BODIES IN AND OUT OF INFORMATION:  
CONSUMPTION AND LIFE IN THE VIRTUAL

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This thesis seeks to articulate how subjectivity is produced by particular interfaces of technology and the body. How technology affects the body and a person's sense of self is inherently tied to the value system deploying it. The Playstation 4, for instance, invites its users to think of themselves as some kind of gamer, a label bound to its simultaneous function of consumer. The value interfacing with the Playstation 4 serves is consumption, a practice valuable from the perspective of free market societies. Identifying the perspective built into a technology's interface and utilization is essential because it is that perspective which may come to define the human user. This thesis examines how perspectives of evaluation are built into technology in two chapters. The first is the Playstation 4, with a user interface that gives the gamer more access to the game and gives the game more access to its consumer. The second is Iain M. Banks's science fiction novel *Surface Detail*. The pairing of these two chapters is intended to give a diverse, albeit intuitive, examination of texts where the interface of the body and technology is a major point of focus. The argument throughout takes a posthumanist perspective, attempting to show that subjectivity is produced by a person's relation with technology and social practices instead of an individual's cognition alone. The introduction begins with a brief discussion of prosthetics as a way in to the question of technology and the body, and ends with a definition of "posthuman subjectivity." The readings of the texts produce a somewhat surprising conclusion: that the Playstation 4 does more to stretch the boundaries of subjectivity than the text of Banks's novel, just going to show that the posthuman is not what comes after the human, but a condition of being human.
For Gloria, for being so supportive along the way.
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INTRODUCTION: POSTHUMAN SUBJECTIVITY

If one were to ask: “What is the effect of technology on the body?” the response would likely come in the form of another question, or series of questions: “What technology? Whose body? How is this body defined?” Another possible question, one which this thesis is concerned with, is: “What social and political value is deployed by this technology?” This question stakes out a more precise beginning for this thesis by privileging a particular element of the interaction of bodies and technology.

The two central focuses of this thesis are the interface of technology and the body and the social or political value driving that interface. In order to understand the effect of technology on the body, the question of value needs a clear definition. Gilles Deleuze puts forth a useful definition in *Nietzsche and Philosophy* that highlights the dual meaning implied by the notion of a cultural value: "On the one hand, values appear or are given as principles: and evaluation presupposes values on the basis on which phenomena are appraised. But, on the other hand and more profoundly, it is values which presuppose evaluations, 'perspectives of appraisal', from which their own value is derived." (1). "Value" serves as a notion or principle according to which bodies, technologies, or the effects of their interface may be evaluated. Evaluation is only possible if there is a value according to which something may be evaluated. On the other hand though, this value which fosters evaluation can only have this position of power if it has already been evaluated. For Deleuze the question at stake is "that of the value of certain values, of the evaluation from which their value arises" (1). This thesis focuses on the narrower side of Deleuze's distinction. Values are here conceived as 'perspectives of appraisal' not of 'values' origin, but of bodies, as acts of evaluation which presuppose a value in a position of cultural
power that determines the social or political worth or utility of bodies and the product of bodies' interface with technology.

The value from which evaluation manifests may be both quantitative and qualitative. For instance, the body of a consumer is qualitatively valuable in that it participates in consumption in general, but quantitatively valuable in how much monetary profit it may generate. In a political environment, political subjects are bodies subjected to evaluation according to their participation in the political system's norms. Considering the current situation in the United States, some bodies are qualitatively valuable as voters which maintain the democratic system, while others are quantitatively valuable as political donors whose monetary contributions maintain the oligarchic slant of the system. This thesis argues that the operations of political and social institutions evaluate bodies on their ability to reproduce the value from which they are evaluated, to act out behavior which lives up to a standard set by a perspective of appraisal. It is not the case that a political entity with supreme agency forcibly controls bodies within its domain; instead, the value from which institutions evaluate their own behavior and interactions with their subjects finds itself reproduced by tendencies of behavior carried out where its perspective of appraisal holds sway. This thesis does not seek to answer the broader philosophical question of how particular values have attained such authority; rather, it seeks to interrogate the effects of evaluations presupposing established values by observing tendencies of behavior at the interface of the body and technology.

One simple way to approach the question about the interaction between the body and technology is to look at prosthetics. Prosthetics are typically, but not always, conceived of as a technology that is outside the body but closely interacts with it. The values at play within the realm of prosthetics are often those of the medical establishment. In "A Leg to Stand On:
Prosthetics, Metaphor, and Materiality” Vivian Sobchack names the primary value at play here as a sense of “wholeness,” saying: "the prosthetic and its technological interface with the body is predicated on a naturalized sense of the body's previous and privileged 'wholeness'" (22). If medicine is devoted to healing sick bodies or enforcing a type of “normality,” then utilizing prosthetics to return damaged bodies to a state of wholeness is in line with its apparent value systems. This wholeness serves as the value motivating appraisals of the body and is accomplished by replacing something taken away, such as a limb. This notion of replacement is not the limit when considering prosthetics though. As Marquard Smith and Joanne Morra note in their introduction to *The Prosthetic Impulse*, in the “earliest instances in the discourses of grammar and of medicine, *prosthesis* offers itself up as ‘addition’ or a ‘replacement,’ and it is usually this dual meaning that persists to this day” (2). The technologies discussed in this essay interact with bodies to influence or add some element or value to human interaction and behavior. Although prosthetics are not the focus, the close coupling of body and technology persists throughout.

The technologies I will consider are the Playstation 4, announced on February 20, 2013, and released to consumers in November of the same year, and technologies deployed by various political apparatuses in Iain M. Banks’s novel *Surface Detail*, a part of a series on a futurist utopia known as “the Culture.” As prosthetics are designed to create a sense of wholeness from a visual and sensory perspective, so free market societies and political institutions deploy technologies to incorporate bodies to further the value of consumption. These technologies often do not interact with the body as closely as a prosthetic limb, but they may still serve as replacements of a type. For instance, the Playstation 4’s investment in social media and online interaction between gamers serves as a replacement for in-person interaction. This technology is
offered as a replacement for in-person interaction because the acts of purchasing the console and participating in social media are what is economically and socially valuable, not the interaction itself. This brings back the question of which value benefits from the interaction of technology and the human. The market value of profit is certainly at stake when it comes to the purchase and use of consumer technology, as well as the more nebulously defined value of one’s appearance on social media.

This essay considers the experience of bodies interacting with technologies that embody particular values to understand the subjectivity that is produced by this interaction. This is in line with Smith and Morra’s aspiration for The Prosthetic Impulse where the essays seek to investigate “the points at which modernity has brought the modern subject and technology (in its broadest sense) into contact with one another and to what ends” (4). This question of “to what ends” becomes more important as the points of contact become more and more pervasive as well as more and more invasive. Just as prosthetics make some "whole" according to a certain "perspective of appraisal," so consumer and political technologies seek to produce subjects living up to a particular standard of evaluation. Saying that bodies come into contact with technology is no longer appropriate for the market driven first world; rather, bodies are integrated into social and political spaces where the defining values of the social and political are built into the technologies that surround, inform, penetrate, and manipulate them on an almost constant basis.

The two chapters of this thesis are divided according the type of technology and text at focus. “Ease of Access: Intersubjective Relations and Consumption in the Playstation 4 Ecosystem” focuses on the influence of consumerist and social values at play when interacting with the virtual environment of the Playstation 4 ecosystem. The text that is analyzed here is the series of speeches made by various game and console developers at Sony's announcement of the
Playstation 4. Press conferences or announcements for new technology, often seen with new tablet or phone releases, serve as a valuable opportunity to see how the producer wishes the technology to be used by the consumers. Such announcements serve not only as an opportunity to persuade consumers to buy the technology, but more importantly, to persuade them to interface with it in a particular way. The Playstation 4 announcement heavily features cooperative gameplay, but not within the realm of multiplayer, where game levels are specifically designed for multiple gamers corresponding to multiple in-game character. Rather, cooperation is promoted in the context of single player gameplay where outside consumers may interact with a friend’s single player game. Since online multiplayer was popularized with the growth of widespread internet access video games have been going through a noticeable shift toward multiplayer and cooperative gameplay. However, this has typically been presented as an element of individual games that is merely made possible by the console, not a direct feature of the console itself. The most notable design achievement with the Playstation 4 is the ability to take over someone else’s game through the Playstation Network, in order to solve a puzzle or complete a challenging level. The result of this new design emphasis for the console as a whole is a new experience of subject/object relations within the Playstation 4 ecosystem, where subjects are sometimes subjects that are also objects to be consumed.

Interacting with other consumer's single player games over the Playstation Network offers a change in kind for online gameplay, as well as for pathways of consumer access. Being able to interfere with the previously direct relation between the individual consumer and their in-game avatar provides not only more access to consumers, but new access. This should not be understood as a paradigm where all games are prone to unexpected takeover. People must be "friends" on the Playstation Network, similar to Facebook, in order to take over a friend's game,
and must be invited to do so, keeping much agency within the realm of the original gamer to in-game avatar paradigm. The apparent goal of the Playstation 4's new pathways of access is to make the gamer comfortable with such a distributed form of agency within the gaming ecosystem. The Playstation 4 produces a particular type of subjectivity in its consumer, here called intersubjectivity, by the maintenance of a certain lifestyle.

The second chapter, "Souls in the System: Souls as Political Constructs in Iain M. Banks's *Surface Detail,*" focuses on the production of souls as the result of a value operating within political systems in Iain M. Banks's novel *Surface Detail.* Starting with Foucault's notion that the soul is a product of technology's interface with the body, this chapter argues that the soul is not necessarily descriptive of the body's identity, but rather describes what is valuable about the body to the political system which incorporates the body into its operations. The political systems the novel focuses on are a capitalist society that uses a form of slavery where children are tattooed and indentured as a result of unpaid debts, a “Hell” created in a virtual reality, and the utopian Culture. This chapter engages with Foucault's notion of biopolitics and argues that souls are a by-product of an individual body's integration into a political system and the regulation of the species body overall. The soul is a reference to the space within that system occupied by a particular body, but does not necessarily describe any personal aspect of identity. Souls are attributed to bodies by the systems they participate in, but this attribution is a result of the practices and values of the system in general, not just the moment of interface between body and technology.

This pairing of a publicly available consumer technology and a science fiction novel serves to offer a comparative analysis of different instances where the coupling of the body and technology will be a point of major focus. A major distinction between the chapters is the
difference in particular values at play. The presence of consumerist values in contemporary culture is plain to see, while the values at play in Surface Detail are debt and suffering. Although set in the context of a science fiction novel, these values stem from capitalist and religious practices and are therefore not particularly foreign. While this essay makes an argument about a facet of contemporary culture, the gaming console, it's goal is not to present a reading of the contemporary moment. Rather, by analyzing the values integrating humanity and technology in various circumstances, it hopes to articulate how subjectivity is a result of particular values occupying the moment of interface. As technology becomes more and more integrated into everyday life, people become more and more integrated into the values that deploy that technology. These values define the human component differently than the human component may define itself. Thus the question of whose or what values technology serves offers a snapshot of where the developed world stands today and a possibility of where it may go, depending on the rapidly evolving form of technology and what values continue to influence its growth.

The field of critical theory which this thesis draws is posthumanism. Although growing in popularity, posthumanism has several definitions and different perspectives. To begin with, the "post" is somewhat elusive in meaning, as is the term humanism. There are several strands of humanism, and this "post" could refer to a chronological shift, where identifying a point in time where the line was crossed would be difficult, or it could refer to a shift in a way of thinking, where the challenge of identifying a meaningful line separating the "post" from whatever it was that came before would once again be difficult to satisfy. As such, a definition of posthuman or posthumanism is unlikely to be exhaustive, but it could perhaps be most simply put as the condition of being or a theoretical perspective that challenges the notion of "I think, therefore I am." By privileging cognition over embodiment as the guarantor of human identity this humanist
perspective creates a myth of the autonomous consciousness operating without bodily constraints. In *What is Posthumanism?* Cary Wolfe argues that this humanist configuration of "the human' is achieved by escaping or repressing not just its animal origins in nature, the biological and the evolutionary, but more generally by transcending the bonds of materiality and embodiment altogether" (xv). By privileging cognition and rejecting embodiment's importance this strand of humanism makes it possible to disembody consciousness while retaining some notion of that consciousness's essence, whatever that may be. This myth has been embraced by much of science fiction and work in cybernetics. Such embrace of disembodiment is the subject of Katherine Hayles's book *How We Became Posthuman* where she seeks to challenge this myth by articulating how consciousness must change along with its shift in substrates.

According to Hayles, the posthumanist perspective conceives of "information as a (disembodied) entity that can flow between carbon-based organic components and silicon-based electric components to make protein and silicon operate as a single system. When information loses its body, equating humans and computers is especially easy, for the materiality in which the thinking mind is instantiated appears incidental to its essential nature" (2). This equation of humans and computers becomes especially easy because a human act of cognition is perceived as an object engaged in computation and information processing. If the consciousness originating from the thinking brain is merely information, there is nothing to oppose that consciousness's movement into a different substrate. Hayles elaborates that the posthuman is "a point of view" that "privileges informational pattern over material instantiation, so that embodiment in a biological substrate is seen as an accident of history rather than an inevitability of life" (2). It "considers consciousness, regarded as the seat of human identity in the Western tradition...as an epiphenomenon, as an evolutionary upstart trying to claim that it is the whole show when in
actuality it is only a minor sideshow" (2-3). As a result, posthumanism "configures human being so that it can be seamlessly articulated with intelligent machines" (3). The body is merely "the original prosthesis" where life and cognition happen to have become self-aware (3). Hayles attempts to challenge this myth of seamless integration while articulating a perspective "that embraces the possibilities of information technologies without being seduced by fantasies of unlimited power and disembodied immortality, that recognizes and celebrates finitude as a condition of human being, and that understands human life is embedded in a material world of great complexity" (5). Such fantasies of immortality are contingent on consciousness and a particular method of cognition surviving transfer from the human body to computer substrates, a notion which Hayles attempts to challenge with her own argument.

Despite Hayles's attempts to avoid such fantasies of the posthuman, Wolfe argues that "the net effect and critical ground tone of her book, as many have noted, are to associate the posthuman with a kind of triumphant disembodiment. Hayles's use of the term, in other words, tends to oppose embodiment and the posthuman" (xv). This opposition perhaps results from the fact that the notion that consciousness can be retained as a pattern of information is discussed throughout Hayles's book. As Hayles herself notes: "Information viewed as pattern and not tied to a particular instantiation is information free to travel across time and space" (13). This freedom of movement for consciousness or subjectivity challenges embodiment's influence on the contested figure of the human rather than challenging cognition as the seat of human identity. Wolfe situates his perspective in a way that continues to make the term "posthuman" both more and less clear. Wolfe identifies his perspective not as posthuman, but as "posthumanist, in the sense that it opposes the fantasies of disembodiment and autonomy, inherited from humanism itself" (xv). While Wolfe makes it clear that he is particularly invested in challenging myths of
disembodiment, he describes his perspective as *posthumanist* instead of posthuman, perhaps because the *ist* articulates a perspective of evaluation rather than a celebration of possibility. Either way, the variability of the term continues to insist upon itself between different texts and arguments.

Wolfe persuasively argues that posthumanism has two functions making it "analogous to Jean-Francois Lyotard's paradoxical rendering of the postmodern: it comes both before and after" (xv). Posthumanism comes before humanism "in the sense that it names the embodiment and embeddedness of the human being in not just its biological but also its technological world," and comes after "in the sense that posthumanism names a historical moment in which the decentering of the human by its imbrication in technical, medical, informatic, and economic networks is increasingly impossible to ignore, a historical development that points toward the necessity of new theoretical paradigms (but also thrusts them upon us)" (xv-xvi). What is largely at stake for a posthumanist perspective is the question of where agency lies in the configuration of the human body and the world around it.

