





The JSI Greening Health and Education Series and the Principles that Guide our Work

Is driven by the fundamental goal to ensure that all individuals can live their best and healthiest life and that everyone has a right to quality education, regardless of age or circumstances. JSI's steadfast commitment to equity and justice across our health and education portfolio advances this goal. The climate crisis and environmental disaster we face today affect people and activities across our diverse portfolio. Our actions can build resilience to and mitigate climate change and environmental degradation. To do so, JSI must integrate climate and environment considerations in everything we do, and to do that, we must address the systemic issues that simultaneously perpetuate inequity and injustice and drive the climate crisis and environmental disaster.

People who suffer the effects of biodiversity loss, environmental degradation, and climate change most acutely are often those who have contributed to them the least. They are also those with the least access to quality health care and education and are often excluded from solution-seeking and policy-making processes. These inequities reflect colonial systems still upheld by racism, classism, white supremacy, and patriarchy. These systems have stripped Indigenous people of access to the land, exacerbating global inequities and preventing people from practicing millennia-old ways of conserving biodiversity and maintaining the planet's balance.

This series of think pieces, entitled "Greening Health and Education," reflects upon JSI's long-standing commitment to addressing the global climate crisis and environmental disaster through our public health and education work and demonstrates our transformative approaches to integrating climate and environmental considerations across our portfolio and throughout our operations long into a more just, equitable and greener future.

JSI must acknowledge its role and that of similar organizations in perpetuating these systems and take a decisive stand against them. Our efforts to understand the causes and mitigate the effects of the environmental crisis and climate change must uphold the following guiding principles:



Unequivocally embody anticolonialism, antiracism, equity, inclusion, and belonging;



Ensure our thinking and action is **youth-led**



transformative systems approach that reimagines policies, systems, operating environments. and

power dynamics



Require that our programs are led by and resonate with the

communities we serve



Approach all interventions from a **cross-sectoral lens**, integrating environment and climate considerations throughout; and



Lead with data that resonates with all parties.



Mothers Associations Lead Climate and Environment Action: In Benin, World Education's mother's association model, scaled nationwide, ensures space for women to engage in children's education, including ensuring schools and communities adapt to and mitigate environmental and climate stressors.

INTRODUCTION

Young people already know what type of education they need to protect the future of our planet. They are demanding an education that allows them to "understand and take better action on climate change and to help reconsider the human place within nature, through whole-school approaches." The education sector, however, has been woefully slow to heed this call and is only just beginning to acknowledge its responsibility in this critical endeavor. Only 40 of the 133 countries that have established Nationally Determined Contribution (NDC) plans for mitigating and adapting to climate change mention climate change education, despite the fact that Article 6 of the UN Convention on Climate Change and Article 12 of the Paris Agreement highlight the role of education.²

Some global entities are making promising statements, if not always taking concrete action. The UN Decade on Ecosystem Restoration 2021–2030 has called education "the single most important ingredient for the success" for its goal to "restore the relationship between humans and nature." UNESCO's International Commission on the Futures of Education stresses the need for "fully realizing the transformational potential of education as a route for sustainable collective futures."

JSI through our World Education division, along with all others in the sector, must respond to young people's clarion call for educational change. In this paper, we examine what is needed and where steps are being taken to meet this demand.

OUR VISION

Throughout our history, World Education has approached education holistically by convening

households, communities, teachers, and partners across the education sector to develop and implement curricula and apply transformative, learner-centered pedagogies. This approach, which fosters equity and involvement of people usually excluded from decision making, will allow us to support the education sector to advance a radical shift whereby learners have the skills and knowledge to be resilient to and challenge the causes of climate change and environmental degradation.

WHAT IS NEEDED?

17,000 young people from 166 countries recently questioned in UNESCO's largest survey of its kind called for education system changes to respond to the climate and environmental emergency. They have demanded changes to curriculum, teaching, learning methodologies, school management, and learning partnerships. The new Greening Education Partnership, led by UNESCO and UNFCC, has divided this work into four components (described below: greening schools; greening learning; greening teachers, education leaders, and policy makers; and greening communities.

