Fordham Environmental Law Review

Volume 20, Number 3

2017

Article 3

The Sound of Falling Trees: Integrating
Environmental Justice Principles into the
Climate Change Framework for Reducing
Emissions from Deforestation and
Degradation (REDD)

Melissa Farris*

^{*}University of Hawaii at Manoa, William S. Richardson School of Law

NOTES

THE SOUND OF FALLING TREES: INTEGRATING ENVIRONMENTAL JUSTICE PRINCIPLES INTO THE CLIMATE CHANGE FRAMEWORK FOR REDUCING EMISSIONS FROM DEFORESTATION AND DEGRADATION (REDD)

Melissa Farris*

I. Introduction

Planting trees in Mount Elgon National Park in eastern Uganda seemed like a project that would benefit everyone. The Face Foundation, a nonprofit group established by Dutch power companies, would receive carbon credits for reforesting the park's perimeter. It would then sell the credits to airline passengers wanting to offset their emissions, reinvesting the revenues in further tree planting. The air would be cleaner, travelers would feel less guilty and Ugandans would get a larger park.

But to the farmers who once lived just inside the park, the project has been anything but a boon. They have been fighting to get their land back since being evicted in the early 1990s....

^{*} Melissa Farris is a juris doctorate candidate, Class of 2010, at the University of Hawai'i at Mānoa, William S. Richardson School of Law. Ms. Farris would like to thank all those who provided aid and support throughout the researching and writing process, especially Professor Denise Antolini, Dr. Leslie Sponsel, Stephan Faris, Chris Lang, Zachary McNish, and her family.

[In 2006], when the courts granted three border communities an injunction against the evictions, the farmers took it as permission to clear the land they consider theirs. Now a stubble of stumps—all that's left of the trees meant to absorb carbon dioxide—dots the rows of newly planted maize and budding green beans.

This thought-provoking narrative, written in 2007 by *Fortune* journalist Stephan Faris, chronicles the struggle faced by several indigenous communities in Uganda after a well-intentioned climate change project displaced them from the lands upon which they depend.²

As emphasized in the article, the struggle in Uganda's Mount Elgon National Park is more than a decade old.³ In the early 1990s, indigenous farming communities living near the park's borders were evicted to make room for reforestation projects.⁴ The projects emerged from a growing trade in voluntary carbon offsets, in which climate-conscious consumers pay to offset their everyday carbon emissions.⁵ Ezera Wandeka, a local farmer, remembers the day forest rangers "came in broad daylight and started firing," setting fire to his home and evicting him and others from their land.⁷ As Faris notes, "Wandeka, who keeps his land title and other documents in a charred pink folder that he rescued from the fire, went from being one of the community's richest members, a parish chief and owner of 26 cows, to one of its poorest."

In the name of climate change mitigation, the Face Foundation began planting trees in the cleared lands in 1994 to offset greenhouse gas emissions from the Dutch Electricity Generating Board.⁹ In

^{1.} Stephan Faris, Planting Trees in Uganda: *The Other Side of Carbon Trading*, Fortune, Aug. 30, 2007, http://money.cnn.com/2007/08/27/news/international/uganda_carbon_trading.fortune/.

^{2.} See id.

^{3.} See id.

^{4.} See id.

^{5.} Id.

^{6.} Id.

^{7.} *Id*.

^{8.} *Id*.

^{9.} Id.

2002, the Foundation began selling carbon credits. ¹⁰ Meanwhile, the evicted communities taxingly pursued legal remedies to regain title of their historical lands. ¹¹ Finally in 2006, Ugandan courts issued injunctions against further evictions to three border communities. ¹² Armed with a decision they believed to confirm their rights to the land, the border communities chopped down more than half-a-million of the trees planted by the Face Foundation, clearing the land for their own use. ¹³ This time they planted their own crops and trees, but without compensation from carbon credits and in the midst of violent conflict with the paramilitary Ugandan Wildlife Authority. ¹⁴

The Ugandan farmers' story provides a disturbing glimpse at the environmental justice realities inherent in even well-intentioned attempts to tackle global climate change. As the world's policymakers prepare for the Fifteenth Conference of the Parties (COP-15) to the United Nations Framework Convention on Climate Change (UNFCCC) scheduled for December 2009 in Copenhagen, Denmark, 15 the Uganda story serves as a cautionary tale for policymakers tackling the next generation of climate change and forestry issues. Scientists now report that deforestation contributes to one-fifth of global greenhouse gas emissions. 16 Consequently, strategies for avoiding deforestation are increasingly making their way onto the discussion agendas of international climate change talks. 17

^{10.} Id.

^{11.} See id.

^{12.} See id.

^{13.} See id.

^{14.} See id.

^{15.} See U.N. Framework Convention on Climate Change, http://unfccc.int/ (last visited Apr. 26, 2009) (website featuring announcements and information regarding COP-15 in Copenhagen 2009); see also U.N. Framework Convention on Climate Change, COP-15 Quick Information, http://unfccc.int/meetings/items/4749.php (last visited Apr. 26, 2009) [hereinafter COP-15 Quick Information] (providing detailed Conference announcements and information).

^{16.} See U.N. FRAMEWORK CONVENTION ON CLIMATE CHANGE, FACT SHEET - REDUCING EMISSIONS FROM DEFORESTATION IN DEVELOPING COUNTRIES: APPROACHES TO STIMULATE ACTION 1 (2009), available at http://unfccc.int/files/press/backgrounders/application/pdf/fact_sheet_reducing_emissions_from_deforestation.pdf [hereinafter FACT SHEET].

^{17.} See, e.g., U.N. Framework Convention on Climate Change, REDD Web Platform, http://unfccc.int/methods_science/redd/items/4531.php (last visited Apr.

This paper analyzes the principles of environmental justice not only as they apply to inequalities regarding the impacts of climate change on vulnerable communities, but also as they extend to the environmental injustices that arise from policymakers' responses to climate change. Following this introduction in Part I, Part II provides brief background information on the recent developments in international climate change policy and discusses the emergence of deforestation as a central issue in post-2012 negotiations on the The section focuses on the trend toward "Reducing Emissions from Deforestation and Forest Degradation in Developing Countries," now known as "REDD" negotiations. The section then overviews the principles of environmental justice and explains how they have been applied at the international level. Part III identifies and analyzes environmental justice principles that should be integrated into a future REDD agreement. Part IV compares a carbon-trading approach for REDD with a non-carbon-trading approach and analyzes each approach's environmental justice implications for indigenous peoples.

As the emphasis shifts from projects that plant more trees to developing solutions for avoiding deforestation, the integration of environmental justice principles in a future REDD agreement might be the determining factor in whether the cautionary tale of the Ugandan farmers will be a lesson learned or foreshadow things to come.

II. BACKGROUND: CLIMATE CHANGE, DEFORESTATION, AND ENVIRONMENTAL JUSTICE

The challenges of developing the future legal framework for climate change is a reflection of the recent developments in law and policy, the emergence of new focal points in discussions, and the growing concern for the implications of climate change responses for vulnerable communities. This section reviews recent climate change developments, identifies deforestation as an issue of increased focus, and lays the foundation for applying established environmental justice principles in the REDD context.

^{26, 2009) (}highlighting the historical context of REDD and its recent developments).

A. From Bali to Copenhagen: A Review of Recent Climate Change Developments

A growing consensus has emerged regarding the science of climate change and its impact on the earth's natural ecosystems. In recent years, the issue has transformed from an uncertain theory to a scientifically backed global challenge. In 2007, the United Nation's Intergovernmental Panel of Climate Change (IPCC) asserted in its Fourth Assessment Report that the "warming of the climate system is unequivocal."18 Moreover, "[o]bservational evidence from all continents and most oceans shows that many natural systems are being affected by regional climate changes, particularly temperature increases." Warming of the climate system has been scientifically linked to a wide range of ecological disruptions, including sea level rise, increased flooding, prolonged droughts, and disturbances of terrestrial and aquatic ecosystems.²⁰ Studies also reveal that vulnerable communities, such as indigenous peoples, have been disproportionally impacted by these "unequivocal" changes. ²¹

Equipped with the latest scientific reports, international environmental policymakers are shifting into full negotiating mode in anticipation of the COP-15, scheduled for December 2009 in Copenhagen, Denmark.²² In anticipation of upcoming talks, a review of recent developments lays a foundation for understanding the direction of the future climate change regime. In December 2007, the Thirteenth Conference of the Parties (COP-13) convened in Bali, Indonesia, and adopted a set of forward-looking decisions aimed at taking climate change mitigation and adaptation beyond the Kyoto Protocol.²³ Through its Bali Action Plan, COP-13 sought to "launch

^{18.} LENNY BERNSTEIN ET AL., INTERGOVERNMENTAL PANEL ON CLIMATE CHANGE, CLIMATE CHANGE 2007: SYNTHESIS REPORT 30, 72 (Abdelkader Allali et al. eds.2008), available at http://www.ipcc.ch/pdf/assessment-report/ar4/syr/ar4_syr.pdf.

^{19.} Id. at 31.

^{20.} See id. at 30-33, 52.

