PHL 307U: Science and Society

CRN: 64061
Instructor: Alex Sager
Email: asager@pdx.edu

Student Hours: Mondays, 2 p.m. and Thursdays, 1 p.m. and by arrangement. Please let me know in advance if you intend to join Monday or Thursday student hours so I can open the Zoom room: https://pdx.zoom.us/j/88035016335

Course Description

The course critically examines how the sciences and the social sciences inform social practices and policies, contribute to human well-being, and support – or threaten – democratic institutions. We will explore the nature of science and reflect on its role in society through examining topics such as climate, forestry, poverty, neurolaw, nudging, migration, positive psychology, psychological targeting, and public health.

Course Learning Objectives

- Gain an understanding of science as a social institution and set of practices.
- Explore how epistemic and social values ought to inform and shape science.
- Learn how scientific research can support policy, as well as how it can be misapplied and misused.
- Critically reflect on ethical questions raised by science and the social sciences from diverse perspectives.
- Develop communication skills by leading and participating in an open-ended philosophical discussion on class topics.
- Hone writing skills by completing assignments in which you apply theoretical tools to concrete cases.

Textbook

There is no textbook. All readings will be available through Canvas or freely available on the web.

Assignments

- Weekly Quizzes – 20% (10 x 2%)
- Weekly Discussion Board Participation – 20% (10 x 2%)
- Science in the News Reflection (15%)
- Science Policy Brief (15%)
- Final Project Proposal (5%)
- Final Project (25%)

Late Assignment Policy

- Please aim to turn in work by the due date; doing so will help you learn the most from the assignment and be successful in the class.
- Unless otherwise indicated, all assignments include an automatic, no questions asked,

grace period of 48 hours. The grace period is there to help you manage the unavoidable challenges with which life occasionally presents us.

- If you need more than 48 more hours to complete an assignment, please be in touch with me to ask for an extension before the due date arrives.
- The timestamp on the Canvas assignment dropbox determines the assignment's official submission time, unless otherwise indicated.
- Finally, you may (and should!) turn in work late, rather than never, but this work will receive a reduced grade.

Coursework Revision Policy
You may revise most work you do for this class for a higher grade. Before revising an assignment, however, please reach out to me first.

Course Communication
1. For questions about the class, E-mail me directly at asager@pdx.edu. I aim to respond to emails about course materials and assignments within 24 hours between Monday and Friday.
2. Class materials, including readings, assignment, and grades will be on Canvas.
3. Optional class meetings and office hours held in real time will use Zoom.

Canvas
Canvas is PSU's course management system. We will use Canvas to post readings, videos, podcasts, and assignments. **I will also post important announcements on Canvas. It is your responsibility to check these announcements regularly.**

Course Structure
The class is structured around two reoccurring assignments:
1) A weekly quiz based on the instructor's lecture and readings/podcasts/videos (**due Wednesday**).
2) Two substantial posts to weekly discussion board (**due Thursday and Saturday, respectively**).

Grading Scheme

93-100 = A	86-89 = B+	77-79 = C+	68-70 = D+	0-59 = F
90-92 = A-	83-85 = B	74-76 = C	65-67 = D	
	80-82 = B-	71-73 = C-	60-63 = D-	

Tentative Class Schedule
Please note that the schedule is subject to change as the semester progresses.

Date	Topics	Readings, Videos, and Podcasts	Assignments
Week 1			
March 31- April 6	The Replication Crisis	-Stuart Richie Interview - Science Fictions -You're Wrong About, Stanford Prison Experiment -Deception at Duke -"Unreliable Research: Trouble at the Lab," *The Economist*, October 13, 2013 - Why Most Published Research is Probably False	

		-"[A Tale of Mistake and Retraction Shows that Science Works Eventually,](#)" *The Economist,* October 31, 2019 -Website: [Retraction Watch](#)	
Week 2
April 7	Trusting Science?	-[Science Fictions, A Comic Based on the Book by Dr. Stuart Richie](#) -[Naomi Oreskes: Why we should trust scientists](#) -Kitcher, Philip. 2019. "[What Makes Science Trustworthy](#)." *Boston Review*, November 7, 2019. -Gordon, Michael D. 2021. "[The Quest to Tell Science from Pseudoscience](#)." *Boston Review*, March 21, 2021.	
Week 3
April 14	Evidence-Based Policy	-Nancy Cartwright (with Jacob Stegenga). 2008. "[A Theory of Evidence for Evidence-Based Policy](#) ." -Podcast: NPR, [Poor Economics](#) -Tollefson, Jeff. 2015. "Can Randomized Trials Eliminate Global Poverty?" *Nature* 524 (7564): 150–53. [https://doi.org/10.1038/524150a](#).	Science in the News Assignment (due April 20)
Week 4
April 21	Quantification and Perspective	-[Yep, We Made Up Vegetables](#) -Jorge Luis Borges, "[On Exactitude in Science](#)" -James C. Scott, "[The State and Scientific Forestry: A Parable](#)" from *Seeing Like a State* -Theodore Porter. 1994. Making Things Quantitative. *Science in Context* 7(3): 389-407 -Martha Nussbaum, "[Creating Capabilities: The Human Development Approach](#)"	
Week 5
April 28	Mental Illness	-Jazmine Russell and Awais Aftab, [Rethinking Assumptions Within Psychiatry & Developing Conceptual Competence](#) -Jefferson, Anneli. "Are Mental Disorders Brain Disorders? – A Precis." Philosophical Psychology 37, no. 3 (April 2, 2024): 552–57. [https://doi.org/10.1080/09515089.2023.2166822](#). -Druss, Benjamin G., and Nev Jones. "Evidence-Based Practicing in Mental Health." *JAMA Psychiatry*, March 5, 2025. [https://doi.org/10.1001/jamapsychiatry.2025.0010](#). -The Economist, Researchers are questioning if ADHD should be seen as a disorder -Doug Beech, [The Best Evidence for Antidepressants Has Never Been Published...and Never Will Be](#)	
Week 6
May 5	Migration	-[How migration really works with HEIN DE HAAS](#) -Banerjee, Abhijit V., and Esther Duflo, "From the Mouth of the Shark" in *Good Economics for Hard Times*. New York: PublicAffairs, 2019. -Avaaz, 2019, Far Right Networks of Deception. Avaaz, London. Available at [https://secure.avaaz.org/campaign/en/disinfo_network_report/](#) -[Austin Kocher, Why Immigration Data Matters and How](#)	Science Policy Brief (due May 11)
Week 7
May 12	Nudging	-Video: [Sunstein on Libertarian Paternalism](#) -Benartzi, Shlomo et al. 2017. "Should Governments Invest More in Nudging?" *Psychological Science* 28 (8):1041–55. [https://doi.org/10.1177/0956797617702501](#). -Cass R. Sunstein, "[Misconceptions About Nudges](#)"	Final Project Proposal (Due May 18)
Week 8