If cognition is a by-product of embodiment and behavior is a result of a body's relationship with other bodies, rather than the body's own will, then agency can hardly be ascribed to the thinking, individual human. While an individual is not entirely without agency, posthumanism sees agency as more often distributed between the technologies of culture surrounding a body than entirely within it. A human may think and be, but both of these conditions are emergent phenomena. Posthumanism then, for all of its different perspectives and its mysterious name, takes up what is a rather familiar task: to show how it is the world that made the human and not vice-versa. Culture's influence over the body and behavior through the establishment of values such as "normal," "whole," or "good and evil" have always influenced
the thinking and behavior of bodies. In this way, subjectivity has always been heterogeneous, always defined by different bodies and outside technologies. Posthumanism does not come after the human, it is merely a way of thinking about the human in the world, something which makes the "post" all the more perplexing as a name.

The posthuman methodological challenge within the context of this thesis is to identify how that which does lack a body influences that which does. The social and political value which motivates the operations of cultural institutions is not a pattern of information that maintains itself while being transmitted among bodies and cultural apparatuses, however its persistent presence amongst bodily and institutional behavior indicates that it is not limited to a particular instantiation. While considering consciousness as a disembodied pattern of information may be a fantasy, information that is free to move across time and space serves as a useful metaphor for a value which consistently presents itself in the interactions of different embodied subjects and objects. Such a consistent presentation of a value is made possible by how bodies and apparatuses are arranged in relation to one another and to the social or political system overall.

The "posthumanist" theory this essay engages with most substantially is the work of Michel Serres. Serres's texts *The Parasite* and *The Five Senses* contribute an important focus on how the arrangement of bodies and apparatuses creates particular constellations of power which reproduce the presence of a particular value. Serres identifies the parasite as something which situates itself next to communicating bodies to manipulate how they relate to one another, thereby asserting control over their operations. This parasite does not need to be an acting or cognating subject, but can also be a particularly important object. Serres calls such an object which is capable of manipulating subjectivity the "quasi-object." In the context of the first chapter, Serres's work is utilized to articulate how technology occupies such unexpectedly
privileged positions. The Playstation 4 places itself between consumers to influence their interactions and behavior. Although it is the object of their consumption, it is more than that, it establishes a relation with the consumers' relationship, putting itself in a position to manipulate the overall system composed of their interactions, referred to as the Playstation 4 ecosystem in the release announcement. A major focus in the first chapter is to articulate how Serres's theory of the quasi-object plays out through the medium of information technology.

The second chapter draws on *The Five Senses* to articulate how bodies reproduce the presence of a particular value within a political system. Following the distinction between bodies and information, Serres distinguishes between "hard" and "soft." The effect of this distinction is to demonstrate how soft information, here thought of as a metaphor for particular political values, influences the arrangement of that which is hard, the bodies and apparatuses constituting the space of a political system. Where the first chapter emphasizes embodiment as an influence over subjectivity, the second chapter takes a wider perspective to show how bodies are often subjected to the circumstances of their culture instead of bodies being subjects capable of effecting their own circumstance. The soul then, is a designation of the body's ideal relation to other bodies and political structures, it is a nominalization place and political utility, not an indication of some subjective essence. Subjectivity is not produced from an autonomous act of cognition, rather it emerges from the heterogeneous embodiment produced by a body deeply embedded in its cultural circumstances.

In “On the Subject of Neural and Sensory Prostheses” Lisa Cartwright and Brian Goldfarb provide two useful terms for the discussion of heterogeneous subjectivity: inter and intrasubjectivity. Although they do not provide specific definitions of these terms, their meaning can be drawn out through the prefixes, "intra" and "inter," as well as Cartwright and Goldfarb's
use of the terms. "Intra," a term designating that which is within, may seem somewhat redundant in the context of "subjectivity" since the subject is typically conceived of as a single person. However, the term is helpful because it denotes that the individual subject has a relationship with its embodied form, and that various aspects of this body may relate to one another in mutable and changing ways. "Inter," on the other hand, refers to something that exists between at least two bodies. In the case of "intersubjectivity," it refers to a sense of self that is conspicuously produced by a person's relationship with something outside of it. These terms take on a complex relation in the context of Cartwright and Goldfarb's article. Since their goal is to "trace power in its multiple and dispersed functions and investigate its effects in producing new forms of subjectivity" in the context of neural prosthetics, they must simultaneously deal with both intra and intersubjectivity (138). For instance, if a blind person were given a neural prosthetic to give them sight, it could take the form of "an electrode array that is implanted in the visual cortex" of the brain that receives information from a small, external camera that could be attached to a pair of eye glasses (142-3). In this case, a person's sensory perception is influenced by a relationship to an object outside of their body, an intersubjective relationship. However, since the person experiences it as their experience, as their sense of vision, then the prosthetic is "incorporated not 'into' or 'on' but 'as' the subject," as Sobchack puts it (22). This constitutes a relationship with that which is part of, or within, the self, an intrasubjective relationship.

This distinction, while helpful in examining the body and a subject's external relationships, represents a somewhat arbitrary boundary drawn around the body. "Incorporation," as an act, brings something which is outside in, so if technology is incorporated into an intrasubjective sense of self, then that intrasubjectivity cannot help but be intersubjective. Technology, especially prosthetics, serves as a way in to an individual's sense of self. This "way
in" to subjectivity often functions by a conceptual integration. For instance, if a person considers their profile on social media or character in a game a part of their "self," then their intrasubjectivity is defined by an intersubjective relation with a representation made to serve interests other than their own. If a person considers their status in the eyes of a political system a part of their self, then they are defined by an intersubjective relationship with a system that likely defines them according to some type of use or productivity value which the person may consider secondary to their own evaluation of their self. The closer humans get to technology, the closer the value at play within that technology gets to defining the experience of being human.

While defining posthumanism is quite challenging, and the explanation offered here should not be thought of as exhaustive, but rather an explanation appropriate for this essay, the intersection of inter- and intrasubjectivity offers an opportunity to define posthuman subjectivity. *A posthuman subjectivity is that which conspicuously possesses both inter and intrasubjective elements; although the various parts producing the subject may be generally integrated as an intrasubjectivity, that intrasubjectivity is contingent on the transmission of information between components of its self that are either not within the subject’s autonomous control, or the arrangement of the components is formed in relation to an outside social or political value.*

Acknowledging the heterogeneity of subjectivity, the influence of embodiment on cognition, and the influence of social and political value on embodiment, undermines the agency placed within the allegedly autonomous subject who wants to believe "I think, therefore I am."
CHAPTER I. EASE OF ACCESS: INTERSUBJECTIVE RELATIONS AND CONSUMPTION IN THE PLAYSTATION 4 ECOSYSTEM

On February 20th, 2013 Sony announced the release of their new video game console, the Playstation 4. The release announcement came in the form of a two hour conference featuring presentations by Andrew House, the Group CEO of Sony Computer Entertainment; Mark Cerny, the Lead System Architect on the PS4; and Dave Perry, game developer and co-founder of a cloud-based gaming service called Gaikai. During the conference the speakers focused on several of the Playstation 4's design innovations such as the ability to play games while they are being downloaded, a touch screen interface on the controller, the ability to record or stream gameplay, and the most noteworthy change, the ability for gamers to allow friends to take over their game over the internet. As part of a long line of video game consoles, the Playstation 4 is a particularly powerful and expensive piece of consumer technology. While it continues some traditions of the Playstation 3, such as streaming gameplay to handheld devices, the Playstation 4's design innovations present many new possibilities for video games and indicate a new level of information technology that is widely available to consumers.

The Playstation 4 announcement is a sales pitch; its purpose is to entice consumers and persuade them to interface with the new console in a particular way. Not only is the Playstation 4 meant to be purchased, it is designed to engender the fastest acquisition and consumption of games possible. The Playstation 4 subsequently encourages a new type of relation between the gamer and the console, as well as between gamers interacting over the internet. A game that can be played while downloading is immediately accessible; integration with social media makes the Playstation Network ever more present, and the consumer's presence ever more dispersed.

Information technology should not be dissociated from the cultural circumstances within which it manifests. The Playstation 4 is a product of Western market driven capitalism. It is a
part of what Zygmunt Bauman has called "the society of consumers," which "(to recall the once popular term coined by Louis Althusser) 'interpellates' its members (that is, addresses them, hails, calls out to, appeals to, questions, but also interrupts and 'breaks in upon' them) primarily in their capacity of consumers" (Bauman 52). The Playstation 4 interpellates consumers by bringing forth a particular type of subjectivity for the gamer, a subjectivity that is both produced by and comfortable with the design innovations featured in the console's announcement speech. Andrew House discusses how Sony has made an effort to utilize the powerful information technologies now available to appease the gamer, saying: "While our Sony heritage has long been defined by superb engineering and technology unleashed by a powerful hardware, we also knew success relied not only on a package of next generation technologies, but on reconceptualizing how the next generation gamer would want to play. While we once had changed the gaming landscape, now the consumer was changing us." The point of the design innovations found in the Playstation 4 is to change not only how the consumer plays video games, but to change the consumer into Sony's ideal conception of a gamer. By interfacing with "a package of next generation technologies" the consumer cannot help but be changed. The design innovations of the Playstation 4 restructure previously stable boundaries of gaming, and in the process restructure the subject playing the game. Within a game, stable boundaries indicate a stable sense of self and autonomy. The Playstation 4 seeks to rearticulate consumers' boundaries in order to augment their capacity as consumers. Opening up the boundary of single player game play to public viewing and possible interference undermines the stability of the relation between the body and the in-game avatar that produces the consumer's subjectivity. With the loss of a stable construction of subjectivity comes more access, more access for more consumers to the object to be consumed.
Much of House's speech is devoted to presenting a narrative of access. House declares that Sony has not just developed a console, but a widely accessible ecosystem for new experiences of gaming:

Ease of access regardless of location or device has been an absolute priority. With mobility and the ability to share content and experiences becoming an increasingly important part of the gaming experience, connectivity between devices, and the ease with which they connect has been essential to meeting the demands of today's casual or core gamer.

When House refers to "ease of access" he speaks of the gamer having more access to the product. He neglects to say that the object of consumption also has more access to the consumer. The object's new access to the consumer is just as, if not more, important to the production of an ideal gamer or subjectivity as the consumer's access to the product. As Katherine Hayles notes in *How We Became Posthuman*, when dealing with information "the constraining factor separating the have from the have-not is not so much possession as access" (39). A gamer does not possess their in-game avatar so much as have access to it. By giving consumers more access to games, but also access to one another, the Playstation 4 creates a web of access where consumers become objects to be accessed by other consumers and the console becomes more than an object to be consumed, but a mediator organizing and articulating the relations between consumers.

While games have recently shifted to emphasize multiplayer interaction, where multiple consumers control multiple characters, the Playstation 4 uses these new pathways of access to integrate multiple consumers into environments formerly designed for a one to one, consumer to object, relation.
When considering the relation of consumer and object of consumption it is necessary to consider the medium bringing the two into contact. For console gaming, this relation is the transmission of information from the controller to the game. Changes to the practice of gaming happen not only in the material relations of the console and consumer, but also in the virtual environment of the game itself. A virtual environment, defined by Ken Hillis in *Digital Sensations*, is an "interactive communications environment...[effecting] a changing perception of our embodied relationship with the world" and has the potential to "remap or collapse the modern experiential 'distance' between subject and object, technology and social relations" (xx). Such collapses or re-mappings are possible because virtual environments create "representational spaces that propose particular spatial illusions or fantasies" (xv). Video games are contingent on consumers buying into the spatial fantasy they propose. Part of this fantasy is the ability to control an in-game character as they move through the game's environment. The stability of the control that gamers have over in-game characters and the clear boundaries of single player campaign (or storyline) play have been instrumental to the construction of the relation between consumer and object of consumption; however, the Playstation 4 offers new pathways of access that defy these boundaries, distributing agency outside familiar barriers.

The Playstation 4 disarticulates boundaries and engenders new access with two particular design innovations. The first is the ability to interact with someone else's single player game either by taking control of their character or dropping items into their game. Before now, crossing the boundary into a single player game from outside the immediate gamer-controller-console pathway was simply not possible. The possibility of such outside interference introduces a new intersubjective relation into the previously stable communication between gamer and in-game character. The second design innovation is the ability to view friends' games live over the
internet. This means that a consumer can see what purchases their friends make and instantly purchase the same game to join in. This access is noteworthy because it conditions consumers to identify one another primarily by the objects they have consumed, that is, by the games they have purchased. When articulating the changes in subjectivity produced by these new relations Michel Serres's theories of "the parasite" and the "quasi-object" from *The Parasite* are particularly insightful. By introducing outside interference into previously stable relations of gamer to in-game character, the Playstation 4 destabilizes the possibility of individuality in such an open virtual environment. Furthermore, the Playstation 4 conditions consumers to identify one another by objects of consumption. This identification is based on the previously stable relationship between the consumer's body and their in-game avatar. The in-game representation is an alleged manifestation of a consumer's cognition and will. With this stability brought into question, the gamer may find that there is always another gamer lurking in the virtual environment with them, just waiting for an invitation to take over. Serres describes this possibility of interference as a parasite that is always waiting next to a subject. Often times invisible the parasite takes advantage of how the subject is situated in relation to surrounding objects. Within the Playstation 4 ecosystem it is not just gamers with newfound access to friends single player gameplay that are the parasites. The console itself takes advantages of the fact that these two consumers are "friends" and uses this relationship to accelerate consumption. The object of consumption determines its own interface and constructs the subjectivity of the consumer, or several consumers, an agency Serres identifies with the name "quasi-object" (225).

Reconstructing access in this way creates a sense of gaming that is unique to the Playstation 4 and alters the experience of gaming in general. This new access is a product of the "elite intentions that get transformed into technologies," which in turn transform the subjectivity
of consumers (Hillis 191). House speaks as if consumers themselves demanded these changes, saying: "The living room is no longer the center of the Playstation ecosystem, the gamer is. With the gamer as the focal point for our efforts, we've created a platform attuned to consumers changing behaviors and an evolving sense of play." This is somewhat misleading; the Playstation ecosystem affects "changing behaviors and an evolving sense of play" because prior to the Playstation 4's particular configuration of material and virtual relations there would be no space, cyber or material, to instantiate such changes. House's speech encourages gamers to change their behavior and sense of play in light of what is presented at the conference; the announcement of the console is essential to its success. The Playstation 4 ecosystem creates a virtual environment that generates new modes of access and new experiences of subject/object relations to create an experience of gaming where the consumer is redefined by Sony's conceptualization of the ideal gamer. Where a previously stable relationship between gamer and in-game avatar allowed the consumer to comfortably identify with their avatar, the instability stemming from the Playstation 4's pathways of access creates a new subjectivity that represents a difference, not in degree of technological integration, but in kind of subjectivity produced. The new consumer is a consumer that has been generated by a relationship where cognition and agency are not necessarily extended by technology, but conspicuously managed by the technology's investment in increasing consumption.

At this point, most computer hardware is capable of sustaining or surpassing the needs of casual users, so it is in the interest of the producers to deploy their choices of hardware and software most effectively. In practice, an emphasis on effective software and accessible user interface creates a more successful product. In order to grasp how important design is to
consumer technology it is necessary to consider Sony's competition during the previous
generation of the console war, Microsoft's Xbox 360.

