

NEW SINS: TECHNOLOGY AND THE FRONTIERS OF CATHOLIC SOCIAL TEACHING¹

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“Modernity entails, ultimately, an injustice that transcends the occasional or accidental exploitation of man by man—a more fundamental injustice against not only the image of God in man but God himself.”



The phrase “Catholic social teaching” is commonly used to refer to the essential content of a series of official documents from the Catholic Church starting with *Rerum Novarum* in 1891, culminating most recently in *Centesimus Annus* (1991). More accurately, it refers to a much longer and broader tradition; for indeed the “social question” in one form or another has been a concern of the Christian community from the earliest times.² Increasingly addressed not only to Catholics,

¹I would like to thank Adrian Walker for his help in the writing of this article.

²In 1998 a masterly summary of this tradition was produced by Rodger Charles, S.J. (*Christian Social Witness and Teaching*, 2 vols. Leominster: Gracewing, 1998). The Church is currently preparing a *Catechism of Social Doctrine*. As I will argue below, however, it is important not to draw boundaries too tightly around this

but to all men and women of good will, Catholic social teaching seeks not to impose a religious faith, but to assist in laying the foundations of a humane civilization. It provides a set of principles upon which a just and democratic society can be based. It supports freedoms and values which, though they may historically have been won largely in the teeth of religious opposition, can never find an adequate foundation in purely materialistic philosophies.

Today, in a period of rapidly evolving technology and of the social changes that inevitably flow from this, the “globalization of solidarity” called for by Pope John Paul II is becoming ever more urgent. But Christians are confused about the role of technological development in this process. The Second Vatican Council adopted, in *Gaudium et Spes*, a generally optimistic view that “mankind’s triumphs are signs of God’s greatness and the fruit of his sublime plan” (34), and that worldly progress may lead to “the better ordering of human society” (39), and the hope is often expressed in Church documents since that time that moral and scientific progress will proceed hand in hand. Yet the Council was also aware of the ambiguity of worldly progress (c. *Gaudium et Spes* sections 54–7); and it is clear that in fact there is much cause for concern. The next phase in the development of Catholic social teaching will undoubtedly involve some attempt to analyze the social and ethical issues raised by recent technological developments and their applications. That in turn will necessarily involve renewed attention not only to anthropology and ethics, but also to eschatology, and the theology of history.

The purpose of this paper is to suggest elements of such an analysis, and to argue that the advance of technology will require of Catholics a more radical (and dangerous) stance than the one they have generally taken so far. In order to establish this, I need to begin by drawing a contrast between two historical periods, which I am calling “modernity” and “postmodernity.” This will show the need for a more profound cultural critique to be incorporated into the social teaching of the Church.

burgeoning discipline. See V. Boland, “On Reading *Evangelium Vitae* as a Social Encyclical,” *New Blackfriars*, February 1999, 7381; David McCarthy, “Procreation, the Development of Peoples, and the Final Destiny of Humanity,” *Communio* 26 (Winter 1999): 698–721; Michael J. Baxter, “Reintroducing Virgil Michel,” *Communio* 24 (Fall 1997): 499–528.

A New World Order

Human history is, of course, made up of transitions. One of the most important of these was the so-called “passage to modernity” beginning in the fourteenth century, which brought an end to medieval civilization.³ The period of Ockham, Bacon and Descartes broke in significant ways not only from the particular religious civilization of Christendom, but from every ancient and traditional civilization known to us. Naturally there were precedents and analogies to this historical shift in other times and places, but the modern scientific civilization that took off in this period marked something radically new. I intend, however, to focus less on this transition to modernity than on a secondary transition within modernity itself that took place around six centuries later.

