From Urban Space to Cyberspace: A Research on Spatial Writing and Human-Android Relations in Do Androids Dream of Electric Sheep?

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Abstract—Philip K. Dick takes the highly computerized but ruined Los Angeles of the United States after the post-apocalyptic war as the background and brings the cyberspace struggle between androids and humans as the novel’s theme, sketching a cyberpunk society in which humans and androids fight against each other. The novel Do Androids Dream of Electric Sheep? invites people to think about cyberspace and human-androids subjectivity. Inspired by Slavoj Zizek’s critical theory of cyberspace, this paper uses this science-fiction force as a text to explore how contemporary American science fiction reconstructs a revolutionary human-androids subject in cyberspace, challenging human subjectivity in the urban space. Faced with human-android coexistence, Dick affirms the coexistence of multiple subjects using equal dialogue, fully exploits the advantages of androids and humans, and constructs the subject with human-androids. Through an in-depth study of androids, this paper concludes that in a human-androids coexistence space, humans and androids should not be in a master-slave relationship; instead, they are each other’s constitutive Other. Humans should try to break the boundary between self and others to accept a pluralistic and open subject.

Index Terms—Urban space, cyberspace, Human-Android Subject, Reconstruction, Do Androids Dream of Electric Sheep

I. INTRODUCTION

The rapid development of science and technology in contemporary society, the continuous upgrading of intelligent technology, and the creation of increasingly intelligent robots have given actual meaning to the imagination that initially existed only in science fiction works. Since the 1960s, Philip K. Dick has been called the Shakespeare of science fiction (Jameson, 2005, p. 345) and has written many outstanding works - more than 40 novels and dozens of short stories. He has incorporated cybernetic ideas into his fiction, producing many vital works that explore the relationship between humans and artificial life forms. Do Androids Dream of Electric Sheep? is a typical example.

This novel takes the future city of Los Angeles as the spatial background, takes us to cyberspace through the interaction between humans and androids, and explores the gradual disintegration of the boundary of the subject between human and simulacrum after the creation of simulacrum by technology as a means. The novel is completed by portraying three types of spatial forms, generating a relational process in the transformation from urban space to cyberspace. First, it is the urban space led by the suburbs of San Francisco and Mars, which carries the urban landscape and urban culture, gradually declining with the encroachment of network technology; then, it is the intersection of virtual and urban space led by the humanoid robot police agency, and this miniature model is an agency of the virtual reconciliation between the city and the network. Cyberspace is represented by the virtual resonance box of Missourian mountaineering, a space with unique virtual characteristics. In Do Androids?1, the android is the focus of the novel’s narrative; as the android's self-awareness grows, the boundary of the subject between humans and android becomes increasingly blurred, and subjectivity gradually dissolves. This paper points out that in the space of human-android coexistence, humans and androids should not be in a master-servant relationship; instead, they are each other's constitutive Other. Humans should try to break the boundary between self and others to reconstruct a pluralistic subject.

1 The abbreviation for Do Androids Dream of Electric Sheep?, the same goes below.
II. LITERATURE REVIEW

Research on Philip K. Dick's science fiction novel *Do Androids?* is relatively diverse and sophisticated, including relevant journal articles, graduate and doctoral dissertations, and monographs or monographs. To provide a more precise overview of the relevant literature, I divide it into the following aspects based on the research themes in this literature.

Posthuman and postmodernism are topics under lively discussion. Jill Galvan points out that Dick envisons a posthuman community in which "humans and machines sympathize and influence each other's existence" (Galvan, 1997). Karl Luther Shadox identifies the requirements of the "posthuman," a shift in the concept of the human from a sovereign self to an independent figure and an imagining of the future without the hierarchy of liberal humanism (Shaddox, 2008). Nima Behroozi Moghadam combines "Marxism with the psychoanalysis of Jacques Lacan, as well as his account of postmodernism," the study discusses "how, contrary to what capitalism dubs a post-ideological era" (Moghadam & Porugiv, 2018). Kim, Yeon Jeong focuses on "the question of how to understand posthuman at this time as it enters the posthuman era, and looks at the posthuman from the aspects of the diaspora through this novel" (Kim, 2021).

