

IN THE INTER-AMERICAN COURT OF HUMAN RIGHTS

Request for Advisory Opinion

Climate Emergency and Human Rights

WRITTEN COMMENTS (*Amicus Curiae*) SUBMITTED BY:

Global Climate and Health Alliance (GCHA)

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THE GLOBAL
CLIMATE & HEALTH
ALLIANCE

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AMICUS CURIAE

Honorable Justices of the Inter-American Court of Human Rights,

The Global Climate and Health Alliance (GCHA) respectfully submits for the Court's consideration this *amicus curiae* brief regarding the Climate Emergency and Human Rights.

The Global Climate and Health Alliance (GCHA) is a coalition of health organizations from around the world dedicated to an equitable, sustainable future. It was established after the 2011 Climate and Health Summit during COP17 of the UNFCCC. GCHA envisions a world where climate change's health impacts are minimized, and health co-benefits of climate mitigation are maximized. Our focus is on integrating health concerns into climate policies, reducing health inequities, and raising awareness of climate-related health threats.

GCHA has networks for Latin America and the Caribbean (LAC) and a Youth Climate and Health Network (YCHN), and serves as the civil society co-chair of the WHO-Civil Society Working Group to Advance Action on Climate and Health. The LAC Climate & Health Network involves health professionals, students, research centers, and NGOs working on climate change's health impacts and co-benefits. YCHN, launched in May 2022, engages young people aged 18-35 to address the interconnections of climate, health, social, and intergenerational justice. The WHO-CS Working Group convenes civil society health organizations leading on climate change to identify and implement areas of collaboration with WHO to address the climate crisis and its impacts on health.

Since 2021, GCHA has developed several iterations of the "Healthy NDC Scorecard"¹ to evaluate countries' commitments to limit global warming to 1.5°C or well below 2°C, as per the Paris Agreement. The 2023 edition of the Scorecard assesses the extent to which governments' national climate commitments recognise and respond to the abundant linkages with health. The Healthy NDC Scorecard has prompted countries to more deeply examine their progress in addressing climate-related health challenges, and their integration of health in their climate policy making. The "Healthy Climate Prescription"² was presented to governments and their negotiators ahead of COP26, highlighting the myriad health harms of the climate crisis, and identifying key areas for accelerated action. The "Healthy Climate Prescription" was supported by over 600 health organizations around the world, representing 46 million health professionals and health workers.

¹ Healthy NDCs. Why Do Nationally Determined Contributions Matter?, GCHA, <https://climateandhealthalliance.org/initiatives/healthy-ndcs/>, Accessed 5 Sep. 2023.

² Healthy Climate Prescription, GCHA <https://climateandhealthalliance.org/initiatives/healthyclimate-prescription/>, Accessed 5 Sep. 2023.

Through a collaboration between experts in public health, medicine, and law - as well as youth climate activists - GCHA drafted this brief to highlight the importance of including health as an integral part of any plan to address the climate emergency and human rights. We firmly believe that human health is intrinsically linked to the health of the planet, and that efforts to address climate change in an equitable manner must take into account climate-related health threats. As investments in health often have environmental co-benefits and vice versa, we encourage the Court to explore strategies that ensure the protection of both human health and the environment when considering policies to address climate change.

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I. IMPACTS OF CLIMATE CHANGE ON HUMAN HEALTH IN LATIN AMERICA AND THE CARIBBEAN

Climate change is a growing threat to public health worldwide, with particularly severe consequences for the Latin America and Caribbean (LAC) region due to its geographic location and socio-economic factors. Climate change exacerbates existing inequities and creates new public health challenges, via direct impacts on health due to extreme weather events such as heat waves, droughts, storms and sea-level rise, and indirect impact on health through forced displacements, food and water insecurity, and vector- or airborne diseases. Recent studies estimate that human-caused global warming, should it reach or exceed 2°C, will cause the deaths of 1 billion people by the end of this century.³ The negative health impacts of vector-borne diseases, wildfires, floods, heat, and myriad other direct and indirect health impacts of climate change disproportionately affect indigenous communities, children, the elderly, and those living in poverty. Addressing these impacts necessitates comprehensive strategies that consider environmental and social determinants of health. Regional and international collaboration is vital to mitigate the health consequences of climate change in LAC and protect the most vulnerable members of society.

³ Pearce, Joshua M., and Richard Parncutt. "Quantifying Global Greenhouse Gas Emissions in Human Deaths to Guide Energy Policy." *Energies*, vol. 16, no. 16, Aug. 2023, p. 6074. *DOI.org (Crossref)*, <https://doi.org/10.3390/en16166074>.

Heat

A warming climate exacerbates heat-related illnesses. Insufficient access to air conditioning and healthcare makes children, the elderly, and impoverished individuals more susceptible to heat-related illnesses. Almost 900,000 deaths in the years between 2002 and 2015 may be attributable to extreme temperatures alone in major Latin American cities.⁴ Infants under one year old and adults over 65 are particularly vulnerable to the effects of more frequent and intense heat waves in South America, with children under one year experiencing an annual average of 2.35 million more person-days of exposure. Heat-related deaths among those over 65 have risen since 2000, particularly in Brazil, Argentina, Colombia, and Venezuela. These heat-related deaths incurred economic costs equivalent to the average income of 485,000 local workers in 2021. Additionally, high temperatures have reduced labor productivity, resulting in a potential income loss of USD 22 billion in 2021, with the construction and agricultural sectors being the hardest hit.⁵

Wildfires

Rising temperatures and prolonged droughts have intensified wildfires in the LAC region. In large part due to burning exacerbated by drought and deforestation, the Amazon Rainforest now produces more carbon than it absorbs.⁶ Not only does this accelerate climate change, but the wildfires across Latin America themselves pose a significant health hazard reaching both closely situated and distant populations. The smoke from these fires contains harmful pollutants, including particulate matter and toxic volatile compounds, impacting millions and directly leading to an estimated 3,400 deaths in the region.⁷ Indigenous populations and impoverished communities residing in fire-prone areas are disproportionately affected by respiratory problems, cardiovascular issues, forced displacement, food insecurity and mental health challenges. These fires also increase the vulnerability of these populations to COVID-19. In fact, people living in indigenous lands face double the mortality from smoke alone when compared to non-indigenous populations in South America.⁸ Immediate actions, like a deforestation moratorium, robust legislation, including recognizing and enforcing the land rights of indigenous populations, forest conservation laws, air quality monitoring, and public advisories, are essential to mitigate health

⁴ Kephart, Josiah L., et al. "City-Level Impact of Extreme Temperatures and Mortality in Latin America." *Nature Medicine*, vol. 28, no. 8, Aug. 2022, pp. 1700–05. *DOI.org (Crossref)*, <https://doi.org/10.1038/s41591-022-01872-6>.

⁵ Hartinger, Stella M., et al. "The 2022 South America Report of The Lancet Countdown on Health and Climate Change: Trust the Science. Now That We Know, We Must Act." *The Lancet Regional Health - Americas*, vol. 20, Apr. 2023, p. 100470. *DOI.org (Crossref)*, <https://doi.org/10.1016/j.lana.2023.100470>.

⁶ Gatti, Luciana V., et al. "Amazonia as a Carbon Source Linked to Deforestation and Climate Change." *Nature*, vol. 595, no. 7867, July 2021, pp. 388–93. *DOI.org (Crossref)*, <https://doi.org/10.1038/s41586-021-03629-6>.

⁷ Butt, Edward W., et al. "Large Air Quality and Public Health Impacts Due to Amazonian Deforestation Fires in 2019." *GeoHealth*, vol. 5, no. 7, July 2021, p. e2021GH000429. *DOI.org (Crossref)*, <https://doi.org/10.1029/2021GH000429>.

⁸ Bonilla, E. X., et al. "Health Impacts of Smoke Exposure in South America: Increased Risk for Populations in the Amazonian Indigenous Territories." *Environmental Research: Health*, vol. 1, no. 2, June 2023, p. 021007. *DOI.org (Crossref)*, <https://doi.org/10.1088/2752-5309/acb22b>.

and environmental risks. International cooperation is crucial to address the contribution of wildfires to climate change and its long-term health consequences.

Air Pollution

Pollution from other sources also has detrimental effects on health. As of 2019, the WHO found that nearly 99% of the global population resides in areas with air quality that falls below its recommended standards. In the LAC region, 95% of inhabitants are exposed to air pollution, primarily in urban areas where over 80% of the population resides. In the Americas, over 320,000 premature deaths can be linked to air pollution per year, disproportionately affecting vulnerable groups including children, pregnant women, and the elderly. The economic impact of air pollution in LAC, attributed to premature deaths due to particulate matter, accounts for a significant 3.4% of the region's GDP.⁹

Fossil fuels are a primary culprit, contributing significantly to both climate change and air pollution. The burning of fossil fuels releases a torrent of pollutants that aggravate respiratory and cardiovascular conditions, leading to premature deaths, and impacting healthcare systems.

Exposure to aeroallergens and high particulate matter worsens existing conditions such as asthma and cardiopulmonary diseases. In 2015, ambient air pollution was identified as a leading global disease burden, particularly affecting low- and middle-income countries. PM_{2.5} exposure caused 4.2 million deaths and 103.1 million disability-adjusted life-years in 2015.¹⁰ Air pollution disproportionately affects rural communities, which rely on polluting fuels and low-quality (traditional) stove technologies for house heating and cooking. These fuels generate high levels of PM as well as greenhouse gas emissions. In South America, 23% of its rural population continue to rely exclusively on biomass fuels for cooking, putting rural communities at higher risk of cardiopulmonary diseases.¹¹

Cities across the region are witnessing increased levels of these pollutants, intensified by rising temperatures. Vulnerable groups, often residing in areas with high exposure to pollutants and limited access to healthcare, bear a disproportionate burden of these health impacts, highlighting a stark inequality and a significant violation of human rights. The detrimental impact on health is inextricably linked with harm to the environment, underscoring the pressing need for comprehensive action. Degraded air quality, driven by industrial emissions and deforestation, undermines the right to a healthy environment, a fundamental aspect of the right to life and well-being.

Vector-Borne Diseases

⁹ "Clearing the Air: Advancing Regional Efforts for Clean Air in Latin America and the Caribbean." *SEI*, <https://www.sei.org/perspectives/clearing-the-air/>. Accessed 5 Sep. 2023.

¹⁰ Vohra, Kam, et al. "Global Mortality from Outdoor Fine Particle Pollution Generated by Fossil Fuel Combustion: Results from GEOS-Chem." *Environmental Research*, vol. 195, Apr. 2021, p. 110754. *DOI.org (Crossref)*, <https://doi.org/10.1016/j.envres.2021.110754>.

