THE DEPARTMENT OF
CHEMISTRY & BIOCHEMISTRY
FLORIDA STATE UNIVERSITY

Ph.D. Graduate Handbook

2018-2020
Table of Contents

Doctor of Philosophy Degree in Chemistry and Biochemistry .......................................................... 5
Ph.D. Overview ........................................................................................................................................ 6
Ph.D. Candidacy Requirements ............................................................................................................. 8
  Graded Graduate Coursework (18 hours minimum) ........................................................................... 8
  Dropping a Course after enrolling .................................................................................................... 8
  Associate Chair for Graduate Studies. .............................................................................................. 8
  Transfer Credit ..................................................................................................................................... 8
  Directed Individual Study Hours ..................................................................................................... 9
  Dissertation Hours .......................................................................................................................... 9
  Seminar Requirement ........................................................................................................................ 9
  First Author Publication Requirement .......................................................................................... 9
  Teaching Requirement ..................................................................................................................... 9
  Spoken English Requirement ........................................................................................................ 10
  Grade Point Average (GPA) Requirement ....................................................................................... 10
  Student in Good Standing Requirement ........................................................................................ 11

Choosing a Major Professor (Year 1) .................................................................................................. 11
  Changing Research Group .............................................................................................................. 12

Supervisory Committee Selection (February 1st) ............................................................................. 12
  Changing Ph.D. Supervisory Committee Members ...................................................................... 13

Required Oral Presentations (Year 2 and 4) ..................................................................................... 13

Advancement to Candidacy (Year 3) ................................................................................................. 13
  Written Proposal ............................................................................................................................ 14
  Oral Defense of Proposal ............................................................................................................... 14
  Oral Competency Evaluation ........................................................................................................ 14

Data Defense (Year 5) ........................................................................................................................ 14
  A student not expecting to defend their Ph.D. dissertation on or before April 1st of their fifth year
  will require a formal committee meeting to present a Data Defense and evaluate their continuation
  status in the Department .................................................................................................................... 14

Ph.D. Dissertation Defense .............................................................................................................. 15

Annual Progress Review (February 1st) ............................................................................................ 16
  Annual Evaluation .......................................................................................................................... 16
  Annual Progress Evaluation Criteria ............................................................................................ 17
Departmental Continuation and Funding Eligibility beyond five years (February 1st) ................. 18
    Procedure for Requesting Continued Support ................................................................. 18
Continuation beyond six years ............................................................................................. 18
    Degree Termination ............................................................................................................ 19
    Petition of Recommendation .......................................................................................... 19
Length of Time to Complete the Dissertation ..................................................................... 19
Enrollment .............................................................................................................................. 19
Scholarly Engagement ......................................................................................................... 20
Funding and Assistantships ................................................................................................. 20
    Tuition Waivers ................................................................................................................ 20
    Teaching Assistantships ................................................................................................ 21
    Research Assistantships ................................................................................................ 21
    Loss of Department Funding .......................................................................................... 21
    Student Employment Outside of the Department ............................................................. 22
Committee Definitions .......................................................................................................... 22
    Associate Chair of Graduate Studies ............................................................................. 22
    Graduate Advising and Awards Committee ................................................................. 22
    Student Affairs Office .................................................................................................. 22
Appendix A: Required Forms .............................................................................................. 23
    Major Professor Selection form (November) ................................................................. 23
    Doctoral (Ph.D.) Supervisory Committee form (February 1st) ........................................ 23
    Seminar Completion Form ............................................................................................. 23
        2nd year (20 min) presentation ................................................................................. 23
        4th year (50 min) presentation ................................................................................. 23
    Ph.D. Candidacy Exam (Fall, 3rd year) ......................................................................... 23
        Written Component Completion form ..................................................................... 23
        Oral Component Completion form .......................................................................... 23
    First Author Publication form ....................................................................................... 23
    Data Defense form (5th year) ......................................................................................... 23
    Doctoral (Ph.D.) Defense of Dissertation form ............................................................... 23
    Yearly Evaluation Bank Form (February 1st) ................................................................. 23
    Continuation Request Form (February 15th semester and continuing) ......................... 23
Doctor of Philosophy Degree in Chemistry and Biochemistry

The Doctor of Philosophy Degree (Ph.D.) in Chemistry and Biochemistry is awarded at The Florida State University (FSU) in each of the following areas: analytical, biochemistry, inorganic, materials, nuclear, organic, and physical.

A Ph.D. in Chemistry and Biochemistry is a research-oriented degree where a tenured or tenure earning faculty member in the Department directly mentors the graduate student. Students learn the principles and practices associated with their field from their mentor. The Ph.D. has Scholarly Engagement requirements including research, coursework and teaching components. Research and publication of the research results are the only mechanism for achieving a Ph.D. degree.

A Ph.D. degree in Chemistry and Biochemistry is typically obtained within four to six years. The process of obtaining a degree involves learning the fundamentals of chemistry and biochemistry through a minimum of 18 credit hours of coursework, two semesters of teaching, 24 credit hours of dissertation research, publication of your work as a first author, proficiency in public presentation, and scholarly engagement. A successful student will publish in peer-reviewed journals, present at local and national meetings, and advance the fundamental knowledge of their field, as assessed in candidacy exams and the Ph.D. defense. Although a minimum of one first author publication in a peer-reviewed journal is required to graduate with a Ph.D., additional first author publications are expected to establish advanced knowledge in a selected field.