Information technology analysis is also very hot in the study of this novel. Klaus Benesch explores the cyborg in Philip K. Dick's *Do Androids?* as a companion to humans, projecting the desire to improve our biological condition in a way that points directly to assimilation with machines (Benesch, 1999). Christopher A. Sims argues that "the novel instead protests against the dehumanizing effects of individualism and demonstrates how technology can be used to reclaim the essence of humanity" (Sims, 2009). Jacob Carlson "uses space, object description, and references to the ersatz to uncover the conditions under which a humanoid other emerges, and what Dick offers as the remedy for our 'bifurcated' humanity" (Carlson, 2018). Alezandra Maass reveals that "between cities and cyberspace, there is not only an ongoing ambivalent relationship between humans and the technology they create but also a concern for the growing power of that technology's influence" (Maass, 2013).

The study of religion has been discussed during Dick's entire writing career. Barlow examines the way Dick was able to use religion to bring together all of his philosophical concerns in his writings (Barlow, 1988). Ruppenthal Ed presents "Dick as a liberal philosopher and theologian whose pseudo-didactic approach draws from a variety of extant historical, sociological and especially theological sources" (Ruppenthal, 2007). Mercerism appears to scholars as Christianity in disguise, with relevant papers, including Peter Fitting, mentioning that the development of Mercerism was the beginning of Dick's increasing use of metaphysical themes in his later novels (Fitting, 1983). Anthony Enns asserts that, like Mercerism, communication with the unbounded is a spinnny, shared, full-sensory experience. Because it can take place without any hardware, it is also analogous to the telepathic fusion of Deckard and Mercer in the penultimate chapter of the robot (Enns, 2006).

As a top theme in Dick's science fiction, scholars have always studied empathy. Aaronson Russell attempts to explore the meaning of empathy in Dick's writings. He demonstrates that "An ethical imperative unites Dick's works to understand the thoughts and emotions of others, human and nonhuman alike" (Aaronson, 1996). Sherryl Vint argues that "the novel's ethical concerns are best understood through animal studies, revealing political deployments of the species boundary to disenfranchise certain humans" (Vint, 2007). Donald Palumbo asserts that empathy is malicious, using designated minorities as scapegoats for negative personality traits so that dominant members can adopt racism to reject their negative characteristics (Palumbo, 2013). Sarah Kissinger forges a link between mortality and empathy, representing how confrontations with mortality deepen the sense of empathy (Kissinger, 2022).

Human-machine subjectivity is another research hot in Dick's writing life. Eric S. Rabkin compares robots to Frankenstein and claims that "while Marry Shelly has enormous sympathy for Frankenstein's monster, Philip K. Dick has no sympathy for robots" (Rabkin, 1988). Umberto Rossi reveals the ontological uncertainty in human subjectivity (Rossi, 2011). Josh Toth uses Derrida's phrasing to link "eating" to ethics and explores the appropriate and just relationship between subjects and the objects they want (Toth, 2013). Sevda Altмолuk explores "the blurry connection between human beings and androids by using Mercerism in this novel" (Altмолuk, 2020).

Real and allusion analysis has been a popular study in recent years. Michael E. Zimmerman uses "Martin Heidegger's views on authenticity in *Being and Time* to illuminate the struggle to be genuinely human as depicted" in this novel (Zimmerman, 2014). Gassan Matthew makes "an understanding of counterfeiting as a manifestation of Foucauldian power; he hopes to foster a conversation about who counterfeiters and what they get out of it" (Gassan, 2015). Yasamin Hemmat explores the surrealism of the characters in this novel by analyzing Baudrillard's theory of disintegrating their identities (Hemmat & Shabrang, 2020). Quentin Hoareau questions "the concepts of reality and illusion, opposing them and blurring the boundaries between them" (Hoareau, 2021).

