



# Homo Economicus, Selfishness, Ethics and Economics

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## Abstract

This paper attempts to go deep into foundational issues of contemporary ethics and economics such as: the departure of XX century mainstream economics from Adam Smith's broad view of human nature, where empathy plays a crucial role, to embrace the unpleasant, greedy homo economicus; the (unnecessary) link between self-interest and rationality such that rational self-interested humans may turn out to be social idiots; the negative effects of the generational egoism that underlies the approach, favoured by climate change sceptics, to the assessment of policies aimed at facing global warming; the difficult coexistence of markets and morals, and the adverse effects of incentives aimed at "rational self-interested agents" in dealing with agents who have social or other-regarding preferences and with goods that should not have a price.

**Keywords** Homo economicus · Selfishness · Rationality · Ethics & Economics

**JEL Classification** A13 · B12 · B13 · B41 · D62 · D91 · Q51

## 1 Introduction

I have dealt with the relation between ethics and economics several times in recent years (Boitani 2021, 2022, 2023, 2024). In what follows I attempt to go beyond the previous piecemeal approach and present a more systematic view of some of the themes that make the complex texture of this uneasy but, in my opinion, inevitable relationship.

My thesis, in summary, is that the intended distancing of mainstream neoclassical economics (notably its neoliberal variant) from ethics, in order to achieve a purported scientific neutrality, has proved damaging to both economic theory and economic policy, departing from the deep moral concerns of everyday life and even having a subtle "nocebo effect" on ordinary people's and public officials' behaviour. To corroborate

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my thesis, I shall deal with the following six points. 1) Many economists have not ceased to embrace the (ethical) postulates of rational individualist egoism that defines *homo economicus*, trying hard (and by far failing) to give this nasty mammal a noble father in the discipline's founder, Adam Smith; 2) there are a great many serious doubts that, even in the most basic economic choices, flesh-and-blood humans, while rational, act as *economic men*; 3) models of resource allocation exclusively based on the assumption of a selfish economic man may lead to widely wrong predictions; 4) consequently, the reduction of economic policy and politics *tout court* to the pursuit of incentives aimed at pushing *economic men* to behave in the public interest can have counterproductive results if (social and moral) humans are spontaneously interested in the well-being of their fellow human beings; 5) generational egoism has had (and still has) heavy consequences (here is a “nocebo effect”) for the way the dramatic issue of climate change is being addressed (or badly addressed); 6) the conjunction of rational selfishness with the transformation of all good things in life into commodities (that can be sold and bought) is likely to spoil them, to distort and corrode their meaning and value.

The six points listed above converge into a multifaceted critical appraisal of the behavioural and moral foundations of mainstream economics. It should be pointed out that most (if not all) of the arguments presented in this paper have been separately and repeatedly raised by economists, social scientists and philosophers (Drucker 1939; Leibenstein 1976; Hollis and Nell 1975; Hahn F.H.-Hollis M (eds.) 1979; Myers 1983; Henrich et al 2001; Cohen 2014; Bowles 2016; Motterlini 2025, to list just a few distant in time examples). The contribution of this paper—which is more a personal exploration in the history of (not exclusively economic) thought than a typical research paper according to contemporary standards in economics—lies in bringing most of the critical arguments together, in plain English, showing why, even from different perspectives, the claim that economics can stand free from ethical foundations should be abandoned whilst the behavioural and ethical roots of economics need a deep rethinking.

However, as recently shown by Stiglitz (2024) rethinking does not mean tearing down everything that exists. There is no need to disown all the remarkable scientific achievements made by economists over the past two and a half centuries. In fact, it would be a truly inexcusable waste of knowledge. Certainly, there is a need to put the achievements of economics as a scientific discipline in a different perspective, to engage economics with a broader and more generous vision of humanity, even to reconstruct some economic propositions and economic policy prescriptions in the light of this new vision. At the centre can only be human beings, their genders and generations, in a positive relationship with nature (our “common home”) in accepted social and community relations, of which mercantile ones (exchanges and incentives) are only a part and not the whole.

A frequently heard objection to whatever critique to *homo economicus* is that using *homo economicus* as a behavioural model is not problematic insofar as it allows for reasonably accurate indications in terms of (scarce) resource allocation, which – according to mainstream theory since Robbins (1932) – is the sole objective of economic theory. Explaining human motivations and behaviours more accurately should be the separate task of other disciplines, such as psychology, sociology, or anthropology, whilst *homo*

*economicus* is maintained to be a parsimonious psychological assumption (Persky 1995) which allows sharp predictions and policy recommendations. From this it is a short step to claim that the theoretical structure of mainstream economics appears solid and unscratched by the critiques moved to its behavioural foundations. I find this kind of argument disputable, and I shall try to tear it apart as far as I can.

As a matter of fact, resource allocation and consequently policy prescriptions do change if actual human behaviour differs from the self-interested, “rational” economic man. As persuasively argued by Sam Bowles (2016, p. 2) “it is not prudent to let *homo economicus* be the behavioural model of the citizen, the employee, the student or the borrower”. Economic predictions based on the assumption of humans behaving as rational egoists may be widely wrong (Thaler 2015). Incentives designed for greedy, selfish economic men may backfire as they crowd out other-regarding behaviours and undermine social values (again Bowles 2016). As already mentioned and as will be better argued below, generational selfishness, embodied in models of intertemporal choice had and still has deadly consequences for present and future human life on our planet (see also Motterlini 2025). An economist may be comforted by the belief that *homo economicus* is a “parsimonious assumption” but should ponder a little more on the likely “nocebo effect” of having convinced people that behaving as a *homo economicus* is rational, and morally acceptable. Moreover, the presumption of neoclassical economists of eradicating economic “science” from its ethical utilitarian roots proves to be mistaken.

The rest of this paper is organised as follows. In Sect. 2 it is briefly argued that empathy – which is strictly linked to Rizzolatti’s “mirror neurons”—plays a decisive role in Adam Smith’s broad view of human nature and that market exchanges do require us not only to think of our interest but also and above all of other needs and desires. Section 3 outlines the evolution of *homo economicus* since the economic man of John Stuart Mill, fully grounded in Bentham’s utilitarianism, to Pareto, and Robbins, who attempted (and failed) at freeing economic “science” from its utilitarian ethical premises, paving the way to the “imperialistic” view of Stigler, Becker, Friedman and Buchanan who claimed that rational self-interested behaviour should be applied to the whole of social science, disregarding the possible “nocebo effect” of imposing rational egoism on the normative ground. Section 4 traces the origin of *homo economicus* in the cynical view of human nature purported by Thomas Hobbes and shows that the experimental evidence supporting this view is indeed flimsy and was also manipulated. The title “Economic man: a social idiot”, summarises the content of Sect. 5, where the circumstances are examined in which purely self-interested rational behaviour leads to inefficient social (and also individual) outcomes and how far assuming such a behaviour may lead to wrong predictions and wrong policy prescriptions, both of which would better be served by assuming “social” or “other regarding” preferences. Section 6 deals with the implications of generational egoism and the consequent practice of high discounting for the assessment of climate change and of climate friendly policies. Section 7 turns to discuss the willingness to pay as the principle according to which extending a market populated by *homines economici* always improves the welfare of all. But putting a price on everything may have negative moral consequences. Section 8 concludes by dealing with the dilemmas of an economic policy solely based on incentives designed for a selfish and greedy *homo economicus*.

