University of Vermont
College of Nursing & Health Sciences

DOCTOR OF PHILOSOPHY IN INTERPROFESSIONAL HEALTH SCIENCES

&

HANDBOOK

(as of November 5, 2025)

CAUTION

This handbook is informational only. Students should always consult the Graduate Catalogue, their advisors and official University websites for current policies, schedules, protocols, and forms.

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1. INTRODUCTION

The College of Nursing and Health Sciences developed the degree program for the Doctor of Philosophy (Ph.D.) in Interprofessional Health Sciences (IHS) in response to national initiatives for restructuring health care education and encouraging research in the health care professions. The program is also based on the movement in health care toward the dynamic-systems approach of the World Health Organization's International Classification of Functioning, Disability and Health (the ICF model). This model prioritizes interprofessional research that goes beyond interdisciplinary efforts as our students learn side by side across unique but related health disciplines and our faculty address the contextual nature of health conditions as they affect body functioning, activity performance, communities, and societal participation.

The doctoral program is also aligned with The Pew Health Professions Commission reports [1-4] that documented fundamental changes in health care and challenged health professional schools to realign training and education to provide students with new competencies and skills. The recommendations of the Pew commission emphasized the importance of interdisciplinary competence in professional curricula[1] and necessity for faculty to develop advanced teaching and research skills.[3] These findings were echoed by the National Commission on Allied Health, which described current barriers to change in professional education, such as inflexible curricula and disciplinary boundaries. The commission recommended that higher educational institutions reduce compartmentalization of health professions and enhance collaboration among programs. The report also identified the limited research base in the health professions as a serious impediment to improving care and service delivery and challenged academic institutions to increase graduate education opportunities to prepare health professionals as clinical and health service researchers.[5]

The University of Vermont College of Nursing and Health Sciences designed the Ph.D. program in Interprofessional Health Sciences to consider health at three levels: 1) status of body structures and functions (molecular, cellular, and organ systems levels); 2) ability of the individual to participate in human activities and assume societal roles; and, 3) physical and social aspects of the environment that support the health of individuals and populations. This program is translational in nature as it focuses on understanding the spectrum of human functioning from the basic physiological function of cells and body systems to overall physical capability. These complex human functions and behaviors are unified by the common theme of human performance. Study of abnormal functioning and the related activity impairments and participation restrictions can lead directly to improvements in the physical, psychological, and social health of people with disabling health conditions. In addition, changes in physiological function at the molecular, cell, organ and systems level; motor control; language production and understanding; social cognition; and, participation in physical activity often coincide in persons with disabling health conditions. This interprofessional doctoral program will facilitate the generation of new knowledge by providing an academic training platform for research collaboration across the professional health disciplines represented by the College of Nursing and Health Sciences (CNHS).

There are three central principles that will guide the preparation of students in the doctoral program:

1) To prepare students as researchers and scientists, including how to contribute to evidence-based practice.
2) To prepare students to take an interdisciplinary approach to education, research, and practice.
3) To prepare students in innovative instruction and assessment, as well as to enhance inter-professional education and align it with changes in delivery of health and human services.

To ensure that our interprofessional doctoral program is accessible to non-traditional working professionals while providing a high-quality doctoral education, the program employs a hybrid educational model using a variety of distance learning technologies including traditional day, evening, and online classes as well as intensive summer sessions. This design is responsive to the changing demographics of graduate education with many potential graduate students working full or part-time in their chosen careers. Although it is preferred that students enroll in a full-time, traditional experience, the Ph.D. program in Interprofessional Health Sciences is designed to be accessible to both traditional full-time students and working professionals, including students holding faculty or clinical positions in the Northeast region.

1.1. Program Goals & Objectives

The overall goal of this graduate program is to promote interprofessional research across fields relevant to Interprofessional Health Sciences within the dynamic systems framework of the ICF model.

Specifically, we wish to educate individuals to:

- create new knowledge
- promote, communicate, and teach the content to others, and
- translate knowledge into improved interventions for promoting human health.

Students are expected to meet the following objectives:

- Demonstrate fundamental knowledge of human physiology, movement, communication, and exercise sciences
- Understand, create and undertake interprofessional, hypothesis-driven approaches to research, and promote the translation of findings to practice
- Demonstrate skills in a variety of approaches for studying human functioning, including assessment of cellular function and biomarkers of health and injury/disease, instrumented laboratory recordings of biomechanics, physiology and neurophysiology, as well as participant self-reported measures, psychophysical exams, clinical exams, and qualitative observational techniques
- Demonstrate analytical thinking and logic in evaluating their own work and that of others
- Exhibit effective performance as educators and scholars in the health professions

These goals and objectives are achieved not only by educating students in current philosophies of health and human service research and education, but also by selecting students for the program who can demonstrate professional competency in their admissions application. They are operationalized through student competencies that are taught and assessed through varied

program experiences and reviewed with the student at least annually as part of their Annual Review (see section 1.2.1).

1.2. Assessment of Student Progress

The program's assessment plan is competency based. It incorporates multiple components, including completion of products and meeting competencies as part of required courses, practicum experiences in research and teaching, comprehensive examinations, and the dissertation. Students play a role in self-evaluation as part of the annual review process and they may receive recommendations as part of that process or be dismissed from the program if their movement through the program is not fully satisfactory.

1.2.1. Annual Review

Throughout enrollment in the Ph.D. in the IHS program, students' progress and performance is reviewed at least once annually by the IHS Student Progression Committee, led by the Program Director/the student's academic advisor. The requirement for annual review is part of Graduate College policy. Progress is reviewed with respect to demonstration of program competencies and timely movement through the program through the Annual PhD Student Academic Progress Report Form (Appendix A).

The Coursework section of this form replaces the Program of Study Form which is used by the Graduate college. This section includes documentation of all required and electives courses, including grades, as well as a list of the comprehensive examinations and dates passed. The form is used along with the student's Banner record by the Graduate College at auditing to ensure the student has satisfactorily completed the courses and all other requirements for graduation. At the point of the graduation audit, it must include a record of the month and year in which each of the requirements was passed. It also must include evidence of enrollment in at least 20 dissertation credit hours, including the session in which the student expects to graduate.

Each year, students should submit updated versions of:

1. Their Annual PhD Student Academic Progress Report Form (Appendix A).
2. Their Individual Development Plan (e.g., MyIDP or similar)
3. Their CV

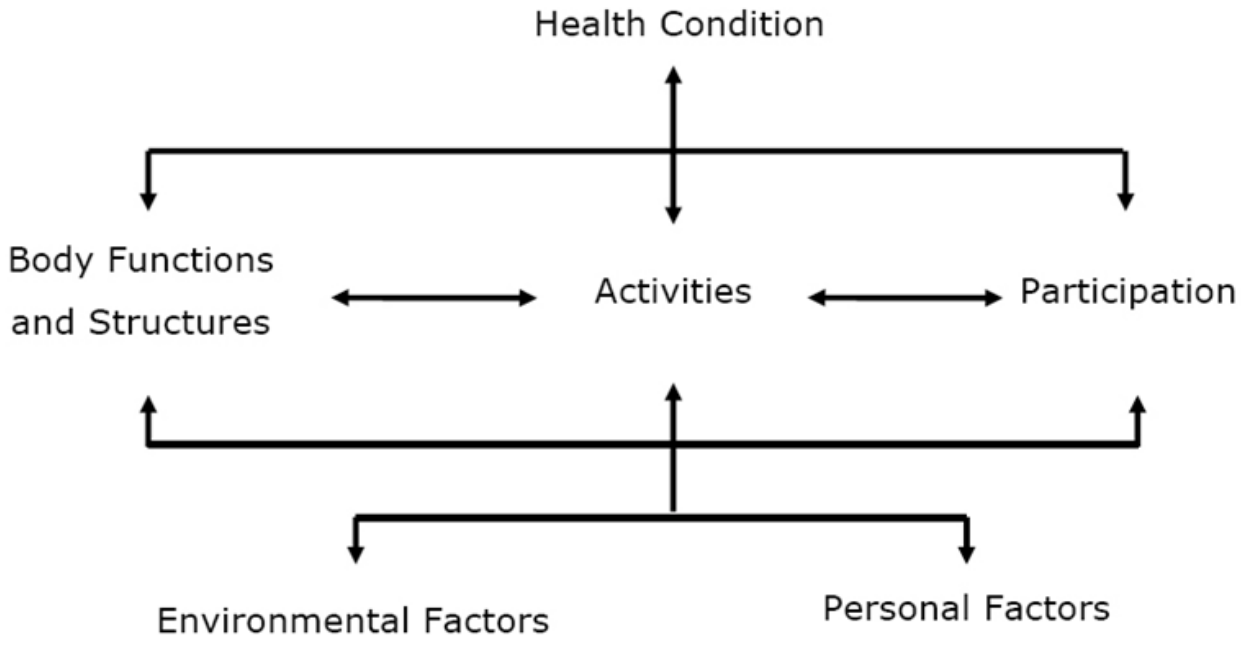
Students should send electronic copies of all documents to the Program Director by September 1 of each year and maintain copies in their files. The same annual review forms are used throughout the program so that the student and advisor know the current status of the student's progress through the program from year to year. Therefore, it is vital for each student to keep an electronic copy of the annual review forms so it will be possible to add to this form for each annual review. Forms turned in without updating will be returned to the student for revision. It is the student's responsibility to maintain this document throughout the program.

During the fall semester of each year, students will receive a program review with ratings and comments about their standing within the program. Students will also meet one-on-one with the program director to review their progress through the program and their plans for the upcoming year. Students are expected to discuss the annual review report with their advisors within 30 days of receiving it. All annual review materials are kept on file and are referenced in the next review

period, along with the newly updated annual review form, which must address the committee's previous recommendations if any reservations were expressed. When deficits are found, the review may result in a recommendation for dismissal or for "continuation with reservation". If the latter, the student is advised of corrective actions and a timeline in which these must be completed to avoid dismissal from the program.

2. PROGRAM DESIGN AND SEQUENCE

The goal of this graduate program is to promote interprofessional research across fields relevant to Interprofessional Health Sciences within the dynamic systems framework of the ICF model (see figure below).



Two Examples of Health Conditions That Could Benefit from Interprofessional Research Spanning Levels of the ICF Model

Program Foci	Levels of the ICF Model		
	Body Impairments	**Activities**	**Participation**
	Parkinson's Disease		
Communication Sciences & Disorders	Hypokinetic dysarthria	Speech / Communication	Recreation & leisure Work participation Family roles Caregiver responsibilities
Movement Science	Bradykinesia Postural instability Tremor	Lay-sit-stand transitions Irregular gait Reach & grasp	
Physical Activity Exercise Behavior	Strength Aerobic capacity Metabolic function	Walking / Running Activities of daily living	
Nursing	Ventilatory function Skin integrity Cognitive function	Self-care Learning Focusing attention	
Medical Laboratory Sciences	Molecular & cellular mechanisms underlying neurodegeneration	Quality of movement	
	Autism		
Communication Sciences & Disorders	Implicit learning Speech planning Social cognition	Speech / Communication	For Children: School interaction Recreation / Play For Adults: Family Roles
Movement Science		Irregular gait Reach & grasp	
Physical Activity Exercise Behavior	Sensory reactivity		
Nursing	Motor planning Movement concepts	Activities of daily living Motor skills	
Medical Laboratory Sciences	GI disorders Improper diet due to sensory reactivity	Activities of daily living	
	Altered cellular metabolism redox signaling, mitochondrial dysfunction leading to muscle weakness, peripheral neuropathy, GI disorders & seizures	Activities of daily living Communication Social cognition	

The curriculum focuses on the three competencies outlined above: research, interprofessional content, and teaching. The curricular approach balances the need for an interprofessional program in Interprofessional Health Sciences and the efficiency of utilizing existing resources so

as not to duplicate courses. As such, the core curriculum includes core IHS courses as well as existing courses in other programs across CNHS. Existing courses approved for graduate credit across several colleges and programs are also available to enhance training upon selecting mentors across multiple research foci. The program of study includes activities considered necessary by the National Research Council for formal education in ethics, writing, proposal writing, statistics, and teaching.

