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**BIODIVERSITY**



## **NATURE AND DEVELOPMENT BRIEF**



# **Investing in Nature for Green, Resilient, and Inclusive Growth**



**WORLD BANK GROUP**

# Investing in Nature for Green, Resilient, and Inclusive Growth

*Humanity is entirely dependent on nature for survival, wellbeing, and economic prosperity. Investing in nature is critical not only for maintaining biodiversity and a stable climate, but also for reducing poverty and inequality, and maintaining the critical ecosystems that support livelihoods. The World Bank Group (WBG) has invested in natural capital for decades and is supporting people and communities to promote sustainable and resilient growth.*

*This Brief is one of a series exploring strategic areas for achieving impact at scale as countries implement the new global targets, once adopted, by investing in nature for green, resilient, and inclusive development; integrating action on nature loss and climate change; and scaling up finance for nature. It shows the strategic development value of investments in nature through a broad spectrum of country and sector experiences in addressing the drivers of nature loss and harnessing nature's services.*

## KEY MESSAGES

- Nature – understood as biodiversity and the ecosystem services provided by healthy ecosystems – is in unprecedented decline, jeopardizing hard-won development gains and putting into risk the attainment of green, resilient, and inclusive development (GRID). The combined effects of nature loss and climate change threaten to push the planet toward dangerous tipping points.
- Nature is at the core of central development challenges (health, livelihoods, inequality, climate change, food security, fragility, energy). If no action is taken to halt the decline of ecosystem services, the impacts on these will be cataclysmic. The poorest countries and communities stand to lose the most in relative terms from nature loss; in a scenario where just a few ecosystem services collapse, low-income countries could forego 10 percent in real GDP annually by 2030.
- Many of the solutions to nature loss and the climate crisis lie in three key sectors - food, land, and water use (including oceans); infrastructure; and energy and extractives. These socio-economic sectors endanger 80 percent of threatened or near-threatened species.
- Investing in nature can help reverse nature loss and create new opportunities for countries. This will require a whole-of-economy approach that places nature at the core of development, including through policies that shift markets and value chains toward models that conserve and restore natural capital. This shift can create long-term growth, greener and higher quality jobs, and improved food security.
- The post-2020 global biodiversity framework, a global strategy for jointly safeguarding nature, is an opportunity to initiate a shift to a whole-of-economy approach to halting nature loss, in tandem with climate action.
- The World Bank Group is supporting green, resilient, and inclusive development in client countries by integrating protection and restoration of nature into economic policy, development programs, and strategic investments. The World Bank is a leading multilateral financier of biodiversity and ecosystem conservation. Last fiscal year, the World Bank's active portfolio included \$2.8 billion of direct investments in nature.



# 1. THE CHALLENGE

**Nature matters for development.** Humanity is embedded in nature, entirely dependent on it for survival, wellbeing, and economic prosperity. Biodiversity, and the ecosystem services it supports, such as food and raw materials, water filtration, and climate regulation, underpin development in tangible ways. Half of the world's GDP is generated in sectors such as construction and agriculture that depend to a greater or lesser extent on ecosystem services.<sup>1</sup> Two-thirds of food crops rely, at least in part, on animal pollination<sup>2</sup>. This natural capital, along with produced capital, human capital, and nonrenewable natural resources, contributes to a country's wealth,<sup>3</sup> generating income that drives economic growth, and supporting the achievement of the Sustainable Development Goals (SDGs).

**Yet nature is in an unprecedented decline, threatening the critical ecosystem services on which economies rely.** The gap between humanity's ecological footprint and nature's ability to replenish and regenerate is widening – an estimated 1.7 Earths are required to maintain the world's current living standards with current economic systems.<sup>4</sup> This is taking its toll on nature; 14 of 18 assessed categories of ecosystem services have declined since 1970.<sup>5</sup> This means smaller fish catches, pollinator decline, poorer freshwater quality, and the reduced ability of nature to control pathogens and protect economic assets from extreme weather.

**Nature loss is also interconnected with climate change** - the two crises reinforce each other and can push the planet toward dangerous tipping points,<sup>6</sup> from the collapse of ice sheets, which can trigger self-reinforcing global warming,<sup>7</sup> to the disappearance of coral reefs, or the dieback of the Amazon forest.<sup>8</sup> Passing ecological thresholds can trigger large, nonlinear, systemic changes in the health of entire ecosystems, which can pervade the global economy.

