Ends and Means, Values and Virtues

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Our philosopher, economist, political scientist, computer scientist and logician convene yet again after enjoying one of Paul's lunches. Outside it is showering with heavy rain. Autumn finally seems to have arrived.

Philosopher: It has taken me a while but I think I now see what social software is trying to get at. Its ultimate driving force seems to be a desire to help solve social problems. For this, one should of course understand these problems and get a good grasp of their structure. So, and that's the second element, we focus on the analysis of such social problems. Finally, the way of going about in both the analysis and the formulation of the possible solutions is to make use of formal techniques that originate from a variety of disciplines—economics, logic, computer science. And this is what gives the enterprise its cross-disciplinary flavor.

Logician: That sounds about right. We agreed in an earlier discussion that it may not be expedient to try and give a precise definition of social software (see page **??**).

Political Scientist: (To the philosopher) But I get the impression that you have reservations about the whole enterprise. In fact, you have been somewhat grumpy all along.

Philosopher: I'm sorry to hear that I came across as grumpy. I must confess I have a worry about the almost exclusive focus on the three elements of solution, analysis, and methodology. We do indeed talk at length about specific problems, solutions to those problems and all sorts of techniques that could be used. But we have not really addressed the question what it is that constitutes a problem nor about when a specific proposal can count as a solution and when it cannot.

Logician: We can't have it all at once, can we? In fact, isn't it better to go about in a kind of piecemeal way rather than posing all those big questions at once?

Economist: I am not even sure that I understand what it is that we are supposed to have neglected.

Philosopher: Ok, I'll try to explain but let me say at the outset that I do not try to argue for the return to a "grand" analysis of big philosophical questions. I am very much convinced of the necessity of breaking up big problems, and I agree that formal methods are an excellent tool for that. What I want to point out is that we should be more sensitive to the normative assumptions underlying our detailed analysis *in order to* improve upon that analysis. To illustrate, consider the various alternative solutions to the Solomon verdict that we discussed earlier. Those solutions were based upon the idea that the professed mothers make a bid for the child. Game-theoretical analysis shows that under such schemes we can make sure that the only equilibrium outcome is the one in which the real mother gets the child, at no cost at all.

Economist: Yes, what could possibly be wrong with that?

Philosopher: I wish to maintain that cheerfully proposing algorithms to solve social problems without worrying about moral side constraints is a questionable way to proceed. Has anyone considered the possibility that it may be immoral to ask a mother to assign a value to her child's life?

Logician: Why is that? Note that the auction solution simply exploits the fact that the true mother will hold the child dearer than her own life. The solution works precisely because a child is priceless to the real mother and not to the fake mother.

Computer Scientist: I see the point about moral side constraints if we consider algorithms like "Apply physical or psychological coercion until the suspected terrorist has named all his contacts". I agree there might be something wrong with that one.

Logician: Yes, and the rule of law in civilized countries is meant to prevent such criminal methods.

Economist: According to an article in the *New Yorker* that I have read [14], a CIA program to outsource torture by means of "extraordinary rendition" of suspected terrorists to countries like Syria or Egypt existed already in the

1990s. Mind you, these are countries where they would almost certainly be tortured. And it got completely out of hand after 9/11.

Philosopher: To get back at something closer to the Solomon verdict, consider the gruesome scenario of *Sophie's Choice*, William Styron's famous novel [21] about a choice a mother is forced to make by a sadistic Nazi officer. She is made to choose which of her two children stays alive, and which gets killed. If she refuses to choose, the Nazis will kill both children. It has been argued that part of the gruesomeness of this choice has to do with Sophie's identity as a mother. According to the philosopher Joseph Raz [18], the mother is asked by the Nazis to do something that violates the essence of what it means to be a parent: not to choose between one's children. The parallel with the Solomon verdict is that we there ask a mother to state how much she values her own child. But, if Raz is right, that is something that she cannot do without violating her own identity as a parent. Hence, what looks like a neat solution turns out to be based on a gross violation of one of our central values.

Computer Scientist: I don't see what you are getting at with this example. Surely, imposing such a choice on a mother is immoral. We all agree.

Economist: Imagine yourself in the position of Sophie. Being put in such a situation is gruesome and immoral. But it does not make things better if she refuses to make a choice, or does it? That way, she condemns both of her children. Suppose she would ask her children: what should I do, nothing, in which case both of you will be killed, or flip a coin? What do you think they would say?

