LITERARY GEOGRAPHIES

“Post-Industrial Barbarians”: Star Trek, the Other, and the Apocalypse

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Abstract:
Following recent work in *Literary Geographies* on critical worldbuilding, a related thread throughout geography examining narratives of apocalypse, and the recent resurgence of *Star Trek,* this paper employs the concept of first contact to explore various forms of apocalyptic avoidance. In the context of the Anthropocene, we argue that science fiction, such as *Star Trek,* illuminates processes of othering and the intersectional nature of ecological, social, and economic violence. Referring to the first contact between alien species, in *Star Trek* the first ‘first contact’ - depicted in film, *Star Trek: First Contact* (1996) set in a post-apocalyptic United States - initiates a global human unity and eventually a universe (at least working towards) eliminating sexism, racism, and capitalism and protecting the environment. This paper expands on the idea of a geographies of *Star Trek* to examine how the discourse of *Star Trek*, with its soon to be twelve series and thirteen films, engages with an alternative future of apocalyptic avoidance through the lens of first contact. Just as the Anthropocene and our current climate crises are rooted in ecological disaster, these many apocalyptic realities of our world also have social and economic underpinnings. Similarly, as processes of othering often reveal the social violence of colonialism, microaggressions, and other forms of hate, the economic and ecologic Other are just as worthy of consideration. Through *Star Trek*, we illustrate discources of de-othering ecological, social, economic violence through a metaphorical first contact with

the environmental, social, and economic crises we currently face. Just as *Star Trek* itself classifies the neoliberal corporate and political elites of the twenty-first century as "post-industrial barbarians," through a utopian frame, we too delve into the barbarity of empathetic absence in a not yet post-apocalyptic world.

Keywords: Star Trek; Science Fiction; Utopia; Apocalypse; Othering; Anthropocene.

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Introduction

Indulging in the definition of the Anthropocene, which holds humans at its core, this paper explores various forms of apocalypse in the *Star Trek* universe, and the means by which the term 'first contact' roots this apocalyptic relationship with the Other. Well beyond the alien Other-turned-Federation within *Star Trek's* utopian interstellar future, this article examines further examples of 'first contact.' Within *Star Trek*, first contact refers to the first contact between two alien species. Its primary manifestation between humans and Vulcans[1] signaled the supposed end to the Anthropocene with the ushering in of a trans-planetary governing structure following a late-twenty-first century nuclear apocalypse. First contact, both in this very specific manifestation within the *Star Trek* universe and much more broadly, can be clearly linked with an apocalyptic avoidance and the utopia envisioned by *Star Trek* creator, Gene Roddenberry and other *Star Trek* writers, directors, actors, and fans. We believe there are vital points to make from the metaphors and processes of first contact as a literary and geographical device. However, there is also the very real possibly of falling into the trap of the colonial gaze through an idea of first contact. While *Star Trek* certainly emulates the "human-centered" and "space-colonialist fantasy" common in 20th century science fiction, we argue significant elements of *Star Trek* critically reflect internally upon themselves and *Star Trek*'s tropes in the same way as Butler's (1998) *Parable of the Talents* (Canavan 2021: 266). Even in the first instance of first contact, the humans were the ones approached rather than vice-versa. We employ the term less as a possible colonial critique of *Star Trek*, which has been dealt with in the work of others, and more as a mode of intercultural and decentralized communication. After all, this contact initiated a global human unity and eventually, what many know as *Star Trek*, a universe (at least working towards) eliminating sexism, racism, and capitalism and protecting human rights and the environment.

Ideally, our planet need not endure another nuclear world war nor wait until 2063[2] and contact with an alien species to make some essential 'first contacts.' This paper, instead, argues that through many of the ecological, sociological, and geographical lessons presented in a literary reading of *Star Trek*, both prior to and post-apocalypse, we might read something into our own 'first contacts' within the Anthropocene. We present these

first contacts not only within the context of apocalypse but within structural processes of othering which map onto explicit and implicit geographies of violence. What if, instead of waiting for a flying saucer of Vulcans, those with the power for structural change made first contact with the environmental, social, and economic crises we currently face?

This paper expands on *The Geographies of Star Trek* (Rhodes, Davidson, and Gunderman 2017) to examine how the discourse of *Star Trek*, with its now ten (soon to be twelve) series and thirteen films, engages with an alternative future of apocalyptic avoidance. Recent work by Neilson (2019) on disaster and the Anthropocene in *Star Wars* sets up a parallel study whereby *Star Wars* remains in a constant state of apocalypse across time. Instead, through *Star Trek,* viewers are 'shown the light' of a more utopic *post*-apocalyptic world. In a recent issue of this journal, Gunderman (2020) asks how *Doctor Who* may serve as a framework for cosmopolitanism, geographies of peace, and a more empathic narrative of the Other. Drawing from these previous works, we similarly seek out *Star Trek's* economic, environmental, and social framing of the Other in the context of the Anthropocene.

Notably, there are still several veins of apocalyptic thought running throughout the *Star Trek* universe, and, as with much of science fiction, dystopia and apocalypse are often core narratives (Greeley 1979). Stockwell (2010) even states that *Star Trek,* while outwardly utopian, encounters "apocalyptic twists" almost weekly. While the ideals of *Star Trek* may be utopian and post-anthropocentric, certain discourses nonetheless indicate otherwise -- as explored particularly in the darker series *Star Trek: Deep Space Nine* (*DS9*) and *Star Trek: Picard* (*Picard*), as well as in critical scholarship on the series. This dialectic of a post-capitalist television show produced in our hyper-capitalist media age complicates these processes, as (almost) all actors within the series are human, alongside the majority of characters. And one often recurring narrative is the supposedly inherent tension between utopian post-anthropocentric treatment of others during first contact and the apocalyptic tensions these Others face. As Garforth (2018: 9) addresses, in the context of utopian studies and environmental envisioning, utopias 'stimulate critical and creative reflection on alternative' presents.