Although *Do Androids?* has been extensively studied in academia, with scholars discussing it from the above perspectives, very few studies have more specifically explored the development of mutually reconstructing the relationships between human and machine subjects in cyberspace in Philip K. Dick's work. Therefore, if we can add this research gap and blind spot from this nuanced perspective, we will have a deeper understanding of studying artificial intelligence.

III. THEORETICAL FRAMEWORK

The spatial turn began with the proliferation of spatial practices and dramatic changes in spatial experiences under the
expansion of capital, which led to reflections and critiques on space: Lefebvre explored space from the perspective of the mode of production (Lefebvre, 1991); Baudrillard proposed that consumer society is essentially an extended space and that symbolic logic has been generally developed to form a mimetic space (Baudrillard, 1998); Edward Soja developed Foucault's concept of heterotopia and proposed a Thirdspace as a field of struggle (Soja, 1996). Jameson believes that postmodern society is characterized by Hyperspace and offers the cultural and political strategy of Cognitive Mapping (Jameson, 1988).

The contemporary European philosopher Slavoj Zizek put cyberspace into the context of globalization, explored its influence on inter-subjective interaction from the perspective of psychoanalysis, and formed a complete critical theory of cyberspace, which pushed the critical theory of space to a new stage (Zizek, 1996). Cyberspace expands the subject's perception and experience with its digital space different from the real world. It shapes the subject's way of life, interaction, knowledge system, and belief system with its unique virtuality and immersion, representing the latest progress in the postmodern spatial turn. This paper is guided by Slavoj Zizek's theory of cyberspace and devotes it to a layer-by-layer explanation from the external space to the operation of the internal subject, specifically: the establishment of cyberspace and the reconstruction of the human-android subject to improve the study of this critical theory.

IV. DISCUSSION

A. Reality and Virtuality From City Space to Cyberspace

Virtualization of reality is a cutting-edge technology that has only recently gained popularity. It creates a three-dimensional virtual environment using computer technology, giving the sensation of seeing, hearing and touching the three-dimensional senses, just like being in the actual world. Virtual reality is a technology that alters the human senses, providing the user with a genuine experience of pleasure as if it were real life. In the novel, humans utilize empathy boxes to bond with Mercer. It is "the most personal possession you have! It's an extension of your body; it's the way you touch other humans; it's the way you stop being alone" (Dick, 1968, p. 70). Isidore, according to the special. Furthermore, when people wish to merge with Mercer, they must typically grip the box's handles and enter a virtual world; they must see a screen and step into the V.R. world. People can share their joys and sorrows with others when they fuse in the virtualization of a natural environment.

The Internet gave rise to virtual worlds, bringing to light "cyberspace", a new type of information and communication technology after the 1990s. Cyberspace is an abstract concept in philosophy and computing that refers to virtual reality within computers and computer networks. In his novel Neuromancer, William Gibson defines cyberspace: "as the deck presented it, had no relationship with the deck's physical whereabouts. When case jacked in, he opened his eyes to the familiar configuration of the Eastern Seaboard Fission Authority's Aztec data pyramid" (Gibson, 2012, p. 103). Before cyberspace completely replaced the physical city, the cyber city emerged as a combination of reality and illusion, mingling physical space and virtual networks to present a "virtualization of reality". Cyberspace, which combines real space and virtual networks, offers a real virtual space. From cyberspace's technical characteristics, it seems naturally superior to urban space in terms of its metaphysical characteristics. However, at a deeper level, its material structural basis, i.e., countless cables, routers, servers, etc., will subject people to a more centralized and unquestionable totalization of control. Cyberspace is "a new field where the complex dynamics of domination and control unfold in a new way" (Hayles, 2010, p. 65).

