

Mangrove Breakthrough Submission

COP30 Presidency Invitation to Submit Contributions to the COP 30 Presidency Roadmap on Halting and Reversing Deforestation and Forest Degradation by 2030.

March 31st, 2026

Contributors are invited to submit concise inputs on one or more of the following questions:

(a) What are the most critical barriers — whether physical, economic, financial, institutional, technological or social — preventing the halting and reversing of deforestation and forest degradation?

Mangroves provide a unique habitat for a wide array of plants and animals, support millions of vulnerable communities with fisheries resources and protect settlements and agricultural lands from natural hazards like hurricanes, sea level rise, and coastal erosion. Though they make up just 2 percent of the world's forests, their per-unit carbon mitigation value is unrivalled, sequestering carbon 3-5 times faster than terrestrial forests. Once lining vast swaths of tropical and subtropical coastlines throughout the Caribbean, South America, Southeast Asia, and Africa, only 14.7 million hectares of mangroves remain – half of their original extent.

While recent trends show a gradual decline in mangrove loss, protecting and sustainably managing the remaining forests is critical to ensure their long-term survival. At the same time, there is a major opportunity to restore mangrove ecosystems, particularly on lands once converted for aquaculture (such as shrimp and milkfish) and agriculture (including rice and palm oil) that later became unproductive and were abandoned. Restoration and management efforts must also account for climate change—for example, by allowing space for mangroves to migrate landward as sea levels rise.

A diverse community of mangrove professionals, including representatives from civil society, government and private sector, along with local communities, has worked to conserve and restore mangrove resources. Yet, across geographies, this community has encountered recurrent barriers that limit both the scalability and long-term sustainability of their interventions:

There is a strong interest in investing in nature-based solutions such as mangrove forest conservation, restoration, and sustainable management, but it often struggles to translate into concrete deals. Financial institutions still lack shared valuation frameworks, common definitions of risk, and a transparent pipeline of investment-ready opportunities. The challenge is not a lack of interest or capital; it is a lack of mechanisms.

As a result, capital remains concentrated at the top of the system, while local economies continue to operate without the transition financing needed to move away from forest-degrading practices. Today, mangroves remain underresourced, despite a clear case for their restoration and conservation. There is an urgent need to ensure capital flows at the required scale and reaches high-quality and ready-to-scale projects. A significant gap persists between global ambition for mangrove protection and restoration and on-the-ground reality, where finance to jumpstart new projects and programs, and long-term finance to maintain current efforts, is insufficient.

Reversing mangrove loss and degradation requires transformational societal change alongside large-scale restoration for those mangroves that are not irretrievably lost. Strong, well-coordinated partnerships with access to diverse funding sources are essential for effective and lasting conservation efforts. Improving

access to international grant funding, as it can support immediate action, help develop viable business cases, and enable financial instruments that attract private sector investment. Bridging the funding gap requires mechanisms that combine grant funding, concessional finance and private sector investment, using grants both to catalyze action and to reduce investment risk.

Conservation organizations often work in isolation without coordinated strategies for driving change, limiting transformational impact across mangrove landscapes. For mangrove conservation to succeed, strategic collaboration is essential. This includes engaging local implementing organizations, grassroots and community groups, and improving their access to international funding and training opportunities. At the same time, national and local stakeholders often remain disconnected, and representatives from civil society, government, and the private sector struggle to align their perspectives. Across mangrove landscapes, partners from the public and private sectors urgently need to join forces to strategize, align and implement their initiatives together to achieve shared goals.

Jurisdictions and land ownership arrangements are often unclear in intertidal mangrove zones. Safeguards to prevent mangrove degradation or overexploitation are lacking. Unclear governance mandates cause inaction, funding gaps, stakeholder tensions, and conflict between resource users. Integral to this is a lack of understanding of threats to mangroves and their values, which has prevented ambitious goal-setting and the establishment of stringent regulations to prevent further declines. To help scale and sustain mangrove interventions, it is critical to integrate ambitious mangrove goals in policies, resolving jurisdictional barriers and integrating legislative safeguards that support the protection of mangrove resources.

