEC and the Associate Dean for Academic Affairs detailing the deficiencies. The Dissertation Examination will be cancelled.

In consultation with the DEC, the Associate Dean will set a new and final deadline for the student to submit an acceptable dissertation document.

Population Health Sciences Forms:

<https://www.umassmed.edu/gsbs/academic-student-affairs/resources--forms/forms/>

Timeline for Completion and Graduation - All Students

Post-Defense Completion of Dissertation

The DEC Chair, in consultation with other DEC members, is responsible for approving a revised dissertation, though the DEC may require approval from all members.

The student has 120 days post-defense to retest, if necessary, to submit the revised and approved dissertation, and to complete all degree requirements. If all degree requirements are not completed within 120 days of the defense, the student will be withdrawn from the Morningside Graduate School of Biomedical Sciences and will receive no degree. Extensions will be considered only with documentation of extreme extenuating circumstances.

Enrollment Status and Stipend During Preparation for and after the DE

During the TRAC-approved timeline for dissertation preparation, the student remains enrolled and supported by stipend. After the defense exam, the student can receive up to three weeks of stipend. Up to six weeks of stipend may be approved with academic justification and agreement of the dissertation advisor, however, the stipend cannot be extended beyond six weeks post-defense. A student remains enrolled until all requirements, including post-defense requirements, are completed.

International Students

As you begin preparing for your Dissertation Defense you should meet with the Immigration Services Office to discuss timelines as they relate to your visa, especially if applying for OPT.

Sample Title Page – Formatting for the Title Page

TITLE (IN CAPITAL LETTERS)

A Dissertation Presented

By

(NAME IN FULL)

Submitted to the Faculty of the

Morningside Graduate School of Biomedical Sciences at UMass Chan Medical School

in partial fulfillment of the requirements for the degree of

DOCTOR OF PHILOSOPHY

(MONTH, DAY AND YEAR)

(MAJOR SUBJECT)

Reviewer Page – Formatting for the Page

TITLE (IN CAPITAL LETTERS)

A Dissertation Presented

By

(NAME IN FULL)

This work was undertaken in the Morningside Graduate School of Biomedical Sciences

(Graduate Program Name, Typed)

Under the mentorship of

(Name Typed), Dissertation Advisor

(Name Typed), Member of Committee

(Name Typed), Member of Committee

(Name Typed), Member of Committee

(Name Typed), External Member of Committee

(Name Typed), Chair of Committee

Mary Ellen Lane, Ph.D.,

Dean of the Morningside Graduate School of Biomedical Sciences

Month, Day and Year

(Typed)

Contents and Arrangement

A dissertation describes a body of work that displays original scholarship, expressed in literate style and possessing a distinct contribution to a particular field of study. Your dissertation may include both published as well as unpublished original materials and should clearly convey all areas of your studies that demonstrate original scholarship and an advancement of knowledge in the domains in which your research was conducted. This dissertation, when completed, will constitute a published work, and, as such, should be prepared accordingly.

Document Divisions

The dissertation consists of three major sections which will be described below:

1. Front matter
2. Body matter
3. Back matter

Front Matter

- Title Page
The title page should conform to the standard dissertation title page adopted by the Morningside Graduate School of Biomedical Sciences (see Sample Title Page).
- Reviewer Page
The reviewer page includes the complete title of your dissertation, the list of your committee members, the name of the dissertation advisor and the Dean of the Morningside Graduate School of Biomedical Sciences followed by your program affiliation and the date (see Sample Signature Page).
- Dedication (optional)
If you wish, you may include a brief dedication section.
- Acknowledgements
This section is used to acknowledge individuals or groups who made substantial contributions to your dissertation work.
- Abstract
This section is limited to 250 words, and should state the main argument of the dissertation, introduce the rationale for the dissertation research, summarize noteworthy findings, and state how the work advances the knowledge of the field of study.
- Table of Contents
Include all front, body and back matter contained in the dissertation excluding the cover page.
- List of Tables
Include all tables contained in the dissertation as indicated by table number and the title of each table
- List of Figures

Include all figures contained in the dissertation as indicated by figure number and the title of each figure.

