THE GRADUATE PROGRAM IN
CELLULAR AND MOLECULAR PATHOLOGY

FACULTY AND STUDENT HANDBOOK:
REQUIREMENTS AND RESPONSIBILITIES

DEPARTMENT OF PATHOLOGY, MICROBIOLOGY AND IMMUNOLOGY
VANDERBILT UNIVERSITY

Revised May 2014
CONTENTS (BE SURE PAGE NUMBERS ARE CORRECT AFTER EDIT)

I. OVERVIEW .................................................................................................................. 3

II. PROGRAM .................................................................................................................... 3
   A. First Year
      Special note concerning direct admission ................................................................. 3-4
   B. Course Requirements — Ph.D.
      Required Courses .................................................................................................... 4
      Electives in the Cellular and Molecular Pathology Graduate Program .................. 4
   C. Course Requirements — MSTP (Medical Scientist Training Program) ............... 5
   D. Selection of Thesis Advisory Committee ............................................................... 6
   E. Qualifying Examination Phase I ............................................................................. 6-7
   F. Qualifying Examination Phase II ........................................................................... 7-8
   G. Role of Thesis Advisory Committee ..................................................................... 8
   H. Thesis
      Preparation ............................................................................................................... 8-9
      Defense .................................................................................................................... 9
      Summary ................................................................................................................. 9
      Final Examination ................................................................................................... 9
      Guidelines for Examiners ....................................................................................... 10
      Final preparation and binding ................................................................................. 10-11
   I. Role of the Mentor During Phase I & II Exams and Dissertation Defense .......... 12
   J. Graduate Student Travel ....................................................................................... 12

III. TIME SCHEDULE ..................................................................................................... 13

IV. GRADUATE FACULTY ............................................................................................. 14

V. THESIS ADVISORY COMMITTEE REPORT FORM ............................................. 15

VI. FORMS LIST ........................................................................................................... 16

VII. GRADUATE SCHOOL POLICY ON PARENTAL LEAVE ................................... 17

VIII. PATHOLOGY, MICROBIOLOGY AND IMMUNOLOGY GRADUATE STUDENT TRAVEL POLICY ................................................................. 18
      Student Travel Forms ............................................................................................ 19-20

• Page 2 •
I. Overview

The graduate program in Cellular and Molecular Pathology provides training in biochemical, cell and molecular biological research to elucidate the fundamental mechanisms of human disease processes. The program emphasizes training in experimental laboratory investigation leading to the Ph.D. degree for students interested in pursuing careers in basic biomedical research and teaching. Graduate study in this area offers students the opportunity to integrate principles of molecular genetics, cell biology, biochemistry, and biophysics into research relevant to improving the quality of life through the discovery of new avenues for treatment of disease. The research interests of the faculty are diverse and include vascular biology, tumor pathology, neurobiology, infectious disease, and tissue repair and remodeling. Major areas of research in the department are vascular biology and tumor pathology.

II. Program

A. First Year

The first year of graduate study in Biomedical Sciences at Vanderbilt is under the direction of the Interdisciplinary Graduate Program (IGP). All graduate students in the Biomedical Sciences, regardless of their specific interests will be enrolled in this program for their first year of study. During this year, the students take a common curriculum that is designed to provide a solid core of knowledge in all of the disciplines of basic biomedical science. Even though the students entering this program come from diverse academic backgrounds, it is the aim of this program to prepare students to enter any department with the foundation to perform effectively in any advanced course and to complete the requirements for the Ph.D. degree. During the first year of study, students identify the laboratory in which they will pursue their thesis research through research project rotations, undertaken in each of four laboratories of their choice. At the end of the Spring semester, the students declare their choice of a department and laboratory for their thesis research.

* Special Note concerning direct admission:

Students can gain admission directly into the graduate program in Cellular & Molecular Pathology. Direct admission usually occurs when the prospective student has already identified a research laboratory and a mentor within the Department, and the mentor has agreed to provide the financial support (tuition, fees, and stipend) for the student. In most cases, students gaining direct admission will be required to take the IGP coursework during their first year. They will not be limited to 8 hours/semester as with the typical IGP student.

In the rare occurrence of a student wishing to gain direct admission into the Cellular and Molecular Pathology program without first having identified a laboratory and a mentor, the student will be required to complete three 7-week research rotations with Pathology faculty members. These rotations will be interdigitated with course work or they may be taken during the summer. No rotations may be arranged and undertaken without prior approval of the Director of Graduate Studies (DGS). In addition, when a laboratory rotation is undertaken, the student and faculty member involved should
notify the DGS in writing. This should include a brief outline of the nature of the proposed project. At
the conclusion of the rotation a brief report should be filed by the faculty member and a grade reported
to the DGS.

Direct admission to the Cellular & Molecular Pathology Program without having first identified an
advisor will occur only under very unusual circumstances.

