



GREEN
CLIMATE
FUND



GCF: Driving the transformation to a climate-resilient financial system



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FOREWORD

Climate change is one of the most pressing challenges of our century and it demands immediate action. Temperatures are rising, biodiversity is collapsing, and livelihoods are under threat. Developing countries are especially vulnerable to climate change and least able to afford its consequences. It is imperative that financial flows be made consistent with a pathway towards low greenhouse gas (GHG) emissions and climate-resilient development.

The Green Climate Fund (GCF) is at the forefront of addressing this challenge by financing climate mitigation and adaptation projects in the developing world, having already approved projects worth more than USD 5.2 billion in over 100 developing countries.

GCF is also supporting the alignment of the financial sector with national targets to meet the Paris Agreement objective of limiting global temperature rise to well below two degrees Celsius. While there is a positive trend towards greening financial institutions, much work remains in enabling developing countries to be ready to engage in green finance on their own.

GCF has an impressive track record in improving institutions' access to climate finance by channelling funds through its Accredited Entities to local financial institutions. GCF works with partners to de-risk and scale up climate-resilient investments, mobilizing additional private capital. These investments will enable GHG reductions and boost the climate resilience of millions of beneficiaries. GCF partners with international and national entities to overcome market barriers and build local capacity to drive the green transition. As well as highlighting the importance of local financial institutions, many of GCF's interventions also focus on building regulatory and policy frameworks.

We are delighted to introduce GCF: Driving the Transformation to a Climate-resilient Financial System, the first publication by the GCF's Private Sector Facility. Our goal is to encourage international and local public- and private-sector entities to engage with GCF and help green finance flows. We hope you find this publication useful, and we invite you to partner with GCF to build a low-carbon and climate-resilient future together!

Yannick Glémarec,
Executive Director, GCF



Ayaan Z. Adam,
Director, Private Sector Facility, GCF



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ABBREVIATIONS AND ACRONYMS

AFD	Agence Française de Développement (French Development Agency)
AfDB	African Development Bank
BOAD	Banque Ouest Africaine de Développement (West African Development Bank)
CABEI	Central American Bank for Economic Integration
DBSA	Development Bank of Southern Africa
DFI	development finance institution
EBRD	European Bank for Reconstruction and Development
ESRM	environmental and social risk management
GCF	Green Climate Fund
GHG	greenhouse gas
IADB	Inter-American Development Bank
IDCOL	Infrastructure Development Company Limited
IDFC	International Development Finance Club
IFC	International Finance Corporation
LDC	least developed country
LFI	local financial institution
MGFC	Mongolian Green Finance Corporation
MSMEs	micro-, small- and medium-sized enterprises
NABARD	National Bank for Agriculture and Rural Development
NDB	national development bank
NDC	nationally determined contribution
NGFS	Network of Central Banks and Supervisors for Greening the Financial System
PPF	Project Preparation Facility
PSF	Private Sector Facility
SEFF	Sustainable Energy Financing Facility
SIDS	Small Island Developing State
UNFCCC	United Nations Framework Convention on Climate Change

INTRODUCTION TO GCF'S PRIVATE SECTOR FACILITY

We aim to mobilize private-sector capital for climate projects that would otherwise be unviable

The Green Climate Fund (GCF) was established by the United Nations Framework Convention on Climate Change (UNFCCC) in 2010 as an operating entity of the financial mechanism of the Convention to support global climate action by promoting a low-emission and climate-resilient transition in developing countries. GCF serves the Paris Agreement, supporting such countries in reaching their nationally determined contributions. Since 2015, GCF has approved projects worth over USD 5.2 billion.

GCF has created the Private Sector Facility (PSF), whose primary mission is to engage both the local and global private sector in supporting climate change mitigation and adaptation projects. Through active engagement with our partners, we can act as a catalyst for funding high-impact, transformative and innovative climate projects and activities. Through the PSF, we aim to de-risk the delivery of private capital and scale up private-sector investment flows for low-carbon and climate-resilient development.

To date, we have channelled USD 1.7 billion through our Accredited Entities to the financial sectors of developing countries. We have worked with our partner institutions to de-risk and scale up climate resilient investments, mobilizing an additional USD 4.3 billion in private capital. These investments will mitigate greenhouse gas emissions – 441 megatonnes of CO₂eq – and enhance the resilience of approximately 10 million beneficiaries. By collaborating with our international accredited entities (e.g. Agence Française de Développement, Deutsche Bank and Mitsubishi UFJ Financial Group), regional entities (e.g. African Development Bank) and national private-sector entities (e.g. XacBank in Mongolia), we have addressed market barriers and built local capabilities to drive the transition to a climate-friendly financial system.

We have channelled USD 1.7 billion through our Accredited Entities to the financial sectors of developing countries

Since our establishment, we at PSF have learned many lessons in how to engage more effectively with private-sector entities. This publication is the first of a set of PSF publications to inform existing and potential partners on best practices we have developed for designing programmes and accessing our resources. It focuses on our vision to green the financial system through engagement with a wide range of financial institutions, notably: central banks, commercial banks, non-banking financial institutions, development finance institutions, national development banks, microfinance institutions, cooperatives, and other green investment vehicles.

EXECUTIVE SUMMARY

The chief climate-related risks that the global economy is anticipated to encounter fall into two categories: physical risks, and transition risks. These risks threaten the operations of individual institutions as well as the stability of the entire financial system. Developing countries are particularly at risk as their economies tend to be more commodity-based and hence vulnerable to price fluctuations.

Chapter 1

Various actors within the financial sector need to respond to climate risks, especially central banks and the banking sector. Central banks can create an enabling environment by imposing regulations and issuing green finance guidelines. As public resources alone are insufficient to meet the need for climate finance, both development banks and commercial banks have an integral role to play in directing finance flows to climate investments. However, they face several barriers, including: limited access to affordable, long-term finance; capacity constraints in implementing green investments; and the lack of an adequate regulatory framework to allow for a low-carbon transition.

Chapter 2

At GCF, we have a vision to create a climate-compatible financial system by overcoming these barriers through our Funding Proposal, Project Preparation Facility, and Readiness Proposal funding windows, along with outreach and promotion of green finance. Through capital provision coupled with credit-enhancement instruments such as guarantees, first-loss capital and extended tenors, we aim to mobilize private-sector capital for climate projects that would otherwise be unviable. In addition, establishment of green banks is another initiative we are promoting. Through the PSF, we also provide grant funding for technical assistance and to help policymakers create an enabling environment for green investments.

Chapter 3

In the publication, a series of case studies, grouped thematically, demonstrate the approach we have taken in approved programmes. These themes include: the green on-lending model through local financial institutions; the risk sharing approach to mobilize private capital; and increasing access to finance for the most vulnerable micro small, and medium enterprises.

Chapter 4

We have learned lessons from these programmes. This publication offers guidance on what makes a successful GCF financial institutions programme and presents the new offerings we are exploring to increase our impact. By sharing our vision for greening the financial sector, through both programmes and policy-level support, we hope that our partners will understand the breadth of resources that GCF can provide to help them achieve our joint goal of achieving the Paris Agreement targets.

Chapter 5

WHY WORK WITH GCF?

At GCF, we offer comprehensive solutions to both commercial and development-oriented financial institutions to jump-start their green transitions. We do this primarily through our three funding windows:

1. **Funding Proposal:** Concessional financial instruments help our partners de-risk and crowd in private-sector climate investments in developing countries. They include:
 - long-term, affordable loans,
 - subordinated loans,
 - guarantees,
 - equity,
 - reimbursable grants,
 - grants for technical assistance.
2. **Project Preparation Facility:** Grant funding lets our partners develop climate projects (including feasibility studies, legal due diligence and pilot projects) for later submission as full Funding Proposals.
3. **Readiness Programme:** Grant funding helps countries create an enabling environment for climate finance. This funding could be for policy interventions from central banks, the development of green capital markets, and establishing national green banks, among others.

In addition to our financial resources, GCF has the sectoral expertise to help design paradigm-shifting programmes and is uniquely positioned to bring together diverse actors to forge meaningful partnerships for climate action.

1.

THE CLIMATE THREAT TO THE GLOBAL ECONOMY AND THE FINANCIAL SYSTEM

In 2019, *The Global Risks Report 2019* (WEF, 2019) listed five environmental-related risks among the ten biggest global risks (Table 1). Among these, the economy is most vulnerable to extreme weather events, failure of climate change mitigation and adaptation, and major natural disasters. The effects are already being felt as in seven of the past ten years global costs from natural disasters have exceeded the 30-year average of USD 140 billion, reaching as high as USD 340 billion in 2017 (TCFD, 2019). Economists estimate that climate change could cause a loss of 16.9 per cent in the value of global assets under a “business as usual” scenario (Dietz et al., 2016). This loss would result from a failure to recognize and respond to climate-related risks commonly categorized as physical risks and transition risks.

Under a “business as usual” scenario, climate change could cause a loss of 16.9 per cent in the value of global assets

TABLE 1. RANKING OF LIKELIHOOD OF GLOBAL RISKS

RANK	RISK TO FINANCIAL SYSTEM
1	Extreme weather events
2	Failure of climate change mitigation and adaptation
3	Natural disasters
4	Data fraud or theft
5	Cyber attacks
6	Human-induced environmental disasters
7	Large-scale involuntary migration
8	Biodiversity loss and ecosystem collapse
9	Water crises
10	Asset bubbles in a major economy

Note: Environmental-related risks highlighted in green
 Source: WEF, 2019

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We can do it. We can address climate change at scale. And by doing so, we can both promote prosperity and a stable climate for the future generations.

YANNICK GLÉMAREC
 GCF EXECUTIVE DIRECTOR

Physical risks arise from the threat of extreme weather events such as hurricanes or floods, often referred to as acute risks, or gradual changes in climate from a slow-onset process such as sea-level rise or soil degradation, referred to as chronic risks

KEY DRIVERS OF VULNERABILITY: PHYSICAL RISKS AND TRANSITION RISKS

Physical risks arise from the threat of extreme weather events such as hurricanes or floods, often referred to as acute risks, or gradual changes in climate from a slow-onset process such as sea-level rise or soil degradation, referred to as chronic risks. Such events will increase credit risk as borrowers will be less likely to repay due to lower productivity of assets, disruptions in the supply chain, changes in market demand and, ultimately, job losses for the most vulnerable. Consequently, lenders will tighten credit policies and increase collateral requirements.

Liability risk is also affected, especially impacting the insurance sector, as increasing claims from asset loss or the occurrence of extreme weather events will result in more payouts to beneficiaries (Figure 1). De facto, it will restrict access to credit/insurance services as they will become more costly. Thus, the exposure to physical risks for the financial sector will harm both the recipients and the suppliers of financial services.

FIGURE 1. EXAMPLE OF THE IMPACT OF CLIMATE CHANGE ON LIABILITY RISK



Indirect impacts in the economic sector are more profound, as they could provoke an increase in migration flow, a loss of jobs, and increased macroeconomic vulnerability. This transformation of the financial sector makes a compelling rationale for institutions to proactively manage these risks. However, it is also necessary to consider the costs associated with this transition.

“
Floods in Kerala, India in 2018 displaced 1m people (3% of the state population), causing an estimated USD2.85bn in asset impairments and damaged one third (70,000km) of Kerala’s total roadways.
 SOURCE: DURDEN, 2018

The transaction costs and disruption in business models pertaining to a shift to climate-compatible capital markets are classified as transition risks. They refer to the risk of losses resulting from implementation of market-based policies, or the introduction of disruptive technologies that leave existing assets commercially unviable. One example is the possibility of carbon pricing. This would cause a significant decrease in value for any fossil fuel-based assets or companies and entail additional taxes. In response, asset and liability values should be reassessed depending on the actions of policymakers and individual actors affected.

These risks must be considered in an integrated manner as the magnitude of physical risks of climate change will increase the transition risks, and, conversely, a proactive management of transition risks could decrease the financial impacts of physical events.

