"Normal" Feelings in "Abnormal" Worlds: On the Political Uses of Emotion in Science Fiction Manga

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CHAPTER 3: SCIENCE FICTIONAL EMOTIONS

This dissertation has thus far extensively mapped out the relationship between emotion, science fiction, and SF manga, but has yet to clarify specifically how emotion can add to the Suvinian conception of science fiction. While cognitive estrangement carries an emotional component for an audience in that it is supposed to be felt in response to the events of a science fictional narrative, this chapter shows how emotion can expand the scope of the novum, positioning emotion as something capable of developing the "cognitive" in cognitive estrangement on two different levels. First, emotion can act as a means to experience the novum, and second, emotion can become a novum in and of itself. In terms of the former, this comes from the ability for emotion to provide alternative perspectives that aid in the presentation of various non-ideal views of science fictional settings where the story emphasizes the subjective views of its characters. The latter, in turn, is based on the idea that emotion itself can become a source of cognitive difference, embodying an identity as "potential logic" that can facilitate further analysis of the SF environment. Thus, this chapter shows how even SF narratives where emotions are prominent are able to contribute to "cognitive estrangement" and the exploration of political alternatives.

3.1. THE EVOLUTION OF COGNITIVE ESTRANGEMENT

While the social and political landscape in which science fiction finds itself today is quite different from when *Metamorphoses of Science Fiction* was published in 1979, that landscape had in fact already begun to change when Darko Suvin defended SF against the "problem" that it lacked "literary" elements. Opposing Suvin's idea that SF had little need for the conventions of traditional character-based fiction, authors began to incorporate those literary elements into their works much more readily. As seen in Ursula K. Le Guin arguing for the

importance of characters in SF ("Mrs. Brown," see Chapter 2.1),[118] for instance, the period referred to as the "New Wave" of science fiction in the 1960s and 1970s "[took] a genre that had been, in popular mode, more concerned with content and 'ideas' than form, style or aesthetics and [paid] much greater attention to the latter three terms."[119] Science fiction effectively began to incorporate the very elements that Suvin argues are unnecessary for science fiction. As a result, it is possible to view in practice SF as expanding increasingly outwards from the central core of cognitive estrangement, eventually reaching a point where the novum is no longer truly significant for science fiction (figure 3.1).[120]

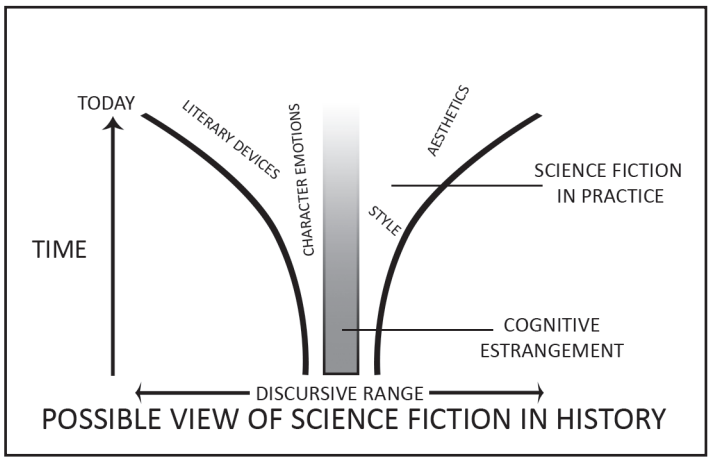

Figure 3.1. A visualization of the view that cognitive estrangement has lost significance in science fiction.

This image of science fiction and its growth can be potentially viewed as a problematic obscuring of the essence of science fiction, or perhaps as an accomplishment for the genre born out of its continued evolution and progress. The former stance can be seen in how Farah Mendlesohn, though not believing that emotion is inherently harmful to science fiction,[121] argues that a preponderance of emotion obscures or even eliminates the crucial, cognitive aspect of sci-

118. Ursula K. Le Guin, *The Language of the Night: Essays on Fantasy and Science Fiction*, ed. Susan Wood (New York: G.P. Putnam's Sons, 1979), 115-116.

119. Adam Roberts, "Defining Science Fiction," in *Science Fiction*, 2nd ed., The New Critical Idiom, Kindle Edition, "New Wave" (London: Routledge, 2006), accessed March 7, 2014, http://www.amazon.com/Science-Fiction-The-Critical-Idiom-ebook/dp/B000OI0HPQ.

120. I must give thanks to Dr. Chris Goto-Jones and Dr. Florian Schneider for helping me to develop this visual conceptualization of science fiction over time.

121. "It is not that human relationships and angsts don't matter, but as a general rule I would suggest this summary: if Hollywood would advertise a film with the tag-line, *In the chaos of war, they fell in love!* science fiction would pronounce, *In the chaos of love, they fought a war!*" Farah Mendlesohn, *The Inter-Galactic Playground: A Critical Study of Children's and Teens' Science Fiction* (Jefferson, NC: McFarland, 2009), 15.

ence fiction.[122] Similarly, Elaine Ostry asks about the potential problems with young adult (YA) science fiction that arise when the "need for hope ... compromises the narrative strategies [of SF]."[123] The latter position is best found in an understanding of science fiction that celebrates both the "megatext," the "conglomeration of [various forms of SF] with which 'SF fandom' is familiar,"[124] while also embracing the similarities between science fiction, fantasy, and the realist novel instead of rejecting them. In contrast to Suvin who presents "science-fantasy" as a "misshapen subgenre," [125] for example, scholars such as Michael M. Levy who study characterization in science fiction,[126] as well as the rise of the "aca-fan" (an academic who is also a fan[127]), have collectively positioned science fiction as something too large and complex to be confined by the notion of "cognitive estrangement." Tautological definitions, where science fiction is that which is science fiction (or in the case of Gary K. Wolfe that which is defined by the SF authors themselves[128]), act not so much as "a cynical marketing exercise" as Adam Roberts presents it[129] but as a celebration of science fiction as a varied genre.

Rather than taking the "loss" of cognitive estrangement (both in the sense of something missing or as failure) as either a victory or defeat, however, I argue that the increased range of science fiction as a genre should prompt reconsideration of the meaning of cognitive estrangement. Instead of "literary" qualities such as character emotion either subjugating or vanquishing the idea of cognitive estrangement, the expansion of SF as a category can be thought of as widening the range of what can be called "cognitive estrangement" in the first

122. Mendlesohn, *The Inter-Galactic Playground*, 75.

123. Elaine Ostry, "'Is He Still Human? Are You?': Young Adult Science Fiction in the Posthuman Age," *The Lion and the Unicorn* 28, no. 2 (2004): 243, accessed June 24, 2013, http://muse.jhu.edu/journals/lion_and_the_unicorn/v028/28.2ostry.pdf.

