Sociological Theory II
SOS3506
Erling Berge

Behaviour and Interactions

NTNU, Trondheim
Spring 2008

Lessons from the natural sciences

- Between scientific disciplines there are relations of reduction or analogy
  - Reductions may be an important engine for scientific progress (some current links between psychology and biology), or it may be premature, crude, or speculative
  - Analogies may provide valuable hypotheses but cannot provide evidence. Sometimes the analogy may provide thought worlds inimical to scientific progress (the organism analogy of society)

Physiology and neuroscience

- Basis for human behaviour
  - Fear: two different pathways from perception to emotional reaction, one going by way of cognition (taking longer providing more detail)
  - Memory affected by levels of stress induced hormones (too high gives no (conscious) memories)
  - Trust: trust game experiments shows
    - Reciprocity above what pure rational choice suggests it is affected by the hormone oxytocin making people less "betrayal averse" (rather than "risk averse")
    - An emotional foundation for punishing of unfair behaviour. Punishing provided stimulus for pleasure centre of the brain
  - Filling in capacity of the brain explains the quest for meaning in all information gathered

Spring 2008 © Erling Berge 2008 3

Explanation by consequences

- Reinforcement
  - If we notice positive consequences we may choose to repeat our action
  - Learning by reinforcements
    - Rewards by fixed or variable ratio schedules
    - Rewards by fixed or variable intervals
  - Learning may be extinguished by removing the reward.
    - This happens faster if the reward has been on fixed frequent ratios
  - To explain behaviour reward schedules needs to occur naturally and be opaque
    - This do not happen often with fixed schedules
  - Response patterns generated by reinforcements will seldom conform to rational choice theory
    - Responses will maximise average reward rather than marginal as rational choice would dictate

Spring 2008 © Erling Berge 2008 4

Differential reproductive fitness

- Selection
  - Agents may be selected by the environment rather than adapt to it
    - Human conscious decisions in breeding animals or plants based on their behavioural characteristics
  - Differential survival of organisms in natural settings will across generations increase the frequency of behaviour that increase reproductive success
    - This is called natural selection

Spring 2008 © Erling Berge 2008 5

Natural selection

- Optimize fitness measured by number of offspring
- Determined by environment and physiological and behavioural properties (phenotype)
- Genotype determined by DNA, a code written by the nucleotides T, A, G, C
  - Each "word" (or codon) of the code is a triplet of these
- Gene is a segment of DNA coding for one particular protein
- Small mutations will delete, insert or substitute one of the nucleotides
  - Evolution can be seen as an analogy to the substitution of letters in a word or sentence: will it still be meaningful? Can meaning be achieved in more than one step?
- Natural selection will generate local maxima

Spring 2008 © Erling Berge 2008 6

Why local maxima?

Small marginal mutations
- Cannot use indirect strategies, descendants have to survive
- Cannot wait for the mutation be become an improvement
- Cannot anticipate what will be an improvement in a changing environment

Caveats
- Large mutations occur
- Change across generations do not eliminate all "sub-optimal" adaptations providing for possible new starts

The units of selection

- Natural selection is opportunistic and myopic and usually fiercely individualistic
- Exceptions
  - Kin selection when seemingly altruistic behaviour increase the survival of kin carrying the same genes
  - Group selection can occur if punishment of non-cooperators is feasible (requires identification of non-cooperators)
- Kin and group selection may explain cooperative behaviour
  - Reciprocal altruism is a third mechanism, but would seem implausible in large groups since it requires the "grim trigger" strategy

Selection and human behaviour

	Intentional source of variation	Non-intentional source of variation
Intentional selection	Plant and animal husbandry	Gradual improvement of boats Eugenics Selective abortion and infanticide
Non-intentional selection	Firms in market competition	Natural selection

Natural selection

Non-intentional variation and selection
* Emotions may provide for a mechanism where genes affect certain types of behaviour (jealousy, anger against defectors, contempt against breaking moral norms, self deception, …)
  – Murder of wives and stepchildren
  – Propensity to punish non-cooperators
  – ???