FIGURE 2. CLIMATE CHANGE AS A MAJOR RISK FOR FINANCIAL STABILITY

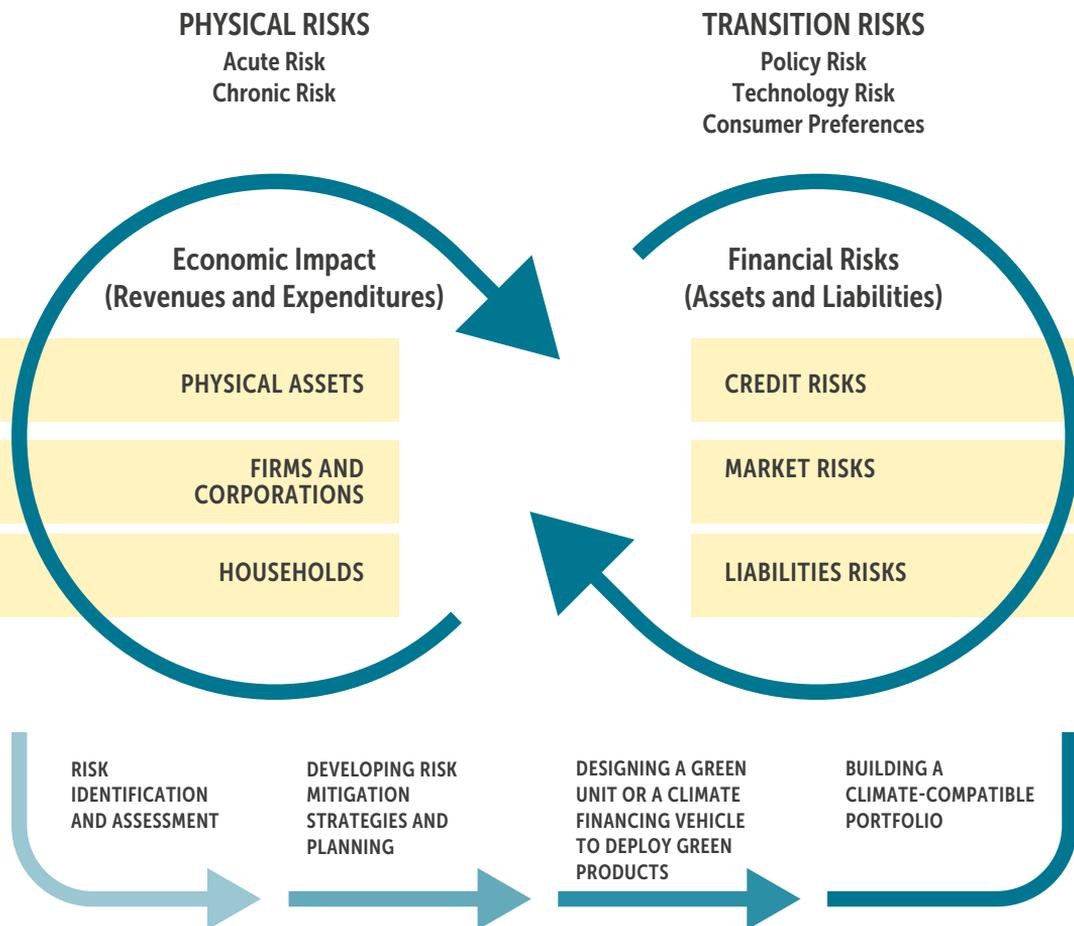


Figure 2 illustrates the interdependence between physical risks to assets, firms and households and the resulting increase in credit, market and liability risks. Financial institutions must manage these risks, first by recognizing and assessing them. Once assessed, institutions can develop risk management strategies that, at a minimum, would involve negative screening to avoid certain types of investments such as carbon-intensive assets. Going a step further, they can proactively develop green product offerings and build climate-compatible portfolios, which are needed to meet the targets of the Paris Agreement.



Paris Agreement:
 An agreement within the United Nations Framework Convention on Climate Change (UNFCCC) dealing with greenhouse-gas emissions mitigation, adaptation, and finance. Its goal is to keep the increase in global average temperature to well below 2 °C above pre-industrial levels. Under the agreement, each country must determine, plan and regularly report on the contribution that it undertakes to mitigate global warming.



Developing countries are particularly vulnerable to the physical risks of climate change

A FOCUS ON DEVELOPING COUNTRIES

With a high proportion of developing countries having commodity-based economies, they are particularly vulnerable to the physical risks of climate change and the resulting commodity price volatility, which will in turn affect household incomes, particularly for unbanked and uninsured rural households. In addition, the value of physical assets will be more affected due to the lack of resilient infrastructure and the limited availability of financial services in vulnerable areas.

As an example of a developing country addressing the physical risks of climate change, Indonesia has recently decided to move its capital city from Jakarta, which is sinking by about 25 cm per year and making this coastal city increasingly vulnerable to sea-level rise, to East Kalimantan on the island of Borneo. This is a drastic but necessary step as 95 per cent of north Jakarta could be underwater by 2050.

The challenge is greatest for the least-developed countries (LDCs), small island developing states (SIDS), and African countries as they face increased physical and transition risks requiring a combination of resilience building, innovative technologies and policy reform. In the portfolio of the Green Climate Fund (GCF), these regions constitute a priority as they are those most vulnerable to climate change and where funding is most needed. It is important to note that some countries are taking proactive steps to create an enabling environment for the green transition and fostering markets for new technologies, as in the case of Bangladesh (**Box 1**).

As illustrated in **Box 1**, GCF's Private Sector Facility (PSF) takes a country-driven approach by providing resources to in-country players to develop their own solutions, with guidance and knowledge sharing from our team. In the next section, we further explore the impact that central banks and supervisory authorities can have on the financial system and why they are essential players in the response to climate change.

BANGLADESH – A PROACTIVE APPROACH BY THE GOVERNMENT AND CENTRAL BANK

[Bangladesh](#) has one of the fastest-growing economies in the world. That growth has been largely driven by exports of commodities and ready-made garments, along with domestic agriculture. This makes the economy particularly susceptible to the effects of climate change. In response, the government has taken a proactive approach to build a climate-compatible financial system and increase the inflow of climate finance. It is phasing out fossil-fuel subsidies while implementing policy and market-based reforms to respond to transition risk challenges. GCF is supporting these efforts through a partnership with Bangladesh Bank and two agreements between GCF's Project Preparation Facility (PPF) and the Infrastructure Development Company Limited ([IDCOL](#)).

Islamic banking in Bangladesh constitutes one-fifth of the financial sector and represents an important entry point to make green policy reforms. **Through GCF's [Readiness Programme](#), Bangladesh Bank will receive USD 700,000 to help green the financial system** by developing a shariah-based green finance framework for banks and non-banking financial institutions. In doing so, the programme will deliver feasibility studies on green sukuk deployment, strengthen the capacity of financial institutions on green banking, and create a knowledge hub for sharia-based green banking. Bangladesh Bank has plans to release updated environmental and social risk management guidelines to be implemented in early 2020. Together with the results of the GCF Readiness Programme, these will pave the way for a more climate-resilient financial sector. The programme is promising for potential replication, as Islamic finance is a growing sector in many developing countries.

At the market level, GCF's PSF is supporting the IDCOL through two PPF agreements to promote the adoption of energy-saving technologies, providing USD 345,800 for the [textile sector](#) and USD 378,623 for the [garment sector](#). Both initiatives should ultimately result in future Funding Proposals. As the textile and garment sectors are essential to the economy and highly reliant on fossil fuels, they are a natural fit for energy-efficient equipment upgrades. The PPF agreements will fund feasibility studies, baseline analyses, gender studies, along with other requirements of a GCF Funding Proposal, and identify best available technologies for energy-efficient equipment in the respective sectors. The Funding Proposals are also expected to move the industries towards green standards, making them more competitive in international markets.

BOX - 1



Sukuk:
A sharia-compliant financial certificate similar to a bond.

2.

THE ROLE OF THE FINANCIAL SECTOR IN RESPONDING TO CLIMATE CHANGE

Managing assets worth hundreds of trillions of dollars, the global financial sector is made up of banks, asset managers, pension funds, insurance firms, sovereign wealth funds, foundations and endowment funds. With such a pool of capital under its direction, the financial sector must act as the intermediary mechanism for distributing capital flows to the various parts of the economy. And, as shown in Chapter 1, the three main threats to the global economy are climate-related. Thus, it is understandable that climate risks should also be viewed as financial stability risks and that, therefore, they come squarely under the remit of central banks and financial regulators.

The financial sector must act as the intermediary mechanism for distributing capital flows to the various parts of the economy

CENTRAL BANKS: GATEKEEPERS OF THE FINANCIAL SECTOR

Central banks and supervisory authorities are powerful regulatory institutions. They are well positioned to steer the financial sector towards supporting and implementing the low-carbon transition through the application of effective financial regulation and monetary, and even fiscal, policy. Although most countries have ratified the Paris Agreement, many central banks still consider that climate change is not a systemic risk threatening financial stability. According to one survey, only six central banks consider climate change a direct and major threat to financial stability ([Central Banking and Amundi, 2019](#)). However, as discussed in Chapter 1, physical and transitional risks arising from climate change can have a material impact on financial and macroeconomic stability. Given that central banks are mandated to understand and address risks that threaten resilience of financial system and economy as a whole, they should take into account potential disruptions from climate change and support greening of financial system.

The case of the Philippines (**Box 2**) is an example of a central bank playing a pivotal role to mainstream green finance as part of its approach to prudential supervision. At GCF, we are eager to support central banks efforts to green their financial systems and increase the climate resilience of them. Accompanying countries' fiscal policy, financial and monetary policy tools are key for central banks to leverage efforts made to implement nationally determined contributions (NDCs) ([Dikau and Volz, 2019](#) and [Krogstrup and Oman, 2019](#)).

Only six central banks consider climate change a direct and major threat to financial stability

BOX - 2**PHILIPPINES CENTRAL BANK TO CATALYSE GREENING OF FINANCIAL SYSTEM WITH GCF'S SUPPORT**

GCF has approved a [USD 692,000 Readiness grant to the Philippines](#) to green its financial sector, with the International Finance Corporation (IFC) acting as delivery partner for this initiative. The IFC is partnering with Bangko Sentral ng Pilipinas (the central bank of the Philippines) and the Bankers Association of the Philippines to engage local financial institution (LFIs) and to promote economic and social risk management in their credit and investment decision-making processes. The programme aims to support the undertaking of local business case studies to understand the risk–return profile of green investments in the country, thereby informing the development of environmental and social risk management (ESRM) guidelines in line with IFC performance standards. Capacity-building and knowledge-sharing initiatives led by the three partners are also to be funded to help banks and LFIs develop and implement their own ESRM. Local banks will receive training on identifying viable climate finance business opportunities, developing strong pipelines and undertaking appropriate due diligence.

Central banks have various policy tools they can use to address climate change. **Table 2** summarizes these tools and refers to examples of countries that have employed green financial regulatory measures.

TABLE 2. POLICY TOOLS FOR CENTRAL BANKS TO GREEN FINANCIAL SYSTEMS

POLICY TOOL	OBJECTIVES	MEASURES	EXAMPLES
Macro-prudential regulation	Improve pricing through better risk management practices, transparency and internalizing climate systemic risks in capital allocation models	Development of sectoral and integrated risk monitoring tools Provision of counter-cyclical capital buffer High risk weight in carbon-intensive assets Lower deposit requirements reserve proportional to the size of green portfolio	The central bank of Brazil mainstreamed environmental and social risks in the Internal Capital Adequacy Assessment Process (Pillar II Basel Accord)
Green micro-prudential regulation	Same as macro but at the level of financial institutions	Disclosure of climate-related risk to banks and insurance companies Environmental and social risk management practices mandatory for financial institutions Climate value-at-risk assessment, stress-testing and scenario-forecasting	As a corollary of the macro level, the central bank of Brazil requires banks to conduct stress tests and assesses banks' capital adequacy based on environmental exposure
Green refinancing to banks	Support the development of climate-compatible markets	Provision of green credit lines to banks and financial institutions at a below-market subsidized interest rate	In 2009, Bangladesh Bank established a revolving refinancing scheme of BDT 2 billion with reduced interest incentives to boost commercial banks' lending to climate friendly projects. The Bank repeated this in 2015, 2016, and 2018. Other examples include the Reserve Bank of India Priority Sector Lending programme
Green credit allocation	Incentives to improve capital allocation model at the level of financial institutions	Limitation of lending to financial institutions with a carbon-intensive portfolio, and a target of loan portfolio allocated to financial institutions investing in green asset classes Application of preferred interest rates for green sectors Lower reserve requirements for green loans	Banque du Liban, the central bank of Lebanon, allows greener banks to hold lower reserves compared to their loan portfolios. The Lebanese Centre for Energy Conservation verifies whether the underlying investments are eligible for receiving the preferential reserve requirement treatment

GCF'S ENGAGEMENT WITH CENTRAL BANKS

Aside from several positive examples such as those mentioned above, most central banks do not consider climate-change-related risks as a systemic risk directly threatening macroeconomic, financial and price stability. In order to encourage more proactive responses, GCF is partnering with international platforms that aim to build the capacity of central banks and share best practices in promoting green finance.