## 2 Selfishness and Empathy in Adam Smith

The claim of some economists to trace back to Adam Smith the idea that it is only selfish motivations and rational calculations that move humans is unfounded (Sen, 2010). According to Smith, the basis of society and market relations themselves lies in empathy. Empathy, according to Smith, is such a self-evident fact that it does not need to be proved. It is a feeling that is not peculiar only to the virtuous and compassionate being, but common to all human beings. It is inborn in their nature as “social animals” (to use Aristotle’s expression) cultivated and refined by education and the experience of life in society.

Economists have much insisted on the selfishness (the *self-interest*) of the brewer, the butcher, and the baker, which Smith mentions in the *Wealth of Nations* (1999, p. 119). “In some school of economics”, Amartya Sen writes (2010, 186–187) “the readers of Smith do not seem to go beyond those few lines, even though that discussion is addressed only to one very specific issue, namely *exchange* (rather than distribution or production) and in particular, the *motivation* underlying exchange (rather than what makes normal exchange sustainable, such as trust)”. One need not be overly altruistic to exchange with those who are willing to offer us their goods, that is, the *motivation* that moves us to exchange may well be our own self-interest, but this does not imply that human behaviour in general cannot be influenced by other motivations. Smith’s ideas about the brewer and the butcher as businessmen have been extolled, and those about people and “the good society as a harmony of sentiments” have been set aside (Collier and Kay 2021, p. 94). “We can pursue our own interests-not least because we understand them better than others-but not at the expense of others. The butcher does business as a butcher, but in doing so he does not cease to be a human being, immersed in a network of obligations” (*loc. cit.*).

However, as Corey Robin (2022) has noted, “far from being a description of selfishness and self-interest in the market, which is how this passage is often read, Smith’s statement is an injunction to orient ourselves to others. The market requires us to speak to other participants “not of our needs but of their benefits”. This imposes a change in our perspective, pushing us to look at the world through the eyes of others. If we fail in such a task, we will also fail in getting what we want from the market. Thus, the market imposes the rule of empathy on us”. With reference to debt and credit—by which money is exchanged today for a promise of repayment in the future—it has been noted by a mind free of economic preconceptions such as Canadian writer Margaret Atwood (2008, pp. 18–19)—that the “cornerstone” capable of underpinning debt/credit relationships is “the sense of justice or fairness,” without which “we would not recognize fairness in repaying debts incurred, so no one would ever be foolish enough to make loans” And from what on earth could the sense of justice and fairness emerge if not from empathy and the value that, for each of us, human relationships have in society and community?

The *Theory of Moral Sentiments*, written seventeen years before *The Wealth of Nations*, opens with “How selfish soever man may be supposed, there are evidently some principles in his nature, which interest him in the fortune of others, and render their happiness necessary to him, though he derives nothing from it except the pleasure

of seeing it” (Smith 2009, 15)<sup>1</sup>. As Sen notes, “Smith discussed extensively the need for non-self-interested behaviour and went on to argue that while ‘prudence’ was ‘of all virtues that which is most helpful to the individual’, we have to recognise that ‘humanity, justice, generosity, and public spirit, are the qualities most useful to others” (Sen, 2010, 185; see also Sen 1987, ch. 1).

As it happens, it is to Adam Smith that Giacomo Rizzolatti, the discoverer of “mirror neurons,” refers in his book-interview (Rizzolatti and Gnoli 2016). Mirror neurons are activated not only when we perform an action but also when the same action is performed by others, when we perceive an emotion in the gestures and behaviour of others. This is a “motor” participation that has much to do with Adam Smith’s empathy. “Empathy,” Rizzolatti says, “does not mean goodness. It points to an inclination on our part to act in a participatory way toward the other” (p. 104). We do not come into the world selfish and wicked but “with a mechanism that fundamentally makes us ready to be part of a society, and thus to have empathy toward others” (p. 107). The emergence of “human consortium,” of relationships between human beings, stems from empathy. The economy, the market are part of the “broad weaving of the human” (p. 108) and therefore cannot but also be grounded in empathy and trust that give form and substance to that weaving<sup>2</sup>.

It is only because of trust that the pursuit of self-interest will not result in predatory and violent behaviour. It is again trust that makes it possible to rely on market transactions, cooperating in the construction of rules and institutions capable of strengthening trust itself (Arrow 1974, p. 26).<sup>3</sup>

### 3 The Evolution and Imperialist Conquests of Homo Economicus

The idea that selfishness characterizes the behaviour of humans—reduced to “individuals” devoid of any community-tie—and that self-interest is also the quintessence of rationality takes shape on the ground prepared by the utilitarian and individualist ethics of English philosopher, jurist and social reformer Jeremy Bentham. For Bentham, the cardinal principle of ethics is the maximization of happiness (understood by economists as utility) for the greatest number of individuals, so that the total sum of pleasures exceeds the total sum of pains as much as possible. For a utilitarian, the choice between alternative plans must be guided by a rigorous cost–benefit analysis,

<sup>1</sup> Also, the Smithian approach to justice—presented in the *Theory of Moral Sentiments*—is grounded in the inner capacity to recognize the other’s reasons in the face of one’s own. Capacity derived precisely from empathy.

<sup>2</sup> In the same direction goes the theory of cultural evolutionism built over the years by Joel Henrich, based on the ability of humans to learn from each other and form a collective intelligence, transmissible from generation to generation. It seems peculiar that in Henrich’s most comprehensive contribution (2017) there is no reference to Rizzolatti’s mirror neurons, which also could strengthen Henrich’s theses to a large extent.

<sup>3</sup> Also valid, in my opinion, is Gaël Giraud’s (2022, p. 221) remark that “the very trust on which any form of contract is based escapes the logic of the contract. The market refers back to something other than itself. ... Does it not happen that every time the market claims to create for itself the conditions of the trust that enables it to live, every time it sets itself up as the origin of itself, it compromises with its own hands its chances of survival?”.

where utility constitutes substance and unit of measurement. A strictly consequentialist approach. It follows that the choice must fall on the alternative that offers the best balance between benefits and costs, because that will be the one that yields the greatest happiness/utility. Since for the utilitarians society is nothing more than the sum of individuals, collective happiness is given by nothing more than the sum of individual happiness/utility. Therefore, maximum collective happiness is achieved if the utility of everyone is maximized.

Throughout the nineteenth century, Adam Smith's broad view of human nature was gradually modified, starting with John Stuart Mill (1836) who firstly introduced the notion of an "economic man" (even if not yet *homo economicus*): political economy – he writes – "does not treat of the whole of man's nature as modified by the social state, nor of the whole conduct of man in society. It is concerned with him solely as a being who desires to possess wealth, and who is capable of judging the comparative efficacy of means for obtaining that end" (p. 321). Mill was well aware that human nature was far more complex than what is encompassed by the economic man. However, he was convinced that "much can be learned from considering a simple, but hardly trivial, view of human nature in interaction with diverse real-world institutions" (Persky 1995, 226).

Neoclassical economists have followed Bentham's approach, taking the early Stuart Mill's view one step further. In fact, Bentham had created, perhaps *malgré lui*, the premises for tightening into a very strong nexus the end of individual utility and rationality as the choice of the best alternative. The next step was the identification of one's own maximum utility as the ultimate end of everyone's action. This was the step taken by economists of the marginalist school, which became established throughout Europe in the last decades of the nineteenth century. The most explicit is perhaps Francis Ysidro Edgeworth (1881) when he states that "the first principle of economics is that each agent is moved only by his own interest" (p. 16) and that "economic calculation is the analysis of selfishness based on mathematical methods" (p. 18). In fact, Edgeworth (as Stuart Mill) was fully aware that selfish behaviour is not applicable to all fields of human action. But he was convinced that it was a good hypothesis to describe what individuals do in war and contracts. It was the dawn of *homo economicus*. A dawn still veiled in haze, but one that would not be long in manifesting itself in all its splendour, through the dazzling reflections of a refined analytical apparatus.