The period of Reformation and Enlightenment is associated with many triumphs of the human spirit, many great achievements and discoveries. But this first phase of modernity may be identified with three great forces or “big ideas” in particular: democracy (the sovereignty of the people), nationalism (the sovereignty of states, as distinct from Christendom) and rationalism (the sovereignty of reason and private conscience over tradition).⁴ It was the age of the factory and the urbanization of culture. Nationalism requires the support of industrial might, and “industry” in the modern sense is the rationalized organization of labor to serve production, trade and war. Catholic social teaching from *Rerum Novarum* to *Centesimus Annus* was mainly concerned with these things. It attempted to foster justice within a framework (ultimately) of democracy, and within an international order composed of separate nation states.

“Postmodernity” is often used as a tag for what happened next. The description is justified insofar as this period witnessed a certain reconfiguration of social, political and economic relations—one requiring a more radical response than Catholic social teaching has offered hitherto. In its essence, however, postmodernity is a simply a

³See especially Richard M. Weaver, *Ideas Have Consequences* (Chicago: University of Chicago Press, 1948); Louis Dupré, *Passage to Modernity* (New Haven and London: Yale University Press, 1993).

⁴Rationalism is still in a sense “logocentric,” but the Logos in question is no longer the second Person of the Trinity, and the Reason of Descartes is no longer the Intellect (*spiritus, nous*).

continuation and intensification of the “logic” of modernity. The cultural shift took place during the mid-twentieth century, and by 1970 had permeated most Western societies to the core. This transition was from the previous concern with democracy, nationalism and rationalism towards consumerism (for today even political choices are being reduced to consumer choices), globalization (transnationals, the “international community,” MTV culture) and relativism. To illustrate: in this first phase of modernity it made sense for the United States to see itself as a “melting pot” in which refugees from many cultural and ethnic traditions could willingly be absorbed. Their new loyalty would be the nation that gave them a home. In the historical phase that followed, however, this was less and less the case. Subcultures would no longer submit to a national ethos; they could not be assimilated in the old way. There was, however, no going back. They would now be assimilated by a force that transcended nations.

In the “postmodern” period, too, technology no longer serves the nation but the individual. We have moved from the crudities of mass production to a more sophisticated technological process that allows the appearance of consumer choice and products customized for individual needs and taste. The retail economy is driven by the search for the non-standard item that will serve (for a few days) as a status symbol. All of this is at best a pathetic imitation, and at worst a demonic mockery, of the true individuality achieved through the traditional crafts in the period before modern industry made them economically unviable.

As far as the City is concerned, postmodernity is not necessarily less *urban* than modernity (in fact it is more so), but now, instead of simply draining people and resources from the countryside, the city spills over and absorbs the country, turning it into something else, something much more artificial. The ultimate aim of the industrial civilization of modernity is nearing fulfilment: the replacement of the natural world by a manufactured world entirely designed by man. The postmodern manufactured world is, however, not merely a world of physical artifacts dominating the countryside and the skyline (factories, pylons, skyscrapers): in these later stages of our culture the manufactured world increasingly exists in cyberspace. It is a world of information (and of supposed information, in the sense of propaganda), of “virtual” reality.

Postmodern culture is decentered, in the sense that it is even less bound to tradition than its predecessor. The past, with all its

riches, is either filtered through the technology that presents it to view, or eliminated and forgotten altogether. On the other hand, this “decentering” goes hand in hand with a centering elsewhere: for example, in the liberal ideology of consumption. This explains how our society can be both so *individualist* and so *conformist*. Finally, this simultaneous decentering or detaching from tradition and recentering in an alternative liberal tradition (that vaunts its freedom precisely from tradition!) is already characteristic of modernity.

The political categories which originated in the French National Assembly were defined as the nation state began to define itself in contradistinction from the *ancien regime*. At a more advanced stage of modernity, Left and Right become increasingly difficult to apply. Our politics are increasingly determined by a range of other concerns—particularly a concern with security. It is likely, for example, that before long a great many instruments of mass destruction will be in the hands of individuals, as well as so-called “rogue” states. The instability that this creates will become the major political concern on the planet in the present century, cutting across all party political lines.⁵ The battle over the freedom of the Internet may be typical of the new world order. The demand for control (whether in the interests of security, peace, unity or ecology) will gradually override concerns for freedom, privacy and local autonomy. The growing power and sophistication of our technology requires ever-more sophisticated safety measures. In this way the new technological mass culture inevitably penetrates every nook and cranny, erodes every pocket of resistance. The new global “Left” (individualist, anarchist) will resist, but as long as it employs the same technology as the “Right” (collectivist, social control), it is fighting a losing battle.

