

or a Better Environmental Communication:

A Materialist Ecofeminist Analysis of Global Warming by a Male Japanese Ecofeminist

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Abstract: In this paper, I will attempt to engender global warming chiefly by using the theory of materialist ecofeminism. I will show that greenhouse gases, the cause of global warming, derive not from a gender-free zone but from the production sphere, which has been attributed mainly to men, and affect the following three areas: nature, the production sphere, and the reproduction sphere, which has been burdened chiefly by women. Thus, I can say that the production sphere consists of masculinity while the reproduction sphere is based on femininity. Engendering global warming with a materialist ecofeminist perspective provides us with another perspective on masculinity, which has created such a problem and adversely affected nature and femininity. When we consider the problem of global warming, we need to use masculinity in a better and different way while we should re-cognize both nature and femininity, toward its genuine resolution.

Keywords: Ecofeminism, Femininity, Global Warming, Masculinity, Materialist Ecofeminism, Production Sphere, Reproduction Sphere

1. Introduction 2

Global warming is an impending problem in this era. To address this issue, the First Commitment Period of the Kyoto Protocol is to be conducted from 2008 to 2012. The Kyoto Protocol is the first international protocol that obliges its member countries to reduce greenhouse gases to the levels allocated within the framework, in order to halt global warming. I would like to pose a question here: Is global warming gender-neutral? While Barry (1999) maintains that global warming is not gendered, I disagree.

In this paper, I as a male Japanese ecofeminist will attempt to engender global warming chiefly by using the theory of materialist ecofeminism. I will show that greenhouse gases, the cause of global warming, derive not from a gender-free zone but from the production sphere, which has been attributed mainly to men, and affect the following three areas: nature, the production sphere, and the reproduction sphere, which has been burdened chiefly by women (e.g., Martine-Brown as cited in Barry, 1999). Thus, I can say that the production sphere consists of masculinity while the reproduction sphere is based on femininity. Here, although I do not intend to essentialize the dichotomies of production/reproduction and masculinity/femininity, I acknowledge that this sort of discourse might unintentionally serve this function. Nevertheless, engendering global warming with a materialist ecofeminist perspective provides us with another perspective on masculinity, which has created such a problem and adversely affected nature and femininity. To indicate this is the ultimate purpose of this paper.

2. What is Ecofeminism?

Categorization of Ecofeminism

The word *ecofeminism* was coined by the French feminist Françoise d'Eaubonne (1974) in 1974. The Japanese female ecofeminist scholar Natsuko Hagiwara (2001) summarizes d'Eaubonne's philosophy that ecofeminism is a "women's revolution to create an ecological revolution for the subsistence of human beings on this planet" (p. 46). According to environmental sociologist John Barry (1999), the original form of ecofeminism dates back to *Vindication of the Rights of Women* written by Mary Wollstonecraft and published in 1792. Hagiwara (1999) simply explains ecofeminism as follows: "The idea of ecofeminism is that ecologists who are indifferent to gender are not real ecologists, because they do not consider the co-existence of men and women while they do that of humans and nature" (p. 199). She also elucidates ecofeminism by saying that it cuts to the gender bias inherent in environmental issues (Okuda, Kondo, Takemi, & Hagiwara, 1998).

Although there are some varieties and schools of ecofeminism, the following point is embraced by all of them, that there is a close and important connection between the domination of nature by humans and that of women by men (e.g., Warren, 1987; Hagiwara, 2001). On the other hand, the common goals are the "liberation of women and nature" (Merchant, 2005, p. 218) and the creation of a vision for a new society without hierarchy and environmental destruction (Hagiwara, 1997). In other words, the domination of women by men and that of nature by humans are both in a looking-glass relationship where one can be both the cause and the effect of the other.