Cyberspace, with all its characteristics superior to material forms, remedies the problems of the postmodern city in the development process. It relieves people's frustration in real life, and its unique syntax, which is different from urban space, constitutes the second aspect of the spatial dimension of the novel. Moving from urban space to cyberspace means, "This transformation process is fueled by tensions between the assumptions encoded in pattern/randomness as opposed to presence/absence" (Hayles, 2000, p. 285). Since the dichotomy of presence and absence has long been dominant in Western culture, this cultural transformation seems to conceal how to decipher the intricate subject relations in postmodern society.

According to Zizek, Cyberspace has a fundamental ambiguity, "It is this surplus dimension which functions as the Real. We might say that in the big opposition between reality and these spectral fantasies, the Real is on the side of fantasies" (Žižek & Daly, 2004, p. 102). To clarify the fundamental ambiguity of cyberspace, it is necessary first to explain how the real society, i.e., urban space, is structured, then to analyze the deviation of cyberspace from it, and finally to conclude the nature and consequences of cyberspace. The latter two constitute Zizek's critical theory of virtualizing reality in cyberspace. In Do Androids? in addition to describing the human being's entrapment by various machines, urban space also influences human perception. Dick's Do Androids? presents an apocalyptic picture of the post-nuclear war world, set in the future city of Los Angeles, which has completely depleted itself. After the nuclear war, the radioactive fallout brings the Earth's creatures to extinction and severely impacts humans.

The World War Terminus is covered with dust, which had contaminated most of the planet's surface and had originated in no country, and no one, even the wartime enemy, had planned on it (Dick, 1968, p. 15). To prevent the harm of radioactive dust, human beings must go out in full armour; once the bustling city buildings have long been empty. As the Earth's environment becomes more and more unsuitable for human survival, many humans migrate to other planets; to encourage the residual population to migrate, the government for each immigrant allocates a humanoid robot to help them better live on the outer planet. In this case, fewer and fewer people remain on Earth, including the radiation-infected
special who cannot immigrate. In the novel, the city is set as a non-ideal city to live in, and the urban culture collapses with the destruction of the urban landscape, and humans drift apart in the urban space.

With the demise of urban space, cyberspace began to rise gradually. Cyberspace is based on the combination of Cybernetics and Space and was first coined by Canadian science fiction writer William Gibson in his book Neuromancer in 1984. In the preface to The Ethics of Cyberspace, scholar Cees J Hamelink clearly states that cyberspace is a virtual communication space created by digital technology. It should include all social designations defined by information and communication technologies and is by no means limited to the operation of computer networks. The Mission police agency in Do Androids? is a microcosm of the city after the invasion of virtual space. The depiction of the bionic police agency is a miniature model of cyberspace. "The Mission Street Hall of Justice building, onto the roof of which the hovercar descended, jutted up in a series of baroque, ornamented spires; complicated and modern, the handsome structure struck Rick Deckard as attractive except for one aspect. He had never seen it before" (Dick, 1968, p. 122). It also has a separate but well-developed network structure that allows the whole building to work in an organized manner. It is isolated from other physical spaces in San Francisco. The androids here create a "web of symbiotic" relationship that break the confines of urban space and the finite nature of time. The police agency is mapping intersectional space: using physical space as a carrier and combining it with a virtual network, breaking the territoriality of physical space and forming a new urban structure.

The empathy box is also cyberspace with massive information data, wholly detached from physical space. The human nervous system will enter the virtual space under a negative ion current. This space, with human intervention, evolves into a particular model of the urban landscape, which makes humans in contact with each other through the fusion of different forms of media, and possesses a multidimensional perception of vision, hearing, and even pain. While the physical city brings John Isidore loneliness and illness, the virtual climbing "he had begun to ascend, along with the others" (Dick, 1968, p. 25). The demise of urban space in the novel and the rise of cyberspace are relational evolutionary processes. The overall consciousness of the "integrated organism" is deconstructed and even split into pieces, unable to perceive the intrusion and control of the surrounding cyberspace. Virtual space destroys the human perception of the physical city, blurring city boundaries. The virtualization of cyberspace is becoming possible.

