

How can we respond to the climate security crisis Latin America?

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Panellists and short summary

The evidence on conflicts around the world since the turn of the century points to a simple conclusion: conflicts, grievances and insecurities are increasingly being affected by changing climates, environmental degradation, food insecurity, and the struggle to control a finite pool of natural resources. One region particularly fragile to climate and security risks in Latin America's dry corridor. This webinar explores these regional challenges, which extend from southern [Mexico](#) to [Panama](#) – taking in [Guatemala](#), [El Salvador](#), [Honduras](#), and [Nicaragua](#).

This webinar was informed by the following overarching questions:

- 1) How are food systems, climate, security and migration linked specifically within the Central American dry corridor?**
- 2) What are the entry points for policy and programming that align climate, food systems and peace objectives?**
- 3) What is the role of agricultural research and development for promoting peace and security?**

For this webinar, we were joined by a distinguished panel, consisting of:

Bram Govaerts, Director of the Integrated Development Program, international Maize and Wheat Improvement Centre (CIMMYT)

Andrew Harper, Special Advisor on Climate Change, United Nations Human Rights Council (UNHRC)

Deissy Martinez, Regional Program Leader, CGIAR Research Program on Climate Change, Agriculture and Food Security (CCFAS)

Javier Aliaga, Climate Change Coordinator, Latin American and Caribbean Network of Fair Trade Small Producers and Workers (CLAC)

1. Why this webinar?

Over the past decade, the world has become considerably less peaceful. The 2021 Global Peace Index (GPI) reports that the average level of global peacefulness deteriorated for the ninth time in thirteen years in 2020, in part due to increased political instability and civil unrest fuelled by the COVID-19 pandemic (Institute for Economics & Peace, 2021). Climate change can also accelerate this negative trend by aggravating socioeconomic and political tensions, which can intensify pre-existing conflict dynamics or create new ones.

The Central American Dry Corridor is a region particularly at risk of climate change. Guatemala, El Salvador, Honduras and Nicaragua are projected to suffer strong rainfall variability and intense droughts in the coming years. Such droughts and floods threaten food security in these countries, which are already prone to high levels of violent crime and political instability. The Latin America and Caribbean region as a whole is the most violent region on earth, according to the United Nations Development Program (UNDP).

We know that as food security declines, the risk of conflict increases. Climate change can also trigger conflict by compounding pre-existing insecurities such as insecure food systems – which are clearly vulnerable to climate change – poverty, inequality and political fragility. In the region, persistent extreme weather events and disasters, as well as more long-term degradation, has drawn livelihoods into question, fuelling insecurity, migration, local resource competition. This is not helped by unjust or entirely absent resource sharing and dispute resolution mechanisms, and potentially volatile food prices and food insecurity. In the CADR this has contributed to domestic and internal conflicts, such as gang violence, homicides, robberies and increasing participation in recruitment of armed groups, which are endangering human security across the region.

Against this backdrop, this webinar aimed to offer a space for critical reflection across sectors on how to tackle climate security risks in the CADR regions. Furthermore, by bringing together experts from the humanitarian, climate and peace realms, the webinar further stressed the need to strengthen international partnerships across sectors in order to move towards sustainable and long-lasting solutions.

2. Drivers of climate security threats in Latin America

Central America is highly vulnerable to the impacts of climate variability due to its geographic location, soil type, atmosphere dynamics, and terrain (Pachauri et al. 2007). The region is strongly affected by increasing temperatures, extreme drought, and destructive tropical storms, and Guatemala, El Salvador, Honduras and Nicaragua all rank within the top 50 countries that have shown to be most impacted by climate risks from 1999-2018 (Eckstein et al. 2019). Such climate dynamics are set to continue undermining access to, and the availability and productivity of, key natural resources, thereby contributing to local competition -- and potentially violence -- over access and usage (Detges et al. 2020). This is particularly significant in the context of the Dry Corridor, given the extent to which the regional economy is dependent on smallholder agriculture: In Guatemala, Honduras, and Nicaragua, more than two thirds of the population rely on agriculture, the viability of which is intimately tied to ecosystems increasingly threatened by climate variability (Bouroncle et al. 2017; Baca et al. 2014). At the same time, demand for food products is expected to increase, with Guatemala and Honduras among the top three countries experiencing the fastest demographic growth in Latin America and the Caribbean between 2009 and 2019 (IOM 2020).

Local competition is set to increase against the backdrop of a fragile social and institutional environment characterized by a history of social, economic, and political exclusion and marginalization. Previous conflicts in Central America, such as the Salvadoran Civil War (1979-1992) and the Guatemalan Civil War (1960-1996), effectively destroyed social cohesion and trust amongst sections of the population. As well as this, increasing pressure on rural livelihoods negatively impacts food security and the availability and profitability of on- and off-farm employment opportunities, thereby reinforcing existing human mobility trends, most notably internal rural-urban migration. The relationship between (slow onset) climate shifts and migration are inherently complex. It is likely that the effects of climate will manifest themselves through intermediary channels drive migration.

