



## A Problem for all Humanity: Nagasaki Writer Hayashi Kyoko Probes the Dangers of Nuclear Energy

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*Recent works have found renowned author Hayashi Kyoko and A-bomb survivor expanding her criticism of nuclear weapons to include nuclear power. This article looks at her criticisms of the nuclear disasters at Tokaimura in 1999 and Fukushima (ongoing), and her emphasis on the dangers of radiation as one which affects all humanity.*

### Keywords:

*Hayashi Kyoko, Trinity, hibakusha, kaku, radiation, atomic, nuclear, Tokaimura, Fukushima, Harvest*

Hayashi Kyoko (1930 - ) was fourteen and working at the Mitsubishi arms factory in Nagasaki – less than a kilometer and a half from the epicenter – when the atomic bomb struck. The experience would forever change her life and, eventually provide the central theme during her later career as a writer. Although wishing to sever her ties with what she has called “the worst of fates,” Hayashi has also stressed the impact of the bombing on her, writing “there was no way to live, other than by confronting August 9<sup>th</sup>.”<sup>1</sup> Since the publication of *Matsuri no Ba* (The Site of Rituals) in 1975, Hayashi has striven to encourage later generations to think of problems of the legacy of the bomb as their own.<sup>2</sup> One important way in which she has done this, is to highlight the lingering effects of radiation. For Hayashi, the problem of radiation damage does not end with the atomic bombing of Hiroshima and Nagasaki. Rather, it has consequences that affect all humanity.

Writers of atomic bomb literature including Hayashi have long focused on the dangers of nuclear weapons, including the ongoing suffering of Hiroshima and Nagasaki hibakusha. Few have directly criticized nuclear power. American propaganda efforts such as the Atoms for Peace program during the Eisenhower administration were highly successful in winning support for nuclear power in Japan, and even many hibakusha actively supported its “peaceful” uses. Because of this, many hibakusha including, until recently, Nippon Hidankyō (the Japan A-Bomb Victims Association) have been reluctant to speak out concerning disasters at nuclear power plants and the emergence of new waves of radiation victims.<sup>3</sup>

While Hayashi was no exception to this, her attention to the lingering dangers of radiation as a problem that can affect people and the environment for generations to come, is applicable to problems of nuclear power as well. Furthermore, in more recent works Hayashi has turned her

attention to nuclear power. In linking nuclear power with nuclear weapons she has created a powerful critique of all forms of atomic energy. Her words in 2011, after the disaster at Fukushima, that “radiation damage is not just the individual experiences of hibakusha, it’s a problem for all humanity,” reflect the two new insights in her work – an emphasis on the dangers of all forms of atomic energy and the realization that we are all now potential hibakusha.<sup>4</sup>

### *From Trinity To Trinity (1999 -2000)*

While the disaster at the Fukushima TEPCO nuclear power plant in March 2011 put the dangers of nuclear power in the world spotlight, Japanese nuclear plants had experienced earlier disasters including the 1999 accident at a JCO nuclear fuel conversion plant in Tokaimura, Ibaraki, an incident which had a large impact on Hayashi. While she was writing *From Trinity to Trinity*<sup>5</sup>, a mishandled nuclear fuel conversion procedure at a JCO processing plant for nuclear fuel exposed three workers to deadly amounts of radiation and made more than 100 other workers hibakusha. Approximately 310,000 residents over a 10 kilometer radius were told to remain in their homes after radioactive particles, as well as neutron and gamma rays, leaked out of the plant. Ultimately at least 667 people were dangerously exposed to radiation.<sup>6</sup> In *Trinity* Hayashi writes that she saw the news of this incident on television during her visit to the Trinity Site in New Mexico. This prompts her to write a letter to her friend Rui,

Just about an hour ago when I returned to my hotel room, I overheard news of the Tokaimura incident on television. I’m very anxious to know how big the accident was. Tomorrow I depart for Trinity. I can’t seem to relax with all the time I have, so I’m writing this letter to you.<sup>7</sup>

Tsukui Nobuko, a writer and interpreter who traveled with Hayashi to New Mexico, notes the impact of the event on Hayashi’s work, writing “of course the terrible amazement that we, in the midst of a trip to the very origin of the bomb, felt over the accident at the nuclear plant – a byproduct of nuclear weapons – is dealt with in *Trinity*.”<sup>8</sup>