Pareto (1906) was probably the first economist to use the expression *homo economicus* in chapter 1 of his *Manual of Political Economy*. He argues that if economics wants to be a science economists must follow the method of scientific "abstraction"; he also advances the following significant comparison: "The same body that I consider as chemically pure for purposes of chemical study I can consider as a material particle for purposes of a mechanical study; I may consider only its shape for purposes of geometrical study, etc. The same man, whom I consider as a *homo economicus* for an economic study, may be considered as a *homo ethicus* for a moral study, as a *homo religiosus* for a religious study, etc. ... In short, considering these different bodies, these different men, amounts to considering the different properties of this real body, of this real man, and tends only to cut into slices the matter to be investigated" (23). From this Pareto goes on in saying that "it is thus a grave mistake to accuse the

student of economic actions – or of the *homo economicus* – of disregarding, or even disdaining, moral, religious, or other actions ... It is the same mistake when political economy is accused of not taking morals into account” and concludes, in a sarcastic vein “it is as if one were to accuse the theory of chess of not taking into account of the culinary art” (24).

Pareto states clearly the methodological “need” of separating economics from supposedly non-economic behaviour to make economics a “science”. An implication of this is disentangling maximising behaviour from ethical assumptions as explicitly maintained by Eugenio Slutsky (1915, 1) when he writes: “If we want to place economics on a solid foundation, we must make it completely independent of psychological assumptions and philosophical hypotheses. On the other hand, since the fundamental concept of modern economics is that of utility, it seems inappropriate to ignore any connection between the visible and measurable flaws in human behaviour and the psychological phenomena that appear to govern them. Utility must therefore be defined in such a way as to make it logically independent of any questionable hypothesis or concept, without, however, excluding the possibility of more in-depth research into the relationships between behaviour and the psychic life of the individual”.

Lionel Robbins (1932) proposed a definition of economics which took Pareto’s view to its limits. According to Robbins economics «is the science which studies human behaviour as a relationship between ends and scarce means which have alternative uses». As aptly summarised by Rodano (2025) “this definition implies that economics is not concerned with either the ends or the means themselves (as they are taken as exogenously given). This separates economics, on the one hand, from technology, and on the other ... from ethics: what matters is not whether individuals’ preferences are morally good or bad, but only that individuals seek to maximize their satisfaction, given those preferences and the resources available”. Optimization under constraint had become the landmark of rationality and rigorous economic modelling.

With Pareto, Slutsky and Robbins, the ethical intonation attached to the concept of “utility” was supplanted by reference to more neutral “preference orders,” unobservable and unfathomable in their mental roots, but revealed by the choices made by agents. The utility function became just an “index” of a preference order. However, Fabio Ranchetti (1998, 2000) has shown—with a masterful analysis of the history of thought—how the attempt to separate rational choice theory from the “metaphysics” of utility (operated by Pareto and, in his wake, by Robbins, Hicks, Allen, Samuelson, Arrow, Debreu, Hahn) has essentially failed, since to utility one ends up returning anyway because traditional economic theory cannot do without some calculation of pleasures and pains.<sup>4</sup>

If utility is necessarily on stage so it is utilitarian ethics. This implies that the separation of economics from ethical premises, which Pareto and Robbins aspired to,

<sup>4</sup> I wish to add that this was never the approach of John Maynard Keynes, who in a 1938 letter to his student (and later biographer) Roy Harrod stated, “I want to emphasize strongly the point that economics is a moral science. I said earlier that it deals with introspection and values. I might have added that it deals with motivations, expectations and psychological uncertainties” (Keynes 1987, p. 300). Clearly, Keynes’s position is also antithetical to that of economists of the Marxist school, who tend to rule out the relevance of people’s behaviour (and thus subjectivity and choice) in economics and to trace everything back to objective “laws of motion.”

has failed. Moreover, utilitarianism is rejected by several thinkers as a shaky foundation of ethics. I just mention one of the greatest: Immanuel Kant. In his *Groundwork for the Metaphysics of Morals*, Kant (1785, 442) writes “The principle of *one’s own happiness* ... is the most objectionable, not merely because it is false and experience contradicts the pretence that well-being always proportions itself to good conduct, not yet merely because it contributes nothing at all to the establishment of morality, since making one happy is quite different from making him good, or making him prudent or astute in seeking his advantage is quite different from making him virtuous”.<sup>5</sup> A critical view of utilitarianism is found in the Encyclical Letter *Brothers All* (104) by Pope Francis (2020) where he writes that “the mere sum of individual interests is incapable of generating a better world for all humanity.”

Since the 1960s, sweeping away the boundaries set by Mill, Edgeworth and Pareto (and ignoring Kant) some economists—who quickly became very influential—have sought to make rational selfishness the alpha and omega of human behaviour in general, that is, far beyond the realm of economic decisions. George Stigler hastily stated that there is “only one general theory of human behaviour, and that is the theory of utility maximization” (1971). Gary Becker (1976, p. 8) like Stigler and Friedman a leader of the Chicago school, claims to have come “to the conclusion that the economic one is an all-encompassing approach applicable to all human behaviour, ... decisions large or small, ... rich or poor people, men or women, adults or children, brilliant or stupid people, patients or therapists, businessmen or politicians, teachers or students.” Later, Becker (1996) came to concede (partly echoing the late Stuart Mill’s accents) that an individual’s utility can include the welfare of others, as long as each individual continues to maximize *exclusively his* own utility, that is, his behaviour is exclusively motivated by the pursuit of *his own* welfare (Sen, 2010, 189–190).<sup>6</sup> Outside of this “expanded” selfishness it is claimed that there cannot exist any rational choice. Rational choice thus must necessarily exclude love, as “love is patient, love is kind. It does not envy, it does not boast, it is not proud. It does not dishonour others, *it is not self-seeking*, it is not easily angered, it keeps no record of wrongs” (Paul, *Corinthians I*, 13, 4–5, italics mine).

James Buchanan (1983) writes that “individuals are seen as driven by self-interest in politics as in other aspects of their behaviour” and that *Public Choice* is “a *perspective* on politics” that derives from the application-extension of the tools and methods of the economist to collective or non-market decision-making” (*ibidem*). Buchanan made clear that *Public Choice* made the “behavioural postulate familiarly known as

<sup>5</sup> It is worth mentioning that according to John Rawls (1971) utilitarianism cannot be a principle of justice that would be chosen behind a veil of ignorance, before one knows whether she will turn out to be in an ethnic or religious minority. When the veil of ignorance rises, no one wants to be victim of religious prosecution or racial discrimination made possible or even fostered by the principle of the maximum happiness, which easily translates into a “dictatorship of the majority”.

<sup>6</sup> Stuart Mill (1863) in his book *Utilitarianism* went so far as to draw a very broad notion of utility, no longer traceable, as in Bentham, to the individual: “I must repeat again what the enemies of utilitarianism have seldom the goodness to acknowledge, namely, that the happiness which forms the utilitarian standard of what is just conduct is not the individual happiness of the individual agent, but that of all the persons who are involved... In the golden rule of Jesus of Nazareth, we may read the true spirit of the ethics of utility. To do to others what one would like to be done to oneself and to love one’s neighbour as oneself constitutes the ideal perfection of utilitarian morality” (Stuart Mill, 1863, 250).

that of homo economicus. Individuals are modelled as behaving so as to maximize utilities subject to the constraints they face”. Before *Public Choice* – Buchanan proudly claims—“there was no ‘economic theory of politics’ derived from individual choice behaviour ... It is only when the *homo economicus* postulate about human behaviour is combined with the politics-as-exchange paradigm that an ‘economic theory of politics’ emerges from despair”.

