Division: Theoretical and Behavioral Foundations  
Program Area: Educational Evaluation and Research  
Course #: EER 7640  Section#: 901 (CRNA only) and 902 (Non Nursing)  
Course Title: Introduction to Quantitative Research  
Term/Year: Winter, 2017  
Course Location: Oakland Center  
Day & Time: Thursday, 5:00 pm  
Instructor: Professor Shlomo Sawilowsky  
Office Address: 371 Education  
Office Hours: Thursday, 3:50-4:50 pm, Oakland Center Faculty Offices  
Office Phone #: 313.577.5244  
EMAIL: professorshlomo@gmail.com

Course Description:
Basic skills in educational research; nomenclature, problem, theory, hypothesis formulation; bibliographical and documentary techniques; retrieval systems; development of data gathering instrumentation; computer orientation and research uses; collection and organization of data; manuscript development, report writing; techniques, methodologies for descriptive and experimental inquiry.

Course Outcomes: It is the purpose of this course to provide experiences that will enable the student to:
1. Utilize research methods in attacking the common problems that arise in the practice of education.
2. Gain knowledge of research which will permit objective decisions concerning curriculum, methods, and administration.
3. Critically and realistically evaluate the findings and reports in research literature.
4. Develop an understanding of research processes that will facilitate willing and active cooperation in needed experimentation.

Texts:
Section 902 (Non Nurse Anesthesia)
Section 901 (CRNA Section)

Both sections use Campbell & Stanley (1963).


**Course Assignments**

1. Small Critiques (3 pages double spaced) - two assigned articles. (2nd article at discretion of Instructor, based on attendance rates.)
2. Major Critique (5 pages double spaced) - data-based article within your major; must receive instructor prior approval of article.
3. Mid-term (at discretion of Instructor).
4. Final Exam (at discretion of Instructor).

The Final Exam will be eliminated if, in the opinion of the instructor, students fulfill their responsibilities as outlined in the Graduate Handbook, e.g., punctual and regular attendance, and responsible demeanor in class.

**Value of Assignments**

1. Quantitative Writing Homework: 10 pts.
2. Assigned Article Critique: 20 pts each. Note DUE dates given in class - NO EXCEPTIONS!
3. Student Selected Article w/Instructor Approval: Critique 70 pts.
4. If Final Exam (50 item multiple choice) becomes necessary, it will count 100 pts, and grade will be assigned out of 200 points.

**Topics** [Note: (1) refers to Section 902 followed by chapter, (2) refers to Section 901 followed by chapter, e.g., (1)1 refers to Fraenkel & Wallen Chapter 1; (2)2 refers to Polit & Beck Chapter 2.] Adjustments may be made during the semester by the instructor.

<table>
<thead>
<tr>
<th>Topic</th>
<th>Chapter/ Readings</th>
<th>Assignment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Introduction, Acquiring knowledge</td>
<td>(1)1; (2)1</td>
<td></td>
</tr>
<tr>
<td>Quantitative Writing Requirements</td>
<td></td>
<td>CITI</td>
</tr>
<tr>
<td>Scientific method, IVs, DVs, Problem</td>
<td>(1)3; (2)2,3</td>
<td></td>
</tr>
<tr>
<td>statement, Operational definitions,</td>
<td></td>
<td></td>
</tr>
<tr>
<td>limitations &amp; assumptions</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ethics in research, HIC</td>
<td>(1)4; (2)7, CITI</td>
<td></td>
</tr>
<tr>
<td>Sampling: Assignment Selection</td>
<td>(1)5,6; (2)12; Sawilowsky</td>
<td>Article 1</td>
</tr>
<tr>
<td></td>
<td>(2003)</td>
<td></td>
</tr>
<tr>
<td>Instrument Reliability</td>
<td>(1)8; (2)13,14; Sawilowsky</td>
<td></td>
</tr>
<tr>
<td>Validity of Instrument Use</td>
<td>(2002)</td>
<td></td>
</tr>
<tr>
<td>----------------------------</td>
<td>--------</td>
<td></td>
</tr>
<tr>
<td>(1)8; (2), 15 Sawilowsky(2002)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Descriptive Statistics</td>
<td>(1)10; (2)16</td>
<td></td>
</tr>
<tr>
<td>CITI DUE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Inferential Statistics</td>
<td>(1)11; (2)17</td>
<td></td>
</tr>
<tr>
<td>Article 1 DUE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Inferential Statistics, Effect sizes.</td>
<td>(1)12; (2)18</td>
<td></td>
</tr>
<tr>
<td>Midterm exam (if required.)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CITI DUE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Experimental research design</td>
<td>(1)13; (2)9,10; Campbell &amp; Stanley</td>
<td></td>
</tr>
<tr>
<td>Begin obtaining approval for Article 2 from Instructor</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Quasi-Experimental design</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Quasi-Experimental design</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Causal-Comparative, Ex post facto, Correlational design, Internal and External validity</td>
<td>(1)16, 15; (2)11</td>
<td></td>
</tr>
<tr>
<td>Survey design, Documentary analysis</td>
<td>(1)17, 20; (2)</td>
<td></td>
</tr>
<tr>
<td>Article 2 DUE April 27, 2017</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Grading Scale (%)**