2.1. Orientation

Orientation will be held during the first week of the program (usually the week before classes begin in the fall). The purpose of orientation is to familiarize students with the goals, structure, and requirements of the program and to introduce them to core faculty. Students will also meet with the Program Director in the first semester of their program to determine transfer credits, if applicable (see section 2.8.1).

2.2. Declaring a Mentor

Students will be required to declare a mentor during the admissions process, prior to beginning the program. The mentor should be a faculty member with an appointment in CNHS who agrees to mentor them through the duration of their graduate studies. These discussions should occur between the student and the faculty member prior to the admissions process. The faculty member must also confirm with their department chair that they are able to take on a graduate student so that appropriate workload considerations can be made.

Upon enrollment in the program, the student should complete the Declaration of Mentor Form (Appendix A) and submit it to the Program Director. If the student changes mentors at any point during the program, a new form will be required.

2.3. Advising

The mentor is the student's official academic advisor for the duration of their time in the program. The Program Director may serve as each student's unofficial academic advisor to ensure all degree components are met; however, the plan of study should be made between the student and their mentor. The Program Director meets annually with the student following submission of their annual review forms (see section 1.2.1) to discuss progress.

Students are expected to check their UVM email accounts regularly and to respond in a timely fashion (e.g., within 2 business days) to advisors' attempts to reach them via their UVM email addresses. Students and mentors are welcome to create their own expectations and definitions around timely responses to communication.

2.4. Registration Status

Students must maintain at least part-time status throughout the program. Students who are actively working toward their degree completion and have completed enrollment in all credits required for the degree, but have not completed all graduation requirements, must enroll each semester for at least part-time (5 credits). Students who are fully funded on a GRA-ship must have full-time status (9 credits).

During the admissions process, all students will be required to submit a 4-year funding plan, in consultation with their mentors. This funding plan will be detailed in their acceptance letter to the program. Any change in registration status (e.g., moving from full-time to part-time, taking a leave of absence [see section 2.7], etc.) will require the funding plan be amended. Changes to registration status and the funding plan should be made in consultation with the mentor and the Program Director.

2.5. Students with Tuition Remission

UVM faculty or staff who are enrolled in the IHS program and who meet the eligibility criteria for employee tuition remission should automatically have their tuition and comprehensive fee covered for up to 15 credits per academic year. If the tuition remission is not applied to the employee's student account, it is the responsibility of the employee to contact UVM Human Resource Services (HRS) to verify their eligibility and ensure payment to their student account before the bill due date. Regular UVM employees exceeding the 15-credit eligibility limit for the academic year are financially responsible for any remaining unpaid tuition and fee charges. Other fees, such as course fees, lab fees, or software licensing fees are not covered through tuition remission benefits.

Note that faculty are only eligible for tuition remission if they are employed full-time, so should be maintaining part-time status in this program. Students may not be full-time doctoral students and working full-time at UVM during the same semester.

2.6. Time Limit

After admission, all requirements for the degree must be completed within nine years from first registration. The Graduate College, however, strongly recommends a timely completion of the degree within 5 years. This ensures students receive maximum benefit from the cohort model and engagement with other doctoral students.

2.7. Leave of Absence

The University of Vermont supports a leave of absence policy to assist graduate students who are temporarily unable to continue their programs. The leave of absence may extend consecutively for one year.

Students request a Leave of Absence from their advisor and graduate program coordinator prior to the start of classes in the semester during which the leave is being taken. Students must also submit a Leave of Absence Request with the Graduate College. The Leave of Absence does not take effect until after approval has been received from both the Graduate Program Coordinator or Chair and the Dean of the Graduate College.

Any student who does not enroll following termination of a Leave of Absence will be deactivated from the Graduate College. The leave of absence does *not* extend the time limit to degree, which is nine years for a doctoral program. Students taking a leave of absence must submit a modified funding plan for the remainder of their time in the program (see section 2.4).

2.8. Credit Requirements

As a university requirement for the doctoral degree, students must take a **minimum** of 75 credit hours from UVM, including 30 credit hours of course work and 20 credit hours of research and dissertation.

2.8.1. Transfer credits

Students may transfer/take elective courses at other accredited graduate degree granting institutions up to a **maximum** of 12 credit hours, with the permission of the IHS Student Progression Committee. Students are responsible for ensuring that official transcripts are sent from the granting institution to the Graduate College for any coursework that is part of their official programs of study prior to the graduation audit. Students must file a Transfer of Credit request through the Graduate College and should do that in their first semester.

2.9. Course Work

2.9.1. General Requirements

Students must:

- Receive pre-approval for their academic plan by the Program Director who will suggest appropriate supplementary courses to ensure the academic success of students.
- Register for and complete all the required courses by the program.
- Receive pre-approval from the Program Director for deviations from the required course sequence.
- Maintain a 3.0 grade point average (A = 4.0) in didactic course work each semester
- Have no more than two grades below a B. Receiving two or more grades below a B (3.0) could be grounds for dismissal from the UVM Graduate College.
- Have satisfactory evaluations of graduate seminar and research rotations
- Pass the qualifying examination
- Complete the dissertation research and teaching requirements of the program.
- Maintain halftime enrollment (i.e., 5 credits) in the academic year from the beginning of enrollment. If a student is funded on a GRA they must maintain full-time enrollment (i.e., 9 credits).

Students' course load and research distributions include the following:

- Interprofessional Health Sciences required core courses (this includes 32 credits of course work and 20 credits in doctoral research)
- 12 credits of electives
- 12 credits of relevant electives transferred from previous graduate work
- 12 credits of courses in research methods
- Participation in professional rotations and doctoral seminars

NOTE:

1) Up to 12 credits of appropriate graduate level electives may be transferred provided a minimum grade of B was attained and the IHS Program Director and Graduate Dean

approve the transfer.

2) Students entering without a master's or doctoral degree would initially complete 24 graduate credits in at least two areas within CNHS; 12 of these credits could count as transferred electives for the doctoral program

2.9.2. Course Policies

A grade of "incomplete" may only be granted in exceptional circumstances and at the discretion of the instructor of record. The student must have no more than 3 incomplete grades at any one time. Incomplete grades must be removed within one year. No course may be repeated more than once. Non-credit experiences (research rotations, monthly doctoral seminars) will be rated as "satisfactory" or "not satisfactory" in the annual review (see section 1.2.1).

2.9.3. Course Delivery

Required courses are typically completed during the first two years of the program. On-campus sessions for the courses taught in Summer sessions of years 1 and 2 are typically held in late May-July. The practice components for teaching and research are individually designed and will require an on-campus presence.

2.9.4. Academic Courses

Courses are described within the three competency areas—research, interprofessional content, and teaching.

2.9.4.1. Discipline-Specific Courses that Satisfy Elective Credits

Students are to select at least 12 credits from at least 2 disciplines from the courses that have been approved for graduate credit (see Graduate College Handbook and registrar's schedule of courses for current offerings) and/or transfer up to 12 graduate credits in relevant fields, for a total of 24 credits of electives. Other courses not listed may be taken with permission of the Program Director.

2.9.4.2. IHS Required Courses

- IHS 7010 (2 credits), **Topics & Measurement of Interprofessional Health Sciences**. This course facilitates interprofessional exposure to topics and methods associated with all of the program's foci, including exposure to current measurement techniques, primary literature, the current research of program faculty, and a final project proposal that emphasizes the use of interprofessional methods.
- IHS 7020 (3 credits), **Applying the ICF Model to Interprofessional Health Sciences.** This courses exposes students to the program's philosophical goals to translate science from impairment-based research to intervention research while accounting for interactions among personal characteristics and environmental factors.
- IHS 7300 (3 credits). **Seminar and Practicum in Health Professions Teaching**. This course provides students with exposure to the fundamentals of health professions teaching and learning, as well as hands-on experience in the classroom with mentorship.
- IHS 7500 (3 credits). **Professional Writing and Grantsmanship**. This course provides students with experience in scientific writing and grant writing.
- IHS 7491 (20 credits). **PhD Dissertation Research** (mentored experience).

- IHS 7XXX (variable credits: TBD). **Special Topics: Doctoral Seminar.** This is a small group student-led seminar devoted to the conduct of interprofessional scholarship.

2.9.4.3. Course Substitution

Course substitution is theoretically possible, but it must be approved by the Program Director. Even if a student has prior experience and strength in a particular area, it is part of the interdisciplinary core of the program to expect cohort members to go through the entire course sequence together. Therefore, such requests are rarely approved.

2.9.5. Example Curriculum

See Table 1 for an example outline of the curriculum.

Table 1. Curriculum Outline

Begin with 12 elective credits transferred in for those holding a graduate degree OR 24 credits taken in the program prior to starting the remainder of the curriculum for those coming in with a B.S., 12 of which would count as transferred electives.				
YEAR 1				
Area	**Course Number**	**Title**	**Semester**	**Credits**
Elective	Elective	Elective Related to Interprofessional Health Sciences	Fall	3
Research Methods	CTS 6200	Analyzing Clinical & Translational Research	Fall	3
Interprofessional Health Sciences	IHS 7010	Topics & Measurement of Interprofessional Health Sciences	Fall	2
Research Methods	CTS 6250	Multivariate Analysis of Clinical & Translational Research	Spring	3
Elective	Elective	Elective Related to Interprofessional Health Sciences	Spring	3
Professional Rotation	IHS 7XXX	TBD	Spring	2-3
Special Topics	IHS 7990	Monthly doctoral student seminar	Fall and Spring	1
Interprofessional Health Sciences	IHS 7020	Applying the ICF Model to Human Functioning & Rehabilitation (summer intensive)	Summer	3

YEAR 2				
Area	**Course Number**	**Title**	**Semester**	**Credits**
Elective	Elective	Elective Related to Interprofessional Health Sciences	Fall	3
Mixed Methods (or Qualitative Research I)	EDRM 6310 (EDRM 6110)	Mixed method research Qualitative Methods I	Spring	3
Elective	Elective	Elective Related to Interprofessional Health Sciences	Fall	3
Teaching & Learning	IHS 7300	Seminar and Practicum in Health Professions Teaching & Learning	Spring	3
Professional Rotation	IHS 7XXX	TBD	Fall and Spring	2-3
Professional Writing/Grantsmanship	IHS 7500	Professional Writing & Grantsmanship	summer	3
YEAR 3-5				
Area	**Course Number**	**Title**	**Semester**	**Credits**
Qualifying Exam (QE)	NA	1a. Grant pre-approval form approved by QE committee 1b. Proposal provided to QE cmt. approx. 2 weeks prior to oral defense 1c. oral defense passed 2. Dissertation Concept Paper (written proposal approved by IHS Doctoral committee)	Fall and Spring	TBD
Dissertation	IHS 7491	dissertation 1. Proposal defense 2. Final defense	Fall and Spring	20
Special Topics	IHS 7990	Monthly doctoral student seminar	Fall and Spring	1

NOTE: 88 total credits for students who begin the program with a B.S.