Kyoko Baba (1993), a Japanese female translator, misunderstands ecofeminism, maintaining, "[In ecofeminism,] I have no idea whether feminists

- 2 Please note that I translated all the citations in this paper from Japanese sources and that their English titles are shown in square brackets in the list of References as well as that I attempt to rely more on Japanese literature in order for the reader to take a glimpse of the status quo of ecofeminism in Japanese academia.
- I was inspired by activities by genanet, a German-based group that considers gender justice in environmental issues (http://wwww.genanet.de/index.php?id=2&L=1).
- 4 Greta Gaard and Patrick Murphy rightly deny the concept that "ecofeminism is the province of women alone" (Gaard & Murphy, 1998, p. 1).
- 5 "Social theorizing about the environment is not a gender-free zone" (Barry, 1999, p. 107).
- 6 This relates to the politics of category construction.

take advantage of environmentalists for empowerment or vice versa" (p. 35). Ecofeminists simply attempt to incorporate the perspective of gender into environmental issues and vice versa; they are not exploiting environmentalists.

In academia, ecofeminism can be categorized as radical environmental sociology. According to Hisayoshi Mitsuda (1995), a Japanese male environmental sociologist, the intention of radical environmental sociology is "to criticize the modern industrial society radically and to aim for a sustainable society where nature and humans can co-exist" (p. 65). In fact, many ecofeminists are sociologists who aim for a sustainable society where nature, men, and women can do just that.

Radical ecologist and ecofeminist Carolyn Merchant (2005) has contributed to classifying ecofeminism into four categories in her book, *Radical Ecology: The Search for a Livable World.* The first category is liberal ecofeminism. It is "consistent with the objectives of reform environmentalism to alter human relations with nature from within existing structures of governance through the passage of new laws and regulations" (p. 197) and, therefore, believes,

Given equal educational opportunities to become scientists, natural resource managers, regulators, lawyers, and legislators, women, like men, can contribute to the improvement of the environment, the conservation of natural resources, and the higher quality of human life. Women, therefore, can transcend the social stigma of their biology and join men in the cultural project of environmental conservation. (pp. 200-201)

In summary, liberal ecofeminism seeks gender equality in the current capitalistic economy and education system and conforms to the existing male principle.

The second category is cultural ecofeminism. Cultural ecofeminism is premodern in that it essentially emphasizes the female principle or femininity in premodernity. In this sense, liberal ecofeminism and cultural ecofeminism are two sides of the same coin (Ueno, 1985) because the former and the latter affirm the *male* principle the *female* principle, the two extremes, respectively. Merchant (2005) portrays it as follows:

Many cultural feminists [sid] celebrate an era in prehistory when nature was symbolized by pregnant female figures, trees, butterflies, and snakes and in which women were held in high esteem as bringers forth of life. An emerging patriarchal culture, however, dethroned the mother goddesses and replaced them with male gods to whom the female deities became subservient. The scientific revolution of the seventeenth century further degraded nature by replacing Renaissance organicism and a nurturing earth with the metaphor of a machine to be controlled and repaired from the outside. The ontology and epistemology of mechanism are viewed by cultural feminists [sid] as deeply masculinist and exploitative of a nature historically depicted in the female gender. (p. 202)

Lynda M. Glennon (as cited in Ueno, 1986) would label cultural ecofeminists as expressive feminists and criticize that they espouse the dichotomy of the male and female principles. In reality, as Michael E. Zimmerman (1990) notes, "Some men are more deeply appreciative of their relationship to the natural world [than women]" (p. 143). Merchant (2005) seems critical of cultural ecofeminism, citing Susan Prentice, who argues that cultural ecofeminism adopts the very dichotomy of men and women and fails to analyze capitalism.

The third category is designated social ecofeminism. It is based on the ideology of social ecology by Murray Bookchin (e.g., 1987, 1990) that the domination of nature by humans derives from that of humans by humans. Merchant (2005) explains,

Social ecofeminism advocates the liberation of women through overturning economic and social hierarchies that turn all aspects of life into a market society that today even invades the womb. It envisions a society of decentralized communities that would transcend the public-private dichotomy necessary to capitalist production and the bureaucratic state. (p. 206)

In this sense, social ecofeminism is oriented toward postmodernity, and ecofeminists Janet Biehl, Ynestra King, and Val Plumwood appear to take this position.

