Graduate Student Handbook
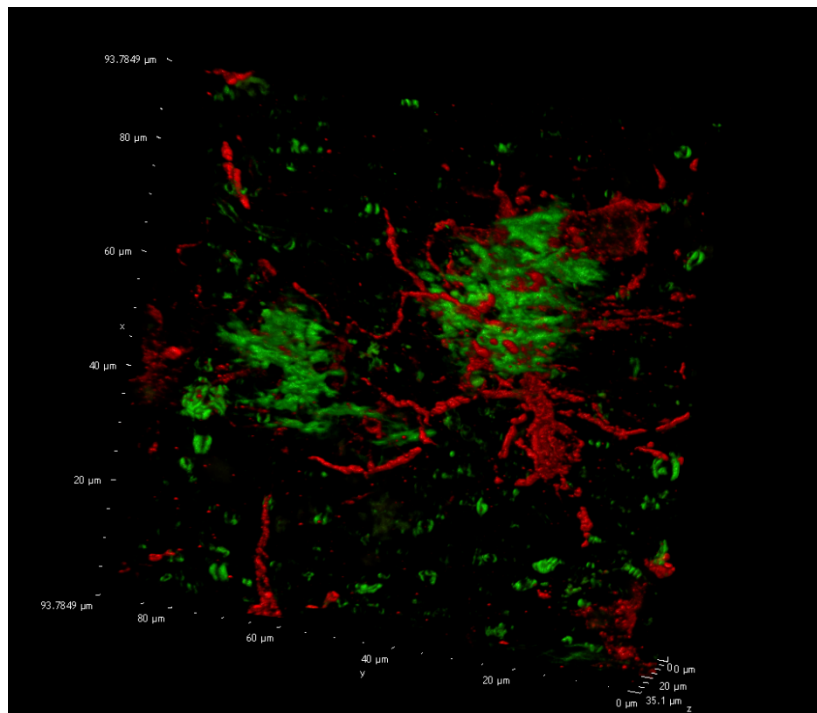
Ph.D. Program in Experimental Pathology

Department of Pathology and Laboratory Medicine

Academic Year

September 19, 2022 to June 9, 2023

[1.] Image of microglial cells (red) wrapped around beta-amyloid plaques (green) from the brain of a person with Down syndrome and Alzheimer disease (courtesy of E. Head).

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Foreword

This brief handbook is designed for graduate students who are performing their Ph.D. thesis research in Experimental Pathology. Typically, these students enter Experimental Pathology via the Cellular and Molecular Biosciences (CMB) gateway program or the Interdepartmental Neurosciences Program (INP). This includes students performing research in the laboratories of Experimental Pathology faculty who hold primary appointments in other departments (so-called joint appointees). The home department for this Ph.D. program is the Department of Pathology and Laboratory Medicine. "Direct admission" to the program is also an option and usually reserved for students who have selected a mentor/advisor who will provide full financial support (for details see "General Information" below or see "Contact Us" below)... This handbook is intended to provide you with practical information to guide your research and academic endeavors. Our goal is to make the graduate program one that will enhance your UCI research experience in a way that will have a long-term, positive impact on your scientific careers. For those of you just joining the Department, welcome and we wish you a rewarding scientific experience with us!

Contact Us

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General Information – Pathology & Lab Medicine

If your PI has a primary appointment in Pathology and has organized a direct admission to the Experimental Pathology Program, you will have completed the steps of Direct Admission with your PI. These consist of completing the application and directions found at: https://grad.uci.edu/admissions/applying-to-uci/index.php. The application packet (consisting of the completed application form, three letters of recommendation, transcripts, a personal statement, and a research statement (a GRE score is not required)). The Experimental Pathology Program will vet the application via a committee of faculty formed by senior advisors of the Experimental Pathology Program.

Upon admission, please stop by D440, Med Sci I, the main Pathology and Laboratory Medicine business office on campus and introduce yourself. If your PI has a primary appointment in the Department of Pathology and Laboratory Medicine, then you will need to sign out keys to the outside building door, to the administrative office, and to the laboratory in which you are working. The Pathology Graduate Program office is in room D440 in the Medical Sciences building in the medical sciences area on the western side of the SOM campus where you will find Stefani Ching, the graduate student Coordinator. If your PI's office and lab are in the Medical Sciences building, room D446 is where your posted mail will be delivered. Your name will be added to your PI's mailbox. Ms. Ching will advise about keys. If you PI's office and lab are in a different building, then you will need to check with your PI for mail delivery in that building. The office key will open the departmental office door to allow for the after-hours use of the copier machine located in D446 and the fax machine located in D440. You are responsible for making sure the copier is off, the lights are off, and the office doors are closed and locked before leaving. The staff computers, desks, and equipment in the individual cubicles are not to be disturbed. If you are waiting for a fax, you should check the fax machine in the main office or your mailbox. If you need access to communal equipment of the Department, inquire whether additional keys are required. The Medical Sciences buildings are automatically locked from 6:00 p.m. to 6:00 a.m., so your building key will need to be with you if you require access to the building during these locked hours. If you are a student in the lab of a joint appointed faculty member, then you will need to contact your PI's home department for keys to their building and your PI's lab space. Your UCInet ID will allow you access to the California Digital Library, and with it, you will have online access to the majority of scientific journals you will need.