This handbook contains information necessary for successful completion of your graduate program. Familiarity with the contents is conducive to completion of your degree in a timely manner.

Providing assistance to graduate students is the primary function of the Chemistry and Biochemistry Student Affairs Office (CBSA). The office is located in 344 DLC, and the telephone number is (850) 645-0651. Students are welcome to call or come by anytime between 8:00 a.m. – 5:00 p.m., Monday – Friday.

The handbook is subject to updates and clarifications. Additional information pertaining to University requirements is available in the FSU Graduate Bulletin published by the Office of the Registrar, as well as the Graduate Student Handbook published by the Office of the Graduate School.

We look forward to working with you!
Ph.D. Overview

Year 1

<table>
<thead>
<tr>
<th>Complete Lab Exploration (CHM 5935-02)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete form identifying six Departmental faculty to Discuss Research (October)</td>
</tr>
<tr>
<td>Complete form identifying three Department faculty labs to carry out a lab rotation (November)</td>
</tr>
<tr>
<td>Complete form to prioritize Professor Choice (1 is highest, 3 is lowest) (November)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Complete Doctoral Supervisory Committee Form (February 1st)</th>
</tr>
</thead>
</table>

| Complete Yearly Review (February 1st) - Must be signed by Major Professor |
| Complete Teaching Requirement |
| Students must complete two semesters of teaching |

<table>
<thead>
<tr>
<th>Complete English Language Requirement (International students only)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students must either pass the Speak Exam with a 50 or pass (90 or higher) EAP4832</td>
</tr>
</tbody>
</table>

Year 2

<table>
<thead>
<tr>
<th>Complete Research Presentation in Program Seminar (20 minutes) - Full committee required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete Yearly Review (February 1st) - Must be signed by Major Professor</td>
</tr>
</tbody>
</table>

Year 3

<table>
<thead>
<tr>
<th>Complete Ph.D. candidacy exam (December 31st) - Full committee required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Written Component (Research Proposal)</td>
</tr>
<tr>
<td>Oral Component</td>
</tr>
<tr>
<td>Part (a) Defense of research proposal</td>
</tr>
<tr>
<td>Part (b) Defense of Fundamental Knowledge in Chemistry and Biochemistry</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Eligible for a Coursework Masters (Spring Semester)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Following successful completion of Ph.D. Candidacy, students are eligible to apply for a coursework-MS degree if desired, which would be granted as they transition to Ph.D. candidates</td>
</tr>
</tbody>
</table>

| Complete Yearly Review (February 1st) - Must be signed by Major Professor |

Year 4

<table>
<thead>
<tr>
<th>Complete Research Presentation (50 minutes) - Full committee required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete Yearly Review (February 1st) - Must be signed by Major Professor</td>
</tr>
</tbody>
</table>

Year 5

<table>
<thead>
<tr>
<th>Complete Data Defense - Full committee required</th>
</tr>
</thead>
<tbody>
<tr>
<td>If Ph.D. thesis is not defended on or by April 1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Complete First Author Publication</th>
</tr>
</thead>
<tbody>
<tr>
<td>Must be submitted prior to degree completion</td>
</tr>
<tr>
<td>Manuscript must be turned into Student Affairs Office</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Complete Ph.D. Defense - Full committee required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Submission of written thesis four weeks prior to defense date</td>
</tr>
<tr>
<td>50 minute presentation in open seminar</td>
</tr>
<tr>
<td>Oral defense in closed meeting</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Complete Yearly Review (February 1st) and Request Ph.D. Continuation Status (February 15th)</th>
</tr>
</thead>
<tbody>
<tr>
<td>A student requiring more than Spring semester to complete their degree is required to file with GAAC for consideration of a continuation in program request</td>
</tr>
</tbody>
</table>
**Note:**

1. It is the responsibility of each student to keep track of the milestones he/she should be reaching each semester.
2. If a student does not feel he/she can reach a specific milestone on time, he/she should contact the Graduate Affairs Coordinator as soon as possible to receive instructions on how to proceed. All paperwork must be submitted on time to CBSA.
3. Failure to contact Graduate Affairs prior to a milestone date will result in review of status in program.
4. Late or missing paperwork could result in failure to complete milestone and loss of funding.
5. All forms for signatures will be distributed during new graduate student orientation, emailed each fall semester, and will soon be available on the chem.fsu.edu website.
Ph.D. Candidacy Requirements

Doctoral students must complete a series of milestones prior to advancing to candidacy and obtaining their PhD in Chemistry and Biochemistry.