All who work in this field must support actions in each of these areas, examined in turn in this paper. Underlying these action areas is the need for fundamental shifts in the nature of education to bring the wholescale transformation that youth are calling for. This requires action-oriented pedagogies that foster responsibility for the future and enable young people to gain not just knowledge but the values and agency to transform themselves and society. A truly transformative education builds young people's ability to collaborate, empathize, problem solve, organize, and connect to each other and nature.⁶

Nurturing Youth Action

From leadership training for girls in eSwatini to youth-led community outreach and action research in Cambodia, World Education strives strive to model transformative education at its best. We are creating a generation of changemakers by investing in young people's strengths and helping them develop skills to act on their own behalf.



In Indonesia (pictured above), youth led campaigns held meetings and used theater, video and social media to express themselves. Project data reveals that as a result, youth experienced new feelings of belonging and responsibility. In Mozambique, in the Integrated Gorongosa Buffer Zone project, we developed a life-skills curriculum integrating education, health, livelihoods, and conservation for adolescent girls. Highlighting the gendered element of the environment crisis, girls' club members organized a range of community activities at which they taught peers about climate and environment.



Green learning: What do young people want? Youth demand diverse aspects of climate change taught across subjects.⁷

Globally, only 53% of national curricula mention climate change.⁸ The UNESCO survey indicates that 70% cannot explain climate change, can only explain its broad principles, or do not know anything about it.⁹ Yet, if only 16% of high school pupils in high- and middle-income nations learned about climate change, carbon dioxide emissions would be reduced by approximately 19 gigatons by 2050.¹⁰ World Bank data analysis suggests that education is the single strongest predictor of climate change awareness.¹¹

It is crucial that all children receive accurate and appropriate information about climate change, biodiversity, and the environment. Equally important is recognizing Indigenous knowledge, traditions, and value systems that correctly recognize human's place in nature. Indeed, youth are demanding an education that re-examines our relationship with nature. Because the most-affected communities understand the climate and environmental crisis best and have the experience and insights for solutions, curricula should be developed in collaboration with Indigenous populations, young people, and communities and integrate local and national environmental justice. The creation of supplementary materials through local storytelling is one best practice gaining momentum.¹²

For learners to understand relationships between climate change, broader ecological systems, and social and economic structures, we must stop teaching 'climate change' as one subject. In the UNESCO youth survey, only 25% of respondents said that climate change education was integrated across subjects. Opportunities for integration abound (e.g., incorporating content on ecological systems,

effects of humans, and the science behind renewable energies into STEM subjects).

Greening learning goes far beyond integrating content knowledge of climate change and the environment. The new Green Learning Agenda framework¹³ separates required skills into three sets. The first involves knowledge and skills for green jobs and a low-carbon economy, such as engineering, science, research, technology, and resource management, vocational skills, and digital and financial literacy and numeracy. The second set encompass confidence, agency, collaboration, and transcultural/temporal/spatial thinking to develop learners who are capable of "transforming mindsets and confronting the underlying structures of inequality and systems of oppression that sustain



Climate and Environment Action through Youth Leadership: Youth groups such as these in Tanzania through World's Education's Bantwana Initiative give participants opportunities to examine their own beliefs, reflect on their identity and community, and learn about rights and social issues.



Members of a Bantwana-sponsored club to build girls' skills in Malawi

climate vulnerability." Last are generic green life skills that cut across all sets, such as socio-emotional and problem solving that result in learners engaging in more sustainable behaviors.

There is emerging evidence that education that emphasizes these transformative capacities and socio-emotional skills increases girls' leadership, voice, agency, and political and civic participation.¹⁴

World Education integrated local environmental themes across different school subjects. In Ghana¹⁵ we equipped teachers to teach environmental issues through integrated science, social studies, and vocational education and training. As a result, students learned how indoor wood fires lead to respiratory infections and how to use woodfires safely for cooking. They also strengthened their skills as

peer educators and were able to be proponents of change, starting in their own households. In 2021, the Ghanian government integrated the approach into its basic education curriculum.

We also integrated local environmental themes across different school subjects. In Ghana¹⁵ we equipped teachers to teach environmental issues through integrated science, social studies, and vocational education and training. As a result, students learned how indoor wood fires lead to respiratory infections and how to use woodfires safely for cooking. They also strengthened their skills as peer educators and were able to be proponents of change, starting in their own households. In 2021, the Ghanian government integrated the approach into its basic education curriculum.