Please feel free to ask any office staff to show you how to use the equipment. Key office staff and their principal duties are:

Stefani Ching, Grad. Student Coordinator, Pathology Financial Support issues	shching@uci.edu	Ext. 4-5367
Rick Koser, HR contact, Purchase Orders	rkoser@uci.edu	Ext. 4-2661
Theresa Tran, Purchase Orders, Reimbursements	theret4@uci.edu	Ext. 4-5827

The basic rules are to respect the equipment and belongings of each laboratory and the office, not to use other laboratories' computers without asking permission from the faculty members, not to borrow anything without asking, and to clean and lock up after oneself. If there is a facilities problem such as a flood, it should be reported to Facilities Management, ext. 4-5444. The police emergency number (911) or UCI Police at ext. 4-5223 or (949) 824-5223 can also be dialed for assistance.

Parking and Transportation Services provides an escort service from 6:00 a.m. to 1:00 a.m. from one place to another on campus. After 1:00 a.m., the UCI Police will then provide the escort service. The number is ext. 4-7233. While crime on campus is low, the escort service should be used if you are leaving your laboratory late at night.

General Information – School of Medicine (SOM), PhD Program

The Experimental Pathology PhD Program is part of the School of Medicine PhD Programs. The Associate Dean in charge of the SOM programs is Klemens Hertel, and the program director is Leora Fellus (lfellus@uci.edu), Medical Education Bldg., room 3111. Leora is your point person for any issues related to the SOM PhD program.

Stipends, Insurance, Travel Support, Loans

As a full-time doctoral student, you will receive a monthly stipend, and your tuition/fees will be paid. The stipend is set by the CMB and INP gateway programs and is the same for all graduate students in departments participating in the CMB and INP gateway programs. The Student Health Insurance Plan (SHIP) is a comprehensive healthcare package available for graduate students (GSHIP). In addition to GSHIP, UCI offers various health and wellness programs. For more information, go to: https://shc.uci.edu/insurance

Departmental Support Program. For students in the Experimental Pathology Program by joint-appointed faculty, your PI/mentor may be eligible for partial support from the Department of Pathology and Laboratory Medicine for work done in the 3rd, 4th, and possibly the 5th year provided milestones like advancement to candidacy in the 3rd year are met. The support is $10,000 per year provided to the PI/mentor at the beginning of each qualifying year in order to defray expenses of your PI/mentor on your behalf. This support is recouped from the SOM Medicine Biomedical Education Assistance Program (BEAP).

Support for travel to conferences is available. Currently, $250/year per student is available to attend a relevant scientific conference. Students must have submitted an abstract and be scheduled for a poster or oral presentation to be eligible for the award. If you meet these criteria, submit a request to the SOM Graduate Studies director (Leora Fellus – lfellus@uci.edu) or Associate Dean Hertel (khertel@uci.edu).

Emergency loans are available through Financial Aid. The phone number for the Office of Financial Aid and Scholarship is (949) 824-6261. The maximum amount for a short period of time without interest is $100.00.

On-Campus Housing

UC Irvine offers guaranteed on-campus housing to all new doctoral students who are admitted before the housing application deadline, May 1, 2021, for Fall 2021 entry. Starting Fall 2018, eligibility for housing extends for a minimum of three years, with the possibility of lease renewal thereafter. For more information, go to: https://www.housing.uci.edu/grad/

Graduate & Postdoctoral Scholar Resource Center

The Graduate & Postdoctoral Scholar Resource Center (GPSCR) (https://grad.uci.edu/services/gpsrc/index.php) exists to enrich the experiences of the UCI graduate and postdoc community by providing coordinated services, events, programs, information, and support. This includes workshops and tutorials on a wide variety of topics related to personal and professional development (e.g., scientific writing). The GPSRC also serves as a meeting place for students to relax, interact, plan events, share ideas, and network. The GPSRC is located on the third floor of the Gateway Study Center - in between the Langson Library and the Cross-Cultural Center, directly across from Aldrich Hall. The main entrance is located at the rear of the building (facing Aldrich Park). Hours of operation: 9:00 a.m. to 5:00 p.m., Monday through Friday. Phone: (949) 824-3849. E-mail: gpsrc@uci.edu.

