Rise of the Planet of the Apes and Social Consciousness

Rise of the Planet of the Apes (2011, Rupert Wyatt) continues a long movie franchise history of social commentary begun with the original science fiction classic *The Planet of the Apes* (1968, Franklin J. Schaffner). The first movie teemed with theological and political themes from race relations, to church and state struggles, to religion versus science debates, to the evolution and creation controversy, to issues of law and nature and finally nuclear fear. The apocalyptic masterpiece contains one of the greatest surprise endings in movie history with astronaut George Taylor (Charlton Heston) cursing humanity for its murderous tendencies in front of the ruined Statue of Liberty.

The original movie was followed by a sequel and three prequels that never regained the intrigue and depth of the first movie and were criticized for their plunge into movie mediocrity. *Rise of the Planet of the Apes* is based loosely on the 1972 prequel *Conquest of the Planet of the Apes* (J. Lee Thompson). Not an official remake, *Rise* moves away from the idea of a slave revolt that seizes power as the only recourse for the oppressed, to focus on the inherent danger of scientific transgression against natural limits.

A trailer for the recent ape flick repeats a recurring theme in the social criticism of new technology when it states: "Our greatest discovery will become our greatest threat." The invention of a cure for neural disease leads to intelligence enhancement in other primates as an unintended consequence and creates a species of ape capable of competing mentally with human beings. The lead character Will Rodman (James Franco) believes he has discovered a cure for Alzheimer's through a gene therapy method involving the injection of the virus ALZ 112 into chimpanzees, which allows the brain to heal itself at

the cellular level. The therapy has the side-effect of increasing memory, cognitive capacity and intelligence. When the experimental chimp attacks its handlers the Gen-sys Corporation scraps the project, but not before the chimp gives birth to a highly intelligent baby that Will adopts to save from extermination. The baby chimp is named Caesar (Andy Serkis) by Will's father Charles (John Lithgow), who also suffers from Alzheimer's and is temporarily cured by the virus-therapy. Will persuades Gen-sys to restart the program with a revised virus called ALZ 113 that drastically increases chimp intelligence, but proves lethal to humans.

After Caesar attacks a neighbor while trying to defend Charles, he is committed to an ape sanctuary where he devises a plan of escape and seizes the ALZ 113 for his fellow Simian inmates. The apes manage to escape from the prison, wreak havoc on San Francisco and overpower a police blockade on the Golden Gate Bridge in efforts to take refuge in the Redwood National Forest. Meanwhile, the ALZ 113 has been accidentally exposed to humans, causing a global epidemic. We are left to believe the apes will adapt and thrive in their new habitat as the human population is decimated by a new viral plague of its own making, thus giving rise to the "planet of the apes."

The movie is obviously not a prequel to the 2000 remake of the original, but a reboot, an attempt to restart the series with a different line of thought. It places the blame for the intelligent origins of apes on the technological tampering with genes in the search for a cure to neural disorders and the desire to enhance human intelligence. The film remains apocalyptic in its social criticism, but locates the new threat in biotechnology rather than nuclear weapons, as in the original series. The one voice of conscience, Caroline Aranha (Freida Pinto), who is Will's girlfriend and zoo veterinarian, tells him that the gene therapy "is wrong. . . . You are trying to control things that are not meant to be controlled." The film offers a warning regarding the overly optimistic

expectations of scientific capability to reverse the natural process of aging and dying. The ultimate negative association is made by comparing the experimental procedure of gene manipulation to the mythological character of Icarus, the man who flew too close to the sun and drowned after his wax wings melted. The allusion appears on a TV set in the background during the ape rebellion that reports on the Icarus manned space mission that was poised to enter the Martian atmosphere. We discover later through a newspaper headline, after the apes have escaped, that the rocket may be "Lost in Space?"

The latest installment in the franchise falls short of the original glory of the 1968 film, but foreshadows the arrival of more movies in the series, hopefully soon. These new movies will unfold linearly from this new starting point that centers on a social consciousness concerning the potential dangers of biotechnology, which has largely replaced nuclear paranoia as the source for our fears of the future and belief that science has spun out of control. This science fiction series continues to present a challenge to our thinking about the belief in the limitless potential of technological progress in an accessible and entertaining format.