Deliberate selection

Intentional variation and selection
- Animal and plant breeders, GMOs

Non-intentional variation -"-
- Sundt's example of improvements in boat design as arising from imperfect copying of earlier good boats and seamen noticing inmprovements
  - Leads to local maxima
  - Leads to intentional variations as builders start experimenting

Market competition

Intentional variation, non-intentional selection
- Type 1: all firms try to maximise profits, imperfect copies of more successful firms may provide improvements
- Type 2: firms are satisficers engaging in search for improvement only when profits fall below a threshold

Selection models in social science

- With high rates of change in the environment, firms needs to anticipate change to keep even with competitors
- Large firms and lobbying groups may be able to shape the environment (cpr.: path dependence mechanism)
- Modelling markets: There is a vast space between "improving efficiency" and "maximizing returns"
- Compare: Adaptive efficiency (North 2005)
- Electoral market models do not do justice to variations in motives among politicians (opportunists, reformers, activists)
- Outside arenas of competition the selection model of "as-if" rationality is even less plausible
- Constraints (before the fact) and selection (after the fact) contribute to explain behaviour. But choice is the core concept to understand

Interaction

1. Outcome for each depends on outcomes for others
2. Outcome of each depends on the actions of all
3. The actions of each depends on anticipated actions of all
4. The beliefs of each depends on the actions of all
5. The preferences of each depends on the actions of all
- Interdependences arise through
  - (1) independent action of individuals
  - (2) collective decisions binding all
  - (3) organisations creating rules to coordinate actions

Unintended consequences

- Unforeseen
  - Actions based on some desire may change the desire (addiction, loss aversion: endowment effect on valuing gains versus losses, closing off opportunities, but this can often be foreseen, depending on cognitive or motivational deficit)
- Externalities (positive or negative)
  - Material consequences suffered without having been part of the choice of action generating the consequence
  - Set x= initial state, y= intended state, z= resulting state
  - Z>Y>X : positive externality
    - Adam Smith: the invisible hand
  - Y>Z>X : weakly negative externality
  - Y>X>Z : strongly negative externality
    - Karl Marx: falling profit rate (actually wrong),
    - Keynes: unemployment as the "contradiction of capitalism"
    - Tragedy of the commons explanations

Spring 2008   © Erling Berge 2008   15

More unintended consequences

Internalities
- Benefit or harm conferred on future selves from actions today (e.g. addiction)

The younger sibling syndrome
- Believing other agents are not as strategic or rational as oneself
  - The cobweb cycles of betting on future demands and reacting to current prices (hog cycles)
  - Non-voting believing your candidate will win
  - Enacting legislation believing behaviour will not adapt

Spring 2008   © Erling Berge 2008   16

Strategic interaction

Game theory – simultaneous decisions
- N players with strategies and outcomes that can be ranked
- Dominant strategies if no other strategy can improve on the outcome regardless of what others do
- An N-tuple of strategies is an equilibrium if no player can improve on her outcome by unilaterally deviating
- Dominant strategies may produce equilibria
    - All have the same dominant strategy
    - Rational adaptation to players with dominant strategies
- Coordination equilibria or conventions: what you do is not so important as the fact that all do the same

Spring 2008   © Erling Berge 2008   17

Equilibria without dominant strategies

- Duopoly
    - Price competition of two firms
    - Location competition of two firms (or political parties)
- Model games illuminating cooperation and coordination
    - Strategies are C=cooperation and D=defection
        - Prisoners dilemma (strategy C or D)
        - Stag hunt (assurance game) (strategy C or D)
        - Chicken (strategy C or D)
    - Strategies are A or B arbitrarily different
        - Battle of sexes (strategy A or B)
        - Focal point game (strategy A or B)
        - Telephone game (strategy A=redial or B=do not redial)

Spring 2008   © Erling Berge 2008   18

Prisoners dilemma

	C	D
C	3,3	0,4
D	4,0	1,1

- Assuming only selfish motivation
- Assume payoff in utility units
- Risk of being sucker?
- Benefit from free riding?

Cases:

- Join labour union or not?
- Cooperate with OPEC or not?

