

## Policy Brief

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# Leveraging National Development Banks To Enhance Financing For Climate-Smart Urban Infrastructure

Directed to International Financial Institutions

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### KEY TAKEAWAYS

- While National Development Banks (NDBs) are well positioned to scale up financing for climate-smart urban infrastructure, only a small minority finance local governments or green infrastructure.
- This research evaluated the demand (cities) and supply (NDBs) side barriers of climate-smart urban infrastructure financing to identify actionable opportunities to scale up NDB financing for climate-smart urban infrastructure. Twelve maturity dimensions were identified across NDBs' strategic, financial, operational, and business parameters, representing areas of opportunities and specific actions that can be taken to capture them.
- Overcoming barriers faced by cities and NDBs also requires close collaboration between stakeholders, including national governments and DFIs. Each key stakeholder identified can play a role individually and collaboratively in bridging the gap in financing green urban infrastructure.

Investments in climate adaptation and mitigation measures in cities' infrastructure will determine the resilience and wellbeing of all communities for years to come. Inaction on climate change in cities will lead to increased inequality both within and among countries. Climate change can have significant financial implications that can create a threat to the stability of the financial system, by disrupting business operations and increasing unexpected expenditures. Up to US\$ 4 trillion worth of assets are at risk from climate change in cities worldwide.<sup>1</sup>

At the same time, infrastructure needs are most acute in cities, and even more so in developing countries and smaller cities. Infrastructure financing needs are estimated at US\$ 4.1-4.3 trillion per year from 2015 to 2030.<sup>2</sup> Making infrastructure low-emissions and climate-resilient will require additional costs of US\$ 0.4-1.1 trillion per year.<sup>2</sup> However, climate-resilient infrastructure is estimated to have a favourable benefit-cost, with the World Bank estimating that investing US\$ 1 trillion in the incremental cost of making infrastructure more resilient in developing countries would generate US\$ 4.2 trillion in benefits.<sup>3</sup>

To close the investment gap in climate-smart urban infrastructure, National Development Banks (NDBs) have the potential to play a stronger role. Sitting at the nexus of public policy and the financial system, NDBs are well positioned to scale up financing for green urban infrastructure. Based on their strong local knowledge and proximity to cities, they are the ideal intermediaries to channel funds for climate-smart urban infrastructure and provide technical assistance and project preparation support for local governments.

This analysis from the Cities Climate Finance Leadership Alliance (Alliance) aims to provide a conceptual framework that looks at the essential dimensions that must be in place to enhance the role of NDBs in financing climate-smart urban infrastructure. The research builds on the main conclusions from the Alliance's Policy Brief on "Enhancing the Role of National Development Banks in Supporting Climate-Smart Urban Infrastructure".<sup>4</sup>

This latest research has focused on:

- **Cities as the demand side of green<sup>5</sup> urban infrastructure financing.** The analysis is based on interviews with six municipalities to develop key insights on the challenges in accessing finance for green urban infrastructure projects, particularly from national development banks. The research and analysis on common barriers and key enablers for cities is presented.

1 CDP, <https://www.cdp.net/en/climate>

2 Cities Climate Finance Leadership Alliance (Alliance). "The State of Cities Climate Finance 2015." Alliance, 2015, [ccfla.wpengine.com/wp-content/uploads/2015/12/CCFLA-State-of-City-Climate-Finance-2015.pdf](https://www.ccla.wpengine.com/wp-content/uploads/2015/12/CCFLA-State-of-City-Climate-Finance-2015.pdf).

3 Global Commission on Adaptation. "Urban Resilience Infrastructure: an Imperative in a Climate Uncertain World." The Rockefeller Foundation, 20 Sept. 2019, [www.rockefellerfoundation.org/blog/urban-resilience-infrastructure-imperative-climate-uncertain-world/](http://www.rockefellerfoundation.org/blog/urban-resilience-infrastructure-imperative-climate-uncertain-world/).