The banking sector is a key lever to scale up climate finance

Network of Central Banks and Supervisors for Greening the Financial System

At the One Planet Summit in Paris in December 2017, eight central banks and supervisors established a [Network of Central Banks and Supervisors for Greening the Financial System \(NGFS\)](#). The platform aims to exchange experiences, share best practices, contribute to the development of environment and climate risk management in the financial sector, and mobilize mainstream finance to support the transition toward a sustainable economy. It defines and promotes best practices to be implemented within and outside of the membership of the NGFS, and conducts or commissions analytical work on green finance. As of August 2019, the NGFS is composed of 42 members and 8 observers, across 5 continents. However, only six central banks are from emerging markets, although these have a broader and more flexible mandate to incorporate green finance consideration into macro-prudential policies.

GCF joined the NGFS as a stakeholder to promote knowledge-sharing and best practices, particularly regarding our Readiness Programme – which can utilize NGFS expertise to design interventions targeted at developing countries' central banks. We intend to facilitate the implementation of recommendations made by the NGFS body of experts, and to encourage central banks and supervisors to join the network. For example, GCF is encouraging the Financial Supervisory Services in the Republic of Korea, which is the host country of the GCF, to join the NGFS. This has involved the joint launching of a study group on climate and sustainable finance with key financial actors in the country.

Sustainable Banking Network

The IFC's [Sustainable Banking Network \(SBN\)](#) is a community of financial-sector regulatory agencies and banking associations from emerging markets committed to advancing sustainable finance in line with international good practice. As of August 2019, the network is composed of 38 countries, including 53 members representing about USD 43 trillion (85 per cent) of all banking assets in emerging markets. Members are committed to moving their financial sectors towards sustainability, with the twin goals of: (i) improved economic, social and governance risk management (including disclosure of climate risks); and (ii) increased capital flows to activities with positive climate impacts. It is a platform for knowledge-sharing and capacity-building that facilitates the mobilization of practical support for members to design and implement national initiatives. GCF looks to offer funding to the network's member countries for targeted interventions depending on how advanced their green financial markets are.

FINANCIAL INSTITUTIONS: CHANNELLING THE FLOWS OF CLIMATE FINANCE

While central banks are the gatekeepers to the financial system of any economy, the goal of their reforms is to change the behaviour of the LFI that we rely on to implement the green transition. Given that public funding is insufficient to meet climate needs, it must be strategically used to crowd in commercial and development-oriented financial institutions.

The role of commercial banks

Total banking sector assets in emerging markets are estimated at USD 50 trillion. Thus, the sector’s potential to meet the investments required for NDCs is immense ([Bank for International Settlements, 2019](#)). However, going beyond the simple role of finance provider, the banking sector is a key lever to scale up climate finance as an intermediary and deployer of green products to corporates and households.

Commercial banks have established relationships with all members of the real economy, from large corporates to micro-, small-, medium-sized enterprises (MSMEs), and households. Acting as intermediaries between their clients and international climate finance, financial institutions account for 57 per cent of green bond issuances, followed by the corporate sector (25 per cent), government (14 per cent), sovereign wealth funds (2 per cent), and the municipal sector (1 per cent) ([Amundi and IFC, 2018](#)). Financial institutions thus have the dual role of managing environmental and social risks for their own portfolios as well as enabling climate investment opportunities for others.

In 2016, the IFC mapped these climate investment opportunities by sector and region based on commitments and finance needs identified through 21 countries’ NDCs ([IFC, 2016](#)). It identified key climate-smart investment opportunities in these countries, including:

- Green buildings in East Asia: China, Indonesia, the Philippines and Viet Nam have a climate-smart investment potential of USD 16 trillion, most of which is concentrated in the construction of new green buildings.
- Sustainable transport in Latin America: Argentina, Brazil, Colombia and Mexico have an investment potential of USD 2.6 trillion, almost 60 per cent of which is for transport infrastructure.
- Climate-resilient infrastructure in South Asia: Bangladesh and India have an investment potential of about USD 2.2 trillion, which is concentrated in the construction of green buildings, ports and rail transport infrastructure, and energy efficiency.
- Clean energy in Africa: The total investment potential of Côte d’Ivoire, Kenya, Nigeria and South Africa is nearly USD 783 billion, which is spread across renewable energy generation (USD 123 billion) and buildings and transportation (USD 652 billion).



Nationally determined contribution (NDC):
A country’s intended reduction in greenhouse gas emissions under the United Nations Framework Convention on Climate Change (UNFCCC).



Climate-proofing existing infrastructure and building new infrastructure that is more climate resilient makes sound economic sense—on average, the benefits outweigh costs by 4:1.

SOURCE: [GLOBAL COMMISSION ON ADAPTATION, 2019](#)

- Energy efficiency and transport in Eastern Europe: The estimated climate-smart investment potential of the Russian Federation, Serbia, Turkey and Ukraine is USD \$665 billion, with over half focused on new green buildings. Energy efficiency is a priority sector, while renewable energy investments are only beginning to accelerate.
- Renewables in the Middle East and North Africa: The total climate-investment potential of Egypt, Jordan and Morocco is USD 265 billion, over one-third of which is for renewable energy generation (USD 97 billion), while 64 per cent (USD 169 billion) is for climate smart buildings, transportation, industrial energy efficiency, electric transmission and distribution, and waste solutions.

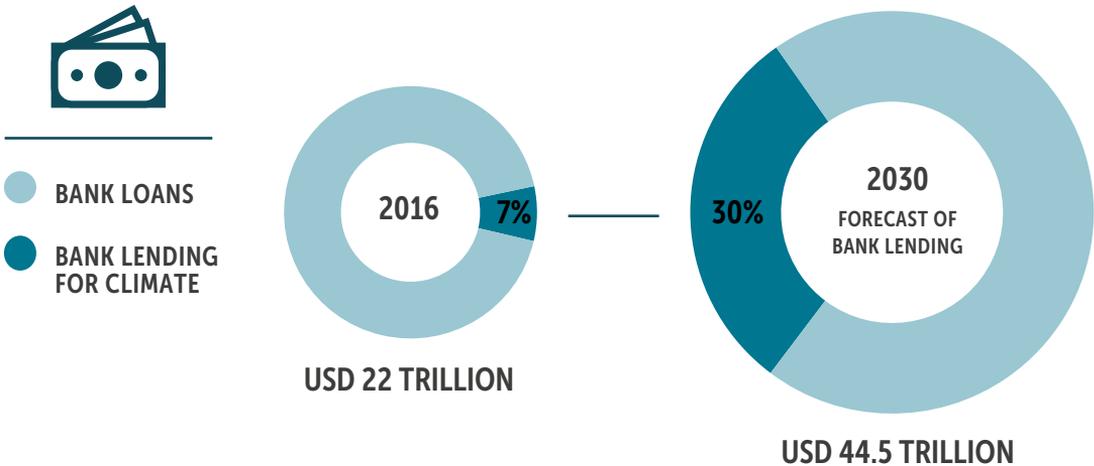


Non-Annex I countries:
 Developing countries, many of which are recognized under the UNFCCC as especially vulnerable to the adverse impacts of climate change, and others more vulnerable to the potential economic impacts of climate change response measures.

Out of the 21 countries, 18 are non-Annex I countries under the UNFCCC eligible to receive GCF funding. The market demand from these 18 countries is expected to increase from USD 20.7 trillion in 2016 to USD 41.8 trillion by 2030.

To capitalize on these opportunities, the IFC argues that total banking assets invested in low-carbon and climate-resilient activities will have to grow from 7 per cent currently to 30 per cent by 2030 in emerging markets, an increase from USD 21.9 trillion to USD 44.5 trillion (Figure 3). However, the current financing flow is far from meeting these needs, and the investment gap is considerable because of barriers associated with the uptake and supply of green products.

FIGURE 3. BANK LENDING FOR CLIMATE INVESTMENTS IN EMERGING MARKETS



Source: Stein, Rooprai and Kludovacz, (IFC), 2018.

GCF's engagement with commercial banks

GCF is currently the only multilateral climate fund financing commercial banks to support the transition to green assets and gradual decarbonization of their operations. Our accreditation portfolio is composed of ten commercial banks ([Attijariwafa bank](#) [Morocco and pan-Africa], [BNP Paribas](#) [France and global], [Crédit Agricole](#) [France and global], [Deutsche Bank](#) [Germany and global], [Ecobank Ghana](#) [Ghana], [HSBC](#) [United Kingdom of Great Britain and Northern Ireland and global], [JS Bank](#) [Pakistan], [Macquarie](#) [Australia] [Mitsubishi UFJ Financial Group](#) [Japan and global], and [XacBank](#) [Mongolia]). In addition, our accreditation pipeline includes another 40 commercial banks potentially eligible to receive funding.

Commercial banks face many difficulties in developing commercially viable pipelines of projects or programmes as competitive as carbon-intensive assets. Such difficulties include assessing the credit risk of new industries and markets as well as a mismatch between the long-term capital required in climate projects and the shorter repayment terms of their own debt. These limitations reduce banks' incentive to build green compatible portfolios and reinforce path dependence on carbon-intensive assets.



Tenor: Length of time until repayment of a loan is due.

However, with three Funding Proposals already approved, XacBank is a prime example of a local commercial bank that is taking advantage of our resources to enhance its climate portfolio (**Box 3**).



Attijariwafa bank is a leading pan-African banking and financial player with a key role to play in promoting sustainable development in all of its countries of presence. ... With GCF support, we are taking steps to develop sustainable energy financing facilities for large corporates and SMEs in the countries most vulnerable to climate change. To this end, we leverage our extensive network in Africa and our deep knowledge of African markets, based on long-standing relationships with our 10 million clients.

MOHAMED EL KETTANI
CEO, ATTIJARIWAFI BANK



Path dependence: Continued use of a product or practice even where better options exist.

Example: From 2015 to 2019, 33 global banks provided USD 1.9 trillion in coal financing because of the lack of commercial viability of green assets (BankTrack, 2019). However, the banking sector has shown willingness to shift the capital flow towards low-carbon and climate compatible assets, notably by restricting coal financing. There is an opportunity to pass through this financing flow to green assets and avoid ending up with a portfolio composed of stranded assets (assets that have suffered from unanticipated or premature write-downs). In practice this shift might need financial and technical support to generate climate-compatible portfolios.

BOX - 3

GCF AND XACBANK – PARTNERS FOR MONGOLIA'S CLIMATE-RESILIENT FUTURE

XacBank is the first Mongolian private bank to partner with GCF and capitalize on its long-term concessional loan and grant instruments to mainstream climate change across its loan portfolio and contribute to the country's low-carbon future.

Mongolia is particularly vulnerable to climate change, with temperatures increasing at more than twice the global average. Impacts include high rates of pastoral land degradation and livestock declines. This has led formerly nomadic people to migrate to the capital city, Ulaanbaatar, where they burn coal, tires, etc. for heating, making Ulaanbaatar the most polluted capital city in the world.

XacBank and GCF have partnered on three initiatives to reduce carbon emissions and mitigate the effects of climate change by providing affordable financing (see table).

INITIATIVE	GCF FINANCING (USD million)	COFINANCING (USD million)	EXPECTED IMPACT
1. Renewable energy programme (solar)	Loan: 8.7	Equity: 8.9 (project developer)	Emissions reduction: 306,750 tonnes CO ₂ eq
2. Business loan programme for GHG emissions reduction	Loan: 19.5 Grant: 0.5	Loan: 20 (Global Climate Partnership Fund) Loan: 15 (EBRD) Loan: 5 (DWM Securitizations)	Emissions reduction: 1.2 million tonnes CO ₂ eq Beneficiaries: MSMEs (target 50% women-led)
3. Energy-efficient consumption loan programme	Loan: 9 Grant: 1	Loan: 9 (XacBank) Grant: 2.5 (Groupe Energies Renouvelables, Environnement et Solidarités)	Emissions reduction: 469,574 tonnes CO ₂ eq

1. Renewable energy programme (solar)

XacBank has benefited from GCF's long-term concessional loan to develop the first, locally financed, utility solar power plant in Mongolia. The 10 MW solar plant aligns closely with Mongolia's goal to supply 30 per cent of the country's energy through renewables by 2030. Construction was completed in early 2019, a milestone for GCF as its [first finished solar plant](#).