*From Trinity to Trinity*, written in 1999 and published in the compilation *Nagai Jikan o Kaketa Ningen no Keiken* (Human Experiences Over a Long Time) (2000), is based on Hayashi’s trip to the Trinity Site where the first atomic bomb was tested on July 16<sup>th</sup>, 1945. The narrator of the story mentions that she had wanted to visit the site for some time and, elaborating on her motivations, writes “Trinity is the departure point for my August 9<sup>th</sup>. It is also the terminus for me as a hibakusha – from Trinity to Trinity.”<sup>9</sup> In other words, the path of the atomic bomb that affected the rest of Hayashi’s life, started at Trinity. The trip also serves to give a sense of closure to her constant wish to “cut her ties to August 9<sup>th</sup>.”<sup>10</sup> Thus, by coming full circle, Hayashi comes face to face with the tragic history which has resided in her for more than half a century.

In the story, the narrator describes a number of places in New Mexico, including The National Atomic Museum, the Los Alamos National Laboratory, and finally the Trinity Site at the White Sands missile test site. The narrator reflects on American attitudes toward the atomic bombings and nuclear power, and atomic power’s relationship with nature. The narrative is broken at many points as she recalls stories from the past, or reflects on things she has read. Much of the story is written as a letter to Rui, who is described as a younger, female friend.

Hayashi expands her focus in *Trinity* to include nuclear power in her criticism of nuclear weapons, and to move beyond the experiences of atomic bomb victims to include victims of other nuclear disasters. While in the past she often used more literal descriptions, such as glass shards embedded in a survivor’s body, to describe the lingering effects of radiation, Hayashi approaches her critique of atomic energy in *Trinity* more subtly and through a greater use of linguistic techniques, metaphor and parable.

One example of this occurs in the language with which Hayashi frames nuclear weapons and nuclear power. In Japanese, the word typically used for atomic bomb is *genshibakudan* (原子爆弾) and for nuclear power *genshiryoku* (原子力). Eschewing these terms however, in *Human Experiences Over a Long Time*, Hayashi often opts for the third term, *kaku* (核) which implies an “atom” or “nucleus” and is best translated into English as nuclear or atomic energy. In *Trinity* when Hayashi stands at Ground Zero of the Trinity Site in New Mexico, she reflects on atomic energy’s lasting effects and extends the concept of hibakusha to the natural world, including plants and animals, writing “until I had stood at the Trinity Site, I had thought that the first victims of nuclear energy (*kaku*) had



**Figure 1: One of the three workers exposed to high-level radiation is carried by stretcher from the JCO plant. (9.30. 1999)**

wishes to delineate certain boundaries or insert ambiguity around a meaning which might otherwise be implied were the word to be written with Chinese characters. In the case of Rui, it would be apparent to a Japanese reader that the sound "rui" could also be expressed by the character 類, the same character used in the word *jinrui* (人類), or "humanity."<sup>14</sup> In his introduction to Vol. 6 of *The Complete Works of Hayashi Kyoko*, Prof. Kuroko Kazuo of Tsukuba University highlights Hayashi's use of the character "Rui" as symbolic of the larger themes dealt with in *Trinity* and *Human Experiences Over a Long Time*.

The novel depicts the character Rui as a younger friend, however, it is natural to think that the author also implies that Rui represents humanity. When the story is read in this way, the link between Hayashi Kyoko's visit to the Trinity Site and the critical incident that occurred at the JCO nuclear processing plant in Tokaimura, Ibaraki on Sept. 30<sup>th</sup>, 1999 becomes clear. One strongly thinks that atomic energy versus human beings and the earth is a larger theme than that dealt with in her previous works, which were based on personal experiences as an A-bomb victim.<sup>15</sup>

Read in this way, Hayashi's message becomes clearer. In the beginning of the story, the narrator recalls a time when she inquired about Rui's age. Avoiding the question, however, Rui responded "I want to be just like you when I grow up."<sup>16</sup> This line could be understood as humanity's fascination with atomic energy – a fascination which threatens the danger of becoming a hibakusha like the narrator or even our own destruction. Later, Rui questions the narrator's intent in visiting the Trinity site, asking if she is "an atomic bomb maniac," a statement reminiscent of criticism that Hayashi has faced throughout her writing career for focusing so single-mindedly on the atomic bombings.<sup>17</sup> Ending both *Trinity* and her letter to Rui, the narrator says, "the world needs not your tests," in reference to the atomic bombs. Then in the very last line, the narrator asks, "what are your thoughts, Rui?"<sup>18</sup> The effect of this line is to force readers to break whatever sense of objectivity might have been felt toward the story and to contemplate Hayashi's message as their own problem.

