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Entering the Multiverse: Perspectives on Alternate Universes and Parallel Worlds

Edited by Paul Booth

## CHAPTER

### **Capitalism and the Multiverse: An Interdisciplinary Exploration of Socio-Economic Influence on Cosmological Concepts**

**Marija Adela Gjorgjioska & Ana Tomičić**

This chapter unravels the complex interplay between the multiverse and the socio-economic ideologies that shape our understanding of it. Integrating cosmology, socio-economic theory, and speculative fiction, we explore how capitalist ideologies color our theories, imaginaries, and perceptions of the multiverse (Fisher 2009, 7). Through the lens of Liu Cixin's (2014) *The Three-Body Problem*<sup>1</sup>, we examine how fiction reproduces capitalist epistemologies onto the concept of the multiverse, challenging the assumption of its inherent diversity (Harvey 1989).

In physics and cosmology, the multiverse refers to a hypothetical set of multiple universes, each with its own set of physical laws, constants, and properties, and arises from theories such as string theory and quantum mechanics, which suggest the possibility of parallel universes existing alongside our own (Greene 2011). In communication studies, the multiverse refers to the diverse range of media platforms, narratives, and communication channels through which information, ideas, and culture are exchanged within society. In this

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<sup>1</sup> "The Three-Body Problem" was originally written within the Chinese context, reflecting aspects of Chinese society during the period covered in the novel/show. It's important to note that during this time, Chinese society was undergoing a transition towards socialism. The Second Centenary Goal of the CPC (Communist Party of China) aims to "build a modern socialist country that is prosperous, strong, democratic, culturally advanced, and harmonious" by 2049. This societal backdrop adds depth to the narrative, as it explores themes of science, society, and ideology against the backdrop of China's evolving socio-political landscape.

context, the multiverse emphasizes the multiplicity and complexity of communication networks and the interconnectedness of different media landscapes (Jenkins 2006). Despite both definitions revolving around the idea of multiple entities existing concurrently, they operate within distinct domains and epistemologies.

*The Three-Body Problem* embodies aspects of both definitions. As a fictional work, it is presented across various platforms (a novel, TV series, and productions by both Tencent and Netflix). Although its science fiction theme, exploring distant solar systems, resonates with the cosmological notion of the multiverse, the novel intersects with communication studies by engaging diverse interpretations surrounding the narrative. Thus, it serves as an intersection of both definitions, showcasing the complex interplay between artistic expression and scientific speculation (Dunne & Raby 2013; Jenkins 2006).

### **The Three-Body Problem: A Literary Metaphor**

*The Three-Body Problem* intertwines Chinese history with advanced physics and alien contact. The story begins during China's Cultural Revolution and follows physicist Ye Wenjie, who becomes involved with a secret government project searching for extraterrestrial intelligence. She contacts an alien civilization, the Trisolarans, who live in a chaotic solar system and are seeking a new home. The novel explores the complexities of communication and the potential for both collaboration and conflict in the face of the unknown, setting the stage for a thought-provoking saga about the future of humanity and its place among the stars. *The Three-Body Problem* explores multiverse-like alternate existences within a unified narrative. Intertwining fiction, multiverse narrative techniques, and capitalist themes, both implicitly and explicitly, we argue that this narrative can be viewed as a canvas where the ideologies of capitalism—competition, expansion, and cyclical growth and decay—are projected onto the fabric of the multiverse, suggesting that our understanding of possible

worlds is influenced by capitalist paradigms (Jameson 2005, 150). Moreover, it invites us to reflect on whether the narrative reproduces or critiques capitalist ideology.

In the novel, Ye Wenjie's character complexity stems from her childhood trauma alongside societal turmoil and familial betrayal, during the Cultural Revolution. Her worldview leads her to question humanity's kindness and rationality, and ultimately its instinct for self-preservation. Her personal disillusionment crystallizes into a nihilistic view of humanity, marked by moral decay, irrationality, and a critical reassessment of its survival instincts. Liu employs Ye's perspective to illustrate what happens when we overlook the way broader socio-political systems shape individuals' morality, rationality, and survival.