The fourth and last category falls on socialist ecofeminism. It is a feminist version of the socialist ecology advocated by James O'Connor (e.g., 1991/1995). According to Merchant (2005), it is "a critique of capitalist patriarchy that focuses on the dialectical relationships between production and reproduction, and between production and ecology" (p. 208) and, hence, is postmodern like social ecofeminism. Mary Mellor and Irene Diamond seem to endorse this viewpoint.

Social ecofeminism and socialist ecofeminism blur into each other. Merchant (2005) discusses the two and states, "Both forms of ecofeminism are united . . . in viewing capitalism and patriarchy as oppressive to women" (p. 208). In addition, Hagiwara's two articles (2002, 2003) introduce only liberal, cultural, and social ecofeminism, but not socialist ecofeminism while she presents in others (1997, 2001; see also Plumwood, 1992/2001) merely cultural and social ecofeminism. In Japan, only Japanese male ethicist Masahiro Morioka (1995; see also Inoue & Morioka, 1995) distinguishes between the social ecofeminism and the socialist ecofeminism, based on Merchant (2005). It appears to me that social ecofeminism focuses more on production while socialist ecofeminism concentrates more on reproduction, which leads to issues in the Third World.

There is another unique form of ecofeminism (Takeda, 2005; Morita, 2007). It is spiritual ecofeminism as seen in female ecofeminist Starhawk (1989), who considers it to be "a movement with an implicit and sometimes explicit spiritual base" (p. 174). Barry (1999) considers ecofeminist spirituality and essentialist ecofeminism in the same section. I, however, regard the two as separate schools of ecofeminism, as Starhawk (1989) is oriented toward postmodernity unlike cultural ecofeminism. In a ritual of spiritual ecofeminism,

We can feel our interconnections with all levels of being, and mobilize our emotional energy and passion toward transformation and empowerment. . . . Transformation is inherently creative, and each of us is part of the creative being who is the universe *herself* [*italics added*]. . . . We can become agents of that transformation, and bring a new world to birth. (p. 184)

On the other hand, Barry (1999) sorts ecofeminism into the following three: essentialist ecofeminism, materialist ecofeminism, and resistance ecofeminism. As essentialist ecofeminism essentializes the female principle and "is to reverse the gendered dualism" (p. 111), the idea is close to that of cultural ecofeminism in Merchant's terms. Materialist ecofeminism bears a resemblance to social and socialist ecofeminism, although it appears to be more similar to the latter because Barry mainly refers to Mary Mellor, a socialist ecofeminist. Resistance ecofeminism stands between essentialist ecofeminism and materialist ecofeminism. As its interest is mainly in practical political issues and the Third World, it can be regarded as standing between cultural ecofeminism and socialist ecofeminism in Merchant's classification.

Materialist Ecofeminism

Materialist ecofeminism is one of the several schools of ecofeminism and considers that "women and nature both suffer at the hands of patriarchy and capitalism" (Barry, 1999, p. 114). According to Barry (1999), the basic ecofeminist political economy position derived from materialist ecofeminism is that the sphere of production (industry, formal economy) rests on the sphere of reproduction (nurturing, informal economy), and the sphere of reproduction rests on nature's

economy (natural resources); therefore, it is understood that the production sphere rests on both the reproduction sphere and nature.

Here, I would say that the production sphere consists of masculinity and the reproduction sphere is made of femininity. This discourse is not essentialism but rather anti-anti-essentialism that disapproves of anti-essentialism, according to anthropologist James Clifford (2000/2003). "The two negatives do not, of course, add up to a positive" (p. 62); in short, anti-anti-essentialism is not equivalent to essentialism. Anti-anti-essentialism "recognizes that a rigorously anti-essentialist attitude, with respect to things like identity, culture, tradition, gender, socio-cultural forms of that kind, is not really a position one can sustain in a consistent way" (p. 62). Clifford continues,

One can't communicate at all without certain forms of essentialism (assumed universals, linguistic rules and definitions, typifications and even stereotypes). Certainly one can't sustain a social movement or a community without certain apparently stable criteria for distinguishing us from them. (p. 62)

