# Worlding the Study of Global Environmental Politics in the Anthropocene: Indigenous Voices from the Amazon

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#### Abstract

Many socioenvironmental struggles around the globe involve trying to protect the disappearance of other "worlds." Along with biological diversity, human languages, traditions, understandings, and the intimate relationships between peoples and their lands are under attack through various forms of colonization, capital expansion, or simply the globalization of lifeways. Scholars of international relations have recently come to appreciate that the world is made up of many worlds, and that great pressures threaten to reduce its diversity. This work has been essential for understanding the struggle of maintaining many worlds on a single Earth. Such scholarship has yet to penetrate fully studies of global environmental politics (GEP). This article extends such sensitivity and scholarly effort to GEP by dialoguing with Indigenous ways of knowing. It argues that Indigenous struggles are struggles for the survival of many worlds on one planet and that we could learn from this. The intention is not to generalize Indigenous knowledge but rather to make a call for engagement. Through Creative Listening and Speaking, a worldist methodology, the article focuses on the Yanomami's forest-world and presents a few perspectives to illustrate how relational ontologies, stories of nonhierarchical and dialogical divinities, make ways of knowing and being from which we could learn how to relate to the Earth as equals.

Ursula K. Le Guin's novel *The Word for World Is Forest* tells the story of natives living on Athshe, a planet made up of thick forests and far from Earth, witnessing the destruction of their land and way of life. The novel describes how the Terrans, future humans, have traveled to Athshe to cut down the planet's trees (sending them back to Earth) and to prepare the land for future Terran colonizers. Two Athsheans talk about the sanity of the Terrans:

"A people can't be insane."

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"But they only dream in sleep, you said; if they want to dream waking they take poisons so that the dreams go out of control, you said! How can people be any madder? They don't know the dreamtime from the worldtime, anymore than a baby does. Maybe when they kill a tree they think it will come alive again!" (Le Guin 1976, chapter II)

Much like Le Guin's fictional Athsheans, many Indigenous peoples around the world<sup>1</sup> consider themselves forest peoples and struggle to keep possession of their lands, forests, water, mountains, knowledge, and ways of being. Indeed, many Indigenous peoples in Brazil define themselves as peoples of the forest and are constantly resisting appropriation, exploitation, and expulsion.<sup>2</sup> For the Yanomami, for instance, the word for nature is forest, and the forest is their world (Danowski and Viveiros de Castro 2017). Their knowledge system speaks of dreams, spirits, animals, and other beings associated with the land, and they see themselves as one among many of the peoples and entities of the forest. From a theoretical perspective, one can say that their worldview eschews anthropocentrism and recognizes the political significance of the diversity of the forest itself.

The Yanomami<sup>3</sup> say that Urihi a is the forest land and Urihinari is its image, the spirit of the forest, which can only be seen by shamans. The shamans tell us that, for the Yanomami, the forest is a sentient being, which is part of a complex cosmological dynamic that encompasses interrelationships between humans and other beings; it feels pain, complains, and its tall trees moan and cry in pain when burned down (Kopenawa and Albert 2013, 311, 382, and 388). In the beginning, when the forest was young, some of their ancestors metamorphosed into animals and other beings: "The human peccaries became peccaries. The human deer became deer. The human agoutis became agoutis," and so on (Kopenawa and Albert 2013, 60-61). For the Yanomami, "it is ancestors turned other that we hunt and eat today" (Kopenawa and Albert 2013, 61). These are only their skins; for their images, (spirits), xapiri, are their real hearts and true inner parts, which are immortal (Kopenawa and Albert 2013).

Kopenawa claims that the "white-people" do not understand why the Yanomami want to keep their forest (Kopenawa and Albert 2013). For them, the forest is more than a carbon sink or timber stock, and biodiversity has intrinsic value aside from its medicinal, food, scientific, or recreational uses. The forest is not an "environment" that surrounds them but their home, in fact, their

- 1. Le Guin has recounted that Dr. Charles Tart, who wrote Altered States of Consciousness, asked her if the Athsheans story was based on the Senoi people of Malaysia. She thought that she was inventing her own "imaginary aliens," but for Dr. Tart, she was describing the Senoi (Le Guin 1976). There may be many peoples whose word for world is forest.
- 2. For Krenak (2015), the first forest peoples are the Indigenous peoples. Afterward, other groups started to identify themselves likewise. Currently the Alliance of the Peoples of the Forest, established in 1989, gathers Indigenous peoples and rubber tappers, who fight for their lands and territories and the protection of the Amazon forest. See www.ipam.org.br/noticias/Povos-das-Florestas-historia-de-uma-alianca/219, last accessed April 9, 2014.
- 3. The Yanomami live in the Northern Amazon, in an area that straddles the Brazil-Venezuela border. Combined, their lands cover 17.9 million hectares, making it one of the largest Indigenous territories covered by forest on the planet.

world. The forest's biological, cognitive, and physical diversity and the relationships between trees, soil, water, animals, humans, and spirits constitute the very fabric of their lives. As such, there is no dichotomy between nature and society or between land and ways of life. The problem is that many non-Indigenous people fail to see this. Unable to fuse ecosocial horizons, the Yanomani resist threats to their land by gold prospecting, infrastructure development, agribusiness, and efforts to appropriate their knowledge and alter their understandings. They must defend their world in the midst of a wider trend to homogenize worlds.