At the time of *Rerum Novarum*, back in the Victorian period, the Church could presuppose the existence of a certain cultural framework. She presupposed a community still to some extent rooted through an agricultural economy in the natural environment, and a common belief in the dignity of human nature, the same in all human beings. Thanks to the vestiges of pre-modern civilization, in other words, she was able to appeal to the natural moral law and attack specific injustices. Once the logic of modernity has finally eroded even the vestiges of pre-modernity, the Church must go further. It has no

⁵Cf. the CIA’s 70-page report, *Global Trends 2015*, published early in 2001 and summarized in many newspapers.

alternative but to give a whole new religious inspiration to the culture. That is why Pope John Paul II made the “new evangelization” the theme of his pontificate, and why his social encyclicals have to be read merely as a part of a wider cultural critique—the critique of the “culture of death” advanced by *Veritatis Splendor* (1993), *Evangelium Vitae* (1995) and *Fides et Ratio* (1998). Whereas the target of *Rerum Novarum* had to be the injustices brought about by industrial capitalism (and the socialist reaction to capitalism by then taking shape), the target of the new cultural critique must be—in addition to these specific injustices—something much more subtle and pervasive: our consumerist, technologically driven way of life, the logic that expresses itself in this way of life, and the spiritual disorder that lies behind it.

What, then, is this “logic” of modernity that, exposed at last in the twentieth century, requires a proportionately more radical Christian response? The lifestyle of the affluent West does still, to be sure, generate specific inequalities of wealth and patterns of exploitation across the planet, much as the early stages of capitalism generated great hardship and injustice in the West itself. These injustices continue to cry out to heaven: they need to be denounced and opposed, just as before. The lifestyle of postmodernity, however, has lifted a mask and revealed the “death of God” and the reduction of knowledge to power that lies at the core of the modern project. When in the medieval civilization (for all its faults) work, art, study, and political life were all perceived as belonging to a religiously based or sanctioned order, these things were nevertheless still (in principle) oriented towards the divine, even if society was divided as to how this orientation was to be expressed. But the practically atheistic or secularized society of modernity, which is no longer shaped from within by a religious tradition but by other forces altogether (and this applies whether or not a large number of citizens attend churches on a regular basis), there can be no official religion, no thanksgiving to God on behalf of the society as a whole. Such official religious ceremonies that remain are emptied of real content; they become purely conventional, if not meaningless, and are likely to be abolished in the name of efficiency. Thus modernity entails, ultimately, an injustice that transcends the occasional or accidental exploitation of

man by man—a more fundamental injustice against not only the image of God in man but God himself.⁶

Lest this seem to be simply a plea for a return to an older sacral society, I should add that the roots of the modern (dis)order lie far back in time, and that medieval society was marked not only by “faults,” as I have just hinted, but by deep flaws and problems of its own. This should not distract us from the seriousness of our contemporary situation. An attack on God is an attack on the cosmos. One of the most important victims of the historical process is a sense of the integrity of the world as a gift of God formed by divine wisdom. Respect for the “integrity of creation” is inseparably linked to a sense of the transcendent, and of the Absolute. The ecology and environmental movement that became so popular after the 1960s was partly inspired by this sense of loss—and the concerns of the environmentalists have since been incorporated in Catholic social teaching by Pope John Paul II. A concern with poverty and injustice is also reinforced by this awareness of the sacred, and thus of our responsibility towards the divine image in the world.