B. Reconstruction of Human-Android Subject

When Zizek uses the terminology of Lacanian psychoanalysis to talk about cyberspace, his real purpose is to explore the issue of the subject. Contrary to some postmodern theorists who hail the liberation of the subject's identity in Cyberspace, Zizek continues Lacan's insistence on the Cartesian subject and, from a psychoanalytic perspective, perceptively sees that today's phenomenon of cyberspace is still not free from the subject's dilemma. "the more our (experience of) reality is 'virtualized,' changed into a screen-phenomenon encountered on an interface, the more the indivisible remainder that resists being integrated into the interface appears as the horrifying reminder of undead Life (Žižek, 1999, p. 155).

(a). Perplexity of Human and Android Self-Identification

Today's advancing artificial intelligence has raised concerns about humanoid robots or even advanced intelligent androids closer to humans in Do Androids? Because the subject of the humanoid robot is defined by its difference from that of a human, the novel inevitably forces man to rethink his existence. How does a man as a subject acknowledge his androids closer to humans in intelligent than most humans: "The servant had in some cases become more adroit than its master" (Dick, 1968, p. 30). It is isolated from other physical spaces in San Francisco. The androids here create a "web of symbiotic" relationship that break the confines of urban space and the finite nature of time. The police agency is mapping intersectional space: using physical space as a carrier and combining it with a virtual network, breaking the territoriality of physical space and forming a new urban structure.

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This weirdness, uneasiness, and even fear of being like us but different trigger the confrontation of people similar to us and reveal our deep-seated rejection of things very similar to us.

However, we fear this nuance not because of the difference itself but because of the smallness of the difference. The degree of similarity is high enough, and the difference is small enough that it can be erased at any time, and thus our uniqueness is lost. This uneasiness of being replaced and assimilated at any moment triggers our sensitive nerves. Thus, "Small differences elicit more anger than large differences" (Jacoby, 2011, p. 128). In this desire for self-identification, if we cannot eliminate the threat and destroy what disturbs us, we must maintain the differences and expand and exaggerate them to show our superiority. This ideology justifies a new round of elimination.

In Do Androids? People keep improving how to identify the humanoid robot, maintaining the "small differences" between humans and humanoid robots. Each new generation of a humanoid robot is born; the higher the degree of simulation, the more difficult it is to distinguish the difference between it and a human. Therefore, the birth of each new generation of the machine is the process of asking about the boundaries of our subject. However, we are afraid that if all the boundaries between humans and androids we have constructed can be dismantled by technology, the department will invent a model that cannot distinguish it from the human being. The identity of human subjects will be blurred and even completely abolished (Dick, 1968, p. 61). Therefore, it becomes especially urgent for humans to think about their subjects in the situation of androids.

If subjectivity depends on the coherence of self-awareness, this coherence is guaranteed by memory. Through memory, the self becomes a continuous unity. "Going over these experiences, we continually come upon experiences in which the present "I" had once lived." however, "when we reflect on this experience, we find that it is not isolated, but set against the background of a stream of such experiences clearly and distinctly given. This is even true when we can no longer directly grasp the experience, finding it necessary to view it through remembering representation" (Stein, 2012, pp. 38-39). But remembering itself is not the same as the actual occurrence of the past; it is, the subject's narrative of itself. "the self is first constructed in and through the narration" (Zahavi, 2008, p. 105), and Rachel Rosen, a Nexus-6 type humanoid robot created by Rosen, are implanted with false memories and mistakenly believes she is a human being when she fails the Voigt-Kampff test and learns she is a humanoid robot, she had turned pale, and her voice shook (Dick, 1968, p. 63). Rachel's identity anxiety as she wanders, confused between the human and the android, echoes the fundamental question of "who am I?".