4 Cities Climate Finance Leadership Alliance (Alliance). Enhancing the Role of National Development Banks in Supporting Climate-Smart Urban Infrastructure. Alliance, 2020. [https://www.climatepolicyinitiative.org/wp-content/uploads/2020/08/Enhancing\\_the\\_Role\\_of\\_National\\_Development\\_Banks\\_in\\_Supporting\\_Climate\\_Smart\\_Urban\\_Infrastructure.pdf](https://www.climatepolicyinitiative.org/wp-content/uploads/2020/08/Enhancing_the_Role_of_National_Development_Banks_in_Supporting_Climate_Smart_Urban_Infrastructure.pdf)

5 There is no widely accepted definition of "green infrastructure", but for the purpose of this memo, we refer to all low carbon, climate resilient infrastructure.

- **The supply side of green urban infrastructure financing, and specifically the role of NDBs.** The research focuses on the barriers and opportunities that NDBs face in financing green urban infrastructure. Based on the interviews with ten NDBs globally, the study develops a “maturity” model of the key attributes required by an NDB to successfully support green urban infrastructure finance.

**NDBs can play a central role in enhancing the support for municipalities throughout the climate-smart infrastructure lifecycle from concept, design and scoping to pre-feasibility, feasibility and implementation stage. However, only 4% of Public Development Banks are specifically mandated to finance local governments, and even fewer NDBs have a green infrastructure-focused mandate.**

## Barriers and Opportunities for NDBs to Provide Financing to Cities for Green Urban Infrastructure

In most countries, NDBs have a responsibility to finance the transition towards a low-carbon, climate-resilient economy to improve the health and well-being of their citizens, and enhance their ability to achieve their development mandate. NDBs are a critical development financing arm of the national government and can be leveraged to advance the national and international climate goals and commitments as well as contribute to the achievement of the Sustainable Development Goals (SDGs).

The research and interviews with NDBs and municipalities identified a number of barriers to NDBs providing climate-smart urban infrastructure financing to cities, but also identified opportunities. These barriers were identified at the policy, legal and regulatory frameworks level, institutional level and financial level.

**Table 1:** Barriers for NDBs Financing Climate-Smart Urban Infrastructure

Policy, Legal and Regulatory Barriers	Institutional Barriers	Financial Barriers
<ul style="list-style-type: none"> <li>• Legal structure can limit the flexibility and ability of the NDB to take higher risks</li> <li>• Unspecific / broad mandate can hinder the NDB's focus and prioritization of climate-smart infrastructure projects</li> <li>• Fragmented policies and lack of coordination at the national and sub-national level can interrupt project design and implementation</li> </ul>	<ul style="list-style-type: none"> <li>• Lack of resources and sectoral expertise in climate infrastructure financing to identify and structure projects</li> <li>• Lack of bankable projects pipeline or capacity to support municipalities with designing, developing and implementing climate-smart infrastructure projects</li> <li>• Weak internal capacity to support municipalities through TA or PPF</li> </ul>	<ul style="list-style-type: none"> <li>• Insufficient capitalization can impede on ability to finance green infrastructure projects with upfront capital requirements</li> <li>• Lack of access to international funds and dedicated resource mobilization to match needs of green infrastructure projects with financing</li> <li>• Weak fiscal capacity</li> <li>• Limited access innovative capital or de-risk instruments to finance climate-smart urban infrastructure projects</li> </ul>

While there are many potential barriers, there are also opportunities for NDBs to provide climate-smart urban infrastructure financing to cities.

**Figure 1:** Enablers for NDBs Financing Climate-Smart Urban Infrastructure

<b>Bankable Infrastructure Projects Pipeline Platforms</b>	NDBs are creating platforms to pool bankable infrastructure projects to attract private sector investments.
<b>Capacity Building</b>	NDBs are helping local governments in capacity building to enhance their access to diverse sources of finance.
<b>Dedicated Fund</b>	NDBs have funds dedicated to sustainable infrastructure projects which helps NDBs prioritize the resources for this sector.
<b>Resource Mobilization</b>	NDBs have a dedicated unit or staff that mobilize resources from donors to the specific needs of local governments and infrastructure projects (PPF & TA).
<b>International Climate Funds' Accreditation</b>	Climate fund accreditation enhances the capacity of NDBs to support green infrastructure projects.
<b>Green / Sustainable Bonds</b>	NDBs that issue green bonds can support green urban infrastructure projects.