The Critique of Technology

In all of this, the role of technology calls for special attention. Controversies over abortion in the late twentieth century presage even more bitter and profound disputes over genetic engineering in the twenty-first. When the British government licensed the cloning of human embryos for the purpose of medical experimentation, and at the same time the sale of abortifacients to children without parental permission, parts of the Catholic community recognized that a new threshold had been crossed. It seemed to some that humankind was now in the business of inventing *new sins* for the first time in history. Only by examining the (implicit) anthropology of our society, its operative assumptions and theories concerning human nature and its destiny, can Catholic social thought make a contribution to resolving the ethical issues raised by modern technology.

⁶Furthermore, the injustice against God that is bound up with the abandonment of religion in turn leads to the further abuse of man, who is now systematically stripped of his transcendent dignity.

What John Paul II has done with his writings on the family, his Wednesday audiences (especially those on Genesis, on Ephesians and on *Humanae Vitae*) and his establishment of the John Paul II Institute, with its branches in every continent, cannot now be undone. It has shown us why a merely moralistic response to technological developments is insufficient. Christ is the “universal norm of ethical action,”⁷ overcoming in himself the split between universal and particular which lies at the root of nominalism, and making possible the reintegration of natural law with virtue ethics, prudence with charity, faith with reason.⁸ Christian ethics must necessarily be founded in a Christocentric anthropology and metaphysics, and here Catholic social thought can find valuable resources with which to oppose the culture of death.

What the Church has had to recognize in its recent teaching is that the inventions such as the contraceptive pill have fueled a new drive towards dualism (the body becomes the mechanical implement of the detached mind) and monism (“our bodies, ourselves”). This in turn necessitated the encyclical *Humanae Vitae* and a subsequent unfolding of the personalistic “theology of the body” by Pope John Paul II.⁹ The technological and ideological detachment of sexual activity from procreation was naturally associated with a drive towards the acceptance of solitary and homosexual activity as harmless or even

⁷See Balthasar’s “Nine Propositions on Christian Ethics” in H. Schürmann, J. Ratzinger, H. U. von Balthasar, *Principles of Christian Morality*, (San Francisco: Ignatius Press, 1986), 79.

⁸L. Melina, “The ‘Truth about the Good’: Practical Reason, Philosophical Ethics and Moral Theology,” *Communio* 26 (Fall 1999): 640–661. “A virtue ethics developed in terms of the acting subject’s tension towards the good can be integrated into a theology arising from faith’s free and dramatic encounter with Christ” (655). “In a virtue ethics, in fact, the normative principles are not laws, but virtues: whereas laws necessarily remain extrinsic to actions, minimalistic, and too general to deal with concrete situations, the virtues intrinsically prepare the subject to perform excellent actions that are adequate to the circumstances” (651). Melina has in mind here the Enlightenment conception of moral law, the “ethics of the third person” rather than an “ethics of the first person,” such as that of St Thomas.

⁹See Mary Shivanandan, *Crossing the Threshold of Love: A New Vision of Marriage in the Light of John Paul II’s Anthropology* (Edinburgh and Washington: T&T Clark and Catholic University of America Press, 1999). See also the excellent article by David S. Crawford, “*Humanae Vitae* and the Perfection of Love,” *Communio* 25 (Fall 1998): 414–38.

beneficial. Homosexual partnerships and “marriages” are now widely recognized. The same logic has more recently led to legalized abortion, to “mercy killing” or euthanasia and eventually to human cloning and genetic manipulation. For—the reasoning went—if procreation is not a sacred action of man and God together but solely a mechanical act performed by man for a variety of reasons, ranging from the need for emotional expression to the desire for entertainment, one that might in any case be performed more efficiently under laboratory conditions, why not choose to make (or *allow to be born*) those babies (and *only* those babies) that we actually want to have? Furthermore, if the power exists to replicate those babies, and even improve them in certain respects, who is to deny parents the right to do so, if they can afford to pay for it? Similarly, the development of computers and communication technology has nourished contemporary dualism by suggesting a false identity between artificial and human intelligence, between “mind” and “information.”