Like the Yanomami's, there are many socioenvironmental struggles around the globe that involve trying to protect the disappearance of other worlds. Along with biological diversity, human languages, traditions, understandings, and the intimate relationship between peoples and their lands are under attack through various forms of colonization, capital expansion, or simply the globalization of lifeways. Scholars of international relations have recently come to appreciate that the world is made up of many worlds and that great pressures threaten to reduce the diversity. Much of this appreciation involves recognizing the eradicating process by which privileged knowledge and power overrun the worlds of the vulnerable or otherwise less powerful. This work has been essential for understanding the struggle of maintaining many worlds on a single Earth. Such scholarship has yet to penetrate fully studies of global environmental politics (GEP). This article tries to extend such a sensitivity and scholarly effort to GEP.

"Worlding" encompasses processes of making the world intelligible and determining the "we" in relation to "others" as well as the extent to which such processes of sense making constitute the worlds we live in (Inoue and Tickner 2016). In this direction, theories and concepts are constitutive of our worlds. It is important to expose our "world-political" conceptions because they situate what counts and what does not, what is part of our world and our time and who is excluded (Tickner and Blaney 2012, 9). Worlding is a twofold process involving self-reflection and dialogue. First, it encourages us to question our own concepts and assumptions to understand how our notions are situated in time and space. Second, it involves stretching our view in time and space to uncover what is hidden by those concepts and assumptions, recognizing that ours is but one among many worlds. We should go to the "critical margins" and be open to "other possible worlds or forms of life that are represented as implausible, ideological, or spurious, and so often consigned to the realms of fiction, fantasy, or nonsense" (Tickner and Blaney 2012, 9).

There is a general agreement that studying GEP means understanding or explaining conflicts of interest among different actors (Conca and Dabelko

4. Examples include Acharya and Buzan (2010); the Worlding Beyond the West book series; the Teaching, Research, and International Politics surveys; and the 2015 International Studies Association annual convention theme "Global IR and Regional Worlds: A New Agenda for International Studies."

2015, 3; Dauvergne 2005; Chasek et al. 2017). Conca and Dabelko (2015, 2) note that there are different views of the forest, and how these differences play out defines the "stuff of politics." However, it seems that forests and other ecosystems (rivers, mountains, savannas, glaciers) have merely been seen by us GEP scholars as carbon stocks, natural resources, biodiversity, and livelihood sites, but not as worlds in and of themselves. Even the assumption that there are different worldviews has not been deeply contemplated. Beyond the recognition of many worlds, we could learn from engaging with them, moving to an "ecology of knowledges" (Santos 2016). Dialoguing with Indigenous ways of knowing can help us to develop more hybrid understandings of scientific knowledge and the nature-society relation (Wapner 2014; Rudy and White 2014).

GEP, as a field, could gain from this dialogue.<sup>5</sup> Few have examined Indigenous peoples (and other marginalized groups) as constituting worlds, much less what this could mean for the study of GEP. Accordingly, this article aims at worlding GEP by dialoguing with Indigenous ways of knowing and considering them in epistemological and ontological parity with academic knowledge. 6 I argue that Indigenous struggles are struggles for the survival of many worlds on one planet and that we could learn from this struggle. My intention is not to generalize Indigenous knowledge but rather to make a call for engagement by presenting a few perspectives to illustrate how their relational worlds, stories of nonhierarchical and dialogical divinities, make worlds from which we could learn how to relate to the Earth as equals. For instance, Indigenous anthropomorphism<sup>7</sup> teaches us about humans' nonexceptionalism and that "nature" is a society of societies. To avoid the risks of considering Indigenous knowledge as an object to be isolated and stored in databases, or as a resource to be extracted, Indigenous peoples must be seen as actors and knowers with voice and agency. In this direction, I will present the notions of Creative Listening and Speaking (CLS) and of "third space" (Ling and Pinheiro, forthcoming), wherein everyone has discursive agency. For Ling and Pinheiro, third space, or "global oasis across multiple worlds," can be an actual or imaginary venue where asymmetries are bracketed so that mutuality can develop and other ways of thinking and doing, being and relating, can emerge.8

I focus on the Yanomami's forest-world and their struggle to keep its possession, presenting examples from Indigenous knowledge systems as evidence

