McGILL UNIVERSITY

SOCI 515/HSSM 610 MEDICINE AND SOCIETY/THE SOCIOLOGY OF MEDICINE

Fall 2014

3647 Peel St. - Room 101 Monday 14:35-16:25

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Office Hours: Tuesday 14:00 - 15:00 and by appointment

About the course

The course is a seminar designed primarily for graduate students. The seminar will focus on the sociology of biomedical (clinical and laboratory) practices and, in particular, including recent developments at the interface of medicine and genomics. Its main objective is to examine how biomedicine shapes and is shaped by societal developments. Biomedicine is a very diverse field and sociologists of biomedicine have investigated a motley of different topics, ranging from the production of visual inscriptions, to the dynamics of medical discourse, the structure of medical texts, the development of diagnosis and classification, the role of biomedical instruments and devices, the evolution of different styles of research, the rise of patient activism, the emergence of biosocial identities, the commercialization of medical research, and so on. Because the field is so large, no single course could possibly cover its entire breadth. I have selected a number of topics corresponding to several key activities of contemporary biomedicine, such as diagnosis, screening, etc., as well as some recent developments, such as evidence-based medicine and genomics.

Course requirements

The course will follow a seminar format. Students are expected to contribute to each session in the form of preparation, participation, and focused questions for discussion. I have selected three *required readings* for each session. I can provide a list of additional readings to students who would like to explore a given topic more extensively.

Students must fulfill the following three requirements:

• First, each student will be expected to write a brief (1-2 pages) comparative summary of each week's required readings. The adjective "comparative"

refers to the assessment of how readings relate or do not relate to each other: What do they have in common? How do their approaches and arguments differ? Are they compatible or incompatible with one another in terms of their assumptions? What are the comparative strengths and weaknesses of each article? The summaries should be e-mailed to all course participants (myself included) no later than the Friday preceding the Monday class during which we will discuss the readings, in order to allow discussion leaders (see next point) to prepare their comments. Students are expected to read each other's comments prior to class.

- Second, each student will participate in leading the discussion of required readings during one class period, as part of a team of two or three students. At the beginning of the semester, each student should sign up for one or more sessions for which s/he agrees to act as the seminar facilitator, with the responsibility for introducing the discussion, keeping it moving and making sure pertinent points are covered. Discussion leaders should act as a team and present an integrated overview of each week's readings and of the issues and questions they raise (as contrasted with discussing each reading in turn). Their overview should be based on their own critical analysis of the readings and include a summary of the comments emailed by the other students. A printed outline of the overview should be distributed at the beginning of the each class.
- Finally, students will submit a seminar paper at the end of the course (4000-6000 words). The paper will analyze a topic of their choice in the sociology of medicine. Any topic will do as long as it deals with biomedicine (broadly defined) and as long as it implements the methodological and theoretical tools discussed in the course. The paper is *not* to be conceived of as an essay review of secondary sources. Rather, it should be based on the analysis of primary sources (medical literature, interviews, etc.). The paper, however, must include a section in which the topic is discussed theoretically or conceptually, and references to the literature from class readings and/or other relevant analytical material that you have found. Students are therefore strongly advised to choose a topic as soon as possible: *term paper proposals and outlines are due on October 20.* Papers are due in principle on the last day of classes (*December 4*) but an extension can be granted until *December 15*.

The grade will be determined by:

- a) Written summaries of readings: 30% of final grade
- b) Class participation (esp. as discussion leader): 20% of final grade
- c) Seminar paper: 50% of final grade

In accord with McGill University's Charter of Students' Rights, students in this course have the right to submit in English or in French any written work that is to be graded.

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STATEMENT ON ACADEMIC INTEGRITY

McGill University values academic integrity. Therefore all students must understand the meaning and consequences of cheating, plagiarism and other academic offences under the code of student conduct and disciplinary procedures (see www.mcgill.ca/integrity for more information).

COURSE SCHEDULE AND REQUIRED READINGS

NOTE: While the seminar focuses on readings that are directly related to biomedicine, most of the readings explicitly refer to the field of *Science & Technology Studies* (S&TS). Ideally, students should have already taken an introductory course to S&TS, although this is not a requirement. For students with no prior exposure to S&TS, the following textbook provides a useful introduction:

• S. Sismondo. 2010. *An Introduction to Science and Technology Studies, Second Edition*. Malden, MA: Wiley-Blackwell.

