

## PSY 409, Fall 2021

### Research Specialization: Theoretical Foundations

**Instructor:** Charles C. Helwig (rm. SS 4029, 416-429-6291, charles.helwig@utoronto.ca)

**Class Time:** Fridays 1-3 pm, online class (on Zoom).

**Office Hours:** Wednesdays, 2-3pm, on Zoom (meetings also available by appointment).

In this seminar, we will address some of the fundamental questions that structure contemporary research in psychology. Answers to these questions are often implicit in the topics we decide to study, the methods we employ, and the way in which we interpret our results. Our goal is to make these questions explicit, and consider how they apply to topics of contemporary concern. The fundamental questions, which might be considered *meta*-psychological questions (i.e., questions *about* psychology and how to practice it), can be organized into three broad categories:

(1) *Ontological* questions: What kinds of things are there for psychologists to study? (For example, are there different types of people—sane vs. insane? Does it make sense to distinguish between the mind and the brain? Is there such a thing as “free will” or psi phenomenon?)

(2) *Epistemological* questions: What does it mean to acquire knowledge in psychology? What constitutes an explanation? (For example, are all (adequate) explanations causal? Must they make reference to biology?)

(3) *Genetic* questions: What are the origins, history, and causes of the things psychologists study? (For example, can we understand human social behavior from an evolutionary perspective? Can we understand social behavior if we *fail* to take an evolutionary perspective? What about mental illness, gender differences, or human happiness? What is the role of the environment?)

Naturally, there are no obviously “correct” answers to these questions, and indeed, the aim of the seminar is not to answer the questions in any definitive fashion. Instead, the aim is simply to consider the range of possible answers, the extent to which some answers might seem more plausible than others, and the way in which our answers to these questions may influence our research.

The seminar will be conducted like a graduate seminar—you’ll be expected to read a fair bit of unfamiliar material with little in the way of preparatory discussion, write regularly (and occasionally at length), and participate actively in the group discussion. The course creates a context in which you have an opportunity to teach yourselves. (Our hope is that those of you who go on to graduate school will find the exercises and expectations that you encounter in your graduate courses to be more familiar, and therefore less intimidating, than they would otherwise be.)

## Readings:

Readings assembled in a packet by Xerox (PSY 409F) to be purchased from the U. of T. bookstore.

## Evaluation:

### *1. Five reaction papers (grade based on best 4 marks; 5% each; total of 20%).*

For the five classes of your choice (except those for which you lead discussion or participate in the debate, see below), please write a brief reaction paper (1 single-spaced page in length, or 2 double spaced pages; 12 pt font, 1" margins) that responds to issues raised in the readings, and presents your unique view of the readings as a whole, or a particular core issue that they engage. Do not use space in these papers to summarize the readings, and only provide quotes from the papers when absolutely necessary: focus on articulating your own view. Papers are **due at the beginning of class (1:00pm on Fridays)**, and must address that week's material. **No late reaction papers can be accepted!** Note: Although the top four marks will be used to calculate your grade, **you MUST turn in 5 papers**. A penalty of 10% on your final grade for this portion of the assessment will be assessed should you only turn in four papers. **You should turn in your reaction papers to my email: [helwig@psych.utoronto.ca](mailto:helwig@psych.utoronto.ca). Please include in the heading of your e-mail the phrase "reaction paper" and the date of the class it covers (e.g., Reaction Paper, Sept 17<sup>th</sup> class), so that I can find it easily.**

### *2. Lead discussion of that week's readings (20%).*

Each week, one or two people (depending on enrollment) will be responsible for leading discussion (in cooperation if two people). All students are expected to read all articles, but the discussion leader(s) will be asked to review the main arguments presented by each reading, and to respond critically to the papers. As part of this, the discussants will structure a part of their presentation in terms of questions raised to the class. Ideally, the commentary will integrate ideas or themes brought up within and across the readings. Do not attempt to summarize the whole reading, but rather highlight key points in the argument and the overall conclusions. You should spend no more than 15-20 minutes **total** (i.e. for all papers) summarizing the papers and the rest of the time should be reserved for class discussion. You may discuss each paper in turn (raising issues for each paper) or you may group papers and discuss them together in whatever order you believe works best. Grades for presentation will be individual.

