

Course title: “The Algorithmic Self”

Level: 4000, i.e., most suitable for advanced juniors and seniors. May be altered to fit 3000-level requirements.

Overview:

According to recent estimates, some 14.4 billion devices are currently connected to the internet. Although they collect data about all kinds of phenomena, much of the information they produce comes from and pertains to individual humans. Often, these data are used in applications designed to impact the everyday life of millions. “The Algorithmic Self” conceives the datafication of the self as an epochal event just beginning to take shape. Our exploration of datafied selfhood departs from a question central to humanities scholarship: what does it mean to be human? We refine this question to ask: what do automated algorithms think it means to be human?

This question does not presume that algorithms are conscious or can “think” in any manner analogous to human thought processes. Instead, it suggests that algorithms are not neutral when it comes to defining, categorizing, and evaluating various dimensions of human existence. To ask how algorithms think about human beings is to inquire into the cultural, political, historical, and technoscientific contexts within which these programs are developed and deployed. For example, the classification of data for the purpose of customizing advertisements reinforces assumptions about identity and desire, and the use of aggregate data to predict crime and election outcomes takes the position that correlation may sometimes be considered equivalent to correlation.

Algorithms affirm beliefs about selfhood that resist falsification and other means of scientific legitimation. Nevertheless, these beliefs have tangible effects on individuals and communities. *The Algorithmic Self* decenters the myth of algorithmic neutrality and objectivity by asking what those beliefs are; who they serve and/or harm; and where their instrumentalization in digital applications should be reimagined or rejected.

Learning objectives:

By the end of the course, students will be able to apply frameworks from multiple Humanities disciplines to articulate various definitions of and perspectives on human life underpinning different kinds of algorithmic programs. These programs include but are not limited to those found in social media; productivity-enhancing analytic mechanisms (e.g., those used to optimize gig economy and warehouse labor output); content recommendation systems; health and fitness trackers; medical diagnostic and precision medicine technologies; government administration programs; and predictive policing tools, among others.

Students will also enhance their facility with interdisciplinary research and communication skills. Through written assignments and oral presentations, they will strengthen their capacity to present original ideas to audiences from diverse scholarly backgrounds.

Activities and evaluations:

Lively, seminar-style participation is central among our activities. Students will be expected to participate in and moderate class discussion.

As a midterm or final project (students have the choice), students select a tool which uses automation technology (broadly construed) and identify links between it and one or more conceptual issues raised in the assigned material and/or class meetings. They write a paper on it and prepare a brief presentation for class. Given available resources, students in “The Algorithmic Self” will also produce an exhibit/showcase of these assignments for a venue on campus or in the local community. As the other option for the midterm or final evaluation, they will write a paper which pursues an original research question.

Other activities may include contributions to a collectively-generated public blog; debates on conceptual topics; and a qualitative data-analysis assignment. For the qualitative data analysis, students will collectively write a questionnaire to assess class-wide attitudes towards a particular topic (e.g., social media habits). The dataset yielded by this questionnaire will serve as the basis for the practice of *in vivo* qualitative/thematic data coding, an analytic method which does not require programming skills and which will be taught in class. This exercise points up the normativity of data collection and categorization methods.

Additionally, we invite authors of assigned texts as guest lecturers.

Reading schedule:

Week 1: What is a Human Being? What is a Machine Learning Algorithm?

- Michel Foucault, “Technologies of the Self” (Ch. 2 of *Technologies of the Self*)
- Florian Jatón, “Introduction” from *The Constitution of Algorithms: Ground-Truthing, Programming, Formulating*
- John Cheney-Lippold, “Introduction” and “Making Data Useful” (Ch. 1) from *We Are Data: Algorithms and the Making of Our Digital Selves*

Week 2: Can Machine Learning Programs “Think?”