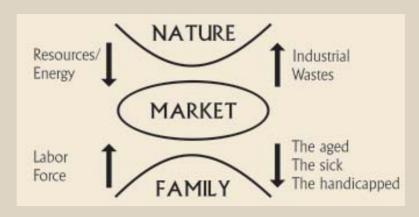
Simply speaking, the production sphere has tended to be attributed to men and the reproduction sphere to women. Barry (1999) is careful in this respect by emphasizing that *men* in ecofeminism means,

... not 'men' per se as individuals or as a group. Rather ... 'male' forms of thinking, institutions and practices which have led both to the degradation of the natural world, and the oppression of women and the denigration of female values and attributes. (p. 111)

Merchant (2005) seems to support this thought by citing Abby Peterson, who maintains, "Under capitalism, ... men bear the responsibility for and dominate the production of exchange commodities, while women bear the responsibility for reproducing the workforce and social relations" (p. 209). Further, Japanese male sociologist Daizaburo Hashizume (1990; see also Tanaka, 1994) argues that "every society has its own culture of gender; however, it will disappear in the longer term" (p. 395). In this sense, my discourse above is, as female ecofeminist Vandana Shiva (1999) articulates, "a phenomenon that takes place only in transition" (p. 62).

3. A Materialist Ecofeminist Analysis of Global Warming

As I agree with the idea of materialist ecofeminism, I attempt to analyze the issue of global warming from this perspective. According to Japanese female sociologist and materialist ecofeminist Chizuko Ueno 7 (1990), the counterculture movements including feminism in the late 1960s discovered family 8 and nature outside of market 9. Ueno's depiction is diagrammed in Figure 1.



7 Ueno is regarded as a materialist feminist in Japan; however, I consider her to be a materialist ecofeminist here as she considers both nature and family outside of market as in Figure 1, which makes her different from other materialist feminists who see only the sphere of family outside of market.

8 Here, *family*, not household located inside market, is an ideological concept rather than something substantial.

The market is formed by depending on the outside of market (e.g., Mita, 1996). In this sense, market is a residuary category and unmarked sign.

Figure 1. Relationship among market, nature, and family.

From "Zu 1 [Figure 1]," by C. Ueno, 1990, Kafuchôsei to Shihonsei: Marukusu-Shugi Feminizumu no Chihei [Patriarchy and Capitalism: Horizon of Marxist Feminism], p. 8. Copyright 1990 by Chizuko Ueno. Reprinted with permission of the author.

10 In this sense, women could be naturalized (naturalization of women) and nature could be feminized ((feminization of nature). Deborah Cadbury (1997) mentions that feminization of nature including animals is caused by environmental hormone, which inspired me to use the concept feminization of nature and to create the term naturalization of women here. As for the latter, Egusa (1999) presents the same term through examining Higusa written by Minako Oba, a late well-known Japanese female novelist. Hagiwara (2005) disagrees with the term feminization of nature because she finds a gender bias in it.

Ueno (2006) calls the former public patriarchy and the latter private patriarchy.

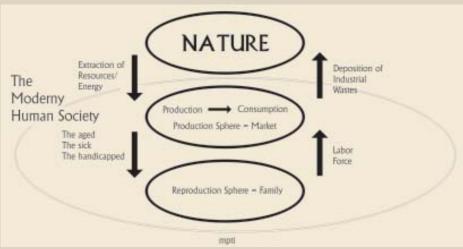
Figure 2. Engendered relationship among market, nature, and family.

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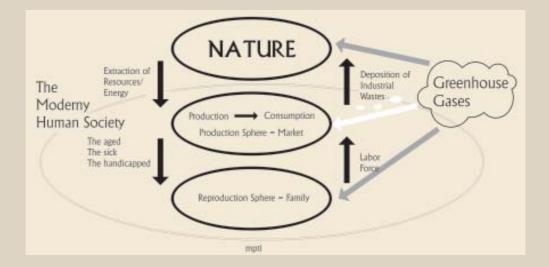
Figure 3. Engendered relationship among market, nature, and family, incorporating the variable of greenhouse gases.