¹¹ Hartinger, Stella M., et al. "The 2022 South America Report of The Lancet Countdown" (see pg 2, footnote 3)

Changing environmental conditions are impacting the geographical distribution of infectious diseases, particularly dengue, which has seen a 35.3% increase in climate suitability for transmission from 2012-2021 compared to 1951-1960.¹² This trend is exacerbated by urbanization and mobility in countries including Brazil and Peru, leading to dengue spreading to new areas. Climate change also facilitates viral sharing among isolated wildlife species, increasing the risk of disease emergence. Additionally, temperate Southern Cone countries, including Chile and Uruguay, have become more vulnerable to severe dengue outcomes due to rapid urbanization, with Chile has seen an increase of dengue cases this year.¹³ Due to these factors, the Pan American Health Organization (PAHO) reports that the number of cases of Dengue in the Americas has increased from 1.5 million cumulative cases in the 1980s to 16,2 million in the decade 2010-2019, with indigenous communities facing a higher risk due to limited healthcare access and remote locations.¹⁴ Other vector-borne diseases like zika, malaria, and chikungunya are expected to increase in prevalence for similar reasons. Schistosomiasis, cholera, and heavy algal blooms are also projected to increase in a warmer world with heavy rainfall and flooding.

Sacrifice Zones

On a larger scale, “sacrifice zones” – socioeconomically disadvantaged areas with extreme levels of pollution due to high concentrations of mines, chemical plants, and other polluting industries – can have severe health consequences for the people living near them, particularly children and the elderly. Areas such as Quintero, near the city of Viña del Mar are surrounded by 17 industrial plants, which produce or operate toxins, and is part of the reason why the Medical College of Chile advocated for the area to be called a “catastrophe zone”. The local population of this region associate the industrial plants with several health impacts such as cancer, respiratory diseases including asthma, cardiovascular diseases, elevated levels of infant mortality, miscarriages and shortened life expectancy.^{15, 16}

Extreme weather events

¹² Hartinger, Stella M., et al. “The 2022 South America Report of The Lancet Countdown” (see pg 2., footnote 3)

¹³ Aliaga, C. “Chile en alerta sanitaria por dengue: explican su relación con el cambio climático y cómo prevenir la enfermedad” *Universidad de Chile*. 25 Aug. 2023, <https://uchile.cl/noticias/208502/chile-en-alerta-sanitaria-por-dengue-dia-internacional-contra-el-mal->. Accessed 08 Sep. 2023.

¹⁴ “PAHO/WHO Data - Dengue”. PLISA Health Information Platform for the Americas <https://www3.paho.org/data/index.php/en/mnu-topics/indicadores-dengue-en.html>. Accessed 05 Nov 2023.

¹⁵ McGinn, Miyo. “For Years, Chile Exploited Its Environment to Grow. Now It’s Trying to Save It.” *Popular Science*, 19 Sept. 2022, <https://www.popsoci.com/environment/sacrifice-zones-chile-constitution/>.

¹⁶ Boyd, David. *Statement at the Conclusion of Country Visit to Chile*. United Nations Special Rapporteur on human rights and the environment, 12 May 2023, <https://www.ohchr.org/sites/default/files/documents/issues/environment/srenvironment/eom-statement-Chile-12-May-2023-EN.pdf>. Accessed 05 Oct 2023.

Extreme weather events are becoming more intense and frequent as a result of anthropogenic global warming. Climate change amplifies extreme weather events and alters long-term temperature and precipitation patterns, directly and indirectly affecting human health. They also disrupt food systems, leading to food insecurity, heightened vulnerability, increased poverty, and migration. Even the healthcare system itself is at risk. In the Americas, 67% of health facilities are located in areas at risk of disasters. According to PAHO, in the last decade, 24 million people were left without access to health care for months because of damaged infrastructure.¹⁷

Urban areas, particularly in low-lying coastal regions, face heightened vulnerability due to flooding, heatwaves, and landslides exacerbated by urban development. Uncontrolled urban growth in high-risk zones exacerbates climate-related impacts. Socioeconomic factors in urban areas, including access to healthcare and resources, influence adaptive capacity, making certain groups like the elderly, migrants, and those with limited resources more vulnerable to climate change. In Latin America, informal development on city outskirts heightens risks, especially for marginalized communities, further concentrating poverty and vulnerability to both extreme events and long-term climate shifts, which will exacerbate health inequities.¹⁸

Displacing Communities

The ominous sweep of climate change is forcefully driving unprecedented migration events, particularly accentuated in the Latin American and Caribbean regions. The fierce intensity and frequency of hurricanes, especially in the Caribbean, and prolonged drought conditions in many parts of the region are forcibly displacing communities, pushing them into the throes of uncertainty and vulnerability. It has been estimated that the economic cost of Hurricane Maria in Dominica was 260% of its annual GDP, along with a displacement of up to 27.3% of its total population.¹⁹ This climatic upheaval leaves heavy imprints on the social, economic, and health aspects of the marginalized populations, who are often thrust into conditions where basic human rights and to the basic necessities to maintain health are at a severe compromise. The abrupt and forceful nature of such migrations due to extreme weather events leaves these communities bereft of access to adequate healthcare, housing, and essential services, exacerbating pre-existing inequities. The displaced face heightened health risks, mental health issues, and loss of community and cultural ties, aggravating the societal divide and fueling the crisis further. Such situations underpin the pressing necessity for climate-resilient policies and frameworks that prioritize the rights and well-being of the most vulnerable, ensuring their access to essential

¹⁷ “Climate Change and Health.” *Pan American Health Organization* (see pg 4, footnote 10) <https://www.paho.org/en/topics/climate-change-and-health>. Accessed 05 Nov 2023.

¹⁸ Indvik, Katy, et al. “Climate Change and Urban Health: Lessons from Latin American Cities.” *Urban Health Network for Latin America and the Caribbean, Salud Urbana En América Latina*, vol. 7, Apr. 2022, https://drexel.edu/~media/Files/lac/Briefs/policy-briefs/Climate_Change_BriefENG.ashx?la=en.

¹⁹ Yglesias-González, Marisol, et al. “Code Red for Health Response in Latin America and the Caribbean: Enhancing Peoples’ Health through Climate Action.” *The Lancet Regional Health - Americas*, vol. 11, July 2022, p. 100248. *DOI.org (Crossref)*, <https://doi.org/10.1016/j.lana.2022.100248>.

services, healthcare, and social protection in the face of the growing climate-induced migration crisis. The international community, in solidarity, must strengthen its commitment to safeguarding human rights in the context of climate-induced migration, ensuring that those most at risk are not left behind as the climate change and our response to it unfold.

Current Actions are Insufficient

Current efforts to curb the pace of climate change are simply not effective. Bressler (2021) estimates that if emissions remain at the current level, there will be 83 million cumulative excess deaths by 2100 globally.²⁰ In South America, government engagement, news coverage, corporate engagement, and scientific output related to the health dimensions of climate change is increasing but still modest²¹. Although Colombia and Chile are recognized as some of the most progressive countries in Latin America with regards to their action on climate change, they are still not taking the steps necessary to curb warming to 1.5°C and prevent catastrophic health consequences. According to the Climate Action Tracker, an independent research project created by Climate Analytics and NewClimate Institute to monitor government actions to achieve greenhouse gas emissions in alignment with the Paris Agreement, both Chile's and Colombia's Nationally Determined Contribution (NDC) goals are rated as "insufficient".^{22, 23}

Chile

Chile has shown significant progress in climate action over the past year. The country's emissions, which were projected to rise just two years ago, are now on a declining trajectory under current policies and actions. This progress has led to a conditional NDC target rating of "Almost sufficient" when compared to modeled domestic pathways, indicating the potential to be 1.5°C compatible if planned policies, such as a coal phase-out by 2030, are implemented.

Chile aims to source 70% of its power from renewables by 2050 and its updated pledge to the Paris Agreement to achieve carbon neutrality by the same year. Prioritizing a transition from coal, the nation aims for a complete phase-out of coal-fired plants by 2040. Chile aspires to dominate in green hydrogen production and champions electric mobility to combat urban air pollution, thus enhancing public health.

²⁰ Bressler, R. Daniel. "The Mortality Cost of Carbon." *Nature Communications*, vol. 12, no. 1, July 2021, p. 4467. [www.nature.com](https://doi.org/10.1038/s41467-021-24487-w), <https://doi.org/10.1038/s41467-021-24487-w>.

²¹ Takahashi, Bruno et al. "Climate change and public health in South America: a scoping review of governance and public engagement research", *The Lancet Regional Health - Americas*, 100603, 2023, <https://doi.org/10.1016/j.lana.2023.100603>

²² *Chile*. <https://climateactiontracker.org/countries/chile/>. Accessed 5 Oct. 2023

²³ *Colombia*. <https://climateactiontracker.org/countries/colombia/>. Accessed 5 Oct. 2023.

Chile further solidified its leadership in climate action by enacting its groundbreaking climate change law. This legislation establishes legally binding NDC targets and carbon neutrality by 2050, while also promoting cross-sectoral governance and public participation and includes the principle of non-regression, a testament to the nation's commitment. Additionally, the law mandates greater transparency and public participation in climate decisions, thus ensuring that its implementation benefits all segments of society. The integration of indigenous knowledge and the prioritization of climate education in schools stand out as particularly innovative features. In essence, Chile's climate change law promotes integrated governance and provides a comprehensive and inclusive framework that intertwines ambitious climate action with broader socio-economic and health objectives.

At the federal level, President Gabriel Boric has made climate change a top priority, appointing an IPCC author as Minister of the Environment and incorporating climate action into various aspects of governance. Additionally, Chile is considering an accelerated coal phase-out by 2030 and a ban on combustion engine vehicle sales by 2035.

Chile's net-zero target for 2050 is deemed "Acceptable" but relies heavily on forest carbon sinks, requiring vigilance to ensure they remain effective, especially in the face of natural factors and climate change impacts.¹⁹ Unfortunately, Chile's unconditional target is still rated "Insufficient" and needs substantial enhancements to align with the 1.5°C temperature limit.

In its National Health Strategy 2023-2030, Chile establishes the environment and healthy environments as axis 1, the expected result of which is to reduce the population exposed and/or vulnerable to unfavorable health-environmental conditions that affect health and quality of life. In this sense, Chilean health professionals must be prepared and trained to respond to this health goal²⁴.