Globally, understanding of mangrove trends, values, management and restoration approaches has grown, but knowledge gaps remain, especially in translating scientific findings into local implementation. This hampers the prioritization of interventions and the design of effective programs. Too often, scientific insights and lessons learned from field programs go undocumented. As a result, mangrove restoration projects continue to face high failure rates - up to 80% - wasting scarce conservation funds, while eroding confidence in restoration. Insights must be made accessible to policymakers and practitioners through guidance and effective public outreach. Peer-to-peer knowledge exchange and capacity-building programs should be tailored to end-users' needs and promote adaptive learning. Knowledge gaps must be addressed through applied research and consistent documentation so that lessons endure beyond individual projects.

(b) What potential levers, whether economic, financial, institutional, social or technological, exist for accelerating the implementation of the commitment to halt and reverse deforestation and forest degradation?

We would like to call for mangrove forests to be fully included in the Roadmap. Mangroves tend to be overlooked in the broader forest agenda. However, in many forest-rich countries (Indonesia, Brazil, Colombia, Kenya, Guinea-Bissau, Senegal), millions of people depend on coastal forests for their livelihoods.

Initiatives like the Mangrove Breakthrough are building a broader financial architecture designed to bridge the gaps and enable systemic transformation. In a global scenario marked by the climate emergency, the Mangrove Breakthrough proposes a new paradigm by embedding nature into the heart of

financial systems. Financing mangroves is not just an environmental cause, but a strategic decision to reduce risks, protect coastal economies, and build long-term resilience.

This architecture integrates four core elements: the Mangrove Transition Bond Series to mobilize regional capital, the Mangrove Catalytic Facility to drive project bankability, a Digital Mapping and Monitoring Platform for real-time validation, and Curated Investment Showcases to connect verified projects with capital. Together, these components provide the structural 'pipes' and valuation frameworks necessary to transform mangroves from a conservation goal into a high-performance, investable asset class.

(c) What country, regional or sector experiences, best practices, and lessons learned can be shared regarding forest conservation and restoration?

Globally, about 40% of the world's remaining mangrove forests lie within protected areas. In some countries—such as Brazil, Mexico, and Bangladesh—more than 75% are protected, though there remains a need and opportunity to strengthen management effectiveness. In others, including Malaysia, Papua New Guinea, and Myanmar, less than 5% of mangroves fall within protected areas.

The Mangrove Breakthrough Six Guiding Principles promote best practices and lessons learned that can be shared to ensure high-quality, impactful, and equitable mangrove forest conservation and restoration. The Six Guiding Principles are as follows:

1. **Safeguard Nature & Maximize Biodiversity:** Prioritize the ecological integrity of mangroves to protect biodiversity and maximize climate benefits.
2. **Employ the Best Information & Practices:** Utilize science-based, peer-reviewed data and proven methods for restoration, rather than simply planting trees.
3. **Empower People & Put Communities First:** Ensure local, indigenous, and community rights are protected, valuing their knowledge and leadership in conservation.
4. **Align to the Broader Context (Operate Locally):** Adapt global goals to local environmental and social realities for context-specific success.
5. **Design for Sustainability:** Focus on long-term management and functionality, rather than short-term gains, to ensure the permanence of projects.
6. **Mobilize High-Integrity Capital:** Secure transparent, sustainable finance (both public and private) to ensure projects are well-funded and accountable.

These guiding principles were developed and informed in partnership with the Global Mangrove Alliance (GMA). The GMA developed the [Best Practice Guidelines for Mangrove Restoration](#) resource that brings together the latest accumulated local and scientific knowledge about mangrove restoration best practices into one comprehensive resource, ensuring best practices for restoration are science-based and inclusive. These provide step-by-step guidance on best practices for every phase of the mangrove forest restoration project cycle - project design, funding and implementation. These mangrove forest restoration experiences are centered on well-established community-based ecological restoration approaches that enhance restoration success and longevity.

The best practices shared in the GMA guidelines are all science-based and provide fair and equitable benefits. They move away from single-species mass tree-planting, which fails to restore functional

mangrove forests, to inclusive ecological restoration approaches. This process of effective mangrove restoration is nuanced, complex and site-specific and requires coordinated project design.

Operating in the local context, including cultural customs, resource use, management and ownership regimes, while taking a land and seascape approach and aligning with international trends and their local implications.

Restoration and conservation actions should purposefully strive for positive biodiversity impacts. Instead of hoping that an area and services can be fully restored later, conserve what is there now. When you do need to restore, instead of planting monocultures, aim for restoring a mangrove ecosystem with multiple species, natural hydrological flows, and natural zonation.