In *Human Experiences Over a Long Time* Hayashi illustrates the danger of radiation with an increased sense of urgency, reflective of the magnitude of a problem such as nuclear energy versus human beings, a danger illustrated in a number of different scenes in *Trinity*. This ever present danger is wonderfully illustrated through the metaphor of the intruder. Just after a visit to the Science Museum in Los Alamos, the narrator relates an "incident" that occurred shortly before she left Japan. Awakened by a sound during the night, she glimpses the outline of a man outside the door to her garden. The man walks away, but the narrator is terrified and checks to see that all of the doors are locked. In the morning, she is unsure of whether she really saw him, but when she finds something the man had left behind, she is sure. She mentions that, after this event, she installed a security system and was more careful to lock the doors. However, she is unable to regain her previous sense of safety and mentions that the incident made her realize her "own loss of the sense of crisis."

I had been embracing a groundless sense of security, thinking that our daily peace was protected. On hot summer nights, I would leave the glass door in the hallway open a crack to let the wind blow in and sometimes would forget to lock the door. Danger is always within close proximity. ...I don't want an innocent child that I've raised to be touched by violence. When I repeatedly cautioned thus, Kei said, 'If we take appropriate measures and there's still a break in, then that's that.' Yes, yes. But somehow it sounded wrong. Was it alright to be so complacent?<sup>19</sup>

The metaphor of the attempted break in again reflects Hayashi's feeling that, by being exposed to the bomb, a crime had been perpetrated against, not just her, but her children as well, and all who could be susceptible to the effects of radiation. "There are particles of radiation from the atomic bombing in my body," she stated. "That's not just a problem that ends after the bombings of Hiroshima and Nagasaki, that's a problem of genes."<sup>20</sup> In addition, Hayashi speaks of society's complacency in the face of the dangers of radiation. While some of this is addressed to the false sense of security that many are lulled into in presuming that they are safe from attack by nuclear weapons, Hayashi's incorporation of the Tokaimura incident into the story suggests that this same complacency can be displayed toward nuclear power as well.

### **Harvest (2002)**

Two years after writing *Trinity*, Hayashi again returned to the Tokaimura disaster with *Shūkaku* (Harvest) (2002). This short story depicts an elderly farmer and his son who live right next to the nuclear processing plant. In scenes that eerily anticipate the tragic events later to unfold at Fukushima, the reader witnesses a nuclear disaster unfolding only meters away through the eyes of the main character. Uninformed about the details of the plant next door to his farm, the main character – 74 year old Yamada – goes about his day in typical fashion until the faint sound of sirens within the plant walls begins to sound. Learning about the accident only after watching the news on television, Yamada is eventually told to evacuate along with the rest of the surrounding area. However, unwilling to leave his farm right before the harvest, he decides to stay.

*Harvest* is significant for Hayashi's writing in that it is one of the first instances in which she focuses in detail on victims of radiation not from the atomic bomb but from nuclear power disasters. What is both striking and tragic in the story is the lack of knowledge of the characters about nuclear power – so

been humans. This was not the case though, the first hibakusha had been right here." It is not just the nuclear bomb that has the potential to create hibakusha, but all nuclear energy.<sup>11</sup>

Additionally, there is the use of the word *hibaku*. This can be written two ways, 被爆 or 被曝. The first refers to being bombed, especially by an atomic bomb, and contains the nuance of receiving radiation damage. Similarly, *hibakusha* (被爆者) refers to victims of bombings, especially the atomic bombings, and is occasionally defined as one who holds certification from the government as having been exposed to radiation in Hiroshima or Nagasaki. The second writing, 被曝 is defined as being exposed to radiation and includes all victims of radiation damage whether of bombing or radiation associated with nuclear power.<sup>12</sup> In *Human Experiences Over a Long Time*, Hayashi uses this second writing when she talks about internal radiation exposure (*naibu hibaku*) from inhaling radioactive particles. The issue of internal radiation exposure has been of the greatest concern for Hayashi. Many of her works were written as victims of the atomic bombs suffering from radiation sickness were attempting to gain recognition from the government. Ultimately, Hayashi writes, the Japanese government refused to recognize the link between radiation sickness from internal exposure and the atomic bombs.<sup>13</sup>