What is at fault in these recent developments is not simply the likely deleterious consequences for families and for society. The problem lies deeper, in an assumed anthropology implicit in the technology and in modernity itself. Technology is far from neutral, as it is frequently assumed to be in both popular and scholarly writings on this subject. “The medium is the message” (McLuhan), and a technology is not simply a technique that may be employed for good or ill but bears within itself a value system and a worldview—perhaps even a metaphysics and a theology, as David L. Schindler has suggested.¹⁰ This is true of all the creations of man, but is most obvious, perhaps, in the case of art. No one would regard a particular artwork as “neutral,” since its explicit purpose is to be the bearer of a message and a meaning. Other human constructions carry less explicit messages. Telephone, television and the Internet, for example, change our sense of space and time, and have a variety of effects on the relationships within the family and the wider social community. Some

¹⁰David L. Schindler, “The Meaning of the Human in a Technological Age,” *Communio* 26 (Spring 1999), 80–103: “In fact, however, the supposed neutrality of modern liberal institutions and technologies already indicates a mechanistic as distinct from a genuinely creaturely ontology of the human person.” Cf. the same author’s “Homelessness and the Modern Condition,” *Communio* 27 (Fall 2000): 411–30.

of these effects will be humanly beneficial, others less so, but an assessment of the technology is not possible without paying attention to the overall pattern of these effects, and to the purpose or function of the technology in relation to the purpose of human life itself. In what respect is a given tool actually serving the true end of man?

A separation seems to have taken place in modernity between technology and art, between *techne* and *poesis*, between the artist and the workman. For a human being to *make* things, to transform matter and energy, to “subdue the earth,” is in his nature and vocation. The ends of that making, its purposes, are necessarily related to the ends of man as such. The disorder we are speaking of arises when this relationship is disrupted, as it is when a new, naturalistic conception of man takes over from the traditional anthropology. This conception is of the very essence of modernity. If man’s end is purely “natural,” there is no higher goal to which his work is ordered, and it becomes an arbitrary matter what he chooses to build or do. His own body, reduced to a mere product of evolution, becomes reduced to industrial material for the work of other men. Consider this passage from the well-known Catholic critic of industrial technology, Eric Gill:

Man is a being, an entity. He is not merely an instrument, a tool, a “hand.” And the things he makes should properly reflect his nature—not merely his idiosyncrasy, the thing art critics call “self-expression”—his nature as a creature that knows and wills and loves and, above all things, loves. And further, the things men make do not properly exhibit man’s nature as a lover unless they are oriented towards the proper object of his love. It is not necessary that there should be any shy-making talk about working for the Glory of God. But it is very necessary, it is entirely necessary that it should be possible to say of men’s work that it does in fact give God glory, that the work of man is that *kind* of work. It is not necessary to talk about it; but it is necessary that it be so. It is not desirable that everybody should always be talking about love; but it is absolutely necessary that, if man’s work is to be a proper and normal expression and exhibition and product of his real nature, every work of man should have the nature of a love song.

The most important motives for man’s activity in doing or making are neither animal instincts nor caprice. We hold that love is more important and not merely prettier than instinct. Upon such a ground and from such a place we

survey the works of men. We see all things as evidence of love. We make what we love—in accordance with our loves we make. A pair of scissors, no less than a cathedral or a symphony, is evidence of what we hold good, and therefore lovely, and owes its being to love.¹¹

As though to continue the thought, Gabriel Marcel reminds us that “in the long run all that is not done through Love and for Love must invariably end by being done against Love. The human being who denies his nature as a created being ends up by claiming for himself attributes which are a sort of caricature of those that belong to the Uncreated.”¹² Techniques that treat the universe and life itself as raw material for manipulation, without due respect for the order in which they have been given, are in contradiction to the true end of human life, as revealed to us in faith. This kind of science (Baconian, Cartesian) becomes “inhuman” because it involves an implicit denial of humanity’s own *telos*, of “final causes” in general, and of divine Providence—an implicit denial of the Incarnation and the Trinity. It is spiritually incompatible with the kind of humility, the kind of receptivity, the kind of contemplation, which alone enables human beings (riddled though they are with physical and psychological imperfection) to attain a measure of holiness and, therefore, of real humanity.