- 18 Hours Graded Coursework
- PI and Committee Selection
- 2nd Year Oral Presentation
- Doctoral Candidacy Exam
- 4th Year Oral Presentation
- First Author Publication
- Data Defense
- Dissertation Defense

Graded Graduate Coursework (18 hours minimum)

Students are required to enroll in a minimum of eighteen credit hours of graduate level (5000 level) graded coursework to meet candidacy requirements. Students must take a minimum of three (9 h) core disciplinary courses in their focus area and the remainder will be chosen in consultation with their supervisory committee. Courses taken outside of Chemistry and Biochemistry, Math, Scientific Computing, Statistics, Neuroscience, Biology, EOAS (Earth, Ocean, Atmospheric Sciences), and Physics require approval from Student Affairs office. Disciplinary Focus Course (DFC) and Directed Individual Study (DIS) courses are non-graded and therefore will not be substituted for graded graduate coursework hours in meeting the 18 h requirement.

During the first semester in the program, students should take three graduate courses in the Chemistry and Biochemistry Department to satisfy nine of the required coursework hours. Students must complete the eighteen hours of coursework by the end of their second year in the program. The Ph.D. Supervisory Committee may request additional courses be completed during the Ph.D.

Dropping a Course after enrolling

Graduate students must be enrolled in a minimum of 9 credit hours to receive a tuition waiver (credit hours may be increased to 12 if deemed necessary by the dean’s office). If you choose to drop a course during drop-add, you must enroll in enough hours to meet the minimum or your waiver will be cancelled. If you want to drop a course after the initial drop-add period, the approval of the Associate Chair for Graduate Studies, your Ph.D. supervisor, and the dean is required. Failure to receive prior approval may result in loss of your tuition waiver from the department. After the drop-add period, students are unable to drop courses online and the Student Affairs Office will process the drop pending approval from the Associate Chair for Graduate Studies.

Transfer Credit

A 3 credit hour course taken for a Master’s Degree at another institution may be credited by the Department towards the mandatory eighteen hours of course credit. The student’s Major Professor must petition GAAC for approval of the transfer credit for the student during the second semester in the program. The petition must identify an appropriate course in the graduate student bulletin, which the transfer course is satisfying and the letter must provide a rationale for accepting the transfer course. The transfer credit will not be recorded on the University transcript.
Directed Individual Study Hours
Prior to passing the Preliminary Doctoral Examination, students must register for Directed Individual Study (DIS) hours. Students should take 6h of CHM 5830 and a combination of CHM 5831, CHM 5832, and CHM 5833 to meet their requirements in the program.

Dissertation Hours
After passing the Preliminary Doctoral Candidacy Examination (3rd Year), students must register for dissertation hours, CHM 6980. Students who have been admitted to candidacy must register for dissertation credits each term in which a substantial amount of work is being done on the dissertation. The minimum number of dissertation hours for completion of a doctoral degree is 24 credit hours.

Seminar Requirement

Responsible Conduct of Research Seminar - Students meet the RCR requirement upon completing the online Collaborative Institutional Training Initiative Responsible Conduct in Research (CITI-RCR) Course.

CHM5801: Safety in Scientific Research – Students are required to enroll and pass the seminar course during their first semester in the program.

CHM 5945: Seminar on Chemical Education - Students are required to enroll and pass the seminar course during their first semester in the program.

CHM 5935: Departmental Seminar – Students are required to enroll and attend Department Seminars each fall and spring semester. Failure to attend departmental seminars will result in the receipt of an unsatisfactory (U) grade.

Research Area Seminars – All graduate students, with exception of first year students, are required to enroll in research area seminars each fall and spring term. A graded research area seminar will be required in the student’s second and fourth year (aligned with oral presentation).

First Author Publication Requirement
Prior to the dissertation defense, the student must have at least one first-author publication (published or accepted) in a peer-reviewed research journal. The publication must be filed with the Student Affairs Office.

Teaching Requirement
Students are required to participate in teaching during their graduate career because teaching experience is an integral part of graduate education. To instruct the students in carrying out teaching duties in a competent and professional manner, the Department conducts CHM 5945, “Seminar on Chemical Education,” prior to the fall semester. All students are expected to register for and fully participate in this course as part of fulfilling the teaching requirement.
Both students being taught and the supervising faculty will provide evaluations of teaching each semester.

A student working toward the Ph.D. degree is required to teach a normal half-time (0.5 Full Time Equivalents – FTE) teaching assignment, or equivalent, for at least two semesters.

Teaching may be waived for students with extensive prior teaching experience or if they are fully funded. Student waiver requests must be reviewed and approved by GAAC and approval by their Ph.D. supervisory committee.

**Spoken English Requirement**

The University requires proficiency in Spoken English in order to be a teaching assistant. Accommodations will be made for student’s that are unable to meet the requirement. Students for whom English is not the native language and who are not fluent in English must demonstrate this competence by passing a test of spoken English (SPEAK) with a score of 50 or higher administered by the University through the Center for Intensive English Studies (CIES) or receive a grade of 90 or above in the EAP 4832 course. The graduate student cannot advance to candidate status until they meet the Spoken English Requirement.

Students unable to pass the SPEAK examination with a score of 50 at the first opportunity after enrolling at the University will be considered deficient in their background and will be required to take remedial work in English (EAP 8432) each semester until a passing score is earned or the student withdraws from the program.

A student not passing the SPEAK examination by the BEGINNING of the third term of enrollment will be ineligible for the normal assistantship and may be given an assignment with a reduced stipend or salary. A student not passing the examination by the END of the third term of enrollment (including summer terms) will be considered to be in Academic Probation and notified of their pending dismissal from the program. Dismissal will become effective at the END of their fourth term of enrollment (including summer terms) unless a passing score is earned in the interim.