Hayashi's final example of language in *Trinity* to emphasize the threat of radiation from nuclear energy is through the character Rui. The name Rui is written in katakana (ルイ), the Japanese script used mostly for foreign words or when the author wishes to direct emphasis toward a particular term. Katakana can also be used when the writer

much so that the nature of the accident is almost completely beyond their comprehension. Coupled with this is the fact that the language used by the characters could equally be addressing an atomic bomb explosion as another form of nuclear disaster. Here again, Hayashi breaks through the boundaries between nuclear weapons and nuclear power. "What should we do if it's a nuclear explosion," Yamada asks his son in desperation. "A nuclear explosion," his son replies incredulously, "you make it sound as if they're making bombs over there."<sup>21</sup>

Later, however, Yamada's son displays the same desperation and concern when he attempts to convince his father to evacuate with him.

Suppose they're dealing with nuclear fuel over there, then any kind of accident has got to mean that there's radiation involved. And if it's anything like a nuclear explosion, then we're being pierced by radiation stronger than an x-ray.<sup>22</sup>

Yamada and his son's lack of information about nuclear power is in no small part the product of the plant's failure to educate the surrounding populace of its dangers. Near the beginning of the story, Yamada reflects on the wall which was erected right next to his field, to block off the plant.

Although he couldn't see through the wall which blocked one side of the road, it was apparently a plant which manufactured nuclear fuel. At least that's the explanation he had been given before the plant was built. ...Since none of his land had been bought up [by the plant] for use though, he hadn't been given any other information. All he knew was that, after the wall had been put up, one part of his potato field had been cut off from sunlight.<sup>23</sup>

After the disaster, Yamada and his son are in danger. Although they hear sirens inside the plant, they receive no warning and are forced to get their information from the television news. This, however, proves to be of little help as

...each station simply repeated the same information in a calm, orderly fashion. There was no room for groundless rumors or gossip and no materials with which to compare how things really were.<sup>24</sup>

Eventually, Yamada chooses to remain in his home and complete the harvest of his sweet potatoes. After most of the surrounding area has been voluntarily evacuated, news crews begin to move in right next to his home and scientists come to monitor the level of radiation in his fields. Here again though, Yamada is given conflicting information about the levels of radiation. Radioactive particles are detected in 33 different soil samples from the surrounding area, but he is told that the levels are much lower than normally found in nature. Salt – an indicator of radioactivity – is taken from his house, but the results of this test are never returned to him. One week after the accident, Yamada and his son harvest the potatoes, unaware of whether the fields have been contaminated by radiation. Yamada states that he, "didn't want to ask" if any of the 33 soil samples were taken from his field. Even if it was contaminated, he "couldn't just leave potatoes that were ripe to be harvested" and the 30,000 yen (around \$285USD in 1999) compensation being offered "wouldn't make up for anything."<sup>25</sup> At the end of the story Yamada is confronted by a succession of reporters, all of whom convey a sense of disbelief that he had not evacuated. It is this disbelief that strikes a nerve with Yamada, who had never been informed that he was in danger.



**Figure 2: Officials monitor radiation levels at a radish field, 1km away from the Tokaimura plant (12.2.1999)**

The nuclear disaster that Hayashi depicts in *Harvest* through the Tokaimura incident of 1999 takes on new meaning following the 2011 nuclear meltdown at the TEPCO-operated nuclear power plant in Fukushima. The dangers of nuclear power and people's complacency in assuming that it is safe, as well as authorities and the media withholding information, are directly confronted in *From Trinity to Trinity*, *Harvest* and other works in *Human Experience Over a Long Time*.

