

Social networks and the economics
of information in collective action
and conflict

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Motivation

- Underlying motivation: why individuals and groups want to engage in conflict and what are structural features that make it more likely to occur
- Popular motivation: Arab Spring protests
- *“...the U.S. needs to take serious note when networks of family and friends align — increasingly through digital media — on a set of grievances that political elites simply cannot or will not address.”* - Philip N. Howard in *Digital Media and the Arab Spring* from Reuters (Feb. 16 2011)

Social and Economic Networks

- Informal: a group of individuals/agents and a social structure that represents interdependencies between them
- Graph theory forms the analytical framework for networks
- Formal: a collection of N nodes and a listing of all pairs of nodes that are thought to be connected
- can be represented by an $N \times N$ matrix whose elements are 0 in ij th entry if nodes i and j are not connected and 1 if i and j are connected
- connection between agents can have many interpretations: suggest communication, kinship, sharing of knowledge, geographic proximity
- Other issues: Static random graphs, measures of connectedness, endogenous network formation

Motivating Literature

- No one coherent thread in below literature: comprise a few avenues of potential research as it relates to network analysis **and information economics generally**
- *The Logic of Collective Action: Public Goods and the Theory of Groups* by Mancur Olson
- *The inevitability of future revolutionary surprises* by Timur Kuran

Literature

- *Theory and Evidence From the Rwandan Genocide* by David Yanagizawa
- *Can Hearts and Minds Be Bought? The Economics of Counterinsurgency In Iraq* by Berman, Shapiro, and Felter

Research Questions

- Collective action problem: are socially connected individuals more willing/likely to engage in collective action? Cheaper costs of coordination but also presence of enforcement mechanisms
- Preference falsification: do social networks allow for a safe, (possibly) anonymous way for individuals to share grievances and understand the extent of popular support for social change?

Research Questions

- Propaganda: how can broad information networks lessen the impact of violent propaganda
- Information in counterinsurgency: in addition to providing incentives for cooperation, how does social network structure facilitate or hinder the information citizens have access to

Challenges ahead

- Obviously, to better define and narrow the research questions and methodology
- Theoretical: a new mathematics that doesn't always fit neatly into preexisting results in standard micro and game theory
- Empirics: how to measure connectedness (proxies for connectedness vs. outcomes of connectedness), quality of data (particularly in societies with conflict), macro vs. micro analysis, endogeneity problems

Comments and Suggestions

-would be greatly appreciated. Thank you!