Martial Arts and Just War Theory

Dr. Lawrence Terlizzese examines a Christian view of martial arts in view of the Just War Tradition.

When I was first asked to speak about Christianity and the Martial Arts I was a little skeptical that a Christian can

practice Martial Arts in good conscience. The popular objections immediately came to mind: "Aren't the Martial Arts steeped in Zen Buddhist practice?" And, "Should a Christian really participate in something as violent as karate?" Christians commonly object to Martial Arts for such reasons, even vilifying them as something as bad as witchcraft.

Upon reflection, I realized that the practice of Martial Arts naturally corresponds to something I have thought long and hard about: Just War Tradition. A central principal of both Just War thinking and the Martial Arts is personal self-defense. Just War doctrine states that if a Christian is unjustly attacked or sees an innocent third party under attack and has the ability to either prevent the abuse or intervene, that he or she should do so. What's more, to fail to render such aid makes one equally culpable in the crime. In other words, inaction and apathy in the face of injustice is just as wrong as the injustice itself.

Just War thinking is usually applied to the relationships between governments and states in times of war. It helps Christians and societies decide if a war is morally acceptable or not and whether it is worthy of their participation. But there is no logical reason to prevent Christians from applying this principle at a personal level. After all, the police cannot possibly be available always and everywhere; we are sometimes forced to protect ourselves.

The Violence Objection

As Americans we naturally think that self-defense means owning a handgun. We live in a gun culture that accepts firearms as a God-given right protected by Law. Christians generally have no objections to gun ownership even though the potential for disaster is obvious. But when it comes to a safer alternative to guns, such as the Martial Arts, practitioners are met with a flurry of protests as if they are embracing some foreign religion. Now, to clear the air, I am entirely in favor of the

Second Amendment right to bear arms. I am simply suggesting that those individuals who choose to practice the Martial Arts as a means of self-defense have chosen a safer alternative to gun ownership. (I assume that the discipline replaces gun ownership for them. From observation, gun owners and Martial Arts participants are generally not the same people.)

Guns are so easy to use that the potential for abuse and misuse is frightening and lethal. The Martial Arts, however, requires training, discipline and values related to peace and human dignity. One is taught self-control and respect for life that must accompany any notion of self-defense. Students are taught not to kill but rather to apply only the force necessary for a given situation.

One of the ironies of war states that the defender may become more powerful than the aggressor. This principle was clearly demonstrated in World War II when the Allies routed the Axis powers. At this point, if the defending party does not possess a system of values that imposes limited action out of respect for human life, then the defender becomes the aggressor by virtue of his advantage of power. Only a notion of justice tempered with mercy will prevent the just party from slipping into injustice and excessive aggression.

At the personal level, it is very difficult to achieve limited action that seeks to apply only the necessary force when it comes to using firearms. For example, various schools of Martial Arts often teach restraint in kicking or punching, using only enough force to defend oneself. Bullets cannot be recalled and their results are almost always fatal or horribly injurious. On the other hand, Martial Arts techniques like karate are inherently limited in their effects—despite violence-filled popular Kung Fu movies. They are designed to apply only the force necessary to achieve the goal of self-defense without killing or permanently disabling the opponent. Kicks, chops and blocks will always prove less fatal or damaging than shooting someone at point blank range. The

use of force is never ideal or welcome, but if given the choice between karate or a .357 magnum for self–defense, the former clearly comes closer to Christian notions of justice and mercy than the latter.

The Eastern Mysticism Objection

The second objection, that the Martial Arts are *necessarily* tied to Eastern mysticism and thus that any Christian practicing these Arts is betraying Christianity, is much easier to answer. The common misconception is that Bodhidharma, the founder of Zen, brought the Martial Arts from India to China in the Sixth Century AD with the spread of Zen Buddhism. Later, the practice spread to Japan. It is certainly true that the East has created a synthesis between the Martial Arts and mystical philosophy, but this creation represents a fairly modern innovation, especially in Japan with the rise of the Samurai warrior around 1300 AD. This is the most prominent symbol of the Martial Arts in the American mind. These Arts were practiced for millennia before the arrival of Zen in China or Japan and go as far back as 2000 BC in Mesopotamia. Historically speaking, there is no necessary connection between Zen and the Martial Arts.