2.9.6. Concentrations in Interprofessional Health Sciences

The Ph.D. in Interprofessional Health Sciences (IHS) program includes four concentrations to increase student interest and the growing demand for translational health research scholars. The broad field of "interprofessional health sciences" is an area of excellence at UVM and the following concentrations take advantage of expertise across the College of Nursing and Health Sciences in which the IHS Ph.D. program is embedded.

2.9.6.1. Concentration in Communication Sciences & Disorders (CSD)

Our students prepare for careers as CSD scholars through a specialized curriculum emphasizing research experiences with our distinguished faculty mentors and a range of guided teaching and mentoring activities. CSD faculty engage in research focused on speech, language, and cognitive functions, on topics ranging from the nature and treatment of autism to the role of temperament in stuttering, advancing the knowledge of brain function and creating new therapies for children and adults challenged by cognitive and neurological disorders. Graduate students in this concentration may have a focus on a communication disorder such as:

- Apraxia of speech
- Autism and other developmental disabilities
- Deafness
- Fluency disorders
- Neurogenic disorders
- Speech sound disorders
- Motor speech disorders

CSD Concentration Requirements:

Students work with their academic advisor, research mentors, and committee to design and complete 3 professional rotations in the department of CSD or related field. This provides students with an opportunity to work in depth on multiple projects relevant to current CSD theories and methodologies.

2.9.6.2. Concentration in Biomedical and Health Sciences (BHSc)

Our students will prepare for careers as biomedical research scholars through a specialized curriculum emphasizing a research experiences with our faculty mentors in who lead highly active research laboratories. BHSc faculty engage in biomedical research focused on topics such as cell biology, cancer, genomics, immunology, and infectious diseases. Graduate students in this concentration may focus on topics that include, but are not limited to:

- Cancer
- Cell signaling
- Autoimmune diseases
- Infectious diseases and immunology
- Genomics
- Genetics
- Metabolism

BHSc Concentration Requirements:

Students work with their academic advisor, research mentors, and committee to design and complete professional rotations in the department of BHSc or related field. This provides students with an opportunity to work in depth on multiple projects relevant to current BHSc theories and methodologies.

2.9.6.3. Concentration in Rehabilitation and Movement Science (RMS)

Our students will prepare for careers as rehabilitation and movement science research scholars through laboratory, clinic and community-based research experiences with our faculty mentors. Graduate students in this concentration may focus on topics that include, but are not limited to:

- Biomechanics
- Motor control
- Muscle physiology
- Exercise and physical activity
- Neurophysiology and neurorehabilitation
- Movement analysis
- Physiological biomarkers
- Imaging
- Outcome measure assessment

RMS Concentration Requirements:

Students work with their research mentor(s) and committee to design and fulfill degree requirements within this concentration. Three professional rotations should take place in the department of RMS or in a RMS-approved research laboratory. This provides students with an opportunity to work in-depth on various research projects relevant to current RMS research areas.

2.9.6.4. Concentration in Integrative Health

Our students prepare for careers as Integrative Health research scholars. Integrative Health faculty use diverse methodologies across a range of clinically applied areas to examine health outcomes using an integrative approach to medicine and health. Integrative medicine and health "reaffirms the relationship between practitioner and patient, focuses on the whole person, is informed by evidence, and makes use of all appropriate therapeutic and lifestyle approaches, health care professionals and disciplines to achieve optimal health and healing." (Academic Consortium for Integrative Medicine and Health, 2019).

Students in this concentration may focus on Integrative Health topics such as:

- Traditional European Medicine (TEM)
- Yoga
- Nature Therapy / Forest Bathing
- Culinary Medicine
- Mindfulness
- Anxiety Management Strategies
- Integrative Pain management
- Integrative psychology
- Acupuncture
- Integrative Oncology
- Behavior change/ health coaching
- Integrative physical therapy/ manual therapy

Integrative Health Concentration Requirements:
Students work with their research mentors and committee to design and complete professional rotations within an approved Integrative Health research setting and educational elective requirements. This provides students with an opportunity to work in depth on multiple projects relevant to current Integrative Health theories and methodologies. UVM Integrative Health is a member of the Academic Consortium for Integrative Medicine and Health (ACIMH) and students are encouraged to take an active role in the Consortium's Research Working Group.

2.10. Doctoral Seminar

Student participation in the Doctoral Seminar is evaluated on a satisfactory/unsatisfactory basis. Satisfactory participation will include attendance at departmental, college, and/or university-wide research seminars, such as the monthly CNHS research talks. Students must document attendance in at least 6 seminars per academic year. Students are also required to present their work at one such seminar at least once per year.

2.11. Teaching Requirements

Students are required to be engaged in a variety of teaching and mentoring activities. In addition to the formal teaching requirements described below, students are also expected to help support the teaching and mentorship of undergraduates and graduate students (not those in the PhD program) in their research.

2.11.1. Teaching Seminar

In their first or second year, students will participate in a teaching and learning seminar the spring semester (IHS 7300). Students will be developing a teaching philosophy and plan as part of this course. They will also be required to teach one class session and observe a faculty teach a class, and reflect on these experiences.

2.11.2. Teaching Experience

Each student must: teach at least one course under the mentorship of a faculty member; OR serve as a teaching assistant for at least two courses; OR serve as a teaching assistant for one course and mentor or co-mentor an undergraduate thesis or research project.

When the opportunity arises, courses may be taught for pay but only after the student has fulfilled his/her GRA requirements (unless otherwise approved by the program director). Approved courses might include, but are not limited to courses identified as undergraduate, graduate, or continuing education courses that receive credit. Only students that already have a graduate degree may teach a graduate course and only at the level of their degree or below. Students may use a current course they have been teaching either at UVM or another institution but must demonstrate improvements in the course based on their learning in IHS 7300. Students who need assistance identifying a course to meet this requirement should begin working with their academic advisors at least a semester ahead of the semester they intend to teach. See Teaching and Mentoring Guidelines in Appendix A for suggestions.

2.11.3. Teaching Portfolio

As part of their evaluation of teaching competency in the program, each student will prepare a teaching portfolio, which comprises examples of the student's teaching philosophy, experience, sample syllabi and lesson plans, evaluations, and feedback. The IHS Student Progression Committee will evaluate each student's teaching portfolio. The portfolio will generally be submitted after the Qualifying Exam is completed and should include information and artifacts relevant to the teaching domains described in the rubric (see Teaching Portfolio Grading Rubric in Appendix A. The teaching portfolio must receive approval from the IHS Student Progression Committee (i.e., receive a minimum score of 24/32) and be written at a level of scholarship acceptable and suitable for submission to a prospective employer. If the student does not receive a passing grade upon first submission, the student will be provided feedback on how to improve the portfolio. In the event that additional teaching experience is deemed necessary, the student will work with the IHS Program Director to identify relevant and appropriate opportunities for additional teaching experience.

2.12. Research Requirements

In addition to course work, the Qualifying Exam, and the required professional rotations (see section 2.13), IHS Doctoral students are required to:

1) Give a poster presentation of the research at the annual CNHS Zeigler Research Forum.
    - The Zeigler presentation is evaluated by the IHS Student Progression Committee as either satisfactory or unsatisfactory (see Criteria for Assessment of Zeigler Research Presentation in Appendix A). If it is judged as satisfactory, it may then be submitted for presentation at a peer-reviewed scientific conference.
    - If the presentation is judged unsatisfactory, the student will receive (within approximately 30 days) a written description of the deficiencies and recommendations for improvements, as well as plans for scheduling a second presentation. The student may repeat the oral presentation once. If the second presentation is also assessed as unsatisfactory, the student's name will be forwarded to the IHS Student Progression Committee with a recommendation that the student be dismissed from the program.
2) Prepare and submit a formal research article based on original research to a peer-reviewed journal as first or co-first author
    - The student selects, in consultation with their project mentor, a peer-reviewed academic journal to which to submit the article. The article must be written at a level of scholarship suitable for submission to a specified peer-reviewed journal.
    - A copy of the submitted or published article should be sent to the IHS Program Director.
3) Submit and present the research to a national or international peer-reviewed conference as first or co-first author.
    - The requirement that the student present at a peer-reviewed conference is flexible (the student may present at any time *after the Zeigler presentation* and *prior to* advancing to candidacy and the topic may be different than the content presented in the paper or Zeigler presentation referenced above).

- Confirmation of acceptance of a research project for presentation at a conference should be sent to the IHS Program Director.

2.13. Research Rotations

In IHS 7010 (Topics & Measurement of Interprofessional Health Sciences), students are exposed to a variety of topics from the fields within the College of Nursing and Health Sciences. At the end of this course, students should be able to identify at least one (or more) professional rotations (2-3 credits each). Each student will indicate the rotations they wish to pursue and submit their preferences on the Research Rotation Request Form (Appendix A), along with their current CV.

Purpose

The professional rotations can be of three types: internship (clinical experience), teaching assistantship, or most commonly, the research rotation. The professional rotation experience is an integral component of the IHS PhD program. The purpose of the research rotations is manifold. One goal is to provide students with the opportunity to broaden and refine their research knowledge and skills while contributing to interdisciplinary study. Another goal is to provide students with the opportunity to develop personal and scientific connections that may result in collaborative research and/or choices of advisor or academic committee/dissertation committee members. Other important goals are for the student to: 1) develop initiative in pursuing research collaborations, and 2) develop effective time-management strategies that ensure research progress in a 'real-world' professional environment that places competing demands on the researcher's time and energy.

Procedure

Students are responsible for identifying laboratories/faculty they are interested in joining for a research rotation. To facilitate this process, the IHS Program Director will present the student with a list and brief descriptions of available research rotations. The student will then initiate contact with prospective supervising faculty to learn about the rotation and to define the expectations. The Research Rotation Interview Form (Appendix A) is used to facilitate this discussion. This step is crucial: it is important for the student to have a clear understanding of what is expected in each laboratory prior to beginning the rotation. This is intended to make both the student's and the rotation supervisor's experience more rewarding and successful. In short, the rotation interview not only provides the student with the opportunity to assess whether or not the lab is a good fit for him/her, but it is also an opportunity for the faculty mentor to assess whether the student is a good fit for the lab. Once desirable research rotations are identified, the student completes the Research Rotation Request Form (Appendix A) and submits it to the IHS Program Director.

