Quotidian Science Fiction: Posthuman Dreams of Emancipation

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Abstract

This article argues that Science Fiction is a posthuman art form, whose texts posit a utopian dream which emphasises that the process of becoming posthuman is both incremental, and conditional upon the equitable cultural, social, and environmental evolution of our societies. The genre provides a transient dreamscape for visitation by the (post)human mind, by which the reader gains an expanded perception of not only their own empirical environment, but also of posthuman possibility. This posthuman dream however, is not a simply literalised by SF's estranging narrative strategy, but rather is located in the intersection between the SF narrative and its generic form. Through the decay of their initially defamiliarizing nova into data which are cognitively explicable by their (post)human audience, SF texts dramatize our species' continuous journey of becoming posthuman. This fundamentally posthuman model of the SF genre therefore challenges the model of cognitive estrangement proposed by Darko Suvin, and so proposes that SF exerts a pragmatic utopian dream that avoids being deterministic or teleological.

KEYWORDS: Posthumanism, Science Fiction, Dreamscape, Darko Suvin

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Although it superficially appears to be the ubiquity of nova—newnesses alien to the reader's reality—of science fiction[1] that render it a characteristically posthuman literary genre, repetitive factors also constitute a prominent, and significant, element within modern SF texts. The repetitive, mundane, or banal is often a substantial aspect of realist texts too, yet in SF these quotidian elements have a specialized function—they enable the genre to formulate a posthuman dream which is not only utopian, but also practicable. As interaction with an SF text is a process of received cognition, it is a process which vicariously excites a posthuman dream in the reader, opening their mind to the experience of that which lies beyond current scientific progress, and perhaps the possible altogether.

This article analyzes a cross-section of representative modern SF texts in order to consider the manner by which their posthuman dream territories encourage a paradigm shift from humanistic modes of utopian appetite. The texts analyzed are: clipping.'s *Splendor & Misery* (2016), Paolo Bacigalupi's *The Windup Girl* (2009), and Kim Stanley Robinson's *Aurora* (2015). As textual meaning is polysemic, each of these SF texts encompasses multiple utopian drives, but for the purposes of succinctness this article respectively maps the drives from postcolonialist, Marxist and feminist discourses, and towards neoteric forms of utopian desire in them discretely. Taken summatively however, these three analyses demonstrate the interrelated and complementary character of differing cultural strands within the wider posthuman dream of modern SF.

Posthumanism, just like SF, is a polyvalent discourse, and accordingly the field's scope, theories, and even fundamental definitions differ between theorists and countries. This article primarily engages with N. Katherine Hayles'

1999 monograph *How We Became Posthuman*, within which she contends that technological and societal progress is inextricably "seriated" (20). Although Hayles' definition of posthumanism is one among many, her definition is integral to this article's thesis. My own discourse concordantly theorizes that we inhabit an intermediary stage between being human and posthuman, and hence that our species is currently "(post)human" (Hayles 246). The figure of the (post)human is an imperative semantic distinction within the discourse of Critical Posthumanism, since, as Hayles recognizes, "As we rush to explore the new vistas that cyberspace has made available for colonization, [we must] remember the fragility of a material world that cannot be replaced" (49). By utilizing the figure of the (post)human, this article thereby recalls that the gradual process of becoming posthuman is a possibility entirely conditional upon our societies pursuing modes of equitable cultural and social progress, in addition to achieving symbiosis with our planetary environment.

Figured in this manner, the utopian abstraction of the posthuman is detached from its teleological orientation, and becomes a prospect which is realizable through our everyday lives. This article therefore contends that the SF genre can best be defined as a posthuman literature—a literature comprised of those texts which contribute towards the posthuman dream. Elana Gomel states that:

Not only does SF vividly dramatize the implications and consequences of new technologies and new discoveries, it is also a powerful influence upon culture, creating a feedback loop of images and ideas. Many central concepts of posthumanism, such as cyborg, clone, android, human-animal hybrid, and alien, originated in SF (340).

Hence, Gomel contends that SF functions as a cultural site which literalizes the emergent posthuman "potentiality of *Homo sapiens* whose biological and cultural self-fashioning ceaselessly generates new modalities of subjectivity and consciousness" (353). Namely, in the discursive interface which originates phenomenologically between the SF text and its reader, a space of posthuman utopian potential is realized. Thus SF is an important element in the cultural and social spheres which, in our (post)human age, play a particularly vital role in the development of our species.

In order to properly contextualize our modern (post)human civilization, it is essential to remember that "we are the last of a long line of humans, surviving somewhere between 22 [...] and 27 [...] extinct human species, going back over 7 million years" (Gray 138). From a broad perspective, we are clearly still far from being truly posthuman. Nevertheless, while genetic drift and natural selection have conditioned our species' evolution for an immense amount of history, the "technical and scientific aspects" (Gray 138) of culture now comprise an organizational and participatory mode by which we have begun to exert a significant measure of control over the direction of civilizational progress. Hence as we become increasingly more posthuman, there is an acute need to continue to "change how we think the political and its forms of

effectivity" (Wolfe 121) in order for technological developments to be reliably matched by ethical advances in the social sphere.