Philosophically speaking, there is no necessary connection between Zen and the Martial Arts, either. Zen philosophy teaches a way of meditation or a means of achieving enlightenment focused on the practical and tangible world as opposed to the spoken or written word. That is, it doesn't rely on sacred texts or traditional reason, but rather on intuitive experience. Zen adherents prefer practice and encounter with reality rather than simply talking about it. Since the Martial Arts are also very practical and physical, this makes Zen attractive to many Martial Artists, but this represents an incidental connection, not a logically necessary one. The connection between the two practices is a convenience. One no more has to be a Buddhist to practice the

Martial Arts than one has to be a Christian to be an American. Simply put, just because Zen appeals to many Martial Artists doesn't mean the two go together essentially. One can do just fine without the other, and that's where Christians can reconcile doing Martial Arts with their faith.

However, the notion of Chi ["chee"], or life-force, in the Martial Arts presents a serious obstacle to many Christians. This underlying idea states that one must align his or her Chi in order to be an effective practitioner. Since Chi clearly represents a pantheist philosophy, a suitable Christian-theist substitute should replace it. Chi is really nothing more than right attitude, enthusiasm and concentration; it signifies the power of the focused mind rather than a mystical supernatural energy we can draw from. As in all sports and disciplines of any kind, one must focus the mind. This is no different for the Martial Artist than for the marksman who must aim at a target or a ball player who must kick or hit a ball. The body follows the mind.

As Christians legitimately concerned with the compromise of faith with Eastern mysticism or a violent culture, a conceptual union of Just War thinking and the Martial Arts creates an excellent theological and practical tool to reconcile both currents in American society. So, if after considering this perspective your conscience is clear, enjoy the Martial Arts for the sport, discipline and art form that they can be.

Tron Legacy: A 21st Century Frankenstein

A culture, like the human body, gives warning signs when it feels sick. If an infection enters the body, fever breaks out. This serves as a demand for treatment. Science fiction has served this purpose in modern culture since the first sci-fi novel, *Frankenstein*, appeared in 1818. A well–intended scientist creates new life that could impart immortality to all, only to immediately cast it aside. However, being an emotional creature, Frankenstein's creation will not be dismissed so easily and demands that his maker take responsibility and introduce him to the human community. Put very simply, all Frankenstein's Monster asked of his creator was to be loved! In the absence of love and acceptance the creature wreaks a terrible revenge and destroys his creator.

The story is so well-tread in popular culture that it provides a guiding motif for most sci–fi stories; thus it serves as a prophetic warning to all technological innovation. In literature, folklore and the movies, a monster means WARNING! "Victor's monster, then, which brings about his death, is a warning to us all. Monster derives from the Latin *monere*, to warn."{1} Science fiction acts as the Socratic gadfly of scientific advance. "From its very birth . . . modern science fiction has functioned as a critic of the scientific enterprise . . . . [It] both educates the general public in science and advises the scientists as to the appropriate projected goals of science . . . . [In] the context of explosive technological advance and 'future shock,' science fiction is the only literature that seriously attempts to explore the social consequences of scientific innovation."{2} Theologian Elaine Graham notes that the Greek word for monster is *teras*, which means something both abhorrent and attractive.

The monster is pure paradox and incarnates a contradictory state of existence. "It is both a sight of wonder—as divine portent—and loathing, as evidence of heinous sin."{3} Awful and "aweful," the monster embodies a liminal{4} being caught between two worlds. It represents the ambivalence of our creations. "Monsters embody fearful warnings of moral transgression . . . [they] herald new possibilities . . . the otherness of possible worlds, or possible versions of ourselves, not yet realized."{5} This is not unlike ancient maps that demarcate unexplored territory with the warning: "HERE BE MONSTERS!" So our popular fictional monsters beckon us to heed their cries to take care for what we create.

The film *Tron Legacy* (2010, directed by Joseph Kosinki) continues this theme for the next generation. The movie is so visually spectacular in 3—D that the audience may easily forget its prophetic warning in a clear case where the medium threatens to overpower the message. As a visual spectacle *Tron Legacy* transforms the original *Tron* (1982, Steven Lisberger) from a cult movie following filmed in animation and live—action into a magnificent film that is also an amusement park ride.

