

AAE 770 – Research Methods in Environmental Design

Number & Title of Course: AAE 770 – Research Methods in Environmental Design
Credits: 3

Course Description:

Survey of research methods in environmental design. Quantitative and qualitative methods used in researching design, social/behavioral and technical problems in architecture.

Course Goals & Objectives:

- Achieve at least moderate proficiency in critical reading, critical writing, and critical thinking about design issues.
- Learn how to efficiently access and sort through the diverse sources of information that can connect their research to the body of critical thinking within the design profession and of other fields with relevant knowledge or perspectives.
- Gain familiarity with standard methodologies and techniques used by environmental design researchers, and the ability to determine which technique is appropriate to a given research design.
- Learn how to narrow their thinking from an interest to a topic to a question, be able to develop one or more approaches to answering that question, and then reconnect the answer to the broader context of the issue so that the new knowledge or understanding can be applied by others.

Student Performance Criteria:

A.3. Investigative Skills

Students will be able to gather, assess, record, and comparatively evaluate relevant information and performance in order to support conclusions related to a specific project or assignment.

C.1. Research

Students will achieve an understanding of the theoretical and applied research methodologies and practices used during the design process

Topical Outline:

Architectural Research & Evidence Based Design	10% of semester
The Tools of Research	10% of semester
Research Planning and Design	15% of semester
Qualitative Methods	10% of semester
Case Study Research	10% of semester
Historical Research	10% of semester
Quantitative Methods	20% of semester
Mixed-Methods	5% of semester
Writing the Research Proposal	10% of semester

Prerequisites:

Graduate standing.

Textbooks/Learning Resources:

- Leedy, P.D. and Ormrod, J.E. *Practical Research: Planning and Design*, 10th Ed, Upper Saddle River, New Jersey: Pearson Prentice Hall. 2013
- Brandt, R., Chong, G., and Martin, M. *Design Informed: Driving Innovation with Evidence Based Design*, Hoboken, New Jersey: John Wiley & Sons Inc. 2010.
- Lural, Brenda ed. *Design Research: Methods and Perspectives*. 200, MIT Press.

Offered:

Fall Semester, annually.

Sample Course Schedule
AAE 770 Research Methods

08.25.	Course intro
08.27.	Discussion – Design Research: Methods and Perspectives, 10-20 pp.
09.01.	Discussion – Design Research: Methods and Perspectives, 22-54 pp
09.03.	Library Tour
09.08.	Discussion – Design Research: Methods and Perspectives, 55-81 pp
09.10.	Discussion – Design Research: Methods and Perspectives, 82-108 pp
09.15.	Research Project Discussion
09.17.	Discussion – Design Research: Methods and Perspectives, 109-143 pp
09.22.	Discussion – Design Research: Methods and Perspectives, 144-192 pp
09.24.	No Class (to compensate for the Lecture on 9.14.15)
09.29.	Discussion – Design Research: Methods and Perspectives, 193-241 pp
10.01.	Discussion – Design Research: Methods and Perspectives, 242-275 pp
10.06.	Discussion – Design Research: Methods and Perspectives, 276-316 pp
10.08.	Research Project Work Day
10.13.	Research Project Work Day
10.15.	Class Presentations on Building Science Concentration
10.20.	Class Presentations on Design/Build Studio
10.22.	Class Presentations on HD Concentration
10.27.	Class Presentations on Education Concentration
10.29.	Class Presentations on DDC
11.03.	Student Presentations on Research Project (2)
11.05.	Student Presentations on Research Project (2)
11.10.	Student Presentations on Research Project (2)
11.12.	Student Presentations on Research Project (2)
11.17.	Student Presentations on Research Project (2)
11.19.	Work Day for Final Exam
11.24.	Lecture
11.26.	Thanksgiving Holiday
12.01.	Studio Reviews (no class)
12.03.	Studio Reviews (no class)
12.08.	Finals Week
12.10.	Finals Week – Final Due

Academic Misconduct—Academic integrity is a legitimate concern for every member of the campus community; all share in upholding the fundamental values of honesty, trust, respect, fairness, responsibility and professionalism. By choosing to join the UNLV community, students accept the expectations of the Student Academic Misconduct Policy and are encouraged when faced with choices to always take the ethical path. Students enrolling in UNLV assume the obligation to conduct themselves in a manner compatible with UNLV's function as an educational institution.