Hayashi's linking of radiation poisoning associated both with the bomb and with nuclear power alerts readers to nuclear dangers. Unfortunately however, as American University History Prof. Peter Kuznick has noted in discussing the relationship between the atomic bomb and nuclear power, "the public allowed itself to be convinced that nuclear power was safe and clean. It had forgotten the lessons of Hiroshima and Nagasaki."<sup>26</sup>

#### **Hayashi addresses the crisis at Fukushima**

*Genbaku o Ikite: Sakuhin to Shogai ga Kataru* (Living the Bomb: Speaking from a Life and Works) was published in July 2011 as a booklet by Iwanami Shoten and is written as an interview between Hayashi and Ferris University professor Shimamura Teru. Reflecting on her wartime experiences and career as a writer, Hayashi elaborates on the background behind *From Trinity to Trinity*, and ties

together the dangers of radiation from bombs and nuclear power, especially in light of the disaster at Fukushima.

Hayashi again confronts nuclear energy as the combined danger of nuclear weapons and nuclear power through her use of the word *kaku*. In speaking of her trip to the Trinity site, she reflects on the problem of radiation for the modern age.

The Ground Zero monument that stands at the Trinity site is the warning sign that humans have plunged into the nuclear (*kaku*) age. Damage from radiation isn't just a special right of victims of the atomic bombings, but is a problem for all those with an awareness of the dangers of nuclear energy (*kaku*).<sup>27</sup>

Later, she reflects further on how her visit to the Trinity site was intended to bring closure to her personal journey fighting against nuclear weapons, and to break away from August 9<sup>th</sup>. However, seeing the damage that nuclear power caused to the animals and environment at the test site, and observing the lingering effects of radiation, she was led to think of the effects of radiation on humanity and nature in larger terms than before. This led her to state in *Living the Bomb* that "as one hibakusha, I clearly came to understand that humans and nuclear energy cannot coexist."<sup>28</sup> Linking her criticism of nuclear energy (*kaku*) to the March disaster at Fukushima, Hayashi states:

People today think of nuclear energy only as a fuel source. There are still many hibakusha from August 6<sup>th</sup> and 9<sup>th</sup> alive in Japan. Although it comes in different forms, we're supposed to have learned what kind of effect atomic energy (*kaku*) has on humanity. At least politicians and experts are supposed to understand this. I'm simply astounded that this country still hasn't learned from our experiences. Why don't such intelligent people understand that, no matter what the situation, atomic energy (*kaku*) is never beneficial?<sup>29</sup>

Hayashi also uses both writings of *hibaku* and refers to all victims of radiation damage as *hibakusha* (被曝者) as well. Interviewer Shimamura states that “nuclear power plants are, by their very nature, a structure that produces *hibakusha* (被曝者). Even if there are no more incidents with explosions, in order to continue maintaining the plants, the workers will continue to be exposed to radiation (被曝).”<sup>30</sup>

Once again, it is internal exposure (*naibu hibaku*) that concerns Hayashi. “For me,” she writes, “the issue of the ‘internal’ has been much more important. The ‘internal’ can cause all sorts of illness.”<sup>31</sup> After Fukushima, internal radiation damage became a great concern amongst the public, and the terms *hibaku* and *hibakusha* to refer to all victims of radiation damage came into much greater use. In August 2011 Japanese author Oe Kenzaburo quoted Hida Shuntaro, a Hiroshima hibakusha and doctor also often quoted by Hayashi, urging the government to conduct research into treatment for “victims of internal radiation damage” (*naibu hibakusha*) as well as “establish a system to deal with the possibility of new hibakusha (ヒバクシャ).”<sup>32</sup> Oe took the universality of “hibakusha” even further, by writing the word in Japanese *katakana* script, without any Chinese characters. This removes the previous linguistic boundary that distinguished A-bomb victims and victims of other radiation damage.