Logician: Let's not get carried away. This may all be beside the point. To make a choice between one's two children, and to express how much one values one's only child seem very different things to me.

Economist: Yes, and the artillery is a bit heavy, too. Maybe there is a way to make your point without bringing in Nazi practices?

Philosopher: The point of the story was not that it is impossible to assign a value to a human life. In fact, I not only believe that to be possible but am convinced that we do so on a regular basis, for example when we decide what kind of safety devices to buy for one's car. What I said is that forcing parents to assign a value to the lives of their children violates their identity as parents and may therefore be immoral.

Logician: Put yourself in the place of Solomon, then. You are holding court,

and two raging women are brought into your courtroom. A soldier carries in a crying baby. The women both claim that they are the mother of the child. You have the legal authority to enforce a decision. You also have a reputation of wisdom to lose. What do you do?

Philosopher: I must confess I don't know. I would have to reflect on this.

Computer Scientist: I would not object to be in the place of Solomon. All those beautiful concubines ...

Logician: Listen, everyone agrees that Solomon's method is harsh. But if you object to that, you have to come up with something better. Flipping a coin would have avoided putting pressure on the women in a way that you deem morally dubious. Trouble is that now there is a fifty percent chance that the child gets handed over to the impostor.

Philosopher: Fair enough. Well, let me think. I guess I would try to find a way that ensures the child goes to the real mother but which does not suffer from unwanted and avoidable side-effects. So can we design a procedure that also has the desired outcome but in which we need not ask the mother to assign a value to her child's life? Suppose that Solomon asks each of the women to write down whether they still want to claim the child. He tells them beforehand that if exactly one of the two makes such a claim, the child will go to her. If however they both claim the child (or if neither of them does) the child will be raised in the palace and each woman should pay a fine that is equivalent to say her annual income. Given her love for the child, the real mother will claim the child: she prefers any situation in which she has tried to get her child back. Realizing this, the other pulls out. After all, given the real mother's claim, there is no chance that she will get the child and she will therefore want to make sure that she does not have to pay the fine. So we have the desired outcome without having asked the mother to assign a value to her child.

Economist: That's neat. But aren't you making an implicit extra assumption about the motives of the fake mother? That is, if her wish to have the child is primarily based on a desire to frustrate the real mother then she may prefer paying the fine after all.

Philosopher: Yes, you are right. But note that such an assumption is also made in the solution that I protested against.

Logician: And can we be sure that the real mother prefers the situation in

which the child is at the palace to the one in which the child is with the fake mother but in which she is not fined?

Philosopher: Yes, I do make that assumption. For which parent would not prefer a situation in which she has done everything she can to keep her own child? Wouldn't you prefer to pay a fine to having to live with the thought that you did not claim your own child, a child who now is raised by an impostor mother? The only reason why one could prefer the latter is, I think, if one fears that the child will have a very nasty life at the palace, say because he will become a slave there. But Solomon can preclude such a complication by ensuring the women that the child will have a decent upbringing in the palace.

Economist: Your proposal brings to mind the famous disagreement between deontology and consequentialism in ethics. Deontologists stress duty or deon, consequentialists look at whether the outcome is fair or desirable. Maybe designers of social mechanisms are more often consequentialists than deontologists ...

Philosopher: In this case the solution is based on the woman having what is called a procedural preference: she prefers to have done everything she could to obtain the child irrespective of the consequences [11].

Economist: The solution hinges on the assumption that the women try to realize their preferences — procedural or not — as well as possible. But I don't see why it discredits the view that consequentialists do a better job in finding solutions to practical social problems.

Philosopher: Deontologists and consequentialists often disagree about what the problems are so you can't say in general that one approach works better than the other. In the Solomon case my worry was about an aspect of the solution that was proposed, not about the nature of the problem itself. And in some cases in which there is agreement about what the problem is I would rather not leave the solution of those problems in the hands of people who think that the ends justify the means.

Logician: Some time ago I came across an interesting book by James Wood Bailey, where the view is defended that utilitarianism, which I suppose is a form of consequentialism, is a useful basis for political theory [5]. Bailey does not deny that individuals within institutions have moral responsibilities that cannot be defined in terms of utility alone. But utility can be used as a yardstick for valuing institutions. It allows us to identify morally valuable

institutions. The argument is based on a definition of institutions as equilibria in complex or iterative games.