### *3. Participation in 1 of 2 debates (15%).*

There will be two debates, each between two teams of two, three, or four individuals (depending on enrollment). The debates will draw on class readings for that week, in addition to any supplemental materials the teams wish to use. Two individuals for each team will present the main position of the group, and the remaining team members will respond to the points raised by the opposing team. Following the presentation of each team's main arguments (20 minutes each), there will be a brief break (20 minutes) during which the teams will prepare responses. Each group will have 15 minutes to present their responses. In the final 20 minutes of class, each team will have the chance to argue the

weaknesses of their own position, after which it will be opened up for a class discussion. The topic of the first debate (and the teams) will be announced on 9/17. The topic of the second debate (and the teams) will be announced on 10/15. Students who are not part of that week's debate should attend thoughtfully and respectfully and will have a chance to participate in the open discussion at the end of the debate.

*4. Final essay (35%) on any topic from the course.*

The paper should take the form of an argument that discusses one of the topics or issues addressed in the course (if you are unsure whether your paper topic is appropriate, please talk to me about it). The primary focus should be theoretical or "meta-psychological" and *not* empirical. Thus, it should resemble your position papers in spirit, but should be organized and based on additional reading. As in previous years, there will be an award for the best essay in the class.

**Length:** between 12 and 15 double-spaced pages (not including title, references, etc.)

**Format:** APA format; 12pt font, 1" margins. **Due:** Friday, December 3<sup>rd</sup> before 5pm sharp (to my email at [charles.helwig@utoronto.ca](mailto:charles.helwig@utoronto.ca)).

\*Note: Late papers penalty 5% per working day, i.e. Monday-Friday.

Accessibility Needs: The University of Toronto is committed to accessibility. If you require accommodations or have any accessibility concerns, please contact Accessibility Services at (416) 978 8060; e-mail: [accessibility.utoronto.ca](mailto:accessibility.utoronto.ca), as soon as possible.

Writing: As a student here at the University of Toronto, you are expected to write well. The university provides its students with a number of resources to help them achieve this. For more information on campus writing centres and writing courses, please visit <http://www.writing.utoronto.ca/>.

Academic Integrity and Plagiarism:

Academic integrity is essential to the pursuit of learning and scholarship in a university, and to ensuring that a degree from the University of Toronto is a strong signal of each student's individual academic achievement. As a result, the University treats cases of cheating and plagiarism very seriously. The University of Toronto's Code of Behaviour on Academic Matters

([www.governingcouncil.utoronto.ca/policies/behaveac.htm](http://www.governingcouncil.utoronto.ca/policies/behaveac.htm)) outlines the behaviours that constitute academic dishonesty and the processes for addressing academic offences. All suspected cases of academic dishonesty will be investigated following procedures outlined in the Code of Behaviour on Academic Matters. If you have questions or concerns about what constitutes appropriate academic behaviour or appropriate research and citation methods, you are expected to seek out additional information on academic integrity from your instructor or from other institutional resources (see [www.utoronto.ca/academicintegrity/resourcesforstudents.html](http://www.utoronto.ca/academicintegrity/resourcesforstudents.html)).

*5. Class participation (10%)*

Every student should contribute significantly to each class. Come prepared with

questions on each of the readings, and be ready to answer the following questions (which you may be asked randomly to answer):

- a. Is there a core issue(s) that unites these readings? If so, what is it?
- b. Is the issue well-formed (i.e., is it a real problem)? If so, why? If not, why not?
- c. What is the significance of the core issue to empirical work in psychology? Does it affect the way we do science?
- d. What are the broader social consequences of our position on this issue?

### **Week 1 (September 10) Introduction**

### **Week 2 (September 17): Explanation: What is it and how do we do it?**

Godfrey-Smith, P. (2003). *Theory and reality: An introduction to the philosophy of science*. Chicago: University of Chicago Press. (Chapter 13, pp. 190-201)

Lombrozo, T. (2006). The structure and function of explanations. *Trends in Cognitive Sciences*, 10(10), 464-470.

Overton, W. F. (2003). Development across the lifespan. In R. M. Lerner, M. Easterbrooks, & J. Mistry (Eds.), *Handbook of psychology: Vol. 6, Developmental psychology* (pp. 13-42). Hoboken, NJ: John Wiley & Sons.

#### *Optional Further Reading:*

Hempel, C. (1966). *Philosophy of Natural Science*. Englewood Cliffs, N. J.: Prentice-Hall.

Skinner, B.F. (1977). Why I am not a Cognitive Psychologist. *Behaviorism*, 5, 1-10.