The story follows Sam Flynn (Garret Hedlund) a disinterested majority share holder in Encom, a giant computer software company, as he pulls pranks on the board. Sam responds to a mysterious page sent from his father's old arcade haunt and stumbles upon a teleport machine and is transported into *The Grid*.

Sam's father, Kevin Flynn (Jeff Bridges), was a radical who believed quantum teleportation represents the "digital frontier." Inside the computer, humanity can alter itself to create the perfect world. "In there is a new world! In there is our future! In there is our destiny!" Flynn emphatically states in a public address. He wants to reshape the human condition through digital manipulation. Flynn, Sr. discovers a serendipitous miracle in the process of creating utopia: a new

life form bursts into existence through spontaneous generation; he calls them "isomorphic algorithms" (ISO's). These self—forming programs hold the potential for solving all the mysteries of science, religion and medicine. They could end all disease and would be Flynn's gift to the world! However, Flynn's own created program CLU (Codified Likeness Utility)—designed to create perfection in The Grid—destroys the ISO's in a coup because they threaten their shared vision for creating perfection within The Grid. This traps Flynn in the digital world with the last surviving ISO, Quorra (Olivia Wilde), forcing them into hiding.

CLU (pronounced "clue"; Jeff Bridges playing his own clone) traps Sam in a vicious gladiatorial game—that he has stacked to be impossibly difficult, despite Sam's skill and determination—in an effort to lure Flynn Sr. from hiding. Quorra rescues Sam and brings him to his father. Flynn Sr. has been languishing all these years because he believes that his only viable option is to remain in his Zen Buddhist retreat. When Sam asks his father to fight CLU in order to escape with him back to the real world, his response is "We do nothing." The elder Flynn hopes against hope for the help of Tron, a warrior program designed to resist assimilation; but we discover that even Tron has been co—opted by CLU. The "Son of Flynn," as programs call Sam, botches an escape attempt, triggering a surprise rescue by Flynn Sr. and Quorra, who then seize the opportunity to exit through the rapidly closing window on the portal back to the actual world. Unfortunately, a Program steals Flynn Sr.'s memory disc in the process, giving CLU complete control over the entire Grid. Using his newfound power, CLU raises an army ready to escape the digital world and enter the real one. "Out there is a new world! Out there is our victory! Out there is our destiny!" CLU proclaims to his troops in Hitlerian Nuremburg Rally style.

Sam and Quorra escape dramatically through the open portal with the help of Tron, who has finally decided that he fights

for the Users (the people who write the Programs). In a dramatic climax, Flynn reintegrates with CLU, destroying both of them.

The movie recapitulates the Frankensteinesque fear of technology turning on its creator. CLU represents the dark *doppelganger*{6}*,* or alter ego, of Kevin Flynn in his youthful days when he believed perfection was an attainable goal.

Biblical allusions emerge, as well. CLU demonstrates a Luciferian jealousy when Flynn discovers the ISO's and seeks their destruction to spite his creator's love for them. Trinitarian imagery abounds throughout the movie, especially in the continual triangular juxtaposition of Flynn the Creator, Son of Flynn and Quorra who represents new life and remains the heart and soul of the movie through her innocence. In one scene, Flynn resides in the background with a glowing halo over his head as Sam and Quorra sit adjacent to each other discussing the beauty of a sunrise, forming a perfect triangle in the center of the screen. This symbolism reminds us that humanity creates the digital world, much the same as the Creator did the real one, and this co—creation can just as easily turn on us. The human condition is one of rebellion against creation. CLU's programmed perfectionism seeks eradication of all that is other than itself including the reclusive creator Flynn and plans to extend that stultifying perfection to the non—digital world.

Flynn's problem, like that of Victor Frankenstein, is that he no longer cares for CLU, but runs away and hides from his darker self. He rejects his creation and does not seek to reintegrate him into the society into which he has been "born," just as Victor Frankenstein disavows his creation. Technology critic Langdon Winner gives us an excellent explanation of the *Frankenstein / Tron* analogy, relating it to our spiritual reality. Winner argues that we fail to take sufficient care as to the consequences of our creations or how these innovations may change our lives negatively, and then we

act shocked when they return to us as demonic powers instead of blessings. "Victor Frankenstein [Kevin Flynn] is a person who discovers, but refuses to ponder, the implications of his discovery. He is a man who creates something new in the world and then pours all his energy into an effort to forget. His invention is incredibly powerful and represents a quantum jump in the performance capability of a certain kind of technology. Yet he sends it out into the world with no real concern for how best to include it in the human community. . . . He then looks on in surprise as it returns to him as an autonomous force, with a structure of its own, with demands upon which it insists absolutely. Provided with no plan for its existence, the technological creation enforces a plan upon its creator."{7}