- 5. Between 2001 and 2016, only 4 of the 427 articles published in this journal discussed Indigenous issues (see Martello 2001; Schlosberg and Carruthers 2010; Kauffman and Martin 2014; Suiseeya 2014).
- 6. Ling (2014) argues that epistemological and ontological parity happens when everyone has discursive agency.
- 7. I will discuss the idea of anthropomorphism later, but it refers to how Indigenous peoples see a common human origin for everything. Humans turned into animals, plants, stars, the moon, the sun, and so on.
- 8. Ling and Pinheiro use the term coined by Edward Soja, who proposes a third way to think about spaces, encompassing the material and social dimensions, beyond the dual thinking that predominated in geography. Third space refers now to urban hybrid developments.

of ways of knowing that are more attuned to the challenges brought on by the planetary socioenvironmental crisis. Considering the existence of Indigenous worlds is important for GEP not because Indigenous ways of knowing are useful as a resource, or because of their closeness to nature (eco-indigenism), but because their ways of knowing and of being on the planet can contribute to understandings of Earth politics in the Anthropocene that stress humans' nonexceptionalism and all of the political relations that follow from such understandings (Nicholson and Jinnah 2016). I draw on both primary and secondary sources, such as documents from organizations that work with Indigenous peoples, as well as academic and nonacademic writings by Indigenous leaders, scholars (mainly anthropologists), and shamans.

This article is divided into three parts. First, I present the notion of multiple worlds from which scholars can engage in knowledge co-production through CLS. Second, I attempt to imagine GEP as a "third space," in which relationality, resonance, and interbeing play out to help us listen to Indigenous voices and realize how dreams, the falling sky, anthropomorphism, and the forest-world resonate with the fate of the Amazon forest and the notion of the Anthropocene. Finally, the concluding remarks emphasize that Indigenous struggles to keep the forest-world are both material struggles over land, forest, water, and animals and ideational struggles over ways of knowing and being, and that these are intrinsically one. Acknowledging the existence of these worlds in not enough, and GEP scholars can endeavor to create third spaces to engage with these worlds, resulting in mutual learning.

## Multiple Worlds and Ways of Knowing: Learning Through CLS

As humanity's impacts on Earth are so great that no place on the planet can be considered as untouched, scholars are pointing to the end of nature as a useful concept and the need to reconceptualize the nature–society dichotomy (Leis 1999; Wapner 2010, 2014; Rudy and White 2014, 129). They refer to hybridity, or the understanding that "things, societies, natures and technologies are mixed up and mingled" (Rudy and White 2014, 129). The Anthropocene challenges the notion of environmental politics that evolved around this dichotomy. A middle ground based on relationships with the "more-than human" is needed (Wapner 2014, 43, 46). Other ways of knowing could bring us new possibilities for understanding Earth politics.

Many people dismiss others' ways of knowing by categorizing them as myths, stories, superstitions, common sense, or simply falling into the realm of "irrationality"; in doing so, monopolies on truth claims are maintained (Cesarino et al. 2013). But Ramos (2013, 25–26) reminds us that "the rise of rationalism is an example of the fascinated attempt to transcend, devalue and discharge complex ways of thought and experience." Yet, in advancing parsimony, objectivity, and neutrality, we also gloss over the ontological importance of "spirits, battles,

ideas, gods, rainbows, pains, minerals, planets, animals, festivities, justice, destiny, disease, divorces, the sky, death, [and] fear."9

Santos (2016) proposes "epistemologies of the South" (ES) as a means of engaging with the ways of knowing of those who have suffered injustice, domination, and oppression. He believes epistemological transformation can "reinvent social emancipation on a global scale" (18). Speaking of multiple knowledges, or epistemes, means considering multiple ontologies, or that there are multiple realities, the pluriverse, in contrast to the assumption of a single universe with multiple cultures, perspectives, or subjective representations (Escobar 2016, 13).

Socioenvironmental struggles involving Indigenous peoples are struggles to keep ways of knowing (Santos 2016; Martinez-Alier 2002) and more broadly for the survival of many worlds. Within these struggles, the diversity of alternatives of life are ignored because our theories and concepts do not identify them as "valid contributions towards a better society" (Santos 2016, 20). This is an epistemological question because we do not count these ways of knowing as knowledge but instead classify them as superstitions, opinions, subjectivities, or common sense.

The ES framework proposes to join different knowledge systems: scientific, popular, artistic, and performative, among others (Santos 2016). Trends in contemporary critical theory point to the need to learn as much from the experience and struggles of subaltern groups as from the formal academy (Escobar 2016, 13). Furthermore, ES attempts to translate across cultures and to look for similar, or equal, concerns and assumptions to identify similarities and differences and, when appropriate, develop new hybrid forms of cultural understanding and communication (Santos 2016), much like Mignolo (2002) has observed in the case of the Zapatistas.<sup>10</sup>

Santos argues for a broader understanding of the world and a view that its transformation may be occurring in ways unforeseen by many of the Western systems of thought, including Marxism. For Santos, the diversity of the world is infinite, encompassing a multiplicity of modes of being; thinking; feeling; time conception; relations among human beings and between humans and non-humans; how we face the past and the future collectively; and how we organize life, the production of goods and services, and leisure (Santos 2016, 20). This framework directly contrasts with the One World World (OWW) that has been enacted through epistemological practices and historical processes related to modernity, which have facilitated the dominant view of a separation between humans and nature (Escobar 2016, 21).

