

George Mason University College of Education & Human Development/Graduate School of Education Secondary Education Program

SEED 675 (Section A01) (Formerly/Cross-Listed as EDUC 675/EDCI 597) "Research in Secondary Education"/Summer-Fall 2020 (3 credits)

Note: This course spans the Summer and Fall 2020 semesters; students will plan their teacher research projects in Summer 2020, earning an "In Progress" (IP) grade, then implement their research projects during Fall 2020, with final grades posted at the conclusion of that semester.

Key Information

Instructor: Kristien Zenkov, PhD, Professor

Office hours: By appointment, via phone, or virtually (https://gmu.zoom.us/my/kzenkov)

Phone: 703.993.5413 (0); 216.470.2384 (M)/Email: kzenkov@gmu.edu

Office/Mail: 1808 Thompson Hall, 4400 University Drive, MSN 4B3, George Mason University,

College of Education and Human Development, Fairfax, VA 22030

Class Meetings

Synchronous Class Sessions (via Zoom: https://gmu.zoom.us/j/93581200608)

• Tues/Thurs, June 2nd, 4th, 9th, 11th, 16th, 18th, 7:20-10:00 pm

Synchronous 1:1 Conferences (via Zoom: https://gmu.zoom.us/my/kzenkov)

• After synchronous class sessions, on Fridays during weeks of June 1st, 8th, 15th, and on Thursdays during weeks of June 22nd and June 29th

Asynchronous Peer Review Group Meetings (via Blackboard Collaborate: TBD)

• At least one meeting per week during weeks of June 1st, June 8th, June 15th, June 22nd, June 29th, and July 6th (with instructor check-in for as many meetings as possible)

All class meetings will occur online, in 1:1, small group, and whole group sessions. Synchronous sessions will occur on dates as indicated as listed above and in the schedule below, and asynchronous sessions will be scheduled by the instructor and students. This class is best conceived of as a "collective independent study," which requires that students engage in considerable independent writing, writing conference time, and peer feedbacking time in order to be successful and complete the course assignments.

Note: For this class you must have a Gmail account in order to access our Google Classroom resources and to submit drafts/revisions of your work to Google Drive.

<u>Instructor Introduction and Theoretical Framework</u>

I believe that the best teachers know themselves as literate people in the broadest sense. I will ask you also to know yourselves as professionals with a variety of literacies, including those of photographers, visual sociologists, and community constituents. Teachers and those who work with

children and youth must be resilient individuals who are willing to take risks to let school literacies matter to themselves, their students, and the broader community. I will expect you to be your best, brightest, most thoughtful, and most creative selves. I intend that this course will be one that you remember, and that you will care passionately about the work we do. I will have uncompromising professional standards for your behavior, participation, and openness. At the same time, I will do everything possible to ensure that you meet these standards. My hope is that we will experience much intellectual camaraderie, engaging discussion, and laughter as we proceed. I encourage you to take risks and celebrate the risks taken by your colleagues.

I bring the perspectives of a veteran teacher and teacher educator, as well as the points of view of a community activist and artist. I approach all educational experiences with the goal of helping students to learn to be active, creative, "real world" members of a just society. It is important for us as educators to approach our teaching with a simultaneously critical and creative perspective: when we assess current teaching practices, we also begin to develop new ones. I offer an explicit critique of schooling: as a classroom teacher with more than fifteen years' experience, an active scholar, and an advocate for children and youth and schools, playing a critical role is my right and responsibility. It is my hope that you will take on this same role.

Perhaps most importantly to you, I have spent my school and university teaching career working across school and university settings with a wide range of children and youth, so I am confident that I will be able to support you in this class. Finally, much as you as university students must be concerned with your own development and others' assessments of your class efforts, I am committed to my growth as a teacher and teacher educator. I will ask for your support in my research as I study your inquiry processes and as I continue to explore authoring (or co-authoring, with you) a book examining how best to help early career teachers conduct teacher research.

I will ask you to think of the teaching strategies we use in class and that you plan to use as research interventions in your own classroom in three categories, which are framed by an assessment-driven, "backwards" design:

- 1) "Ways Out": What is the student's "way out" of the text or activity with which you are asking them to engage? That is, what artifacts and demonstrations will the student complete to exhibit her/his comprehension of the key ideas that they are encountering? How will you assess students' knowledge, skills, and attitudes? How will students demonstrate their retention of and relationship to the material?
- 2) "Ways In": What is the student's "way in" to this text or activity? That is, how are you approaching the student's natural interests in or motivations for this assignment? Think about how you might use the student's existing "literacies" to do this. What specific strategies will you use?
- 3) "Ways Through": What are students' "ways through" this text or activity? What strategies and tools are you giving students to make sense of and understand the sources you are using with this assignment? How will students translate the material into their own terms?

Prerequisites/Corequisites

Methods I (required prerequisite), Methods II/Content Literacy (required prerequisites or corequisites), SEED 440/540 (recommended prerequisite; formerly EDUC 372/672)

Catalogue Description

The exit requirement (the Teacher Research Impact Presentation) is submitted during the semester the candidate is enrolled in SEED 675 (formerly EDUC 675), which can be either a one- or two-semester experience. Pre-internship and summer versions of this course are only offered in a two-semester format and only for students who will be able to implement their projects in the

immediately following semester. This course helps beginning teachers become more effective by becoming more familiar with teaching interventions that address these teachers' content or pedagogical interests and the learning challenges their current (or future) students will face. Completion of a teacher research process requires teacher candidates to review the research literature on attempts to address these challenges and on the content/pedagogical interests they believe will serve their current/future students. Perhaps most importantly, the teacher research process requires teachers (or teacher candidates) to systematically collect and interpret data and evidence from their own or their internship classrooms to improve practice. SEED 675 emphasizes linking evidence of student learning to make informed instructional decisions. Specifically, this course is designed to help teachers understand and enact principles of teacher research in secondary classrooms.

