

PEC 575 Social Choice, Bargaining, and Elections

Fall, 2017
T 3:25–6:05pm
Harkness 112

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Hours: by appointment

The course covers models of elections and legislative bargaining, with a special focus on the fundamental connections between the two modeling applications. The common theme is a canonical framework in formal models of politics: optimal choice of policy, subject to approval by a voting body. In elections, this is a candidate's choice of electoral platform, which is then voted on by the electorate; in bargaining, this is the choice of a policy proposal, which is then voted on by members of a committee or legislature. We begin with background in social choice theory, which is used in the later game-theoretic analyses. We then examine the canonical model as applied to static elections, dynamic bargaining, bargaining with an endogenous status quo, political accountability, infinitely repeated elections, and lobbying. (Not all topics will be covered.)

2 Social Choice Theory

We cover basics of relations, preference, and choice. We then move to preference aggregation, with a focus on simple voting rules, and we review impossibility theorems of Arrow, Gibbard, and Nakamura. The majority top cycle and uncovered set are defined. Possibility results for value restriction will be proven and applied to models with single-peaked preferences and to voting over lotteries. We also survey results on majority cycling in the multidimensional spatial model.

- J. Duggan (2017) "Abbreviated Notes on Social Choice"

Downsian Elections

We cover Downsian models of elections under different assumptions on the objectives and information of the candidates, and we find a strong connection between pure strategy equilibria and the majority core. We focus particularly on existence of equilibrium outcomes, which sometimes requires attention to mixed strategy equilibria. Applications include determination of taxes and the role of campaigns.

- J. Duggan (2014) "A Survey of Equilibrium Analysis in Spatial Models of Elections"

- T. Groseclose (2001) "A Model of Candidate Location when One Candidate Has a Valence Advantage," *American Journal of Political Science*, 45: 862–886
- A. Prat (2002) "Campaign Advertising and Voter Welfare," *Review of Economic Studies*, 69: 999–1017
- S. Coate (2004) "Political Competition with Campaign Contributions and Informative Advertising," *Journal of the European Economic Association*, 2: 772–804
- J. Duggan and M. Jackson (2006) "Mixed Strategy Equilibrium and Deep Covering in Multidimensional Electoral Competition"
- O. Carbonell-Nicolau and E. Ok (2007) "Voting over Income Taxation," *Journal of Economic Theory*, 134: 249–286
- A. Meirowtiz (2008) "Electoral Contests, Incumbency Advantages, and Campaign Finance," *Journal of Politics*, 70: 681–699
- S. Callander (2008) "Political Motivations," *Review of Economic Studies*, 75: 671–697
- E. Dekel, M. Jackson, and A. Wolinsky (2008) "Vote Buying: General Elections," *Journal of Political Economy*, 116: 351–380
- S. Ashworth and E. Bueno de Mesquita (2009) "Elections with Platform and Valence Competition," *Games and Economic Behavior*, 67: 191–216
- P. Hummel (2010) "On the Nature of Equilibria in a Downsian Model with Candidate Valence," *Games and Economic Behavior*, 70: 425–445
- S. Krasa and M. Polborn (2012) "Political Competition between Differentiated Candidates," *Games and Economic Behavior*, 76: 249–271
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- T. Romer and H. Rosenthal (1978) "Political Resource Allocation, Controlled Agendas, and the Status Quo," *Public Choice*, 33: 27–43
- D. Baron and J. Ferejohn (1989) "Bargaining in Legislatures," *American Political Science Review*, 83: 1181–1206
- D. Ray and R. Vohra (1999) "A Theory of Endogenous Coalition Structures," *Games and Economic Behavior*, 26: 286–336
- J. Banks and J. Duggan (2000) "A Bargaining Model of Collective Choice," *American Political Science Review*, 94: 73–88
- H. Eraslan and A. Merlo (2002) "Majority Rule in a Stochastic Model of Bargaining," *Journal of Economic Theory*, 103 : 31–48
- J. Banks and J. Duggan (2006) "A General Bargaining Model of Legislative Policy-making," *Quarterly Journal of Political Science*, 1: 49–85
- T. Kalandrakis (2006) "Proposal Rights and Political Power," *American Journal of Political Science*, 50:441–448
- T. Kalandrakis (2006) "Regularity of Pure Strategy Equilibrium Points in a Class of Bargaining Games," *Economic Theory*, 28: 309–329
- S.-J. Cho and J. Duggan (2009) "Bargaining Foundations of the Median Voter Theorem," *Journal of Economic Theory*, 144: 851–868
- D. Cardona and S. Palfrey (2017) "The Median Voter Theorem in a Stochastic Model of Bargaining," *Journal of Economic Theory*, 171: 1075–1103

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- G. Grossman and E. Helpman (1996) "Electoral Competition and Special Interest Politics," *Review of Economic Studies*, 63: 265–286
- A. Dixit, D-286

- M. Richter (2014) "Fully Absorbing Dynamic Compromise," *Journal of Economic Theory*, 152: 92–104
- V. Anesi and D. Seidmann (2015) "Bargaining in Standing Committees with an Endogenous Default," *Review of Economic Studies*, 82: 825–867
- J. Zappal (2016) "Markovian Equilibria in Dynamic Spatial Legislative Bargaining: Existence with Three Players," *Games and Economic Behavior*, 98: 235–242
- V. Anesi and J. Duggan (2017) "Existence and Indeterminacy of Markovian Equilibria in Dynamic Bargaining Games," working paper
- J. Zappal (2017) "Simple Markovian Equilibria in Dynamic Spatial Legislative Bargaining," working paper

In n t ¹ or ~~2~~ on Accountab ty Mo s

The last topic is models of infinitely repeated elections with incomplete information. We focus on existence of equilibria that are stationary, in an appropriate sense, and the incentives of politicians to respond, in equilibrium, to the preferences of voters .

- J. Duggan and C. Martinelli (2017) "The Political Economy of Dynamic Elections:

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