Indeed, her rationalization of her experiences do not include an account for the complex interplay of historical, social, and political factors that define human behavior and societal dynamics. Driven by her profound disappointment in humanity, Ye establishes the Earth-Trisolaris Organization (ETO) with the aim of facilitating contact and collaboration with the Trisolarans. The ETO embodies her belief that Earth's salvation may lie in the intervention of a more advanced civilization. This reflects her disillusionment with humanity's capacity to resolve its own crises. Her actions are driven by a hope that an external, more advanced civilization might enforce a reset on Earth's trajectory, which she sees as spiraling towards self-destruction.

Led by her nihilism and pessimism Ye confirms that for her “it's easier to imagine the end of the world than the end of capitalism” (Jameson, 2003). This narrative reveals that the challenges faced by humanity, particularly under the socio-political structure of capitalism, are perceived as endemic rather than circumstantial. Ye's disillusionment, rooted in the specific epoch spanning the latter half of the 20th century and the dawn of the 21st, under capitalism's sway, could also be perceived as a critique targeting the repercussions of this economic system rather than humanity *per se*. However, Ye's perspective conflates

capitalism with human nature, without considering the social construction of this socio-political system, suggesting the extinction of humanity due to the failures of capitalism. Ye's sense of defeatism echoes the sentiment that there is no alternative (TINA) to the current socio-political system.

Trisolaris is considered to be superior to Earth, based on their technological advancements. There is no regard for the socio-political system of Trisolaris, or its relevance to its civilizations' (supposed) superiority in relation to Earth. The narrative primarily explores the Trisolarans' efforts to survive and their interactions with Earth, rather than delving deeply into their social makeup or internal societal organization. However, the Trisolarans do refer to a figure known as the "Princeps," which can be likened to a king or ruling leader in their civilization. This title indicates a hierarchical structure within Trisolaran society, suggesting elements of centralized leadership. The awareness of the socio-political system's significance is notably absent in the consideration of both Earth and Trisolaris, underscoring a critical gap in acknowledging the foundational role these systems play in shaping civilization's trajectory and ethical frameworks. This stance inadvertently endorses supremacism/racism and imperialism, suggesting that a supposedly superior civilization, like Trisolaris, has the right to conquer and impose its systems on Earth, mirroring the mechanisms of colonialism and imperialism as "the highest stage of capitalism" (Lenin 1917, 72).

### **Quantum Insights and Observations: Reimagining Earth's Socio-Political Pathways**

Ye's disillusionment, set against the backdrop of her belief in the superiority of Trisolaris, could be viewed as a critique of humanity's socio-political stagnation under capitalism. This critique, grounded in the story's cosmic scale, paves the way for a deeper exploration of

alternatives, invoking quantum theory to underscore the potential for radical change and diversity in the fabric of our socio-political realities (Barad 2007, 132-135).

In the context of quantum theory, superposition suggests that, until observed, particles exist in all possible states simultaneously (Rosenblum & Kuttner 2006, 87-92). Applied to a macroscopic object like Earth, being "observed" or "measured" by another planet from another solar system could mean that Earth's state becomes defined or "fixed" in relation to that observation. In quantum mechanics, observation collapses the superposition into a single state. By introducing Trisolaris as an external observer, akin to quantum theory's concept of superposition, Liu could imply that Earth's fixation at a specific socio-political point—capitalism—symbolizes a pivotal decision in human history's trajectory, challenging readers to contemplate alternative socio-political realities beyond the status quo. The portrayal of Trisolaris's challenges juxtaposed with Earth's suggests a perspective that Earth's issues may be less insurmountable than perceived. However, the narrative emphasis on scientific solutions hints at an oversight of socio-political and ethical considerations fundamental to addressing civilizations' crises. By presenting characters and scenarios from divergent realities, the narrative invites readers to envision broader socio-political possibilities, challenging the assumption that the current system is immutable and prompting a reimagining of alternative societal structures beyond capitalism. One implication for the spectator could be that witnessing scenarios from different realities within *The Three-Body Problem* might lead to a reevaluation of their understanding of reality. The narrative's contrast between Trisolaris's astrophysical dilemma and Earth's challenges, highlights the self-inflicted nature of Earth's issues, prompting reflection on their potential resolutions.

