

UC Merced

TRANSMODERNITY: Journal of Peripheral Cultural Production of the Luso-Hispanic World

Title

Epistemological Spaces, Carbon Credits, and Environmental Modernity: the Suruí Forest Carbon Project

Permalink

<https://escholarship.org/uc/item/4c59p93q>

Journal

TRANSMODERNITY: Journal of Peripheral Cultural Production of the Luso-Hispanic World, 7(2)

ISSN

2154-1353

Author

Luna Freire, Juliana

Publication Date

2017

DOI

10.5070/T472035433

Copyright Information

Copyright 2017 by the author(s). This work is made available under the terms of a Creative Commons Attribution License, available at <https://creativecommons.org/licenses/by/4.0/>

Peer reviewed

Epistemological Spaces, Carbon Credits, and Environmental Modernity: the Suruí Forest Carbon Project

JULIANA LUNA FREIRE
FRAMINGHAM STATE UNIVERSITY

Abstract

This study analyzes the experience of the Indigenous Paitei-Suruí in Brazil with the Fifty-Year Plan and the Forest Carbon project implemented inside the Sete de Setembro Indigenous Land (SSIL) with the support of distinct political players such as United States-based Google Earth engine, Metareilá, Ministry of Culture, Ecosystem Marketplace/Forest Trends, among others. Brazil has a long history of complex relations with Indigenous rights, including long-due discussions on identity, land recognition and demarcation. The concern with environmental issues brings in a different layer of political interests to the scene. There is very little dialogue on the acceptance of their forms of knowledge by mainstream society, and, as this study highlights, this relation to nature is being pressured to be commercialized and quantified in a Western-style system. The essay concludes that the Suruí pact to sell its Carbon Credits to multinationals such as Natura is a good example of this strategy of paradoxical post-modernity: the traditional local values and culture of the Indigenous society can be *represented* through new technology, but it is through those machines that the groups can be *observed* and *appropriated* as non-threatening to a global audience.

Introduction¹

In 2011, when I interviewed a member of the Suruí² Indigenous People in the northwestern region of Brazil, a new position within the village had been created: that of Community Communications Specialist. At that time, the group was enthusiastically developing *Ponto de Cultura Maloca Digital*, a series of blogs by Indigenous youth with funding from the Ministry of Culture (“Ponto de Cultura” n. pag.). The younger generation was being trained to use the Internet to promote their community, and also enthusiastically discussing the new projects taking place inside their territory (Chico Suruí n.pag.). When asked about those projects, Chico argued that technologies such as film, photography, Internet, and media in general were being used for the advancement of his people, which he saw as directly dependent on the conservation of the natural ecosystem: “A floresta em pé é importante para a qualidade de vida do ser humano” [the standing forest is important to the quality of life of human beings] (Chico Suruí n. pag.).

The idea of modernizing and institutionalizing the conservation effort within the Indigenous villages follows what Pimenta calls a “new ecological practice” (my trans.; 124) in which Indigenous and environmentalists merge to discuss sustainable development. One example, as Pimenta explains, is that the notion of the limitedness of spaces caused for some Indigenous peoples a new kind of perception of the use

of land:

Antes, era assim. Eles [os Ashaninka] chegavam num local como esse [...], usavam a área durante dois ou três anos e se mudavam para outro canto [...]. Então, esse lugar aqui, ele começava a se recuperar de novo. Quando eles usavam o outro canto, mudavam de novo para outro lugar [...]. Era manejo mesmo do território. [...] Agora, a gente tem a terra, mas a gente não pode mais usar o território como antigamente e temos que fazer estes trabalhos [de manejo de plantio] [Before it was like this: They [the Ashaninka] arrived at a place just like this one [...], used the area for two or three years and then moved somewhere else [...]. So this place here started to recover again. When they used up the other plot, they moved somewhere else again [...]. So they were alternating inside the territory [...] Now we own the land, but we can't use it anymore like we used to do, so we have to do this kind of work of plot rotation]. (Ashaninka Francisco Pianko qtd. in Pimenta 125)

Planting practices changed in order to continue accommodating family plots and other sorts of sustainable exploitation of the natural resources (Pimenta 120), including plot rotation to maintain the fertility of the soil, since they were now to remain in the same area. Consequently, the author argues, the idea of conservation emerged. In general, one of the concerns for populations that agree on participating in environmental projects are that they should continue having access to the forest and to the medicinal plants available in it: that they should be able to build houses and plant their own crops in their delimited land (Ayakanukala Laura qtd. in Maisonnave n.pag.). On the one side, groups such as the Amazon Institute of Environmental Research (IPAM) present pressing concerns for the society such as global warming, and the need to curb deforestation (“Desmatamento” n. pag.), which in 2016 pointed to an estimated increase of 29 percent in the Amazon region alone (PRODES n. pag.). On the other side, practical concerns to the lives of the local communities in the Amazon need to be gauged alongside those larger issues, such as of family agriculture and self-sustainability, and of preservation of the forest and its resources.³ This perception of nature, though, as observed in the constant reference to use, goals and resources, brings us back to an idea of conservation that is by itself framed by an epistemological understanding of nature as utilitarian, producing a belief of nature as a resource, and rationalizing its preservation because of the natural balance and maintenance of people in an instrumental way.

Other scholars theorize on how current, neoliberal environmental agendas affect the livelihoods of people (Fairhead et al. 253). As I intend to argue, this construction detaches itself from non-Western relationships to nature that we cannot understand: be it religious, ritualistic, or communitarian, our

justification of this new ecological practice is still based on monitoring of acres of timber through satellite technology to account for tons of carbon dioxide absorbed by nature. The belief of crop rotation is not based on their understanding of ritual and plantation methods, but based on a Western science that relies on the observation of the soil.

The present study focuses on marginalized unexpected spaces affected by technology and the discourse that uses environmental concerns as a framework for reading Indigenous communities within our contemporary capitalist agendas. In order to do so, I analyze the negotiation of the case of the project of the Suruí Forest Carbon Project, so as to suggest how the concept of a green economy has only touched the surface of the forest as a place for the lived experience of these communities. It goes without questioning that such economy reproduces old colonial power relations of provider of surplus natural resources extracted from the local population vs. consumer/exploiter of natural goods in an unequal trade balance. This essay includes (1) a historical background on the complicated relation of the Suruí local people with the forest, including the concern with deforestation and logging, (2) an analysis of how this concern with nature has been captured to the general public and legislators, thus influencing the lives of local populations and the negotiation of such terms,⁴ (3) the response by some Suruí against being imposed such dialogical relation, instead of rethinking green projects so as to include a plural perception of Indigeneity and their relationship with nature.

The concept of “economy” is rethought in this new context, varying from the financial support from multinationals, on a larger scale, to the price associated with the carbon marketplace of the Indigenous reserve, in the local scale. However, many questions remain unanswered: what kind of financial incentives, such as tax breaks, are being given to the corporations involved in such partnerships? How is the price for the carbon credit determined? How is the environmental and social damage numerically assessed in order to determine social responsibility? On the other hand, we can find a series of questions that escape this equation in mathematical terms: how do the villages sustain themselves without being able to use the territory for planting crops, cooking with timber, or buying general goods without access to the capital to be invested in the community? How is money distributed within a territory that should cater for present and future generations, regardless of who is actively involved in the project? Finally, how is project membership determined?

Scholars have contributed to our understanding of the use of technology by Indigenous groups across the globe, negotiating political and cultural space by having access to those tools (Ginsburg 2008; Salazar and Córdova 2008). Besides drawing on media theory to understand technology as empowerment, I also ask in which ways technology leads to surveillance, here referring to Michel

Foucault's (1979) and Paul Virilio's (1994) conceptualizations. Foucault argued that modernity created techniques of disciplinary power, making explicit that discipline served to shape and modify conducts and create "docile bodies", amenable to the system (economic, political, social). The technology that allows them to record (and transmit to the world) where the loggers are acting is also regulating their own access to the forest, as we will later discuss. To complement that, in 1994, Virilio's text *The Vision Machine* contributed to cultural theory with an understanding of technology that affected warfare, mainly information transmission on politics and the militarization of the public life. Virilio's chief concern is with the connection between war, cinematic substitution and what he calls the "logistics of perception"—image devices and systems that provide visual experience of conflict with virtual images disconnected to the geographies of place. Such theorization can work when we observe thorough satellite images deforestation wars of military police, patrol groups and illegal logging trucks, overnight cutting down trees and involved in *timbering laundry*, a term used for the process of ticketing and legalizing timber for its controlled sale. Examples of this type of activity abound, such as the news report by Folha on the wood center of Itaipuã do Oeste in Rondônia, a tiny town of only 8,000 people but a large number of woodshops (Garcia n. pag.). The perception of the conflict is captured through virtual lenses and mapped on GPS technology, giving the monitoring a sense of urgency and immediate control by the machines overseeing the territory. Mainstream society has little information about the monitoring of those images, what (if) military police is actively persecuting those involved, or what kind of force and mechanisms of control are used.