**Grade Point Average (GPA) Requirement**

Students will be placed on probation if their cumulative Grade Point Average (GPA) in all graduate courses taken falls below 3.0. Students placed on Academic Probation will have one semester to raise their GPA above 3.0 to remain in the program. If a student is unable to raise their GPA, they will be dismissed from the program.

Students can have no more than two unsatisfactory (U) grades during their Ph.D. If students receive more than two unsatisfactory grades, they will be reviewed for termination from the program.

**Student in Good Standing Requirement**

A Ph.D. student must remain in Good Standing during their Ph.D. program, as detailed in the yearly review. A student given “Not in Good Standing” status must address the deficiencies within one semester or will be evaluated by the Department for immediate termination.
Choosing a Major Professor (Year 1)

Graduate students will only be allowed to join a laboratory group and/or conduct research towards their Ph.D. upon completion of the Lab Exploration, which concludes in the third week of November of their first year.

First year students are introduced to faculty and their research during in the Introduction to Research Series that takes place during orientation. The Introduction to Research Series presents a succession of 20 min research presentations by the faculty. A Major Professor Selection form will be completed with specific dates for completion of sections. Signatures need to be obtained prior to the submission. Students are encouraged to begin to address sections 1 and 2 as soon as they arrive on campus.

Section 1. Identification of research groups (October). Students must select four research groups in the Department, or identified by the department, to meet and discuss research opportunities with the faculty member for the laboratories of interest. (faculty signature required)

Section 2. Formalize Laboratory Rotations (November). Students will identify a minimum of two labs to carry out a formal lab rotation. During the rotation, the student may be expected to work in the laboratory, attend group meetings, and/or discuss scientific research projects. (dates of the rotation and a signature from faculty member required)

Section 3. Selection of Major Professor (November). The student will rank order their research group selection and turn in the form to student affairs in November. You will be notified of your Major Professor in November. While every effort is made to match you with your first choice. We may not be able to meet all requests. If this is this case, a match to the second or third choice will be made.

Changing Research Group
Occasionally a graduate student or the major professor decide the chosen research group is not appropriate for the graduate student. When this occurs, you may change research groups.

You will have 30 days to locate a new research group after your advisor resigns as chair of your Ph.D. supervisory committee. Following the 1-month period, you will be placed in a MS track for degree completion within the semester.

If you are changing groups in year 1 or 2, the process is straightforward. To change groups your current major professor must notify the chair of GAAC and student affairs that they will no longer wish to act as the major professor for the student. Once the announcement has been made, a graduate student is granted 1 month to identify a new group and join the group by submitting an updated Supervisory Committee Form to the Student Affairs Office. The form must have the signature from the new major Professor.
For students beyond year two, in addition to finding a new group you must petition GAAC for continuation in the program by submitting a letter for the Ph.D. supervisory Committee detailing the rationale for switching groups.

If you are unable to find a new group, then you will be placed in the coursework master’s degree track and your eligibility to continue in the Ph.D. program will end at the end of the current term. You will not be eligible for Department support following this term.

**Supervisory Committee Selection (February 1st)**

The Ph.D. Supervisory Committee form must be completed in consultation with the Major Professor no later than February 1st of the first academic year.

The student’s Ph.D. Supervisory Committee is directly responsible for yearly evaluation of student performance, including the Ph.D. candidacy exam, all seminar requirements, the data defense, and the Ph.D. defense.

Supervisory Committee responsibilities include the following:

1. Attendance of pre-candidate research seminar – 2nd Year Oral Presentation
2. Administration of the Oral and Written Ph.D. Candidacy Examination – 3rd Year
3. Attendance of candidate research seminar – 4th Year Oral Presentation
4. Attendance of data defense – 5th Year
5. Function as the examining committee for the defense of the student’s dissertation
6. Yearly review of the progress of each student

A supervisory committee will oversee the student’s progress to the Ph.D. and administer the Ph.D. examination and final defense. The Supervisory Committee will consist of the following faculty with doctoral directive status at the Florida State University:

1. The Major Professor, who will act as Chair of the Ph.D. Supervisory Committee. If the advisor is out of the Department, a co-major professor is required.
2. Two (or more) faculty members chosen from the Department of Chemistry and Biochemistry.
3. One tenured faculty member from outside the Department who acts as the University’s Representative. If there is a co-major professor outside of the department, they are not considered the university representative.
The full committee is required to be present at all formal committee meetings. One member may attend via a SKYPE video call (or its equivalent); however, this cannot be the University Representative. The Dean of the Graduate School, the academic dean (Dean of the College of Arts and Sciences), and the Department Chair must be given the opportunity to attend examinations held by the Committee as non-voting members. The Major Professor, Chair of the Department, Dean of Arts and Sciences, or the Dean of the Graduate School may appoint at their discretion a member of the Ph.D. examining committee.

Changing Ph.D. Supervisory Committee Members
Changes to the Ph.D. Supervisory Committee after the initial form submission requires submission of a new form to the Student Affairs office, so the Graduate school can be notified. The form will require a signature from the Associate Chair for Graduate Affairs.