124. Roberts, "Defining Science Fiction," in *Science Fiction*.

125. Suvin, *Metamorphoses of Science Fiction*, 68.

126. For example, Michael M. Levy, "Who, What, and Why? Character Motivation in Doctor Who," *Children's Literature Association Quarterly* 10, no. 2 (1985): 76-79, accessed May 3, 2014, http://muse.jhu.edu/journals/childrens_literature_association_quarterly/v010/10.2.levy.pdf.

127. Arguably best represented by Henry Jenkins, who, having worked extensively on the cultural effects of *Star Trek* and other titles, labels himself as an "aca-fan" in the title of his own blog. Henry Jenkins, *Confessions of an Aca-Fan*, accessed May 3, 2014, http://henryjenkins.org.

128. Gary K. Wolfe, *The Known and the Unknown: The Iconography of Science Fiction* (Kent, OH: The Kent State University Press, 1979), xiv.

129. Roberts, "Defining Science Fiction," in *Science Fiction*.

place, instead of cognitive estrangement remaining relatively unchanged since Suvin first introduced it. Furthermore, the potential for science fiction to utilize emotion as a cognitive component for estrangement is made likelier due to the fact that the "science" in science fiction has also grown to include not only the material sciences but also the affective sciences[130] and social sciences. Notably, the the latter has increasingly concentrated on the political significance of emotion in "the so-called 'affective turn' in the social sciences."[131] The collective effects of these relationships are mapped out in figure 3.2.

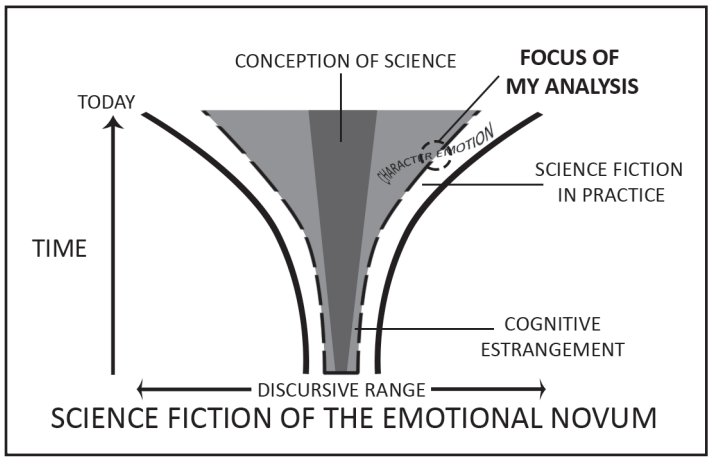

Figure 3.2. The growth of cognitive estrangement.

Essentially, while Suvin's original idea of cognitive estrangement may not necessarily fit science fiction as it has developed, it is not that the concept has been eliminated or obscured. Rather, it has grown accordingly, fueled by both a widening of its core through a broader understanding of scientific thinking and literary factors, such as character emotion becoming increasingly relevant, in the context of science fiction. The introduction of the soft sciences into SF, along with the use of literary qualities, aligns with Suvin's preference for soft science fiction over hard,[132] revealing cognitive estrangement to be more porous than it at first appears.

My study of science fiction manga is specifically an examination of that porous surface, the point at which emotions become science fictional (figure 3.2), and it is from that position, where emotion begins to directly influence the

130. For an overview of various arguments concerning the affective sciences, see Paul Ekman and Richard J. Davison, eds., *The Nature of Emotion* (New York: Oxford University Press, 1994).

131. Paul Hoggett and Simon Thompson, Introduction to *Politics and the Emotions: The Affective Turn in Contemporary Political Studies*, eds. Simon Thompson and Paul Hoggett (New York: Continuum International Publishing Group, 2012), 2.

132. Suvin, *Metamorphoses of Science Fiction*, 28.

SF narrative, that I argue that cognitive estrangement can be emotional not only in terms of outcome (making the audience feel estranged through their cognitive reading of the stark differences between their world and the SF narrative's), but also in the process as well (emotion itself becomes an element of logic and interaction and thus a part of the cognitive process towards estrangement). Here, the idea that emotions can be significant in science fiction does not refer merely to examples where emotions (or lack thereof) are overtly important to the SF setting such as in *To Terra*.[133] Rather, emotion in the literary and conventional sense, as a narrative force, can become science fictional, either by influencing the way we look at the novum, or even by becoming a novum itself.

3.2. THE COGNITIVE PROCESS OF CHARACTER INTERPRETATION

Although my concern with emotion in science fiction has more to do with its portrayal within the realm of fiction, it is necessary for me to address the subject of "real emotions," that is to say emotions felt by non-fictional people, because of how cognitive estrangement, particularly the estrangement aspect, is in the end meant to be felt on an emotional level by the audience. From this perspective, science fiction and the desire for rational processes share common ground with a long-held belief in political thought that logic and emotions should ideally remain separate. As Paul Hoggett and Simon Thompson state, "It was assumed that political subjects were essentially rational actors busily maximizing their strategic interests even while sometimes constrained by their limited information-processing abilities. This strange and lopsided account of the political subject split cognition from emotion, and reason from passion."[134] This wariness towards emotion arises from a fear of how it might be manipulated or be utilized to reinforce an existing set of beliefs, such as when Theodor Adorno and Max Horkheimer criticize mass culture partly in response to the propaganda of fascism and Nazism as a means to use emotion to manipulate emotion.[135] As

133. See Chapter 2.2 for a description of *To Terra*.

134. Hoggett and Thompson, Introduction to *Politics and the Emotions*, 1.

135. "The purpose of the fascist cult of formulae, the ritualized discipline, the uniforms, and the whole allegedly irrational apparatus, is to make possible mimetic behavior.… The *Führer*, with his ham-actor's facial expressions and the hysterical charisma turned on with a switch, leads the dance. In his performance he acts out by proxy and in effigy what is denied to every-

mentioned in the previous section, however, the increasing acknowledgement of emotions in political thought has changed, especially in recent years. Where once the idea that emotions naturally possess rationality might be seen as a tenuous argument at best or as coming from what has been perceived as alternative discourses (such as feminist literature), now it is an opinion shared by increasing numbers of scholars.[136]