Ultimately, we could argue that the perception of neo-environmental projects such as this one as a quick fix to greenhouse effect emissions is part of a newer version of an epistemological system that still maintains a colonial divide. It is also important to emphasize that the World Wide Fund has denounced Europe for not achieving its goals of forest preservation (only four out of the ten percent of natural forest recommended is being preserved), while still pushing a heavy preservation agenda for countries outside Europe who want to continue involved in European Union trade (Yaik n. pag.). The Indigenous groups were quickly appropriated my media discourse as the saviors of our environment, and also engaging in this *trope* themselves, as a solution to the capitalist, Western-oriented economy, as fixers to the damage created elsewhere. The progressive, industrialized countries, who created the problem of global warming in the first place, resort to the *otherized* space for generating the carbon credits needed to compensate their damage to nature, whereas just a small part of the profit of multibillionaire industries such as Natura is sent back to the communities in the Amazon region, and for Indigenous communities even more.⁵

But behind this imposition of a specific ecological practice that is primarily beneficial to the Western world, there also remains the question of the burden of post-colonial, impoverished minority groups that inhabit those spaces and have traditionally lived inside those green margins. The rationalization of their relationship with nature imposes not only a divergent understanding of nature (epistemologically-speaking), but an understanding of themselves as green protectors that subjects them to a new relation to their environment. Again returning to Foucault's theorization of "docile bodies," the power of observation and monitoring does not occur only from the inside to the outside: Federal Police, as other members of the community have complained, is constantly monitoring activity within the villages ("Nota de esclarecimento" n. pag.) not necessarily to monitor activity by the outsiders, but also from the insiders. Ultimately, the surveillance machine provided by Google with the GPS and imaging technology that was once seen as freeing now is being rejected by some for preventing an autonomous way of life. As Fairhead et al. (2012) argue, we need to be aware of discursive constructions of forests as "marketized 'carbon sinks' and not lived-in spaces, with embedded histories and cultures" (251).

The Initiative and Collaboration Program

Environment and capital impose solutions on how "a floresta em pé pode gerar renda" [how the standing forest can generate income] (Maisonave n.pag.). But instead the area has a history of deforestation that dates back to the 1960s with large financial incentives to attract ranchers to the area, who ended up finding deforestation as a more lucrative activity (FUNBIO 2011). There are seventy authorized timber extraction sites and 306 shops surrounding the Indigenous reserves of the region (Maisonave n. pag.). Despite many areas having approved forest management plans, Irene Filha points to the little monitoring done in areas of *authorized* timber extraction, causing them to later lose their permits due to infractions (100). These plans are based on the premise that "o manejo florestal procura reduzir os danos à floresta, reduzir os desperdícios de madeira e aumentar a eficiência das operações de extração" [Forest management plans try to avoid harm to the forest, reducing the waste of timber and increasing the efficiency of the extraction activities] (Barros qtd. in Filha 96).

The initiative combines environmental concerns with extra income within the forest. Far from large urban centers in the states of Rondônia and Mato Grosso, deep in the Amazon region, the Suruí people have managed to promote the use of satellite technology after a much discussed agreement with Google Earth, which was the first step in the implementation of the Suruí Forest Carbon project ("Amazonian People" n. pag.). Their understanding of Portuguese is restricted though, and so is to

broadcasting media and to mainstream media resources. There were no specific legislation about REDD+ in Brazil (Maisonnave n.pag.) until the “Estratégia Nacional de Redd+” was launched in 2015 by the Ministry of Environment. It finally established a series of requirements in order to implement such projects in Indigenous Territories (ITs), adding to the FUNAI document “Povos Indígenas e REDD+ no Brasil: Considerações Gerais e Recomendações” (2010) [Indigenous Peoples and REDD+ in Brazil: General Consideration and Recommendations.] One of its concerns was that “opportunistic organizations and companies would try to implement projects with communities without the necessary safeguards to their rights” (my trans; FUNAI 1). For example, it establishes that such projects have to benefit the whole community and generate money for collective interest (FUNAI 3).

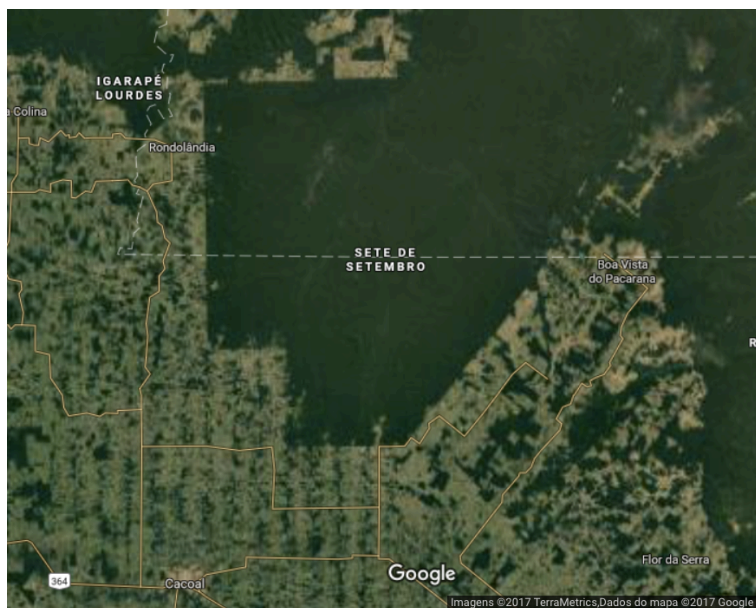


Figure I: Location of Sete de Setembro Indigenous Land and project. Image from Google Earth.

The maps above show the areas where the Sete de Setembro Indigenous Land (SSIL) [Terra Indígena Sete de Setembro] is located. The physical limits of the reservation clearly contrast with the rest of the territory, green versus brown, indicating how much the forest has been destroyed outside the reservation limits. It is said that the first time the Suruí chief Almir visualized the extent of the deforestation in the outside territory was when using the Google Earth areal vision resource when it was first implemented (Bishop and Hill 101-02). Since the surrounding areas were quickly devastated by illegal logging, more pressure exists not to let the remaining areas to follow the same path. The process of illegal logging constitutes environmental crime and theft, and the wood is often sold with counterfeit documentation, since they cannot link the wood to any licensed wood logging spot. The

estimated rate of deforestation is of 0.07 percent a year between 2000 and 2009 (Vitel et al. n. pag.), predominantly for pasture and agriculture (INPE 2010 n. pag.). In certain instances, the Brazilian Institute of Environment and Renewable Natural Resources (Ibama) patrols the territory with special forces.

As a response to many of the variables mentioned, in 2007, a group of NGOs, including Ecosystem Marketplace, a subproject of Forest Trends, and Association Metareilá, the project proponent from within the community, developed a “Fifty Years Plan,” outlining community goals and laying the groundwork for a Carbon Project. All the funds would go to a Paiter-Suruí Fund to benefit the whole community (“Metareilá” n. pag., “Projeto Carbono Florestal” n. pag.). For instance, Chicoepab Suruí (2013) fully analyzes one of the projects strengthened with funds from the carbon sale, the reforestation plan Projeto Pamine (16). It was led by the Metareilá Association (Chicoepab Suruí 33), and it aimed at reforesting the land with native species. It could be considered the most important one for the 50 Year Plan of the Suruí People (Chicoepab Suruí 32; “Metareilá” n. pag.).

The concern with deforestation mentioned above is due to a cyclic economic dependence on timber extraction dating back to the 1970s (Fearnside 1986, 1989), and in current times due to the constant presence of loggers and cattle ranchers in approximately fourteen main sites of illegal extraction within their territory (Ferronato and Nunes 6), in which some members of the Suruí Indigenous communities also participate. In fact, Chicoepab Suruí points to the involvement of some members of the community in illegal wood extraction, cattle ranching, and land renting to sharecroppers inside the reservation (29).

Back in 2005, Soares Filho et al. already warned against many of the historical causes of deforestation: financial incentives, past colonization politics, land conflict, wood market expansion, cattle expansion, and agribusiness boom, especially soy (see full reference list in Soares Filho et al. 137). Deforestation generates 60 percent of the CO² emission in Brazil (Ministério 11). Soares Filho et al. warn that forest areas just outside of reservations would tend to disappear, and even conservation areas close to railroads would still be affected by logging (145). Even Indigenous land, better preserved in a sense, would be affected by fire and continuous drought caused by the savannah climate entering the water basin (Nepstad et al. qtd. in Soares-Filho 145). Dourojeanni (2003) warns that conservation plans done in Federal, State and Private areas often lack accurate information and are of poor quality, as in for example being done in the print version but never put in practice, lacking geographical and biological information specific to the area, as opposed to the state region that is not relevant (1).