Stag Hunt

	C	D
C	4,4	1,3
D	3,1	2,2

- C=hunting stag, requires cooperation D=hunting hare, individual activity
- Risk of being sucker?
- Benefit from free riding?
- Can we assume payoff is common knowledge?
  - If not actions may confirm wrong beliefs f.e. of PD preferences in the game
- Cultures of corruption may be a belief-dependent, not a motivation dependent phenomenon
- Disease control, counterterrorism

Transforming games

- Payoffs arise from the causal structure of the situation
  - Thresholds may make individual efforts pointless
  - Efforts may show "economies of scale", increasing returns on number of cooperators
  - Changing preferences from egoistic to altruistic or to conditional cooperation by institutional means (including punishments and rewards)

Spring 2008   © Erling Berge 2008   21

Chicken

	C= swerve	D
C	2,2	1,3
D	3,1	0,0

- Cars driving towards each other, the first to swerve loose honour
- The outcome is indeterminate

Cases
- Cuban missile crisis
- Irrigation system needing only one to maintain it (free rider vs sucker)

Spring 2008   © Erling Berge 2008   22

Battle of sexes

	Ballet	Boxing
Ballet	1,2	0,0
Boxing	0,0	2,1

Coordination
- Man and wife needs to agree tacitly since they have no way of communicating
- The outcome is indeterminate
- Multiple coordination equilibria seem to abound in social life
  - Choice of constitution, standards of measurement

Spring 2008   © Erling Berge 2008   23

Telephone game

Caller / Receiver	Redial	Do not redial
Do not Redial	2,2	0,0
Redial	0,0	1,1

- If a phone call is broken, who redials?
- The one who initiated the call or the one who received it?
- Which is best?

Spring 2008   © Erling Berge 2008   24

Focal point game

	A	B
A	1,1	0,0
B	0,0	1,1

- In coordination problems with indeterminate eqilibria psychological or social clues may furnish a focal point suggesting how to choose
- Focal points have been demonstrated experimentally
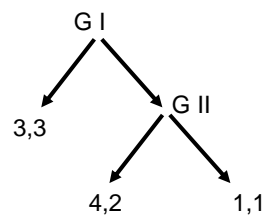- Choice of ruler, following customs, democratic rule, …

Sequential games

- The game tree
  - Backward induction
  - Rationality and information is common knowledge
- Is the threat of war credible?
- Problem of commitment (promises, threats)
  - Pre-commitment
  - Reputation
  - Burning bridges
- Case: Authoritarian rulers and promises to citizens

G I → 3,3 / G II → 4,2 , 1,1

Games and behaviour

- To what extent can we say the game theory explains behaviour?
  - Often there are alternative explanations to the game theoretic one of intention of achieving a desirable outcome
  - Pride and passion may be an alternative to interest, and may be involved in strategic reasoning
- Experiments may help us distinguish between different types of motives

Spring 2008   © Erling Berge 2008   27

Ultimatum and dictator games

Ultimatum game
- Player I propose a division (x, 100-x), player II accepts or rejects, On rejection no one gets anything

Dictator game
- Player I dictates a division (x, 100-x) that is the outcome provided x<100
- Rationality assumptions predict x to be as close to 100 as the rules allow
  - This is not the way people behave. The offer to player II is typically higher than that
  - Use of computers or strong anonymity and rotation of players rules out personal relations or reputation building. Also experimenter effects, lack of information or common knowledge can be rules out.
  - Failure of rationality or non-self-interested behaviour cannot be ruled out
  - Altruism can be rejected by results from the dictator game, offers are less generous than in the ultimatum game
  - Fear of rejection and norms of fairness seems to affect ultimatum game behaviour
  - Other games show strong reciprocity behaviour (trust game)

Spring 2008   © Erling Berge 2008   28

Backward induction

- If it is rational to defect in the last game of a finite series then it is rational to defect in the next to last, etc all to the first game
- People do not behave like this. If the logic of backward induction is explained people do follow it suggesting that this is a kind of reasoning that do not come "naturally"
- Cases: sequences of PD games show a higher level of C choices than predicted. The chain store paradox: predatory pricing is more frequent than predicted.
  - What is the role of uncertainty about some aspect of the game? (number of games, type of player)
  - Are there focal points?
  - Reasonable individuals will cooperate where rational will not

Spring 2008   © Erling Berge 2008   29

Kaynes' beauty contest

- Pick the most beautiful person based on pictures. Enter a raffle if you pick on of the 6 most beautiful.
- "It is not a case of choosing those X which, to the best of one's judgement. Are really the prettiest, nor even those which average opinion genuinely thinks the prettiest. We have reached the third degree where we devote our intelligence to anticipating what average opinion expects average opinion to be."
- If people do not conform the rationality predictions it may be because they are less than rational or more than rational.
  - In the younger sibling syndrome and in failing to apply backward induction one is less than rational
  - To be reasonable is to transcend rationality
  - To focus on the property of obviousness and reasonableness may reflect higher standards than mere rationality. But these properties are hard-to-define and highly context dependent