Increasing unregulated movement – whether permanent or temporary, over short or longer distances - may create new challenges both areas where people leave and go. Already overstretched city infrastructure and services may not be able to keep up with population growth, which, combined with poor labor market absorption, can give rise to growing poverty and socio-economic marginalization (Detges et al. 2020). Migrants are also often forced to work in informal, poorly regulated sectors such as construction, transport, or household services, leaving many open to exploitation and abuse. Such conditions in turn create potential sources of tension, conflict and anti-government grievances, particularly if horizontal socio-economic fault lines between groups emerge or are exacerbated (Buhaug and Urdal 2013; Østby 2008). Informal and irregular migration, especially when it occurs across borders, can also feed smuggling networks, often overseen by international crime groups (Sanchez 2018), with large numbers of migrants forming both a source of income and a cover for the expansion of drug-related activities.

Finally, climate impacts may undermine peace and security by pushing vulnerable communities into illegal coping mechanisms, such as the production of illegal cash crops (Detges et al. 2020). Especially in Central America, the vulnerability of rural livelihoods has been exploited by non-state criminal armed groups. A limited number of accessible livelihoods not only incentivizes a move towards more lucrative but illegal crop choices, but also provides criminal groups with a fertile recruitment ground, particularly among young people (Nillesen and Verwimp 2009; Nett and Rüttinger 2016). Beyond offering payment, armed groups may also seek to exploit political grievances or a lack of social cohesion within and between communities, furthering conflict dynamics and creating new ones. In certain cases, such groups may also become the de-facto authority in a particular area, capitalizing on the absence of state support to promote services such as education, healthcare, and food provision (Fulton and Nickels 2017).

3. How can we tackle climate security risks in Latin America

CGIAR is laying groundwork to tackle these complex challenges in the dry corridor region. Our webinar laid out three clear priorities for policymakers, researchers and programmers.

1) *Invest in communities and leverage existing efforts to comprehensively quantify interrelated challenges and target investment and research efficiently to tackle them*

Increasing the local capacity of farmers by investing in processes that integrate local knowledge and using this as the foundation of creating more sustainable food systems and fairer economies. CGIAR's Research Program on Agriculture, Food Systems and Climate Change aims to build adaptive resilience of local institutions, rural communities and farmers in its climate smart villages in the region. Capacity building and knowledge exchange are crucial to increase social capital and cohesion, which will ensure long-term benefits and sustainability in the territories, while scaling the approach to more smallholder farmers and communities.

Projects must also be inclusive and transparent. Mitigation efforts can work to worsen social and gender inequalities by excluding women and indigenous groups, increasing the risk of conflict. In some cases, community elites can capture benefits from forests leading to tensions among community members. The rights and key roles of indigenous peoples should be protected in climate change initiatives and women should be recognized as change makers and empowered within projects. Doing so not only improves the lives of marginalized groups, but also helps foster peace and security within communities as a whole. Climate security opportunity costs, externalities and rural development potential need to be assessed and inclusive business cases based on natural resource or environmental economic accounting built. In this paper, we have provided examples of externalities in the environmental, social and economic spheres that are interrelated (resource degradation and food insecurity leading to migration and conflicts).

2) *Put communities at the heart of climate change adaptation and mitigation projects and build on existing approaches*

Many of the efforts involved in tackling climate security threats in the region are siloed from one another, which means they often overlap or leave gaps in programming. Designing effective projects that positively build peace requires breaking out of academic and institutional silos and thinking holistically about climate change and security. When taking a multi-sector and – generational view, there still exists fragmentation among rural education efforts. Focusing on agriculture, rural education and training is often project-driven (e.g., not institutionalized over a longer-term), delivering specific, oftentimes siloed, technology transfer (e.g., improved varieties and seeds, but not relevant farming practices). However, the sustainability of climate security solutions depends on the ability to manage train-the-trainer approaches over time (e.g., certified extension agent programs), build different kinds of business models (e.g., for ecosystem services, service providers, cooperatives), manage community networks, and perform advocacy and political dialogue (e.g., to improve enabling conditions). Such longer-term education programs could in future go hand-in-hand with currently unconnected One Health and conflict resolution/mediation training programs.

3) *Foster inter-ministerial and inter-sectoral dialogue to overcome siloed perspectives and develop a shared understanding of problems to agree on coordinated and joint actions.*

In many cases, inter-ministerial dialogue remains superficial (e.g., knowledge exchange versus joint learning and actions), budgets uncoordinated and national security institutions continue to act separately from each other and from research providers). A sensible starting point is to connect national mitigation and adaptation and security plans to related AR4D-identified rural opportunities and pathways, demonstrating what has worked where and documenting successful approaches for

technology and process-know-how transfer from other countries or regions. Empowering local workers is key to the solution, as are policies that give real support in order to break the vicious cycle between low incomes, climate, conflict and migration.

Resources

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