UC Irvine GPS-STEM

GPS-STEM is a career and professional development program for PhD students and Postdoctoral fellows in STEM. For more information see https://gps.bio.uci.edu/.

Fellowship and Training Grant Information

Although applying for graduate fellowships is not formally required, you are highly encouraged to do so. Fellowship/grant writing is particularly valuable for focusing your ideas and research, and if successful, for providing financial support and building your resume/curriculum vita (CV). Information on several federal and private fellowships available to graduate students can be found via the Grad Division website at the following link: https://www.grad.uci.edu/funding/index.php. The School of Medicine offers a variety of Fellowships summarized at: https://www.som.uci.edu/graduate-studies/student-support/student-support.asp Your PI/mentor may also know of private foundations that offer graduate fellowships in your research area.

Your PI/mentor may also have access to training grants, which can provide stipend and tuition/fee support. Because access to such training grants is very PI-specific, you should inquire with your PI about these. Be aware that most fellowships and training grants (but not all) require US citizenship or permanent residency (i.e., a green card). A current listing of training grant support can be found at: https://grad.uci.edu/funding/training-grants.php.

Direct Admission for Departments – School of Medicine Basic Science Programs (as of July 1, 2021).

Faculty may directly admit a student according to the university admission policies. The department PI/mentor is fully and solely responsible for the student's tuition, fees, and stipend (at the SOM rate of pay) for the duration of their studies.

Applicants must submit all materials required by UCI, which include the application form (https://grad.uci.edu/admissions/index.php), original transcripts, 3 letters of recommendation, personal and research statements, and a non-refundable application fee. GRE scores are not required. International students have added requirements. For further information see "Contact Us", above.

Registration and Enrollment

Each quarter you will need to register for classes with a minimum of 12 units for full-time study. Registration is through WebReg (https://webreg1.reg.uci.edu/cgi-bin/wramia?page=login?call=0014).

You are responsible for enrolling in the required courses/units prior to the deadline each quarter (see **Graduate Courses**, below). You must sign up for Path 200, 203, 204, and 227 every quarter (see below for further description of these courses). If you do not register on time, you:

- will have to pay late fees,
- will not meet the IRS FICA exemption and thus will be subject to federal deductions from your paycheck,
- must use the online Add/Drop/Change procedure for late registration, including justification for registering late.

IMPORTANT: You must enroll in classes and pay any late fees by the end of the 3rd week of the quarter; otherwise, you will lose your student status and will need to reapply to the program! For US citizens and permanent residents who are non-residents of California during the first year, you should become legal California residents by the beginning of the second year. California residency will eliminate "Nonresident Supplement Tuition" of $5,034 per quarter for Academic Year 2021-22 (https://www.reg.uci.edu/fees/2021-2022/graduate.html).

A petition for Resident Classification must be submitted by the deadline prior to the quarter for which you will be enrolling. For more information regarding California residency, see the Office of the Registrar's Residency website: http://www.reg.uci.edu/navigation/residency.html.

For foreign or international students, non-resident tuition is waived for a period of nine academic quarters (3 years) and reduced to the California resident rate AFTER advancement to candidacy. This reduction in student expenses is substantial. Therefore,

advancement to candidacy is recommended by the end of the third year, if not earlier, and completion of the dissertation within nine academic quarters. Fees increase back to non-resident levels after the nine academic quarters (so-called "doc2A" status). For more on the "Doc2A" status and international student requirements see https://grad.uci.edu/forms/academics/Graduate-Policies-and-Procedures.pdf

When your address or phone number changes, please notify both the Registrar's Office and Stefani Ching in the Pathology Graduate Program Office.

Graduate Courses

Every student should enroll every quarter in:

Path 200 A, B, C - credit for laboratory research (Graded, based on performance). 1-12 units.

Path 203 A, B, C - credit for organized group study based on readings, discussions, presentations given within each lab group (S/U), 1 unit.

Path 204 A, B, C - credit for attending the departmental Seminar series given by graduate students (Research in Progress, RIP talks), postdoctoral fellows, faculty, and invited speakers. For invited speakers, all students should attend Q & A sessions, usually after the speaker's presentation (Graded, based on attendance including the Q & A session) (organized by E. Head).1 unit

Path 227 - Journal Club, offered every fall, winter and spring terms (organizer, D. Mercola). 1 unit.

Every student is also required to enroll one time:

Path 225/M&MG 225 - Molecular Mechanisms of Human Disease (Graded, based on performance). *The class curriculum is currently being updated and is expected to be available in 2024*. This class will be offered Spring Quarter of even numbered years, so students should plan accordingly (Path. organizer, D. Mercola).