Required Oral Presentations (Year 2 and 4)
Students will register for the graded research area seminar in order to present second and fourth year research presentations in the appropriate research area seminar, if possible. The presentation must be scheduled with the faculty member in charge of the appropriate Research Area Seminar and announced to the Department at least 1 week prior to the presentation date. The second year presentation will be 30 min in length (20 min with 10 min for questions), while the fourth presentation is expected to be 50 minutes in length. The Ph.D. Supervisory Committee must be present during the presentation. Following the presentation, the student should submit a signed Presentation Form.

Advancement to Candidacy (Year 3)
The Ph.D. candidacy exam consists of three parts: a written research proposal, an oral research presentation, and oral competency evaluation. The candidacy exam must occur by the end of the 7th semester in the program (Fall, 3rd year).

The candidacy exam requires all members of the Supervisory Committee to be present and will be scheduled for a minimum of 90 minutes. At most, one faculty member (not including University Representatives) can attend via electronic communication.

Students not passing any part of the exam will be given only one semester to be re-evaluated by their Supervisory Committee. Failure to pass the requirements will result in termination from the Ph.D. program.

Written Proposal: A written proposal on the student’s research effort (not to exceed 12 pages) will be written in the style of an NSF or NIH R01 proposal and constitute the written exam portion of the Ph.D. defense. The written proposal meets the written exam portion of the Ph.D. Candidacy Exam. It should clearly outline the aims, rationale, and background; provide preliminary data; and propose future work for the Ph.D. A well-defined hypothesis, an approach to address the hypothesis, and preliminary data should be a part of the written component. The student is not required to submit a budget.
The written proposal should be written by the student and should not utilize the writing, figures, or details, in whole or in part, of a proposal written by the major professor.

The proposal should be submitted four weeks prior to the oral component and evaluated by the Supervisory Committee. The faculty will present written critiques and identify concerns to the students as part of the evaluation. The committee chair will summarize the reviews and notify the student of the evaluation one week prior to the oral presentation date. Proposal may be returned to the student for resubmission to address faculty concerns. A returned written component will require rescheduling of the candidacy date within a month of return.

Oral Defense of Proposal: An oral presentation (30-45 minutes) on their proposed research followed by an oral defense of the ideas addressing faculty concerns will occur as part of the Ph.D. candidacy exams. It is anticipated that the oral component will not exceed one hour. The oral presentation question and answer period is separate from the candidacy evaluation phase. The questions may occur during the presentation or following the presentation. Failure to pass the oral component will require repeat of the section by the student.

Oral Competency Evaluation: The oral component of the Ph.D. exam is accomplished by the evaluation of the student’s competence in their field following completion of the oral Defense of Proposal. The Oral Competency Evaluation is specifically designed to evaluate the student’s level of fundamental knowledge and understanding in their field. It is anticipated that this competency evaluation will last 30-45 minutes. This examination should not be confused with the evaluation of the students’ research plans, which is carried out during your oral defense of proposal part of the exam.

**Data Defense (Year 5)**

A student not expecting to defend their Ph.D. dissertation on or before April 1st of their fifth year will require a formal committee meeting to present a Data Defense and evaluate their continuation status in the Department.

The Data Defense will demonstrate to the Ph.D. committee that the Ph.D. candidate has collected sufficient data of adequate quality to assemble the dissertation. The data defense is not a “pre-defense” of the Ph.D. thesis, but it will consist of a written and oral component. It will be presented at least three months prior to the defense, but not later than the end of the first term of the fifth year in the program. The presentation is not a public presentation and is not a candidacy exam. The anticipated time for the Data defense is 5 to 30 min. With agreement by committee, the Data Defense can be combined with the 4th Year Oral Presentation, which serves as part of data presentation in a closed meeting after presentation.

The written component is an extended outline of the thesis (several pages), including an outline of the chapters, the major findings, and detailed description of the remaining content to be completed. The written component is due to the committee four weeks prior to the data defense.

The oral component will be a 5 to 30-minute presentation in front of the Supervisory Committee detailing the thesis chapters, indicating what has been published, what has been accepted for
publication, and focusing on the remaining research to complete the Degree. A timeline for completion of the remaining thesis components must be clearly detailed during the defense. The hypothesis of the research and its impact within the context of the field should be clearly stated.

The Supervisory committee will decide if the student has collected sufficient data of sufficient quality to write and defend a Ph.D. thesis. The Supervisory Committee will identify any apparent weakness in the completed data, further experiments required to support the hypothesis, and provide a document of the agreed timeline to achieve the results. The document will be placed in the student file. It is anticipated that passing the Data Defense will ensure no additional experiments will be requested during the final Ph.D. defense.

In the event that the committee deems there is more work to be performed than what the student anticipated, the student is required to develop an experimental plan to address the deficiencies. A student may repeat the data defense one additional time. At the conclusion of your Data Defense, you need to submit your committee-signed Data Defense Form to CBSA.

**Ph.D. Dissertation Defense**

At least 1 month prior to the dissertation defense, the dissertation must be submitted to all members of the Supervisory Committee. The dissertation defense should be delivered by the student as a 30-40-minute oral summary of the student’s major research accomplishments.