In August 2010 IGN.com published a "Hardware Throwdown" comparing the PS3 and
the Xbox 360's hardware. Author Jesse Schedeen gives a thorough examination of the technical
capabilities of the hardware in each device in ten categories such as CPU (central processing
unit), GPU (graphics processing unit), hard drives, Networking, etc. Thanks to its apparently
superior hardware, the PS3 comes out on top in seven out of ten categories. However, Schedeen
notes: "the PS3 has more horsepower and support for a wider range of high resolution video and
audio. But despite being a year older, the Xbox remains surprisingly competitive in some areas."
This is reinforced by the fact that it took seven years for the PS3 to surpass the Xbox 360 in
worldwide sales. In January of 2013 Jay Alabaster of IDG New Service cited an IDC report
putting Playstation 3 sales at seventy seven million units worldwide, beating out the Xbox 360
by a mere one million. This close competition likely stems from a particular category that
Schedeen gives to the 360 in his comparisons: "Networking." Schedeen states that "When it
comes to Network capabilities, gamers need to ask themselves whether they intend to rely on a
wired ethernet connection or wireless." Although the PS3 does have wifi support and its Ethernet
connection is faster than the Xbox 360's wifi, Schedeen gives the category to the Xbox 360
because effective wifi matters more than effective hardwired Ethernet connections. In a world
where everything is wireless, careful design and software devoted to wireless social relations is
the most effective way to interpellate consumers.

Sony leadership has acknowledged some design issues with the Playstation 3 as well. In
an article on Edge-Online.com Daniel Robson cites an interview with Sony Worldwide Studios
president Shuhei Yoshida where he admits that "third parties had real trouble developing or
porting games [to the PS3], because (the system) was so different" and had very sparse RAM, a
component third party game developers tend to rely on. Yoshida explains that the Playstation 4
represents an effort to make a console that is both easy for third parties to make games for and
user-friendly. This need for effective design, something that gave the Xbox 360 great staying
power, likely led to such careful consideration of how the Playstation 4 deployed its hardware, to
the effect of altering how games are played. Although House reiterates that the gamer is
changing Playstation, the Playstation 4 deploys its hardware to rearticulate the consumer's
boundaries and relations when playing. These relations and boundaries, relations to in-game
characters and boundaries preventing outside access, are opened by the Playstation Network to
reflect the "ease of access" that House named as a goal for the design of the system.

The Playstation 4 ecosystem uses the consumer's relationship with their in-game avatar as
a channel to access their subjectivity. This is not the subjectivity of the individual embodied
consumer playing the game, but the subjectivity produced from that very channel, both material
and abstract, relating the consumer to their avatar. By changing the relations and making the
channel accessible to multiple consumers, the Playstation 4 makes the consumer herself more
accessible by the object of her consumption as well as other gamers. These changes are brought
about by three aspects of the Playstation 4 ecosystem's design: the wireless controller's reduction
of the embodied experience of gaming; the possibility for friends to observe or take over a
friend's game via the Network; and the ease with which the system can manipulate a consumer's
agency over their own in-game character, giving and taking away the ability to record gameplay
according to the game's design. The whole of these changes culminates in a gaming experience
that is never individual, but always relational and characterized by a distribution of agency
between consumers, a distribution mediated by the console and the design of individual games.
Within the Playstation 4 ecosystem subjectivity no longer describes the interiority or essence of a body or consumer; rather, it describes what is valuable about the consumer to the ecosystem in general: their participation in this newly distributed and accelerated consumption. With new pathways of access and new experiences of agency, the possibility of interference within previously stable boundaries creates a new kind of consumer.

Consider the progression of the physical setup of gaming consoles and their controllers. During the early 2000s when the Playstation 2 and Xbox were popular, controllers were attached to the console with a wire. As such, the player's body could only move so far or in certain ways when playing a game, making gaming a uniquely embodied experience. Then, with the Playstation 3 and Xbox 360, controllers became wireless and wifi was built into both systems, making consoles able to communicate with consumers regardless of position. Introducing wireless controllers into the relationship makes the presence of the body matter less. As information's ability to move increases, the gamer has more freedom to move around and doesn't have to think about his or her body in relation to the console. Wireless controllers also open up the player's connection with the console to outside interference. If two controllers are set to the same frequency then the in-game character will not be under the control of one person, but is more likely to run around the screen in a schizophrenic manner as the game receives commands from two controllers are once. The bodily perception of holding a controller no longer guarantees control. By disembodying the connection with the console producers leave room for an outside gamer to interfere in an ideally one-to-one relationship. Still, this is limited by proximity; controllers can only communicate with consoles nearby. However, with the advent of controlling in-game characters through the Network, such questions of space disappear as other gamers may always have access.
When discussing the design concept "Social Play" Mark Cerny, the Lead System Architect on the Playstation 4, explains how the Playstation 4 incorporates socializing into its ecosystem, stating: "Play is no longer an isolated pastime. Social play is so important to the Playstation 4 that we have added hardware to support it, in the form of dedicated, always on, compression and decompression systems." These compression and decompression systems make it easier to transmit information such as videos and live streams of gameplay. The reasoning for this, as Cerny puts it, is that the "hardware enhances visibility of gameplay. You can browse live game video of what your friends are doing at that exact moment, or spectate the gameplay of a famous person within your gaming universe." By offering up gameplay for observation the Playstation Network makes public what was once the last remaining private part of video games, single player campaign play. Playing alone is no longer an individual activity. Ken Hillis argues that "within virtual environments, pleasure and surveillance are in an as yet underacknowledged dialectical, and not oppositional, relationship" (xxxviii). Cerny certainly advocates for a sense of pleasure at being watched, hinting at the possibility of being a famous person in the gaming universe. The Playstation 4 moves away from mere "non-opposition," to creating a sense of accomplishment with being watched. Social interaction is constructed by its virtual environment to make the relation of gamer to in-game character accessible to those who have paid for it, by buying a console and by right of being "friends" on the Network.

By giving online "friends" the right to view other friends' games, the outside consumer is given an agency similar to the gaze. This outside friend still has to be invited though, or have their friend request accepted, so the consumer actually playing the game retains some measure of agency as well. Still, with viewing and the possibility of interference always possible, agency within the game becomes distributed by the console rather than a product of individual cognition.
Since the Playstation 4 distributes agency throughout the Network according to the design of specific games and the player's need, the distribution of agency is always fluctuating. The question of where does agency lie within the Playstation 4 ecosystem does not have a consistent answer. Agency becomes a product of a particular configuration of access at a certain time rather than a description of a particular consumer or subject.

Making single player campaign play an option for live streaming is a noteworthy technical feat, but it is not particularly astounding. Considering the progression of information technology in the past few years, consumer expectations for the Playstation 4 were high. The genuinely astounding moment comes when Cerny tells the audience: "You can even see that your friend is in trouble and reach out through the Network to take over the controller and assist them through some difficult portion of the game." While consumers were expecting the hardware of the Playstation 4 to be powerful, such design innovations present a strong appeal to Sony's consumers. It is not that Sony has presented a previously unseen technology, but that they have deployed it in a way that allows for such a strong connection between consumers that is so impressive. Even calling single player campaign play "public" becomes reductive; single player gameplay is accessible. As the limits of technology disappear so do the boundaries of the player.

With the Playstation 4 and the ability to control someone else's game, the controller sitting in the hands of Player A can control Player B's in-game persona, with no regard to physical location. All that is required is being "friends" on the network, similar to social media, and an internet connection. Contact with the controller is a key feature of the embodied experience of gaming. The feeling of the controller in the hand means that gamer can now reliably express agency and subjectivity in the game. This reliability comes from the allegedly direct relationship between the controller and the in-game character. If a gamer can give access
to their in-game avatar to another consumer, then their embodied experience of gaming becomes deceptive. Making individual play so variously accessible opens up the relationship of the gamer with their in-game avatar to a new experience of interference, or what Serres calls "the parasite."

The possibility of interference incorporates unreliability into the embodied experience of gaming, especially since it is a possibility built into the Network and no longer a mere controller glitch. In *The Parasite* Michel Serres focuses on how parasites interfere with allegedly one-to-one relationships in order to benefit. His primary example is a metaphor of rats stealing food from one another inside a large house. The image of rats eating refers to communication; when one rat eats a meal undisturbed it has successfully communicated a piece of information (Serres 6). However, other rats try to steal the food; "[to] parasite means to eat next to" (7). When a country rat comes in and steals food from a city rat, it introduces noise into the city rat's message, and the city rat may run away, its message unsent or garbled. An unexpected rat may always appear in the channel carrying the information. In the house, or the system, the owner may make noise to scare the rats away, or the rats may make noise to put themselves in a better spot in a highly excitable chain of relations. While Serres's figure of the rat may refer to the presence of noise in communication in general, it may be appropriated here to articulate the interference in the communication of agency from consumer to game.

Within Serres's paradigm of the parasite, interference is possible whenever there are "two interlocutors and the channel that attaches them to one another" (Serres 53). Wherever bodies and technology come into contact, an opportunity for interference by an outside party arises. The channel is what really controls the communication and the "parasite, nesting on the flow of the relation, is in third position" (53). The relation carries the message, but also bears the possibility that a hidden third agent, the parasite, will interfere. By maintaining a third position the parasite
is able to play, or perhaps prey, upon the "the position" of the other interlocutors (39). By preying upon the position of the other bodies and technology, the parasite manipulates how they relate to one another. Serres argues that to "play the position or to play the location is to dominate the relation. It is to have a relation only with the relation itself...And that is the meaning of the prefix *para-* in the word *parasite*: it is on the side, next to, shifted; it is not on the thing, but on its relation. It has relations they say, and makes a system of them" (38). Since this relation is always present, communicating between consumer and console, so is the possibility of the parasite, whether or not it makes itself heard. The consumer cannot play the game without the console, and the console, as the medium of relation, always has power over the information moving through it and makes a system of accelerated and distributed consumption. The gamer attempts to communicate with the in-game character via the controller, effectively consuming the game. However, as soon as the gamer connects to the game, as "soon as we are two, we are already three or four. We learned that a long time ago. In order to succeed, the dialogue needs an excluded third; our logic requires the same thing. Maybe they also require an included fourth" (57). When the two-way relationship cannot complete the consumption, the Playstation 4 ecosystem needs a previously excluded agent, the friend who has already completed the level, to do so again. Someone else must communicate the agency necessary to finish the consumption. Although this may not be necessary to complete a game, this design element's emphasis in the announcement indicates that developers may perceive it as optimal when creating games for the console, that games may be designed to encourage such intersubjective consumption. In this way, the Network motivates consumers to consume twice, by assisting in a game they have already chewed up and moved on from. The Network makes two gamers consume the same objects at once. Or at least, one gamer consumes the level while the other cannot look away. A
relationship of two has become a relationship of four, the game, the Network, the consumer who has arrived to eat, and the consumer watching. This quaternary relationship is hardly isolated, because one aspect of the chain of relations, the Network, also mediates, making all of the relations open to the viewing public.

For the sake of finishing a game, for consuming faster, the Playstation Network opens the relationship of embodied controller to in-game avatar to access from third and fourth party intrusion, undermining the reliability of the senses of touch and sight. The perception of holding a controller no longer implies control. Hayles argues that while "the body," as a construct, "can disappear into information with scarcely a murmur of protest, embodiment cannot, for it is tied to the circumstances of the occasion and the person" (197-8). However, by making relations so open to interference the Playstation Network destabilizes the certainty of embodied awareness. The controller no longer provides access to the game. Instead, it gives the Network access to embodiment, if only in order to undermine it.

The Network also gives outside players access to the environment of a game without directly interfering with the controller/in-game relationship. Dave Perry, game developer and co-founder of a cloud-based gaming service called Gaikai, explains during his presentation that the Playstation Network gives developers creative ways to integrate multiple consumers into single player games. Developers can give "director level status" to gamers they deem appropriate. People with this privilege are then able to access and "manipulate levels to assist you during your gameplay." Practically, this means that "developers can insert command buttons for certain levels where friends can drop in special items for you such as giving you a health potion when you're in critical condition." This creates an experience where gaming is signified by participation within a virtual environment whose options for interface accelerate consumption of
the product. Games, as individual products, no longer possess the boundaries that restrict play to one consumer. Rather, the game expands to reflect the openness of the Network hosting it. As product boundaries blur, consumer integration maximizes.

The various stages of possible interference in the one to one, consumer to object, relation realize various distributions of agency. If a friend takes over the game to beat a boss or solve a puzzle, agency is heavily skewed toward the outside consumer. If that friend merely drops a health potion they may not have defeated the level for the original consumer, but they have inserted their own agency into the victory. Gaming is no longer a place of "subjects" or the individual. The subject playing the game is not the individual but the relationship between them articulated by the console. The environment and parasitic relations make gaming an intersubjective experience; one gamer could not have finished the level without the other. The meal is too big for one rat. The single victory is dispersed through several consumers. Everyone did their part, but no one ate the meal alone. It is a victory where the end of one subject and the beginning of another are indistinguishable. This could be thought of as multiplayer, were it not taking place in the subjective, single player campaign of a game. Multiplayer is designed for several consumers to control several characters, this intersubjective relation is generated by the interaction of multiple consumers in a virtual environment meant to express the will of only one.

The compression and decompression systems are not the only hardware innovations built into the Playstation 4. The Playstation 4's controller features a new share button that allows the consumer to record their gameplay. Cerny explains that the gamer can push the "share" button, scroll through the last few minutes, select the portion they want, and then the video will upload to the Network while the gamer resumes play. The share button works with the compression and decompression systems to make moments of consumption as publicly accessible as possible.
Cerny states that the developers' "goal is to make sharing of video, on the Playstation 4 generation, as popular as sharing your screenshots is today." Furthermore, by locating the share button on the controller the Playstation Network maintains a connection to the consumer's body. As such, sharing an informational instantiation of identity becomes an immediate physical possibility. Later in the conference, during a demonstration of the game Killzone: Shadowfall, the gameplay of the demo was recorded and uploaded to Facebook. Transitioning from screenshot to video reflects the increased capacity of the Playstation 4's hardware and design. This share button appears to give more access to the game than previously available, but is more devoted to compelling consumers to distribute themselves throughout the Network.

Even this access is constructed by the environment and its producers. In the same Edge-Online article quoted earlier, Sony Worldwide Studies president Shuhei Yoshida elaborates on the "share" function: “There will be parts of a game that the maker does not want people to be able to see...For example, on Vita, developers can in certain scenes disable the feature that lets users take a screenshot, and (the Share function) will have a similar mechanism. The creator may not want to make video of the final boss sharable, for instance.” A final boss battle of a high profile game would certainly be a valuable event to spectate, but could also lessen gamers' motivation to invest in the game themselves. As such, the Playstation Network merely grants the consumer access according to the circumstance; access is never fully guaranteed. Thinking of the "share" function as the agency to record parts of the game is a false narrative. Rather, the Playstation Network is recording the consumer and access, for the consumer at least, is merely an illusion. The consumer is unable to publicize their individual success.

For previous generations of consoles spectating gameplay still required people to be physically together. The Playstation 4 negates this need, articulating social interaction by
transmitting information between consumers. As Cerny pointed out, it is possible to be a famous person in a gaming universe. However, qualifications for fame in a gaming circle, such as rapid complete time or acquisition of desirable equipment in games, are no longer guaranteed to be representative of one person's accomplishments. The openness that the Playstation Network integrates into the relation of player to avatar necessitates skepticism of unique subjectivity or accomplishments, dramatically destabilizing previously taken for granted boundaries. Beating a game is no longer a victory for an individual gamer. Rather, this victory is a manifestation of "the distributed cognition of the...human subject [correlated] with...the distributed cognitive system as a whole, in which 'thinking' is done by human and non-human actors" (Hayles 290).