You must enroll in a minimum of 12 units per quarter for full-time study.

At the end of the first year, you will have completed all the course requirements of either the Cellular & Molecular Biosciences (CMB) Program or the Interdepartmental Neuroscience Program (INP). For students who have entered as a direct admission, a discussion with your PI/mentor is advised as following the coursework from either CMB or INP will provide you with a strong foundation. From your second through fourth year, you are required to take at least one didactic course per year. A partial list of approved elective courses is in the preceding section. If you and/or your advisor identify a course not on this list, please get approval from the graduate advisor (Elizabeth Head, Edwin Monuki or Dan Mercola).

Partial List of Approved Elective Courses

Path 221/M&MG 221	Immunopathogenic Mechanisms of Disease (organizers, D. Mercola and M. McClelland, M&MG, spring term, odd years only), 3 units
Path 240:	Neuropathology (organizer, D. Mercola), 3 units.
BIOCHEM 215/DEV BIO 207:	Mouse Developmental Genetics, 4 units.
DEV BIO 203B:	Developmental and Cell Biology, Graduate tutorial, 4 units.
DEV BIO 231B:	Cell Biology, 4 units.
DEV BIO 245:	Stem Cell Biology, 5 units.
MOL BIO 205:	Molecular Virology, 4 units.
MOL BIO 217A:	Principles of Cancer Biology I
MOL BIO 217B:	Principles of Cancer Biology II
MOL BIO 218:	Clinical Cancer, 3 units.
MOL BIO 399/DC 399:	University Teaching, 4 units.
M&MB 206	Regulation of Gene Expression, 4 units.
M&MG 215:	Integrative Immunology, 4 units.
M&MG 222:	Molecular Pathogenesis of Microbial Infections, 4 units.
NEUROBIO 206:	Molecular Neurosciences, 5 units.

Teaching Assistantships

Students in the Experimental Pathology Graduate Program are no longer required to be Teaching Assistants (TAs). A TAship is not required; however, you have the option of being a TA, if you and your advisor so chooses. This can be a valuable component of your doctoral training, as many of you will go on to careers that involve teaching. Be aware that if you are interested in "TAing", you must take TA training beforehand, which is currently offered in the Fall only. Please plan accordingly. The SOM PhD program office will inquire every summer about students interested in TAing. See also, Division of Teaching Excellence and Innovation (DTEI), AIRB 3000, University of California, Irvine, Phone: 949.824.3594, Email: dtei@uci.edu. In addition, a list of current openings for Teaching Assistants in various departments is circulated to all graduate students annually by SOM Graduate Studies (contact Leora Fellus, lfellus@uci.edu, for further information),

If English is not your first language, you must demonstrate proficiency in spoken English before you can be appointed a TA. For this purpose, you must take and pass the Test of Spoken English (TSE) or the TOEP (https://grad.uci.edu/admissions/applying-to-uci/english-proficiency.php) Exceptions to this requirement will not be granted. A minimum score of 50 is required for a TA appointment. The TSE is given six times per year at TOEFL test centers. *Once you have been appointed as a TA, you should enroll in either Mol Bio 399 or Dev Bio 399 - "University Teaching".*

More intensive training experiences in teaching are also available. If interested and acceptable to your PI, please contact the SOM Grad Studies (Leora Fellus) for additional information about these programs.

Pathology Seminar Series

The Department of Pathology and Laboratory Medicine sponsors an Experimental Pathology Research Conferences Series, course "**Path 204**", which is given principally by faculty (both UCI and non-UCI invited speakers). They are also given by graduate students and postdoctoral fellows, termed Research in Progress (RIP) talks. Currently, these occur on the 4th Monday of every month from 11:00 a.m. to 12:00 p.m. in fall, winter, and spring quarters. Presentations are currently held in-person and via Zoom. Stefani Ching is the Zoom host and will provide the Zoom link. In addition, for most invited speakers participate in a follow-on in-person meeting with the graduate students for a Q & A session. In-person seminars are in the Thorp Conference Center, Gross Hall, 4th floor. For most invited faculty speakers, an itinerary is prepared that includes a one-hour session with the graduate students immediately after the seminar. <u>Student attendance at this seminar series including the Q & A sessions with the speaker is mandatory. It is recommended that students have at least two questions prepared for the Q & A sessions with the invited faculty speakers</u> (Note: grading for this course is based on attendance). In the case of in-person seminars, students should document their attendance on provided sign-in sheets. Stefani Ching will record presence in virtual seminars. Graduate students may recommend faculty speakers for invitation (see below) for this series.