Sam emerges back into the real world with Quorra a changed man, refusing his father's Zen retreat and ready to assert responsibility for his company by taking it back from greedy executives. *Tron Legacy* warns of the dangers of the digital frontier including cells phones, online dating and WiFi. Only through our care to assert responsibility for our technology through ethical control will it bring positive change to the human condition. But the movie also offers hope in the astounding potential digital technology offers through Sam's transformation coupled with Quorra's ability. The movie is a welcome tonic to a perfectionist and paranoid age obsessed with an elusive ideal of perfection. Flynn Sr. states, "Perfection is not knowable, but right in front of us all the time." The movie proclaims that utopia, or human happiness, is not an ideal such as a computer program, but is found in our loved ones who are right in front of us.

Notes

1. Eric S. Rabkin, "Imagination and Survival: The Case of Fantastic Literature" in Brett Cooke and Frederick Turner, eds. *Biopoetics: Evolutionary Explorations in the Arts* (Lexington, KY: ICUS, 1999), 304.

2. Joseph D. Miller, "The 'Novel' Novel: A Sociobiological Analysis of the Novelty Drive As Expressed in Science Fiction"in Brett Cooke and Frederick Turner, eds. *Biopoetics: Evolutionary Explorations in the Arts* (Lexington, KY: ICUS, 1999), 326.

3. Elaine L. Graham, *Representations of the Post/Human: Monsters, Aliens and Others in Popular Culture* (New Brunswick, NJ: Rutgers University Press, 2002), 53.

4. According to Encarta Dictionary: English (North America) accessed via Microsoft Word, "liminal" [liminl] means: "belonging to the point of conscious awareness below which something cannot be experienced or felt."

5. Graham, *Representations of the Post/Human: Monsters, Aliens and Others in Popular Culture* 53, 54.

6. Encarta Dictionary: "dop·pel·gang·er [dɑp(ə)lgæŋər]: 1. someone who looks like someone else; 2. spirit that looks like someone alive; 3. a spirit that some people believe looks like someone who is alive.

7. Langdon Winner, *Autonomous Technology: Technics-out-of-Control as a Theme in Political Thought* (Cambridge, MA: MIT Press, 1977), 313.

Into the Void: The Coming Transhuman Transformation

In the TV show *The Six Million Dollar Man*, Lee Majors played Steven Austin, a crippled astronaut who was rehabilitated

through bionic technology that gave him superhuman strength and powers. The show, like so much science fiction, presents us with the dream that technology will enhance all our facilities from sight to memory, hearing to strength, and lengthen our life span to boot. The bionic man represents a fictional forerunner of the transhuman transformation. The Transhumanist school believes that technology will not only enhance the human condition, but eventually conquer death and grant us immortality. Human enhancement technology performs wonders in allowing the lame to walk, the blind to see, the deaf to hear and the sick to be well, but even immortality is out of the reach of technology. In striving to enhance our physical existence we may lose our souls in the process.

In his famous book, *The Abolition of Man* published in the 1940s, C. S. Lewis wrote that modern society is one step away from "the void"{1}—"post–humanity,"{2} a state of existence from which there will be no return. Lewis argues that when we step outside of what he calls the Tao{3}, we lose all sense of value for human life that has always governed civilization. What Lewis calls the Tao, we might call Natural Law or Traditional Morality—that internal moral understanding of right and wrong which God has written on the hearts of all people (Romans 2), the *Logos* by which all things were created (John 1, see especially verse 4).{4}

In leaving traditional spiritual values behind, Lewis argues, modern technological civilization has reduced human value to only what is natural, and we have lost our spiritual quality. Modern society has striven to conquer nature and largely succeeded, but at a great cost—with each new conquest, more losses in human dignity, more of the human spark extinguished. Lewis offers the example of eugenics from his time in the 1930's and 40's.{5} Eugenics is now a debunked science of racial manipulation and something we know was practiced with particular ferocity in Nazi Germany.{6} But the driving philosophy of manipulating nature and humanity into something

new and final remains prominent. Lewis underestimated the truth of his own prophecy. He thought that maybe in 10,000 years the final leap will be taken when mankind will solidify itself into some kind of inert power structure dominated by science and technology.[7]