Colombia

Colombia updated its NDC target in 2020 but is currently not on track to meet it, with policies resulting in emissions around 24% over the target. The Climate Action Law, enacted in December 2021, made NDC and net-zero targets legally binding.

Colombia, with its rich biodiversity, is poised not just to be a global leader in natural resources but also in conservation and sustainable development. The nation's ambition to become a "Power of Life" underlines this commitment. This vision, as outlined in the National Development Plan, seeks to harness Colombia's unique ecological wealth for sustainable development, ensuring both economic growth and environmental conservation. It aims to make Colombia a global example by striking a balance between using its natural resources for socio-economic progress and conserving its rich environmental heritage for future generations. This approach, rooted in an

²⁴ Estrategia nacional de salud para los objetivos sanitarios al 2030, Ministerio de Salud, Gobierno de Chile, 2022, <https://www.minsal.cl/wp-content/uploads/2022/03/Estrategia-Nacional-de-Salud-2022-MINSAL-V8.pdf>

understanding of the intrinsic link between nature, culture, and development, recognizes the role of local communities, especially indigenous groups, in maintaining and promoting ecological balance. The "Power of Life" ambition also holds significance in the context of climate action; by prioritizing sustainable practices, Colombia seeks to be an active player in global efforts against climate change while safeguarding the health and well-being of its people. Although Colombia's newly elected President Gustavo Petro has prioritized climate change on his political agenda, focusing on conservation, sustainable energy, and a low-carbon transition, Colombia's NDC target is still rated "Insufficient" against modeled domestic pathways, and its policies are considered "Insufficient" against its fair share contribution (although the fair share target itself is rated as "Almost Sufficient").

To improve climate action and yield significant and immediate benefits for public health, Colombia should consider a coal exit, as it relies on coal for a significant portion of its energy supply.

Colombia's leadership in climate ambition stood out at COP28 as it was the first Latin American country and the largest producer of coal and gas to join the growing bloc of nations spearheading the push for a Fossil Fuel Non-Proliferation Treaty. The Treaty would complement the Paris Agreement by establishing a new international mechanism to specifically manage a global just transition away from coal, oil and gas²⁵.

The land use sector has been a significant source of emissions in Colombia, and efforts to reduce emissions from deforestation are crucial. Colombia's net-zero target is evaluated as "acceptable," with various strategic initiatives outlined to promote low-carbon development.

The overall climate rating for Colombia is "Insufficient," indicating the need for substantial improvements in policies and commitments to align with the Paris Agreement's 1.5°C limit and protect its present and future populations from uncontrollable climate hazards for health.²⁰

Regional importance

In matters of regional importance, the Inter-American Court of Human Rights holds a significant and influential position in the protection and promotion of human rights in the Americas. The advisory opinion of the Inter-American Court of Human Rights on the Climate Emergency and Human Rights, at the behest of Colombia and Chile, holds paramount significance not just for the Pan American region but also for the global community. This decision, aimed at delineating the connections between climate action and human rights, sets a precedent that echoes beyond regional boundaries. Countries around the world, grappling with the intricate challenges posed by climate change, stand to benefit from the Inter-American Court of Human Rights' comprehensive examination and clarification of these issues. The Court's guidance can serve as a foundational framework for states worldwide, aiding them in developing and implementing

²⁵ At COP 28, Colombia joins call for Fossil Fuel Treaty, strengthening international climate leadership <https://fossilfuel treaty.org/colombia-press-release>, accessed December 16, 2023

policies that cohesively integrate human rights and climate action. As nations globally strive to align their climate objectives with their human rights obligations, the advisory opinion will act as a critical reference point, underscoring the universality of both human rights and climate change concerns, and highlighting the imperative for a harmonized, global approach to tackling these pressing issues. The Global Climate and Health Alliance emphasizes that the international implications of the Court’s opinion will contribute to enhancing global cooperation, promoting shared learning and facilitating the collective pursuit of sustainable, equitable and human rights-centered solutions to the climate crisis.

Opportunities for Improvement related to Health

Action on climate change offers one of the greatest public health opportunities of the 21st century.²⁶ Climate action across all sectors can yield health co-benefits: emissions reductions in the energy sector improve air quality; sustainable food and agriculture systems protect and promote healthy nutrition; multimodal transport systems improve air quality, support physical activity and can increase mobility equity; these changes can lead to reduced burden of respiratory and cardiovascular conditions, type 2 diabetes and some cancers; urban green infrastructure also improves mental health and social cohesion and equity. Integrating health into climate policies can accelerate a low-carbon transition while improving public health. Many of the same steps needed to align with the Paris Agreement's 1.5°C limit are also essential to protect health, particularly for marginalized and vulnerable populations. Forest conservation practices, for example, not only directly lower carbon dioxide levels, but also improve air and water quality and ensure that tribal populations have access to essential food and medicine. Transitioning to cleaner fuel sources, whether it be from wood-burning stoves to clean fuels at home, or by limiting coal use and transitioning to clean renewable energy for industry and transportation, limits particulate matter and improves air quality, protecting against cardiopulmonary diseases, particularly for children and the elderly. Cleaning up “sacrifice zones”-- heavily industrialized areas that produce or use toxins – protects the surrounding ecosystem while decreasing the risk of cancer, asthma, cardiovascular diseases, and miscarriages for the local population.

Access to clean air, food, and water and a stable climate are essential to human health. Policies that deprive people, including children, of access to a clean environment have direct impacts on their health, and are in violation of Articles 4 (1) and Article 19 of the American Convention on Human Rights²⁷.

²⁶ Watts, Nick, et al. “Health and Climate Change: Policy Responses to Protect Public Health.” *The Lancet*, vol. 386, no. 10006, Nov. 2015, pp. 1861–914. *DOI.org (Crossref)*, [https://doi.org/10.1016/S0140-6736\(15\)60854-6](https://doi.org/10.1016/S0140-6736(15)60854-6).

²⁷American Convention On Human Rights
<https://www.cidh.oas.org/basicos/english/basic3.american%20convention.htm>

II. LEGAL OBLIGATIONS AND PRINCIPLES IN ADDRESSING CLIMATE CHANGE AND HEALTH

1. Introduction

This chapter examines the legal obligations and principles that guide States in addressing climate change and its impact on health. It encompasses a comprehensive analysis of international agreements and principles, including the American Convention, the Paris Agreement, and relevant documents, to understand the scope of State responsibilities. Additionally, it explores mechanisms for climate and health integration and identifies persistent challenges in this regard.

2. State's Duty of Prevention (Question 1)

The State's duty of prevention concerning climate events exacerbated by global warming is not only a moral imperative but also firmly anchored in international legal frameworks. This duty is primarily enshrined in the American Convention on Human Rights, which sets a robust foundation for safeguarding the well-being of individuals within its jurisdiction. Article 4 of the Convention, in particular, plays a pivotal role in this context. It unequivocally recognizes the right to life as a fundamental and inalienable right, effectively imposing a paramount obligation on States to take proactive measures to shield their citizens from climate-related threats.

This duty finds resonance in the fact that climate change, driven by global warming, poses an existential challenge to human lives. From more frequent and severe natural disasters to the insidious impacts of changing ecosystems on health and livelihoods, the consequences of unchecked global warming are dire. Therefore, the duty to prevent and mitigate these climate-related hazards becomes an integral component of upholding the right to life.

Furthermore, the Paris Agreement, a landmark international accord, reinforces and amplifies this duty. Within its core framework, articulated in Article 2, the Paris Agreement sets a clear and ambitious objective: to limit the increase in global average temperature to well below 2 degrees Celsius above pre-industrial levels, with a preference for limiting it to 1.5 degrees Celsius. This target is both scientifically validated²⁸; and it is a collective commitment by nations, to avert

²⁸ IPCC, 2018: Summary for Policymakers. In: *Global Warming of 1.5°C. An IPCC Special Report on the impacts of global warming of 1.5°C above pre-industrial levels and related global greenhouse gas emission pathways, in the context of strengthening the global response to the threat of climate change, sustainable development, and efforts to eradicate poverty* [Masson-Delmotte, V., P. Zhai, H.-O. Pörtner, D. Roberts, J. Skea, P.R. Shukla, A. Pirani, W. Moufouma-Okia, C. Péan, R. Pidcock, S. Connors, J.B.R. Matthews, Y. Chen, X. Zhou, M.I. Gomis, E. Lonnoy, T. Maycock, M. Tignor, and T. Waterfield (eds.)]. Cambridge University Press, Cambridge, UK and New York, NY, USA, pp. 3-24, doi:10.1017/9781009157940.001.

catastrophic climate impacts. In this context, States are duty-bound to take deliberate, immediate, and sustained actions to reduce greenhouse gas emissions and transition to sustainable practices.

3. Principles Guiding Climate Actions (Question 2B)

The principles that underpin and drive climate actions encompass a profound understanding of the intricate and far-reaching impacts of climate change, as well as the moral imperative to address them conscientiously. These guiding principles resonate not only through international agreements like the Paris Agreement but also in the collective conscience of nations, organizations, and individuals committed to confronting the climate crisis head-on.

1. Equity: Equity is a foundational principle that serves as the compass for climate actions. It recognizes that the burdens of climate change are not evenly distributed; vulnerable and marginalized communities often bear the brunt of its consequences. As a threat multiplier, climate change to date has exacerbated health inequities. Therefore, equitable climate action entails ensuring that those who are least responsible for causing climate change are not disproportionately affected by it. This principle emphasizes the need for inclusive strategies that prioritize the needs and rights of these vulnerable populations, both in mitigation efforts to reduce emissions and adaptation measures to build resilience. Not only is equity an important foundational principle, but the [most recent IPCC report] finds equity both compatible with, and necessary for, ambitious, effective climate action.

2. Justice: Justice, closely linked with equity, is integral to climate action. It calls for accountability and redress for historical and ongoing environmental injustices. Climate justice demands that those responsible for the majority of greenhouse gas emissions take responsibility for their actions and assist vulnerable communities in adapting to the impacts of climate change. It also underscores the importance of intergenerational justice, recognizing that actions taken today have profound consequences for future generations who will inherit the planet we leave behind. Historically developed nations have been the primary contributors to greenhouse gas emissions and consequently share a greater responsibility in mitigating climate change. High-income developed countries that historically and/or currently are the highest emitters have a particular responsibility to address climate change through leadership on emissions reductions, as well as through technical and financial support to developing countries on climate issues. By addressing their responsibilities in these ways, historically developed nations can build trust with developing countries, which trust is essential to pursuing the collaborative global solutions this global challenge requires.