Evaluation

At the midpoint of each research rotation, the student must complete a self-evaluation and submit it to the rotation supervisor and the IHS Program Director (see the Research Rotation Self-Evaluation Form; Appendix A), either of whom may choose to review the student's evaluation in

order to identify areas in need of improvement. At the end of the rotation, the student again completes the Self-Evaluation Form and submits it to the rotation supervisor and the IHS Program Director. The rotation supervisor reviews the student's self-evaluation with the student. The purpose of this process is to provide the student with constructive feedback to help students be successful researchers. At the end of the rotation, the rotation supervisor completes an online evaluation of the student (see Research Rotation Supervisor Evaluation Form; Appendix A). This evaluation is then shared with the student and placed in the student's file. The student's performance in each research rotation is evaluated as Satisfactory/Unsatisfactory on the basis of whether the student performs above or at (satisfactory) or below (unsatisfactory) expectations on the various dimensions assessed. Generally speaking, students who receive a rating from a rotation supervisor on the final evaluation of "below expectations" on any of the dimensions of performance are at risk for failing a rotation.

If the student does not successfully pass a rotation, additional rotations (if approved) will be required until three rotations have been successfully completed. Specific types of rotations may be mandated by the IHS Program Director in order to remediate specific areas of challenge that have been identified in prior rotations.

3. QUALIFYING EXAMINATION

The qualifying examination (QE), which serves as a comprehensive exam and the exam for advancement to candidacy for the PhD, will be undertaken after students have successfully completed three research rotations as well as all didactic course requirements with a GPA of 3.0 or better with one exception: IHS 7500 may be taken concomitantly with QE credits and activities.

The QE will include a grant proposal that is written and orally defended which must be passed successfully for the student to advance to candidacy. The grant proposal must receive pre-approval from the student's QE committee (see Qualifying Exam Pre-Approval Form, Appendix A) and be written at a level of scholarship acceptable and suitable for submission to a specified funding agency, conforming to the format and referencing style of that agency.

QE Protocol Options

IHS doctoral students are expected to develop and defend a grant proposal that is written in the context of an actual grant funding mechanism. This is important for pedagogical reasons: in practice, it is the funding mechanism that shapes the purpose, length, and specific requirements of a grant proposal. Although it is strongly encouraged, students are *not required to actually submit* their grant proposal. In summary then, students may choose one of two options for completing the grant protocol portion of the QE which involves a decision regarding whether or not they plan to submit their grant proposal for funding. The following conditions apply for each option:

QE GRANT PROTOCOL OPTIONS	*Faculty Co-investigators listed on grant*	*Minimum funding amount*
Plan to submit	Yes	No but must be IHS PD approved
No plan to submit	No	$10,000 or IHS PD approved

Requirements

1. The student must be first author or co-first author (or co-primary investigator) on the submission.
2. The student must assemble a QE committee consisting of at least three faculty members from at least two disciplines (one of which shall be named Chair of the committee and will oversee the QE process).
3. All students must submit the Qualifying Exam Pre-Approval Form (see Appendix A) to the QE Committee chair for transmission to the Committee for approval ***before*** writing the grant. The purpose of the pre-approval is to make sure the student's committee is 'on board' and that they agree that the grant is feasible and appropriate (e.g., time, scope, content area, question). This is important to ensure that the student does not do a lot of work on a grant that is ultimately untenable or that has little chance for success. The pre-approval is an up or down decision. If denied, the committee may request adjustments or suggestions for a subsequent attempt. The form must include:
    - A brief description of the specific project and funding agency.
    - The Request for Proposals (RFP) of the agency, including any submission dates (past or future) and page limits.
    - A 1-2 page "concept paper" outlining the essence of the proposed activity:
        - Introduction – statement of problem, need, and significance
        - Objectives – measurable objectives (objectives you can evaluate)
        - Resources required – staff, equipment, materials, etc.
        - Implementation plan – what you are going to do, who is going to do it, how you are going to do it, and when you will do it
        - Funding timeline – duration of funding needed
4. If the student is planning to submit the grant (i.e., they have co-investigators or collaborators who will be named in the actual grant submission, the student must provide documentation of approval (can be an email) from all key partners at each step of the process (pre-approval, draft review, and prior to final submission to the funding agency).
5. The grant must be external (not internal) and must be research related in some capacity. Intramural grant funding will be considered for part-time UVM faculty IHS students on a case by base basis and must be approved by the IHS Program Director.
6. The application should meet all of the specifications of the funding agency.
7. If the requirements of the funding agency are "minimal," the IHS Student Progression Committee or QE Committee may require the student to provide a more extensive description of key components.
8. As stated above, actual submission of the grant is ***not*** a requirement of the examination, but submission to the agency is strongly encouraged. In rare cases, a grant may have

already been submitted but the committee may ask for additional revisions for the purpose of the examination.

9. If human subjects are involved in the project, the student must follow required procedures. The student may not need IRB approval prior to submitting the grant if not required by the funding agency. However, if the grant is funded and IRB approval is required, and if the student is a member of key personnel for the project, the student must obtain the necessary IRB approvals.
10. The proposal and accompanying approval forms must be consistent with the grant proposal and submission guidelines of the institution through which the application is being submitted.
11. If the student proposes to use the grant funding to support dissertation research, the student must have an approved dissertation committee and dissertation concept paper prior to writing the grant. In such cases, the dissertation committee will participate as members of the QE committee.

Written Exam

The written exam involves writing the grant proposal (i.e., all aspects of the grant submission *excluding* the budget justification section) using the concepts learned in the core courses. The student must select a novel research question that meets the FINER criteria (feasible, interesting, novel, ethical, relevant). Although neither the IHS Program Director nor faculty co-investigators (in the event that there are any) may serve on the QE Committee, they may assist the student in the conceptualization of the proposal (e.g., literature review, methods, analysis). They may also assist in the writing of the grant proposal portion of the student's exam but in a limited way. Specifically, the student is expected to take the lead on the writing (i.e., the student will write a first and complete draft of the grant proposal and co-investigators may edit the manuscript and offer recommendations for revision). In addition, it is expected that the student will formally describe his/her role in the grant development process and this statement is approved as accurate by the student's co-investigators/collaborators as appropriate. This said, it is also important to note that the borrowing of standard technical language (e.g., to describe a proposed methodology) is considered permissible and students are encouraged to borrow such language and include it in their grant proposals as deemed appropriate. *In many cases, the grant/research proposal will be related to the student's anticipated dissertation topic, although this is not a requirement of the exam.* Students (and their collaborators) who chose to submit the grant, should be aware that there is an obligation to pursue the proposed studies as in the case that the grant is funded.

In addition, in the event that students identify faculty who are well-suited to provide specific kinds of guidance to improve the content of their grant proposal, they may (and are encouraged to) meet/consult with those faculty. Students may verbally consult with faculty on any aspects of the grant proposal (e.g., research question, literature review, methods, analysis) irrespective of whether those faculty members also serve on the student's QE committee.

To the students:

When you have selected a research question, ask yourself these questions before requesting approval of your protocol:

1. Is this research question FINER?

2. Can you state concisely the goals of the proposed research and summarize the expected outcome(s), including the impact that the results of the proposed research will exert on the research field(s) involved? (From NIH Specific Aims)
3. Can you list succinctly the specific objectives of the research proposed, e.g., to test a stated hypothesis, create a novel design, solve a specific problem, challenge an existing paradigm or clinical practice, address a critical barrier to progress in the field, or develop new technology? (From NIH Specific Aims)

To the student's QE committee:
Please carefully review the student's application in the context of the funding mechanism and specific RFA. The student should be judged solely in their ability to respond effectively to the RFA in terms of the prescribed content, format, and level of detail requested. This may mean that, for example, that for this QE, the student may or may not be expected to be able to describe specific methodologies or statistical procedures (such educational goals are instead, inherent to the conduct of the dissertation). As such, evaluation of the student's performance must be framed within the specific and particular demands of the RFA that the student has chosen. With this in mind, some questions that may be appropriate include:

- Is this research question FINER?
- What are the goals of the proposed research
- Can you summarize the expected outcome(s)?
- What are the implication of the proposed study for theory or clinical practice?

Assessment: Written and Oral Exam
Students will meet with their QE Committee to answer questions related to the written grant proposal. No formal presentation of the written protocol is required as part of the oral exam. Students should dress appropriately for the oral defense and be prepared for 2-3 hours of examination. After the Committee is satisfied that all questions have been answered, the student will be excused from the room while the Committee discusses the student's performance. At this time, the committee will formally evaluate both the written and oral exam. The written portion of the exam will be evaluated by the QE committee using the Qualifying Exam Assessment Criteria (see Appendix A). With regard to the oral exam, the Committee should consider the following questions in making their assessments:

- Is the proposed research question FINER? Does it address the "so what" factor?
- Is the grant submission responsive to the RFA (note: the specific content and level of detail required for each RFA will vary significantly and, consequently, the expectations for the student's written and oral portion of the exam will vary as well). With the specific RFA in mind, the committee should consider how well the student is able to describe and/or answer questions related to the:
    - research design, subjects, intervention (if applicable), and methods, including data collection and management
    - analytic plan including plans for descriptive, basic and multivariate statistics and sample size requirements
    - protection of human subjects including: human subjects involvement, potential risks, recruitment and informed consent and risks/potential benefits
    - potential limitations and threats to validity and any plans to address them
    - translational or policy implications of the proposed research.

The written grant proposal and the oral defense of the grant proposal will be evaluated by the QE Committee using the criteria summarized below and ***with reference to the criteria of the funding agency***. When the evaluation of the written proposal and oral defense is complete, the committee will judge the completion of this requirement as "satisfactory" or "unsatisfactory."

If the written grant and/or oral exam is/are judged as satisfactory (meaning no or few revisions are recommended), the student is provided minor edits/recommendations by the committee, however, reexamination and confirmation of changes is not necessary.

If the written grant and/or oral exam is/are judged as unsatisfactory (meaning significant revisions or a retake of the exam is necessary), the student may receive mentoring and resubmit the written grant to the committee and/or retake the oral exam. If significant written revisions or re-examination are required, the QE Chair will solicit comments from the other panel members and communicate them in writing to the student. The Chair will work with the student on a reasonable process and timeline for the revisions. In most cases, the student should be offered 30 days to make revisions and/or prepare for re-examination of the oral exam component. With regard to the written grant, any resubmitted materials must be sent to the QE committee chair with a cover letter that explains how the revised materials are responsive to the Committee's recommendations. With regard to the oral component, the student must communicate to the QE Chair in writing, what steps or actions the student has taken to gain knowledge or skill in the specific areas previously deemed lacking. If the student's written revisions and/or oral re-examination are deemed unsatisfactory, the student's name will be forwarded to the IHS Student Progression Committee with a recommendation that the student be dismissed from the program.

Following completion of the qualifying examination:
When the student has passed the QE requirements, a Successful Completion of Comprehensive Exam form must be submitted to the Graduate College, with a copy to the Program Director.

4. DISSERTATION

4.1. Forming a Dissertation Committee

A Dissertation Committee oversees the dissertation process. The committee can be appointed as the student nears completion of the QE. The committee must include a minimum of 4 members of the University of Vermont Graduate Faculty including the student's advisor and a chairperson (a full list of graduate faculty may be found in the Graduate Catalogue). At least two committee members must be CNHS faculty members. At least two additional members of the committee must be from the University of Vermont. If the student has co-advisors, there must be an additional member from the graduate faculty who is not an advisor or the chairperson. The chairperson must be a member of the Graduate Faculty and from outside the student's and the advisor's department and graduate program, including primary and secondary appointments.