An example of academic misconduct is plagiarism. Plagiarism is using the words or ideas of another, from the Internet or any source, without proper citation of the sources. See the *Student Academic Misconduct Policy* (approved December 9, 2005) located at: <https://www.unlv.edu/studentconduct/student-conduct>.

Copyright—The University requires all members of the University Community to familiarize themselves **with** and to follow copyright and fair use requirements. **You are individually and solely responsible for violations of copyright and fair use laws. The university will neither protect nor defend you nor assume any responsibility for employee or student violations of fair use laws.** Violations of copyright laws could subject you to federal and state civil penalties and criminal liability, as well as disciplinary action under University policies. Additional information can be found at: <http://www.unlv.edu/provost/copyright>.

Disability Resource Center (DRC)—The UNLV Disability Resource Center (SSC-A 143, <http://drc.unlv.edu/>, 702-895-0866) provides resources for students with disabilities. If you feel that you have a disability, please make an appointment with a Disabilities Specialist at the DRC to discuss what options may be available to you. If you are registered with the UNLV Disability Resource Center, bring your Academic Accommodation Plan from the DRC to the instructor during office hours so that you may work together to develop strategies for implementing the accommodations to meet both your needs and the requirements of the course. Any information you provide is private and will be treated as such. To maintain the confidentiality of your request, please do not approach the instructor in front of others to discuss your accommodation needs.

Religious Holidays Policy—Any student missing class quizzes, examinations, or any other class or lab work because of observance of religious holidays shall be given an opportunity during that semester to make up missed work. The make-up will apply to the religious holiday absence only. It shall be the responsibility of the student to notify the instructor **within the first 14 calendar days of the course for fall and spring courses (excepting modular courses), or within the first 7 calendar days of the course for summer and modular courses**, of his or her intention to participate in religious holidays which do not fall on state holidays or periods of class recess. For additional information, please visit: <http://catalog.unlv.edu/content.php?catoid=6&navoid=531>.

Transparency in Learning and Teaching—The University encourages application of the transparency method of constructing assignments for student success. Please see these two links for further information:

<https://www.unlv.edu/provost/teachingandlearning>

<https://www.unlv.edu/provost/transparency>

Incomplete Grades—The grade of I—Incomplete—can be granted when a student has satisfactorily completed three-fourths of course work for that semester/session but for reason(s) beyond the student's control, and acceptable to the instructor, cannot complete the last part of the course, and the instructor believes that the student can finish the course without repeating it. The incomplete work must be made up before the end of the following regular semester for undergraduate courses. Graduate students receiving "I" grades in 500-, 600-, or 700-level courses have up to one calendar year to complete the work, at the discretion of the instructor. If course requirements are not completed within the time indicated, a grade of F will be recorded and the GPA will be adjusted accordingly. Students who are fulfilling an Incomplete do not

register for the course but make individual arrangements with the instructor who assigned the I grade.

Tutoring and Coaching—The Academic Success Center (ASC) provides tutoring, academic success coaching and other academic assistance for all UNLV undergraduate students. For information regarding tutoring subjects, tutoring times, and other ASC programs and services, visit <http://www.unlv.edu/asc> or call 702-895-3177. The ASC building is located across from the Student Services Complex (SSC). Academic success coaching is located on the second floor of the SSC (ASC Coaching Spot). Drop-in tutoring is located on the second floor of the Lied Library and College of Engineering TEB second floor.

UNLV Writing Center—One-on-one or small group assistance with writing is available free of charge to UNLV students at the Writing Center, located in CDC-3-301. Although walk-in consultations are sometimes available, students with appointments will receive priority assistance. Appointments may be made in person or by calling 702-895-3908. The student's Rebel ID Card, a copy of the assignment (if possible), and two copies of any writing to be reviewed are requested for the consultation. More information can be found at: <http://writingcenter.unlv.edu/>.

Rebelmail—By policy, faculty and staff should e-mail students' Rebelmail accounts only. Rebelmail is UNLV's official e-mail system for students. It is one of the primary ways students receive official university communication such as information about deadlines, major campus events, and announcements. All UNLV students receive a Rebelmail account after they have been admitted to the university. Students' e-mail prefixes are listed on class rosters. The suffix is always @unlv.nevada.edu. **Emailing within WebCampus is acceptable.**

Final Examinations—The University requires that final exams given at the end of a course occur at the time and on the day specified in the final exam schedule. See the schedule at: <http://www.unlv.edu/registrar/calendars>.