It is nevertheless also essential to recognize that developing countries also play a pivotal role in the global climate narrative. Firstly, many developing nations are rapidly industrializing, and without adopting sustainable practices now, they could significantly contribute to future emissions, exposing their populations to the associated increases in air pollution and other associated co-harms. Secondly, as frontline states, many developing countries are directly experiencing the harshest impacts of climate change. Proactive action can protect their communities from the worst outcomes while serving as role models for resilience and adaptation. Additionally, these nations often possess vast natural resources, including forests and biodiversity, which are critical for global climate stabilization. By promoting conservation and sustainable land management, they can assert their leadership in the global climate dialogue. Lastly, from a human rights perspective, proactive measures in developing countries ensure that all their citizens, particularly the most marginalized, have a chance at a dignified life, free from the devastating impacts of climate change.

Justice demands accountability from historic emitters; it also requires a shared vision of a sustainable future in which every nation, regardless of its development stage, actively contributes to a global solution.

3. Precautionary Principle: The precautionary principle is a vital tenet of climate action as well as of public health that advises taking preventative measures in the face of uncertainty. Given the irreversible nature of many climate impacts, erring on the side of caution is essential. This principle encourages decision-makers to act proactively to mitigate emissions, even in the absence of absolute scientific certainty about the nature, timing, and extent of future harms. It recognizes that waiting for unequivocal proof of harm could very well lead to catastrophic consequences, making early and decisive action imperative.

These principles, enshrined in the Paris Agreement under Article 2, play a pivotal role in shaping climate strategies and policies at the international and national levels. They guide the formulation of climate action plans, emphasizing the moral and ethical dimensions of addressing climate change. Furthermore, they are essential in the context of losses and damages resulting from the climate emergency, as they compel nations to take responsibility for their contributions to climate change and the consequences it inflicts on communities and ecosystems.

In sum, these principles - equity, justice, and the precautionary principle - not only provide a moral compass for climate actions but also ensure that the global response to the climate crisis is grounded in fairness, responsibility, and foresight. They remind us that the fight against climate change is not just a scientific or technical endeavor; it is a profoundly ethical one, demanding a commitment to safeguarding the planet and the well-being of all its inhabitants.

4. Differentiated Obligations for Children (Question 2C)

In the face of the climate emergency, it is imperative to recognize that States bear distinct responsibilities towards children and future generations. This recognition is deeply embedded in international legal frameworks, notably highlighted in Article 3(1) of the Convention on the Rights of the Child. This pivotal provision places paramount importance on the best interests of the child, underscoring that in all actions concerning children, the primary consideration must be their well-being and rights.

Within the context of climate change, this means that States must adopt a multifaceted approach. They are not only tasked with mitigating emissions and adapting to the impacts of climate change but must also consider the profound and lasting effects of their climate policies on children's lives. This encompasses safeguarding the right to a clean environment, ensuring access to education and healthcare that can address climate-related health issues, and preserving a stable climate for future generations.

Children's health is particularly vulnerable to a number of direct and indirect climate change impacts, including for example the impacts of air pollution from wildfires and from burning of fossil fuels; the adverse developmental impacts of undernutrition; and risks to mental and physical health when facing displacement due to extreme weather or other climate shocks. States' differentiated obligations towards children are a testament to their moral and ethical duty to protect the most vulnerable members of society from the consequences of climate change. Recognizing and addressing these unique responsibilities is pivotal in charting a path towards a sustainable and just future for all.

5. State Obligations in Consultation and Judicial Proceedings (Question 2D)

Within the complex landscape of climate governance, the role of States in consultation procedures and judicial proceedings is crucial. Article 9 of the Paris Agreement solidifies this role by affirming the right of individuals and communities to access justice and seek effective remedies when they are adversely affected by climate change.

This provision ensures that citizens and communities have a voice and legal recourse in cases where climate policies or actions may harm them. It reflects the principle that accountability and transparency are cornerstones of effective climate action. States, therefore, have a dual responsibility: first, to create avenues for meaningful public participation in climate decision-making, and second, to ensure that justice is accessible to those who seek it due to the impacts of climate change.

In essence, this obligation underlines that the fight against the climate emergency is not just a top-down process but one that engages all levels of society. It reinforces the idea that individuals

and communities must have the means to hold governments and corporations accountable for their actions, or lack thereof, in addressing the climate crisis.

6. Protection of Vulnerable Groups (Question 2E)

The climate emergency disproportionately affects vulnerable groups and the health of vulnerable groups, including territorial and environmental defenders, women, indigenous peoples, and Afro-descendant communities. State obligations to protect these communities are deeply rooted in international agreements, reflecting a commitment to safeguarding the rights and well-being of those most affected by climate change.

These obligations find expression in instruments such as the UN Declaration on the Rights of Indigenous Peoples and the Convention on the Elimination of All Forms of Discrimination Against Women. They require States to not only mitigate climate change but also to adopt policies and practices that ensure the resilience and security of these vulnerable groups.

Protecting these communities means recognizing their unique knowledge, cultures, and rights. It involves consulting and involving them in decision-making processes that affect their territories and livelihoods. Moreover, it necessitates robust measures to prevent and respond to environmental and human rights abuses often suffered by these groups in the context of climate change.

7. Shared and Differentiated Human Rights Obligations (Question 2F)

The climate emergency presents a global challenge that requires a shared commitment to uphold human rights. Various international agreements, including the Universal Declaration of Human Rights and the International Covenant on Economic, Social, and Cultural Rights, underscore the importance of human rights in the context of climate change.

Central to this concept is the principle of "common but differentiated responsibilities," recognizing that while all States share the responsibility to address climate change, developed nations must take a lead role. This entails not only reducing emissions within their own borders but also providing financial support and technological assistance to vulnerable countries to help them mitigate and adapt to climate change.

These obligations reflect a collective recognition of the intertwined nature of human rights and climate action. They emphasize that addressing the climate crisis is not merely an environmental or economic imperative but a moral and ethical one. Upholding human rights in the face of

climate change demands concerted global efforts, ensuring that no one is left behind in the pursuit of a sustainable and just future.

8. Existing Mechanisms and their Relation to Health

To address climate change's impact on health, several mechanisms have been established, including the UNFCCC formation and the Paris Agreement. These mechanisms recognize the link between climate change and health, emphasizing the need to protect human health from climate impacts.

- UNFCCC formation: The UNFCCC acknowledges the relationship between climate change and health, underscoring the importance of protecting human health from climate impacts (Article 2) committing to adaptation and mitigation considerations and actions in order to minimize the adverse effects of climate change on public health and on the quality of the environment. Expanding on this, the Preamble to the Paris Agreement states that "parties should, when taking action to address climate change, respect, promote and consider their respective obligations on [...] the right to health".²⁹
- The Glasgow Climate Pact, established at COP26, stands as a significant attempt to enhance global climate action in light of the insufficient progress made under the Paris Agreement. The Pact underscores the critical need for accelerated efforts by nations, especially major emitters, calling for robust emissions reduction commitments, amplified financial support from developed nations to developing countries, and enhanced transparency and accountability in climate action reporting.
- UN Human Rights Council resolution on the right to a clean and healthy environment was adopted by the General Assembly On 28 July 2022 with states as primary duty-bearers in realizing it, but also Courts.³⁰ The substantive elements of this right include clean air; a safe and stable climate; access to safe water and adequate sanitation; healthy and sustainably produced food; non-toxic environments in which to live, work, study and play; and healthy biodiversity and ecosystems.
- Sharm El Sheikh: The Sharm El Sheikh conference recognised the human right to a clean, healthy, sustainable environment and highlighted health as a crucial aspect of climate adaptation, emphasizing the need for healthcare infrastructure resilience.

²⁹ The Paris Agreement, *United Nations Framework Convention on Climate Change (UNFCCC)* 2016, https://unfccc.int/sites/default/files/resource/parisagreement_publication.pdf

³⁰ UNGA, The human right to a clean, healthy and sustainable environment, A/RES/76/300 (28 July 2022).

Although these mechanisms represent a step forward in safeguarding the environment and health, they are still insufficient to reach the goals outlined in the Paris Agreement, which in turn, would protect millions of lives from the effects of climate change.

9. Challenges in Climate and Health Integration

The endeavor to integrate climate and health initiatives faces a series of challenges. Even with established mechanisms and frameworks in place, the journey toward effective integration remains an uphill battle. Three pivotal challenges stand out prominently, collectively impeding the holistic safeguarding of public health amidst the ever-mounting specter of climate change.

a. Slow Progress: Perhaps one of the most frustrating aspects of this challenge is the glacial pace of progress in integrating climate and health considerations into policy frameworks and practical applications. Despite an expanding body of scientific evidence unequivocally linking climate change to an array of health impacts, and clear evidence supporting the joint benefits for climate, health, and economies of climate policies designed with health in mind, the translation of this knowledge into actionable policies and practices has been frustratingly sluggish. This protracted delay in weaving climate and health into decision-making processes compounds the vulnerability of communities already grappling with the burgeoning consequences of climate change. Furthermore, this inertia not only exacerbates existing vulnerabilities but also results in irreversible loss and damage, further burdening already strained systems, including health systems, and communities.

b. Lack of Prioritization: Another significant hurdle is the lamentable lack of prioritization. All too often, climate change and health concerns find themselves relegated to the fringes of political agendas, institutional planning, and community discourse. This failure to accord them the urgency they merit leads to disjointed, piecemeal efforts that leave susceptible populations exposed to greater risks³¹.

c. Inadequate Finance: Perhaps the most pressing of these challenges is the perennial issue of ill spent financial resources. Although health was recognized as a priority topic by 83% of NDCs from LAC, most NDCs do not commit to specific health actions, translating to less than 0.5% of multilateral climate finance for LAC countries allocated to health initiatives.³² In Colombia, heat-mortality costs have more than quadrupled over the past 20 years. Heat not only affects workers' health but also their labour productivity,

³¹ Hartinger, Stella M., et al. "The 2022 South America Report of The Lancet Countdown" (see pg 2., footnote 3)

³² Yglesias-González, Marisol, et al. "Code Red for Health Response in Latin America and the Caribbean: Enhancing Peoples' Health through Climate Action." *The Lancet Regional Health - Americas*, vol. 11, July 2022, p. 100248. DOI.org (Crossref), <https://doi.org/10.1016/j.lana.2022.100248>.

generating potential income losses that could affect the wellbeing of themselves and their families. In 2020, the monetised costs of premature mortality due to air pollution in SA were equivalent to the average income of 2.9 million people. Chile and Peru registered the highest losses, equivalent to 1.57% and 0.83% of their GDP.³³ While the interconnectedness of climate change and public health is increasingly evident, the resources allocated to combat this symbiotic threat often fall short. The insufficiency of financial backing restricts the development and execution of critical projects and programs aimed at fortifying public health in an era of environmental upheaval. In 2019, South American countries spent US\$27.9 billion on fossil fuel subsidies.³⁴ Eliminating these subsidies and redirecting these funds to health, education, or zero-carbon energy can aid vulnerable households possibly affected by rising energy prices, thereby potentially boosting overall health and wellbeing and foster a healthy, low-carbon shift.