Although the emotions of real people do not necessarily reflect the portrayal of emotions in a fictional setting, it is notable that this greater scientific consideration for emotions as a force with the potential for rational change resembles the deep inquiries into the concepts of identification, empathy, and interpretation with respect to characters in fiction. As Suzanne Keen explains when she writes, "Character identification often invites empathy, even when the fictional character and reader differ from one another in all sorts of practical and obvious ways, but empathy for fictional characters appears to require only minimal elements of identity, situation, and feeling, not necessarily complex or realistic characterization,"[137] interpreting character emotion possesses its own process of thoughtful elaboration. Similarly, Derek Matravers asks how people are able to feel that the emotions of fictional characters are "real" even when they are aware that these emotions do not exist in reality.[138] Noël Carroll writes, "Rather than character identification, it is our own-pre-existing emotional constitution, with its standing dispositions, that the text activates. This, in large measure, is what accounts for our emotional involvement with narrative fictions in general and mass fictions in particular."[139] These scholars, although they refer to different aspects of fictional emotion's relationship with audiences and disagree with each other in certain respects (Carroll finds character identification relatively trivial), all point towards a complex process where emotions become

one else in reality." Max Horkheimer and Theodor W. Adorno, *Dialectic of Enlightenment: Philosophical Fragments* (Stanford, CA: Stanford University Press, 2002), 152.

136. See for example: Noël Carroll, *A Philosophy of Mass Art* (New York: Oxford University Press, 1998), 252-261.

137. Suzanne Keen, "A Theory of Narrative Empathy," *Narrative* 14, no. 3 (2006): 214, accessed November 20, 2013, http://muse.jhu.edu/journals/narrative/v014/14.3keen.pdf.

138. Quoted in Joseph T. Palencik, "Emotion and the Force of Fiction," *Philosophy and Literature* 32, no. 2 (2008): 259, accessed June 24, 2013, https://muse.jhu.edu/journals/philosophy_and_literature/v032/32.2.palencik.pdf.

139. Carroll, *A Philosophy of Mass Art*, 265.

understood, and that this process is generated in part through the ability to imagine characters with emotion.[140]

In Mendlesohn's concerns over YA science fiction, the belief that cognitive estrangement has trouble existing in stories dominated by emotion is based on the idea that an emphasis on character psychology risks bringing along with it an entire arm of mainstream/traditional fiction which operates on values different from the ones exhibited most prominently in science fiction, and that feelings lead to "scientifically" inferior developments or even a resistance against change. Yet, in light of the complexity with which an audience can come to "understand" the emotions of a character, there is the potential for this process to lead to cognitive estrangement. When considering the Suvinian argument that science fiction operates by creating convincing worlds where the origins and consequences of nova are in some way traceable throughout the narrative, it is assumed to mean a world that is on some level "scientifically convincing.... The emphasis is on difference, and the systematic working out of consequences of a difference or differences, of a novum or nova, becomes the strength of the mode."[141] However, there is also the possibility that a world portrayed mainly in terms of its scientific detail works differently for readers who find that emotions are an important part of the world; for them, the "information-dense" portrayals may lack sufficient attention to emotions and therefore be "unconvincing." Without this connection, such readers would

140. Azuma Hiroki has presented a somewhat similar idea, arguing that, in a postmodern environment, people (notably *otaku*) do not take in stories as a whole but rather extract relevant information for their own use, a "database narrative" approach (Azuma Hiroki, *Otaku: Japan's Database Animals*, trans. Jonathan E. Abel and Shion Kono (Minneapolis: University of Minnesota Press, 2009), 27-35). In the case of *otaku* this relevant information involves finding the attractive qualities of characters, and then using those fragments to potentially piece together new and individualized narratives. While this is potentially useful to my own arguments as it also shows how people can interpret more fully formed ideas out of bits and pieces of characters and to provide "alternative perspectives" on a given narrative, I have chosen not to utilize Azuma's argument because this dissertation is not about seeing how audiences defy, subvert, or transform narratives for their own use. For similar reasons, while Azuma Sonoko (unrelated) expands upon the notion of the "database narrative" by showing how those fragmented elements can include interpersonal relationships and thus potentially ties in with the subject of the "you-me dynamic" (Azuma Sonoko, "Mōsō no kyōdōtai: 'Yaoi' komyuniti ni okeru ren'ai kōdo no kinō [The cooperative system of fantasizing: The functions of codes of love in the 'yaoi' community]," in *Shisō chizu* [Idea maps], vol. 5, eds. Azuma Hiroki and Kitada Akihiro (Tokyo: NHK Shuppan, 2010, 249-254) its focus on fans also would take this dissertation in a very different direction.

141. Roberts, "Defining Science Fiction," in *Science Fiction*, "Some Formalist Definitions of SF."

be prevented from experiencing cognitive estrangement because the story would have never successfully connected to their cognition in the first place, something which can potentially be provided by character emotion by way of the interpretive process which makes it into something "real." The argument that a narrative which focuses on emotions first and foremost brings with it an enormous risk of contravening the "scientific thinking" of science fiction is therefore questionable. While having a detailed and intricate extrapolation of a novum overshadowed by a preponderance of emotion remains a distinct possibility, it would be a mistake to think that prominent emotions, at best, can only contribute to the extrapolation of the novum with great difficulty. This is not a critical judgment of science fiction's demographics, nor is it an argument that science fiction should do more to cater to readers who prefer emotional stories and therefore that SF is simply better when it is more emotional. Instead, the main point here is that the portrayal of emotions in a work of fiction itself involves a form of thoughtful extrapolation, a process that, in turn, can potentially become a part of the science fictional narrative.