Notes: This course <u>requires</u> that you have access to a classroom or appropriate research site to conduct your research. If you do not have your own classroom, you will need to let me know during our first class. I will suggest alternative arrangements, but these will still require that you conduct research in a classroom setting on a teaching strategy.

Course Overview

Teachers are often encouraged to implement "research-based" practices, required to attend workshops where research findings are presented, provided with lists of books that synthesize research, and asked to suggest changes in practice based on the implications of research. Although these practices have their usefulness, the assumption implicit in much of the discourse surrounding educational research is that teachers are *consumers* and/or *objects* of research, rather than *producers* of research. The past two decades have seen a growing movement to upend those assumptions through an emphasis on the importance of teacher research. Thus, the research and theory we will read and the methodologies with which we will engage are those associated with teacher research (i.e., research conducted by teachers for professional purposes). Teacher research positions teachers as *producers* of knowledge—professionals who can learn about and improve their practice by studying important questions that grow from their own experiences and observations.

This class is designed to support you in using and building on the ideas and content you have encountered in your previous coursework. Most importantly, the course assists you as you consider ways to better support children and youth. In other words, your current and future students are at the center of our work. Toward these ends, the course requires you to conceptualize, design, and begin to implement an original research project in your school/classroom. Only if we attempt to live these teacher research processes in this course will you be able to use them eventually in your own teaching practices. Thus, for every activity in this course, you must act and study with multiple lenses—as a student, teacher, and advocate. Although the work required to achieve these goals is intensive, the course is designed to provide you with much support. You will need to hit the ground running, starting your research project early, and working on it steadily. Through our readings, we will explore research methodologies, analyses of the history and impact of teacher research, and the efforts of teacher researchers. Our readings and discussions will help you develop your own rationale and "road map" for your project. We will dig into readings together, write often and share our writing with one another, and support each other in our research goals.

Course Delivery

The purpose of this course is for you to learn how to conduct teacher research and apply it in your classroom in order to improve your teaching and your students' learning. This class is 100% online and is considered a "virtual instruction" course. This course is student-centered and will be conducted using a project-based approach. Your research questions and methodology will be the focus of the course and will drive readings, classroom discussions, peer review activities, reflections,

and the teacher research project that you complete. The purpose of the draft research project sections and the peer review sessions will be to support completion of your teacher research project and provide opportunities for us to learn about and analyze methods of teacher research. You will have the opportunity to construct knowledge and critically reflect on the research process as you complete your report and prepare your "Teacher Research Impact Presentation" for graduation.

The course will be delivered through a variety of online instructional approaches. You will be expected to post your own assignments and respond to peers' feedback by the end of each designated class week (midnight US eastern standard time). During class meetings there will be large group, small group, and individual activities. GMU's Blackboard course framework (with Zoom as a "meeting room") will be used regularly throughout the course, and you will also be required to use Google Drive and our Google Classroom site to upload and share drafts of your research project with me and a small group of your peers. Your GMU email address is required for communication with the course instructor and must be active by the first week of class. Please inform me of any accessibility problems the first day of class.

Participants will conduct independent research, as well as communicate with each other and the instructor via electronic media. In general, we will engage in four activities during our time together:

- 1) Mini-lectures, activities, and discussions related to research methods led by the instructor and course participants and supported by course text and selected readings
- 2) Discussions of the week's readings led by the instructor and course participants
- 3) Class and peer review group meetings in which students concentrate on selected readings, provide feedback and support for each other's writing and research processes, and share how they have presented their research efforts to authentic audiences
- 4) Individual, small group, and whole group meetings to discuss research efforts Please note that because you have much to learn from each other, and because teaching is often a collaborative effort, you will frequently work in groups. This will give you a chance to share ideas, be exposed to a range of perspectives and experiences, and support each other as you continue to develop your teaching and researching skills.

Course Outcomes and Objectives

This course is designed to enable students to:

- 1) demonstrate an understanding of the process and components used in teacher research by conducting and assessing a chosen scholarly inquiry situated in their classroom and impact on students' learning (research-based practice; innovation)
- 2) prepare a research proposal which makes explicit links between theory and practice (research-based practice)
- 3) examine ethical considerations when conducting teacher research (research-based practice; social justice)
- 4) conduct teacher research which includes: research question(s), research proposal; review of related literature; methods; data collection/analysis; findings; discussion of impact on students, teachers, and the education field (research-based practice)
- 5) participate in critical and collaborative inquiries to gain multiple perspectives in interpreting research and for validation and peer review of research (collaboration; ethical leadership)
- 6) demonstrate integration of national and state standards for content and pedagogy as related to their research question(s) by reflecting on their own teaching practice and its impact on students' learning (SPA standards respective to students' discipline)
- 7) demonstrate skills in the application of technology and use of resources in teacher research (innovation)

Students will achieve these outcomes through the following objectives:

- 1) Prepare a research proposal that includes the research context, a problem statement, a research question and outcomes, and a data collection plan that makes explicit links between theory and practice. Students will brainstorm (in whole class and small group settings), give peer feedback online, self-reflect, and post a viable plan to conduct a research study in the classroom. Students will access resources and references, and conduct a review of the literature. The proposal will be judged on its viability and level of practical application, given the time constraints of the semester.
- 2) Conduct a teacher research project in a local school or classroom. Students will prepare all data collection instruments to conduct the study. Prior to implementation, data collection instruments will be reviewed by peers and the instructor. Students will be assigned to research teams that will troubleshoot and provide support as data is collected. Results will be shared and students will provide feedback to each other on the presentation and interpretation of data.
- 3) Review professional strengths and weaknesses of the teacher research process through peer review and self-assessment. Students will provide regular online feedback to their peers on their drafts/revisions of their research projects.
- 4) Write a teacher research report (using APA format) that includes the context for the study, research question(s) and outcomes, a review of related literature, methodology, data collection/analysis, implications, limitations, and an action plan. Students will review example research reports from prior semesters. Students will upload drafts of their complete report and its sections to Google Drive for peer and instructor review and feedback using the rubric used to assess the report. Students will present a summary of their report to their peers in brief in-class presentations.
- 5) Work to identify one authentic audience with which you will share your teacher research project and its findings. Design and enact a presentation that moves the public understanding of your study and its findings along. You might highlight the very importance of teacher research or summarize the findings of your research efforts.
- 6) Describe your plan for integrating the SEED "Seeds" ("Inquiry and Reflection," "Social Justice," "Collaboration and Partnership," "Relationships with and Respect for Youths," and "Advocacy and Agency") in your future teaching.

Relationships to Program and Professional Standards

By the end of this course students will demonstrate an understanding and application of subject area standards aligned with the National Content Standards and identified by their Specialized Professional Association (SPA):

- Social studies teachers: National Council for the Social Studies, http://www.ncss.org
- English teachers: National Council of Teachers of English, http://www.ncte.org
- Math teachers: National Council of Teachers of Mathematics, http://www.nctm.org
- Science teachers: National Science Teachers Association, http://www.nsta.org

Students should also have an understanding of and be able to apply the standards of the Interstate New Teacher Assistance and Support Consortium (INTASC):

• https://ccsso.org/sites/default/files/2017-12/2013_INTASC_Learning_Progressions_for_Teachers.pdf

Finally, students will need to demonstrate understanding of the SEED "Inquiry and Reflection" Seed:

 Definition: The SEED program is committed to educating teachers who appreciate and know how to ask questions about their practices and who are critically reflective of their pedagogies, empowered by evidence. The ability to inquire and reflect on one's teaching practice is foundational to educators' ongoing and self-directed professional growth across their professional lifespans. Educators who can inquire into and consistently implement

- effective instructional practices—and who can critically reflect on and evaluate their pedagogies—will be the most responsive teachers and will best inspire students to learn.
- SEED 675 Evidence: Teacher candidates will learn how to design and conduct a teacher research project situated in a classroom with the goal of improving their teaching and students' learning.

Required Texts and Materials

Textbooks/General Readings

- Aguirre, R. (2015). Comparing the Effectiveness of Guided Notes in Traditional and Block Schedule Classes. Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Kimball, V. (2019). The importance of teaching dialectic diversity in the American English Classroom. Unpublished master's teacher research project. Note: This paper will be provided electronically.
- Lattimer, H. & Caillier, S. (2015). Surviving and thriving with teacher action research: Reflections and advice from the field. New York: Peter Lang.
- Maher, A. (2019). The impact of classroom ommunity on intrinsic motivation of students. Unpublished master's teacher research project. Note: This paper will be provided electronically.
- Rooney, K. (2017). The Neverending Reflection Story, Math Edition: Students see themselves as learners. Unpublished master's teacher research research project. Note: This paper will be provided electronically.
- Zenkov, K., Pellegrino, A., Sell, C., Biernesser, S., & McCamis, M. (2015). Picturing kids and "kids" as researchers: Preservice teachers and effective writing instruction for diverse youth and English language learners. *The New Educator*. Note: This article will be provided electronically.
- *Note: Other text readings will be provided electronically.

English Exemplar Teacher Research Papers

- Bradshaw, L. (2017). Fostering Student-Centered Active Learning: How Does it Impact Comprehension, Engagement, & Motivation? Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Collis, A. (2018). Strategies in Student Autonomy, Engagement and Achievement: Student Determined Due Dates. Unpublished master's teacher research project. Note: This paper will be provided electronically.
- Newman, K. (2015). Empowering Student Voice by Applying a Social Justice Perspective to the Study of Literature. Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Slater, B. (2017). Student-Centered Goal Setting and Pursuing Skills in the Classroom. Unpublished masters teacher research project. Note: This paper will be provided electronically.

Social Studies Exemplar Teacher Research Papers

- Barton, S. (2014). Effectiveness of informal mentoring on vulnerable learners. Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Travis, M. (2017). *Implications of a 1:1 Laptop Initiative in High School Classrooms*. Unpublished masters teacher research project. Note: This paper will be provided electronically.

Science Exemplar Teacher Research Papers

Araneo, K. (2016). Implementing goal setting strategies in an online learning-centered classroom to build motivation and promote student success. Unpublished masters teacher research project. Note: This paper will be provided electronically.

- Polen, C. (2014). *Particle physics: An essential and engaging part of the program.* Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Snow, L. (2015). Explicit Teaching of Reading Comprehension Strategies to Improve Content Literacy in Biology. Unpublished masters teacher research project. Note: This paper will be provided electronically.

Math Exemplar Teacher Research Papers

- Brand, M. (2014). Station teaching co-teaching method. Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Hahne, C. (2012). Confidence + Good Grades = Success!: Defining and Promoting Student Success in Mathematics Through the Use of Self-Monitoring and Progress Tracking. Unpublished masters teacher research project. Note: This paper will be provided electronically.
- Koca, J. (2017). Students' Mathematics Identities: Cultivating a Sense of Belonging in a Math Classroom. Unpublished masters teacher research project. Note: This paper will be provided electronically.