To surmount these challenges, a concerted and resolute effort is required. Adequate funding must be secured, not merely as an investment but as an imperative for safeguarding human health. Prioritization should be paramount, with climate and health concerns elevated to the forefront of political and societal consciousness. Furthermore, the pace of progress must be accelerated, translating scientific insights into real-world strategies promptly. Only through such determined actions can we hope to bridge the gap between climate and health, ensuring the comprehensive protection of public health in the face of an ever-evolving climate landscape.

10. Conclusion

In conclusion, States are bound by a complex web of legal obligations and principles derived from international agreements such as the American Convention and the Paris Agreement. These obligations encompass prevention, protection of vulnerable groups, and consideration of future generations in climate actions. Mechanisms and initiatives underscore the importance of health in climate responses but face persistent challenges in implementation. To address the climate emergency's impact on health effectively, States must prioritize these legal duties and work individually and collectively to overcome existing hurdles. Developing countries at the same time, being underprepared to respond and adapt to the climate impacts, should leverage the opportunity that climate action represents for health and the economy, thus leading the way to healthier and more equitable societies that are more resilient to the climate challenges, and fostering the ability of populations to enjoy their human rights.

III. RECOMMENDATIONS

³³ Hartinger, Stella M., et al. "The 2022 South America Report of The Lancet Countdown" (see pg 2., footnote 3)

³⁴ Hartinger, Stella M., et al. "The 2022 South America Report of The Lancet Countdown" (see pg 2., footnote 3)

We support the call of Chile and Colombia for inter-american standards to accelerate the response to the climate emergency with clear national responsibilities that protect both human and environmental health. We urge the Court to move swiftly towards recommending actions that have climate and health co-benefits, such as phasing out fossil fuels, eliminating “sacrifice zones”, investing in resilience of health systems and populations, clean technologies, and protecting natural ecosystems. As countries develop, it is their responsibility to ensure that their development pathway optimally protects their people’s health, and does not saddle them with development that comes at the cost of serious health impacts in the long term due to outdated technologies.

Overarching Principles

States have the obligation to protect the environment as part of their responsibility to protect human life. When considering equitable protection of all communities, the State should consider the ability of these communities to protect themselves from the effects of a changing climate. Children, the elderly, low-income individuals and indigenous and tribal communities are disproportionately impacted by the health consequences of climate change and often unequipped to protect themselves from them. As such, the State has a duty to provide these communities with an appropriate amount of protection from climate change through mitigation as well as resources to adapt to climate-related events. To meet these challenges, we encourage the States to ***Take decisive action to limit global warming to 1.5°C and ensure a healthy and equitable future for all***, while considering the following principles which preserve both human and environmental health:

1. Prioritizing and advancing environmental protections based on scientific evidence

- a. **States should prioritize health and environmental considerations when evaluating new projects and legislation.** When doing so, States should invoke the principle of non-regression as a means of protecting health, obligating them to advance rather than weaken environmental protections in order to prevent catastrophic health consequences. This includes mandating comprehensive environmental, health and social impact assessments for major projects and policies.
 - **Example:** The Colombian Environmental Licensing Authority (ANLA) made the decision by rejecting ConocoPhillips' request to conduct hydraulic fracturing pilot tests. ANLA cited insufficient information on water management and environmental evaluation, highlighting its

commitment to thorough environmental assessments.³⁵ This decision underscores Colombia's commitment to transitioning to clean energy sources and mitigating the adverse effects of fossil fuel dependence.

- Health co-Benefits: Fracking is associated with water contamination, exposure to chemical spills, the inhalation of silica and other hazardous air pollutants, and an increased risk of both cancer and other noncancerous health consequences resulting in shorter life expectancies.³⁶ ANLA's decision to ban fracking reflects the Colombian government's commitment to prioritize human health while moving towards a greener energy future.

b. **New tools and legislation should be informed by rigorous scientific evidence.**

This necessitates additional funding for research into environmental issues. This should include studies that incorporate knowledge from indigenous and marginalized communities, who are often left out of the scientific dialogue but may have a wealth of knowledge on the subject.³⁷ Furthermore, as per the Escazú Agreement, the public has the right to access this information and its sources in a way that is accessible, allowing people to make informed decisions when voting on new policies.

- Example: Colombia and Costa Rica have both adopted a green taxonomy, which is a classification tool that allows lenders and borrowers to identify economic activities that contribute to specific environmental targets. These tools use existing information to critically evaluate projects and channel private sector capital towards projects that align with national environmental goals. A green taxonomy is one example of how scientific information can and should be translated into accessible formats and used to make key decisions across sectors.³⁸
- Health co-benefits: Ensure that new legislation is founded on solid scientific evidence. Including insights from marginalized communities offers crucial health benefits. This approach aids in effectively tackling key environmental health determinants, leading to improved air and water quality, and reducing related illnesses. Inclusive research involving indigenous and marginalized communities uncovers unique insights into sustainable health and well-being, promoting policies that prioritize health equity and environmental justice. Moreover, public access to such

³⁵ Griffin, Oliver, and Oliver Griffin. "Colombia Judge Orders Suspension of Fracking Pilot Project." *Reuters*, 21 Apr. 2022. www.reuters.com,

<https://www.reuters.com/business/energy/colombia-judge-orders-suspension-fracking-pilot-project-2022-04-21/>. Accessed 2 Oct 2023.

³⁶ "Hydraulic Fracturing & Health." *National Institute of Environmental Health Sciences*, <https://www.niehs.nih.gov/health/topics/agents/fracking/index.cfm>. Accessed 2 Oct. 2023.

³⁷ *Forest Governance by Indigenous and Tribal Peoples. An Opportunity for Climate Action in Latin America and the Caribbean*. FAO, 2021. *DOI.org (Crossref)*, <https://doi.org/10.4060/cb2953en>. Accessed 4 Oct 2023.

³⁸ "Colombia: Leading the Path to Sustainability in Latin America." *World Bank*, <https://www.worldbank.org/en/news/feature/2022/08/31/colombia-leading-the-path-to-sustainability-in-latin-america>. Accessed 3 Oct. 2023.

environmental information empowers individuals and communities. It allows them to make informed decisions, engage actively in policy discussions, and advocate for their health and environmental rights. Ultimately, such an evidence-based and inclusive approach significantly enhances the effectiveness of legislation, ensuring superior health and environmental outcomes for all communities.

- c. **Establish environmental monitoring agencies with the authority to enforce regulations.** Without monitoring and enforcement, regulations establishing strict environmental protections are moot. The State's duty to continue to advance environmental and health protections (non-regression) is intrinsically linked to its responsibility to ensure that such protections are upheld, particularly in the face of opposition, corruption, and violence.
- **Example:** Brazil has long had a Forest Code, mandating that private landowners in ecologically sensitive areas keep portions of their land undeveloped. This law, which can be traced back to 1934, has undergone significant revisions, including an amendment in 2012 which pardoned illegal deforestation that occurred prior to 2008 and lessened protections for existing forests. Unfortunately, even with less stringent protections the law is not being strictly enforced, as evidenced by record emissions from Amazon deforestation in recent years.³⁹
 - **Health co-benefits:** Establishing empowered environmental monitoring agencies directly bolsters public health. By enforcing adherence to environmental standards, these agencies mitigate the health risks associated with environmental degradation and pollution, reducing exposure to harmful elements.
- d. **Develop targeted policies and strategies to promote and protect the health and wellbeing of, with, and for vulnerable communities including low-income urban areas, sacrifice zones, rural communities and tribal areas.** Policies that affect marginalized communities should be created with direct input and feedback from these communities. This is particularly important for communities that are not represented in governing bodies, such as tribal and indigenous communities, as well as ethnic minority groups. Working with trusted community liaisons, inviting community leaders to provide input on local measures, and ensuring that information is disseminated equitably in both oral and written formats and in local languages/dialects is necessary to ensure that policies and projects reflect the real, and not perceived, needs and challenges of each community.
- **Example:** Bolivia emerged as a global leader in Indigenous rights by adopting the UN Declaration on the Rights of Indigenous Peoples in its

³⁹ Gatti, Luciana V., et al. "Amazonia as a Carbon Source Linked to Deforestation and Climate Change." *Nature*, vol. 595, no. 7867, July 2021, pp. 388–93. DOI.org (Crossref), <https://doi.org/10.1038/s41586-021-03629-6>.

domestic law and constitution under President Morales. He dissolved the Ministry of Indigenous and First Peoples Affairs to integrate Indigenous demands into all government aspects. Bolivia's democracy transformed, emphasizing Indigenous citizenship and introducing participatory democracy elements like recall referendums and citizen-led initiatives. The government aimed to decolonize, depatriarchalize, and promote plurinationality and Indigenous autonomy. The Andean Indigenous principle of "living well" guided development, emphasizing harmony, wealth redistribution, diversity, and environmental respect within a communal framework.⁴⁰

- **Health co-benefits:** Involving vulnerable communities in policy creation ensures that measures taken are relevant, culturally sensitive, and effective in promoting their health and well-being. This inclusive approach ensures equitable dissemination of information and resources, empowering marginalized groups to make informed health decisions and access necessary resources. It also promotes social equity and health equality by ensuring that even the most underrepresented communities have their health needs acknowledged and addressed, leading to more comprehensive and inclusive health and well-being outcomes for all.

2. **Creating a pathway to phase-out coal, oil, and fossil gas.** Decarbonization offers States the opportunity to adhere to the goals of the Paris Agreement while greatly improving population health. By phasing out fossil fuels, States make the choice to protect their community from respiratory and cardiovascular illnesses, cancers, and the degradation of natural resources, improving the health of current and future generations.

a. **Access to clean energy for all.** When phasing out fossil fuels and investing in renewable energy, the State should ensure equitable access to reliable, affordable clean energy supply for all, including rural and low-income communities not on the current energy grid. Strategic energy investments in these communities can not only accelerate a just transition, but can reduce gender, health and educational inequities.