**The poorest economies stand to lose the most in relative terms from nature loss, which puts at risk their prospects to grow out of poverty.** World Bank modelling<sup>9</sup> shows that in a scenario where just a few ecosystem services – wild pollination, provision of food from marine fisheries, and timber from native forests – collapse, low-income countries could forego 10 percent in real GDP annually by 2030, compared with global losses of 2.3 percent. Sub-Saharan Africa and South Asia could see annual drops of 9.7 and 6.5 percent, relative to a no tipping point scenario

**The most vulnerable communities may be most at risk too** - 80 percent of the global population live below the poverty line lives in rural areas<sup>10</sup>, and tend to depend heavily on nature's services. Without income from natural resources, poverty among smallholders in Latin America, South Asia, East Asia, and Sub-Saharan Africa would be higher.<sup>11</sup> Healthy ecosystems prevent the descent of poor households into deeper poverty by providing food, water, and raw materials, and thus act a barrier against natural and man-made disasters and as a safety net during economic crises.<sup>12</sup> The global food crisis unfolding this year, which threatens to drive millions into extreme poverty, magnifying hunger and malnutrition,<sup>13</sup> underlines nature's vital role in food security. Loss of critical ecosystem services can aggravate fragility, conflict, and the vulnerabilities of people.

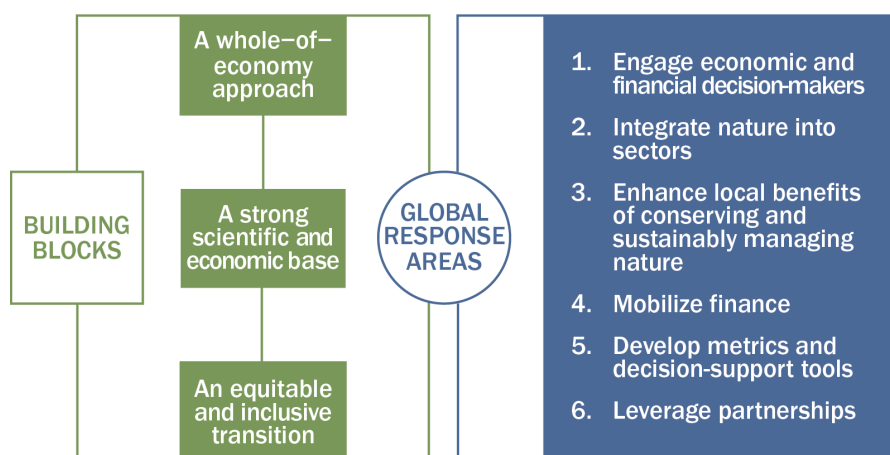
**Market, policy, and institutional failures are keeping economies on unsustainable development paths.** Nature loss can be traced to five direct drivers: land and sea use change; direct exploitation; climate change; pollution; and invasive species.<sup>14</sup> Enabling these are socio-economic and demographic trends, technology, valuation, and governance factors that encourage unsustainable production and consumption, depleting nature beyond what is socially optimal and within ecological boundaries. Misaligned policy incentives place a negative price tag on nature's services;<sup>15</sup> governments spend at least US\$800 billion annually on fiscal support that is potentially harmful to nature.<sup>16</sup> Environmental policy often remains siloed from development policies and strategies, and its implementation is often led by a single ministry, despite the systemic risks and multisectoral drivers of nature loss.

**Investing in nature creates opportunities for high-value and greener growth.** Shifting markets and value chains toward models that conserve and restore natural capital, and use it sustainably, can create long-term growth and greener and higher quality jobs, if measures are put in place for an equitable and inclusive transition.<sup>17</sup> Strategic investment in protected areas can create opportunities for income diversification which support local economies.<sup>18</sup> A sustainable transition of food, land use, and ocean use; infrastructure and the built environment; and energy and extractives could create US\$10.1 trillion in annual business opportunities and 395 million new jobs by 2030.<sup>19</sup> Leveraging these opportunities and bringing nature into rural and urban development planning is essential for setting economies on a green, resilient, and inclusive development path.

## 2. WHAT IS NEEDED?

**To “bend the curve” of nature loss, a systemic shift to more sustainable production and consumption practices and conservation and restoration of nature is needed.** Present efforts to mitigate nature loss are insufficient, as evidenced by plummeting indicators of ecosystem health globally.

Putting economies on more sustainable development paths hinges not only on increases in conservation, but also on the adoption of a whole-of-economy approach – steering sectors that depend – and have an impact – on nature towards sustainable practices, and away from business-as-usual. It means systematically accounting for nature’s value and the risks associated with its loss in policy and investment decisions across sectors (see Figure 1).



**Figure 1. Elements of an Effective Global Response**

Source: WBG Approach Paper on Biodiversity and Ecosystem Services

**Many of the solutions to nature loss and the climate crisis lie in three socio- economic sectors:** food, land use, fresh water, and ocean use; infrastructure and the built environment; and energy and extractives. These socio-economic sectors endanger 80 percent of threatened or near-threatened species.<sup>20</sup> They also rely on the continued provision of ecosystem services and hold the key to the transformations needed to address the drivers of nature loss, such as transitioning away from extensive and unsustainable farming and mining or reducing the footprint of urban infrastructure in terms of land use change, emissions, and waste. They are key to solving the climate crisis, making an even stronger case for investing in their sustainability.