This examination consists of the student’s oral presentation and defense of the dissertation administered by the Supervisory Committee. The presentation is in the form of a public seminar that is open to all students and faculty; the examination is closed to the public. It is the responsibility of the Major Professor to designate the time and place of the dissertation defense and to preside at the defense. In the event that one of the committee members (not the student and not the university representative) is absent, he or she may attend the defense through video-conferencing. A notice of the defense time and place should be sent to the student’s Supervisory Committee and to the entire Department of Chemistry and Biochemistry. The student is also responsible for submitting notification of the time and date of the dissertation defense to the Office of the Graduate School a minimum of two weeks prior to the defense using the online Defense Announcement Form.

Manuscript deadlines and other important information can be found at The Graduate School website. [https://gradschool.fsu.edu/academics-research/thesis-treatise-dissertation](https://gradschool.fsu.edu/academics-research/thesis-treatise-dissertation)

**Annual Progress Review (February 1st)**

In accordance with University, College, and Departmental policies, all graduate students must be evaluated each year in writing. The review process ensures students are meeting the program requirements at each stage of their graduate career and that they exhibit a mature and professional approach toward courses, research, seminars, University and Department deadlines, and teaching. The review may be either with the Major Professor alone or with the full committee and will provide feedback on the student’s progress towards degree, research accomplishments, and professional development. If the review is done with the Major Professor only, the student is
required to provide a copy of the Yearly Review to their Supervisory Committee members for individual evaluation. Any member of the Ph.D. supervisory committee may request a complete committee meeting to discuss the evaluation prior to submission to the department.

**Annual Evaluation**

The Annual Progress review is to be submitted to the Student Affairs Office no later than February 1st for inclusion in the student’s file and uploaded to the Graduate Tracking system. **The original document will be maintained by the student and should only require a short update each year to be in compliance.**

1. **Student in Good Standing** – Meets or exceeds the high standards set by the Graduate Program in Chemistry and Biochemistry. The student is advised to continue in the graduate program.

2. **Student in Good Standing but Cause for Concern** – Deficient in one area of expectation for the Graduate Program in Chemistry and Biochemistry. The student’s advisory committee will provide students receiving a Cause for Concern an individual development plan (IDP). Progress towards degree will be re-evaluated in the following semester after initiation of a signed IDP. The IDP may include the following:
   
   - **I.** The student may be advised to complete a Master’s degree before continuing to the Ph.D. degree.
   
   - **II.** The student may be advised to complete a Master’s degree without the expectation of going onto the Ph.D. degree
   
   - **III.** A formal deadline to meet any incomplete Ph.D. requirements may be imposed.
   
   - **IV.** Additional coursework or requirements for continuation towards degree may be assigned for completion within a defined time period.

3. **Student Not in Good Standing** – Does not meet the high standards set by the Graduate Program in Chemistry and Biochemistry. The student will be reviewed by the Department tenured and tenure-earning faculty for dismissal from the graduate program within a semester of notification.

**Annual Progress Evaluation Criteria**

GAAC will review the annual student progress evaluation forms and confirm all Ph.D. requirements are being met. GAAC will provide a formal recommendation to the Department of “Student in good standing,” “Student in good standing but with a cause for concern,” or “Student not in good standing” for all graduate students in the program each year. A vote of the faculty at large approving or modifying GAAC evaluation will be recorded in the student file each year. Students will be asked to address the deficiencies noted in the recommendation within one semester or they will be reviewed for immediate program termination by a vote of the faculty. A student “Not in Good Standing” for more than one semester will be reviewed for termination of the program for not meeting the level of expected performance.

All students must maintain a 3.0 or higher GPA in CHM 5000 level courses not including graded research and seminars. No more than two reprimands should be on the student record. Failure to submit a report on time, receipt of a “Student Not in Good Standing” recommendation from a
student’s Supervisory Committee on the yearly review, or more than a single “Unsatisfactory” grades in a S/U course during their Ph.D. career will result in a GAAC recommendation of “Student Not in Good Standing.”

A detailed list of review items is noted below by year.

**1st year** - GAAC will review the coursework progress, GPA, Deficiency Notices (including unsatisfactory grades, and formal reprimands), status of Ph.D. advisor selection, and Supervisory Committee form submission. For continuation in the program, students are expected to have completed or be enrolled in a minimum of 2/3 of required courses.

**2nd year** - Students should have met with their Ph.D. Supervisory Committee, established a target date for Ph.D. candidacy, presented their second year research presentation and completed or be enrolled in the final courses to meet the requirement of 18 credit hours of 5000 level coursework.

**3rd year** – Students will have completed their Ph.D. candidacy Requirements, including written and oral components. Failure to advance to candidacy prior to yearly review will result in the student receiving a “Not in Good Standing” evaluation, being placed in the M.S. program, and a formal review for termination from the program.

**4th year** – Evidence of scholarly engagement will be evaluated by reviewing manuscripts, presentations, and fourth year research presentation. Failure to have advanced to candidacy prior to this date will result in an immediate termination from the program without Departmental review.

**5th year** - The evaluation is based upon the recommendation of the Supervisory Committee following the Ph.D. Data Defense.