The *Neon Genesis Evangelion* manga,[142] like its better-known anime counterpart,[143] provides a strong example of characters whose "emotionally convincing" characteristics, notably their psychological complexities, serve to create a strong sense of their SF environment. The manga portrays a post-apocalyptic world where humanity must defend itself from alien-like invaders known as "Angels," but the main characters themselves are so overwhelmed by personal trauma that their own emotions weigh on them more greatly than the enemy threat. While one might accuse *Neon Genesis Evangelion* (hereafter *Evangelion*) of being a story where character psychology overshadows the science fictional setting, it is the very fact that the main characters "ignore" the world they are tasked with protecting which contributes to *Evangelion* and its sense of cognitive estrangement. These characters are supposed to set their personal feelings aside in service of a greater cause

142. Sadamoto Yoshiyuki, *Neon Genesis Evangelion*, vol. 1–4, 3-in-1 Edition (San Francisco: VIZ Media, 2012–2013).

143. The *Neon Genesis Evangelion* anime television series and its manga began at around the same time, but the anime is generally considered the "default" version, with the manga being a concurrent reinterpretation. Additionally, because the manga was serialized for another approximately 20 years after the TV series concluded while covering approximately the same time frame, it has gone in some substantially different directions.

but are unable to do so, a tension which generates the idea that people's individual psychologies do not vanish simply because there is something of "higher" importance in society.

While it is possible to maintain that these ideas do not apply directly to science fiction, which operates on a particular framework and set of values, the resemblance between narrative empathy and the process of cognitive estrangement is substantial. Like science fiction, the ability to think of characters as emotionally "real" from minimal qualities requires imagination, interpretation, and a connection to the historical present. Though this cannot be considered perfectly identical to the interpretive process involved with science fiction, this commonality provides a means through which emotions, particularly how they can interact with the novum on a cognitive level, can be investigated. The tendency when discussing science fiction and traditional character psychology-oriented fiction may be to emphasize their differences, but in this case their similarities are just as significant. The ability for the broader effects of the novum to be "minimized" as part of the exploration of its world as seen in an example such as *Evangelion* shows how the presence of emotion in a work of science fiction is capable of expanding the range of considerations SF can offer, and can contribute to the investigation of science fiction as a way to open up additional paths for political thought.

3.3. EMOTION AS ALTERNATIVE PERSPECTIVES

If emotions are capable of "resisting" the science fictional world, then there is the possibility for emotions to impact how we view the novum by providing "alternative perspectives" on the science fictional environment. By acting as contextualized viewpoints of specific characters, a narrative can potentially deliver its science fictional world without necessarily being preeminently conducive to witnessing it. This "conflict of interest," in relation to the tendency for SF protagonists to be objectively rational in their engagements of science fictional environments and therefore "ideally suited" for expressing the contents of that world, presents the option for characters to be in some sense "unreliable" for apprehending their environments. This, in turn, can potentially act as a method to provide various insights into a given science fictional space, where emotions become a means by which to clarify the novum.

While there is immense variation among objectively rational SF/utopian protagonists, there is also a clear historical trend of characters that are especially suited for expressing the ideas that come from their narratives through the overtly rational aspects of their perspectives. In Edward Bellamy's *Looking Backward*,[144] the main character Julian West is initially skeptical of the substantial changes brought forth by an American society run like a benevolent corporation, but that skepticism also sets up his eventual logical realization that the United States of the future is vastly superior.[145] In Jack London's *The Iron Heel*,[146] the ultra-masculine Ernest Everhard is a man whose intimidating intelligence and passion derive from his unceasingly rational mind and mastery of Marxist thought. This renders him as the embodiment of the values central to the perfect society known as the "Brotherhood of Man" which would arise in the distant future. Case in William Gibson's *Neuromancer*[147] has a history as a drug addict and hacker that heavily influences his viewpoint, but this also provides him the "ideal" perspective of his world because his condition and his intimate understanding of cyberspace make him appropriate for the particular dystopian condition of the novel. Robert Kinnaird in Hal Clement's *Needle*[148] is a naturally inquisitive boy with skills in logical deduction, which quickly become useful in his interactions with the alien symbionts. In each example, while the respective characters do not entirely resemble each other and even express emotions in different ways, their ultimately rational and logical selves are presented as, if not the perfect "formal 'registering apparatuses,'"[149] at least well-suited to the task.

This is not a condemnation of the objectively rational character in science fiction, as using a character who possesses a relatively neutral perspective on their world first and foremost provides an effective and efficient way to convey

144. Edward Bellamy, *Looking Backward* (Bedford, MA: Applewood Books, 2009).

145. The character Julian is actually extremely emotional, but I find that the use and development of his emotion in *Looking Backward* almost exists separate from the main narrative about the utopian society itself, which makes it actually more of an example where emotions neither contribute to nor hinder the novum.

146. Jack London, *The Iron Heel* (Chicago: Lawrence Hill Books, 1907).

147. William Gibson, *Neuromancer*, Kindle Edition (New York: Penguin Putnam, 2003), accessed February 7, 2014, http://www.amazon.com/Neuromancer-William-Gibson-ebook/dp/B000O76ON6.

148. Hal Clement, "Needle," in *The Essential Hal Clement Volume 1: Trio for Slide Rule and Typewriter* (Framingham, MA: The NESFA Press, 1999), 21-204.

149. Philip E. Wegner, *Imaginary Communities: Utopia, the Nation, and the Spatial Histories of Modernity* (Berkeley: University of California Press, 2002), 13.

a radically different environment. Nor does a character being "emotional" automatically mean that they are neither objective nor rational. However, objectively rational characters clearly serve a specific function based on the idea that utopian and science fiction narratives should give the "best" view possible of their settings and their political ideas. *The Iron Heel*, for instance, reinforces the view of Ernest as the rationally objective protagonist merely limited by the period in which he lived. Using one of London's "favorite literary devices, the frame story,"[150] where a (fictitious) foreword writer named Anthony Meredith lives in the utopian age of the Brotherhood of Man and is thus afforded a great degree of hindsight, we see through Anthony's eyes the biases present in Avis's recollection due to her love for Ernest, as well as the limits in Ernest's own knowledge. Yet, the reveal that Ernest was "but one of a large number of heroes who, throughout the world, devoted their lives to the Revolution..."[151] only serves to strengthen Ernest's view as the best one available for experiencing the world of the narrative, because it shows how Ernest's way of thinking was an objectively better one shared by many. The only perspective that is more ideal is Anthony's, who functions in a way as a stronger, more enlightened post-Revolution version of Ernest.

