



# Are the WBG and IDB doing enough for transport decarbonization?

**Despite climate commitments, MDB finance continues to favor fossil fuel-dependent vehicles**

Lead author and researcher:  
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Despite climate commitments, MDB finance continues to favor fossil fuel-dependent vehicles

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## Abbreviations

<b>CC</b>	Climate Change
<b>CCAP</b>	Climate Change Action Plan
<b>COP</b>	Conference of the Parties
<b>CPF</b>	Country Partnership Framework
<b>ESF</b>	Environmental and Social Framework
<b>ESP</b>	Environmental and Social Policies
<b>ESS</b>	Environmental and Social Safeguards
<b>EV</b>	Electric Vehicle
<b>GHG</b>	Greenhouse Gas
<b>IDA</b>	International Development Association
<b>IBRD</b>	International Bank for Reconstruction and Development
<b>ICE</b>	Internal Combustion Engines
<b>IDA</b>	International Development Association
<b>IDB</b>	Inter-American Development Bank
<b>IEA</b>	International Energy Agency
<b>IFC</b>	International Finance Corporation
<b>LAC</b>	Latin America and the Caribbean
<b>LTS</b>	Long Term Strategy
<b>MDB</b>	Multilateral Development Banks
<b>MIGA</b>	Multilateral Investment Guarantee Agency
<b>NDC</b>	Nationally Determined Contributions
<b>PS</b>	Performance Standards
<b>SDG</b>	Sustainable Development Goal
<b>UNFCCC</b>	United Nations Framework Convention on Climate Change
<b>WBG</b>	World Bank Group
<b>ZEV</b>	Zero emission Vehicles

## Executive Summary

An effective, efficient transportation sector is vital to the success of every society and is critical to enabling economic development. However, transport is also one of the biggest drivers of climate change with more than 25 percent of the energy-driven carbon emissions. Globally, fossil fuel combustion in the transportation sector is the largest source of rising CO<sub>2</sub> emissions. For economies to grow sustainably, it is critical that transport systems shift from a reliance on fossil-fuel dependent internal combustion engines (ICE) to investments in zero emissions vehicles (ZEV) and electric charging infrastructure. The World Bank and other Multilateral Development Banks (MDBs) have a critical role to play in supporting this transition. This report analyzes the ways in which the World Bank and the Inter-American Development Bank (IDB) are investing in the transport sector, and specifically the extent to which these investments finance transport systems which are fossil-fuel dependent. It finds that the vast majority of World Bank and IDB transport sector financing goes to projects that include ICE investments. For the MDBs to move their portfolios towards Paris alignment, this must change with a commitment from the MDBs to phase out investments in ICE, and to increase investments in ZEV systems.

Transport systems are a key element of urban planning and are inextricably linked to other urban planning decisions. Transit decisions impact everything from access to schools to community health and safety. Two of the Sustainable Development Goals (SDGs) are specifically relevant to developing a transportation sector that is safe and efficient. SDG Target 3.6 aimed to cut in half the number of global deaths and injuries from road traffic accidents. SDG Target 11.2 aims that, by 2030, all people, in particular persons in vulnerable situations such as persons with disabilities and children, have access to public transportation that is safe and affordable. We believe that for a transport system to be safe, it must also promote, rather than harm, public health. A 2019 study found that exhaust from ICE vehicles caused about 385,000 premature deaths in 2015, up from 361,000 deaths in 2010. Given the critical importance of transportation systems in driving economic development, combined with the urgent need to act to combat climate change, public investment in ZEV transport, including buses and trucks should be a global priority. Countries around the world are already making time-bound

commitments to phase out the sale, production and use of internal combustion engine vehicles and fossil fuel infrastructure. For example,

- Norway has set a national goal that all cars sold should be zero emission by 2025. This builds upon Norway's progress to date - battery electric vehicles represented more than half the market share of cars in Norway in 2020. Norway shows how quickly progress can be made using the right policies and economic incentives for purchasers.
- The United Kingdom will ban sales of new petrol and diesel cars and vans from 2030, and all non-zero emissions road vehicles by 2040.
- Eight additional European countries, Singapore, Canada, Cape Verde and the US states of California and New York also have phase-out plans for fossil fuel-dependent vehicles.
- Costa Rica has been future-focused creating the first country-wide electric charging grid in the region to ease the transition to ZEVs. This is just part of Costa Rica's larger plan to decarbonize its economy by 2050.

Unfortunately, public finance from the MDBs is predominantly making it more difficult to decarbonize the transportation sector. BIC's research has uncovered that since the 2015 Paris Climate Agreement became effective, the vast majority of World Bank Group and IDB transport-related project financing continues to favor fossil fuel-dependent vehicles over ZEV alternatives. The World Bank and IDB have provided robust financing for internal combustion vehicles, maintenance, production and infrastructure, with relatively little support for electric vehicles or electric vehicle infrastructure.

In this report we present research findings on project financing from the World Bank Group and the IDB Group. Our research on World Bank (IBRD/IDA) projects reviews active transport-related projects, whereas the research on the International Finance Corporation (IFC), the private sector arm of the World Bank, as well as the IDB Group considers all active projects that we could ascertain, based on public information, are relevant to vehicle use. All projects assessed were proposed between January 2017 through September 2021.

Of the project financing in the transport category from the World Bank, 68 percent is for projects that include support for ICE vehicles and infrastructure,

such as refineries and petrol stations while only two percent of financing is for projects that support ZEVs and infrastructure, such as electric buses and charging stations. Put another way, of 216 transport-category projects from 2017 until present, \$77 billion was for projects that involved ICE vehicles and infrastructure. Less than \$1 billion was for projects that supported ZEVs. Meanwhile, more than 28 percent of all IFC project financing went to projects that likely included support for ICE vehicle procurement, use, maintenance, or manufacture, whereas only one percent went to projects supporting ZEVs.

For projects related to the transport sector from the public sector arm of the IDB, most of the funds for the transport sector are used for ICE projects. From a total of \$7.6 billion of the IDB's own 'Transport' category, \$7.4 billion (97 percent) were directed to ICE intensive projects, \$99 million for ICE infrastructure (1.3 percent), and \$880,000 for ZEVs (0.01 percent). With respect to the IDB Invest, the private sector arm, of project funding pertinent to vehicles 95 percent went toward ICE intensive projects versus five percent for ZEVs.

The World Bank is aware of the role it should play in decarbonizing the transport sector, and in the last few years has started to take some action with small programs dedicated to decarbonizing transport. This includes Sum4All, the World Bank's sustainable mobility campaign launched in 2017, which brings together public and private partners to provide the data and policy tools needed to decarbonize global transport, including the Global Roadmap of Action Toward Sustainable Mobility. Earlier in 2021, the Bank also launched the Global Facility to Decarbonize Transport, a multi-donor trust fund specifically focused on transport decarbonization. The World Bank Climate Change Action Plan (CCAP) released in 2021 also observes that "[a] shift to EVs, including private vehicles as well as buses and trucks, would reduce GHG emissions as well as air pollution and associated health impacts." The CCAP stresses that emissions from transport are expected to grow by 60 percent by 2050 "without aggressive measures."

Similarly, the IDB addressed the decarbonization of transportation in its own Climate Change Action Plan, which noted that in Latin American and Caribbean (LAC) countries transportation accounts for 32 percent of energy-related greenhouse gas emissions. The IDB CCAP acknowledges that "[f]ossil fuel subsidies are hindering the process to

decarbonize energy...” IDB actions described in its CCAP include investing in technologies “to support decarbonization and reduction of fossil fuel consumption,” as well as “to support financing of electric vehicles.”

The awareness and initial efforts of the World Bank and IDB are welcome, but their lending portfolios do not yet show they are serious about transport decarbonization as the vast majority of their funding continues to support ICE. The World Bank and IDB cannot claim to be supporting sustainable transport when their portfolios continue to primarily support ICE. For the World Bank, Inter-American Development Bank (IDB), and the other multilateral development banks (MDBs) to show that they are serious about decarbonizing transport, they must commit to end all investments for the internal combustion engine, or fossil fuel-dependent vehicles, by 2025. This should be coupled with increased investments in ZEV systems and infrastructure. By making this shift, the MDBs can play a critical role in creating a world in which everyone has access to transport infrastructure that is both climate-resilient and climate-friendly

## Introduction

This report aims to provide information about the WBG’s and IDB’s current financing of ICE and ZEV technologies in ground transport.

Emissions in the transport sector — which involves road, rail, air, and marine transportation — currently account for some 24 percent of the global CO<sub>2</sub> emissions. It is expected to be the fastest growing source of global emissions till 2050. In terms of transport modes, 72 percent of global transport emissions come from road vehicles, which account for 15 percent of the total energy-related emissions (IEA, 2021).

The reduction of greenhouse gases (GHG) in the transport sector is reportedly among the main priorities within the WBG and IDB climate strategies. The WBG admits that “without decarbonizing transport, no scenario for achieving the 1.5-degree climate goal is feasible.”<sup>1</sup>

This report aims to identify the WBG and IDB’s main commitments and strategies related to the decarbonization of transport, describe the extent to which the allocation of funding for transport-related projects and policies since 2017 have effectively shifted to Zero Emission pathways, and identify the main elements hindering this transition.

This research was conducted between the months of September and October 2021, based on official, publicly-available information from the WBG and IDB.

The documents containing the databases, findings, conclusions, and proposal will be developed in the following sections:

- A summary of WBG and IDB’s guidelines on decarbonization and other related initiatives.
- Description of the classification categories
- Discussion of findings that may contribute to a better understanding of the relative support for ICE vehicles versus ZEVs, and trends for the WBG and the IDB.
- Conclusions and recommendations that synthesize findings that may contribute to the discussions.

## Summary of WBG and IDB guidelines on decarbonization and other related initiatives

In the context of the United Nations Framework Convention for Climate Change (UNFCCC), national and local governments, as well as international and non-governmental organizations have stepped up efforts to develop long-term approaches to combat climate change (CC).

MDBs have committed to the goals and paths of action set by the Paris Agreement and have released Climate Action Plans that bind them to the CC goals and establish multi-annual strategies and operational plans that assist in adjusting their internal policies and their coordination with partners.

Moreover, the international community expects MDBs to become catalyzers for mitigation and adaptation strategies by setting guidelines for international and regional action, developing methodologies, funding innovative solutions, and advising countries in relation to the alignment of investments.

In this section, we will summarize the main international agreements within the UNFCCC, refer to applicable documents and guidelines from MDBs, the WBG and the IDB, and describe other relevant initiatives regarding the decarbonization of the transport sector.

### THE UNFCCC

In 1992, the Earth Summit in Rio de Janeiro established the basis for today's UNFCCC with an international treaty to combat "dangerous human interference with the climate system." The treaty established a Secretariat and urged nations and UN organizations to direct efforts to improve scientific research on CC and make policy agreements. In 1995, the UNFCCC set the first yearly Conference of the Parties (COP) to review the implementation of the Convention and any other instruments to take the decisions necessary to promote its effective implementation. In 1997, the Kyoto Protocol included the adoption of concrete commitments of the parties to coordinate actions between 2005 and 2020.

## The Paris Agreement

Almost all United Nations countries, including the European Union and 191 states that represent 98 percent of global greenhouse gas emissions, have now ratified the Paris Agreement,<sup>2</sup> which was negotiated in 2015. The agreement aims to forestall a global rise in temperature above 1.5 degrees Celsius, which necessitates a decrease in greenhouse gas emissions by 45 percent (relative to 2010 levels) by 2030 and reaching net zero GHGs by around 2050.<sup>3</sup> Parties agreed to align financial flows in a consistent pathway towards a reduction in GHG emissions and climate-resilient development.