Computer Scientist: Wait, let me guess. I see how his argument would go. I bet he just redefines my duty to abstain from stealing, say, in terms of maximizing my long-term interest. Why is stealing a bicycle morally wrong? Because it is not in my long term interest. I will get caught, or if not, my own bike will get stolen tomorrow, or I will have to invest in an expensive lock to get my bike from getting stolen, and so on. This is just an iterative version of the prisoner's dilemma game, where 'cooperate unless challenged' is the most successful strategy. So it turns out that what is morally right is what is good for me in the long run. See Axelrod's book on the evolution of collaboration [4], or Maynard Smith on evolution and the theory of games [15] that we discussed before (page **??**).

Logician: In Amsterdam the only reasonable thing to do is to ride on a cheap bicycle and invest in two expensive bike locks. Any bike thief will prefer to steal a more expensive bicycle locked with a single lock. But this is prudence, not morality. You are right, by the way, about Bailey's argument.

Philosopher: I am not sure a reduction of norms and values to our long-term interests is needed for the design of social algorithms. Consider the problem of fair division. There may be all sorts of different considerations that affect whether a division of a legacy is fair or not. In some cases it may be fair to give each of the children an equal share. In other cases we may want to give one of the children a bigger share, say because the others have squandered a large part of the family fortune. If we take the long term perspective, we should describe the problem as forming a small part of a much larger 'game of life' [6] which explains — in terms of our interests — the relevant moral side constraints in the division problem at hand. It would of course be great if this were possible, but I don't see why we should embark on it for a particular division problem. It seems to me that it suffices to be aware of the fact that different moral considerations may affect what is a problem and what is not, and what is an appropriate solution to a problem. We should thus be sensitive to those considerations both in the formulation of our problems and in the analysis of our solutions to them.

Political Scientist: Ah, that's what you are getting at! Of course, the solutions that we have discussed are based on the assumption that they all have a right to an equal share.

Philosopher: So you're saying that the solution only works for certain problems of fair division?

Logician: Of course, if there is debate about whether fair division is the correct procedure to be applied to a certain case, then that debate should be settled first.

Computer Scientist: This seems like an orthogonal issue to me. Scientists have learnt to disentangle such issues. But you philosophers seem to enjoy an occasional bit of conceptual confusion.

Economist: We should bear in mind that a model by definition leaves things out. Models are meant to get us started with thinking about solutions to well-defined versions of problems, without immediately taking aboard messy notions like moral rights and obligations. This still seems to me the most expedient route. And now I need a cigarette, if you'll excuse me.

(The economist goes outside to have a smoke. The others get a cup of coffee. After a few minutes, the economist returns, a bit wet. It is still raining outside.)

Philosopher: I really don't understand why you don't get it. What is so controversial about my point? Clearly, if we are interested in providing solutions to social problems then we cannot ignore normative considerations. To say that something is a problem is to take a normative stance. The same applies to the formulation of a solution to a problem. Whether something is a solution or not is not a purely value-neutral issue.

Logician: Yes, you sort of said this before. Maybe it helps if you give a concrete example of what you have in mind.

Philosopher: Take an example from economics, then. The economist and philosopher Amartya Sen [20; 16] argued that notions like rights, freedom and equality are of utmost importance for our understanding of human well-being. For him, the importance of these considerations was not a reason to abandon the economic framework, but rather to broaden the framework so as to make room for these new concepts.

Economist: This has had profound consequences for our thinking about poverty. For a long time, economists were accustomed to define poverty in terms of Gross Domestic Product (GDP) —the lower the GDP per capita, the poorer the country was said to be. As a result, policies aimed at reducing poverty

primarily were primarily aimed at increasing GDP per capita.

Philosopher: I suppose you need some indicator to measure success of an economic policy.

Economist: That's right, but Sen argued that GDP was a poor indicator for poverty. First of all, the focus on aggregate country data means that we lose sight of certain very relevant differences in well-being. Afro-American men in the U.S., for instance, have a lower life expectancy than males in China, yet the GDP of the U.S. is much higher. Moreover, the focus on GDP entails that we overlook certain crucial differences between countries. Take the example of large scale famines, which, as Sen points out, have never happened in democracies. Sen argues that this is not a coincidence: famines can only happen in authoritarian systems lacking openness of information and transparency of procedures. Sen's advocacy of capabilities or entitlements led to a change of policy of the UN: instead of reporting on economic development only, they now report on a wide range of issues under 'economic and social development'. [1]

Political Scientist: Sen was right: the formulation of the problem of the existence of poverty is of utmost importance. Sen's own proposals for how to view the problem of poverty can of course also be questioned. Some of those who shared Sen's criticism of GDP as an indicator for poverty have disagreed with his alternative to it. But how does this translate to the social software enterprise? We are not yet focusing on world-scale problems like poverty. Can we be sure we need reflection on our normative assumptions?