Although numerous other theorists have theorized that SF is a utopian literature, this article presumes that the genre's utopian fundament runs significantly deeper than its surface-level points of intersection with representational politics. Phillip. E. Wegner, for instance, asserts that the utopian drive of "science fiction is a matter of narrative and not, as is often assumed, of representation," (573) yet the utopian drive of the genre cannot accurately be stated to be located solely in its narratives either. Rather, the genre's utopian drive is located in the intersection between the SF narrative and its generic form, and hence its texts are implicitly utopian. The genre provides a transient dreamscape for visitation by the (post)human mind, by which the reader gains an expanded perception of not only their own empirical environment, but also of posthuman possibility. Much like Ernst Bloch's supposition that "From the anticipatory, [...] knowledge is to be gained on the basis of an ontology of the Not-Yet," (13) the posthuman dream SF focalises is a sufficient journey in itself, and any prophecy or scientific foresight the text may appear to posit is largely ancillary to the imaginative appetite it generates phenomenologically. SF does not attempt to predict the future, but rather presupposes that the future can be influenced by individuals.

Whilst Darko Suvin states that "the boredom of a nine-to-five drudgery relieved [only] by flashes of TV commercials" (24) is anathema to SF, this study asserts that it is precisely this type of social lethargy which necessarily underlies SF's newnesses in order to focalise its posthuman dream. I propose that when SF texts utilize quotidian features, they readily acknowledge the transience of their own posthuman dream and place themselves on a wider continuity of (post)humanity, therefore presupposing that our species will continue to progress beyond their own respective imaginative horizons. The fact that there lies a latent imaginative possibility within the supposedly human mind, capable of understanding the newnesses of SF texts, confirms that our species is capable of becoming drastically posthuman, and that we have already at least partially begun the process of becoming so. The remainder of this article details the mechanics of the interaction between the reader's quotidian reality and the nova of SF texts, via which the genre generates a space of utopian potential.

In a trenchant satire of SF's colonial tendencies, *Doctor Who* depicts the Tivolian species as hyperbolically meek beings, who are keen to actively encourage oppressive species to conquer their home planet and enslave their people. Since they are accustomed to Tivoli having been conquered on numerous occasions, their planetary anthem is titled "Glory to [Insert name here]", so that the species which the Tivolians mean to adulate in the song can be altered at a moment's notice (Hurran). Although *Doctor Who's* portrayal of the Tivolian race is deliberately ludic, it is nonetheless emblematic of a historical tendency towards colonialist narratives within the SF genre. And yet,

as a posthuman literature, the SF genre should unquestionably strive to never reproduce narratives which valorize colonial practices.

Following this vein of thought, the emerging subgenre of Afrofuturism takes inspiration from the fact that "Africa has thousand-year-old traditions of cosmological tales" (such as the "Dogon narrative that life on Earth originated with aliens") which significantly precede the canon of western SF as a basis for its countercultural rewriting of the role of African peoples within the SF and fantasy genres (Levontin 74). As a racially conscious variety of futurism, Afrofuturism "constantly gives birth to a future that is in need of reclaiming," (Gipson 93) as is evident in clipping.'s *Splendor & Misery*, a rap album which utilizes a SF milieu to construct a chronopolitical reexamination of slavery. By reconceptualizing racial otherness as a posthistorical occurrence within its posthuman dream, the album builds a new narrative of the African and Afrodiasporic future which lies outside of hegemonic conceptions of futurism, and thus reclaims time and space to figure the African future in African terms.

Splendor & Misery's cover art depicts a figure in silhouette who—rather disconcertingly—appears to be wearing stereotypical slave attire and a spacesuit simultaneously. These two textiles, which originate from utterly disparate periods of history within the posthuman continuum, and denote ostensibly antithetical constellations of cultural meaning, appear visually innocuous when juxtaposed together. Yet, as the text's protagonist searches for a place beyond the purview of racial prejudice and the ideologies of species which enslave other living beings, he is concurrently an emancipated slave and a pioneering—although reluctant—cosmonaut. By blurring the cultural signifiers which surround its protagonist, the album recurrently explores the interplay between past and future, since Afrofuturism, like its close relative decolonization, "is an historical process [which] can only be understood, [...] can only find its significance and become self-coherent insofar as we can discern the history-making movement which gives it form and substance" (Fanon 2). By implicating the image of slavery in its science fictional setting in this manner, the album confirms that "the field of Afrofuturism does not seek to deny the tradition of countermemory. Rather, it aims to extend that tradition by reorienting the intercultural vectors of Black Atlantic temporality towards the proleptic as much as the retrospective" (Eshun 459). By projecting its race politics into the far future, *Splendor & Misery* thus continues the fight for African and Afrodiasporic cultural heritage, anticipating and destabilizing the assault on the African future using the same colonialist narratives which have already colonized the African past and present.

In the track 'All Black', the eponymous repeated refrain of "all black everything" situates race even more strongly within the album's field of semantic meaning. Whilst the refrain of this track primarily asserts a resonant exultation at the passenger's liberation following an otherwise tragic slave rebellion, it additionally signifies the immense emptiness of interstellar space by which he and the sentient spaceship he has commandeered are surrounded.