- 9. For Ramos, we should also demystify the Western (European) belief that the commercial, political, philosophical and scientific accomplishments are a result of a sole effort from Europeans: "Europe was periphery to Asia before the Christian age, and it benefited from innumerous discoveries of the Orient." (Ramos 2013, 21–22, translated from Portuguese by the author).
- 10. In the case of the Zapatistas, a process of "bi-directional translation" occurred between Marxism and Indigenous ways of knowing in which the Mayan people of Chiapas and Subcomandante Marcos changed their original frameworks (Mignolo 2002).

Furthermore, multiple knowledge systems refer to multiple worlds (Escobar 2016; Ling 2014). Escobar (2016) argues that these are "relational worlds" in which the defenses of territory, life, and the commons are intrinsically one. In this sense, Indigenous and other marginalized peoples' struggles are viewed as ontological struggles (Escobar 2016, 13, 20–21). It is not only rights over territories or rights to keep their cultures, beliefs, practices, or capabilities to function (Schlosberg and Carruthers 2010) but resistance to a particular ontological occupation, that of the "universal world of individuals and markets that attempts to transform all other worlds into one" (Escobar 2016, 21). Indigenous, Afrodescendant, peasant, and poor urban communities' struggles are ontological struggles for many worlds (Escobar 2016; Mignolo 2002) on one planet (Inoue and Moreira 2016).

More than acknowledging these worlds, we could learn from them (Santos 2016, 22). Other knowledge systems can carry new possibilities that scientific knowledge cannot foresee, especially considering the very real possibility of surpassing planetary limits (Rockström et al. 2009). Referring to the current global socioenvironmental crisis, Santos (2016, 22) asserts, "The scientific knowledge that brought us here will not be able to get us out of here, we need other knowledges, we need other conceptions of time, we need other conceptions of productivity, we need other conceptions of spatial scale." Similarly, Escobar (2016, 21–22) contends that with global climate change, the "ubiquity of the language of crisis to refer to the planetary ecological and social condition," and the struggles for mountains, landscapes, forest, and territories that appeal to relational and pluri-ontological understandings of life, are evidence of the OWW's exhaustion and the need for change.

In this sense, there is an urgent need to find other ways to conceptualize, research, and practice environmental/Earth politics in the Anthropocene (Wapner 2014). Environmentalism should strive toward "transformative, ecological and justice-oriented goals" (Dauvergne 2016, 9). To think of GEP in pluriversal terms means having a "politically emancipatory position that includes processes of knowing ... and ways of being in the world" (Querejazu 2016, 5). As a field, GEP should engage these multiple worlds to recast how we study—and perhaps practice—GEP.

Considering multiple knowledge systems does not erase power inequities. It is important to distinguish integration of knowledge, parallel approaches to developing synergies across knowledge systems, and knowledge co-production. *Integration* refers to processes that attempt to incorporate components of one knowledge system into another through a validation process based on the latter system. A *parallel approach* looks for complementarities, while presupposing validation across knowledge systems, with each system considered legitimate within its context. Each pursues knowledge in parallel, enriching the other. Finally, *co-production* is a mutual process of knowledge generation that engages actors at all stages, including validation. In this instance, epistemic and ontological dialogue should be carried in equal terms and in a respectful manner through knowledge co-production and parallel approaches (Tengö et al. 2014, 582).

Given the power asymmetries, knowledge co-production is not easy. Ling and Pinheiro (forthcoming) combine Santos' ES with international relations worldism<sup>11</sup> to guide CLS. Worldist dialogics is premised on three ideas: relationality, resonance, and interbeing (Ling 2014). The first identifies power asymmetries while recognizing the discursive agency of, by, and for subalterns and is linked to ES's recognition of multiple ways of knowing. Resonance encourages political solidarity with silenced or marginalized voices and is connected to epistemic justice, identifying similarities among discourses or how "one set of articulations at one site vibrates with those at another" (Ling 2014, 21). Finally, interbeing, or ethics with compassion, guides worldist action, recognizing that "you are in me and I in you" (Ling 2014, 21), and is related to ES's emancipatory transformation. These principles contribute to CLS or a "worldist" method for knowledge co-production (Ling and Pinheiro, forthcoming).

