College of Education and Human Development
Division of Special Education and disAbility Research

Spring 2017
EDSE 842 DL1: Application of Research Methodology in Special Education
CRN: 23066, 3 – Credits

<table>
<thead>
<tr>
<th>Instructor: Dr. Anna Evmenova</th>
<th>Meeting Dates: 01/23/17 – 05/17/17</th>
</tr>
</thead>
<tbody>
<tr>
<td>Phone: 703-993-5256</td>
<td>Meeting Day(s): TBA</td>
</tr>
<tr>
<td>E-Mail: <a href="mailto:aevmenov@gmu.edu">aevmenov@gmu.edu</a></td>
<td>Meeting Time(s): TBA</td>
</tr>
<tr>
<td>Office Hours: by appointment</td>
<td>Meeting Location: NET</td>
</tr>
<tr>
<td>Office Location: Finley 201A</td>
<td>Other Phone: N/A</td>
</tr>
</tbody>
</table>

Note: This syllabus may change according to class needs. Teacher Candidates/Students will be advised of any changes immediately through George Mason e-mail and/or through Blackboard.

Course Description
Provides knowledge and skills in the application of research methodology in special education. Topics include methods for conducting survey research, experimental and quasi-experimental research, research involving correlation and regression, and qualitative research. Emphasizes application to specific issues in special education research.
Prerequisite(s): Admission to PhD in education program, or permission of instructor.
Schedule Type: SEM
Hours of Lecture or Seminar per week: 3
Hours of Lab or Studio per week: 0

Prerequisite(s): Admission to PhD in education program, or permission of instructor
Co-requisite(s): None

Advising Contact Information
Please make sure that you are being advised on a regular basis as to your status and progress through your program. Mason M.Ed. and Certificate teacher candidates/students should contact the Special Education Advising Office at (703) 993-3670 for assistance. All other teacher candidates/students should refer to their faculty advisor.
Course Delivery Method
Learning activities include the following:
1. Class lecture and discussion
2. Application activities
3. Small group activities and assignments
4. Video and other media supports
5. Research and presentation activities
6. Electronic supplements and activities via Blackboard

Learner Outcomes
Upon completion of this course, teacher candidates/students will be able to:

1. Describe the strengths and limitations of single subject research designs in special education research.
2. Describe basic procedures involving single subject research designs.
3. Evaluate previous research that has employed single subject research methodology.
4. Design future special education research using single subject methodology.
5. Describe the strengths and limitations of qualitative research designs in special education research.
6. Evaluate previous research that has employed qualitative research methodology.
7. Design future special education research using qualitative methodology.
8. Describe the strengths and limitations of survey research designs in special education research.
9. Evaluate previous research that has employed survey research methodology.
10. Design future special education research using survey methodology.
11. Describe the strengths and limitations of group-experimental research designs in special education research.
12. Describe basic procedures involving group-experimental research designs.
13. Evaluate previous special education research that has employed group-experimental research methodology.

Course Relationship to Program Goals and Professional Organizations
Course Relationship to Program Goals and Professional Organizations This course is part of the George Mason University, College of Education and Human Development (CEHD), Graduate School of Education, Special Education, CEHD PhD in Education Program. This program complies with university and program standards.

Required Textbooks
None

Recommended Textbooks
Required Resources
An article readings list (to be downloaded from GMU library) provided below and posted on Blackboard will correspond to the syllabus schedule.

Additional Readings
Additional readings may be provided by the instructor throughout the semester as appropriate to support discussions.

Course Performance Evaluation
Students are expected to submit all assignments on time in the manner outlined by the instructor (e.g., Blackboard, Tk20, hard copy).

Tk20 Performance-Based Assessment Submission Requirement
It is critical for the special education program to collect data on how our students are meeting accreditation standards. Every teacher candidate/student registered for an EDSE course with a required Performance-based Assessment (PBA) is required to upload the PBA to Tk20 (regardless of whether a course is an elective, a one-time course or part of an undergraduate minor). A PBA is a specific assignment, presentation, or project that best demonstrates one or more CEC, InTASC or other standard connected to the course. A PBA is evaluated in two ways. The first is for a grade, based on the instructor’s grading rubric. The second is for program accreditation purposes. Your instructor will provide directions as to how to upload the PBA to Tk20.

For EDSE 842, the required PBA is (NO ASSESSMENT REQUIRED FOR THIS COURSE). Failure to submit the assignment to Tk20 will result in reporting the course grade as Incomplete (IN). Teacher candidates/students have until five days prior to the University-stated grade change deadline to upload the required PBA in order to change the course grade. When the PBA is uploaded, the teacher candidate/student is required to notify the instructor so that the “IN” can be changed to a grade. If the required PBA is not uploaded five days prior to the University-stated grade change deadline and, therefore, the grade not changed, it will become an F. Please check to verify your ability to upload items to Tk20 before the PBA due date.