But gathering support across the communities can also be a challenge: a biographical description of even some of the most successful projects will point to the difficulty of negotiating consensus. In the case of Pamine,

as aldeias que foram se inserindo no projeto mais recentemente nem sempre podem contar com os mesmos benefícios, o que dá origem a novos conflitos [...] Algumas pessoas veem as áreas de reflorestamento como sendo da associação e não querem dar continuidade aos cuidados dessas áreas reflorestadas [the villages that joined the project more recently were not always able to receive the same benefits, what generates new conflicts [...] Some people see the reforestation areas as belonging to the association [Metareilá] and do not want to continue caring for the reforested areas]. (Chicoepab Suruí 59)

The Alliance for the Forest People, existing since 1989 and connecting Conselho Nacional de Seringueiros (CNS), Coordenação das Organizações Indígenas da Amazônia Brasileira (Coiab) and the Grupo de Trabalho Amazônico (GTA) has also been discussing the issue of recognition of the Indigenous peoples' environmental contribution to the world. In the case of the Suruí, they argued during the negotiations in 2009 that they were defending the best interests of the country in protecting the land from illegal deforestation by using Google Earth to monitor land cover and use of the area. Considering that, for so long, so much had been discussed on “the negative effects of globalization on indigenous communities, particularly on their lands, cultures, identities, and lives” (Guissé 2004:3), the potential of such an innovative, collaborative, and at the same time autonomy-creating project seemed to be the ideal solution to combine the best of both worlds: a group (Google) guided by capitalist economic growth in developed and developing nations redressing their damages by financially supporting the preservation of biodiversity and cultural minority groups at the same time that compensating greenhouse gas (GHG) emissions. Media straightaway reproduced the enthusiasm—from all sides—of such enterprise (see BBC Brasil n.pag., Borges n.pag. “Carbono Suruí” n.pag.). The possibility of a joint solution for producing material goods, establishing sustainable development, managing natural resources, and fighting financial inequality among impoverished indigenous communities seemed to finally materialize. At that time, a large photo illustrated the frontcover of the *San Francisco Gate*, representing the international curiosity when the Indigenous leader Chief Almir Suruí decided to visit the Google headquarters to discuss the project and seek support (Kepka n.pag.). He posed wearing a headdress and bead necklaces on Ellis Street, surrounded by walkers staring at him. What the image ultimately resonates is a discourse that quickly associates the concepts of

Indigenesness in partnership with ecologic modernity, but which imposes on Indigenous communities a relation with capitalism, nature and legislation that is static and intrinsic to a Western positionality. As Chico Suruí explains, mirroring the same combined understanding of ecology and financial value:

A princípio, o Projeto Carbono Suruí só previa a conservação da floresta nativa em pé, mas agora também considera as áreas de reflorestamento para a comercialização dos créditos de carbono. Essa iniciativa é bastante reveladora do recente reconhecimento do valor econômico da floresta por parte dos Paiter Suruí [At first, the Surui Carbon Project only allowed for the conservation of the native forest, but now it also considers areas for reforestation aiming at the commercialization of the carbon credits. This initiative is very revealing of the recent recognition of the economical value of the forest for the Paiter Suruí]. (Chicoepab Suruí 35)

Bishop and Hill discuss this specific case and what they perceive as the positive impact of REDD+ into “agriculture programmes” (101), specifically of farming “organic coffee, bananas and Brazil nuts, all of which would be branded as Suruí products and marketed accordingly” (101). This Western positionality, despite what can be perceived as positive outcomes, can take for granted that the legislative, or contractual terms of the pact, despite being approved and overseen by governmental groups such as FUNAI (National Indigenous Foundation) and FUNBIO (Brazilian Biodiversity Fund), among others, impose types of consequences and novel problems not listed in contractual terms. There is an ongoing debate accusing green projects of being a new form of colonialism (Navarro and Bessi n. pag.; “The Worst REDD-Type” n. pag.; Lang, “No REDD+” n.pag.): such affirmation needs to be probed, along with a discussion of the consequences of this incoming capital to individual groups, the natural or ecological goals of the communities involved, and the legal restrictions imposed by the pact.

What these recent projects point to is how pervasive the greenwashing mentality has clouded hegemonic views of the forest and of nature. When drafting the rules for such partnerships, here returning again to Foucault, how does scientific knowledge give non-Indigenous more power to negotiate these terms and justify capitalist damage elsewhere? The preservation as originally thought by the Ashaninkas in the state of Acre meant respecting the forest and not using more than needed (or being greedy) (Pimenta 125). Pimenta discusses how the Ashaninka’s posture changed when they perceived that natural resources are limited: they noticed they could end up without the natural resources they needed (125).⁶ On the other hand, the preservation when discussing carbon

sequestration is less of a dialogic relation of needs met by the forest, and more of an artificial price set by the conservation specialists worried about GHG emissions. We also need to recognize the limits of what we know about carbon sequestering. Monitoring stops being an issue of honor and understanding transmitted from generation to generation to become suddenly self-imposed by a legal agreement.

Cyclic Dependence on the Forest: Its Varied Forms

This Brazilian Indigenous group is physically located in the surroundings of the city Cacoal, with shared territory in the states of Rondônia and Mato Grosso, in the Sete de Setembro Indigenous Land,⁷ with a population of approximately 1,200 individuals in twenty-four villages (Ferronato and Nunes 5), speaking a language from the Mondé family and Tupi branch (Lewis, Simons, and Fennig 2015). We will return to the issue of language proficiency when discussing the legal implications of the pact, such as agreeing on clauses that have been negotiated in Portuguese, a foreign or second language to many, and that involves legal jargon already difficult for a general audience.

What Latour (qtd. in Gebara et al. 6) indicates is the Indigenous Peoples' relationship with the forest is different than REDD+ promoters' perception. At the same time, national legislation points to the "posse plena e o usufruto exclusivo de seus territórios" [full possession and sole user of their territories] (Ipam qtd. in Barcellos 5). Other initiatives have been addressing the need to rethink this pattern of capitalism and ecology-driven value and projects. One example specific to Brazil is the Programa Bolsa Floresta [Forest Grant Program] (PBF), instituted by the government of the state of Amazonas since 2007, which aims at financially compensating projects, people, institutions that foster environmental care. It receives support from large multinationals such as Coca Cola, large companies such as Banco Bradesco, besides BNDES. Through it, individuals receive R\$50 for voluntarily not damaging the forest, or participating in a project. It was created with Law 3.135 on Climate Change, Environmental Conservation and Sustainable Development of Amazonas, and Complimentary Law 53, and by the Sistema Estadual de Unidades de Conservação (Seuc), on June 5, 2007 ("Como funciona" n.pag.).

Santos indicates how the green economy consists of "a new phase of the primitive accumulation of capital over those natural components until now out of market", in which the general society has cast a new perspective on "biodiversity (water, land, seeds, forests, carbon, etc.)" (Santos qtd. in Barcellos 46). The main concern should be, however, what Becker indicates:

o uso da valorização da Amazônia, por exemplo, como símbolo de vida e capital natural, não pode aparecer dissociado das populações que nela residem, já que são estas as possuidoras do saber local, que convivem há séculos com essa natureza e que tem os conhecimentos (sábios), adquiridos historicamente, ao longo de seu convívio na região [the use of valorization of the Amazon, for example, as a symbol of life and natural capital, should not appear disassociated of the populations that reside in it, since those are the ones that hold the local knowledge, that inhabit for centuries with that nature and with the (wise) knowledge, acquired historically, through the long period of cohabitating the region]. (qtd. in Barcellos 47)

There is also a list of recommendations on how financial resources generated by REDD+ funds should be spent:

de propriedade da comunidade e gerar recursos que sejam aplicados em atividades de interesse coletivo, como educação, saúde, alternativas econômicas sustentáveis, segurança alimentar, valorização cultural, proteção territorial, infraestrutura de transporte, comunicação, eficiência energética e fortalecimento cultural e institucional [as belonging to the whole community and to generate resources that are used in activities of collective interest, such as education, health, sustainable economic alternatives, food security, cultural reinforcement, protection of the territory, transport infrastructure, communication, energetic efficiency, and cultural and institutional strengthening]. (Barcellos 50)

As reported, the deforestation is generalized in parts of Brazil for fine timber extraction, crops, cattle farming, etc., compared to the still green areas inside the reservations. Parts of the Indigenous reserves are also suffering attacks from illegal logging, including the help from other Indigenous members who disagree with the pact of stopping illegal logging. At the same time, the sale of carbon credits was believed (primarily by non-Indigenous) as an opportunity for extra income to implement their management plan, but not as a solution to the all the economic problems faced by this group of people (“Consentimento Livre e Prévio” 29). A large global agenda on environmental problems was consolidated under the United Nations Framework Convention on Climate Change. The goal was to set standards to balance the CO² emission and greenhouse effect so as to allow ecosystems to gradually adapt to the changes in climate. In order to do so, all developed nations participating in the deal needed to commit to a series of priorities and objectives (United Nations 1992). As part of the decision to reduce emissions from deforestation in developing countries (REDD+), UNFCCC provided guidance including on forest carbon

stocks. Besides the projects created and endorsed by the UNFCCC, a series of similar initiatives to work with REDD+ in a voluntary market were created, including multiple NGOs across the globe and in which the Pater-Suruí Project was inserted.