Spring 2008   © Erling Berge 2008   30

Trust

- Trust is "to refrain from taking precautions against an interaction partner, even when the other, because of opportunism or incompetence, could act in a way that might seem to justify precautions."
- Distrust may show up as avoidance or as precautions in interactions. The volume of avoidance is hard to observe
- Reasons for trust
  - Precautions: costs too high, signal something of value, incompatible with emotional relation, prior beliefs about a person, effort to induce trust in a relation
- Reasons for trustworthiness
  - Past behaviour, incentives, signs and signals
- Trusting: the propensity to trust others is especially important in getting cooperative ventures off the ground
- Trust may induce trustworthiness: trust game with indications of return level and option of punishment, but not chosen, shows highest return. The game without option for punishment (blind trust) show less trustworthiness

Spring 2008 © Erling Berge 2008 31

Social Norms

- Values: moral and social norms, religion, political ideology
- Beliefs: opinions about factual matters, causal relations
- Emergence of social norms difficult
- Content of beliefs are highly variable, while mechanisms for emergence, propagation, change, and collapse are more invariant
- Social norms operate through informal sanctions directed at norm violators sometimes affecting material benefits often compounded by gossip. They require an observer
- Most important: 1) gossip, 2) avoidance, 3) ostracism affecting emotions: shame in the violator and contempt in the observer. May lead to avoidance and material losses
- Why sanction if it is costly or risky?
  - Non-punishers may risk punishment? Triggering of anger and contempt?

Spring 2008 © Erling Berge 2008 32

Social norms and other norms

- Conventions (mostly self-enforcing)
- Legal norms (enforced by specialised agents)
- Moral norms (work without observers)
- Quasi-moral norms, (reciprocity, and conditional cooperation), (triggered by an agent observing what others do)
- Social norms (work when others observe what an agent is doing)

Spring 2008   © Erling Berge 2008   33

Externalities, conformism, codes of honour

- Norms against small negative externalities are prevalent (case: spitting) including group generated
- Many such norms emerge through public intervention
  – However, the statement that norms against tragedies of the commons have not emerged spontaneously is debateable
- The Law of Jante: often bad for the community
- Behaviour in feuds, vendettas, duels, revenge are often closely regulated
  – Explanations for their existence are not good enough (instead of ordinary third party law enforcement, maintaining reputations for retaliation (cattle people), maintaining war skills (aristocrats) cannot provide the mechanisms for the functional maintenance)

Spring 2008   © Erling Berge 2008   34

Etiquette, use of money, drinking and tipping

- Rules about dressing, behaving etc. often pointless but punished severely. The puzzle is why inconsequential matters come to be seen as important
- Legal restraints, restraints among friends, neighbours, and strangers
- Religious prohibitions, moderation, prescriptions of heavy drinking, conditional reversals, …
- Some tipping reasonable to ensure good service, other times incomprehensible. Once a norm exists following the norm is understandable
- Why norms? Their importance and proximate mechanism of operation are understood. Their origin is a puzzle.
  - Evolutionary emergence of emotions of shame and contempt, OK
  - But why are there different norms in different societies?

Spring 2008   © Erling Berge 2008   35

Collective belief formation

- Conforming to majority views
  - With variable knowledge, the majority is probably right
  - Power will persuade what is right (ridicule, shunning, etc) all the way down to firm beliefs
- Outward vs inward conformism
  - Fear of disapproval, learning, disonance reduction
- Cognitive vs motivational mechanisms
- Wrong beliefs do not persist over generations if validation by observation continues
- Pluralistic ignorance – believing one's belief to be an exception to the majority belief
- Culture of hypocrisy – public display of a belief that everybody knows no one believes
- Mechanisms: fear of disapproval or punishment
- Conformism may unravel or non-conformism may snowball
  - E.g. by the child in Anderson's tale "The emperor is naked!"