De-risking local renewable energy investments: GCF's loan allowed XacBank to improve its lending terms and de-risk local investment. This first-of-its-kind project is expected to promote local climate finance via demonstration, capacity-building and market enabling channels.

2. Business loan programme for GHG emissions reduction

GCF has supported XacBank to make renewable energy and energy-efficient technologies more commercially feasible for MSMEs by providing long-term and affordable credit lines.

MSMEs contributing to Mongolia's low-carbon future: MSMEs make up more than 90 per cent of businesses in Mongolia. The programme's main objective is to promote both the use and production of energy-efficient and renewable energy products in the domestic market. The programme looks through a gender lens and is expected to result in women's economic empowerment – with at least 50 per cent of financial support to go to women-led MSMEs, which will also benefit from improved loan terms. The affordable credit lines will increase the number of them using energy-efficient / renewable energy technologies and reduce GHG emissions significantly.

3. Energy-efficient consumption loan programme

The programme finances heating and housing solutions with reduced emissions and improved environmental and health co-benefits. It targets the most vulnerable ger (yurt) population as these households in Mongolia account for 18 per cent of energy usage and about 80 per cent of air pollution in Ulaanbaatar.

Proving that a local financial institution can change consumer behaviour: Through this initiative, XacBank has shown how the availability of long-term, affordable finance in local currency – made available through GCF support – removes financial barriers and results in wider adoption of energy-efficient technologies at the household level.

The role of development banks

Development finance institutions (DFIs, including development banks) act as market makers and play a pivotal role in many economies. This is due to their large balance sheets and mandate to take first-mover risks and shape markets, as well as their strong relationship with governments and LFI, and their market penetration in underserved sectors. Many development banks are increasingly embedding climate change considerations as a cross-cutting theme within their financing activities and strategies (Smallridge *et al.*, 2013). Development banks act not only as an intermediary to channel climate finance, but also as a key lever for green banking and enticing local financial institutions to integrate climate change as a cross-cutting theme. Their in-house expertise is often mobilized for technical assistance programmes to adopt environmental and social risk management practices, develop credit-rating systems aligned to climate objectives, and design climate change strategies aligned to NDCs.

GCF's engagement with development banks

We at GCF engage with national, regional and international development banks operating in different geographical areas and with different market access capacities (Table 3 and Box 4). These DFIs were key intermediaries and donors in the climate finance landscape before the development

We at GCF engage with national, regional and international development banks operating in different geographical areas and with different market access capacities

of direct access modalities at the GEF-5, the Adaptation Fund and GCF. Indeed, the size of the projects designed and submitted to GCF may incorporate different institutions depending on the geography targeted and project characteristics. A pilot project or programme will entail a “fit for purpose” and localized intervention, while a proven technology may require broad market penetration in several countries to achieve scale. More generally, large GCF-funded projects have been delivered through international DFIs and multilateral development banks thanks to their capacity across different markets and expertise in technology deployment at a larger scale.

TABLE 3. SELECTION OF DEVELOPMENT BANKS AND FINANCE INSTITUTIONS ACCREDITED TO GCF

INTERNATIONAL	REGIONAL	NATIONAL
African Development Bank Group	Caribbean Development Bank	Brazilian Development Bank (BNDES)
Asian Development Bank	Central American Bank for Economic Integration	CDG Capital (Morocco)
European Bank for Reconstruction and Development	Corporación Andina de Fomento (CAF)	Fiji Development Bank
French Development Agency (Agence Française de Développement)	Development Bank of Southern Africa	National Bank for Agriculture and Rural Development (India)
International Finance Corporation	West African Development Bank (Banque Ouest Africaine de Développement)	Findeter (Colombia)

“

There is an urgency to put concrete solutions in place that are consistent with the Paris Agreement and the SDGs' ambition, and local financial actors are part of the solution. ... IDFC members, have a key role to play in reorienting existing investment patterns towards – and facilitating increased investment in – sustainable development, including by creating opportunities and contributing to enabling frameworks.

RÉMY RIOUX

CHIEF EXECUTIVE OFFICER, AGENCE FRANÇAISE DE DÉVELOPPEMENT, AND CHAIR,
INTERNATIONAL DEVELOPMENT FINANCE CLUB

PARTNERSHIP BETWEEN GCF AND THE INTERNATIONAL DEVELOPMENT FINANCE CLUB

BOX - 4

To increase its engagement with development finance institutions (DFIs), [GCF partners with the International Development Finance Club](#) (IDFC). The IDFC is a platform of international, national and regional development banks for climate change advocacy, mobilizing finance to support action for low-carbon and climate-resilient sustainable development. This coalition of 24 leading DFIs from across the globe has a combined total portfolio of USD 4 trillion in assets. It makes commitments of over USD 850 billion per year, out of which about USD 220 billion was committed to green investments in 2017, compared to USD 173 billion in 2016 (IDFC, 2018). Of this USD 220 billion, USD 196 billion went to fund actual mitigation and adaptation projects, while USD 24 billion went on climate change mainstreaming throughout the project lifecycle for all the projects approved (see figure). The latter is a crucial element for building the capacities of local financial institutions (LFIs) and constitutes the bulk of GCF-supported technical assistance programmes. In July 2019, GCF and the IDFC signed a statement of partnership to achieve their joint goal of combating climate change. With this partnership, GCF and the IDFC will: (i) promote knowledge-sharing and best practices in climate finance; (ii) encourage IDFC members to access GCF resources; and (iii) promote capacity-building initiatives for development banks to green their operations and financial systems as a whole. In addition, the multilateral development banks and the IDFC have developed **five principles to mainstream climate action** within LFIs:

1. Commit to climate change.
2. Manage climate risks.
3. Promote climate-smart objectives.
4. Improve climate performance.
5. Account for your (LFI) climate action.

These principles are being implemented by 44 bilateral, regional or national development banks, 12 development banks, and 10 commercial financial institutions.

3.

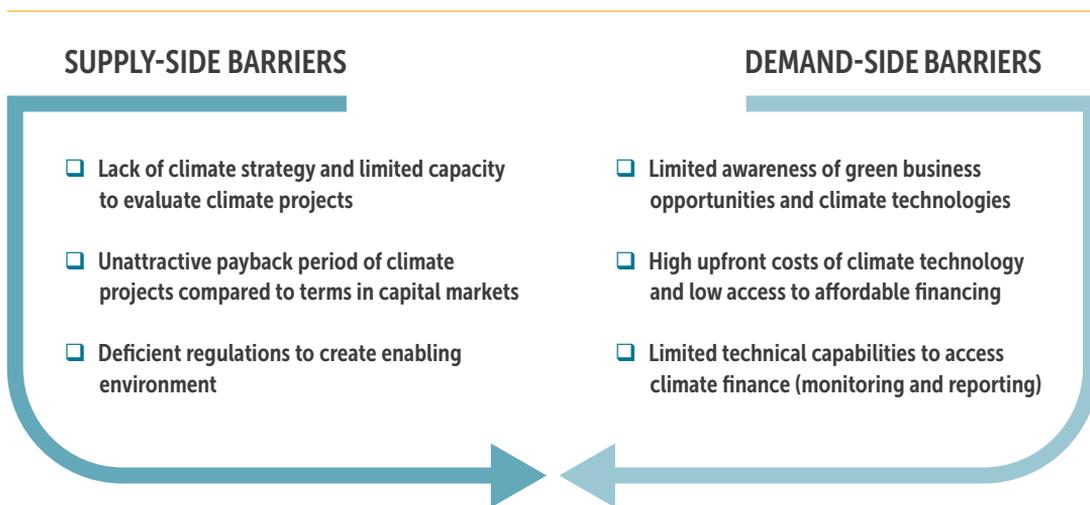
GCF'S VISION FOR GREENING THE FINANCIAL SYSTEM

All too often, private-sector financial institutions in developing countries face many barriers that prevent them from playing a full role in greening the financial system. To help them overcome these barriers, we at GCF have developed a comprehensive vision. The following sections first describe the barriers and then GCF's vision.

BARRIERS TO THE GREEN TRANSITION

In order to jump-start the green transition, which will also help countries meet their NDC targets, private-sector financial institutions must overcome barriers relating to their own capacity, the markets in which they operate and the overarching regulatory environment (**Figure 4**). These three levels of barriers are summarized in the following sections.

FIGURE 4. SUPPLY- AND DEMAND-SIDE BARRIERS TO THE GREEN TRANSITION



Capacity barriers

Many financial institutions in developing countries still lack the capacity to evaluate climate technologies and projects. Often, they do not have a robust ESRM framework to properly assess environmental and social risks associated with climate projects in addition to underlying financial risks. On the demand side, many potential customers remain unaware of green business opportunities and technologies. Technical assistance for financial institutions and private businesses in the form of capacity-building and awareness-raising can build demand for green products and the capability of banks to offer the associated financial products.

Market barriers

In terms of developing and deploying instruments, financial institutions have started launching green financial products and services tailored to meeting various consumer demands. However, the funding resources available are usually short-term-based and can be very expensive – a major barrier to deploying green financial instruments. Moreover, many developing countries may lack access to new technologies, which are often more expensive and perceived as riskier. Therefore, financial institutions can benefit by accessing long-term and concessional financing from organizations such as GCF and international DFIs, which compensate for these additional costs and perceived risks (**Box 5**).

BOX - 5

OVERCOMING BARRIERS TO RENEWABLE ENERGY INVESTMENT IN WEST AFRICA

- Project name: [BOAD Climate Finance Facility to Scale Up Solar Energy Investments in Francophone West Africa LDCs](#)
- Accredited entity: [West African Development Bank \(BOAD\)](#)
- GCF financing: EUR 57 million loans; EUR 4 million grants
- Cofinancing – BOAD: EUR 60 million loans; EUR 1 million grants
- Target countries: Benin, Burkina Faso, Guinea-Bissau, Mali, Niger and Togo
- Impact: 4.8 million tonnes CO₂eq avoided; about 2.9 million beneficiaries

GCF's catalytic effect on boosting access to climate finance: With the lowest access rates to reliable energy services in the world, West African countries are facing an investment gap resulting from capacity, market and policy barriers. Project developers and local financing institutions (LFIs) willing to seize the untapped opportunity of solar energy in this region often face unaffordable terms, notably due to high interest rates and short tenor. Combining long-term concessional loans and credit-enhancement instruments through its on-lending model, GCF has provided a senior loan facility and a standby loan facility with a tenor extension. This has provided a catalytic effect to increase access to climate finance for project developers on affordable terms and to crowd in private investors. The EUR 105 million senior loan facility (cofinanced with the BOAD) and the EUR 12 million standby loan facility will leverage an additional EUR 50 million equity from the private sector, and EUR 78 million from commercial and public banks.

GCF has also provided grant funding channelled through BOAD to provide capacity-building support to local project developers along with national institutions. The aim is to develop regulations to create a more conducive environment for investments in renewables.

Policy barriers

Some private-sector financial institutions may take their own climate initiatives either individually or collectively through an association of banks. However, the government can create an enabling environment to

accelerate and provide the impetus if it aims to engage with them in their journey on a low-emission and climate-resilient path. Targeted policy interventions can provide green finance guidelines along with negative incentives (e.g. carbon taxes) and positive incentives (e.g. green subsidies) to create a more conducive environment.

HOW TO GREEN THE FINANCIAL SYSTEM - OUR VISION

At GCF, PSF has developed a comprehensive vision for greening the financial system that addresses the three levels of barriers: capacity, market and policy. Our vision recognizes the role of banking and capital market regulators in developing and implementing policies and regulations to address climate investment opportunities and risks in the financial sector. It emphasizes the importance of developing climate-compatible markets to enable the financial sector to raise long-term debt financing and grow green portfolios. It also addresses the need to build the capacity of the financial sector to originate and appraise green loans, assess climate risks in its portfolios, and effectively manage environmental and social risks. We have summarized our vision in a Theory of Change (**Figure 5**).