B. Course Requirements — Ph.D.

Required: (change numbers to new system)

Pathology 8331 Seminar in Experimental Pathology
Pathology 8332 Current Topics in Experimental Pathology
M&IM 8335 Research Proposals: Preparation & Critical Review
Pathology 8351 Cellular and Molecular Basis of Disease
Pathology 8352 Cellular and Molecular Basis of Disease
Pathology 8999 Non-Candidate Research (research prior to entering into candidacy)
Pathology 9999 Research (research after entering into candidacy)

Elective courses in the Department of Pathology:

Pathology 8322 Experimental Methods in Pathology
Pathology 8335 Molecular Pathology of Extracellular Matrix
Pathology 8337 Cellular and Molecular Basis of Vascular Disease

Students must make a grade of B or better in PATH 8351 and 8325 (Cellular and Molecular
Basis of Pathology), complete at least 24 hours of didactic work, and maintain an overall B average in
didactic courses. Satisfactory (S) and unsatisfactory (U) grades are given for Pathology 8999 and
Pathology 9999. Three unsatisfactory grades will result in dismissal from the program.

Students in the Cellular and Molecular Pathology Graduate Program are expected to regularly
attend the weekly "Works in Progress" and "Journal Club" sessions. Attendance can be excused if the
student has an emergency, is attending an offsite conference or if an important seminar or meeting is
occurring on site that conflicts with attendance at "Works in Progress" or "Journal Club." It is expected
that absences will be rare during the semester. For anticipated absences, it is the student's
responsibility to obtain permission to be absent from the director(s) of "Works in Progress" or "Journal
Club" as soon as they realize a conflict exists. In the case of emergencies, the student should notify the
"Works in Progress" or "Journal Club" directors as soon as possible but no later than one week
following the absence. It is at the discretion of the "Works in Progress" or "Journal Club" directors
whether an absence is excused. The DGS and Cellular and Molecular Pathology Program Manager
should be copied on all requests for absence. Attendance is kept at "Works in Progress" or "Journal
Club" and the student's attendance record is provided to the student's Dissertation Advisory Committee
Chair prior to each meeting of the committee. The student's attendance is factored into the committee's
overall evaluation of the student's progress.
## C. Course Requirements — MSTP (Medical Scientist Training Program) Students

<table>
<thead>
<tr>
<th>PATHOLOGY</th>
<th>GS Credit Hours</th>
<th>Semester Total</th>
<th>Cumulative Total</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>MEDICAL SCHOOL</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Fall (VMS I)</strong></td>
<td></td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>• Molecular Foundations of Medicine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• MSTP Seminar (IGP 8310)</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Spring (VMS I)</strong></td>
<td></td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>• Structure, Function, and Development</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• Medical Microbiology and Immunology</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• MSTP Seminar (IGP 8310)</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Fall (VMS II)</strong></td>
<td></td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>• MSTP Seminar (IGP 8310)</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Spring (VMS II)</strong></td>
<td></td>
<td>11</td>
<td></td>
</tr>
<tr>
<td>• Disease, Diagnoses, and Therapeutics (PATH 383)</td>
<td>10</td>
<td></td>
<td></td>
</tr>
<tr>
<td>• The Brain and Behavior</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• MSTP Seminar (IGP 8310)</td>
<td>1</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Didactic Hours** 14

| **GRADUATE SCHOOL** | | | |
| **Fall** | | 7 | |
| • Seminar in Experimental Pathology (PATH 8331) | 1 | | |
| • Cellular and Molecular Basis of Disease (PATH 8352)* | 3 | | |
| • Electives** | 3 | | |
| • MSTP Seminar | | | |
| **Spring** | | 3 | |
| • Current Topics in Experimental Pathology (PATH 8332) | 1 | | |
| • Research Proposals: Preparation & Critical Review (M&IM 8335) | 2 | | |
| • Cellular and Molecular Basis of Disease (PATH 8351)* | (3)* | | |
| • Electives** | TBD | | |
| • MSTP Seminar | | | |

**Didactic Hours** 10

**Total Didactic Hours** 24

* Only 1 equivalent semester is required of either PATH 8351 or 8352

** Additional elective courses may be deemed necessary depending upon the student’s course of study and in consultation with the mentor and DGS.

Phase I qualifying examinations in Pathology are scheduled in Summer at the end of the G1 year.

Students must maintain an overall B-average in didactic courses.
D. Selection of Thesis Advisory Committee

The Thesis Advisory Committee will administer both Phase I and Phase II of the Qualifying Exam. The committee will consist of at least five faculty members, with at least three members, including the Thesis Advisor, being from the Division of Investigative Pathology (IP), Department of PMI and at least one but no more than two with Graduate Faculty Appointments from other programs/departments. The members from the IP Division may have primary or secondary appointments in PMI. In selecting members of the Thesis Advisory Committee, it should be kept in mind that this committee will provide oversight and direction for the student through the final defense. Consequently, members should be selected carefully, based on their specific areas of expertise and their expected contributions in advising the student during the dissertation research. In the first step of the selection process the student and preceptor, in consultation with the DGS, should develop a list of faculty for the committee. When the list has been approved by the preceptor and the DGS, the student should then contact the faculty to determine their willingness and availability to serve. Faculty members should not be asked to serve on the committee until the list has been approved by both the preceptor and the DGS. The Chair of the Thesis Advisory Committee should be selected by the Thesis Advisor and the student in consultation with the DGS, prior to the first committee meeting. In general, the Chair of the committee should hold a primary faculty appointment in the Department of Pathology, Microbiology and Immunology; faculty holding secondary appointments in the Department may serve as Chair only with the approval of the DGS.