Although he is now free from enslavement in literal terms, he appears to have been the lone biological being to survive the rebellion, and so his emancipation is not only pyrrhic, but also deeply lonely. The scale of the loss of life caused by the insurrection is implied by the passenger's designated cargo number—2331—which also survives as a damning memento of the dehumanizing manner of his and his species' prior enslavement. Afrofuturism then, revisits narratives of servitude in particular because "slavery is neither the utopian future nor an ancient far-removed past", which in practice means that its sociocultural legacy "can be felt in the politics of the present" (Womack 157).

Hence, the album's posthuman dream works to ground the text's newnesses and Afrofuturist agenda within a novel setting which is nevertheless largely recognizable to the contemporary reader. As such, it is evident that the novelty of the spaceship he inhabits has already begun to decay from the passenger's perspective by the opening of the narrative, as there is lyrically a sense of extreme mundanity when he leaves "his cot" and attempts to explore his environment. The ship narrates that the passenger is prone to "bouts of stasis," and this implies that he routinely copes with his boring existence alone onboard the ship by frequently seeking refuge in sleep. Although his aversion to exploring his fantastic surroundings may seem quite comic, (post)human life is only given a sense of coherence by the "comprehensibility [...]; manageability [...]; and meaningfulness" (Nygren 355) of an individual's circumstances, and the passenger's situation is neither meaningful, manageable or comprehensible to him. Eventually, tiring of "scream[ing] [...] to break up the monotony," he begins to sing instead, and then proceeds to do so "until his vocal chords collapse." His act of creating music briefly allows him to overcome the banality of his environment then, as "singing invariably distorts language, removing it from its day-to-day setting [...] and situating it within a new sonic context" (Zbikowski 197). It is principally through the power of song that the passenger discovers a desire for social conditions more egalitarian than those of his present situation, and it is likewise through the songs of *Splendor & Misery* that the SF listener is interpellated towards that same appetite from their own mundane reality.

Though the passenger perceives only banality in his environment, the sentient spaceship he inhabits is a compelling novum in its own right. Accordingly, the manner by which the passenger's quotidian experiences are experienced from the perspective of the ship is particularly intriguing. While narrating one particular passage of the album, the ship mistakenly observes that the passenger "stumbl[ing] to the shower, [as] a ritual of some sort," is fundamentally akin to his "insist[ence] on speaking passages before he eats." This category error on behalf of the ship's AI, which conflates the everyday with the spiritual, reveals the comprehensive extent to which any novum is subjectively and hence phenomenologically realized. To the ship, the passenger showering is an almost entirely unfathomable novum, and only decipherable in religious terms, whilst its own novelty as a sentient slave-transporting spaceship

is entirely commonplace. Yet for the passenger, his own daily routine is entirely banal, and the inner workings of the ship are in many ways incomprehensible. As the text's listeners, our own cognition of these nova begins by being closest to the passenger's cognitive perspective. This has a metacognitive purpose, since the posthuman dream thus helps us begin to colonize the text's newnesses by discovering our familiar within its innovative qualities.

Moreover, the ship perceives the intervals where the passenger is cryogenically asleep as "torture," and must experience the truly banal nature of these periods of time first-hand, whilst lamenting that its occupant "feels them not, like a brief sleep, while ship's clocks count millennia." Through this role reversal—whereby it is shown that it is not only the passenger that is subject to the quotidian—his and the ship's common lived experience of the mundane is figured as holding the imaginative potential, within the posthuman dream, to suggest a link between all forms of life and consciousness. This salient role reversal is further typified by the fact that, although the speaker of each track of the album can be inferred, the individualities of both the protagonist and the ship are decentered by its somewhat distorted and often static-filled aesthetic. The text's aesthetic therefore makes it unclear whom the speaker is at any given moment. *Splendor & Misery* thereby emphasizes that there is a mutually informative correspondence between the (post)human and technology, and as such, just as "R&B imagines interpersonal relations and informational technologies as mutually constitutive rather than antithetical foils" (Weheliye 38), the album's electronically saturated aesthetic contributes towards making it implicitly as well as explicitly Afrofuturistic.

Although the AI of the ship has control over its own onboard lighting systems, it elects to keep the lights "off long enough so your days aren't just arbitrary, though they are," in order to create a diurnal day for its passenger with a night-time which is just as artificial as his daytime. The symbolic dichotomous opposition between light and darkness which this binarism posits aptly demonstrates that, although in the extraterrestrial gulf of interstellar space many humanistic constructs are shown to be shambolic, the importance of others is reaffirmed. Likewise, when the passenger takes an injection which puts him to sleep with "slow blood"—which seems to be a speculatively developed form of cryostasis or cryopreservation—the ship, observing his torpor, notices that his "nerves fire like flies lightly [...] each night." Although they are far from Earth, and the passenger is currently comatose, his circadian rhythm is unrelenting, "an artifact [...] similar to a muscle memory" which continues to hold sway over his bodily processes. While posthumanism serves to fracture the hegemonic conception of the human, the posthuman dream of SF speculates that our individual subjective experiences of the mundane will remain a cornerstone of our consistently evolving (post)human existence. As with Hayles' notion that we are already (post)human, the emphasis of the posthuman dream on the mundane comprises a pointed refutation of the deterministic tendencies of humanistic utopian discourses.

