DEPARTMENT OF PUBLIC HEALTH SCIENCES (PHS)

MPH THESIS ADVICE AND GUIDELINES

Orienting Yourself to the Thesis Process

Selecting the MPH thesis option means that you have chosen to enhance your graduate education by gaining experience in the planning and conduct of an academic research project. Such research experience not only increases your value to prospective employers, but also enhances your applications to doctoral programs should you decide to pursue a research career or other terminal degree (e.g., Ph.D. or MD). In addition, completing a thesis often involves developing a close relationship with a PHS faculty member who will guide the research and mentor you through the thesis process.

There are many steps and considerable work involved in designing, conducting, writing, and defending a thesis, and the decision to do so should not be made lightly. Those steps are outlined below and you should read this document carefully before embarking on a thesis journey. As you review this document, please know that each thesis process is unique, and the timelines for and ordering of the steps below is designed to illustrate the ideal case. There are many pathways toward a complete thesis, so long as the student demonstrates commitment and responsibility. Please also know that while timelines and processes may be flexible, some processes and steps are mandatory. These are highlighted in boldface type below.

Finally, please know that there are two format options for the written thesis document: (1) the traditional five-chapter thesis and (2) the thesis manuscript option. A traditional five-chapter thesis typically contains five identifiable sections including an introduction, literature review, methods, results, and discussion. The manuscript thesis option differs in that it takes the form of a manuscript that must be submitted for potential publication in a professional, peer-reviewed journal prior to graduation. Examples of traditional and manuscript theses can be found in the PHS department main offices and the NMSU library (http://lib.nmsu.edu/). Additional formatting and other guidelines for both the traditional thesis and manuscript thesis can be found at the NMSU Graduate School website (https://gradschool.nmsu.edu/). Unless explicitly specified, the steps/processes below apply to both the traditional and the manuscript thesis options.

Year 1

Find a thesis advisor and Identify a research topic or area: The first steps in beginning a thesis are finding a thesis advisor and identifying a research topic or area. These activities may occur in either order or occur simultaneously. Some students have a topic area they wish to pursue, and need only to find a thesis advisor that matches that interest. Other students may not have a specific topic or area, and would benefit from discussing ideas with a potential thesis advisor. Either method is acceptable.

Although students are assigned an academic advisor upon admission to the program, it should be understood that this individual may not be willing or able to serve as a thesis advisor. Faculty and student research interests vary and you might find that a faculty member other than your academic advisor is a better match to your interests in research. As such, we encourage you to explore the faculty by searching the website, reviewing faculty publications, and arranging face to face (or Skype) meetings with them. Please note that only full-time, tenured and tenure-track faculty who are on the NMSU Graduate Faculty (http://gradschool.nmsu.edu/graduate-faculty/) are eligible to serve.
as thesis advisors. Ideally, you should identify a potential thesis advisor early in the first semester or as soon as possible.

Regardless of whether you pursue your own topic, or develop one with the aid of a potential thesis advisor, it is essential that you identify a general area of research that is interesting to you and compatible with the interests of your thesis advisor. Discussions/negotiations with potential advisors, reviewing curriculum vitae (CV), and reading faculty publications are excellent ways of getting to know your potential thesis advisor, identifying a research area, and beginning to identify a specific research question. This should also be done during the first semester.

Develop thesis ideas. As your ideas progress and you settle on a thesis advisor, you should continue to work with your advisor to develop your research question(s) and eventually plan your study. The existing literature in an area is a good place to look for study ideas. As you review the research in an area, keep in mind that most studies are not completely novel or ground-breaking, but instead build on previous work through replication and extension. If someone else has already published a study that interests you, you may still consider conducting a similar or replication study. Although simple (i.e., exact) replication is generally discouraged, replication and extension of published work (e.g., replication in different population) is encouraged. Replicating and extending previous work will test your ability to think critically about incremental progress in science and test your ability to critically evaluate and improve previous studies.

Because it is difficult for new researchers to identify a specific research question on their own, working closely with your thesis advisor to identify a research question is exceedingly important. Regular (e.g., weekly, bi-monthly, or monthly) meetings with an advisor are recommended. These meetings should include discussion about how to review existing research and what other disciplines or areas of expertise would be helpful to consider as you proceed. Ideally, you and your thesis advisor will agree on a research question by the end of your first semester in the program.

Use of Secondary Data: A thesis may involve collection of original (primary) data or use of existing (i.e., secondary) data. Whereas primary data is collected directly by the student, secondary data may be culled from national or state-level databases (e.g., National Health and Nutrition Survey; Behavioral Risk Factor Surveillance System surveys) or from existing data sets held by the thesis advisor or others. Although use of secondary data does not require original data collection, it does require the examination of an original or novel research question based on those data.
Complete IRB/Human Subjects Training: Regardless of whether the thesis uses primary or secondary data, the student will be required to receive Institutional Review Board (IRB) approval for the project. As described below, the IRB is the university committee responsible for ensuring that researchers protect the privacy and welfare of human research subjects. Although you may want to wait to submit an IRB application for your thesis project until the idea is more fully developed, the first semester is a good time to complete the required Human Subjects Training (http://compliance.research.nmsu.edu/IRBtraining). Successfully completed IRB training is good for three years.