More than thirty years ago, Steven Kelman (Professor of *Public Management* at Harvard’s Kennedy School of Government) noted that not only is *Public Choice* inaccurate when it comes to describing the actual behaviour of politicians, but it does not even capture what “good public policy” is. For “good policy”, according to Kelman, a norm of “public spirit” is needed. And that norm is “that people should simply not be selfish in their political behaviour”. According to Kelman, however, “the *Public Choice* school is part of the assault on that norm” (Kelman 1987, 81). That is, the cynicism of *Public Choice* has a “nocebo effect” as it helps weakening public spirit, by insisting that public spirit cannot exist because (once again) prophecies threaten to be self-fulfilling and “if the norm of public spirit dies, our society will be bleaker, and our individual lives will be more impoverished. This is the tragedy of *public choice*” (Kelman 1987, p. 94).

Milton Friedman (1962) moving on the normative ground, argued that corporations should be selfish and should not engage in any “socially desirable” activities. For him, *corporate social responsibility* (cps) was little more than a facetious, potentially harmful because cps was capable of “destroying value”: firms contribute to society’s well-being if and only if they maximize shareholder value. Which may be true, provided that all the restrictive conditions for the validity of the invisible hand theorem apply. Maurizio Franzini (2021) noted how the rational selfishness of *economic man* may be a sufficiently descriptive hypothesis of the behaviour of firms. But he also pointed out how the shift from descriptive hypothesis to normative guidance, so dear to certain economists, rests on the applicability of the invisible hand theorem (known to economists as the *First Theorem of Welfare Economics*).<sup>7</sup>

When the conditions for the validity of that theorem are not fulfilled, “the assumptions essential for the invisible hand to do its work and neutralize the potential perverse effects resulting from the actions of *homo economicus* vanish” (Franzini 2021). The conquest of market power—which makes it possible to enjoy high profits and ensure very high remunerations for managers—therefore, is one of the main “intermediate” goals of the selfish, rational enterprise—becomes economic power in a broad sense. “Ultimately,” Franzini further writes, “a perverse intertwining of selfishness and power takes place, in which the former pushes toward the creation of the latter, which, once created, produces social effects that are not very commendable due also to the use that selfishness pushes to make of it” (*ibid.*). It is precisely when the invisible hand fails that “one feels, as it were, most acutely the lack of *homo moralis* and *homo socialis*” (*ibidem*).

One should also be aware that the view of markets and competition shared by economists such as Stigler, Friedman and their followers is different from the one

<sup>7</sup> It should be noted, in passing, that Adam Smith mentioned the “invisible hand” only three times in all his work (see Roncaglia 2005; Norman 2018).

of Adam Smith and classical and neoclassical economists of the late nineteenth and early twentieth century. As Michele Grillo (2022) noted, “in recent decades, economic theory has progressively abandoned a ‘systemic’ view of competition, which is to be interpreted as an inherently *win–win* social mechanism, since it induces each actor to contribute to social welfare by specializing, in the division of labour, in the role in which it enjoys comparative advantage. Rather, a *Darwinian* notion of competition has prevailed, which is culturally less adequate for its social benefits to be appreciated, because it focuses only on one aspect of the mechanism, which is moreover undesirable in itself”. This undesirable aspect leads to “the winner takes it all” because the winner is the “fittest” and deserves to win.

Going back to Friedman’s view of the firm, one should notice that the firm is not a simple institution. Collier and Kay (2021, 8) explains it well: “the successful enterprise is itself a community,” the place where many interests converge, intertwine, sometimes conflict. A successful manager is the one that is capable of maintaining the balance between the desire of investors to have good dividends and see the value of their shares rise, that of employees to have and keep safe, health-friendly and well-paid jobs, that of customers to have good quality products at low prices, that of suppliers to be paid regularly, and that of the community to have low-polluting productions made with clean energy. This is the only way employee turnover will be reduced, customers will remain loyal, suppliers will continue to do their part, investors will keep stocks in their portfolios, and the quality of the air we breathe will improve<sup>8</sup>. A very similar view is put forward by Raghuram Rajan, in his *The Third Pillar* (2019). Where communities are portrayed as the third pillar of society that balances the roles of individuals and the state, and where the firm is itself represented as a community.<sup>9</sup>

#### 4 The Cynical View of Human Nature at the Origin of Homo Economicus

I believe that the economists of the last two centuries have inherited the cynical vision of Hobbes, the seventeenth-century English philosopher who described the “state of nature” as the site of war of all against all. Hobbes’ was a desk hypothesis, with no scientific basis, but very attractive to any cynical view of humanity that always stands behind the need for Leviathan, or the strong man in politics. Hobbes is considered, along with Machiavelli, the father of *political realism* “but his view of man could hardly be less realistic” (Bregman 2019, 102). “That of the selfish, fearful and aggressive human being,” Bregman writes again, “is a myth that is hard to die” (*ibid.* 18). Indeed, it is a myth that was intended to be nurtured first and foremost literarily, by those who told the story of a group of polite English boys shipwrecked on a desert island; a group that quickly turns into a pack of unrestrained and violent savages (Golding

<sup>8</sup> Presenting the firm as a set of contracts between individuals with different interests, but all driven by rational self-interest (Alchian and Demsetz, 1972) does not greatly enhance the understanding of the enterprise as a complex and layered community in which cooperation is decisive.

<sup>9</sup> Adriano Olivetti was an initiator, promoter and practical organiser of communities the centre of which was occupied by the “factory”, with a vision of the firm strongly at variance with the one supported by Friedman. See Olivetti (2014).

1954). *Lord of the Flies* earned the author the Nobel Prize in Literature. The fruit of pure literary invention refreshed and reinvigorated the Hobbesian view and even gave a start to theoretical and experimental psychology research, especially in the 1950s and 1960s.

The experiments by Muzafar Sherif (1954) Stanley Milgrom (1961) and Philip Zimbardo (1971) have become very famous. The results of all three of these experiments, according to official accounts at the time, seemed to provide overwhelming evidence of the ease with which human beings turn into ferocious wolves, to the point of committing unprecedented atrocities on each other. Those who have delved into the matter—by re-listening to the original recordings of the various stages of the experiments and have also interviewed some of the surviving participants—have brought to light the many, fatal, manipulations by those responsible for those experiments. Manipulations designed to provoke and nurture aggressive behaviour in people who, even in the situations of objective constraint and opposition created by the experimenters, would have lived with order and tranquillity (Bregman, 2020, 127–156). Note that in at least one case (Zimbardo’s experiment) the choice to stay in the experiment and accept the artfully created sadism was dictated by the fear that they would not receive any of the compensation provided for participation if they had given up early. Which, if nothing else, tells us something about the corruptive power of money.

As noted by Giorgio Rodano (2025) Hobbes himself, in his discussion of how the escape from the state of nature can occur “writes about the role played by a group within the population that is not guided (like the rest) by egoism and the will to dominate (the ‘glory’) but by respect for the ‘laws of nature’, which surprisingly anticipate, in some respects, those of Kant’s Critique of Practical Reason. This group of ‘moderates’ (as Hobbes calls them) has the task of extending the acceptance of the covenant implying the *transfer*, for the entire population, of individual sovereignty to the emerging absolute State. The State, in turn, will impose on all the respect of these ‘laws of nature’”.