ACTION AREA 2. Greening Teachers, School Leaders, & Policy Makers

Greening teachers: What do young people want? They are demanding "that their teachers are well supported to become ready to teach climate change. They are concerned that teachers are not confident enough and have limited resources to teach about climate change." ¹⁶

Teachers as well as learners need knowledge, competencies, attitudes, and practices to improve environmental action. Kristina Kwauk and Olivia Casey¹⁷ have suggested the need to help teachers: 1) understand the causes of climate change, types of solutions, and how justice is interlinked; and 2) understand and apply transformative methodologies that will result in inclusive climate action.

In 2021, Education International and UNESCO surveyed 58,000 teachers across the world. Only 40% felt equipped to teach about climate change.¹⁸ World Education has worked with education systems

not just to improve teachers' content knowledge, but on transformative teaching and learning approaches. In Egypt, we've trained teachers on project-based STEM education. In Côte d'Ivoire, we are supporting the government to revise its secondary school curriculum and train teachers, pedagogical advisors, and other government actors to apply gender-transformative teaching approaches to the curriculum. In Cambodia, we are helping the government establish a school-based teacher mentoring system, and in Mozambique we have trained teachers and coaches to model effective teaching and learning strategies to their peers. Setting up professional

Waste-free Schools

In Vietnam under the Building Healthy Cities project, JSI worked with the Education Department, the Youth Union, and primary schools to develop and pilot the Waste-free Schools initiative. The resulting training manual integrated food safety, waste management, and environmental health concepts. **Customized activities provided** educational, practical, and fun ways for primary school students to recycle, and in one area resulted in workshops with government departments and local NGOs on circular waste practices, specifically eco bricking and composting.

learning communities in places as diverse as the U.S. and Nepal has helped teachers change how—not just what—they teach.

In parallel, however, education leaders and policy makers need to change assessment systems so that

teaching and learning are not just measured in terms of content knowledge. In particular, we need to change quality assurance tools/policies so that education institutions are monitored and assessed for how well they develop learners' capacities as change agents.



Greening schools: what do young people want? That schools become important learning spaces for climate change and innovative hubs for all relevant stakeholders to engage in climate action, and that youth have "more say in decision-making on climate change action in school." 19

Schools must lead by example. The way they are managed must reflect the new climate action pedagogy and content to enable learners to 'live what they learn and learn what they live.'20

Students should be leading environmental action alongside teachers. Genuine participatory decision-making should be taking place, involving students as well as parent-teacher associations, for example in assessing schools' energy use and waste management and designing whole-school sustainability plans and projects. Increasingly, development partners are supporting construction of carbon-neutral buildings, applying Indigenous and nature-based solutions such as planting native species around buildings, using locally produced sustainable products, and encouraging sustainable transportation. Disaster risk-reduction strategies consider schools as hubs, as reflected in a push for student-led risk assessments and action planning.

The eco-/green school movement is an ideal platform for greening schools, and emerging evidence shows

benefits to giving young people roles in school environmental management.²¹ Greening schools is an area in which we have multiple strengths, with years of experience promoting student councils and participatory school management. We focus on advancing equity by prioritizing students and communities marginalized by poverty, Indigenous and religious minority status, disabilities, and gender, all of whom are disproportionately affected by climate change. Across much of our programming, World Education recognizes the need for additional school-based wrap-around services to foster equitable access to school and ensure that those experiencing climate injustice are no longer excluded from participating in the improvements to be made in their school. Interventions include accessibility modifications, stipends, take-home food rations. health referrals, income generation assistance for families, and student mental health support. With the increasing prevalence of climate and environmental change-induced disasters, the need for such services will remain high.



Environmental justice and Indigenous solutions: World Education's Participatory Community Diagnostic Tool was used in the Mahinadopa community in Cote d'Ivoire, to help women, religious leaders, youth, and residents make educational decisions that helped them overcome systemic challenges.



Intergenerational Learning for Climate and Environment Action: On USAID | Egypt's Literate Village activity, we applied an intergenerational learning approach to improve rural mothers' abilities to contribute to their children's primary education.



Greening Communities: what do young people want? "Contextualized climate change education through engagement with the local community." "Specificities of their geographic and demographic contexts be addressed."

UNESCO's Education for Sustainable Development Road Map has emphasized the importance of engaging the local community as a way to foster inclusive, action-based, and multi-disciplinary learning and positive climate and environmental behavior change.²² At the same time, improving school-community linkages enables us to focus on traditional knowledge. Inviting community members to join school management committees, speak at schools, contribute to development of climate- and environment-related curriculum content and activities, and mentor students fosters respect for Indigenous and local culture and values, community-based approaches, and action.