Up until now, the Church has tended to go along with the general view that technological progress is benign and in any case irresistible. Christians must simply make the best of it. Every new invention may be used for good or ill: the Church should simply discourage its use for ill. If technologies in themselves are *not* morally or culturally neutral after all, then this policy needs to be re-examined. The crisis over human cloning is likely to force such a re-examination in any case, for now even the scientists and technicians are beginning to ask: “are some kinds of knowledge so terrible they should not be pursued?”

This question was phrased in the *Newsweek* “Issues 2001” special edition, which drew attention particularly to a widely-quoted paper by Bill Joy, the cofounder and chief scientist of Sun

¹¹Cited from Brian Keeble (ed.), *A Holy Tradition of Working: Passages from the Writings of Eric Gill*, (Ipswich: Golgonooza Press, 1983), 62–3.

¹²G. Marcel, *Men Against Humanity* (London: Harvill Press, 1952), 55–6.

Microsystems, in the April 2000 issue of *Wired* magazine. This paper was influential and alarming because it came from a man at the cutting edge of the present technological revolution. He wrote: “we are on the cusp of the further perfection of extreme evil,” through the “empowerment of extreme individuals,” and the “pursuit of unrestricted and undirected growth through science and technology,” especially through robotics, genetic engineering and nanotechnology. He went on to evoke a truly apocalyptic scenario: the prospect that (if we do not first destroy ourselves) our technology itself, soon to be self-replicating, may dispense with human beings altogether. “By 2030, we are likely to be able to build machines, in quantity, a million times as powerful as the personal computers of today As this enormous computing power is combined with the manipulative advances of the physical sciences and the new, deep understandings in genetics, enormous transformative power is being unleashed. These combinations open up the opportunity to completely redesign the world, for better or worse: the replicating and evolving processes that have been confined to the natural world are about to become realms of human endeavor.”

Joy points out that the new technologies are being developed less by governments than by corporate enterprise. The likelihood of abuse and the risk that abuse would lead to the destruction of the biosphere is simply too great. “The only realistic alternative I see is relinquishment: to limit development of the technologies that are too dangerous, by limiting our pursuit of certain kinds of knowledge.” He looks to his grandmother and to the Dalai Lama for examples of “common sense,” and takes hope from the unilateral US abandonment of the development of biological weapons, which “stemmed from the realization that while it would take an enormous effort to create these terrible weapons, they could from then on easily be duplicated and fall into the hands of rogue nations or groups.” However, verifying relinquishment will require transparency amounting to the loss of privacy, the invention of new forms of protection for intellectual property, and the adoption by scientists and engineers of “a strong code of ethical conduct” akin to the Hippocratic Oath.

Bill Joy’s scenario seems too optimistic. It is hard to imagine attempts to ban certain technologies, or at least to prevent them falling into private hands (out of fear of “unacceptable risk” and public outcry), being more than partially and temporarily effective. However, it is not the case that research is currently being driven by sheer

curiosity along an inevitable path. Scientific endeavor always runs along certain channels, created by political and commercial pressures, by social and metaphysical assumptions, by the availability of funding and desire for fame, and by the manifold “spirit of the age.” Rather than ask how we might repress certain types of research, we might therefore consider how to redirect some of those creative energies. Bill Joy himself touches on this when suggests we might “rethink our utopian choices”—the dreams that define our direction. What goals are we setting for ourselves? Men might have been standing on Mars in 2001, if the drive to conquer space had not evaporated after the United States beat Soviet Russia to the Moon. Funding went in other directions. Similarly, the direction of current research can be changed by legislation and investment that sets other priorities, priorities more in tune with our true purpose on this earth and with the dignity of the human person.