For each invited speaker, a graduate student will serve as a **host** (determined by a Rota to be provided or the host will be the student who recommended the speaker, below). For Zoom sessions, the host will provide a brief introduction of the speaker and solicit questions at the end of the presentation (the C.V. of speakers can be obtained from Stefani Ching). The host should confirm with the speaker that they agree to a meeting with the Experimental Pathology graduate students which is usually scheduled for the hour after the conclusion of the invited speaker's presentation. The host should contact the speaker in advance and determine if there are UCI faculty that the speaker would like to meet or talk with and form an Itinerary of the times of the Zoom meeting(s). Other UCI faculty with similar scientific interests as the invited speaker should be contacted, and if any request time with the invited speaker, a mutual time organized on the speaker's itinerary. UCI faculty with similar interests to the invited speakers may be identified by literature searches (contact Dan Mercola for quick searching).

In the case of in-person speakers, they are escorted to each UCI faculty member's office for the meetings. The host need not be present at itinerary appointments (however as noted graduate student attendance of the post-presentation student Q & A session with the speaker is required. Finally, for in-person speakers the host should organize transportation using Uber/Lyft (see Stefani Ching for help with Department-provided payment) for the speaker, who is using commercial transportation, usually to and from the John Wayne/Santa Ana Airport, or their hotel (UCI provided accommodation for invited speakers that need overnight arrangements, usually at the Atrium Hotel across from the John Wayne/Santa Ana airport). Stefani Ching arranges for the hotel reservations and payments and needs to know names, titles and dates of arrival and departure. It is helpful to form a table of the itinerary and circulate it to all stakeholders. In the case of in-person invited speakers, the department will provide box lunches or a buffet and drinks for the student Q & A session in Tamkin F108, i.e., lunch with the invited speaker.

Each graduate student will be asked to provide 2-3 invited speaker names each year to Dr. Head along with several sentences about their research area and why the student would like this person to give a seminar. Speaker suggestions can include investigators in a similar area of study to that of the student (knowledge) and/or the student may have an interest in a postdoctoral training or employment opportunity with that speaker (networking). Dr. Head will invite a speaker for each graduate student. When accepted, the student who nominated the speaker will become the host for that speaker. **Appendix A** provides further instructions on the expectations for a student host.

Graduate students in the program will also present in the seminar series, course **Path 204**, RIP talks, once a year. These oral presentations are an important part of the graduate training. Second year students typically give a 30-minute RIP talk. In the third year and beyond, students will present their research as formal one-hour seminars. Following advancement to candidacy (see below), students are encouraged to coordinate their required yearly meetings with their doctoral committee in conjunction with their yearly **Path 204** RIP seminar.

Independent Development Plans (IDPs).

Students will be required to submit an IDP to the program director on an annual basis. These forms are to be filled out collaboratively with your PI to clearly establish goals for the upcoming year. An example form is attached to this handbook (**Appendix B**). Please note, the program director will use these forms to monitor your progress and aid in giving you opportunities to meet your training/independence goals. IDPs are due at the end of Fall quarter, by December 31 of each year.

Faculty/Student Research Units Work Expectation Documentation

Each quarter, the student and mentor will submit a faculty research unit work expectation document that captures a brief outline of work expected to be completed within the quarter. The signed outline will be submitted to the Graduate Coordinator (Stefani Ching). This documentation ensures progress forward in the student's research. An example form is attached in this handbook (**Appendix C**).

Advancement to Candidacy Committee and Exam

Qualifying Exams (aka the "prelims") are normally completed at the end of your first year in either the INP or CMB Interdepartmental Gateway Programs. The time and place of the oral component of this examination as well as the examiners are organized by the CMB Program Administrator, Morgan Oldham (morgano@uci.edu or (949) 824-8145), or the INP Program Administrator, Gary R. Roman (gary.roman@uci.edu or (949) 824-6226). Upon passing and with the approval from your Experimental Pathology PI/mentor, the student formally enters the Experimental Pathology Graduate Program. Financial support for student stipend and tuition/fees then shifts from the gateway program to the student's PI/mentor. In exceptional cases when a student is ineligible to sit for their qualifying exam by the end of the first year in the program, the student may enter the Experimental Pathology Graduate Program on a conditional basis. Details of these

exceptions will be worked out by the student's prospective mentor, the Experimental Pathology Graduate Advisor (Elizabeth Head), Pathology Chair (Ed Monuki), and the CMB Director (Prof. Peter Donovan), the INP Director, Prof. Christie Fowler, and the Director of the Experimental Pathology Graduate Program.

The next step in progress towards the doctoral degree is Advancement to Candidacy (aka the "advancement"). The purpose of this process is to ensure that the student has selected an appropriate topic for their dissertation and that completed and planned experimental work is scientifically rigorous and likely to be completed successfully within the "normative" period for graduate study (5 years).