Adam Smith, in essence, repudiated the Hobbesian view of a brutish, egoist “natural” human being and embraced the more optimistic view advanced by John Locke.<sup>10</sup> Subsequent economists (and not only economists, as it turned out) instead used Hobbes without too many qualms (and sometimes without even being fully aware of it) substituting the market for Hobbes’ Leviathan-State as the mechanism for turning war between selfish (and rational) beings into a prosperous, peaceful world of trade and industry.

As we saw, by the end of the Nineteenth century, however, Adam Smith’s view had been abandoned by economists (Sen, 2010, 184–187). The legitimate and natural pursuit of self-interest was taken to extremes, in search of a single motive for human behaviour, and thus turned into a caricatured selfishness. Of course, there is as much selfishness as generosity in man, as much the bad, greedy and violent wolf as the good, loyal and trustworthy one. The two wolves struggle in each of us. Which one wins depends on which one we feed (Bregman 2019, 23). Economists have long fed (intellectually) the bad wolf. What is worse is that “institutions designed around the

<sup>10</sup> See Napoleoni (1975) 26.

hypothesis that individuals are selfish and greedy find that the hypothesis is self-fulfilling” (Collier and Kay 2021, 21). That is, using *homo economicus* as the single, exclusive model of human behaviour may have a “nocebo effect” and may be even corruptive of the public spirit when it is applied to political actions. As peremptorily stated by Gaël Giraud (2022, 69) “man is not a wolf for man’s sake, we must get out of this self-destructive image of Hobbesian origin”.

## 5 Economic Man: A Social Idiot?

As mentioned above, rational selfishness does not always allow for maximum well-being for the community. In some instances, it does not even allow individuals to reach an “optimal” position. It appears paradoxical, but it is not. Take the case of so-called “public goods,” i.e., those goods (or services) that everyone can consume without thereby reducing the consumption of anyone else and from whose consumption no one can be excluded through price. A lighthouse can guide the navigation of countless ships without prejudice to any, while no vessel, even if it does not pay, can be deprived of light once the lighthouse is lit. Clearly, if a good or service is obtainable for free, there is no rational and selfish reason to pay for it. In short: everyone is better off when not paying, hoping that someone else will do so and thus make the good available to all, or counting on the state, to which we pay taxes, to pay for the good. It is called free riding (literally getting a free ride or, more loosely, being a parasite). But if no one paid—following the dictates of selfish rationality—that good would not be produced and thus the welfare of each and all would be significantly reduced. The individual rationality of *economic man* does not lead to a desirable outcome for everyone or even for individuals. Each and every one would be much better off if they cooperated instead of looking only at personal satisfaction. Hence Amartya Sen’s (1976-7, p. 102) statement, “the purely economic man is, in fact, close to being a social idiot.”

If the lighthouse was lit only upon payment and no one was willing to pay for its light many ships would crash into the rocks. A very significant loss of life and money. Or navigation would have to self-restrict to daylight hours and days with good visibility only, slowing down trade considerably. The most efficient solution is for a public entity to bear the expense of operating the lighthouse, financing it through tax revenues. Of course, the lighthouse is just one example. There are many others (many in the field of environmental resources) in which maximum welfare for the greatest number is by no means achievable through the pursuit of private interest by a myriad of rational, selfish individuals. But it could be achieved through voluntary involvement and cooperation within relevant communities. A rationality that leads, on so many occasions, to deeply inefficient, unjust, inequitable results does not seem particularly recommendable, i.e. cannot have a normative status.

There is no need to dwell on many of the descriptive limitations of rational egoism as a theory of choice, especially outside the behaviour of business and finance. A rich mine, in this respect, is Richard Thaler’s (2015) book. I want to emphasize just one point, related to cooperation in the production of public goods. Thaler’s experiments largely disprove the assumptions of selfish behaviour and the consequent prediction

that no one will cooperate. In the experimental situations, “on average people contribute about half of their share to the public good” (Thaler 2015, p. 145). Of course, half-contribution means that the public good would always be under-produced relative to a cooperative arrangement. But, in short, it is still much more than the zero which is the prediction of models based on rational egoism.

Many say that the results of these experiments are distorted by the circumstance that participants “play” only once. Things would turn out differently if everyone had a chance to play several times and learn which strategy is truly rational. So, in the long run, selfish rationality would end up prevailing. In fact—as James Andreoni (1988) and many others after him have shown—when engaged in repeated interaction, most “players” begin by trusting others and continue to cooperate if others, in turn, continue to do so. They choose instead to switch to selfish behaviour if they find that others have done the same. This seems a mode compatible with the Smithian idea of empathy, but also with the tendency to punish those who behave unfairly and selfishly. Bowles and Gintis (2011, 12) define *social preferences* as those whereby “a player who cares for others is interested not only in his own payoff, but also in that of his partners.” With *social preferences*, even a one-shot prisoner’s dilemma turns into an *assurance game* with a multiplicity of Nash equilibria, including cooperation and mutual defection. To know which of the equilibria will be realized, the state of confidence becomes crucial. Yes: just the old “state of confidence” about which Keynes (1936, ch. 12) wrote at length.<sup>11</sup>

Of course, people are trained to see selfishness everywhere, so any seemingly unselfish and cooperative behaviour must still be traced back to selfishness. Does someone give money to a beggar? He does it just to feel good and/or get a reputation as a good, compassionate person. Does the manager treat employees well? He does it to make himself look respectable and because workers, treated well, are more productive. For some economists it is hard to admit that empathy, cooperation and generosity generate (also) personal satisfaction and efficiency. Even more difficult to admit that human rationality can be a more articulate and complex thing than maximizing selfish utility.

Beyond the ethical point (of great relevance to me) it is clear that cooperation is more frequent and enduring than models based on self-interest tell us. Not only in the *public good games* mentioned above. Even in experiments on the so-called *ultimatum game*, behaviours emerge that contradict the rational selfishness hypothesis. The game is simple: a randomly chosen subject (proposer) is given an amount, say €100, with which to make an offer to a second subject (respondent) to split the €100. The bid can range from 0 to 100 with variations of 1€. The respondent ignores the identity of the proposer and can only accept or reject his offer. If the respondent accepts, he gets exactly what the proposer offers while the proposer keeps what is left. If the responder refuses, neither player gets anything. Selfish, maximizing behaviour on the part of both would result in a 1€ offer being accepted. This is the Nash equilibrium of the game, which assumes selfish maximizing behaviour. But experiments conducted around the world show that the most frequent bid by proposers is between €25 and

<sup>11</sup> Interestingly, no reference to trust and confidence is present in Sam Bowles’ (2016) articulate discussion of “other regarding preferences.”

€50. Something that continues to occur even when we turn the *ultimatum game* into a *dictator game*, in which the proposer keeps the change even when the responder rejects the offer and, therefore, the rational-egoist offer would simply be zero.

The results of the experiments mentioned above show how people, at every latitude and quite independently of the development stage of the society in which they live, adhere to some norm of equity for which sharing a fortune is considered normal and fair. In short, investigations by anthropologists and biologists have found no trace of *economic man*, studying the behaviour of so many human communities scattered around the globe (Henrich et al. 2001). On the other hand, “the model has been shown to be particularly effective in predicting chimpanzee behaviour in simple experiments. So, all the theoretical work was not useless. We simply applied it to the wrong species,” is Henrich and Wilson’s (2016) ironic conclusion. The behaviour of children, and even monkeys, tells us that fairness underlies our sense of justice and, therefore, that we care about what happens to others as much as we care about what happens to us. This is why we care about inequality: we care about our social position (of income, wealth and recognition) relative to that of others. Where “others” are mostly members of our community, not strangers we do not know and about whom we know nothing.