However, the 21st century may prove to be the era of posthumanity that Lewis foresaw in his time. The current movement of transhumanism, or human enhancement, asserts that humanity will eventually achieve a new form as a species through its adaption to modern computer technology and genetic engineering in order to reach a higher evolutionary condition. Our present state is not final. Transhumanism derives from Darwinian doctrine regarding the evolution of our species. Evolutionary forces demand that a species adapt to its environment or become extinct. On this view, many species experience a pseudo—extinction in which their adaptation gives way to another kind of species leaving its old form behind. Many evolutionists believe this happened to the dinosaurs on their way to becoming modern birds and that humanity faces the same transformation on its way up a higher evolutionary path.[8] Primates evolved into humans so humans will eventually evolve into something higher (posthuman).

Metaman

Our present condition will give way to the cyborg (which is short for cybernetic organism) as we join our bodies and minds to technological progress. Transhumanists believe that because Artificial Intelligence (computing power) advances at such a rapid pace, it will eventually exceed human intelligence and humanity will need to employ genetic engineering to modify our bodies to keep pace or become extinct. Therefore, the cyborg condition represents humanity's inevitable destiny.

The two predominant pillars in transhumanism revolve around Artificial Intelligence (AI) and genetic engineering. One represents a biological change through manipulating genes. The

other presents the merging of human intelligence with AI. The biological position (through use of genetic engineering) claims that through transference of genes between species, we eradicate the differences and create a global superorganism that encompasses both kinds of life—the natural and the artificial. Biophysicist Gregory Stock states that once humanity begins to tamper with its genetic code, and the codes of all other plants and animal species, that "the definition of 'human' begins to drift."{9} Through genetic engineering we will transform the human condition by merging humanity with the rest of nature, thereby creating a planetary superorganism. A superorganism operates like a bee hive or an anthill as a collection of individual organisms united as a living creature. Stock calls this Metaman, the joining of all biological creatures with machines, making one giant planetary life form. This superorganism encompasses the entire globe.

Transhumanism presupposes that no distinction exists between humanity, nature or machines. Metaman includes humanity, all it creates, and also the natural world. It acknowledges humanity's key role in the creation of farms and cities, but includes all natural elements, such as forests, jungles and weather. Metaman includes humanity and goes beyond it.{10} Stock envisions a greater role for genetic engineering in redefining biological life as different species are crossed. Humanity may now control the direction of its evolution and that of the entire planet.

Stock states that through "conscious design" humanity has replaced the evolutionary process.{11} This leads us to Post—Darwinism where people have supplanted the natural order with their own technological modification of humanity and the entire ecological system. "Life, having evolved a being that internalizes the process of natural selection, has finally transcended that process."{12} Humanity may now, through the agency of technological progress, seize direction of its development and guide it to wherever it wants itself to go. No

other species has ever controlled its own destiny as we do.

The Singularity

A second transhumanist belief argues for the arrival of an eventual technological threshold that will be reached through the advancement of Artificial Intelligence. The argument goes like this: because AI develops at a rapid pace it will achieve equality with the human brain and eventually surpass it. Estimates as to when this will happen range from the 2020's to 2045. The evolutionary process will reach a crescendo sometime in the 21st century in an event transhumanists call "the Singularity."[{13}] There will be a sudden transformation of consciousness and loss of all distinction, or Singularity, between humanity and its creations, or the absence of boundaries between the natural and artificial world. Singularity watchers expect that this event will mark the ultimate merging of humans and machines. Renowned inventor and AI prophet Ray Kurzweil states, "The Singularity will allow us to transcend these limitations of our biological bodies and brains. . . . There will be no distinction, post–Singularity, between human and machine. . . ."[{14}]As the fictional CEO and mastermind behind a cutting edge AI company in the year 2088 crowed, "My goal is for us to end death as we know it on earth within 50 years—for the essence of every person to live perpetually in an uploaded state. . . . The transhuman age has dawned."[{15}]