The Advancement to Candidacy exam should be taken **by the end of the summer of the third year of graduate study** (i.e., by the end of the second year in the Experimental Pathology Graduate Program in most cases). Students are encouraged to advance even earlier, if ready. The advancement exam committee consists of five members – at least three from the Experimental Pathology Program (primary or joint-appointed faculty) and at least one "outside" member (i.e., NOT in Experimental Pathology). Your PI/mentor will serve as Chair of the committee. All members must be Academic Senate faculty (Professor, Professor-in-Residence, or Clinical X Professor series). Academic Senate faculty from other UC campuses may serve as outside members. Exceptions to include non-Academic Senate members (e.g., faculty in the Adjunct Professor, Visiting Professor, Clinical Professor, and Researcher series) may be granted by the Dean of the Graduate Division, Gillian R. Hayes. Larger committees are acceptable, but it is important to emphasize that the *majority* of committee members must be Experimental Pathology faculty.

The student will meet with the committee for an oral examination of their proposed thesis plans. Prior to the exam, a written research proposal modeled after an NIH grant application must be submitted to the committee members at least one week before the oral presentation. It should include an introduction, specific aims, background and significance, progress to date (preliminary data), research plan, and literature cited. The general organization of such a proposal can be found on the NIH Website: http://grants1.nih.gov/grants/funding/phs398/phs398.html. The proposal should be no more than 15 pages, excluding references and figures. A UCI Graduate Division PhD Form I, Advancement to Candidacy, is also required and organized by the student with Stefani Ching. The Graduate Division has transitioned all their forms to online DocuSign forms (https://grad.uci.edu/academics/DocuSignForms.php) which are initiated by the grad coordinator, Stefani Ching, not the student and electronically circulated to those who must approve by signing. Paper forms will not be accepted. Upon completion of the exam, the committee chair should contact the grad coordinator with the outcome of the exam and to initiate the PhD Form I for signatures.

During the exam, the student should be aware that he/she will be asked to leave the room before the presentation, and that extensive questioning and interruptions will likely occur during the presentation. Following the presentation, the committee will discuss the proposal at length with the student. The committee will then excuse the student again

from the room for discussion. Immediately after this discussion, the committee will inform the student of its recommendations.

Doctoral Committee

After successfully advancing to candidacy, you will form a Doctoral (or Dissertation) Committee. This information is required on the PhD Form I, Advancement to Candidacy, which is submitted upon completion of the exam. This committee is composed of at least three members from the Advancement to Candidacy Committee. The chair and a majority of members must be Experimental Pathology faculty (either primary or joint appointees), but unlike your advancement committee, there is no requirement to include an outside faculty member. You can also retain more than three members for the Doctoral Committee if you so choose. The committee shall meet with the student no less than once a year to evaluate the student's progress and plans for future work. To document that the student has convened a yearly committee meeting, a form obtained from Stefani Ching must be signed by all committee members. This form is included in the student's file. A convenient time to have your yearly committee meeting is at the time of your yearly seminar in the RIP talks of the Pathology seminar series (Path 204). Additional meetings may be called, as necessary, by request of the student or the advisor.

Dissertation (Thesis) Preparation and Defense

Written and oral presentations of a student's Dissertation are the criteria for receiving the Ph.D. Prior to scheduling the oral presentation (aka thesis defense), the student should communicate with the Doctoral Committee members and receive approval to schedule the defense. For additional guidance, also go to https://grad.uci.edu/academics/degree-completion/electronic-submission.php. Among useful links is the UCI Thesis and Dissertation Manual: https://etd.lib.uci.edu/. The Archives at the Main Library also has dissertation packets listing all the requirements for your thesis preparation.

The written dissertation should be given to the doctoral committee members at least two weeks before your defense. You will present your dissertation as a seminar – the oral thesis defense - followed by a question-and-answer period, and then attend a closed-door session with your doctoral committee. Make sure to organize the DocuSign PhD Form II with Stefani Ching. The completed Form II will be circulated to the committee numbers for approval by signature.

The UCs allow for modifications to the dissertation as developed by the student with the committee. Recommended modifications to the written Dissertation document may be extensive, including the possible necessity of performing additional experiments. Thus, the student should schedule ample time for revisions to the final Dissertation prior to its submission to the Library Archives. Once graduate requirements are completed, students may participate in the UCI graduation ceremony. Exceptions to this policy (i.e., attending the ceremony before completing all graduation requirements) requires prior approval. Caps and gowns may be rented in advance from the UCI Alumni Association (https://capandgown.uci.edu/).