- **Example:** After Hurricane Maria devastated Puerto Rico's electricity grid in 2017, the island has been investing in solar energy and storage, which has the potential to produce four times the amount of energy that the island needs. Furthermore, solar panels have just a 0.05% failure rate when it comes to reliability and lifespan, and can allow dialysis centers

⁴⁰ Rice, Roberta. "Indigenous Political Representation in Latin America." *Oxford Research Encyclopedia of Politics*, by Roberta Rice, Oxford University Press, 2017. *DOI.org (Crossref)*, <https://doi.org/10.1093/acrefore/9780190228637.013.243>.

and clinics to remain operational even when the power grid fails. For example, Hurricane Fiona, a category 1 storm, cut power across the entire island in 2022, but many homes, clinics and dialysis centers that had installed generators or rooftop solar panels were spared.⁴¹ Electrification also has benefits for gender equity. In Sub Saharan Africa, studies have found that access to electricity reduces the time women spend on household chores like cooking and washing, freeing up their time for other productive activities or leisure. Electrification also creates opportunities for women to join the labor force or focus on education, contributing to economic empowerment and financial independence. It enables access to reliable lighting and healthcare facilities, reducing maternal mortality rates and enhancing overall safety for women and newborns, and allows for increased access to information which challenge inequitable gender roles and norms, reducing acceptance of gender-based violence.⁴²

- **Health co-benefit:** Universal access to clean energy leads to a significant reduction in air pollution from fossil fuel combustion, lowering the incidence of respiratory and cardiovascular issues. Cleaner air and the promotion of sustainable energy solutions concurrently contribute to overall public health, reduce health inequality, and help in mitigating climate change, further preventing climate-related health issues.

b. **Accelerate a just transition by incentivizing local and community-based renewable energy projects.** States should consider distributional justice (analyzing who will benefit from energy generation), procedural justice (transparency, equitable access to information, and meaningful participation in decision making), recognitional justice (the need to include those who have been traditionally excluded from energy justice debate) and the right to resist and oppose unjust energy transitions when moving towards clean energy.⁴³ Involving local communities in decisions about energy projects and supporting small businesses mitigates many of the human rights injustices that can occur as a result of hasty energy transitions.

- **Example:** Various entities in the Dominican Republic have partnered with the National Renewable Energy Laboratory (NREL) to explore funding options for solar and energy-efficient systems in public hospitals and other facilities like schools. This collaboration is also enhancing technical

⁴¹ “Solar Power Is Helping Some Puerto Rico Homes Avoid Hurricane Fiona Blackouts.” *Time*, 20 Sept. 2022, <https://time.com/6215138/solar-power-puerto-rico-hurricane-fiona/>. Accessed 4 Oct 2023.

⁴² “Powering Households and Empowering Women: The Gendered Effects of Electrification in Sub-Saharan Africa.” *Journal of Public and International Affairs*, <https://jpia.princeton.edu/news/powering-households-and-empowering-women-gendered-effects-electrification-sub-saharan-africa>. Accessed 5 Oct. 2023.

⁴³ *Renewable Energy (in)Justice in Latin America*. Business and Human Rights Resource Centre, Aug. 2021, https://media.business-humanrights.org/media/documents/RE_LATAM_final_English.pdf.

expertise in photovoltaic deployment and building retrofits, and has the potential to guide on policy design. NREL is further considering partnering with a non-profit focused on clean energy and corporate social responsibility to offer energy audit training to its member companies.⁴⁴

- **Health co-benefits:** Transitioning to renewable energy sources reduces exposure to air pollution, a major health risk associated with fossil fuel combustion. The reduction in air pollution results in fewer cases of respiratory and cardiovascular diseases, improving overall public health. Additionally, the implementation of community-based renewable energy projects helps in mitigating climate change, which in turn, reduces the health risks associated with extreme weather events and climate-related diseases. These local projects also encourage community engagement and participation, leading to increased public awareness and education on health and environmental issues, and promoting overall community well-being and resilience against climate-related health risks.

c. **Improve national air quality standards.** National standards must reflect WHO air quality guidelines, the goals of the Paris Agreement, and the urgent need to phase out fossil fuels.

- **Example:** In Latin America and the Caribbean (LAC), actions have been taken to combat air pollution, including regional initiatives like the Actions on Air Quality and the Central America Regional Strategy for Climate Change. Many LAC governments have implemented measures such as air quality monitoring, waste management, cleaner production, and sustainable transport. Nonetheless, some countries lack current frameworks for reducing air pollution, leading to policy implementation delays. Addressing air quality is essential for achieving both health and climate goals, as air pollution and climate change share common drivers and emissions sources, impacting human health and Sustainable Development Goals.⁴⁵
- **Health co-benefits:** Enhanced air quality standards help in reducing the exposure to hazardous pollutants. This reduction plays a crucial role in minimizing the risk of some cancers, cardiovascular diseases (including strokes), as well as asthma and other respiratory diseases, leading to an improved quality of life and increased life expectancy.

⁴⁴ *Country and Regional Projects in Latin America and the Caribbean.*

<https://www.nrel.gov/international/projects-latin-america-caribbean.html>. Accessed 4 Oct. 2023.

⁴⁵ Pedraza, Jenniffer. "Clearing the Air: Advancing Regional Efforts for Clean Air in Latin America and the Caribbean." *SEI*, 6 Sept. 2023, <https://www.sei.org/perspectives/clearing-the-air/>. Accessed 3 Oct 2023.

- d. **Eliminate sacrifice zones.** By ensuring that no community is “sacrificed” i.e. subject to disproportionate and unsafe levels of industrialization and pollution, we can reduce the disease burden in vulnerable urban communities while mitigating climate change. Eliminating sacrifice zones will require a multifaceted approach involving monitoring pollution levels (including volatile organic compounds and other pollutants such as arsenic not previously included in metrics), transitioning to clean, renewable energy, and ensuring that residents of sacrifice zones are not economically impacted by this transition.⁴⁶
- **Example:** The closure of Chile's coal-fired thermoelectric power plants, a significant step in the Decarbonization Plan, is in progress, with eight plants already closed and others slated for closure. However, the legacy of coal dependency has taken a toll on areas like Quintero and Puchuncaví, known as "sacrifice zones." These regions have faced pollution, health issues, and the decline of traditional livelihoods. Environmental challenges persist as projects and industrial operations continue. While there are signs of hope, justice for affected communities remains elusive, emphasizing the need for a just transition and community involvement in environmental recovery. Chile has an opportunity to set an example of a fair transition.⁴⁷
 - **Health co-benefits:** This aligns with human rights principles and carries substantial health advantages. Ensuring that no community bears an undue share of environmental harm contributes to a significant reduction in disease prevalence in vulnerable urban areas. It minimizes exposure to harmful pollutants and industrial by-products, decreasing the incidence of respiratory, cardiovascular, and other pollution-related health conditions. This equitable approach to environmental health and safety fosters the well-being of all communities, supports the right to a healthy living environment, inter-generational rights and aligns with broader global commitments to combat climate change, as outlined in the Paris Agreement.
- e. **Ensure and enforce legal protections for environmental advocates.** Activists, particularly women, children, and members of indigenous communities face threats of violence when advocating for environmental protection and the health and safety of themselves and their communities. Multiple activists have been killed in recent years, which indicates a failure of the State to protect the right to life (Article 4 of the American Convention), to respect rights, (Article 1) as well

⁴⁶ Ramos Miranda, Natalia. “In Chile’s Polluted ‘sacrifice Zones,’ Residents Seek Respite in New Constitution.” *Reuters*, 22 Dec. 2020. [www.reuters.com](https://www.reuters.com/article/us-chile-environment-constitution-idUSKBN28W1CH), <https://www.reuters.com/article/us-chile-environment-constitution-idUSKBN28W1CH>.

⁴⁷ Lux, Cristina. “When the Energy Transition Isn’t Just: The Case of Quintero and Puchuncaví in Chile.” *Interamerican Association for Environmental Defense (AIDA)*, 21 July 2023, <https://aida-americas.org/en/blog/when-the-energy-transition-isn-t-just-the-case-of-quintero-and-puchuncavi-in-chile>

as to protect freedom of thought and expression (Article 13), freedom of association (Article 14), and the right of judicial protection (Article 25). Ensuring that legal protections for environmental activists are in place and enforced, particularly in sacrifice zones and contested areas, is crucial to set the stage for collaboration between local communities and the government in future efforts to preserve the climate and human health.

- Example: Article 9 of the Escazú Agreement 1) guarantees a safe environment that enables the defense of human rights in environmental matters, 2) to take adequate and effective measures to recognize, protect and promote all the rights of defenders and 3) to prevent, investigate, and punish attacks on, threats against or intimidation of human rights defenders in environmental matters. While the Escazú agreement represents a major milestone in defending environmental advocates, further progress can be made in ensuring that there are legal consequences for violence and harassment of environmental advocates. The Escazú Agreement also emphasizes the importance of equitable sharing of information and government actions must reflect this. For example, the draft index of the Action Plan on Human Rights Defenders on Environmental Matters in Latin America and the Caribbean, presented in April 2023, was open for public comment but only until July, and only accepted comments online, making it nearly impossible for many indigenous and tribal peoples to participate.⁴⁸
- Health co-benefits: Many environmental advocates represent youth, women, and indigenous communities, as well as people from areas most affected by climate change. In accelerating a just transition, it is imperative to invite their voices into the conversation about environmental and human health. Protecting the right to free speech, respect, and life for all, including environmental advocates, ensures that the interests of marginalized populations are integrated into holistic environmental and health policies that represent the needs of the entire community.

- f. **Cut methane emissions rapidly from fossil fuels, agriculture and food systems and waste.** Methane, a potent greenhouse gas, adversely impacts human health and exacerbates climate change. It contributes to ground-level ozone formation, harming air quality, and methane co-pollutants contaminate air, water, and soil. Immediate and substantial health benefits can be achieved by reducing methane emissions, which remain in the atmosphere for 12 years. Over half of methane

⁴⁸ *PUBLIC CONSULTATION ON THE PROPOSED ANNOTATED INDEX OF THE ACTION PLAN ON HUMAN RIGHTS DEFENDERS ON ENVIRONMENTAL MATTERS IN LATIN AMERICA AND THE CARIBBEAN.*
<https://publicoescazu.cepal.org/en/projects/evaluation-of-the-proposed-actions/1>. Accessed 5 Oct. 2023.

emissions are from human activities, with agriculture (40%), energy (35%), and waste (20%) being major contributors.

- **Example:** The Global Methane Pledge, signed by 150 countries, aims to reduce emissions. Transformational changes in energy, agriculture, and waste management are needed, along with readily available technical solutions that could cut methane emissions by 45% by 2045, offering significant health and climate benefits.⁴⁹
- **Health co-benefits:** A 45% reduction in human-caused methane emissions by 2030, totaling 180 million tonnes annually, would significantly curb the formation of ground-level ozone. Beyond 2040, this would yield substantial global benefits, including preventing 255,000 premature deaths, 775,000 asthma-related hospitalizations, and 73 billion hours of labor lost due to extreme heat. Moreover, it would save 26 million tonnes of crops annually, particularly wheat, maize, soybeans, and rice, equivalent to 1-2% of global yields in 2020, making it crucial for a growing world population.⁵⁰

3. Ensure universal access to sustainable, low-carbon and affordable healthcare.

Access to sustainable and affordable healthcare can and should be part of a holistic adaptation and mitigation strategy. Healthcare currently accounts for around 5% of all greenhouse gas emissions. At the same time, it is particularly vulnerable to the effects of climate change, with 77% of all hospitals in the AMRO/PAHO region at high risk of damage during extreme hurricanes, earthquakes or flooding.⁵¹ As climate-related weather events continue to increase in frequency and intensity and have widespread health consequences, it is the obligation of States to ensure that their population is protected by a robust and resilient health care system. This necessitates investments in renewable energy sources that allow hospitals and clinics to remain operational when currently existing power sources are unavailable, the expansion of mobile and dynamic primary health networks that allow isolated and migrant populations to continue to access care even if displaced, and widely available, affordable healthcare.

- a. **Example:** The Pan American Health Organization (PAHO) has created a SMART hospitals toolkit, detailing ways to make healthcare buildings and operations more

⁴⁹ Linh Nguyen, Amanda Quintana, Amy Rowland, and Gabriel Vegh-Gaynor. Mitigating Methane: A Global Health Strategy - Overview. Abt Associates and Global Climate and Health Alliance. August 2023. <https://climateandhealthalliance.org/initiatives/methane-health/>

⁵⁰ Kuylenstierna, Johan, et al. "Why We Must Reduce Methane Emissions Now to Solve the Climate Crisis." *SEI*, Stockholm Environment Institute, 12 May 2021, <https://www.sei.org/features/why-we-must-reduce-methane-emissions-now-to-solve-the-climate-crisis/>.

⁵¹ Belize - Healthcare facilities combating the effects of climate change – Post Hurricane Lisa, <https://www.who.int/about/accountability/results/who-results-report-2020-mtr/country-story/2022/healthcare-facilities-combating-the-effects-of-climate-change--post-hurricane-lisa#:~:text=According%20to%20the%20Plan%20of,during%20and%20after%20a%20disaster>. Accessed 5 Nov. 2023.

resilient, mitigate their impact on the environment and reduce pollution. This process can reduce both costs and greenhouse gas emissions, while achieving adaptation, risk reduction and development benefits.⁵²

- b. **Health co-benefits:** Ensuring universal, sustainable, and low-carbon healthcare upholds the fundamental right to health and well-being. It mitigates the healthcare sector's environmental impact, reducing global greenhouse gas emissions and the associated health issues from pollution. This transition prioritizes equity in health access, affirming that every individual, regardless of their socio-economic status, is entitled to quality healthcare. This approach aligns with the principles of the Universal Declaration of Human Rights by promoting the inherent dignity and equality of all individuals, ensuring their right to a healthy living environment and access to healthcare, and addressing broader environmental and social determinants of health.
4. **Support sustainable land management practices:** Supporting sustainable land management practices is crucial for upholding human rights, including the right to a healthy environment and an adequate standard of living. It emphasizes efficient and responsible resource use, preserving the environment for future generations and protecting the rights and well-being of indigenous and local communities.
- a. **Stop deforestation and conserve existing ecosystems.** According to the UN's State of the World's Forests Report in 2020, there are 8 million people in Latin America who depend on the forest, representing 82 percent of the region's rural extreme poor population. For these individuals and communities, defending the environment equates to defending their livelihoods, health, water, food sources and culturally significant sites.⁵³ Ceasing deforestation, expanding protections for natural areas and tribal lands, and supporting local and community-led conservation efforts ensure protection of entire ecosystems, which includes the protection of human life and land sovereignty.
 - **Example:** The Maya Biosphere Reserve (MBR), established by the Guatemalan government and UNESCO in 1990, spans 2.1 million hectares and is Central America's largest natural forest block. It comprises over two dozen management units, including 10 community forest concessions, where communities are permitted to sustainably earn a living from the forest through businesses focused on tree nuts, palm fronds, and timber adhering to the Forest Stewardship Council's standards. Community forestry has proven highly effective in conserving the forest, with

⁵² *Smart Hospitals Toolkit - PAHO/WHO | Pan American Health Organization.*

<https://www.paho.org/en/health-emergencies/smart-hospitals/smart-hospitals-toolkit>. Accessed 5 Oct. 2023.

⁵³ *The State of the World's Forests 2020.* FAO and UNEP, 2020. *DOI.org (Crossref)*, <https://doi.org/10.4060/ca8642en>.

near-zero deforestation rates in the original nine concessions for two decades. Furthermore, this approach has led to the creation of over 100 forest businesses, generating 12,000 jobs with significant female leadership and benefits for more than 45,000 people from 2013 to 2021. Additionally, these businesses generated \$69.6 million in total sales, contributing to lower poverty rates compared to other parts of Guatemala and reducing outmigration from concession communities.⁵⁴

- **Health co-benefits:** Sustainable land management in collaboration with local communities protects vital ecosystems and also reduces exposure to air pollution caused by forest fires and land clearing activities, which can lead to respiratory problems and other health issues. It also ensures the availability of clean water sources, which are essential for drinking and sanitation, thereby promoting better health outcomes for communities dependent on these ecosystems.

- b. **Encourage local, sustainable farming and livestock practices and regenerative agriculture.** Each year, the world loses approximately 5 million hectares of forest, 95% in the tropics. Brazil alone loses approximately 1.7 million hectares of forest yearly, making it the country with the highest rate of tropical deforestation in the world. Deforestation is driven in large part by agriculture, with the expansion of pasture land to raise cattle being responsible for 41% of tropical deforestation, particularly in Brazil. In fact, most deforestation in Latin America occurs for beef production: 72% of deforestation in Brazil is driven by cattle ranching, and 11% of deforestation in other LAC regions such as Argentina and Paraguay is driven by beef production.⁵⁵ Reducing the consumption of beef and dairy products is associated with a reduction in greenhouse gasses and improvements in health, including a lower incidence of stroke and heart disease. There are possible paths to sustainable and regenerative agriculture which preserve and restore the ecosystem while providing valuable economic opportunities for farmers.^{56,57}

We encourage governments to support small farms to adopt evidence-based, locally-feasible methods of ecological farming, encourage the consumption of more nutritious diets, as well as to reinforce regulation and inspection to prevent illegal deforestation.

⁵⁴ Nerger, Matt. "Community: The Secret to Stopping Deforestation in Guatemala." *Rainforest Alliance*, 1 June 2022, <https://www.rainforest-alliance.org/in-the-field/community-the-secret-to-stopping-deforestation-in-guatemala/>.

⁵⁵ Ritchie, Hannah, and Max Roser. "Cutting down Forests: What Are the Drivers of Deforestation?" *Our World in Data*, Oct. 2023. [ourworldindata.org](https://ourworldindata.org/what-are-drivers-deforestation), <https://ourworldindata.org/what-are-drivers-deforestation>.

⁵⁶ Nordborg, Maria. *Holistic Management - a Critical Review of Allan Savory's Grazing Method*. SLU/EPOK – Centre for Organic Food & Farming & Chalmers, 2018, https://orgprints.org/id/eprint/34330/1/holisticmanagement_review.pdf.

⁵⁷ Zaks, Laura. "The 'Sweet Spot' for Farms to Enhance On-Farm Biodiversity." *National Sustainable Agriculture Coalition*, 11 Jan. 2022, <https://sustainableagriculture.net/blog/the-sweet-spot-for-farms-to-enhance-on-farm-biodiversity/>.

- Example: Coopcerrado, a cooperative of 5,000 families, received the United Nations' Equator Prize in the "New Nature Economies" category for its two-decade effort in creating a farmer-to-farmer model in Brazil's threatened Cerrado savanna. This model fosters mutual support for training, commercializing, and establishing organic and regenerative businesses. The Cerrado is a critical biodiversity hotspot facing destruction from agriculture, but this cooperative's collective approach has helped restore the biome while providing income for vulnerable families, overcoming bureaucratic and logistical challenges to bridge small farmers and traditional communities into mainstream markets.⁵⁸
- Health co-benefits: Encouraging sustainable agriculture reduces the need for deforestation, leading to improved air quality, particularly in areas prone to forest fires. This, in turn, lowers the risk of respiratory diseases and related health problems for local populations. Additionally, transitioning to sustainable livestock practices can reduce the consumption of red meat, lowering the risk of heart disease and stroke, thus benefiting public health.

c. **Integrate tribal land stewardship and sovereignty into conservation efforts.**

Indigenous peoples inhabit 404 million hectares in Latin America and the Caribbean, roughly 20% of the region's total area. Of this, 60% (237 million hectares) lies in the Amazon Basin. These territories house about 35% of the region's forests and store approximately 34,000 million metric tons of carbon, accounting for 30% of Latin America's forest carbon and 14% globally. These territories also support rich biodiversity and protection of these territories helps prevent zoonotic disease outbreaks. Indigenous territories typically experience lower deforestation rates than other forest areas, with some matching or surpassing non-indigenous protected areas in conservation effectiveness. While covering 28% of the Amazon Basin, indigenous territories contribute only 2.6% of carbon emissions. Factors contributing to their low impact include cultural knowledge, territorial rights recognition, forest policies, land use restrictions, and sustainable, small-scale agricultural practices.⁵⁹ Entrusting tribal communities with the management of their native lands protects vulnerable communities and ecosystems while preserving indigenous languages and information.

- Example: Favorable community forestry policies in Mexico have enabled indigenous communities to generate substantial income through sustainable timber production. This income incentivizes these

⁵⁸ Hanbury, Shana. "Brazil Farming Co-Op Carves a Sustainable Path through Agribusiness Stronghold." *Mongabay Environmental News*, 11 Oct. 2021, <https://news.mongabay.com/2021/10/brazil-farming-co-op-carves-a-sustainable-path-through-agribusiness-stronghold/>.