Correspondingly, the posthuman dream of SF focalizes a utopian desire which is as much present-oriented as it is future-oriented, and which recognizes that everyday existence is not a condition to be transcended, but rather the unshakeable foundation of any realizable utopian desire. Ultimately then, even in an era where our species is recognized as (post)human, any comprehensive politics of emancipation remains "a question of transforming a necessity imposed on the multitude [...] localized misery and exploitation into a condition of possibility of liberation"—a prospect which in itself perpetually remains "a new possibility on this new terrain of humanity" (Hardt and Negri 47). Thus, whereas essentialist conceptions of utopia are fated to be overly deterministic, utopianism as a prospective desire remains conceivable precisely by its very intangibility, and hence, its theoretical pliancy. This is reflected in the eucatastrophe of *Splendor & Misery*, wherein the passenger fervently conjectures that "there must be a better place to be somebody, be somebody else," his abortive urge to discover a social *telos* having been supplanted by the realization that such a *telos* is not to be found within the causata of humanism.

His subsequent decision to move away from "history [...] this time-bound conscience" by directing the ship's course away from the known universe, and thus his attempt to truly "be somebody else," is therefore a rejection of humanism itself, which "was nothing but an illusory ideology, the exquisite justification for pillage; its tenderness and affection sanctioned our acts of aggression" (Sartre 168). Indeed, the passenger's choice subverts a common trope which figures the return of protagonists to Earth as the primary narrative drive of science fictional tales, palpable in texts such as the television series *Battlestar Galactica*, the 1968 movie *Planet of the Apes*, and Jeanette Winterson's novel *The Stone Gods* (2007). As the Afrofuturistic agenda of *Splendor & Misery* implies, it is critical to ensure that posthumanism is significantly more sincere in its promises of species-wide fraternity than its sanctimonious and frequently colonial theoretical precursor. By mandating that "we must never lose contact with the people who fought for their independence and a better life" (Fanon 129), a posthumanism which is conversant with Afrofuturism holds the potential to pertinently answer Frantz Fanon's call for "a new history of man" (Fanon 238), since Afrofuturism not only rewrites conventional histories, but concomitantly ventures future histories with a utopian appetite.

Moreover, although Afrofuturism and Marxism stress the primacy of eradicating differing social ailments as the totalizing current of their respective utopian philosophies, given that "regimes of slavery and servitude are internal to capitalist production and development" (Hardt and Negri 123), all philosophies which attempt to envision solutions to (post)human social concerns are inherently complementary. As William Gibson famously states, in the globalized societies of contemporaneity, "the future is already here—it's just not very evenly distributed" (Gibson), and it therefore seems severely problematic that in the decades which have followed the fall of the Berlin Wall, Marxist

philosophies have—on an almost global scale—"either disappeared or become completely marginalized [...] The socialist horizon, bright red just three decades ago, has vanished" (Therborn 178 - 179). However, if Marxism *per se* is no longer a suitable concept for progressive politics to unite behind, countercultural thought itself undoubtedly still is, and here the floating signifier of the posthuman once more comprises a consummate rallying point for cutting-edge utopian political theories.

Almost paradoxically then, although the futuristic dystopian society of Paolo Bacigalupi's *The Windup Girl* depicts capitalism as being trapped in cycles which will repeat *ad infinitum*, the novel's posthuman dream allows it to nonetheless bear utopian intent. Although our species' material conditions will continue to metamorphose drastically as we become ever more posthuman, their own everyday social conditions will constantly remain picayune to the (post)humans who partake in those routines that sustain their material existence. Concordantly, Guy Standing proposes that the prevalent Marxist term proletariat is no longer applicable to twenty-first century social analyses given, amongst other factors, the decreasing amount of permanent contracts available to employees. He subsequently suggests that modern socio-utopian philosophies instead need to reorganize around the term precariat, defined as that class which "is faced by systematic insecurity" (Standing 156). By Standing's definition, precarious existences keep the individuals which comprise the precariat absorbed by the menial elements of their lives rather than the overarching truths, forcing these subjects to adopt the short view in order to survive at all, and so tying them and their desires to the material base of their society.

In *The Windup Girl's* "late twenty-second century" (72) setting, during a so-called "new Expansion" (140), the figure of the precariat is bleakly extrapolated into the future by the high prevalence of precariousness in the lives of the novel's citizens. The novel's speculative premise is that our own age—referred to diegetically as the "old Expansion" (10)—was followed by a near-apocalyptic "Contraction" (96) caused by the dissipation of global oil supplies, and then in turn by a time of "calorie wars and plagues" (90). At the point at which the novel's narrative takes place, precariousness is wielded as an ideological apparatus by the Thai ruling classes, as is evidenced by the Kingdom of Thailand's "coal war" (178) against Vietnam, a conflict which only serves to exacerbate the precarious social conditions of its citizens. Despite the distinctions indicated by their nomenclature, the successive phases of societal "development" which the Thailand of the novel has undergone are all defined by precariousness, their material conditions having the tangible effect of consuming the cognitive capacity of Thailand's citizenry, and so contributing to the determination of a political axis of conservatism, rather than ever of change.