Theoretically, the voluntary market operation would be simple: the multinationals would purchase the “carbon credits” issued by the Indigenous communities, which produce far less GHG emissions than the forest in their territory is capable of neutralizing, leaving them credits to be commercialized with companies causing damage to the environment. As part of the accreditation process, the project in the region of Cacoal received the highest recognition standards by the United Nations, receiving Verified Carbon Standard (VCS) accreditation and CCBA Certification (Climate, Community and Biodiversity), because of the endangered and vulnerable species also found in the area (“Metareilá Association” n. pag.).

Media outlets emphasizing this project boomed, and material about the Suruí was used to convince other communities to start negotiating similar terms. The extrativist reserve Tapajós-Arapiuns in the state of Pará, created in 1998 (“Resex” n. pag.), has also started discussing similar terms, even though the negotiations stopped due to protest by the Indigenous community from 13 ethnic groups (G1 n. pag.). A similar pact between the Mudukuru and Celestial Greens was later heavily denounced for not even including the oversight of local or national institutions or government (Aranha n.pag, Valle n. pag.). Similar questionings have been made on pacts with Parintintin from Amazonas and Karipuna from Amapá (Aranha n.pag.). The pact with the Awo “Xo” Hwara and Celestial Green Ventures was also later suspended by the Advocacia Geral da União (“AGU Denuncia” n. pag.).

Intriguingly, only those communities in developing countries were engaged in maintaining carbon credit projects,⁸ whereas developed nations were involved predominantly in purchasing such credits. From the perspective of the communities who bought into the arrangement, the motivation was multiple: international awards, financial compensation, tax breaks, and media attention to the social and economic concerns of their communities, all in exchange for supposedly fixing—or supposedly ameliorating the guilt of—a Western-created problem of global warming and deforestation. The goal of the project was to generate R\$4 million in carbon credits through REDD+, as largely announced by media outlets across the world (“Créditos” n. pag.).

Four clans are believed to have agreed on participating in the project by signing the “Memorando de Entendimento” [Understanding Memo] on June 9, 2009. It stated their desire to reach a common goal in this project by projecting that image to the outside society (“Consentimento Livre” 28).

Questioning “Sustainable Development”: A New Form of Capitalist Transaction?

As the world population increased by four times during the twentieth century, and the global gross domestic product by twenty times (Abramovay 3), the market for “sustainable development” seems to be a posterchild of a new postmodern reality. As argued by NGOs such as Forest Trends, there is growth in the market for non-governmental organizations attempting to “link forest communities to emerging environmental markets in carbon, water, biodiversity and beyond, to *leverage* conservation and community benefits” (Borges n. pag.). However, the concept of “development” and its implications in autochthonous communities has already been highly problematized in cultural studies. When María Josefina Saldaña-Portillo wrote *The Revolutionary Imagination in the Americas and the Age of Development* (2007), she hypothesized that, due to the pervasiveness of the ideology of progress in Latin America, not only is the *primitive* in history absent from knowledge and action in the written narratives (78), but the “teleology of progress in colonialization and surveillance” justifies the need to *lead* the native inhabitants toward progress, technology, and modernity (Saldaña-Portillo 109). What perhaps Portillo did not predict at the time was that the teleology of progress and the surveillance tools brought by technology and modernity would be used precisely to deny these indigenous communities the possibility of using the natural resources around them, as if it were possible to scientifically measure and calculate development and the *primitive’s* interaction with nature.

Much of current environmental politics draw upon theorizations of the concept of green economy, which aims at “reducing the material and energy involved in the production of goods and services” (Abramovay 4). Considering the increasing scarcity of natural resources, it has been argued that “the prevailing idea in twentieth-century economics –that human talent and ingenuity would always be able to substitute exhausted resources and repair the damage caused by production and consumption—has revealed itself to be tragically mistaken” (Abramovay 3). Consequently, many have suggested that part of the green economy’s goal is to establish a healthy balance between economics and ethics, which accomplishes the following two premisses: “[1] reduces the use of carbon in its material and energy bases [...] and [2] offers possibility for the basic needs of human beings to be met within the limits of the ecosystems’ capabilities” (5). The ethical element missing in many of those proposed environmental projects draws on establishing a shared responsibility for environmental preservation, including rethinking the established inequality of both energy consumption (Abramovay 5) and worldwide inequality of emissions from different groups in the planet (Abramovay 4). What we see, instead, is a wrong understanding of the concept of green economy, wrongly relying on a new set of post-colonial relations that reiterates former power subordinations of developed sectors conducting further economic expansion over Indigenous nations that are granted the

subservient role of caring for natural resources in their pristine form, the former using the latter to compensate for the social responsibility of the damages caused to nature and imbalance in the ecosystems. Thus the indigenous is removed from a situation in which their dependence on the government for financial resources is gradually replaced by dependence on the environment, from governmentality to environmentalism (Luke 1997; Agrawal 2005).

The Protest: Multinationals, Outside Political Players, and the Value of Nature

Natura, the giant Brazilian cosmetics company buying the Suruí carbon credits, signed the pact for R\$1.2 million in 2013. The negative media attention did not appear until the end of 2014, this time when a group of members of the community, supported by the Indigenous Missionary Council (CIMI), a subgroup affiliated with the CNBB (Conferência Nacional dos Bispos do Brasil), filed grievances against the expenditure of the income generated (Bonilha n.pag.). The Indigenous group protested the project three years later, and CIMI was claiming it to be “parte de uma política do capitalismo verde e neocolonialismo” [part of the politics of green capitalism and neocolonialism] (Heck n.pag.). Because of that, the group of Indigenous leaders who signed the petition asked for a dissolution of the pact (CIMI Nacional n. pag.).

The protest indicates the need to step back and reanalyze how the contract was signed, if with support of most of the community, and whether the support from members was maintained. One of the points of dissension here is that the financial flows from the project might not result in the kind of return expected by part of the group. The 50-Year Plan is based on the premise of “sustainable etnodevelopment” (my trans.; “Metareilá” 6): a series of projects idealized for the well-being and future of the community, considering financial alternatives, training and education that go beyond extraction of natural resources. Carta de Cuiabá, a document signed by governors and vice-governors of the region Legal Amazon (Acre, Amapá, Amazonas, Maranhão, Pará, Rondônia, Roraima, and Tocantins) that met at a convention on May 29, 2015 requested to the president Dilma Roussef the following: the right of Indigenous Peoples to receive national and foreign funds allocated for projects reducing deforestation and pollution emission in the next years (Dióz n.pag.). When considering whether to implement similar projects in the Xingu Indigenous Land, for example, the issue on how to achieve agreement among different groups/languages was also raised (Maisonnave n.p.).

Academics such as Laura Graham, when working with the Xavantes group, discussed the adoption of international green discourse by the Indigenous communities themselves to bring in visibility to their

causes, even though the adoption of such homogenized discourse offered a risk of “flatten[ing] or essentialize[ing] the diversity within Indigenous groups” (322). The current debate originating in 2014 about the Suruí Forest Carbon Project mirrors this essential issue on how to achieve protection of the forest at the same time that granting the Indigenous populations control over their natural resources after signing such partnerships. In current times we are returning to the discourse of isolation and preservation that for so long worried anthropologists, this time not concerning the population, but of their ecosystem. What the Indigenous group protesting the pact has been defending is that such untouched use of the forest land is not practical or beneficial to their communities, and that the incoming capital also changes their relations from the inside out (“Nota de esclarecimento” n.pag.). The other language conflict to be addressed, as mentioned previously, is the terms of the agreement and the difficulty of determining mutual consent from the whole community: it is a case when a high percentage of them are not fluent Portuguese speakers and are also exposed to the cross-cultural barrier of understanding the legal language and implications (besides the social consequences) of such a long-term pact.