The Paris Agreement sets the international framework to limit global warming through national Long-Term Strategies (LTS) and Nationally Determined Contributions (NDC) regarding mitigation of and adaptation to climate change. The Paris Agreement acknowledges the principles of equity, and of common but differentiated responsibilities and respective capabilities, recognizing that peak climate pollution may take longer for developing countries, which would be reflected in the formulation of LTS and NDCs.

The Paris Agreement states that "developed country Parties should continue taking the lead by undertaking economy-wide absolute emission reduction targets. Developing country Parties should continue enhancing their mitigation efforts, and are encouraged to move over time towards economy-wide emission reduction or limitation targets in the light of different national circumstances."

The agreement recognizes the importance of integrated, holistic, and balanced non-market approaches to assist the Parties in the implementation of their NDCs. Paris also emphasizes the relevance of technology development and transfer, stating that "accelerating, encouraging and enabling innovation is critical for an effective, long-term global response to climate change," thus promoting financial support for developing country Parties in its implementation.

International Organizations and MDBs are allowed to participate as "International Governmental Organizations" in the conferences. The IDB, and several other MDBs, are approved IGO Observers to the UNFCCC. The WBG is an Observer as a body within the UN system.<sup>4</sup>

## COMMITMENTS AND STRATEGIES FROM MDBS

### Voluntary Principles: “Mainstreaming Climate Action within Financial Institutions,” 2015

Representatives of MDBs, leading private banks, and development agencies, signed a document in the context of the Paris Agreement 2015 in the pursuit of a “Mainstreaming Climate Action Within Financial Institutions.”<sup>5</sup> The group included AFDG, Agence Française de Développement, African Development Bank, BNP Paribas, Caisse de Depot et de Gestiôn, Credit Agricole, Credit Guarantee Corporation, CAF Development Bank of Latin America, Development Bank of Southern Africa, European Bank Reconstruction and Development, European Investment Bank, FMO Entrepreneurial Development Bank, IDB, IDB Invest, TSKB, the Japanese International Cooperation Agency, KFW Group, NDF, Proparco, and Yes Bank.

The document supports the notion that the Paris Agreement needs to be accompanied by a new “alignment paradigm,” in which mitigation finance “must go beyond the principles of reducing GHG emissions or enhancing GHG sequestration, towards financing the activities that actively support the Paris Agreement and thus a net-zero emissions and climate-resilient world.” The commitment referred to the need to scale up investments in sustainable energy in the path toward “resilient development pathways.” They also acknowledged that “bridge technologies” and CO<sub>2</sub>-emissions should be phased out in a pathway to decarbonization. MDBs stressed their own “pivotal role” in helping investments and assets support implementation of low carbon pathways.

As part of their joint strategy, they agreed on five principles for their CC strategies:

- Commit to climate strategies.
- Manage climate risks.
- Promote climate smart objectives.
- Improve climate performance.
- Account for climate action.

### MDBs Common Principles for Climate Finance Tracking, 2015

Also in 2015, MDBs agreed on a list of “Common

Principles for Climate Mitigation Finance Tracking,”<sup>6</sup> which would be used to improve and coordinate methodologies and allow comparability.

The statement highlights that:

- Project reporting should be done ex-ante the project implementation, at board approval or financial commitment.
- The principles require mitigation activities to be disaggregated from non-mitigation activities as far as reasonably possible. If such disaggregation is needed and not possible using project specific data, a more qualitative/ experience based assessment can be used to identify its proportions.
- In fossil fuel combustion sectors (transport and energy production and use), the methodology recognizes the importance of long-term structural changes, such as the energy production shift to renewable energy technologies, and the modal shift to low-carbon modes of transport. Consequently, for renewable energy and transport projects ensuring modal shift, both new and retrofit projects are included in the climate financing reporting. In energy efficiency, however, the methodology acknowledges that “drawing the boundary between increasing production and reducing emissions per unit of output is difficult.”

Below is the transport section of MDBs’ methodology for Climate Finance reporting, extracted from MDBs’ Climate Finance report in 2021. The full table is included in the Appendix Section of this report.

7. TRANSPORT	7.1. Urban transport modal change	Urban mass transit
		Non-motorized transport (bicycles and pedestrian mobility)
	7.2. Transport-oriented urban development	Integration of transport and urban development planning (dense development, multiple land-use, walking communities, transit connectivity, and so on), leading to a reduction in the use of passenger cars
		Transport and travel demand-management measures dedicated to reducing pollutant emissions, including GHG emissions (such as high-occupancy vehicle lanes, congestion charging or road pricing, parking management, restriction or auctioning of licence plates, car-free city areas, low-emission zones)
	7.3. Inter-urban transport	Railway transport ensuring a modal shift of freight and/or passenger transport from road or air to rail (improvement of existing lines or construction of new lines)
		Waterway transport ensuring a modal shift of freight and/or passenger transport from road or air to waterways (improvement of existing infrastructure or construction of new infrastructure)
		Bus passenger transport ensuring a modal shift from a higher-carbon mode of public transport
	7.4. Infrastructure for low-carbon and efficient transport	Charging stations and other infrastructure for electric vehicles, hydrogen or dedicated biofuel fuelling
		Digital solutions and programmes dedicated to reducing GHG emissions

In relation to transport, the current MDBs Climate Financing reporting methodology considers every reduction from a higher GHG emitting technology to a lesser emitting technology (modal shift) as climate financing. In practice, this means the purchase of ICE buses as part of “integrated transport systems” to replace single car drivers is considered climate financing, even though it locks in GHG emissions for the lifetime of the buses, which could mean decades of additional emissions. The Climate Report of April 2021, mentions that MDBs are developing a new “granular methodology” of Climate Finance Measuring, which is expected to be published later this year.

Since 2011, MDBs have been periodically reporting

their climate finance, describing their fund allocations for CC mitigation and adaptation. According to the MDBs’ latest report (April 2021), climate funding has increased in 2020 to \$66 billion from a total of \$231 billion in operations. Climate finance currently stands at 29 percent, and MDBs have pledged to raise climate finance to \$175 billion annually by 2025. Of the total climate finance in 2020, \$49.9 billion, or 76 percent, was for mitigation and \$16.1 billion, or 24 percent, was climate change adaptation finance. As reported by the MDBs, the largest portion of climate finance is for the “Transport” sector, with a total of \$12.9 billion, followed closely by renewable energy (\$11.8 billion) and energy efficiency (also \$11.8 billion).

## Total MDB climate finance, 2020 (in \$ million)

Table 3. Total MDB climate finance, 2020 (in US\$ million)

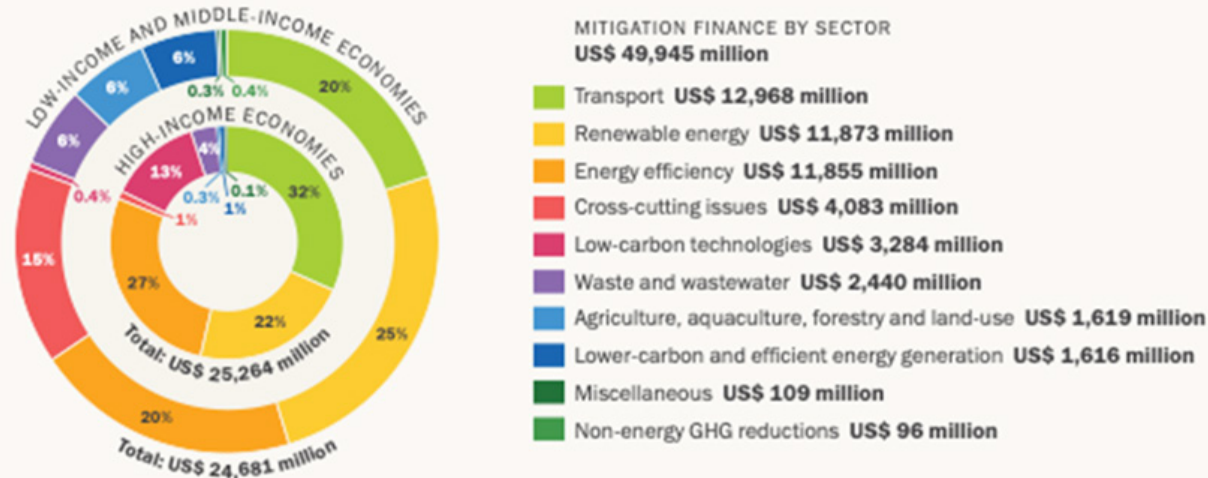
MDB	For low-income and middle-income economies			For high-income economies			Total climate finance				
	Adaptation finance	Mitigation finance	MDB climate finance	Adaptation finance	Mitigation finance	MDB climate finance	Adaptation finance	Adaptation as a percentage of total climate finance	Mitigation finance	Mitigation as a percentage of total climate finance	MDB climate finance
AfDB	1,277	785	2,062	33	–	33	1,311	63%	785	37%	2,095
ADB	741	4,570	5,310	11	4	15	752	14%	4,574	86%	5,326
AIIB	127	987	1,115	15	69	84	142	12%	1,056	88%	1,199
EBRD	481	1,802	2,283	66	1,510	1,576	547	14%	3,312	86%	3,859
EIB	743	2,487	3,230	2,005	22,623	24,628	2,748	10%	25,110	90%	27,858
IDBG	741	1,757	2,498	433	501	934	1,174	34%	2,257	66%	3,431
IsDB	170	89	259	1	1	2	171	65%	90	35%	261
WBG	9,047	12,205	21,252	208	556	764	9,255	42%	12,761	58%	22,016
<b>Total</b>	<b>13,327</b>	<b>24,681</b>	<b>38,009</b>	<b>2,773</b>	<b>25,264</b>	<b>28,036</b>	<b>16,100</b>	<b>24%</b>	<b>49,945</b>	<b>76%</b>	<b>66,045</b>

Note: In certain cases, MDBs finance activities that have simultaneous benefits for mitigation and adaptation. The 2020 figure of US\$ 795 million of climate finance with dual benefits is presented under the subheading of mitigation or adaptation finance (based on the most relevant elements of the project) to simplify reporting. The AIIB reported US\$ 2 million, the EBRD reported US\$ 21 million and the IDBG reported US\$ 772 million as dual-benefit projects. Note that the IDBG and AIIB split dual-benefit finance equally between adaptation and mitigation categories, while the EBRD allocates all dual-benefit activities to adaptation finance. See Annex D for further details.

Source: MDB's Climate Finance report 2020

## MDB climate finance by sector, 2020 (in \$)

Figure 11. MDB mitigation finance by sector, 2020



Source: MDB's Climate Finance report 2020

## MDBs Engagement and Policy Development Support, 2018

In 2018, a group of MDBs released the document “The MDBs’ alignment approach to the objectives of the Paris Agreement: working together to catalyze low-emissions and climate-resilient development.”<sup>7</sup> This group was composed only of MDBs, without private institutions nor agencies that had participated in the voluntary principles and mainstreaming document. It was formed by the African Development Bank Group, the Asian Development Bank, the Asian Infrastructure Investment Bank, the European Bank for Reconstruction and Development, the European Investment Bank, the IDB Group, the Islamic Development Bank, the New Development Bank and the WBG (IBRD, IFC, MIGA). In the statement, MDBs announced that they were developing an approach toward an “alignment” to the Paris Agreement, and identified six principles:

1. Alignment with mitigation goals.
2. Adaptation and climate-resilient operations.
3. Accelerated contribution to the transition through climate finance.
4. Engagement and policy development support.
5. Reporting.
6. Align internal activities.

## High level MDB Statement, 2019

In the context of Climate Action Summit in 2019, MDBs issued a “High Level MDB statement”<sup>8</sup> with the following commitments:

Action 1: MDBs expect climate finance to total at least USD \$65 billion annually by 2025, with \$50 billion for low and middle income economies, 50 percent above current levels (of 2019).