⁵⁹ *Forest Governance by Indigenous and Tribal Peoples*. FAO, 2021. (see pg. 17, footnote 26)

communities to maintain forest cover, contributing to low deforestation rates in areas like the Sierra Norte of Oaxaca and Southern and Central Quintana Roo. Many indigenous forest enterprises in Mexico reserve a significant part of their forests for conservation and harvest less timber than allowed by their management plans to ensure resource sustainability.⁶⁰

- **Health co-benefits:** Integrating tribal land stewardship and sovereignty into conservation efforts not only safeguards the environment but also supports the health, well-being, and economic prosperity of indigenous communities. By empowering indigenous people to manage their ancestral lands, it reduces their exposure to environmental hazards associated with deforestation, such as air and water pollution, which can lead to respiratory and waterborne illnesses. Furthermore, when indigenous communities maintain their traditional lifestyles and diets, it often results in healthier eating habits, which can lower the prevalence of diet-related diseases such as diabetes and obesity. Additionally, the preservation of indigenous knowledge about medicinal plants and traditional healing practices can contribute to improved healthcare options and the development of potentially life-saving medications.

5. **Invest in mass transportation and urban design that prioritizes mass transportation and safeguards pedestrians and cyclists.**

The environmental and health co-benefits of prioritizing active transportation (i.e., bicycling, walking, and using other non-motorized forms of transportation) are clear: active transportation has minimal to no carbon footprint and prolongs life expectancy. Walking and cycling improve mental and physical health while reducing the risk of heart disease, diabetes, stroke, and obesity. Furthermore, cities that prioritize mass transportation and active transport experience overall improvements in social cohesion and resident happiness, with decreases in violent crime and social inequities. By electrifying and expanding existing public transportation options while designing for active transportation, urban areas can significantly reduce air pollution, decrease their greenhouse gas emissions, increase green spaces and decrease urban heat islands, and improve resident fitness.

- **Example:** In 2016, it was reported that 23% of the global population lacked sufficient physical activity, with Latin America having the highest prevalence of sedentary behavior at 39%. To address this issue, Latin American cities have implemented interventions like recreational cycle paths (Ciclovía Recreativas). These programs temporarily close streets to create safe, car-free spaces for recreational and sports activities. According

⁶⁰ *Forest Governance by Indigenous and Tribal Peoples*. FAO, 2021. (see pg. 17, footnote 26)

to the database Ciclovías of the Americas, these programs have rapidly expanded to cover over 70 cities by 2019. The benefits of these paths include improved health, reduced deaths, illnesses, and increased economic value, across 15 Latin American cities.⁶¹

- **Health co-benefits:** This approach supports the right to health by reducing air pollution and related respiratory illnesses. It enhances the right to life and well-being by promoting physical activity and reducing accidents related to vehicle traffic, ensuring all individuals can navigate their cities safely and healthily.

6. Collaborate at an international level on mitigation, adaptation and resiliency plans.

The effects of a changing climate are not limited to one country or continent. Droughts, rising temperatures, vector-borne diseases, fires, and floods are expected to affect communities across borders, and are projected to displace tens of thousands of people. As such, mitigating and adapting to climate change will require an unprecedented level of international collaboration and flexibility. Nations are encouraged to consider intersecting vulnerabilities when devising resiliency and adaptation plans, and should consider working at multiple levels—from the community level to the international level—to address them.

- **Example:** Colombia, Ecuador, Peru, and Bolivia have joined forces in a collaborative effort to protect Andean water resources. Supported by the Global Environment Facility (GEF), the Development Bank of Latin America and the Caribbean (CAF), and CONDESAN (Consortium for the Sustainable Development of the Andean Ecoregion), this initiative, known as AICCA (Adaptación a los Impactos del Cambio Climático en los Recursos Hídricos de los Andes), aims to address common challenges such as data gaps, policy formulation, and climate-conscious territorial management practices. Through information exchange, regional dialogues, and shared experiences, the project seeks to establish strong foundations at the local level that can be scaled up to safeguard the future of water resources in the Andean region.⁶² In addition to collaboration between LAC countries, there are opportunities for collaboration across regions. For example, the European Green Deal (EGD), seeking to deliver climate neutrality by 2050, is expected to prompt unprecedented changes in the European Union's (EU's) economy. In addition to sparking internal changes, the EGD is expected to have a significant external impact on

⁶¹ *Ciclovías Recreativas y Salud En Latinoamérica*. Instituto de Salud Global, Barcelona, Colorado State University, 2020, <https://observatoriodabicileta.org.br/uploads/2021/07/Ciclovias-recreativas-America-Latina-CSU.pdf>.

⁶² "Andean Neighbors Working Together on Climate Resilience." *Global Environment Facility*, 22 Apr. 2021, <https://www.thegef.org/newsroom/feature-stories/andean-neighbors-working-together-climate-resilience>.

other countries due to both the EU's global ecological and carbon footprint and to the EU's green norm-setting intent. The Carbon Border Adjustment Mechanism (CBAM) and the EU proposal to stop deforestation are examples of initiatives with this potential impact. Opportunities for EU-LAC cooperation under the EGD may include strengthened diplomacy, climate governance and legislation, ensuring just transitions in local projects, increasing international and private finance for the energy transition, sharing sustainable finance experiences, and enhancing cooperation in areas like electromobility, biodiversity protection, and adaptation.⁶³

- **Health co-benefits:** International collaboration upholds the right to a healthy environment for all, irrespective of geographical boundaries. It embodies global solidarity and the shared responsibility to combat climate change, protecting present and future generations' rights to life, health, and a sustainable environment.

7. Develop and regularly update disaster response and contingency plans. As extreme weather events are expected to increase in frequency and severity, it is important that countries regularly update their disaster response and contingency plans, while investing in sustainable weatherized and retrofitted infrastructure. As detailed above, this is particularly important for healthcare systems, which may need to serve a higher number of patients with fewer resources during times of crisis. However, ensuring that housing is weatherized and retrofitted, particularly in regions vulnerable to flooding, heat waves, and storms, safeguards residents from the health consequences of these events while preventing internal displacement and refugee crises. Universal early warning systems are a key component of adaptation planning and should include communities with limited access to technology and written communication.

- **Example:** According to the final report on the Pan American Health Organization's (PAHO) 2016-2021 Plan of Action for Disaster Risk Reduction, 34 countries in Latin America and the Caribbean have strengthened their emergency and disaster response plans and procedures. Six more are currently testing and updating them. The report assessed progress on six key objectives, with 15 countries preparing health facilities for disaster risk reduction and 17 others in progress. Additionally, 24 countries have integrated safe hospital criteria into health services

⁶³ A. Averchenkova, L. Lázaro Touza, G. Escibano, C. Prolo, S. Guzmán Luna & L.E. Gonzáles. *The European Green Deal as a driver of EU-Latin American cooperation*. Real Instituto Elcano. July 2023. www.realinstitutoelcano.org. ISSN: 2255-5293

planning. Twenty-five nations have allocated staff and budgets for health emergency management, and 19 evaluated disaster risk in the health sector. Notably, during the plan's timeframe, 703 disasters occurred in the Americas, resulting in 15,395 deaths, affecting 145 million people, and causing over \$676 billion in damage.⁶⁴

Another promising development occurred in the Caribbean, which saw the first launch of a global plan on early warning systems. The Early Warnings for All initiative (EW4ALL) aims to protect people worldwide with early warning systems by 2027 amid rising climate hazards. The plan calls for \$3.1 billion in investments by 2027, with a focus on vulnerable communities. Less than half of all countries have multi-hazard early warning systems, which reduce disaster mortality by a factor of eight and lower economic losses. The launch also emphasized cooperation with Caribbean organizations like the Caribbean Disaster Emergency Management Agency (CDEMA) to strengthen climate and disaster resilience.⁶⁵

- Health co-benefits: Investing in resilient, sustainable healthcare systems as well as regularly updated disaster management plans saves lives and money by ensuring that communities have access to essential medical services during disasters. Early warning systems are a cost effective way of significantly reducing disaster mortality and keeping populations safe, particularly in areas which do not have robust medical systems able to absorb large influxes of patients during times of crisis.

IV. CONCLUSION

Climate change is directly linked to a wide variety of adverse health outcomes, which disproportionately affect marginalized and vulnerable populations. These health outcomes are expected to result in millions of preventable deaths over the next few decades unless drastic actions are taken to mitigate greenhouse gas emissions, create resilient and sustainable systems that allow humans to adapt to environmental changes, and take steps to preserve human and ecological health. The organizations submitting this Amicus curiae encourage states to consider actions that have both environmental and human health benefits as part of a comprehensive plan

⁶⁴ PAHO Report Assesses Vital Progress toward Reducing Disaster Risk in Latin America and the Caribbean - PAHO/WHO | Pan American Health Organization.

<https://www.paho.org/en/news/13-10-2022-paho-report-assesses-vital-progress-toward-reducing-disaster-risk-latin-america-and>. Accessed 5 Oct. 2023.

⁶⁵ “Caribbean Sees First Regional Launch of Global Plan on Early Warning Systems.” UNSDG, PAHO. 13 Oct 2022. <https://unsdg.un.org/latest/stories/caribbean-sees-first-regional-launch-global-plan-early-warning-systems>. Accessed 5 Oct. 2023.

to curb global warming to the 1.5°C goal outlined in the Paris Agreement. When developing such plans, States must recognize that human and environmental health are inherently linked. As such, environmental protection is directly related to the respect and preservation of human life, rights outlined in the American Convention. Furthermore, ensuring access to clean air, water, and natural spaces, and thus preventing cancer, respiratory diseases, vector borne disease, and premature mortality, is the responsibility of the State to both current and future generations. When developing plans and taking steps to mitigate and adapt to climate change, States must abide by the principle of non-regression, and are encouraged to seek rigorous scientific data as well as community input, and indigenous knowledge. This requires States to provide communities with accurate, transparent information regarding environmental laws, policies, and actions, and necessitates actively seeking the input of marginalized communities who have difficulty accessing such information. Furthermore, as part of this open dialogue, States must take steps to protect environmental advocates in accordance with the Escazú Agreement. The Latin America and Caribbean region has the opportunity to become a leader in sustainability and health equity through the thoughtful integration of health considerations in national climate policy.

This document is a testament to our united stance on this crucial issue, and we hope it aids the Court in its deliberations. We are at the disposal of the Court for any further information or clarification.

Respectfully submitted,

GLOBAL CLIMATE & HEALTH ALLIANCE and partnering organizations

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