As geographers, we follow others who have clearly tied science fiction into the ecological apocalypse (Whyte 2018; Garforth 2019; Menga and Davies 2020), but this paper further roots the apocalypse into its socioeconomic undertones (as indicated by Gergen, Smith and Vasudevon 2020). Furthermore, we demonstrate how geography may explore beyond past interests in dystopian science fiction to ask how to critique and apply the *utopian.* Similarly, Cassegård and Thörn (2018: 563) suggest that:

> [r]ather than necessarily implying passivity or mere mourning, we contend that postapocalyptic narratives can be the wellspring of a postapocalyptic politics in which activism arises as a response to loss. This politics, however, can only be understood by scrutinizing the particular utopian imagination brought into play by this discourse, its relation to time–space, and the way it constructs collective identity.

In many ways, this is the context of *Star Trek* - a postapocalyptic utopia crafted through twentieth century (and now twenty-first) politics. How might audiences learn from or in

spite of *Star Trek* in overcoming the generation of waste, both human and non-human, through the exploitative nature of our capitalist-state systems? Through a discursive exploration of the apocalyptic Other (ecological, social, and economic systems) in *Star Trek*, this paper lays out a charter for apocalyptic avoidance in the Anthropocene.

The Apocalyptic Other and the Spatial Relations of Media Landscapes

As a key component of political, geopolitical, and popular geopolitical discourse, the creation and alienation of the Other in science fiction and media more broadly have been core tropes. At the same time, however, science fiction, particularly subgenres, such as Afrofuturism, cli-fi, and solarpunk, have used further literary devices to explore alternative pasts, presents, and futures where imperial injustices, economic systems, or environmental policies and actions shift from their current trajectories. We find particular synergy with works one might classify as solarpunk as a science fiction aesthetic that rejects capitalism and a human-nature binary in favor of a world instead working towards equity and understanding. Latham's (2017) anthology collects many of these works. For instance, they address the role of Afrofuturism as a means to empower Black individuals via future, past, or present narratives and acknowledge that 'Black existence and science fiction are one and the same.' Consider Butler's (1998) *Parable of the Talents.* Her combination of climate crises, rampant neoliberalism, and racial and class-based discrimination comments on the dystopian possibilities of a "Third World America." She not only brings these current issues into focus as a possible future but highlights an immediate present precarity within a violent neoliberal system whose processes of othering most harm BIPOC (Black, Indigenous, and People of Color) and other disenfranchised voices (c.f. Springer 2016). Similarly, Murphy (1995) illuminates the power of science fiction authors, such as Ursula K Le Guin, to give voice to non-human actors. Below, we deconstruct some of the standard narratives of an ecologic apocalypse to make way for a more holistic understanding of the Anthropocene via science fiction, whereby economic and social concerns equal or even surpass the ecological (Sparks 2018; Evans 2017).

Science fiction's ability to "refocus" the narrative upon the once othered, empowers these alternative pasts, presents, and futures off the page, out of the screen, and into the minds (and perhaps the actions) of audiences. Dillon (2017) provides the example of Indigenous scientific literacies as a means of not only countering the othering effects of Western scientific method, but contributing to the growing movement of Slow Geographies and their necessity for the incorporation and empowerment of Indigenous Geographies (i.e. Bagelman and Bagelman 2016). The double-meaning of our "post-industrial barbarians" title refers to both the dramatic shift in political economy depicted in *Star Trek*, as well as the ongoing violence of our current political economy. Our particular concern explores the devaluation of people, place, labor, and environment accompanying deindustrialization (Carr and Gibson 2016; Hoskins 2016).

While we utilize "the Other" and processes of othering as part of this paper's frame, we nonetheless recognize the contentious nature of the term. The exchanges between Inwood (2013) and Morrison, Johnston, and Longhurst (2013) illuminate the othering metanarratives embedded in the very discussions of an all-too-often essentialized Other.

They help orient our own work away from discussions of Other-as-subject and towards Other-as-process. Just as Devadoss (2020) links processes of othering to the everyday, particularly through colonial language and microaggressions, we see similar uses of language throughout *Star Trek* which not only perpetuate these processes of othering, but address them. One benefit of *Star Trek's* more philosophical nature is the show's ability for self-reflection, and in some cases that includes close examinations of othering, microaggressions, and their impact on socio-spatial relations between cultures.

We rely heavily on discourse analysis and a subjective selection of examples across the various *Star Trek* series and films to address our questions (see Appendix 1 for a full list of episodes and films discussed below). Through our analysis, we sought out not only examples of power portrayed through the language of the script and acting, but in many cases through the show itself. As we have stated, while *Star Trek's* goals are to be above racism, sexism, homophobia, class, etc… there are nonetheless these violent discourses in text and performance. Furthermore, this discourse analysis was also conducted in the context of a course where the authors engaged weekly in conversations around our research questions, methods, and findings spurring processes of discovery. This process, over 15 weeks, allowed a more organic, though still clearly subjective process of identifying and analyzing apocalyptic narratives. These narratives of othering, set into broader popular culture and media landscapes, expose the spatial properties of economic, ecological, and social collapse and/or utopia in the post-Anthropocene setting of *Star Trek*.

