

**Department of Civil and Environmental Engineering
University of Connecticut**

PhD Graduation Steps and Timelines Guide

Expectations of Ph.D. Graduate Study:

Graduate students should demonstrate the following basic research skills to be successful in their research:

- Core technical knowledge appropriate to area of specialization
- Independent critical thinking
(Literature research, data organization, time management)
- Technical Writing
(Clear and concise expression, problem-solution based, citations)
- Connection of different concepts
(Thinking in an interdisciplinary manner)
- Technical Presentations
(Articulation, visualization)

Steps of Ph.D. Graduate Study:

1. Plan of Study (POS)
2. General Exam (GE)
3. Dissertation Research Proposal Defense (DRPD)
4. Publications (PUB)
5. Dissertation Defense (DD)

Each student must complete a Department PhD Checklist form that must be approved by their Advisor and the appropriate Graduate Program Director before scheduling the final defense (i.e. step 5). The checklist form is to ensure that all students in the program are following these steps and timelines. Without an approved PhD Checklist Form, students will not be able to proceed with scheduling their Dissertation Defense.

Each PhD student must also consult the graduate student handbook (or guide) provided by their specific area of concentration (Environmental Engineering, Transportation and Urban Engineering, Structural Engineering and Applied Mechanics).

Plan of Study (POS):

- For a student with a M.S. in the Ph.D. program, the POS must be filed within the first 2 semesters (or before completion of 12 credits of coursework)
- For a student with a B.S. in the Ph.D. program, the POS must be filed within the first 4 semesters (or before completion of 18 credits of coursework)

General Exam (GE):

The general exam should address all expectations as listed above, to draw conclusions about the suitability of the graduate student for graduate research study.

- The General Exam may be scheduled only after POS is approved and with consent from the advisor.
- The General Exam step is separate from the written and oral portions of the proposal defense. Each technical group has designed a general exam that best fits the needs of the technical area. In doing so, each group developed a general exam that ensures quality of the program and fairness to students across technical areas.

Dissertation Research Proposal Defense (DRPD):

The proposal/prospectus is a written description of the student's proposed graduate research. The student must defend their proposal in an oral presentation. Successful DRPD form and approved proposal document need to be submitted to graduate school.

- It is highly recommended that the proposal defense be scheduled within 6 months or 2 semesters from completion of GE.

Procedure for the external review of dissertation proposals

All CEE PhD students in consultation with their major advisor:

1. Invite two faculty members or researchers with a doctoral degree to serve as external reviewers. External reviewers can be from different fields of study (STAM, TUE, ENVE) or a different Department/University and should be outside the advisory committee.
2. Provide the dissertation proposal to the advisory committee and the two external reviewers before the proposal defense.
3. Ensure that the dissertation proposal external review is conducted by selecting at least one of the two options below:
 - a. Option 1: the two reviewers attend the dissertation proposal oral presentation and discussion. After the proposal defense, the reviewers must sign the graduate school form with their full names before the student provides the form to the Department for signature.
 - b. Option 2: the dissertation proposal is read by the two reviewers who provide their written review to the Associate DH (STAM, TUE) or program Director (ENVE), using the template that follows.
4. The Associate DH (STAM, TUE) or Program Director (ENVE) signs the Graduate School's dissertation proposal form checking the appropriate box in page 2 and returns to the student for processing.

Dissertation Proposal External Review Template

Student Full Name:

Reviewer Full Name:

1. Is the proposal well written, well organized, and well argued?
2. Does the proposal describe a project of appropriate scope?
3. Does the student demonstrate knowledge of the subject and an understanding of the proposed method of investigation?
4. Does the student show awareness of the relevant research by others?
5. Does the student consider how the proposed investigation, if successful, will contribute to knowledge?

Publications (PUB):

Prior to scheduling their dissertation defense, students need to show evidence of research results and journal publications with the following:

- At least 1 published or in press, 1 accepted and 1 submitted for journal publication

Dissertation Defense (DD):

Internal PhD Checklist form needs to be completed (including the requirement of publications) prior to scheduling defense.

- Three papers can be weaved together with introduction and conclusion to submit as Ph.D. dissertation
- Ph.D. dissertation needs to be sent out to advisory committee 14 days prior to DD
- The earliest the final dissertation defense can be scheduled is 6 months after the proposal defense.

The procedures and policies for assessment, pass/fail outcome for GE, retaking exams, and other time specific regulations are set by the technical groups.