# INLS 581 Research Methods, Fall 2013 Tuesday/Thursday 11am-12:15pm, Alumni 203

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## Objective

Students will gain an understanding of the concepts and terminology used in social science research and of the methods used to perform this research. This course introduces students to: (1) scientific inquiry and ethics; (2) research design and various data collection techniques; and (3) basic techniques for data analysis.

### **Course Materials**

The textbook that we will be using is *The Practice of Social Research*, by Earl Babbie. It is available through the Student Store as well as online. We will also be supplementing the textbook with other readings; these will be available on the Sakai site under the Resources tab.

#### Assessment

Your final grade will be based on the following:

Attendance and Participation	15%
Exams	54%
Discussion Leading	3%
Mini-Ethnography	14%
Group Experiment Design Project	14%

### **Attendance and Participation**

Your attendance and participation are critical to your success in this class. Other than the discussion leading, there are no small assignments or problem sets, so it is your job to do the readings ahead of time and come to class ready to discuss and engage in exercises to apply them. This will ensure that you comprehend and retain the material. If you have any problems understanding anything that we cover, I encourage you to raise those questions or approach me outside of class. In the last few weeks of the semester, we will be covering quantitative analysis, and in those weeks, I will be going over examples in class. It will be useful for you to try these yourself after class to make sure you understand.

Students are expected to come to class and arrive on time. Please let me know if you are not going to be in class. Repeated absences or tardiness will affect your participation grade. You are welcome to use laptops for class-related activities.

Please read the readings that have been assigned for each class session prior to coming to class and be ready to discuss them. You may want to think about questions that you need clarification on, issues that you would like to discuss with your classmates, and how you might be able to apply the material to your interests/work.

# Exams

There will be three exams throughout the semester. Each exam will cover the material covered in the corresponding unit and they are not cumulative. The exams will help you to confirm that you have acquired familiarity with the concepts covered and that you will be able to apply them to solve problems of interest to you. As such, they will be comprised of a combination of multiple-choice, fill in the blank and short answer questions. There may be questions asking you to consider particular research problems and discuss how you would solve them.

# **Discussion Leading**

Throughout the semester, there will be opportunities to lead discussion on the assigned readings. There are two parts to this. First, at least 48 hours prior to the class time on the day you sign up to lead discussion, please send me an email with some thoughts on the reading (4-6 sentences) and 3-5 questions for the class to think about. I will send feedback to you; then please send this out to the class. On the day of class, be prepared to discuss your thoughts in more depth and nurture a discussion around your questions.

We will sign up for slots to lead discussion online, so please look out for this.

# Mini-Ethnography

This assignment will involve selecting a group or setting to observe, and a specific research question to answer. Here are some examples:

- How scientists find information
- How doctors and nurses communicate
- How homeless people exchange information and their information needs
- What information is shared in support groups and the meaning that this information has

For more examples, please see the Khoo et al. (2012) paper that is listed for the Ethnography session. Please make sure that I approve your group/site before you begin.

For the purposes of this assignment, we will work under the assumption that you are not attempting to publish any results you may, and we will not be applying for IRB approval.

Please see me if you have any concerns about this. Consider any ethical issues that may be involved with the site that you select.

In this assignment, we will engage in *participant observation*. Please make at least three visits to the site that you decide upon. While you are there, you should take handwritten notes of the activity that you observe. When you first arrive, you may want to spend a few minutes describing the scene. You may find it useful to draw a map.

Try to capture as much detail as possible. This may include details of the site itself, e.g. layout, lighting, furniture, etc., interpersonal interactions, and individual behaviors, including gestures and language. Note key phrases used by your informants, as these can help you understand the assumptions and life-worlds of those whom you are observing. After each observation session, you should spend some time reviewing your notes, and then adding some high-level observations.

Please turn in a 3-4 page paper addressing your research question on the due date indicated for the Mini-Ethnography. The Mini-Ethnography will be graded based on the extent to which it answers the research question and the detail of the examples. Please submit a scan of your written notes along with your paper.