Henrich (2017) himself argues how a defining characteristic of the human species is collective intelligence, related to the ability to learn from one another when we are immersed in a community, bound by a *common purpose*. “The accumulation of collective intelligence,” Collier-Kay (2021, 98) summarizes, “is the combined product of competition and cooperation. The collective experience of a community is shared and stored. And this stock of knowledge is transmitted through culture and education.” It was precisely on the cases of cooperative institutions emerging spontaneously within communities for the management of local “commons” that Elinor Ostrom focused in her 1990 book, *Governing the Commons. The Evolution of Institutions for Collective Action*, which later earned her the Nobel Prize in Economics (2009).

John Roemer (2010) has shown how Ostrom’s results can be supported by rational, but not strictly selfish, behaviour. Behaviour inspired by the Kantian categorical imperative that “everyone should perform those actions that he would like others to perform as well” (p. 2) and, therefore, avoid the actions he would like others to avoid as well. That is, the individual wonders what would happen if he deviated from his strategy and others did the same. Kantian behaviour is not generous or altruistic but prompts individuals to internalize the externalities that arise in social interaction and, therefore, to cooperate, as shown by Ostrom in her research. “If people can agree to live by Kantian rules, then the inefficiencies of Nash equilibrium could be overcome” (p. 17). A Kantian equilibrium is in fact generally efficient, while a Nash equilibrium is not in most cases. Selfish rationality generates inefficiency; Kantian behaviour, on the contrary, generates efficiency. Behaviour inspired by Kantian ethics, moreover, “induces far more significant redistribution than does egoist ethics” (*ibid.*) contributing to an accepted (i.e., consensual) reduction in inequality. Which is, of course, a far from negligible point from the standpoint of social cohesion and moral equality.

Many brilliant economists and social scientists racked their brains to solve the puzzle of why and how cooperation emerges in finitely repeated games played by

self-interested, rational Hobbesian individuals (Nash behaviour).<sup>12</sup> The solution was before their eyes: actual human beings are not *homines economici*. Actual human beings developed a cooperative attitude in a process of gene- culture coevolution, set in motion by the good social and individual results on average obtained thanks to empathy, reciprocity and reputation which gave rise over the generations to social norms reinforcing cooperation (Henrich and Henrich, 2007, ch. 3, 6, 7; Henrich and Wilson, 2016). This does not imply that humans are always cooperative, gentle and fair minded. Communities are often strongly opposed to one another, and the history of humankind is plagued by wars and bloodshed. However, the gene-culture coevolution approach explains why cooperation and other regarding (or social) behaviour are much more frequent in small and large groups than predicted when moving from the assumption of *homo economicus*.

Summing up, the selfishness and greed of *homo economicus*, besides being poorly descriptive of human behaviour in general, are neither necessary nor most of the time sufficient to characterize behaviour as “rational” and to arrive at cogent conclusions and predictions. Different approaches to rationality can be identified and—as mentioned above—have been widely applied in economics and other social sciences. That of *homo economicus* is a behaviour that is anything but socially recommendable outside the world of perfect competition, perfect and symmetrical information. Besides, “the presumption that selfishness is a morally ‘neutral’ assumption ... is not defensible (Sacco and Zamagni, 1996, 272). The convincing argument of Sacco and Zamagni can be summarised as follows. A rational individual does not intentionally choose what is worse, whatever her objectives are; hence a self-interested *and* rational individual never prefers what is worse for herself. By adding the mild moral principle that is a good thing if people are better off, it follows that is a *morally* good thing to satisfy an individual’s preferences. “As it can be seen the self-interest assumption transforms rationality – which is not by itself a moral notion – into an ethical laden concept (Sacco, Zamagni, 1996, 273). This implies, once again, that those economists who identify rationality and self-interest inevitably fail to separate economics from ethics, by implicitly accepting one, very special and disputable ethical principle.

## 6 Future Generations at a Discount

I will now address the relationship that, in my view, exists between the economic policy prescriptions derivable from the postulates of *homo economicus* and the views advanced by some economists (especially but not exclusively those of neoliberal inspiration) toward climate change. It is by now well known that climate change is fundamentally due to repeated and widespread negative externalities such as CO<sub>2</sub> emissions; externalities that no bargaining among free individuals under any allocation of property rights can internalise. In particular, some of the people affected by climate change are not yet born (i.e. they belong to future generations) and have no bargaining power (nor a feeble say) today. Self-interested rational (or foolish?) behaviour does

<sup>12</sup> It is well known that the emergence of cooperation in finitely repeated games involving a multitude of Nash players proved to be an especially hard nut to crack in a pure theory perspective, contrary to the evidence stemming from games played with “real” people (Henrich and Henrich, 2007; Bowles 2016).

not lead to actions capable of limiting the temperature increase to below 1.5 °C, which is considered a relatively safe threshold by most climate scientists (Stern 2022).

The typical reaction of many economists when facing this issue is dismissive. It is just a matter of assessing costs and benefits: the future benefits of reducing CO<sub>2</sub> emissions now and in the next 30 years (and by doing so minimising the warming) versus the costs in terms of foregone GDP associated with the implementation of the necessary policies. The role of the rate at which future costs and benefits are discounted remains central and shows, once again, the socially disruptive and corrosive effects of egoism (in this case, generational egoism). Here there is an opportunity to highlight a further critical aspect of the relationship between ethics and economics. Economists have been (rightly, in my opinion) criticized for not considering disaster risks, irreversibilities, and even risk aversion. But even considering these fundamental issues (which would suggest testing each decision in the context of many different scenarios, as suggested by M. Shafik 2021, Ch. 7) the role of the rate at which costs and benefits that arise in the future are discounted remains central. And the issue certainly has ethical relevance.

The effect of discounting is to devalue the costs and benefits, however great they may be, that occur in the future. The more distant the future considered and, for a given time span, the higher the discount rate used the higher the devaluation of the future is. Many economists have not stopped too long to discuss ethical issues and have simply applied so high discount rates (5–6 percent) and so long periods that all impacts of global warming on future welfare are dwarfed. The most notable exception is Nicholas Stern (2009, 2015) who thoroughly examines the very idea of applying a discount rate to the calculation of environmental damages<sup>13</sup>. What are the reasons that might justify discounting the future and to what extent, if at all, should it be done? In business calculations, discounting a future cost or benefit is quite normal, since a business has to pay interest on borrowed money and, therefore, from future earnings the interest paid in the meantime must be subtracted. Discounting cash flows, however, is not the same as discounting the welfare of future humans (Broome, 1992, 1994). According to Frank Ramsey, the great English mathematician and philosopher contemporary and colleague of Keynes at Cambridge, discounting the future is “an ethically indefensible practice and arises only from our weakness of imagination” (Ramsey, 1928, 543).<sup>14</sup>

Sometimes discounting is justified based on intergenerational distributive equity. Future generations will have higher incomes than current ones, so why should we, who are poorer, bear high costs to leave our wealthier great-grandchildren a natural capital that has been revalued by climate change mitigation actions? Discounting the damage that inaction today will produce in the future is one way to restore distributive equity. As a matter of fact, today’s inaction risks leaving a natural capital irreversibly destroyed within a short time. Which implies that future generations, even if their material income will be higher, will most likely have lower welfare, due to reduced opportunity to enjoy environmental assets (glaciers, coral reefs, forests, lakes, etc.).

<sup>13</sup> Since the publication of the *Stern Review* in 2007, the discount rate debate has surged, and ethical issues have returned to centre stage. A comprehensive bibliography on the subject would be endless.