- Alan Turing, “Computing Machinery and Intelligence”
- John Searle, “Can Computers Think?”
- Nick Bostrom, “Are We Living In A Computer Simulation?”
- Emily Tucker, “Artifice and Intelligence”

Week 3: Hubert Dreyfus on AI Optimism pt. I

- Hubert Dreyfus, “Introduction,” “The Biological Assumption” (Ch. 3) and “The Psychological Assumption” (Ch. 4) from *What Computers Still Can't Do: A Critique of Artificial Reason*

Week 4: Hubert Dreyfus on AI Optimism pt. II

- Hubert Dreyfus, “The Epistemological Assumption (Ch. 5) and “The Ontological Assumption” (Ch. 6) from *What Computers Still Can't Do: A Critique of Artificial Reason*

Week 5: Objectivity pt. I

- Auguste Comte, *Course of Positive Philosophy* Ch. 1
- Theodor Adorno and Max Horkheimer, “The Concept of Enlightenment” from *The Dialectic of Enlightenment*
- John Cheney-Lippold, “Control: Algorithm is Gonna Get You” (Ch. 2 of *We Are Data*)

Week 6: Objectivity pt. II

- Lorraine Daston and Peter Galison, “Epistemologies of the Eye” and “Mechanical Objectivity” (Ch.1 and Ch. 3 of *Objectivity*)
- Sun-Ha Hong, “Honeymoon Objectivity” (Ch. 1 of *Technologies of Speculation: the Limits of Knowledge in a Data-Driven Society*)

Week 7: Realness and Authenticity pt. I

- John Cheney Lippold, “Subjectivity: Who Do They Think You Are?” (Ch. 3 of *We Are Data*)
- Rob Horning, “Mass Authentic” and “Authenticity as a Service”

Week 8: Realness and Authenticity pt. II

- Sun-Ha Hong, “Data’s Intimacy” (Ch. 4 of *Technologies of Speculation*)
- Oliver L. Haimson and Anna Lauren Hoffman, “Constructing and Enforcing ‘Authentic’ Identity Online: Facebook, Real Names, and Non-Normative Identities”

Week 9: Identity pt. I: Gender as Technology

- Donna Haraway, “A Cyborg Manifesto”
- Rina Nkulu, “Immaterial Girl”
- Vivian Lam: “Endless Nameless: Gender Reconsidered as ‘Vibe’”

Week 10: Identity pt. II: Race as Technology

- Ruha Benjamin, “Introduction: The New Jim Code” from *Race After Technology: Abolitionist Tools for the New Jim Code*
- Falguni Sheth, "The Technology of Race and the Logics of Exclusion" pp. 22-29
- Laura Kurgan, Dare Brawley, Brian House, Jia Zhang, and Wendy Hui Kyong Chun: “Homophily: The Urban History of an Algorithm”

Week 11: Algorithmic Colonialism / *The Costs of Connection*

- Abeba Birhane, “The Algorithmic Colonization of Africa”
- Nick Couldry and Ulisses A Mejias, “Preface: Colonized by Data” and “The Capitalization of Life Without Limit” (Ch. 1 of *The Costs of Connection: How Data is Colonizing Human Life and Appropriating it For Capitalism*)

Week 12: *The Costs of Connection* pt. II

- Nick Couldry and Ulisses A Mejias, “Cloud Empire (Ch. 2); “Interlude: On Colonialism and the Decolonial Turn”; and “The Coloniality of Data Relations” (Ch. 3) from *The Costs of Connection*

Week 13: *The Costs of Connection* pt. III

- Nick Couldry and Ulisses A Mejias, “The Hollowing Out of the Social” (Ch. 4); “Data and the Threat to Human Autonomy” (Ch. 5); and “Decolonizing Data” (Ch. 6) from *The Costs of Connection*

Week 14: The Predicted Self

- Sun-Ha Hong, “Prediction as Extraction of Discretion”
- Justin Joque, “Automating Knowledge” (Ch. 1) and “Do Dead Fish Believe in God?” (Ch. 4) from *Revolutionary Mathematics: Artificial Intelligence, Statistics, and the Logic of Late Capitalism*

Week 15: Reimagining Algorithmic Selfhood

- Mark Fisher, “Acid Communism (Unfinished Introduction)”
- Ruha Benjamin, “Introduction” from *Viral Justice: How We Grow the World We Want*
- Nick Couldry and Ulisses A Mejias, “Postscript: Another Path is Possible” from *The Costs of Connection*