

EPSY 5244: Survey Design, Sampling, & Implementation
Fall Semester, 2011
Wednesday, 5:15 – 8:00 PM

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Classroom: Elliott Hall N119
Office: 170 Education Sciences
Office Hours: Monday 12-2
Or by appointment

Texts:

Dillman, D.A., Smyth, J.D., & Christian, L.M. (2010). *Internet, mail, and mixed-mode surveys: The tailored design method* (3rd ed.). Hoboken, NJ: John Wiley & Sons, Inc.

Optional [Required for QME Students]:

Lohr, S.L. (2010). *Sampling: Design and analysis* (2nd ed.). Boston, MA: Brooks/Cole Publishing.

Additional Reading (provided in class):

Krosnick, J.A. (1999). Survey research. *Annual Review of Psychology*, 50, 537-567.



at <http://www.itemanalysis.com/>

The Course:

In this course you will develop an understanding of basic survey research methods, particularly those that apply to educational settings with research applications in education and the social sciences. You will develop a practical understanding of the principles of sampling and data analysis. The course is taught from the theoretical basis of Social Exchange Theory and will include the review of state-of-the-art research on survey methods.

Primary Course Objectives:

You will be able to apply basic survey research methods to the design of survey instruments, as well as the collection, analysis, and interpretation of responses. Generally, you will be able to

- ◆ Evaluate the appropriateness of survey research methods given the research context,
- ◆ Plan and execute a pilot test of survey instruments for instrument refinement,
- ◆ Identify sources of sampling and non-sampling errors,
- ◆ Develop basic sampling designs,
- ◆ Select analysis methods appropriate for survey data,
- ◆ Write a complete proposal for a survey research project.

Requirements:

Readings are listed on the day for which the reading applies. Read the material prior to class. We will discuss most of the material in the text during class. Much of the material concerning measurement and the application of certain statistical techniques in the analysis and interpretation of survey results will be presented in class but is not presented in the text.

We will take as much time as is necessary to complete understanding of the material before we move on. There is time during each session to allow for extended time on a topic. The material is cumulative to a certain extent so it is imperative that you keep up with the workload. You are encouraged to work with a partner, as long as this works for you, and to utilize office hours to complete your understanding of the material from the moment you begin to feel uncertain. It is during these moments of uncertainty that a great deal of learning can occur.

Several projects will be required to assess student achievement of the above objectives. These projects include the following: (1) instrument plan, (2) instrument draft, (3) instrument pilot test, (4) sampling plan, and (5) data analysis plan. The tasks in whole constitute a comprehensive survey proposal. A more detailed description of each task is provided at the end of this syllabus. The first two components of the survey project will be exchanged in class for review by one or two other student. The authors will be able to make modifications based on this review prior to submitting the work for evaluation by the instructor one week later. Finally, we will have time throughout the semester to discuss individual projects.

There will also be one sample exercise and one data analysis exercise. Each component of the survey project (tasks 1-5) is worth 20 points; the sampling and data analysis exercises are worth 25 points each, for a total of 150 points.

Instruction:

Each course meeting will include lecture on key points of the day's topic(s) and a period of questions and answers. Many of the sessions will include time to debate issues and challenge assumptions raised by students, the instructor, and the text author. Several sessions will include small group work (e.g., time to review text book material and others presented in class). As the instructor, I assume the following responsibilities: to present material in a clear and contextualized format, to provide opportunity for students to pursue additional clarification in and out of class, to develop and employ fair and meaningful assessment activities, to use results of evaluation activities for instructional feedback and course planning, and to provide opportunities for recourse if students believe they have been unfairly evaluated.

Technology:

Technology is becoming increasingly important in education and we will pursue learning with the aid of technology in several ways. Students will be allowed to submit projects electronically. Students are encouraged to investigate survey-related web sites to support their reading and project work. A page of links to additional readings and resources is provided at the class website. During discussions of sampling and data analysis, computer demonstrations will be conducted in class to illustrate various topics. At least one class session will be held in a computer lab to conduct hands-on computing using software to complete the sampling and data analysis exercises.

Diversity:

The College of Education and Human Development is committed to have every course contribute to our understanding of diversity, including but not limited to: age, creed, disability, ethnicity, gender, global perspectives, international background, language background, learning differences, marital status, multicultural perspectives, national origin, public assistance status, race, religion, sex, sexual orientation, and veteran status. Each of these characteristics plays a role in educational and psychological measurement and research. They are factors that contribute to individual and group differences -- they (may) affect the constructs we set out to measure and the way we interpret and report survey results. These issues will be addressed throughout the course and will be used as topics of debate and considerations of selecting survey methods to understand the role of group differences in evaluating survey results.

It is the University Policy to provide, on a flexible and individualized basis, reasonable accommodations to students who have disabilities that may affect their ability to participate in course activities or to meet course requirements. Students with disabilities are encouraged to contact me when possible to discuss their individual needs for accommodations.