# **Group Experiment Design Project**

You will work in a group of 3-4 people. Together, you will select a problem of interest. Examples include:

- How do tags affect people's perceptions of the credibility of an article?
- Does the rank of a search result affect the probability that it will be clicked on?
- How does presentation format affect comprehensibility of information?
- How do different types of metadata affect one's desire to connect with a person depicted in a profile?

The question could be similar to one that has been previously been researched, as long as you describe what has already been done, and what is a little different about the way you are doing it, and/or that you are replicating it. Conduct a literature review of research that has previously been done on your problem and use it to inform your design. In your Methods section, make sure that you specify the target population, one or more independent factors with different levels, a dependent variable, and how you will simulate/measure these.

You are not responsible for carrying out your experiment. However, you should indicate how you will conduct the analyses, and what contribution your experiment could potentially have to the field.

Your final deliverable should consist of the following:

Title page (1 page) Abstract (250 words) Introduction (1-2 pages) Literature Review (3-4 pages) Methods (3-4 pages) Significance and Limitations (1-1.5 pages)

## **Assignment Submission**

Please name each file that you submit using the following convention: LastName\_AssignmentName. For example, if your name were John Smith, you might turn in an ethnography assignment, "Smith\_Ethnography.pdf". Assignments should be double-spaced in a standard 12-point font.

Please email assignments to me by 9 a.m. on the due dates indicated for each on the syllabus. Late assignments will be penalized by 5% for each day they are late. Please discuss with me in advance if you will have a problem submitting an assignment on the day it is due.

Graduate		Undergraduate	Undergraduate	
95-100	Н	95-100	А	
90-94	P+	90-94	A-	
85-89	Р	87-89	B+	
80-84	Р-	84-86	В	
70-79	L	80-83	B-	
		77-79	C+	
		74-76	С	
		70-73	C-	
69 and below	F	67-69	D+	
		64-66	D	
		60-63	D-	
		59 and below	F	

### **Grading Scale:**

### Software

In this class, I will be using JMP to demonstrate the quantitative data analysis techniques. You are free to use another statistical package on Exam 3 if you choose (please clear it with me if it is not SAS, SPSS or R), and I will be happy to help you with any problems you may encounter using Stata, SPSS or R.

The Institute for Digital Research and Education at UCLA, for example, maintains a site of resources for various packages (Stata, SAS, SPSS, Mplus and R). The entry page for IDRE Statistical Computing resources is here: http://www.ats.ucla.edu/stat/.

## Honor Code

I encourage you to discuss class material with other students. However, with the exception of the group project at the end, the assignments that you turn in and the quizzes should be your own individual work. If you use material from other sources, please make sure that you give appropriate credit. For more information on how to do this, you can visit: <u>http://www.lib.unc.edu/instruct/plagiarism/</u>. The Purdue Online Writing Lab (OWL) is a useful resource on academic writing in general: <u>http://owl.english.purdue.edu/owl/</u>.

Please make sure to familiarize yourself with the Honor Code. For more information about the Honor Code, please visit <u>http://honor.unc.edu</u>.

## **Syllabus Changes**

The syllabus may be revised throughout the semester. When there is a revision, I will make an announcement either in class or through a Sakai announcement. The current version will be available on Sakai.

Date	Торіс	Due			
	Unit 1: Conceptualizing Research				
Aug. 20	Overview of research				
Aug. 22	Paradigms and theories				
Aug. 27	Research design				
Aug. 29	Conceptualization, operationalization, and measurement				
Sep. 3	Sampling				
Sep. 5	Research ethics (guest speaker)				
	Unit 2: Research Methods				
Sep. 10	Survey research	Exam 1			
Sep. 12	Questionnaire design				
Sep. 17	Qualtrics hands-on session (lab)				
Sep. 19	Indices and scales				
Sep. 24	Qualitative field research				
Sep. 26	Interviews				
Oct. 1	Focus groups				
Oct. 3	Ethnography				
Oct. 8	Qualitative data analysis				
Oct. 10	Experiments I				
Oct. 15	Experiments II				
Oct. 17	Fall break (no class)				
Oct. 22	Evaluation research (guest speaker)				
Oct. 24	Exam 2	Exam 2			
Oct. 29	Bibliometrics (guest speaker)				
	Data Analysis				