Consequently, what we witnessed in 2015 was some Suruí Indigenous representatives reinitiating the dialogue on their benefit in this kind of neocolonial arrangement, and its effect in their interaction with nature. Their argument was not specifically against the fundamental core of protecting nature or the project ideals, but rather the unfairness of how the money was distributed (Zwick n. pag.). The protesters were concerned with how the pact was being done, or the lack of information behind the pact, as one of the leaders explained during an interview (Henrique Suruí qtd. in “Para que projetos”):

A promessa era muito bonita. Até hoje a maioria do povo Suruí não entende ainda o que é isso, Redd (Redução de Emissões por Desmatamento e Degradação) [...] Acabou a liberdade dos Suruí na nossa terra [...] Ninguém sabe o que aconteceu com o dinheiro [...] o povo está sem vida. Queremos a supressão do projeto para voltar a ter a vida que tínhamos antes. Voltar a ser guerreiro [...] Hoje é muito difícil dizer que estamos unidos. O projeto trouxe uma divisão muito grande. Não é qualquer liderança que pode organizar o povo Suruí novamente e que pode dizer para voltar a ser Suruí” [The promise was very beautiful. But even today the majority of the Suruí still do not understand what that is, Redd (Reduction of Emissions caused by Deforestation and Degradation) [...] the liberty of the Suruí in their land is over [...] Nobody knows what happened to the money [...] the people is lifeless. We want the suppression of the project to return to what we were before. To be warriors again [...] Today it is hard to say that we are united. The project brought a great

division. It won't be any leader that will be able to organize the Suruí people and to convince us to be Suruí again] (9)

His complaint establishes a series of concerns: of understanding the implications of consent and what REDD+ was when the pact was signed; of understanding how the money was going to be spent in the community and of actively participating in the projects created with those funds. Moreover, the protests also questioned the issue of the sense of community gradually being changed, raising the flag of how a 50-year management plan for the community will be successful if there is no longer a sense of ownership of those long-term goals.

Others wrote to the Ministério Público Federal [Public Federal Ministry] in January 2015 asking for the end of the project (“Nota de esclarecimento” n.pag.). The CIMI, another political actor in this discussion, added its support in saying: “NÃO à financeirização da natureza, NÃO à economia verde e NÃO ao mercado de carbono” [NO to the financing of nature, NO to the green economy, and NO to the carbon marketplace] (Porantim qtd. in Heck n. pag.).⁹ The term “financeirização da natureza” [financialization of nature] is problematic in itself for attaching a transaction value to the the pollution done, and also not considering the multiple repercussions of the problem created.¹⁰ To add another layer of complexity, *Porantim*, the publication by the CIMI, was responsible for starting a heavy agenda against those green projects, not uniquely the Suruí Forest Carbon Project, with whom part of the Suruí population is now siding (Henrique qtd. in Bonilha n.pag.).

An indigenous city councilman in Rondônia, Nham Pá, from Guajará-Mirim, recently explained the practical implications of such pacts, preventing them from touching the trees within their reservation:

O índio não pode vender madeira, não pode vender caça, não pode vender minério. Então tem que ter apoio para produzir porque o índio precisa, como todo mundo, de dinheiro para comprar roupas, remédios e outras necessidades” [the Indigenous person can't sell timber, can't sell hunted animals, can't sell mining products. So the individual has to have the support to produce what they need, just like everyone else, [they need] money to buy clothes, medicine, and other needs]. (Ascom n.pag.)

The concept of green economy in this kind of argument is imposes a difficult balance to the Indigenous community. Since the funds are invested in long-term projects, and their subsistence through crops and extractivism is limited by space, their options are also restricted.

Further Challenges on Agency: Lessons Learned

As many have warned, we must also avoid victimization discourses that conceal agency from ethnic groups (Baglo 137). More importantly, agency has to be understood as also valuing and incorporating Indigenous ways of knowing, and this attempt by subgroups in reinitiating the discussion warrants more attention. This concern with the land, at the fabric of the still ongoing fight for territorial recognition in Brazil, and as represented in their community media, gained much larger proportions with the support of Google Earth: in a 2011 video featuring Chief Almir Suruí, the main spokesperson for the project, the Suruí Forest Carbon Project is explained, backed up by images of the Amazon, and the huge Google Earth logo on the right side. This is representative of much of the media attention given to the topic, with university visits, international conferences, among others. On a TedEx talk in Belo Horizonte in 2012, entitled “High Technology to Preserve Old Traditions,” by Almir Suruí and Google representative Rebecca Moore, they both discussed the idea of constructing a Suruí cultural map, highlighting locations, cultural landmarks, images of the area, and information on the trees. Both projects combined the idea of creating a cultural archive, as theorized by Taylor (2003), Turner (1990) and Ginsburg (2002), but also of actively engaging with technology for Indigenous self-determination. The archive is composed of items such as an open data kit to record illegal logging and geo-tag video content for the cultural map. Based on the idea of self-determination, the project was welcomed as an ongoing collaboration by multiple associations within the SSIL to plan long-term results for the communities. The use of technology was celebrated as a sign of modernity, and media worldwide commented on the articulation of “laptops and arrows” (“Trading Bows and Arrows” n. pag.), culture and technology together.

Twenty years ago, Caren Kaplan provided an interesting reading of Body Shop ads and their use of international images of nature, including those of Indigenous peoples, as a naive transformation of cultural differences into commercialized commodities (1995). What we see with many of these news reports on technology use by Indigenous communities is a similar case of superficial celebration of multiculturalism that often takes for granted the need to engage with what is being said by those marginalized communities, and the positionality of their discourse. More recently, at the debate “Exclusiones epistémicas, emergencias y emancipaciones en América Latina” [Epistemological exclusions, emergences and emancipations in Latin America], at the Latin American Research Conference (2015), in which Gladys Tzul Tzul and Boaventura de Sousa Santos participated, one of the arguments emphasized by this Mayan activist and scholar was on the need to recognize “el saber

experto que niega al indígena e impone interpretaciones” [the expert knowledge that denies the existence of the Indigenous individual and imposes interpretations], also mirroring what has been discussed by Walter Mignolo on decolonial thought (2011). What the complications of the Suruí project warns us against is of an idealized Indigenous relationship with nature – which brings back the question of how to read those attempts without deprecating the possible development of further partnerships and relations that would indeed foster *participatory collaboration* to protect nature. If such collaborative partnerships are possible, tested, negotiated, criticized and redone again, with less impositions of power and vigilance and more of real dialogue and empowerment, more important results previously discussed could be set: leading to improvement in quality of life and more balanced benefits. All these variables that need to be problematized not only from an environmental perspective, but with humanistic lenses. It leaves us questioning how does institutional support, either from the CIMI, from Google, or from Forest Trends, shift the balance inside the communities, of subgroups expressing diverging opinions. It would be fair to say that such support fortifies internal community oppositions, forcing its members to take sides on decisions that need to be taken as a whole about the financial resources and their own collective goods.

Conclusion: New Takes on Indigenous Autonomy, and Natural Preservation

This experience with the Fifty-Year Plan and the challenges faced by the Suruí Forest Carbon Project in implementing projects from within the community make us rethink the appropriation of Indigenous roles within this project of decolonization. Brazil has a long history of complex relations with Indigenous rights, including long-due discussions on identity, land recognition and demarcation. The concern with environmental issues brings in a different layer of political interests to the scene. Multiple Indigenous groups are still fighting for recognition from the federal government and FUNAI and for compensation for their territories in contemporary Brazil, largely against agribusiness interests that still dominate local politics, especially in states dependent on cattle, soy, and timber extraction. There is very little dialogue on the acceptance of their forms of knowledge by mainstream society, and, as I attempted to highlight, this relation to nature is being pressured to be commercialized and quantified in a Western-style system.

The Suruí pact with Google Earth is a good example of this strategy of paradoxical post-modernity: the traditional local values and culture of the Indigenous society can be *represented* through new technology, and it is through those machines that the groups can be *observed* and *appropriated* as non-threatening to a global audience. For the Suruí, their involvement with Google Earth and the

United Nations Framework Convention on Climate Change through REDD+ is the incarnation of the traditional stereotype of the nature-protecting Indigenous people, here making reference to Ramos's concept of *hyperreal Indian*, idealized in their relation to nature: "never surrender to greed over your lands, never succumb to the bribes of the powerful, never capitulate to corruption, always denounce injustice. The more stoic and resistant to temptation, the more deserving he will be of white solidarity" (10). This image of an idealized, green, non-capitalist Indigenous attempts to hide more complex discussions about the appropriation of the Indigenous category in a larger scheme of environmental economics. These populations are also selling timber to buy their own commodities. Our precarious understanding of the intersection of economy and ecology needs further discussion to also include the perspective(s) of the Indigenous communities, the real impact of capitalist transactions and the new conceptions of the green industry in the structures and organizations of those villages negotiating these green partnerships. Based on a Western belief in mixing nature preservation and assets, the Suruí project is based on a scientific planning created from within the developed world, a mingling of green post-modern concerns with global warming and other natural resources, and post-industrial progress. Mignolo describes the epistemological system that transformed "nature" into "natural resources" during the period of the Industrial Revolution, "legitimizing its uses" (13). Consequently, more complete examination of the association between ecology, economy and also Indigenous knowledge about nature is necessary, so that the rhetoric of "environmental markets" is questioned and that we dismantle this appropriation of the Indigenous communities as a minor part in these new economic and power structures.

