

LMC 6650 | SPRING 2015

VISUALIZING URBANISM

Wednesdays, 1:35 PM-4:25PM, TSRB 209
Program in Digital Media
School of Literature, Media and Communication
Georgia Institute of Technology

Professor: Yanni Alexander Loukissas
Email: yanni.loukissas@lmc.gatech.edu
Office Hours: Tuesdays 2-3, TSRB 318A

COURSE DESCRIPTION

This project studio will prepare students to use data visualization to explore—and subsequently reimagine—*urbanism* as a way of life. Visualizing Urbanism will focus on the use of publicly available housing data from the city of Atlanta. The course will combine aspects of a seminar and a studio. Early in the term, we will read about and discuss theories of urbanism, social studies of data and critical approaches to visualization. Thereafter, students will develop their own data visualizations—in dialog with outside housing experts, such as researchers, planners and community organizers—to make the city strange: revealing otherwise invisible social patterns at work. The course will equip students with the skills and experience necessary to think critically about the relationship between data and social life. Prior experience with visual design and computer programming (Java or JavaScript) is encouraged. Enrollment will be limited to 12.

LEARNING OUTCOMES

- Students will learn to examine public data as cultural artifacts, inextricably tied to host institutions and the details of their social, historical and material context.
- Students will learn to speak effectively about the ethics, aesthetics and epistemology of data.
- Students will develop skills for creating and critiquing visualizations of large data sets for public audiences.
- Students will learn about the opportunities and pitfalls in using visualization as a means of illuminating large data sets.
- Students will learn to frame questions about data and develop their own answers through a combination of design and social science methods.

ASSIGNMENTS

There are two types of assignments in this course:

Readings will structure the theoretical portion of the course. Each student should complete readings before class and submit a written response online. All reading selections listed on the

syllabus are tentative. Additional readings may be assigned as supporting material along with projects and written assignments.

Projects are substantial efforts meant to develop your capacity to conceptualize and execute creative works in data visualization. This requires the merger of technical expertise and creative vision. Projects also demand that you identify and describe a creative goal, such that I can evaluate your work against your stated objective. Attention to detail in execution is appreciated, but rougher-edged well-conceived work is encouraged over very polished, unimaginative work.

GRADING

Grades will be given based on completeness and excellence, distributed as follows:

20% Participation
30% Introductory Projects
50% Final Project

Grades for projects will be distributed A-F with +/- modifiers used sparingly. Roughly speaking, an assignment will be excellent (A), good (B), satisfactory (C), unsatisfactory (D), or failing (F). Submissions that meet only the basic requirements of the assignment will receive a "C". C means "satisfactory." Submissions that meet all the requirements of the assignment and are executed with additional care, creativity, and coherence will receive a "B." To receive an "A" on assignments (and therefore, in the course), submissions must go above and beyond the basic requirements, showing exceptional care, creativity, and coherence. Submissions that fail to meet the requirements of the assignment or whose execution is incomplete or inadequate will receive a "D" or below.

Deadlines All assignments will include submission instructions and a due date. Late assignments will be penalized one letter grade per day. Assignments turned in on the due date, but after the specified deadline will be penalized half a letter grade. Extensions will only be granted in extreme circumstances (i.e. serious illness, family emergency). Failure to complete any of the projects may be grounds for a failing grade.

CLASS REQUIREMENTS AND POLICIES

Students are encouraged to bring their laptops to class. It is important to keep in mind that this class focuses on the principles and processes of visualization, not on technical skills; it is therefore up to you to develop and/or hone your facility with any tools required to complete assignments.

Attendance Students are required to attend and actively participate in all classes. Failing to attend 4 or more classes is grounds for a failing grade.

Readings and Materials will be distributed electronically via T-Square, email, or another readily available means. Some readings will be linked directly from the syllabus. Any materials not linked here can be found in the T-Square resources. Additional materials for projects will be distributed electronically. You will need your own laptop computer (Windows or Mac).

DEBATE, DIVERSITY, AND RESPECT

In this class, we will present and discuss a diversity of perspectives. Although you may not always agree with others' perspectives, you are required to be respectful of others' values and beliefs. Repeated inappropriate or abusive comments and/or behavior will be cause for disciplinary action. If you feel that your perspectives are being ignored or slighted, or you in anyway feel uncomfortable in the classroom, please contact me immediately.