After faculty members have agreed to serve on the committee, a “Request to Appoint a Thesis Committee” form should be completed and submitted to the Graduate School. The Graduate School then officially appoints the committee and notifies each member. The "Request to Appoint a Thesis Committee” form and other forms can be found on the Graduate School website (http://www.vanderbilt.edu/gradschool/form_locator/).

E. Qualifying Examination Phase I

A student must have completed at least 24 hours of didactic work prior to taking Phase I of the Qualifying Exam. Unless there are special circumstances approved by the DGS, the Phase I Qualifying Examination should be completed in the summer of the second year. This means that students should have the specific aims of their qualifying exam proposal approved by their committee no later than May 1 of their second year of graduate school (first year in the CMP program). The qualifying exam should take place no later than August 1 of that same year. Since it is difficult to schedule an exam during the summer months, the student should finalize the date of the exam as soon as possible after the specific aims have been approved. It is expected that the exam date will have been established no later than the end of May. The student should notify the Director of Graduate Studies and the Cellular and Molecular Pathology Program Manager as soon as the exam date is finalized. The Program Manager can help arrange a suitable room for the exam. Notification of the exam date and scheduling of a room for the exam should be completed no less than four weeks in advance of the exam.

The examination will be administered by the student’s Thesis Advisory Committee. The purpose of the Phase I Qualifying Examination is twofold:
a) To test the student’s ability to define a basic scientific research question, evaluate relevant 
literature, and propose critical experiments to address the question;

b) To test the student’s depth and breadth of knowledge of basic cell and molecular pathology.

For this examination, the student is required to develop a novel proposal based on the research 
she/he plans to undertake in the Thesis Advisor’s laboratory and defend the proposal before the Thesis 
Advisory Committee. The proposal should follow the Research Plan section of the NIH R01 grant 
format and be no more than 10 pages, double-spaced, with no more than 30 lines of text per page and 
type face with an average spacing of no more than 15 characters per inch. The written proposal should 
include the hypothesis to be tested, specific aims, sufficient background to provide rationale for the 
study, experimental approach and design, anticipated outcomes, possible problems, and interpretations 
of data. The proposal should be submitted to the Thesis Advisory Committee and DGS at least 10 
days prior to the date of the exam.

The examination will begin with the student presenting a brief overview of the proposal (15-20 
minutes) followed by questions from the committee. It is important that the committee ask questions 
focused on the proposal to be able to evaluate the student's ability to define a basic research question 
and propose experiments to address that question. Equally important, the committee should ask 
questions to test the student's breadth of knowledge of basic cell and molecular biology and pathology. 
While the amount of time for examination in each of these areas is not specified, it is important that 
sufficient questions are asked to determine if the student is prepared to proceed with the dissertation 
proposal and thesis research.

The examination should last no longer than two hours. During the examination, the thesis 
advisor may ask questions, but should not assist the student in answering questions. Unsatisfactory 
performance may require additional coursework or study followed by reexamination. The student is 
allowed to consult the Thesis Advisory Committee and/or Thesis Advisor for advice on how to address 
weaknesses identified in the proposal or examination, and how to improve the proposal or performance 
in the examination. The reexamination may focus on the identified weaknesses or may be 
comprehensive. A student may be dismissed from the program if performance on the re-examination is 
not deemed satisfactory by a majority vote of the Thesis Advisory Committee.

F. Qualifying Examination Phase II

For the Phase II examination the student must submit to the Committee and to the DGS a 
dissertation research proposal in the format of an NIH R01 grant proposal. (Use Arial, Helvetica, 
Palatino Linotype, or Georgia typeface, and a font size of 11 points or larger with 0.5 inch margins, no 
more than 6 lines/inch, and no more than 15 characters/inch average spacing.) The proposal should 
include a Specific Aims page and Research Strategy (Significance, Innovation, and Approach) up to a 
maximum of 13 pages. The Phase II proposal could be an extension or refinement of work proposed in 
Phase I or could be based on a new research direction as decided by the student and her/his mentor. 
The student in consultation with the committee will set a date and will notify the DGS who in turn 
notifies the Associate Dean of the Graduate School. The DGS and Program Manager must be notified 
four (4) weeks prior to the date of the exam. The written proposal must be submitted to the members of 
the committee at least 10 days prior to the examination.
The format for the examination includes a 30 to 45 minute oral presentation by the student followed by a question/answer period. All questions should be related to the proposal. The Thesis Advisor may ask questions and may provide points of clarification if requested; however, the Advisor should not assist the student in answering questions. If the student passes the examination, they are admitted to candidacy for the Ph.D. degree. If the committee feels that certain areas of the proposal are weak or need refocusing, or if clarification concerning the research protocol is needed, the student can be asked to re-write all or part of the proposal and re-schedule another committee meeting. The committee may also specify a time period in which the students must respond to the concerns. If the student does not successfully address the concerns of the committee at the re-examination, the student will be asked to withdraw from the Ph.D. program. With the passing of this examination the student is admitted to candidacy for the Ph.D. degree. By the regulations of the Graduate School the candidate has a maximum of 4 years from the date of passing the qualifying examination to complete the Ph.D. degree. Preferably, the Phase II Qualifying Examination should be completed by the February or March that follows completion of the Phase I Examination (i.e. early in their third year) and certainly no later than May of the third year unless the Mentor, Thesis Advisory Committee and DGS all determine that a special circumstance exists.