The story of Trisolaris, illustrated in "The Three-Body Problem," with its civilization's cyclic rises and falls in response to the unpredictable orbits of its three suns, draws a parallel to the fluctuating dynamics characteristic of capitalist markets—highlighted

by cycles of booms and busts, and periods of prosperity followed by downturns. This allegory reflects the cyclical nature of both the fictional Trisolaris and real-world capitalist systems, emphasizing cycles of growth and contraction, alongside the inevitability of innovation becoming obsolete. Jameson's critique on the cultural logic under late capitalism (Jameson 1991) suggests that our perception of diversity among universes, or economic systems, might be more about variations of recurring themes, governed by similar underlying principles such as competition, survival, and adaptation.

Trisolaris's environmental and societal upheavals serve as a metaphor for the competitive essence of capitalism, where civilizations and economies alike are forced to navigate chaos and adapt to survive. This struggle reflects the competitive drive in capitalist societies to innovate in the face of economic challenges and market volatility. However, the narrative extends this metaphor to critique the conventional portrayal of the multiverse in popular culture. Rather than presenting a realm of boundless diversity, it posits a cosmos where civilizations like Trisolaris face inevitable collapse. This choice serves as a commentary on the limitations of the multiverse concept as envisioned through capitalist ideologies, suggesting that differences between realities are superficial, masking an underlying uniformity. Furthermore, Trisolaris's repetitive cycles of crisis and recovery underscore the critique of perceived uniqueness within the multiverse, arguing against the notion that each universe is fundamentally distinct. Instead, it suggests our conceptualization of the multiverse—and our view of capitalist economies—may be influenced by a tendency to replicate familiar patterns. This insight, echoed by Unger (2014), challenges the depth of our imagination within theoretical models of the multiverse, potentially constrained by capitalist thought to a framework defined by repetition and competition. Finally, the narrative suggests that the recurring cycles of collapse and rebirth in Trisolaris, where survival strategies

ultimately lead to failure, reflect a profound commentary on our inability to transcend our existing socio-political and economic paradigms when conceiving of multiverses. This narrative underscores the notion that despite our efforts to envision alternate realities as distinct and varied, they may actually be bound by the same conceptual and philosophical frameworks that limit our reality, challenging us to question the extent of our imaginative capabilities and the possibility that true innovation in conceptualizing alternate realities requires a radical departure from current frameworks.

### **The Capitalist Multiverse**

Capitalism, driven by the imperative of capital accumulation, shapes social relations, class dynamics, and economic development. It is characterized by market competition, the pursuit of individual profit, and the commodification of resources. In the process, it promotes a homogenization of cultural and product diversity under the guise of variety, where differences are more superficial than substantial. David Harvey illuminates how capitalism molds societal and individual perspectives, creating a landscape where economic growth and competition drive deeper cultural and product homogenization. Our imaginations are intricately linked to the structures we create within capitalist frameworks, underscoring the extent to which capitalist ideologies permeate our visions of the future. The imaginative colonization by capitalism, deeply ingrained in our collective consciousness, implies that it not only dictates the dynamics of our economic and social systems but also extends its influence into our speculative theories of the multiverse. Conversely, the multiverse might represent a space where we erect a new vision of the future, distinct from capitalism, in our imagination before we bring it into reality.

## **Exploring diversity through capitalism**

Within capitalism, the illusion of diversity is prevalent. Markets seem to offer an endless variety of products and services. However, diversity often reveals itself to be superficial—variations on a theme rather than genuine uniqueness. Many products are differentiated by branding rather than by substantial differences in functionality or quality, reflecting a deeper homogeneity underlying the apparent diversity. The concept of superficial diversity in capitalism offers a useful framework for reevaluating our expectations of diversity in the multiverse. It prompts us to question whether our assumptions about the uniqueness of each universe (or media platform) are influenced by the same mechanisms that create the illusion of diversity in markets. This reflection challenges us to consider the possibility that the principles underlying our imaginaries might be more uniform than previously imagined (Frank 1997, 45).