A = 90 – 100
B+ = 83 – 84
C+ = 73 - 74
A- = 85 – 89
B = 78 – 82
C = 68 - 72
B- = 75 – 77
F = 67 and below

**IMPORTANT NOTES**

1. **THE WORK YOU TURN IN IS ASSUMED TO BE YOUR OWN. THERE IS A ZERO TOLERANCE POLICY FOR PLAGIARISM OR OBTAINING UNAUTHORIZED OUTSIDE HELP ON GRADED ASSIGNMENTS. IF A QUESTION ARISES ABOUT THE WORK TURNED IN, THE MATTER WILL BE REFERRED TO THE ASSISTANT DEAN, AND IF VERIFIED WILL RESULT IN AN "F" AND RECOMMENDATION FOR EXPULSION. SEE FURTHER POLICIES BELOW.**

2. **NO CLASS DURING SPRING BREAK, THURSDAY, MARCH 16, 2017**

3. **NO CLASS APRIL 13, 2017**

4. **TURN YOUR CELL PHONE OFF PRIOR TO CLASS!**
Academic Dishonesty/Plagiarism

The College of Education has a “zero tolerance” approach to plagiarism and other forms of academic dishonesty. (See Student Code of Conduct http://doso.wayne.edu/assets/student-code-of-conduct-brochure.pdf). Plagiarism includes copying material (any more than 5 consecutive words) from outside texts or presenting outside information as if it were your own by not crediting authors through citations. It can be deliberate or unintended. Specific examples of academic dishonesty, including what constitutes plagiarism, can be found in the University’s Undergraduate Bulletin (http://bulletins.wayne.edu/ubk-output/index.html) and Graduate Catalog (http://www.bulletins.wayne.edu/gbk-output/index.html) under the heading “Student Ethics.” These university policies are also included as a link on Blackboard within each course in which students are enrolled. It is every student’s responsibility to read these documents to be aware which actions are defined as plagiarism and academic dishonesty. Sanctions could include failure in the course involved, probation and expulsion, so students are advised to think carefully and thoroughly, ask for help from instructors if it is needed, and make smart decisions about their academic work.

Enrollment/Withdrawal Policy

Students must add classes no later than the end of the first week of classes. This includes online classes. Students may continue to drop classes (with full tuition cancellation) through the first two weeks of the term. Students who withdraw from a course after the end of the 5th week of class will receive a grade of WP, WF, or WN.

- WP will be awarded if the student is passing the course (based on work due to date) at the time the withdrawal is requested
- WF will be awarded if the student is failing the course (based on work due to date) at the time the withdrawal is requested
- WN will be awarded if no materials have been submitted, and so there is no basis for a grade

Students must submit their withdrawal request on-line through Pipeline. The faculty member must approve the withdrawal request before it becomes final, and students should continue to attend class until they receive notification via email that the withdrawal has been approved.

Beginning the fifth week of class students are no longer allowed to drop but must withdraw from classes. The last day to withdraw will be at the end of the 10th
full week of classes. The withdrawal date for courses longer or shorter than the full 15-week terms will be adjusted proportionately.
See the university webpage for full details: http://reg.wayne.edu/students/information.php

Attention Students with Disabilities:
If you have a documented disability that requires accommodations, you will need to register with Student Disability Services (SDS) for coordination of your academic accommodations. The Student Disability Services (SDS) office is located at 1600 David Adamany Undergraduate Library in the Student Academic Success Services department. SDS telephone number is 313-577-1851 or 313-202-4216 (video phone). Once you have your accommodations in place, I will be glad to meet with you privately during my office hours to discuss your special needs. Student Disability Services’ mission is to assist the university in creating an accessible community where students with disabilities have an equal opportunity to fully participate in their educational experience at Wayne State University.
Please be aware that a delay in getting SDS accommodation letters for the current semester may hinder the availability or facilitation of those accommodations in a timely manner. Therefore, it is in your best interest to get your accommodation letters as early in the semester as possible.

Religious Observance Policy:
Because of the extraordinary variety of religious affiliations represented in the University student body and staff, the Wayne State University calendar makes no provision for religious holidays. It is University policy, however, to respect the faith and religious obligations of the individual. Students who find that their classes or examinations involve conflicts with their religious observances are expected to notify their instructors well in advance so that alternative arrangements as suitable as possible may be worked out.

Wayne State University Writing Center
The Writing Center (2nd floor, UGL) provides individual tutoring consultations free of charge for students at Wayne State University. While the center serves both graduate and undergraduate students, undergraduate students in General Education courses, including composition courses, receive priority for tutoring appointments. The Writing Center serves as a resource for writers, providing tutoring sessions on the range of activities in the writing process – considering the audience, analyzing the assignment or genre, brainstorming, researching, writing drafts, revising, editing, and preparing documentation. The Writing Center is not an editing or proofreading service; rather, students are guided as they engage collaboratively in the process of academic writing,
from developing an idea to correctly citing sources. To make an appointment, consult the Writing Center website: http://www.clas.wayne.edu/writing/.

To submit material for online tutoring, consult the Writing Center HOOT website (Hypertext One-on-One Tutoring) http://www.clas.wayne.edu/unit-inner.asp?WebPageID=1330.