- List of copyrighted Materials Produced by the Author
If any part of the dissertation has been published, the student should state that here, including the full citation. The student is responsible for securing permission to use this material from the copyright holder.
- List of Third Party Copyrighted Material
This should summarize all material (Figures, Tables, etc.) created by a third party (published and unpublished) that are included in the dissertation. This list should include the Figure or Table number, the publisher or author. The student is responsible for securing permission to use such material from the copyright holder.
- List of Symbols, Abbreviations or Nomenclature (optional)
- List of Multimedia Objects or Files (optional)
This section is required should you include references to files that are not easily adapted for inclusion in the final copy of the dissertation (e.g., video clips, sound recordings, or files).
- Body Matter

Guidelines for the Introduction

- The introduction establishes the main argument of the dissertation work and provides the background information necessary to evaluate merits of the argument and the significance of the work.
- The Introduction must be an original work written by the student.
- The Introduction must preferentially reference primary sources, and those most relevant to the argument. Reviews may be used to cite background information that is relevant, but not directly related to the dissertation argument. Primary literature must be cited to provide support for original ideas, interpretations, and conclusions.
- While publication of the Introduction is not required, it must meet the requirements for publication as a review in a major journal.
- The introduction must be current and focused on the dissertation. While a previously published review, written by the student, may form a substantial part of the introduction, it must be altered as necessary to encompass all data and conclusions presented in the dissertation.
- If any part of the Introduction was previously published (as a review, for example), this must be indicated in the text.

Using Materials and Methods, Results, Tables, Figures and Legends from Student-authored Publications or Manuscripts

Published manuscripts authored by the student may be used heavily to provide text for describing methods, results, and conclusions, along with tables, figures, and associated legends, so long as the following conditions are met:

- Manuscripts must be adapted to conform to the formatting of the dissertation. See guidelines for each section, below.
- All figures must have unique numbers, and no figures should be designated as “supplemental”.
- It is the responsibility of the student to ensure that all copyrighted materials are used in accordance with the stipulations of the copyright holder.
- Appropriate attributions must be given for any written text, figures and data that were not produced by the student.

Guidelines for Results

- The Results can be presented in a single chapter with subsections or divided into several chapters. Organize chapters or subsections in a manner that best presents the logic of the argument. This may or may not be the way that the information is presented in a manuscript.
- Figures, tables, and associated legends must be embedded in the text.
- Large datasets (e.g., RNA-seq, ChIP-seq) should be deposited in an appropriate publicly available databases.
- Do not designate any figures as "Supplemental Figures". Decide to use, or not use, any figures from manuscripts as appropriate. Rerun figures according to their order in the dissertation, not according to their order in a manuscript.
- Any text sections and figures that have been previously published must be identified, with proper attributions.

Guidelines for the Discussion

- The discussion must be an original work written entirely by the student, with no co-authors. The author must include the following information:
 - Restate the scientific questions that the work intended to answer.
 - Briefly summarize the major results.
 - State the major conclusions and implications of the work in the context of the field of study and provide adequate arguments for each.
 - Indicate the caveats of the conclusions and describe additional approaches and/or directions that may strengthen the conclusions. Discuss the experimental, technical, practical, or other limitations that keep you from making strong conclusions.
 - Discuss the future directions that the research should take.
- If any part of the discussion was previously published, this must be indicated in the text.

Back Matter

- Appendices (optional)

This section may be included to present additional findings of a separable nature to that of the research chapters, which may not constitute an additional chapter. Also, this section may include material that cannot unitarily be included within the overall topic of the dissertation but may include findings that have contributed largely to the dissertation research.

- Bibliography

Format all referenced materials contained within the dissertation into a concise listing at the end of the document. The format follows that format most common in the journals of the field.

General Formatting

Fonts

The preferred font size is 12 in either the Times New Roman or Arial styles. For clarity, different typefaces (font sizes or styles) may be used within headings, tables, figures, and appendices.

Line Spacing and Margins

All main text should be double spaced (3 lines per vertical inch) and text should only be on one side of each page if printed. Single spaced lines may be used for the table of contents, tables, figure legends, long quotations, footnotes, and bibliographical citations. Margins must be at least 1 1/2 inches wide at the top and left, and 1-inch wide at the bottom and right. Illustrations, tables and figures should conform to these margins as well.