**How these key sectors plan, invest, and produce matters for development goals.** These sectors, the backbone of the global economy, account for one-third of global GDP and provide two-thirds of all jobs.<sup>21</sup> Their output is critical to satisfying the needs and demand of a growing global population. Doing so within planetary boundaries is necessary to achieve this.

**The post-2020 global biodiversity framework, expected to be adopted by the Parties to the Convention on Biological Diversity to replace the 2011–20 Aichi Biodiversity Targets, offers an opportunity to initiate a shift to a systemic and whole-of-economy approach to halting nature loss, in synergy with climate action** (see brief *“Integrating Nature and Climate Action”*). Achieving such a shift requires engaging central governments, and finance and sectoral ministries to support policy reform that can make a real impact.

Such reform would sustain natural assets by creating market opportunities and incentives for sustainable transitions in sectors like infrastructure, agriculture, and fisheries, and the alignment of broader financial flows with nature goals. At the local level, it means participatory governance of natural resources and connecting the stewards of nature – indigenous and local communities, and small producers – to markets for environmental services and green commodities. Keys to achieving this transition are sufficient funding; sound monitoring; and the active participation of the private sector, including financial institutions, the insurance industry, and corporates.

### 3. HOW IS THE WBG CONTRIBUTING TO SOLUTIONS?

**The World Bank Group is supporting green, resilient, and inclusive development in client countries by mainstreaming nature considerations into economic policy, development programs, and strategic sectoral investments.** The WBG deploys integrated financing solutions for the conservation and restoration of nature, supports institution-building, and develops tools and analytics that help provide evidence-based knowledge. Increasingly, attention is shifting to economic sectors and policies beyond the purview of environmental ministries – for example, urban development, agriculture, disaster risk management, and water management - to address the drivers of nature loss and promote sustainable sector practices.

**Strategic support is provided across six broad global response areas under a whole-of-economy approach** (see also the [WBG Approach Paper on Biodiversity and Ecosystem Services](#)):

#### 1. Engagement of economic and financial decision-makers

**The challenge:** Managing nature as a development asset to harness opportunities, and mitigate risks is a task for economic and financial decision makers, whose leadership is critical for horizontal and vertical government coordination. Yet environmental policy often remains siloed from development policies; its implementation is often led by a single ministry, despite the systemic risks involved and the multi-sectoral nature of the drivers.

**In response, the WBG** is mainstreaming nature in the country engagement model, through the Climate Change and Development Reports, the Country Partnership Framework, and supporting client countries' efforts to incorporate nature into national development strategies, including the National Biodiversity Strategies and Action Plans (NBSAPs) and Nationally Determined Contributions (NDCs); economic and trade policy across sectors; and financial decisions.

#### 2. Integrating nature and nature-based solutions into sectors

**The challenge:** Unlocking the potential for green, resilient, and inclusive development hinges on a shift to sustainable practices in key economic sectors, through planning and regulations that manage nature-related risks, as well as through strategic investments in nature-based solutions, which continue to be under-utilized. Seeing nature as a solution can help countries simultaneously tackle food and water insecurity, disaster risk, human health risks, urban development, and climate change.

**In response, the WBG** is promoting sector planning that minimizes nature risks and supports strategic investments in watershed and wetland management, integrated coastal zone and landscape management, renewable energy, ecotourism, agroforestry, green urban infrastructure, and the circular economy, all of which integrate nature-based solutions in investment.

#### 3. Enhancing local benefits of conserving and sustainably managing nature

**The challenge:** Area-based conservation remains the foundation for safeguarding blue and green biodiversity and ecosystem services, but this can work only if markets for environmental services and benefit-sharing mechanisms are in place, and integrated with livelihoods development. Spatially explicit planning is crucial, that weighs trade-offs and synergies between economic inclusion and sustainability, bringing together stakeholders and local knowledge.

**In response, the WBG** is harnessing its ability to work across sectors and in fragile contexts to

support integrated landscape management and restoration, and to create innovative financing mechanisms for local benefits. The WBG is also supporting a sustainable tourism recovery, taking advantage of its inter-disciplinary expertise to help countries to tackle over-exploitation of natural resources, deforestation, and illegal wildlife trade, and to sustain livelihoods.

#### 4. Mobilizing finance

**The challenge:** Closing the financing gap, estimated at US\$700 billion per year over the next ten years,<sup>22</sup> needs a holistic approach involving *greening finance* – directing financial flows away from projects with a negative impact on nature towards those with positive impact, and *financing green* – unlocking investment in conservation, restoration, and the sustainable use of nature.<sup>23</sup> Repurposing harmful subsidies could reduce this gap by US\$500 billion.<sup>24</sup>

**In response, the WBG** is helping countries align financial flows with sustainable development objectives and unlock direct investment into natural capital through analytics and decision-making tools; partnerships; and financial innovation such as piloting green, blue, and wildlife conservation bonds; and performance-based mechanisms such as REDD+.