## The NDB Maturity Model for Financing Climate-Smart Urban Infrastructure

NDBs that finance infrastructure have different capacities and may face different constraints based on their size, structure and local financing needs. Nevertheless, common themes have emerged in the challenges and opportunities NDBs globally face at the strategic, financial,

### About the NDB Maturity Model Dimensions and Parameters:

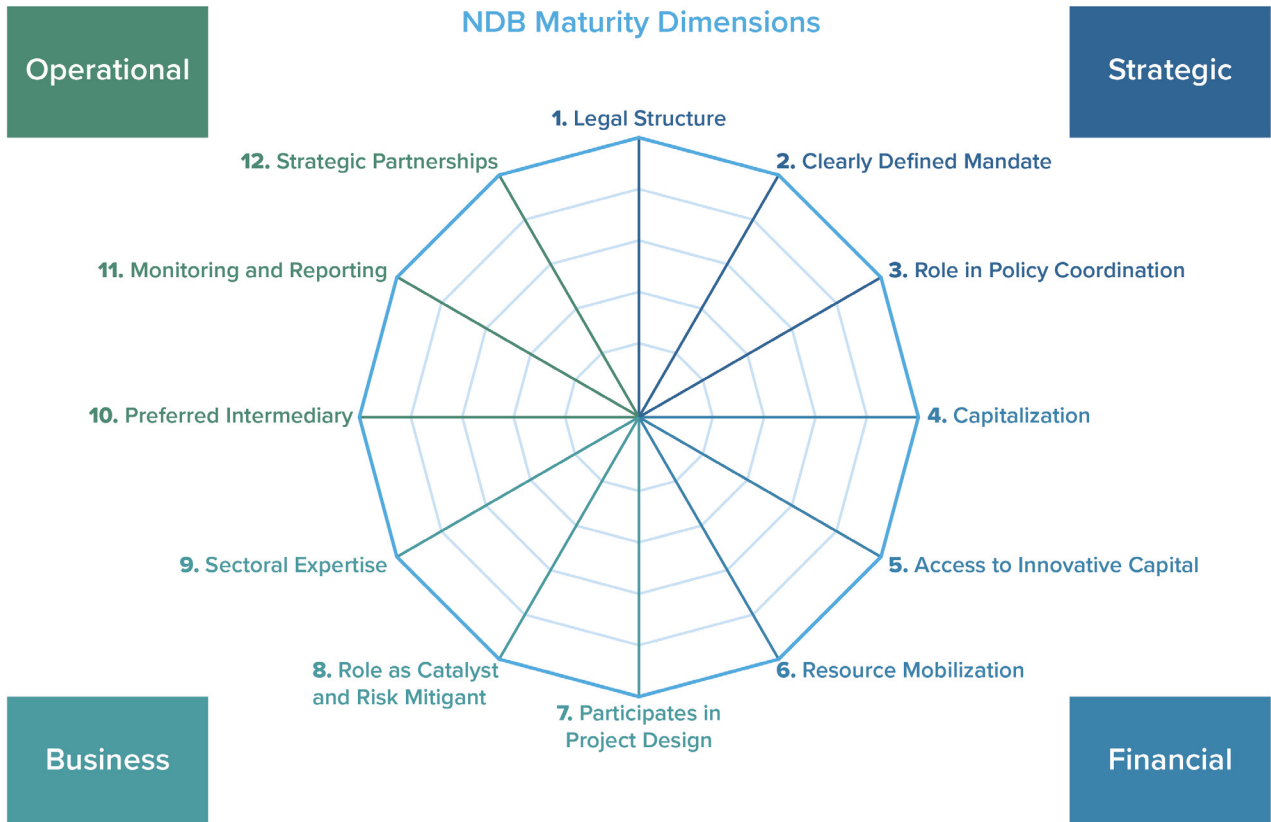
Based on the 12 main dimensions explored, each of these dimensions is presented in a positive value statement intended to define what “mature” means for each area. Each dimension is scored out of 5, based on our assessment, with 5 being a fully fledged NDB capable of optimizing climate-smart urban infrastructure financing.