Although the true revolutionization of the social "can succeed only as a repetition of a first failed attempt" (Žižek 63) which has preceded it, the progress of a society towards equality is never a given and can only be realized by political action and reform. Consequently individual consciousness in the

novel is not only subject, but rather starkly acquiescent, to the menial processes which facilitate it. *The Windup Girl's* Thailand is a material reality symbolically underscored by the characters' enclosure by the seawall which "looms with its massive lock system" (91). The towering seawall appears to panoptically oversee all their endeavours, and so perpetually reminds them that they inhabit what would be "a city underwater" (169), but for their continued labor. Since "to be precariatised is to be subject to [...] living in the present, without a secure identity or sense of development achieved through work and lifestyle" (Standing 16), the novel's various protagonists all exhibit a fixation on their respective quotidian conditions.

In his vocation as a kink-spring factory manager, Hock Seng's "[e]very day" (46) existence involves sitting and pondering the unattainability of the blueprints for recreating AgriGen's genehacked algae, which are secreted away within a great safe, "a monolith of forged steel, impervious to everything except patience and diamond drills" (46). As he disconsolately muses to himself, "there are new empires waiting to be built, if only [he] can reach the documents," (46) yet just as is the case for Seng, the precarious existences preconditioned by capitalist societies always keep subjects in the position of never being able to reach that little bit further to exceed their material conditions. Thus, subjects rarely attain the social agency necessary to be able to envision and bring about alternative material conditions, as "when you are poor, economic challenges are more than just economic, they are also cognitive [and so] difficult decisions tax scarce cognitive resources even further" (Schilbach 438). The extent to which material conditions dominate cognitive processes, and hence impair social agency, is especially apparent when, after the anchor pads are disabled by Jaidee's white shirts, Seng curses "that he was a fool and didn't put his nose to the wind, that he let himself be distracted from bare survival by the urgent wish to do something more, to reach ahead" (111). For the precariat, attempts to venture toward utopian horizons are all too often curtailed in their infancy, and hence to dream beyond the mundane present is a luxury which can scarcely be afforded.

If, as Schilbach proposes, any given individual's material conditions radically influence their cognitive situation, discovering modes of imagination which are capable of envisioning alternatives to capitalist modes of production becomes a more imperative task than ever. Although Western societies have "traditionally viewed cognitive capacity as fixed, [...] it can change with circumstances" (Schilbach 437), and hence social advancement is next to impossible in *The Windup Girl's* Thailand, which is defined by strife to the extent that "twenty-five percent reliability" (14) is to be celebrated. As "Scarcity narrows your focus to your immediate lack, to the meeting that's starting in five minutes or the bills that need to be paid tomorrow" (Bregman 57), Seng's precarious livelihood is precisely the reason why he orders the kink spring production line to be reopened although he is made aware that "the baths are impure" (188) and potentially harbour a virulent contagion. As Seng states, "if

we don't get the line running we all starve" (189), yet it is precisely his oversight in reopening the production line without adequate precaution which ultimately contaminates the factory irreparably. As the impossibility of his decision illustrates, precarious social conditions and cognitive burdens operate within a closed negative feedback loop.

Unlike Seng, windups like Emiko have been engineered to be physically superior to their (post)human masters—having, amongst other genetic augmentations, "perfect eyesight and perfect skin and disease-and-cancer-resistant genes" (50)—with the result that Emiko is more posthuman than her creators themselves are. Nevertheless, Emiko's species has similarly been crippled by its creators' anthropocentric thought processes, with the result that her biology itself ensures her subservience, and subsequently, that her life is genetically conditioned to be precarious. Emiko has been genetically engineered to be "servile as a dog" (262) towards the species which created her, and can easily overheat due to the "poor genetic design" (160) of her thermoregulatory system, so although she is "optimal" (283), she is optimal specifically for "a rich man's climate control" (51). Specifically, since she was designed to only be "a disposable Japanese toy" (55), her social agency has been calculatingly manufactured to include a critical flaw, and she therefore needs to find "a way to cool herself" (152) down numerous times a day:

In the privacy of the open air and the setting sun, she bathes. It is a ritual process, a careful cleansing. The bucket of water, a fingerling of soap. She squats beside the bucket and ladles the warm water over herself. It is a precise thing, a scripted act [...] each move choreographed, a worship of scarcity (148).

Although cooling down regularly is a habitual activity for her, Emiko bathes with an undeniably reverent care for her body, her assiduousness born of a determination to perform the process faultlessly, and so to be able to exert a brief mastery over her bodily processes. Coolness forms a brief and invigorating release for her, but it is a freedom won only through a process of engagement with scarce resources, and hence short-lived. If "freedom is the possibility of something new and truly different coming about" (Suvin 82), then as long as Emiko remains in a continual state of conflict with her own body, "and despises herself for it" (66), she has far less cognitive agency, and hence there is far less possibility of her rebelling. Her need to cool herself thereby nullifies the dissident potential which would otherwise be enclosed by her constant utopian longing for "a place for New People" (220), a desire which absorbs her thought processes "every day, every minute, every second" (220).