Hence, "women and the environment are the 'shadow subsidies'" (Martine-Brown as cited in Barry, 1999, p. 123) of market, as women have been attributed to family. Accordingly, Ueno explains, "The sphere of family surprisingly has similarities to nature. There is logical parallelism between nature and market, and family and market" (p. 8) . Ueno further states, "From the sphere of nature, market inputs resources and energy, and outputs industrial wastes instead . . . from the sphere of family, market inputs human resources as labor forces and outputs the aged, the sick, and the handicapped as industrial wastes who are not useful as labor forces" (pp. 8-9). Here, the production sphere is equal to market while the reproduction sphere is equivalent to family ...

Let us turn now to Japanese male sociologist Munesuke Mita (1996), who repositions the formula Mass Production à Mass Consumption as Mass Extraction à Mass Production à Mass Consumption à Mass Disposition. Mita's repositioning suggests that the mass extraction and the mass disposition were black boxes in modern society. All that is mentioned above can be summarized in Figure 2, which is adapted from Figure 1



In Figure 2, we can see that greenhouse gases, the cause of global warming, come from the production sphere and reach both the reproduction sphere and nature, in addition to the production sphere itself. Based on this statement, Figure 2 can be developed into Figure 3.



As Barry (1999) proposes a hierarchy consisting of the production sphere, nature, and reproduction sphere and positions the production sphere at the top, nature at the bottom, and the reproduction sphere between the two, Figure 3 will be depicted from the vertical angle as in Figure 4.

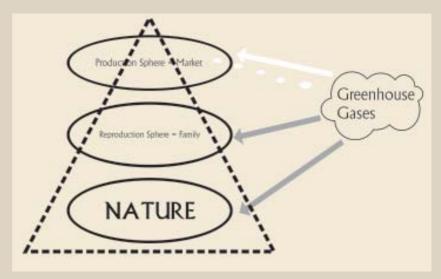


Figure 4. Engendered relationship among market, nature, and family, incorporating the variable of greenhouse gases, from the vertical angle.

4. Conclusion

The bottom line is that the production sphere does not stand alone but relies on the reproduction sphere and nature. Therefore, greenhouse gases generating from the production sphere affect not only the production sphere itself but also the reproduction sphere and nature. Male psychologist Erik H. Erikson (1995) argues,

Historians and philosophers recognize a 'female principle' in the world, but . . . forever insist on a mirage of progress which promises that man's (the male's) logic will lead to reason, order, and peace, while each step towards this mirage brings new hostile alignments which lead to war, and worse. (pp. 363-364)

Agerup (2003) notes that global warming is man-made, or human-made; however, in reality, it is man-made, or masculinity-made because greenhouse gases are made in the production sphere, which is based on masculinity [2]. Thus, when we consider the problem of global warming, we need to use masculinity in a better and different way while we should re-cognize both nature and femininity, toward its genuine resolution.

Agerup, M. (2003). Is Kyoto a good idea? In K. Okonski (Ed.), *Adapt or die: The science, politics and economics of climate change* (pp. 77-97). London: Profile Books.

Baba, K. (1993). Ecofeminism: Yakusha kaisetsu [Ecofeminism: Translator's note]. In H. Beard & C. Cerf, *Tôse amerika tabû-go jiten* [The official politically correct dictionary and handbook] (Japanese ed., K. Baba, Trans., p. 35). Tokyo: Bungeishunju.

Barry, J. (1999). Environment and social theory. London: Routledge.

Bookchin, M. (1987). *The modern crisis* (2nd ed.). Montreal, Québec, Canada: Black Rose Books.

Bookchin, M. (1990). *Remaking society: Pathways to a green future*. Boston: South End Press.

Cadbury, D. (1997). *The feminization of nature: Our future at risk.* London: Hamish Hamilton.