G. Role of Thesis Advisory Committee

It is the responsibility of the Thesis Advisory Committee to assure that the requirements of the department and the Graduate School are met by the candidate for the degree. In addition to reviewing the scientific progress of the student, the committee should be generally concerned with the student’s development during the program. Students should feel free to seek help from any member of the Thesis Advisory Committee.

The Thesis Advisory Committee should meet with the student and Advisor at least every 6 months to review progress and to assist the student in planning the direction of research. The DGS should be notified of the committee meetings. Prior to these meetings the student will develop a progress report for the period of time since the last meeting. This report should be given to each committee member at least one week prior to the meeting. The Chair of the Thesis Advisory Committee will use the Student Advisory Committee report form (see p. 14) to record the results of each meeting. The report form should be signed by the student after discussion with the committee Chair. In addition, the Chair should provide a letter to the applicant detailing the results of the meeting. Copies of the letter should be sent to each member of the Thesis Advisory Committee. Copies of the report and letter also must be filed with the Program Manager and copies sent to the DGS. This procedure will help maintain open communication between student, thesis advisor, DGS, and the Committee. If a student receives two unsatisfactory reports they must schedule a meeting with the DGS to discuss the situation.

H. Thesis

Preparation

The Thesis Advisory Committee, in consultation with the student, the thesis advisor, and the DGS, will determine when the student has completed the requirements for the dissertation research and is prepared to write the thesis. Since the publication of original research is felt to be an integral part of graduate education, the student cannot defend the thesis until at least one first-authored manuscript
has been accepted for publication by a refereed journal. At the discretion of the dissertation committee, a co-first author paper is acceptable for meeting this requirement as long as the committee is convinced that the student has contributed intellectually in a substantial way to the design of experiments, analysis of data and the writing of the manuscript, in addition to performing the experiments. In deliberating whether a co-first author paper will be accepted for meeting the first authorship requirement, the committee should keep in mind that first authorship is only one of several guides they should consider in determining whether the student has completed a body of work that reflects independent scholarship signifying that the student is ready for their next step towards an independent career in science.

The student should obtain the document (http://www.vanderbilt.edu/gradschool/form_locator/) "Instructions for the Preparation of Theses and Dissertations" from the DGS. This describes the requirements for the writing of the thesis as dictated by the Graduate School. If further questions arise, the Graduate School office in Kirkland Hall should be consulted. The format for the thesis is flexible; however, the student should obtain approval for the format from the thesis advisor, the DGS, and the Graduate School prior to writing the document. A suggested format is given below:

1. **Introduction** — Background of the problem (historical or contextual) and the rationale for the approach to the problem
2. **Methods and Materials**
3. **Results** (*en bloc* or in sections)
4. **Discussion of each section**
5. **General Discussion**
6. **Appendix** — Reprints of published work, if not incorporated into the body of the thesis.

The student must notify the DGS and the Program Coordinator of the Thesis Advisory Committee membership, date, time, and location of the defense at least four (4) weeks in advance of the defense date. The student must submit a copy of the thesis to each member of the committee at least two weeks prior to the final defense and examination.

**Defense**

The Thesis Advisory Committee will examine the student and thesis. If possible, the defense should be scheduled during one of the regular departmental seminars, such as Works in Progress (WIP) or Journal Club (PATH 8331 and 8332). In some instances it might be possible to schedule a defense during Seminars in Pathology. The student should contact the program manager who will arrange to have the student added to the appropriate schedule.

The **final examination** begins with the student presenting a seminar of approximately 45 minutes in duration. This portion of the examination is open to the public. At the end of the seminar, questions from non-committee members are entertained. After those questions have been addressed, the public is dismissed, and the Thesis Advisory Committee administers the final examination. At the end of the examination, the student is asked to leave the room while the committee discusses the examination and evaluates the student's performance. The student is then informed of the results of the examination. If successful, the members of the examining committee sign the appropriate forms and, if appropriate, the first page of the thesis. It is the prerogative of the committee as to whether they sign the thesis at this time or whether they sign it when final revisions, if any, are made. The form declaring successful completion of the final examination must be signed and sent to the Graduate School.
Guidelines for reading and evaluating the thesis are the following:

1. The data presented are adequate in scope and no major questions arise concerning the design of experiments employed to collect the data.

2. Introduction, Results, Discussion are not flawed to a degree that requires drastic rewriting and/or reinterpretation.

3. The thesis is well written and the presentation is sufficiently clear to allow unambiguous understanding of the principal themes.

4. Overall, the thesis as presented is acceptable as the basis for examination of the candidate.

Final Preparation and Thesis Submission

Following the examination, the student must, with the help of the Thesis Advisor, make any necessary corrections to the thesis. It is then the responsibility of the student to submit the thesis to the Graduate School.

There are two options, electronic or hardcopy, for Thesis and Dissertation Submission. Please follow the guidelines below for your chosen method. Please note that all doctoral students must submit a curriculum vitae to the Graduate School at the time of the dissertation submission.

1. Complete an Intent to Graduate Form the semester you plan to graduate. See Graduate School Calendar for pertinent deadline dates.