Geographies of Star Trek

> To lightly dismiss science fiction is to ignore an important cultural genre that is worthy of careful scrutiny by the geography discipline. (Dalby 2003: 8)

Few sources of popular culture are as far-reaching or as extensive as the *Star Trek* universe. Since the saga first aired on television in 1966, as of 2022 more of those years than not have seen new episodes of *Star Trek,* with thirteen of those years airing more than one series at once. There are currently four (soon to be five) series "airing" new episodes. In total there are over 800 episodes of *Star Trek*. That's not to mention the successful (and less successful) films, video games, books, comics, and of course fan culture and the permeance of *Star Trek* into many other elements of popular culture (McAuley 2018). Reading the geographies of *Star Trek*, then, is in many ways a matter of literary geographies. And just as Saunders (2010: 438) highlights not only the necessity to continue to re-read text and its multiple shifting spatial and temporal narratives embedded in the 'imaginative writing that has motivated literary geography' we, too, not only approach some contemporary works of science fiction but also revisit past films and episodes.

Central to the plot of the *Star Trek* film *First Contact* [1996], a nuclear World War 3 in the late twenty-first century between nation-states drives humans to develop the technology to leave Earth and travel beyond the speed of light, initiating first contact. As we learn from piecing together various historical accounts throughout the series, the hundred years following that first contact in 2063 saw the dissolution of the nation-state, abandonment of fossil fuels, an end of capitalism as a United Earth government slowly

absorbed the sovereignty of individual states and regions, and a protein resequencer (the predecessor to the replicator) paved the way for food, and later almost any matter, to be replicated. As Stone (2019) critiques, however, *Star Trek* on a whole has failed to adequately address climate change in its universe. While we were hoping to counter their argument that at no point in any series or film does *Star Trek* directly address Earth's climate change, we have yet to find anything to the contrary beyond the many literary metaphors used throughout the series. As Stone writes, 'compared with the amount of time the series devotes to, say, the rights of artificial beings, the perils of genetic engineering, or just fighting Nazis, climate change seems notably underserved by the franchise.'

Star Trek reflects upon transnational connections and xenophobia associated with state borders, capitalism and the exploitative forces that render goods and people as waste in an increasingly commodified world, and our climate crisis. All three "alien" concepts lead towards an apocalyptic trajectory by 2063 should some form of "first contact" not occur. While answers in our political economy could of course address all three concerns, and each of these approaches impact one another, for the sake of this paper, we address each form of apocalyptic othering as relatively separate in the context of first contact and *Star Trek*.

While *Star Trek* began as an idealized future riddled with the colonial (Fulton 1994; Grewell 2001; Neumann 2001; McGeough 2016; Davidson 2017), sexist (Greven 2008), and racist (Barber 2017; Seitz 2017; Alexander 2016; Pounds 2009) markings of contemporary society, as the series advanced, those scars upon that utopian future faded to pave the way for a clearer picture of Roddenbury's idealized transnational-socialist society. Once the 1990s era of *Star Trek* began, and *DS9* (1993-1999) and *Voyager* (1995-2001) came on air, audiences were exposed to how that society might look through Afro-futurist (Kilgore 2014) or Feminist lenses (Dove-Viebahn 2007). At the same time, and no doubt not decoupled from those critical perspectives, the advent of *DS9* also laid the groundwork for uncovering the grit from Roddenbury's "paradise" as a quote from Captain Benjamin Sisko illuminates in season 2:

> On Earth, there is no poverty, no crime, no war. You look out the window of Starfleet Headquarters and you see paradise. Well, it's easy to be a saint in paradise, but the Maquis[5] do not live in paradise. Out there in the Demilitarized Zone, all the problems haven't been solved yet. Out there, there are no saints — just people. Angry, scared, determined people who are going to do whatever it takes to survive, whether it meets with Federation approval or not! (*DS9* 1994 "The Maquis, Part II")

We saw a darker past of the Federation through the eyes of *Star Trek: Enterprise* (2001-2005), which as a show succumbed to more blatent and egregious Hollywood tropes of race, gender, and violence (Greven 2008), and *Star Trek: Discovery* (2017-). Both were set prior to the events of (TOS) *The Original Series* (1966-1969) and the other series. A significant point should be made that for the first time in twenty years, *Star Trek* is once again venturing into the future of their universe. Set twenty years following the events of *The Next Generation (TNG), DS9*, and *Voyager*, *Picard* (2020-) once again delves into those existential questions of utopia, as does *Discovery,* as its third and fourth seasons take place

another 800 years after *Picard*. This is all to reflect upon the typical stereotype of *Star Trek* as a solely utopian telling of the future. Instead, rather than only exploring the avoidance of apocalypse, *Star Trek* reflects the constant processes of *becoming apocalyptic*. Ironically, these imaginary landscapes and alternate futures of science fiction root the apocalypse into the material and more-than-human realities that inform environmental and social collapse.

First Contact with an Ecological Other

First contact, however, is not relegated solely to interpersonal or geopolitical relationships, but enables a rich – and simultaneous – discussion of complex human-environment relations. Historically, *Star Trek* has used its platform as a cult classic - a representation of the Federation's perfect utopia distanced from the horrors of reality through what could affectionately be referred to as "plot armor"- to address countless social issues. Harris (2020) outlines science fiction's contemporary utilization of climate science to present environmental issues in a more consumable format to viewers. Expanding upon Rhodes, Davidson, and Gunderman (2017: 2), and the description of Gene Roddenberry's vision of *Star Trek* as 'more optimistic and more egalitarian than the US of the 1960s,' we explore the way that *TOS, TNG,* and *Voyager* enable a critical engagement and examination of "human"-environment interactions through the "safe" lens of utopian society. Furthermore, in the act of examining those interactions, we can begin to ask: how does *Star Trek* discuss current issues and represent the protagonists' role – i.e. the human role – in dystopian situations, such as environmental disaster scenarios, through the "safe" lens of the United Federation of Planet's utopia?