Humanoid robot Luba Luft points out that it still does not mean that the "I" is the 'I' in the field of view of others, even if recognized by others. Perhaps there was a human being like Deckard, replaced by a humanoid robot Deckard and was not recognizable. Wasn't it this way that Garland - the humanoid robot who pretended to be the actual Garland - could conceal himself from Phil Resch? The difficulty of self-identification does not occur only in the mind but also in the realm of the body. Phil Resch did not recognize the Android Garland, not because the actual Garland was similar in thought to the Android Garland, but because they were identical in appearance, as were Rachel and Pris Stratton. In the real world, we identify an individual by identifying their body; when the body is consistent, the individual is consistent. Once this consistency falters, the difficulty arises for us to identify individuals through their bodies. "'Rachael.' He said, perplexed. [...] And then he saw that it was not quite Rachael" (Dick, 1968, p. 246). The intuitive basis no longer exists. Identification through the body is no longer possible. Deckard calls Pris "the other Rachael" (Dick, 1968, p. 249), confirming the body's importance in identifying the individual. This falsity of individual identity worries Rachel, who desires to be recognized and identified as unique despite being a humanoid robot. This uniqueness is the possibility of being repeatedly identified as the same individual.

Identification; there goes I. My god, maybe that's what'll happen. In the confusion, you'll retire me, not her. And she can go back to Seattle and live my life. I never felt this way before. We are machines, stamped out like bottle caps. It's an illusion that I — I — personary — really exist; I'm just representative of a type. (Dick, 1968, p. 209)

How is subject construction of the self possible once the subjects in a social group are not mutually recognized? The police agency under the control of the humanoid robot Garland is a police agency isolated from the outside world or the world Deckard lives in; its phone lines are not connected to the outside world, the members inside are all in agreement, and the evidence corroborates each other, all pointing to the dubious identity of Deckard. Within this closed system, the identities of the android and the bounty hunter are entirely inverted. Deckard's identity as a bounty hunter is not recognized in this police agency, and he also vehemently denies the authenticity of the police agency. The failure to acknowledge each other has created a deep rift between the subjects. The loss of communication between the subjects causes self-identification to shift from introspective closure to the closure of the world, and the self-identification remains incomplete.

Rick and cold-blooded killer Phil Resch together on a mission to hunt Androids; Rick confided in Phil that he was in a quandary: "So much for the distinction between real humans and humanoid constructs...I rode down with two creatures, one human, the other android. . . and my feelings were the reverse of those intended. Of those I'm accustomed to feeling—am required to feel" (Dick, 1968, p. 157). Rick's bounty hunter duties demanded no pity or compassion for the humanoid robot. But again, is this absolute? These humanoid robots have the same appearance, intelligence, and abilities as humans and could be well integrated into society. They should have been given the same social identity and status as human beings but have been enslaved by human beings. In the novel, these humanoid robots are defined as commodities with exchange value, and the work mentions that "Under U.N. law, each emigrant automatically received possession of an
android subtype of his choice, and, by 1990, the variety of subtypes passed all understanding, in the manner of American automobiles of the 1960s” (Dick, 1968, p. 16). Androids could even be customized to meet specific needs, and their commodity properties dictated that they were always treated as objects.

But in the capture mission, Rick no longer treats androids as clever artificial commodities; he develops empathy for individual androids. In his eyes, Luba Luft is so vibrant that it does not look like an artificial life (Dick, 1968, p. 144). On the contrary, human beings' indifference and desperation in hunting and killing Androids are more like emotionless androids. As N. Katherine Hayles states, "If even an android can weep for others and mourn the loss of comrades, how much more unsympathetic are unfeeling humans?” (Hayles, 2000, p. 162). Blurring differences between humans and androids have triggered a crisis of self-perception for individual humans.