Late Work and Incompletes

Late work will be accepted only if I am previously notified – no points will be deducted for late work that was previously agreed upon. It is up to you to stay on track. An incomplete (“I”) will be assigned only if agreed to prior to the last week of class. If course work is incomplete and no prior notification has been given, the grade based on points obtained will be awarded. No options will be given at that point to submit incomplete work.

Returning Papers, Exams, and Projects

Given the size of the class and the extensiveness of student projects, I will try to return work by the following class session, but can't guarantee anything! Priority will be given to those students who submit their work on schedule. If, at the end of the semester, you would like to receive remaining work through U.S. mail, submit a self-addressed stamped envelope. Otherwise, you may pick up final projects once grades are submitted in the Psychological Foundations' office in 250 Education Sciences Building with a student ID. Papers will be available there until February. Uncollected papers will be destroyed just prior to fall semester the following year.

Evaluation (http://www1.umn.edu/usenate/u_senate/usenpol.html):

A - achievement that is outstanding relative to the level necessary to meet course requirements.

B - achievement that is significantly above the level necessary to meet course requirements.

C - achievement that meets the course requirements in every respect.

D - achievement that is worthy of credit even though it fails to meet fully the course requirements.

I – (Incomplete) assigned at the discretion of the instructor when, due to extraordinary circumstances, e.g., hospitalization, a student is prevented from completing the work of the course on time. Requires a written agreement between instructor and student prior to the last day of class.

Academic dishonesty: academic dishonesty in any portion of the academic work for a course shall be grounds for awarding a grade of F or N for the entire course.

Letter Grade	Percentage
A	95-100%
A-	90-94.99%
B+	85-89.99%
B	80-84.99%
B-	75-79.99%
C+	70-74.99%

How to Access Your Grades

Go to OneStop for Students (<http://onestop.umn.edu/onestop/>), click on Grades & Transcripts; on the right side under Quick Links, click on Grades/Unofficial transcript.

The Senate affirms the standard (first adopted by the University Senate on February 16, 1922, and reaffirmed 1993) that one semester credit is to represent, for the average University of Minnesota undergraduate student, three hours of academic work per week (including lectures, laboratories, recitations, discussion groups, field work, study, and so on), or approximately 45 hours of work over the course of an enrollment period. Expectations of faculty and students will be made clear. It is expected that the academic work required of graduate and professional students will exceed three hours per credit per week or 45 hours per semester.

University of Minnesota Policy on Scholastic Misconduct

(http://www1.umn.edu/regents/policies/humanresources/Academic_Misconduct.pdf)

Scholastic misconduct is broadly defined as "any act that violates the rights of another student in academic work or that involves misrepresentation of your own work."

Scholastic dishonesty includes, (but is not necessarily limited to): cheating on assignments or examinations; plagiarizing, which means misrepresenting as you own work any part of work done by another; submitting the same paper, or substantially similar papers, to meet the requirements of more than one course without the approval and consent of all instructors concerned; depriving another student of necessary course materials; or interfering with another student's work.

Citations/Avoiding Plagiarism

<http://swc.umn.edu/writinglinks.htm>

From the UM's Student Writing Center. Scroll down to find "Citations/Avoiding Plagiarism."

Avoiding Plagiarism

<http://ollie.dcccd.edu/library/module4/M4-VII/plagar.htm>

Details what plagiarism is, illustrates with examples of "what not to do", and links to other sites that "further define plagiarism"

University Policies

See <http://onestop.umn.edu/onestop/faculty/Teaching/Policies.html> for a list of policies related to teaching with links to those policies. Also see

<http://www1.umn.edu/usenate/usen/policies.html> for University Senate policies related to Teaching/Education.

Statement on accommodations

It is University policy to provide, on a flexible and individualized basis, reasonable accommodations to students who have documented disability conditions (e.g., physical, learning, psychiatric, vision, hearing, or systemic) that may affect their ability to participate in course activities or to meet course requirements. Students with disabilities are encouraged to contact Disability Services and their instructors for a confidential discussion of their individual need for academic accommodations. Disability Services is located in Suite 180 McNamara Alumni Center, 200 Oak Street. Staff can be reached by calling 612-626-1333 voice or TTY.

Statement on mental health services

As a student you may experience a range of issues that can cause barriers to learning, such as strained relationships, increased anxiety, alcohol/drug problems, feeling down, difficulty concentrating and/or lack of motivation. These mental health concerns or stressful events may lead to diminished academic performance or reduce a student's ability to participate in daily activities. University of Minnesota services are available to assist you with addressing these and other concerns you may be experiencing. You can learn more about the broad range of confidential mental health services available on campus via the Student Mental Health Website at <http://www.mentalhealth.umn.edu>.

Statement on classroom conduct

(<http://www1.umn.edu/usenate/policies/classexpectguide.html> and/or http://www1.umn.edu/regents/policies/academic/Student_Conduct_Code.pdf)

All students at the University have the right to a civil, productive, and stimulating learning environment. In turn, instructors have a responsibility to nurture and maintain such an environment. Lively, even heated, discussion is not disruptive behavior. Both instructors and students have a fundamental obligation to respect the rights of each other and an equally fundamental obligation to respect the instructional setting as a place for civil, courteous behavior.