**6th year and beyond** – Review is based upon meeting defined milestones from last year’s review

**Departmental Continuation and Funding Eligibility beyond five years (February 15th)**

Students about to enter their sixth year in the program (or longer) are required to be reviewed by the Graduate Academic an Awards Committee (GAAC) for continuation of Department support beyond spring Semester of their fifth year. Continuation with Departmental financial support (tuition waiver, health care supplement, and teaching assistantship or research assistantship) is not guaranteed beyond five years. Review for Continuation beyond this point requires the submission of the **Continuation Request Form** to GAAC. GAAC will review; seek Department Approval from the tenure and tenure-earning faculty. Part of the decision is based upon the recommendation of the Supervisory Committee following the Ph.D. Data Defense and the Annual Progress Review.

*Please be aware that the Department rarely provides funding beyond year six, and any student beyond six years in the degree will be considered a “Student Not in Good Standing.”*
If there is a likelihood of needing continued support, a petition should be submitted, as petitions received after February 15th will not be considered.

**Procedure for Requesting Continued Support**

A request for continuation of Department support requires clear progress towards degree completion to determine if continuation in the program is warranted. GAAC will only consider a petition for continuation if all degree requirements have been met. A student requesting continuation status must be a “Student in Good Standing.”

The request for continuation is to be made for a specific time period. Although the continuation request is made for a specific time period (1-12 months) in the **Continuation Request Form**, GAAC may only approve continuation status for a limited time, which will not necessarily coincide with the requested time by the student.

The petition must clearly define a timeline for degree completion by the student, which has been agreed upon by the faculty advisor and the Ph.D. supervisory committee. The timeline must clearly identify the milestones and how they will be met each month of the continuation request. Failure to meet the milestones will result in re-review of the student’s status in the program and potential termination.

**Continuation beyond six years.**

Granting continuing status beyond six years requires compelling, well-documented reasons noted in earlier progress reports and validated by the GAAC. Compelling reasons may include Major Professor departs FSU, retires from FSU, or passes away, the student switches research programs in 2nd or 3rd year, CATASTROPHIC instrumental failure, or a well-documented research restart after a failed project or effort, or approved leave of absence as discussed below.

**Degree Termination**

Degree termination requires a vote of the Department tenured and tenure-earning faculty. Students considered “Not in Good Standing” for two semesters will be immediately terminated from the program. A student may request re-evaluation of the decision by the Chair of the Department.

**Petition of Recommendation**

A student may petition the Department through the Department Executive Committee for reconsideration of a GAAC recommendation. The process requires notification to the Department Chair of a request to reconsider the departmental vote based upon a GAAC recommendation. The Chair will convene the executive committee to reconsider the decision and may ask for additional information in support of the petition.

**Length of Time to Complete the Dissertation**

A typical Ph.D. degree is obtained in 5 years. Students beyond five years must petition for program continuation, as noted in the section above (**Departmental Continuation and Departmental Funding Eligibility beyond five years**).
The Department of Chemistry and Biochemistry requires a student entering the sixth year to be reviewed by GAAC for continuation in the Ph.D. program. GAAC will review the request and make a recommendation to the Department Faculty for approval by a vote at the next Faculty meeting.

Since the University rules dictate that a doctoral candidate must defend his/her dissertation within five (5) calendar years of passing the Preliminary Exams, the denial of Continuation of support only pertains to the funding of the graduate student tuition and salary and not to the ability to pursue a Ph.D. Degree. If a student’s request for Continuation is denied, the student may remain in the program but will be required to pay tuition without waivers at the full time student rate. In addition, the student cannot be employed as a teaching assistant or a research assistant within the Department of Chemistry and Biochemistry. Only under the most extraordinary circumstances does the Department consider a petition for support beyond the sixth (6th) year. Compelling reasons may include advisor departs FSU, retires from FSU, or passes away, the student switches research programs in 2nd or third year, CATASTROPHIC instrumental failure, or a well-documented failed project requiring additional time to collect data for a degree.

**Enrollment**

**Full Time Enrollment**

The Department considers all graduate students to be full-time students and requires each in-state student to register for 12 hours per semester, unless otherwise directed by the College of Arts and Sciences. International or out-of-state students are required to register for 9 credit hours per semester in courses unless directed differently by the Dean of Arts and Sciences Office. All students supported as TAs or RAs are required to be full-time students by University regulation and liability clauses, which require such enrollment practices.

Unsupported students in their last term, whose only task is the writing of their dissertation, may petition the Graduate Advising and Awards Committee to register for a reduced load. This action should be taken before the semester begins. A six-hour load generally applies to students who are still on campus and are utilizing Departmental facilities. Students registered for fewer than six hours are not allowed to continue to perform research or utilize University research facilities.

Only one term of a reduced load is permitted. Therefore, students who have not completed the defense of their dissertation or thesis during this term in which they are registered for a reduced load must adhere to the 9-12 hour per semester minimum in all subsequent terms.

An unsupported student, who is off campus and not utilizing any University or Departmental facilities and who has satisfactorily completed all University and Departmental requirements, except for the defense of Thesis/Dissertation, is permitted to register for two credit hours in the final term of enrollment.