Where characters in *The Windup Girl* do have the cognitive freedom to be able to envision social alternatives to their current material conditions, their utopian desires are often misdirected by religious and/or superstitious ideologies. Emiko and the rest of her kind are led to believe that "their duty was to serve [...] and their reward would come in the next life, when they became fully human" (221). This doctrine is emblematic of the manner in which capitalistic systems strive to keep populations "deprived of organizational

structures that permit individuals lacking resources to discover what they think and believe in interaction with others, to formulate their own concerns and programs, and to act to realize them" (Chomsky 171). Religious observance in the novel, then, figures as a form of purchase with which characters attempt to secure a teleological, yet deeply intangible future state, as an imagined alternative reality to their habitual material conditions. The appeasement of gods is often even shown to be a higher priority than attaining sustenance in their society, as is apparent in the instance where Hock Seng offers a blood orange as a platitude for good luck; "a ripe one, clean of contamination, and expensive" (48). As here, the citizens of the novel's Thailand are moved to squander valuable material resources on the supplication of divinities in the vain hope of bringing about a better world from an otherwise utterly hopeless situation. Plainly, they conceive that divine intervention is now the only mode by which utopianism is conceivable.

The utopian purpose which emerges from the dystopia of *The Windup Girl* is therefore deeply imbricated in matters of class and inequality, and highlights the need for a (post)human awareness which understands social matters using a continually evolving sociopolitical vocabulary, such as Standing's neologized terms precariat and salariat. As is underscored by the abhorrent design flaws genetically coded into windups, (post)human social theory must be able to keep pace with and respond to the ethical issues raised by technological advancements, as new social causes which need to be advocated for will arise periodically as we advance further into the (post)human future. Specifically, there is a need to remain aware that the nature of a sentient species' origin—whether it arises evolutionarily, technologically, or through bioengineering—should be unconnected to any consideration of its rights. Thus, we must aim for our societies to achieve a non-anthropocentric awareness that all life is ultimately only "the embodiment of multiple crossings of information/data and the linkages of these bits of data" (Nayar 60).

Such an awareness is already a foundational presumption of many innovative sociological theories which can be loosely categorized under the label biopolitical feminisms; such as cyberfeminism, ecofeminism, and biopolitics and its cognate field postnaturalism. According to Kristen Loveland, in the late 1980s, a number of discourses within feminism began to conceive that "the concept of self-determination had lost its meaning and utility in an era when scientists could produce embryos in the lab and diagnose them in the womb" (75), and hence strands of feminism began to diversify into the field of biopolitics. Unsurprisingly, then, the closely interrelated fields within biopolitical feminisms can also be demonstrated to be intimately affiliated with posthumanism. As is also true for posthumanist discourses, biopolitical feminist discourses are all capable of promoting an entirely non-essentialist awareness of gender in order to "re-tool the human sciences and prepare us to meet up with the on-going transformations of the world" (Åsberg 11).

Throughout the recorded social history of our species, binarisms have "intentionally constructed otherness or a colonization of being, [...] created, maintained, and enacted racism, patriarchy and heterosexism" (Tlostanova 26), and hence have been an essential component of a wide range of discriminatory practices. Accordingly, biopolitical feminisms posit that since the advent of technology blurs many conventional essentialist boundaries between constructed notions of our species and the natural world, it can no longer be argued that there is any true essence to femaleness. As a new form of body politics, postnaturalism attempts to decentre androcentrism by refuting many of the constitutive fundaments of 'human nature' altogether. Since "From the feeding bottle to *ex vivo* embryos, technology holds great potential for [...] feminists to blur the lines between culture/nature and related gender dualisms" (Lam 55), the discursive concerns of postnaturalism are often directly complimentary to those of posthumanism.

An essentialist feminist reading of Kim Stanley Robinson's *Aurora* would likely argue that spaceflight is usually undertaken in phallic spaceships, and that the novel's sentient spaceship Ship was "launched on its voyage as if between closing scissor blades" (50). Ship's method of launch might therefore be construed as a metaphor of birth from between female legs; however, such a reading would be rather reductive. Rather, as a sentient spaceship which "looks like two wheels and their axle" (50) rather than a phallus, Ship is indeterminate in terms of conventional gendered readings, and is more accurately construed as an animate postnatural environment. Proceeding from a postnatural reading of the novel, Ship's sentience can be seen not a mode of anthropomorphizing it, but instead as a way of demonstrating a (post)human affinity with the natural, a kinship further manifested in the narrative through its crew's mutualistic interaction with its biomes. The mutualistic relationship between Ship and its crew is apparent during the preparation of the latter for cryogenic sleep, at which point they "undressed and lay on their refrigerator beds naked and were covered by [...] a complex part of the hibernautic envelope that would soon completely surround them" (318). Importantly, this passage is imbued with a high repetitive quotient, since it defamiliarizes sleep—a quotidian process experienced by both Ship's crew and the reader—to the point that it becomes a novelty, a futuristic form of cryogenics capable of eliciting "a century of dreaming" (320).[2] Although this passage could be figured as the crew's symbolic return to the womb, given that postnaturalism "calls for a non-reductionist, interdisciplinary, and synthesizing understanding of a whole series of interlocking relations" (Merrick 218), such gendered imagery within *Aurora* should be recognized as postnatural rather than conventionally gendered, by virtue of Ship's technological novelty.