After Fukushima, Hayashi spoke with renewed urgency, and at times abandoned metaphor to speak more directly. In a June, 2011 interview with Japan’s leading business newspaper, the *Nihon Keizai Shinbun*, she addressed the connection of nuclear weapons and nuclear power as follows:

Atomic bombs are different from what powers nuclear plants. Yet, at their core, they are the same nuclear matter. When you carry this line of thought to connect August 9<sup>th</sup> and Fukushima, it is apparent that both pose problems of how one thinks about human life.<sup>33</sup>

The value of human life is fundamental for Hayashi and it runs through all of the works examined here. As an atomic bomb victim, she has witnessed and shared the history of hibakusha, from their struggle to gain recognition from the government, to their discrimination in society and lifelong suffering from radiation. In 2011’s *Living the Bomb* Hayashi further explains some of the metaphors used in *From Trinity to Trinity* and *Harvest*, tying them to the concept of the value of human life, and its relation to the disaster at Fukushima. Through these examples, we see that some of Hayashi’s most pointed criticisms of nuclear power were made as early as 1999, well before Fukushima.

One of these examples is the metaphor of the Spanish conquistadores in *Trinity*. The narrator uses the story to transition between her time just after visiting the National Atomic Museum and just before traveling by car through the New Mexico countryside. “It’s written in the *History of World Exploration*” she begins, “that Spaniards began colonizing New Mexico in 1598.” And she continues,

Santa Fe is interesting in the history of conquest. Any land that people set their eyes on seems to have an enticing charm before it has ever been trodden... Enticed by the native American legend, exploration parties passed through Santa Fe as they made their way east and west in search of the city of treasure and gold. ... Most of the explorations ended in failure. The explorers either suffered from internal divisions or became entangled in local disputes that ended in bloodshed.<sup>34</sup>

Beneath the surface of this critique of European expansion, these words touch on a more fundamental issue for Hayashi – the concept of center versus periphery. The nuclear power plants in Japan, such as those at Tokaimura and at Fukushima are located far from the hub of empire – Tokyo. When accidents happened, it was not the people of Tokyo who were threatened, but the people who lived near the plants – the farmers, and members of other rural communities.

This is something that Shimamura, in his discussion with Hayashi, elaborates on in *Living the Bomb* where he exposes the harsh reality of the power politics involved in the Japanese nuclear industry. Speaking first to the origin and connection of the Trinity Site with the European colonizers, he points out,

The European colonizers chased the Native Americans out one after another and snatched up increasingly large portions of their land. It was on that land that they conducted the nuclear test. In other words, it was built upon the plunder and cheap purchase of lives. I think that nuclear power plants are the same – they are founded upon lives which are looked down upon and cheaply bargained for. Whether in Fukushima or Aomori or Fukui, nuclear power plants are located where there is a bounty of nature. In other words, none are located in urban areas or industrialized areas.<sup>35</sup>

The issue of discrimination of center against periphery, central to both *Trinity* and *Harvest*, is one on which Hayashi elaborates on in *Living the Bomb*. Relating a story of a conversation with her friend, a doctor who had worked with hibakusha since the end of the war, Hayashi asks why the United States would set an 80 kilometer evacuation zone, while the Japanese Government only set a mandatory 20km evacuation zone around the crippled nuclear plant in Fukushima. “It’s a matter of human life,” the doctor explains, “a difference of the extent to which basic human rights are recognized.”<sup>36</sup>

Hayashi states that only from one other person – a doctor who had worked with patients of the Chernobyl disaster and urged mandatory evacuation 30km around the plant at Fukushima – did she hear similar words used in the mainstream media. “It was only from this one doctor,” Hayashi says, “from whom I heard the words ‘human life.’” This leads her to conclude that “in this country, the weak are discarded.”<sup>37</sup>

In return for accepting nuclear reactors, struggling rural economies like those in Fukushima received subsidies from the central government, and the promise of jobs and prosperity. Like nuclear power plants, U.S. military bases in Japan are also located in the periphery, with an overwhelming amount in Okinawa. Vancouver Peace Philosophy Centre director Satoko Oka Norimatsu has noted that the national government’s positioning of nuclear power plants and U.S. military bases far from Tokyo is rooted in policies which discriminate “against the periphery to assure the protection of the state and guarantee the energy needs of the metropolis.”<sup>38</sup> Norimatsu cites the use of the word *kimin*, or “abandoned people,” to describe the plights of the people in Fukushima and Okinawa.