FIGURE 5. THEORY OF CHANGE TO GREEN FINANCIAL INSTITUTIONS



THE THREE PILLARS OF OUR VISION: MARKET, POLICY AND OUTREACH

At GCF, we operationalize our vision through (Figure 6): Funding Proposals and the PPF (Pillar I); policy-level interventions, which are implemented through the Readiness Programme (Pillar II); and awareness-raising and outreach, which are implemented through partnerships with other key institutions in climate finance (Pillar III).

FIGURE 6. OPERATIONAL MODALITIES TO PARTNER WITH GCF



Pillar I

GCF provides concessional financing and de-risks investments for its financial institution partners through Funding Proposals and the PPF. We assess how relevant Funding Proposals are in terms of our eight strategic results areas (**Figure 7**). They must also meet GCF requirements in terms of financial standards, environmental and social safeguards, and gender (**Figure 8**). Through Funding Proposals, we provide a variety of concessional financial instruments to ensure the commercial viability of the project and affordability to end-borrowers. These instruments include: low-interest and long-tenor lines of credit; subordinated debt; equity; and risk mitigators such as guarantees, first-loss protection, and grant-based capacity-building programmes. PPF grants can be used for a variety of project preparation activities prior to the submission of a Funding Proposal. These activities include, among others: pre-feasibility studies and project design; environmental and social impact assessments; hiring an investment advisor for structuring; and running pilot programmes. An Accredited Entity must submit a Funding Proposal within two years of receiving PPF support.



Subordinated debt:
Debt that ranks after other debts if a company goes into liquidation or bankruptcy.

FIGURE 7. GCF'S EIGHT STRATEGIC RESULTS AREAS



Energy generation and access



Transport



Buildings, cities, industries and appliances



Forests and land use



Health, food and water security



Livelihoods of people and communities



Ecosystems and ecosystem services



Infrastructure and the built environment



Green banks, capitalized with sources of public capital, such as the Green Climate Fund, can play a particularly important role in emerging economies. By acting as cornerstone investors, they provide confidence and reassurance to help private investors get comfortable with new markets and technologies. ... This combination can produce the ultimate green public / private partnership.

GAVIN TEMPLETON HEAD OF SUSTAINABLE FINANCE, GREEN INVESTMENT GROUP

FIGURE 8. WORKING WITH GCF – RATIONALE AND ADDITIONALITY

<p>ADDITIONALITY OF GCF FUNDING</p> <ul style="list-style-type: none"> • Why GCF? • Project must crowd in additional financing on top of GCF 	<p>STRONG CLIMATE RATIONALE</p> <ul style="list-style-type: none"> • Climate impact of investment is key • Scientific evidence to be provided 	<p>COUNTRY-DRIVEN APPROACH</p> <ul style="list-style-type: none"> • Alignment with nationally determined contributions • Early country (national designated authority) engagement • No-objection letter
<p>COMPLIANCE WITH GCF POLICIES</p> <ul style="list-style-type: none"> • Fiduciary standards • Risk management • Environment and social safeguards • Monitoring and evaluation criteria • Gender policy • Legal standards 	<p>SIX INVESTMENT CRITERIA</p> <ol style="list-style-type: none"> 1. Impact potential 2. Paradigm shift potential 3. Sustainable development potential 4. Recipient needs 5. Country ownership 6. Efficiency & effectiveness 	<p>COMPLETENESS OF DOCUMENTATION</p> <ul style="list-style-type: none"> • Feasibility study • Financial model • Project timetable • Gender analysis • Environmental studies • No-objection letter

Pillar II

Our Readiness Programme aims to enhance country ownership and access to GCF funding. It provides grants to a Readiness delivery partner through national designated authorities or focal points to develop policies that encourage market-driven economic growth that creates a demand for green credit and investment. While an Accredited Entity can automatically act as DP, any entity can become a DP if they pass GCF’s [Financial Management Capacity Assessment](#). The programme supports countries in: strengthening their institutional capacities; engaging stakeholders in consultative processes; obtaining direct access to GCF; providing access to finance; and mobilizing the private sector. It can target support to help countries green their financial systems by working with key stakeholders such as central banks and financial regulators to implement policy reforms, build capacities for green finance and ESRM, develop green capital markets, and/or establish national green financing vehicles.

Pillar III

PSF is taking on the role of knowledge broker and thought leader through its awareness-raising and outreach activities to leverage lessons learned, share knowledge, and scale up existing initiatives. It sponsors, and presents at, green finance events that bring together industry players to raise awareness of the green bank model, promote availability of GCF funding, and make connections to speed up the delivery of green finance. In doing so, it has formed key partnerships with groups like the NGFS, IDFC and Green Bank Network (**Box 6**).

GREEN BANK NETWORK

We at GCF have supported the Green Bank Network's efforts to give countries access to the best of global technical assistance, structuring advice and capitalization sources to establish green banks. As part of these efforts, we connected the Green Bank Network with Tata Cleantech Capital Limited, which has participated in funding of over 5.2 GW renewable energy projects in India, which recently became its newest member. We have also sponsored the inaugural Green Bank Design Summit in March 2019, and we now look forward to the launch of the Global Green Bank Design Platform, which will provide:

- a hub to mobilize technical assistance to support green bank formation;
- a community of practice;
- knowledge creation and sharing;
- a strong and clear voice for green banks.

Through our PSF, we support the green bank model as an effective way for governments to meet policy targets (including NDCs), shape green development policy, and create green centres of excellence encompassing multiple funding programmes. Green banks (**Figure 9**) can also mobilize private-sector funding through concessional resources, build the capacity of local financial institutions, and encourage investment in new technologies and sectors. The creation of more national investment banks, jointly capitalized, is viewed as a near-term, actionable solution to mobilize private climate finance at scale ([CEFLI, 2019](#)).

Unlike investment funds, green banks have the advantage of perpetual lifetimes, flexibility in financial products, and the ability to raise additional funds on capital markets. Structurally, this model can be applied by establishing a green unit within an existing institution (as in the case of the Development Bank of Southern Africa's Climate Finance Facility [**Box 7**]), re-forming an existing institution, or creating a new institution with a green mandate (as GCF is providing support for in Mongolia [**Box 8**]).

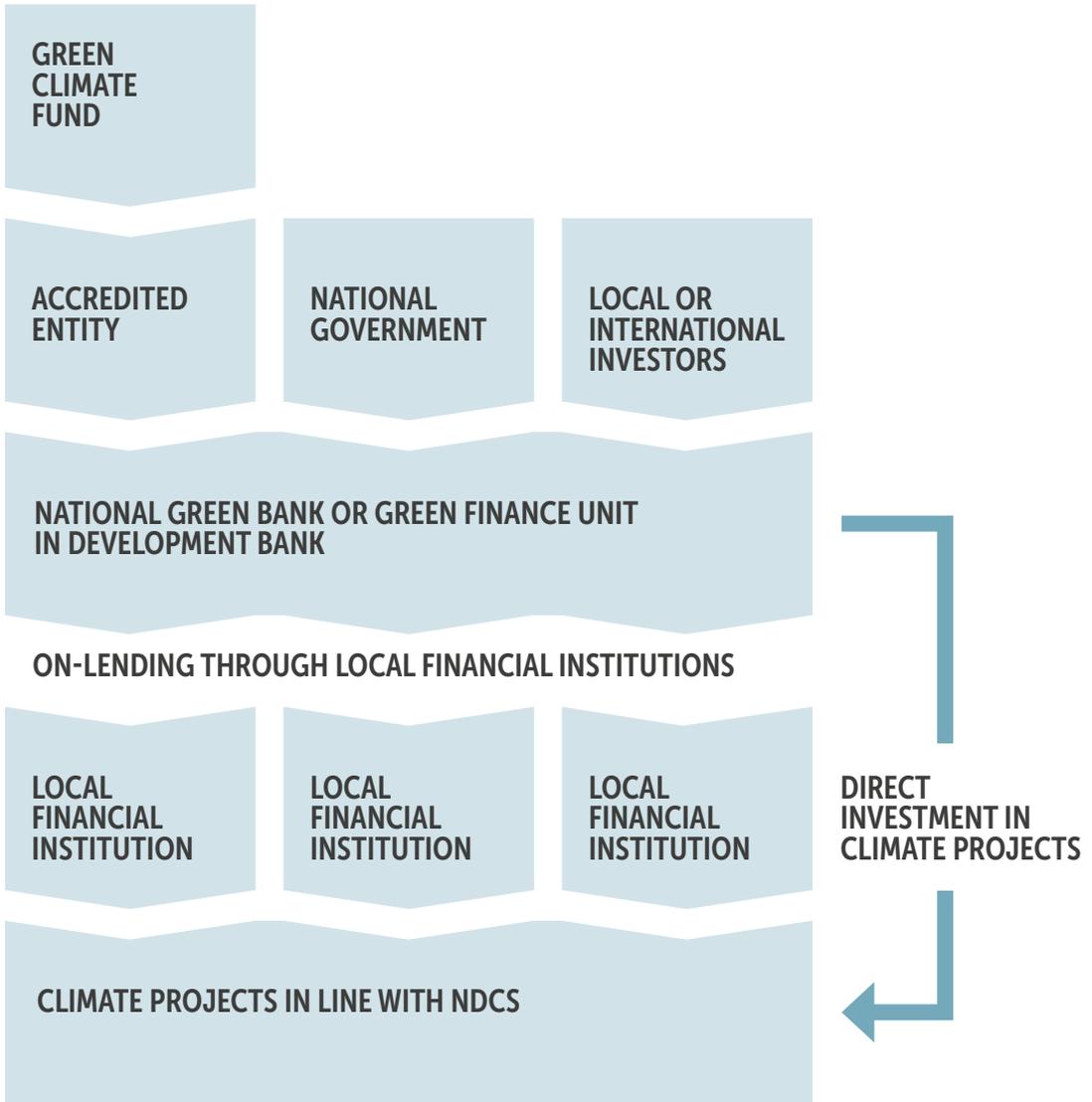
BOX - 6

We support the green bank model in developing countries



Green bank: A dedicated finance entity designed to invest in low-carbon and climate-resilient projects.

FIGURE 9. DEVELOPING NATIONAL GREEN BANKS TO IMPLEMENT THE PARIS AGREEMENT



CLIMATE FINANCE FACILITY – AN INDEPENDENT UNIT WITHIN THE DEVELOPMENT BANK OF SOUTHERN AFRICA

- GCF funding: USD 55 million loans; USD 0.6 million grants
- [Development Bank of Southern Africa \(DBSA\)](#): USD 55 million loans; USD 0.6 million grants
- Convergence: USD 0.3 million grants
- Impact: 29.8 million tonnes CO₂eq avoided; about 470,000 beneficiaries

GCF funding for first-of-a-kind facility for emerging markets: The southern Africa region faces significant climate-change mitigation and adaptation challenges. In South Africa, 90 per cent of electricity is generated from fossil fuels – responsible for 82 per cent of the country's greenhouse gas emissions – demonstrating the need for a strong and sustainable intervention. GCF is funding the DBSA to create the Climate Finance Facility, a dedicated green finance operating unit, along with design support from Convergence, the Coalition for Green Capital, and ClimateWorks Foundation. The lending facility will consist of credit enhancements including first-loss or subordinated debt and tenor extensions to catalyse private-sector climate investments, primarily in water and renewable energy. The facility will be a first-of-its-kind application based on the green bank model, adapted for emerging market conditions. It offers a globally significant "proof of concept" to other nations seeking to address market barriers and quickly scale up domestic climate finance in an efficient manner with low transaction costs.

BOX - 7

The case of Mongolia (**Box 8**) shows that, with the right policy support, a nascent market with limited access to climate finance can use more comprehensive GCF support to create an enabling environment and overcome operational barriers towards establishing a national green bank.