Overall, our reading revealed two recurring plot points in the Star Trek narrative. First, the crew often happen upon an issue in their travels with which they become entangled and must find a way to fix. In this case, it's possible that the problem stemmed from the Federation, or even humans themselves; however, when that is so, it seems there's *always* some way to fix it. Thus, in these situations the crew is never held accountable, and they rarely walk away and leave a problem they caused unfinished. This will be referred to as the "easy fix," and refers to the human ability to "prevent" the apocalypse through their own means, as well as fix the problems that other races had brought upon themselves. Second, is the "sacrifice ending" where the crew becomes embroiled in a conflict or problem and must make a sacrifice to solve it, or in some cases is *unable* to fix the problem. It is important to note that the sacrifice ending is never the crew's fault. These often involve some sort of moral dilemma, or the choice of prioritizing one being over another. The sacrifice end represents a more realistic take on the "prevention of the apocalypse", forcing the characters - and in turn the viewer - to accept that sometimes, something has to be given up in order to make a difference, and in certain cases there may be no solution.

Star Trek IV: The Voyage Home (the 1986 film) takes place in 1980s San Francisco where the crew attempts to find a long-extinct humpback whale so that it can communicate with a probe about to destroy Earth in the twenty-third century. Neilson (2019) describes the importance of setting when representing a disaster scenario; the "easy fix" episodes certainly play follow this pattern of rooting themselves into the imagined landscape. *Star Trek IV,* for instance, utilizes a familiar temporal and spatial setting to engage with the

ramifications of human-caused mass extinction while still keeping the distance offered by *Star Trek*. This, even on a subconscious level, forces the viewer to engage with the immediacy of this imaginary issue in an imaginary world because of real-life equivalents. *TNG's* 1993 "Force of Nature" puts a different spin on it in their commentary on the climate crisis, in which warp drive emissions (the primary mode of transportation in *Star Trek*) are causing subspace damage in a designated corridor of space. The episode lends itself to a sense of scale, seeing the immense *Enterprise* dwarfed by the personification of humanity's own looming problem.

> PICARD: ...You know, Geordi, I spent the better part of my life exploring space. I've charted new worlds, I've met dozens of new species. And I believe that these were all valuable ends in themselves. Now it seems that all this while, I was helping to damage the thing that I hold most dear.
> LAFORGE: It won't turn out that way, Captain. We still have time to make it better. (TNG 1993 "Force of Nature")

Finally, *Voyager*'s 2001 "Friendship One" takes the audience to a barren wasteland of a planet stuck in a nuclear winter, immediately establishing a disaster setting. The planet would be theoretically inhabitable for humans - size, atmosphere, etc - if not for the massive amounts of radiation caused by improper implementation of "clean" energy. It's revealed that a Federation probe by the name of "Friendship One", containing everything from music to technology, landed on this planet. In turn, the inhabitants used the antimatter technological knowledge in it to power their world; however, they didn't have the experience needed to implement it correctly, resulting in destructive amounts of antimatter radiation. This narrative reflects Earth's own problematic pasts of nuclear energy, on top of ongoing energy crises. However, in each of these examples, there comes that "easy fix"- time travel to save the whales, a restriction on warp travel, nanoprobes fixing the atmosphere- which shows the viewer that, even when the issue may be their fault, something can be done to fix it.

The "sacrifice end" takes a slightly more pessimistic viewpoint on similar issues, but is largely portrayed in a different manner; while the "easy fix" teaches audiences about hopefulness in the face of ramifications of the environmental apocalypse, the "sacrifice end" revolves around the realistic sacrifices needed in the face of ecological apocalypse. In *TOS*'s 1969 "Mark of Gideon", the Enterprise meets the people of Gideon, a proud race that values life above all else, and has made technological strides to lengthen that life so as to become functionally immortal. Kirk faces the dilemma of either allowing Gideon to suffer due to immense overpopulation, or to allow them to use a virus of which he himself is a carrier and kill off volunteers in order to solve the issue. This reflects commonplace-yet-outdated Malthusian ideals of an overpopulation-based apocalypse. In the case of the Gideons, they manage to exacerbate that catastrophe by elongating their lifespan, inflating Malthus' philosophies to an exaggerated scale. Veitch and Kulscar (2018: 145) identify a similar Malthusian theme within late twentieth century comics such as *Green Lantern*; the authors cite urbanization as the perceived force behind overpopulation, modernization,

and "social problems" in the 1970s. "Mark of Gideon" aired in 1969 and echoes similar sentiments.

The 1992 *TNG* episode "The Inner Light" follows a different format, but still echoes the same "sacrifice ending" sentiments; Picard is targeted by a probe, and is made to live out the life of a man who watched his planet die 1000 years prior due to global warming and a sun going supernova. The episode was released in the 1990s, when scientists were beginning to form a consensus about the effects of global warming on the climate, making it immediately relevant to viewers. The episode also includes a scene where Picard attempts to warn the government of the changes he's observed, only to find out they had known for years. The Inner Light is a clear critique of the handling of evidence of climate change by world officials. Lastly, *Voyager's* 1998 "Night" is a commentary on environmental sustainability, capitalism, and the spatial fix of waste exportation. In the episode, the Malon - a race whose economic system hinges heavily on the disposal of toxic waste - chose to prioritize efficiency and profit over morality and sustainability by dumping their society's toxic waste into the Indigenous space of another species, who appear less developed, and thus less important or valuable, than their own. Captain Janeway must choose to sacrifice herself in order to prevent the Malon from entering the Indigenous space or abandon the Night Aliens (the Indigenous Peoples of the region) to the mercy of the Malon.