It is not enough to be very strong in one area or parameter. One stronger area does not necessarily offset a weaker area. The most mature NDBs are those that find a balance between all four parameters. For a strong and mature NDB, the harmony or balance among the four common parameters, and the four key dimensions within each parameter, is as important (if not more important) than the absolute “scores” of individual dimensions or parameters.

The NDB maturity scale is intended to create a standard and consistent measure of comparison for NDBs financing green urban infrastructure.

business and operational level. Twelve dimensions have been identified and developed to define – in normative terms – what constitutes a mature NDB’s ability to finance climate-smart urban infrastructure. International Financial Institutions (IFIs) have a supporting role to play in various dimensions to enhance NDBs’ capacity to finance climate-smart urban infrastructure projects.

**Figure 2:** The NDB Maturity Model



The below table summarizes the twelve dimensions of the NDB Maturity Model, which evolved from the barriers and enablers NDBs face in financing climate-smart urban infrastructure. These dimensions provide evidence-based analysis to develop the recommendations for several key stakeholder groups.

**Table 2:** Summary of the NDB Maturity Model Dimensions

Parameters	Dimensions
Strategic	<ol style="list-style-type: none"> <li>1. The Bank’s <b>legal structure</b> is established in an Act or specific legislation</li> <li>2. The Bank has a <b>clearly defined mandate</b> to support green infrastructure as well as local governments.</li> <li>3. The Bank has a <b>strategic policy role</b> with a seat at the policy table, plays a convening role in developing a green urban infrastructure strategy, coordinates among ministries, provides policy recommendations and supports in the operationalization of the project.</li> </ol>
Financial	<ol style="list-style-type: none"> <li>4. The Bank’s <b>size of equity</b> is sufficient to support climate smart urban infrastructure deals.</li> <li>5. The Bank has <b>access to innovative capital sources</b> to fund a range of green infrastructure projects.</li> <li>6. The Bank has a <b>devoted resource mobilization unit</b> to <b>access blended finance or grant funds</b> from international DFIs.</li> </ol>
Business	<ol style="list-style-type: none"> <li>7. The Bank <b>participates in project design</b> for green urban infrastructure at the national level or at the origination phase.</li> <li>8. The Bank acts as a <b>catalyst and de-risking instrument</b> to facilitate bankable infrastructure projects using various forms of guarantees, project preparation facilities and technical assistance to support municipalities.</li> <li>9. The Bank has the <b>sectoral expertise</b> of climate smart urban infrastructure financing.</li> </ol>
Operational	<ol style="list-style-type: none"> <li>10. The Bank is the <b>preferred intermediary</b> for international climate funds.</li> <li>11. The Bank <b>sets indicators to monitor and report</b> on green urban infrastructure transactions.</li> <li>12. The Bank has <b>strategic partnerships</b> with diverse sources of finance to channel funds to green infrastructure projects.</li> </ol>

## International Financial Institutions Can Channel their Financial and Non-financial Support Through NDBs

There are a number of dimensions for International Financial Institutions (IFIs) to consider as they support NDBs. Sitting at the nexus of public policy and the financial system, NDBs are well positioned to scale up financing for green urban infrastructure. Strong local knowledge and proximity to cities, makes NDBs the ideal intermediaries to channel funds for climate-smart urban infrastructure and provide technical assistance and project preparation support for local governments. IFIs can leverage the shared interest with NDBs in development but also in contributing to the global commitment to climate goals, by supporting NDBs to scale up finance for climate-smart urban infrastructure.

IFIs can play an important role supporting NDBs as they address barriers and develop opportunities to strengthen their capacity to provide and mobilize financing to cities for green

urban infrastructure projects. The research has identified a number of areas where IFIs can play a vital role. IFIs can particularly play a supporting role in increasing NDBs access to innovative sources of capital, provide project preparation facilities or technical assistance to help with planning and project design, encourage training or resources that can help NDBs build internal capacity and sectoral expertise, and continue building strategic partnerships and engagement with NDBs. Additionally, the Joint Declaration of all Public Development Banks<sup>6</sup> places a great emphasis on partnerships and global coalitions to strengthen impact and collectively reach the Sustainable Development Goals and reinforce local financial systems.