#### 5. Developing metrics and decision support tools

**The challenge:** The decisions of public and private actors involving biodiversity often entail material trade-offs, yet they are supported by incomplete information on nature's value and the risks associated with its loss. Improved spatial data and metrics are essential for better informing planning, policy, and financial decisions.

**In response, the WBG** uses its knowledge and analytics to support client countries in technical capacity enhancements, and the gradual adoption of natural capital accounting and ecosystem valuation. The WBG is also supporting the application of spatial planning and ecosystem modelling tools, as well as other tools for biodiversity impact assessment to inform investment decisions at the project, landscape, and national level.

#### 6. Leveraging partnerships

**The challenge:** Partnerships are essential for an effective global response to the nature crisis, and this requires strengthening dialogue with the private sector, financial institutions, and regulators on nature and on the role of financial sector and trade policy as means to curb environmental degradation. This also includes building coalitions of actors at the local level.

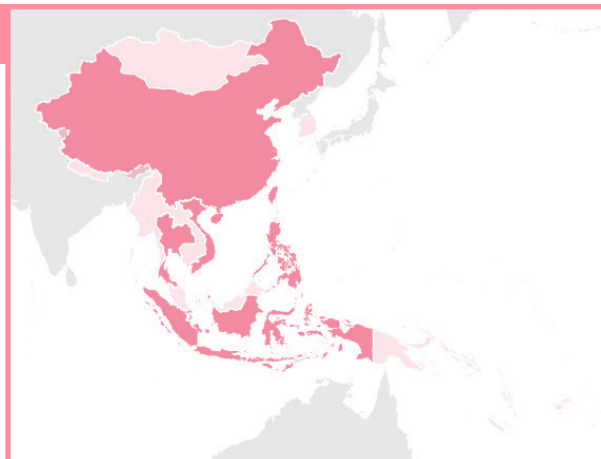
**In response, the WBG** promotes collaborative partnerships that bring consensus amongst multiple stakeholders for joint action. This is becoming increasingly relevant for globally significant ecosystems that span countries, where their services transcend national boundaries. Examples of such ecosystems include the Amazon basin in South America, the Sahel, Savannahs in East Africa, Miombo Woodlands of Southern and Central Africa, Congo Basin, and mountain landscapes and the Aral Sea Basin in Central Asia.

**The WBG takes a multi-regional and cross-sectoral approach to investing in nature.** The WBG portfolio supports conservation and restoration of nature and harnessing of its services sustainably to advance development goals. This brief provides a birds-eye view of selected WBG investments and technical assistance to sustainable development across regions, demonstrating inherent interconnectedness of sectoral interventions. The WBG operates through a diverse set of financing modalities, often blending resources from the International Development Association (IDA), the International Bank for Reconstruction and Development (IBRD), multilateral and bilateral trust funds, such as the Global Partnership for Sustainable and Resilient Landscapes (PROGREEN) and the Blue Economy Program (PROBLUE), as well as the private sector for greatest impact (see brief *Scaling up Finance for Nature*).

**A series of global and regional programs the World Bank leads also provide catalytic funding and advance knowledge for accelerated adoption of nature-based approaches in different sectors.** These programs include the Food, Land Use, and Restoration Impact Program; Global Platform for Sustainable Cities; Global Wildlife Program; Amazon Sustainable Landscapes program; and Global Facility for Disaster Reduction and Recovery, among others.



In **Indonesia**, the World Bank is supporting critical investments by the government in green, resilient, and inclusive development. The Sustainable Landscapes Management Program is supporting the government's efforts to reduce deforestation and forest degradation and promote equitable growth through land tenure reform, social forestry, and emissions reductions payments. The World Bank's Sustainable Oceans Program is supporting the country's transition to a blue economy. Oceans underpin the country's prosperity - 70 percent of Indonesians live in coastal areas, over 50 percent



of the country's protein supply is derived from fisheries, and Indonesia's ocean economy is worth over US\$256 billion annually.<sup>25</sup> Yet this natural capital is under threat from overfishing, marine plastic pollution, and coastal and urban development, which are resulting in degradation of critical ecosystems such as coral reefs and mangroves. These challenges are exacerbated high vulnerability to climate change, which also - undermines coastal livelihoods. Building on a broad portfolio of investments and technical assistance, the World Bank-supported Mangroves for Coastal Resilience project aims to rehabilitate 75,000 hectares of mangroves, while enhancing mangrove protection and strengthening coastal development opportunities.