<sup>14</sup> The living Australian philosopher Peter Singer (1972) has pointed out the incompatibility between a “global” utilitarian ethic (that is, one that includes all living beings, including those not yet born) and the selfish individualism of currently living generations.

Some areas of the planet will have become uninhabitable and large environmental migrations will be the order of the day. For that matter, they already are today. In this broader context, looking at intergenerational equity only in terms of income seems limited, to say the least. As Stern and Stiglitz (2023, 283) argue, “to what extent a dollar today is worth more (or less) than a dollar in the future depends on whether consumption (understood broadly, that is, including the environment) is higher in the future than it is today. Whether and to what extent future generations will be better off or worse off than the present generation depends on the policies put in place, especially what is done about climate change ... In other words, the discount is endogenous to the decisions we make and cannot be inferred from markets or from something located outside the analysis”.

But I want to focus on the most ethically dubious motivation for discounting, the so-called time preference rate. I start with a number that tells us a lot. The welfare of a person born in 2051 (35 years from now) if discounted at a 2 percent rate, would be worth about half the welfare of a person born in 2026. The worth of those born later is much lower. Future generations are not so much part of “us”: they are unknown, they are “them” to be given little weight. Stern and Stiglitz (2023, 282) effectively summarize the issue: “Pure time discounting is essentially discrimination based on date of birth.”

Roy Harrod (1949) called time preference “an infirmity of man [...] a polite expression for rapacity and the conquest of reason by the passions”. What reasons (or what passions) could be behind time preference? The only reasons that seem plausible to me, but not very convincing, are affective proximity and the possibility of the extinction of humankind. As David Hume (1984, Book Three, Sect. 1) already recognized, each of us is more attached to our children and grandchildren than to the distant descendants we will never know. This seems a simple and understandable psychological trait at the individual level. But why should it concern society as a whole? This goes beyond the mere sum of individuals living today and includes future generations, whose welfare—according to most moral philosophers—should therefore weigh as heavily as our own. Even the most consistent utilitarians, such as Peter Singer, recognize this.<sup>15</sup> The possibility of the extinction of humankind makes the probability that our descendants will actually enjoy the benefits of policies made today lower than one hundred percent. This is a reason for discounting those benefits. By how much? An extinction from exogenous causes is a remote possibility, since the odds of a collision between Earth and some giant meteorite or a sudden transformation of the Sun, making it capable of roasting its planets, are very low. On the other hand, it is not impossible that our decisions today about climate and other matters will affect, at least in part, the very probability of extinction, as well as, of course, the “natural capital” we will leave to future generations. As with growth, taking any exogenous value, just to run the model, is not a correct choice either scientifically or ethically. Nicholas Stern, in his *Review on the Economics of Climate Change* (2006) used a low discount rate (1.4 percent)

<sup>15</sup> The Nineteenth century utilitarian philosopher Henry Sidgwick (1907, 414) wrote “It seems ... clear that the time at which a man exists cannot affect the value of his happiness from a universal point of view; and that the interests of posterity must concern a Utilitarian as much as those of his contemporaries, except in so far as the effect of his actions on posterity—and even the existence of human beings to be affected—must necessarily be more uncertain”.

arguing with substantial ethical arguments that the risks of a dramatic future must weigh heavily. By somehow accounting for the catastrophe's risk and by using a low discount rate, Stern was able to show that the flow of future benefits accruing from policies aimed at combatting climate change far outweighs the costs.<sup>16</sup> Not so have done his critics, beginning with William Nordhaus (1994, 2007) who did not hesitate to use much higher discount rates (4–6 percent).<sup>17</sup>

Many economists thought that in order to find some plausible value to a variable as crucial as the discount rate we should look only at the market, whose relative prices would reflect the preferences of individuals. Someone said that the discount rate should be equal to the long-term interest rate on capital invested by private individuals. This is that rate that is used to discount the gains from an investment and calculate its present value to compare with its costs. Doing so would ensure efficiency. Setting a discount rate lower than the marginal rate of return on alternative investments would mean making the yield of climate change mitigation investments lower than the yield of alternative investments. And this would not be in the interest of future generations who—it is said—would prefer a more profitable investment on our part today so that they would have many more resources (also) to cope with climate change in the future. As Marc Davidson (2015) has noted, however, this is “spurious reasoning” because future generations have no way of expressing their preferences and making this kind of choice. It is difficult to conceive of a social contract that takes into consideration people who do not yet exist (M. Shafik 2021, 153–162). To be honest, it seems a paradox to search the financial market to find a fundamental parameter for calculating the effects of the most colossal market failure (climate change) as the financial market is notorious for its malfunctioning and lack of ethical focus. Moreover, if anything, the information provided by markets “is about individual choices with a limited time horizon, not about what society *should do* over a much longer time frame” (N. Stern 2009, 109).

Once again, some economists have tried to impose their individualistic approach, based on rational egoism. Thus making—as already argued above—a precise ethical choice while trying to conceal it behind the facade of efficiency and the market. This time, however, the chances for the next generations of humans to live a dignified and therefore truly free life on this planet are at stake.

## 7 Markets and Morality

One of the central ideas of many economists is that every good thing in life can be seen and represented as a commodity to be traded, deriving maximum benefit. The extension of markets, therefore, would expand the range of opportunities for each person, thus

<sup>16</sup> A well-known, poignant result in the theory of repeated games might also be recalled, according to which the existence of cooperative equilibria in repeated games is ensured by a sufficiently low discount rate. This is equivalent to saying that the relevant time horizon is extended (shortened) by adopting a low (high) discount rate. It should not come as a surprise that cooperation in fighting climate change becomes easier when the discount rate is low.

<sup>17</sup> Nicholas Stern's (2015, ch. 4) rebuttal of Nordhaus is respectful but unrelenting. Stern has also returned to the topic in Chichilnisky, Hammond, Stern (2020) Stern (2022). Recently, Partha Dasgupta (2021) also emphasized the ethical meaning of discounting in his *Review on the Economics of Biodiversity*.

resulting in greater benefits for all. Moreover, paying for a good, whatever it is, would not change its nature, nor would it change the attitude we have toward that good. “The common assumption, almost always hidden, is that the process of commercialization has no effect on the product,” the British economist Fred Hirsch wrote in 1976 (92). Coincidentally 1976 is the same year when Gary Becker’s book (cited above) was published, a book where commercialization is thoroughly assumed to be neutral.<sup>18</sup>

In 1972, Ken Arrow (anything but soft on the neoliberal ideology and rational selfishness) had defended to the hilt the possibility of selling one’s blood in the U.S. (as opposed to being able only to donate it, as was then the case in the U.K.). The argument used was the efficiency generated by extending the scope of markets. His nephew Larry Summers (former Treasury Secretary under Clinton, former Harvard Chancellor and chairman of the *National Economic Council* under Barack Obama) expressed the same ideas, as did Greg Mankiw (also former chairman of the *National Economic Council*, but under G.W. Bush). Mankiw also argued that bagging or paying some poor person to stand in line for us in order to get tickets to a free show are examples of how markets achieve an efficient outcome by helping to get theatre, opera, stadium, or public concert tickets to consumers who are willing to pay the higher price to attend the show and skip the line. But as argued by Michael Sandel (2012, 31) “this argument is unconvincing ... The reason is that the willingness to pay for a good does not show who values it most highly. This is because market prices reflect the ability as well as the willingness to pay. Those most wanting to see Shakespeare may be unable to afford a ticket. And in some cases, those who pay the most for tickets may not value the experience very highly at all” (*ibidem*). The queue is just a way to allocate a scarce commodity (the seats in the theatre, or stadium, etc.). A way that, unlike paying a price, does not reward willingness to pay but the time one is willing to spend to satisfy an intense desire to attend the event, even if one has no money to spend.