Relationality, resonance, and interbeing provide a way to overcome several caveats that emerge when trying to engage with other ways of knowing, such as Indigenous knowledge. As Indigenous peoples have been historically marginalized and silenced, there could be the illusion that Indigenous knowledge can be "transferred" to, or "assimilated" by, the academy (Agrawal 1995; Wilson 2004; Martello 2001). The "neo-Indigenistas" believe that studies of Indigenous knowledge could be archived in national or international centers as databases and rely on the same type of dichotomous worldview of modernization theorists, creating two categories of knowledge (Western and Indigenous) rooted in essentialisms. They overlook the diversity and heterogeneity within these knowledge systems and forget that they are not separated and static or fixed in time and space (Agrawal 1995, 420–421).

Martello (2001, 131) analyzes documents pertaining to the Convention on Biological Diversity, the Convention to Combat Desertification, and a World Bank Program, finding that their language about traditional knowledge reflects a view of it as an "extractable resource" to be standardized to be made comprehensible, useful, and valuable. Such a view establishes a "one-way dynamic" from the local to the international with little involvement of Indigenous and local communities (Martello 2001).

Discursive agency means that everyone has voice in equal terms. Indigenous issues should be reframed as changes in power relations and control over the use of lands and resources, including the right to decide on how to save their knowledge and who can use it, instead of archives and knowledge centers (Agrawal 1995, 431–432) or resources to be extracted. Cultures are not closed, as peoples are dynamic agents who change over time.

Co-optation is another risk. Some researchers are showing how Indigenous principles, such as *buen vivir* (living well), can be incorporated into national law and policies, and so be used by the state to maintain control and power (Poweska

<sup>11.</sup> In worldism, Multiple Worlds and the Westfalia World contradict and complement each other (Ling 2014, 15).

2017; Ranta 2017). The ideas of epistemic justice and resonance contribute to deconstruct one-way dynamics and co-optation. Knowledge emerges from encounters, co-constitution, and interconnectedness.

Ethics with compassion and emancipatory transformation can help to overcome the dangers of "eco-indigenist" or "primitivist" discourses (Sissons 2005; Carneiro da Cunha 2012, 11). Eco-indigenism focuses on the closeness Indigenous peoples maintain to nature by revaluing "primitivism and tribalism in relation to destructive rationality and individualism" (Sissons 2005, 23). For Sisson, the discourse of eco-indigenism, or eco-ethnicity, emphasizes the relationships between peoples and their natural environments but does not consider that most Indigenous people in settler societies are now urban. Furthermore, there are colonial and postcolonial regimes of oppressive authenticity that distinguish "authentic and inauthentic" natives, "freezing" Indigenous peoples in certain positions and identities and failing to recognize the dynamism of Indigenous cultures and the increasing diversity of Indigenous identities (Sissons 2005, 28).

Primitivism is the idea that Indigenous societies have remained somewhere in the past, revealing what Western societies were like before "History" (Carneiro da Cunha 2012, 11). These societies have their own (tragic) history. For instance, archeological sites evidence that the Amazon was much more populated before 1500, with large populations that built roads, settlements, and vibrant arts and crafts (Lopes 2017; Carneiro da Cunha 2012). Emancipatory transformation highlights that dynamism and how people, even the voiceless, are struggling to maintain their ways of being. That is why Santos points out the possibility of learning from these struggles.

CLS require changes in power relations (Agrawal 1995), dismantling binaries toward mutuality, and a change in the relationship, not in the positions (Ling and Pinheiro, forthcoming), resulting in mutual learning. Attempts to incorporate Indigenous knowledge into global and local governance processes have been discussed in the literature (Kauffman and Martin 2014; Suiseeya 2014; Berry et al. 2018). While these works highlight the importance of Indigenous knowledges, the focus is not on discursive agency and parity among knowledge systems.

Ling and Pinheiro (forthcoming) suggest that (re)naming can be a creative way to transform relationships, releasing what obstructs the flow of communication. For instance, many Indigenous peoples have reservations about concepts like "natural resources" and "ecosystem services" because they conflict with their worldviews (Kauffman and Martin 2014; Athayde 2015). Ownership is another problematic concept for some Indigenous peoples, who "have a 'horizontal' relationship with beings, rather than possessing ownership or control over them" (Athayde 2015, 51). For "true listening to happen all the elements of an exchange must be reorganized, giving it a new shape, form or meaning," which include our notions related to environment and nature.

12. Carolina Pinheiro, email interview with the author, February 5, 2018.

A third space or a "global oasis" can be imagined, or can be an actual place for creative explorations<sup>13</sup> (Ling and Pinheiro, forthcoming). Herein I try to create a third space to listen to David Kopenawa, a Yanomami shaman. I consider the book *The Falling Sky* an exercise of CLS (though it is not named as such) between him and Bruce Albert, an anthropologist, who translated Kopenawa's words (discursive agency) and explained how they resonate with academic knowledge. The book reveals mutuality and a new relation between these knowledge systems.