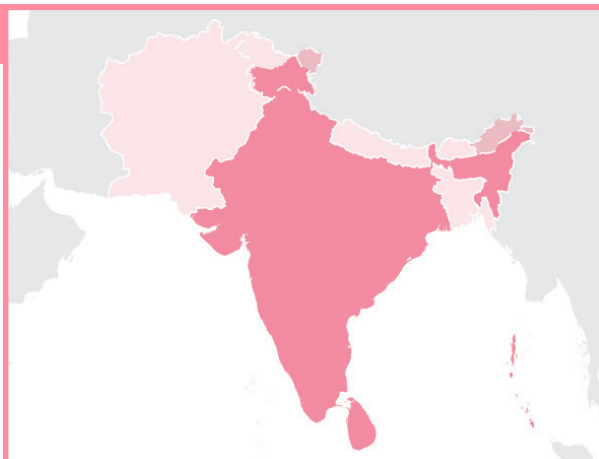
In **Vietnam**, fishing provides protein for 50 percent of the population, and is the primary livelihood for poor and near-poor coastal communities, with nearly 70 percent of the fishing fleet dependent on nearshore fisheries. Yet, overexploitation of fisheries has significantly reduced the yields and quality of the catch. To help restore the natural capital that supports food security and jobs, the World Bank is supporting national-level inter-sectoral spatial planning. Already piloted in eight provinces,<sup>26</sup> this approach has reduced conflicting uses of coastal resources across sectors and operators, and restored depleted marine fisheries. The project helped more than 13,000 aquaculture farmers reduce waste and pathogen spillover. It also helped set up co-management groups along 803 km of coastline, which has reduced fishing violations by a third, allowing for the recovery of marine ecosystems. Further upstream, improvements in fishing ports have halved postharvest losses. The International Finance Corporation (IFC) is also helping set Vietnam on a path to a blue economy by supporting the integration of nature risks into offshore wind planning and investments.

In **South-East Asia**, a global manufacturer of PET resin received the IFC's first blue loan to tackle plastic pollution. The US\$300 million facility will support the recycling of 50 billion PET bottles a year globally by 2025, diverting waste from landfills and oceans, benefitting **Thailand, Indonesia, and the Philippines**.

In **China**, a government investment and US\$380 million loan from the World Bank will help address water scarcity and ecosystem degradation in the Yellow River basin, which supplies 160 million people with water and produces 26 percent of China's GDP (2018 data). Water security is predicted to become a major area of vulnerability due to climate change, especially in northern China, where availability could drop 24 percent by 2050. Ecosystem degradation makes matters worse, with a third of the river catchment suffering from soil erosion, which threatens land productivity and creates pollution. Smallholder farmers need support for adaption as they face potential yield losses and shifts in crop growing area; the World Bank program will support basin-level coordination, provincial-level ecological protection, and integrated water management, for an economically productive, ecologically sustainable, and climate-resilient Yellow River Basin. At the farm level, this means helping producers reduce pollution runoff and implement forest restoration, terracing, and water and soil conservation, among other sustainable practices. The program will further help restore habitats for 147 freshwater fish species, 27 of them endemic, and millions of waterbirds in the basin.

## SOUTH ASIA

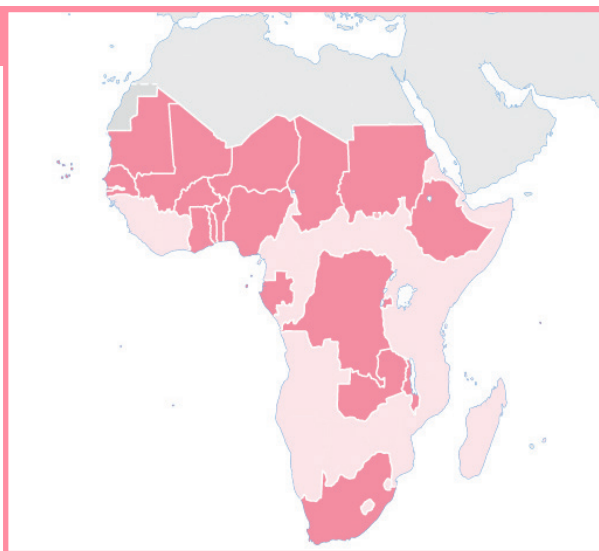
In **India**, the World Bank is strengthening Kerala's resilience against natural disasters, climate change impacts, disease outbreaks, and pandemics. The state has suffered multiple landslides and floods over the past decade. The 2018 monsoons - the worst in a century - triggered devastating floods and landslides, affecting over 5.4 million people, displacing 1.4 million, and resulting in financial losses of US\$3.74 billion. A state-level programmatic series of World Bank operations has since supported cross-sectoral investments in Kerala's resilience, recovery, and rebuilding, including after the COVID-19 pandemic. The current phase - the Resilient Kerala Program, is investing US\$125 million in embedding resilience in key economic sectors, including through integrated and sustainable water and land management, and a shift to climate-smart agriculture. It also supports the establishment of an IT-enabled One Health platform that will strengthen coordination, joint surveillance, and preparedness to counter future zoonotic disease outbreaks.