To avoid accusations of Luddism and neo-Romanticism, we may therefore consider the possibility that another kind of science—equally “advanced”—would be possible on the basis of an authentic creaturely respect for the divine wisdom in nature.¹³ In his classic work, *The Abolition of Man*, C.S. Lewis compares the Baconian scientist with Goethe’s Faustus. “For the wise men of old the cardinal problem had been how to conform the soul to reality, and the solution had been knowledge, self-discipline, and virtue. For magic and applied science alike the problem is how to subdue reality to the wishes of men: the solution is a technique; and both, in the practice of this technique, are ready to do things hitherto regarded as disgusting and impious—such as digging up and mutilating the dead.”¹⁴ He goes on, “The regenerate science I have in mind would not do even to minerals and vegetables what modern science threatens to do to man himself.”

E. F. Schumacher has done a great deal, with his concept of “appropriate technology,” to fill in this notion of a “regenerate” science.¹⁵ It is, however, much easier to suggest things that would

¹³See my earlier article, “A Science of the Real,” in *Communio* Fall 1998, also available at the website of the Centre for Faith & Culture: see www.secondspring.co.uk/secondspring/science_index.htm.

¹⁴C. S. Lewis, *The Abolition of Man* (London: Oxford University Press, 1943), 46.

¹⁵E.F. Schumacher, *Small is Beautiful: A Study of Economics as if People Mattered* (London: Blond & Briggs, 1973); *Good Work* (London: Jonathan Cape, 1979).

probably be forbidden by a wiser science than to predict *what would be possible to it*; for if the same resources of time and creativity were invested in “working with the grain of nature” (to use a phrase from Britain’s Prince Charles in his commentary on the 2000 BBC Reith Lectures) as are currently invested in the opposite process, we have no way of telling or imagining how quickly and how far a new kind of progress would take place—or even of measuring such progress (since the goal towards which we are moving would itself have been transformed).

Conclusion

In an early sequence of the film *Star Trek: Generations* (based on the well-known television series), we find the crew of the starship “Enterprise” sailing the blue ocean in a wooden galleon. For regular viewers of the series, the sense of greater freedom in a world less dominated by technology is almost palpable. Suddenly there is a call from the bridge of the starship, and the Captain steps out of the galleon scene through an invisible door, out of the computer-generated environment of the holodeck, back to the world that for him is reality, for us merely another illusory entertainment. This little episode is interesting because part of the appeal of the genre of science fiction lies in the feeling it gives of having been liberated, set free from the limitations of everyday reality. And here within the supposedly liberated world of the future we find a projected nostalgia for the earlier, less technological age.

In another film, *The Truman Show*, the protagonist gradually discovers that the whole town in which he lives is a construct and its inhabitants (including his own wife and best friend) are merely actors; that he is the unknowing star of a long-running television soap opera, watched around the world by millions of people 24 hours a day. In order to escape, he sets sail across the open sea, only to collide with the blue metallic sky where it meets the water on the horizon. He steps out of the boat, and feels his way along the horizon until he finds a door. At that point the voice of the show’s creator speaks to him for the first time, tempting him to remain within the safe, known world of the dome. “I have watched you ever since you were born,” he is told, “and I know you better than you know yourself.” The film ends as Truman rejects this voice and takes his first step beyond the artificial world; his first act no longer as a puppet of others, but as a free man.

The hint is that our own freedom also begins, potentially, when the film stops and we cease to be enthralled at the spectacle of another person's life—unlike the film audience who are shown momentarily celebrating Truman's victory, before switching to another channel.

In both these movies, as in many others from *Frankenstein* to *The Matrix*, there is an attempt being made to explore something of the relationship between the artificial and the real, and the sense we have that authentic human freedom depends on preserving a relationship with the "natural" world. There is a feeling that the more "artificial" the world becomes, the more human beings through their technology can actually determine what happens in it, the less freedom we actually possess, and the "thinner" our freedom becomes. The underlying message about human freedom conveyed by *The Truman Show* seems to be that genuine freedom depends on the *possession of truth*. It is the truth which sets us free, whereas a lie always enslaves.