An unsupported student, who is off campus and not utilizing any University of Departmental facilities, and who has satisfactorily completed all University and Departmental requirements after the final clearance deadline for one semester but prior to the first day of classes of the next semester, is required by the Graduate School to register for two credit hours during the term of graduation.
Scholarly Engagement
All graduate students must meet the Scholarly Engagement requirement. The goal is to prepare students to be scholars who can independently acquire, evaluate, and extend knowledge, as well as develop themselves as effective communicators and disseminators of knowledge. To meet the Scholarly Engagement requirement, doctoral students should interact with their Major Professor weekly; attend Department seminars, and publish research in a reviewed journal. Scholarly engagement may include attending and presenting at Scientific meetings, carrying out collaborative study and research beyond the university campus (i.e. national laboratories, collaborators laboratories, etc.); and utilizing the library, laboratories, and other facilities provided by the university.

Funding and Assistantships
Tuition Waivers
All students employed by the University through a research assistantship or a teaching assistantship receive tuition waivers each semester if registered full time.

A student that has a fellowship administered through the University will receive a tuition waiver if enrolled full time.

Students not enrolled full-time, self-supported, funded via external funding mechanisms, or on a fellowship not administered by the University will not receive a tuition waiver.

Teaching Assistantships
The policies for teaching are outlined in the Graduate Student Teaching handbook. All TAs are required to abide by the rules in the TA handbook.

Graduate students must have demonstrated English competency exam to be considered for a Teaching Assistantship. A student who is required to take the SPEAK exam must score a 50 or higher to be allowed to teach. A score of 45 on the SPEAK exam permits the graduate student to be a grader, proctor, lab section instructor, or recitation section instructor as long as they are enrolled in the University’s English improvement course (EAP 4832).

As a rule, an incoming graduate student is offered a teaching assistantship (TA) and is usually assigned to teach General Chemistry Laboratory. Incoming graduate students meet with the Department’s teaching interview committee (Associate Chair of Undergraduate Studies, Associate Chair of Curriculum, General Chemistry Lab Coordinator, and Organic Chemistry Lab Coordinator) during orientation to assess their ability to teach.

TA positions for students beyond their first year, who are not supported by a Research Assistantship (RA), are made available based upon the Departmental needs. TA assignments will be based upon prior student performance in a TA position, and are prioritized for students who have been in the program for less than five years.

TAs for upper level courses are selected on the basis of qualifications and interests, as well as Departmental teaching needs. Every effort is made to match teaching assistants with laboratory and grading assignments for which they are best qualified.
**Research Assistantships**
After the first academic year, the student’s Major Professor may support the student as a Research Assistant (RA) or through a Teaching Assistantship (TA). The Major Professor will provide the expectations and assessment of performance as a Research Assistant (RA).

**Loss of Department Funding**
Loss of Departmental Funding Support will result in the student not being eligible for direct departmental support in the form of a teaching assistantship, Department funded OPS lines, tuition, fees, or any healthcare supplements.

Loss of Departmental funding can occur for students receiving a “Not in Good Standing” evaluation, failure to uphold the professional expectations of the department, failure to complete degree milestones on time, not receiving a Ph.D. within five years, or failure to comply with safety regulations. Loss of Departmental funding requires approval by the faculty following the GAAC vote. The Loss of Departmental funding can be appealed to the Chair of the Department.

Students who have lost Departmental funding may continue in the program if self-funded or may seek funding through faculty grant support as hourly employees.

**Student Employment Outside of the Department**
Students are not permitted to hold employment outside the Department. This is not intended to prevent students from performing small, non-recurrent tasks, such as occasional tutoring.

**Committee Definitions**

**Associate Chair of Graduate Studies**
The Associate Chair of Graduate Studies oversees decisions reached by GAAC and GRAC and interacts directly with the Student Affairs Office. Any concerns by the student or the Major Professor with regard to academic related issues should be forwarded to the Associate Chair.

**Graduate Advising and Awards Committee**
The Graduate Advising and Awards Committee (GAAC) provides student guidance concerning their degree requirements. GAAC has the responsibility to collect yearly reviews and evaluate standing in the program. Decisions by GAAC that are approved by departmental vote can be appealed at the Department Chair level.

**Chemistry and Biochemistry Student Affairs Office (CBSA)**
The Student Affairs Office maintains the student records, provides guidance on University requirements, and offers administrative support to students.
Appendix A: Required Forms

All required forms for the Chemistry and Biochemistry Department will be provided at the new graduate student orientation, as well as via email each fall semester (forms to be available on the chem.fsu.edu website soon). The competed and signed forms are to be submitted to the Student Affairs Office:

Major Professor Selection form (November)

Doctoral (Ph.D.) Supervisory Committee form (February 1st)

Yearly Evaluation Bank Form (February 1st)

Seminar Completion Form

- 2nd year (20 min) presentation
- 4th year (50 min) presentation

Ph.D. Candidacy Exam (Fall, 3rd year)

- Written Component Completion form
- Oral Component Completion form

Data Defense form (5th year)

Doctoral (Ph.D.) Defense of Dissertation form

Continuation Request Form (February 15th of 5th year)