In **Sri Lanka**, the World Bank is supporting the Road Development Authority's effort to develop and roll out climate resilient road design standards, construction guidelines, and best practices for integrating nature-based solutions into road infrastructure. This will help protect roads from damage from erosion and landslides, and reduce their negative impacts on biodiversity by improving habitat connectivity. The project will also help integrate bioengineering solutions and climate-resilient design into road improvements. More than 320,000 people will benefit from climate-resilient road access to markets, schools, and health facilities.

## AFRICA

In the **Sahel**, temperatures are increasing 1.5 times faster than the global average. Due to land degradation, around 80 percent of the farmland has lost productivity, diminishing the availability of land for food production or grazing, depleting water, and increasing the vulnerability of communities. In 2012, the World Bank launched the Sahel and West Africa Program in Support of the Great Green Wall (financed by IDA - US\$1.2 billion and the GEF - US\$100 million) to implement landscape-level interventions under a pan-African initiative spanning 12 countries: **Benin, Burkina Faso, Chad, Ethiopia, Ghana, Mali, Mauritania, Niger, Nigeria, Senegal, Sudan, and Togo**. More than 19.4 million people benefited from this program, which has restored degraded land and instituted sustainable land and water management for improved agricultural productivity, biodiversity, and resilience across 1.6 million hectares of African drylands.<sup>27</sup> At the One Planet Summit in 2021, the World Bank committed to invest a further US\$5.6 billion between 2020 and 2025 in 11 countries that are part of the Great Green Wall. Around 60 projects across different sectors will scale up restoration and integrated land management for even larger and more transformative results.



In **Ethiopia** the World Bank's comprehensive program<sup>28</sup> is scaling up the results of a successful decade-long effort by the government to improve land management, helping to reverse land degradation and restore critical ecosystem services. World Bank investments have already brought 1.9 million hectares of watersheds in Ethiopian highlands under sustainable land management, benefiting 3.8 million people.



By 2025, up to 4.5 million hectares are expected to benefit from improved water and soil moisture and fertility management practices, while integrated agro-silvo-pastoral practices will boost agricultural productivity, climate resilience, and economic opportunities at the farm level across 7,900 micro watersheds. Land certification is another important element – the program has supported the issuance of 3.6 million land certificates, 2.3 million of them to women.

In **Rwanda**, the World Bank is helping the municipal government in the city of Kigali integrate ecosystem services into urban planning, through technical assistance to develop a comprehensive, evidence-based stormwater management master plan, and through investments in integrated ‘gray’ and ‘green’ infrastructure solutions that reduce runoff along human settlements and restore the flood attenuation capacity and water quality of the wetlands. With support of a GEF grant, wetland restoration is being piloted on 194 hectares, and is expected to improve climate resilience and urban livelihoods for more than 250,000 people exposed to increasingly frequent flood events.<sup>29</sup>

As part of the GEF-funded, World Bank-led Global Wildlife Program covering Africa, Asia and Latin America, **19 countries across Africa** are working together to combat the illegal wildlife trade – widely reported as the world’s fourth largest crime. The program is designed holistically to work across wildlife trafficking chains from source to demand, in parallel with promoting wildlife-based economies that benefit local communities. Through efforts to halt poaching, address human-wildlife conflict, scale up sustainable land and forest management, and develop nature-based tourism, World Bank projects in **Chad, Gabon, Malawi, the Republic of Congo, South Africa, and Zambia** are protecting flagship wildlife such as elephants and rhino, improving the management of 9.5 million hectares, restoring over 100,000 hectares, and benefitting 680,000 people through diversified and resilient livelihoods that are consistent with wildlife conservation.

## MIDDLE EAST AND NORTH AFRICA

The World Bank is helping **Morocco** realize the full potential of its rich blue assets in the Mediterranean Sea and the Atlantic Ocean, which contribute substantially to GDP and jobs in the country, and are essential to attaining a sustainable, resilient, and inclusive economy as part of COVID recovery efforts. The WBG supports institutional frameworks and coordination amongst multiple ministries, and provides targeted investments to strengthen two key blue sectors - tourism and fisheries. The project promotes climate-resilient and sustainable integrated management to restore 78,270 hectares of marine and coastal areas, with a focus on creating jobs and improving biodiversity management in seven selected sites. Notably, it will also promote Moroccan tourism through better environmental monitoring and protection of its beaches, inter alia. These efforts build upon the recently-adopted legal framework for integrated coastal zones management, and support the WBG Climate Change Action Plan (2021-2025) to ensure a coherent approach in aligning the country’s development and climate change goals.