Assignments

Performance-based Assessment (Tk20 submission required)
None

College Wide Common Assessment (Tk20 submission required)
None

Performance-based Common Assignments (No Tk20 submission required.)
See Below

Other Assignments
**Class Participation** (13 points)

1. Professional Behavior: For a satisfactory grade in the course, students are expected to attend all classes, arrive on time, be prepared for class, demonstrate professional behavior (see Professional Disposition Criteria at [http://www.gse.gmu.edu](http://www.gse.gmu.edu) for a listing of these dispositions), and complete all assignments with professional quality in a timely manner. To successfully complete this course, students need to adhere to the due dates for specific readings and assignments to be completed. If you feel you cannot adhere to the schedule noted in the syllabus, please contact the Instructor immediately to discuss options for withdrawing and completing the course during another semester.

2. Laptops, cell phones, PDAs and all other electronic devices should be silenced during class time. If you choose to use your personal laptop for note taking, I ask that you utilize it for that purpose only (not for surfing the web, checking email, etc.).

3. Promptness: All assignments must be submitted on or before the assigned due date. In fairness to students who make the effort to submit work on time, 5% of the total assignment points will be deducted each day from your grade for late assignments.

4. Written Products: All written assignments must be prepared in a professional manner following guidelines stated in the Publication Manual of the American Psychological Association (6th edition). All final products must be typed. Products that, in the judgment of the instructor, are unreadable or unprofessionally prepared will be returned un-graded or assigned a lower evaluation.

**PLEASE expect to verbally participate, effectively listen during every class meeting, and encourage face-to-face and online discussions with your peers.**

**Comparative Methodological Table** (18 points)

This table should be a graphic organizer that depicts characteristics for each of the following research methodologies: qualitative, single-subject, and survey research.

The table should include the following headers for each research method (at least): *Purpose* (apart from other methods; why this methodology specifically over others?); *Data Sources* (identify the types of data sources typical of this methodology); *Strengthen Internal Validity* by... (How do you strengthen internal validity? Procedures? Steps?); *Strengthen External Validity* by...(How do you strengthen internal validity? Procedures? Steps?); *Establish Reliability* by...(How do you establish reliability?)

You can feel free to add additional headers/columns to the comparative methodological table. The ten points should include accuracy in those headers provided above. This table is to be completed independently but it is expected that individuals will use class materials, resources, lectures, discussions, to support completion of this assignment. A rubric will be provided in class.
One Methods Section (40 points)

One paper inclusive of a complete methods section is to be completed. The student may select any of the following methodologies: single-subject, qualitative, or group-experimental or quasi-experimental methods. The paper should be about 8-10 page max., double –spaced, for each proposal (NOT including title page, abstract, and references). The paper will be evaluated for APA (6th ed.) format. Provide a title for your paper. Provide brief introduction. Then, subsequent subheadings should ordinarily include the following:

- Background Literature (brief)
- Purpose Statement
- Research Questions
- Method
  - Participants
  - Setting
  - Materials/Instrument
- Procedures
  - Data Sources
- Data analysis
- Anticipated Results/Discussion
- References

RUBRIC FOR METHOD SECTION ASSIGNMENT
(30 points for content; 10 points for mechanics, grammar, APA)

Exemplary Paper
(Content - 30 points): Appropriate topic, thorough description of participants, data sources, and procedures. Adequate design, analysis, and general understanding/interpretation of the relevant methodology; excellent incorporation of QIs (Mechanics – 10 points): clearly and directly written, good writing style, free of mechanical or stylistic errors, appropriate and correct use of APA format.

Adequate Paper
(Content – 27-29 points): Good overall paper, lacking in one or two of the criteria for an exemplary paper, and/or may have neglected specific components relevant to the relevant methodology; addresses some but neglects significant QIs (Mechanics – 8-9 points): Not entirely clear and thorough, minor writing style or APA format errors may be present;

Marginal Paper
(Content – 24-26 points): Overall, acceptable but with one or more significant problems. Contains some useful information, but may have substantial problems with the evaluation, or unclear or inappropriate description of methodology. (Mechanics – 6-7 points): Substantial problems with writing style/APA format
**Inadequate Paper**

*(Content < 24 points)*: Paper with substantial problems in important areas such as writing, description of participants, data sources, procedures, data analysis, or overall thoughtfulness; contains little or no information of value to the field of education.

*(Mechanics- 4-5 points)*: Writing lacks organization, subheadings, limited APA format

Unacceptable/no paper (0 points): Paper with no value whatsoever relative to the assignment, or no paper turned in at all.