Action 2: Based on current trends, MDBs expect collective efforts to also result in a further \$40 billion of climate investments mobilized annually by 2025 from private sector investors.

Action 3: Present key elements of our common framework, which defines clear principles each institution will incorporate, starting from 2021.

Action 4: Develop a new transparency framework to report on the impact of each MDB’s activities.

Action 5: Each institution will take actions to help

clients move away from the use of fossil fuels.

## WBG’S COMMITMENTS AND STRATEGIES

### WBG’s Environmental and Social Framework

In 2017, the WBG published its Environmental and Social Framework (ESF)<sup>9</sup> to replace its existing social and environmental safeguards policies. The ESF guides the assessment and management of environmental and social risks and impacts in its projects, both to undertake due diligence and to support borrowers. The ESF includes a Vision for Sustainable Development and an Environmental and Social Policy for Investment Project Financing.

The vision includes responding to climate change, stresses the WBG’s commitment to decarbonization, and mandates that WB projects should “choose the alternatives with lower carbon emissions” both in the selection of projects and the technologies to be used.

Within the ESF are the Bank’s Environmental and Social Policies (ESP), which set out the requirements for Borrowers relating to the identification and assessment of environmental and social risks and impacts associated with projects. The ESP includes 10 Environmental and Social Standards (ESSs) to be met by projects, including ESS1: Assessment and Management of Environmental and Social Risks and Impacts, ESS3: Resource Efficiency and Pollution Prevention and Management, and ESS6: Biodiversity Conservation and Sustainable Management of Living Natural Resources. ESS3 mandates that environmental impact assessments should include an estimate of GHG emissions resulting from the projects. While the need to reduce GHG emissions is mentioned explicitly within the ESF, it does not include concrete steps or requirements for selecting low carbon alternatives and only provides recommendations.

### WBG CC Plans: 2016 - 2020 / 2021 – 2026

In 2016, the WBG released its first Climate Change Action Plan (CCAP) 2016–2020<sup>10</sup> that aimed to set an integrated approach for the WBG, as well as support WBG clients to integrate climate into their development strategies. Its second edition, released in 2020 for implementation in the 2021-2025 cycle,<sup>11</sup> is influenced by the WBG’s Green, Resilient, Inclusive Development (GRID) Framework - COVID

19 efforts.<sup>12</sup> It highlights the need to integrate mitigation and adaptation with economic growth and poverty reduction. The WBG pledges to support countries' NDCs and LTs, by providing funding, technical support, and frameworks to ensure those plans through IBRD, IDA and MIGA.

The WBG reports it is jointly developing "rigorous methodologies to assess alignment" with other MDBs, and developing new methodologies for other financing instruments, including policy-based lending and investments in financial institutions and funds. An operation "will be considered aligned" when it "actively contributes to decarbonization pathways or supports activities that do no harm, and on climate adaptation and resilience it fully addresses climate risks." The World Bank CCAP announced that IBRD will align all new operations starting July 1, 2023. For IFC and MIGA, 85 percent of board approved real sector operations will be aligned starting July 1, 2023, and 100 percent of these starting July 1, 2025, two fiscal years later. To achieve this, both institutions will begin aligning 100 percent of their projects at the concept stage well ahead of July 1, 2023. The WBG also stresses its 2017 commitment to end all financing for upstream oil and gas projects.

The WBG reports that "five key systems – energy; agriculture, food, water, and land; cities; transport; and manufacturing – together generate over 90 percent of global GHG gas emissions," and proposes the following sectoral strategies regarding transport and cities:

**Cities.** Promote integrated solid-waste management and circular-economy approaches; improve urban transportation, including public transit and non-motorized options.

**Transport.** Support cities and urban areas in planning, developing, and managing integrated transport systems including high-quality public transit to replace private vehicles and fragmented informal urban transport services; digital technologies to offer significant opportunities to improve efficiency; reduce congestion, air pollution, and GHG emissions

Electric vehicles (EVs) hold significant potential, especially as the power sector is decarbonized. A shift to EVs, including private vehicles as well as buses and trucks, would reduce GHG emissions, air pollution, and associated health impacts. The WBG will support countries or cities in planning and implementing e-mobility solutions, to electrify public

transit, green government fleets, adopt micro-mobility solutions, incentivize individual EV adoption, and build the necessary support infrastructure, such as charging stations. A key IFC focus area is electric buses for public transit in cities. The IFC is executing a three-pronged approach to scale up its investments in this sector.

Pricing and regulatory reforms for fuels and vehicles can be effective tools for reducing GHG emissions, by reducing the price of public transit relative to private vehicles in cities, and by encouraging the purchase of cleaner and more fuel-efficient vehicles.<sup>13</sup>

**Logistics and Freight.** The plan mentions that interventions to decarbonize the freight sector and deliver competitive logistics include measures to re-engineer supply chains, change inventory practices, reduce the fragmentation of production, bring production closer to customers, shift to lower-carbon transport modes, switch to energy-efficient and low-carbon vehicles across modes, including in maritime transport, and optimize networks. Green logistics and green infrastructure not only provide improved connectivity, but can also be a cost-efficient way of reducing emissions and climate-related natural hazards, supporting nature and climate objectives.

## WBGs Document on Electric Mobility & Development 2018

In 2018, the WBG, through its Energy Sector Management Assistance Program, and with the collaboration of the International Association of Public Transport, published the "electric mobility and development" document,<sup>14</sup> which introduces a set of recommendations to improve the development and adoption of e-mobility.

The document highlights the "potential for governments at all levels of capacity to engage with e-mobility," through the adoption of regulations, customs procedures, subsidies and other incentives. Among other recommendations, it mentions:

- E-mobility offers tremendous opportunities but will only be part of the solution to the challenges of mobility and transport sector emissions even under optimistic scenarios of uptake.
- It requires a broad engagement with consumers, industry, operators, companies across the value chain, all levels of government, and the broader public.
- The sustainability benefits of e-mobility are

strongly linked to power system emissions. Fully capturing the environmental benefits of e-mobility requires parallel effort to make full use of renewable energy sources.

- Simple e-mobility solutions can also be elegant, affordable, and highly sustainable.
- Enable public transport operators to succeed with e-mobility. Operators deliver services in a constrained environment.
- Governments need ways and means of avoiding additional financial strain on public transport operators in the switch to e-mobility.
- The impact that transitioning to e-mobility can potentially have on jobs and output in the automotive sector is something that countries need to actively plan for.
- Consumer-led initiatives and the integration of different technologies into the e-mobility value chain should be embraced and encouraged.
- The sustainability of e-mobility requires an integrated approach to consider environmental, economic and social implications of the entire supply chain, particularly as they relate to battery lifecycle.

## IFC Climate Implementation Plan 2016

In 2016, IFC set up a Climate Action Plan<sup>15</sup> with 4 objectives:

- Scale climate investments to reach 28 percent of IFC's annual financing by 2020.
- Catalyze \$13 billion in private sector capital annually by 2020 to climate sectors through mobilization, aggregation, and de-risking products.
- Maximize impact through GHG emissions reduction and resilience.
- Account for climate risk – both the physical risk of climate impacts and the carbon asset risk in IFC's investment selection.

Regarding the transport sector, the IFC proposal highlights that several of its public transit operations that develop technical solutions to solve mobility problems and congestion need to be scaled up. The EV market needs innovation, capital, and business models. Regarding the IFC's past role in the decarbonization of transport, it recognizes that "IFC has not prioritized investment in this sector" but calls for a WBG-wide exploration on the topic.

## IFC Performance Standards

The IFC has an exclusion list (2007)<sup>16</sup> that defines products that the IFC does not finance. The list includes illegal activities, weapons, alcoholic beverages, gambling, radioactive materials, production of asbestos, and large drift fishing nets. The list does not consider other high pollutant or GHG emitting activities.

The IFC's Performance Standards (PS) document,<sup>17</sup> which guide project designers and evaluators, was published in 2012. Regarding CC, the PS document mentions that the process of identifying risks and impacts in projects must "consider the emissions of greenhouse gases, the relevant risks associated with a changing climate and the adaptation opportunities." It notes that GHG reduction alternatives have become available and affordable in all parts of the world.

The IFC has among its objectives to "reduce project-related GHG," and mentions that the prevention of pollution does not mean the absolute elimination of emissions, but its avoidance at the source whenever possible. If not possible, clients should seek to minimize pollution to the extent that the PS objectives are satisfied. PS3: Resource Efficiency and Pollution Prevention has some specific elements regarding GHG emissions, and states that "the client will consider alternatives and implement technically and financially feasible and cost-effective options to reduce project-related GHG emissions during the design and operation of the project." For projects that produce more than 25,000 tonnes of CO2 equivalent annually, clients are mandated to quantify the emissions from their facilities. MIGA adopted its Performance Standards in 2013, which are identical to the IFC's in this regard.

## IDB GROUP

In 2016, the Governors of the IDB Group signed the Bahamas Resolution,<sup>18</sup> which committed the IDB to increase financing of climate change related projects in Latin America and the Caribbean to 30 percent of the IDB's and the then Inter-American Investment Corporation's (currently, IDB Invest) combined total approvals of loans, guarantees, investment grants, technical cooperation, and equity operations by December 2020.

## IDB: 2017 Delivering Climate Agenda

In 2017, the IDB delivered a set of recommendations

to align its strategies to the Paris Agreement goals.<sup>19</sup> Regarding transport, the IDB mentions that “the sector urgently needs” to take steps toward mitigating climate change and increasing its resilience to hydrological and climatological changes.

For those goals, it issued the following recommendations for mainstreaming and stakeholder engagement:

- Support mass transit systems (including buses, trams, metros, and ferries) and promote the use of cleaner technologies in transportation systems (e.g., clean buses).
- Support transportation demand management measures dedicated to reducing GHG emissions (e.g., speed limits, high occupancy vehicle lanes, parking management, and license plate auctioning); and supporting transit-oriented development.
- Enable planning to complement transportation systems with green infrastructure: maximizing non-motorized transportation (e.g. pedestrian and bicycle space, bike sharing).
- Promote vehicle fuel efficiency (through a shift to low-carbon fuel and more efficient vehicles).
- Promote the use of technology for vehicle sharing, ride-hailing, and carpooling.
- Support multi-modal transportation systems and promote a modal shift of freight and passenger transportation from roads to railways and waterways, which have lower per-mile emissions.
- Incorporate adaptation criteria into infrastructure and operation, taking climate scenarios into consideration to design climate resilient infrastructure to more negative scenarios.

## **IDB CC Action Plans: 2016-2020 / 2021-2025**

In 2016, the IDB approved the Climate Change Action Plan 2016–2020 (CCAP 2016-2020). The IDB argues that the plan centers on maintaining ambitious climate action by presenting key priorities at the IDB Group and regional level, while maintaining that specific country pathways to low-carbon and climate-resilient development depend on individual country circumstances and consistency with a demand-driven MDB financing.

In October 2021, IDB Group released a second update to its CCAP for the timeframe 2021-2025.<sup>20</sup> The report was based on the lessons from the IDB CCAP 2016-2020, highlighting the need to adopt different approaches by the public and private branches of the group (IDB and IDB Invest). It highlights the adoption of a 30 percent climate finance as an annual minimum, and that climate finances must be complemented with other measures to ensure consistency of financial flows to low carbon development. On the basis of the MDB’s building blocks on CC, the IDB describes pathways to achieve its CC neutrality strategy and makes recommendations for stakeholders and its own staff on concrete measures for CC adaptation and mitigation. The plan also includes an Appendix with Sector Specific Actions across sectors, including transport.