## Recommendations

It is recommended that IFIs:

1. **Support National Development Banks in making greater use of innovative capital**, notably accessing dedicated pools of capital from institutional investors, funding in various currencies, achieving economies of scale by aggregating multiple projects, and offering low and fixed interest rates and long repayment terms.
2. **Provide National Development Banks to with financial resources as well as project preparation facilities and technical assistance** to enhance their capacity to support local governments in structuring and financing climate-smart urban infrastructure projects. Assisting National Development Banks in strengthening planning and project design can improve the quality of climate-smart urban infrastructure projects.

### Case Study 1: Colombia's Findeter – Sustainable and Competitive Cities Platform in Collaboration with the Inter-American Development Bank

The Sustainable and Competitive Cities is a Platform led by IDB and Findeter which promotes strategic projects aimed at transforming intermediate cities through project design and planning to improve citizen quality of life. Findeter offers a holistic approach that takes sustainable infrastructure ideas of municipalities through every stage of the project lifecycle from conception to financing and implementation.

To make the Platform self-sustainable, Findeter is increasingly considering charging municipalities for project planning and preparation support. Meanwhile, Findeter supports its National Government in conducting pre-contractual and contractual processes as well as the monitoring of the implementation of social and sustainable infrastructure programs through its technical assistance program.

<sup>6</sup> Finance in Common Summit, "Joint Declaration of All Public Development Banks in the World", 12 Nov. 2020, [https://financeincommon.org/sites/default/files/2021-01/FiCS%20-%20Joint%20declaration%20of%20all%20Public%20Development%20Banks\\_0.pdf](https://financeincommon.org/sites/default/files/2021-01/FiCS%20-%20Joint%20declaration%20of%20all%20Public%20Development%20Banks_0.pdf)

3. **Advise National Development Banks in developing and utilizing de-risking instruments** to catalyze private sector investments.

### **Case Study 2: Development Bank of Southern Africa’s Embedded Generation Investment Programme**

To foster innovation and spur the generation of renewable energy projects, DBSA has turned to the GCF to de-risk and mobilize investments by Independent Power Producers (IPP) and local government entities in renewable energy projects.

The program, titled the Embedded Generation Investment Programme (EGIP), is a credit support mechanism supporting non-sovereign backed Power Purchase Agreements for renewable energy projects in South Africa.

This Programme contains two components:

1. First, EGIP provides credit support to private sector solar and wind IPPs established as special purpose vehicles (SPV) backed by non-sovereign off-takers to enhance the bankability of renewable energy projects.
2. Second, EGIP provides credit support to SPVs which are owned by Local Community Trusts and/or, Small, Medium and Micro-sized enterprises to support their obtaining and managing equity ownership in local renewable energy sub-projects.

4. **Assist National Development Banks in deepening their sectoral expertise and building internal capacity** to identify, finance and implement green infrastructure projects with local governments.
5. **Engage with National Development Banks to develop partnerships and build relationships** to ensure political support, leverage diverse resources and source of capital, support the needs of green urban infrastructure projects, and benefit from peer learning and knowledge exchange.
6. **Build partnerships and initiatives to enhance local governments’ financial knowledge and access to information** on climate finance players, objectives of concessional funds and assessment criteria for climate-smart urban infrastructure projects. Provide support to NDBs to enhance their capacity and resources to enable them to support cities’ reach a fiscal and technical level sufficient to increase their access to diverse sources of finance.

**The full knowledge product ‘Leveraging National Development Banks To Enhance Finance for Climate-Smart Urban Infrastructure’ includes further case studies and examples.**

**Access the knowledge product on the Alliance website.**



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## ABOUT THE CITIES CLIMATE FINANCE LEADERSHIP ALLIANCE

The Cities Climate Finance Leadership Alliance (the Alliance) is a coalition of leaders committed to deploying finance for city level climate action at scale by 2030. It is the multi-level and multi-stakeholder coalition aimed at closing the investment gap for urban subnational climate projects and infrastructure worldwide. Climate Policy Initiative (CPI) serves as Secretariat for the Alliance. Funding for the Alliance's activities is jointly made available through two German government ministries: The Federal Ministry for Economic Cooperation and Development (BMZ) and the Federal Ministry for the Environment, Nature Conservation, and Nuclear Safety (BMU).

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