**Peer Exchange Feedback (15 points)**

Each student will provide another student with his her final methods paper. The task is to provide thorough feedback to the peer using track changes. Comments and suggestions made should consider the quality indicators and elements of quality research designs and/or considerations of special education research. A rubric will be provided in class.

**Final Exam (14 points)**

The final exam will be completed in class. Responses to open-ended prompts will be typed and provided to the instructor at a designated due date (see schedule). Responses on exam should not be discussed among peers but course materials, resources, and readings may be used to support the responses.

**RUBRIC FOR FINAL EXAMINATION**

For each open-ended test item:

**Exemplary response (2 points):** Provides direct and thorough response to question, defines relevant terms, and provides specific examples or instances of the concepts being discussed. Answer is directly reflective of lecture, readings, activities, or assignments, or other material of direct relevance to class.

**Adequate response (1.5 point):** Provides direct and relevant response to question, provides accurate information directly relevant to class readings, notes, or activities; may provide less information, less elaboration, or a less thoughtful overall response than an exemplary response.

**Marginal response (1 point):** Provides some relevant information, but does not demonstrate overall a clear or complete understanding of the relevant concepts.

**Evaluation (see rubrics)**

1. Attendance/participation: 13 points
2. Comparative Methodological Table: 18 points
3. One Methods section: 40 points
4. Peer Exchange: Feedback 15 points
5. Final Exam 14 points
Course Policies and Expectations

Attendance/Participation

Due to the importance of lecture and discussion to the total learning experience, students are encouraged to both attend and participate in both online and face-to-face class regularly. Attendance, punctuality, preparation, and active contribution to small and large group efforts are essential. These elements will reflect the professional attitude implied in the course goals and will account for 13% of the course grade. Students who must miss a class must notify the instructor (preferably in advance) and are responsible for completing all assignments and readings for the next class.

Note: The course will run on Tuesday to Tuesday schedule. All new materials, readings, and assignments will be posted on Tuesday afternoon (at 4:00pm) and students will be expected to complete and submit due assignments by Tuesday afternoon (by 4:00pm).

Late Work

All assignments must be submitted on or before the assigned due date. In fairness to students who make the effort to submit work on time, 5% of the total assignment points will be deducted each day from your grade for late assignments.

Grading Scale

95-100% = A
90-94% = A-
87-89% = B+
83-86% = B
80-82% = B-
70-79% = C
< 70% = F

Note: The George Mason University Honor Code will be strictly enforced. Students are responsible for reading and understanding the Code. “To promote a stronger sense of mutual responsibility, respect, trust, and fairness among all members of the George Mason University community and with the desire for greater academic and personal achievement, we, the student members of the university community, have set forth this honor code: Student members of the George Mason University community pledge not to cheat, plagiarize, steal, or lie in matters related to academic work.” Work submitted must be your own or with proper citations (see http://oai.gmu.edu/the-mason-honor-code/).
**Professional Dispositions**
Students are expected to exhibit professional behaviors and dispositions at all times.

**Core Values Commitment**
The College of Education and 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/](http://cehd.gmu.edu/values/)

**GMU Policies and Resources for Students**

**Policies**
- Students must adhere to the guidelines of the Mason Honor Code (see [http://oai.gmu.edu/the-mason-honor-code/](http://oai.gmu.edu/the-mason-honor-code/)).

- Students must follow the university policy for Responsible Use of Computing (see [http://universitypolicy.gmu.edu/policies/responsible-use-of-computing/](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 [http://ods.gmu.edu/](http://ods.gmu.edu/)).

- Students must follow the university policy stating that all sound emitting devices shall be silenced during class unless otherwise authorized by the instructor.

**Campus Resources**

- Support for submission of assignments to Tk20 should be directed to tk2ohelp@gmu.edu or [https://cehd.gmu.edu/api/tk20](https://cehd.gmu.edu/api/tk20). Questions or concerns regarding use of Blackboard should be directed to [http://coursessupport.gmu.edu/](http://coursessupport.gmu.edu/).

- The George Mason University 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/](http://writingcenter.gmu.edu/)).

- The George Mason University 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 George Mason University Office of Student Support staff helps students negotiate life situations by connecting them with appropriate campus and off-campus resources. Students in need of these services may contact the office by phone (703-993-5376). 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://studentsupport.gmu.edu/, and the OSS staff will follow up with the student.

For additional information on the College of Education and Human Development, please visit our website https://cehd.gmu.edu/.

**Class Schedule**

Note: Faculty reserves the right to alter the schedule as necessary, with notification to students.