The emotional qualities of Avis and the limitations of Ernest are emphasized as ways of casting their perspectives as subjective ones, but it would be useful to take this a step further and to consider the emotional point of view that resists clearer perception of the world. What if, for instance, *The Iron Heel* focused not on Ernest, or Avis and her Julian West-like role in the narrative, or even the representatives of the "Iron Heel"—the oppressive capitalist forces that control the world and stifle the progress of mankind—but the character Bishop Morehouse? In *The Iron Heel*, Morehouse is portrayed as a compassionate and emotional man who is unfortunately blind to the "realities" of historical materialism. Over the course of the story, Morehouse begins to understand Ernest's words about the terror of the Iron Heel and provides aid and comfort to workers, but because he does not properly understand the need for revolution, Morehouse's attempt at helping is ultimately considered misguided. If *The Iron Heel* were to use Morehouse as its primary conduit into this alternative world and not cast him so clearly as a lamentable creature who can never learn the "truth," the result, I argue, would be a substantially different perspective on the workings of that world. In this cir-

150. Wegner, *Imaginary Communities*, 117.

151. London, *The Iron Heel*, 3-4.

cumstance, emotion could act as a means by which to approach and understand the novum, and the very possibility that this understanding may be "imperfect" does not necessarily lead to a "wrong" portrayal of the world but merely a different one. The potential to challenge the overwhelming sense of the "objective" makeup of the world as espoused by the original novel is where the ability for emotion to provide alternative perspectives reveals its significance to science fictional explorations of political ideas.

The notion that subjectivity and psychology exist within roughly the same space, as I have implied, has been met with some resistance. Fredric Jameson, in categorizing the type of science fiction which includes Philip K. Dick, Stanislaw Lem, and Le Guin, states that their science fiction is better described as emphasizing "subjectivity" rather than "psychology" because psychology is "disqualified for its humanist overtones" and for being more of a "pseudo-science."[152] However, a mild conflation between psychology and subjectivity is not necessarily problematic for science fiction, particularly in light of feminist writer Margaret Walker's idea for an "alternative moral epistemology." [153] If one sets aside the moral aspect of her argument (valid as it may be), Walker provides a helpful way for thinking about how "humanist psychology" can cooperate with "subjectivity" in science fiction. Writing in response to the tendency for moral philosophy to assume that the best solutions come out of rational objectivity at the same time that it fails to question where the standards for rationality may come from,[154] Walker "does not imagine our moral understandings congealed into a compact theoretical instrument of impersonal decision for each person, but as deployed in shared processes of discovery, expression, interpretation, and adjustment between persons."[155] This method relies on a viewing of "particular persons as *a*, if not *the*, morally crucial epistemic mode,"[156] using what

152. Fredric Jameson, *Archaeologies of the Future: The Desire Called Utopia and Other Science Fictions* (London: Verso, 2005), 92-93.

153. Margaret Urban Walker, "Moral Understandings: Alternative 'Epistemology' for a Feminist Ethics," *Hypatia* 4, no. 2 (1989): 16, accessed December 1, 2013, http://www.jstor.org/discover/10.2307/3809803.

154. Walker is writing in particular about the tendency for women's political views to be denied due to women being seen as too irrational, but I find that this idea is still useful even when not strictly limited to its feminist origins.

155. Walker, "Moral Understandings," 16.

156. Walker, "Moral Understandings," 16.

Carol Gilligan describes as a more "contextual and narrative"[157] form of thinking rather than one that "abstracts the moral problem from the interpersonal situation."[158] Walker also points to the significance of storytelling as a part of emotional investigation, where narrative relies on "the location of human beings' feelings, psychological states, needs, and understandings as nodes of a story (or of the intersection of stories) that has already begun, and will continue beyond a given juncture of moral urgency."[159] If this is taken as one of the strengths of considering the same circumstance from multiple angles, it can also apply to SF narratives that use emotion to provide alternative perspectives and thus a more malleable or customizable form of investigation of the science fictional world. Emotions can thus be used to question the structure of the worlds both fictional and real, evoking Donna Haraway's idea that "Cyborg imagery can suggest a way out of the maze of dualisms in which we have explained our bodies and our tools to ourselves. This is a dream not of a common language, but of a powerful infidel heteroglossia."[160] The integration of emotion in science fiction can similarly aid in thinking about cognitive estrangement beyond its original meaning.

Within the conception of "emotion as alternative perspectives" there are three points that require clarification. First, the idea of emotion as alternative perspective is not meant to cast emotion as a magic bullet which automatically rips through the constraints of science fiction, nor is it an assertion that emotional science fiction is fundamentally superior. Second, this is also not an argument that emotions are inherently resistant to the concept of the "ideal" protagonist, as a vast number of stories outside of science fiction presume their main characters to be the perfect means to transmit a certain set of values. Third, science fiction manga, including the works that will be analyzed in later chapters, are not examples of perfectly non-ideal protagonists, because they are all in some way given particular "advantageous" viewpoints from which to view their world, often by having their identities connect directly to the novum. In *7*

157. Carol Gilligan, *In a Different Voice: Psychological Theory and Women's Development* (Cambridge, MA: Harvard University Press, 1982), 19.

158. Gilligan, *In a Different Voice*, 32.

159. Walker, "Moral Understandings," 18.

160. Donna Haraway, "A Cyborg Manifesto: Science, Technology, and Socialist-Feminism in the Late Twentieth Century" in *Simians, Cyborgs and Women: The Reinvention of Nature* (New York: Routledge, 1991), accessed November 20, 2013, http://www.egs.edu/faculty/donna-haraway/articles/donna-haraway-a-cyborg-manifesto.

Billion Needles, the character Hikaru experiences the novum firsthand by being one of the first humans to merge symbiotically with an alien species.[161] *Zettai Karen Children*[162] features characters who are among the strongest psychics in the world and thus more keenly experience the social tensions between psychics and normal humans. *Coppelion*[163] presents its central characters as clones created in response to the nuclear disaster in Tokyo at the center of the manga's premise. Rather than providing viewpoints and contexts based entirely in their emotions, these science fiction manga use their characters to emphasize a more emotional sense of perspective in conjunction with a conventionally rational one. This can be seen as reflecting Valentin Volosinov's thoughts on truth as described by Wegner: instead of assuming either fact or individual subjectivism as the ultimate truth, a "dialectical synthesis" between these two approaches is preferable.[164]

By considering its own characters as beings with emotional positions specific to their individual circumstances and backgrounds, a work of science fiction can intentionally operate from the subjective biases of those characters as a way to expand the portrayal of the science fictional world. This can be seen in how the *Evangelion* manga portrays specific emotional traumas for each of its characters and then shows how their unique sets of values conflict with their world in different ways. Sōryū Asuka Langley, a character touted as a genius, tries to find her self-worth by proving her talent for defeating the monstrous "Angels," for instance, while protagonist Ikari Shinji fights in order to avoid having to look for a purpose in the first place, a difference in psychology which creates a more varied view of the pressure placed upon them by their environment. In fact, if one takes into account the many different versions of the primary *Evangelion* narrative,[165] subtle differences in characters' psychological makeups influence