### **Week 3 (September 24): Minds, Brains, and Consciousness**

Taylor, R. (1963). *Metaphysics*. New Jersey: Prentice Hall Inc. (pp. 10-37).

Searle, J. (1990, January). Is the brain's mind a computer program? *Scientific American*, 26-31.

Churchland, P. M., & Churchland, P. S. (1990, January). Could a machine think? *Scientific American*, 32-37.

Chalmers, D. J. (2002). The puzzle of conscious experience. *Scientific American*, 90-100.

#### *Optional Further Reading:*

For an excellent overview of the mind/body problem:

LaRock, E. (2010). Philosophical implications of awareness during general anesthesia. In G. A. Mashour (Ed.). *Consciousness, awareness, and anesthesia* (pp. 233-252). Cambridge, UK: Cambridge University Press. (Note: available as an e-book download from the University of Toronto Library Catalogue website).

Koch, C. (May 9, 2018). What is consciousness? *Nature* 557, S8-12 (2018).  
<https://www.nature.com/articles/d41586-018-05097-x>

A provocative and interesting piece by William James:

James, W. (1898). *Human immortality: Two supposed objections to the doctrine*. Boston & New York: Houghton Mifflin Co. Available from:  
<https://babel.hathitrust.org/cgi/pt?id=chi.11978515;view=1up;seq=8>

#### **Week 4 (October 1): DEBATE WEEK: Evolutionary psychology**

Pinker, S. (1997). *How the Mind Works*. New York, NY: W.W. Norton and Company. (Chapter 3, pp. 149-210).

Lewontin, R. C. (1998). The evolution of cognition: Questions we will never answer. In D. Scarborough and S. Sternberg (Eds.), *An invitation to cognitive science, Volume 4: Methods, models, and conceptual issues* (pp. 108-131). Cambridge, MA: MIT Press.

Fodor, J. (2000). *The mind doesn't work that way*. Cambridge: MIT press, (pp. 79-100).

*Optional Further Reading:*

Tooby, J. & Cosmides, L. (2005). Conceptual foundations of evolutionary psychology. In D. M. Buss (Ed.), *The Handbook of Evolutionary Psychology* (pp. 5-67). Hoboken, NJ: Wiley.

Gould, S. J. (June 26, 1997). Evolution: The Pleasures of Pluralism, *The New York Review of Books*, 47-52. (read only last few pages on evolutionary psychology).

[http://www.stephenjaygould.org/reviews/gould\\_pluralism.html](http://www.stephenjaygould.org/reviews/gould_pluralism.html)

#### **Week 5 (October 8): Nature vs. Nurture**

Fodor, J. (1980). On the impossibility of acquiring more powerful structures. In Ed. Piattelli-Palmarini, M. *Language and Learning: The debate between Jean Piaget and Noam Chomsky* (pp. 142-162). Cambridge: Harvard University Press.

Pinker, S. (2004). Why nature & nurture won't go away. *Dædalus*, 133(4), 5-17.

Harris, J. R. (1999, June 29). Children don't do things half way: A talk with Judith

Rich Harris (Published June 29, 1999), *The Edge*.

The above (Harris) reading is not in the reader but is available at:

<https://www.edge.org/conversation/children-dont-do-things-half-way>

Crawford, T. (2009). Nurturing improves human memory. *Toronto Star* (February 4, 2009).

Optional Further Reading:

Curry, A. (July 18, 2019). Parent's emotional trauma may change their children's biology. Studies in mice show how. *Sciencemag.org* (doi: 10.1126/science.aay7690).  
<https://www.sciencemag-org.myaccess.library.utoronto.ca/news/2019/07/parents-emotional-trauma-may-change-their-children-s-biology-studies-mice-show-how>

### **Week 6 (October 15): Religion and Psychology**

McGrath, A. (2005). Has science eliminated God? – Richard Dawkins and the meaning of life. *Science & Christian Belief*, 17, 115-135.

Bielski, Z. (2009). Science is my job—faith is my rock. *Globe and Mail* (March 20, 2009).

Bloom, P. (Dec. 2005). Is God an accident? *Atlantic Monthly*.

Oser, F. (1991). The development of religious judgment. *New Directions for Child Development*, 52, 5-25.

