L6: Ethical Solutions to Economic Dilemmas

(1) Chapter 2 shows that living in communities is not as easy or automatic as some theorists make it appear. A variety of dilemmas have to be solved to make this an attractive solutions. Such solutions may be transmitted genetically or socially—with the latter generally more important than the former. (This is evident in the variety of ethical dispositions that exist and the fact that we still have numerous, Hobbesian, Hardinian, Public Goods, and Externality Problems).

(2) Both sets of rules and their associated dispositions evolve through time as rule innovations that do not work are die out and ones that do work tend to be more frequently passed on to the next generation of humans.

(3) Chapter 3 takes up economic dilemmas.

(4) Textbooks take for granted that most such dilemmas have already been solved. But this tends to be true only in societies with will developed market networks. Not all present day societies have such networks.

(5) Chapter 3 suggests that their absence is in a sense "natural." It is what one would expect if ethical assessments of market activities and norms for participating in markets were based entirely on biological or similar practical interests.

(6) In the absence of supportive ethical dispositions, markets tend to be far smaller, less efficient, and thus less important in the daily lives of most individuals.

Realizing Gains from Trade

- Textbooks suggest that as long as there are good that can be traded and mutual gains from trade exist, then trade will take place.
- However, that is not always as easy as even the textbook case, where mutual gains from trade are well understood and trade takes place without transactions costs.
- Note that in the game below there are two Nash equilibria. One where gains to trade are realized and one where no trade takes place.
- In the zero transactions cost environment imagined the first may be said to weakly dominate the second, but both outcomes are Nash equilibria and can be stable outcomes.

Table 3.1: An Exchange Game Without Transactions Costs

		Friedrich (Seller)	
		Make Offer	Do not
Adam (Buyer)	Accept Offer	(A , F) (3, 3)	(A , F) (0, 0)
	Do not	(0, 0)	(0, 0)

Realizing gains to trade w transactions costs

- When there are transactions cost, the weak dominance of the trade strategy disappears because when a seller seeks a buyer is costly and so if trades do not occur, this makes sellers worse off. Similarly, when a buyer seeks a seller, but none is found, this makes the buyer worse off.
- There are still two possible Nash equilibria, but the no-trade equilibrium becomes more likely than in the text book case. (Think of all the stuff in your closet that should be sold on Craig's list etc.)
- This game structure is sometimes called an "assurance game." Notice that it is similar to the coordination games of chapter 2, but in this case one of the coordinated equilibria is more desirable than the other.
- In this setting, some but not all gains to trade are likely to be realized.

Table 3.2: Exchange Game with Transactions Costs

		Ronald (Seller)	
		Make offer	Do not
Douglas (Buyer)	Accept Offer	(D, R) (2, 2)	(D, R) (–1, 0)
	Do not	(0, –1)	(0, 0)

Normative Support for Trade

- Adam Smith's classic text, the *Wealth of Nations* (1776/2002) suggests that trade takes place because people have a "propensity to truck, barter, and exchange one thing for another." In such cases, transactions costs may be offset by the joy of trading.
- Utilitarians (see Ch. 12) tend to regard trade as a moral activity because it tends to increase aggregate utility. Mutual gains from trade implies that both parties are better off after a trade than before.
- The effects of cultural and moral support can be represented by adding "V" to the payoffs associated with trade. If V is high enough, the two equilibrium result is replaced with a single equilibrium where all gains from trade are realized (here V>1 is sufficient to do so.
- On the other, hand if cultural and moral opposition to trade exists, then V<0 (as in More's *Utopia*), and the no trade equilibrium becomes more likely.

Table 3.3: Gains from Trade with Transactions Costs in a Trade-Supporting Culture

		Friedrich (Seller)	
		Make offer	Do not
Adam (Buyer)	Accept Offer	(A , F) (2+V, 2+V)	(A , F) (–1 + V, 0)
	Do not	(0, –1 + V)	(0, 0)

The Dilemma of Fraud

- The previous cases assumed that both buyers and sellers fully understood the gains from trade that can be realized
- However, this is not always true. It is not always possible to recognize the quality of a good or service at the point of sale. For example, durability is often not known for years afterwards. Even the taste of a piece of fruit or bottle of wine cannot be known until after one takes the product home and consumes it.
- In such settings, sellers (or buyers) may engage in fraudualent behavior. They may make claims about the product that are false or misleading—and by selling "inferior" products as if they were "superior" products, their production costs go down and their profits go up.
- However, in such cases, far fewer market transactions may occur. Indeed, once the risks are understood by consumers, none may be.