161. Tadano Nobuaki, *7 Billion Needles*, vol. 1. (New York: Vertical, Inc., 2010), 12-30.

162. Shīna Takashi, *Zettai Karen Children*, vol. 1-15 (Tokyo: Shogakukan, 2005-2008).

163. Inoue Tomonori, *Coppelion*, vol. 1-20 (Tokyo: Kodansha, 2008-2013).

164. Wegner, *Imaginary Communities*, 4.

165. The primary *Evangelion* narrative—which exists in roughly similar forms in the anime television series, the manga by Sadamoto Yoshiyuki, and the *Rebuild of Evangelion* films—focuses on the core characters of Ikari Shinji, Sōryū Asuka Langley, and Ayanami Rei and the gradual elimination of the threat of the Angels using massive bio-mechanical robots known as "EVAs." It is strongly characterized by the sense of tension between these characters and the world around them, which the various secondary properties including games and other manga tend to minimize.

the image of what should be the "same" world. Compared to the Shinji from the television anime (the "original" Shinji) and his passive personality,[166] the manga Shinji described thus far is a little more defiant, while the Shinji of the *Rebuild of Evangelion*[167] film series is less paralyzed by fear, which shifts the understanding of the cruelty of Shinji's environment in different directions.[168]

Additionally, as will be seen in later chapters, the emphasis on characters' subjective perspectives is what allows *Zettai Karen Children* (Chapter 6) and *Coppelion* (Chapter 7) to convey their science fictional worlds in specific ways related to emotion. This is especially the case for *7 Billion Needles* (Chapter 5), which replaces the ideally "rational" view of the protagonist Robert in *Needle* with that of the much more emotional Hikaru. If characters can simultaneously be Ernest, Avis, and Bishop Morehouse, whether there is a focus on a lone character or on a large variety, the expression of subjective experience becomes a way for the ideas that come out of a work of science fiction to be both complex and multi-layered in their conveyance of the presence of relative truths within the worlds portrayed. A variety of emotional perspectives allow for the same novum to be interpreted in multiple ways.

3.4. EMOTION AS "POTENTIAL LOGIC": THE EMOTIONAL NOVUM

In addition to emotions providing alternative perspectives within SF, I also argue that emotion can become an integral part of the science fictional aspect beyond the simple idea that the novum in some way directly involves emotion.

166. *Neon Genesis Evangelion*, Platinum Complete, directed by Anno Hideaki (1995-96; ADV Films, 2005), DVD.

167. *Evangelion: 1.11: You Are (Not) Alone*, directed by Anno Hideaki (2009; Funimation Entertainment, 2010), DVD. *Evangelion: 2.22: You Can (Not) Advance*, directed by Anno Hideaki (2010; Funimation Entertainment, 2011), DVD.

168. More specifically, these small differences in Shinji result in an environment where people are unable to make meaningful connections with each other in the television series, one where close connections are pulled apart by the condition of the world itself in the manga, and one where the characters actively fight to keep themselves connected in the *Rebuild of Evangelion* films. For additional information, including how the mediums themselves influence these differences, see: Carl Li, Nakamura Mari, and Martin Roth, "Japanese Science Fiction in Converging Media: Alienation and Neon Genesis Evangelion," *Asiascape Occasional Papers* no. 6 (2013), accessed November 10, 2013, http://asiascape.org/resources/publications/asiascape-ops6.pdf.

To a certain degree, this is well within the capability of more "rationally" focused conceptions of science fiction, as a portrayal of a society that actively rejects emotion, for example, makes the significance of emotion to the SF environment (as well as the possibility of cognitive estrangement through it) clear and obvious. However, I extend this thought process further and present the idea that emotion itself can become a novum. In particular, emotions can act as forms of "potential logic," capable of contributing to cognitive estrangement when they are viewed as ideas in the process of becoming logical, neither lacking reason nor standing opposite to it, and thus something that can exist in the very science fictionality of a narrative.

In his description of the anime *Nadia: The Secret of Blue Water,* Thomas Lamarre writes about how its characters, through the visual techniques used in its production, "are never fully on the side of reason or unreason," and whose "actions and emotions constitute potential depths and affective fields."[169] Though *Nadia* is arguably less science fiction and more science fantasy due to the prevalence of magic, it is certainly not the case that the idea of characters who possess both reason and unreason simultaneously are limited by fantasy or other non-SF forms of fiction. Rather, this concept can translate into science fiction by having depictions of emotion that, if not emphasizing both qualities outright, leaves space for interpretation of emotions as leading to some form of logical connection to the worlds they occupy, even as those expressions continue to be overtly emotional.

Writing about Vonda McIntyre's *The Exile Waiting*, Jameson posits the following idea: "If indeed the psychological attitudes and interpretations ... are rather something like the raw material on which the form of SF narrative works, then we must add that it transforms them, by way of its own unique production process, into *something else*: something which in the case of *Exile*, has a different kind of aesthetic value than would be observable even in the best 'psychological' art."[170] Taking the idea of the character that is simultaneously reason and unreason and processing it through the SF narrative, it becomes possible for character emotions to act as the precursor to science fictional development in a narrative. This positions emotions within the SF narrative as an element of

169. Thomas Lamarre, "Inner Natures," in *The Anime Machine: A Media Theory of Animation* (Minneapolis: University of Minnesota Press, 2009).

170. Jameson, *Archaeologies of the Future*, 299.

possibility that can then be realized over the course of the story, and is the first of two functions for emotion as potential logic: "emotion as eventually realized logic." If, rather than being perceived as something opposite to logic and reason, the conveyance of emotion can be seen as a form of thought derived from a logic which has yet to be clearly defined, then it would have a clear purpose in science fiction, a narrative genre which emphasizes on-going processes.