### **Block 1: Policy Support**

The IDB’s new addition to the MDB’s building blocks provides a description of and recommendations for the MDB’s interactions with governments, and how to integrate NDCs and LTSs with the IDB’s Policy-Based Loans. This is an important consideration to overcome the gaps between national strategies and project strategies.

The IDB also highlights the importance of working with governments to provide incentives and address market barriers hindering the adoption of new environmentally efficient technologies. The IDB highlights that NDCs represent an important part of the process to reach net zero, “but thus far, they are collectively inconsistent with global emissions pathways” that will limit the global temperature increase to 1.5–2°C. It adds that NDCs’ “short time horizons (three years) and focus on marginal improvements may even risk investing in assets that are incompatible with long-term decarbonization and could later be stranded.”

### **Recommendations**

- Support member countries to develop LTSs and update NDCs to be consistent with long-term temperature objectives.
- Support the private sector in designing sustainable strategies aligned with LTSs and NDCs.
- Expand the scope of analysis on NDC design and implementation, including fiscal and sectoral policies and regulations, and publish

the findings.

- Support countries to establish effective policies for climate action, through Policy Based Loans and other instruments.
- Promote policies that address market barriers, foster competition, provide incentives for green innovation and sustainable investments, and aim to achieve multiplier effects.
- Deploy initiatives to accelerate the development of early-stage solutions for environment and climate action.
- Develop and deploy instruments that promote state-of-the-art technology, incentivize and scale sustainable finance solutions, and nurture innovation for climate applications.

## Block 2: Alignment of operations to the Paris Agreement

### Recommendations:

- Country Development Challenges (CDC), Country Strategies (CS), and Sector Framework Document (SFD) should further align the work of the IDB Group with the decarbonization and resilience goals.
- The IDB should systematically provide support services to teams developing CDCs, CSs, and SFDs to reflect long-term decarbonization objectives.
- Further integrate the climate agenda in CDCs and CSs, according to country needs.
- Define a methodology for a climate change risk assessment of the portfolio.

## Block 3: Mitigation

The IDB highlights that the decarbonization of transportation, buildings, and industry “involves challenges such as electrification (or use of hydrogen), the development of new processes for emissions-intensive sectors.” Countries need to take steps to decarbonize their economies in a socially acceptable way to ensure compatibility with other sustainable development goals and ensure an inclusive and just transition.

### Recommendations:

- Provide support to governments to implement decarbonization technologies in the different

sectors.

- Develop decarbonization financing schemes for private companies to transition to low-carbon energy and transportation.
- Design insurance mechanisms to address renewable energy first mover risk in new markets as well as de-risking schemes for battery storage and green hydrogen.
- Further prioritize climate change issues in fiscal management.
- Develop studies, dissemination activities, and training to improve knowledge and promote a just transition to a low-carbon economy.
- Develop a screening tool for investment alignment with low-carbon pathways to be included in client selectivity criteria in all sectors and train investment officers to use it.
- Continue to estimate GHG emissions for operations and consider options for using the data to inform decisions.
- Develop a GHG-emissions tracking tool for transactions that can provide information on the alignment of portfolio to long-term scenarios.

## Block 4: Adaptation and Climate Resilience

### Recommendations:

- Promotion of policy changes toward more resilient and inclusive agriculture systems.
- Support small and medium producers to recover their capacities, knowledge, and tools to produce food and scale up successful models of climate-resilient technologies and practices in the region.

## Block 5: Climate Finance

The IDB admits the challenges for building sustainable finance systems in the region, and the need to develop markets and policy frameworks.

### Recommendations:

- Use technical assistance to support the public and private financial sectors to channel and mobilize resources for sustainable development.
- Use technical assistance and non-reimbursable grants as de-risking instruments in the form of

- guarantees or equities to develop innovative financing structures.
- Incentivize private banks to develop a sustainability strategy to decarbonize their portfolios.
- Facilitate dialogue between regulators, governments, and financial institutions.
- Leverage the Green Bond Transparency Platform to address the heterogeneity of green bond reporting to attract new market players and funds to the region.

## Block 6: Reporting

The IDB highlights its conception that current reporting of climate financing has been “well-suited,” but admits there is room for improvement and proposes the following recommendations:

- Explore options for improving consideration of climate change and sustainability issues through the Development Effective Framework instruments.
- Identify and implement mechanisms to promote the use of climate-resilience indicators at the project level.
- Encourage the use of relevant indicators in the project-results matrix (e.g., reduction of energy consumption) that will enable improved monitoring.
- Implement a more systematic approach to tracking private-sector mobilization and co-financing volumes associated with climate change operations.

## Block 7: Internal Activities

The IDB makes a series of recommendations to align its internal operations. It mentions the possibility of replacing vehicles with “more efficient” vehicles, and continues to consider hybrids as a type of ‘bridge’ technology.

Recommendations:

- Increase the amount of electricity coming from on-site solar systems.
- Analyze business travel patterns, investigate drivers, gather lessons from teleworking, and contemplate ways to sustain reductions in travel.

- Based on country-office business needs and local market conditions, replace vehicles with more efficient, hybrid, or all-electric models.
- Continue the MetroCommute program, explore its possible expansion, and continue and expand Bank-wide employee-engagement activities on green commuting.

In the appendix of the IDB’s 2021-2025 CCAP, the IDB also provides a description of the transportation sector in the region and provides sector specific actions for transportation. The IDB reports that transportation is a growing source of GHG emissions, making up to 32 percent of energy related emissions in LAC (figures of 2014), which is expected to grow as the region has “some of the world’s highest motorization rates, and a rapid expansion of freight transportation” (IDB 2021, extracted from Vergara, Fenhann and Schletz 2015).

The IDB promotes electrification, transit-oriented urban development, and modal shift to public transportation and non-motorized transportation as options for decarbonization pathways. It also stresses that EVs “provide an opportunity in the face of growing motorization” in the region. However, it continues to describe certain ICE technologies, such as hybrids and biofuels, as goals of climate financing.

The IDB recommends the adoption of the following policies to accelerate the adoption of EVs:

- Enacting increasingly stringent local pollution and emissions standards for cars.
- Supporting private capital investments and research and development activities to expand or create value-added industries in the EV and battery markets.
- Introducing regulations to designate parking spaces and expand charging stations for EVs in public spaces and new developments.
- Regulating or harmonizing standards for charging devices.
- Promoting initiatives (such as electric taxi pilot projects) to build awareness.
- Introducing dynamic pricing for charging vehicles, incentivizing charging during off-peak periods.
- Identifying and supporting viable sustainable business models for EV adoption.
- Supporting adoption of the adequate enabling environment (fiscal, legal, and financial reforms). For EVs to effectively reduce

emissions, efforts to decarbonize the electricity generated to power them must continue in parallel.

- The IDB acknowledges the challenges faced by some transportation modes, such as air travel, “given the unfeasibility of electrification and the obstacles to replacing fossil fuels with biofuels.”

The IDB proposes actions for developing policies and knowledge to further the climate change agenda:

- Consider the resilience of the overall transportation network and the uncertainties of climate change impacts when prioritizing interventions.
- Foster a modal shift of freight and passenger transportation from roads to railways and waterways, which have lower per-mile emissions, and maximize non-motorized transportation (e.g. pedestrian and bicycle space, bike-sharing).
- Analyze viable alternative business models for EVs adoption in public transportation, identify necessary reforms to create an adequate enabling environment, and enact regulatory reforms to improve market penetration of EVs.
- Promote the use of technology for vehicle sharing, ride-hailing, carpooling, and autonomous vehicles.
- Promote nature-based solutions to complement transportation systems.
- Build capacity of local and national transportation agencies on climate change issues.

The IDB also recommends the mainstreaming of actions for its own operations:

- Support mass transit systems (including clean buses, bus rapid transit, trams, metros, cable cars, and ferries) informed by data to maximize efficiency ratios, including retrofitting systems to adapt to COVID-19.
- Support financing of EVs.
- Support financing of transit-oriented development.
- Use sustainable materials when building roads.
- Design transportation infrastructure considering local climate change impacts.

## OTHER RELEVANT ONGOING INITIATIVES

### Global Facility to Decarbonize Transport (GFDT), 2019

GFDT<sup>21</sup> is a development platform formed by private companies, knowledge partners, IGOs, MDBs, professional associations, governments, and non-governmental organizations (NGOs) to contribute to CO2 mitigation by “translating climate ambitions into actions.” The WBG and the IDB Group are members. GFDT proposes better regulation of used car exports to developing countries, which in some cases represent over 90 percent of national fleets; policies that represent significant potential for GHG emissions reductions; and investing in e-mobility and other emerging technologies.

GFDT is organized in five work streams:

1. Tracking progress: This initiative evaluates how current mitigation measures contribute to reaching objectives for reducing transport CO2.
2. In-depth sectoral studies: This initiative identifies effective policies for decarbonizing urban passenger transport, road freight transport, maritime transport, aviation, and inter-urban transport.
3. Focus studies: This initiative analyses specific decarbonization issues and feeds the results into other work streams.
4. National pathways: This initiative assesses available policy levers for decarbonizing transport from a country perspective. Projects may also examine regional or sub-national levels.
5. Policy Dialogue: This initiative organizes global dialogue on transport and climate change through high-level roundtables, policy briefings, and technical workshops. It acts as a conduit for transport sector input to climate change negotiations.

### Financial Alliance for Net Zero Emissions

The Glasgow Financial Alliance for Net Zero (GFANZ)<sup>22</sup> launched in 2021, supported by the UNEP, brings together 160 firms (which claim to be responsible for \$70 trillion) to accelerate transition to net zero. All their members must be accredited by the UN Race to Zero. The network includes 43 banks from 12 countries. Their goals are to broaden Race

to Zero's finance campaign, expand the number of financial institutions, ensure the commitments are backed by interim targets (2030 or sooner), coordinate commitments to support the transition, support technical collaboration, and advocate for policy that supports economy-wide transitions to net zero. The initiative is backed by the UK and US governments. All members, within 18 months of joining, are required to set 2030 targets (or sooner), a 2050 target, and intermediate goals for every year from 2030 onwards.

### **Sustainable Mobility for All: Sustainable Electric Mobility: Building Blocks and Policy Recommendations (WBG, GIZ, TUMI, UITP), 2021**

Sustainable Mobility for All (SuM4All)<sup>23</sup> is a multi-agency platform for international cooperation on transport and mobility, comprising 55 public organizations, MDBs (including the WBG and the IDB), private companies, intergovernmental organizations, and civil society seeking a transition towards e-mobility. In a document published this year, they analyzed the main barriers to electric mobility development, identified essential building blocks for successful public policies in the field of electric mobility, and provided policy recommendations.

SuM4All proposes seven building blocks with recommendations for MDBs, countries, and companies to advance the electrification of transport:

- **Building momentum:** The deployment of sustainable electric mobility requires the motivation and alignment of multiple actors, suppliers, operators, consumers, regulators, and institutions.
- **Raising awareness:** a narrative based on transparent information and multi-stakeholder engagement.
- **Setting the right policy framework:** regulating the market and stimulating action. The development of sustainable electric mobility requires a suitable policy and regulatory framework to authorize and stimulate the sale and use of all types of electric means of transport, set appropriate incentives, and support the provision of charging facilities, space, and services. A clear and appropriate legal framework is essential to stimulate important private sector investment.

- Financial incentives for purchase and use are helpful, but the most effective incentive is to prioritize the necessary infrastructure and services — public transport level of service and prioritization and safe cycling and walking infrastructure.
- Supporting the industrial transformation necessary to transform mobility systems and capture potential economic benefits requires specific attention.
- Integrating mobility and energy policy for mutual benefit.
- Pilot projects: the benefits of local experience.
- Providing knowledge: capacity building and exchange of experience.
- Developing the financing tools: financing mechanisms and business models fit for purpose.