Table 3.4: The Dilemma of Fraud

		Gordon (buyer)	
		Accept or solicit offer	Ignore all offers
Richard (seller)	Fraudulent offer	(R ,G) (3, –3)	(R , G) (–1, 0)
	Honest offer	(2, 2)	(–1, 0)
	Do not make offers	(0, –1)	(0, 0)

Honest merchants as solution to fraud

- If a subset of merchants have internalized norms that reduce their personal net benefits from fraudulent offers (guilt) or that increase them from honest offers (virtue), then trade with some merchants will take place even for these kinds of products and services (assuming that at least some buyers can tell the difference between "honest" merchants and "pragmatists'.).
- Insofar as this occurs, competition will tend to gradually eliminate the fraudsters and replace them with honest merchants. Indeed, even pragmatists may behave as moral merchants—at last in public, as noted by Kant—because of their practical interests in appearing to be honest. Such an appearance tends to increase trade and profits.
- It is interesting to note that a guilty reaction to fraud moves us back to the 2 equilibria result, but a virtuous norm for honesty moves to a single equilibrium of all gains from trade being realized. (*Try the latter out on a separate game matrix*.)

Table 3.5: Markets with Fraud and Guilt from Fraudulent Behavior

		Gordon (buyer)	
		Accept or solicit offer	Ignore all offers
Richard (seller)	Fraudulent offer	(R ,G) (3–G, –3)	(R , G) (–1–G, 0)
	Honest offer	(2, 2)	(–1, 0)
	Do not make offers	(0, –1)	(0, 0)

Shirking and team production of services for sale

- As Adam Smith pointed out (see Ch 11), production by specialized teams can be much more efficient (less costly) than production by a similar number of independent artisans
- And one of the key features of a commercial society is that much of what is produced for sale is done so through very large teams of specialized workers.
- However, there are problems associated with “team production.”
- Namely, in cases in which an individual team members output is difficult to measure, each team member has an incentive to shirk rather than work.
- The team member retains a share of the output produced, but gains all of his or her private benefit from shirking. The result is much less output from team production than potentially possible.

Table 3.6 The Shirking Dilemma of Team Production in Natural Cooperatives (hours of effort)

		Harold		
		8 hours	6 hours	4 hours
Armen	8 hours	(A, H) 16, 16	(A, H) 14, 17	(A, H) 12, 18
	6 hours	17, 14	15,15	13, 16
	4 hours	18, 12	16, 13	14, 14

The productivity of a work ethic

- An work ethic increases the private reward associated with working diligently and hard—namely one obtains a sense of pride or virtue in working at or near one's full capacity.
- The effect of such a norm can be characterized either with a sense of virtue from working diligently or sense of guilt associated with shirking.
- In this case, the results of these alternative normative disposition are similar and matrix 3.7 illustrates the case in which a person with an internalized work ethic feels guilty when he or she shirks. Notice that the shirking dilemma is solved if the team members associate G>1 with shirking.
- Note that this implies that such persons are more productive on the job (team) than others—in deed in many cases than others with greater skills.
- A team composed of such persons produces more than a similar team of pragmatists would.

Table 3.7 How a Work Ethic Reduces the Shirking Dilemma (hours of effort)

		Harold		
		8 hours	6 hours	4 hours
Armen	8 hours	(A, H) 16, 16	(A, H) 14, 17–G	(A, H) 12, 18–2G
	6 hours	17–G, 14	15–G,15–G	13–G, 16–2G
	4 hours	18–2G, 12	16–2g, 13–G	14–2G, 14–2G

Incentives to under specialize

- Another problems that markets confront to make efficient use of specialized teams is that individual team members have incentives that may induce them to under specialize, because they realize only part of the benefits generated through specialization.
- In the choice setting characterized, Armen and Harold may choose to specialize in either activity A or activity B and then trade their outputs to secure the other good, or they may "generalize" and spend half of their time on each activity in which case they are each self-sufficient, but do not benefit from specialization. The payoffs are in utility levels and demands for different outputs of the two activities are assumed to be somewhat inelastic. So, if the supply of one increases a lot, its price falls a lot. Thus, when one person is a generalist and the other is a specialist, the generalist is better off because the value of the good produced by the specialist falls while that not produced by the specialist increases. (Note that total output and income is lower at the central cell than in the two off diagonal cells.)