The "normative time to degree" – i.e., the expected length of Ph.D. training – is five years. This period includes both the first year in the Gateway program and the time spent in the Experimental Pathology Graduate Program. The "maximum time to degree" is seven years. Both the mentor and the student should be vigilant regarding the maximum time to complete the degree. Any training beyond the seven-year maximum requires exceptions from Associate Dean Klemens Hertel and the Dean of the Graduate Division, Gillian R. Hayes, and are not routinely approved.

Outline of Requirements

Year 2
- Sign up for Path 200, 203, 204, and 227 every quarter
- Take at least one didactic course
- Attend seminars (Path 204)
- Attend the Journal Club (Path 227)
- Present RIP talk in Path 204
- Complete annual IDP form by December 30
- Complete quarterly Faculty/Student Research Units Work Expectation Document
- Consider applying for fellowships

[3,] New students are not expected to make presentations in the Journal Club in their first term in the program but should attend, read the assigned papers, and prepare at least 2 questions to ask the presenter. In subsequent terms all students will present an approved paper at least once per term.

Year 3
- Sign up for Path 200, 203, 204, and 227 every quarter
- Take at least one didactic course
- Attend seminars (Path 204)
- Attend the Journal Club (Path 227)
- Present research seminar in Path 204
- Complete annual IDP form by December 30
- Complete quarterly Faculty/Student Research Units Work Expectation Document
- Consider applying for fellowships
- Consider attending and presenting at a scientific meeting
- Set up Advancement to Candidacy Committee
- Take Advancement Exam (by end of 3rd year)
    - Submit proposal in NIH format (approx. 10-15 pages) at least a week in advance
    - Meet with committee members

Year 4
- Sign up for Path 200, 203, 204, and 227 every quarter
- Take at least one didactic course
- Attend seminars (Path 204)
- Attend the Journal Club (Path 227)
- Present research seminar in Path 204
- Complete annual IDP form by December 30
- Complete quarterly Faculty/Student Research Units Work Expectation Document
- Consider attending and presenting at a relevant scientific meeting
- Organize and meet with Doctoral Committee (ideally in conjunction with your Path 204 seminar)
    - o Get yearly meeting form signed
- Make postdoctoral plans

Year 5 and beyond
- Sign up for Path 200, 203, 204, and 227 every quarter
- Attend seminars (Path 204)
- Attend the Journal Club (Path 227)
- Present research seminar in Path 204
- Complete annual IDP form by December 30
- Complete quarterly Faculty/Student Research Units Work Expectation Document
- Consider attending and presenting at a relevant scientific meeting
- Meet yearly with Doctoral Committee
- Solidify postdoctoral plans
- Arrange for your thesis defense
  - Submit written dissertation at least two weeks prior to defense
  - Celebrate
- Submit your dissertation
  - Attend graduation (optional)
  - Celebrate

Current Graduate Students (as of September 2022)

Daniella Bota
 Christopher Douglas
 Javier Lepe

Dongbao Chen
 Alejandra Garcia Salmeron

Wendy Cozen
 Esther Lam

Al La Spada
 Jacob Deyell
 Nina Shajarian
 Madhy Garcia Garcia
 David Luong
 Nolan Huck

Ed Monuki
 Michael Neel
 Viky Espericueta

Donald Forthal
 Thomas Caldwell

Elizbeth Head
 Jeremy Rouanet
 Elizabeth Andrews
 Cherie Stringer
 Jiamin Yan

Christin Kenney
 Jacob Dohl

Handbook APPENDIX A.
Guidelines for Hosting an Invited Seminar Speakers – Department of Pathology & Laboratory Medicine

Here are some suggestions to help you with your first time serving as a host of an invited speaker or a refresher if you have not done this already.

- You are responsible for developing a short agenda or itinerary. In the times of COVID – it is reasonable to ask our speaker to dedicate a minimum of 1.5 to 2 hours to the virtual visit. 1 hour will be for the seminar (Stefani Ching will help arrange, she will get the speaker title and have them fill out CEU paperwork) and 1 hour for meetings. Make sure to save 30 min for a graduate student meeting. For the remaining 30 min, you will want to reach out to 1 or 2 faculty members who may be interested in a one-on-one meeting with the speaker and/or ask the speaker if there are UCI faculty that they would like to meet with. If you need guidance for this – ask Dr. Head or Dr. Monuki or Dr. Mercola.

For arranging the itinerary, be mindful that UCI faculty have densely booked calendars and it is important to contact faculty and inviting them to participate in the itinerary should be done as soon as a speaker has accepted an invitation, usually several months before the actual presentation date.