# Listening to the Forest-World: Indigenous Ways of Knowing, the "Falling Sky," and Anthropomorphism

Relationality: Indigenous Ways of Knowing

Indigenous peoples' ways of knowing are based on different sources and expressed in different ways. Relationality, or discursive agency, implies parity among ways of knowing and that it is important to listen to a myriad of voices. Some peoples use stories, poems, myths, dreams, written texts, and songs. Much like in Le Guin's novel, which tells us how the Athsheans learned about the world through their dreams, dreams are also very important for the Yanomami and other Indigenous peoples in the Amazon. Dreams inform how they make sense of the invisible principles of the world (Danowski and Viveiros de Castro 2017, 103). Western epistemologies, in contrast, do not value dreams. Moreover, dreams in Western epistemologies occur from the first-person perspective, which Danowski and Viveiros de Castro (2017, 104) consider evidence of our narcissism and an incapacity to be open to an infinity of agencies in the cosmos. Kopenawa echoes this sentiment when he states,

The white people, they do not dream as far as we do. They sleep a lot but only dream of themselves. Their thought remains blocked, and they slumber like tapirs or turtles. This is why they are unable to understand our words. (Kopenawa and Albert 2013, 313)

Moreover, the Yanomami's knowledge is not "drawn" (written), for they believe that their "memory is long and strong." Their knowledge is based on "words pronounced by mouth," on things they see when they take the *yãkoana*<sup>14</sup> powder, and on what the spirts tell them in dreamtime (Kopenawa and Albert 2013, 24). Kopenawa asserts that he did not have to read to learn about the

<sup>13.</sup> Lily Ling created a project in which she discusses IR while exploring recipes of traditional dishes from different regions. The assumption is that food can communicate more about different worlds than conventional IR concepts (Carolina Pinheiro, email interview with the author, June 16, 2018).

<sup>14.</sup> Yākoana hi or yākoana a, Virola elongata, a tree whose resin is used by shamans to prepare their hallucinogenic snuu and whose principal active ingredient is dimethyltryptamine (Ethnobiological Glossary in Kopenawa and Albert 2013, 584).

forest and that he "saw them for real by drinking my elder's breath of life with the yākoana powder." For him, this also provides the "breath of the spirits," multiplying his words and extending his thoughts (Kopenawa and Albert 2013, 24).

It is interesting to note that Ailton Krenak, another Indigenous leader, has a different perspective. For him and his people, reading and writing can be a way to learning, but they consider literacy a technique like driving or operating a machine. For them, everything has a right value, and literacy is just one among many skills (Krenak 2015, 85).

Cesarino et al. (2013) organize and translate poems by the Marubo, who inhabit Amazonas state in Brazil. In their poems, the Marubo express their wisdom. Kana Voã is their "head of the spirits." Their notion of divinity is not one of a hierarchical father creator of the world through an imperative monologue; rather, creation derives from a dialogical decision: a dialogue among entities who are peers, or siblings, and who discuss among themselves a land for future inhabitants. Similarly, the Desana from Upper Rio Negro talk about creationism in terms of a conversation between two demiurges, Baaribo and Burupu (Cesarino 2013, 44–45).

As mentioned, scholars have argued that Indigenous myths and stories should not be treated as fantasy, imagination, or fiction, as something in opposition to the objective scientific or historical claims to truth; nor should these myths be elevated to some mystical or romantic solution to our crisis (Cesarino et al. 2013, 19–20; Wilson 2004). They should be judged in their respective contexts, pursuing an attitude that is committed to guaranteeing others' ontological self-determination (Cesarino 2013, 20, referring to Eduardo Viveiros de Castro). This is a condition for CLS to happen and opens the possibility of mutual learning. For example, the Yanomami's "falling sky" prophecy can teach us about the possibility of ecological collapse with the destruction of the Amazon rain forest.

## Resonance: Save the Amazon, Keep the Sky from Falling?

The Yanomami have been attacked for defending their forest land, Urihi a. In Brazil, Indigenous peoples continue to be subjected to brutal violence, marginalization, land invasions, and exploitation. Gold prospecting, the expansion of infrastructure, agriculture and cattle ranching, and the exploitation of wood and other resources have put increasing pressure on their forest land and driven much of this violence. For example, between 2009 and 2017, 891 Indigenous people were murdered in all of Brazil, <sup>15</sup> with Indigenous peoples accounting for approximately 38 percent of all those who are murdered in the country's rural areas. Among these, the Yanomami have suffered some of the highest rates of deaths and physical violence (Conselho Indigenista Missionário 2016). Beyond

See http://especiais.correiobraziliense.com.br/517anosderesistencia, last accessed January 18, 2018.

this existential threat to their territory, for Kopenawa, the threat to this forestworld is indeed a threat to the whole world.

Kopenawa claims that the "white-people" do not understand why his people want to keep their forest. He has heard words of warning from great shamans and that "white-people" should dream further and pay attention to the voices of the forest's spirit: "[Their] way of thinking is other. They do not truly know the things of the forest" (Kopenawa and Albert 2013, 22, 410).