### **IEA World Energy Outlook 2021**

IEA's yearly Energy Outlook report,<sup>24</sup> released in October 2021, mentions that transport continues to have the highest level of reliance on fossil fuels of any sector and accounts for the highest CO<sub>2</sub> emissions from end-use sectors (7.1 Gt in 2020). The report mentions that 15 percent of total energy emissions today come from road transport.

IEA argues that "one of the major reasons behind higher emissions is strong demand growth from emerging markets and developing economies, many of which do not have net zero pledges." As an example, IEA mentions that 40 percent of global car sales in 2030 will take place in developing economies without pledges.

IEA highlights that "EV's are already competitive with ICE vehicles on a total cost of ownership basis," but they face non-economic barriers, especially in developing economies. One of the key elements is that those economies rely heavily on second-hand markets, and heavy duty vehicles need an extensive network of fast charging points and consolidated electrical grids. IEA estimates that the global electric fleet could effectively reach over 250 million by 2030.

To achieve positive goals, IEA calls for increased finance in the transport sector, especially in the developing world. Finance for clean energy transport should rise from the current \$75 billion to \$380 billion (or \$570 by 2030 depending on different scenarios IEA has built). It mentions that "the scale of this increase requires a rapid growth in low interest debt

financing and risk capital equity investment across all types of zero-emission vehicles and charging infrastructure.” IEA stresses that it is “essential for governments to set clear targets for the deployment of EV charging infrastructure and EVs.” It adds that the electrification of transport in emerging markets, and developing economies, in particular, depends on support for manufacturing to drive down costs, as well as on new measures to boost demand through, for example, government procurement and dedicated credit lines for consumer lending. It calls on MDBs and other financial institutions to “lend support by expanding concessional loan programs to consumers and business owners for EV chargers at a below-market rate.” Other policy options include supportive tax incentives to enable manufacturers and operators to lower costs of EV charging installation and operation

## US guidance on Fossil Fuel Energy at the MDBs, 2021

In August 2021, the United States Treasury Department issued Fossil Fuel Energy Guidance for MDBs,<sup>25</sup> itself a key aspect of implementing President Biden’s Executive Order 14008 which addresses how the US will use its voice and vote as an MDB member. The US policy advocates that MDBs must not finance fossil fuel projects. The US opposition to MDB financing for coal and oil projects — with certain exceptions regarding decommissioning and backup — also includes upstream fossil gas projects. They vowed only to support midstream and downstream fossil gas projects if the projects met IDA-eligibility; if analysis demonstrates that there is no economically and technically feasible alternative; if the project has significant impact on energy sector, access, or development; and if the project is aligned with Paris Agreement goals. Policy-based operations would be opposed if they support fossil fuel activities, and the US would consider activities that indirectly support these activities on a case-by-case basis. The US would also oppose all investment to intermediaries or companies where they could reasonably determine that the funds would be used for non-compatible investment projects.

## China and WBG’s case study: Electrification of public transport, 2021<sup>26</sup>

China is the world’s largest energy consumer and carbon emitter. In September 2020, the Chinese president announced China’s aim to have CO<sub>2</sub> emissions peak before 2030 and to achieve carbon

neutrality before 2060. According to WBG, China is the only economy worldwide that has implemented large-scale electrification of city buses, accounting for 98 percent of the global electric bus stock and 95 percent of the global stock of dedicated bus chargers.<sup>27</sup> WBG says that this rapid technology transition was driven by strong policies supporting local governments with experimental innovations and lessons from pilot projects that were scaled across the country.

The WBG, along with Shenzhen Bus, the China Center for Energy and Transportation and the China Development Institute, released a case study on the implementation of electric bus systems in the city of Shenzhen. Shenzhen reportedly became the first city in the world that fully electrified its urban transit fleet with 16,359 electric buses. In addition, Shenzhen is also approaching the goal of fully electrifying its fleet of 21,609 taxis — 99 percent electrified at the end of 2019 with 21,485 electric taxis.

The WBG report highlights some positive lessons learned from this experience:

- The transition to electrification requires coordination and policy synergy across different levels of governments as well as different departments within the governments.
- An e-bus transition is “only financially viable with subsidies.”
- Shenzhen’s success in electrifying its entire bus fleet in a short period of time was a joint effort by private and public entities. Private players especially in vehicle manufacturing, charging, and new technology are also critical.
- The government mandate to shift completely to clean energy buses, accompanied by generous national and local government subsidies that significantly lowered the upfront cost, supported the fast and full electrification of the bus fleet in Shenzhen.
- The key challenge for electric bus adoption around the world is its short term high capital cost. Even with sizable national and local government subsidies, the upfront cost of electric buses is still much higher than conventional buses. Shenzhen introduced a financial leasing model using a financial leasing company.
- The prerequisite of charging infrastructure is one of the main operational differences between diesel and electric buses.

## NGOs Recommendations on the implementation of MDBs Building Blocks on CC, 2020

In 2020, the NewClimate Institute, Germanwatch, and the World Resource Institute submitted to the UNFCCC a series of documents,<sup>28</sup> financed by the German Government, containing recommendations on how MDBs could operationalize their Paris alignment, based on the MDBs' Climate Finance Building Blocks.

*Principle 1:* Alignment with mitigation goals. This building blocks sets a basic list of considerations for the development of general strategies, which includes: The definition of positive and negative lists for global pathways and sectors, the development of specific criteria for sectors, the definition of criteria for policy lending, and the provision of inputs for long term strategies.

Recommendations:

- Combine a clear target for net-zero carbon dioxide emissions around 2050 with sector and project specific considerations.
- Develop sector-specific criteria for Paris alignment independent of countries' responsibilities and capabilities since MDBs should aim to close any gaps in capacity.
- Develop criteria for Paris alignment that reflects the project context.
- Ensure consistency of a Paris alignment definition across different approaches and banks.
- Ensure full consistency of the mitigation finance tracking methodology with the definition of Paris alignment.
- Build up a joint database for available information on global and sector pathways and countries' circumstances.

*Principle 2:* Adaptation and climate-resilient operations. The MDBs would be active in managing physical climate change risks in a manner consistent with climate-resilient development and in identifying opportunities to make operations more climate-resilient.

Recommendations:

- Adopt a harmonized multi-step quantitative process for new medium- and high-risk

projects that incorporates climate risk and adaptation options in project financial and economic analysis, and set a date by which all new projects will be analyzed.

- Adopt a common set of emission scenarios, timeframes, and climate models to be used in climate risk analyses.
- Adopt adaptation and resilience metrics that allow MDBs to track and report on the results and effectiveness of adaptation finance activities.

*Principle 3:* Accelerated contribution to the transition through climate finance. MDBs should strive to actively support low-emissions and climate-resilient development pathways by increasing climate finance. MDBs would go beyond current efforts to (i) prioritize, target, and report on climate finance, (ii) mobilize private sector investments, (iii) support clients' access to concessional finance, including for leveraging private capital, and (iv) provide the needed technical assistance for climate action.

Recommendations:

- MDBs should update their eligibility criteria to exclude fossil fuel-related investments from being labeled as climate finance.
- MDBs should ensure joint reporting on aggregate volumes and impacts, and should provide links to their individual databases to ensure traceability of climate finance comparable climate impact and risks information at activity level.
- MDBs should consider setting additional climate finance targets.
- MDBs could additionally increase private climate finance mobilization by partnering directly with institutional investors.
- Private climate finance mobilization data should be provided on a more disaggregated level.
- MDBs should allocate sufficient technical assistance to non-environment ministries to increase their understanding of climate change and Paris-aligned solutions.

*Principle 4:* Engagement and policy development support. Support shared principles for economy-wide LTSs and NDC enhancement in country

engagement and particularly in the development of MDB country strategies.

Recommendations:

- Further elaborate their shared principles for economy-wide LTSs.
- Champion LTS and NDC enhancement in country engagement and particularly in the development of MDB country strategies.
- Consistently use policy-based finance in ways that help countries transition to low-carbon climate resilient development pathways.
- Scale up dedicated support platforms to provide more support to more countries.
- Develop policies and strategies to convince actors that they lend to or invest in to define their own long-term decarbonization targets.
- Encourage and support other clients to adopt ambitious decarbonization targets.

*Principle 5: Reporting.* Develop tools and methods for characterizing, monitoring and reporting, and harmonize approaches when possible.

Recommendations:

- MDBs should disclose their assessment of climate-related risks and opportunities as well as climate impacts of all activities, scenario analyses, and strategy.
- Risk and impact management.
- Provide detailed recommendations on metrics to disclose.

*Principle 6: Align internal activities.* MDBs would progressively ensure that our internal operations, including facilities and other internal policies, are also in line with the objectives of the Paris Agreement.

Recommendations:

- Treat MDB infrastructure as a source of GHGs. Only invest in the best available technologies for appliances and buildings.
- Replace carbon intensive or inefficient infrastructure and appliances, e.g., fossil-fueled cars and inefficient buildings.
- Invest in onsite renewable energy, and where insufficient, procure it from elsewhere.

- Create an enabling environment for staff.
- Develop an approach for Paris-aligned investments for employee pension funds.
- Move from an offsetting approach to a “contribution claim approach.”

## Methodology: Description of the classification categories

This section will describe the categories built for this research, which will later be used to analyze the projects in the following section.

This research was done on an ex-ante basis, considering project information documents, environmental impact assessments, and other documents drafted in the preparation phase (approved by the MDBs before project's implementation). Only one additional database was considered in the case of the IDB, where project documents were complemented with available official Awarded Contracts.

The following categories will be used to analyze the data:

- ICE vehicles
- Policies that finance the production of ICE and their parts
- ICE infrastructure
- ZEVs

The a priori assessment has some limitations as the high level of abstraction in which projects are worded usually leaves out specific and explicit

consideration of ICE or ZEV technologies. For this reason, we developed an "ICE intensive" category that will be used to classify projects that do not specifically mention this technology, but in which we could infer its procurement, utilization, and/or maintenance (e.g., large infrastructure construction works, rural and urban roads construction, large farming projects, logistics and distribution). This also applies for several projects that involve private contractors and, in those cases, no information about the type of technology used is mentioned in the project documents. This classification as "ICE intensive" does not necessarily imply that fossil fuel technologies will be used in all phases of the project life. For example, for road construction projects, we will consider the use of ICE machinery in the construction, even if those roads could later be used by any transport technology.

An additional category was considered for projects or policies that do not consider ZEV technology specifically, but which finance sustainable energy that could support e-mobility (e.g., solar panels, wind energy generation). These categories are not mutually exclusive; most projects are complex and formed by multiple sub-components, which might contain two or more technologies (e.g. the construction of a port that uses solar panels). These projects will be considered in two or more categories.

## PROJECT CATEGORIES IN RELATION TO ICE / ZEV TECHNOLOGIES

**Category 1.** Projects or Development Policy Operations (DPOs) that explicitly and directly finance the procurement, maintenance, and repair of ICE vehicles.

**Category 2. ICE intensive sectors;** projects linked to fossil fuel technology that lack specific information on ICE/ZEV technology. It describes projects and DPOs that are potentially, or even ostensibly, beneficial to ICE vehicles or related infrastructure. This category Includes: large infrastructure/construction, logistics, food distribution, large agriculture, large animal farms, large industries, tourism and hotel construction. It does not include small projects in the health sector, finance, agricultural cooperatives, or small agriculture, education, or intermediaries.

**Category 3.** Projects or DPOs that directly finance **commercial or government activities that play a necessary or intentional role in the above.** This may include, inter alia, production of ICE vehicle components, materials, and other value-added products used in the ground transport sector.