*Optional Further Reading:*

Gould, Stephen J. (March 1997). Nonoverlapping magisteria, *Natural History*, 106, 16-22. [http://www.stephenjaysgould.org/library/gould\\_noma.html](http://www.stephenjaysgould.org/library/gould_noma.html)

Boyer, P. (2003, March) Why is religion natural? *Skeptical Inquirer*  
<http://www.csicop.org/si/2004-03/religion.html>

Harris, S. (2004). *The End of Faith*. New York, NY: W.W. Norton & Company, Inc. Ch. 2. The nature of belief (pp. 50-79).

*Optional Video supplements:*

Richard Dawkins

<http://www.youtube.com/watch?v=ayd0XkD3OXg>

<http://www.youtube.com/watch?v=bNH00gj>

[HRk](#)

<http://www.youtube.com/watch?v=QERyh9Y>

[YEis](#)

Alistar McGrath

<http://www.youtube.com/watch?v=DBRKY8Qx9YQ>

Dawkins & McGrath (Debate)

<http://video.google.ca/videoplay?docid=6474278760369344626&q=mcgrath+dawkins&total=13&start=0&num=10&so=0&type=search&plindex=0>

Daniel Dennett

[http://www.youtube.com/watch?v=DTepA-WV\\_oE](http://www.youtube.com/watch?v=DTepA-WV_oE)

### **Week 7 (October 22): Parapsychology**

Bem, D. J., & Honorton, C. (1994). Does psi exist? Replicable evidence for an anomalous process of information transfer. *Psychological Bulletin*, 115, 4-18.

Hyman, R. (1994) Anomaly or artifact? Comments on Bem and Honorton, *Psychological Bulletin*, 115(1), 19-24.

Bem, D. J. (1994). "Anomaly or artifact? Comments on Bem and Honorton": Response to Hyman. *Psychological Bulletin*, 115(1), 25-27.

Shermer, M. (January 13, 2003). Psychic Drift. *Scientific American*.

<http://www.sciam.com/article.cfm?articleID=000464CE-BC82-1E1C-8B3B809EC588EEDF&catID=2>

Brooks, M. (2004). The weirdest link. *New Scientist*, 181(2440), 32-35.

#### *Optional Further Reading:*

Milton, J. & Wiseman, R. (1999). Does psi exist? Lack of replication of an anomalous process of information transfer. *Psychological Bulletin*, 125, 387-391.

Bem, D. J., Palmer, J., & Broughton, R. (2001). Updating the ganzfeld database: A victim of its own success? *Journal of Parapsychology*, 65(3), 207-218.

Bosch, H., Steinkamp, F., & Boller, E. (2006). Examining psychokinesis: The interaction of human intention with random number generators: A metaanalysis. *Psychological Bulletin*, 132(4), 497-523.

Freedman, M. (2018). Mind-matter interactions and the frontal lobes of the brain: A novel neurobiological model of psi inhibition. *Explore*, 14, 76-85.

Benson, H., et al., (2006). Study of the effects of intercessory prayer in cardiac bypass patients: A multicenter randomized trial of uncertainty and certainty of receiving intercessory prayer. *American Heart Journal*, 151(4), 934-942.

Bem, D. J. (2011). Feeling the future: Experimental evidence for anomalous retroactive influences on cognition and affect. *Journal of Personality and Social Psychology*, 100, 407-425.

Wagenmakers, E. J., Wetzels, R., Borsboom, D., van der Maas, H. L. J. (2011). Why psychologists must change the way they analyze their data: The case of psi: Comment on Bem (2011). *Journal of Personality and Social Psychology*, 100, 426-432.

### **Week 8 (October 29): DEBATE WEEK: What is abnormal?**

Szasz, T.S. (1960). The myth of mental illness. *American Psychologist*, 15(2), 113-118.

Kirk, A.S. (15 August, 2005) Are we all going mad, or are the experts crazy?  
*Los Angeles Times*.

[http://www.spa.ucla.edu/main2.cfm?d=xr&f=news.cfm&s=school&news\\_id=12742](http://www.spa.ucla.edu/main2.cfm?d=xr&f=news.cfm&s=school&news_id=12742)

Rosenhan, D. L. (1973, January 19). On being sane in insane places. *Science*, 179, 250-258.

Bentall, R. P. (1992). A proposal to classify happiness as a psychiatric disorder. *Journal of Medical Ethics*, 18(2), 94-98.