In **Jordan**, the Multilateral Investment Guarantee Agency (MIGA) supported the construction, and then subsequent upgrading and expansion, of wastewater treatment infrastructure for the cities of Amman and Zarqa. Initial guarantees supported the construction of a plant which is addressing both water scarcity and environmental and health concerns related to the discharge of untreated wastewater into rivers and surface water bodies. Subsequent guarantees supported the upgrade and expansion of the infrastructure to provide additional capacity to meet the needs of the growing population.

## LATIN AMERICA AND THE CARIBBEAN

In **Grenada, Saint Lucia, and Saint Vincent and the Grenadines**, the World Bank is making multi-sectoral blue economy investments to strengthen resilience and create jobs, accelerating the post COVID-19 recovery. Growth and jobs in two critical sectors - tourism and fisheries - have been heavily constrained by COVID-19, which has complicated challenges related to high debt, climate change, and natural disasters. The project will identify previously untapped sustainable economic opportunities for small, semi- and industrial-scale fishing operators, and invest in coastal infrastructure and an emergency response mechanism benefiting 28,000 people. To boost employment and productivity, it will also improve access to finance for 75 micro-, small-, and medium-sized enterprises, 60 percent of which are women-owned or managed, in the tourism, fisheries, and waste management value chains.



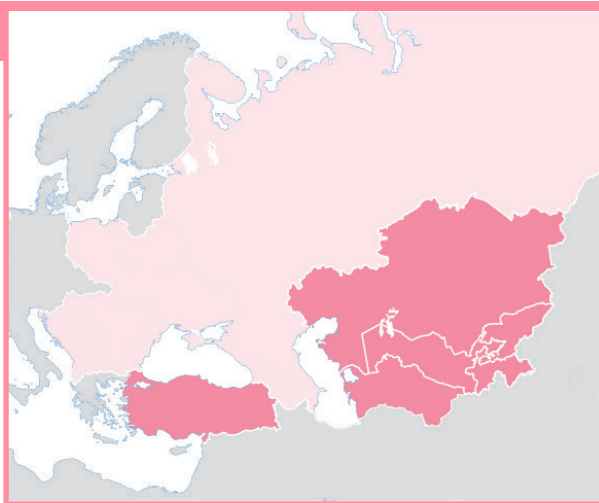
**Brazil:** In the Cerrado biome - the second largest biome in Brazil and South America, and a key producer of agricultural commodities, the World Bank is supporting integrated landscape management by helping 4,000 landholders and agricultural producers adopt low-carbon-emission agricultural and land-restoration practices. This will help mitigate the pressures from the expanding mechanized soybean and beef cattle value chains, which are driving natural resource degradation and reducing agricultural productivity. Nearly 1.2 million hectares of land in the Cerrado will be brought under improved land use planning – a critical step for aligning development goals with sustainable management of the ecosystems that support productive sectors. Low-carbon-emission agricultural practices have been adopted on nearly 94,000 hectares. In the state of Sao Paulo, IFC is investing up to US\$100 million in wastewater and solid waste treatment through performance-based contracts which incentivize private sector companies to reduce pollution and improve water quality in the Pinheiros River.

The loan facility to the São Paulo State development agency will unlock lending to small and medium-sized water and energy service companies operating in the water, wastewater, and solid waste sectors. IFC is also supporting improvements in water waste traceability in high-risk areas for biodiversity.

In **Mexico**, agriculture is of pivotal socioeconomic importance, with 45 percent of the labor force employed in the sector, mainly in rural areas. The livestock sector alone employs more than 900,000 people directly.<sup>30</sup> Yet extensive cattle ranching is also increasingly linked to land degradation due to overgrazing affecting between a quarter to a half of the territory of certain states, to depletion of water resources, and to deforestation. Supported by the GEF-funded, World Bank-led program on Food Systems, Land Use and Restoration (FOLUR), the Mexico Connecting Watershed Health with Sustainable Livestock and Agroforestry Production project is aimed at helping 10,000 farmers shift to sustainable and climate-smart productive practices and restore 10,500 hectares of land, bringing 450,000 hectares of land under climate-smart practices, and spanning 15 watersheds. This is expected to promote landscape restoration, conserving biodiversity, and enhancing provision of ecosystem services that the agricultural sector needs to remain productive. The project will build the resilience of rural jobs and smallholder livelihoods by conserving and restoring ecosystem services such as water supply, flood control, and pollination, and help mitigate GHG emissions equivalent to 1.2 percent of Mexico's Nationally Determined Contribution linked to the land-based sectors.