Both of these positions, one emanating from genetic engineering that seeks to enhance the body, the other from Artificial Intelligence that seeks to supersede and even supplant the need for bodies, argue for the eventual replacement of humanity with biological–machine hybrids. Metaman and Singularity systems are direct heirs of the modern idea of progress. They present the dawning of a technological Millennium, but they also share a long history dating back into medieval Christendom. In the early Church, technology, or

the "mechanical arts," was never considered as a means to salvation or Edenic restoration. Historian David Noble argues that from Charlemagne to the early Early Modern period technology became associated with transcendence as the means of restoring the lost divine image or *imago dei*.{16}

Theologian Ernst Benz argues similarly that the Modern technological project was founded on a theological notion in which humanity believed itself to be the fellow worker with God in establishing His kingdom on earth through reversing the effects of the Fall.{17} We are fellow workers with God; however, this position overemphasized humanity's role in restoration to the point of becoming a works—based salvation of creation.

Despite the apparent secularity of the super science behind all the technological wonders of our time, the notions of modern progress and transhumanism remain grounded in an aberrant form of Christian theology. Noble summarizes this well when he states, "For modern technology and modern faith are neither complements nor opposites, nor do they represent succeeding stages of human development. They are merged, and always have been, the technological enterprise being, at the same time, an essentially religious endeavor."{18} The theology behind Modern technological progress remains rooted in Medieval and Early Modern notions of earthly redemption when the "useful arts,"{19} which ranged anywhere from improved agricultural methods to windmills, were invested with redemptive qualities and humanity began to assume an elevated status over nature. "In theological terms, this exalted stance vis-à-vis nature represented a forceful reassertion of an early core Christian belief in the possibility of mankind's recovery of its original God—likeness, the 'image—likeness of man to God' from Genesis (1:26), which had been impaired by sin and forfeited with the Fall."{20} Technology becomes the means of restoring the original divine image. Technological development was expected to reverse the effects of the Fall

and restore original perfection. This theology also serves as the impetus behind Millennial thought which believes technology helps humanity recover from the Fall and leads to an earthly paradise. Transhumanism extends this Millennial belief into the twenty-first century.

Redeeming Technology

We are faced with the problem of how to redeem all the advances of technology such as human enhancement without losing ourselves in the process. Idolatry preoccupies our central concern with technology. Biblically speaking, idolatry exalts the work of humanity, including individual human beings, over God; we commit idolatry when we serve the creature rather than the Creator. "Professing to be wise, [we] became fools, and exchanged the glory of the incorruptible God for an image in the form of corruptible man and of birds and four-footed animals and crawling creatures" (Rom. 1:22-23). Theologian Paul Tillich offers a keen and insightful definition of idolatry when he states, "Idolatry is the elevation of a preliminary concern to ultimacy. Something essentially partial is boosted into universality, and something essentially finite is given infinite existence."{21} Transhumanism presents us with a spiritualization of technology believed to grant us immortality through shedding our bodies and adopting machine ones or through genetic engineering that will prolong bodily life indefinitely. Our Modern age defines technology as a source of material redemption by placing finite technical means into a divine position, thus committing idolatry.

In seeking to reconcile technology with a biblical theology we have three possible approaches. *Technophobia* represents the first position. This view contends that we should fear technological innovation and attempt to destroy it. The Unabomber Manifesto offers the most radical, pessimistic and violent expression of this position, arguing for a violent

attack against the elites of technological civilization such as computer scientists in an effort to return society to primitive and natural conditions in hopes of escaping the kind of future transhumanists expect.{22} However, the entire tenor of our times moves in the opposite direction, that of *technophilism*, or the inordinate love for technology. Transhumanism optimistically believes that through technological innovation we will restore our God-like image. A third position asserts a mediating role between over-zealous optimism and radical morose pessimism. {23}

Technocriticism

Technocriticism offers the only viable theological position. By understanding technology as a modern form of idolatry we are able to place it in a proper perspective. Technocriticism does not accept the advances of innovation and all the benefits new technology offers without critical dialogue and reflection. Technocriticism warns us that with every new invention a price must be paid. Progress is not free. With the invention of the automobile came air pollution, traffic and accidents. Computers make data more accessible, but we also suffer from information overload and a free-flow of harmful material. Cell phones enhance communication, but also operate as an electric leash, making inaccessibility virtually impossible. Examples of the negative effects of any technology can be multiplied if we cared enough to think through all the implications of progress. Technocriticism does not allow us the luxury of remaining blissfully unaware of the possible negative consequences and limitations of new inventions. This approach is essential because it demonstrates the fallibility of all technological progress and removes its divine status.