Conca and Dabelko (2015, 2) emphasize that there are different visions of the forest and that GEP evolves around attempts to reconcile these visions, to find a balance among them, or to fight to make one preeminent. However, in recent years, a dominant vision of the forest appears to be emerging that values it insofar as it serves an instrumental function, such as to store carbon or protect biodiversity. While saving the Amazon is fundamental to reducing carbon emissions from deforestation, as well as conserving biodiversity and hydrological and climate cycles, for peoples like the Yanomami, there is much more to the struggle to keep the forest. The forest is their world.

To argue that the forest is their world is not to reduce their struggle to a fictional story like in Le Guin's novel. Archeological, ethnobotanical, and ethnohistoric studies have shown that the Amazon has been inhabited for thousands of years. It has never been a pristine, untouched forest. In some places, it was more densely populated before 1500 than it is today; there, it showed signs of Indigenous management, of resource depletion, and even of ecological crisis (Schwartzman et al. 2000; Lopes 2017; Carneiro da Cunha 2012). The Amazon is in fact the result of dynamic interactions between its inhabitants.

Nowadays, Indigenous peoples and the traditional communities that live in the Amazon forest are primarily responsible for its protection. Indigenous lands/territories act as obstacles to the advancement of deforestation and associated carbon emissions. Studies demonstrate that Indigenous lands are among the most preserved in terms of forest cover and biodiversity. Moreover, these lands also contribute to avoiding deforestation outside their boundaries, with distances up to ten kilometers (Ricketts et al. 2010). The Yanomami consider the protection of their forest land fundamentally important not only to guarantee the resources needed for their survival but also for the equilibrium of the entire world and to maintain intact the forces of their cosmological order: thunder, winds, storms, day and night, game, and fertility (Kopenawa and Albert 2013). The shamans protect the inhabitants of the forest and everyone else. Invasions of their land could result in all the shamans' deaths, who, in turn, would not be able to prevent the forest from turning to chaos. The Maxitari,

<sup>16.</sup> A NVivo word frequency count evidences the prominence of climate-related themes. In 427 articles (2001–2016), the first most frequent word is climate. Policy, change, governance, and countries come right after. Carbon is the twenty-fifth most frequent word; forest comes after in twenty-ninth position. Biodiversity, Indigenous peoples, justice, and livelihood do not figure among the one hundred most frequent words.

the earth being, and Titiri, the night being, will get angry, and the shamans will not be there to push back Titiri (Kopenawa and Albert 2013, 405):

The forest will become dark and cold and will remain so forever. It will no longer have any friendship for us.... Then the waters will gradually cover the entire earth and the humans will become other, just as it happened in the beginning of time.... The sky, which is as sick from the white people's fumes as we are, will start moaning and begin to break apart.... For this time, there won't be a single shaman left to hold it up. (Kopenawa and Albert 2013, 405–406)

For the Yanomami, if the forest dies, the shamans will die and will not be able to call upon *xapiri* spirits, who are needed to keep the sky from falling (Danowski and Viveiros de Castro 2017, 104; Kopenawa and Albert 2013). To save the Amazon means saving their as well as our world(s). To understand why the forest conveys such power, it is important to try to view it as they do. Resonance encourages political solidarity with silenced or marginalized voices. Thus the attempt to understand the forest-world can contribute to achieving epistemic justice and realizing that the Yanomami's claim about the fate of the Amazon forest is not that far from what science has been demonstrating.

Interbeing: The Word for World Is Forest—Anthropomorphism and the Forest as a Society of Societies

The forest for the Yanomami and other Amazon Indigenous peoples is a living entity where humans, animals, spirits, and other beings coexist and interact. As mentioned, Urihi a is their forest land, and Urihinari is the spirit of the forest that bestows life to the forest beings. This understanding is similar to other Indigenous peoples' views. For example, for the Tukano, who live in the Brazilian and Colombian Amazon, nature, animals, and human beings were created together and depend on each other. Initially, human beings could marry animals, because humans were created through a mix of forest and animals. Consequently, there were trees and animals in the forest with the same blood as human beings (Cabalzar 2010, 21-37). In the Central Amazon, the Xerente<sup>17</sup> believe that everything, from rivers and forests to animals, holds an independent soul and is controlled and cared for by corresponding supernatural spirits. These spirits interfere directly in their daily activities, such as fishing, hunting, planting, and harvesting. Their stories teach them that there must be respect among these elements and that learning can occur through these interactions (Melo 2000). The Manxineru in the Western Amazon (Acre) also believe that the animals and rivers have spirits and that people get their names from the animals (Machineri 2013).

17. The Xerente currently count approximately three thousand inhabitants, living in the center of Tocantins state in two legally demarcated territories. Despite the numerous threats to their territory due to the introduction of hydroelectric dams, paved roads, hydro ways, and intensive agriculture, the Xerente's livelihood, culture, and traditions are still intensely related to nature.