Recommended Texts

- American Psychological Association (2020). *Publication manual* (7th ed.). Washington, DC: American Psychological Association.
- Note: APA guidelines are available online at http://owl.english.purdue.edu/owl/resource/560/01/

Resources

Articles and Books

- Arhar, J., Holly, M. & Kasten, W. (2008). *Action research for teachers: Traveling the yellow brick road*, (3rd ed.). Upper Saddle River, New Jersey: Merrill Prentice Hall.
- Bell, J. (2005). Doing your research project: A guide for first-time researchers in education and social science (4th ed.). Buckingham, England: Open University Press.
- Bruce, S.M. & Pine, G. J. (2010). Action research in special education: An inquiry approach for effective teaching and learning. New York: Teacher's College Press.
- Chiseri-Strater, E. & Sunstein, B. (2006). What works? A practical guide for teacher research. Heinemann. Note: Intro and sample chapter can be found at http://books.heinemann.com/shared/onlineresources/E00713/chapter9.pdf and ordered online at http://books.heinemann.com/products/E00713.aspx.
- Cochran-Smith, M. & Lytle, S.L. (2009). *Inquiry as stance: Practitioner research in the next generation (practitioner inquiry)*. New York: Teachers College Press.
- Cook-Sather, A. (2009). Learning from the student's perspective: A methods sourcebook for effective teaching. Boulder, CO: Paradigm Publishers.
- Dick, B. (2011). Action research literature 2008—2010: Themes and trends. *Action Research*, 9(2), 122-143. doi: 10.1177/1476750310388055
- Friedman, V. J., & Rogers, T. (2009). There is nothing so theoretical as good action research. *Action Research*, 7(1), 31-47. doi: 10.1177/1476750308099596
- Hubbard, R. & Power, B. (1999). *Living the questions: A guide for teacher researchers*. NY: Stenhouse Publishers.
- Hubbard, R. & Power, B. (2003). *The art of classroom inquiry: A handbook for teacher-researchers*. Portsmouth, NH: Heinemann.
- Kosnik, C., Beck, C., Freese, A.R., & Samaras, A.P. (Eds.), (2006). *Making a difference in teacher education through self-study: Studies of personal, professional, and program renewal.*Dordrecht, The Netherlands: Springer.
- Lebak, K. (2010). Can inquiry and reflection be contagious? Science teachers, students, and action research. *Journal of Science Teacher Education*. 21 (8), 953 970. Doi: 10.1007/s10972-010-9216-x

- Leedy, P.D., and Ormrod, J.E. (2012). *Practical research: Planning and design* Upper Saddle River, NJ: Merrill.
- Marquez-Zenkov, K. (2007). Through city students' eyes: Urban students' beliefs about school's purposes, supports, and impediments. *Visual Studies*, *22*(2), 138-154.
- Marquez-Zenkov, K., & Harmon, J.A. (2007). "Seeing" English in the city: Using photography to understand students' literacy relationships. *English Journal*, 96(6), 24-30.
- McNiff, J., & Whitehead, J. (2011). *All you need to know about action research* (2nd ed.). Thousand Oaks, CA: Sage.
- Mertler, C.A. (2013). *Action research: Improving schools and empowering* educators (4th ed.). Thousand Oaks, CA: Sage.
- Meyers, E. & Rust, F. (2003). Taking action with teacher research. Heinemann.
- Mills, G. E. (2010). Action research: A guide for the teacher researcher (4th ed.). Pearson
- Mitra, D. (2007). Student voice in school reform: From listening to leadership. In D. Thiessen & A. Cook-Sather (Eds.), *International handbook of student experience in elementary and secondary school*. Dordrecht, The Netherlands: Springer Publishers.
- Morrell, E. (2007). *Critical literacy and urban youth: Pedagogies of access, dissent, and liberation*. New York: Routledge.
- Pahl, K., & Pool, S. (2011). 'Living your life because it's the only life you've got': Participatory research as a site for discovery in a creative project in a primary school in Thurnscoe, UK. *Qualitative Research Journal*, 11(2), 17-37.
- Parsons, J., Hewson, K., Adrian, L, & Day, N. (2013). Engaging in action research: A practical guide to teacher-conducted research for educators and school leaders. Brush Education
- Razfar, A. (2011). Action research in urban schools: Empowerment, transformation, and challenges. *Teacher Education Quarterly*, 38(4), 25-44. Retrieved from http://search.proquest.com/docview/923754407?accountid=14541
- Rodgers, C. (2006). Attending to student voice: The role of descriptive feedback in learning and teaching. *Curriculum Inquiry*, 36(2), 209-237.
- Sagor, R. (2010). Collaborative action research for professional learning communities. Solution Tree.
- Samaras, A. P. (2011). Self-study teacher research: Improving your practice through collaborative inquiry. Thousand Oaks, CA: Sage.
- Samaras, A. P., Freese, A. R., Kosnik, C., & Beck, C. (Eds.) (2008). *Learning communities in practice*. The Netherlands: Springer Press.
- Seidman, I. (2012). Interviewing as qualitative research: A guide for researchers in education and the social sciences (4th ed.). New York: Teachers College Press.
- Shagoury, R. & Power, B. (2012). Living the questions: A guide for teacher researchers (2nd ed.). NY: Stenhouse Publishers
- Singer, Jessica. (2006). Stirring up justice: Writing and reading to change the world. Portsmouth, NH: Heinemann. ISBN: 0325007470
- Strambler, M. J. (2013). Promoting student engagement through evidence-based action research with teachers. *Journal of Educational and Psychological Consultation*. 23(2), 87-114.
- Temple, C., Ogle, D., Crawford, A., Frepon, P. (2008): *All children read: Teaching for literacy in today's diverse classrooms*. Upper Saddle River, NJ: Pearson/Allyn & Bacon.
- Whitford, B. L. & Wood, D.R. (2010). *Teachers learning in community: Realities and possibilities*. Albany, NY: SUNY.
- Wyatt, M. (2011). Teachers researching their own practice. *ELT Journal*. 65(4), 417 42. doi: 10.1093/elt/ccq074
- Yonezawa, S., & Jones, M. (2007). Using student voices to inform and evaluate secondary school reform. In D. Thiessen & A. Cook-Sather (Eds.), *International handbook of student experience in elementary and secondary school* (pp. 681-710). The Netherlands: Springer Publishers.
- Zenkov, K., Harmon, J., van Lier, P., & Marquez, M. (2008). Picture this: Seeing diverse city students' ideas about schools' purposes, impediments, and supports. *Multicultural Perspectives*.