Additional recommended readings:

- B. Latour. 1987. Science in Action: How to follow scientists and engineers through society. Cambridge, MA: Harvard University Press.
- B. Latour. 2005. Reassembling the Social. An Introduction to Actor-Network Theory. Oxford: Oxford University Press.
- E. J. Hackett, O. Amsterdamska, M. Lynch & J. Wajcman (Eds). 2008. Handbook of Science and Technology Studies. Third Edition. Cambridge, Mass: MIT Press.

DETAILED SCHEDULE

1/ September 8: GENERAL INTRODUCTION

2/ September 15: 20th century (bio)medicine

(a) M. Berg, 1995. Turning a practice into a science. Reconceptualizing postwar medical practice. *Social Studies of Science* 25: 437-76.

- (b) P. Keating & A. Cambrosio, 2003. *Biomedical Platforms. Realigning the Normal and the Pathological in Late-Twentieth-Century Medicine*. Cambridge, MA: MIT Press; chapters 1-3 (pp. 1-82 + notes pp. 341-65).
- (c) V. Rabeharisoa & P. Bourret, 2009. Staging and weighting evidence in biomedicine: comparing clinical practices in cancer genetics and psychiatric genetics, Social Studies of Science 39: 691-715

3/ September 22: Analyzing clinical work

- (a) R. Fox, 2003. Medical Uncertainty Revisited. In G.L. Albrecht, R. Fitzpatrick & S.C. Scrimshaw, eds. *Handbook of Social Studies in Health and Medicine*. Thousand Oaks, CA: Sage; pp. 409-25.
- (b) M. Berg, 1992. The construction of medical disposals. Medical sociology and medical problem solving in clinical practice, *Sociology of Health & Illness* 14: 151-80.
- (c) C. May, T. Rapley, T. Moreira, T. Finch & B. Heaven, 2006. Technogovernance: Evidence, subjectivity, and the clinical encounter in primary care medicine. *Social Science & Medicine* 62: 1022-30.

4/ September 29: Inscriptions

- (a) B. Latour, 1990. Drawing Things Together. In: M. Lynch & S. Woolgar, eds. *Representation in Scientific Practice*. Cambridge: MIT Press; pp. 19-68.
- (b) M. Berg, 1996. Practices of Reading and Writing: The Constitutive Role of the Patient Record in Medical Work. *Sociology of Health & Illness* 18: 499-524.
- (c) B. Latour, 1999. Circulating reference: Sampling Soil in the Amazon Forest. In B. Latour, *Pandora's Hope: Essays on the Reality of Science Studies*. Cambridge, MA: Harvard University Press; pp. 24-79.

5/ October 6: Diagnosis

- (a) C.E. Rosenberg, 2002. The tyranny of diagnosis: Specific entities and individual experience. *The Milbank Quarterly* 80: 237-60.
- (b) P. Atkinson, 1995. *Medical Talk and Medical Work*. London: Sage; chapters 4 (Reading the Body) and 5 Constructing Cases), pp. 60-109.
- (c) A. Mol, 1998. Missing Links, Making Links. On the Performance of Some Atheroscleroses. In M. Berg & A. Mol, eds. *Differences in Medicine. Unraveling Practices, Techniques and Bodies*. Durham: Duke University Press; pp. 145-65.

NO CLASS on October 13: Thanksgiving

6/ October 20: Diagnosis meets genomics

- (a) A. Hedgecoe, 2003. Expansion and Uncertainty: Cystic Fibrosis, Classification and Genetics. *Sociology of Health and Illness*, 25: 50-70.
- (b) D. Navon, 2011. Genomic designation: How genetics can delineate new, phenotypically diffuse medical categories. Social Studies of Science 41: 203-26.

(c) P. Bourret, P. Keating & A. Cambrosio, 2011. Regulating Diagnosis in Post-Genomic Medicine: Re-Aligning Clinical Judgment? *Social Science & Medicine*, 73: 816-24.