THE COMMUNICATION CENTER

The Communication Center is located in Clough Commons, Suite 447. It is an excellent resource for any student (undergraduate or graduate) who wants help with a communication-related project. You can visit the center for help at any stage of the process for any project in any discipline. The knowledgeable and friendly tutors are available to help you develop and revise your projects. They are not available to "fix" your projects. Please do not ask the tutors to proofread or edit your work. For information on making an appointment please visit <http://communicationcenter.gatech.edu/content/makeappointment>. If you need assistance with the appointment system, you can call 404-385-3612 or stop by the center. All services are free and confidential.

STUDENTS WITH DISABILITIES

Students should self-report to the Access Disabled Assistance Program for Tech Students at: 220 Student Services Building Atlanta, GA 30332-0285 404.894.2564 (voice) or 404.894.1664 (voice/TDD) www.adapts.gatech.edu/guidebook.html

PLAGIARISM WARNING

Plagiarism of any form will not be tolerated, and will result in a failing grade for the course. Plagiarism is not only the uncredited copying of text from another's work but also copying ideas or code from other digital artifacts. Adaptation of code samples (provided or found online) is not necessarily plagiarism. To facilitate your success on projects, I will try to provide sample code or links to other samples. However, explicitly copying entire algorithms or sample applications and representing them as your own is not permitted. Use sample code and online resources as tutorials to help you write your own original code. Copying more than 10% of a code sample will be considered plagiarism.

Having said that, students are encouraged to share and critique each others' work. You are allowed (and encouraged!) to work together with other students, but collaboration is only permitted on group projects. On all other assignments, you are expected to complete and turn in your own work. Students may not submit work on another's behalf. Unauthorized use of any previous semester course materials is prohibited. Violating these terms will be considered a direct violation of academic policy and will be dealt with according to the GT Academic Honor Code.

SCHEDULE

Details about forthcoming assignments will be added to this syllabus weekly, so you will need to check it regularly. This schedule is subject to change at any time. Updates and changes will be announced in class or by email to students.

WK 1 | January 14: Welcome / About

WK 2 | January 21: Discussion Session (Critical Visualization)

Reading Due:

Peter Hall (2008) [Critical Visualization](#)

Laura Kurgan (2012) excerpt from [Close Up at a Distance](#)

Lauren Klein (2016) [Timescape and Memory](#)

Additional Readings

Johanna Drucker (2012) [Humanities Approaches to Graphical Display](#)

Catherine D'Ignazio (2015) [Feminist Data Visualization](#)

Carl DiSalvo (2012) [Adversarial Design](#)

Jeffrey Bardzell & Shaowen Bardzell (2013) ["What Is 'Critical' About Critical Design?"](#)

Bruno Latour (2008) [A Cautious Prometheus? A Few Steps Towards a Philosophy of Design](#)

WK 3 | January 28: Design Critique

Exercise 1 Due

WK 4 | February 4: Discussion Session (Urban Data Studies)

Reading Due:

Elora Raymond, Kyungsoon Wang, & Dan Immergluck (2015) ["Race and uneven recovery"](#)

Sharon Zukin, Scarlett Lindeman & Laurie Hurson (2015) ["The Omnivore's Neighborhood?"](#)

Spencer Rascoff & Stan Humphries (2015) excerpt from [Zillow Talk](#)

Additional Readings:

Kevin Lynch (1960) [The Image of the City](#)

Herbert J Gans (1968) ["Urbanism and Suburbanism as Ways of Life"](#)

New York Times Editorial Board (2015) ["The End of Federally Financed Ghettos"](#)

Alana Semuels (2015) ["Can Better Data Help Solve America's Housing Problems?"](#)

WK 5 | February 11: Design Critique

Exercise 2 Due

WK 6 | February 18: Discussion Section (Critical Data Studies)

Reading Due:

Geoffrey Bowker & Susan Leigh Star (1999) excerpt from [Sorting Things Out](#)

Rob Kitchin & Tracey Lauriault (2014) ["Towards Critical Data Studies"](#)

Matt Ratto (2011) "Critical Making"

Additional Readings:

danah boyd & Kate Crawford (2012) "Critical Questions for Big Data"

Nick Seaver (2015) "The nice thing about context is that everyone has it"

Craig Dalton & Jim Thatcher (2014) "What does a critical data studies look like, and why do we care?"

WK 7 | February 25: Design Critique

Exercise 3 Due

WK 8 | March 3: Humanities Visualization Workshop

No Class (Optional: Attend Workshop)

WK 9 | March 10: Proposal Review

Final Project Proposal Due

WK 10 | March 17: Design Critique

WK 11 | March 24: Spring Break

No Class

WK 12 | March 31: Mid-term Review

WK 13 | April 7: Design Critique

WK 14 | April 14: Design Critique

WK 15 | April 21: Preliminary Review

Final Review TBD