Notes

¹ I would like to thank the blind reviewers for the thorough suggestions on the improvement of the article, including the reference to Fairhead et al. (2012) and to the UNFCCC (“Key Decisions” 2012).

² Paiter is a self-denomination by the group meaning “gente de verdade, nós mesmos” [real people, we as ourselves] (“Surui Paiter: Nome e língua”). The plural form of “paiter” is “paiterei”, but often called “paiter” (“Surui Paiter: População”). The population quickly diminished after the contact in 1969 and is nowadays comprised of 1675 (“Quantitativo” n. pag.).

³ The local, non-Indigenous, communities are also the undiscussed party in this agreement about land use. As non-Indigenous they do not receive protection by FUNAI, but certainly are caught in-between these forces deciding what can or cannot be done with the forest.

⁴ The documentary *Eternal Amazon* (2012), by Belisário Franca, focuses on projects created within the Amazon that develop sustainable relationships with nature. According to the director, longer projects (with five or more years) were selected to represent these new partnerships of sustainable use of natural resources that are being created with the people that inhabit that territory, including, but not limited to, Indigenous groups, riverbed populations, among others. One project taking place in the Reserva Extrativista Tapajós-Arapiuns is later discussed, specifically of saving and reusing discarded wood for handicraft (“Nova forma” n.pag.). Little has been written or researched on the perceptions of the Indigenous populations of these projects.

⁵ From 752 million families in 2015, 2,251 families were working directly with Natura as suppliers of natural goods (“Nosso modelo”).

⁶ Anthropologist Eduardo Viveiros de Castro theorization of “multinaturalism” can potentially push this idea a lot further, by arguing the idea of the coexistence of several natures under the cosmovision of Amazon peoples (226). As he argues, for the Amerindian the spirit is similar in different natural forms (human, animal or plants), but the body takes different shapes.

⁷ The permanent land recognition of this specific reserve happened in 1983, with FUNAI’s *Portaria* [decision] number 1561. The official contact of the Paiter Suruí led by FUNAI happened in 1969, and the first demarcation in 1976 (“Surui Paiter: histórico”).

⁸ It is still unclear whether carbon credits will yield positive impact in terms of climate change, some critics argue (McGrath 2015, np). In Russia and Ukraine, for example, some projects compensated did not motivate new enterprises for protecting the environment, but rather financially compensated projects that already were removing certain chemicals from the atmosphere for carbon credits. The issue questioned was whether projects would increase additionality that was discussed for the New Global Agreement on Climate Change (in Paris).

⁹ As could be expected, CIMI has also been under fire about its interference in Indigenous issues in the country. Just recently a Parliamentary Commission of Investigation (CPI) has been created to investigate the interference of the CIMI on Indigenous deals in Mato Grosso do Sul, dealing particularly with land invasions (“Nota sobre a CPI do Cimi” n. pag.). How certain institutions contribute and negotiate their influence on local governments is also a frequent point of contention. However, these concern of influence over Indigenous peoples also reflect political concern over land. The same CPI above has also been investigated over concerns of political influence when the land conflict in the region has caused horrible numbers of death and violence among the Indigenous populations with paramilitary attacks (“Nota sobre a CPI da Cimi” n. pag.).

¹⁰ Take Mexico City as an example: because of their high levels of pollution, the atmospheric air reaches levels in which cars have to be restricted and regular activities within the city have to be modified due to ozone levels above acceptable limits, including closing schools and public services (Associated Press n. pag.). In economic terms, such a sale of Carbon Credits is an abstraction, attempting to compensate for the polluted air elsewhere, but which fails to address the real problem of the population living in megalopoli that do not benefit from the fresh air. This is what Fairhead, Leach and Scoones refer to as the concept of equivalence: that “a ton of carbon anywhere is somehow the same” (245).

Works Cited

- Abramovay, Ricardo. *Beyond the Green Economy*. New York: Taylor and Francis, 2015. Accessed 1 Jan. 2016 <<http://www.myilibrary.com.ezproxy1.library.arizona.edu?ID=828565>>. Web.
- Agrawal, Arun. *Environmentality: technologies of government and the making of subjects*. Durham, NC: Duke University Press, 2005. Print.
- “AGU denuncia venda ilegal de créditos de carbono em área indígena.” Carta de Belém. 29 Jul 2013. N. pag. <http://www.cartadebelem.org.br/site/agu-denuncia-venda-ilegal-de-creditos-de-carbono-em-area-indigena/>. Accessed 30 May 2015. Web.
- “Amazonian People First to Earn Carbon Credits after Proving They Saved Endangered Rainforest.” *Business Wire*. 31 May 2013. N. pag. Accessed 30 May 2015. <http://www.businesswire.com/news/home/20130531005688/en/Amazonian-People-Earn-Carbon-Credits-Proving-Saved#.VU7LmxYSzT0>. Web.
- Aranha, Ana, Carlos Arthur França, Jessica Mota, and Natalia Viana. “A terra é dos índios. E o carbono, é de quem?” *Pública: Agência de Reportagem e Jornalismo Investigativo*. 9 Mar. 2012. N. pag. <http://apublica.org/2012/03/terra-e-dos-indios-carbono-e-de-quem/>. Accessed 1 Dec. 2016. Web.
- Ascom. “Lideranças, MPF e governo estadual discutem melhorias para indígenas de Rondônia.” *Ministério Público Federal: Procuradoria da República em Rondônia*. 19 Mar 2015. Accessed 30 May 2015. <http://www.prro.mpf.mp.br/noticias/ultimas-noticias/liderancas-mpf-e-governo-estadual-discutem-melhorias-para-indigenas-de-rondonia>. Web.
- Associated Press. “Mexico City Emits New Pollution Alert for High Ozone Levels.” *USA Today*. 14 May 2016. N. pag. <http://www.usatoday.com/story/news/world/2016/05/14/mexico-city-new-pollution-alert/84400572/>. Web.
- Baglo, Cathrine. “Rethinking Sami Agency during Living Exhibitions: From the Age of Empire to the Postwar World.” *Performing Indigeneity: Global Histories and Contemporary Experiences*. Lincoln: University of Nebraska, 2014. 136-168. Print.
- Barcellos, Luiza. “A institucionalidade dos fundos indígenas Kayapó e Paiteer Suruí: modelos de fundos socioambientais para REDD+ em âmbito local.” M.A. Dissertation. Instituto de Ciências Humanas e Sociais. UFRRJ. 2015. Print.
- BBC Brasil. “Para índios Suruí, internet permite luta ambiental e paquera online.” *Estadão*. 17 Mar 2010. Accessed 30 May 2015. <http://sustentabilidade.estadao.com.br/noticias/geral,para-indios-surui-internet-permite-luta-ambiental-e-paquera-online,525608>. Web.
- Bishop, Joshua, and Chloe Hill. *Global Diversity Finance: The Case for International Payments for Ecosystem Services*. Northampton, MA: Edward Elgar Publishing, Inc. Print.
- Bonilha, Patricia. “Lideranças Suruí afirmam ao presidente da Funai que não querem mais o projeto de carbono em suas terras.” Conselho Indigenista Missionário (CIMI). 24 Mar 2015. Accessed 30 May 2015. http://www.cimi.org.br/site/ptbr/?system=news&conteudo_id=7992&action=read. Web.
- Borges, Beto. “The Surui Carbon Project.” *Children of the Amazon*. 3 May 2010. N. pag. Accessed 30 May 2015. <http://www.childrenoftheamazon.com/surui/the-surui-carbon-project/>. Web.
- “Carbono Suruí.” *Aquaverde*. N. pag. Accessed 30 May 2015. <http://www.aquaverde.org/11348/?lang=pt-br>. Web.