For the Yanomami and many Amazonian cosmovisions (Ashaninka/Campa, Yawanawa, Aikewara), humans are empirically prior to the world. Anthropomorphism means that everything is human: "The human peccaries became peccaries. The human deer became deer" (Kopenawa and Albert 2013, 60-61). A kind of primordial humanity (sometimes created by a demiurge) existed as the only substrate or matter from which the world was formed (Danowski and Viveiros de Castro 2017, 91). Animals came into being from these prior humans. Portions of this humanity turned into animals, plants, other living beings, meteorological phenomena, and parts of the cosmos (stars, the moon, etc.) spontaneously or through the action of a demiurge. Those portions that did not transform into something else constitute the historical or present humanity (91–92). Danowski and Viveiros de Castro contrast the Amerindians' ontological anthropomorphism with Western anthropocentrism. In their view, the former is the inverse of the latter: "To say that everything is human is the same as saying that humans are not a special species" (99, 100–101). Usually, the attack on anthropocentrism is based on statements that humans are animals, living beings, or material systems. Anthropomorphism, by contrast, states that animals and other entities are "humans just like us" (101–102). This inversion of the argument is very much attuned to the notion of the Anthropocene; by removing "nature" as an "other," we can change the way we relate to the more-than-human world, wiping away the dichotomies and hierarchical distinctions.

Accordingly, for several Amazonian Indigenous peoples, the society–nature dichotomy does not make sense. The "natural world," or the whole world, is an intrinsically connected "multiplicity of multiplicity." Animal and other species are considered other kinds of "folks" and "peoples," and like political entities, they live in their societies (Danowski and Viveiros de Castro 2017, 97–98). The forest (or nature) is a set of societies like an "international arena," constituted by former humans, <sup>18</sup> that, according to some Indigenous peoples, retained a latent or secret human side. <sup>19</sup> Everything is literally political, as there is no absolute difference in status between society and environment (98). Thus there is no nature but a "society of societies," where everything has a life of its own and an image/spirit. The forest and even the water is alive (Kopenawa and Albert 2013, 382). That is why it makes sense to speak of the forest-world, and "ethics with compassion" can guide us to speak with the peoples of the forest and to respect all beings in the "society of societies."

## Conclusions: GEP as a Third Space for CLS in Relation to the Forest-World?

To "world" GEP means to question and reflect on the ways we produce and validate knowledge and how knowledge constitutes our worlds, as well as to recognize

- 18. Non-humans are seen as former humans.
- 19. This hidden condition cannot be seen by humans in normal conditions, but the shamans can see it in their trance.

that multiple ways of knowing refer to multiple worlds, or the pluriverse. It is not enough to acknowledge the existence of many worlds or reals and many ways of knowing. It is important to learn from them (Santos 2016; Escobar 2016).

Indigenous peoples' struggles to keep possession of lands, forests, water, mountains, knowledge, and ways of being are also struggles to keep worlds. As scholars, we can learn from these worlds. This article attempted to create a "third space" for CLS. This is only a first step; a more ambitious one would be to meet in conferences and other spaces to develop mutuality and coproduce knowledge. Despite power asymmetries and all kinds of violence, Indigenous peoples are agents and knowers who develop their own concepts in which we can find resonance.

To listen to the forest peoples, we must recognize their discursive agency. Moreover, epistemic and ontological parity is a way to change relationships into mutuality and not simply an inversion of poles. Applying the principles of relationality, resonance, and interbeing, I tried to listen to Indigenous voices in the Amazon, especially to the Yanomami's, who have been struggling to keep their forest-world. Their ways of knowing involve dreams, prophecies, stories, myths, and also written texts. Engaging with these ways of knowing is important for understanding the forest-world as a living entity inhabited by humans and former humans, who turned into animals and other beings. For the Yanomami and other Indigenous peoples, human beings are not exceptional, nor are they the only ones that have intelligence and spirituality, and thus they should not be treated as on top of the evolutionary chain. Animals and "nature" are also humanity's future, not merely its past (Danowski and Viveiros de Castro 2017, 93–95).

This notion is germane to reconceiving environmental politics and relations with the more-than-human world in the Anthropocene (Wapner 2014). The forest-world is a society of societies (Danowski and Viveiros de Castro 2017) whose balance is delicate because everything is in relationship with one another. Moreover, by bringing the "save the Amazon" motto in dialogue with the Yanomami shamans' "falling sky" prophecy, we can acquire new meanings of the forest. For the Yanomami, to keep the forest-world guarantees that the "sky does not fall" or the coexistence of many worlds. There is resonance for GEP scholars, as we could better recognize and value other ways of being and knowing and learn from them. Perhaps, if we help to keep the forest-world, the sky will not fall.

I would like to honor the memory of Lily Ling, who passed away in October 2018. Lily always encouraged and inspired me to embrace diversity and many worlds.

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