## EUROPE AND CENTRAL ASIA

In **Central Asia**, arid landscapes are prone to desertification that threatens infrastructure resilience and the supply of transboundary water resources. The cost of inaction is equivalent to 4 percent of the GDP of Central Asia. Agricultural production has already dropped by up to one-third, creating food insecurity and constraining economic growth;<sup>31</sup> climate change further aggravates these pressures. The World Bank's five-year Climate and Environment (CLIENT) umbrella analytical program is facilitating collaboration between **Kazakhstan, the Kyrgyz Republic, Tajikistan, Turkmenistan, and Uzbekistan** for green, inclusive and resilient



COVID-19 recovery. The analytical work led to the creation of the regional Resilient Landscapes in Central Asia (RESILAND) investment program, which is catalyzing transboundary action to restore landscapes, improve ecosystem connectivity, and increase the resilience of communities and infrastructure to the impacts of climate change and land degradation.

The RESILAND World Bank project in **Tajikistan** addresses the broad-based drivers of degradation, spanning multiple sectors in restoring and enhancing the management of 685,000 hectares of degraded forests, and shifting 83,000 hectares of farmland to integrated and community-based pasture management, and climate-smart cropping practices. RESILAND projects in **Uzbekistan** and **Kazakhstan** are also investing in the restoration of degraded forests and rangelands.

In **Türkiye**, the World Bank has set in motion a model for landscape resilience in vulnerable rural regions to support the country's sustainable COVID recovery efforts and facilitate a green transition. Investments in nature-based solutions and resilient infrastructure are helping lift vulnerable rural communities out of poverty, by addressing seasonal flooding, droughts, soil erosion, and landslides across 1 million hectares of land in the Bolaman and Cekerek river basins — two areas marked by high poverty rates and vulnerability to climate change. The project will restore forest landscapes, help create jobs, train 2,000 farmers in sustainable agriculture, and build resilient infrastructure for improved irrigation and water supply, benefitting 90,000 people. Another 65,000 beneficiaries in forest village communities will be able to access more diversified livelihood opportunities.

## 4. WHAT DOES SUCCESS LOOK LIKE?

**A whole-of-economy approach.** There are many examples of successful actions that address nature loss and harness nature's services to advance sustainable development goals across all regions. The challenge now is to scale them up and mainstream them into decisions across all levels and economic sectors, including the financial sector. Success will be a transition to sustainable development that 'bends the curve' of biodiversity and ecosystem services loss and simultaneously addresses climate change in an equitable and inclusive manner.

**Strategic investments in nature-based solutions to achieve multiple goals.** Investing in nature can provide opportunities for countries to tackle multiple challenges simultaneously. Greater investment in nature-based solutions can advance many societal goals, including food and water security, disaster risk management, human health, and climate change mitigation. For the WBG, this means mainstreaming nature-based solutions into project financing in line with commitments made in IDA20 and in the WBG Climate Change Action Plan 2021-2025.



**Taking action in priority sectors.** Through a strategic balance between restoration and production, with a focus on the interdisciplinary ‘nature-food-health nexus’, countries could enhance growth and resilience, and strengthen community-based governance and management of natural resources. In many low- and middle-income countries, continuing to invest more natural capital and nature-based solutions as a driver in developing ecosystem services-based approaches will allow for successful economic gains to simultaneously alleviate poverty and improve ecosystem functioning.

**Government buy-in.** Success also means boosting regulatory and policy incentives for government buy-in and increased budget support; employing diligent safeguards related to risk management that allow informed tradeoff decisions with positive impacts; defining adaptation opportunities; and supporting a whole-of-economy approach to addressing the drivers of nature loss, including by shifting value chains towards sustainable practices and greener jobs. Well-informed political leadership is also key for engaging stakeholders and financial partners for a collective contribution to achieving green, resilient, and inclusive development.

**Creating the enabling conditions for private sector investment.** An enabling environment created by regulators and governments, is key to attracting private investment. Scaling up direct investments in nature – and redirecting financial resources that may currently do harm to nature – towards nature-positive companies and projects that support conservation, restoration, and sustainable use of biodiversity and ecosystem services is already showing success on the ground.

**Seeing nature as central to green, resilient, and inclusive growth.** Looking ahead, a mark of true success would be countries systematically exploring opportunities for strategic and innovative investments in biodiversity and ecosystem services that facilitate green, resilient, and inclusive growth. The WBG will support concerted global efforts to (i) leverage investments for better informing multisectoral land use plans in different jurisdictions; (ii) enhance joint biodiversity and climate change data generation and analytics to support performance evaluations; (iii) mainstream biodiversity into sectoral planning of green energy; (iv) consider ecological connectivity and biodiversity assets in the urban setting; and (iv) mitigate the impacts of mining through the rehabilitation of disturbed land and adherence to licensing requirements. It also means developing a strong evidence base for investments that foster green, resilient, and inclusive development, and improve technical capacities of client countries to use this evidence in decision making. Enhancing a country’s enabling environment will be central to the success of these measures.

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