Consumption then, is primarily achieved through consumer relations. Consumption becomes intersubjective because the Playstation 4 distributes the act of "play" between consumers and the console that integrates them. Both the players and the channel giving them access to one another do the consuming. Perry explains that the PS4 has so many new features for social play designed into it in order to make sure a gamer's "circle of PSN friends will become that much more important." Making the circle of PSN friends more important makes intersubjective consumption more likely. Not only are gaming and consumption disembodied by wireless controllers and interconnected consoles, but so is the practice of socializing itself. The new consumers emerging from this system "are distinguished not by the disappearance of the old but rather by a shift in the nature of their control mechanisms, which in turn are determined by the kinds of exchanges the machine is understood to transact" (Hayles 91). It is not the individual, or the celebrity, but the relation between them that the Playstation 4 controls. The console controls the way the individual gamers socialize with one another, constructing its consumers' interaction according to the needs of the object they are consuming.
When the console is designed to have so much influence on how consumers relate to one another, consumers become both objects to be consumed and subjects doing the consuming. This complicated relation is largely due to how consumers appear to one another through the Playstation Network. Since a consumer's cognition is identified with the in-game avatar, the consumer becomes an object to be consumed, either through the gaze of public viewing, or through varying stages of interference. Both Bauman and Serres offer insightful accounts of changing subjectivity and subject/object relations that begin to privilege the object's presence over the subject's agency. Bauman sees this transformation from consumer to commodity as something that may be hidden in the society of consumers, arguing that one of the most prominent features of "the society of consumers - however carefully concealed and most thoroughly covered up - is the transformation of consumers into commodities" (Bauman 12). However, considering Hillis's comment on the dialectic of surveillance and pleasure and the emphasis on public accessibility by all three of the conference's main presenters, this transformation is hardly covered up. The Playstation 4 ecosystem compels consumers to interact with one another according to this very transformation into objects. The nature of this interaction is strongly influenced by the console itself. Being an object that possesses agency, the Playstation 4 ecosystem acts as a quasi-object, as Serres calls it, to manipulate the behavior of and relationship between subjects within its system.

While playing video games online, consumers interact with representations of other consumers, representations produced by purchasing and playing through a game; the console fosters the relation, the relation fosters the object-status. All that is visible on screen is the object of consumption, but it moves and behaves like the consuming subject; thus, "Members of the society of consumers are themselves consumer commodities, and it is the quality of being a
consumer commodity that makes them bona fide members of that society" (Bauman 57). The "quality of being a consumer commodity" is the result of information technology's display of the subject as their object of consumption. This is possible precisely because virtual environments are interactive; the subject moves through the virtual space of the object in order to consume it. When consumers interact with one another through the Playstation Network they interact with another consumer's act of consumption. As such, the difference between being an object to be consumed and a consuming subject is merely a matter of perspective. A person who is playing a game, and expressing their will over their in-game character without interference, may consider his or her self to be a subject actively consuming an object. However, to that person's friends observing the live play over the Network, all that is visible is an object to be consumed.

The console is designed to generate this object status through the presentation of consumption to other consumers. During his speech in the announcement Dave Perry explains that the console is designed to keep friends informed on one another's purchases: "When your friends purchase a game, you'll know immediately so you can join in on the action." In addition to only being possible because consumers can now play games while they are being downloaded, such integration exists because consumers have so much access to one another as objects to consume. There is no difference between "friend" and "game to purchase" in Perry's statement. The distinction is made in the syntax of his sentence, but does not exist when displayed on screen.

When consumer's participate in such a system they buy into a cycle of feedback that reflexively constructs their identity. Cerny explains that the Playstation Network keeps track of the information gamers produce when consuming: "As the system learns your likes and dislikes we can take this even further. You'll discover content preloaded and ready to go on your
Subjectivity becomes a reflexive construct within the Playstation Network, "whereby that which has been used to generate a system is made, through a changed perspective, to become part of the system it generates" (Hayles 8). The consumer buys a game, an act recorded by the Network. The Network uses this information to suggest games for purchase for that consumer in the future. The ecosystem takes a moment of self-definition, choosing a game to buy, and changes it into information to influence the consumer later. This information is also displayed to that gamer's friends, the objects influence one another. As such, subjectivity is not produced by the consumer's will, but by a combination of that will and the displacement of products and information onto the consumer.

While Bauman directly addresses the shift toward object-status for consumers, some of his theories do not presuppose a virtual environment. For instance, Bauman argues that the lack of distinction between a consumer, or subject, and their purchases is essential to the maintenance of the society of consumers:

In most descriptions, the world formed and sustained by the society of consumers stays neatly divided into things to be chosen and their choosers; commodities and their consumers: things to be consumed and humans to consume them. In fact, however, the society of consumers is what it is precisely because of being nothing of the sort; what sets it apart from other types of society is exactly the blurring, and ultimately the effacing of the divisions listed above. (Bauman 12)

Within a virtual environment the boundaries of "things to be chosen" and "choosers" are already difficult to identify. Virtual environments are interactive; consumers play through a game, they are already a part of it. There is no distinct barrier between consumer and object to efface. The barrier is a channel, or more precisely, interaction. The distinction is only drawn to
be effaced a moment later. For the Playstation 4, there is no consumer, or subject, before the game the subject is articulated in. Consumers are only identifiable when they interact with the object of consumption. In this virtual environment the consuming subject appears only as the object it is consuming.

Recalling Bauman's Althusserian perspective, one may argue that individual consumers become "a subject through the Subject and subjected to the Subject" and are conditioned to recognize one another as such, to identify one another through acts of consumption (Althusser 121). However, the capital "Subject" should not only be considered a determining ideological apparatus, but a controlling method of relation capable of articulating subjects that maintain that method of relations. "Consumption" is a name for a particular type of relation between a subject and object, and the primary value for the society of consumers. Individuals may consume and play games with other individuals but they do not control this relation; rather, they only become "subjects," individuals that can be identified at all, because the Playstation 4 ecosystem articulates consumers by their objects of consumption and constructs these objects of identification to integrate as many consumers as possible into a single virtual environment. So while consumers may identify one another based on the collapse of distinctions that Bauman posits, the Playstation 4 requires a theory of relations that articulates how that distinction is crossed.

Most of Bauman's critique seems focused on relations between individual objects or individual consumers. While he does not discount the importance of the internet in cultural shifts, the influence of the virtual environment and its construction of intersubjective consumption defy the one-to-one relation posited within his critiques of consumer and object to be consumed. Consumption, like agency, is distributed within the Playstation 4 ecosystem; as
such, the relation and object engendering that relation must also be distributed to cross the
distinction between chooser and thing-to-be-chosen for multiple consumers at once.

The consumer's identification at the hands of the object makes it is necessary to consider
how the object accesses the subject. Serres develops the concept of the "quasi object" for this
purpose (Serres 225). The quasi-object is more than an object, "but it is one nevertheless, since it
is not a subject, since it is in the world; it is also a quasi-subject, since it marks or designates a
subject who, without it, would not be a subject without it" (225). The quasi-object is the object
that renders individuals subjects. It identifies individuals as being worthy of identification of
subjectivity. Serres uses the example of a playing a game with a ball, where the "ball isn't there
for the body; the exact contrary is true: the body is the object of the ball; the subject moves
around the sun. Skill with the ball is recognized in the player who follows the ball and serves it
instead of making it follow him and using it" (226). Excelling at the relations of the environment
marks identity. Players are celebrities in the gaming universe when they follow the rules of the
game to great success. It is not players succeeding at the game though, it is the game succeeding
through the players; the quasi-object "is an astonishing constructor of intersubjectivity. We
know, through it, how and when we are subjects and when and how we are no longer subjects"
(227). The player of games is only a subject when he is playing. The Player is a subject of the
Subject when he follows the ball to the goal; the gamer when he follow a playable character to
the end of the level. The relation to the object of consumption is the determining Subject that
identifies the consumer as the subjected subject.

Since the interface with the quasi-object produces subjectivity, the particular nature of the
 quasi-object must be accounted for. This notion of the ball is still too limited to grasp
intersubjective consumption in a virtual environment; only one person can hold a ball at a time.
The end of one subject and the beginning of another are identifiable as the ball moves along. The Playstation 4 ecosystem is designed for intersubjective consumption of a single game, for multiple players with a single quasi-object. The ball cannot sustain the "we" that completes the level when the console brings in the excluded third. Serres insists that the way "to calculate the 'we,' is, in fact, the passing of the ball. But it is to abandon the 'I'" (227). However, when the console integrates the excluded third, the friend who has already finished the game to assist in a level, the first player is not abandoned; he remains present, watching and holding his controller. It is his level and the victory will be listed on his profile. If the excluded third merely drops a "health potion at a critical moment," as Perry mentions, then the first player would never have stopped holding the ball, but did not score alone. Multiple pathways of access to the quasi-object exist even when the distribution of agency shifts. As boundaries of games expand and blur to reflect the openness of the environment they are instantiated within, so do the boundaries marking off "subjectivity." The boundaries of the quasi-object of the Playstation 4 ecosystem must be as distributed as its consumption or, as Serres puts it, "fuzzy" (57).

"Fuzzy" is a mark of precision connoting that a quasi-object capable of integrating multiple subjects must be "a spectrum, a band, a continuum" (57). A quasi-object found within the Playstation 4's Network is not merely an object that determines the subject, it is an object whose limits are not those of a single object, whose limits are fuzzy and indeterminate. A ball has an outside, and is in the hands of the player or it is not. Serres describes the agency of the fuzzy more precisely when he says "the subject moves around the sun" (226). The sun makes the solar system, it is bigger than the subjects, its light and gravity determine all the planets at once; subjects orbiting the sun may always be subjects, but players seeking the ball have to chase it in order to become a subject. Despite its reach, even the sun cannot determine all of the system it
makes, some parts of the planets are cold and dark. Information does not suffer this problem, it has no body to give it limits.

A truly "fuzzy" quasi-object goes beyond "a simple yes or no to such questions of sides. Inside or outside? Between yes and no, between zero and one, an infinite number of values appear, and thus an infinite number of answers" (Serres 57). Information can always get inside, so the sides do not really matter. The quasi-object retains its influence over the subject in virtual environments, but its method of accessing the subject that evolves. Virtual quasi-objects do not obey the logic of either here or not that a ball does; rather, they are waiting to be accessed and the Playstation 4 announcement serves to encourage various modes of such access. The control mechanism of the Playstation 4 ecosystem relies on information's ability to access, and be accessed by, multiple consumers at once. A fuzzy, virtual quasi-object is able to integrate multiple subjects because it does not possess physical boundaries that limit consumers' access to it. When the channel relating the quasi-object to subjects is information technology the quasi-object does not possess a body for the consumer to hold, but is a pattern within a virtual environment, created to signify one consumer while accessible to multiple consumers, and that is the truly astonishing marker of intersubjectivity.

The Playstation 4 announcement attempts to paint a picture of consumers having more active access and agency over the games they play through the new console. While this may be true in some sense, this access is not only inverted by the console, but widely distributed throughout a web of interconnected consumers and objects to be consumed. The Playstation 4's feat of social engineering is to make the two sides of this distinction slide over one another in new and unexpected ways. This has primarily taken place within the virtual environment meant for single player game play.
From Bauman's perspective, the society of consumers, through its objects and sales pitches, invites the consumer to locate their sense of self, or "subjectivity" within its objects. Video games play into this by giving the consumer a central character or figure to identify with. This in-game character has been a signpost of individuality and subjectivity within the virtual, especially when in the single player storyline of a game. The narrative of the announcement focuses on strengthening this relation one-to-one relation while simultaneously creating a new relation of subjects and objects within the Playstation 4 ecosystem. When Dave Perry is speaking, a graphic for the website Ustream is displayed behind him, an online video streaming service, with the tagline "Broadcast Yourself." It is the "self" that is being broadcast over the Playstation Network, an object that the consuming subject identifies with. In "Immanence: A Life," Gilles Deleuze argues that relations such as this act of identification are essential to the emergence of consciousness, saying: "Consciousness becomes a fact only when a subject is produced at the same time as its object" (421). Both the subject and object are required, and consciousness is determined by how they are related to one another. In the case of the Playstation 4, consumers are conscious of themselves as subjects identifying with their object, so the distinction between these two remains in body only, because the consumer's consciousness is invested in the virtual object. Consciousness is not limited to the subjects body, but may be extended into the object because the subject acts through the object in a virtual environment that is otherwise inaccessible. The Playstation 4 ecosystem guides and manipulates this extension of consciousness in order to produce the subjectivity of its ideal gamer. A single in-game avatar becomes an object for multiple and varying constellations of consciousness within the Playstation 4 ecosystem.
The nature of this virtual object does not fit the narrative of consumer-oriented access that House begins with his introduction to the conference. The consumer can only record and broadcast their "self" when the virtual environment deems it appropriate. Furthermore, the environment of the individual, single player game player, has been designed for multiple consumers. Not a shift to multiplayer, this is the distribution of the object essential to a single subjective consciousness to multiple consumers. After the binding, invested consciousness emerges between the human body that purchased the game and their in-game character, there emerges another consciousness between that in-game character and those given access to it over the network and the social priorities it has been designed to fulfill. This is the distributed consciousness that emerges when the distinction between subjects and objects is merely a matter of perspective, when the relations have already been determined by the mediating console itself.

The Playstation 4's feat of consciousness engineering comes when the consciousness of this distributed subject, under the guise and existing in the environment of the individual object, feeds back into the consciousness produced between the human consumer and object of consumption. Human consciousness is produced through distributed relations while selling itself through objects feeding the fantasy of the individual. What is produced then, through this particular practice of consumption, could be called posthuman, having emerged from its particular embodiment: a configuration of bodies, technology, and social value.
Iain M. Banks's Culture series has always had a political focus, with leftist criticisms of capitalism and certain religions quite openly staged throughout the series. The driving conflict of the novels often centers around foreign intervention. Although Banks's fictional society of "the Culture" is a socialist utopia that exists without money, disease, violence, or death if a person so chooses, it has a foreign policy best described as "that of the United States in the recent Bush administration: just as Bush wanted to spread the good news of American democracy to the rest of the world, and was willing to put some force behind that benevolent imperative, so too the Culture" (Jacobs 51). This is the perspective seen in many of the early novels of the series, where the Culture, which is maintained by advanced artificial intelligences stored within ships, intervenes in other civilizations to influence their growth and values, often with violent results.

In *Surface Detail* this question of foreign intervention persists, but what stands out more than the usual large-scale questions of the moral faults in various political systems is the management of bodies within those political systems. This focus is perhaps only possible because the plot of the novel is not devoted to the toppling of a political system, instead the Culture adopts a general attitude of non-interference with its galactic neighbors.

Briefly put, *Surface Detail* follows Lededje's Y'breq, a slave whose consciousness is transported to the memory banks of a Culture ship after she was murdered, travelling from the Culture back to her old home to kill her former owner, Joiler Veppers. The Culture tries to stop her for various reasons, the main one being that Veppers knows the location where several virtual Hells are stored. These Hells are places where mind-states, or consciousnesses, of people who have died are sent if their society deems them in need of punishment. The Culture is involved in a war with other civilizations over whether or not Hell should be allowed to exist,
and if the Culture can acquire Veppers's cooperation, they could end the war by simply blowing up the computer substrates housing the virtual Hells. In a review of *Surface Detail*, Abigail Nussbaum, who has written several excellent reviews on books in the Culture series, criticizes the novel for not taking the questions of foreign intervention seriously enough, and for tying up the ending in a way that invites little reflection on the violence that accompanies such practices. The culmination of the novel does little to address serious consideration of the differences between societies and the values that influence them. Although the novel is quite long and complicated, Nussbaum points out that the conflicts "are resolved happily and somewhat bloodily, without the Culture's official interference, and solely through the actions of a few individuals who never reflect back on their societies. There is no consequence, not even the faint sense of disapproval that permeates other Culture novels, to either the official choice to stand aside or the unofficial choice to intervene." This is somewhat unusual for a Culture novel, where the weight of violence is typically taken seriously, even if the violence is carried out anyway. While Nussbaum makes a good point about *Surface Detail*'s difference from the rest of the series, *Surface Detail* still has much to offer with regards to other important elements of the science fiction genre, in this case the interface of technology and the body.