Extracurricular activities involving community-based projects and intergenerational learning opportunities, particularly involving caregivers, are good strategies for school-community linkages. For example, World Education's Field School approach that brings together students and farmers has been effective. Centered on experiential learning techniques, nature-based solutions, and collaboration, with the field as the "textbook," participants develop new skill sets, experiment, and think more critically about the environment and agriculture.

In addition to linking communities with the formal school system, action under the greening communities area must include non-formal and lifelong learning for out-of-school youth and adults that combines climate and environmental content, 'green life skills,' and transformative capacities to respond to challenges ahead. World Education, has been a leader in functional literacy, integrated with financial literacy, conservation, and livelihoods. Our Conservation Literacy Project in Cambodia increased conservation knowledge and

practices among Indigenous communities in a protected reserve. Similarly, long-term impact surveys with youth who took part in non-formal programming that combined foundational and life skills, sustainable agriculture, and livelihoods, demonstrated increased agency, continued use of new skills, and knowledge sharing with communities.

CONCLUSION - BRINGING IT ALL TOGETHER

World Education's programming incorporates all four aforementioned action areas. We have emphasized relevant, inclusive, and action-oriented pedagogies that prepare learners for the rapidly changing world of work; foster responsibility for the future; and enable them to make informed decisions and take individual and collaborative action. We accomplish this by working with governments and local partners on curriculum, teacher development, whole-school planning, and community engagement in formal and nonformal education. What we need now is to bring this all together to ensure education is truly part of the solution to the climate and environmental crisis. Initiatives such as the Greening Education Partnership provide just such an approach to maximizing the role of education in climate action, solutions, and environmental justice.

The time for change is undoubtedly now. "What we know, what we believe in, and what we do needs to change. What we have learned so far does not prepare us for the challenge. This cannot go on. And the window of opportunity is closing fast. We must urgently learn to live differently."²³

References

- Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 2 Kwauk, Christina, Efrain Monterroso, and Francisco García Suárez. "4 Alarming Findings about Education across Countries' Nationally Determined Contributions." Education International, January 11, 2023.
- 3 <u>Annual Report 2021</u>. Foundation for Environmental Education, 2022.
- 4 Reimagining our futures together A New Social Contract for Education. UNESCO, International Commission on the Futures of Education., 2021.
- 5 Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 6 "Five Questions on Transformative Education." UNESCO.org, 2021.
- 7 Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 8 Getting every school climate-ready: how countries are integrating climate change issues in education. UNESCO, 2021.
- 9 Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 10 Cordero, Eugene C., Diana Centeno, and Anne Marie Todd. "The Role of Climate Change Education on Individual Lifetime Carbon Emissions." PLOS ONE 15, no. 2 (2020). https://doi. org/10.1371/journal.pone.0206266.
- 11 Education and Climate Change. The World Bank, n.d.
- 12 Chumbler, Christine. "Producing Local Stories on Environment and Climate Change." Global Climate Change, 2020.

- 13 Kwauk, Christina, and Olivia Casey. Rep. <u>A Green New Learning Agenda</u>, <u>Approaches to Quality Education for Climate Action</u>. Center for Universal Education at Brookings, n.d.
- 14 Kwauk, Christina. "Why Is Girls' Education Important for Climate Action?" Global Climate Change, 2021.
- Mullen, Natalie. "Integrating Green Education into Ghana's Basic Education Curriculum." World Education, January 27, 2023.
- Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 17 Kwauk, Christina, and Olivia Casey. Rep. <u>A Green New Learning Agenda</u>, <u>Approaches to Quality Education for Climate</u> Action. Center for Universal Education at Brookings, n.d.
- 8 "Teachers Have Their Say: Motivation, Skills and Opportunities to Teach Education for Sustainable Development and Global Citizenship." Teachers Have Their Say: Motivation, Skills and Opportunities to Teach Education for Sustainable Development and Global Citizenship, July 6, 2022.
- 19 Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 20 "How Does It Work?" Eco Schools. Accessed May 29, 2023.
- 21 Youth Demands for Quality Climate Change Education. UNESCO, 2022.
- 22 Education for sustainable development: a roadmap. UNESCO, 2020
- 23 Education for sustainable development: a roadmap. UNESCO, 2020