Clifford, J. (2003). Interviewer: Manuela Ribeiro Sanches Santa Cruz, Winter 2000. *On the edges of anthropology (Interviews)* (pp. 43-78). Chicago: Prickly Paradigm Press. (Reprinted from *Etnográfica*, 371-388, *4*[2], 2000)

D'Eaubonne, F. (1974). Le feminisme ou la mort. Paris: Pierre Horay.

Egusa, M. (1999). Ôba Minako *Higusa* no sekai–Neitibu, jendâ– [Ôba Minako's "Higusa (fireweed)": Native, gender] [Electronic version]. *Bunkyô Daigaku Bungakubu Kiyô* [Bulletin of Literature Department of Bunkyo University], *13-2*, 23-41.

Erikson, E. H. (1995). Childhood and society. London: Vintage.

Gaard, G., & Murphy, P. (1998). Introduction. In G. Gaard & P. Murphy (eds.), *Ecofeminist literary criticism: Theory, interpretation, pedagogy* (pp. 1-13). Urbana, IL: University of Illinois Press.

Hagiwara, N. (1997). Ecological feminism. In Y. Ehara & Y. Kanai (Eds.), *Wâdo mappu: Feminizumu* [Word map: Feminism] (pp. 292-317). Tokyo: Shin-yo-sha.

Hagiwara, N. (1999). Atarimae dato omotteita ishiki wo kaeteiku noga jendâ kyôiku nandesu [It is gender education that changes the existing awareness]. In Workshop Myû (Ed.), 'Manabi' no jidai e: Chikyû-shimin eno manabi–30 nin no genba [Toward the age of learning: Learning to be global citizens and experiences of 30 persons] (pp. 193-200). Tokyo: Shogakukan.

Hagiwara, N. (2001). Jendâ no shiten de toraeru kankyô mondai: Ekofeminizumu no tachiba kara [Seeing environmental issues with a perspective of gender: From a standpoint of ecofeminism]. In K. Hasegawa (Ed.), *Kankyô*

undô to seisaku no dainamizumu [Dynamism of environmental activism and policies] (pp. 35-64). Tokyo: Yuhikaku.

Hagiwara, N. (2002). Kyarorin Mâchanto *Radikaru Ekorojî* [*Radical Ecology* by Carolyn Merchant]. In Y. Ehara & Y. Kanai (Eds.), *Feminizumu no meicho* 50 [50 classics of feminism] (pp. 414-423). Tokyo: Tokyo Inshokan.

Hagiwara, N. (2003). Ekofeminizumu [Ecofeminism]. In A. Okuda, Y. Akiyama & H. Hasekura (Eds.), *Gaisetsu: Feminizumu shisôshi* [Overview: History of feminist thought]. Kyoto, Japan: Minerva Shobo.

Hagiwara, N. (2005). *Kankyô to jendâ* no kôsaku: Shizen to ningen no kyôsei wo mezashite [Intersection of *environment and gender*: Toward coexistence of nature and human beings]. In H. Hara (Ed.), *Jendâ kenkyû ga hiraku chihei* [Horizon explored in gender studies] (pp. 317-334). Tokyo: Bunkashobo Hakubunsha.

Hashizume, D. (1990). Seiai no poritikusu [Politics of sexual love]. In H. Ichikawa, H. Kato, K. Hashimoto & Y. Murakami, *Gendai tetsugaku no bôken 4: Erosu* [Adventure of contemporary philosophy 4: Eros] (pp. 341-396). Tokyo: Iwanami Shoten.

Inoue, S., & Morioka, M. (1995). *Otoko wa sekai wo sukueruka* [Can men save the world?]. Tokyo: Chikuma Shobo.

Merchant, C. (2005). *Radical ecology: The search for a livable world* (2nd ed.). New York: Routledge.

Mita, M. (1996). *Gendai shakai no riron* [Theories in contemporary society]. Tokyo: Iwanami Shoten.

Mitsuda, H. (1995). What is environmental sociology?: Rethinking of paradigm debate in the U.S. *Journal of Environmental Sociology*, 1, 53-71.