2. Obtain final approval of your thesis/dissertation director and committee members of the document content


4. Schedule an appointment with one of the two format editors for final discussions and approval from the Graduate School: Liz Leis at 322-3934 (liz.leis@vanderbilt.edu) or Linda Harris at 322-3943 (linda.harris@vanderbilt.edu).

5. Following Graduate School format approval, submit final document in one of the two methods, electronic or hardcopy:

   For electronic submission:
   
   o Revise title page as shown on page 16 of the Guidelines.
   o Create an account with the Electronic Theses and Dissertation library.
   o Convert the thesis or dissertation to PDF format, name file with your last name, and upload it on the ETD website.
   o Submit one copy of the title page with original signatures and one copy of the abstract with original signatures. Plain white copy paper is accepted.

   For hardcopy submission:

   o Print two (2) sets of the entire thesis or dissertation with original faculty signatures, and one (1) abstract, on 8½ X 11 inch, white, acid-free, quality bond paper of at least 20-lb. weight and not less than 25% cotton.
Print one (1) abstract with original signature of advisor(s) on the same bond paper.

6. Submit all other required documents, forms, and fees, to the Graduate School by the deadline indicated on the Intent form. Refer to Checklist on page 10 of the Guidelines at the following link: https://vanderbilt.edu/gradschool/form_locator/thesis_and_dissertation_submission/thesis_guide.pdf. The Pathology, Microbiology, and Immunology department will pay the 65.00 traditional publishing fee if you submit electronically.

Authors determine the access to their work when creating their ETD account. Choices are listed below. The availability can be changed at a later time by the author or by a graduate school staff member, with permission from the author.

**Availability**

My advisory committee and I agree that the above mentioned document be placed in the ETD archive with the following status:

(choose one)

- No availability currently selected.
- Release immediately for access worldwide.
- Restrict to campus access only. Will be released in two years from approval date unless the Graduate School authorizes an extension.
- Restrict to campus access only. Will be released in one year from approval date unless the Graduate School authorizes an extension.
- Restrict to campus access only. Will be released in six months from approval date unless the Graduate School authorizes an extension.
- Withhold all access for patent and/or proprietary purposes. Will be released in two years from approval date unless the Graduate School authorizes an extension.
- Withhold all access for patent and/or proprietary purposes. Will be released in one year from approval date unless the Graduate School authorizes an extension.
- Withhold all access for patent and/or proprietary purposes. Will be released in six months from approval date unless the Graduate School authorizes an extension.

**PLEASE NOTE:** Restricted or withheld works WILL be released for worldwide access based upon your selection above UNLESS you contact the Graduate School PRIOR TO THAT DATE to request an extension and provide details to support your request.
I. Role of the Mentor During Phase I Exam, Phase II Exam, Dissertation Defense

Mentors provide a unique perspective on the student and their research. Their participation in committee meetings is crucial. However, in the Phase I and Phase II examinations as well as at the final examination, the student must perform unaided and unhindered. Consequently, mentors are not allowed to participate in the examinations nor in the subsequent deliberations concerning the student’s performance, unless directly called upon by the committee chair to provide clarification or advice.

J. Graduate Student Travel

The Department of Pathology encourages graduate students to participate in regional and national meetings, realizing that this represents an important facet of graduate education. In those situations where other funds are not available for travel, the Graduate Program may provide limited funds. Priority will be given to students who are presenting a paper or a poster, as well as those who have not previously received funding from the Program. Please note, however, that consideration may also be given to students desiring to attend workshops or short courses. It is imperative that requests for travel funds be made to the DGS, and include the meeting, location, estimated costs (travel, housing, meals, and registration) and justification for attending. However, the student should first apply to the Graduate School for funding. No departmental funds will be allocated without the student first applying to the Graduate School. Student travel requests are coordinated through Candice Stevens, PMI Administrative Officer, C-3314 MCN. Detailed instructions for travel requests are provided in Section VIII.
III. **Suggested Time Schedule for Graduate Training Update Numbers**

<table>
<thead>
<tr>
<th></th>
<th>Year 01</th>
<th>Year 02</th>
<th>Year 03</th>
<th>Year 04-?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>F</td>
<td>S</td>
<td>S</td>
<td>F</td>
</tr>
<tr>
<td>IGP Core Curriculum</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lab Rotations</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>‡ Path 8331 / Seminar Exp. Path.</td>
<td></td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>‡ Path 8332 / Current Topics</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Path 8351 A8352 / Cellular and Molecular Basis of Disease</td>
<td></td>
<td></td>
<td>B</td>
<td>A</td>
</tr>
<tr>
<td>Electives</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Selection of Thesis Advisor</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Selection of Thesis Advisory Committee</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Qualifying Exam Phase I</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Qualifying Exam Phase II</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Path 8999/ Non-Candidate Research</td>
<td></td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Path 9999/ Research</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

‡ Students take PATH 8331 & 8332 for credit one time, but they must participate in the courses as long as they are in residence in the program.
### IV. GRADUATE FACULTY