#### Schedule at a Glance

Oct. 31	Data collection techniques (e.g. elicitation techniques,	
	diaries, think-aloud)	
Nov. 5	Textual analysis software (guest speaker)	Mini-
		Ethnography
Nov. 7	Content analysis	
Nov. 12	Quantitative data analysis (frequencies and descriptive	
	statistics)	
Nov. 14	Quantitative data analysis (chi-square and t-test)	
Nov. 19	Quantitative data analysis (ANOVA)	
Nov. 21	Quantitative data analysis (correlation and regression)	
Nov. 26	Special topics	Group
		Experiment
Nov. 28	Thanksgiving (no class)	
Dec. 3	Exam 3	Exam 3

# Schedule

Aug. 20: Introduction; go over syllabus. Overview of Research.

Babbie, Ch. 1 Human Inquiry and Science

Additional reference:

Hjørland, B. (2000). Library and information science: practice, theory, and philosophical bias. *Information Processing & Management*, *36*(3), 501-531.

Aug. 22: Paradigms and Theories Babbie, Ch. 2 Paradigms, Theories and Social Research

Aug. 27: Research design; Evaluating researchBabbie, Ch. 4 Research DesignAdditional reference: Babbie, Ch. 17 Reading and Writing Social Research

Aug. 29: Conceptualization, operationalization, and measurement Babbie, Ch. 5 Conceptualization, Operationalization and Measurement Held, C., Kimmerle, J., & Cress, U. (2012). Learning by foraging: The impact of individual knowledge and social tags on web navigation processes. *Computers in Human Behavior, 28*, 34-40.

Sep. 3: Sampling Babbie, Ch. 7 The Logic of Sampling

Sep. 5: Research ethics Guest speaker: Dr. Lawrence B. Rosenfeld Babbie, Ch. 3 The Ethics and Politics of Social Research The Belmont Report (http://www.hhs.gov/ohrp/humansubjects/guidance/belmont.html)

Sep. 10: Survey research Exam 1.

Sep. 12: Questionnaire design

Babbie, Ch. 9 Survey Research

Kyrillidou, M., & Persson, A.-C. (2006). The new library user in Sweden: A LibQUAL+ study at Lund University. *Performance Measurement and Metrics*, 7(1), 45-53.

Sep. 17: Qualtrics hands-on session

Wright, K. B. (2005). Researching Internet-based populations: Advantages and disadvantages of online survey research, online questionnaire authoring software packages, and web survey services. *Journal of Computer-Mediated Communication*, *10*(3), article 11. http://jcmc.indiana.edu/vol10/issue3/wright.html

Sep. 19: Indices and scales Babbie, Ch. 6 Indexes, Scales, and Typologies

Sep. 24: Qualitative field research

Babbie, Ch. 10 Qualitative Field Research

Agosto, D. E., & Hughes-Hassell, S. (2006). Toward a model of the everyday life information needs of urban teenagers, part 1: Theoretical model. *Journal of the American Society for Information Science and Technology*, *57*(10), 1394-1403.

Sep. 26: Interviews

Berg & Lune, Ch. 4 A Dramaturgical Look at Interviewing

Fisher, K., Naumer, C., Durrance, J., Stromski, L. & Christiansen, T. (2005). Something old, something new: preliminary findings from an exploratory study about people's information habits and information grounds. *Information Research*, *10*(2) paper 223 [Available at <u>http://InformationR.net/ir/10-2/paper223.html]</u>.