Pearson, P. (2013). The DSM debate: When life, itself, becomes a critical condition. *Globe and Mail* (April 27, 2013).

### **Week 9 (November 5): What is Gender? How Many? How do we know? Transgender and Beyond the Gender Binary**

Before you do the readings, you may find it interesting to take the following online measure of gender or sex-role identification:

The Bem Sex Role Inventory: <http://garote.bdmonkeys.net/bsri.html>

Readings:

Richards, C., Bouman, W. P., Seal, L., Barker, M. J.; Nieder, T. O., T'Sjoen, G. (2016).



Non-binary or genderqueer genders. *International Review of Psychiatry*, 28, 95-102.

Zucker, K. J., & VanderLaan, D. P. (2016). The self in gender dysphoria: A developmental perspective. In M. Kyrios, R. Moulding, G. Doron, S. S. Bhar, M. Nedeljkovic, and M. Mikulincer (Eds.), *The self in understanding and treating psychological disorders* (pp. 222-232), Cambridge: Cambridge University Press.

Baudewijntje, P. C., & Guillamon, A. (2016). Neuroimaging studies in people with gender incongruence. *International Review of Psychiatry*, 28, 120-128.

Tuvel, R. (2017). In defense of transracialism. *Hypatia*, 32, 263- 278.

Also, there are three [online documents](#) relating to public policy to peruse:

The Ontario Human Rights Commission **initial** draft policy on discrimination and harassment because of gender identity and gender expression:

<http://www.ohrc.on.ca/en/consultation-survey-revised-policy-discrimination-and-harassment-because-gender-identity-and-gender>

The OHRC online public consultation survey on policy issues relating to gender identity and gender expression (input from which was used to formulate the final definitions):

<http://www.ohrc.on.ca/en/backgrounder-%E2%80%93-talking-about-gender-identity-and-gender-expression>

The **final** OHRC policy on discrimination and harassment because of gender identity and gender expression:

<http://www.ohrc.on.ca/en/policy-preventing-discrimination-because-gender-identity-and-gender-expression>

In the above online documents, focus on the definitions of gender identity and gender expression in the initial and final versions of the policy, as well as the variety of responses to the survey regarding potential definitions of these terms. Consider the different definitions and survey responses in light of the arguments and evidence presented in the readings.

Optional additional readings:

Fox, M. J. (2011). Prototype theory: An alternative concept theory for categorizing sex and gender? *Knowledge Organization*, 38, 328-334.

Meyer-Bahlburg, H. F. L. (2010). From mental disorder to iatrogenic hypogonadism: Dilemmas in conceptualizing gender identity variants as psychiatric conditions. *Archives of Sexual Behavior*, 39, 461-476.

Drescher, J., Cohen-Kettenis, P., Winter, S. (2012). Minding the body: Situating gender identity diagnoses in the ICD-11. *International Review of Psychiatry*, 24, 568-577.

**November 12: Fall Reading Week, No Class.**

**Week 10 (November 19): Free Will – Are we free to choose our actions?**

Wegner, D. (2004). Precis of the illusion of conscious will. *Behavioural and Brain Sciences*, 27(5), 649-659.

Preston, R. (13 August, 2007). An Error in the Code. *The New Yorker*.

Greene, J. & Cohen, J. (2004) For the law, neuroscience changes nothing and everything. *Philosophical Transactions of the Royal Society of London B*, 359, 1775-1785.

Taylor, R. (1963). *Metaphysics*. New Jersey: Prentice Hall Inc. 38-57.

**Week 11 (November 26): The pursuit of happiness: What makes us happy, and how can we tell?**

Aristotle (1892). *The Nicomachean Ethics*. Translated by J.E.C. Weldon. New York: MacMillan. Book I (pp. 84-100).

Argyle, M. (2005). Causes and Correlates of Happiness. In D. Kahneman, et. al., (Eds.), *Well-being: the foundations of hedonic psychology* (pp. 353-375). New York: Russell Sage Foundation.

Ryan, R. M., Huta, V. P., & Deci, E. L. (2008). Living well: A self determination theory perspective on eudaimonia. *Journal of Happiness Studies*, 9, 139-170.

*Optional Further Reading:*

Johns, H., & Ormerod, P. (July 16, 2007). Should we be happy with research on happiness? *Financial Times*.

<http://economistsview.typepad.com/economistsview/2007/07/should-we-be-ha.html>

**Note: December 3: Final Essay Due.**