Qualitative Analysis

- Bogdan, R. C., & Biklen, S. K. (2011). *Qualitative research for education: An introduction to theory and methods* (5th ed.). Boston, MA: Allyn & Bacon.
- Blair, J. Czaja, R., & Blair, E. A. (2014). *Designing surveys: A guide to decisions and procedures* (3rd ed.). Thousand Oaks, CA: Pine Forge Press.
- Maxwell, J.A. (2005). *Qualitative research design: An interactive approach* (2nd ed.). Thousand Oaks, CA: Sage.
- Miles, M. B., & Huberman, A. M. & Saldaña, J. (2013). *Qualitative data analysis* (3rd ed.). Thousand Oaks, CA: Sage.
- Strauss, A., & Corbin, J. (1990). Basics of qualitative research: Grounded theory procedures and techniques. Newbury Park, CA: Sage.

Quantitative Analysis and Statistics

- Bartz, A. E. (1999). Basic statistical concepts (4th ed). Upper Saddle River, NJ: Merrill.
- Cronk, B. C. (2002). How to use SPSS: A step-by-step guide to analysis and interpretation (2nd ed). Los Angeles, CA: Pyrczak Publishing.
- Rovessi, C., & Carroll, D. J. (2002). Statistics made simple for school leaders. Lanham, MD: Scarecrow Press.
- Salkind, N. (2010). Statistics for people who (think they) hate statistics (4th ed.). Thousand Oaks, CA: Sage.

Research and Writing

Booth, W.C., Colomb, G.G., & Williams, J.M. (2008). *The craft of research* (3rd ed.). Chicago, IL: The University of Chicago.

General Websites

- George Mason University Library: http://library.gmu.edu/
- What Kids Can Do: www.whatkidscando.org
- Through Students' Eyes: www.throughstudentseyes.org

Teacher Research/Research Websites

- http://www.lupinworks.com/jn
- http://www.drawntoscience.org/educators/action-research/what-is-action-research.html
- http://www.teacherresearch.net/

Data Collection Tools

Go to Google Documents is like the best free option to create surveys and forms.

National Reports and Test Reporting Centers

- The Nation's Report Card/National Assessment of Educational Progress: http://nces.ed.gov/nationsreportcard/
- National Center for Educational Statistics: http://nces.ed.gov/help/sitemap.asp
- TIMSS and PIRLS (The International Math and Science Study and International Literacy Study): http://www.timss.org/

Virginia State Standards

• State of Virginia Standards of Learning Test Information: http://www.doe.virginia.gov/testing/index.shtml

Course Requirements

General

All draft assignments should be turned in via Google Drive—as Google Documents—and all final projects should be turned via Blackboard on the due date indicated in the schedule below. All projects must be typed, in 12-point font, with one-inch margins, double-spaced, in Times New Roman font, and follow APA guidelines. Writing quality (including mechanics, organization, and content) is figured into the overall points for each writing assignment, so please proofread carefully. Late papers and projects will not be accepted without penalty, excepting extraordinary circumstances. I am happy to clarify and lend assistance on projects and assignments, but please contact me within a reasonable timeframe. I reserve the right to add, alter, or omit any assignment as necessary during the course of the semester.

Note: Please title each assignment with your last name, the name of the project/assignment, and the date you are submitting it (e.g., Smith_Literature_Review_Draft_9-1-12).

Attendance and Participation (20 points)

Students are expected to attend *all* class periods of courses for which they register. Class attendance and participation—with the whole group, in our small "Peer Review Groups," and in 1:1 conferences—is important not only to the individual student, but to the class as whole. Class participation is a factor in grading; instructors may use absences, tardiness, or early departures as de facto evidence of non-participation and as a result lower the grade. Participants are expected to read the assigned materials, arrive promptly, attend all class meetings for the entire session, and participate in class discussions. If, due to an emergency, you will not be able to participate during a given week of class, please contact me as soon as possible and certainly prior to any scheduled class, meeting, or conference time; it's best to do so via my email or my mobile phone (216.470.2384). Students are responsible for obtaining information given during class discussions despite attendance. Demonstration of positive and collaborative professional dispositions toward colleagues during peer reviews, along with a willingness to accept constructive criticism, is a course expectation.

By virtue of agreeing to work together in this course we instantly formed a new community. This community will be rooted in mutual respect and shared responsibility; these foundations translate into consistent and punctual attendance and active participation in all class activities. My goal is to develop a comfortable classroom community where risk-taking is encouraged; we can only grow through such open-heartedness. Your attendance, thoughtfulness, clarity, and active sharing of responsibility for our classroom community will affect your grade. Absences and tardies—in both online and campus class sessions—will impact your grade. Two tardies are equal to one absence, and missing 30% or more of class sessions will result in automatic course failure. Please turn off all mobile phones, computers, and pagers when you participate in our class.

In addition to the attendance and participation expectations outlined above, you will be expected to participate in our class by offering regular feedback on your Peer Review Group members' teacher research efforts. A peer reviewer is a colleague whom you trust personally and professionally, as well as someone who is kind but courageous about asking provocative questions about your work and your perspective. In our course, a significant amount of time will be spent considering each other's work, and I will offer you tools to use to support the creation and revision of each section of your research reports. These activities will require that you follow the outlined procedures quite closely—though not religiously or without modification. Let's keep in mind that peer reviewers intend not just to know their own work but to understand the contexts, circumstances, and settings of their peers' efforts. Let us also be advocates for each other's critical reflections on our teaching practices. We will establish non-negotiables for our work as a class and for each of our peer interactions.

