Agreements associated with social contracts, 214 coordinating on an equilibrium, 214–215 failure of one side to carry out, 215–216 Akaike Information Criterion, 111	dynamic model with idiosyncratic shocks, 140–143 informational, 135 instrumental, 135 pure versus imitative, 135
Akerlof, G., 93	
Aristotle, 155	Decision making, in interactions-based
Arrow-Debreu model, 17, 27	models, 17–20
B 11 200 200	Discriminatory norm
Bargaining game, multiagent, 206–208	in class formation model, 194–195
Bargaining process, evolutionary model of, 193–194	conditions for emergence of, 192–193 governing distribution of property, 191
Behavior. See also Norms	Durlauf, S., 86, 87
conformist, 134	Burnari, 5., 60, 67
generating positive externalities,	Egalitarianism, effect on within-group
136–137	selection, 179
punishment for deviations in, 93	Ellison, Glenn, 91, 143
taste-based preferences in, 93-94	Equity norms
Behavior, aggregate	conditions for emergence of, 192-193,
in economic environments, 29–30	196–198
emergence of individual interactions, 30	in distribution of property, 191 stochastic stability of, 199
Behavior, individual	time taken to achieve, 199–201, 204–205
distributions across populations, 16	Erdal, D., 223
in models of local interactions, 94–100	Errors-in-variables problem, 60-63
Beliefs	Externalities, 17–19, 90–91, 146
endogenous, 194-196	
heterogeneous, 27	Fairness, as coordinating device, 224
Bernheim, D., 93	First Welfare Theorem of Economics, 28,
Boehm, Christopher, 159	33
Brock-Durlauf model, 4–5	Folk theorem, 216, 223, 227
	Fractious state
Classes, conditions for emergence of, 192–193	conditions for emergence of, 192–193, 198–199
Coleman, James S., 67–68	transition time to equity norm from,
Conformity	199–201, 204–205
dynamic model of, 134–140	Fudenberg, D., 91

Game theory Housing and Urban Development Battle of the Sexes, 218, 219, 220, 223 (HUD), Moving to Opportunity Chicken, 217-218 programs, 6, 50, 72-74, 76, 85 Game of Life, 221, 226 Hume, David, 155, 180, 214, 215, 216, 222 modeling direct interrelationships in, 20 Prisoners' Dilemma, 218-219 Identification of social interactions with correlated unobservables and pure and mixed strategies in, 217–218 Gauthier, David, 215 errors-in-variables, 60-63 Gautreaux program, 6, 50, 72–74, 76, 85 with endogenous group membership, Gaviria, A., 69 General equilibrium theory and simultaneity problem, 54-59 I Have a Dream program, 75, 76 behavior of data aggregates under, 29 - 31Individualism, methodological, 33-34 compared with interactions-based Individuals. See Behavior, individual Individual selection. See also Group approach, 17, 31 description of individual behavior in, selection acquisition and abandonment of norms, 166-173 incompleteness of, 29, 30 of a dichotomous trait, 181-183 Gibbs measures, 23 Glaeser, E., 78n22, 86-87, 94 factors influencing trait selection in, 179 Granovetter, Mark, 34 in framework to analyze trait Greif, Avner, 157 replication, 160-161 integration with group selection process, Group characteristics 173-177 endogeneity of, 54 Inertia, in social interaction structures, simultaneity problem in estimating, 54-59 143-146 Groups Institutions absence of individual selection in effect on preferences, 155–156 homogeneous, 161 influence on group selection process, 159 role in transmission of behavioral endogenous membership in, 63-66 influence on individual behavior, 5-6, norms, 151 8-9 Interactions-based models applied to language, 34-35 in model of trait selection process, 161 Group selection. See also Individual applied to security issues, 35–37 selection collective behavior, 15-16 between- and within-group, 158–159 global versus local interactions, 23–26 conditions for absence of, 161 and methodological individualism, derivation of equation for dichotomous trait, 181-183 nonlinearities and multiple steady states in human populations, 162–166 individual acquisition and abandonment reasoning from individual to aggregate of norms, 166-173 behavior, 17-20 influence of economic institutions on, with spatial structure, 25-26 159-160 influence of egalitarianism on, 179 Kant, Immanuel, 223 Knauft, B., 223 Hamilton, Alexander, 227 Knight, Frank, 133 Harsanyi, John, 157, 214 Language for research, 27-29 Hayek, F. A., 224