<table>
<thead>
<tr>
<th>Name</th>
<th>Room</th>
<th>Phone No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Abel, Ty, M.D., Ph.D.</td>
<td>U-2216A MCN</td>
<td>2-9451</td>
</tr>
<tr>
<td>Atkinson, James B., M.D., Ph.D.</td>
<td>C-3320 MCN</td>
<td>3-9576</td>
</tr>
<tr>
<td>Bock, Paul E., Ph.D.</td>
<td>1205A- Stallworth</td>
<td>3-9863</td>
</tr>
<tr>
<td>Boyd, Kelli, Ph.D., D.V.M.</td>
<td>AA-6220 MCN</td>
<td>2-3596</td>
</tr>
<tr>
<td>Burk, Raymond F., M.D.</td>
<td>1075J MRB IV</td>
<td>2-6768</td>
</tr>
<tr>
<td>Justin Cates, M.D., Ph.D.</td>
<td>C-2310C</td>
<td>6-6694</td>
</tr>
<tr>
<td>Davidson, Jeffrey M., Ph.D.</td>
<td>F-527 Acre Bldg.</td>
<td>873-7087</td>
</tr>
<tr>
<td>Eischen, Christine, Ph.D.</td>
<td>CC-2210 MCN</td>
<td>3-2303</td>
</tr>
<tr>
<td>Fogo, Agnes B., M.D.</td>
<td>C-3310 MCN</td>
<td>2-3114</td>
</tr>
<tr>
<td>Gailani, David, M.D.</td>
<td>538 PRB</td>
<td>6-1505</td>
</tr>
<tr>
<td>Jennifer Giltnane, M.D., Ph.D.</td>
<td>649 PRB</td>
<td>5-1004</td>
</tr>
<tr>
<td>Head, David R., M.D.</td>
<td>4800B TVC</td>
<td>3-9049</td>
</tr>
<tr>
<td>Hoover, Richard L., Ph.D.</td>
<td>CC-2213 MCN</td>
<td>3-8845</td>
</tr>
<tr>
<td>Hudson, Billy G., Ph.D.</td>
<td>B-3102 MCN</td>
<td>2-7298</td>
</tr>
<tr>
<td>Jerome, Walter G. (Jay), Ph.D.</td>
<td>U-2206 MCN</td>
<td>2-5530</td>
</tr>
<tr>
<td>Kim, Annette, M.D., Ph.D.</td>
<td>4603A TVC</td>
<td>3-7745</td>
</tr>
<tr>
<td>Deborah Lannigan, Ph.D.</td>
<td>712 B PRB</td>
<td>2-5460</td>
</tr>
<tr>
<td>Major, Amy, Ph.D.</td>
<td>383 PRB</td>
<td>6-1816</td>
</tr>
<tr>
<td>McDonald, Oliver, M.D., Ph.D.</td>
<td>CC-2201A</td>
<td>3-1101</td>
</tr>
<tr>
<td>Mitchell, William M., M.D., Ph.D.</td>
<td>U-3302 MCN</td>
<td>2-3238</td>
</tr>
<tr>
<td>Mosse, Claudio, M.D., Ph.D.</td>
<td>A-19 Acre Bldg.</td>
<td>873-6976</td>
</tr>
<tr>
<td>Opalenik, Susan, Ph.D.</td>
<td>A-2313A MCN</td>
<td>3-1931</td>
</tr>
<tr>
<td>Osteen, Kevin G., Ph.D.</td>
<td>B-1100 MCN</td>
<td>2-4196</td>
</tr>
<tr>
<td>Sanders, Melinda E., M.D.</td>
<td>4918A TVC</td>
<td>2-1410</td>
</tr>
<tr>
<td>Santoro, Samuel A., M.D., Ph.D.</td>
<td>C-3322 MCN</td>
<td>2-3234</td>
</tr>
<tr>
<td>Schoenecker, Jonathan, Ph.D.</td>
<td>4202 DOT</td>
<td>3-5875</td>
</tr>
<tr>
<td>Seegmiller, Adam, M.D., Ph.D.</td>
<td>4918B TVC</td>
<td>2-0858</td>
</tr>
<tr>
<td>Sephle, Gregg C., Ph.D.</td>
<td>F-318 Acre Bldg.</td>
<td>873-7524</td>
</tr>
<tr>
<td>Shepherd, Virginia L., Ph.D.</td>
<td>F-423 Acre Bldg.</td>
<td>873-7098</td>
</tr>
<tr>
<td>Stricker, Thomas, M.D., Ph.D.</td>
<td>CC-3309 MCN</td>
<td>3-4008</td>
</tr>
<tr>
<td>Swift, Larry L., Ph.D.</td>
<td>CC-3327 MCN</td>
<td>3-2646</td>
</tr>
<tr>
<td>Valentine, William M., D.V.M., Ph.D.</td>
<td>CC-3303 MCN</td>
<td>3-5836</td>
</tr>
<tr>
<td>Verhamme, Ingrid M., Ph.D.</td>
<td>T-2309 MCN</td>
<td>3-6563</td>
</tr>
<tr>
<td>Wallace, Jeanne, D.V.M.</td>
<td>AA-6224 MCN</td>
<td>2-6852</td>
</tr>
<tr>
<td>Ware, Lorraine B., M.D.</td>
<td>B-1321 MCN</td>
<td>2-3412</td>
</tr>
<tr>
<td>Weaver, Alissa M., M.D., Ph.D.</td>
<td>748 PRB</td>
<td>6-3529</td>
</tr>
<tr>
<td>Woodworth, Alison, Ph.D.</td>
<td>4918EA TVC</td>
<td>2-0905</td>
</tr>
<tr>
<td>Young, Pampee, M.D., Ph.D.</td>
<td>C-2217 MCN</td>
<td>6-1098</td>
</tr>
<tr>
<td>Zijlstra, Andries, Ph.D.</td>
<td>C-2104A MCN</td>
<td>2-3295</td>
</tr>
<tr>
<td>Zutter, Mary, M.D.</td>
<td>T-3218B MCN</td>
<td>3-1095</td>
</tr>
</tbody>
</table>
V. THESIS ADVISORY COMMITTEE REPORT FORM

