data-ppf.github.io Feb 5, 2019

lecture 3 of 14: risk and social physics

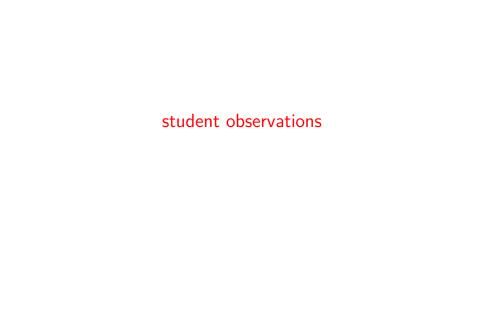chris wiggins + matt jones, Columbia

themes

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- non obviousness of statistical analysis of human phenomena

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- Quetelet creation of society and social physics

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- non obviousness of statistical analysis of human phenomena
- Quetelet creation of society and social physics
- contrast with analysis of variation a la Galton next time.

student observations

readings: Gerd, Porter, Quetelet

1) Gigerenzer, Gerd,

The Empire of Chance: How Probability Changed Science and Everyday Life. Ideas in Context. Cambridge: Cambridge University Press, 1989, Section 1.6 ("Risk and Insurance")

- ▶ WHY resistance to probability among practitioners of risk: science of risk "positively anti-statistical"

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- ▶ Who is best placed to make descriptive and prescriptive judgments?

2) Quetelet, Adolphe

"Preface" and "Introductory," A Treatise on Man (1842),

- ▶ What is this new science of man? What qualities should have

Let's talk through three stages on p 6. 1. Experience 2. "society" 3. Moral phenomena resemble physical phenomena

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- ▶ Porter 100 : "clear evidence that human variation could be understood in the same terms as errors of observation"

3) Porter, Theodore.

The Rise of Statistical Thinking, 1820-1900 (Princeton, N.J.:
Princeton University Press, 1986), chap. 2 (40-70) + 100-109.

- ▶ a note on 'secondary sources': what questions do we ask one?

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- Generally, how does P interpret and explain what Q is up to?
- lots of context around Quetelet's role in shaping our thinking about data, people, and policy.

DEVIANCE and HUMAN MEAN

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- 104: how understand DEVIATION AND THE MEAN

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- 54: criminality and deviance as focus; how understand deviation?

LIBERAL POLITICS

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- 46: "If social physics is to be conceived in part as a testament to the confidence and ambition of the astronomer, it must also be recognized as a paean to social order in the spirit of gradualist liberalism".

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- 56: "Secular social evolution" rather than WHAT?? What's excluded

CHARACTERIZING PEOPLE AND RACES: LOOKING AHEAD

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- Average man as "type" of nation [52]

FUTURE SCIENCES

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- Surprising turnabout:

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- ▶ Surprising turnabout:
- ▶ Social MODEL for new forms of science of mass phenomena

WHAT SCIENCE MAKE POSSIBLE and THINKABLE

- 55: important source of analogies for other fields

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▶ 55: important source of analogies for other fields
▶ 69: from moral to scientific:

power and principles

how did new capabilities rearrange power? who can now do what, from what, to whom?

role of rights, harms, justice?

foreshadowing data for Thursday

reminder of themes/big main takeaways

themes

up next

appendix

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