Draft Research Project Components (20 points—4 points each)

According to the timeline in the schedule below, students will submit to Google Drive draft sections of each of the five research project sections—the introduction, literature review, methodology, findings, and discussion. These will be shared with your Peer Review Group and the instructor.

- 1) Introduction Draft (due by Thurs, June 4th)
 - In your draft introduction, briefly describe yourself, your professional background, your teaching (and learning) experiences, and your experience with reading and or participating in education research studies, reports or articles—also briefly describe some of the lessons you've drawn from this reading/participation. Very briefly speculate about what you believe the benefits of conducting research in your own classroom might be, about what your research questions and/or interests are, and about how (and why) you will involve your students in your project in a "Youth Participatory Action Research" way—in the design, question selection, implementation, strategy selection, data collection, data analysis, and/or presentation of findings. *Revised Introduction due on Sunday, June 21*st.
- 2) Literature Review Draft (due Thurs, June 11th)

What have you read about any of the strategies you might want to try with your students? What are some of the big ideas about these strategies of which you're aware? How do these ideas fit with your own teaching (or learning) experiences? What are the intersections between researchers' findings? What are the tensions between researchers' findings? On whose shoulders do you want to stand, as a teacher and a teacher researcher? What research questions might you address with your project? *Revised Literature Review due on Monday, July 5th.*

- 3) Methodology Draft (due Thurs, June 18th)
 - What learning challenges are your students facing? What teaching challenges are you and/or your colleagues encountering? What strategies are you interested in trying out? How might you consider collecting data on your students' achievement, engagement, and efficacy with your teaching and subject area? What sort of timeline might you follow to complete your project? How might you involve your students in the identification of a teaching/research challenge, in the identification of research questions, in data collection methods, in data analysis methods, and/or in sharing findings of your project? Who might your 5-7 potential case study students be? Teacher research is often criticized because the outcomes are not generalizable—how might you respond to this concern in defending teacher research as a viable research method? What will be your specific teaching interventions? What will be your primary data collection methods? How might you triangulate the data collection in your study? How might you ensure that your study is valid and your data collection techniques are reliable? How might you ensure that you have met any ethical challenges associated with conducting research on your teaching and followed your school's ethics policy regarding the collection of data? Note: Your methodology is your teaching/research PLAN; you will report on what you actually did—and learned—in your findings section. Revised Methodology due on Sunday, July 11th.
- 4) Findings Draft (due week of Nov 10th)
 - What initial sense (analysis!) have you made of any data you have collected thus far? What is an example of the most interesting, surprising, consistent, or representative data you have gathered thus far? What patterns do you already recognize in your data? What patterns do you notice in your potential case study student data? What stories could you tell about these students' experiences with your study? What can you tell us about your students' achievement, engagement, and efficacy with your study and your subject area? What outliers do you see in your data—that still inform your teaching? *Revised Findings due week of Nov* 24^{th} .

5) Discussion Draft (due week of Nov 24th)

What do the patterns and outliers in your data tell you about the implications of your project—for you as a teacher, for your colleagues, for teacher education, and for educational policy? What should happen in your classroom, based on the results of your project so far? With whom might you share your project methods and results? What sense have your students made of your project methods and results?

Revised Research Project Components (10 points—2 points each)

You will submit revised versions of your introduction/contexts, literature review, methodology, findings, and discussion/action plan sections. Due dates of these revised sections are listed in the schedule below. Assessment of your revisions will be based on your documented responses to the feedback your peers and Dr. Zenkov provide. Completing these revised elements will scaffold you toward completion of your final project—a very good thing.

Teacher Research Project (50 points)

Participants will design and conduct an teacher research project that is relevant to their present or future teaching positions. Outlines, examples, descriptions, and rubrics of these projects will be provided. You will write a literature review and proposal for this project, collect and analyze preliminary data, and share the results of your study with both our class (and an outside audience) in a (PowerPoint or otherwise) presentation. It is possible to partner with another student for the purpose of sharing data and researching different aspects of a common topic; each partner, however, must submit an original, stand-alone report. Each participant will make an in-class maximum ten-minute presentation (ungraded) on her/his project; an outline and examples of these presentations will be provided. Please note that projects or papers submitted for credit in another course cannot also be used for a grade in this course. When considering research topics, you should identify a research question that really matters to you. It should be something about which you are curious and with which you are willing to spend time researching and learning. In the words of a former Mason student, "If you aren't eager to spend several days curled up reading about your topic, then it's not love, and you need to ditch it and find another topic."

Teacher Research Impact Presentation

Working independently you will identify an authentic, alternative, preferably contemporary media-based method through which you will share the impact of your teacher research—to an audience you care about and/or to an audience that you think should care about your teacher research work. While you will make a brief presentation of your individual research findings in class, the mission of this assignment is for you to design and enact a presentation that moves the public understanding of your study along. You might choose to create a presentation that highlights your project and findings. You might highlight the very importance of teacher research. You are encouraged to display and present these findings in an alternative setting and through creative means, with your primary goal being engaging in an exercise in demonstrating the significance of your research to the broader world. You may potentially share your project with the Secondary Program Faculty and members of the larger college or educational community.

Assessment and Mastery Grading

All assignments will be evaluated holistically using a mastery grading system; the general rubric is described below, and a specific rubric provided with each assignment. A student must demonstrate "mastery" of each requirement of an assignment; doing so will result in a "B" level score. Only if a student additionally exceeds the expectations for that requirement—through quality, quantity, or the creativity of her/his work—will she/he be assessed with an "A" level score. With a mastery grading system, students must *choose* to "go above and beyond" in order to earn "A" level scores.