Page Numbering

The pages preceding Chapter I should be numbered consecutively in small Roman numerals. The cover page should be considered page "i" but should not be numbered, nor should the title page be numbered (as "ii"). Beginning with the first page of Chapter I and continuing through the bibliography or appendix, pages should be numbered consecutively in Arabic numerals. The numbers should appear in the upper right corner of the page, flush with the upper margin and should not be followed by a period. Chapters should be numbered in Roman numerals consecutively throughout the dissertation, with the word "CHAPTER" used as part of the designation followed by the Roman numeral. This heading should be centered and near the top of the page.

Headings

Chapters should be designated throughout the dissertation with the word "CHAPTER" used as part of the heading followed by consecutive Roman numerals. This heading should be centered and near the top of the page. Headings for main divisions within a chapter should be centered but should have only the first letter of the principle words capitalized. Sub-divisions within the main divisions should be indicated by side heads.

Tables and Figures

Tables and figures are numbered according to the chapter number followed by a decimal followed by consecutive numbering beginning with 1 (e.g., Table 3.1 denotes chapter 3, table 1). Consecutive numbering for tables and figures is reset at the start of each new chapter.

Third party copyrighted matter

The use of third party copyrighted materials is strongly discouraged and will only be permitted if written permission from the copyright owner is obtained prior to submission of the dissertation for review. The student is responsible for securing permission from the copyright holder.

Third party copyrighted material and permission to use this material should be listed in the Front Matter (see page 9). Examples are included below.

Sample Page

Figure Number	Publisher License	Number
Figure 1-2	Nature Publishing Group	2330811110362

The following figures were reproduced from journals: No permission required

Figure Number	Publisher
Figure 1-1	Theoretical Biology and Biophysics Group, Los Alamos National Laboratory

Dissertation Publication

After a successful PhD Dissertation Defense, the Dissertation shall be finalized, including revisions or corrections based on the decisions of the DEC. The DEC Chair is responsible for verifying that all revisions meet the requirements of the DEC. The DEC Chair's signature on form [GSBS79](#) constitutes acceptance of the revisions.

Publication Requirements

To be considered the student's official dissertation, a searchable PDF version of the dissertation must be on file in the Lamar Soutter Library. The PDF version will be uploaded by the Library to the eScholarship@UMassChan website. See [submission guidelines](#).

eScholarship@UMassChan is a digital archive offering worldwide access to the research and scholarly output of the University of Massachusetts Chan Medical School community. The goal is to bring together all the University's research under one umbrella, in full text whenever possible, to preserve, promote, and provide access to that research. eScholarship is administered by the Lamar Soutter Library.

BBS/BCCB Student Checklist

This checklist is provided for your convenience. Please use to keep track of forms and processes required of you before graduation.

All student forms can be found here: <https://www.umassmed.edu/gsbs/academic-student-affairs/resources--forms/forms/>

- Dissertation Examination Committee (DEC) Selection (GSBS14)
- Checklist for DEC Chair Review of Submitted Thesis (GSBS83)
- Request for Notice of Dissertation Defense (GSBS11)
- Dissertation Defense Outcome (GSBS79)
- Completion of Degree-Stipend Termination Date (GSBS17)
- Graduation Check-out (GSBS20)
- Graduation, Commencement and Post-Graduate Information (ONLINE – GSBS71)
- eScholarship Permission Letter (GSBS19)
- Survey of Earned Doctorate ONLINE
- Certificate of completion for the Morningside Graduate School of Biomedical Sciences cBCD Survey for Exiting Students (Survey Link emailed from GSBS.Career@umassmed.edu)
- Submission of final, revised dissertation to eScholarship.

PHS Student Checklist

This checklist is provided for your convenience. Please use to keep track of forms and processes required of you before graduation.

All student forms can be found here: <https://www.umassmed.edu/gsbs/academic-student-affairs/resources--forms/forms/>

- PHS Dissertation Examination Committee (DEC) Selection (GSBS14)
- Checklist for DEC Chair Review of Submitted Thesis (GSBS83)
- Request for Notice of Dissertation Defense (GSBS11)
- Dissertation Defense Outcome (GSBS79)
- Completion of Degree-Stipend Termination Date (GSBS17)
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