A non-UVM faculty member or a non-graduate faculty member may serve as an additional member on the Defense Committee if approved by the Graduate Dean. In this case, the student must submit a Request for External Defense Committee Member form through the Graduate College. A current curriculum vitae from the proposed additional committee member is also required by the Graduate College. This is a formal process that can take some time and that should be factored into the student's timeline.

Once the committee members are identified, the student should notify the Program Director and also submit a Defense Committee Membership form to the Graduate College.

4.2. Dissertation Concept Paper

The purpose of the dissertation concept paper is to lay out the basic concepts and methods for the dissertation research for review, discussion, and tentative approval by the IHS Student Progression Committee and the student's dissertation committee. The process for approving the dissertation concept paper is intended to be interactive and is often iterative, as edits and both minor and significant revisions may be required. Both qualitative and quantitative methods are valued in this program and can be used for dissertation research; however, a mixed-methods approach is recommended to enhance the potential impact of the research and help the student gain a broad set of research inquiry skills.

The dissertation will be based on original research focusing on a significant problem in the student's area of specialization with an interprofessional application. In this program, a project based solely or primarily on secondary data (e.g., a literature review, systematic review, meta-analysis, analysis of archival data) does not qualify as a dissertation (although such approaches can certainly be a part of a larger study with multiple aims and methodologies). With regard to the scope of a dissertation, it is important to keep in mind the purpose of the dissertation. The educational goal of a dissertation involves developing a wide array of skills. These include breadth in analytical, methodological, and communicative skills that foster scholarly independence and culminates in a robust demonstration of evidence-based inquiry.

Determining whether research is worthy of a dissertation could involve several different considerations. The key questions considered by the IHS Student Progression Committee typically include: Does the project include multiple rigorous methods for primary data collection? Does the project lend itself to the mentoring of a small team of research assistants? Does the project lend itself to multiple original articles? Would the work be deemed impactful by independent peer-reviewers?

DISSERTATION CONCEPT PAPER FORMAT

The student should describe similar concepts for each of the three component papers in a concise form. Concept papers are approximately 10 pages in length.

Statement of the Problem

The statement of the problem is a rational and reasoned argument that posits the problem and indicates the necessity for the research. This should be supported by a literature review of critical studies that provide sufficient information to identify the "gap" in the current research that will

be addressed by the proposed study. This will set the stage for how your research will contribute to attempts to address the problem. This section also will incorporate definitions of key concepts.

Significance of the Research
Significance should be established by presenting an integrative review of key sources that establish the need for the study or studies. The far-reaching implications of the project findings should be addressed as well. This should include a brief review of the literature with relevant citations and may also include an outline of additional topics to be included in the review of the literature conducted while in the dissertation phase for the main study or collection of studies.

Articulation of Interprofessional Scholarship
The way(s) in which the proposed research is interprofessional should be described. In what ways does the proposed research integrate knowledge or expertise from two or more professions or disciplines to produce new scientific knowledge?

Research Question(s)
The research questions should be presented and show how the methods will be designed to answer those questions. Bear in mind that any questions should be answerable within the timeline and framework of dissertation research. Consider the nature of the data that will be gathered and analysis techniques that will be used to answer each question or set of questions. One way to do this is by providing a table that will show the independent and dependent variables and analysis tools that will be used for each study.

Method(s)
The methods description(s) should include data sources, instruments, procedures, and analysis methods to be used in each study. It will be important to gather the committee's input and tentative approval of the methods, which the student will tighten and elaborate for the formal proposal.

DISSERTATION CONCEPT APPROVAL FORMAT
The dissertation concept paper (generally 10 pages in length) is developed to outline the plan for the dissertation. The student and student's mentor, submits the dissertation concept paper to the IHS Program Director via email. The Program Director will then forward it to the IHS Student Progression Committee for approval. This committee will evaluate the proposal for its appropriateness with regard to scope, rigor, feasibility and interprofessional scholarship. If the IHS Student Progression Committee has questions or concerns, these will be addressed with the student prior to progressing. The Dissertation Concept Paper Approval Form is provided in Appendix A.

4.3. Dissertation Proposal

After the Dissertation Concept Paper is approved, the student may begin writing their Dissertation Proposal. The Dissertation Proposal is essentially the entirety of the first few chapters of the dissertation. Students should prepare a thorough background section, including literature review, as well as a detailed methods section for their dissertation project. The aim of the dissertation proposal is to demonstrate depth and breadth of knowledge in the field as well as a well-defined plan for the dissertation project. This will allow the student's Dissertation

Committee to evaluate whether the student has the necessary knowledge and skills to successfully complete the dissertation project.

Follow the formatting requirements for the full dissertation in preparing the dissertation proposal. Because the dissertation proposal will comprise the first few chapters of the full dissertation, there are no length limits; rather, the student and advisor should ensure a thorough review of all necessary background and methodology.

Once the student's advisor has reviewed all components of the dissertation proposal and agrees that it is ready for defense, the dissertation proposal may be scheduled. The dissertation proposal written document should be sent to Dissertation Committee members at least 2 weeks before the scheduled defense date.

The dissertation proposal is defended in a formal face-to-face meeting with the student's Dissertation Committee. Faculty members from outside the University may join virtually if needed. This proposal meeting should be scheduled for a two-hour block of time. It generally begins with a formal presentation of 20-30 minutes, followed by questions from the committee and discussion. Alternatively, shorter presentations may be provided for each of the studies being proposed, with discussions following each component study presentation.

Note that in necessary cases, it is possible to have one member of the committee absent from the proposal defense if scheduling becomes a barrier. This absent member should not be the committee Chair, and should consent to the committee going ahead with the defense without them. The absent member should review the written dissertation proposal and provide a list of questions to the committee Chair in advance of the oral defense date, which the Chair can then ask the student during the defense. Following the defense, the committee will relay the outcome of the proposal to the absent committee member and obtain their feedback about whether the defense was successful or not. Note that this option should only be used as a last resort, in cases where scheduling with the full committee would significantly delay the student's progression through the program.

Following the dissertation proposal, the student or dissertation committee chair should submit the Dissertation Proposal Approval Form (Appendix A) to the Program Director. Students who do not satisfactorily pass the dissertation proposal must revise their proposal according to the committee's comments and redo the dissertation proposal process until the committee determines that they are ready to move forward with their dissertation research.

After a successful defense of the dissertation proposal, the student will have earned doctoral candidate status and permission to move forward in completing the proposed research. Note that no data collection should begin until the dissertation proposal is successfully defended.

4.4. Dissertation Research

Human Subjects Institutional Review Board (IRB) approval must be obtained prior to gathering original data or prior to analyzing secondary data. The UVM IRB approval letter is a *required* component of doctoral dissertations. Forms for IRB approval can be found at http://www.uvm.edu/irb/forms.

Dissertation Research Credits
Once the student enters the dissertation phase, they may register for IHS 7491 for dissertation credits. The student should register each semester with their mentor as the instructor of record. The number of credits registered for each semester will depend on the student's enrollment status (part-time versus full-time) and should be decided upon in consultation with the mentor and/or Program Director. The number of credits will determine the amount of time the student spends on their dissertation research each semester, using the general calculation that 1 credit is equivalent to 3 hours of work per week. For instance, if the student is registered for 9 credits, they should be dedicating approximately 27 hours per week to their dissertation work over the course of the semester. Twenty dissertation credits are required for doctoral programs at UVM.

Continuing Education Credits
If the student has completed 20 dissertation credits (IHS 7491) and requires more time to complete their dissertation work, they may register for continuing education credits to maintain their enrollment. Full-time students should register for the appropriate number of credits (e.g., 9) in GRAD 9030 under the IHS Program Director's section. Part-time students should register for the appropriate number of credits (1-8) in GRAD 9020. Students may continue registering for these continuing education credits until their dissertation is complete.

4.5. Writing the Dissertation

Students must follow the Graduate College's dissertation guidelines in preparing their dissertations.

Note: The descriptions in this section provide suggestions for formatting. The actual proposal format and content will be guided by the student's dissertation committee and will comply with the standards of the Graduate College.

A standard structure is recommended for the IHS Doctoral Program (major sections include Introduction, Method, Results, Discussion). The research may be conducted using quantitative, qualitative, or mixed methods.

Alternatively, and at the discretion of the student in consultation with the dissertation committee, the paper may adopt multiple papers structure reflecting anticipated publishable units. For example:

Chapter I = Introductory Chapter
Chapter II = Paper 1
Chapter III = Paper 2
Chapter IV = Paper 3
Chapter V = Integrative Discussion

The student and dissertation chair will decide how to engage members of the dissertation committee during the process of completing the research and writing the required papers. Any major variations in methodology approved as part of the proposal should be presented to the committee for approval if they arise.

Students often present drafted chapters to the chair of their dissertation committee first and then to the whole committee when approved for submission by the chair. As a general guideline the committee should be given two weeks for reviewing each submission (unless a different timeframe has received agreement by the committee).

4.6. Dissertation Defense

The dissertation defense may be scheduled only after the student's committee has reviewed all components of the written document and agrees that the dissertation is close enough to completion that it is appropriate to schedule the defense. The Graduate College's timetable for dissertation students and dissertation guidelines are helpful resources for the defense process.

Students must submit a Defense Committee Membership Form through the Graduate College no later than the beginning of the semester they plan on defending. The Graduate College's timetable for dissertation students includes deadlines for scheduling defense dates and submitting the final document for graduating in particular semesters or summer sessions.

The defense should be scheduled for 2-3 hours according to the availability of all dissertation committee members. The two-hour defense must be formally scheduled with the Graduate College at least 3 weeks prior to the scheduled defense date. Once the defense is scheduled, students should submit a copy of the Graduate College Defense Notice (Appendix A) to the Graduate College (gradcoll@uvm.edu) and to the Program Director. This form is used for developing a public notice about the defense.

A formatted copy of the dissertation must also be submitted to the Graduate College (gradcoll@uvm.edu) for a Format/Record Check at least 3 weeks prior to the scheduled oral defense. Please put "Format Check" in the subject of the email. It is wise to arrange for a professional formatter to assist with the final preparation of the manuscript prior to submission to the Graduate College.

At this point, the candidate should provide a completely compiled dissertation to members of the dissertation committee, allowing approximately 2 weeks for the committee to review the final version of dissertation prior to meeting.

In most cases, a dissertation defense begins with a public presentation of approximately 30-35 min, followed by a period of 25-30 min for questions from the audience. At this point, the committee chair excuses other guests and the committee meets with the candidate for 45-90 minutes to discuss any further changes needed in the dissertation and to ask questions of the candidate about any aspects of the work. At the conclusion, the candidate is excused while the committee deliberates approval of the defense and the document. Most candidates are asked to make some changes before submitting the document to the Graduate College.

4.7. Dissertation Completion

The acceptability of the dissertation is determined by the dissertation committee. The chair of the dissertation committee notifies the Graduate College of the outcome. A grade of "S" or "U" is awarded. If a student's defense examination performance is not satisfactory, then one reexamination, and one only, is permitted.

Following the successful defense, a signed copy of the Defense Examination Record must be returned to the Graduate College. The Graduate College will provide the chairperson of the dissertation committee with the blank Defense Examination Record before the defense.

After a successful dissertation defense, candidates must electronically upload the corrected dissertation to ProQuest (http://www.etdadmin.com/uvm) for approval by the Graduate College within the time period specified by the dissertation defense examination committee, and/or the Graduate College.

5. GRADUATION

Consult the Registrar's Office pages and Graduate College deadlines to verify the last date to apply for graduation and the last date to defend the dissertation. Application for audit is expected to occur 2-4 months prior to the expected commencement date. An Intent to Graduate form must be submitted to the Graduate College by August 1 for an October graduation, October 1 for January graduation, and February 1 for May completions. It is the student's responsibility to follow University guidelines and the timeline for applying for the graduation audit when eligible.

The student will have earned the Doctor of Philosophy degree in Interprofessional Health Sciences after the requirements have been met.

6. ACADEMIC HONESTY AND OTHER UNIVERSITY POLICIES

6.1. Professionalism

Students are expected to adhere to professional standards in the classroom and other academic settings. Students' professionalism begins when they start the program, not when they graduate. In general, codes for behavior are established and adhered to in order to convey one's dedication to excellence, commitment to meeting obligations, and respect for peers, colleagues, professors, and research participants.

First and foremost, students must adhere to the Code of Academic Integrity outlined in University policy (https://www.uvm.edu/policies/code-academic-integrity).

Faculty also expect students to show respect to peers and professors at all times. Professionalism requires that doctoral students approach professors with courtesy and respect for their position:

1. Set up advance appointments and use office hours to discuss issues with faculty;
2. Attend all required classes, arrive on time, and be present and fully engaged;
3. Turn off cell phones prior to coming to class or meetings with professors or peers
4. Avoid the use of a combative or adversarial tone whether discussing issues in person, over the phone, via email, or through other means of online communication.

Faculty will also demonstrate a professional demeanor when interacting with students.

6.2. Discrimination and Harassment

The Doctoral Program in Interprofessional Health Sciences in the College of Nursing and Health Sciences strives to ensure all current and prospective members of our community receive fair treatment and opportunity, and experience an environment that is inclusive, and free from harassment, bias, discrimination and bullying. Every member of the program– faculty, staff, and students – is responsible for maintaining a safe, respectful, supportive, and collaborative atmosphere. If an incident occurs, please contact the program director and/or your primary advisor. Please refer to the Office of Equal Opportunity for links to policies and procedures: https://www.uvm.edu/aaeo.

6.3. Attendance Policy

Students are expected to attend all regularly scheduled classes. It is the responsibility of the student to inform the instructor regarding the reason for absence or tardiness from class, and to discuss these with the instructor in advance whenever possible. Circumstances that require the student to be absent for any length of time should be discussed with the faculty member so that a plan can be made for make-up work or extensions of due dates. Student attendance may be evaluated by instructor report to the Program Director at the conclusion of each semester.

6.4. Common Ground and Code of Student Rights & Responsibilities

Faculty and students will at all times conduct themselves in a manner that serves to maintain, promote, and enhance the high quality academic environment befitting the University of Vermont. Information about Our Common Ground is outlined here: https://www.uvm.edu/president/our-common-ground. Details of the Code of Students Rights and Responsibilities are outlined here: https://www.uvm.edu/~dguber/POLS21/articles/studentcode.pdf.

6.5. Religious Holidays

Students have the right to practice the religion of their choice. Each semester students should submit in writing to their instructors by the end of the second full week classes their documented religious holiday schedule for the semester. Faculty will permit students who miss work for the purpose of religious observance to make up this work.

6.6. Academic Honesty

The principal objective of the policy on academic honesty is to promote an intellectual climate and support the academic integrity of the University of Vermont. Each student is responsible for knowing and observing the Code of Student Rights and Responsibilities at https://www.uvm.edu/~dguber/POLS21/articles/studentcode.pdf and the Code of Academic Integrity at https://www.uvm.edu/policies/code-academic-integrity. For the purposes of the courses in this program, each assignment contains information about the expectations for individual or collaborative work.

6.7. Effective and Responsible Use of AI

Each instructor, mentor, and committee member will have their own expectations of the use of AI in writing and research. Please see the Graduate College's guidance on Effective and Responsible Use of AI for advice on how and when AI resources should be used. Regardless of if and how AI is used, students are expected to act ethically and follow UVM's Code of Academic Integrity.

6.8. ADA Student Accommodations

Reasonable accommodations are provided for students with appropriate documentation from the Office of Accessibility Services (https://www.uvm.edu/accessibility-services). This office coordinates reasonable accommodations for students with documented disabilities. To receive accommodations in the courses in this program, please bring the primary instructors copies of the letter provided by the Office of Accessibility and speak to course instructors about plans to implement the recommendations in each course.

6.9. Dismissal from the program

Students may be recommended to the Graduate College for dismissal from the program for any of the following reasons, but not limited to:

- Failure to maintain the required grade point average of 3.0 each semester in required courses.
- Receipt of two or more grades below a B.
- Unsatisfactory performance in a research rotation or monthly doctoral seminar.
- Failure to receive a grade of satisfactory on the qualifying examination within two tries.
- Failure to pass the dissertation defense within two tries.
- Violation of academic honesty in course work or research.
- Unethical conduct in the profession or in the conduct of research.
- Inability to complete all program requirements within 9 years.

Dismissal recommendations are made by the Program Director and IHS Student Progression Committee (made up of IHS program core faculty members) to the Graduate College. As chair of the Student Progression Committee, the IHS Program Director compiles the student folders for review and communicates recommendations by the committee for dismissal but the Program Director is recused from voting.

7. REFERENCES

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8. APPENDICES

8.1. APPENDIX A. IHS-SPECIFIC PROTOCOLS AND FORMS

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Declaration of Mentor Form

This form must be completed by the faculty mentor and the student. Discussions should also involve the faculty member's department chair so that appropriate workload is considered. After this form is completed, a copy should be sent to the IHS Program Director.

Student Name: _____

Faculty Name: _____

Date began program: _____ Anticipated graduation date: _____

_____
Mentor Signature Date

_____
Student Signature Date

_____
Chair Signature Date

_____
Program Director Signature Date

The University of Vermont
COLLEGE OF NURSING AND HEALTH SCIENCES

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Annual PhD Student Academic Progress Report Form

Student's Name: **Date:**

Sections I – IX and XII (Completed by the Student)
Sections X and XI (Completed by the Advisor and IHS Student Progression Committee)

I. General Information.

Date of Enrollment:

Advisor's Name:

Cumulative GPA:

Dates of Graduate Studies Committee meetings (please include all dates):

Members of Graduate Studies Committee:

*Note: **Minimum** of 4 members of the Graduate Faculty (including the Student's Advisor).*

II. Funding.

How were you funded in the past academic year? Please briefly describe any Graduate Research/Teaching Assistantships (GTRA-ships) and/or part-time work that you performed to cover living expenses. If known, also include information of how tuition was covered.

III. Coursework (*please attach a current transcript*).

☐ Course Requirements are complete (Check if Yes).

A. Transferred Credits

Course Number	Course Title	Grade	Credits	Year

B. Core Required Courses

Course Number	Course Title	Grade	Credits	Year

C. Elective Courses

Course Number	Course Title	Grade	Credits	Year

D. Research Rotations

Course Number	Course Title	Grade	Credits	Year

E. Dissertation Credits

Course Number	Course Title	Grade	Credits	Year

F. Credits Completed (see PhD Requirements section of the Graduate Catalog)

Transfer Credits: _____

Course Credits: _____

Research Credits: _____

Total Credits: _____

IV. Teaching.

☐ All program-specific teaching requirements completed: check if Yes. If not all requirements have been completed, summarize teaching requirements met during the current review period and any outstanding requirements yet to be met, with anticipated date of completion (attach additional page(s) if necessary).

Teaching Experiences.
Students must complete at least two significant activities besides IHS 7300. As specified in the IHS handbook, each student must: teach at least one course under the mentorship of a faculty member, OR serve as a teaching assistant for at least two courses, OR serve as a teaching assistant for one course and mentor or co-mentor an undergraduate thesis or research project.

Course Number	Course Title/Experience	Grade	Credits	Year
IHS 7300				

Teaching Portfolio.
As part of their evaluation of teaching competency in the program, each student will prepare a teaching portfolio, which comprises examples of the student's teaching philosophy, experience, sample syllabi and lesson plans, evaluations, and feedback. The IHS Student Progression Committee will evaluate each student's teaching portfolio. The portfolio may be submitted in the 3rd or 4th year of the program.

☐ Teaching Portfolio approved by IHS Student Progression Committee?

IV. Doctoral Seminar Requirements. Please list all research seminars attended each year. Students are required to attend at least 6 seminars per academic year and present their work at least once per year.

Seminar Series	Role (Attendee/Presenter)	Semester/Year

V. Program Milestones (e.g., Comprehensive Exam, Qualifying, Capstone Project, etc.). Include dates Milestones have been or will be completed by (attach additional page(s) if necessary).

Qualifying Exam (QE):

Dissertation Concept Paper:

Dissertation Proposal:

VI. Individual Development Plan (IDP).

☐ In Use (Check if Yes)? If Yes, Last Date Updated _____

VII. C.V./Resume.

Please attach a current C.V. or resume, including Awards/Honors, Fellowships/Grants applied for and/or awarded, citations for submitted and accepted peer-reviewed publications and abstracts presented at scientific meetings, local/regional presentations, etc.

VIII. Research Project(s) (if started)

Attach written progress report (1-3 pages) summarizing completed research projects and specific aims, results achieved and plans for the upcoming year, including plans for future publications and presentations.

IX. Estimation of Percent (0-100) Completion of Dissertation Research Project: _____%.

Anticipated graduation date _____

X. Summary of student's self-assessment, including any mitigating factors:

XI. Committee Written Feedback (attach additional page(s) as required):

XII. Overall Progress Rating (Satisfactory, Marginal, or Unsatisfactory): _____

XIII. Student Reflection and Response to Written Committee Feedback (attach additional page(s) as required):

XIV. Signatures:

_____ _____

Student (required) Date

_____ _____

Advisor (required) Date

Other Committee Members (optional):

_____ Date _____

_____ Date _____

_____ Date _____

_____ Date _____

_____ _____

Program Director (required) Date

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Research Rotation Interview Form

This form must be completed by the faculty research rotation supervisor and the student prior to the start of the placement. The specific activities, requirements, and expectations should be discussed and agreed upon by both parties. Discussions should also involve the faculty member's department chair so that appropriate workload is considered.

Students in the IHS PHD program are expected to complete three two-credit professional rotations. Each of the three research rotations typically lasts one semester (15 weeks), with approximately 7 hours of research work performed per week. Changes to the total credits, hours, and duration of the rotation are possible but must be pre-approved by the IHS Program Director. These research activities provide students the opportunity to gain exposure to the research done in the rotation lab by: 1) understanding the current knowledge in the field, 2) learning about the underlying hypotheses that drive the current lab research, and 3) directly participating in an aspect of the research process (e.g., literature review, method development, data collection, analysis, interpretation, or research dissemination). It is also intended as an opportunity for the rotation supervisor to evaluate the student's performance and further the student's development as a researcher and expertise in a particular area.

The (prospective) supervising faculty and the student should jointly consider the questions/areas below. After this form is completed, a copy should be sent to the IHS Program Director.

Student Name:_____ Rotation # (circle one): 1 2 3 Rotation

Prospective Supervisor:_____

Semester/Year:_____ Proposed start date:_____

What are the specific expectations for the rotation?

1. Student will spend 7 hours per week (2 credits). If other arrangement, specify:
   _____
2. Student will keep scheduled appointments, turn in assignments on time, and participate actively in assigned lab activity.

3. Anticipated research duties:
   a. _____
   b. _____
   c. _____
   d. _____
   e. _____

4. Required readings? Yes No

5. Attendance at lab or group meetings? Yes No

6. Additional/preparatory training required? Yes No
   If yes, list training sessions:_____

7. Expected outcomes (e.g., complete a paper, analysis of data, etc.) and dates of completion:

   a. _____ Due:_____
   b. _____ Due:_____
   c. _____ Due:_____
   d. _____ Due:_____

8. Anticipated learning outcomes:
   a. _____
   b. _____
   c. _____

_____
Faculty Supervisor Signature Date

_____
Student Signature Date

_____
Chair Signature Department Date

_____
Program Director Signature Date

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Research Rotation Request Form

Name:	95 #:
Address:	
Phone:	E-mail Address:

Research Rotation Choices, in Rank Order:

	Faculty Member	Lab/Project
1st		
2nd		
3rd		
4th		
5th		

Describe your research interests:

_____

_____

_____

_____

_____

_____

ATTACH YOUR CURRENT C.V.

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Research Rotation Self-Evaluation Form

For each research rotation, the student must complete two self-evaluations: one mid-way through the lab rotation and one at the end. The student is expected to take responsibility for remembering to complete the self-evaluation at the appropriate time. Once each self-evaluation is complete, the student sends it to the research supervisor and the IHS Program Director. Each self-evaluation is a written report (approximately two pages) in which each of the following areas is addressed:

Student's Name:_____ Date:_____

1. REPORT PROGRESS ON PROJECTS: Review the Research Rotation Interview form that you completed with your supervisor before you committed to this project. Have you made satisfactory/expected progress in all of the identified research activities? If so, describe. If not, describe and discuss barriers to achieving the stated goals.

2. REVIEW AND UPDATE TIMELINES FOR ALL MAJOR RESEARCH-RELATED PROJECTS (IF APPLICABLE): Are adjustments needed to timelines or goals? Do lab duties require re-prioritization? If changes are needed, how have you communicated with your supervisor?

3. TIME MANAGEMENT: Have you been able to fulfill the required hours for each week of your rotation? If not, why not? Are you able to perform the research duties at the expected level despite the other demands of graduate school (e.g., coursework) and more general life responsibilities?

4. YOUR LEARNING: Have your goals for learning about research in this lab been met? If so, briefly describe your experience. If not, identify barriers to your learning.

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Research Rotation Supervisor Evaluation Form

Instructions: Please rate the student, compared to expectations for IHS Ph.D. candidates as this level, on the following aspects of the student's research rotation. The results of this survey will be sent to the IHS Program Director, shared with the student, and placed in the student's file. Please read each part of the survey carefully and respond as honestly and as thoughtfully as possible.

Below expected Expected Above Expected NA Comments

Please rate the student on the following dimensions:

- Ability to meet the research goals identified at the beginning of the rotation
- Ability to learn new skills
- Ability to apply knowledge and principles of research
- The degree of care and conscientiousness of work
- Initiative to access relevant literature
- Demonstrates active intellectual engagement in the project
- Ability to carry out tasks independently (when appropriate)
- Current level of laboratory skills
- Participation in laboratory activities
- Preparation for laboratory activities
- Quality of written reports
- Quality of data collection/analysis/interpretation
- Quality of interaction with lab colleagues/supervisor
- Overall evaluation for this rotation

_____

Was the student unable to devote sufficient time and/or careful attention to lab duties because of the burdens of coursework or the inability to prioritize competing life responsibilities? Y N
Optional comments:_____
Would you recommend this student to other rotation supervisors? Y N
If no, please describe your concerns_____
It is the student's responsibility to complete and submit to you a **mid**-rotation self-evaluation.
Did the student do this? Y N
It is the student's responsibility to complete and submit to you a **end**-rotation self-evaluation.
Did the student do this? Y N

Regardless of whether the student completed the self-evaluation, did you ever have the opportunity to review the student's performance during the research rotation period? Y N
What actions, if any, did you put in place to support the student's research success or to address concerns noted in the student's mid-rotation performance?

_____
Please describe any performance change you observed with these supports in place and/or following a review of expected activities.
Optional comments:_____
Other general comments:_____

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Criteria for Assessment of Zeigler Research Presentation

Failure to achieve a "Satisfactory" rating for *any* Essential Component may result in an unsatisfactory grade for the Research Presentation.

ESSENTIAL COMPONENTS	SATISFACTORY	UNSATISFACTORY
Organization: Completeness and organization.	Presentation content is sufficiently complete, well organized.	Presentation is disorganized, unfocused, or essential components are not addressed.
Rationale: Demonstration of rationale for research.	Rationale for research concisely outlines a research need or gap.	Rationale for research is omitted or appears unjustified.
Research Questions: Inclusion of clearly-stated research question(s).	Research question(s) are appropriate to the study and precisely stated.	Research question(s) are omitted or inappropriate to the study.
Method: Clarity and validity of methods.	Methods are described clearly and are valid for the study.	Methods are inaccurately described or lack validity.
Results: Results directly responsive to research questions and methods used.	Results are directly responsive to research questions and methods used.	Results are omitted or not responsive to research questions and methods used.
Discussion: Inclusion of interpretation of findings.	Findings are critically analyzed and interpreted.	Findings are insufficiently or inaccurately analyzed/interpreted.
Strengths and Limitations: Identification of strengths and limitations.	Research strengths and limitations are clearly identified.	Research strengths and limitations are omitted or inappropriate.
Conclusion: Data-supported conclusions.	Conclusions are clear and well supported by study data.	Conclusions are omitted or not supported by study.

Future Research: Inclusion of implications for future research.	Implications for future research are outlined.	Implications for future research are omitted or inappropriate.
Questions: Ability to answer challenging questions.	Presenter answers challenging questions knowledgeably, accurately, and honestly.	Presenter does not answer questions knowledgeably, accurately, or honestly.
Effectiveness: Overall effectiveness of presentation in communicating with intended audience.	Presenter efficiently and effectively communicates the essential meaning of the presentation to the intended audience.	Presentation does not communicate the essential meanings of the research efficiently or effectively with the intended audience.

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Qualifying Exam Pre-Approval Form

Student Name: _____ Date submitted: _____

Committee member (chair): _____ Discipline: _____
Committee member 2: _____ Discipline: _____
Committee member 3: _____ Discipline: _____

Official Name, Address of Grant Agency:

Grant submission date (past or future):

Do you intend to actually submit this grant (yes or no; if no, the funding mechanism must accede $10,000)?

What is the dollar amount you seek?

Working Title of Proposed Activity:

Concept Paper: (1-2 pages, 1" margins, 12 pt Times, single-spacing)

1. Introduction – statement of problem, need, and significance
2. Objectives – measurable objectives (objectives you can evaluate)
3. Resources required – staff, equipment, materials, etc.
4. Implementation plan – what you are going to do, who is going to do it, how you are going to do it, and when you will do it
5. Funding timeline – duration of funding needed

Outline of Agency's Requirements: (These should be taken from the proposal guidelines and scoring criteria and pasted into this document, including page limits and whether the document should be single or double spaced.) Include electronic link to grant mechanism here if available.

Submission Deadline(s): (It is essential for the committee to be aware of submission deadlines and whether the deadlines roll on a quarterly or annual schedule.)

Reference: (Web link where official information on the grant can be found.)

The QE committee has determined that this QE concept proposal is:
____ APPROVED ____ NOT APPROVED (see attached comments)

Committee member (chair): _____ Date: _____
[signature or typed]

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Qualifying Exam Assessment Criteria

Repeated failure to achieve a "Satisfactory" rating for *any* Essential Component may result in failure to pass Qualifying Exam competency.

	ESSENTIAL COMPONENTS	SATISFACTORY	UNSATISFACTORY
1.	**Responsive to Funding Agency** Elements of the application (excluding budget which is not evaluated) conform to the guidelines required by the funding agency and address its mission.	All or most elements of the application are within the parameters required by the funding agency, and the purpose of the project is relevant to the agency's mission.	No or few elements required by the specified funding agency are included, or the student demonstrates insufficient knowledge of the funding agency's requirements and mission.
2.	**Overview and Purpose** Clarity and precision of overview of project, goals, and specific problem the project will address. The required specificity and level of detail will vary by RFA.	Clear overview of project, concise account of project goals, clear statement of problem to be addressed.	Overview confusing or missing, or goals unclear or problem not well defined.
3.	**Background and Significance** Persuasive nature of the description of the significance of the problem evidenced by the review of the key literature. The required specificity and level of detail will vary by RFA.	The review of the literature and other data provide a cogent argument for the importance of addressing this problem, using excellent sources and rationale for establishing the background and the significance of the proposed activity.	Review of literature cursory, absent, inappropriate, or otherwise unresponsive to the guidelines of the RFA. Inadequate sources of information are used, or the background is poorly described, or the significance of the proposed activity is not well established.
4.	**Objectives** Objectives are described with measurable benchmarks. The required specificity and level of detail will vary by RFA.	An appropriate number of clearly defined measurable objectives as called for by the RFA.	Inappropriate number of objectives or objectives that are not measurable; poor or ill-conceived research design; inadequate or poorly articulated methodology, inappropriate analysis, or presentation of objectives that is not responsive to the RFA.
5.	**Implementation Plan** Methods for addressing the problem include (as	Effective research design, well thought-out description of the methodology. Achievable work	Implementation plan is illogically presented or lacks adequate description (e.g., personnel roles,

	appropriate) research design, procedures, and analysis plan. Also describes appropriate work plan including resources required and realistic timeline: What, who, when, and how. The required specificity and level of detail will vary by RFA.	plan and timeline. Description and justification of all resources (e.g., named personnel, equipment, and materials required at each stage) as called for by the RFA.	equipment or materials needed, unrealistic timeline) or is otherwise unresponsive to the guidelines put forth in the RFA.
6.	**Evaluation/Data Analytic Plan** Evaluation plan and/or data analytic plan of outcomes to answer research questions. The required specificity and level of detail will vary by RFA and may even be 'not applicable' for some RFAs.	If applicable, there is an evaluation/data analytic plan that describes how outcomes will be measured and evaluated and that is responsive to the guidelines put forth in the RFA.	If applicable, the evaluation/analytic plan is poorly developed, does not measure outcomes, is missing, or is otherwise unresponsive to the guidelines put forth in the RFA.
7.	**Hypotheses/Outcomes** Formal hypotheses/ or other expected research are described and justified. The required specificity and level of detail will vary by RFA.	Formal hypotheses/exploratory research questions, or other expected outcomes are described and justified and responsive to the guidelines put forth in the RFA.	Formal hypotheses/exploratory research questions, or other expected outcomes are not described and/or justified or presentation is not responsive to the guidelines put forth in the RFA.
8.	**References** References are appropriate, cover sufficient breadth and depth, use a citation format that is consistent and accurate, and exactly match the citations in the grant narrative.	Cited references are appropriate, cover sufficient breadth and depth of topic, and the citation format is consistent and accurate. Reference list matches citations in document exactly.	Some references are inappropriate, their selection is superficial, or citation format is inconsistent or does not follow prescribed format. Some references are missing, others that were not cited are included in the reference list.
9.	**Length** Proposal length conforms to agency's prescribed limit.	Length of the proposal conforms to funding agency's limit and addendum.	Length of the proposal does not conform to agency's limit, or addendum.
10.	**Overall Quality of Application** Quality of application is organized, accurate, scholarly, and of solid substance and is responsive to RFA.	Information is presented and organized efficiently and effectively, with accurate grammar and spelling and few/no proofreading errors; application is responsive to the guidelines put forth in the RFA.	Presentation is of low quality and disorganized, or grammar and spelling or proofreading errors are present; application is not responsive to the guidelines put forth in the RFA.

Comments**:**_____

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Academic Honesty Declaration

You are responsible for making yourself aware of and understanding the policies and procedures of the University of Vermont that pertain to Academic Honesty. These policies include cheating, fabrication, falsification and forgery, multiple submission, plagiarism, complicity and computer misuse. If there is reason to believe you have been involved in academic dishonesty, you will be referred to the Office of Student Conduct. You will be given the opportunity to review the charge(s). If you believe you are not responsible, you will have the opportunity for a hearing. You should consult with the course instructor or the Doctoral Program Director if you are uncertain about an issue of academic honesty prior to the submission of an assignment or test.

I have read and understand the Code of Academic Integrity of the University of Vermont. All work that I submit as a requirement for the Ph.D. in Interprofessional Health Sciences degree will abide by all of these policies and the guidelines specified for each assignment by the instructor.

Student's Printed Name: _____

SIGNATURE

Date:_____

Doctoral Program Director's Printed Name: _____

SIGNATURE

Date:_____

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Dissertation Concept Paper Approval Form

WORKING TITLE:

STUDENT'S NAME:

IHS Student Progression Committee

The IHS Student Progression Committee agrees the proposed project is appropriate in scope and feasibility and may be pursued to fulfil the program requirement of dissertation. The full proposal still must be presented in a formal meeting with the student's dissertation committee for approval. Only at that point can the student apply for Doctoral Candidate status.

IHS Committee Chair _____ Date _____

DOCTORAL PROGRAM OF STUDY
IN INTERPROFESSIONAL HEALTH SCIENCES

Dissertation Proposal Approval Form

DISSERTATION TITLE:

STUDENT'S NAME:

DATE OF PROPOSAL DEFENSE:

OUTCOME OF PROPOSAL DEFENSE:

_____ Satisfactory

_____ Unsatisfactory

Comments:

Signatures:

Student: _____

Dissertation Committee Chair: _____

Dissertation Committee Member: _____

Dissertation Committee Member: _____

Dissertation Committee Member: _____

Dissertation Committee Member: _____

Dissertation Advisor: _____

IHS Program Director: _____

Graduate College Defense Notice

Please Post

The following thesis (or dissertation) presentation is open to those in the University community.

Student Name

Advisor:

Master or Doctor of (insert degree)

Insert complete name of your program

Defense date

time

location

Title of Thesis or Dissertation

Abstract

This is where you place your abstract. An abstract is simply a concise (usually between ½ page and ¾ page) explanation of your thesis from motivation to conclusion.

The abstract page is single spaced with font of Times New Roman 12. The first line of each paragraph is indented ½ inch and is separated by the last line of the previous paragraph by an extra carriage return.

Teaching and Mentoring Guidelines

STEPS FOR THOSE TEACHING A COURSE

Step 1: Develop a Teaching Plan

a. The student should develop a teaching plan that includes consultation with the Center for Teaching & Learning, the chair of the department, or a faculty member who has taught or mentored the course in the past.
b. The student must submit the following to the program director being to being approved to teach the course:
    1. The student's personal learning objectives – what the student wishes to accomplish through this practicum.
    2. Course number and name.
    3. Target audience – type and anticipated number of students.
    4. Location(s) where it will be taught. Time frame for delivery of course.
    5. Draft Syllabus with:
        ii. Course description.
        iii. Course objectives.
        iv. Topics to be covered.
        v. Sequence in which topics will be presented.
        vi. Pedagogy to be employed.
        vii. Assessment methods.
    6. Description of how the methodology proposed for use in this course is linked to the theories and concepts discussed in IHS 7300.

Step 2: Review of the Teaching Plan

Approval of the teaching plan rests with the department chair and the Doctoral Program Director.

Step 3: Course Preparation

The course must be largely developed and ready to teach ONE MONTH BEFORE the student begins teaching. The materials, which will be reviewed by the supervisor for the course, should include the following:

- Final Syllabus in appropriate format (following departmental or college template) with:
    - Course information – class dates, times, locations, etc.
    - Instructor information – name, contact information, office hours, etc.
    - Textbooks/reading materials
    - Course description
    - Course objectives
    - Class, department, college, and university policies – attendance, make-up or late work, academic honesty, etc.
- Description of each class session, including:
    - Topics to be covered
    - Materials to be used, including audio-visual
    - Activities, including lab activities

    - Readings
    - Assignments
    - Pedagogy
- Assessment of student learning
    - Sequence
    - Format
    - Scoring rubrics for all essay questions, projects etc.
    - Grading policy
- Justification of the chosen topics, delivery model, and instructional methods
- Materials including course packs, handouts, activities, etc.
- Assessments, including copies of all assessments.

Step 4: Teaching Experience

Reflection

- The teaching will not be formally supervised, however, the student is required to provide an end-semester reflection to the Doctoral Program Director following the conclusion of the course as well as journaling throughout the semester (see below).

Creating a teaching portfolio is highly recommended for students teaching a course. The preparation of the teaching portfolio is based, in part, on coursework from IHS 7300 and materials developed during the teaching mentorship, including a reflective narrative summarizing the contents of the formative journaling and student course evaluations.

Satisfactory completion of the practicum experience will be judged by the Doctoral Program Director.

STEPS FOR THOSE SERVING AS TAs and MENTORS OF STUDENT RESEARCH

Step 1: TA Experience

When students serve as Teaching Assistants, they may do so as part of their Graduate Research Assistantship or for independent study credits toward their graduate elective requirements (3-6 credits). When conducted as an independent study, students must conduct and semi-structured interview with a potential teaching mentor (see Program Director for materials to facilitate the interview) and submit this documentation to the Program Director for approval prior to beginning the independent study. Please review this documentation carefully as it details the expectations for collaboration, reflection and journaling activity, as well as the nature of student feedback and student evaluations of teaching.

Satisfactory completion of all teaching experiences will be judged by the Doctoral Program Director in collaboration with the teaching and mentoring supervisors.

Step 2: Mentoring Experience (students must already have a master's or more advanced degree to mentor an undergraduate thesis)

The student must submit documentation of their mentorship of an undergraduate or master's student's research including:

- Personal learning objectives – what you hope to learn
- Mentorship objectives- what you hope accomplish through this research mentorship experience with a student
- Identification of the student mentee and a description of their research project
- Outcomes of the research mentorship experience
    - Description of the process
    - Description of the content
    - Description of the responsible conduct of research

Satisfactory completion of all teaching experiences will be judged by the Doctoral Program Director and (as applicable) in collaboration with the teaching and mentoring supervisors.

Step 3: Portfolio

The student must submit a teaching portfolio to the supervising faculty member and the doctoral program director. The preparation of the teaching portfolio is based on coursework from IHS 7300 and materials developed during the teaching mentorship, including a reflective narrative summarizing the contents of the formative journaling and student course evaluations.

Satisfactory completion of all teaching experiences will be judged by the Doctoral Program Director and (as applicable) in collaboration with the teaching and mentoring supervisors.

Step 4: Journal

Journal
In order to gain approval for teaching competencies, students are expected to keep a journal throughout the experience to:

- Provide an ongoing formative self-analysis of his/her performance.
- Assess his/her achievement of the learning objectives as outlined in the proposal.
- Take a student-centered perspective and gather and reflect on assessment data regarding how his/her students are learning.

<u>Tips on Journaling</u>

You should make your journaling interactive with the supervising instructor.
Journal entries should capture both descriptive information about the experience, and self-reflective information about what you are learning. Reflect both on a surface level [e.g., *next time I'll do this first instead of that*] and on a deeper level [e.g., *I am finding that I need to work on responding to questions in a way that is less defensive; Today, the discussion really got going, and I think it was because...*]. The reflection also should address the personal goals you have set for yourself.

It is suggested that you share your impressions and your learning about the teaching process, as well as any input or suggestions about what journaling practices worked well for you, with your fellow cohort members.

The student will be expected to keep a journal (see Tips on Journaling below) throughout the experience to:

- Provide an ongoing formative self-analysis of his/her performance.
- Assess his/her achievement of the learning objectives as outlined in the proposal.
- Take a student-centered perspective and gather and reflect on assessment data regarding how his/her students are learning.
- The student must share journal entries with the supervisor (in person or via email) at least twice per month across the semester, so that the supervisor and the student teacher have an opportunity to interact with each other at multiple points.

Teaching Portfolio Grading Rubric

Category	Excellent (4)	Proficient (3)	Developing (2)	Needs Improvement (1)	Points
Teaching Philosophy Statement	Clearly articulated, reflective, and well-supported by examples. Demonstrates deep understanding of teaching principles.	Clearly stated philosophy with some supporting examples, but may lack depth or specificity.	Philosophy is somewhat vague, lacks clarity, or lacks strong supporting examples.	Unclear, lacks reflection, or missing key components.	/4
Teaching Experience	Comprehensive and well-documented with relevant details on courses, levels, and institutions.	Experience is well presented but lacks depth or minor details.	Limited documentation of teaching experience or missing some key details.	Experience is unclear, incomplete, or missing.	/4
Sample Syllabi & Lesson Plans	Syllabi and lesson plans are well-structured, detailed, and clearly demonstrate instructional approach.	Materials are clear and functional but may lack minor details or clarity in approach.	Basic materials provided but lack depth, clarity, or completeness.	Syllabi and lesson plans are unclear, incomplete, or missing.	/4
Student Evaluations & Feedback	Strong evidence of positive student feedback with well-organized summaries and supporting data.	Some student evaluations provided, but organization or supporting details could be improved.	Minimal student feedback or lacks clear summaries.	Little to no evidence of student feedback included.	/4
Teaching Materials & Innovations	Excellent examples of assignments, assessments, or teaching innovations with clear explanations of effectiveness.	Good examples provided, but explanations of their impact could be stronger.	Some materials provided, but lack explanation or innovation.	Few or no teaching materials included, or poorly explained.	/4

Category	Excellent (4)	Proficient (3)	Developing (2)	Needs Improvement (1)	Points
Evidence of Teaching Effectiveness	Strong data or qualitative evidence showing student progress and teaching effectiveness.	Some evidence provided but may lack thorough analysis or strong conclusions.	Limited evidence provided, or weakly connects to effectiveness.	No clear evidence of effectiveness included.	/4
Professional Development in Teaching	Well-documented participation in professional development activities related to teaching.	Some professional development listed, but not thoroughly explained.	Limited mention of professional development.	No professional development included.	/4
Letter(s) of Recommendation	Strong letter(s) from credible sources that effectively support teaching ability.	Good letters, but may lack depth or specificity.	Weak or generic letters with minimal insight into teaching.	No letters provided.	/4

Total Score: ___ / 32 points (minimum 24 points required)