In an interview with Wired magazine, Banks has argued that science fiction is "the only [literary genre] that deals directly with the effects of change, and specifically technological change, on people and society. And that has been one of the most important aspects of our lives since the industrial revolution" (Parsons). While he severely neglects other genres, Banks's comment serves as a starting point for an important observation. Not only does science fiction deal with technological change and its effects, it offers an opportunity to suggest and investigate how technology may influence the movement of value throughout political and social systems.
This movement of value inevitably brings it into contact with the body. This contact most often occurs at the moment of interface between the body and technology. The political system evaluates the moment of interface between bodies and technology to compel both objects to maintain the reference of its essential value. By interfacing with technology the body is incorporated into a system that seeks to discipline individual bodies and regulate the species in general. Michel Foucault focuses on this regulation in "Right to Death and Power Over Life," arguing that species regulation constitutes a power over life itself. Foucault describes the management of bodies as a bio-politics, which he defines according to an essential distinction:

this power over life evolved in two basic forms:...One of these poles...centered on the body as a machine: its disciplining, the optimization of its capabilities, the extortion of its forces, the parallel increase of its usefulness and its docility,...The second...focused on the species body, the body imbued with the mechanics of life and serving as the basis of the biological processes...Their supervision was effected through an entire series of interventions and regulatory controls: a bio-politics of the population. (44)

Foucault draws a distinction between practices which discipline individual bodies, such as handcuffs, and practices or technologies capable of managing the practices of a population, such as birth control. While practices disciplining individual bodies came before technology was capable of managing a species, "these forms are not antithetical, ...they constituted two poles of development linked together by a whole intermediary cluster of relations" (44). It is this intermediary cluster of relations where power, or the value that manipulates technologies, bodies, and their interfaces, resides. When the population of the species is managed instead of disciplined then power is no longer exercised out of political institutions, but distributed by the
relationship between institutions and the species body. Foucault refers to power as becoming more of a norm in this case, saying that in the case of species regulation "the law operates more and more as a norm, and...the judicial institution is increasingly incorporated into a continuum of apparatuses (medical, administrative, and so on) whose functions are for the most part regulatory" (48). This continuum must also incorporate the body of the population it is regulating to be effective. This raises two questions: How is the body incorporated into this continuum, and what makes the continuum continuous?

Since the population of a species is regulated by technology with access to its common body, then the body, as a category of existence, is integrated into the continuum when it interfaces with technologies of the state. This moment of interface is particularly significant for Foucault in *Discipline and Punish* where he identifies it as the moment that generates the soul. Foucault argues that the soul is

the present correlative of a certain technology of power over the body. It would be wrong to say that the soul is an illusion, or an ideological effect. On the contrary, it exists, it has a reality, it is produced permanently around, on, within the body by the functioning of a power that is exercised on those punished - and, in a more general way, on those one supervises, trains and corrects, over madmen, children at home and at school, the colonized (29).

The soul is more than just something that appears in and around the body though. What Foucault identifies is the appearance of an abstract value at the moment of interface between technology and the body. This value persists throughout the continuum of apparatuses; the body merely serves as a useful anchor for observing and naming this slippery abstraction. The soul is the
name for what the political system finds valuable about the body; it has been produced by an evaluation.

Since the soul is produced at the moment of interface, it is productive to think about what integrates bodies and technology, as well as what relates them to other apparatuses Foucault argues are incorporated into a continuum in "Right to Death and Power Over Life." It is the relation between apparatuses and bodies that makes it possible to identify what is valuable to the continuum. The relation between components and their overall organization is more constitutive of a political systems identity then the nature of specific institutions. The continuum of apparatuses is not continuous because of some aspect of a particular institution, it is continuous because of how the apparatuses relate to one another, and the technology that achieves this relation. The persistence of the relation is necessary for a political system to function and the soul is produced to justify is continued operation. Since Surface Detail focuses on the maintenance of differing political systems instead of conflict between them, it offers an opportunity to examine what is consistent about this type of influential relation across systems with different political values, that is, different perspectives of appraisal.

What is produced by the interaction of the body and a society's technology is no longer merely the body, but a figure or an idea of a person that the society wishes to maintain and protect because by doing so the relation that produced that idea of a person is reinforced. The relation influencing the continuum and regulating the species continuously reproduces what is valuable to its own production; it incorporates bodies to inscribe a soul onto them, a soul representative of the body's political utility. Within Surface Detail, both the Culture and Sichult inscribe a soul onto Lededje's body, two souls produced by technology to articulate different conceptualizations of who Lededje is onto a single body. Each of these souls represents that
particular system's conceptualization of personhood. The maintenance of political systems in Surface Detail indicates that souls are not only a product of technology's interface with the body, they are also produced by an evaluation of the body's utility in relation to the operations of the political system overall. Although the soul may be identified around the body, an insistence on an entirely intrasubjective soul fails to account for how the soul is related to other parts of the continuum in general. The soul may be meant to signify a person's essence, but this is a surface detail, a nominalization of place within the continuum only, not an indication of differentiated content or essence. A culturally constructed soul realizes the body's reproduction of the essential value regulating the continuum of apparatuses constituting a political system. The power of politics is neither held or fulfilled within individual bodies, but generated by the transmission of an authoritative perspective of evaluation between them. It just so happens that the body is often the seat of politically valuable components whose behavior and life the political system needs to regulate to maintain authority.

In order to articulate how bodies are regulated by a value, a vocabulary which distinguishes this abstraction from its instantiation offers some methodological clarity. In The Five Senses Michel Serres develops a theory which distinguishes between the material apparatuses of society and that which moves through them, typically thought of as information. He refers to it as "hard and soft." The hard is "located on the entropic scale: it pulls your muscles, tears your skin, stings your eyes, bursts your eardrums, burns your mouth, whereas the gifts of language are always soft" (113). The hard body feels the world it interacts with. Through the mingled senses it experiences things like "stone-breaking," things capable of bursting eardrums and pulling muscles (112). The soft consists of "drawing letters and crosses with a brush, red on white, recognizing their place within a code," and conveys meaning about the
world and perceptions (112). Serres sees the world as "a sort of tide, or current, or drive from hard towards soft: it is history, of course, but evolution as well, and time, no doubt. Energy resolves into information...Hardware becomes software, force becomes meaning" (Serres 114). This history of the current from hard to soft is not simply a natural order of things though. It is executed by the technologies interfacing with bodies. Often these are technologies of the state meant to articulate a specific meaning onto bodies, putting hard and soft into permanent mixture. Serres writes that "What remains now is to think about mingling itself; the softening, the leveling, the planning, the smoothing out of hardness into softness. It is time to write about mixtures" (116). Although the body is what is observable, the soft, like the parasite, is always present in and around it.

While Serres appears to be focusing on the body in his book, many of his ideas translate clearly into the social realm. What is hard is not just the body, but political apparatuses and material objects that operate according to a particular discourse. The soft is a metaphor for the insertion of discourse into the activity of the body, be it human, a political apparatus, or a piece of technology. The continuum of apparatuses is continuous because the discourse of the soft is consistent throughout. The particularity of the mixture constitutes an essential factor to the identity and function of the political system. Serres appears to value the hard more, his book has a personal focus in this way. However, he points out that language, "previously soft in a hard world, learned the hard way how to overcome that obstacle, and these days counts as the only hard thing left in a world softened to the point of muteness. It has silenced hardness...language is winning, and it does so physically first and foremost" (120). The soft rises to the more significant side of the distinction, usurping the hard, because it is the soft that determines how the body operates. The mixture that Serres refers to is the orientation of the hard, or the body, according to
the ideas or meaning contained within the soft. This is the actual purpose of the soft. Although
the insertion of information serves as a useful metaphor to describe movement, it fails to
articulate purpose. A pattern of information cannot shatter a stone, but it can help communicate
that the stone is meant to be shattered by articulating how the stone is supposed to be used in
relation to other machinery. The soft trades its body for manipulative agency.

Serres explains such a relationship between objects and machinery with an example of a
road under construction. A broken road may be repaired so that cars can drive on it again, or it
can be labeled under repair to instigate a different relationship between the road and technology.
For Serres the former is a matter of hardness, of crushing stone into place. The other option,
labeling the road as broken so that no one will use it, is accomplished by using the soft to
manipulate the hard. Serres argues that if "a highway is in disrepair, it can be fixed; you fill in
the pot-holes, go over the new bitumen with a steamroller, reinforce it at considerable expense,
both physical and financial. But there is another solution: put up signs which read 'Road under
Repair'. This is the preferred solution of administrators; it is cheaper, and panders to their
tendency to communicate by memoranda" (112). Putting up a sign serves two purposes. The first
is that it creates an arrangement between objects which serves a certain value. In this example
this value could be immediate cost; even if the road is useful or necessary, putting off repair
delays expense. So the road has been evaluated as not useful for driving, an evaluation which
instigates a particular relation between components, in this case: cars do not drive on the road.
The sign evaluates the road's utility, or lack thereof, to create a relationship between components
that serves the value of delaying immediate cost.

The second purpose of this sign is to establish memoranda as a meaningful and
authoritative mode of communication. By using a sign, the authority of signs in general is
reinforced. Since memoranda are, as Serres puts it, administrators' preferred method of communication, then the reception of memoranda by other components is essential to such administrators maintaining the primacy of their adopted value. Such communication serves not only to communicate, but to maintain its right to communicate.

Independently, the soft may be understood as information free to travel. However, when it comes to the mixtures which Serres calls attention to, the soft is important because it engenders a perspective of appraisal for the hard. The soft's presence in the construction of the soul may take many forms such as words in a religious book articulating a utility of bodies for its belief system or an inscription on a particular body which disciplines it as an individual. In either case, the soul, the conceptualization of a body's political and social value, is produced not only by the correlation of technology over the body, but by an evaluation presupposed by this correlation because it is the evaluation which determines the particularity of the mixture constitutive of the soul's meaning and the body's utility.

_Soriface Detail_ offers several different mixtures to examine: Sichult, the Culture, and Hell. These mixtures, that is these evaluations of bodies and technology, effect particular forms of biopolitical discipline and regulation within political systems. This chapter will examine the discipline of a specific person in relation to two of these systems. When Lededje moves from Sichult to the Culture she not only experiences a different body, but is also attributed a new soul by the Culture's polity. In effect, Lededje has two souls over the course of the novel. After focusing on individual discipline, the chapter will shift to consider the other side of Foucault's distinction of biopolitics: the regulation of the species, and argue that bodies are made into objects of transmission found within pathways where bodies, technology, and cultural apparatuses are arranged to further the movement of a political system's essential value. The soul
is an indication of a body's ideal place within such a pathway; the body is disciplined for the sake of regulation. The final section utilizes Humberto Maturana and Francisco Varela's theory of biological systems from *Autopoiesis and Cognition* to articulate how the virtual environment of Hell reproduces suffering by privileging how bodies are made to interact rather than some aspect of bodies' particular nature. The effect of adopting this system's theoretical focus is to marginalize the importance of the individual point of view of Chay, the character trapped in Hell who finds her body transformed to further suffering throughout the environment. While focusing on a specific character, especially with the extended discussion of Lededje, it is easy to consider their body an end rather than a means. The language of Maturana and Varela's theory helps solidify the focus on the body's operational utility for the rest of the system, rather than the effect of the system's operations on the body. The experience of the soul, as a socially attributed conceptualization of a person's place in society, disciplines the body by purporting to indicate its subjective essence while instead constructing a subjectivity defined by utility.

Lededje Y'breq, one of the main characters of the novel, dies in the first chapter. She is an Intagliate, her body is covered in a tattoo that was administered to her while she was still a fetus. The laws of the planet Sichult dictate this means she is a slave owned by someone who can often be identified based on the content of the tattoo. She is murdered by her owner, Joiler Veppers, for trying to escape. Banks thoroughly develops this "particular feature of Sichultian law," explaining that Intagliation is a device to repay debt:

> if a commercial debt could not be fully settled, or if the terms in some deal were deemed not entirely sufficient due to shortage of funds or other negotiables by one of the parties, then the defaulting or inadequately provisioned side could compensate by undertaking to have a generation or two of the progeny made...
Intagliate, signing over at least some of their children and grandchildren...to the
care and control, indeed the ownership, of those to whom they were either
indebted or at a fiscal disadvantage. (Banks 71)

The value of debt influences the arrangement of bodies in relation to the commercial and legal
apparatuses of Sichult. This essential relation, a have or have not of wealth, incorporates bodies
into a continuum of apparatuses according to their value as objects of debt. This debt forms a
relationship between two bodies, Intagliate and owner, but the movement of debt and its
imposition into a particular body occurs because of the movement of debt throughout continuum
as a whole. Veppers, a business partner of Lededje's father, acquired Lededje after betraying her
father and bankrupting him in a business deal to build a soletta, a satellite to shield Sichult from
its sun. Lededje's mother was forcibly tattooed, and Lededje's "embryo was altered, changed to
become that of an Intagliate, and then implanted" into her mother (75). This technology inscribes
an image onto Lededje's body in order to display the political system's evaluation of her.

Intagliaion is a practice which inscribes information into the process of life in order to reproduce
the practice of evaluating bodies based on their capacity to fulfill unpaid debt. Intagliaion
disciplines individual bodies by inscribing a soul onto them that has been defined by the
movement of value, both monetary and cultural, from one political apparatus to another and
regulates the species by integrating the species body into that movement. Lededje's soul is
produced by the law's evaluation of her body as commensurate with a specific debt, making her
into an object to be owned, with the particular history of how she came to be an Intagliate
inscribed on her body.

Lededje's soul takes the form of a rigidly defined history, and it is this history, as well as
its inscription on her body, that disciplines her as an object. This discipline is achieved by the
notion that her soul, although culturally constructed, is her essence. For the political system on Sichult it is; Lededje is only valuable as canvas inscribed with debt. She has no rights, because even though Intagliates are supposed to have rights and protections, Banks describes them as "more like aspirations" which the powerful and wealthy can ignore, a familiar criticism of capitalism within Banks's Culture novels (75). Lededje's soul, as the product of technology's interface with the body and the determining idea of her existence within the political system, makes her "no more than an ornament; something to be admired, to be stared at and cooed over, an object of fascination and astonishment, her duty being to exemplify and magnify the magnificence and sheer wealth of Mr. Joiler Veppers, President and Prime Executive Officer of the Verpine Corporation" (80). The Sichultian political system's conceptualization of Lededje's utility has the effect of disciplining her body by giving her a specific place in society which she cannot independently free herself from. Although the act of inscription is the most visible influence on Lededje's Intagiation, focusing on the interface with the technology used to tattoo her amounts to an intrasubjective perspective that leaves out the operations of the legal system which helped move this debt into her body to begin with.

Judith Butler makes a connection between the law and the soul in her consideration of Foucault's work in "Foucault and the Paradox of Bodily Inscriptions." Throughout the short essay she highlights that both the law and the soul are defined by their inscription on the body, and that both of these constructs subject the body to a particular meaning and place within society. Since her essay focuses on Foucault's work she follows in his line of thought that the soul and the law are produced by their inscription on the body instead of pre-existing laws or values motivating that inscription. While the circumstances of Lededje's soul require a focus on the relations between several bodies and apparatuses, the language of Butler's article allows for a
nuanced consideration of how the soul comes to manipulate its body. Lededje's experience of
discipline is the result of an intersubjective movement of debt between several bodies and objects
on Sichult and the act of evaluation which integrates her body with these objects as a continuum.