It goes without saying, the queue is not a good system for everything. If I must sell my used car or an apartment, I don’t have to take the first offer, and there is no ethical problem with looking for whoever has the highest willingness to pay. Similarly, it would be a bad idea to put people in line to buy socks, bread, or blenders. Far better to rely on the market, preferably a competitive one. But the queue is a good tool where *egalitarian* access to a certain good is a value to be protected. I don’t think we would find it ethically acceptable to replace queues at polling stations with payment (perhaps by electronic auction) to vote quickly. What would we think if the timing of access to anti-Covid vaccines was adjusted based on willingness to pay instead of health fragility and, therefore, need?

There are other examples: Sandel (2009, 2013) and Bowles (2016) discuss several ones.<sup>19</sup> Paying children to read books or to incentivize them to get good grades, paying drug-addicted women to allow themselves to be sterilized and not give birth

<sup>18</sup> Close to Hirsch view is that advanced by Arthur Okun (1977, 134) when he claims that he “could not give more than two cheers [to the market]. The tyranny of the dollar yardstick restrained my enthusiasm. Given the chance, it would sweep away all other values, and establish a vending machine society. The rights and powers that money should not buy must be protected with detailed regulations and sanctions, and with countervailing aids to those with low incomes”.

<sup>19</sup> On the ethical dilemmas that arise when “tragic choices,” that is, with strong value and distributional implications, are left to the market, an important reflection remains that of Calabresi-Bobbitt (1978).

to children who are themselves drug-addicted, paying to get another woman to carry a pregnancy in their place, may seem like ways to improve everyone's welfare—both those who are willing to pay and those who are willing to be paid. Are we sure that is the case? According to Sandel (and I agree) it is not certain that this is always the case: “Paying children to read books may push them to read more, but it may also teach them to view reading as work and not as a source of intrinsic satisfaction” (Sandel, 2013, p. 16).<sup>20</sup> Allowing paid surrogacy may perhaps increase the welfare of wealthy couples who cannot have children and poor women, perhaps residing on the other side of the planet, and thus satisfy the cost–benefit criterion from a utilitarian standard. But the transformation of gestation into a “service” that can be purchased on the world market ends up debasing women by instrumentalizing their bodies and reproductive faculties. And are we sure there is no ethical problem when the use of one's body for the benefit of strangers enables poor women in the Global South to multiply by a hundred or a thousand the earnings of a “normal” job? Won't that “normal” job now be despised, along with the women who do it, just because they have no opportunity to enter the world market for surrogate pregnancies?

In short, “putting a price on good things can corrupt them” and, thus, can distort the incentives one would like to create. An example analysed by Gneezy and Rustichini, (2000) and taken up by Sandel comes from research on some kindergartens in Israel. Sometimes, parents would arrive late to pick up their children and teachers would have to wait until the last late parent showed up. To solve the problem, the kindergartens imposed a fine of a few *shekels* on late parents. “Curiously, late withdrawals increased” (*op. cit.*, p. 67). The opposite of what standard economic theory tells us: if I have to pay a higher price for something I consume less of it. The point—Sandel explains—is that before the fines, parents felt guilty about being late and making teachers wait. The fines, on the other hand, were perceived by parents as the price for teacher overtime, or if you prefer as the fee for the service surcharge. The price had transformed a moral obligation to arrive on time (to release teachers at the scheduled time) into a market relationship, in which parents were buying a service that teachers were supposedly willing to sell.

The question that many economists, proponents of market ideology, do not want to ask is, “what is the moral significance of the behaviours and norms that money can erode or displace?” (*op. cit.*, p. 92). But this means investigating the moral ideas that guide how issues such as sex, procreation, child-rearing, criminal sanctions, immigration policies, environmental protection, etc. are addressed. The separation of economics and ethics, advocated by so many economists to establish their discipline as the only true science of society, has produced many failures. My friend Fabio Ranchetti was aware of this when he insisted on the need for economists to highlight, rather than hide, the ethical assumptions of their theories and the ethical implications of their models. And when he emphasized that “there are goods which are not priced, not because they are not scarce, but because they do not fall in the sphere of the economy, in the sphere of the market” And he specified, “what do I mean? For example, friendship, love, sympathy do not have a price” (Ranchetti 2011) but they are priceless for most of us.

<sup>20</sup> See also Bowles (2016), chapter 3.

## 8 Conclusions

The main issues discussed in the previous pages can be summarised as follows. The attempt at separating economic “science” from ethics failed; the residual ethics attached to mainstream economics is a dolled-up version of Bentham’s utilitarianism, complemented with Hobbes’ cynical view of human nature, resulting in the selfish and greedy *homo economicus*. This unpleasant mammal—besides turning out to be a social idiot in many real-world circumstances other than perfectly competitive markets – is not even a good working assumption, as proved in countless experiments. The behaviour of *Homo economicus* also had (and still has) a “nocebo effect” when imperialistically applied to political theory (Public Choice), social issues (such as crime and marriage), intergenerational issues such as assessing the impacts of climate change and the policies to face it.

To conclude, I wish to focus on a single economic policy issue in the light of the critical assessment of economic theory pursued in this paper. We should question the view that rational, selfish individuals respond to incentives and only to incentives. Hence, we should question the principle that any economic policy, to be successful, must consider that human beings are made of this stuff and, therefore, economic policy must be based on incentives such that selfish individuals behave in ways compatible with a well-ordered economy (and politics). But “confidence in the ability of a well-designed incentive system to push even a completely amoral and self-interested citizen to act in the public interest” (Bowles 2016, 36) is way overstated. As Bowles aptly writes, “ethical and *other-regarding* motivations have always been essential to a well-governed society and are likely to be even more so in the future. Policies that ignore this fact and remain indifferent to the preferences that motivate people’s actions can undermine innate predispositions” (*loc. cit.*) and have effects opposite to those desired, as we have tried to show in the previous pages. Addressing the climate issue with the narrow view of self-interest and therefore the incentives necessary to move today’s selfish individuals, non-interested in the wellbeing of future generations, leads to certain defeat.

No one should underestimate the importance of incentives, least of all those who devoted no small part of their research activity to the topic (as the present author). But neither should anyone ignore the possible distortionary effects of incentives—designed for the (rational?) selfishness that would dominate markets—on behaviour that is itself ethically oriented to the common welfare or otherwise attentive to the effects on others, including our descendants. To use Bowles’ words again, “in the eyes of the Legislature, policy tools based on the maxim of selfishness, designed as they are for scoundrels and villains, can become part of the problem” (*ibid.*, 37). “Good policies and good constitutions are those that support ends that have social value not only by harnessing selfishness, but also by arousing, cultivating and strengthening motivations animated by public spirit” (*ibid.*, 222) thus nurturing the good wolf and not the bad wolf that coexist in each of us. I would add that even the proper functioning of markets and the very salvation of humanity from ongoing climate change needs a more complex and articulated system of incentives, which does not rest exclusively on *homo economicus* and takes due account of *homo socialis* and *homo moralis*.

Leaving the final words to Richard Thaler (2015, 9): “we don’t have to stop inventing abstract models that describe the behaviour of imaginary Econs [i.e. *homines economici*]. We do however have to stop assuming that those models are accurate descriptions of behaviour and stop basing policy decisions on such flawed analyses ... The primary reason for adding Humans to economic theories is to improve the accuracy of the predictions made with those theories. But there is another benefit that comes with including real people in the mix. Behavioural economics is more interesting and more fun than regular economics. It is the un-dismal science”.

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