Star Trek manages to cover a multitude of environmental issues -- pollution, overpopulation and extinction, misuse of nuclear energy, etc. -- that often directly correlate with the political climate. In doing so, it familiarizes audiences with unfamiliar settings and allows them to relate to characters and develop a stage on which to safely play out political critiques. Kitchin and Kneale (2005: 11) describe this as "geocentrism", stating that our extension of geography to encompass space itself leads us to "map the Earth onto the planets we might find beyond our own solar system." Representation of our own geography in *Star Trek* -- and in turn our own issues that come with those geographic imaginaries -- effectively allows us to thoroughly explore those topics much as characters in Star Trek are able to explore other realities in the holodecks.[6] Through these discursive narratives and worldbuilding, we map our geocentrisms and imaginary landscapes to offer possible solutions and different sorts of outcomes, while still catering to and educating a wider audience. Just as Gunderman (2020: 48) identifies *Doctor Who's* ability to project representations of social exploitation onto alien planets, *Star Trek* does so through environmental representations. *Picard* holds potential for these sorts of representations, as well, and speculation continues around this series and the recently announced *Star Trek: Strange New Worlds* series both returning to the classic "planet of the week" style of close-ended episodic plots. Despite being less present than broader questions of economic and social issues, topics pertaining to environmental destruction can be mapped throughout *Star Trek* within the context of an Othered sense of nature and are sure to continue, potentially more frequently, as *Star Trek* moves away from heavily serialized plots.

Processes of Social Othering in *Star Trek*

While nature and capital are certainly Othered processes, academics and the broader fandom and popular culture of *Star Trek* clearly identify *Star Trek*'s engagement of the

social Other as the show's prime directive. The Other regularly emerges on Star Trek in many ways: sometimes as people desperate for assistance or sometimes as advanced societies who feel they are above the Federation. We now explore the literary geographies of these representations and their reflection of our everyday society through ethnocentrism, microaggressions, and colonial language. We hope to demonstrate Star Trek's engagement with "the Other" as a conscious reflection upon twentieth and twenty-first century social relations which perpetuate disproportionately violent structures. At the same time, we draw from Bhabha's (1994) work to decolonize language and reflect on how *Star Trek* 'can' reach beyond a flattened Other, thus breaking the feedback loop of colonialism's othering which categorizes culture and identity rather than individualizing agency and experience.

In the 1995 and 1997 *Voyager* episodes "Ex Post Facto" and "Nemesis," colonial language and microaggressions perpetuate stratified and violent social structures and show how *Star Trek* as a show, rather than the demonstrably fallible Federation ideals, may offer counter narratives to our own social structures. "Ex Post Facto" depicts the murder of a Benean professor which Voyager's helmsmen, Lt. Paris, was accused of committing. Throughout the episode the Numiri people are depicted as aggressive and quick to fight compared to the Benean and Voyager protagonists, with another Voyager character describing them as "never needing an excuse to attack." The mystery of who killed the Benean professor creates an urgent feeling to the episode as the members of Voyager try to save Paris from imprisonment. It is never implied that the Numiri people committed the murder because they are portrayed as less civilized - more barbaric - and thus unable to either plan or execute the technological tactics necessary to frame Paris. These assumptions and portrayals are examples of microaggressions, as there is a disconnect between the lived experience and the generalized perceptions of different cultures (Solorzano, Ceja, and Yosso 2000). These 'subtle, stunning, often automatic, and nonverbal exchanges' which impact the Other, often without either the victim or perpetrator's knowledge of the occurrence (Pierce, Pierce-Gonzalez and Wills 1978: 65; c.f. Pierce 1978), compound and further bifurcate society, shaping the visceral geographies of Otherness (Joshi, McCutcheon, and Sweet 2015). These spatial interactions play out on the screen throughout *Star Trek*, as the show attempts to demonstrate the subtle power of microaggressions in terms of national, racial, or ethnic identity and conflict, but just as Pierce himself pointed out when he coined the term, television itself commits microaggressions and the overall invisibility of Black, LatinX, Indigenous, and Asian human characters throughout *Star Trek,* except for the one or two examples of each, is no exception.

In the *Voyager* episode "Nemesis," the first officer Chakotay crash lands in the middle of a planet-wide civil war. Audiences witness the intense dehumanization of a bi-furcated society where both sides use terms such as "savages" and "beasts" to refer to the other. Whereas these are beyond microaggressions, they still show a divide between facts and perception. The generalization of aggression without broader context, such as these, fuel a perception of barbarism, and as Makolkin (2014: 3) explains, tie together common misconceptions of linear development and dehumanization of the Other (c.f. Nally 2014).

These misconceptions, as played out on screen in both episodes, and throughout much of popular culture, can lead to micro and macro aggressions.

The colonial implications of *Star Trek* also follow the series. Quotes such as those featured above reflect upon the internal dialogue of the *Star Trek* canon and the colonial ontology which it sustains. In "Phage" (1995), *Voyager's* fourth episode, a race known as the Vidiians steals organs from other compatible species in order to cure the phage, a degenerative disease. Throughout the episode (and the antagonists' story arc throughout the series), you see them talk about stealing organs to replace their own to increase their longevity. This colonial mindset, much like that of the Borg[3], or even the Klingons[4], in that their culture is built upon the colonization of bodies, land, or technology, is something Starfleet must consistently overcome. Particularly in this case, when body becomes resource, the Vidiians hold those resources at a higher value than the individual lives that those bodies sustain. As Lawrence and Dua (2005) discuss in their work on decolonizing language, there is a level of denial that happens during colonial conquests. This denial occurs as the Vidiians justify the harvesting of organs in order to sustain their own society yet victimize and literally disembody the Other. Unique in this relationship is the Voyager crew, and Captain Janeway's decision not to interfere with their culture, despite the culture's tendency to use other people for their own benefit, thus in a way breaking a colonial cycle. As we point out, the Federation is literally a colonial entity, but by employing the Prime Directive, which prevented the Federation from interfering in the affairs of any planet that had not yet discovered warp travel, and not continuing a cycle of violence or incapacitating individuals for personal agendas, she also breaks from the colonial gaze. Instead, throughout the story arc, we see empathy, cooperation, and societal change manifest within Vidiian culture following these earlier de-escalation tactics.