Spring 2008   © Erling Berge 2008   36

Rumours, fears, hopes

- Rumours will usually grow in significance as they are retold
- Origin, speed and mechanism of propagation are seldom studied
- Reactions to rumours observed at a distance was taken as proof of the rumour
- Propensity to believe in conspiracy (malevolence) made I difficult to see similarity of condition as a source of similarity of rumours
- Rumours will usually follow pre-existing cultural schemata with weak (but real) foundation in historical experiences
- Rumours based on fear more prevalent than those based on hope?
- Counter-wishful thinking and fear based rumours cause people to modify behaviour. Wishful thinking based on hope do not have nearly as much impact on behaviour.
- Economic markets may be an exception. How the interactive belief formation works here is not understood
- Information cascades: access to private information and knowledge about previous formed beliefs may in sequences (roll calls, reviews) lead to false beliefs even if each would have reach a correct conclusion if the raw data was available rather than the conclusion
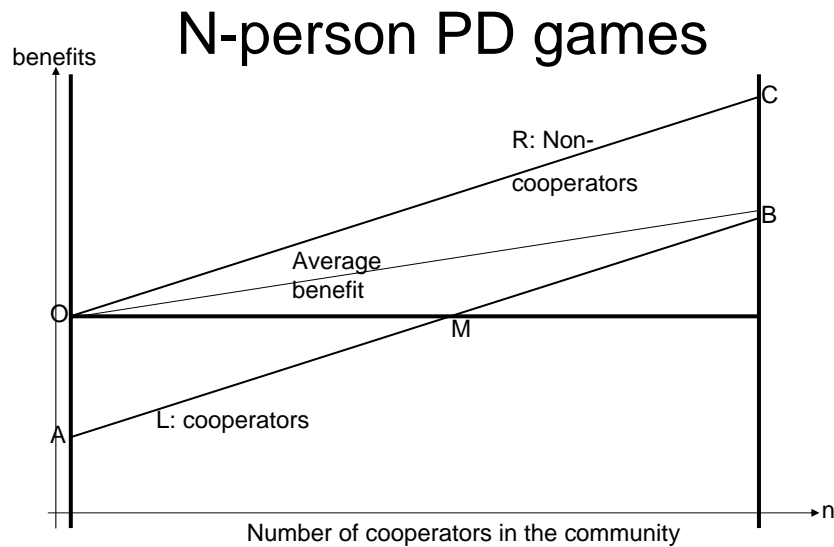
Spring 2008 © Erling Berge 2008 37

Collective action

- How can one sustain collective action without centralized authority?
- Public goods game: variation of individuals according to propensity to cooperate may create unravelling or snowballing
- The problem of collective action (a social dilemma) is in its simplest form defined by:
  – Individual defection beats individual cooperation, but
  – Universal cooperation beats universal defection

Spring 2008 © Erling Berge 2008 38

N-person PD games

benefits

R: Non-cooperators

Average benefit

O

M

C

B

A

L: cooperators

Number of cooperators in the community

n

Figure 24-2

- Vertical axes define two person PD game
- Unilateral defection/ free riding is the "rational" choice,
- Universal cooperation the next best
- Unversal defection third best and
- Unilateral cooperation when all else defect the worst (one is exploited, taken for a sucker)
- If M< N cooperate they are all better off even if free riders do even better
- Note:
- Here the cost of cooperation is a constant, that may seldom be the case.
- Both increasing and decreasing marginal return may be observed
- Further: the benefit of cooperation is linear in n
- Curve linearity may be more reasonable with variable both positive and negative marginal utility

Free-riders

- Rational outcome oriented self-interested motivations is insufficient to elicit cooperation
  - Except: indefinitely repeated games with a grim trigger strategy, or
  - An outside agency imposing selective sanctions on participants
    - Creating such an organisation is a collective action problem
    - Some promises of rewards may not be credible