Cellular and Molecular Pathology

Committee Evaluation

Date: ______________

Student: ______________ Advisor: ______________

COMMITTEE MEMBERS

<table>
<thead>
<tr>
<th>Committee Members</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>--</td>
</tr>
<tr>
<td></td>
<td>--</td>
</tr>
</tbody>
</table>

Verbal Communication
Written Communication
Laboratory Skills and Techniques
Attention to Detail
Ability to Organize Scientific Data
Familiarity with Research Literature
Self Reliance
Departmental Participation
Critical Thinking Skills
Progress since last meeting
Understanding of Responsible Conduct in Research

<table>
<thead>
<tr>
<th>RA</th>
<th>TN</th>
<th>G</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

RATINGS: Please use whole integers ONLY
1) Outstanding
2) Very good
3) Acceptable
4) Unsatisfactory

RCR Issues Discussed
(Check all that apply)

- Data Acquisition, Management, Sharing and Ownership
- Conflict of Interest and Commitment

The Committee finds that the overall progress is:

- Outstanding
- Very good
- Acceptable
- Unsatisfactory

Next Meeting in __ 3 months __ 6 months __ 9 months __ Other (specify)

The CMP Program strongly suggests a meeting every six (6) months, unless there is a valid reason for more or less frequent meeting. A summary of the meeting will be prepared by the Chair of the committee and distributed to the student, mentor, committee, DGS, and CMP Graduate Program Manager.

The following individuals have read and understand the comments on this form:

Committee Chair Signature: ______________

Student Signature: ______________ DGS Signature: ______________

Return Completed Form and Summary Report to the CMP Graduate Program Manager
VI. FORMS LIST

All pertinent forms (as listed below) can be accessed via the Graduate School Website’s Form Locator: http://www.vanderbilt.edu/gradschool/form_locator/

Registration Related Forms:
• Request for Graduate Credit Form
• Request for Independent Study Form

Intent to Graduate Forms:
• Intent to Graduate Form, December
• Intent to Graduate Form, May
• Intent to Graduate Form, August

Ph.D. Committee, Qualifying Exam, and Dissertation Defense forms:
• Dissertation Defense Results Form
• Dissertation Enhancement Grant Application
• Qualifying Exam Results Form
• Request to Appoint Ph.D. Committee Form
• Request to Change Ph.D. Committee Form
• Request to Schedule Dissertation Defense Form — Must be submitted to the Graduate School at least two weeks before date of defense.
• Request to Schedule Qualifying Exam Form — Must be submitted to the Graduate School at least two weeks before date of exam.

Forms for Faculty:
• Petition for Change of Grade Form (This form is only available in the office of the Graduate School Registrar at 411 Kirkland Hall.)
• Request for Change in Graduate School Curriculum Form
• Submission of Final Grade for Temporary or Missing Grade Form (This form is only available in the office of the Graduate School Registrar at 411 Kirkland Hall.)

Travel and Exchange Programs:
• Free University of Berlin Exchange Application
• Graduate Student Travel Grant Application
VII. Graduate School Policy on Parental Leave (October 2009)

**Eligibility:**

All students enrolled full-time in the Graduate School and supported by funding from either internal or external sources are covered by this policy. This includes students with funding through stipends, such as training grants or service-free fellowships, and students compensated for services, such as teaching assistants or research assistants. Students supported by external funding sources may be subject to additional rules of the granting agency regarding parental leave. Students are not employees and thus are not subject to the provisions of the Family and Medical Leave Act (FMLA).

**Period of Leave:**

Prior to and/or following childbirth or adoption of an infant, the primary caregiver (whether mother or father) will be allowed to take six weeks of parental leave. During this period, the student’s current stipend, and, if applicable, funding for health insurance and tuition, will be continued without interruption. The student’s enrollment status will be continued during this period, as well.

**Limitations:**

If both parents are Vanderbilt graduate students, only one may take parental leave. The parental leave provided by this policy may be taken during the semester in which the child is born or adopted, or during any subsequent semester that begins no later than six months after the birth or adoption.

**Advance notice and approval:**

The student must request a parental leave from her or his departmental chair, through the Director of Graduate Studies (DGS), at least three months prior to the beginning of the anticipated leave or, in the case of adoption, as soon as the adoption is confirmed. The request must be made in writing and, once approved by the department chair and DGS, forwarded to the Graduate School. Students should also make appropriate arrangements as needed with their course instructors to make up any missed coursework during the leave period.

**Documentation upon return:**

As soon as possible, the student must provide her or his DGS with (a) a copy of a birth certificate or, (b) in the case of adoption, written certification of child adoption from the adoption agency.