7/ October 27: Screening

- (a) D. Armstrong, 1995. The rise of surveillance medicine. Sociology of Health & Illness 17: 393-404.
- (b) S. Timmermans & M. Buchbinder, 2012. Expanded newborn screening: articulating the ontology of diseases with bridging work in the clinic. *Sociology of Health & Illness* 34: 208–220.
- (c) S. Hogarth, M. M. Hopkins & V. Rodriguez, 2012. A molecular monopoly? HPV testing, the Pap smear and the molecularisation of cervical cancer screening in the USA. *Sociology of Health & Illness* 34: 234–250.

8/ November 3: Coordinating biomedical activities

- (a) G. Bowker & S.L. Star, 1999. Sorting things out: Classification and its consequences. Cambridge, MA: MIT Press, 1999; chapter 4: Classification, coding and coordination, ppé 135-61; chapter 9: Categorical work and boundary infrastructures: Enriching theories of classification, pp. 285-317
- (b) J.H. Fujimura, 1992. Crafting science: Standardized packages, boundary objects, and 'translation'. In A. Pickering, ed. *Science as Practice and Culture*. Chicago: The University of Chicago Press; pp. 169-211.
- (c) M. Berg, 1998. Order(s) and Disorder(s). Of Protocols and Medical Practices. In M. Berg and A. Mol, eds. *Differences in Medicine. Unraveling Practices, Techniques and Bodies.* Durham: Duke University Press; pp. 226-46.

9/ November 10: RCTs Clinical research

- (a) H.M. Marks, 1997. *The Progress of Experiments: Science and Therapeutic Reform in the United States, 1900-1990.* Cambridge: Cambridge University Press; chapter 7 (Anatomy of a Controversy: The University Group Diabetes Program Study), pp. 197-228.
- (b) P. Keating & A. Cambrosio, 2012. Cancer Clinical Trials: The Emergence and Development of a New Style of Practice. *Bulletin of the History of Medicine* 81: 197-223.
- (c) I. Löwy, 2000. Trustworthy Knowledge and Desperate Patients: Clinical Tests for New Drugs from Cancer to AIDS. In M. Lock, A Young & A. Cambrosio, eds. *Living and Working with the New Medical Technologies: Intersections of Inquiry*. Cambridge: Cambridge University Press; pp. 49-81.

10/ November 17: Regulating biomedicine

- (a) S. Timmermans & M. Berg, 1997. Standardization in Action: Achieving Local Universality through Medical Protocols. *Social Studies of Science* 27: 273-305.
- (b) T. Moreira, 2005. Diversity in clinical guidelines: the role of repertoires of evaluation. *Social Science & Medicine* 60: 1975–85.

(c) A. Cambrosio, P. Keating, T. Schlich & G. Weisz, 2006. Regulatory objectivity and the generation and management of evidence in medicine. *Social Science & Medicine* 63: 189-99.

11/ November 24: Evidence-based medicine

- (a) D. Armstrong, 2007. Professionalism, Indeterminacy and the EBM Project. *BioSocieties* 2: 73-84.
- (b) H. Lambert, 2006. Accounting for EBM: notions of evidence in medicine. *Social Science & Medicine* 62: 2633-45.
- (c) E. Mykhalovskiy & L. Weir, 2004. The problem of evidence-based medicine: Directions for social science. *Social Science and Medicine* 59: 1059-69

12/ December 1: Calculating risks

- (a) I. Hacking, 1992. Statistical Language, Statistical Truth and Statistical Reason: The Self-Authentication of a Style of Scientific Reasoning. In E. McMullin, ed., *The Social Dimensions of Science*. Notre Dame, Indiana: University of Notre Dame Press; 130-57.
- (b) A. Faulkner, 2009. The PSA test for prostate cancer: risk constructs governance? In: A. Faulkner, *Medical technology into healthcare and society:* a sociology of devices, innovation, and governance. Basingstoke: Palgrave Macmillan; pp. 72-99.
- (c) T. Porter, 2000. Life Insurance, medical testing, and the management of mortality. In L. Daston, ed. *Biographies of scientific objects*. Chicago: University of Chicago Press, 226-46.

13/ December 4 (Thursday): SUMMING-UP /STUDENT PRESENTATIONS

General discussion of the topics examined during the previous weeks and of the students' projects: please come prepared to talk for five-ten minutes about your term paper.