Butler attributes the agency of the act of inscription onto a body to the nebulous figure of
"History." Her use of history, which she acknowledges is problematic, is problematic because
she defines it as the creator of social values without ascribing any particular agent behind history,
not even in the vague sense of the phrase "History is written by the winners." The essential
inversion for understanding how Lededje's soul is constructed in relation to Butler's notion of the
body is that, instead of history being a nebulous agent behind social and political values, history
is defined and only observable when those very values can be shown to move through the
apparatuses constituting a political continuum. Still, the nebulousness of history as an agent over
the body is useful for emphasizing how a political value is reproduced through the discipline of a
body rather than the body as a product of a system which seeks steer history through the
domination of the species.

Butler argues that the "mechanism of cultural construction" of the body "is understood as
'time,' and the specific operation of 'history' is understood, and understood problematically, as
inscription" (602-3). History constructs bodies by leaving evidence of events and the passage of
time on their surface. This evidence, be it tattoos or something less directly inscriptive creates a
meaning or notion of the person that indicates how they should be treated within a political
system. Butler goes on to say that history is the "creator of values and meaning, that signifying
practice, which requires the subjection of the body in order to produce the speaking subject and
its significations" (603). Bodies are produced by the movement of history, and exhibit a
particular value precisely because history has left its inscription on them.
The content of Lededje's tattoo evidences a particular history. This is not just the history
of her body, but of how her body is connected to different bodies and objects. Banks explains
that the tattoo's design is based on the political context of the tattooing:

The basis for the fabulous scroll work wrapping every square centimetre of her
skin was that of the letter V, for Veppers, and the Verpine Corporation he
commanded. Other elements included twin crossed knives and images of the
object the fateful deal been about in the first place; Sichult's soletta, the giant
space-mounted fabrication which shielded the world from some of the light of the
sun. (75)

Under Butler and Foucault's thinking Lededje is a slave because she has been inscribed
with these images. It is the moment of interface, the "inscription on the body" that Butler
regularly reiterates, that articulates Lededje's soul. Butler argues that the "law is not literally
internalized, but incorporated on bodies; there the law is manifest as a sign of the essence of their
selves, the meaning of their soul...The juridical law no longer appears external to the bodies it
subjects and subjectivates" (605). Both Butler and Foucault's notions of the soul privilege its
presence on the body over its relation to other political apparatuses, but the historical process
which comes to inscribe the soul on the body only does so because of how the body is evaluated
in relation to those other apparatuses. They observe changes in the hard instead of the movement
of the soft. Lededje is a slave because of a multiplicity of circumstances, in particular, the
movement of debt between several bodies. The history that is inscribed on her body tells the
story of the movement of that debt: from business partners, to the soletta, to the Verpine
Corporation, and how the law incorporated her into that movement. History did not create this
value nor its presupposed act of evaluation. Rather, history is observed as changes effected by
the consistent presence of a value and mode of evaluation. Butler connects the body to its political utility most precisely when she argues that the "culturally constructed body would be the result of a diffuse and active structuring of the social field," (607). The social field is vital to the body's evaluation within a system because this image of a field may incorporate multiple bodies and apparatuses, identifying the body's cultural meaning as the result of intersubjective relations rather than some intrasubjective essence.

This diffuse structuring of Lededje's soul, or even personhood, highlights the multiplicity of the effect of mixing the hard and soft. Lededje's political value is both quantitative and qualitative. Although Lededje is owned by Veppers, her status as an Intagliate is constructed by relations across the social and political system. The markings on her body do not just identify Veppers, but indicate that Lededje became this object because an amount of debt moved through several political and commercial apparatuses within Sichult, including the soletta in the sky. What binds this object in the sky to Lededje's body is the movement of capital from one to the other. The soletta costs money to build, Lededje's father incurs debt which he fails to pay, so Veppers acquires Lededje. Her body is commensurate with a certain monetary amount, a quantitative value. Her qualitative value comes from the presence and social acceptance of her body's indication of her slavery. The fact that she is a slave reinforces the presence of slavery on Sichult and reproduces debt as the essential value of the system as well as its mode of evaluation. The soft object of debt has become the hardest part of Sichultian politics by engendering a particular evaluation of technology and bodies. It is when Lededje is evaluated in relation to other cultural apparatuses that she is incorporated into the continuum and disciplined according to her body's capacity for the reproduction of debt.
The body does not give birth to values as a result of inscription, but reproduces the mode of evaluation which is historicized by the inscription. While Butler focuses on the soul as the effect of the law on the body, a slightly different perspective is appropriate for Lededje's context. The soul, on Sichult, is the presence of the law *passing through and incorporating* the body. The law does not rest in the body; the body happens to reside in the movement of the law, and the soul is produced as a by-product of that movement, to show that the body has been incorporated into a continuum of political apparatuses operating according to a particular value.

Lededje's experience in the Culture is much different as her soul takes on an entirely new form, one stemming from the Culture's different value system and politics, as well as its more advanced technology. Although the Culture's utopian socialism and technology are the most visible markers of difference from Sichult, the more meaningful distinction is the Culture's different way of evaluating bodies or sentience, the latter being the concept the Culture privileges. In stark contrast to Sichult, the Culture does not evaluate bodies or sentience in order to define a soul for them according to some political utility, and instead evaluates technology for its capacity to retain a sentient consciousness. The Culture's conception of a person or a socially valuable soul is any sentience, and the value organizing interfaces between bodies and technology is a value of non-interference for the soul. Essentially, the Culture designs its technology so that the soul is free to move through bodies and apparatuses as much as possible.

Where the movement of debt informed Lededje's soul as an Intagliate, in the Culture, the soul itself is free to move. Throughout *Surface Detail* Lededje has two souls, products of two different perspectives of appraisal applied to her body and its interactions with a political system. The Culture shows that even if the body or sentience is not seen as a utility, the soul is still produced by an evaluation of how the political system's value may be continuously reproduced.
For the Culture, the soul is the essential variable determining the relations throughout its political continuum.

When considering the development of civilizations over a galactic timescale, Banks posits that, at some point, civilizations are very likely to come up with some concept of the soul. What separates societies with particularly advanced technologies from those that are less developed is the ability to instantiate a consciousness within a computer's substrates. If this were possible, and the personality or subjectivity of the person were to survive, then the essence of the person would somehow be irreducible to their embodied circumstances. This leads Banks to put forth a notion of the soul which still attributes it to the correlative of technology over the body, but also reinscribes the soul as something which retains a subjective essence of a person. Banks argues that once the technology to capture and instantiate a mind-state outside the body is developed, the notion of the soul insists upon itself: "Even if your civilization had somehow grown up without the concept [of a soul], it was kind of forced upon you once you had the means of recording the precise, dynamic state of someone's mind and either placing it directly into the brain of another body, or storing it as some sort of scale-reduced - but still full - abstract inside an artificial substrate" (Banks 123). The most advanced technology interfaces with the body to eliminate the need for the body while claiming to retain the mind. This attributes the essence of a person, or their consciousness, to their acts of cognition and information processing within the brain rather than their full experience of life through a body. The Culture is such a civilization, and accomplishes the transport of mind-states through something called a neural-lace.

Neural-laces are, essentially, a bunch of tiny wires implanted into a being's brain capable of capturing "mind-states, souls, [or] dynamic full-brain process inventories" (66). They can be used to communicate with sentient computers, to upload a person's consciousness for storage, or,
in Lededje's case, to back up a person in case of unexpected death. After Lededje is murdered by Veppers in the beginning of the novel she wakes up in a virtual reality on the Culture ship Sense Amidst Madness, Wit Amidst Folly. Lededje was transported there because another Culture ship implanted a neural-lace in her head without her knowing several years earlier. The ship's avatar, Sensia, tells Lededje that a "full back-up-capable neural lace grows with the brain it's part of, it beds in over the years, gets very adept at mirroring every detail of the mind it interpenetrates and co-exists with....There is almost certainly less difference between the you that died and the you that you are now than there would be between your selves at one end of a night's sleep and the other" (78). So although the soul is still produced by the correlative technology over the body, the product of that relation is distinctly bodiless. The soul, from the political perspective of the Culture, can exist within an organic body, but also within any computer substrate with enough memory that can receive and transmit such data.

What the Culture considers to be the soul is the mutual fantasy of some elements of science fiction and posthumanism: the mind can survive without the original body. What Banks's definition of the soul misses is just how important the technology and embodiment are in the equation. If the mind were to find itself outside its body its mode of interaction with the world, its very ontological being, would be radically changed. The mind would still be a product of embodied circumstance, but what Banks's definition does is efface the embodied differences between the body and a computer substrate. The very standard that made Lededje a slave on Sichult isn't even possible anymore; she has no body to tattoo.

Just because the brain may be considered an information processor does not mean that the body can be as well, nor should consciousness be reduced to such information processing. In this way, Banks reinscribes the humanist perspective of "I think, therefore I am," and even though his
Banks does show the appeal of this kind of thinking in the context of such advanced technology. Attributing the essence of a person to their cognition comes across as a very liberating move because it would allow someone great freedom of movement in otherwise impossible ways. Despite this, Lededje hardly considers herself a disembodied consciousness. When she asks Sensia where her tattoo has gone Sensia tells her: "[that] info didn't travel" so Lededje will not be able to have the exact same tattoo that was so essential to her identity on Sichult (92). Despite this, Lededje still opts to have a full body tattoo administered to her new body. Even though it is not the same, it reflects the fact that consciousness is conscious of itself as an embodied subjectivity.

By considering the information captured by the neural-lace to be Lededje's soul, the Culture maintains a political system where the soul is distinctly undisciplined by its disembodiment. What the Culture does evaluate is how its technology interacts with patterns of consciousness retained in substrates and bodies. The perspective of appraisal essential to the Culture's functioning still evaluates the interface between bodies and technology in order to produce its ideal conception of a "person," but its consideration of consciousness as being what is valuable about a person creates a kind of disembodied freedom where the soul is able to move through bodies and apparatuses, integrating them into a particular organization privileging this movement, much like the operation of debt on Sichult.

One of the Culture's ways of furthering this movement of the soul is by ensuring that it is able to switch bodies if a person so wishes. Sensia tells Lededje that she is "essentially a fully functioning, viable independent mind-state and incontrovertibly sentient, with all that implies regarding rights and so on" (91). The Culture perceives Lededje's sentience as an essential value
that should be given rights, even though she has already been produced by the Culture's apparatuses. One of these rights is the right to be "revented," the "term for being brought back to life in a physical body" (91). This is possible because Culture ships keep a "standard stock of mindless bodies" for people to be revented into if they were to die, or even if they just want to switch bodies (92). That Culture ships are prepared to accommodate this movement of consciousness between forms indicates that it is its construct of consciousness itself that is valuable. By privileging acts of cognition over embodiment the Culture constructs the will to move between bodies and apparatuses as an essential aspect of its political system.

A civilization does not develop an ideology of mobile souls very easily. The Culture's emphasis on the disembodied mind-state as the essence of a person is a reflexively constructed value. Since the evaluation of apparatuses for the movement of souls is the most essential factor to the Culture's political system, at least in Surface Detail, then the ability to capture consciousness must have preceded this political perspective. What has been produced by the Culture's technology has become the determining factor for how the Culture conceives of beings with rights, and this idea determines how Culture ships continue to deploy their technology. As Banks's definition of the soul states, a society has to do some growing before reaching such advanced technology, so these values came after society had been well established. At some point the Culture began to feed the product of its own technology back into its own relations to make that product, the informational consciousness, the determining value orienting the relation. Furthermore, the organic body, as the original seat of the soul, has become a transitory medium from which consciousness or the soul may come and go (8). The ship keeps blank bodies on hand because it already has the technology to keep Lededje "alive" without her original body.
Such a progressive stance toward the soul's movement and the rights of sentience does not mean that people within the Culture are not disciplined. Just as nihilism is still an ideology, freedom of movement should still be considered a discipline. The departure from Foucault is that what is disciplined is not the body, but the soul itself. Rather, the soul is constructed to be undisciplined, free to move throughout whatever embodied or virtual space it has access too. Considering Serres's theory of mixtures and hard and soft, the softness of the Culture certainly constitutes the hardest thing about it. A person may choose to break stones in the Culture, and have a genuinely embodied experience, but they may also choose to instantiate their mind in a virtual reality where their form is highly changeable. Even this description of the virtual as an environment where the body is changeable also applies to the hard in the Culture, where bodies are a matter of choice, bringing the distinction between hard and soft into question. Despite the fascinating narratives such possibilities create, Banks's construct of mobility between and mutability of bodies while retaining some essence of a person continues the philosophic traditions of humanism that posthumanism seeks to challenge. This perhaps shows just how utopian the Culture really is. It is not that life is prolonged, that people don't compete for wealth, or that disease is eradicated that makes the Culture a utopia. Rather, it is having enough resources to always maintain bodies to house its souls, such that it can afford to be unconcerned with those bodies, that makes the Culture utopian.

While the novel focuses on individual discipline from Lededje's perspective, it is important to remember that this discipline is part of a larger biopolitics: the regulation of the species. The two sides of this distinction often overlap; the discipline of the individual occurs for the sake of regulating the species. In order to shift from examining individual discipline to species regulation the role of the body needs to be reconsidered. Focusing on regulation requires
a wider perspective than discipline. While Lededje's experience shows that individual discipline is the result of the overall operations of the political system, her experience is particular, not universal. The regulation of the species requires an examination of bodies in general, an examination of bodies as a category of existence for an essential component of a political system.

When bodies are disciplined they are incorporated into the movement of value throughout a political system. It is this movement which realizes the regulation of the species. The two poles of development in Foucault's distinction of biopolitical control, discipline and regulation, do not develop separately. Not only are they not antithetical, they are symbiotic. Regulation is impossible without discipline to maintain the operations of individual bodies and discipline often functions to further regulatory powers. Since the body functions as a category of existence, interference with its processes of life is a mechanism of discipline which can be widely distributed. Just as Lededje's experience of discipline is contingent on the organization of Sichult's political system, so the regulation of such a political system is contingent on interfering with individual bodies to use them as spaces of debt.

Bodies are not the only aspect of a system that require regulation to consistently reproduce a certain value's perspective of appraisal. When Foucault speaks of the law being incorporated into a continuum of apparatuses he references medical and administrative apparatuses as well (Foucault 48). Although these apparatuses contribute to the regulation of bodies, they themselves must be regulated to maintain political homeostasis. Therefore, regulation cannot only apply to bodies, instead it would be more accurate to say that the species body is incorporated into a continuum of regulated apparatuses whose functions are to extend their operative mode of evaluation throughout the species body. The methodological challenge to thinking about the regulation of the species is not only to consider the cumulative effects of
widely distributed modes of discipline, but to consider how such discipline may be possible for non-human objects and apparatuses within the continuum.

Thinking about the species body as one apparatus among many offers an opportunity to consider a theory of communicative objects, where a consideration of the type of operations needed for the political system as a whole may be more useful than considering particular experiences. It is the relations between the apparatuses which makes the continuum continuous, so considering the relation in general is most productive. Serres puts forth two theories in *The Five Senses* which provide a vocabulary for articulating how such a relation may establish itself across a heterogeneous continuum of apparatuses. The first is an explanation of black boxes, a familiar concept in posthumanist texts that refers to an object that receives information, changes it, and sends it back out. The box is black because its internal operations cannot be seen. In the case of a black box being a component of a political system, the box's particular operations are not important as long as the output reproduces the same value as the input, even if it takes a different form. Secondly, Serres argues that black boxes, objects of exchange and transformation, provide an opportunity for global traits of a system to access localities such as bodies and even cultural apparatuses such as courts.