- You are responsible for an introduction to the speaker – please stay within a 5-minute period (practice is a good idea) - highlighting their research area, accomplishments, and publications. Ask Stefani Ching for a copy of the speaker's C.V.
    - Who are they, what position do they hold and where are they?
    - What is their educational background?
    - Any awards you can highlight?
    - Describe publication record (e.g., how many papers, examples of high impact journals) and mention funding (i.e., funded by the NIH, foundations etc.)
    - Why you invited them to talk
    - Read out the talk title and thank them for giving the seminar
    - Remind the audience that they can write questions in the chat or save them for the end
- When the speaker finishes, you "take the floor" again and ask attendees if they have any questions. Sometimes that may include reading submitted questions from the Zoom chat if they are there. Also – be prepared to ask the speaker a question yourself in case no one else has questions to stimulate discussion. Although our group is pretty good about asking questions.
- When the time comes, close the presentation at the top of the hour (or 5 or so minutes past), you will thank the speaker and attendees and close the seminar.

Handbook APPENDIX B.
Independent Development Plan Form

Academic Year	Year in Program	Date

Name	
Program	
NTTA (Normative Time to Advancement)	
NTTD (Normative Time to Degree)	
Advisor	
Mentor	

Instructions: The student should complete the IDP in preparation for a scheduled meeting with his/her mentor and advisor. The IDP is designed to foster communication in a variety of areas to ensure the student is receiving comprehensive feedback about both his/her progress to date and future expectations. Accomplishments, challenges, and goals should be addressed as well as any performance/progress issues so that both the student and the mentor/advisor have a clear understanding of the student's progress toward the degree.

Academic Course Planning
In order to fulfill my academic goals and maintain NTTD progress, I plan to enroll in these courses. **Annual Goals:**   **Long Term Plans:**   - **Mentor/Advisor Comments:**

Research Planning

I will make progress on my research agenda through the following: (include collaborations, research theories that you've developed, and studies/projects that you've been involved with.)

Annual Goals:

Long Term Plans:

- -
Mentor/Advisor Comments:

Conference/Publications Planning

I plan to attend the following conferences. The professional papers I plan to submit (include publications and submittal deadlines).

Annual Goals:

Long Term Plans:

- -
Mentor/Advisor Comments:

Career Planning

My long and short-term career goals. Skills and competencies I expect to develop and workshops I plan to attend.

Annual Goals:

Long Term Plans:

- -

Mentor/Advisor Comments:

Funding Planning

My plans for securing funding each year of my graduate program. (Include Dept. Funding, External Grants/Fellowships and Summer Internships)

Annual Goals:

Long Term Plans (including funding for dissertations and research projects):

- -

Mentor/Advisor Comments:

Health and Wellness Planning

This section highlights the importance of maintaining work-life balance to increase wellness and decrease risk for work burnout. Examples of health and wellness activities include participating in moderate to vigorous exercise 3 times a week, meditation, time management, eating balanced meals, getting appropriate hours of sleep, and having supportive social relationships.

I will prioritize my health and wellness by regularly engaging in the following personal and/or professional activities:

Weekly:

Monthly:

- -

Mentor/Advisor Comments:

Leadership Development Planning

My leadership skills and competencies are being developed through the following (include positions held, activities and projects, civic engagement activities etc.). My professional leadership aspirations include the following activities:

Annual Goals:

Long Term Plans:

- -

Mentor/Advisor Comments:

Dissertation Progress Planning

I am aware of and am following the Department degree progress expectations through the following steps: (Include plans for committee membership, advancement deadlines and writing schedules).

Annual Goals:

Long Term Plans:

- -

Mentor/Advisor Comments:

_____   _____
Graduate Student Signature   Date

_____   _____
Mentor Signature   Date

[1.] Handbook appendices B and C are examples of Departmental forms which may vary in detail from current forms and are provided here for convenience. For UCI Graduate Division forms note that The Graduate Division has transitioned all their forms to online DocuSign forms (https://grad.uci.edu/academics/DocuSignForms.php), which are initiated by the grad coordinator, not the student, and electronically circulated to those who must approve by signing. Graduate Division will not accept paper forms.

Handbook APPENDIX C.
Faculty/Student Research Units Work Expectation Documentation

Quarter/Academic Year (units)	Year in Program	Date

Instructor Name	
Student Name	
Department/Program	
Thesis Advisor	

Instructions: Faculty must provide written expectations for all graduate research units. This may be a syllabus, or a brief outline of work expected to be completed within the quarter. Implementation of this new policy will ensure that both the faculty member and graduate student have a clear understanding of expectations of work to be completed within a given quarter. **Faculty and graduate students must hold individual meetings during the first instructional week of each quarter to discuss research work expectations. A signed outline of the work expectations must be submitted to the departmental graduate coordinator by the end of the first instructional week.**

Research Units Work Expectations
Quarterly Goals:
- -
Student Comments: