### **Dissertation Guidelines**

# **Overview**

Students admitted into the HPPR program will work under the supervision of a Doctoral Advisor, identified during the recruitment/admissions process, to complete a program of dissertation research designed to develop professional skills required to establish a career as a public health scientist. Key components of the dissertation process include: selecting a doctoral qualifying examination committee, preparing for the doctoral qualifying examination, admission to doctoral candidacy, selecting a doctoral dissertation advisory committee, developing and defending a dissertation proposal, conducting the proposed research, preparing manuscripts to summarize and disseminate findings, and a final defense of the dissertation process. The dissertation process begins immediately upon admission to the doctoral training program.

All doctoral candidates will prepare and defend a dissertation proposal and obtain IRB approval for the proposed dissertation research. The dissertation must address a scientific question relevant to the application of behavioral and public health sciences either through secondary analysis of an existing data set or by collecting and analyzing new data. Doctoral candidates will complete an article-style dissertation requiring the preparation of two manuscripts that are ready for submission to a peer-reviewed professional journal.

The Doctoral Advisor identified during the recruitment/admissions process also will serve as Chair of the student's Doctoral Dissertation Advisory Committee and will oversee all aspects of the student's dissertation research. The Chair must be a doctorally prepared member of the UAMS College of Public Health Faculty with a primary appointment in the Department of Health Behavior and Health Education, and will have an established program of research that provides a general context for the student's dissertation research. When dissertation research requires significant oversight from a faculty member who does not hold a primary appointment in the Department of Health Behavior and Health Education, two Co-Chairs will be appointed in order to effectively coordinate interdisciplinary oversight. One Co-Chair must have a primary appointment in the Department of Health Behavior and Health Education.

The Chair and student will identify a Doctoral Dissertation Advisory Committee (DAC) comprised of 3-5 doctorally prepared faculty members, one of whom is the DAC chair. Three doctorally prepared members must have faculty appointments, relevant research expertise, experience mentoring graduate students in research activities, and a history of teaching graduate level courses. A majority of the committee members must have a primary appointment in the College of Public Health (e.g. two of a three member committee; three of a four or five member committee). Additional members may be selected from outside COPH or UAMS as needed to obtain relevant expertise. At least one member previously should have served as Chair of a doctoral advisory committee.

The student will work closely with the Doctoral Advisory Committee to define a research question to be addressed in the dissertation process. After passing the qualifying exam all students must complete a minimum of 18 semester credit hours of dissertation research (HBHE 6800) and must register for at least one credit hour of dissertation research during each academic term until the degree is awarded. Grades are assigned for Dissertation Research HBHE 6800 on a pass / no pass basis. Students who do not earn a passing grade for three consecutive semesters may be dismissed from the program for failing to demonstrate adequate academic progress. A dissertation proposal must be successfully defended within 3 years of passing the qualifying examination. A student who does not successfully defend an initial proposal may prepare a second proposal defense that must be scheduled before the 3 year deadline. Should the proposal not be approved within three years of passing the qualifying examination the student will be dismissed from the program. Students who do not complete the final dissertation defense within 7 years of passing the qualifying examination will be dismissed from the program. Students should consult with their Doctoral Advisor to develop a specific timeline that will assure adequate time to complete each component of the process.

#### **Doctoral Dissertation Advisory Committee**

To identify potential committee members with expertise relevant to their general area of dissertation research the student should become acquainted with the entire COPH faculty as soon as possible. Relevant expertise may address substantive content, assessment and intervention methodologies, and data analysis. The Chair of the Doctoral Dissertation Committee will nominate committee members by submitting a Doctoral Advisory Committee Form for approval by the director of the HPPR Program. A curriculum vitae or resume documenting relevant expertise should be submitted along with the form for individuals who have not previously served on a HPPR dissertation committee. The Committee Chair and the Director of the HPPR Training Program will approve the selection of all members.

The Chair will direct and integrate the overall program of dissertation research. The Doctoral Dissertation Advisory Committee will provide advice as needed to inform the development of the dissertation proposal, implementation of the proposed research, and the preparation of required manuscripts. The student will actively solicit input from the committee by submitting periodic drafts of the dissertation (e.g. introduction, literature review, methodology, summary of results, required manuscripts), and by scheduling periodic meetings with the committee and/or individual members to discuss plans and review progress. General expectations regarding the purpose and timing of periodic drafts and meetings should be established early in the dissertation process. Submission and review of drafts and/or periodic meetings may be requested as needed either by the student or by a committee member.

It is not necessary to consult all committee members equally regarding each aspect of the dissertation research. Members should be consulted primarily on those aspects directly related to their areas of expertise and they will serve in an advisory capacity rather than as directors of the research. The student and the Chair are responsible for making final decisions regarding content, design, and methods and may adopt positions that one or more committee members believe to be less than optimal. The Chair is responsible for resolving significant differences of opinion among committee members.

The full committee must convene with the student at the proposal defense meeting and at the final defense meeting. In the event that extenuating circumstances precluding a formal face-to-face meeting interfere with reasonable progress in the dissertation process, an alternative strategy for completing the proposal defense or the final defense may be proposed. The student should submit a formal request that identifies the extenuating circumstances and time constraints that preclude a face-to face meeting. The request also should propose an alternative strategy to accomplish the goals of the meeting in question. The request must be approved by the Chair of the Doctoral Advisory Committee and by the Director of the HPPR Program.

Although it is expected that members of a Dissertation Committee will be retained on a committee until completion of the dissertation research, circumstances may arise that may warrant a change in committee membership. These circumstances may be identified by a student or by a member of the Dissertation Committee. Examples of such circumstances include, but may not be limited to: changes in a committee member's position that result in lack of time to adequately participate on the committee; changes in position that affect membership eligibility criteria; extended leave or sabbatical; student development of a dissertation topic that is outside the member's expertise; irreconcilable differences between committee members that inhibit the student's progress; or, a failure of the mentor/mentee relationship to adequately foster either the student's academic development or progress on dissertation research activities (e.g., incompatibility, irreconcilable differences).

To resolve any issues that may warrant a change in committee membership the student will work with the Dissertation Committee Chair to:

- Define the issue(s);
- Solicit input from other Dissertation Committee members, clarifying issues as appropriate;
- List potential courses of action, including but not limited to changing the committee composition, and consider advantages and disadvantages of each;
- Consult the Doctoral Program Director and Department Chair to discuss defined issues and possible courses of action;
- Confirm and implement a course of action with measurable goals and timelines for relevant parties;
- If a change is to be made in the committee composition, complete and submit Change of Dissertation Committee Documentation Form.

If the issues that may warrant change in committee composition involve differences with the Dissertation Committee Chair, the student is encouraged to directly address those differences with the Chair. If the student is not comfortable doing so, he/she may initially discuss these issues with the Program Director. The student and Program Director then will meet with the Dissertation Committee Chair to discuss the identified issues. In the event that the Dissertation Committee Chair also serves as the Program Director, the student may initially discuss issues with the Department Chair.

Changes to committee membership should be carefully considered before being pursued, since such changes may adversely affect the timeline for completing the dissertation, the student's ability to retain the current dissertation project, and/or access to datasets, subjects, intervention materials, or other intellectual property held by any member leaving the dissertation committee. Plans to address relevant issues must be proposed via email to the HPPR Program Director and HBHE Department Chair The Program Director and Department Chair will review the proposed plan. Their decision to approve/decline the plan will be documented via email distributed to the student, the dissertation committee, and the Associate Dean for Academic Affairs.

# **Dissertation Proposal**

Doctoral candidates will prepare and defend a dissertation proposal to formally define a selected area of research, to propose specific hypotheses and related research questions to be addressed in the dissertation research, and to identify and justify methods that will be used to address the proposed hypotheses and questions. The initial dissertation proposal and the final dissertation will be written in accordance with guidelines presented in the Publication Manual of the American Psychological Association. The manuscripts will be prepared in accordance with guidelines from the journals to which the manuscripts will be submitted.

Chapter 1 (Introduction) provides an overview that briefly identifies a public health problem, succinctly defines the purpose and relevance of the dissertation research, proposes a specific primary hypothesis and summarizes key aspect of research design and methodology.

Chapter 2 (Literature Review) presents a comprehensive summary of relevant literature that critically examines significant aspects of the identified public health problem, establishes the conceptual framework used to address the identified problem, and justifies proposed methods for intervention, assessment, and data analysis.

Chapter 3 (Methodology) elaborates the research design and delineates specific procedures for recruitment, intervention, assessment, and data analysis. Chapters 1-3 of the dissertation proposal will be fully developed and adequately supported with a comprehensive list of references.

Chapter 4 (Data Summary) will present an outline that will be used to summarize all analyses addressed in the dissertation. The outline will state each hypothesis/research question, identify data sources and specific variables that will be used to address each hypothesis/question, will list quantitative and qualitative procedures

that will be used to analyze identified variables, and will identify hypotheses/research questions to be addressed in each of the planned manuscripts described in Chapters 5 and 6.

Chapters 5 and 6 of the proposal (Planned Manuscripts) each comprise an abstract/concept paper (1-2 pages) describing a manuscript that will be submitted for publication in a peer-reviewed journal. Each of the two concept papers will identify a specific public health issue defined in Chapter 2; and will address hypotheses/research questions presented in Chapters 1 and 3 that are directly relevant to the topic of the planned journal article. The concept paper in each chapter also must briefly identify components of intervention, assessment, and data analysis procedures (more fully defined in Chapter 3) that specifically are relevant to the proposed manuscript. Each concept paper should identify a peer-reviewed journal to which the student proposes to submit the planned manuscript. The concept paper also will present a brief rationale supporting the selection of that journal. Concept papers comprising Chapters 5 and 6 of the dissertation proposal will be a component of the final dissertation when it is submitted for review and final defense. Instructions for authors published by each of the selected journals should be included in the appendix section of the dissertation proposal. These instructions will not be included in the appendix section of the final dissertation.

It may not be necessary or appropriate for all research questions and analyses that are listed in Chapter 4 to be included in the two required manuscripts. Although research questions and analyses that are not addressed in either of the two required manuscripts may be developed into separate manuscripts, these additional manuscripts are not required as part of the dissertation. It is not necessary to submit concept papers with the dissertation proposal to prospectively identify any additional manuscripts. If subsequently developed, any additional manuscripts will not be included in the final dissertation.

A comprehensive reference list following Chapter 6 will include all references cited in the dissertation. Additional supporting materials should be included in an Appendix section in the order the reader encounters them in the dissertation proposal (e.g. assessment instruments, intervention protocols, author instructions). Each piece of information should be labeled in a separate appendix.

The Chair of the Doctoral Advisory Committee will determine when the student is ready to schedule a meeting to defend the dissertation proposal. The student will submit a printed copy and an electronic copy of the dissertation proposal to each member of the committee 14 days before the meeting. The dissertation proposal defense is a working meeting with attendance restricted to the student and the Doctoral Advisory Committee. The meeting will be approximately two hours in duration during which time the strengths and limitations of the dissertation proposal will be thoroughly discussed. The student will make a brief oral presentation (20-30 min) addressing the key aspects of the dissertation proposal. Committee members will identify strengths of the proposal along with any concerns regarding the feasibility, quality, and relevance of the proposed research. Subsequent discussion should attempt to establish consensus recommendations regarding any revisions required to enhance strengths and address identified concerns. The Chair will document concerns raised by the committee as well as strategies/revisions recommended to address those concerns. The summary will be distributed to the student and all committee members. The student will make recommended changes and will submit the revised proposal to the committee for review and approval. Members of the Doctoral Advisory Committee will sign the Dissertation Proposal Approval Form to officially accept the proposed methods and anticipated manuscripts. The student may not proceed with proposed dissertation research until the revised proposal is officially approved by a simple majority of the committee. A dissertation proposal must be successfully defended within 3 years of passing the qualifying examination. A student who does not successfully defend an initial proposal may prepare a second proposal defense that must be scheduled before the 3 year deadline. Should the proposal not be approved at the second defense the student will be dismissed from the program.

# Dissertation Research

Dissertation research is conducted by the student under the supervision of the Doctoral Advisory Committee Chair and in compliance with established regulatory policies. The student should complete all mandatory training (e.g. Human Subjects Protection, HIPAA) before the dissertation proposal defense meeting is scheduled. On-line training is available at <a href="http://www.citiprogram.org/">http://www.citiprogram.org/</a>. Immediately after the dissertation proposal is approved by the Doctoral Advisory Committee, the student should submit a research protocol to the UAMS Institutional Review Board (IRB). If the research is to be conducted in a setting other than UAMS, approval from that setting must be included in the UAMS IRB materials. Information regarding electronic submission of research protocols to IRB is available at <a href="http://irb.uams.edu/clara/clara-accounts/">http://irb.uams.edu/clara/clara-accounts/</a>. Students should refer to the IRB Policies for specific guidelines governing the conduct of human research (<a href="http://irb.uams.edu/irb-policies/current-irb-policies/">http://irb.uams.edu/irb-policies/current-irb-policies/</a>). No interaction with human subjects or their data may occur before an IRB research protocol has been reviewed and approved.

While conducting dissertation research, the student should maintain periodic contact with all members of the Doctoral Dissertation Advisory Committee to review progress and identify any issues relevant to their respective areas of expertise. Expectations regarding the timing and format of periodic updates should be established early in the dissertation process. Events requiring substantive changes in the proposed methods or planned manuscripts should be reported to the Doctoral Advisory Committee as soon as possible. Substantive changes in the focus, scope, or methods proposed for planned manuscripts should be documented by submitting revised concept papers that address required changes. Members of the Doctoral Advisory Committee will sign an amended Dissertation Proposal Approval Form to officially accept the proposed revisions in methods or manuscripts.

### **Final Defense**

The Chair of the Doctoral Advisory Committee will determine when the student is ready to schedule a meeting for the final dissertation defense. Not less than 30 days prior to the date of the final defense, the program must notify the College of Public Health and post public notices announcing the title of the dissertation, and the date, time and place of the defense. The COPH website will be the official posting mechanism for the thirty day public announcement for all dissertation defenses. The student will submit a printed copy and an electronic copy of the dissertation along with the two required manuscripts and any supporting materials to each committee member 30 days prior to the scheduled meeting.

Chapter 1 (Introduction) provides an overview that briefly identifies a public health problem, succinctly defines the purpose and relevance of the dissertation research, proposes a specific primary hypothesis and summarizes key aspect of research design and methodology. Minor changes from dissertation proposal may be required to reflect any changes to update Chapter 2.

Chapter 2 (Literature Review) should be updated to reflect any changes to the initial proposal.

In Chapter 3 (Methodology), future tense language describing proposed procedures for the proposal defense should be changed to past tense language describing completed procedures. Revisions in Chapter 3 should reflect any changes required by the Committee during defense of the initial dissertation proposal as well as any changes that became necessary in the course of the dissertation research.

The outline in Chapter 4 (Data Summary) will include each hypothesis and research question proposed in Chapter 3; and will identify specific quantitative and qualitative procedures used to analyze data relevant to each hypothesis and question. This outline should be amended to include relevant results (e.g. quantitative; means, proportions, p values: qualitative; data codes, concepts, themes), and to clearly identify results incorporated in each of the two required manuscripts. As previously noted, it may not be necessary or appropriate for all results that are summarized in Chapter 4 to be included in the manuscripts.

Chapters 5 and 6 each will include the abstract/concept paper (1-2 pages) from the dissertation proposal describing a manuscript that will be submitted for publication in a peer-reviewed journal. Any revised concept paper that became necessary to address changes during the dissertation research also should be included in the relevant chapter. The final concept paper in each chapter will be amended to briefly address the results and discussion presented in the respective manuscripts.

A comprehensive reference list following Chapter 6 will include all references cited in the dissertation. Additional supporting materials should be included in an Appendix section in the order the reader encounters them in the dissertation proposal (e.g. assessment instruments that are not copywrited, intervention protocols). Each piece of information should be labeled in a separate appendix. Instructions for authors published by each of the selected journals that previously were included in the appendix section of the dissertation proposal should not be included in the final dissertation.

The two manuscripts described in Chapters 5 and 6 must be completed and ready for submission in accordance with guidelines for the selected peer review journal. The completed manuscripts will be distributed to the Doctoral Dissertation Advisory Committee along with the dissertation document and other supporting materials. In order to avoid potential problems with journal policies regarding first publication rights the completed manuscripts will not be submitted to the UAMS library with the final dissertation or to ProQuest for electronic archiving and publication.

The final defense will be approximately two hours in duration. The student will present a comprehensive summary of the dissertation research establishing the significance of the public health problem, identifying the primary hypothesis and related research questions, describing study design and methodology, reporting study results, and discussing implications in the context of the extant literature. This dissertation summary should be approximately 45 minutes in duration and suitable for presentation at a formal colloquium during an employment interview.

At the conclusion of the formal presentation, the Chair will invite questions and comments from the general audience and facilitate an open discussion for approximately 15 minutes. The Chair will then excuse the general audience and the Doctoral Dissertation Advisory Committee will conduct an oral defense of the dissertation in which committee members may present a broad range of questions relevant to the general area of investigation, specific aspects of dissertation methods and results, or the relevance of methods and results to public health practice and science. The Chair will determine when the oral defense should be concluded and the student will be excused from the room while the committee makes its decision. Approval by a simple majority of the Doctoral Dissertation Advisory Committee is required for acceptance of the dissertation. The Chair will verbally inform the student of the committee's decision. The decision may include required changes in the dissertation or manuscripts. Committee members may elect to sign off, or wait to review recommended changes. The Chair will not sign until the student submits the revised dissertation and provides proof that it has been submitted to ProQuest for electronic archiving/publication.

#### **Publication and authorship**

All doctoral candidates will complete an article-style dissertation requiring the preparation of two manuscripts that are ready for submission to a peer-reviewed professional journal. By definition, the dissertation should represent independent research designed and conducted by the student with faculty guidance and oversight. Therefore, the student is expected to be listed as principal author on the two planned manuscripts derived from the dissertation research. The Chair and other members of the Doctoral Advisory Committee should receive authorship and/or other publication credit commensurate with their contributions to the research and manuscript. Both faculty and students should participate in authorship decision made early in the dissertation process and document the proposed authorship responsibilities and credit on the Proposed Authorship Form.

These general guidelines are consistent with ethical principles regarding publication credit published by the American Psychological Association (1992, *American Psychologist*, 47, 1597-1611)

General principles can establish appropriate expectations, but cannot provide comprehensive guidance in all circumstances. In the absence of explicit guidelines, the relative contributions of student and faculty can be open for interpretation. Ethical concerns emerge when faculty claim authorship credit that is not earned, as well as when students are awarded undeserved authorship credit (Fine & Kurdek, 1993, American Psychologist, 48, 1141-1147). Recommendations regarding the process of establishing authorship credit proposed by Fine and Kurdek are available on-line (<a href="http://www.apastyle.org/manual/related/fine-1993.pdf">http://www.apastyle.org/manual/related/fine-1993.pdf</a>) and summarized below.

- The supervisor should provide the student with information related to how authorship decisions are made, the nature of professional and nonprofessional contributions to publications, the meaning of authorship credit and order, and the importance of both parties agreeing on what contributions will be expected of each collaborator for a given level of authorship credit.
- The supervisor and student should assess the specific abilities of each party, the tasks required to complete the scholarly publication, the extent of supervision required, and appropriate expectations for what each collaborator can reasonably contribute to the project.
- The collaborators should discuss and agree on what tasks, contributions, and efforts are required of both parties to warrant authorship and to determine the order of authorship
- Agreements regarding authorship credit and order may need to be renegotiated