Variable marginal utility

Average benefit
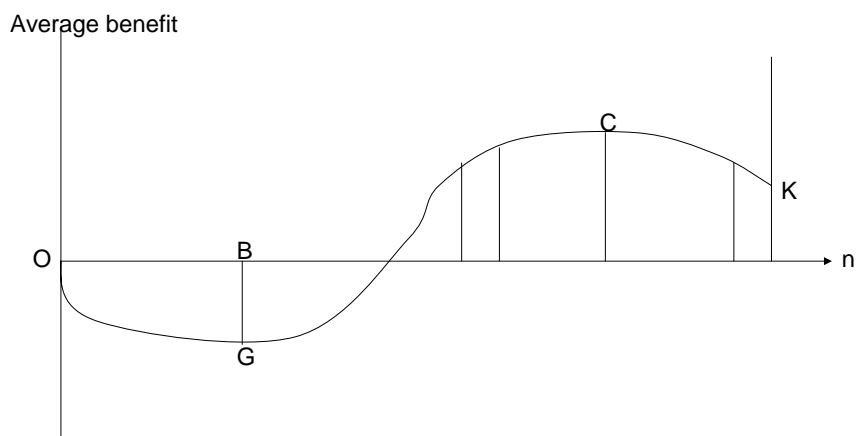
Voluntary cooperation Fig 24-3

- A variable threshold for participation may at each stage trigger new participants in a snowballing effect
- Starters:
  - Unconditional cooperators
  - Selfless utilitarian – cooperate if unless her actions will harm other innocent bystanders
  - Full utilitarian – cooperate if their contribution increase the average benefit not counting costs to themselves
- Conditional cooperators
  - Cooperation based on fairness considerations
  - Cooperation based on social norms
  - Cooperation based on "process benefits" / essential by products from the collective action

Collective decision making

- Aggregation of individual preferences to decisions binding on all
  - Including transformations and misrepresentations of preferences
  - Aggregation mechanisms: arguing, bagaining, and voting
    - Arguing is to persuade by giving reasons
      - Public debate drives out self-interest, encouraging misrepresentation, opening for shifts in preferences ("the civilizing force of hypocrisy"); but of course also genuine sincere arguing may change preferences.
      - How public should debates be? Too public and arguments degenerate, too closed and bargaining ensue

Voting

- Issues in popular voting:
  - Franchise,
  - Mode of voting (secret or open)
  - Majority needed for a decision
  - Quorum (sometimes in referendum systems)
- Issues in assembly voting:
  - Quorum
  - Majority needed for a decision
  - Roll call or show of hands voting (secret voting is rarely used) [this is different from secret/ open proceedings]
- The reasons for needing to vote may be
  - Diverging fundamental preferences
  - Diverging beliefs

Spring 2008   © Erling Berge 2008   45

Aggregation of beliefs

- Aggregation of beliefs by voting will seldom be able to disentangle beliefs from preferences
  - On jury majority voting: One may increase the chance of getting the right decision (forming the right belief) by 1) increasing the chance of each having the correct belief (quality), or 2) increasing the number of voters (quantity)
  - Qualifications may be a direct function of numbers
  - Incentive for rational ignorance increase with numbers and will (probably) offset the qualification effect

Spring 2008   © Erling Berge 2008   46

Aggregation of preferences

- Problem 1: misrepresentation
  - Open rather than secret voting may induce votes against one's most preferred alternative
  - Also in secret voting one may achieve an outcome better than the likely result of sincere voting by voting for a second best alternative (voting for one's most preferred alternative is seldom a dominant strategy)
- Problem 2: indeterminacy of outcomes
  - With more than 2 alternatives and more than 2 groups there may appear cycling rank orders of alternatives based on the order of voting
    - To overcome the indeterminacy one might measure intensity of preference or aggregate degree of individual need satisfaction (this is beyond what can be done today)
    - How serious the problem is in reality is unknown
    - Case: Stortinget voting on choice of airport localisation

Spring 2008   © Erling Berge 2008   47
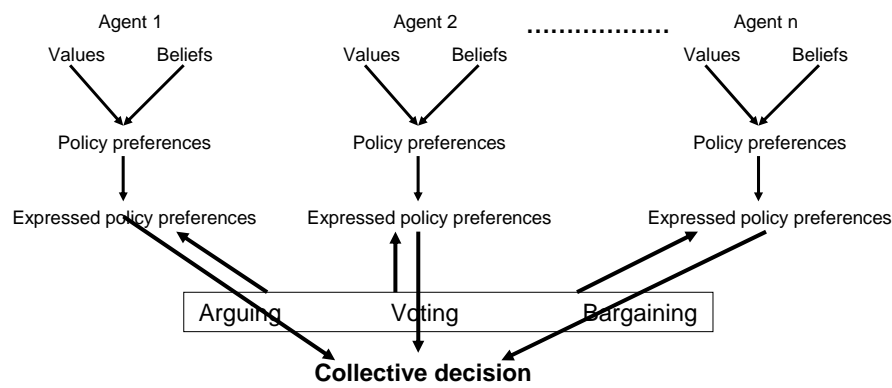
Bargaining