Technocriticism humanizes technology. We assert nothing more than the idea that technology expresses human nature. Technology is us! Technology suffers the same faults and failures that plague human nature. Technology is not a means

of restoring our lost divine image or reasserting our rightful place over nature. This amounts to a works—based salvation and leads to dangerous utopian and millennial delusions that amount to one group imposing its grandiose vision of the perfect society on the rest. Such ideologies include Marxism, Technological Utopianism and now Transhumanism. We are restored to the divine "image of His Son" by grace through faith alone (Rom. 8:29). Technology, serving as an extension of ourselves, means that what we create will bear our likeness, both as the image-bearers of God and in sinful human identity. It contains both positive and negative consequences that only patient wisdom can sort through.

Through criticism we limit the hold technology has on our minds and free ourselves from its demands. We use technology but do not ascribe salvific powers of redemption to it. A critical approach becomes even more crucial the further we advance in the fields of genetic engineering and AI. We do not know where these fields will lead and an uncritical approach that accepts them simply because it is possible to do so appears dangerous. We live under the delusion that technology frees us, but as Lewis warns, "At the moment, then, of Man's victory over Nature, we find the whole human race subjected to some individual men, and those individuals subjected to that in themselves which is purely 'natural'—to their irrational impulses."{24} The famous science—fiction writer Frank Herbert echoes Lewis's sentiments in his epic novel *Dune*: "Once men turned their thinking over to machines in the hope that this would set them free. But that only permitted other men with machines to enslave them."{25} Genetic engineering or merging humanity with AI only exchanges one condition for another. We will not reach the glorified condition transhumanists anticipate. A responsible critical approach will ask, Into whose image are we transforming?

Notes

1. C. S. Lewis, *The Abolition of Man* (New York: Macmillan,

1947), 77.

2. Ibid., 86.

3. Lewis, of course, did not originate this ancient Chinese concept but rather applied it to universally accessible principles.

4. Ibid., 56.

5. Ibid., 72

6. See *Darwin's Racists: Yesterday, Today and Tomorrow* by Sharon Sebastian and Raymond G. Bohlin, Ph.D. Though the German Nazis acted out this hideous ideology to an extreme, eugenics was actually first promulgated in the United States, Germany and Scandinavia around the turn of the 20th Century.

7. Lewis, *The Abolition of Man*, 71.

8. See Dr. Ray Bohlin's article PBS Evolution Series, especially the section entitled "'Great Transformations' and 'Extinction'."

9. Gregory Stock, *Metaman: The Merging of Humans and Machines into a Global Superorganism* (New York: Simon and Schuster, 1993), 165.

10. Ibid., 20.

11. Ibid., 228.

12. Ibid., 231.

13. Ray Kurzweil, *The Singularity is Near* (New York: Penguin, 2005).

14. Ibid., 9.

15. David Gregory, *The Last Christian*, (Colorado Springs: Waterbrook Press, 2010), 102.

16. David F. Noble, *The Religion of Technology* (New York: Knopf, 1997), 9.

17. Ernst Benz, *Evolution and Christian Hope: Man's Concept of the Future from Early Fathers to Teilhard de Chardin* trans., Heinz G. Frank (New York: Doubleday, 1966), 124-125.

18. Noble, *The Religion of Technology*, 4, 5.

19. Ibid.,14.

20. Ibid.

21. Paul Tillich, *Systematic Theology: Reason and Revelation Being and God*, Vol. 1 (Chicago: University of Chicago Press,

1951), 13.

22. FC, *The Unabomber Manifesto: Industrial Society and Its Future* (Berkeley, CA: Jolly Roger Press, 1995).

23. See Neil Postman, *Technopoly: The Surrender of Culture to Technology* (New York: Knopf, 1992), 5.

24. Lewis, *The Abolition of Man*, 79, 80.

25. Frank Herbert, *Dune* (New York: Ace, 1965), 11.