- "A" level score = Student work is well-organized, exceptionally thorough and thoughtful, candid, and completed in a professional and timely manner. Student followed all format and component guidelines, as well as including additional relevant component. Student supports assertions with multiple concrete examples and/or explanations. Significance and/or implications of observations are fully specified and extended to other contexts. Student work is exceptionally creative, includes additional artifacts, and/or intentionally supports peers' efforts.
- "B" level score = Student work is well organized, thorough, thoughtful, candid, and completed in a professional and timely manner. Student followed all format and component guidelines. Student supports assertions with concrete examples and/or explanations. Significance and/or implications of observations are fully specified.
- "C" level score = Student provides cursory responses to assignment requirements. Student did not follow all format and component guidelines. Development of ideas is somewhat vague, incomplete, or rudimentary. Compelling support for assertions is typically not provided.
- "F" level score = Student work is so brief that any reasonably accurate assessment is impossible.

Grading Scale

A = 95-100%

A = 90-94%

B + = 87-89%

B = 83-86%

B - 80-82%

C = 70-79%

F = Below 70%

Incomplete (IN): This grade may be given to students who are passing a course but who may be unable to complete scheduled course work for a cause beyond reasonable control. The student must then complete all the requirements by the end of the ninth week of the next semester, not including summer term, and the instructor must turn in the final grade by the end of the 10th week. Faculty may grant an incomplete with a contract developed by the student with a reasonable time to complete the course at the discretion of the faculty member.

Assignments/Possible Points

Attendance and Participation = 20 points

Draft Research Project Components = 20 points

Revised Research Project Components = 10 points

Teacher Research Project (including presentation) = 50 points

Total = 100 points

Professional Dispositions

See https://cehd.gmu.edu/students/polices-procedures/

Core Values Commitment

The College of Education & Human Development is committed to collaboration, ethical leadership, innovation, research-based practice, and social justice. Students are expected to adhere to these principles: http://cehd.gmu.edu/values/.

GMU/CEHD Policies and Resources for Students

Policies

- Students must adhere to the guidelines of the Mason Honor Code (see https://catalog.gmu.edu/policies/honor-code-system/).
- Students must follow the university policy for Responsible Use of Computing (see http://universitypolicy.gmu.edu/policies/responsible-use-of-computing/).
- Students are responsible for the content of university communications sent to their Mason email account and are required to activate their account and check it regularly. All communication from the university, college, school, and program will be sent to students solely through their Mason email account.
- Students with disabilities who seek accommodations in a course must be registered with George Mason University Disability Services. Approved accommodations will begin at the time the written letter from Disability Services is received by the instructor (see https://ds.gmu.edu/).
- Students must silence all sound emitting devices during class unless otherwise authorized by the instructor.

Campus Resources

- Support for submission of assignments to Tk20 should be directed
 to <u>tk20help@gmu.edu</u> or <u>https://cehd.gmu.edu/aero/tk20</u>. Questions or concerns regarding
 use of Blackboard should be directed to <u>http://coursessupport.gmu.edu/</u>.
- The Writing Center staff provides a variety of resources and services (e.g., tutoring, workshops, writing guides, handbooks) intended to support students as they work to construct and share knowledge through writing (see http://writingcenter.gmu.edu/).
- The Counseling and Psychological Services (CAPS) staff consists of professional counseling and clinical psychologists, social workers, and counselors who offer a wide range of services (e.g., individual and group counseling, workshops and outreach programs) to enhance students' personal experience and academic performance (see http://caps.gmu.edu/).
- The Student Support & Advocacy Center staff helps students develop and maintain healthy lifestyles through confidential one-on-one support as well as through interactive programs and resources. Some of the topics they address are healthy relationships, stress management, nutrition, sexual assault, drug and alcohol use, and sexual health (see http://ssac.gmu.edu/). Students in need of these services may contact the office by phone (703-993-3686). Concerned students, faculty and staff may also make a referral to express concern for the safety or well-being of a Mason student or the community by going to http://ssac.gmu.edu/make-a-referral/.

GSE/CEHD Information

For additional information on the College of Education and Human Development, Graduate School of Education, please visit our website [See http://gse.gmu.edu/]

Human Subjects Research Review Process

Any research or teacher research that will be publicly disseminated must have prior approval of the GMU Human Subjects Review Board (HSRB). Teacher research that is used solely for the purpose of studying pedagogical aspects may be conducted without additional permission but cannot be disseminated.

Asynchronous/Peer Review Group/1:1 Conference meetings are highlighted in grey

Details	Topic/Activity	Assignment due	Reading
Week #1 Tues, Jun 2 nd Synchronous 7:20-10:00 pm	 Introductions Small group conferences Course overview, syllabus, requirements "The Proposal" 	Teacher Research Topic Survey	• None!
Week #1 Thurs, Jun 4th Synchronous 7:30-9:00 pm Optional Conferences 9:00-9:30 pm	 Introduction to teacher research and Youth Participatory Action Research (YPAR) Dissecting a teacher research introduction, project, and research timeline Differentiating between 675 and 597 projects "Finding Your Research Passion" and "Starting with a Problem" 	 Introduction draft "Collect-a-Quote" Google Slide w/ <u>Surviving</u> readings "Screenshot Stars" Google Slide w/ YPAR website Baseline and ongoing data examples 	 The Syllabus Surviving, Introduction and Ch. 1-2 http://yparhub.berkeley.edu/ Zenkov, et al YPAR project Aguirre, Kimball, Maher, Rooney Introductions—read all four Teacher Research Project Description and Teacher Research Overview
Week #1 Fri, Jun 5th 1:1 Conferences 2:00-4:00 pm Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Introduction draft feedback and "I-Chart" BDA insights from Surviving and example paper 1:1 Optional Conferences 	 Peer Review Group feedback on Introduction draft "I-Chart" BDA: Based on today's readings, what do you know about research topics/questions? 	 Surviving, Ch. 3-7 Introduction from one example paper in your subject area