Morioka, M. (1995). Ekorojî to josei–Ekofeminizumu [Ecology and women–Ecofeminism]. In S. Kito, K. Toda, M. Morioka & R. Evanoff (Eds.), *Kankyô shisô no tayôna tenkai* [Various developments in environmental thought] (pp. 152–162). Kanagawa, Japan: Tokai University Press.

Morita, K. (2007). *A post-Kyoto Proposal: Engendering the Kyoto Protocol with ecofeminist perspectives.* Unpublished master's thesis, Rikkyo University, Graduate School of Intercultural Communication, Tokyo, Japan.

O'Connor, J. (1995). Jizoku-kanô na shihonshugi wa ariuruka [Is sustainable capitalism possible?] (K. Toda, Trans.). In K. Toda & R. Evanoff (Eds.), *Kankyô shisô to shakai* [Environmental thought and society] (pp. 187-193). Kanagawa, Japan: Tokai University Press. (Original work presented 1991)

Okuda, A., Kondo, K., Takemi, C., & Hagiwara, N. (1998). Ekofeminizumu wo narau [Learning ecofeminism]. *Gendai Shisô* [Modern Thought], *26*(6), 112-140.

Plumwood, V. (2001). Feminism and ecofeminism: Beyond the dualistic assumptions of women, men and nature. In J. O'Neill, R. K. Turner & I. J. Bateman (Eds.), *Environmental ethics and philosophy* (pp. 441-446).

Cheltenham, England: Edward Elgar. (Reprinted from *The Ecologist*, 8-13, 22(1), 1992, January/February)

Shiva, V. (1999). Seitaigakuteki minshushugi ga yoki shakai eno shohôsen [Ecological democracy is the prescription for a good society] (N. Kataoka, Trans.). In K. Isshiki (Ed.), *Shin kankyôgaku ga wakaru* [Understanding environmentology (New ed.)] (pp. 62-66). Tokyo: The Asahi Shimbun.

Starhawk (1989). Feminist, earth-based spirituality and ecofeminism. In J. Plant (Ed.), *Healing the wounds: The promise of ecofeminism* (pp. 174-185). Philadelphia: New Society.

Takeda, K. (2005). Ekofeminizumu [Ecofeminism]. In S. Ozaki, S. Kameyama & K. Takeda (Eds.), *Kankyô shisô kîwâdo* [Key words of environmental thoughts] (pp. 8-9). Tokyo: Aoki Shoten.

Tanaka, K. (1994). Feminisuto shakaigaku no yukue [Future of feminist sociology]. In T. Inoue, C. Ueno & Y. Ehara (Eds.), *Feminizumu riron* [Feminist theories] (pp. 78-99). Tokyo: Iwanami Shoten.

Ueno, C. (1985). Ekorojikaru feminizumu hihan [Criticism of ecological feminism]. In Nihon Joseigaku Kenkyukai 1985 Nen 5 Gatsu Shimpojiumu Kikaku Shudan (Ed.), *Feminizumu wa dokoe yuku–Josei-genri to ekorojî–* [Where is feminism heading?–The female principle and ecology–] (pp. 68-77). Kyoto, Japan: Women's Books Store Shokado.

Ueno, C. (1986). *Onna wa sekai wo sukueruka* [Can women save the world?]. Tokyo: Keisoshobo.

Ueno, C. (1990). *Kafuchôsei to shihonsei: Marukusu-shugi feminizumu no chihei* [Patriarchy and capitalism: Horizon of Marxist feminism]. Tokyo: Iwanami Shoten.

Ueno, C. (2006). Kea no shakaigaku dai yon shô: Kea towa donna rôdô ka? [Chapter 4 of sociology of care: What sort of labor is care?]. *at*, *5*, 94-117.

Warren, K. (1987). Feminism and ecology: Making connections. *Environmental Ethics*, *9*(1) (Spring 1987), 3-20.

Zimmerman, M. E. (1990). Deep ecology and ecofeminism: The emerging dialogue. In I. Diamond & G. F. Orenstein (Eds.), *Reweaving the world: The emergence of ecofeminism* (pp. 138-154). San Francisco: Sierra Club Books.