Examples of emotions as "eventually realized logic" can be found in *7 Billion Needles*, *Zettai Karen Children*, and *Coppelion*, all of which feature one or more characters whose resultant emotions are able to exert influence on their worlds as part of a greater scientific process. In *7 Billion Needles*, for example, the protagonist Hikaru interacts with the novum primarily through her emotions. This affects Horizon, the alien living inside of her, and over time it becomes able to interpret her passionate outbursts into something that another alien, the purely rational Moderator, can understand, thus implying that there is a logic at work in Hikaru's emotions. These expressions of emotion indicate an undefined logic working within them while also participating in the logical steps that drive the world of the narrative. Furthermore, they provide examples for how "emotion as potential logic" is not limited to a unidirectional relationship where emotion feeds into the science fictionality of the narrative. Instead of being exclusively the "raw material" which leads to science fictionality as per Jameson, emotion can also be the end product, reshaped and refined by the parameters of the SF environment, or even something in between. Here, emotion as "potential logic that is eventually realized" can participate in the elaboration of the novum to its fullest extent as both raw and refined product, and then feed back into the narrative as an influential force itself. As will become evident in subsequent chapters, the relationship established by emotion and the novum becomes increasingly complex and intricate as the direction of influence continually shifts.

While it would be tempting to argue that emotion as potential logic can only contribute to science fiction once it gains a more apparent structure, this fails to take into account the very science fictionality that comes from something being "only" a possibility. In order to elaborate on this point, I begin by analyzing the following quote by Suvin in reference to cyberpunk:

> 'Adolescent' does not necessarily mean invalid;
> indeed, it means very probably at least partially valid;

> but it also, finally, means untenable à la longue [in the long run].[171]

Although Suvin is not writing about emotion here, it is worth considering his use of the word "adolescent" and how it ties to the idea of emotion in science fiction. The most obvious connection would be with the assumed image of adolescence as a period in life where children are most ruled by their emotions, the criticism of which is at the center of Mendlesohn's views on "you-me"[172] narratives in young adult SF.[173] However, the more significant aspect of Suvin's remark is the conception of adolescence as a bearer of great potential. Emotion with respect to logic can be viewed in a similar manner, as possessing enormous potential to become a more visibly structured thought process. At the same time, another implication of Suvin's words is that the primary flaw of adolescence is the possibility that its potential remains unfulfilled.

If potential is seen mainly as something which can succeed or fail, then it is easy to argue that, even if emotions can be considered potential logic, a portrayal of emotions which does not clearly connect to the novum cannot sufficiently contribute to a sense of science fictionality. This way of thinking is present in Mendlesohn's concern over the seeming inability for readers of young adult science fiction to "convert" over to adult science fiction (which is presented as being less about emotional development and more about "science") in large numbers, where the issue lies not with how adult SF may not be doing enough, but in the tendency for young adult SF to over-emphasize emotions at the expense of informational density and thus distance itself from "proper" adult works.[174] In contrast to the idea that emotion as potential logic can only contribute to cognitive estrangement and the speculation of political alternatives if it fulfills its "potential," however, I would here argue that emotions which remain in a state

171. Darko Suvin, "On Gibson and Cyberpunk SF," in *Storming the Reality Studio: A Casebook of Cyberpunk and Postmodern Fiction*, edited by Larry McCaffery (Durham: Duke University Press, 1991), 365.

172. Mendlesohn, *The Inter-Galactic Playground*, 15.

173. This is not to actually assume that adolescence equates entirely with the idea of "highly emotional teenagers," nor do I disagree with Mendlesohn that this assumption should be challenged. Rather, my use of the terms emotional and adolescent here is in response to skepticism towards character emotions (especially in the form of highly emotional adolescents) as being unable to fulfill the goal of cognitive estrangement.

174. Mendlesohn, *The Inter-Galactic Playground*, 52.

of "adolescence" within SF can still be conducive to science fiction in two significant ways, particularly when thinking about the structural flexibilities of utopian and science fictions.

The first way in which emotion as "purely potential logic" can contribute to cognitive estrangement and thus the conveyance of political alternatives is when it emphasizes the very concept of "ideas in progress." In reference to Ernest Bloch's idea of societies and cultures as perpetually unfinished products, Wegner writes, "Of course, this project [utopia] too will only ever be partially successful, for the Archimedean point of any such a critical totalization similarly will be located in the always deferred, the 'not-yet-become' unity of the utopian future."[175] In other words, one of the strengths of utopian fiction and SF is that the world of the narrative does not have to be viewed with a beginning, middle, and end, an idea to which Jameson also points:

> . . . [I]n order for narrative to project some sense of totality of experience in space and time, it must surely know some closure (a narrative must have an ending, even if it is ingeniously organized around the structural repression of endings as such). At the same time, however, closure or the narrative ending is the mark of that boundary or limit beyond which thought cannot go. The merit of SF is to dramatize this contradiction on the level of plot itself, since the vision of future history cannot know any punctual ending of this kind, at the same time that its novelistic expression demands some such ending.[176]

Through a similar process, emotions can be viewed as "science fictional" when they emphasize the sense of possibility and thus act as the very idea of a perpetual process. This also allows "emotion as potential logic" to connect with "emotion as alternative perspective" by providing a way of scrutinizing the historical orientation of science fiction and cognitive estrangement. Walker's own interpretation of the word "narrative" in her alternative epistemology sep-

175. Wegner, *Imaginary Communities*, 19.

176. Jameson, *Archaeologies of the Future*, 283.

arates emotional expression from emotional satisfaction and the absolute need for dénouement, casting it as an on-going process, both a story being told and a story yet to be told, an idea that can be used to explore that contradiction between the open-endedness of SF and the closure expected of character psychology-based narratives.

The second way in which emotion as "purely potential logic" can add to the science fictional investigation of political ideas is through its similarities to the gap between the known and unknown that exists at the core of science fiction. Addressing the difficulty of determining at what point the contemporary world becomes the one found in the utopian narrative, Jameson points to the "the secession of Utopian imagination from everyday empirical Being," which "takes the form of temporal emergence and a historical transition," and how "the break that simultaneously secures the radical difference of the new Utopian society makes [that transition] impossible to imagine."[177] The "limit" of utopias is that there inevitably comes a point at which some of the vital differences which cause that alternative world to differ from the current world are not elaborated, and even science fiction, with the novum at its center and cognitive estrangement as its goal, is also restricted by the inability for every logical process to be fully elaborated.