Develop a Concept Paper/Thesis Prospectus. During your second semester you should continue meeting with your theses advisor and developing your research question(s), hypothesis(es) and project methods. One way to start formalizing your ideas is through a concept paper or thesis prospectus. A thesis prospectus is a 1- or 2-page paper that outlines the major aspects of the to-be-proposed project. It might include a problem statement, research question, hypotheses, a priority population, description of the research methods, anticipated results, and timeline for the project. A well-developed prospectus is a good—and required—way to crystalize your ideas before presenting them to potential committee members (see below).

Assemble a Thesis Committee: The thesis committee is composed of at least two members of the faculty of Department of Public Health Sciences and one faculty member outside the department as the Dean’s Representative. All members of your thesis committee must be members of the NMSU Graduate Faculty. Generally, your thesis advisor will also serve as “chair” of the thesis committee and will therefore be responsible for directing the work of the committee, including providing instructions to the committee members. The thesis advisor will likely have suggestions regarding candidates for the second department member and the Dean’s Representative. The Dean’s Representative oversees the process to determine if the process was conducted fairly according to the guidelines. The Dean’s Representative may be an expert in content matter relevant to the thesis topic, but it is not required. Ideally, students should form their thesis committees during their second semesters in the program.

Qualified individuals from outside the University may serve as additional members of the student’s thesis committee; however, these individuals will need to obtain a temporary appointment to the NMSU Graduate Faculty. The application for this temporary appointment can be found at the Graduate School website.

Thesis Prospectus Meeting:

Students are required to have a meeting about the prospectus to refine their ideas before writing the full proposal. At least two members of the thesis committee (Dean’s Representative optional) must approve a prospectus for the planned thesis (or thesis manuscript before) the student may proceed with the project. Once your committee approves your project, please submit the Thesis Prospectus/Proposal/Defense Form to the Graduate Coordinator.

Develop your full thesis proposal: Once the prospectus has been approved, it is time to develop the full proposal. At this time, you should download the Thesis/Dissertation Guidelines: A Manual for Graduate Students Preparing a Thesis or Dissertation from the Graduate School website (http://gradschool.nmsu.edu/theses-dissertations/) to ensure your work follows University guidelines. This document has information on procedures, forms, required pages and sections, required fonts, document formatting, formats for tables and figures; etc. It also has a section on “manuscript thesis.” The Graduate School provides a Word document template containing many of the required aspects of the dissertation. The Graduate School will ultimately be responsible for approving the final version of
your thesis, so it is best to start following their formatting guidelines early in the process, including the proposal phase.

If you are completing the manuscript option, you should obtain a relevant style guide such as the *Publication Manual of the American Psychological Association* (Sixth Edition; [http://www.apastyle.org/manual/](http://www.apastyle.org/manual/) or *AMA Manual of Style* ([http://www.amamanualofstyle.com/](http://www.amamanualofstyle.com/)) and review the requirements. If you know the intended journal outlet for your eventual manuscript submission, you should visit their website and review their instructions to authors pages which provide specific requirements for manuscripts to be considered for publication.

Regardless of traditional or manuscript option, the thesis proposal can be viewed as an early draft of the final thesis. It should contain many of the key sections of the final thesis including a title page, abstract, introduction, hypotheses (if applicable), methods, proposed analyses, and anticipated results. Many of these sections need not be 100% complete because you will be able to continue working on them as you continue working on other thesis activities (e.g., collecting and analyzing data); however, the proposal should contain sufficient information for the thesis committee to thoroughly evaluate the scientific merit of the proposed research.

**Successfully present and defend your proposal:** Once your thesis advisor deems your proposal to be sufficiently complete, you must submit your proposal to your committee members and arrange to have a thesis defense meeting approximately two weeks after. At the defense, you should expect to provide a brief (approximately 15 min) overview of the project and be prepared to address questions from your committee. Afterwards, your thesis committee will discuss the merits of your proposal with you. They may approve it or request changes. This is a critical point because upon successfully defending your thesis proposal, you may submit your proposal for review by the NMSU IRB (see below) and begin collecting and/or analyzing data following IRB approval of the protocol. Once your committee approves your project, please submit the Thesis Prospectus/Proposal/Defense Form and a copy of the approved proposal to the Graduate Coordinator.