When Hayashi speaks of discrimination and the value of human life to lament the actions of the government after the disaster at Fukushima, she speaks from a lifetime of living with the damaging effects of radiation as a hibakusha, and out of concern for future generations. Recalling the struggles of Nagasaki and Hiroshima hibakusha to gain recognition from the government, she worries about how the long term human effects of radiation from Fukushima will be dealt with, stating:

Amongst my hibakusha friends, many have repeatedly been in and out of the hospital. However, even if they submitted the forms to gain recognition as suffering from radiation sickness, their claims were continually rejected on the grounds that there was no connection between the atomic bomb and their sickness, or that the cause was unclear.<sup>39</sup>

Recognition based on the often invisible effects of internal radiation damage, the issue that has been most important for Hayashi, was repeatedly denied by the government. After the disaster at Fukushima, however, the issue of internal radiation damage (*naibu hibaku*) was raised publicly for the first time. “As soon as I heard these words, I broke into tears,” Hayashi said. “So they had known about internal radiation damage all along.”<sup>40</sup>

Through metaphor and language in *From Trinity to Trinity*, *Harvest*, and other stories in *Human Experience Over a Long Time*, Hayashi directs her lifelong message about the dangers of radiation and the struggles of hibakusha to encompass atomic power in general. In this way, she effectively directs comment and criticism that speaks to contemporary issues of nuclear power—both the atomic bomb and nuclear energy. Hayashi has long sought to shake readers out of complacency over the dangers of atomic energy and, as John Whittier Treat has written in his comprehensive study of atomic bomb writers, endeavored to “make the bombing a present-day problem for a world that only looks as if it is at peace.”<sup>41</sup> Drawing on her lifelong experiences with the atomic bomb, Hayashi seeks to assure that humanity will no longer have to face tragedy at the hand of the atom, whether atomic bombs or atomic power.

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## Images

Image 1: Shimizu Shuji and Noguchi Kunikazu. *Rinkai Hibaku no Shougeki: Ima aratamete tō genshiryoku*. (Tokyo: Liberta, 2000),13.

Image 2: Rinkai Jiko no Taiken wo Kiroku Suru Kai. *Tokaimura Rinkai Jiko no Machi kara: 1999nen 9gatsu 30nichi Jiko Taiken no Shōgen*. (Tokyo: Morimoto, 2001), 51.

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*For further information on and works by Hayashi Kyoko in English, please see Kyoko Selden’s excellent translations, the following of which are available at [Japan Focus](#).*

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## Notes

<sup>1</sup> Hayashi Kyoko, *Hayashi Kyoko Zenshū*, (The Complete Works of Hayashi Kyoko) Vol.6. (Tokyo: Nihon Tosho Sentā, 2005), 9, 64.

<sup>2</sup> *Hibakusha* (被爆者) refers to a person who was exposed to the atomic bombing and suffers from radiation poisoning and other effects. More on the uses of the word will be discussed later.

<sup>3</sup> [Yuki Tanaka and Peter Kuznick](#). “Japan, the Atomic Bomb, and the ‘Peaceful Uses of Nuclear Power.’” *The Asia – Pacific Journal*, Vol. 9, Issue 18, No. 1, (2 May, 2011)

<sup>4</sup> Hayashi Kyoko. *Hibaku o Ikite: Sakuhin to Shōgai o Kataru*. (Living the Bomb: Speaking from a Life and Works) (Tokyo: Iwanami Shoten, 2011), 26.

<sup>5</sup> “From Trinity to Trinity” (Torinitī kara Torinitī e) is the second of the two novellas in *Human Experiences Over a Long Time* (Nagai jikan wo kaketa ningen no keiken, 2000, Noma Literary Prize). Translation by Kyoko Selden, *The Asia-Pacific Journal*, [link](#).

<sup>6</sup> Figures were taken from Hayashi, *Living the Bomb*, 51 and can also be found in “Criticality accident at Tokai nuclear fuel plant (Japan).” World Information Service on Energy. 14 December 2010, [link](#). The Tokaimura incident occurred on September 30<sup>th</sup>, 1999. JCO is a subsidiary of Sumitomo Metal Mining. For more in depth analysis see, for example, Nanasawa Kiyoshi. *Tokaimura Rinkajijiko e no Michi* (The Road to the Tokaimura Criticality Accident). (Tokyo: Iwanami Shoten, 2005).

<sup>7</sup> Hayashi Kyoko. *Human Experiences Over a Long Time*. (Tokyo: Kodansha, 2000), 156.