**Category 4.** Projects or DPOs that directly finance construction, procurement, maintenance, and repair of **infrastructure** that serves, as its main purpose, to support the operation of ICE vehicles or any of the categories above. This may include fuels production, refining or transport, pipelines, fueling stations, or other infrastructure that would not be used by ZEVs.

**Category 5.** Support for the ICE that is **not self-evident** and/or not measured as such in public documents. Such support may include DPOs where analysis might be needed to demonstrate how the support is effectively utilized.

**Category 6. Positive examples of WBG and IDB support for ZEVs.** These may include direct support of zero emissions passenger, commercial, or mass transit vehicles. Such support could also include indirect, though intentional, support for ZEVs in the form of relevant updates to electric grid infrastructure, plug-in stations for Battery Electric Vehicles (BEVs), or any other aspect of the EV sector.

**Category 7.** Funding for **renewable energy** that could be considered ZEV-related technologies. Solar panels, wind generation, etc.

Notes:

1. ZEV technology includes e-mobility, as well as other non-zero emissions energy sources, such as hydrogen, solar, and other near-zero GHG technologies. It considers different types of vehicles, such as two and three wheelers, cars, trucks, trains, and other machinery.
2. ZEV does not include hybrid EVs such as cars or trains, which are powered by both internal combustion engines and electric motors.
3. Production of ethanol and the use of fossil gas are classified as ICE infrastructure technology.
4. In case of car and car-parts production, they will be classified as ICE unless otherwise specifying the use of ZEV technology.
5. Technology firms that provide assistance to logistics (e-sharing and logistics software platforms) will be classified as “not specified.”
6. Cases in which the wording “sustainable” or “green bonds” are used without further specification will be considered “not specified.”
7. The expansion or time extension of a project, which has a new document in the database, will be considered as a new project.
8. Large infrastructure projects (including hydroelectric dams) will be considered ICE intensive because of the use of ICE machinery in the construction phase.

# Discussion of findings

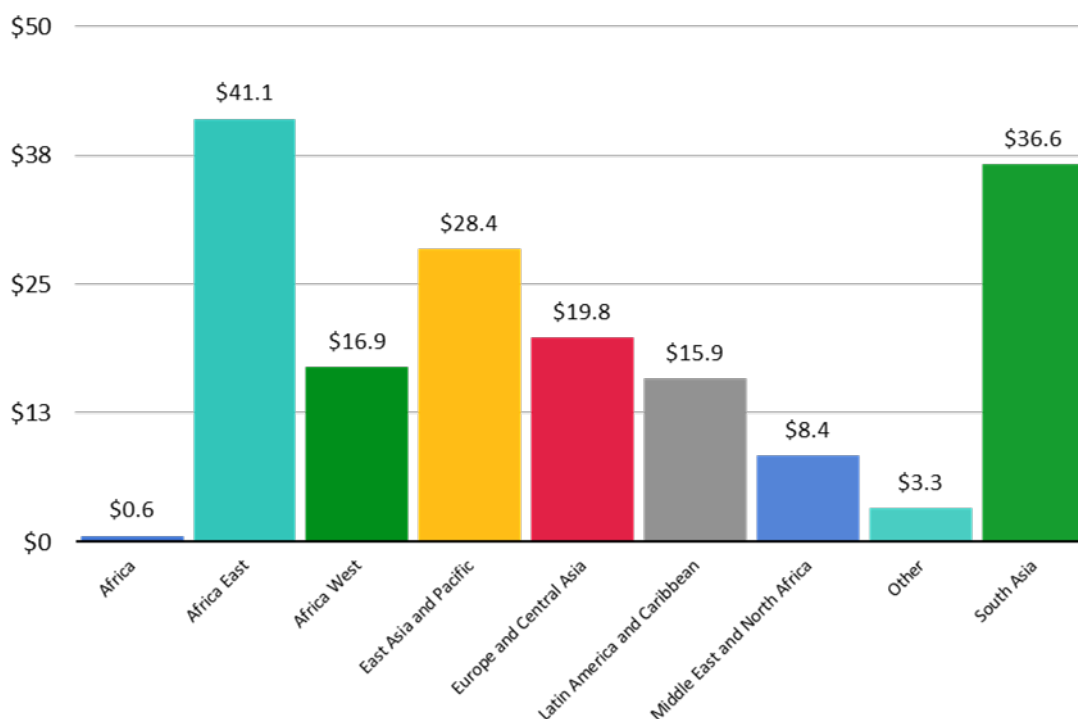
## WORLD BANK FINDINGS

The official database of IBRD/IDA, the public sector arm of World Bank, includes all the “active” documents approved between January 1, 2017 and September 21, 2021 that are likely to include transportation elements.<sup>29</sup> The selection amounts to 1,127 projects. All the numbers in this section will be expressed in US dollars (\$). The projects could be classified in two or more categories simultaneously.

### Total IBRD/IDA projects in DB by region

Chart 1 shows the volume of funds from IBRD/IDA for development projects. More than a third of the funds are allocated to Asia (\$65 billion) and Africa (\$58.5 billion, without considering North Africa and the Middle East). These funds include IDA.

Chart 1. Total IBRD/IDA projects per region, in \$ billions

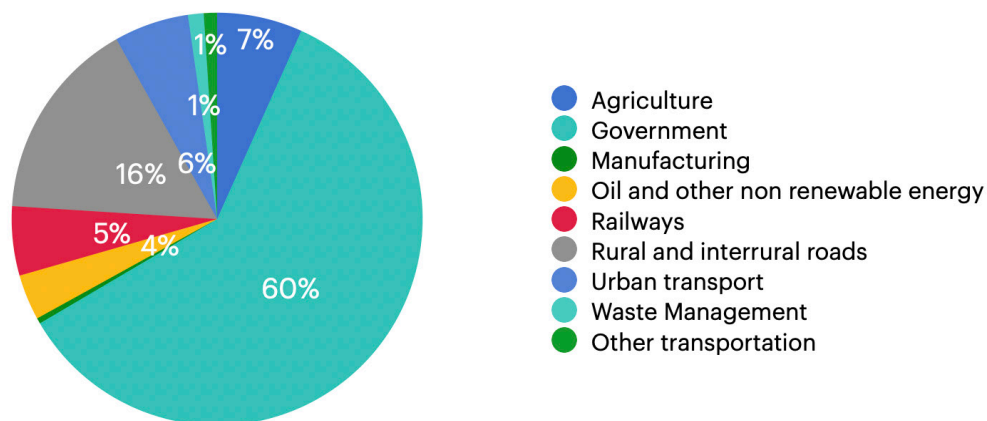


Region	Africa	Africa East	Africa West	East Asia and Pacific	Europe and Central Asia	Latin America and Caribbean	Middle East and North America	Other	South Asia	Total
Nr of projects	5	194	227	184	149	161	56	4	147	1127
Amount (IBRD + IDA), in \$ billions	\$0.6	\$41.1	\$16.9	\$28.4	\$19.8	\$15.9	\$8.4	\$3.3	\$36.6	\$168

## Total IBRD/IDA projects by sector

The categories for this analysis are based on IBRD’s own categories. Each project in the database has three sector categories. For this section, we considered only the “Sector 1” or main sector description. Evident on the chart below, a large share of the funding (60 percent) was allocated to government modernization and spending. This includes all national and subnational governments, and a large number of categories (which include public transport, waste management, etc.). The second largest share of funds was for Rural and Inter-rural Roads (16 percent), a category that is considered to be predominantly ICE / ICE Intensive. Under Agriculture, there are also a number of projects which fund ICE technology.

**Chart 2: Total IBRD/IDA funds by sector (2017-2021) on selected categories**

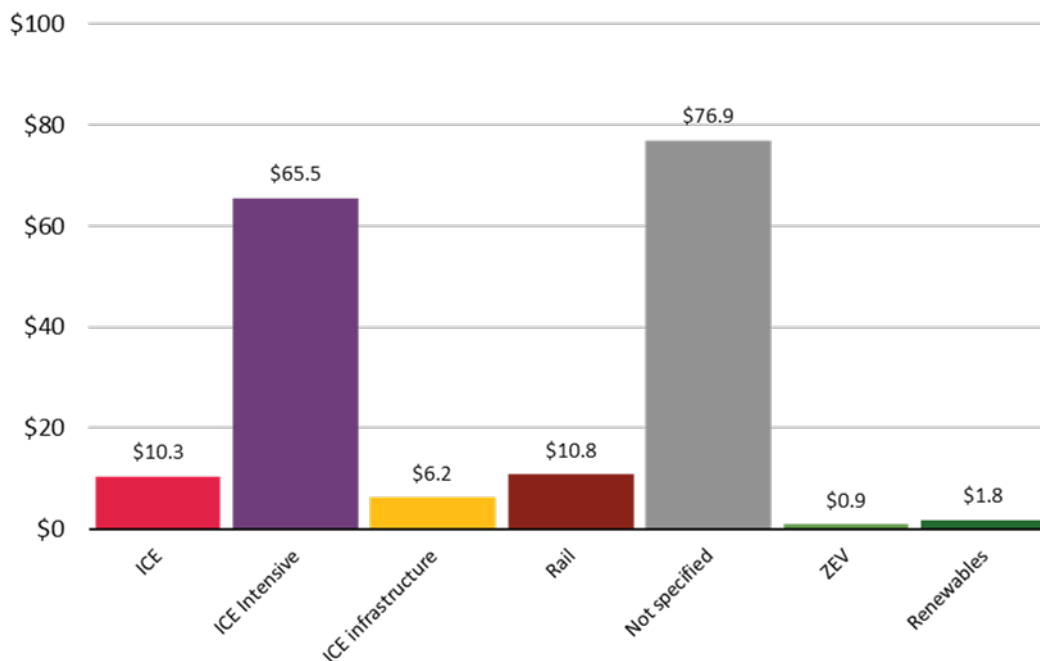


Sector	Agriculture	Government	Manufacturing	Oil and non renewables	Railways	Rural and inter-rural roads	Urban transport	Waste Management	Other transportation	Total
No. of projects	138	726	7	15	15	156	43	21	8	1129
Amount (in \$ billions)	\$11.2	\$100.3	\$0.7	\$6.0	\$9.1	\$26.5	\$9.8	\$2.0	\$1.7	\$167.3
Percentage	6.7	59.9	0.4	3.6	5.4	15.8	5.9	1.2	1.0	100.0

## Projects by ICE/ZEV technology

A total of 1,127 project documents were selected from the IBRD/IDA database for this research, with a value of \$167.7 billion. Based on their project descriptions and components, we were able to classify them according to the categories in Product 2. From the total amount of funds, 6.15 percent was allocated to ICE projects (10.3 billion), 39 percent for ICE intensive technology (\$65.5 billion), 3.7 percent for ICE infrastructure (\$6.1 billion), 45.9 percent as not specified (\$76.9 billion), and 6.4 percent was for Railways (\$10.7 billion). Only 0.6 percent was allocated for ZEV projects (\$0.9 billion) and 1.1 percent for renewable energy and environment projects (\$1.8 billion).