Table 3.8 The Under-Specialization Dilemma

		Harold		
		Specialize in A	Half A and Half B	Specialize in B
Armen	Specialize in A	(A, H) 4, 4	(A, H) 5, 7	(A, H) 6.5, 8
	Half A and Half B	7, 5	6, 6	7, 5
	Specialize in B	8, 6.5	5, 7	3, 3

Market Support for Persons with Productive Ethical Dispositions

- Insofar as the productivity of every organization depends in large part on the rule-following propensities of its members, organizations will attempt to recruit members who are likely to act in accordance with their rules. Thus, a potential member's normative dispositions will be one of the considerations when an organization recruits or accepts a new member, because these dispositions have significant effects on a new member's productivity.
- This is not to say that only mild-mannered, rule-following individuals will be admitted into organizations, but it is to claim that whether a person can be expected to follow the organization's rules or not is a nontrivial consideration in hiring decisions.
- The matrix below illustrates a firm's hiring decisions when choosing among workers of various skills and with various degrees of productive ethical dispositions. Note that both are normally considerations for this firm in its hiring decisions. (It is not just job related skills that matter.) [Think about and explain why, based on the above.]

Table 3.9: Menu of Potential Team Members and Their Anticipated Marginal Revenue Products

	High Skill	Moderate Skill	Low Skill
High Ethics	10*	8*	6*
Moderate Ethics	7*	6*	4
Low Ethics	5	4	3

* Five most highly ranked potential team members.

The Effects of Ethical Dispositions on the Scope of Commerce

- All the above implies that markets tend to support a subset of ethical dispositions because of their effects on productivity. Markets tend to support any ethical disposition that increase productivity or makes a firm's products more attractive to consumers.
- Conversely, markets tend to avoid hiring individuals with ethical disposition that decrease productivity or makes a firm's products less attractive to consumers.
- Ethical dispositions without such effects are neither encouraged nor discouraged. They are irrelevant to a firm's hiring or promotion calculus.

- Thus when one says that "**markets have moral foundation**," what is meant is that a subset of moral dispositions tends to make firms and markets more effective arrangements for producing the goods and services that consumers desire.
- Without moral support, markets would be far less useful "arrangements" for producing goods and services and would play a far smaller role in the average persons life.
- It bears noting, that such was the case in most of the world before the 16th century. Subsistence farming, working on farms, and hunter-gathering were the primary activities of a vast super majority of the population (90%), only a small fraction of which was for the purpose of sales to person outside the immediate area.

Effects of Market Rewards on a Community's Distribution of Ethical Dispositions

- Because markets reward a subset of ethical dispositions, they create incentives for individuals and families to invest more heavily in some dispositions than others.
- This effect is illustrated in table 3.10 below. In this case, market rewards are assumed to increase (by s) for particular ethical dispositions (Honesty and Prudence) and also increase the rewards associated with work.
- Notice that "Ben" realocates his time towards more work and more effort at developing the dispositions rewarded, diminishing his effort to develop other ethical dispositions.
- Market rewards, thus, encourage the development of some ethical dispositions and discourage others.

Table 3.10 Ben's Allocation of Time and Effort (Cell Entries are Marginal Utility, 16 Hours Allocated)

			Acquisition of Virtue		
	Leisure	Work	Honesty	Prudence	Bravery
1 hour	20	30 +s	11 +s	12 +s	11
2 hours	16	24 +s	9 +s	11 +s	10
3 hours	12	18 +s	7 +s	10 +s	9
4 hours	9	12 +s	6 +s	8 +s	8
5 hours	6	8 +s	5 +s	6 +s	6
6 hours	3	4 +s	4 +s	4 +s	4
7 hours	4	2 +s	6 +s	2 +s	1
8 hours	2	1 +s	4 +s	1 +s	0

Some Conclusions

Together, chapters 2 and 3 can be regarded as demonstrating the ethical prerequisites for early market networks. Without solutions to the most important social dilemmas of life in communities, such communities are unlikely to emerge, be sustainable, or occupy a place rather than a circuit. Without a stable place, significant trade or specialization are unlikely to emerge. Without significant partitioning and transferability of user rights, trade in things would be impossible. Without some disposition to engage in trade beyond pragmatic advantage, trading networks and specialization tend to be smaller than with them.

Without solutions to the problem of fraud, trade in some kinds of goods and services are unlikely to emerge or be sustained. Without solutions to problems associated with team production, the efficiencies of designed procedures for production would be less apt to be realized.
All these economic dilemmas have to be overcome for market networks to be come dense and extended. Their solutions are prerequisites to the emergence of a commercial society.

The game matrices of this chapter and the previous one demonstrate why such dilemmas are likely to be significant barriers to the emergence of settled communities and significant commercial networks. There are dozens and dozens of particular dilemmas with the general forms illustrated.

The small number settings used to illustrate the essential features of particular classes of dilemmas tend to make the problems appear to be obvious—which is, of course, advantageous to readers—but real-world dilemmas are rarely as obvious as the game matrices make them appear. More complex, larger-scale social dilemmas may never be fully understood and so would not consciously be solved, although they may be incidentally solved by rules adopted to address other problems.