Logician: Consider the issue of strategic behavior, the topic of the Gibbard-Satterthwaite theorem. The theorem states that almost every social choice function is vulnerable to manipulation, that is, that it may be advantageous for one or more of the individuals not to submit their real preferences. Or, as it also has been formulated, individuals may have an incentive to lie about their preferences.

Economist: Within economic theory, that theorem gave rise to a specialized subfield: implementation theory. The idea there is to find mechanisms that 'implement' manipulable social choice functions. A mechanism is said to implement a social choice function if, when the mechanism is used rather than the social choice function, the strategic behavior of the individuals will result

[1] See `http://www.un.org/esa/`.

in the same outcome as what would have resulted if they had all expressed their real preferences under the social choice function.

Political Scientist: This sounds like a nice example of social software. A problem is formulated—the manipulability of social choice functions—and an algorithm is formulated—the implementation mechanism—to solve the problem.

Philosopher: Yes, indeed. But still I think we should examine the normative assumptions underlying the approach. Why is strategic behavior considered to be a problem? In a recent paper [12] Dowding and Van Hees argue that in a context of political decision making strategic behavior may be a virtue rather than a vice. They argue that if a procedure is manipulable, that is, if strategic behavior may pay off, then rational individuals have to make a calculation about what is best for them to do. This means that they will try to collect information about the beliefs and preferences of the other individuals, about the way in which the social choice function operates, about the possible ways the others may act, and so on. In sum, the greater the incentives to manipulate, the greater the incentive to obtain information about the decision problem. If having more information about the process is considered to be a valuable thing, and many theorists of democracy have indeed argued so, then it is a good thing that the social choice function is manipulable. There need not be a problem for an implementation theorist or a social software designer to solve. In fact, the use of a mechanism that makes manipulation impossible may in fact be creating a problem rather than that it solves one: it impoverishes the political process.

Political Scientist: When it was pointed out to Jean-Charles de Borda that his election scheme—where voters distribute points over candidates to indicate an order of preference—is highly susceptible to strategic manipulation, he is said to have exclaimed: 'My scheme is intended only for honest men' [7, p. 182].

Logician: Well, that severely limits its usefulness.

Economist: Surely manipulation may pose problems, even in a political context. Think of the cost of getting all this extra information. Also, it makes the decision process more unpredictable.

Political Scientist: And will it not be unfair for those individuals who do not have the same strategic skills as others?

Economist: That disadvantage would also apply to the implementation mechanisms.

Philosopher: The argument does not yield that manipulability is *always* a good thing; it merely challenges the view that it is *never* a good thing. Again, my point is that we should be careful about what we believe to be a problem that needs solving. Take the decision making process at university department meetings. Say we want to "solve" the problem of inefficiency or non-transparency of such meetings, a problem that we are probably all familiar with. It may well be the case that getting rid of inefficiency or non-transparency creates new problems that are more serious than the ones we intended to solve.

Logician: Abolishing departmental meetings altogether also has its drawbacks, you mean?

Computer Scientist: I agree that we should always think carefully about the severity of a disease before administering potent cures. Good doctors try to avoid iatrogenic illness, problems arising from the treatment itself. But how does one do that? Does philosophy have a patent cure-all? Should we assume that meetings at philosophy departments are conducted in more constructive and efficient ways than elsewhere?

Philosopher: Well, at least we have learnt from long experience that we agree more easily on pragmatic solutions than on fundamental principles.

Logician: Ahem—hardly what I would call a systematic method.

Philosopher: The interesting thing is that when there are strong disagreements about fundamental principles, a solution can only be pragmatic if it does not go against any of those principles. In order to be pragmatic, one should know what it means not to be pragmatic. And here insights from ethics are often of use. There are all sorts of ways of going about. For instance, one can distinguish between consequentialist and non-consequentialist accounts of what a problem is.

Computer Scientist: I attended the occasional lecture on ethics, but what vexes me is the exclusive focus on moral problems, or should I say, moral puzzles. The whole enterprise seems to miss a fundamental point about how people behave. Ethicists, at least those I have listened to, seem to assume that people when reflecting on a course of action analyze the morality of it, reach a conclusion, and then act accordingly. But what we see is that humans have

great trouble to do what is in their best interest, and even greater trouble to do what their conscience tells them to do.

