



Learning Sciences Three-Paper Dissertation Option for the Ph.D. Degree

Learning Sciences Doctoral Area Faculty

Documented finalized on May 14, 2020; further smaller changes may follow

To complete a three-paper dissertation, the following requirements must be met:

1. Students must propose this choice to their Committees, describing the three papers they will write, how they constitute a “package” of related work, and how as a group these papers develop the student’s research capability.
2. Students are encouraged to consult with their Committee as they plan the project. It is in their interest to obtain their Committee’s feedback as they plan and design their studies prior to formally defending their proposal.
3. Students must be lead author on each paper. Although they may have co-authors--including their advisor--the following criteria must be explicitly met by the student:
 - a. Each section of each paper must be written by the student. However, the student may receive formative feedback on these sections. Receiving feedback preserves the parallel between this format and a traditional dissertation.
 - b. Each empirical paper must clearly lay out a problem, use research methods that are appropriate to study the problem, use appropriate and state-of-the-art analytic techniques conducted by the student, and interpret the findings within the context of the theory or conceptual framework that supports the research.
 - c. Students will send these papers to excellent quality peer-reviewed journals in their area, although the papers do not have to be submitted before the defense.
4. If students wish to use a published paper on which they are first author toward the dissertation requirements, the Committee has the prerogative to disapprove the paper if:
 - a. The student did not produce each of the sections but relied on their co-authors to do so. Co-authors must attest to the fact that the student had primary responsibility for all sections of the paper;
 - b. The paper contains research that the Committee finds below the expectations for a high-quality piece of research. In the event that the committee finds the published paper unacceptable, they may require modifications of the submitted work before passing the student and allowing that paper to be included among the three-paper package.
5. The nature of the three papers may differ in type (e.g., literature review or conceptual paper, empirical article, or a translational research paper). Within these guidelines, the Committee will have the final say over which papers can count toward the three-paper dissertation. Guidelines

for what must be included are:

- a. A minimum of two of the papers must be empirical reports of *original pieces of scholarship* that might include data collection, secondary data analysis, or meta-analysis.
 - b. One of the papers may be either:
 - i. A literature review or conceptual paper that takes a critical stance on what is known and what further research is needed.
 - ii. A paper that translates research for practitioners or policymakers. This excludes blogs or magazine pieces. Acceptable journals will have editorial boards and use external reviewers. Examples of these types of journals include *Phi Delta Kappan*, *Young Children*, *Theory into Practice*, and *Tech Trends*.
6. The three-paper option will also require that the thesis contain two chapters that integrate the three papers:
- a. An Introduction in which students articulate the overarching theories and empirical studies in which they ground their work.
 - b. A final discussion in which the studies are summarized in the context of the overarching framework. Students must present this integration during the final defense.
 - c. If the Committee requests additional analyses or information that do not fit into the three papers, the Committee can request that they appear as Appendices in the document.