Exploring the parallels between capitalist dynamics and the fictional multiverse within literature, we aim to delve into the notion that our narrative pathways hinge on a pivotal choice: to either navigate through the enduring presence of capitalism, which overlooks the potential for alternatives such as socialism, or to face a nihilistic future marked by humanity's self-destruction, challenging the conceptual boundaries of diversity itself.

## **Concluding Reflections**

This exploration, bridging the realms of cosmology, socio-economic theory, and speculative fiction, reveals the profound impact of our socio-economic systems on both our scientific inquiries and cultural narratives. The reflection on the parallels between capitalist dynamics and the theoretical constructs of the multiverse underscores the need to question the extent to which our perceptions of (cosmic or media) diversity are colored by the principles of competition, exploitation, and individualism inherent in capitalism. Viewing the multiverse

through a capitalist lens has illuminated the potential for an illusion of diversity—a mirage of infinite variety that, upon closer examination, reveals a limited set of underlying principles. This realization challenges us to reconsider the nature of diversity itself, both in the cosmos and within our socio-economic systems. It prompts us to ask whether our expectations of boundless uniqueness and variety in the multiverse are merely projections, rather than reflections of objective reality. *The Three-Body Problem* serves as a critical tool for examining the cyclic nature of our endeavors and the limitations of our imagination when conceptualizing alternate realities. It not only critiques the replication of capitalist ideologies across theoretical universes but also invites us to envision possibilities that transcend these constraints. Engaging with the mysteries of existence and the cosmos demands a radical departure from these frameworks, urging us to conceive of a universe where diversity is not just an extension of our worldly experiences but a genuine reflection of the boundless possibilities inherent in the fabric of reality. This endeavor requires not only a shift in our scientific and philosophical inquiries but also a transformation in the cultural narratives that shape our understanding of the multiverse.

## **References**

- Barad, Karen. 2007. *Meeting the Universe Halfway: Quantum Physics and the Entanglement of Matter and Meaning*. Durham: Duke University Press.
- Dunne, Anthony, and Fiona Raby. 2013. *Speculative Everything: Design, Fiction, and Social Dreaming*. Cambridge, MA: The MIT Press.
- Fisher, Mark. 2009. *Capitalist Realism: Is There No Alternative?* Winchester: Zero Books.

Frank, Thomas. 1997. *The Conquest of Cool: Business Culture, Counterculture, and the Rise of Hip Consumerism*. Chicago: University of Chicago Press.

Greene, Brian. 2011. *The Hidden Reality: Parallel Universes and the Deep Laws of the Cosmos*. New York: Alfred A. Knopf.

Harvey, David. 1989. *The Condition of Postmodernity: An Enquiry into the Origins of Cultural Change*. Oxford: Blackwell.

Jameson, Fredric. 1991. *Postmodernism, or, The Cultural Logic of Late Capitalism*. Durham: Duke University Press.

Jameson, Fredric. 2003. "Future City." *New Left Review* 21: 65-79.

Jameson, Fredric. 2005. *Archaeologies of the Future: The Desire Called Utopia and Other Science Fictions*. London: Verso.

Jenkins, Henry. 2006. *Convergence Culture: Where Old and New Media Collide*. New York: New York University Press.

Lenin, V. I. 1917. *Imperialism, the Highest Stage of Capitalism*. New York: International Publishers.

Liu, Cixin. 2014. *The Three-Body Problem*. Translated by Ken Liu. New York: Tor Books. Original work published 2008.

Rosenblum, Bruce, and Fred Kuttner. 2006. *Quantum Enigma: Physics Encounters Consciousness*. Oxford: Oxford University Press.

Unger, Roberto Mangabeira. 2014. *The Religion of the Future*. Cambridge, MA: Harvard University Press.