May 19	Violence	-Boyer, Pascal. "What Is the Root of Group Conflict?" In *Minds Make Societies: How Cognition Explains the World Humans Create*, 33–65. New Haven London: Yale University press, 2018. -Steven Pinker, [The Better Angels of Our Nature: A History of Violence and Humanity](#) -John Halstead & Phil Thomson, [The Prehistoric Psychopath](#)	
Week 9			
May 26	Neurolaw	-Aggarwal, Neil Krishan, and Abhishek Jain. "Neuroethics and Neurolaw in Forensic Neuropsychiatry: A Guide for Clinicians." *Behavioral Sciences & the Law* 42, no. 1 (January 2024): 11–19. https://doi.org/10.1002/bsl.2638. -Tim Requarth, [The Final Five Percent](#), Longreads, October 2019 [-Inside the mind of a murderer: the power and limits of forensic psychiatry](#) -Francis X. Shen, [Every Story is a Brain Story](#)	
Week 10			
June 2	Artificial General Intelligence and its Skeptics	- [The Government Knows AGI is Coming	The Ezra Klein Show](#) -[Dario Amodei, Machine of Loving Grace](#) - Farrell, Henry, Alison Gopnik, Cosma Shalizi, and James Evans. "Large AI Models Are Cultural and Social Technologies." *Science* 387, no. 6739 (March 14, 2025): 1153–56. https://doi.org/10.1126/science.adt9819.	
Exam Week			
June 9			Final Project (due June 9)

Academic Integrity:

Academic integrity is a vital part of the educational experience at PSU. PSU defines plagiarism as including "word for word copying, using borrowed words or phrases from original text into new patterns without attribution, or paraphrasing another writer's ideas". If you have questions about whether or not you should give credit to a source in your work, you may clarify it with me. In general, I recommend always citing the sources you have consulted, as well as those you borrow from directly. If you are unsure about how to cite a source, you are having difficulty with an assignment or a due date, please contact me.

PSU Code of Student Conduct and Responsibility

As with all other classes at PSU, conduct questions not explicitly covered by this syllabus are covered by PSU's Code of Student Conduct.

Course AI Policy

In this course, those students who wish to utilize Generative AI tools, such as ChatGPT, are allowed to do so. AI tools may be employed to brainstorm assignments or projects or to refine pre-existing work. However, to uphold scholarly standards, students are required to cite any AI-generated material that contributes to their work, including in-text citations, quotations, and references. The generation of content through AI without appropriate attribution constitutes academic misconduct.

I encourage you to think carefully about your use of Generative AI tools and how it will affect your learning. It should not be a substitute from engaging with class materials and interacting with peers (e.g., on the course discussion board). It is also important to recognize that Generative AI

has severe limitations, among them the tendency to "hallucinate" (i.e., generate false information), reflect the biases of the training data, and to provide simplistic or reductive responses.

Disability Accommodations

If you have a disability and need accommodations, you will need to register with the Disability Resource Center, which is located in 116 Smith Memorial Student Union, Suite 116. You can also contact the DRC at 503-725-4150 or, drc@pdx.edu. You can also visit the Disability Resource Center | Portland State University. If you need assistance getting started with this process, please be in touch with me and the class mentor.

Title IX Reporting

As instructors, students frequently come to us for assistance in matters that are not related to the course material. Please be aware that PSU's policies require instructors and mentors to report any instance of sexual harassment, sexual violence and/or other forms of prohibited discrimination. If you would rather share information about these experiences with an employee who does not have these reporting responsibilities and can keep the information confidential, please contact one of the following campus resources (or visit this link):

- Confidential Advocates: 503.894.7982, or by scheduling on-line
- (PSU Womens Resource Center) (for matters regarding sexual harassment and interpersonal/sexual violence)
- Center for Student Health and Counseling (SHAC): 1880 SW 6th Ave, 503.725.2800
- Student Legal Services: 1825 SW Broadway, (SMSU) M343, 503.725.4556