- CIMI Nacional (ciminacional). “Lideranças Suruí afirmam à Funai que não querem mais o projeto de carbono em suas terras.” <https://twitter.com/ciminacional/status/570596419280748544>. 25 Feb 2015, 6:49 pm. Tweet.
- “Como funciona o Bolsa Floresta.” Fundação Amazonas Sustentável. Manaus: Fundação Amazonas Sustentável, n.d. <http://fas-amazonas.org/pbf/> 29 Sept. 2016. Web.
- Consentimento Livre, Prévio e Informado Projeto Suruí Carbono*. Equipe da Conservação da Amazônia. Brasília: Forest Trends, ACT Brasil Edições, Metareilá Association, 2010. 1-40. Print.
- “Créditos de Carbono da Tribo Pater Suruí podem gerar até R\$ 4 milhões por ano.” *Instituto Brasileiro de Florestas*. N.d. N. pag. Accessed 30 May 2015. <http://www.ibflorestas.org.br/noticias/872creditos-de-carbono-da-tribo-pater-suru-podem-gerar-ate-r-4-milhoes-por-ano.html>. Web.
- “Desmatamento na Amazônia in 2016: prenúncio de um retrocesso?” Instituto de Pesquisa Ambiental da Amazônia. 1 Dec. 2016. <http://ipam.org.br/desmatamento-na-amazonia-brasileira-em2016-prenuncio-de-um-retrocesso/>. Accessed 1 Dec. 2016. Web.
- Dióz, René. “Governadores de MT e 8 estados da Amazônia assinam ‘Carta de Cuiabá’”. G1 Mato Grosso. 29 May 2015. <http://g1.globo.com/mato-grosso/noticia/2015/05/governadores-de-mt-e-8-estados-da-amazonia-assinam-carta-de-cuiaba.html>. Accessed 1 Dec. 2016. Web.
- Dourojeanni, Marc. “Análise Crítica dos Planos de Manejo de Áreas Protegidas no Brasil.” *Áreas Protegidas: Conservação no Âmbito do Cone Sul*. Pelotas: Ed. A. Bager, 2003. 1-20.
- Eternal Amazon*. Dir. Belisário Franca. Pragma, 2012. DVD.
- Fairhead, James, Melissa Leach, and Ian Scoones. “Green Grabbing: A New Appropriation of Nature?” *The Journal of Peasant Studies* 39.2 (2012): 237-261. Web. 1 June 2017.
- Fearnside, Philip. “Spatial Concentration of Deforestation in the Brazilian Amazon.” *Ambio* (1986) 15.2: 72–79.
- . *A Ocupação Humana de Rondônia: Impactos, Limites e Planejamento*. Conselho Nacional de Desenvolvimento Científico e Tecnológico (CNPq), Brasília, 1989.
- Ferronato, Marcelo, and Reginaldo Nunes. “A Exploração Ilegal de Madeiras na Terra Indígena Sete de Setembro, Cacoal.” *Revista Facimed* 3.3 (2011): 1-12. Print.
- Filha, Irene Garrido. “Manejo florestal: questões econômico-financeiras e ambientais.” *Estudos avançados* 16(45): 2002. 91-106. Print.
- Foucault, Michel. *Discipline and Punish: The Birth of the Prison*. New York: Vintage Books, 1979. Print.
- FUNAI. *Povos Indígenas e REDD+ no Brasil: Considerações Finais e Recomendações*. Brasília: Gestão Ambiental e Territorial de Terras Indígenas (Funai), 2010. 1-7.
- FUNBIO. *Suruí Forest Carbon Project*. Rio de Janeiro: Fundo Brasileiro para a Diversidade, 2011. pp. 1 15. <http://redddatabase.iges.or.jp/redd/download/project;jsessionid=B42DAB7455899C9A55141CF4DC73C60D?id=89>. Accessed 1 Dec. 2016. Web.
- Garcia, Rafael. “Raízes Frágeis: Tudo sobre desmatamento zero.” *Folha de São Paulo*. n. pag. 16 Sept. 2015. <http://arte.folha.uol.com.br/tudo-sobre/desmatamento-zero/raizes-frageis/> Accessed 1 Dec. 2016. Web.
- Gebara, Maria Fernanda, Luiza Muccillo, Peter May, Claudia Vitel, Lasse Loft, and Angelo Santos. “Lessons from local environmental funds for REDD+ benefit sharing with indigenous people in Brazil” *CIFOR*. 26 (Nov. 2014): 1-8. PDF.
- Ginsburg, Faye. “Introduction.” *Global Indigenous Media: Cultures, Poetics, and Politics*. Duke University Press, 2008. Print.
- . “Screen Memories: Resignifying the Traditional in Indigenous Media.” *Media Worlds: Anthropology on New Terrain*. Ewing, NJ: University of California Press, 2002. 39-57. Print.
- “G1 Após protestos de indígenas, projeto de carbono florestal é suspenso.” *G1 Santarém*. Globo.com

- 14 Aug. 2015. <http://g1.globo.com/pa/santarem-regiao/noticia/2015/08/apos-protestos-de-indigenas-projeto-de-carbono-florestal-e-suspenso.html> Accessed 20 Sept. 2016. Web.
- Google Earth. Location of the Paiter Suruí. JPEG.
- Graham, Laura. "Genders of Xavante Ethnographic Spectacle: Cultural Politics of Inclusion and Exclusion in Brazil." *Performing Indigeneity: Global Histories and Contemporary Experiences*. Eds. Laura Graham and H. Glenn Penny. Lincoln: University of Nebraska Press, 2014. Print.
- Guissé, El Hadji. *Globalization and Indigenous Peoples*. United Nations Economic and Social Council, Commission on Human Rights, Working Group on Indigenous Populations. U.N. Document E/CN.4/Sub.2/AC.4/2004/3. June 10. New York: United Nations, 2004. Print.
- Heck, Hego. "Os Suruí e o projeto carbono: para que o mundo saiba." Conselho Indigeni Missionário (CIMI). 24 Feb 2015. 30 May 2015. http://cimi.org.br/site/pt-br/?system=news&conteudo_id=7991&action=read. Web.
- INPE (Instituto Nacional de Pesquisas Espaciais). Projeto PRODES, Brazilian Amazon Forest Monitoring. INPE, São José dos Campos, SP, Brazil, 2013. N. pag. Accessed 1 June 2017. Web. <<http://www.obt.inpe.br/prodes/index.php>>.
- "Nova forma de assistência técnica e extensão rural muda a vida de comunidades na Amazônia." Instituto de Pesquisa Ambiental da Amazônia (IPAM.ORG.BR). 04/12/2015. N. pag. <http://ipam.org.br/nova-forma-de-assistencia-tecnica-e-extensao-rural-muda-a-vida-de-comunidades-na-amazonia/>
- Kaplan, Caren. "A world without boundaries: the Body's Shop's trans/national geographies." *Social Text* 43 (1995): 45-66. Print.
- Kepka, Mike. *Amazon Chief Almir Suruí*. 15 Oct. 2009. *San Francisco Gate*. 18 Oct. 2009. Print.
- Lang, Chris. "No REDD+ in Rio+20 – A Declaration to Decolonize the Earth and the Sky, Global Alliance of Indigenous Peoples and Local Communities on Climate Change against REDD and for Life." *REDD Monitor*. 19 Jun 2012. N. pag. Accessed 30 May 2015. <http://www.reddmonitor.org/2012/06/19/no-redd-in-rio-20-a-declaration-to-decolonize-the-earth-and-the-sky/>. Web.
- Lewis, M. Paul, Gary F. Simons, and Charles D. Fennig (eds.). *Ethnologue: Languages of the World, Eighteenth edition*. Dallas, Texas: SIL International, 2015. N. pag. Accessed 30 May 2015. <http://www.ethnologue.com>. Web.
- Luke, Timothy. *Ecocritique: contesting the politics of nature, economy and culture*. Minneapolis: University of Minnesota Press, 1997. Print.
- Maisonave, Fabiano. "Mato de valor: tudo sobre desmatamento zero." *Folha de São Paulo*. 16 Sept. 2015. n.pag. <http://arte.folha.uol.com.br/tudo-sobre/desmatamento-zero/mato-de-valor/>. Web. Accessed 1 Dec. 2016.
- McGrath, Matt. "Carbon Credits Undercut Climate Change Actions Says Report." *BBC News*. 25 Aug. 2015. Web. <http://www.bbc.com/news/science-environment-34042115> "Metareilá Association/Suruí Forest." *CodeRedd*. N.d. Accessed 30 May 2015. <http://www.coderedd.org/redd-project/metareila-association-suru-i-forest/#.VpqHMs4UdQc>. Accessed 1 Dec. 2016. Web.
- Mignolo, Walter. *The Darker Side of Western Modernity: Global Futures, Decolonial Options*. Durham, NC: Duke University Press, 2011. Print.
- Ministério do Meio Ambiente (MMA). *ENREDD+: Estratégia Nacional para REDD+*. Brasília, 2016. Accessed June 1, 2017. Web. http://redd.mma.gov.br/images/publicacoes/enredd_documento_web.pdf
- Moore, Rebecca, and Almir Suruí. "High Technology to Preserve Old Traditions." *TEDex Belo Horizonte*. 14 Aug 2012. Accessed 30 May 2015.