<table>
<thead>
<tr>
<th>Date</th>
<th>Class Topic</th>
<th>Reading &amp; Assignments Due by the End of the Week</th>
</tr>
</thead>
</table>
| Tuesday, January, 24     | Introduction/Organization: Pretest; research traditions; common methodological concerns; nomothetic vs ideographic methods; causation; internal and external validity; dependent and independent variables; what is published in special education? | Mastropieri, et al. (2009)
|                          |                                                                              | Odom, Brantlinger, Gersten, Horner, Thompson, & Harris (2005)                                              |
|                          | *Face-to-face check-in*                                                     | *Matching Activity*                                                                                     |
| Tuesday, January, 31     | Evidence-Based Practices in Special Education: Quality Indicators           | Cook, Tankersley, & Landrum (2009)
|                          |                                                                              | EBPs Exploration Activity                                                                              |
| Tuesday, February, 7     | Qualitative Research designs: Quality Indicators                            | McDuffie & Scruggs (2008)
|                          |                                                                              | Braintlinger, Jiménez, Klinger, Pugach & Richardson (2005)                                                |
|                          |                                                                              | Leko & Brownell (2011)                                                                                   |
|                          | *Discussion Board Activity*                                                 | *Qualitative Study Peer Review*                                                                         |
| Tuesday, February, 14    | Qualitative Research: Application of the QIs and NVivo demo                 | Trainor & Graue (2014)
<p>|                          |                                                                              | Pugach, Mukhopadhyaya, &amp; Gomez-Najarro (2014)                                                            |
|                          | <em>Face-to-face check-in</em>                                                     |                                                                                                           |</p>
<table>
<thead>
<tr>
<th>Date</th>
<th>Class Topic</th>
<th>Reading &amp; Assignments Due by the End of the Week</th>
</tr>
</thead>
</table>
| Tuesday, February, 21 | Survey Research                                                             | Burns & Ysseldyke (2009)  
Weston, Curran, Majsterek, & Prigge (2010)  
Gehlbach & Brinkworth (2011) |
|                |                                                                              | **Survey Study Peer Review**                                                                                 |
| Tuesday, February, 28 | Single-Subject Research: QIs                                               | Horner, Carr, Halle, McGee, Odom, & Wolery (2005)  
Regan, Mastropieri, & Scruggs (2005) |
|                |                                                                              | **Discussion Board Activity**                                                                                |
| Tuesday, March, 7   | Single Subject Research: Application of QIs                                  | Lane, Kalberg, & Shepcaro (2009)  
|                |                                                                              | **Single-subject Study Peer Review**                                                                         |
| Tuesday, March, 21  | Mixed Methods Research                                                       | Klingner & Boardman (2011)  
Bishop, Brownell, Klingner, Leko, & Galman (2010) |
|                |                                                                              | **Comparative Table Due**                                                                                   |
| Tuesday, March, 28  | Fidelity of Intervention: Fidelity measurements and quality                  | Gresham, McMillan, Beebe-Frankenberger, & Bocian (2000)  
|                |                                                                              | **Fidelity of Intervention Activity**                                                                        |
| Tuesday, April, 4   | Group Experimental and Quasi-Experimental research designs overview (pre-existing groups) | Gersten, Fuchs, Compton, Coyne, Greenwood, & Innocenti (2005)  
Cook, Cook, Landrum, & Tankersley (2009)  |
<p>|                |                                                                              | <strong>Discussion Board Activity</strong>                                                                                |</p>
<table>
<thead>
<tr>
<th>Date</th>
<th>Class Topic</th>
<th>Reading &amp; Assignments Due by the End of the Week</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tuesday, April, 11</td>
<td>Group Experimental: Application of QIs</td>
<td>Gersten, Baker, Smoth-Johnson, Dimino, &amp; Peterson (2006)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marshak, Mastropieri, &amp; Scruggs (2011)</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Quantitative Study Peer Review</strong></td>
</tr>
<tr>
<td>Tuesday, April, 18</td>
<td>Group Experimental: QIs; Assumptions of ANOVA, SPSS tutorials: Descriptive Percent, One-Way ANOVA, Paired t-tests, Paired samples t-test</td>
<td>Nagro &amp; Cornelius (2013)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Cohen (1994)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Gliner, Leech, &amp; Morgan (2002)</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>SPSS Activity</strong></td>
</tr>
<tr>
<td>Tuesday, April, 25</td>
<td>Peer Feedback</td>
<td>Method Section Drafts Due</td>
</tr>
<tr>
<td></td>
<td><strong>Face-to-face check-in</strong></td>
<td></td>
</tr>
<tr>
<td>Tuesday, May, 2</td>
<td>Final Exam</td>
<td>Method Sections are Due</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Final Exam</td>
</tr>
</tbody>
</table>

**Assessment Rubric(s)**  
See above

**Appendix**  
Required Readings


http://www.cec.sped.org/content/NavigationMenu/Publications2/exceptionalchildren/