CONCRETE EXAMPLE OF HOW GCF IS SUPPORTING THE GREEN BANK MODEL IN [MONGOLIA](#)

- Readiness Programme: USD 350,000
- Delivery partner: Global Green Growth Institute (GGGI)

In 2017, GCF awarded a grant of USD 350,000 to the GGGI to prepare the establishment of a national financing vehicle aligned with the Government of Mongolia's nationally determined contributions. As upstream support provided by GCF, the intervention revolves around the Project Preparation Facility (PPF) structure and market-level information generation. The first component of the programme intends to **support the development of a comprehensive proposal** through

BOX - 8

BOX - 8 CONTINUED

consultative processes involving the whole financial sector and climate change governance stakeholders, such as the national designated authority (Ministry of Environment and Tourism), Mongolian Bankers Association, line ministries, end-users, and local financial institutions. The other component aims to generate relevant market information, including market and technical assessments, to overcome investment barriers and generate a pipeline of bankable projects.

- Project Preparation Facility: USD 348,964
- Accredited Entity: XacBank

As a continuum of the Readiness proposal, XacBank has developed the PPF to **provide additional technical and legal due diligence** for the [establishment and operationalization of the Mongolian Green Finance Corporation \(MGFC\)](#). This PPF funding will be in the form of an equity contribution by the GCF to the MGFC. In this connection, Macquarie's Green Investment Group, acting as investment advisor, has provided comprehensive recommendations, which include:

- Ensure independence in corporate governance.
- Eliminate conflicts of interest among shareholders.
- Form an establishment team early on to guide the setting up of the institution.
- Maintain flexibility in the corporate structure and business model for future funding rounds.
- Create operating principles in line with the green mandate.
- Find early investments with complementary initiatives.

Funding climate projects through financial institutions is an effective way to reach borrowers

GCF FINANCIAL INSTITUTIONS PORTFOLIO

At GCF, we recognize that funding climate projects through financial institutions is an effective way to reach borrowers ranging from large corporations to smallholder farmers in each of our target sectors.

Accordingly, we have committed to finance USD 1.7 billion of public and private financial institution programmes, accounting for 33 per cent of our total portfolio (**Figure 10**).

FIGURE 10. MAP OF GCF'S FINANCIAL INSTITUTIONS PORTFOLIO

Total GCF funding
USD 1.7b

Total GCF co-financing
USD 4.3b

Total n. of projects
20

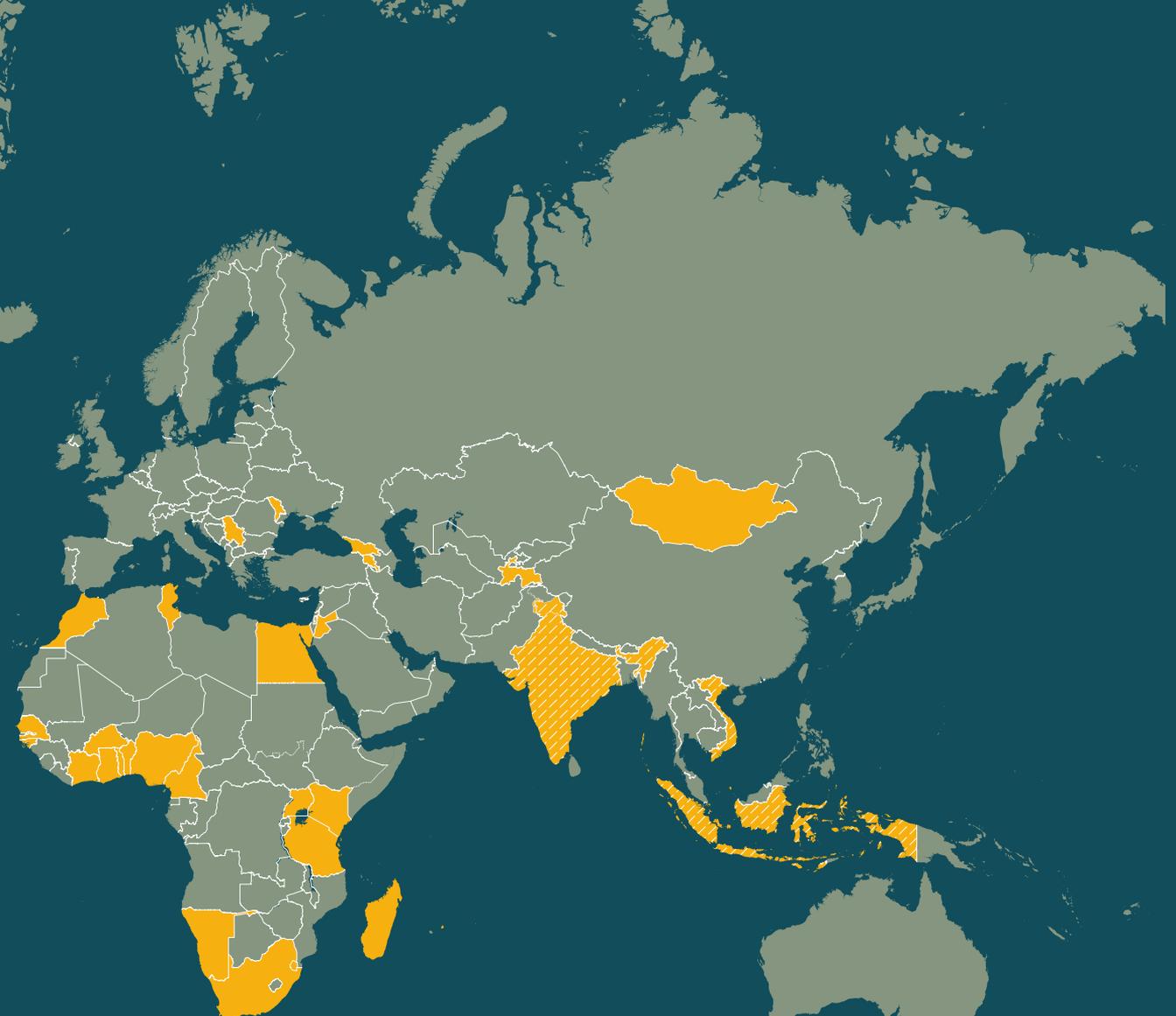
CO₂eq. avoided
441 million tonnes

-  Cross cutting
-  Adaptation
-  Mitigation

LATIN AMERICA
 & THE CARIBBEAN

No. of projects	8
GCF funding	USD 514,906,827
Co-financing	USD 1,507,631,121





AFRICA

5

USD 633,141,176
USD 1,256,811,765

**EASTERN EUROPE &
 CENTRAL ASIA**

1

USD 113,400,000
USD 302,100,000

ASIA PACIFIC

6

USD 438,700,000
USD 1,234,000,000

The boundaries and names shown and the designations used on this map do not imply official endorsement or acceptance by GCF.

4.

GCF'S FINANCIAL INSTITUTION INTERVENTIONS: CASE STUDIES

THE GREEN ON-LENDING MODEL

Green on-lending is the main model we at GCF use to achieve scale on large programmes. All the programmes have concessional lending terms plus grants for capacity-building. By working with the local financial system through projects and programmes, we create a lasting impact within countries by strengthening the capacity of financial institutions and their alignment with green principles, supporting them to become key players in climate finance (**Boxes 9 and 10**). We accomplish this through technical assistance, which may include: capacity-building for climate project origination and marketing; climate strategy development; sector-specific assistance; legal and regulatory assistance; and matchmaking with the best available technologies.

We create a lasting impact within countries by strengthening the capacity of financial institutions and their alignment with green principles, supporting them to become key players in climate finance

TRANSFORMING FINANCIAL SYSTEMS FOR CLIMATE

- Accredited entity: [Agence Française de Développement \(AFD\)](#)
- GCF financing: EUR 209 million loan; EUR 31 million grant
- Cofinancing – AFD/Proparco: EUR 406 million loan; EUR 7 million grant
- Target countries: Benin, Burkina Faso, Cameroon, Côte d'Ivoire, Ecuador, Egypt, Kenya, Madagascar, Mauritius, Morocco, Namibia, Nigeria, Senegal, South Africa, Togo, Uganda and United Republic of Tanzania
- Impact: 36 million tonnes CO₂eq avoided; about 1 million beneficiaries (50 per cent of them women)

Ambitious on-lending programme between GCF and AFD: The programme provides loans and technical assistance to local financial institutions (LFIs) in developing countries. The aim is to create self-sustaining markets targeting a variety of sectors in both mitigation (60 per cent) and adaptation (40 per cent). The sectors include: renewable energy, green infrastructure, waste management, forestry and energy efficiency, agriculture and land use, water management and resilient housing. Through this initiative, we are helping to mainstream climate finance in the financial sector and private-sector companies by stimulating both supply and demand. Reduced interest rates and long-term loans stimulate the demand side of climate investments, while technical assistance for LFIs and their clients aims to support project origination, audit, monitoring, and training of staff in climate strategy and environment and social management. This all serves to increase the supply of climate finance.

BOX - 9

BOX - 10

SUSTAINABLE ENERGY FINANCING FACILITIES – SCALING UP HIGH-PERFORMANCE TECHNOLOGIES

- Accredited Entity: [European Bank for Reconstruction and Development \(EBRD\)](#)
- GCF financing: USD 420 million (USD 382.5 million loans; USD 38 million grants)
- Cofinancing: USD 1,118 million (USD 1,080 million loans – credit line; USD 38 million grants)
- Target countries: Albania, Armenia, Egypt, Georgia, Jordan, Kyrgyzstan, Mongolia, Montenegro, Morocco, Republic of Moldova, Serbia, Tajikistan, Tunisia
- Impact: 29.1 million tonnes CO₂eq; 90,660 beneficiaries.

Concessional credit lines to boost long-term lending to end-borrowers: At GCF, we have approved a programme with the European Bank for Reconstruction and Development (EBRD) to green the financial system in 13 countries – fully aligned to their nationally determined contributions – by setting up what is known as the Sustainable Energy Financing Facility (SEFF – later renamed the Green Economy Financing Facility). The programme delivers concessional credit lines, and provides technical assistance for more than 50 participating local financial institutions (LFIs). Ultimately, these LFIs intend to provide affordable and long-term loans for a broader pool of end-borrowers, reaching about 20,000 direct beneficiaries, as: renewable developers; micro, small and medium enterprises; households; and technology service providers operating in commercial, agricultural or transport sectors. The programme aims to support: the deployment and uptake of high-performance renewable energy; energy efficiency; and resilient technologies. A unique feature of the SEFF is its technology-driven solutions using EBRD’s technology selector, which aims to promote the best available climate technologies. The intervention is designed around concessional funding and capacity-building to increase penetration of such technologies to these markets. It will reduce the upfront and operating costs relating to operating risky incipient markets. These costs reflect, among others: financial barriers, high perceived risk of lending related to energy-efficient and renewable energy initiatives; technical barriers; and a lack of awareness about the benefits.



Limited recourse loan:
If the borrower defaults, the lender can enforce the charge but recover only a limited amount from the borrower.

UNLOCKING MARKETS THROUGH RISK-SHARING

At GCF, we empower Accredited Entities (see **Annex 1**) and LFIs by absorbing some of the risks they face in climate investments. We do so through a variety of financial instruments such as subordinated debt, limited recourse loans, and guarantees, and utilizing different financial structures such as risk-sharing facilities and sub-participation in loans. Accredited Entities may choose to sponsor projects of other executing entities, which is an effective way for entities that are not accredited to access GCF resources (**Box 11**). The case of the Inter-American Development Bank (IADB) also provides a prime example of the variety of instruments that GCF can deliver to share risk with the goal of crowding in private capital (**Box 12**).

CREDIT LINE FOR SOLAR ROOFTOP SEGMENT FOR THE COMMERCIAL, INDUSTRIAL AND RESIDENTIAL HOUSING SECTORS

- Accredited Entity: [National Bank for Agriculture and Rural Development \(NABARD\)](#)
- GCF financing: USD 100 million
- Cofinancing – Tata Cleantech Capital Limited (TCCL): USD 100 million; USD 50 million from private equity investors
- Impact: 5.2 million tonnes CO₂eq avoided

Using on-lending to reach vulnerable end-borrowers and promote renewable-energy infrastructure: The Government of India has set a target of 40 GW of rooftop solar power by 2022. This will require substantial financial resources estimated at USD 34 billion. However, before the project's approval, only USD 625 million had been mobilized by the State Bank of India through the [World Bank](#), enough to fund 400 MW of rooftop solar capacity. Fully aligned to achieving the government's objective, the programme implemented by TCCL aims to tap 250 MW of solar rooftop capacity in the period 2018–2022. Compared to the market's usual loan tenor of 5–7 years, the project intends to offer a long tenor (12–15 years), which is much needed for renewable-energy infrastructure. In addition, TCCL provides a complete business solution integrating technical capacity matters, which often limit the funding, take-up and development of rooftop solar technologies.