- <https://www.youtube.com/watch?v=xmlekZ--OWE&list=PLAF8E219F6CD4C54A>. Web. Navarro, Santiago, and Renata Bessi. "Green Neocolonialism, Afro-Brazilian Rebellion in Brazil." *Truthout*. 28 Dec 2014. N. pag. Accessed 30 May 2015. <http://www.truthout.org/news/item/28232-green-neocolonialism-afro-brazilian-rebellion-in-brazil>. Web.
- "Nosso modelo." *Relatório Anual 2015*. Nd. <http://www.natura.com.br/relatorio-anual/2015/quem-somos/nosso-modelo-de-negocios>. Accessed 1 Dec. 2016. Web.
- "Nota de esclarecimento: Lideranças Paiter Suruí pedem extinção de projeto de carbono com a Natura." *Conselho Indígena Missionário*. 12 Jan 2015. n. pag. Accessed 30 May 2015. http://cimi.org.br/site/pt-br/?system=news&conteudo_id=7948&action=read. Web.
- "Nota sobre a 'CPI da Cimi' no Mato Grosso do Sul." CIMI. 21 September 2015. <http://www.cimi.org.br/site/pt-br/?system=news&action=read&id=8354> 29 Sept. 2016. Web.
- Pimenta, José. "Desenvolvimento sustentável e povos indígenas: os paradoxos de um exemplo amazônico." *Anuário Antropológico 2002-2003*. Rio de Janeiro: Templo Brasileiro, 2004: 115-150. http://www.dan.unb.br/images/pdf/anuario_antropologico/Separatas%202002-2003/2002-2003_josepimenta.pdf. Web.
- "Para que projetos que destroem a vida?" *Porantim: Em defesa da causa indígena* 368 (Sept. 2014). Brasília, DF. 8-9. Print.
- "Ponto de Cultura Maloca Digital." Cacoal, Rondônia. 28 Jul 2010. Accessed 1 Nov. 2011. Web. PRODES. "Monitoramento da Amazônia Brasileira por Satélite." Instituto Nacional de Pesquisas Espaciais. Nd. n. pag. <http://www.obt.inpe.br/prodes/index.php>. Accessed 1 June 2017. Web.
- "Projeto Carbono Florestal Suruí está disponível para consulta pública." *Ponto de Cultura Maloca Digital*. 12 Nov 2011. N. pag. Accessed 30 May 2015. <http://pcmalocadigital.blogspot.com/2011/11/projeto-carbono-florestal-surui-esta.html>. Web.
- "Quantitativo populacional dos indígenas cadastrados no SIASI em 2013 por diversos parâmetros de territorialidade indígena ou nacional." Secretaria Especial de Saúde Indígena (SESAI). Ministério da Saúde, 2013. Web. Accessed 1 Jun 2017. http://dw.saude.gov.br/gsid/servlet/mstrWeb;jsessionid=A19953677BA7253AD1D671153DBB95C8?src=mstrWeb.2048001&evt=2048001&share=1&hiddensections=header%2Cpath%2CdockLeft%2Cfooter&visMode=0¤tViewMedia=2&documentID=0FC0A96611E34C7BBAB90080EFE5381A&Server=SRVBIPDF03&Port=0&Project=DMSIASI_4&
- Ramos, Alcida Rita. *The Hyperreal Indian*. Brasília: Série Antropóloga, 1992. Print.
- "Resex Tapajós-Arapiuns." *Unidades de conservação no Brasil*. Instituto Socioambiental, nd. <http://uc.socioambiental.org/uc/6577>. N. pag. Accessed 1 Dec. 2016. Web.
- Salazar, Juan Francisco, and Amalia Córdova. "Imperfect Media: The Poetics of Indigenous Video in Latin America." *Global Indigenous Media: Cultures, Poetics, and Politics*. Eds. Michelle Stewart and Pamela Wilson. Duke University Press, 2008. 39-57. Print.
- Saldaña-Portillo, María Josefina. *The Revolutionary Imagination in the Americas and the Age of Development*. Durham, NC: Duke UP, 2003. Print.
- Soares Filho, Britaldo, et. al. "Cenários de desmatamento para a Amazônia." *Estudos Avançados* 19 (54): 2005. 137-152. Print.
- Suruí, Chico. Personal Communication (*Skype*). 24 Mar 2011.
- Suruí, Chicoepab. "Reflorestamento da Terra Indígena Sete de Setembro: Uma mudança da percepção e da conduta do Povo Paiter Surui de Rondônia?" M.A. Thesis. UNB Universidade Nacional de Brasília. Brasília, 2013. Print.

- “Surui Paiter: Histórico do contato.” *Povos Indígenas no Brasil*. Socioambiental. N.d. Accessed 30 May 2015. <http://pib.socioambiental.org/pt/povo/surui-paiter/846>. Web.
- “Surui Paiter: Nome e língua.” *Povos Indígenas no Brasil*. Socioambiental. N.d. Accessed 30 May 2015. <http://pib.socioambiental.org/pt/povo/surui-paiter/843>. Web.
- “Surui Paiter: População.” *Povos Indígenas no Brasil*. Socioambiental. N.d. Accessed 30 May 2015. <https://pib.socioambiental.org/pt/povo/surui-paiter/845>. Web.
- Taylor, Diana. *The Archive and the Repertoire: Performing Cultural Memory in the Americas*. Durham: Duke UP, 2003. Print.
- “The Worst REDD-Type Projects in Africa: Continent Grag for Carbon Colonialism.” *No REDD in Africa Network*. N.d. N. pag. Accessed 30 May 2015. <http://www.no-redd-africa.org/index.php/16-redd-players/84-the-worst-redd-type-projects-in-africa-continent-grab-for-carbon-colonialism>. Web.
- Turner, Terence. “Visual Media, Cultural Politics and Anthropological Practice: Some Implications of Recent Uses of Film and Video among the Kayapó of Brazil.” *Commission on Visual Anthropology Review* (Spring 1990): 8-13. Print.
- “Trading Bows and Arrows for Laptops: Carbon & Culture.” *Earth Outreach*. 14 June 2012. Accessed 30 May 2015. <https://www.youtube.com/watch?v=XFIeYbNl6Y>. Youtube.
- Tzul Tzul, Gladys, and Boaventura de Sousa Santos. “Exclusiones Epistémicas, Emergencias y Emancipaciones en América Latina.” XXXIII International Conference of the Latin American Studies Association. Caribe Hilton. San Juan, Puerto Rico. 28 Mar 2015. Presidential Session.
- United Nations Framework Convention on Climate Change (UNFCCC). *Key decisions relevant for reducing emissions from deforestation and forest degradation in developing countries (REDD+)*. Bonn, Germany: UNFCCC Secretariat, February 2016. 1-41.
- United Nations Framework Convention on Climate Change* (UNFCCC). Bonn, Germany: United Nations, 2012.
- United Nations Framework Convention on Climate Change* (UNFCCC). Geneva, Switzerland: United Nations, 1992.
- Valle, Raul Silva Telles do. “O caso do carbono indígena e as lições aprendidas.” Instituto Socioambiental. Boa Vista, 22 Mar. 2012. N.pag. <https://www.socioambiental.org/pt-br/blog/blog-do-isa/o-caso-do-carbono-indigena-e-as-licoes-aprendidas>. Accessed 20 May 2015. Web.
- Virilio, Paul. *The Vision Machine*. London: British Film Institute, 1994. Print.
- Vitel, Claudia; Gabriel Carrero; Mariano Cenamo; Maya Leory; Paulo Graça, and Philip Fearnside. “Land-use Change Modeling in a Brazilian Indigenous Reserve: Construction of a Reference Scenario for the Suruí REDD Project.” *Hum Ecol* (2013) 41: 807. Accessed 1 June 2017. Web. <https://link.springer.com/article/10.1007/s10745-013-9613-9>
- Viveiros de Castro, Eduardo. “Perspectivismo e multinaturalismo na América indígena.” *O que nos faz pensar* (2014) 14.18: 225-254.
- Yaik, Lim. “Green Colonialism.” *NYT*. 6 Oct 2009. Accessed 30 May 2015. http://www.nytimes.com/2009/10/07/opinion/07iht-edyaik.html?_r=0. Web.
- Zwick, Steve. “Paiter-Surui Take Stock of Community Fund Charged with Managing Finances.” *Ecosystem Marketplace*. 17 Jan 2015. N. pag. Accessed 30 May 2015. http://www.ecosystemmarketplace.com/pages/dynamic/article.page.php?page_id=10754§ion=news_articles&cod=1. Web.