Learning, in group selection model,

166-173

Libertarianism, 229

Henderson, V., 68

Hilbert space, 28 Hirschman, Albert O., 180

McIntyre, L., 28-29 Pareto efficiency, in First Welfare Manski, Charles, 77nn7, 8 Theorem, 33 Policy interventions. See also Gautreaux Maryanski, A., 221, 226 Mason, K., 6-7 program; I Have a Dream program; Media campaigns, 74–75 Media campaigns; Moving to Mieszkowski, P., 68 Opportunity (MTO) programs; Social Moral codes of society, 215 policy interventions Morris, Stephen, 144 effects on social interactions, 49-50, Moskos, C., 10 70 - 75Mosteller, F., 67-68 Gautreaux/WTO programs as, 72–74 Moving to Opportunity (MTO) programs, Populations 9, 50, 72-74, 76, 85 distribution of traits in, 161 Moynihan, D., 67–68 group selection in human, 162–166 Multiple equilibria, 26, 31, 77n3 studies of heterogeneous, 16-17 Preferences cognitive aspects of, 157-158 Nash demand game, 193-196 Nash equilibrium effect of economic policies and institutions on, 155-156 in Chicken game, 218 in game theory, 217–220 effect of social structure on evolution of, Natural experiments 177-179 defined, 9 in model of residential segregation, 2-3 Gautreaux program, 9 for neighborhood composition, 146 Moving to Opportunity Demonstration, taste-based, 93-94 Probabilities, in interaction-based models, Neighborhood 18-20, 22-23 factors altering composition of, 146 Property Gautreaux/WTO programs as tests of in evolutionary model of bargaining, effects of, 73-74 individual preferences for composition norms governing distribution of, 191 of, 146 Neighbors Random choice models, 18 choice as sorting process, 146 Random fields, 22-23 in dynamic model of conformity, 136 Raphael, S., 69 Nisbett, Richard, 157 Reciprocity, 215–220 Norms. See also Discriminatory norm; Ross, Lee, 157 Equity norms; Fractious state; Social norms Sacerdote, B., 78n22, 86-87, 96 governing the distribution of property, Sauvageau, Y., 68 Scheinkman, José, 78n22, 86–87, 96 individuals' acquisition and Schelling, Thomas C., 2–3, 25, 146 abandonment of, 166-167, 169 Schofield, J., 68 influence of social structures on Segmentation evolution of, 159-160, 191-192 effect on within-group updating, 178 local norms in dynamic model of in group selection, 166-173 conformity, 137 role in replication of a trait within a observable long-run, 143 group, 178 in rise of nation state, 166 Segregation self-enforcing nature of, 191 factors influencing patterns of, 149 residential, 2-3, 25 social norms, 137 Selection. See Group selection; Individual transmission of, 151 selection Orwell, George, 213 Sen, Amartya, 157

Sibley, J. B., 10 Sonnenschein-Mantel-Debreu theorem, Signals as actions, 91–94 29, 30 Simplex representation, 196–199 Sorting process gains from trade, 147 Simultaneity problem, in estimating effect of group on individual characteristics, idiosyncratic choices in, 148-149 54-59 individual choice variable in, 146-148 Social contract by race, 151 consent in operation of, 214 Summers, A., 68 fair versus authoritarian, 225-226 in game-theoretic terms, 214 Tilly, Charles, 162–163, 165 hierarchical, 226 Tipping process of hunter-gatherer societies, 224 from one norm to another, 135 self-policing, 214 as response to stochastic shocks, 150 Social dynamics model Topa, G., 87 Traits empirical evidence generated by, 8-11 features of, 2-3 distribution in population, 161 insights in, 3-5 framework to analyse replication of, Social economics, 1–8 159 - 161Social interactions. See also Identification group-beneficial, 159-161 of social interactions Turner, J., 221, 226 combining local and global, 100-101 detecting existence of, 46, 48–53 Unobservable variables, in estimating empirical analysis of, 37–38 effect of group on individual generating social norms, 191-192; characteristics, 60-63 geometry of, 143 Utilitarianism, in political spectrum, 229 identification problem, 54-59 Variables. See also Unobservable variables issues in measurement of, 84-89 local or global interactions in in endogenous group membership measurement of, 89-90 problem, 65 model of local, 25-26, 94-100 errors-in-variables in social interactions, peer group effects, 66-69 physical and learning, 90-91 explaining shifts in, 83-84 problems of using microdata to identify, 84 - 85Whiten, A., 223 signaling and taste, 91-94 Wilson, J. Q., 225 unobservables and error-in-variables, Wilson, William Julius, 69 60 - 63Wolfe, B., 68 Social norms. See also Discriminatory norm; Equity norms; Fractious state Young, H. Peyton, 145 defined, 196 in dynamic model of conformity, 137 Zipf's Law, 29, 37 Social order arising from decentralized interactions, 205-206 emergence of spontaneous, 140 when people change associations, 146 Social pathologies individual characteristics in, 6 social economic studies of, 5 Social policy interventions effects on private incentives, 47–48

effects on social interactions, 47–52