We at GCF are sharing risk alongside TCCL, which is acting as the Executing Entity for the programme. However, as a non-accredited entity, the compliance of TCCL operations with GCF disbursement terms and legal requirements are still the responsibility of [NABARD](#). In addition, NABARD is playing a crucial role in the realization of this project – the on-lending from GCF to TCCL. It is also responsible for monitoring and evaluating the project and for reporting to GCF.

BOX - 11

LOW-EMISSION CLIMATE RESILIENT AGRICULTURE RISK SHARING FACILITY FOR MSMEs

- Accredited Entity: [Inter-American Development Bank \(IDB\)](#)
- GCF financing: USD 20 million (USD 11 million equity; USD 5.4 million loans; USD 1.5 million guarantees; USD 2.1 million grants)
- Cofinancing – Inter-American Development Bank (IADB): USD 10 million (USD 3 million equity; USD 4.3 million loans; USD 1.5 million guarantees; USD 1.1 million grants)
- Impact: 9.2 million tonnes CO₂eq avoided

Using GCF's concessional funding to reach agricultural MSMEs: The agroforestry sector is underserved financially although it has strong potential for both mitigation

BOX - 12

BOX - 12 CONTINUED

and adaptation. In particular, MSMEs representing a wide spectrum (farmers, local aggregators, processors, corporates, etc.) have limited access to funding. The programme will bridge this funding gap by making available a range of financial products to end-borrowers through the intermediation of financial institutions. GCF's concessional resources (including low-interest loans, equity and guarantees) serve to crowd in a large pool of investors and channel funding through financial institutions acting as executing entities of the project.

The senior loan and associated guarantees will be used to deliver long-term and low-cost debt to agricultural MSMEs, while the equity investment will set up a restoration fund, invest in growth-stage companies, and anchor re-insurance services provided to end-consumers. As such, **this use of these instruments is pathbreaking** in the current capital market for this sector – as funding from local financial institutions to agroforestry represented just 0.3 per cent of total financing in Guatemala and 1.5 per cent in Mexico when this proposal was approved by GCF. Another innovative component covers certification costs and upgrade services for the Forest Stewardship Council label and will ultimately create linkages to high-value markets and increase MSMEs' income.

INCREASING ACCESS TO FINANCE FOR MSMES AND HOUSEHOLDS

One of the advantages of working through LFIs is the ability to finance hard-to-reach borrowers. MSMEs and households often lack access to climate finance as they do not have existing relationships with banks, nor do they have the technical capacity to articulate their climate needs and monitor projects sufficiently. Our vision for greening the financial system specifically targets MSMEs and households by working through non-banking financial institutions (e.g. microfinance institutions), and by providing capacity-building grants along with concessional loans. For example, the [Energy Efficient Consumption Loan Programme](#) implemented by XacBank helps overcome barriers facing households willing to uptake energy-efficient technologies.

BOX - 13

AFFIRMATIVE FINANCE ACTION FOR WOMEN IN AFRICA – FINANCING CLIMATE-RESILIENT AGRICULTURE IN GHANA

- Accredited Entity: [African Development Bank \(AfDB\)](#)
- GCF financing: USD 8.5 million loans; USD 11.5 million grants
- Cofinancing – AfDB: USD 5 million loan: USD 0.6 million grants
- Target country: Ghana
- Impact: 3.2 million tonnes CO₂eq avoided; 373,720 beneficiaries (50,800 direct female beneficiaries, including 400 women-led MSMEs)

Empowering women through on-lending: One of the main areas in need of financing in Ghana is agriculture, as the sector accounts for 25 per cent of the country's economy and employs 50 per cent of the population. The agriculture sector is largely rainfed and highly vulnerable to climate change. Moreover, it is the third-largest emitter of greenhouse gases in Ghana. In addition, although women undertake 70 per cent of agricultural activities, they make up only 20 per cent of the total banked population in Ghana. They often do not have full control over income and agricultural products, and lack a formal channel to meet their financing needs.

This programme is designed as a special intervention as part of the AfDB's gender initiative called Affirmative Finance Action for Women in Africa. Launched in 2016, it is a pan-African initiative aimed at addressing all critical elements of the entrepreneurship ecosystem of women in business in Africa, particularly in finance. Funding from GCF is key to driving the gender initiative in this sector. The objective is to empower women through finance to participate in low-emission, climate-resilient agricultural practices including crop rotation, mixed cropping, improved nutrient management, minimum tillage and drought-resilient crops, as well as installation of solar and biogas systems for agricultural activities. GCF and AfDB will on-lend through local commercial banks to exclusively target MSMEs and farmer-based associations led by women to achieve this objective.

Our vision for greening the financial system targets MSMEs

PRODUCTIVE INVESTMENT INITIATIVE FOR ADAPTATION TO CLIMATE CHANGE (CAMBIO II)

- Accredited Entity: [Central American Bank for Economic Integration \(CABEI\)](#)
- GCF financing: USD 12.5 million loans; USD 3 million grants
- Cofinancing – CABEI: USD 12.5 million loans
- Target countries: Costa Rica, Dominican Republic, El Salvador, Guatemala, Honduras, Nicaragua, Panama
- Impact: About 70,000 beneficiaries (including 5,000 MSMEs) receiving loans

On-lending to remove barriers to finance and promote adaptation: Agriculture, livestock and forestry activities are core to Central American economies but highly sensitive to climate change. Conservative banking practices and high risks associated with rural operations have left agricultural actors with limited financial options for business development towards climate resilience. Through the CAMBIO II programme, we at GCF are partnering with CABEI to increase MSMEs' resilience to climate change in the target countries by removing barriers to access financial and non-financial services for using climate change adaptation measures. This is achieved by a three-pronged approach: (i) concessional loans through local financial institutions (LFIs) to MSMEs; (ii) capacity-building for MSMEs to design adaptation investments and adapt their production systems, and for LFIs to develop adaptation finance portfolios; and (iii) grant-based incentive schemes for MSMEs and LFIs for the implementation

BOX - 14

BOX - 14 CONTINUED

of adaptation activities. The LFIs include cooperatives, microfinance institutions, and non-banking financial institutions so that the programme can target more vulnerable borrowers without access to traditional sources of finance. Through these measures, the programme will allow MSMEs to implement agricultural adaptation investments, including efficient irrigation, crop diversification, and sustainable land management.

In 2016, our PSF launched a [“request for proposals” pilot programme targeting MSMEs](#). It attracted 30 concept notes with requests for GCF financing totalling over USD 739 million. These requests included submissions from international and direct-access entities, regional and local agencies, private equity funds, private companies and foundations. Boxes 13 and 14 present two of the subsequently approved Funding Proposals.

5.

THE WAY FORWARD

LESSONS LEARNED

By sharing the case studies in this publication, we hope to illustrate the key elements of our financial institutions approach, and to inform existing and potential partners about the resources we can offer. However, it is important to note that any successful financial institutions programme should contain:

- comprehensive market analysis for each target country, including relevant sectors aligned with target country NDCs;
- analysis of fit with six GCF investment criteria (see **Figure 8**) and evidence of GCF additionality (why concessional funding is needed);
- identification of participating financial institutions through sound due diligence, or selection criteria for them;
- defined pipeline of investments and/or eligibility criteria for future climate investments;
- strategy to ensure the use of best available technologies;
- well-developed technical assistance component to build local capacity;
- limited timeline for disbursements to encourage quicker implementation.

LOOKING AHEAD

By including these elements, we ensure that programmes use GCF's concessional funding efficiently and effectively to maximize impact in terms of enhanced climate resilience. As a learning institution, GCF undergoes periodic evaluations of its performance. In June 2019, the Independent Evaluation Unit released its latest performance review ([IEU, 2019](#)). In response to this review and our own internal analysis, we plan to improve our business by:

- targeting riskier investments;
- ensuring our full concessionality reaches the end-recipients;
- mobilizing more private capital;
- allowing more flexibility in our business model;
- increasing our adaptation portfolio;
- providing stronger upstream engagement at the policy level.

To do so, PSF is exploring six new business line offerings, as described below. It is important to note that the implementation of these offerings is dependent on the review and approval of the GCF Board.



We ensure that programmes use GCF's concessional funding efficiently and effectively to maximize impact in terms of enhanced climate resilience

Early-stage incubation facility

Our early-stage incubation facility would focus on supporting start-ups that develop climate-change mitigation and adaptation technologies and projects. We aim to operationalize this by establishing a Climate Innovation Facility. This is a market-oriented solution designed to support and accelerate early-stage climate innovations and technologies through the creation of regional innovation hubs, supported by a central accelerator, and the creation of a private equity growth fund in the near future.

Local currency lending facilities

Providing local currency lending is desirable because most projects demand local currency. While financial institutions can benefit from our concessional financing, they still have to absorb the full foreign exchange risk as we can lend in only four currencies (EUR, GBP, JPY and USD). Hence, LFI have to manage the mismatch between the loans they borrow from international lenders and those they make to local borrowers. This can mean an enormous financial burden for LFIs and increase the lending rates to end-borrowers.



... the overall rate of return on investments in improved resilience is very high, with benefit-cost ratios ranging from 2:1 to 10:1, and in some cases even higher

SOURCE: [GLOBAL COMMISSION ON ADAPTATION, 2019](#)

Co-investment platform

Our co-investment platform aims to bring institutional investors into non-traditional climate investment opportunities, with the risk mitigation they seek, and the investment return they look for in developing countries with strong growth prospects. Given the magnitude of investments needed for climate projects, the platform can be used to crowd in local and regional financial institutions to originate, structure and finance projects.

Direct investment modality

Under the direct investment approach, GCF would invest directly in projects and programmes on the ground – as opposed to channelling resources through Accredited Entities – and take an equity position when necessary. This modality would allow us to invest in a much wider range of climate projects, including establishing new green banks, and to absorb the full investment risk.

Adaptation endowment fund

We are exploring the idea of creating an endowment fund. Financed by GCF and other philanthropic investors, its returns will be invested in private-sector-oriented adaptation projects in line with national adaptation plans, with a special focus on LDCs and SIDS.

Stronger upstream engagement

With a stronger focus on upstream engagement through our green finance Readiness Programme, we at GCF can provide a way forward for developing countries that want to transition to a green economy. By creating an enabling environment, we can unlock many multiples of our investment, as compared to solely providing finance without the accompanying policy interventions.

CONCLUSION

We hope that in reading this publication you have gained a deeper understanding of GCF's vision for greening the financial system and how we can assist our partners in the low-carbon and climate-resilient transition. We are confident that through continued engagement with our partners, together we can meet the climate challenge by achieving the goals of the Paris Agreement.



Together we can meet the climate challenge by achieving the goals of the Paris Agreement

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ANNEX 1

HOW TO ACCESS GCF FUNDING

At GCF, we mobilize climate finance by working through a wide range of organizations. Organizations with specialized capacities in driving climate action may apply to become GCF Accredited Entities. They can be private, public, non-governmental, subnational, national, regional or international bodies. They should have clear, detailed and actionable climate change projects or programmes to present to GCF that progress mitigation and adaptation. **Box A1.1** provides advice from some Accredited Entities.

BOX - A1.1

WHAT ADVICE WOULD YOU GIVE TO OTHER ORGANISATIONS SEEKING ACCREDITATION TO THE GCF?

Central American Bank for Economic Integration (CABEI)

"It is an easy question to answer after you have gone through the process! What is very important is to ensure that the organisation has commitment at the highest level. This is a key issue, and will unlock resources, both financial and staff. Because many of the issues that will be assessed during the accreditation process are linked to how people within the organisation work and overall processes, if the leadership is not convinced very few people will follow behind. For CABEI, we had the support and commitment from the highest levels of the organisation starting from the Board of Directors, the Executive President, and Vice President. This helped tremendously in taking the process forward.

Next is communication. Right from the beginning, express clearly what the organisation is trying to achieve through accreditation, how it will contribute to its goals and what impact it will have in taking the organisation forward. At CABEI, we always articulated that accreditation to the GCF isn't the end result but the beginning."