Just as humans search for self in their growth, androids also search for the answer to the question, "Who am I?". Androids also dream, think about the meaning of life as humans do, and search for the life they want. For example, Luba Luft's life "has consisted of imitating the human, doing what she would do, acting as if she had the thoughts and impulses a human would have. Imitating, as far as she is concerned, a superior life form" (Dick, 1968, p. 146), and her pursuit and desire for art is no less than that of the real person, which makes her escape to Earth at the expense of killing her employer. Even Rick praises, "She was a wonderful singer. The planet could have used her" (Dick, 1968, p. 149). But humans have not given androids the same right to exist and social identity as individuals. This also confirms the anxiety of human beings in the scientific era when confronted with others. Humans are natural creatures, but as creators, they create alternative beings, and the artificial "monsters" are better than humans, making people extraordinarily uneasy and fearful.

(b). Dissolution of the Boundaries Between Human and Android Subject

Unlike the Golden Age science fiction writers who favoured hard science fiction, Dick is more interested in the philosophical inquiry into reality and human values In Do Androids? in which the line between human and machine is blurred and uncertain. The humanoid robot is more actual than a human. This situation "emphasizes human isolation and alienation" in the human experience (Aldiss & Wingrove, 1986, p. 428) and Dick's questioning and worrying about human subjectivity. At the same time, Dick suggests a possible solution: the protagonist makes a compromise and chooses to accept the existence of electronic beings. Cyberspace changes the way the subject is structured. It thus changes the subject's way of experience and cognition, resulting in the subjectivity being wholly lost and becoming a loyal slave of the artificial "other" or a captive entirely manipulated by the other.

Cyberspace gradually blurs and breaks the main boundary between humans and androids, especially with the birth of a new generation of androids, so that empathy is no longer the unique ability of human beings and the unique status of people is lost. Empathy is an essential basis on which androids and humans can be distinguished, so what is the possibility and validity of using empathy to achieve self-identification and self-recognition of the subject? The Voigt-Kampff Empathy Test is based on specific test questions to observe the test subject's eye muscle contraction and facial capillary response to determine whether the subject is a human being. Almost all of these questions were about animals; for example, "you are given a calf-skin wallet on your birthday.", "he shows you his butterfly collection" (Dick, 1968, p. 50). If the subject shows strong empathy for the test question, the indicator responds dramatically; if there is a lack of empathy, the indicator is still. It shows that the ability to empathize with animals has become an important indicator, and humans show absolute admiration and cherish for real animals.

In Do Androids? people feel a kind of empathy through the empathy box and Mercer fusion. Mercer is an older man, and whenever people hold the handle of the empathy box, his climbing figure appears. People climb with Mercer, experience Mercer's feelings, become one with Mercer physically and spiritually, and thus achieve the integration of all people's consciousness. "As it did for everyone who at this moment clutch the handles, either here on Earth or on the colony planets. He experienced the others who incorporated the babble of their thoughts and heard in his brain the noise of their many individual existences" (Dick, 1968, p. 22). On the other hand, an android could never participate in this fusion, "An android, no matter how gifted as to the pure intellectual capacity, could make no sense out of the fusion which took place routinely among the followers of Mercerism" (Dick, 1968, p. 30).

In Rick's view, "As long as some creature experienced joy, then the condition for all other creatures included a fragment of joy. However, if any living being suffered, then for all the rest, the shadow could not be entirely cast off" (Dick, 1968, p. 31). The novel argues that this capacity for empathy is innate to humans over long evolutionary periods. Through the empathy box guided by Mercerism, one can merge with Mercer and thus strengthen this innate capacity for empathy. This is where the android differs from humans. Even Nexus-6 android types, although they already have a basic sense of cooperation and identification with each other, can still not complete the empathy test. As for real humans, no matter who they are, even the inferior chickenheads can easily experience the same sense of integration that Mercerist followers occasionally experience.