**IRB Approval Process:** As noted above, the IRB is responsible for supervising and approving research that involves human subjects. Their mission is to protect the rights and welfare of individuals participating in research projects. All theses that involve data from human subjects must be approved by the NMSU IRB regardless of whether those data are primary or secondary. Prior to any data collection or analysis, the student, along with the committee chair, must submit an IRB protocol for review. Further information on IRB submission, review, processes and other procedures can be found at the Office of Research Compliance ([http://compliance.research.nmsu.edu/IRB](http://compliance.research.nmsu.edu/IRB)). You should anticipate that it will take at least 4 weeks for the IRB to review your protocol; proposals based on analysis of de-identified secondary data may take less time. **You must not engage in any data collection or analysis prior to receiving formal approval from the IRB.**

**Year 2**

**Register for MPH 599:** MPH 599 is designed to give you course credit for your thesis work. **Registering for MPH 599 is possible only after you have successfully defended your thesis proposal.** Students must complete at least 6 hours of MPH 599 and be enrolled in MPH 599 during the semester that the thesis is completed.

**Complete The Thesis Work:** Once you have received all necessary approvals, it is time to begin collecting the data, organizing and cleaning the data, analyzing the results, and completing the thesis
document. You should continue to work closely and meet regularly with your thesis advisor during this period.

**Distribute and present (defend) your thesis:** Once you have completed a draft of your final thesis that meets the requirements of your thesis advisor, it is time to distribute your thesis to your committee members and present your work. Students are responsible for arranging the public presentation of the work including reserving a room and announcing the presentation (e.g., email, flyers). They are also responsible for distributing copies of their draft thesis to their committee members. Such distribution should be no less than two weeks prior to the presentation date.

The presentation is to both your committee and the public. Like the proposal defense you will be asked to present your research project and findings, and answer questions from the general audience and your committee. After you’ve answered all the questions, the committee will dismiss the audience and ask you to leave the room while they decide to (a) pass the thesis, (b) conditionally pass with revisions, or (c) fail the thesis defense. **If you pass, the committee will sign the Thesis Prospectus/Proposal/Defense Form, which you should submit to the Graduate Coordinator.**

If you conditionally pass with revisions, your committee may wait to sign the Thesis Prospectus/Proposal/Defense Form until they and/or the chair receives the requested revisions. Please note that it is very common for the committee to ask for revisions before giving final approval to any thesis document. After your committee has signed off on your defense form, you are now ready to apply for your degree. You will need to check with the Graduate School to ensure that you have met all the requirements. **At this time, you should also submit the Thesis Prospectus/Proposal/Defense Form, to the Graduate Coordinator.**

**Submission of manuscript:** **If you have selected the thesis manuscript option, you are required to submit your thesis to a peer-reviewed journal before graduating.** As such, you should work with your advisor to make sure that you have met the submission requirements for your intended journal outlet. Once you have submitted the manuscript, please forward a copy of the acknowledgement of manuscript receipt from the journal to the Graduate Coordinator.

**Develop your Curriculum Vitae:** You may also look for other opportunities to present your work, including local, regional, and national conferences. Examples include the annual NMSU Research Expo, the annual Southwest Institute for Health Disparities Research (SWIHDR) conference, or the annual meetings of New Mexico Public Health Association, Society for Public Health or American Public Health Association. Seek out those activities and venues that will help make you more marketable when you graduate. You should record these activities by keeping an up-to-date resume or curriculum vitae.

**Complete NMSU Graduate School requirements:**

In addition to the requirements outlined above, the NMSU Graduate School has several additional requirements. These requirements are outlined below, but students are responsible for knowing and following all Graduate School requirements ([https://gradschool.nmsu.edu/](https://gradschool.nmsu.edu/))

1) Submitting your final approved thesis document for formatting review. This includes completing all required forms in the Thesis Forms Packet. Forms and documents include:
   a. The “Intake Form”
   b. The “Forms and Procedures for Degree Completion Checklist”
   c. The “Thesis Guidelines Checklist” Completed by the student working with the faculty chair.
d. The “Signature Page for Faculty and Student”
e. A copy of the thesis/dissertation to be reviewed

All theses are reviewed for formatting by the Graduate School Coordinator in the Graduate School (phone: 575-646-1432; https://gradschool.nmsu.edu/contact_information/). Students should communicate with the Graduate School Coordinator prior to submitting their thesis for an estimate on how long it will take for review.

2) Submitting your *Graduate School reviewed and approved* thesis to the library for binding. This also includes completing two forms:
   a. Library Thesis/Dissertation Binding Form
   b. Library Personal Binding Form
New Mexico State University
Department of Public Health Sciences

THESIS APPROVAL FORM

This is to certify that __________________________, Banner ID# __________ has successfully passed the

☐ Thesis Prospectus Exam
☐ Thesis Proposal Defense Exam
☐ Thesis Completion Defense Exam

administered on ________________.

Name

Date

Title of Thesis:
____________________________________________________________________________
____________________________________________________________________________
____________________________________________________________________________
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____________________________________________________________________________

Printed Name

Signature

Thesis Chair:

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Committee Member:

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Committee Member (Optional)

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Dean’s Representative: (optional for Prospectus meeting)

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