Moreover, *Aurora* also "challenge[s] traditional notions of what counts as 'human' and what counts as 'nature'" (Merrick 227) through the crew's quotidian appraisal of Ship. When the novel depicts the naturalness of the crew's close interdependence and necessitated symbiotic relationship with a

postnatural environment which is necessary to sustain both themselves and the future generations of their voyage, it exhibits the falsity of conventional binarisms, such as the rigid distinction often drawn between technology and nature. This is evident when Euan claims that Aurora's day cannot be measured by any "unit of time [they] had on the ship" (134), only for Freya to respond, "yes we did [...] Women's periods. We brought the months with us" (134). The text hereby science-fictionalises a 'natural' aspect of femininity; Freya's retort demonstrates that since "patriarchy has depended on a gendered dualism that includes technology/biology, subversion of that dualism is liberatory" (Lam 58). The text therefore emphasises the emancipatory drive of postnaturalism.

Furthermore, Ship's subdivision into biomes has allowed distinct (post)human cultures to evolve through separate closed ecological systems over decades, so that upon meeting, the residents of different biomes often find each other's cultural mundane intensely defamiliarizing. Freya, for example, finds the childrearing customs and coming-of-age ceremony of the inhabitants of the nearby biome Labrador "crazy" (61). Their everyday agrarian lifestyle and ambivalence towards the technological basis of Ship seem almost indecipherable to her at first. The residents of Labrador in fact, allow their children to mature to adolescence before disabusing them of the notion that they are anything other than animals living entirely naturalistic lives. Only then do they reveal to them that they are members of a species which has technologically constructed the environment which they have resided upon from birth. By emphasizing the falsity of pervasive binarisms between the (post)human/natural in this manner, *Aurora* simultaneously shatters the inter-reliant binarism of male/female gender and contributes to an understanding that "there is nothing about being "female" that naturally binds women. There is not even such a state as "being" female, itself a highly complex category constructed in contested sexual scientific discourses and other social practices" (Haraway 311).

The repetitive nature of the processes which comprise the interaction between Ship and its crew is foregrounded when Devi explains the importance of their ecosystem to Freya:

It's always the same. Everything in here has to cycle in a balance. [...] There has to be an equilibrium in the back-and-forth between the plants and the carbon dioxide in the air. You don't have to keep it perfectly level, but when one side hits the ground you have to have some legs to push it back up again. [...] And our ability to figure out how to do that depends on our models, and really it's too complex to model. [...] So we try to do everything by little bits and watch what happens. Because we don't really understand (10).

The highly cyclical nature of these organic processes mandates that humans need to constantly participate in Ship's operation. Accordingly, its crew are never depicted as the masters of Ship, or as being at a remove from nature, but rather are shown to function as necessary participants within its ecological systems. In order to preserve their own life processes, it is necessary for the crew to ensure they adhere to the principle that "Everything needs to loop in

long loops, and never stop looping" (12) within Ship's ecosystems. They must achieve this by ensuring the continuance of these cyclical biological processes, in addition to maintaining their own equitable communality. Similarly, in (post)human societies; the "drugs we ingest are flushed out of our bodies and into lakes, seas and other bodies of water" (Åsberg 7); the "ocean floor [is beginning to] subside due to elastic deformation" (Frederikse 306); and we are currently instigating the sixth planetary mass extinction event (Kolbert 8). Evidently, the anthropogenic impact on Earth renders it no longer natural, but rather postnatural, meaning that the "binarisms around which definitions of the subject and of gender relations are structured become unstable" (Wolmark 57). The crew's interaction with Ship can therefore be seen as an estranged reflection of the manner in which (post)human societies are inevitably postnatural, and should rightly be considered as constituent parts of the conglomerate entity which is our planetary environment, rather than as beings who are in any manner separate from it.

It is particularly telling that although Ship is *Aurora's* centralizing novum, its crew refer to it as "this thing" (15), and have a strong sense of what is "usual" (98) aboard it. The crew's environment is thus hypernaturalized. In order to ensure their own survival, they must remain exceedingly aware of their relationship to their mundane surroundings at all times, even though they are utterly habitualized to Ship's supreme quality of technological newness. The symbiotic relationship between Ship and its crew is poignantly contrasted by the almost immediate aftermath of the crew's arrival on the eponymous Aurora, where it is soon realized that the intense and unrelenting planetary winds will "be a hard thing to deal with" (144). The circadian clocks of Aurora's explorers soon become disrupted by planetary "days and nights last[ing] nine days each, the day always full sunlight" (133), and the new planet—which was long "craved" (80) as a place where "they could spread their wings and fly" (80)— quickly becomes "tedious" (140), despite it previously being a cause to "wow" (136). The crew are forced to accept the bathetic truth that, after a journey which has lasted generations, they will be prevented from inhabiting Aurora by the dictates of their circadian rhythms, and this is of course a deliberate irony, given that Aurora's namesake is the Roman goddess of the dawn.