Philosopher: "Following one's conscience" is just a metaphor, although one that Church philosophers like Augustine and Thomas Aquinas took quite seriously.

Computer Scientist: What I meant is making resolves, and then failing to stick to them. Oblomov behaviour. See, people are not like computers at all. A mouse-click on the "do A" button, but nothing happens.

Philosopher: That is what philosophers call 'akrasia', or inability to act in accordance with one's best judgement [17].

Logician: "O Lord, give me chastity, but not yet." The only quote from St. Augustine that I know by heart [3]. Very human, indeed.

Computer Scientist: When I teach programming skills, I have found out that it is no use to explain to my students that master programmers write clear code with documentation, insert tests that can serve as specifications, and restructure their programs whenever needed. Instead, I just drill them and give them feedback — letting them rewrite their unstructured rubbish until it satisfies my standards — until writing clear code is second nature to them. Not very different from instilling moral behavior in my young children. I mean skills like not hurting other children, not being rude, being honest, being polite. I have never heard ethicists address the issue of moral education, and that is precisely why I find ethics as an academic discipline so utterly boring and irrelevant.

Logician: Aristotle's *syllogistics* may be just a footnote to modern logic, but Aristotle's *Ethics* [2] is more inspiring than many of today's sterile discussions.

Philosopher: Thank you very much. I don't accept this dismissal of armchair philosophy though. If for instance thinking about the distinction between facts and values is a form of armchair philosophy, then I am happy to be an armchair philosopher. Moreover, you may want to catch up on the developments. The kind of armchair philosophy that you are criticizing hardly serves as an accurate picture of contemporary ethics. Whether it concerns a new field like neuro-ethics [13], developments in moral psychology [10], the study of the evolution of norms [22], or the revival of virtue ethics, we can witness an empirical turn in our thinking about moral issues. As to the revival of virtue ethics, the plea that ethics should take psychological insights into ac-

count can already be found in a landmark paper by Elizabeth Anscombe that was published in 1958 [1].

Computer Scientist: Ahem, 1958 is a long time ago. Was this a plea for a return to the Aristotelian view of ethics, with much greater emphasis on psychology? And did academic philosophers pay any attention?

Philosopher: As a matter of fact, many of them did, and there are quite a lot of places where you could start. A book I very much recommend is *Moral Goodness* by Philippa Foot [9]. It revives the ancient idea of a link between human happiness and virtue. It marks a fresh start in thinking about moral issues, and is already a classic. Foot was one of the founders of Oxfam, by the way. And it may interest you that Foot introduced the trolley problem that Rohit Parikh mentioned in his lecture here at NIAS (see page **??**). Another gem is *Ethics and the Limits of Philosophy*, by Bernard Williams [23]. I am almost sure you will like it, for Williams is about as skeptical as you are about what philosophy can have to say about moral issues. Only more knowledgeable, of course.

Computer Scientist: (With a smile) Of course.

Logician: I don't know about Foot or Williams, but Aristotle is a good practical psychologist, and that is why much of what he has to say about reaching one's full potential by training oneself to be an excellent man — or woman, one has to add — is still relevant today. We may want to study ethics in order to improve our lives, and the principal concern of the subject, according to Aristotle, is the nature of human well-being.

Computer Scientist: I like the view that people must be trained to be moral. It reminds me of the well known Zen simile of the training of the mind as "taming the wild ox" [19]. And a friend in cognitive science told me that the image of a wild animal and a rider with limited control squares quite well with modern findings of how emotion and reason interact in determining action [8].

Logician: (At the economist) It explains why you have difficulty giving up smoking. Your habit is endangering your health, and you know it. The warning message printed on your fags reminds you. Your insurance company makes you pay a premium for the extra risk. You can work out the statistics. Still, you can't give up, because the ox is stronger than the rider.

Computer Scientist: To smoke or not to smoke: that question may have something to do with ethics after all. I am sure Aristotle would have agreed

that an addicted smoker is lacking in the quality of temperance.

Philosopher: If ethicists are censored for their bad habits, there is always an easy rejoinder: "Who has ever seen a signpost walk in the direction that it points to?"

Political Scientist: Let's leave a discussion of the virtues for another occasion. I think we have talked enough for one lunch.

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