<sup>8</sup> Tsukui Nobuko. “Genten e no tabi: Hayashi Kyoko sakuhinkō,” (Journey to the Source: A Look at one of Hayashi Kyoko’s works). *Meisei Daigaku Kenkyū Kiyō – Jinbun Gakubu*, v. 39. (March, 2003), 61.

<sup>9</sup> Hayashi Kyoko. *Human Experiences Over a Long Time*. 136.

<sup>10</sup> *Ibid.*, 134.

<sup>11</sup> Hayashi, *Human Experiences Over a Long Time*, 171.

<sup>12</sup> Definitions based on a survey of five dictionaries: *Nihongo Daijiten*, Vol. 2. Shogakukan, (1972, 2001); *Nihongo Daijiten*, Vol. 2. Kodansha (1995); *Gakken Kokugo Daijiten*. Gakushūkenkyūsha, (1998); *Nihongo Daijiten*, Seisen ban. Shogakukan, (2006); *Kojien*. Iwanami Shoten, (1998). The two writings of *hibaku* are often confused, and some dictionaries list them under the same heading.

<sup>13</sup> Hayashi, *Human Experiences Over a Long Time*, 16-17 as well as Hayashi, *Living the Bomb*, 43-44.

<sup>14</sup> Other critics who have discussed this include Kuroko Kazuo in Hayashi Kyoko, *The Complete Works of Hayashi Kyoko* v.6, 494 and Tsukui Nobuko “Genten he no Tabi: Hayashi Kyoko Sakuhinkou,” 63 – 64.

<sup>15</sup> Hayashi, *The Complete Works of Hayashi Kyoko*, Vol. .6. (Tokyo: Nihon Tosho Sentā, 2005), 494.

<sup>16</sup> Hayashi, *Human Experiences Over a Long Time*, 129.

<sup>17</sup> *Ibid.*, 133. For more criticism of Hayashi see Nakagami Kenji and other critics in John Whittier Treat, *Writing Ground Zero: Japanese Literature and the Atomic Bomb*. (Chicago: University of Chicago Press, 1995), 107 – 120 as well as Hayashi, *Living the Bomb*, 24 – 27.

<sup>18</sup> Hayashi, *Human Experiences Over a Long Time*, 179.

<sup>19</sup> *Ibid.*, 161.

<sup>20</sup> Hayashi, *Living the Bomb*, 28.

<sup>21</sup> Hayashi, *The Complete Works of Hayashi Kyoko*, v.6, 266-267.

<sup>22</sup> *Ibid.*, 267.

<sup>23</sup> *Ibid.*, 265.

<sup>24</sup> *Ibid.*, 268-69.

<sup>25</sup> *Ibid.*, 274-75

<sup>26</sup> Yuki Tanaka and Peter Kuznick. “Japan, the Atomic Bomb, and the ‘Peaceful Uses of Nuclear Power.’”

<sup>27</sup> Hayashi, *Living the Bomb*, 32.

<sup>28</sup> *Ibid.*, 41.

<sup>29</sup> *Ibid.*, 42.

<sup>30</sup> *Ibid.*, 45

<sup>31</sup> *Ibid.*, 28

<sup>33</sup> Shiraki Midori. “Nagasaki Hibakusha ga mita ‘Fukushima’ – Sakka Hayashi Kyoko san (‘Fukushima’ as seen by Nagasaki hibakusha Hayashi Kyoko).” *Nihon Keizai Shinbun*, 22 June 2011.

<sup>34</sup> Hayashi, *Human Experience Over a Long Time*, 146 – 148.

<sup>35</sup> Hayashi, *Living the Bomb*, 45.

<sup>36</sup> *Ibid.*, 42.

<sup>37</sup> *Ibid.*, 43.

<sup>38</sup> [Satoko Oka Norimatsu](#). “Fukushima and Okinawa – the ‘Abandoned People’ and Civic Empowerment.” *The Asia-Pacific Journal*, Vol. 9, Issue 47, No. 3 (21 Nov. 2011)

<sup>39</sup> *Ibid.*, 43.

<sup>40</sup> Ibid., 43

<sup>41</sup> Treat, John Whittier. *Writing Ground Zero: Japanese Literature and the Atomic Bomb*. (Chicago: University of Chicago Press, 1995), 321.