Oct. 1: Focus groups
Berg & Lune, Ch. 5 Focus Group Interviewing
Additional reference:
Gazmararian, J. A., Dalmida, S. G., Merino, Y., Blake, S., Thompson, W., & Gaydos, L.
(2013). What new mothers need to know: Perspectives from women and providers in
Georgia. *Maternal & Child Health Journal.*

Oct. 3: Ethnography Berg & Lune, Ch. 6 Ethnographic Field Strategies Barthet, M., & Dixon, S. (2011). Ethnographic Observations of Musicologists at the British Library: Implications for Music Information Retrieval. In *ISMIR* (pp. 353-358). Additional reference: Khoo, M., Rozaklis, L., & Hall, C. (2012). A survey of the use of ethnographic methods

in the study of libraries and library users. *Library and Information Science Research, 34,* 82-91.

Oct. 8: Qualitative data analysis Babbie, Ch. 13 Qualitative Data Analysis Oct. 10: Experiments (I) Babbie, Ch. 8 Experiments Shah, C., & Marchionini, G. (2010). Awareness in collaborative information seeking. *Journal of the American Society for Information Science and Technology*, *61*(10), 1970-1986.

Oct. 15: Experiments (II) Johnson, T. E., Archibald, T. N., & Tenenbaum, G. (2010). Individual and team annotation effects on students' reading comprehension, critical thinking, and metacognitive skills. *Computers in Human Behavior*, *26*(6), 1496-1507.

Oct. 17: No class; fall break.

Oct. 22: Evaluation research Guest speaker: Dr. Sharon Stoerger, Rutgers University

Oct. 24: Exam 2.

Oct. 29: Bibliometrics Guest speaker: Laura Sheble

Oct. 31: Data collection techniques (e.g. elicitation techniques, diaries, think-aloud) Babbie, Ch. 12 Evaluation Research Hornecker, E., & Nicol, E. (2012). What do lab-based user studies tell us about in-thewild user behavior? Insights from a study of museum interactives. *DIS 2012*.

Nov. 5: Textual analysis software (location: 3010 Davis) Guest speaker: Paul Mihas

Nov. 7: Content analysis Babbie, Ch. 11 Unobtrusive Research, p. 330-342 Willemsen, L. M., Neijens, P. C., Bronner, F., & de Ridder, J. A. (2011). "Highly recommended!" The content characteristics and perceived usefulness of online consumer reviews. *Journal of Computer-Mediated Communication*, *17*, 19-38.

Nov. 12: Quantitative data analysis I (frequencies and descriptive statistics) Babbie, Ch. 14 Quantitative Data Analysis Kim, J. Y., Feild, H., & Cartright, M.-A. (2012). Understanding book search behavior on the Web. *CIKM '12*.

Nov. 14: Quantitative data analysis II (chi-square and t-test) Babbie, Ch. 16 Statistical Analyses, p. 469-480 Koepfler, J. A., & Fleischmann, K. R. (2012). Studying the values of hard-to-reach populations: Content analysis of tweets by the 21<sup>st</sup> century homeless. *iConference 2012*. Additional reference: Institute for Digital Research and Education. What statistical analysis should I use? Statistical analyses using Stata. Available at: http://www.ats.ucla.edu/stat/stata/whatstat/whatstat.htm.

Nov. 19: Quantitative data analysis III (ANOVA) Babbie, Ch. 16 Statistical Analyses, p. 486-488 JMP Case Study Library 06, Priority Assessment

Nov. 21: Quantitative data analysis IV (correlation and regression) Babbie, Ch. 16 Statistical Analyses, p. 465-469 Diriye, A., White, R. W., Buscher, G., & Dumais, S. T. (2012). Leaving so soon? Understanding and predicting web search abandonment rationales. *CIKM '12*. Additional reference: Institute for Digital Research and Education. Regression with Stata: Chapter 1 – Simple and multiple regression. Available at: http://www.ats.ucla.edu/stat/stata/webbooks/reg/chapter1/statareg1.htm.

Nov. 26: Special topics

Nov. 28: No class; Thanksgiving.

Dec. 3: Exam 3.

### Acknowledgements

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