Star Trek shows everyday interactions with the Other that parallel viewers' everyday experiences. It depicts xenophobia, microaggressions, and colonial themes as central to apocalyptic dystopia, and despite the colonial implications that are shown within *Star Trek*, it is still and in some ways an increasingly progressive show. The themes that *Star Trek* explores do not stop or begin with the exploration of culture as we have and will demonstrate through ecological and economic intersections; it branches into many other everyday practices people may not regularly consider.

First Contact with an Economic Other

Star Trek presents our own market-based economic system as an othered and archaic system in its speculative future where humans have finally made contact with the inherent exploitation of capitalism. The irony within *Star Trek*, however, is that while all major protagonists and organizations - earth, Star Fleet, and the Federation - have long since rejected the economic systems of capitalism (accruing wealth, market economies, currency, and exploiting natural resources and labor for profit), the show itself is part of its own broader systems of capitalism. Even a fleeting glance at the many attempts to create fan-generated content (e.g. Axinar; see Lerner 2018) reveals the profit-tinted glasses of Paramount/CBS, not to mention the recent proliferation of *Star Trek* shows more likely than not propping up Paramount's online streaming service. Difficult as it may seem to

look beyond these panes of capitalism and into the communal utopia dreamt up by Gene Roddenberry, that is what we strive to do in this following section. How does a post-capitalist system translate in a utopian setting, and how do those concerns and "fixes" of labor and resource exploitation connect into apocalyptic discourse?

Harvey's (1999) introduction to the ideas of the spatial fix sets up multiple points of contact between the means of production, capitalist modes of production, and the necessity of the frontier to primitive accumulation. Limitless space acts as a control valve upon the limits of surplus labor, fixed resources, and contradictions of the "free market." We are currently operating within a system in which capitalism has lost most of its "frontiers" (we write this under the uncertainty of the Covid-19 crises and in the context of serious discussions of substantial neoliberal expansion into the United States Postal Service and public colleges and universities). Instead, capitalism relies increasingly on internal processes of primitive accumulation (free markets, right-to-work, and the increasing grasp of neoliberalism upon global political economy). Obviously, *Star Trek* operates outside of two of these capitalist processes. First, the means of production (processes of securing food, water, and shelter) are generated through replicator technology, whereby almost any known matter can be recycled and regenerated into almost any other known matter. This process would first and foremost push the industrial reserve army past any breaking point, with almost no need for manufacturing or agriculture. Even the production of energy itself transforms, as machines in the *Star Trek* universe run on dilithium - a fictional crystalline substance capable of both substantial energy production and sustainable use – which can be recrystallized mid-use (Okuda and Okuda 1997).

The second significant break between *Star Trek* and capitalist modes of production comes from the limitlessness of space itself. However, while Federation space is clearly not boundless (we often see encounters with Klingon, Cardassian, and Romulan borders[7] throughout the series), the spatial fix becomes quite literal in *Star Trek*.

Dalby (2003: 8), writing on the 'utopias of the spatial fix' and utopias of reimagined environmental relationships, argues that cultural geographers can utilize science fiction as 'a useful foil for critical reflection on the cultural assumptions about nature that modern geography has taken for granted.' The [outer]spatial fix of *Star Trek* realigns the modes of production, and, as we have already argued, the social and environmental relations of "human" culture. In many ways, *Star Trek's* anti- and post-capitalist worldbuilding sits in a unique place in Western popular culture, and this "first contact" with the systems and consequences of capitalism presents significant opportunity for broader discussion.

In a handful of episodes throughout *Star Trek,* the show very clearly stresses to the audience that capitalism is not only outmoded, but incompatible with the newly-formed culture of the (intra)globalized Federation: a culture that no longer abides poverty, racial, ethnic, or gender inequity, or environmental exploitation. Take, for instance, this exchange between the sons of two of the main characters in *DS9:*

> Nog. It's my money, Jake! If you want to bid at the auction, use your own money.
> Jake. I'm Human, I don't have any money.
> Nog. It's not my fault that your species decided to abandon currency-based economics in favor of some philosophy of self-enhancement.

> Jake. Hey, watch it. There's nothing wrong with our philosophy. We work to better ourselves and the rest of Humanity. ("In the Cards" 1997)

Nog, as a Ferengi, is speaking for his entire species in this exchange, reasserting the centrality of capitalism to Ferengi culture. While representations of Ferengi are riddled with antisemitic stereotypes (particularly in TNG), their resistance and even open hostility towards the Federation allows the show to highlight the greed and corruption which drives the violence, sexism, and environmental collapse of the regularly failing Ferengi Alliance. In many ways, the Ferengi Alliance acts as both antithesis to the Federation and also as a metaphor or projection of our current trajectory.[8] While commenting on Earth history and Federation values throughout multiple series, in the 1995 *DS9* episode "Little Green Men" the three Ferengi regulars on the show find themselves on a 1947 US military base. There, Quark, Nog, and Rom come face-to-face with the "violent, petty, bigoted, and selfish" social and geopolitical twentieth century hegemony, a "savage" society destroying their own - our own - planet. Such comments on contemporary society regularly come as characters within all the series happen to find themselves traveling back in time to Earth roughly around the year of the show's production (i.e. Kilgore 2014; Rhodes 2017). Another particularly blatant comment comes from an ancillary *Voyager* character, Captain Braxton: 'after three decades with those post-industrial barbarians I had to go through extensive rehabilitation.' The episode demonstrates the cyberpunk – and apocalyptic - nature of our actual present ("Future's End" 1996 and "Relativity" 1999). This broader discussion of the inherent violence of post-industrial landscapes mirrors the work of urban and cultural geographers exploring industrial heritage. In "Future's End," a technology corporation has acquired massive wealth and power and their capitalist drive overwhelms Braxton leaving him homeless and physically and mentally injured. *Star Trek,* through examples such as Braxton's experience or the antagonist narratives of the Ferengi, reflect upon a fully post-industrial world where all resources – including energy sources – are immaterial. This utopia, however, stands in stark contrast to our own experience since we know that marginalization, exploitation, and violence only multiplies post-industrialization within capitalist modes of production (Barnes et al. 2006; Emery 2019).