However, the logic of SF is generally not thought of as vanishing simply because some elements go unexplained, and the ability to reinforce logic by the assumption that a plausible process exists can be considered one of the strengths of utopian and science fictions. The fact that there is, within the process of cognitive estrangement, a gap of variable size between the contemporary world and the one portrayed in the SF narrative in terms of how one transforms into the other, becomes an opportunity for readers to involve themselves in a greater level of interpretation. Furthermore, this gap also acts as a space of science fictional potential, in other words a novum. Given this, it should also be possible to view emotion as "purely potential logic" as capable of contributing to SF in a similar manner. The same process which allows people to imagine characters as possessing "real" emotions without the need for full elaboration on their psychologies, when placed in a science fictional environment, can encourage a similar level of questioning and cognitive investigation of emotion, and by extension an opportunity for cognitive estrangement.

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177. Jameson, *Archaeologies of the Future*, 85-86.

This ability for emotion to act as a novum, whether in the form of both "purely potential logic" or "potential logic that is eventually realized," can be seen in *Evangelion* and how the initial relationships between the characters and their environment generate different conceptions of their world as the narrative progresses. The character Ayanami Rei at first appears to be emotionless and almost robotic in her focus on the greater cause of fighting the Angels. Along with Shinji's own reactions to Rei, which involve him feeling unsure of how to communicate with her, the manga presents Rei as a human being created to perform according to the essential need of her world. Over the course of the narrative, however, Rei begins to exhibit emotion. While this initially appears to be the result of her increasing interactions with Shinji, it is shown that she in fact possessed emotions all along, that her "doll-like" personality is derived from her inability to both understand and express her own feelings, and that Shinji helps her to realize this. *Evangelion* alters the impression its setting provides by revealing the structure underneath Rei's supposed lack of emotions, from one which is capable of creating an emotionless being whose purpose is defined for her, to one which is also able to stunt the emotional growth of its "heroes."

However, Rei and her emotions also present a strange and complex entity made all the more cognitively estranging by the fact that the origins and consequences of those emotions are clearly derived from the environment around her.[178] This demonstrates the possibility for a work of science fiction to utilize emotion in order to explore both paradoxes of science fiction, the process that can never be fully detailed, and the goal that is ever-moving. The characters' emotions (besides being a way of interpreting their world) act upon the world itself, the "potential" of their emotions transforming into one of the many science fictional aspects of a given environment. This can help readers to try and understand the cause and effects of the characters' emotions as nova, despite the characters themselves being unable to fully confront the subject themselves, which then positions emotion as a potential logic that can contribute to a sense of cognitive and rational processes in an SF narrative.

178. Azuma Hiroki describes *Neon Genesis Evangelion* (specifically the TV series but this can apply to the manga as well) as a work where its fans largely ignored its science fictional world in favor of its characters and their attractive characteristics, especially when it comes to Rei (Azuma Hiroki, *Otaku: Japan's Database Animals*, trans. Jonathan E. Abel and Shion Kono (Minneapolis: University of Minnesota Press, 2009), 36-38, 51-52.). However, my description of Rei shows how her surface qualities nevertheless carry the potential to be explored and to connect to the science fictional setting.

3.5. CONCLUSION: FROM FUNCTION TO EXPRESSION

Whether regarded as a positive consequence or a negative one, the overall field of science fiction is often viewed as having grown well beyond Suvin's concept of novum and its desired outcome of cognitive estrangement. However, this view of science fiction relies on the notion that cognitive estrangement has remained in relative stasis as SF itself has changed. In contrast, I present an alternative means of looking at cognitive estrangement where it has adapted to the widening of the area called science fiction by both growing from within (expanding science fiction to include not only the material sciences but the social and affective sciences as well) and by absorbing "literary" qualities such as emphasis on character emotion. Together with the fact that the act of comprehending the psychology of a character can require an interpretive process similar to that of science fiction and the novum, emotion is positioned not opposite the cognition in cognitive estrangement but rather as something that can directly contribute to it.

Instead of viewing the "ambiguity" of emotion as evidence of it being poorly suited for the pursuit of political alternatives, emotion can encourage a sense of science fictionality and a path towards cognitive estrangement even when it might appear to do otherwise. Emotion can act as a lens through which to view a novum, providing alternative perspectives on a given SF environment that allows it to challenge the tendency towards rational objectivity common in science fiction. Emotion can also become a novum, where its function as a kind of potential logic renders it not only as an aspect to explore but also a way of looking at the very significance of "possibility" which exists at the core of science fiction. Together, these uses of emotion can elaborate in greater depth the worlds and political ideas conveyed in science fiction, as well as the characteristically "unfinished" state of science fiction itself.

This results in two major categories through which I will analyze the use of emotion in science fiction manga and explore the potential for "cognitive estrangement" to involve emotion in terms of both cognition and estrangement. The first is *the effects of the science fictional world on emotions*, which ties into the use of emotion as alternative perspectives. This category concentrates on how cognitive estrangement might be achieved through emotion when the drastic difference in the world or environment produces thoughts and actions that are

born out of psychological elements. "What reactions do characters have to the novum over the course of the narrative? What happens to a character's emotional state in the presence of the novum both short-term and long-term?" The second category is the opposite of the first, *the effects of emotions on the science fictional world,* whereby emotion is utilized as a novum. Viewing science fiction manga with respect to this idea is mainly about investigating the potential role of emotion as a foundational part of a science fictional narrative. "How might the emotions of characters impact the on-going processes of their world? How is the SF environment created through the expression of emotion?"

Providing that both directions exist in a work of science fiction, the two categories cannot automatically be assumed equal in amount, influence, or intensity, given the wide range of narrative and imaginative possibilities for stories regarded as science fiction. In addition, even assuming that the two are both present and mostly equal, it would be a mistake to regard their relationship as one of unidirectional cause and effect. Instead, it is necessary to take into consideration complex interactions between the two where the roles of cause and effect switch between the novum and emotion, possibly bleeding together to the point where it is impossible to fully distinguish the cause and the effect at any given moment.

Whether emotion is the novum or is merely the lens through which to view it, the visions of alternate worlds derived from would-be feasible mechanics can be informed and enhanced by its presence. The expression of emotion carries the potential to address and lay bare the supposed reliance on rigid structure in science fiction and expand on science fiction's ability to stretch the limits of cognitive perception, a process which can not only inform the political ideas found in SF but also approach these ideas in unique ways. What remains, then, is to see exactly how these emotions are conveyed in the first place, which in the case of this dissertation is in the form of science fiction manga. This will be the main focus of the next chapter, which explores the visual language of expression in manga and its influence on the portrayal of emotion.