Details	Topic/Activity	Assignment due	Reading
Week #2 Tues, Jun 9 th Synchronous 7:30-9:00 pm Optional Conferences 9:00-9:30 pm	 What teaching/learning questions might we address? Gathering baseline data on your class/students Dissecting a sample literature review 	 Zenkov & Peer Review Group Feedback: Introduction drafts Annotate 3 for you, 1 for us Baseline and ongoing data 	 Surviving, Ch. 8-10 Aguirre, Kimball, Maher, Rooney Literature Reviews—read all four
Week #2 Thurs, Jun 11 th Synchronous 7:30-9:00 pm Optional Conferences 9:00-9:30 pm	 What teaching/learning questions might we address? "Taming the Beast: Researching and Writing a Literature Review" and "Emergent Research" and "Making Time for Research" Dissecting our literature reviews 	Literature review draft Baseline and ongoing data	Surviving, Ch. 11-13 Literature Review from one example paper in your subject area
Week #2 Jun 12 th 1:1 Conferences 2:00-4:00 pm Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Literature Review draft feedback and "Real Book Talk" BDA insights from Surviving and example paper 1:1 Optional Conferences 	 Peer Review Group Feedback: Literature review drafts "Real Book Talk" BDA: Based on today's readings, what do you know about literature reviews? Baseline and ongoing data 	 Surviving, Ch. 14-18 Literature Review from one example paper in your subject area

Details	Topic/Activity	Assignment due	Reading
Week #3 Tues, Jun 16th Synchronous 7:30-9:00 pm Optional Conferences 9:00-9:30 pm	 How will we study our teaching interventions? What data will we gather on their achievement, engagement, and efficacy? Our research plans, interventions, and data collection plans "Trusting the Process" Dissecting a sample methodology 	 Zenkov & Peer Review Group Feedback: Literature Review drafts Triangulation, timeline, and data description samples Baseline and ongoing data 	 Surviving, Ch. 19-24 Aguirre, Kimball, Maher, Rooney Methodologies—read all four
Week #8 Thurs, Jun 18 th Synchronous 7:30-9:00 pm Optional Conferences 9:00-9:30 pm	 How will we study our teaching interventions? What data will we gather on their achievement, engagement, and efficacy? Our research plans, interventions, and data collection plans "Sharing the Work" Dissecting our methodologies 	Methodology draft Baseline and ongoing data	 Surviving, Ch. 25-30 Methodology from one example paper in your subject area
Week #9 Jun 19 th 1:1 Conferences 2:00-4:00 pm Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Methodology draft feedback and "Puzzle" BDA insights from Surviving and example paper 1:1 Optional Conferences 	 Peer Review Group Feedback: Methodology drafts "Puzzle" BDA: Based on today's readings, what do you know about Methodologies? Baseline and ongoing data 	Methodology from one example paper in your subject area

Details	Topic/Activity	Assignment due	Reading
Week #4 Thurs, Jun 25 th 1:1 Conferences 12:30-4:00 pm Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Introduction revisions Mentor teacher check-in about your project topic, research questions, literature review insights, methodology elements 1:1 Conferences 	 Revised Introduction (due Sun, June 21st) Mentor teacher check-in Peer Review Group Feedback: Introduction revisions 	• None!
Week #5 Thurs, Jul 2nd 1:1 Conferences 12:30-4:00 pm Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Literature Review revisions Mentor teacher check-in about your project topic, research questions, literature review insights, methodology elements 1:1 Conferences 	 Revised Literature Review (due Mon, July 5th) Mentor teacher check-in Peer Review Group Feedback: Introduction revisions 	• None!
Week #6 1:1 Conferences TBD Asynchronous Peer Review Group Meetings	 Peer Review Group Meetings: Check in about Methodology revisions Mentor teacher check-in about your project topic, research questions, literature review insights, methodology elements 1:1 Conferences 	 Revised Methodology (due Mon, July 11th) Mentor teacher check-in Peer Review Group Feedback: Methodology revisions 	• None!

Details	Topic/Activity	Assignment due	Reading
Week of Sept 7 th Synchronous Session TBD	 Your implementation plan Merging your "Impact on Student Learning" and your Teaching Research projects (Pre-Internship Students) 	Revised "Proposal"— Introduction, Literature Review, Methodology	Aguirre, Kimball, Maher, Rooney Methodologies—re-read all four
Peer Review Group and 1:1 Conferences			
Week of Oct 12 th Synchronous Session TBD Peer Review Group and 1:1 Conferences	The qualitative analysis process	 Zenkov and Peer Review Group Feedback: Revised "Proposal" Qualitative data sources 	 Aguirre, Kimball, Maher, Rooney Findings—read all four Findings from one example paper in your subject area
Week of Nov 10 th Synchronous Session TBD Peer Review Group and 1:1 Conferences	Making sense of our data	 Findings draft Peer Review Group Feedback: Findings draft 2 data sets—one quantitative, one qualitative 	 Aguirre, Kimball, Maher, Rooney Discussion—read all four Discussion from one example paper in your subject area
Week of Nov 24th 1:1 Conferences	Sharing our projects and results	 Discussion drafts Zenkov and Peer Review Group Feedback: Findings drafts Impact Presentation proposal 	None!
Week of Dec 7 th Synchronous Session TBD	PresentationsCourse evaluations	 Presentations of your teacher research projects Final research projects and presentations due to Blackboard/Tk20 by Fri, Dec 11th 	None!