Building upon the presentation of the Ferengi in *TNG, DS9* instead introduces Ferengi as protagonists, particularly Quark as a primary character alongside his nephew (Nog) and brother (Rom) as regularly occurring secondary characters. While there are still certainly problematic depictions - again stemming back into the anti-Semitism of the early caricatures - this attention to the Ferengi Other (this 'humanizing,' if you will) - allows *DS9* to demonstrate the agency of actors within an overbearing capitalist society where even politics ("Rules of Acquisition") and religion ("Devine Treasury" and the "Vault of Eternal Destitution") have merged with an overarching ideology of generating profit. If the Ferengi Alliance represents the future apocalypse - the dystopia to the Federation's utopia - and the current trajectory of expanding neoliberal social structure, discourses of individual Ferengi instead demonstrate our path towards apocalyptic avoidance. Most significantly in terms of the relationship between Earth and Ferenginar, Nog enlists in Starfleet, demonstrating a personification of the potential to avoid our own destruction via capitalism.

While there are certainly problematic discourses, and more than a few plot holes, *Star Trek,* overall, regularly engages in "first-contact" of sorts with alternative economic processes. This is so much so that Tim Worstall, a Senior Fellow at the Adam Smith Institute, has argued that 'the economics of Star Trek is thus True Communism,' even the first 'True Communism,' built from the elimination of scarcity, that we've seen (Worstall 2015).

In the 1988 *TNG* episode "The Neutral Zone," Captain Picard attempts to describe the twenty-fourth century to a twentieth century financier:

> A lot has changed in the past three hundred years. People are no longer obsessed with the accumulation of things. We've eliminated hunger, want, the need for possessions. We've grown out of our infancy.

This episode is important not just because it came early in *TNG's* run - setting up the economic and social conditions of the next twenty overlapping seasons of *TNG, DS9,* and *Voyager* - but also because it clearly connects economic and social structures. In this case, removing capitalism removed most social and environmental apocalypses to come, and as Commander Riker even points out in this same episode after observing the three 20th century individuals, 'there's not much to redeem them. Makes one wonder how our species survived the 21st century.' This discourse, from across *Star Trek* canon, reiterates the inseparability of first contact, an alternative economic future, and the avoidance of apocalyptic consequences.

First Contact as Apocalyptic Avoidance

The metaphor of first contact acts as a literary and geographical device to illustrate processes of othering in apocalyptic scenarios. The speculative fiction within *Star Trek* continues to build on of previous work in this journal which asks similar questions of critical worldbuilding more broadly. Martin and Sneegas (2020, 16) "contend that the humanities and social sciences, and geography in particular, have much to add to the interrogation of speculative worlds as such, the processes of their production, as well as the relationships between imagined and lived worlds – including emergent political struggles over speculative media." These considerations of speculative worlds should be more prominent not only throughout geographical research but in our classrooms. Students who are exposed to the critical narratives of science fiction are also exposed to the *possibilities* certain science fictions, such as *Star Trek* or the solarpunk genre, offer (i.e. Elbow and Martinson 1980; Kadonaga 1995; Seitz 2021). In *Star Trek: First Contact* when Lily Sloane asks Picard how much the USS Enterprise-E cost to build, he states:

> The economics of the future is somewhat different. You see, money doesn't exist in the 24th century... The acquisition of wealth is no longer the driving force in our lives. We work to better ourselves and the rest of humanity.

First Contact, more than any other complete narrative in *Star Trek*, highlights an apocalyptic future for Earth, and not just a possible scenario whereby the Enterprise needs to complete its mission, save the day, and restore the timeline to its rightful order, but an apocalypse which has passed, that is inescapable, and most importantly is ever-escalating. In the film, for a brief moment before the ship travels back in time, they visualize that, should they fail in initiating first contact, the Earth will face a complete planet-wide extinction. As we are aware, we are past the point of fixing many apocalyptic scenarios, the seas will rise, the Earth will warm. We are already seeing these and other impacts of our ongoing climate crisis, just as we continue to see apocalyptic events play out at the hands of capitalist and ethnocentrist-fueled violence.

How does one "make first contact" with nature? How do we make that first contact ourselves and, instead of "mapping Earth" onto faraway distant planets, apply those to our own geographies? In doing so, how are we able to further observe the Anthropocene and speculate about the apocalypse, environmental or otherwise? Through the perspectives of characters engaging in that first contact during disaster scenarios, *Star Trek* provides us with discrete identifications of issues we must address, as well as occasionally a framework for both "future" issues (as in *Star Trek IV)* or theoretical fixes. Once again, *Star Trek* in particular has consistently offered critiques of our own landscapes and the issues therein, and one might speculate that in future episodes of Trek - whether that's *Picard, Lower Decks,* or even the much-anticipated *Strange New Worlds* - we may begin to see analogies or avoidance strategies for climate change, global warming, etc. or even COVID-19 itself in a manner similar to *Voyager's* "Critical Care" or *DS9's* "The Quickening." Many of the episodes presented above offer a sense of hope - the idea that we *can* fix things through listening to what science tells us and working to make strides in changing our ways - in the face of the apocalypse that is characteristic of a utopia such as the United Federation of Planets.