Teaching and learning are vital to the mission of the University. The University believes teaching responsibilities to be of primary importance for its instructors (faculty, graduate teaching assistants, instructors, teaching specialists, etc.) such that performance by instructors shall be taken into consideration in determining salary increases, tenure, retention, and promotion.

Statement regarding sexual harassment

<http://www1.umn.edu/regents/policies/humanresources/SexHarassment.pdf>

"Sexual harassment" means unwelcome sexual advances, requests for sexual favors, and/or other verbal or physical conduct of a sexual nature when: (1) submission to such conduct is made either explicitly or implicitly a term or condition of an individual's employment or academic advancement in any University activity or program; (2) submission to or rejection of such conduct by an individual is used as the basis of employment or academic decisions affecting this individual in any University activity or program; or (3) such conduct has the purpose or effect of unreasonably interfering with an individual's work or academic performance or creating an intimidating, hostile, or offensive working or academic environment in any University activity or program. University policy prohibits sexual harassment. Complaints about sexual harassment should be reported to the University Office of Equal Opportunity, 419 Morrill Hall.

Support Services

<http://www1.umn.edu/ohr/teachlearn/syllabus/specialserv.html>

College of Education & Human Development Mission Statement

The new College of Education and Human Development is a world leader in discovering, creating, sharing, and applying principles and practices of multiculturalism and multidisciplinary scholarship to advance teaching and learning and to enhance the psychological, physical, and social development of children, youth, and adults across the lifespan in families, organizations, and communities.

Department of Educational Psychology Mission Statement

Educational psychology involves the study of cognitive, emotional, and social learning processes that underlie education and human development across the lifespan. Research in educational psychology advances scientific knowledge of those processes and their application in diverse educational and community settings. The department provides training in the psychological foundations of education, research methods, and the practice and science of counseling psychology, school psychology, and special education. Faculty and students provide leadership and consultation to the state, the nation, and the international community in each area of educational psychology. The department's scholarship and teaching enhance professional practice in schools and universities, community mental health agencies, business and industrial organizations, early childhood programs, and government agencies.

Quantitative Methods in Education Mission Statement

To prepare students to become cutting-edge professionals in educational measurement, evaluation, statistics, and statistics education, through excellence in teaching, research, and service; and through investigating and developing research methodology in education.

Graduate Student Learning Outcomes

<i>Knowledge Development</i> Ability to master a body of knowledge that characterizes a field of study
<i>Higher Order Thinking Skills</i> Ability to think analytically and draw connections between divergent information sources
<i>Communication Skills</i> Ability to demonstrate effective written and oral communication skills
<i>Disciplinary Expertise</i> Ability to use the tools of the discipline to perform scholarly work
<i>Professional and Ethical Development</i> Ability to function as a practicing, ethical member of the profession
<i>Originality/Innovation</i> Ability to generate novel ideas, methods, approaches, or performances in one's discipline

A Survey Proposal

1. Instrument plan
 - a. Explain the intended purpose and context for the survey (the BIG questions the survey is trying to answer—2 to 3 questions—from which most other questions will come)
 - Program evaluation questions or
 - Research problem, questions
 - b. Describe the type of survey you will develop
 - c. Define the topics you will cover or the constructs you will measure
 - d. Provide a complete schedule from design to reporting (one that is realistic, not within the timeline of this course)
2. A draft instrument – fully formatted
 - a. A pre-notice letter (or card or email)
 - b. A consent form (use template from web)
 - c. The survey instrument
 - An introduction to the survey (may be cover letter or 1st page of survey)
 - Complete instructions
 - 12-15 questions
3. Sampling plan
 - a. Describe the research design and why it is appropriate in your context (use the research classifications provided in class)
 - b. Explain your procedures for securing the sampling frame
 - c. Specify the sampling plan and sample size
 - Completely describe sampling/selection procedures
 - Show complete computations for sample size (even if you are not sampling)
 - d. Describe limitations and address all sources of error (use online examples as models)
4. Instrument pilot test
 - a. Describe pilot test (10 respondents) & think-aloud procedures (2 respondents)
 - b. Summarize results (frequencies of responses & input from think-alouds)
 - c. Describe any revisions made to survey based on results
 - d. Do you have any additional recommendations for implementation based on your experience from the pilot
5. Data analysis plan
 - a. Describe your sample in terms of the sampling design and what this means for analysis (what are your actual analysis options given the sampling design)
 - b. Explain the options you have for presenting descriptive results (graphical displays, tables of frequencies, etc.)
 - c. Describe the analysis procedures for each major evaluation or research question
 - Specify the statistic or statistical test used
 - Why is this appropriate?
 - How will you interpret the results? What about generalizability?

Each component of the project will be explained in greater detail as the course progresses.