Androids have a solid desire to mimic humans, with Luba Luft constantly imitating real people, imitating a higher form of life, and Roy Beatty trying to experience human integration forcefully. The android's desire to mimic squeezes the human's willingness to narcissism, eventually triggering the human's pursuit of androids. To humans, the android is hunted down because the clan, for human enslavement rebelled against the creator and posed a threat to human life and human identity. Yet they are so similar to our lives that we must find justification for the killing. The Voigt-Kampff Empathy Test was developed based on humans' empathy, but androids do not. This technical difference, originally intended only to identify androids, gradually became an innate, essential, and prescriptive property of humans and
acquired metaphysical significance. He believes that animals do not need this function because once the predator perceives the pain of the predator, the predator will starve to death. After all, it cannot feed. At the same time, humans rely on such empathy and empathy in living in groups and helping each other, which guarantees the survival of the human species. Therefore, empathy can precede individual experience, and it is the product of "two billion years of evolution under the pressure of survival," as is the human desire to survive. The psychology of empathy gradually shifted from a methodological to an existential one. It gave birth to a Mercerian ideology, similar to religious beliefs, to strengthen the psychology of empathy and ultimately define and construct the essence of the human being.

In Rick’s opinion, his electric sheep “doesn’t know I exist. Like the androids, it could not appreciate the existence of another” (Dick, 1968, p. 44). The humanoid robot only understands itself at most, not other beings, so Rick cannot see his manifest in the strange individual of the android, and the humanoid robot does not recognize his subjectivity. In turn, he does not acknowledge the subjectivity of the android. This inability to achieve mutual recognition shows the opposite: the Other is the reference coordinate in the subject’s construction. Empathy is the bridge that the novel text tries to build between the gap between the self and the Other. In the plot’s climax, Deckard falls in love with the humanoid robot Rachel and begins to reflect on the legality of his hunting and killing of the humanoid robot, asking himself whether he ever understood the humanoid robot and whether he understands it now. It seems to imply that the concrete experience of contacting and competing with the android allows the human to accept the humanoid robot like the other. The construction of the subject is always in progress, and the mechanism of empathy to grasp the body of the other in experience is an effective attempt for the subject to construct itself. In this process, the boundary between human and humanoid robot subjects gradually reconstructs, forming a balanced state.

V. CONCLUSION

In the relationship between humans and space, the natural and social space, as a future grey picture, warns people against the terrible consequences of rational tool expansion. The symbiotic relationship and organic connection between humans and space become the indispensable external condition for human subject construction. Through the series of characters in the novel, Dick presents the crisis of human subjectivity and out of the multiple dimensions of human and space and human and android, the human subjectivity crisis and out of the subject dilemma and self-reconstruction. Specific to the construction of the subjectivity of each person, the characters in work react differently to the subjectivity crisis and the human-android identity system. As the protagonist of the work, Rick’s identity is changeable. With his understanding and identification of the identity of the humanoid robot, he becomes more receptive. While deconstructing and constructing, he follows the human standard of constant openness and change. Resch is a conservative image of the human image and the guardian of the human identity. After experiencing doubts about his identity, Resch’s claim to the boundaries of man-android identity prefers a persistent attitude. Isidore is the least recognizable human image in his work, and the humanoid robot despises him. But in Isidore’s eyes, humanoid robots and people, electric animals and real animals, Mercer and Bust all have equal status. Although he is special in intellectual degradation, we see rare human qualities, so he is the contradictory unity of stupid and human intelligence.

The humanistic blind area of science fiction from Dick’s work shows a common representation of human nature and artificial intelligence by describing different possibilities to move towards the multiple options of subject reconstruction. Dick inspired us in the android, in the era of artificial intelligence, to reconstruct the subject, the need to abandon the inherent system and stereotypes and human centrism, merging thinking with more open subjectivity to tolerate and admit others, even aliens, with the constructivist mentality to meet the infinite possibilities and create the future.

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REFERENCES


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