These films I have mentioned are being offered to us as electronic entertainment, which creates around us an artificial world or virtual reality increasingly hard to distinguish from the real thing. Simultaneously, digital technology is being applied to biological life in genetic engineering. In a movie, the technique known as "morphing," whereby the image of one thing or person is electronically transmuted into the image of another, can be amusing or shocking. In the world outside the cinema, one gets the impression that technologists aim to do the same with plants, animals and human beings, eventually "morphing" one species into another. For the modern mentality, there is, after all, no very radical gap between the image and the reality: both can be reduced to bits of information, which can be easily manipulated. There is nothing deeper, nothing transcendent. It is only a short step from this to the assumption that truth is not something I receive or observe or accommodate myself to, but something I must manufacture.

This suggests again that the deepest issue raised by modern technological progress is a question concerning our attitude towards God and creation. Human societies have always been shaped partly by the technology available to them. (Correlatively, of course, the technology has been shaped partly by political and economic forces.) Now, however, with the acceleration of technical progress, it is not merely the type of technology that shapes or helps to condition our society but the very fact of constant change. There is no rest in an achievement, but rather constant pressure to advance yet further in

order to gain a competitive advantage over one's neighbors/rivals. Technical advance does not spell security, but insecurity. Technology is able to promise a mastery of nature so profound that the boundary between natural and artificial effectively disappears, but instead of implying the final conquest of natural perils such as disease, earthquake and flood, the artificial world proves in some ways more dangerous and more unpredictable than the "natural."

At a certain point, mere complicity with the culture of death becomes morally illicit.¹⁶ If we are approaching, or have passed, that point, the time has come to recognize the radical implications of Catholic social teaching. How are we to conduct ourselves in the present situation? It has been the burden of my article to raise this necessarily inconvenient question.

I am, of course, not unaware of the disquieting and superficially even discouraging character of such a diagnosis. But it has, I think, the great advantage of helping us, by the very strength of the reaction it evokes in us, to choose the only path that is open to us if we want to avoid complicity, not merely in a catastrophe, but in the greatest crime which mankind has ever committed against itself.

Let me make myself clear. There can be no question here of my attempting to define anything at all resembling a political line of action. What we have to do with is rather an inner attitude; but this inner attitude cannot remain at the stage of a mere attitude, it must find expression in deeds, and that according to the situation in which each of us finds himself: I mean by that, that this is not a matter, as is unfortunately so often the habit of intellectuals, of our thrusting ourselves into fields in which we are wholly without authority, by signing appeals, manifestos, and so on. I am not giving a distorted emphasis to my own point of view when I say that this sort of thing is too often at the moral level of the petty confidence trick. But on the other hand it is within the scope of each of us, within his own proper field, in his profession, to pursue and unrelaxing struggle for man, for the dignity of man, against everything that today threatens to annihilate man and his dignity. It is perhaps above all in the field of the law, in the field of legal rights of the person, that this struggle ought to be carried on,

¹⁶Andrew Kimbrell of the Center for Technology Assessment (www.icta.org) refers to this unintended complicity as a form of "cold evil."

for we must recognize that the very notion of law, in this sense, is no longer acknowledged, no longer understood. The men of my own generation can bear witness that in this realm a collapse has taken place of which, thirty or forty years ago, nobody would have been able even to conceive. And here again we find the same phantasm, the same “crowned ghost” which I have been so incessantly denouncing: I mean the idea of a “meaning of history,” a “direction of historical progress” as constituting the criterion in the name of which certain human beings are to be preserved or even set on high for admiration and others thrust aside, which is to say, eliminated.¹⁷ □

STRATFORD CALDECOTT co-founded the *Centre for Faith & Culture* with his wife *Léonie*.

¹⁷Gabriel Marcel, *Man Against Humanity* (London: Harvill Press, 1952), 184. I make no apology for taking this passage out of its actual context, where Marcel is discussing the threat to liberty from Communism on the one hand and the clericalist or moralistic reaction to Communism on the other.