**Extended leave:**

Students who wish or need to take a longer period of leave, without continuation of funding, may request a leave of absence for up to one year through the established policy of the Graduate School. Graduate students who are not receiving funding through Vanderbilt should request a leave of absence for childbirth or adoption if they anticipate an interruption in progress toward their degree.

This policy is applicable to all students enrolled in the Graduate School and establishes minimum standards for parental leave for graduate students. Departments may offer greater accommodations as are warranted by the individual circumstances of the student.
VIII PATHOLOGY, MICROBIOLOGY AND IMMUNOLOGY GRADUATE STUDENT TRAVEL POLICY

PMI GRADUATE STUDENT TRAVEL PROCESS:
INITIATION, APPROVAL AND REIMBURSEMENT

To request travel authorization, students should complete the Graduate Student Travel Information Form and submit to their mentor for review and approval. Once travel has been approved by the mentor, complete the top portion of a PMI Request Travel Form and submit both forms to your travel managers, Katherine Sachs and Audrey Patrick in MCN CC3322. Your travel managers will then obtain the signature approvals from the Division Chief and Department Chair.

Once these approvals have been granted, you will receive an official notice of approval from your travel managers with instructions on how to proceed with your travel arrangements and reimbursement. No travel arrangements should be made prior to receiving this official authorization.

As soon as your travel is approved, pick-up a (Blue) Student Travel Form 60-002-658 from your travel managers, and complete the first and last pages of these forms. Please return this form to your travel managers at least two weeks prior to your travel start date. Your travel managers will secure the final signature authorization(s) needed.

If you have applied for a Travel Award from the Graduate School, please submit a copy of your approval letter to your travel managers in order to allow for appropriate reimbursement of expenses upon your return.

Please keep all original, itemized receipts for those expenses for which you will be requesting reimbursement upon your return from travel. Within ten days from your return from travel, please complete a Travel Expense Worksheet, and submit to your travel managers, along with your receipts. Receipts should be taped to single-sided, letter-sized white paper. Requests for reimbursement submitted later than ten days following return from travel will not be processed.

Reimbursable expenses include:

- **Airfare**
- **Registration Fees**
- **Hotel/Lodging**
- **Meals:** Travelers will be reimbursed for expenses for food on the basis of actual reasonable expenses incurred; meals over $25.00 require a justification; alcoholic beverages will not be reimbursed. Original, itemized receipts are required. A non-itemized credit card receipt is not acceptable.
- **Ground Transportation** including taxis, airport parking fees, and the following:
  - Travel by personal automobile is an allowable expense when it is the most economical and reasonable mode of travel under the circumstances; reimbursement will not exceed the total cost of round-trip coach airfare to and from the nearest commercial airport serving the destination.
  - Rental cars will require prior authorization and justification from the student’s mentor.
PMI Travel Request Form

Submit this request to your division chief no later than one month prior to requested travel.

Traveler Name: ____________________________________________________________

Travel Dates:                  Depart: ____________________   Return: __________________

Purpose of travel:
   Professional meeting (specify) _____________________________________________
   Justification _____________________________________________________________
   Other (provide details) ___________________________________________________

Funding source: (include cost center)
   Name of fund: _______________________________ Center # __-____-____-____ Amt: $______
   Name of fund: _______________________________ Center # __-____-____-____ Amt: $______
   Non-Vanderbilt Funding: (Be specific.) _______________________________________

Traveler: _______________________________                              Date: _________
   Signature

Reviewed:
   Approved: _______  Not Approved: ________

   Division chief: ___________________________________ Date: ___________
   Signature
   Approved: _______  Not Approved: ________

   Department Chair: _____________________________ Date: ___________
   Signature

Comments:
   ____________________________________________________________
   ____________________________________________________________
   ____________________________________________________________
GRADUATE STUDENT TRAVEL INFORMATION FORM
DEPARTMENT OF PATHOLOGY, MICROBIOLOGY AND IMMUNOLOGY

<table>
<thead>
<tr>
<th>STUDENT NAME:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>TRAVEL DATES:</td>
<td></td>
</tr>
<tr>
<td>CONFERENCE NAME:</td>
<td></td>
</tr>
<tr>
<td>CONFERENCE LOCATION:</td>
<td></td>
</tr>
</tbody>
</table>

PURPOSE FOR TRAVEL (PLEASE INCLUDE A COPY OF THE CONFERENCE SCHEDULE):

<p>| |</p>
<table>
<thead>
<tr>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
</tbody>
</table>

WILL YOU APPLY FOR A TRAVEL AWARD THROUGH THE GRADUATE SCHOOL? ______________________________


<table>
<thead>
<tr>
<th>ESTIMATED TOTAL EXPENSE:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>FUNDING SOURCE (CENTER NO.):</td>
<td>ALLOWABLE AMOUNT:</td>
</tr>
<tr>
<td>FUNDING SOURCE (CENTER NO.):</td>
<td>ALLOWABLE AMOUNT:</td>
</tr>
<tr>
<td>FUNDING SOURCE (CENTER NO.):</td>
<td>ALLOWABLE AMOUNT:</td>
</tr>
</tbody>
</table>

_________________________  ___________________________  ________________
Mentor (Print Name)        Mentor Signature           Date