A political system regulates itself by using bodies and apparatuses as objects of exchange. The body is a hard place where the soft may transform but still continue to engender a certain perspective of evaluation. Although only the hard remains observable, the consistency of operation attests to the soft's discourse. The soft must retain its influence over the hard throughout these transmissions. Lededje's body received the soft as a manipulation of genetic information and transmits it as a visual signifier and would pass on this genetic heritage to any children she bears. A court on the other hand, weighs evidence and makes a judgment. An input
and an output, this evidence and judgment are tied to the "body" of the court that can receive certain types of inputs and produce certain types of outputs. Species regulation is achieved by arranging social and political apparatuses to form an uninterrupted pathway, where outputs correlate with inputs and inputs correlate with outputs, so that the transmission of the soft value through the hard world may always continue.

The presence of the soft is essential here because of its dual meaning. Referring to both the insertion of discourse or information into a body as well as engendering a mixture which invites an evaluation of the object, the soft describes the metaphorical movement of a value through a series of objects and refers to the mode of evaluation which is essential to the political system's operation. Serres describes the black box in terms of the transformation from hard to soft:

Take a black box. To its left, or before it, there is the world. To its right, or after it, travelling along certain circuits, there is what we call information. The energy of things goes in: disturbances of the air, shocks and vibrations, heat...Information comes out, and even meaning. We do not always know where this box is located, nor how is alters what flows through it...Before the box, the hard; after it, the soft.

(129)

The neural lace serves as an excellent example here. Before the neural lace's internal operation, there is the body, something hard and of the world. After the operation, which is itself a form of transmission, there is only information, albeit information that contains a consciousness. For the Culture, such a consciousness would be the soft value that influences the arrangement of apparatuses within its continuum. Neural laces often transmit information to the sentient ships such as Sense Amidst Madness, Wit Amidst Folly, itself a black box that takes this
information and gives it a new body. Through the transmission of two different black boxes the body has gone from being hard, to soft, to hard again, simultaneously taking on varying levels of value in relation to the political systems it moves through. Black boxes are not isolated pieces of technology drifting through the continuum, the space filled by black boxes is the continuum. Black boxes, like the bodies of the species, are stacked upon one another, receiving and transmitting as they are able. The soft's ability to create a consistent discourse extended through various apparatuses and bodies is subject to circumstance, it is only through a particular stacking of boxes that a transmission of values capable of regulating a species possible.

Since bodies are part of the transmission of the essential value of the continuum, being incorporated into the continuum means being incorporated into a pathway of exchange. Souls of incorporated bodies are aftereffects of the reception and transmission of the essential value, nominalizations of an ideal place within the system's organization. The stability of such pathways is essential for the soft to maintain its discourse of multiple bodies, such stability comes from the correlation of inputs and output. The particular nature of a political system is very much subject to the circumstances which formed localized aspects of its continuum. Serres describes such pathways as roads, but these are not empty spaces for the movement of bodies; rather, they are arrangements of bodies which the soft may travel through without interruption, like the pathway from the soletta to Lededje's body. Serres describes the arrangement of such pathways as movement around towns and cities: "Roads radiate out from towns...They set traffic and flux in motion on the periphery where mixtures, sorting, exchanges and deals take place. The capital, the head or centre, seems to owe its existence to these outer layers, as if equilibrium were being created on a plateau or in a depression, an acropolis surrounded by a fluctuating belt" (299-300). The roads are always trafficked, always filled with bodies and boxes, as the soft exchanges
one medium for another. The highest authority may seem to exist at the center, but it's authority is actually maintained by the activity of the political system overall, by the equilibrium attained through consistently uninterrupted transmission. The particular arrangement of bodies is determined by the nature of the value moving through these pathways as well as the nature of the boxes' transmission, be the boxes pieces of technology or incorporated bodies. The souls of the species are created along these pathways where the soft arranges the hard, and the total constellation of these pathways of souls forms the space constituting the continuum.

Practices regulating the species overall generate the souls of individual bodies by incorporating them as components in a system. Although the soul is often thought of as individual, the production of souls happens along these pathways; souls are produced en masse. Different souls may emerge along different roads, but the soft that travels those roads carries the same value. Just as the political continuum on Sichult needed Lededje's body to continue the movement of debt generated by the production of the soletta, so other bodies form pathways for debt from other expenses. The soul does not describe the essence of an individual or "subject," rather it articulates the body's utility according to the dominant political value, making the body into a component to be arranged according to what it can receive and transmit.

From a perspective emphasizing the relations between cultural apparatuses instead of individual essence, bodies become components to be arranged within a system. The soul is the value of the space filled by the body in relation to the overall system; it is descriptive of how the body is being used within the continuum. A side focus in Surface Detail is on one of the virtual Hells that Veppers owns. This Hell is a virtual reality, created for citizens of Pavul whose consciousnesses will be instantiated there if they are seen as deserving punishment for deeds they do in life. Since Hell is closed off from outside interference it is productive to think of it a closed
system, arranging its components in such a way that they suffer as much as possible. This system has a special interpretation of this suffering though, its components must have hope that the suffering will end, and that they may return to the Real or perhaps just be deleted. One of the Representatives of the Pavulean Parliament justifies the existence of Hell by saying: "We need the threat of punishment in the afterlife to keep us from behaving like mere beasts in this existence" (Banks 258). Hell's purpose to the outside world is to act as a deterrent, but this does not explain the events inside Hell itself.

The narrative of Hell is told from the perspective of Chay, a Pavulean academic who infiltrated Hell to report back on its existence and atrocities in the real world. Upon entering Hell though, Chay's mind came unhinged and she became convinced that the real world does not exist. This is, apparently, a surprising perspective for someone trapped in Hell to have, and offers the reader an opportunity to observe how a political system maintains the transmission of its dominant value when one of the components suddenly refuses to cooperate. When asked by two demons why she doesn't believe in the real world, Chay responds with her own question, itself perhaps one of Banks's criticisms of religions with notions of Hell: "How could there be a Real where people would allow something so terrible as this to exist? This place must be all that there is. What people call the Real is a myth, an unreachable heaven only there to make existence all the worse by comparison" (283). When she says this she is taken before an "ultimate Demon," in charge of making decisions about Hell (284). Although Chay is already suffering with every moment she stays in Hell, the Demon makes it clear to her that her rejection of the Real means that she is not suffering enough. In response to Chay's claims that there is no hope for a better Real, the Demon explains that "there must be hope. To abandon hope is to escape part of the punishment. One must hope in order for hope to be destroyed. One must trust in order to feel the
anguish of betrayal. One must yearn, or one cannot feel the pain of rejection, and one must love in order to feel the agony of witnessing the loved one suffer excruciation” (285). Although physical suffering is constantly carried out in Hell, the continuous transmission of hope between its components is the goal. Despite being a virtual reality, Banks's Hell is a traditional one, and seems to be focused on highlighting the absurdity of a belief system that would advocate sending people there. When Chay refuses this attribution of hope then Hell must find a new way to utilize her body to reproduce hope. It does this by, first, trying to make her believe in hope again and, when that fails, by using her to spread hope without her believing in it herself. The content of the soul does not have to describe the identity of the body it is associated with; it is a nominalization of place, not identity. Rather, the soul is the precise value and utilization of the body's place in the continuum.

In *Autopoiesis and Cognition* Humberto Maturana and Francisco Varela put forth a theory of autopoietic machines that they describe as closed systems devoted to maintaining a set of relations within their boundaries which constantly reproduce themselves, thus maintaining the identity of the system overall. Maturana and Varela's text focuses on biology, and the reproduction of cells is their consistent example. However, this reproduction of relations as a way to maintain identity resonates with political and social systems, in large part because they emphasize the relationship between components rather than the nature of components themselves. Much like how the soul is produced by the body's interaction with other bodies, so a cell carries out its functions because of how its "constitutive relations are established through the production of molecules (proteins, lipids, carbohydrates and nucleic acids) which determine the topology of relations in general" (Maturan and Varela 91). Although the nature of the
components varies greatly from example to example, wherever they are arranged to reproduce
the relation that arranged them, a system emerges.

Perhaps the most essential idea in Maturan and Varela's theory is autopoiesis, which they
define as the "interactions and transformations [that] continuously regenerate and realize the
network of processes (relations) that produced them" (79). These interactions and
transformations of components are contingent on the relations that gave rise to them and seek to
reproduce that same relation. It is the interactions between the components which makes this
reproduction possible, not some essence of the components themselves. Whereas "[m]achines are
usually viewed as concrete hardware systems, defined by the nature of their components and by
the purpose that they fulfill in their operations," Maturana and Varela argue that "the significant
properties of the components must be taken in terms of relations, as the network of interactions
and transformations into which they can enter in the working of the machine which they
integrate and constitute as a unity" (77). So although it may be tempting to define Hell by the
presence of re-embodied souls and sadistic demons, characterizing Hell as a system shifts the
focus to the processes that Hell arranges to create hope in its denizens, and it is these processes
which are the focus during Chay's part of the novel. The soul then, is not the identity of a
component, it is a description of its interactions.

Maturana and Varela identify one further distinction which is helpful for grasping
systems: organization and structure. Organization describes the processes of a system overall, it
is contingent on the continued transmission of dominant values in general. A system's
organization is constituted by the "relations which define a machine as a unity, and determine the
dynamics of interactions and transformations which it may undergo as such a unity" (77). This
should not be confused with the form of particular relations that may be observed at a certain
point, which constitutes the system's structure. Maturana and Varela define structure as the "actual relations which hold among components which integrate a concrete machine in a given space" (77). Hell is organized around the production of hope and suffering, its structure is the actualization of particular interactions which carry out that production. When Chay expresses hopelessness, the structure has failed the organization and Hell must arrange a new structure in order to continue the transmission of hope. The soul is produced in accordance to how the body is incorporated into a particular structure. The meaning or value of a subject's soul is a structural particularity of a component's value in relation to the organizing principle of the system overall.

When Chay first enters Hell it appears that Hell, or the ultimate Demon, simply assumes everyone has hope. All the demons seem surprised that Chay refuses to accept hope that her torment will end, despite the fact that Hell appears to be only dedicated to pain. As such, Hell must arrange a new structure for its components where Chay may become part of a pathway for the soft value of hope. Hell's first step is to make Chay believe in a benevolent God; this would put Chay back into what might be thought of as the more traditional organization of the machine, where she believes in hope, where she, in a sense, identifies with the soul attributed to her body. The ultimate Demon tells Chay: "I hoped to make you hope...But you are beyond hope. That is vexing... You should have had religion, child, that in it you might have found the hope that could then be crushed" (Banks 285-7). The system is vexed, so it shifts its components to resume its essential process.

The mechanism for creating this belief is to instantiate Chay's consciousness into a new virtual reality for her to live a new life and become a person of faith. She is sent to a convent for women called "the Refuge." This ability to send a consciousness to an entirely new space is an advantage granted to Hell by being a virtual environment. While Chay lives in the Refuge she is
compelled to take part in its religious practices and realizes that "with time, and the very rituals and services, devotions and chants that she found so meaningless might themselves lead to the belief she lacked, even if it at first she did not feel that she partook of them with any faith at all" (342-3). The point of her virtual exile from Hell is to compel her to live a faithful life where the hope she acquires will persist past the point of her death, making her a hopeful member of Hell once again. Although Chay's body is not changed, the faith she develops is meant to influence the thoughts and imaginary beliefs she will carry with her back into Hell. The faithful suffer the most in Hell. This interface between the technology of the system and her body is designed to use bodily discipline to create an ideological effect.

However, Chay holds onto her memories, and eventually grows to accept her memories of the Real as well, and writes the story of her life down in a journal so that she does not forget. Eventually, she gets old and the time comes for her to die. On her deathbed she sees an angel that tells her it is time for her to meet her maker. In conversation with this angel of death, Chay resists the narrative of hope it tries to seduce her with:

"I had no maker. My maker was the universe, or my parents...'Maker' indeed. What superstitious bollocks are you trying to - ?"

"Chay!" The thing shouted at her..."You are about to die...Have you no wish to see God and be accepted into Her love?"

"Oh, don't be ridiculous. There is no God."...

"What?" the angel cried. "Will you have no thought for your immortal soul?"

"Oh, fuck off," Chay said..."Do whatever it is you have to do and let's just get this charade over with." (369-70)
By resisting the narrative of faith in a loving God, Chay refuses to buy into the relation of hope in an outside construct. Merely remembering her past life is not enough to constitute hope, Chay must transmit a genuine expression of hope before she can participate in Hell's autopoiesis again.

Hell's second step to force Chay to participate in its process of hope and suffering is to invert the expected arrangement of components and, instead of making Chay have hope in something, make Chay herself a figure of hope in Hell. The system changes the location and operations of a specific component to reestablish the more important relation with other objects. When Chay awakens back in Hell her body has been transformed: "She had become something great and dark and winged. Her feet had become claws big enough to grasp a person whole. She spread her front-legs/arms/wings. They opened easily, purposefully, far out to either side. Limbs ready to walk the air...She felt a strange hunger, and a tremendous urge to fly" (387). Chay meets the ultimate Demon again, who tells her that the hunger she feels is a hunger to kill, and that she can permanently kill one person every day, forever deleting them from Hell. When Chay asks why she would be allowed to bestow such a blessing on the suffering the demon explains to her that her new body has been designed "[t]o bring hope into Hell! You will be their angel...They will beseech you to come to them, to deliver them from their torment. They will worship you...You may choose whom to reward with death. Pander to their idiocies or deliberately ignore them...Just kill one a day. You can try and kill more but it won't work; they'll die all right but they'll come back, worse" (395). Since Chay refused to believe in hope as an outside construct, her body is restructured so that she may transmit hope differently. Her body is the black box upon which many smaller boxes, being the bodies of those who hope she will kill them, are stacked. She is made into one of the first positions of the structure of black boxes that transmits
hope throughout Hell. Information has been incorporated into her being to give her a body whose interactions create hope as an output to subsequent bodies.

Here the overlap in Foucault's distinct poles of biopolitics from "Right to Death and Power Over Life" manifests. Chay's body experiences discipline as a result of operations regulating the species body and other objects incorporated into the system's continuum. The system is willing to break down and remake components to maintain its autopoiesis. Maturana and Varela explain that autopoietic machines, first and foremost, seek autonomy; "that is, they subordinate all changes to the maintenance of their own organization, independently of how profoundly they may otherwise be transformed in the process" (80). This profound transformation is to change a heretic into an angel of death, because as long as the defining organization of the system persists, the nature of the individual components is inconsequential.

Souls are the result of such organization, they designate a political position. Lededje's political position is that of a slave, she has no rights. Chay's body is transformed into a productive function. The soul of a body indicates of what rights that person has within the political system, it dictates what a person can and cannot do, what a person can and cannot say. Political systems are maintained by giving certain rights to certain bodies, so they may receive and transmit the necessary value. Actions which may transmit the wrong value are prohibited. If Lededje, as an object of debt, were to transmit anything other than debt, the organization of the system would suffer. If Chay had convinced other bodies trapped in Hell that there was no hope, the system's operations would have either changed to accommodate a new perspective or had to undertake even more drastic re-structuring. Notions such as human rights then, are reflections of a person's soul in the eyes of the state they belong too, a product of its evaluations.
The identity and rights of citizens, that is, the meaning conveyed by their souls, are produced by the citizens' participation in a political system. The body may have a presence before the law, but it won't occupy a meaningful position until it has been evaluated and incorporated into the law's operations. *Surface Detail* offers an examination of differing political systems' modes of evaluation and how such evaluations affect individual bodies. Banks's politically leftist perspective is clear throughout, allowing *Surface Detail* be read as an evaluation of certain values. *Surface Detail* invites readers to appropriate its evaluations, especially in moments where something such as Hell is justified as a deterrent for bad behavior. Readers do not have to take up Banks's perspective though, and the novel's function as a site of ideological conflict and choosing is what makes literature so valuable.
CONCLUSION: TOWARD A REFLEXIVE FUTURE

When considering the two chapters of this thesis together, a surprising observation can be made: the "posthuman" that is produced by interacting with the Playstation 4 is more posthuman than that which is articulated by *Surface Detail*. The conceptual incorporation of a now unstable extension of consciousness between gamer and in-game avatar indicates that the Playstation does more to question the autonomy and the boundaries of the subject than anything in *Surface Detail*. Even considering the presence of virtual reality in *Surface Detail*, the Playstation 4 pushes surprisingly far in this aspect as well. Where Michel Serres theorizes about intersubjectivity as a physically material phenomena, the Playstation 4 articulates it in virtuality. On the other hand, *Surface Detail*’s assumption of cognition as the essence of a person downplays the influence of intersubjectivity, even in virtual instantiations. Instead of identifying *Surface Detail* as a posthumanist text, this thesis has sought to present a posthuman way of reading it, one where the essence of a person is not assumed to be constituted by their own cognition, as the Culture ship avatar Sensia does. This comparison is not meant as a denigration of any kind, but is made to point out that the posthuman manifests in surprising and unexpected ways. The comparison of the two chapters, one examining how a current social value affects subjectivity, the other showing the variability of modes of evaluation between social and political systems, is meant to highlight that the value influencing a system is what is variable between systems. The conclusion of this thesis rests on the fact that these systems are produced as much by circumstance as the bodies within them and that they can change over time.