**Chart 3: Total funding of IBRD/IDA funds by technology, in \$ billions**

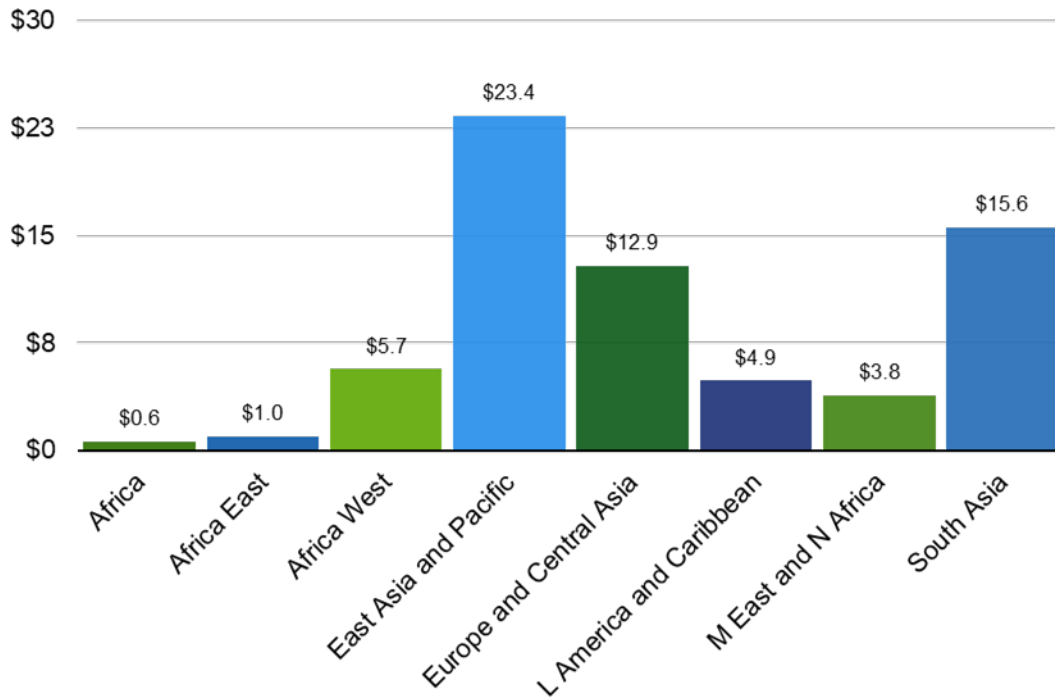


	ICE	ICE intensive	ICE infrastructure	Rail	Not specified	ZEV	Renewables
No	85	359	19	16	641	4	26
Amount (in \$ billions)	\$10.3	\$65.5	\$6.2	\$10.8	\$76.9	\$0.9	\$1.8

## Allocation of ICE funds by region

The largest amount of ICE funds was allocated to East Asia and Pacific (34 percent), followed by Africa East (23 percent) and Europe and Central Asia (19 percent)

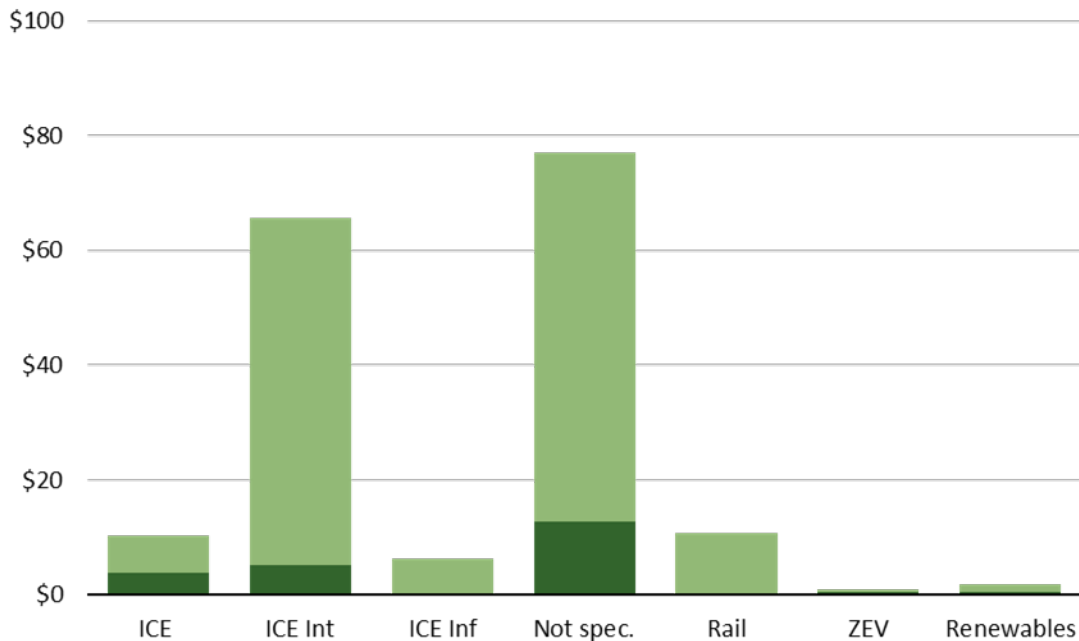
Chart 4: Funds for ICE/ICE Intensive/ICE Infrastructure by regions in \$ billions



## ICE in IBRD / IDA countries

In chart 5 we can observe the amount of funds allocated to the IBRD for IDA and non-IDA countries by type of technology. Non-IDA funds account for 84.4 percent of the total funding. In the case of ICE purchases, it reaches 59.3 percent and 8.5 percent in ICE intensive. ICE infrastructure in IDA comprises only 4.5 percent of the funds.

**Chart 5: Funds by IBRD/IDA by type of technology (in \$ billions)**



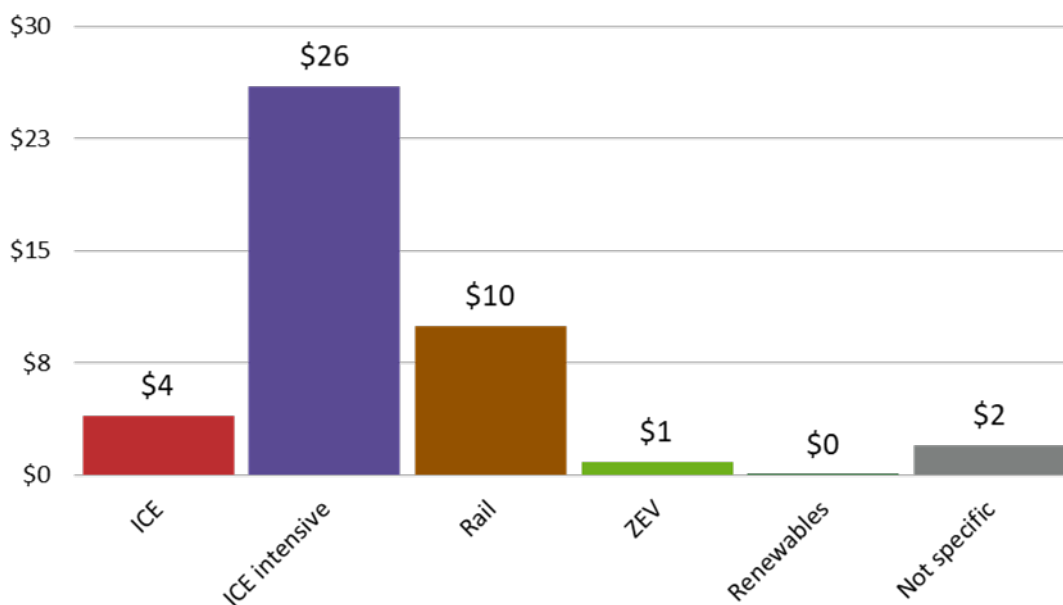
	IDA	IBRD (non-IDA)
ICE	\$3.9	\$6.5
ICE intensive	\$5.2	\$60.4
ICE Infrastructure	\$0.3	\$5.9
Not specified	\$12.7	\$64.3
Rail	\$0.0	\$10.8
ZEV	\$0.5	\$0.4
Renewables / environment	\$0.4	\$1.4
<b>Total</b>	<b>\$22.7</b>	<b>\$145.1</b>

## IBRD funds in the transport sector

All projects in the database have tags in three different sectors. For this “transport” section, we will consider all projects that were tagged with a transport category (Urban Transport, Public Administration Transportation, and Other Transportation) in any of the three sector categories.

As seen on Chart 6, more than two thirds (69.1 percent) of the total funds for the transport sector are allocated to ICE or ICE intensive projects and policies (\$30.7 billion). Only 2.1 percent of the total funds are financing ZEV technologies (0.9 billion).

**Chart 6: IBRD vehicle/machinery technology used in transport sector, in \$ billions**

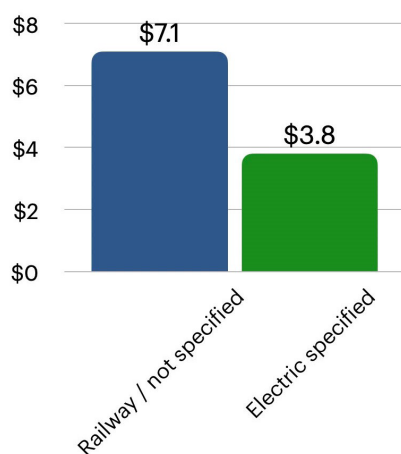


Vehicle / Machinery equipment	ICE	ICE intensive	Rail	ZEV	Renewables	Not specified	Totals
No. of projects	27	157	16	4	1	14	216
Amount of IBRD/IDA funds (in \$ billions)	\$4.0	\$26.6	\$10.7	\$0.9	\$0.0	\$2.1	\$44.4

## Rail infrastructure and vehicles

Railways are considered in a special category, as the construction of infrastructure could be used by both ICE and ZEV technologies. There are a total of 16 projects for funding railway systems in the database (\$11.0 billion). Four projects for electrified rail (\$3.8 billion), and 12 projects were not specified (\$7.1 billion, not mentioned), including two projects with purchases of equipment.

**Chart 7: IBRD Railway projects by type of technology ICE/ZEV (in \$ billions)**



Project ID	Country	Total IDA and IBRD Commitment (In \$)	
P175138	Argentine Republic	\$382,767,500	Railway - electric
P170868	Republic of Serbia	\$125,000,000	Railway - electric
P175137	Arab Republic of Egypt	\$681,100,000	Rail - train equipment
P173424	Republic of Colombia	\$ -	Increases share of renewable energy in electricity network
P170532	Republic of Turkey	\$ -	Rail
P165300	Republic of Colombia	\$4,400,000,000	Railway - electric
P158756	Republic of Ecuador	\$632,200,000	Rail
P161122	Bosnia and Herzegovina	\$149,191,750	Rail
P161393	Argentine Republic	\$ -	Rail
P150158	Republic of India	\$1,107,000,000	Rail
P147499	Republic of Croatia	\$200,700,000	Rail
P127241	United Republic of Tanzania	\$300,000,000	Rail
P144489	Republic of Ecuador	\$1,684,164,012	Railway - Electrified - Expansion metro works
P129594	Democratic Republic of the Congo	\$180,000,000	Rail
P125630	Federative Republic of Brazil	\$600,000,000	Railway - electric
P117356	Arab Republic of Egypt	\$340,000,000	Rail

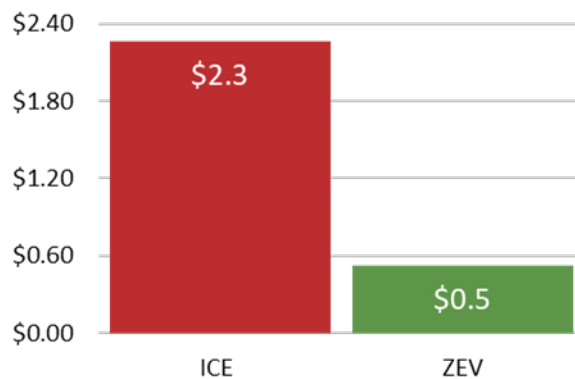
## Bus transport / BRT

There are a total of 14 buses and/or bus rapid transport (BRT) systems in the database, for a total of \$2.8 billion. From that total, 12 are ICE or unspecified technology (\$2.2 billion), whereas two projects funded buses that included electric buses for \$0.6 billion.