- Reaching agreement through credible threats and promises
- Problem 1: Credibility
  - of promises depends on degree of self-interest in keeping a promise, resources and ability to deliver, time horizon of relationship, reputation
    - Logrolling (A promises to vote for an issue important to B on condition that B votes for an issue of importance to A)
  - of threats depends on the default condition (if no bargaining result obtains), the available resources for carrying out the threat, the time horizon of the negotiators, degree of risk aversion, reputation

Spring 2008   © Erling Berge 2008   48

Collective decisions

Agent 1	Agent 2	··············	Agent n

Values   Beliefs   Values   Beliefs   Values   Beliefs

Policy preferences   Policy preferences   Policy preferences

Expressed policy preferences   Expressed policy preferences   Expressed policy preferences

Arguing	Voting	Bargaining

Collective decision

**The aggregation mechanism contributes to shaping the
input to the mechanism itself**

Spring 2008   © Erling Berge 2008   49

Organisations and institutions

- Institutions and organisations relates to each other as tokens and types (an instance of a concept and the concept itself) [This analogue may not further our understanding as much as "the rules of the game" analogue of North 1990]
- Organisations are collective actors
- Institutions are ways of doing things

Spring 2008   © Erling Berge 2008   50

Monitoring

- Principal and agent have different interests: principal (hard work, honesty), agent (easy work, power, personal extra incomes and favours to friends)
    - How can the principal ensure that the agent does her bidding faithfully?
    - In employing monitors who will guard the guardians?
    - Asymmetries of power, incentives, and information
- Problems of shirking, corruption, proliferation of hiring, etc. may be countered by acting on incentives and/ or opportunities of agents
    - Monitoring and sanctioning is costly

Trust and distrust

- Trust my help in lowering monitoring and sanctioning costs
- Some constitutions aspire to create a system of checks and balances, they are organised distrust
    - Assuming that those who hold power will work to retain and expand it
    - Assuming the constituent assemblies are acting AS IF they are motivated by reason – the civilizing force of hypocrisy
- 12 topics to consider in setting up constitutional checks and balances (p.436-438) :

Preventing degeneration of democracy

1. Preventing the government to engage in political justice
2. Preventing the government from manipulating the electoral system
3. Preventing the government manipulating the flow of information
4. Preventing the government manipulating the flow of money
5. Prevent central bankers from implementing disastrous monetary policies
6. Preventing the government from manipulating statistical information
7. Preventing the government from starving the opposition
8. Preventing the government from enacting self-serving legislation
9. Preventing the government from bypassing these restriction by using its majority in parliament
10. Preventing the government from ignoring these restrictions
11. Preventing the government from manipulating judicial reviews
12. Preventing judges to ignore large popular majorities

Spring 2008   © Erling Berge 2008   53

The problem of the second best

- If not all the above conditions are fulfilled it is not certain that the more are fulfilled the better
  - e.g. judicial review without checks on the judges may be worse than no review
  - Often incompetence will temper despotic rule
  - Removing one ill only to discover it kept a second greater ill at bay is not uncommon

Spring 2008   © Erling Berge 2008   54

Is social science possible?

What counts as a science?

1. General agreement on what is true, what is false and what is conjectural
2. A cumulative process of discarding theories and explanations for ever
3. Main concepts and theories can be expressed in a way accessible for all willing to expend time and effort
4. The "classics" are read mainly by the historians of science

Spring 2008   © Erling Berge 2008   55

Social sciences

- Soft social science
  - Postmodernism, postcolonial theory, subaltern theories, deconstructionism, Kleinian or Lacanian psychoanalysis etc are all far from the ideal
- Qualitative social science
  - Including history, case studies do not do well on all criteria. It does best on criterion 3
- Quantitative social science
  - Including measurement, data analysis, and modelling
  - Modelling is evaluated doing well on criterion 3 and 4.
  - Hard core rational choice does not fare better than soft social science.

Spring 2008   © Erling Berge 2008   56