Miguel Mendez, Head of Partnerships, and Norma Palma, Senior Analyst of Partnerships, CABEI

International Union for Conservation of Nature (IUCN)

"Environmental and Social Safeguards (ESS) is one of the most important and challenging parts of GCF's accreditation process. Institutions should fully understand the process and, ideally, have an ESS system already in place. Fortunately, IUCN has an ESS system thanks to its prior accreditation to the Global Environment Facility (GEF). After accreditation, institutions should immediately start engaging with GCF National Designated Authorities (NDA). They should also avoid taking on too much in the beginning. Staying focused is important."

Jean-Yves Piro, Director, and Sébastien Delahaye, Portfolio Manager, IUCN

Japan International Cooperation Agency (JICA)

“To have an effective partnership, potential entities should think about their comparative advantage. In the case of JICA, ours is the agency’s global reach, field-oriented approach, and its track record in providing Japanese expertise, skills and knowledge. Now that JICA is a GCF Accredited Entity, our comparative advantage has increased, and we are looking to generate greater awareness about our partnership with GCF so that our partner countries are aware of this positive development.”

Satoshi Shigiya, Senior Director, Office for Climate Change, JICA

Source: [GCF, 2017](#).

Accredited Entities develop Funding Proposals for consideration by GCF. They also oversee, supervise, manage and monitor their respective GCF-approved projects and programmes. There are two types of GCF Accredited Entities, based on access modalities: Direct Access Entities and International Access Entities.

Direct Access Entities are subnational, national or regional organizations nominated by developing country national designated authorities or focal points. Organizations nominated to become Direct Access Entities may be eligible to receive GCF Readiness support. This funding helps organizations in developing countries prepare to become Accredited Entities, as well as enabling those already accredited to strengthen their organizational capacities.

International Access Entities can include United Nations agencies, multilateral development banks, international financial institutions, and regional institutions. These organizations have the wide reach and expertise to handle a variety of climate change issues, including ones that cross borders, and thematic areas. International Access Entities do not need to be nominated by developing country national designated authorities or focal points.

Organizations that are not Accredited Entities can engage with GCF in other ways. These include, but are not limited to:

- partnering with an Accredited Entity on implementing its approved GCF project;
- cofinancing projects with an Accredited Entity;
- being a Readiness delivery partner, provided that the entity can demonstrate relevant expertise, experience and ability to implement projects.

HOW TO SUBMIT A FUNDING PROPOSAL TO GCF

Figure A1.1 shows an example of the steps for submitting a Funding Proposal. The steps are the following.

Country and entity work programme: NDAs and AEs submit a work programme with prioritized sectors in line with country NDCs.

Project idea generation: NDAs and AEs use work programmes to identify a pipeline of projects and work with GCF to refine ideas to maximize climate impact.

Concept note submission: AEs may choose to first submit a concept note to GCF to receive early feedback on a project idea, or go directly to Funding Proposal development.

Funding Proposal development: The AE submits a Funding Proposal to GCF's PSF or Division of Mitigation and Adaptation (DMA), depending on whether it is a private- or public-sector project.

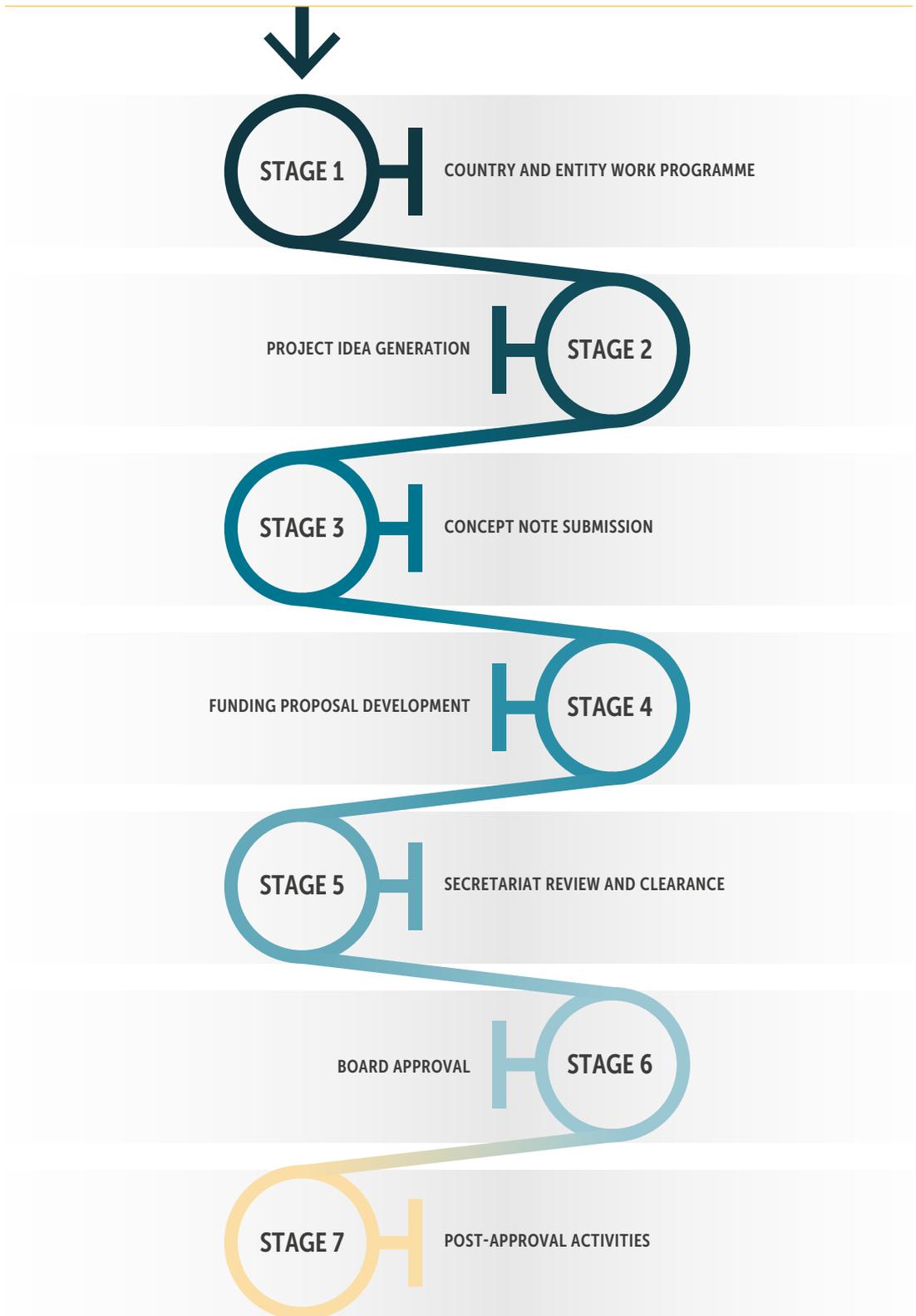
Secretariat review and clearance: GCF performs due diligence, including a site visit to the AE and other implementing entities, and negotiates a term sheet. The Secretariat writes an assessment of the Funding Proposal, and the senior management team determines whether it is ready for review by an independent panel. If given clearance, the Independent Technical Advisory Panel (ITAP) reviews the Funding Proposal to provide feedback and determine whether it can go forward for GCF Board approval.

Board approval: The GCF Board meets three times a year to approve Funding Proposals and set policies.

Post- approval activities: After Board approval, GCF and the Accredited Entity sign a Funded Activity Agreement (FAA) detailing the legal terms and conditions of the project. Once the funded activity agreement has been signed, the Accredited Entity fulfils any conditions required prior to disbursement and submits a request for the GCF funds. The AE is required to submit annual performance reports on the project's climate impact and financial performance, along with an interim and final evaluation.

Please refer to GCF's website for detailed and up-to-date information on accessing GCF's resources, including our operational and Funding Proposal manuals.

FIGURE A1.1 . FUNDING PROPOSAL PROCEDURE



ANNEX 2 GCF'S APPROVED FINANCIAL INSTITUTION PROGRAMMES

FUNDING PROPOSAL	PROJECT NAME	ACCREDITED ENTITY	REGION	THEME	SECTOR	GCF FUNDING (USD eq.)	TOTAL (USD eq.)
FP009	Energy Savings Insurance (ESI) for private energy efficiency investments by Small and Medium-Sized Enterprises	Inter-American Development Bank	Latin America and the Caribbean	Mitigation	Public	21,700,000	41,700,000
FP020	Sustainable Energy Facility for the Eastern Caribbean	Inter-American Development Bank	Latin America and the Caribbean	Mitigation	Public	80,000,000	190,468,000
FP059	Climate Resilient Water Sector in Grenada (G-CREWS)-	GIZ (German Corporation for International Cooperation)	Latin America and the Caribbean	Adaptation	Public	40,148,003	47,872,889
FP063	Promoting private sector investments in energy efficiency in the industrial sector and in Paraguay	Inter-American Development Bank	Latin America and the Caribbean	Mitigation	Public	23,000,000	43,000,000
FP064	Promoting risk mitigation instruments and finance for renewable energy and energy efficiency investments	Inter-American Development Bank	Latin America and the Caribbean	Mitigation	Public	103,000,000	163,850,000
FP065	Financial Instruments for Brazil Energy Efficient Cities (FinBRAZECC)	World Bank	Latin America and the Caribbean	Mitigation	Public	195,000,000	1,306,000,000
FP071	Scaling Up Energy Efficiency for Industrial Enterprises in Vietnam	World Bank	Asia-Pacific	Mitigation	Public	86,300,000	497,200,000
FP083	Indonesia Geothermal Resource Risk Mitigation Project	World Bank	Asia-Pacific	Mitigation	Public	100,000,000	410,000,000

FUNDING PROPOSAL	PROJECT NAME	ACCREDITED ENTITY	REGION	THEME	SECTOR	GCF FUNDING (USD eq.)	TOTAL (USD eq.)
FP025	SEFF - Sustainable Energy Financing Facilities	European Bank for Reconstruction and Development	Africa, Asia-Pacific, Eastern Europe	Cross-cutting	Private	378,000,000	1,385,000,000
FP027	UGEAP - Universal Green Energy Access Programme	Deutsche Bank	Africa	Mitigation	Private	80,000,000	302,000,000
FP028	MSME Business loan programme for GHG emission reduction	XacBank	Asia-Pacific	Mitigation	Private	20,000,000	60,000,000
FP046	Renewable Energy Programme #1 - Solar	XacBank	Asia-Pacific	Mitigation	Private	9,000,000	18,000,000
FP048	Low Emissions & Climate Resilient Agriculture Risk Sharing Facility	Inter-American Development Bank	Latin America and the Caribbean	Cross-cutting	Private	20,000,000	158,000,000
FP081	Line of Credit for Solar Rooftop Segment	National Bank for Agriculture and Rural Development	Asia-Pacific	Mitigation	Private	100,000,000	250,000,000
SAP004	Energy Efficient Consumption Loan Programme	XacBank	Asia-Pacific	Mitigation	Private	10,000,000	22,000,000
FP095	TFSC - Transforming Financial Systems for Climate	AFD (French Development Agency)	Africa, Latin America and the Caribbean	Cross-cutting	Private	273,000,000	742,000,000
FP097	CAMBIO II	Central American Bank for Economic Integration	Latin America and the Caribbean	Adaptation	Private	16,000,000	28,000,000
FP098	DBSA Climate Finance Facility	Development Bank of Southern Africa	Africa	Cross-cutting	Private	56,000,000	171,000,000
FP105	BOAD Climate Finance Facility to Scale Up Solar Investment in Francophone West Africa LDCs	BOAD (West African Development Bank)	Africa	Mitigation	Private	69,000,000	139,000,000
FP114	Programme on Affirmative Finance Action for Women in Africa	African Development Bank	Africa	Cross-cutting	Private	20,000,000	25,600,000

The Green Climate Fund (GCF) supports global climate action by promoting a low-emission and climate-resilient transition in developing countries. It has created the Private Sector Facility (PSF) to de-risk the delivery of private capital and scale up private-sector investment flows for low-carbon and climate-resilient development.

This publication is the first of a set of PSF publications to inform existing and potential partners on best practices for designing programmes and accessing GCF resources. It focuses on our vision to green the financial system through engagement with a wide range of financial institutions, notably: central banks, commercial banks, non-banking financial institutions, development finance institutions, national development banks, microfinance institutions, cooperatives, and other green investment vehicles.

The publication includes an annex explaining how to access GCF funding.