The first contact made with humans in *Star Trek* is made to mirror the life of the society that the audience is already involved in, which is demonstrated through the various forms of the Other which they encounter. The utilization of many different tactics of interaction, such as microaggressions, hate speech, or even the limiting of interactions, allows *Star Trek* to utilize first contact as a literary device. The Prime Directive allows for the people of the Federation to interact with others without influencing their culture. Although there are some examples of breaking the Prime Directive - the Federation's policy of non-intervention - the Federation works towards creating a more equal society while still having to overcome its own processes of othering. These biases go further than just influencing interaction with the variety of otherworldly individuals that they encounter, and help play a hand in the economic and environmental aspects of the worlds in which they find themselves.

Finally, the potential for *Star Trek* to engage first contact with capitalism exists. Currently, the obfuscations of free market rhetoric and neoliberal policy continue to exert their power over broader narratives. However, in certain ways *Star Trek* peels back these curtains. Through the examples of the Ferengi homeworld we see a possible apocalyptic future of acid rain, a socioeconomic culture highly unstable due to a reliance on markets, and the everyday neoliberal realities of paying not only for health care, emergency services,

and the means of life, but to enter another person's home or conduct any bureaucratic function. Likewise, we see the realities of sexist, racist, and environmentally detrimental structures which are coupled to the manufactured scarcity created by a privatized means of production. In *Star Trek* the elimination of this scarcity directly led to the revolution which in most ways equalized human society. However, this progression is not obvious, and instead the first contacts we witness blend together: economic, environmental, and social.

While our goal is to present a diverse set of examples from across the *Star Trek* universe, we are aware of our skew towards *Voyager* and *DS9*. Many of these examples of apocalyptic avoidance and first contact could be expanded even further within the *Star Trek* canon, let alone outside of canon and beyond *Star Trek* itself. As one of the most successful, most developed, and most wide-reaching science fiction franchises, *Star Trek* offers possibilities for more detailed critical examinations into human-environment relations or its popular impacts, areas we unfortunately do not cover. In general, a greater examination of socio-spatial relations in *Star Trek* and science fiction, connecting early Marxist writing with ongoing critical revolutions in the field of geography, would bring substantial value into understanding the processes of Othering within science fiction from a standpoint of geography and spatial relations.

Conclusion

Modeled on the United Nations' Preamble, the Charter of the United Federation of Planets establishes a framework in *Star Trek* under which all sentient life maintains fundamental rights and dignity, and within which interstellar resources are to be both collective and sustainable. Given the challenges facing the United Nations and problematic cultural depictions of and within *Star Trek*, these goals align yet fail to see fruition. Even in the *Star Trek* universe, it is clear from our examples and discussion that these attempts at equity present unique and at times seemingly insurmountable challenges. However, by examining these challenges - these apocalyptic narratives - through a lens of a sustainable social, environmental, and economic "First Contact", we believe *Star Trek* offers substantial discourses of apocalyptic avoidance in the face of the Anthropocene.

Particularly in the more critical series, such as *DS9* and *Voyager*, the inclusion of more overtly post-colonial, Afrofuturist, feminist, and Marxist perspectives provides a more critical understanding of the processes of othering. Just as Gunderman (2020) extracts a geography of peace from Doctor Who, we find a geography of the utopian and (post)apocalyptic in *Star Trek*. These literary landscapes throughout the *Star Trek* canon are also inherently geographical as they help answer core questions such as the nature of sustainable human-environment interactions in the context of complex political economies. Likewise, Star Trek explores, through metaphors, successes, and failures, the inherent sociospatial processes of othering. And finally, the embodiment of post-capitalist and hyper-capitalist discourse in the geopolitics and characters in *Star Trek* reflect yet another potential narrative of economic apocalyptic avoidance.

First Contact, as either the 1996 film or as fictional intragalactic law, offers geographers a unique popular geopolitical lens when approaching narratives of apocalypse

and challenges of the Anthropocene. We encourage geographers to not only begin to reach for science fiction when searching for case studies and comparative analyses, but to step back from these speculative fictions and ask how they reflect similar speculative non-fiction. How do those discourses change reflect a *social* science fiction? Just as *Star Trek* approaches first contact as a process which is not just social, but with clear environmental and economic conditions, a similar reading of any such apocalyptic narrative should certainly not ignore the social, economic, or environmental conditions of the Anthropocene.

Notes

[1] The species that Spock belongs to for those familiar with the show.
[2] The year of first contact with the Vulcans.
[3] An organization in political opposition with the Federation due to broader geopolitics.
[4] A computer chamber which projects interactive virtual environments.
[5] A collective, conquering race of technologically assimilated individuals.
[6] A race that is commonly presented as imperial, warlike, and violent.
[7] Often non-Federation-aligned races that are occasionally used as antagonists.
[8] It is important to note that the Ferengi were introduced in *TNG* with the intention that they would serve as the primary antagonists for the series.

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Appendix 1.

Episode (in order of appearance in paper)	Series	Air Date
Star Trek: First Contact	n/a	1996
"The Maquis, Part II"	*Deep Space 9*	1994
Star Trek IV: The Voyage Home	n/a	1986
"Force of Nature"	*The Next Generation*	1993
"Friendship One"	*Voyager*	2001
"Mark of Gideon"	*The Original Series*	1969
"The Inner Light"	*The Next Generation*	1992
"Night"	*Voyager*	1998
"Innocence"	*Voyager*	1996
"Ex Post Facto"	*Voyager*	1995
"Nemesis"	*Voyager*	1996
"Phage"	*Voyager*	1995
"In the Cards"	*Deep Space 9*	1997
"Little Green Men"	*Deep Space Nine*	1995
"Future's End"	*Voyager*	1996
"Relativity"	*Voyager*	1999
"The Neutral Zone"	*The Next Generation*	1988
"Critical Care"	*Voyager*	2000
"The Quickening"	*Deep Space Nine*	1996