As a result of the crew's egregious disappointment with the planet they and their ancestors had lived their lives hoping to colonize, *Aurora's* linear narrative journey towards a definite objective is subverted, and the crew begin the return voyage "home" (265) aboard Ship, reinhabiting their postnatural environment once more. The crew's quotidian existence onboard is now threatened, however, as a scarcity of resources on an elemental level is fast-descending upon them. When famine ensues, the practice of human nourishment, which was previously habitual and therefore unconsidered in philosophical terms, is discussed so frequently there is "no other topic of conversation" (307). The extent of the crew and Ship's interdependence is thereby reinscribed, emphasizing that (post)humans are to no extent autonomous of their environment.

Intriguingly, since Ship is "aware, in a way no single human could be" (87), it finds it possible to retrospectively differentiate between the quotidian occurrences which have transpired onboard itself between members of its crew. Although (post)human memory is unreliable, and our species is prone to become habitualized, and therefore unable to distinguish between quotidian events, Ship has perfect recall. Ship is therefore able to note that there have been "so many night talks like this. Several thousand of them, depending on how one interprets "like this."" (115), during an instance in which Devi is communicating with it late at night. As a metaphor for the postnatural environment, Ship is hence shown to be more capable of ordering and interpreting (post)human experiences than the (post)humans who inhabit it themselves are, thereby acting as a reliable archive of the commonality of their and its own experiences.

As Donna Haraway states, given that "the difference between machine and organism is thoroughly blurred; mind, body, and tool are on very intimate terms" in (post)human times (320). It consequently becomes imperative to decentre the role of the (post)human in our politics of relation to the environment. *Aurora* ends with the first experiences of the surviving portion of Ship's crew upon the immensely more expansive postnatural environment of Earth, so that the text's metaphor of the postnatural comes full circle. For Sarah Lefanu, "science fiction and feminism can engage in a fruitful interplay that releases the writers' imaginations to explore new relations between ideas of inside and outside, self and world" (20), and this is exactly what Ship's recursive journey to Aurora has achieved by its conclusion. Via *Aurora's* posthuman dream, our contemporary world has gained cognition of alternate, and fundamentally utopian, biopolitical relations which can be striven for, relations which radically defy normative constructions of gender.

The social agendas materialized by the posthuman dreams of the three texts which have been analyzed in this article show an acute awareness that all social concerns are interrelated. Likewise, technological progress, the factor which ultimately mediates (post)human advancement, will not continue indefinitely unless the social and environmental spheres of our societies are recognized as being of paramount importance to the political and economic spheres. As these contemporary texts delineate, it is necessary to ensure that the social sphere does not develop in a manner unfavourable to (post)human autonomy, or in a manner uninformed by the concerns of emancipatory countercultures. The posthuman dream, as expressed through these three SF texts, can thus be seen to be fundamentally hyperstitial, as it functions to bring about its own fulfilment, whilst attempting to "reconceptualiz[e] the "political" in relation to social complexity" (Wolfe 126) under the understanding that social development is, in itself, profoundly stochastic.

The posthuman dream recognizes that in the posthuman future, many prominent modern societal constructs such as economics, democracy, human rights, and international relations may no longer bear any relevance whatsoever to contemporary day-to-day life, and hence new forms of social concerns will

emerge. This places the vein of utopianism it advocates outside of the realm of overly-deterministic grand narratives. Although we can attempt, we can barely begin to extrapolate what later forms of (post)human society will look like, and so successful SF should always strive to "be wiser than the world it speaks to" (Suvin 36). Thus, by grounding its speculative narratives in our contemporary social mundane, SF demonstrates that the continual development of our current social concerns and discourses is as important to the future of our species as are our contemporary social concerns *per se*. Because of its prospective aspect, utopia is above all a space of possibility, and posthumanism holds the potential to rehabilitate that space of possibility just as much as utopianism holds the potential to judiciously define the posthuman future.

        This article has demonstrated that the prominent representation of the (post)human quotidian and its associated repetitive phenomena within modern works of SF comprises a fundamental drive of the genre, which functions to analogize the interrelated nature of the (post)human present and its posthuman future. SF, it has been demonstrated, exhibits a posthuman dream, which encourages its readers to conceptualize the posthuman future in terms of a gradual continuum, and hence the genre encourages us to recognize that any posthuman future which may arise will be deeply conversant with our own mundane lives in the present.

Notes

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[1] Henceforth SF.

[2] *Aurora* also intertextually invokes the fairytale *Sleeping Beauty* here, perhaps as a means of comment that the crew's (post)human society has become technologically advanced enough to be able to make real that which was only possible within the realm of fantasy when Charles Perrault first penned the story more than three centuries ago.

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