^{21.} INGRID BARNSLEY, U.N. UNIV. INST. OF ADVANCED STUDIES, REDUCING EMISSIONS FROM DEFORESTATION AND FOREST DEGRADATION IN DEVELOPING COUNTRIES (REDD): A GUIDE FOR INDIGENOUS PEOPLE 14 (2008), available at http://www.ias.unu.edu/resource_centre/REDDPocketGuide_web.pdf.

^{22.} COP-15 Quick Information, supra note 15.

^{23.} See U.N. Framework Convention on Climate Change, Bali, Indon., Dec. 3-15, 2007 Report of the Conference of the Parties on its Thirteenth Session:

a comprehensive process to enable . . . long-term cooperative action," for further addressing climate change, to be completed at COP-15 in 2009. More specifically, the Bali Action Plan called for establishing a comprehensive process for long-term cooperative action that enhances national and international mitigation and adaptation, facilitates the enhancement of technology development and transfer, and improves financial resources and investments. ²⁵

In addition to focusing climate change discussions on long-term cooperative action, COP-13 narrowed in on deforestation as an important climate change issue. In Decision 2 of COP-13, the Parties outlined approaches for stimulating action to "reduce emissions from deforestation and forest degradation in developing countries" (REDD) and affirmed an "urgent need" to take further action. Since Bali, REDD discussions among policymakers have intensified, and the issue has become a key component of climate change negotiations. ²⁷

Fueled by momentum from Bali, the Fourteenth Conference of the Parties (COP-14) met in Poznań, Poland, in December 2008, to offer commitments for launching into full negotiating mode in 2009. In March 2009, The Bonn Climate Change Talks, held in Bonn, Germany, followed up on the progress made in Poznań. The Bonn Talks gave important guidance on what a Copenhagen agreement

Addendum – Part Two: Action Taken By the Conference of the Parties at the Thirteenth Session (Mar. 14, 2008), available at http://unfccc.int/resource/docs/2007/cop13/eng/06a01.pdf.

^{24.} Id. at 3.

^{25.} Id. at 2-5.

^{26.} Id. at 8.

^{27.} See U.N. Framework Convention on Climate Change, The United Nations Climate Change Conference in Poznań, 1-12 December 2008, http://unfccc.int/meetings/cop_14/items/4481.php (website identifying REDD as an important ongoing issue for developing countries).

^{28.} Id.

^{29.} See U.N. Framework Convention on Climate Change, Bonn Climate Change Talks: March 2009, http://unfccc.int/meetings/intersessional/bonn_09/items/4753.php (last visited Nov. 17, 2009) [hereinafter Bonn Climate Change Talks] (website summarizing the Bonn Talks and providing links to key meeting documents). The Bonn Climate Change Talks consisted of the seventh session of the Ad Hoc Working Group on Further Commitments for Annex I Parties under the Kyoto Protocol (AWG-KP) and fifth session of the Ad Hoc Working Group on Long-term Cooperative Action under the Convention (AWG-LCA). Id.

must contain, and featured the first round of discussions on the prospective legal form of a Copenhagen agreement. 30 Technology transfer and finance remained central components of the discussions, as developing countries asserted their desire to implement nationally appropriate mitigation actions provided they receive the promised technological and financial support from industrialized countries.³¹ The Bonn Talks also marked the return of the United States to the negotiating table, under the newly elected Obama Administration.³² The United States' opening statement was received with applause, lifting expectations for a Copenhagen agreement that could succeed in areas where the Kyoto Protocol had floundered.³³ The negotiating texts for Copenhagen are scheduled to be available in June 2009 at the next session of climate change talks in Bonn.³⁴ The culmination of these recent developments in climate change policy, coupled with the presence of the United States and the lessons learned from Kyoto, set a new stage for tackling the latest climate change challenges in Copenhagen and beyond.

B. Deforestation Takes Center Stage

New scientific research and a more cooperative negotiating environment allow policymakers fresh opportunities to address the latest climate change dilemmas, including the emerging focus of deforestation.

1. The Growing Concern for the World's Forests

Recent studies have revealed that the world's forests are in danger and are contributing to climate change. In its report State of the

^{30.} Web Video: Bonn Climate Change Talks March/April 2009 - Closing Press Briefing (UNFCCC 2009), http://unfccc.int/meetings/intersessional/bonn_09/items/4753.php (featuring a video statement by UNFCCC Executive Secretary Yvo de Boer).

^{31.} Id.

^{32.} Id.

^{33.} Id. The lack of participation by the United States in the Kyoto Protocol has been extensively criticized and is viewed by many as a key reason for the Protocol's ineffectiveness. See, e.g., Lisa Schenck, Climate Change "Crisis": Struggling for Worldwide Collective Action, 19 Colo. J. INT'L ENVIL. L. & POL'Y 319, 328-31 (2008) (explaining the United States position and the "fundamental flaws" of the Kyoto Protocol).

^{34.} Bonn Climate Change Talks, supra note 29.

World's Forests 2007, the Food and Agriculture Organization of the United Nations (FAO) recognized that progress is being made in sustainable forest management, but it noted that the progress has been uneven. The Although net forest areas in Europe, Canada, and the United States are stable, Latin America, the Caribbean, and Africa are continuing to lose their forests at astounding rates. He Europe Between 1990 and 2005, Africa lost more than nine percent of its forest area. In Latin America and the Caribbean, the net loss of forests per year increased from 0.46 percent between 1990-2000, to 0.51 percent between 2000 and 2005. On a global scale, deforestation was estimated at "an alarming rate of 13 million hectares per year" between 1990-2005.

The causes and driving forces of deforestation are numerous and often vary from region to region. Frequently, forests are cleared for agricultural use, logging, road development, and human settlement. More cryptic underlying causes are also driving the destruction of forests, including international demand for timber, poor governance in forested regions, lack of national resources for forest management, uncertain or contested land rights, poverty, and a lack of institutional capacity among local communities and forest peoples to participate in forest management. Deforestation and uncontrolled forest fires are especially severe in countries plagued by war and civil conflict. ⁴³

In the climate change realm, forests have been recognized for their critical role in absorbing greenhouse gases, acting as "carbon sinks" by removing carbon molecules from the atmosphere through photosynthetic processes. 44 Recently, however, deforestation has also been targeted as a contributor to climate change. In 2007, the IPCC estimated that nearly twenty percent of global anthropogenic

^{35.} FOOD AND AGRIC. ORG. OF THE U.N., STATE OF THE WORLD'S FORESTS 2007, at viii (2007) available at ftp://ftp.fao.org/docrep/fao/009/a0773e/a0773e00.pdf.

^{36.} Net forest refers to the amount of area deforestation (negative value) plus the amount of new planting and natural expansion of existing forests. *Id.* at 64.

^{37.} Id. at ix.

^{38.} Id. at viii.

^{39.} Id. at viii-ix.

^{40.} FACT SHEET, supra note 16, at 1.

^{41.} BARNSLEY, supra note 21, at 10.

⁴² Id

^{43.} FOOD AND AGRIC. ORG. OF THE U.N., supra note 35, at viii.

^{44.} BARNSLEY, supra note 21, at 16.

carbon emissions result from the forestry sector, which includes deforestation.⁴⁵ Based on these studies, not only is the destruction of forests reducing important carbon sinks, deforestation is also contributing significantly to greenhouse gas emissions.

In addition, the latest scientific studies add yet another dimension to the deforestation dilemma. In April 2009, the International Union of Forest Research Organizations (IUFRO)46 released a report suggesting that, not only is deforestation now recognized as a contributor to climate change, but that the impacts of climate changes are in turn causing even more harm to the world's forests.⁴⁷ Increases in temperature, increases in the intensity of pests, prolonged droughts, and other climate-induced stresses contributing to a dangerous feedback loop that could lead to considerable forest destruction. 48 As the report points out, "[t]he carbon-regulating services of forests are at risk of being lost When carbon sinks are destroyed, the trees slowly release their stored carbon through decomposition or their use as fuel.⁵⁰ In addition, the tree-clearing process itself, usually through burning, generates substantial emissions.⁵¹ Not all forests are created equal: different forests store different quantities of carbon, and the amount depends on disturbances (e.g., pests, insects and fires), the

^{45.} BERNSTEIN ET AL., supra note 18 at 36.

^{46.} See generally INT'L UNION OF FOREST RESEARCH ORGS., WORLD SER. VOL. 22, ADAPTATION OF FORESTS AND PEOPLE TO CLIMATE CHANGE: A GLOBAL ASSESSMENT REPORT (Risto Seppälä et al. eds. 2009) available at http://www.iufro.org/download/file/3580/3985/Full_Report.pdf. [hereinafter ADAPTATION OF FORESTS]. The International Union of Forest Research Organizations (IUFRO) is a "non-profit, non-governmental international network of forest scientists, which promotes global cooperation in forest-related research and enhances the understanding of the ecological, economic and social aspects of forests and trees." International Union of Forest Research Organizations, http://www.iufro.org/iufro/ (last visited Apr. 26, 2009).

^{47.} Press Release, International Union of Forest Research Organizations (IUFRO), New Study Warns Damage to Forests from Climate Change Could Cost the Planet Its Major Keeper of Greenhouse Gases 1 (Apr. 17, 2009), available at http://www.iufro.org/download/file/3624/199/Press_release_-_English.pdf; See also ADAPTATION OF FORESTS, supra note 46 at 9.

^{48.} Press Release, supra note 47.

^{49.} ADAPTATION OF FORESTS, supra note 46 at 14.

^{50.} BARNSLEY, supra note 21, at 17.

^{51.} *Id*.

type, age and health of the plants, and the forest management practices. 52

The importance of the world's forests extends even further, as forests are well-known for being biodiversity hotspots and providing valuable ecological services (e.g., providing medicines, food, energy, and other forest products). In addition, Dr. Leslie Sponsel, ecological anthropologist at the University of Hawai'i, points out that forests are also cultural diversity hotspots. The world's forests are home to millions of human forest-dwellers. Globally, an estimated 1.2 billion people are dependent on agro-forestry, 350 million people are highly dependent on forests, and a staggering 60 million indigenous peoples are totally dependent on the forests for their livelihoods.

2. Previous Approaches to Deforestation and Climate Change

International concern for the world's forests emerged early in the development of international environmental law. In 1992, at the landmark United Nations Conference on Environment and Development (UNCED), commonly referred to as the Rio Earth Summit, the United Nations (U.N.) General Assembly published the "Non-Legally Binding Authoritative Statement of Principles for a Global Consensus on the Management, Conservation and Sustainable Development of All Types of Forests" ("Rio Forest Principles"). The report acknowledged the social and environmental importance of forests and acknowledged the complexities involved with their conservation. The Rio Forest Principles correctly recognized that forest discussions involve an "entire range of environmental and

^{52.} Id. at 16.

^{53.} Id. at 5.

^{54.} Interview with Leslie Sponsel, Professor of Anthropology, University of Hawai'i at Mānoa, in Honolulu, Haw. (Apr. 14, 2009).

^{55.} See THE WORLD BANK, FORESTS SOURCEBOOK 1 (2008), available at http://siteresources.worldbank.org/EXTFORSOUBOOK/Resources/completeforest sourcebookapril2008.pdf.

^{56.} Id.

^{57.} Conference on Environment and Development, Rio de Janeiro, June 3-14, 1992, Non-Legally Binding Authoritative Statement of Principles for Global Consensus on the Management, Conservation and Sustainable Development of All Types of Forests U.N. Doc A/CONF.152/26 (Vol. III) (Aug. 14, 1992).

^{58.} See id.

development issues and opportunities, including the right to socioeconomic development on a sustainable basis."⁵⁹ The Rio Forest Principles also recognized that "[g]overnments should promote and provide opportunities for the participation of interested parties, including local communities and indigenous people, industries, labour, non-governmental organizations and individuals, forest dwellers and women, in the development, implementation and planning of national forest policies."⁶⁰ Although the Forest Principles do not constitute binding international law, they lay an important foundation for applying environmental justice principles to deforestation.

Boxing forests into their traditional role as carbon sinks, the 1997 Kyoto Protocol's Clean Development Mechanism (CDM) allowed developed countries to meet a portion of their reduction targets by funding reforestation and afforestation projects in developing countries to offset their carbon emissions. Hethods for avoiding deforestation were not delineated under the CDM, but compensation could be received for projects like the reforestation program in Uganda's Mount Elgon National Park. The CDM did not include avoided deforestation projects largely because the Protocol incorporated the principle that climate change mitigation was a task for developed nations, who were responsible for the majority of global greenhouse gas emissions.

Upon receiving new scientific information identifying deforestation as a major contributor to greenhouse gas emissions, climate change policymakers shifted their focus from reforestation to developing methods for avoiding deforestation and "Reducing Emissions from Deforestation and Forest Degradation in Developing

^{59.} Id. at Preamble \P (a).

^{60.} *Id.* at $\P 2(d)$.

^{61. &}quot;Reforestation" refers to "the reestablishment or regeneration of a forest." BARNSLEY, *supra* note 21, at 80. "Afforestation" is defined as "[d]eveloping a forest on land that has not been forested in recent times." *Id.* at 74.

^{62.} Id. at 21.

^{63.} See supra Part I.

^{64.} FRIENDS OF THE EARTH INTERNATIONAL (FOEI), ISSUE NO. 114, REDD MYTHS: A CRITICAL REVIEW OF PROPOSED MECHANISMS TO REDUCE EMISSIONS FROM DEFORESTATION AND DEGRADATION IN DEVELOPING COUNTRIES 10 (2008), available at http://www.foei.org/en/resources/publications/climate-justice-and-energy/2008/redd-myths.

Countries" (REDD). Beginning in 2005, a multitude of varied REDD proposals began emerging at climate change talks. In 2005, at the UNFCCC's Eleventh Conference of the Parties (COP-11) in Montreal, the governments of Papua New Guinea and Costa Rica formally proposed a "Compensated Reduction" system of voluntary carbon emissions reductions through forest conservation. Shortly after Montreal, the two nations joined forces to form the Coalition for Rainforest Nations (Rainforest Coalition), an intergovernmental organization that focuses on forest issues and continues to be influential in discussions at the international level. A REDD proposal supported by the Rainforest Coalition in current climate change talks is analyzed in Part IV, Section A, of this paper.

Although an international REDD mechanism is still being negotiated under the UNFCCC, a number of REDD pilot programs are already underway. ⁶⁹ At COP-13 in 2007, the World Bank launched its Forest Carbon Partnership Facility (FCPF), receiving donations from Australia, Finland, France, Japan, Norway, Spain, Switzerland, the United Kingdom, and the United States, to provide

^{65.} TOM GRIFFITHS, FOREST PEOPLES PROGRAMME, SEEING 'REDD'?: FORESTS, CLIMATE CHANGE MITIGATION AND RIGHTS OF INDIGENOUS PEOPLES http AND LOCAL COMMUNITIES 4 (200), available at http://www.forestpeoples.org/documents/ifi_igo/seeing_redd_update_may09_eng.p df.

^{66.} Id.

^{67.} Coalition for Rainforest Nations, http://www.rainforestcoalition.org (last visited Mar. 9, 2009). As of March 9, 2009, the Coalition for Rainforest Nations (Rainforest Coalition) comprised the following participating nations: Bangladesh, Belize, Bolivia, Central African Republic, Cameroon, Congo, Colombia, Costa Rica, DR Congo, Dominican Republic, Ecuador, Equatorial Guinea, El Salvador, Fiji, Gabon, Ghana, Guatemala, Guyana, Honduras, Indonesia, Kenya, Lesotho, Liberia, Madagascar, Malaysia, Nicaragua, Nigeria, Pakistan, Panama, Papua New Guinea, Paraguay, Peru, Samoa, Sierra Leone, Solomon Islands, Suriname, Thailand, Uruguay, Uganda, Vanuatu and Vietnam. Id. The Rainforest Coalition notes that "[c]ountries participate on a voluntarily basis primarily through unified negotiating positions, workshops and collaborative programs. Participation does not necessarily imply that countries adhere to any specific domestic policies or negotiating positions within the international context." Id.

^{68.} See infra Part IV.A.

^{69.} TEBTEBBA FOUNDATION, GUIDE ON CLIMATE CHANGE AND INDIGENOUS PEOPLES 45 (Raymond de Chavez & Victoria Tauli-Corpuz eds. 2008), available at http://www.tebtebba.org/index.php?option=com_docman&task=doc_download&gi d=285&Itemid=27.

funding for select countries to develop REDD regimes. 70 September 2008, U.N. agencies, including the U.N. Development Programme, the Food and Agriculture Organization, and U.N. Environment Programme, launched "UN-REDD," a collaborative pilot program aimed at assisting developing countries⁷¹ and the international community in capacity-building for effective REDD mechanisms and payment structures.⁷² The Government of Norway contributed \$35 million (U.S. dollars) in start-up financing for UN-REDD, ⁷³ and the framework document incorporates cooperation with the World Bank's FCPF. 74 With the development of these programs came criticism for a lack of consultation with indigenous peoples.⁷⁵ In particular, the World Bank received substantial criticism for its lack of consultation with indigenous communities prior to establishing the FCFP. 76 It is from this concern for the lack of consultation with the world's indigenous peoples that environmental justice implications arise in the next generation of climate change policy.

C. Environmental Justice

As climate change policymakers face the latest challenges of collective action, such as developing an effective REDD mechanism, the story of the Ugandan farmers⁷⁷ serves as a warning of the potential implications of responses to climate change for underrepresented communities. Viewing climate change law and policy from an environmental justice perspective can help ensure that

^{70.} Id. at 46.

^{71.} Nine countries have been selected to participate in UN-REDD; they include Bolivia, Democratic Republic of the Congo, Indonesia, Panama, Papua New Guinea, Paraguay, United Republic of Tanzania, Vietnam and Zambia. BARNSLEY, supra note 21, at 44.

^{72.} TEBTEBBA FOUNDATION, supra note 69, at 48.

^{73.} BARNSLEY, supra note 21, at 44.

^{74.} U.N. COLLABORATIVE PROGRAMME ON REDUCING EMISSIONS FROM DEFORESTATION AND FOREST DEGRADATION IN DEVELOPING COUNTRIES (UNREDD): FRAMEWORK DOCUMENT 1 (2008), available at http://www.undp.org/mdtf/UN-REDD/docs/Annex-A-Framework-Document.pdf.

^{75.} TEBTEBBA FOUNDATION, supra note 69, at 46.

^{76.} Id.

^{77.} See supra Part I.

forest-dependent indigenous communities will not be faced with that same tragic struggle under REDD.

1. The Roots of Environmental Justice

The history of the environmental justice concept sets up an important context for applying its principles to international climate change law. Although struggles for equality and the recognition of global disparities among peoples are not new, the "Environmental Justice Movement" is a relatively recent development, emerging in the 1980s. It began as a grassroots response in the United States to evidence that hazardous pollution was disproportionally impacting the health and well-being of minority and low-income communities. Sociologist Robert Bullard was one of the most influential voices in strengthening the principle and advanced a theory that minority and poor communities are more likely to be chosen as sites for "locally unwanted land uses."

The theory and movement gained momentum throughout the 1980s and 1990s through the assertion of legal claims based on environmental law and civil rights law, which sought to control emissions of toxic substances and limit the infiltration of hazardous and poor neighborhoods.81 minority into "Environmental Justice" evolved, the movement began to also address disparities in regulatory processes.⁸² As environmental justice scholars Clifford Rechtschaffen and Eileen Gauna note, "the communities most impacted by environmentally risky activities had important decisionmaking proceedings, from excluded sometimes intentionally so and sometimes because of a lack of specialized knowledge, resources, and other impediments."83 In particular, Native Americans were considered victims of "environmental racism," and some groups sought

^{78.} CLIFFORD RECHTSCHAFFEN AND EILEEN GAUNA, ENVIRONMENTAL JUSTICE: LAW, POLICY, & REGULATION 3 (2002).

^{79.} Rebecca Tsosie, The Climate of Environmental Justice: Taking Stock: Indigenous People and Environmental Justice: The Impact of Climate Change, 78 U. Colo. L. Rev. 1625, 1629 (2007).

^{80.} Id.

^{81.} Id.

^{82.} RECHTSCHAFFEN & GAUNA, supra note 78, at 3.

^{83.} Id.

regulatory control over reservation lands.⁸⁴ Rebecca Tsosie, Professor of Law at the Sandra Day O'Connor School of Law at Arizona State University, categorizes these "sovereignty claims" by Native Americans as the "first generation" of environmental justice claims.⁸⁵

Professor Tsosie categorizes the "second generation" of environmental justice claims, which can include claims based on climate change injustices, as a progression to "rights-based claims." 86 The legal and political disputes stemming from climate change pose distinctive challenges for underrepresented communities and require ever further evolution of the environmental justice movement. As a global application of Professor Tsosie's second generation of environmental justice claims, "climate justice" has surfaced as a principle to be applied at the international level, reflecting that "global impacts of climate change will fall disproportionately on minority and low-income communities."87 Professor Tsosie further asserts "that the key to resolving the second generation of environmental justice claims by Native peoples lies in recognition of their identities as the indigenous peoples of particular regions, with unique sets of cultural attributes and separate histories that reflect the close relationship between these peoples and their lands."88 addition, "[u]nlike the first generation of environmental justice claims, the problem of climate change cannot be resolved through recognition of Native sovereignty, because the environmental harms are largely occurring beyond the boundaries of their lands."89 This is particularly applicable to REDD because the causes of deforestation are often driven by foreign actions or are influenced by outside pressure, but the impacts are felt locally by indigenous communities that are dependent on forests. 90 Part III of this paper suggests that REDD issues are even furthering the evolution of the environmental justice movement into a "third generation" in which climate change responses are scrutinized in addition to climate change impacts. 91

^{84.} Tsosie, *supra* note 79, at 1627-29.

^{85.} Id. at 1627.

^{86.} Id. at 1628.

^{87.} Id. at 1633.

^{88.} Id. at 1644.

^{89.} Id.

^{90.} See supra Part II.B.

^{91.} See infra Part III.

2. Applying Environmental Justice Principles to Climate Change Disputes at the International Level

Although environmental justice claims are clearly identifiable in domestic legal systems, attempts are being made to expand the principle to international environmental disputes. In 2005, the Inuit Peoples of the Arctic filed a human rights case in front of the Inter-American Commission on Human Rights, seeking assistance in obtaining relief from the impact of global warming on their livelihood. 92 The petition argued that United States' carbon emissions have contributed so significantly to climate change that they amount to a human rights violation. 93 The Inuit Petition was backed by findings from the 2004 Arctic Climate Impact Assessment that the Inuit culture is likely to be severely disrupted because climate change is contributing the decline of marine species and the melting of sea ice upon which these peoples are heavily dependent.⁹⁴ support its claims, the Inuit Petition pointed to the United States' membership in the Organization of American States, the 1948 Declaration of Rights and Duties of Man, the International Convention on Civil and Political Rights, and the International Convention on Economic, Social, and Cultural Rights as sources of the United States' human rights obligations under international law.⁹⁵ In 2006, however, the Inuit Petition was rejected by the Inter-American Commission on Human Rights, citing insufficient evidence of harm. 96

Although the petition was unsuccessful, it serves as an important step in the development of international climate change law by arguing that climate justice cannot be isolated or extracted from the established rules of international human rights law. By providing recognition of the overlap between environmental issues and the human rights of indigenous peoples, the Inuit Petition alerts policymakers of the potential for climate justice legal claims. The sea ice for the Inuit is analogous to the trees for forest-dwellers, and the "rights-based" environmental justice claims presented in the Inuit

^{92.} Tsosie, supra note 79, at 1643.

^{93.} Id.

^{94.} Id. at 1670.

^{95.} Id. at 1671.

^{96.} Andrew C. Revkin, *Inuit Climate Change Petition Rejected*, N.Y. TIMES, Dec. 16, 2006, at A9.

Petition are also relevant for indigenous forest communities in tackling REDD.

III. ENVIRONMENTAL JUSTICE PRINCIPLES TO INCLUDE IN AN EFFECTIVE REDD MECHANISM

The unique challenges of collective action, coupled with the high biological and cultural diversity inherent in forest areas, ⁹⁷ require that an effective REDD mechanism incorporate environmental justice principles. As climate change law develops and solidifies, law and policymakers should be proceeding along pathways that do not compromise human rights. While overlapping with Professor Tsosie's "second generation" of environmental justice, the challenges of REDD are transporting the environmental justice movement into a "third generation" in which the responses to climate change are scrutinized in addition to the impacts of climate change.

Simply put, this "third generation" incorporates the concept that without consideration of environmental justice principles, the solution is becoming part of the problem. As journalist Stephan Faris noted while recalling his study of the reforestation programs in Uganda's Mount Elgon National Park, 98 "the people who were in essence asked to pay for the effort to mitigate climate change in Uganda were the farmers who had been farming that land. Everybody benefited, except them—and they're among the most vulnerable."99 By employing the lessons learned from the projects in Uganda—that even well-intentioned climate change projects can vulnerable unanticipated on and adverse impacts generation communities—it becomes clear that a third environmental justice must go beyond tackling the disparities that result from disproportionate climate change impacts and target the inequalities that are generated by the response to climate change.

Aware that REDD mechanisms have a potential for harming indigenous peoples, policymakers should approach the Copenhagen discussions with an eye on environmental justice through a "rights-

^{97.} Sponsel, *supra* note 54 (emphasizing the importance of preserving both biological and cultural diversity of forests).

^{98.} See supra Part I.

^{99.} E-mail from Stephan Faris, Journalist, to author (Apr. 7, 2009, 10:49:00 HST) (on file with author).

based" approach. Throughout the evolution of the environmental justice movement, several scholars have sought to delineate the principles of this legal theory. Environmental justice sociologist Robert Bullard recognized several essential environmental iustice framework elements that can be applied to rights-based arguments concerning global responses to climate change, 100 including a central right of all individuals to be protected from environmental degradation, a preference for prevention strategies, a shifting the burden of proof to polluters, and providing redress when disproportionate burdens occur. 101 In 1991, at the First National Environmental Leadership Summit, of Color People environmental justice principles were identified; 102 they included the fundamental right to political, economic, cultural and environmental self-determination of all people, the right to participate as equal partners at all levels of decision-making, and the right of environmental injustice victims to receive full compensation and reparations. 103

Building on the established environmental justice principles described in past scholarship, this section identifies and analyzes three key principles that should be woven into the REDD tapestry to ensure that environmental justice is preserved for indigenous peoples. These key principles are: (1) the recognition of an indigenous right to environmental self-determination; (2) the entitlement to redress for environmental injustices; and (3) the direct consultation with indigenous peoples to facilitate representation of their diverse voices at international climate change negotiations.

^{100.} Maxine Burkett, Just Solutions to Climate Change: A Climate Justice Proposal for a Domestic Clean Development Mechanism, 56 BUFF. L. REV. 169, 191 (2008).

^{101.} Id. at 191; see also ROBERT D. BULLARD, ENVIRONMENTAL JUSTICE FOR ALL (1991), reprinted in UNEQUAL PROTECTION, at 10 (Robert D. Bullard ed. 1994).

^{102.} See The First National People of Color Environmental Leadership Summit, Proceedings, Principles of Environmental Justice (1991) [hereinafter Principles of Environmental Justice], reprinted in CLIFFORD RECHTSCHAFFEN & EILEEN GAUNA, ENVIRONMENTAL JUSTICE: LAW, POLICY, & REGULATION 23 (2002).

^{103.} Id.

A. Recognition of Indigenous Right to Environmental Self-Determination

The recognition of an indigenous right to environmental selfdetermination is an extension of Bullard's framework principle of "the right of all individuals to be protected from environmental degradation."104 Bullard's principle lays the foundation for environmental justice claims based on human rights that can be substantiated through established international human rights law. indigenous right to environmental self-determination is recognized in several international law instruments that articulate well-established human rights principles and norms. 105 1989, the U.N. International Labor Organization (ILO) adopted Convention No. 169 Concerning Indigenous and Tribal Peoples (hereinafter ILO Convention No. 169), recognizing "the aspirations of [indigenous] peoples to exercise control over their own institutions, ways of life and economic development and to maintain and develop their identities, languages and religions, within the framework of the States in which they live." 106 Furthermore. Article 13 of ILO Convention No. 169 provides that "governments shall respect the special importance for the cultures and spiritual values of the peoples concerned of their relationship with the lands or territories . . . which they occupy or otherwise use."107

Second, the rights of indigenous peoples are also recognized at the international treaty level through the International Convention of Biological Diversity (CBD), which emerged from the 1992 Rio Summit. As Professor Tsosie notes, the CBD was the first international treaty "to step beyond responsibilities of nation-states and consider the role of indigenous and local communities in environmental decision-making." For example, the Preamble to the CBD recognizes "the close and traditional dependence of many

^{104.} BULLARD, supra note 101 at 10.

^{105.} S. James Anaya, Indigenous Peoples in International Law 97 (2d ed. 2004).

^{106.} International Labor Organization, Convention Concerning Indigenous and Tribal Peoples in Independent Countries, pmbl., June 27, 1989, C169, available at http://www.ilo.org/ilolex/cgi-lex/convde.pl?C169.

^{107.} Id. art. 13.

^{108.} Tsosie, supra note 79, at 1667.

^{109.} Tsosie, supra note 79, at 1668.

indigenous and local communities... on biological resources, and the desirability of sharing equitably benefits arising from the use of traditional knowledge, innovations and practices relevant to the conservation of biological diversity." As of April 2009, there were 191 Parties to the CBD, indicating a strong consensus regarding the principles articulated in the Convention. ¹¹¹

Third, the United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP), adopted by the U.N. General Assembly in September 2007, outlines a set of aspirational articles "reaffirming that indigenous individuals are entitled without discrimination to all human rights recognized in international law." Specifically, Article 7.1 of UNDRIP stipulates that indigenous peoples have the "rights to life, physical and mental integrity, liberty and security of person." Moreover, Article 24.1 of UNDRIP adds that "[i]ndigenous peoples have the right to their traditional medicines and to maintain their health practices, including the conservation of their vital medicinal plants, animals and minerals." 114

Although UNDRIP does not constitute binding international law, it provides evidence of a worldwide consensus on indigenous peoples' right to self-determination, which could be persuasive in climate justice claims. The well-established human rights principles and norms articulated in ILO Convention No. 169, the CBD, and

^{110.} United Nations Convention on Biological Diversity, pmbl., June 5, 1992, 1760 U.N.T.S. 143, 145.

^{111.} United Nations Convention on Biological Diversity, List of Parties, http://www.cbd.int/convention/parties/list/ (last visited Apr. 26, 2009).

^{112.} U.N. DEP'T OF ECON. AND SOC. AFFAIRS, Div. for Soc. Pol'y and Dev., United Nations Declaration on the Rights of Indigenous Peoples (Sept. 13, 2007), available at http://www.un.org/esa/socdev/unpfii/en/drip [hereinafter UNDRIP].

^{113.} Id. art. 7.1.

^{114.} Id. art. 24.1.

^{115.} In describing how new and emergent customary international law can become binding on states, S. James Anaya articulates that:

Norms of customary international law arise . . . when a preponderance of states and other authoritative actors converge on a common undertaking of the norms' contents and generally expect future behavior in conformity with those norms. Customary law is 'generally observed to include two key elements: a 'material' element in certain past uniformities in behavior and a 'psychological' element, or opinio juris, in certain subjectivities of 'oughtness' attending such uniformities in behavior.'

ANAYA, supra note 105, at 61 (citations omitted).

UNDRIP require that the legal framework of a REDD agreement incorporate the recognition of an indigenous right to environmental self-determination.

Inherent in the recognition of an indigenous right to environmental self-determination is the recognition of a legal right to the lands upon which indigenous communities depend. For example, Article 26 of UNDRIP provides that:

- 1. Indigenous peoples have the right to the lands, territories and resources which they have traditionally owned, occupied or otherwise used or acquired.
- 2. Indigenous peoples have the right to own, use, develop and control the lands, territories and resources that they possess by reason of traditional ownership or other traditional occupation or use, as well as those which they have otherwise acquired.
- 3. States shall give legal recognition and protection to these lands, territories and resources. Such recognition shall be conducted with due respect to the customs, traditions and land tenure systems of the indigenous peoples concerned. 116

Moreover, Article 25 of UNDRIP provides that "[i]ndigenous peoples have the right to maintain and strengthen their distinctive spiritual relationship with their traditionally owned or otherwise occupied and used lands." This subset of the self-determination environmental justice principle is especially crucial for REDD because many REDD proposals "commodify" forest lands, potentially displacing forest indigenous communities. It furthermore, many indigenous forest communities do not possess legal title to their lands. The Convention on Biological Diversity (CBD) Ad Hoc Technical Expert Group on Biodiversity and Climate noted that indigenous peoples "are unlikely to benefit from REDD where they do not own lands." Such displacement of indigenous

^{116.} UNDRIP, supra note 112, art. 26.

^{117.} Id. art. 25.

^{118.} TEBTEBBA FOUNDATION, supra note 69, at 32; See infra Part IV.A-B.

^{119.} BARNSLEY, supra note 21, at 50.

^{120.} U.N. Environment Programme, Convention on Biological Diversity, London, Eng., Nov. 17-21, 2008, Draft Findings of the First Meeting of the Second Ad Hoc Technical Group on Biodiversity and Climate Change, at 4, available at

communities potentially violates Article 10 of UNDRIP which provides that "[i]ndigenous peoples shall not be forcibly removed from their lands or territories. No relocation shall take place without the free, prior and informed consent of the indigenous peoples concerned and after agreement on just and fair compensation and, where possible, with the option of return." Without the recognition of their rights to historical and traditional lands, indigenous peoples are deprived of their environmental self-determination acknowledged under international human rights law.

One strategy for integrating the environmental justice principle of a recognition of indigenous rights to historical and traditional lands is to incorporate a mechanism into REDD for indigenous communities to pursue land entitlement claims locally. The acquisition of land title, however, can take decades. The thirty year struggle of the Wounaan communities of Eastern Panama provides an important example of the challenges for indigenous peoples seeking land entitlement. 122 The Wounaan live in small villages scattered throughout the tropical rainforests of Eastern Panama and are among the smallest of Panama's indigenous groups, with a population of approximately 6,800 individuals. 123 The Panamanian government's system of semi-autonomous reservations has been a success for several of the country's diverse indigenous groups, but a failure for the Wounaan. 124 A majority of the Wounaan communities live outside the reservations' borders. 125 Communities outside the reservations have historically been unrecognized by the Panamanian government and have not been afforded rights to their lands. 126 Moreover, individual property rights were not appropriate for the Wounaan who utilized the forest and its resources collectively as a community. 127 Finally, in December 2008, as a result of increased

http://www.cbd.int/doc/meetings/cc/ahteg-bdcc-01/other/ahteg-bdcc-01-findings-en.pdf.

^{121.} UNDRIP, supra note 112, art. 10.

^{122.} Martin Philipp Heger & Zachary McNish, Forest Dwellers with No Forest: Legal, Ecological, and Economic Considerations of Indigenous Land Entitlement for the Wounaan 4 (2009) (unpublished manuscript, on file with author).

^{123.} Id. at 4-5.

^{124.} Id. at 5.

^{125.} Id. at 4.

^{126.} Id. at 6.

^{127.} See id. at 14.

international scrutiny, the Panamanian government passed a law that set up procedures by which the Wounaan can acquire legal title to their lands. The law is only four pages long, however, and the Wounaan remain skeptical regarding whether the law will be effective. Indigenous peoples seeking similar title to their lands in anticipation of REDD implementation may face comparable daunting challenges.

B. Indigenous Peoples Should Be Entitled to Redress for Environmental Injustices

With the indigenous right to environmental self-determination comes an entitlement to redress should violations occur. The principle of entitlement to redress was also acknowledged in the context of environmental justice by Robert Bullard, who identified the redress of disproportionate burdens "through targeted action and resources" as an essential framework element. This important environmental justice principle is consistent with Article 28 of UNDRIP, which states that:

Indigenous peoples have the right to redress, by means that can include restitution or, when this is not possible, just, fair and equitable compensation, for the lands, territories and resources which they have traditionally owned or otherwise occupied or used, and which have been confiscated, taken, occupied, used or damaged without their free, prior and informed consent. ¹³²

Moreover, Article 14 of ILO Convention No. 169 stipulates that "[t]he rights of ownership and possession of the peoples concerned over the lands which they traditionally occupy shall be recognised [sic]." ¹³³

Legal precedent for a rights-based claim for redress under international law is exemplified in the landmark Awas Tingni case of

^{128.} Id. at 36.

^{129.} Id.

^{130.} BULLARD, supra note 104, at 10.

^{131.} See id.

^{132.} UNDRIP, supra note 112112, art. 28.1.

^{133.} International Labor Organization, supra note 106, art. 14.

2001. ¹³⁴ In Awas Tingni, the Inter-American Court of Human Rights found that Nicaragua had violated the American Convention on Human Rights by ignoring objections from the Mayagna indigenous community after the government granted a concession for logging on the community's traditional land. ¹³⁵ The Court ruled in favor of collective land rights for the community that had previously been unable to attain such rights. ¹³⁶ Consequently, the Nicaraguan government altered its land titling laws, enabling the Mayagna to collectively title their lands. ¹³⁷ Applying the legal precedent for redress established in Awas Tingni to climate justice principles can lay a foundation for a cause of action should injustices occur as a result of policymakers' responses to climate change through REDD.

C. Ensuring Direct Communication with Indigenous Peoples and Representing Their Voices in International Climate Change Negotiations

The recognition of an indigenous right to environmental self-determination cannot be fully realized without the incorporation of the third key environmental justice principle to developing an effective REDD mechanism: the facilitation of direct consultation with indigenous peoples. This principle is rooted in the "Principles of Environmental Justice" delineated at the 1991 First National People of Color Environmental Leadership Summit, which provided that environmental justice "demands the right to participate as equal partners at every level of decision-making including assessment, planning, implementation, enforcement and evaluation." The main purpose for incorporating this principle into a future REDD agreement is to ensure the legal framework reflects the diversity among indigenous groups worldwide by integrated their diverse voices into the decision-making process.

^{134.} Mayagna (Sumo) Awas Tingni Community v. Nicaragua, 2001 Inter-Am. Ct. H.R. (Ser. C) No. 79, ¶ 121 (Aug. 31, 2000); see also S. James Anaya & Claudio Grossman, The Case of Awas Tingni v. Nicaragua: A New Step in the International Law of Indigenous Peoples, 19 ARIZ. J. INT'L & COMP. LAW 1, 15 (2002) (summarizing the decision of the Inter-American Court of Human Rights).

^{135.} See Anaya & Grossman, supra note 134, at 11.

^{136.} See id.

^{137.} Heger & McNish, supra note 122, at 34.

^{138.} Principles of Environmental Justice, supra note 102, at 23.

Understanding the cultural diversity among the world's indigenous groups is essential to developing an effective consultation mechanism under REDD. The world's forests are home to millions of human forest-dwellers, and nearly 60 million indigenous peoples are totally dependent on the forests for their livelihoods. According to ecological anthropologist Dr. Leslie Sponsel, forests are among the most culturally diverse areas of the planet. Not only do indigenous forest communities vary substantially worldwide, considerable cultural diversity among indigenous peoples can even be found within the borders of a single country. For example, in Panama, a relatively small country of just 2.9 million people, there are at least seven culturally and linguistically distinct indigenous groups. 141

Upon reflecting on the importance of cultural diversity among forest-dwellers, Dr. Sponsel also asserts that humankind is losing its ability to adapt to changes in the climate system at a time when adaptability is most needed. He theorizes that perhaps those most adaptable are the indigenous peoples who have relied on nature to sustain their livelihoods rather than individuals in industrialized nations who are dependent on imported food. Deforestation at its current rates has the potential to wipe out the source of that crucial knowledge. Conversely, indigenous peoples are often the least powerful vocally and politically and are subject to disproportionate impacts from climate change.

The diversity of indigenous peoples has been recognized as an important environmental justice component. At the climate change discussions held in Bonn, Germany, between March 29 and April 8, 2009, Victoria Tauli-Corpuz, chair of the U.N. Permanent Forum on Indigenous Issues (UNFPII), announced that the UNPFII would not be taking a unified position on whether indigenous peoples are for or

^{139.} THE WORLD BANK, supra note 55, at 15.

^{140.} Sponsel, supra note 54.

^{141.} Heger & McNish, supra note 122, at 4.

^{142.} Sponsel, supra note 5454.

^{143.} Id.

^{144.} ADAPTATION OF FORESTS, *supra* note 46, at 14 (asserting that forests are at risk of being lost entirely).

^{145.} Sponsel, supra note 54.

against specific REDD mechanisms. She emphasized that it would be the decision of local communities to decide what is appropriate, acknowledging the indigenous right to self-determination. Similarly, Professor Eric Yamamoto and Jen-L Lyman have explained that "environmental justice must recognize that each racial or Native group is differently situated and that differing contexts contribute to differing group goals, identities, and differential group power[,]" and "[w]hen applied, this framework illuminates the underlying racialized character of environmental justice claims and treats each racial or Native community separately according to its specific socio-economic needs, cultural values, and group goals." This perspective on the diversity of indigenous peoples is an important factor to incorporate into a REDD agreement focused on environmental justice.

Climate change responses that lack consultation with indigenous peoples potentially exacerbate the inequalities that already plague the climate change dilemma. For example, some forests groups fear that a non-collaborative REDD agreement could perpetuate the remnants of the feudal or colonial history and dictatorial regimes that have contributed to the social disparities prevalent throughout the developing world. Two primary strategies exist for ensuring that the voices of diverse indigenous groups are heard. First, limiting the number of negotiators at the table and focusing on smaller, or sub-, issues could ensure that indigenous voices are not drowned out by the members or demands of powerful parties. A focused agenda can more adequately factor in the concerns of indigenous peoples. In addition, smaller negotiating groups would ensure that indigenous peoples are not inappropriately lumped together into a massive group

^{146.} REDD-Monitor, Victoria Tauli-Corpuz on Indigenous Peoples and Carbon Trading, Apr. 8, 2009, http://www.redd-monitor.org/2009/04/08/indigenous-peoples-and-carbon-trading/.

^{147.} Id.

^{148.} Eric K. Yamamoto & Jen-L W. Lyman, *Racializing Environmental Justice*, 72 U. COLO. L. REV. 311, 346 (2001).

^{149.} Id.

^{150.} SIMONE LOVERA, THE HOTTEST REDD ISSUES: RIGHTS, EQUITY, DEVELOPMENT, DEFORESTATION AND GOVERNANCE BY INDIGENOUS PEOPLES AND LOCAL COMMUNITIES 8 (2008),

 $http://www.wrm.org.uy/actors/CCC/cop14/Hottest_REDD.pdf.$

^{151.} Schenck, supra note 33, at 373.

^{152.} Id. at 355.

for the purposes of climate change negotiations. At smaller negotiating tables, distinct groups with varying socio-economic, cultural, geographical, and regional concerns could discuss their unique needs, values, and goals. The powerful parties, however, still control much of the negotiation process, and as Chris Lang, editor and author for REDD-Monitor¹⁵³ points out, "[e]ven the local community and Indigenous representatives that do go to the UNFCCC COP meetings (which of course is a tiny minority) find it very difficult to get their voices heard at these meetings."¹⁵⁴

The second complementary strategy for ensuring that the voices of diverse indigenous groups are heard during climate change decisionmaking is to encourage non-governmental organizations (NGOs) to participate in framework development and implementation. NGOs and other sectors of civil society have played a substantial role in the implementation of international environmental law for the past decade. 155 Although international agreements and commitments are an essential component of international law, civil society is often able to move processes along when governments are unable to do so due to conflicting political and economic agendas. For example, civil society groups, including NGOs, can contribute diverse societal views and specific subject matter expertise to decision-making processes."156 Furthermore, NGO functions can include developing new convention proposals, drafting treaty language, participating in negotiations, correcting treaty mistakes, pointing out inconsistencies in proposals, serving as official state delegation measures, promoting public interest, mobilizing public opinion pressures on governments, and providing expert support. 157

Incorporating civil society in REDD decision-making fills in the gaps for addressing the third key environmental justice principle of ensuring direct communication with indigenous peoples. It also brings the discussion full circle by linking back to the first key principle of environmental self-determination. For example, tying

^{153.} REDD-Monitor is an online collection of REDD-related analyses, opinions, news, and views. It is operated by Chris Lang. REDD-Monitor, http://www.redd-monitor.org/ (last visited Apr. 26, 2009).

^{154.} E-mail from Chris Lang, Editor of Redd-Monitor, to author (Apr. 17, 2009, 10:32:00 HST) (on file with author); see also REDD-Monitor, supra note 153.

^{155.} Schenck, supra note 33, at 355.

^{156.} Id.

^{157.} Id.

the role of civil society to the principle of land rights recognition, NGOs can act as gap-fillers in nations lacking the institutional infrastructure for effective forest management, placing more control with local public interest organizations rather than top-down management by outside investors. In Panama, for instance, the U.S.based non-profit Native Future worked directly with the indigenous peoples of the Wounaan community during their long struggle to secure legal rights to their traditional lands. Through a higher education scholarship funded by Native Future, one member of the community, Leonides Quiroz, was able to complete his law degree at the University of Panama, becoming the first university graduate of the Wounaan tribe. 158 Empowered by this opportunity, Mr. Quiroz appeared before the Inter-American Commission on Human Rights, in Washington, D.C., in October 2008 to present a legal case on behalf of his people for the Panamanian government to afford the Wounaan legal title to their lands. 159 As a result of increased international scrutiny, the Panamanian government passed a law that sets up procedures by which the Wounaan can acquire legal title to their lands. 160 The Panamanian example indicates that by allowing NGOs to participate in the solution and empowering the professional skills of indigenous peoples, policymakers are equipped with mechanisms for incorporating indigenous voices (historically overshadowed by government interest) into their decisions.

The inclusion of NGOs at the negotiation table also presents noticeable risks for indigenous peoples. Not all NGOs have interests that align with those of indigenous peoples, and many NGOs represent industry interests in climate change negotiations. ¹⁶¹ The tale of the Ugandan farmers is a clear example of divergent interests between a public interest organization and those of a local community. ¹⁶² The Face Foundation, responsible for implementing the reforestation project on the evicted farmers' land, was actually established by Dutch power companies, rather than environmental

^{158.} Native Future, Wounaan Take Land Rights Claims to Inter-American Commission on Human Rights, Oct. 28, 2008, http://nativefuture.org/n/news/Entries/2008/10/28_Wounaan_Take_Land_Rights_C laims_to_Inter-American_Commission_on_Human_Rights.html.

^{159.} *Id*.

^{160.} Heger & McNish, supra note 122, at 36.

^{161.} Schenck, supra note 33, at 356.

^{162.} See supra Part I.

interests. 163 Even the views of traditional *environmental* NGOs might not adequately represent the interests of indigenous groups.

IV. A CRITIQUE OF TWO MAJOR REDD PROPOSALS

An effective REDD plan could help secure indigenous lands, provide additional sources of income for local communities, preserve biodiversity, protect the species upon which indigenous peoples depend, and provide an avenue for indigenous peoples to gain political support in global decision-making. The reality of these prospects, however, depends heavily on the specific design and legal framework negotiated for a REDD agreement.

Current REDD proposals can be grouped into two generalized categories: (1) market-linked approaches tied to carbon trading, and (2) funding-based approaches not linked to carbon-trading. This categorization is not comprehensive, however, and many proposals adopt "basket" approaches, incorporating aspects of both. This section will highlight examples of each of the two general REDD approaches and analyzes their implications for indigenous peoples. Consistent with traditional notions of environmental justice, the analysis will take on a "rights-based" perspective.

A. Linking REDD to Global Carbon Markets

1. A Carbon Trading Example: The Coalition for Rainforest Nations Proposal

An example of a proposal based primarily on carbon trading is the Coalition for Rainforest Nations' (Rainforest Coalition's) proposed REDD mechanism. ¹⁶⁵ At the Accra Climate Change Talks in August 2008, twenty-three ¹⁶⁶ of Rainforest Coalition's participating nations

^{163.} Id.

^{164.} BARNSLEY, *supra* note 21, at 48-49.

^{165.} KATE DOOLEY ET AL., AN OVERVIEW OF SELECTED REDD PROPOSALS 13 (Ed Fenton ed., 2008), available at http://www.fern.org/media/documents/document 4305_4306.pdf.

^{166.} U.N. Framework Convention on Climate Change, Ad Hoc Working Group on Long-Term Cooperation 3d Session, Reducing Emissions From Deforestation and Forest Degradation in Developing Countries; and the Role of Conservation, Sustainable Management of Forests and Enhancement of Forest Carbon Stocks (Aug. 25, 2008), available at

submitted a REDD proposal that presents carbon trading as the most viable option for addressing REDD. 167 Based on historical data, the proposed mechanism would establish Reference Scenarios (RS), or gross deforestation carbon emissions baselines, on a national basis. 168 Next, Reference Emissions Rates (RERs) would be established for a given reference period. 169 Upon expiration of the given reference period, REDD credits would be generated for any reduction in emissions below the RER. 170 These credits could be sold in the global carbon market, and industrialized nations could use the credits to reach their emissions reduction targets under the next phase of climate change commitments. 171 The mechanism would be composed of three stages, beginning with a "Readiness" and "Scaling-Up" phases, in which government-led contributions would fund capacity building leading up to 2012, and culminating in a "Future Markets" phase that features fully fungible emissions reduction credits for 2012 and beyond. 172

2. Analyzing Carbon-Trading Proposals Through an Environmental Justice Lens

Proponents of carbon-trading and market-linked approaches to REDD support the mechanism because it is an option for bringing developing countries into climate change mitigation, which has been identified as a key component of the post-2012 climate change regime. ¹⁷³ In addition, supporters assert that market-based incentives are essential because industrialized countries frequently back down from voluntary commitments for financial assistance. ¹⁷⁴ Plans aimed

http://unfccc.int/files/kyoto_protocol/application/pdf/papuanewguinea190908.pdf [hereinafter UNFCC Working Group] (The twenty three nations backing the 2008 proposal included: Belize, Bolivia, Cameroon, Central African Republic, Costa Rica, Democratic Republic of Congo, Dominican Republic, Equatorial Guinea, Ghana, Guatemala, Guinea, Kenya, Lesotho, Liberia, Nicaragua, Panama, Pakistan, Papua New Guinea, Singapore, Solomon Islands, Thailand, Uganda, and Vanuatu).

^{167.} See generally id.

^{168.} DOOLEY, supra note 165, at 13.

^{169.} Id.

^{170.} Id.

^{171.} Id.

^{172.} UNFCC Working Group, supra note 166, at 5.

^{173.} FRIENDS OF THE EARTH INTERNATIONAL, supra note 64.

^{174.} Id.

at broad goals of effectively preserving forests could benefit indigenous peoples. This section analyzes the pros and cons of a carbon-trading proposal from an environmental justice principles perspective.

Effective REDD mechanisms have the potential to benefit the indigenous peoples who inhabit the forests of the world and to advance indirectly the principles stipulated in UNDRIP. If deforestation were to continue at its current alarming rate, the livelihoods, cultures, customs, spiritual practices, and languages of forest peoples could be threatened with extinction. ¹⁷⁵ Allowing those consequences to materialize could amount to violations of internationally recognized human rights. For example, the UNDRIP stipulates that "[i]ndigenous peoples have the right to maintain and strengthen their distinctive spiritual relationship with their traditionally owned or otherwise occupied and used lands." ¹⁷⁶ Furthermore, UNDRIP stipulates that "[i]ndigenous peoples have the right to their traditional medicines and to maintain their health practices, including the conservation of their vital medicinal plants, animals and minerals." ¹⁷⁷

Although carbon-trading proposals boast generalized opportunities for indigenous peoples, closer scrutiny indicates that the proposals could lead to civil rights violations for forest peoples. First of all, a carbon-trading approach creates a plethora of land use and land ownership dilemmas. A significant portion of forested areas across the globe are state-owned, and many national governments do not recognize the customary or traditional rights of indigenous peoples to the lands they inhabit. Carbon trading could stimulate financial incentives for "owners" of land—governments, private investors, and conservation NGOs—to "grab" lands in hopes of financial gain. Such practices could lead to zoning and demarcation of forested areas, potentially excluding indigenous peoples from their traditional and ancestral lands. Friends of the Earth International has expressed its concern about the potential increase in state or corporate

^{175.} BARNSLEY, supra note 21, at 8-9.

^{176.} UNDRIP, supra note 112, art. 25.

^{177.} Id. art. 24,1.

^{178.} BARNSLEY, supra note 21, at 50.

^{179.} GRIFFITHS, supra note 65, at 21.

^{180.} Id.

control over forests, noting that "[t]he simple fact that forests are becoming an increasingly valuable commodity means that they are more likely to be wrested away from local people." 181

Furthermore, rights-based environmental justice claims from these land use dilemmas could be premised on potential rights violations of UNDRIP. Under Article 7.1 of UNDRIP, indigenous peoples have the "rights to life, physical and mental integrity, liberty and security of person." In addition, Article 10 of UNDRIP articulates that "[i]ndigenous peoples shall not be forcibly removed from their lands or territories. No relocation shall take place without the free, prior and informed consent of the indigenous peoples concerned and after agreement on just and fair compensation and, where possible, with the option of return." The proposed solution for dealing with deforestation should not mean additional deprivation of rights for the people already disproportionally impacted by deforestation in the first place.

Carbon-trading REDD mechanisms also raise a broader environmental justice concern, similar to the human rights claim raised by the Inuit Petition: 184: those most responsible for the climate change problem (industrialized nations) could continue their consumption-based lifestyles. Rather than focusing on reducing their fossil fuel consumption, industrialized nations would be equipped with means to offset those emissions without reductions, and developing nations and indigenous peoples are left "holding the bag" of human rights implications.

Furthermore, a "polluter pays" principle is not emphasized in a carbon trading mechanism because the system financially rewards the "polluters" (forest-destroyers) for conserving forested areas, while indigenous peoples, who have remained stewards of their lands, often receive no such rewards. There are also regional inequalities involved with a carbon trading approach, especially if baselines, like those proposed by the Rainforest Coalition, are used to determine emissions credits. Based on historical baselines, countries with past low deforestation rates would not receive the same benefits from the program as regions that have vigorously deforested land in recent

^{181.} Friends of the Earth International, supra note 64, at 6.

^{182.} UNDRIP, *supra* note 112, art. 7.1.

^{183.} Id. art. 10.

^{184.} See supra Part II.C.2.

years. 185 Ensuring low-deforestation countries receive adequate financial incentives is an essential component for consideration in the REDD framework. In addition, because plantations are currently included in the Food and Agriculture Organization of the United Nation's (FAO's) definition of "forests," forest-destroyers could be financially rewarded for expanding plantation lands to the detriment of biodiversity and forest-dwelling communities. 186 Because carbon trading proposals pose environmental justice concerns for indigenous peoples, negotiators at Copenhagen should carefully consider and balance the strengths and weaknesses of alternative proposals.

Many REDD proposals, like the UN-REDD Programme (an experimental carbon trading REDD mechanism funded by Norway and the World Bank), ¹⁸⁷ pledge to uphold UNDRIP and to apply a rights-based approach, but few proposals actually make the benefits of the program *conditioned* upon recognition of indigenous rights. ¹⁸⁸ As law and policymakers consider carbon trading proposals at COP-15, such as the REDD program proposed by the Rainforest Coalition, considerations for indigenous environmental self-determination, the entitlement to redress for environmental injustices, and direct consultation with indigenous peoples are crucial.

B. Non-Carbon-Trading Proposals for Addressing REDD

1. A Contrasting Example: The Tuvalu Proposal

Alternatives to carbon market-based solutions include a funds-based approach. Such an approach has been proposed by Tuvalu, a small Polynesian island nation located approximately halfway between Hawai'i and Australia. At COP-12 in Nairobi in 2006, Tuvalu proposed a "Forest Retention Incentive Scheme" to

^{185.} DOOLEY, supra note 165, at 9.

^{186.} FRIENDS OF THE EARTH INTERNATIONAL, supra note 64, at 23.

^{187.} See supra Part II.B.2.

^{188.} GRIFFITHS, supra note 65, at 1.

^{189.} HAMMOND CITATION WORLD ATLAS 87 (Hammond World Atlas Corp. rev. ed. 2003).

^{190.} The Gov't of Tuvalu, Reducing Emissions from Deforestation in Developing Countries,

1, available at http://unfccc.int/files/methods_and_science/lulucf/application/pdf/tuvaly_for_add.p df (submitted to the Conference of the Parties to the U.N. Convention on Climate Change, Twelfth Session, Nairobi, Kenya, 2007).

"provide incentives to communities for protecting and retaining forests." The proposal consisted of three major components: (1) a Community Forest Retention Trust Account; (2) Forest Retention Certificate; and (3) an International Forest Retention Fund. 192

Although the Tuvalu mechanism is still evolving, some of the basics are worth highlighting in order to understand how local communities might be impacted by such a proposal. Communities wishing to conserve forest areas and engage in sustainable forest management would establish a Community Forest Retention Fund, potentially funded through the Special Climate Change Fund, 193 government contributions, corporate sponsorship, and NGO contributions. 194 The community could draw upon the interest of the Community Forest Retention Trust Account annually. 195

After establishing the Trust Account, communities could apply for Forest Retention Certificates based on an estimate of emissions reduced by the funds-based project. The Forest Retention Certificates would be issued by the national governments at the end of a prescribed period, rewarding the communities for protecting forests. In the meantime, communities would be supplemented with the interest accrued from the Trust Account. The Certificates would be funded by the proposed International Forest Retention Fund to be established under the UNFCCC.

^{191.} DOOLEY, supra note 165, at 14.

^{192.} Id.

^{193.} The Special Climate Change Fund was established under the UNFCCC in 2001 in accordance with the Marrakesh Accords to finance projects relating: (a) to adaptation; (b) technology transfer; (c) energy, transport, industry, agriculture, forestry and waste management; (d) activities to assign developing countries in economic diversification. Conference of the Parties to the U.N. Convention on Climate Change, Seventh Session, Marrakesh, Morocco, Oct. 29 – Nov. 10, 2001, Addendum – Part Two: Action Taken by the Conference of the Parties, 43 (Nov. 10, 2001).

^{194.} CARMENZA ROBLEDO & JÜRGEN BLASER, UNITED NATIONS DEVELOPMENT PROGRAMME, KEY ISSUES ON LAND USE, LAND USE CHANGE AND FORESTRY (LULUCF) WITH AN EMPHASIS ON DEVELOPMENT COUNTRY PERSPECTIVES, 37 (2008).

^{195.} DOOLEY, supra note 165, at 14-15.

^{196.} Id. at 15.

^{197.} Id.

^{198.} Id. at 14-15.

^{199.} Id.

Fund include revenues generated from fossil fuel taxation in developed countries. ²⁰⁰

2. Analyzing Non-Carbon-Trading Proposals Through an Environmental Justice Lens

With any REDD proposal, even those not linked to carbon trading, comes with the potential risk for displacement of indigenous peoples. In a non-carbon-trading approach, however, the outside pressures are minimized and the value of the forests would not be drastically increased.²⁰¹

Non-carbon-trading or funds-based approaches focus more on promoting community-based forest management than do central government-oriented plans, empowering indigenous peoples to become a part of a REDD solution.²⁰² Ensuring transparency of funding mechanisms is essential to effectiveness of the program. Not only is communication between the international community and indigenous peoples essential, so is communication between these peoples and their national and regional governments. Regional plans may be better at capturing the concerns of various distinct indigenous groups by not amalgamating their lands into one large economic resource pool. The development of a REDD program that expressly incorporates direct communication with various indigenous groups could set an example for governments to follow suit at the national and regional level. The other extreme, however, is that corruption will remain a mainstay in many of these vulnerable areas, and indigenous peoples will not receive national or regional consultation. A non-carbon-trading approach also better ensures that REDD issues do not distract from encouraging actual emissions reductions in industrialized nations, thus better emphasizing the "polluter pays" principle inherent in the environmental justice concept. Regardless or non-carbon-trading mechanism carbonof whether a implemented, key environmental justice principles—including (1) the of an indigenous right to environmental determination, (2) the entitlement to redress for environmental injustices, and (3) the direct consultation with indigenous peoples should be incorporated into the REDD design.

^{200.} FRIENDS OF THE EARTH INTERNATIONAL, supra note 64, at 18.

^{201.} Id. at 36.

^{202.} Id.

V. CONCLUSION

As the world's policymakers prepare for the Fifteenth Conference of the Parties (COP-15) to the United Nations Framework Convention on Climate Change (UNFCCC) scheduled for December 2009 in Copenhagen, Denmark, ²⁰³ the stories of indigenous farmers in Uganda and the Wounaan in Panama serve as cautionary tales for policymakers tackling the next generation of climate change and forestry issues. Scientists now report that deforestation contributes to one-fifth of global greenhouse gas emissions. ²⁰⁴ Consequently, strategies for avoiding deforestation are increasingly making their way onto the discussion agendas of international climate change talks. ²⁰⁵

Building on the established environmental justice principles described in past legal scholarship, there are three key principles that should be woven into the REDD tapestry to ensure that environmental justice is preserved for indigenous peoples. These key principles are: (1) the recognition of an indigenous right to environmental self-determination; (2) the entitlement to redress for environmental injustices; and (3) the direct consultation with indigenous peoples to facilitate representation of their diverse voices at international climate change negotiations. Incorporation of these principles is necessary to address the emerging "third generation" of environmental justice claims that tackle the disparities in the response to climate change in addition to the disparities in climate change impacts.

Although it may not be possible for decision-makers to reach an agreement that specifically addresses the needs of all diverse indigenous groups globally, by incorporating these key principles into a REDD mechanism, negotiators can ensure that environmental justice concerns are factored into their decision-making process, potentially preventing indigenous peoples from being left with nothing but a forest of stumps. If a tree falls in the forest, the indigenous peoples—who depend on the forest ecosystem for their physical, cultural, and spiritual livelihood—will hear its sound.

^{203.} See supra note 15.

^{204.} See FACT SHEET, supra note 16.

^{205.} See, e.g., U. N. Framework Convention on Climate Change, supra note 17.