A biodiverse mangrove ecosystem has a greater variety in root types, tree sizes, foliage, and fruits, thus fulfilling different functions and attracting diverse fauna. This results in the provisioning of multiple goods (timber, fodder, honey, fruits, and fish) and services (enhanced coastal protection, carbon storage, water purification, fisheries enhancement). Such mangroves are also likely to be more resilient to climate change.

Mangrove remote sensing platforms can equip policymakers, mangrove practitioners, and investors with comprehensive, up-to-date mangrove data for the effective design, financing, and implementation of mangrove initiatives. [The Global Mangrove Watch](#) (GMW) is an online platform developed by Aberystwyth University, soloEO, Wetlands International, the Nature Conservancy, JAXA, NASA, and the GMA that provides near-real-time data on mangrove cover and change, giving governments, funders, and communities a common picture of where change is happening, where interventions are needed and whether these are working. The GMW platform can support governments and practitioners to integrate mangrove-positive commitments into their climate mitigation, adaptation, biodiversity and development plans, report on them, translate their commitments into priorities on the ground and monitor difficult-to-access coastlines regularly and consistently. With high-resolution information on cover change, soil carbon, living biomass, canopy height and other parameters, Global Mangrove Watch also gives coastal and park managers, conservationists, policymakers and practitioners the evidence needed to respond to illegal logging and pinpoint the causes of local mangrove loss and track conservation progress. With its consistent mapping approach, GMW also enables transparency —supporting year-by-year progress tracking, comparisons across countries and regions, and clear accountability to funders and communities.

The Global Mangrove Watch provides the shared baseline and monitoring system for the Mangrove Breakthrough, underpinning its goals to halt mangrove loss, restore half of what has been lost, and double the area protected by 2030, while unlocking \$4bn in sustainable finance to deliver these objectives.

(d) How can forest conservation, sustainable management, and restoration best reflect the diverse realities of countries at different stages of development, the rights and knowledge of indigenous peoples and local communities, and different degrees of forest cover?

We recommend implementing, in all aspects of project design, social safeguards to protect and enhance community member rights, knowledge, and leadership to achieve fair and equitable benefit sharing.

Mangroves provide essential services to protect and sustain coastal communities, including ensuring water quality, food provision, livelihoods, climate mitigation, and climate adaptation. Local actors – and their representative institutions – need to be capacitated to meaningfully engage and advocate for their needs in all aspects of a project, including design, implementation, and policy dialogues. The project governance structure needs to facilitate participation and decision-making as well as fair and equitable benefit sharing.

Local ecological knowledge (LEK) can provide vital information to develop mangrove conservation and restoration efforts with greater potential for long-term outcomes. Recently, the Global Mangrove Alliance (GMA) published *The LEK Best-Practice Guide*, which detailed how researchers have examined or incorporated LEK, projects demonstrating numerous ways that LEK improves conservation, and guidance to engage ethically with LEK holders.

Despite growing interest in LEK, little guidance existed before this publication to assist researchers and practitioners in engaging with this knowledge ethically and holistically. The *Mangrove Breakthrough* encourages wider inclusion of LEK in mangrove research and projects by: 1. Raising awareness of the variety and scope of LEK about mangrove ecosystems. 2. Highlighting the value that LEK can bring to mangrove conservation and restoration. 3. Encouraging increased engagement of LEK in projects. 4. Emphasizing the importance of equitable collaboration.

Successful mangrove interventions integrate existing and future livelihood opportunities from the start. When communities benefit directly from protected and restored ecosystems, they are more likely to protect them for the future. Cash-for-work planting alone rarely secures long-term care. Mangroves can offer many tangible benefits to local communities, some of which can be monetized, such as ecotourism, wild capture fisheries and provision of food and fodder. Restoration and conservation could aim to create a mangrove-based economy that optimizes such mangrove benefits while avoiding overexploitation and introducing alternative livelihoods that do not degrade mangroves. Wealth acquisition should be aligned with nature's capacity, and it needs to take into consideration the aspirations of equitable societies.

Using the best available science-based knowledge, including indigenous, traditional, and local knowledge, for mangrove forest conservation and restoration. Make use of the best available science, including lab and field-based measurements as well as traditional and local knowledge and experiences that has often been developed and refined over centuries. Convene a multi-disciplinary and multi-sectoral team to help integrate biophysical as well as socio-economic aspects and to ensure different stakeholder perspectives are represented and addressed.