The future is a fiction, both in the sense that it is not the present and in that fiction is often occupied with the future. The opportunity of studying the future that occupies fiction is that the values that audiences and scholars read into various present futures may have an influence on
varying future presents. The opportunity for interpretation that fiction offers places some agency back into the individual, provided other cultural circumstances allow it, and gives people the opportunity to evaluate social and political value on a broader level. Such evaluations of fiction by audiences and readers may become the evaluations which social and political systems reproduce in the future. With technologies like Google Glass creating deeper integration of bodies and information, the politics of the interface between humans and technology can hardly be overemphasized.

Considering recent depictions of the future in film and fiction in general, the future is bleak, often apocalyptic. This focus on apocalypse, on a single event which carries humanity into the future by radically changing the present, does little to give room to the importance of social and political values on the construction of the future. The future is not a break, there is no hard line between the future and the present. The apocalypse is a myth encouraging apathy by putting the future out of human control. In reality it may be a side-effect of social and political systems' operations. Climate change is certainly an apt example of this. If the changing climate brings some sort of apocalyptic event, it will be because social and political systems on the planet did not do enough to stop it, because they continued to operate on a particular set of values that did not consider their own impact on the future. This is where considerations of the future in fiction may influence the future that is to come. Even if individual humans may have little agency in changing a broken political system, the species body is still an essential component in a system's reproduction of its organizing relations. As such, the species body's internal values and operations offer an opportunity to transgress those of larger political systems.

The image of the cyborg, a combination of human and machine, is often representative of what the future may bring, with the particular combination of technology and human being
symptomatic of the cultural values influencing such bodies. It is also a figure often cited as transgressing patriarchal and hetero-normative values. Since Donna Haraway's "A Cyborg Manifesto," depictions of cyborgs in fiction have been compared to the radical potential raised in the essay. In "Refiguring the Radical Cyborg in Mamoru Oshii's Ghost in the Shell," Carl Silvio explains the use of cyborgs as transgressive figures: "The figure of the cyborg thus represents an imaginary projection into the realm of popular fiction, a trope invested with cultural anxieties and beliefs about contemporary technology. But such fictions, of course, function in society as more than the representation of cultural attitudes; they also perform ideological operations by shaping and reinforcing current belief systems" (55). The setting of fiction often reflects the cultural perspectives surrounding its production. For instance, Victorian era literature often focuses on monstrous bodies, suggesting that the body itself was a source of anxiety for people of the time period. However, as such literature is produced, it also reinforces that fear which gave birth to it. In a contemporary setting, after zombie and apocalyptic films became popular, television capitalized on this fear of the future with The Walking Dead, a show that was made in response to the popularity of the zombie/apocalypse genre, but that also fed back into, and influenced the future of the genre. To return to the example of the cyborg, Silvio elaborates further on its potential as an ideological site of transgression, saying it can "provide ideal sites for examination of how the interface with technology can be presented to us as liberating, as what Althusser would call 'an imaginary representation of the relation of individuals to their real conditions of existence' (123), while simultaneously naturalizing and buttressing existing social relations" (Silvio 55). It is this presentation of the interface of technology that offers fiction the opportunity to explore and even, in a certain sense argue for the influence of certain values within that interface. To conclude this thesis, this section will discuss various depictions of the
future in fiction to emphasize the value relating bodies and technology. Perhaps the most important aspect of the future that such values will influence is the public's perspective on what it means to be a "person," a concept that posthumanism as a field is invested in stretching or deconstructing. If persons are typically thought of as human bodies, but some political perspective makes one type of body monstrous, then only discrimination can result. By drawing disparate values in fictional futures, such as security, agency, and capital, audiences and scholars have an opportunity to construct a reflexive future; the future that is not yet present will be influenced by the futures presented within fiction.

Katherine Hayles defines reflexivity as "the movement whereby that which has been used to generate a system is made, through a changed perspective, to become part of the system it generates" (8). The future is generated in literature, television, and film. This fiction though, can be appropriated by audiences to influence the future that follows the present. The species body viewing and reading fiction, the body of fictional work itself, and, perhaps most importantly the serious study and interpretation of fiction, academic or otherwise, together constitute substantial components of various larger political systems, components which may change their perspectives of one another and change the perspective of the system overall.

The value people act on and transmit throughout society can feed back into the relations which motivate the social and political systems. One decision, like the apocalypse, will not change the world, but the operations of politics according to certain values will determine the direction of its future; it is those values which are the focus here. The first example is less futuristic than prescient: in Christopher Nolan's The Dark Knight Batman is able to track the Joker through the city of Gotham by using the public's cellphones as a kind of radar. Considering the recent controversy over data collection by governments, the foresight in this scenario is
almost eerie. The challenge with the scene where this technology is revealed is that it gives one person too much power over the public, and by shutting down the technology the value of personal freedom is reinforced. The second example, which considers the *Ghost in the Shell* film and television franchise, focuses on bodies that cross the boundary between man and machine. By contrasting depictions of cyborgs which are rooted in fear or which ascribe agency and personhood to different bodies, audiences may decide which value to take away with them, which value to feed back into the social and political systems which produced these fictional futures to begin with.

Near the end of *The Dark Knight* the Joker has essentially taken over the Gotham City through fear. The real challenge, making this depiction somewhat unusual, is not stopping him so much as finding him. It is difficult to find one person in a city of thirty million. Batman resorts to surveillance, and uses the technology throughout the city to monitor all of it for the sake of finding one man. He asks his friend and business partner, Lucius Fox to monitor the city and tell Batman where to go to find the Joker. This scene highlights the clash of values that are also at play within recent debates over data collection by governments, where data produced by all citizens is monitored to locate an allegedly dangerous few. The choice is between security via surveillance or personal privacy. Fox describes what he sees in this monitoring, and articulates a perspective that values privacy over security, saying: "You've turned every cellphone in Gotham into a microphone...You took my sonar concept and applied it to every phone in the city. With half the city feeding you sonar, you can image all of Gotham. This is wrong....This is too much power for one person." Fox, valuing personal privacy, challenges the value of security in this degree, and the film invites viewers to see these values as oppositional, even if that is not necessarily true. Batman, who often embodies various conservative political values, voices the
need to find the threat above all else: "I've got to find this man Lucius...When you're finished, type in your name." Upon Lucius typing in his name, the technology destroys itself, resolving the issue within the film at least. In this way the film articulates the value of personal privacy as more important than security. This reading is somewhat reductive in the context of the "Just this one time it is okay to break the rules" thinking, but the film's point in general is clear enough. The film invites audiences to challenge the notion that such monitoring is acceptable, and to adopt a value which privileges privacy over security. If this value were to be integrated into the political system of the United States, the system's operations would change, and the fictional future would have been influenced by the fictions of the present.

To consider a depiction of the not-so-distant-future, the *Ghost in the Shell* franchise, consisting of two films, a two season tv series, and a four part mini-series, examines the values at play within technology that penetrates the body to create cyborgs. The central character, Major Motoko Kusanagi, is a female operative in Section Nine, a secret intelligence unit for Japan's government. Kusanagi is "full prosthetic," the only part of her that is organic is her brain. In "Beyond *Ghost in the (Human) Shell*" Austin Corbett contrasts Kusanagi, seen as a positive example of what is possible by mixing technology and the human body, with more Western, dystopian, examples of cyborgs, such as Darth Vader. The results of technology's influence on the body can hardly be predicted, but the attitudes people take toward such cyborgian forms will influence the state of culture as those forms go from science fiction to reality.

Corbett explores a history of cyborg bodies, starting with depictions of monstrous bodies such as those seen in H.G. Wells's *The Island of Dr. Moreau*. Moving to contemporary depictions of altered bodies, he explains that while more positive depictions of the cyborg developed in Japanese culture in the 1990s, in "Hollywood, the cyborg continued to be
conceptualized along the same lines as it had been for a century, 'male' and violently dominant, through characters such as Darth Vader [and] the Terminator...Furthermore, these cyborgs continued to be posited as ab-human, and the desirability of rejecting cyborgization was routinely brought to the forefront" (45). This Western cyborg is often seen as an unfeeling machine whose purpose is death and oppression. Darth Vader offers a particularly interesting example. In the original Star Wars trilogy, he is depicted as more machine than man, and his moment of redemption in the conclusion is conspicuously humanizing. What is odd though, is that the origin story seen in the prequel trilogy shows that what has made Anakin Skywalker into this monstrous cyborg is the very human elements of a typical tragedy. For Darth Vader at least, the machine element offers a space to display the tragic and violent elements of humanity. The problem with this valuation of the cyborg is that it makes the embodied form something to despise and fear. If such values are adopted to influence the social and political operations that carry humanity into the future, then humanity will grow to fear itself, paranoid and self-loathing.

Japanese depictions of the cyborg are much more favorable and generally optimistic, at least when concerned with the changing human body. Corbett opposes the Western cyborg to the "Japanese depictions, [where] the nature of the cyborg as antithetical to humans is lost, replaced with a concern for the subjectivity of monstrosity and hybridity" (45). The focus of this hybrid subjectivity is Motoko Kusanagi, who uses her prosthetic body to defy many of the limits placed on the entirely human body. Kusanagi's "dress is particularly interesting, as she generally wears only a leotard, coat and boots. This dress, while seemingly provocative, is not sexualized by other characters in the narrative, and seems to imply a freedom from traditional conceptions of femininity" (46). Corbett's point about her dress is more believable in the context of her authority within Section Nine, where she "is always in control, ordering and orchestrating the other
members of the team. She embodies many aspects of traditional masculinity, while also appearing stereotypically female. Similarly, Batou, her muscular second-in-command, is highly masculine yet he always defers to Kusanagi” (47). The positive value attached to Kusanagi largely results from the way her depiction presents her as a strong female character. Although Kusanagi's body is often portrayed as oversexed as a result of her dress, her authority and agency are clearly secure without her simultaneously being turned into some type of monstrosity. Her different body remains valuable. If the cyborg body is seen as a vehicle for agency rather than monstrosity then the body will remain valuable even as it changes. An optimistic perspective of the cyborg body is certainly a less divisive value than the fear that it will become a murderous machine.

Despite the fact that Ghost in the Shell maintains a perspective that the cyborg body is valuable and capable of carrying the human into the future, the show does highlight some social values that would challenge the autonomy of cyborgs. The political institutions of the show remain capitalist, and it is Section Nine that pays for Kusanagi's maintenance and new bodies when she is severely damaged in combat. Without the support of her job, Kusanagi would be unable to afford all of the technology in her body that gives her such agency. Silvio points out that the capitalist value of ownership persists in Ghost in the Shell: "Because Section Nine actually owns the material underpinnings of her subjectivity, her sense of personhood cannot be thought of apart from its bureaucratic organizational structure. Major's body thus does not exist as an ontologically stable presence that guarantees her identity, but as an ensemble of parts that circulate within a larger system" (Silvio 59-60). Although Kusanagi has operational agency over her body, this agency is contingent on her deployment according to Japan's national security interests. Furthermore, her intrasubjective experience of a body, her "personhood" as Silvio puts
it, is directly determined by an intersubjective relationship, since all of her body is property of the Japanese government, even if her supposed essence, her "ghost" is not. The capitalist value of ownership undermines the agency found in the cyborg body. As such, the human is not what determines the value of the human, capital does. The value of fiction is its identification of the body as a contested site, a site which may be claimed by evaluations from a humanist, posthumanist, ethical, or capitalist perspective.

Still, if society has faith that the cyborg body can have the same value as, or a value complementary too, the entirely organic body, and if society acts upon the cyborg body as it would older bodies, then the value that carries it into the future social and political systems will be inherently optimistic, and seek to preserve life instead of stratifying and demonizing some element of it. Corbett directly addresses the need for an optimistic perspective in the conclusion of his essay, arguing that "We should strive for a vision of the future that is realistic and optimistic, like [Ghost in the Shell], rather than the destructive dystopias of Hollywood" (Corbett 48). The future will only work for humanity if humanity works for the future. The future will change the human body, in many ways for the better. Technology provides benefits to health services, making life more comfortable and longer. However, as Eric Baard points out in "Cyborg Liberation Front," such advancements come with challenges, and "the convergence of genetics, computer science, nanotechnology, and bioengineering...is almost guaranteed to strain our ancient sensibilities and definitions of personhood." Since personhood is often the essential standard for the right to political participation and agency, how evaluations of personhood change over time will be a major factor in what the future looks like.

Banks's Culture offers one scenario where technology is evaluated according to how it can benefit humans and live up to a high ethical standard instead of subjecting them to external
or foreign evaluation. In the novella "The State of the Art," the Culture encounters Earth, and decides to study it to decide if it is going to interfere or if it will leave Earth alone. During this time, one member of the Culture, Linter, decides to leave the Culture and join Earth permanently. He asks the Culture ship studying earth to give him a more human body, as Culture bodies are genetically engineered to live longer and have various glands that Earth humans don't. When one of Linter's friends asks the ship why it agreed to change Linter's body into something so much weaker than a Culture body, the ship articulates the essential freedom which is at the core of the Culture, and a familiar enough ideal in general:

The same technological expertise, the same productive surplus which, in pervading our society, first allows us to be here at all and after that allows us the degree of choice we have over what happens to Earth, long ago also allowed us to live exactly as we wish to live, limited only by being expected to respect the same principle when applied to others...We live with, use, simply get on with our freedom as much as the good people of Earth talk about it; and we talk about it as often as genuine examples of this shy concept can be found down there" (161).

The ship argues that it gave Linter his new body because it was ideologically obligated to do so. Linter's actions did not to interfere with the ship, so the ship had no reason to deny Linter. What is important for the development of the Culture is that the ship directly attributes the positive aspects of life in the Culture to the development of technology. It is technology that makes knowledge over the body a practical asset in maintaining and improving quality of life. The technology that is used for surveillance does not have to be deployed that way. The cyborg body does not have to be owned by something other than the consciousness attributed to the space of the body. The ship's point about living with such a value as freedom instead of just
talking about it also articulates the kind of appropriation that is necessary to genuinely feed the values of fictional futures into the political system which will make the future a reality. Bodies transmit values throughout their social and political system which each act and spoken word. Batman maintains the value of privacy by setting up his monitoring system to destroy itself. Kusanagi transmits the value of the female cyborg body with her competence at her job. The Culture spreads the value of freedom by allowing bodies to leave the Culture. Bodies must appropriate values into their behavior to transmit them through society and make those values the driving force of political systems. While there may be no single figure of the cyborg which should serve as the goal, values such as inclusion and personal autonomy may serve as optimistic enough aims.
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