IBRD list of ZEV bus projects:

- \$540 million (Republic of Cote d'Ivoire P167401)
- \$0.98 million (design of e-bus projects in Brazilian cities - P169272)

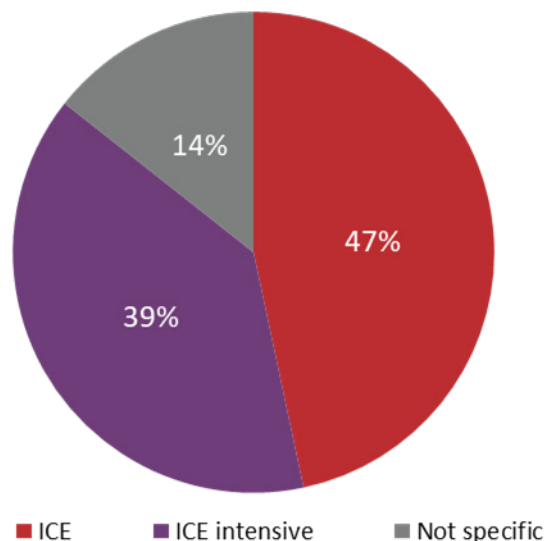
**Chart 8: Funds allocated for Buses BRT by ICE / ZEV, in \$ billions**



## Waste and water management

Waste management is one of the largest sectors of IBRD/IDA investments, with 80 projects totaling an amount of \$10.8 billion. From that amount, \$7 billion can be considered ICE purchases (\$0.59 billion, ICE; \$6.4 billion, ICE intensive), while \$3.5 billion are non-specified. A significant number of funds were allocated for truck purchases for waste management.

**Chart 9: Funds for waste management and water infrastructure, by type of technology**



Project Id	Country	Total IDA and IBRD Commitment	
P162151	Republic of the Union of Myanmar	\$0*	Natural gas and steam turbines in the Ywama power plant with a “highly-efficient CCGT”
P172109	Islamic Republic of Afghanistan	\$0*	Natural gas plant - construction
P162727	Republic of Turkey	\$2,735,000,000	Expansion of fossil gas underground storage
P163563	Islamic Republic of Mauritania	\$20,000,000	Provide technical assistance to oil development
P146206	Republic of Uzbekistan	\$140,000,000	Natural gas equipment upgrade - construction
P161683	Republic of Mozambique	\$29,000,000	Mining cadaster - purchase of machinery, vehicles
P160652	Republic of Senegal	\$29,000,000	Development of oil production - This activity intends to support government’s effort to develop an oil and gas policy, articulating how the country will manage the sector (upstream, midstream, and downstream) and assess the share of future oil and gas production that could be delivered to shore
P154127	People's Republic of Bangladesh	\$205,210,000	335 MW of gas-fired combined cycle capacity
P146007	Arab Republic of Egypt	\$1,473,900,000	Construction of fossil gas connection for households
P133565	Republic of Turkey	\$789,100,000	Natural gas construction
P133445	Republic of Liberia	\$35,000,000	Construction of oil infrastructure
P093765	Republic of Turkey	\$538,000,000	Natural gas infrastructure construction

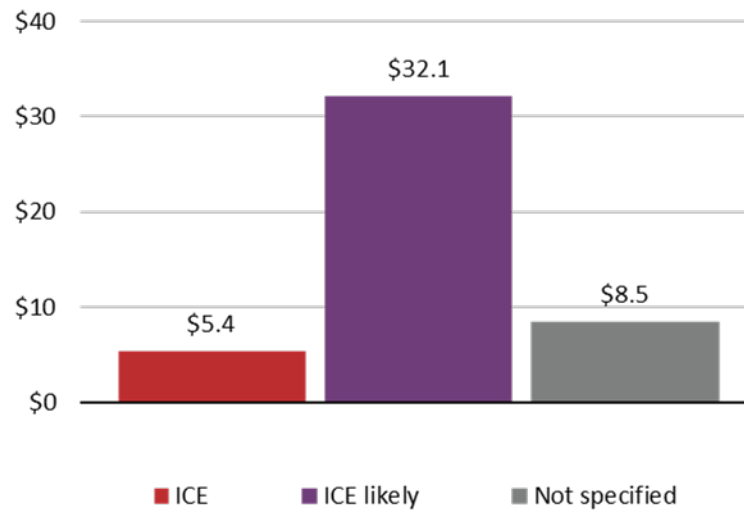
\* The database noted no budget, which may reflect that it has not been finalized.

## Agriculture/Road infrastructure linked to agriculture

There are a total of 360 projects related to agriculture and rural roads' infrastructure in IBRD/IDA's database for a total of \$47 billion. From that total, ICE purchases amounted to \$5.44 billion (49 Projects), ICE intensive projects to \$32.13 billion (197 projects) and not specified \$8.5 billion (106 projects).

A large number of ICE Intensive projects are linked to road construction in rural areas.

**Chart 10: IBRD Funding in agriculture/non-urban roads**



## Renewable energy

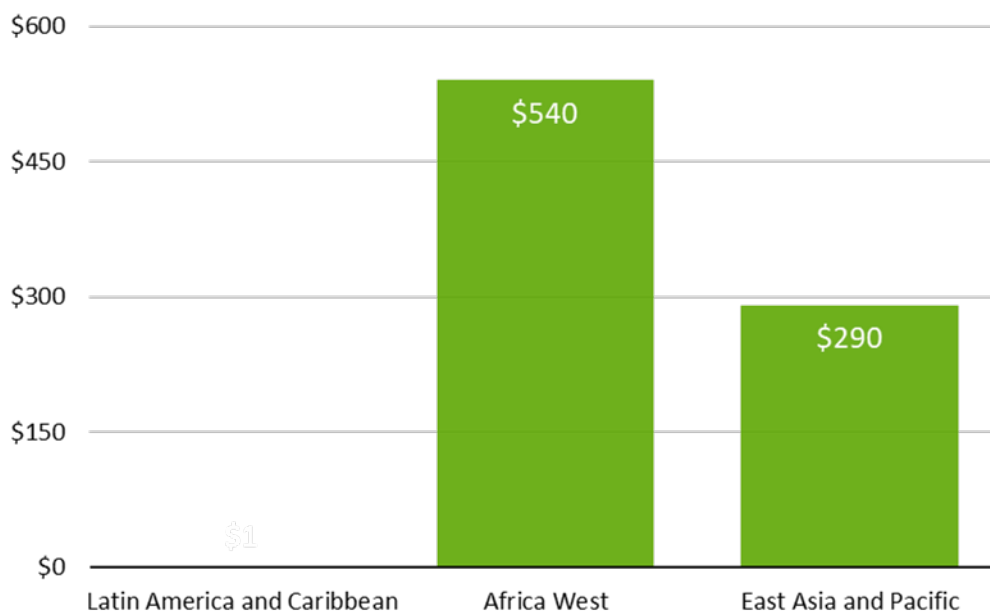
Renewable energy totals a number of 23 projects for \$1.76 billion. No projects under this category are specific to ZEVs, many of them are smaller elements of other larger infrastructure projects (e.g., the installation of a solar roof in buildings).

Project ID	Total IBRD/IDA commitment	
P172439	\$ -	Project aims to increase solar power as total of national generation. Promote private investors in solar technology
P174736	\$6,900,000	Rehabilitation of hydropower - considers it renewable energy.
P172974	\$1,500,000	Solar panels - pilot station
P168211	\$ -	Hyropower plant
P149990	\$35,000,000	Solar panels on buildings
P164354	\$ -	Energy transmission infrastructure
P170132	\$31,700,000	Energy transmission infrastructure
P169051	\$795,480	Climate policy communication
P149239	\$8,000,000	Installation of renewable energy minigrids
P167914	\$ -	Pilot solar rooftops
P161540	\$22,500,000	Solar panel in maritime port construction
P162580	\$ -	Solar park planning
P155859	\$550,000	Technical assistance
P163568	\$121,500,000	Solar plant
P160910	\$34,000,000	Battery solar system
P163358	\$3,991,436	Wood energy generation
P161757	\$4,800,000	Solar panels for water supply
P161319	\$240,480,000	Hyropower plant
P161644	\$6,250,000	Geothermal project
P154440	\$27,050,000	Market development
P155226	\$34,950,000	Hydro plant
P130623	\$131,250,000	Agriculture regulations and finance - Solar panels
P130174	\$1,044,550,000	Hyropower plant

## Summary of IBRD's support for ZEV

The following chart represents the geographical distribution of IBRD's finance for ZEV projects. One large project in Côte d'Ivoire received \$540 million in financing, two projects to China received \$290 million, and one project in Brazil received \$0.9 million.

**Chart 11: ZEV projects by region, in \$ million**



Project No	Region	Country	Amount in \$ millions	Description
P169272	Latin America and Caribbean	Federative Republic of Brazil	\$0.9	BRT Electro buses
P167401	Africa West	Republic of Cote d'Ivoire	\$540	BRT system - electrical buses
P159883	East Asia and Pacific	People's Republic of China	\$166	Strategy to promote green freight transport
P148129	East Asia and Pacific	People's Republic of China	\$224	Infrastructure - Green transport - bicycle sharing

## Findings from IBRD/IDA

Our assessment of the IBRD/IDA projects and policy lending operations suggests:

Regarding reporting:

- The WBG publishes an extensive project database on their webpage; however, it takes a significant amount of time and effort to produce aggregated information.
- Only a partial amount of data is exported automatically, while important information (e.g., Project components) have to be opened from each project separately.
- There is no automated Business Intelligence (BI) system to produce statistics based on WBG's database.
- IBRD/IDA provide information on the purchase plans of their projects; however, each has to be opened separately, and each project could involve multiple purchases.
- A website dedicated to WBG's Corporate Procurements, does not provide information on vehicle purchases.

Regarding considerations about the use of ICE/ZEV technology:

- There are no specific fields of information indicating the use of ICE or ZEV technology in projects.
- There are a significant number of ICE equipment purchases in projects that provide no detail about the possibility of ZEV alternatives, as requested by WBG's Environmental and Social Standards.
- There are no projects or development policy lending specifically dedicated to the development of ZEV research and innovation, or for the development of basic infrastructure for the decarbonization of private transportation.
- Concepts like "sustainable" are often used to report ICE purchases as a "modal shift" from more polluting technologies.
- Some projects mention "green funds" or "sustainable finance" without detail on the machinery or equipment that those projects would purchase.

Regarding ICE/ZEV project finance amounts:

- From the total amount of IBRD/IDA funds, 48.9 percent were allocated to ICE/ICE Intensive technology, 45.9 percent as not specified, and 6.4 percent was for Railways, while only 0.6 percent was allocated for ZEV projects and 1.1 percent for Renewable energy.
- More than two thirds (69.1 percent) of the total funds for the transport sector are allocated to ICE/ICE Intensive projects and policies. Only 2.1 percent (in two projects for bus purchases) are financing ZEV technologies for the road sector.
- A minority of road infrastructure projects (only six projects in the entire database) mention the construction of bicycle lanes. However, this information does not seem to be integrated or be a pillar of special consideration for project design.
- Most projects dedicated to agriculture, totaling \$47 billion, either directly or indirectly, finance ICE technology.
- Renewable energy totals a number of 23 projects for \$1.76 billion. No projects under the renewable energy category are specific to ZEVs.

## USE OF ICE AND ZEV TECHNOLOGY IN IFC PROJECTS

The IFC provides up to date information on its website about the projects it finances in the private sector. Its Project Information and Data Portal provides additional functionality for processing, as well as basic data on long-term commitments by sector and region. Its Search Engine allows for an automatic export of main project information, which includes the project description and some information regarding environmental impact assessment of their projects.

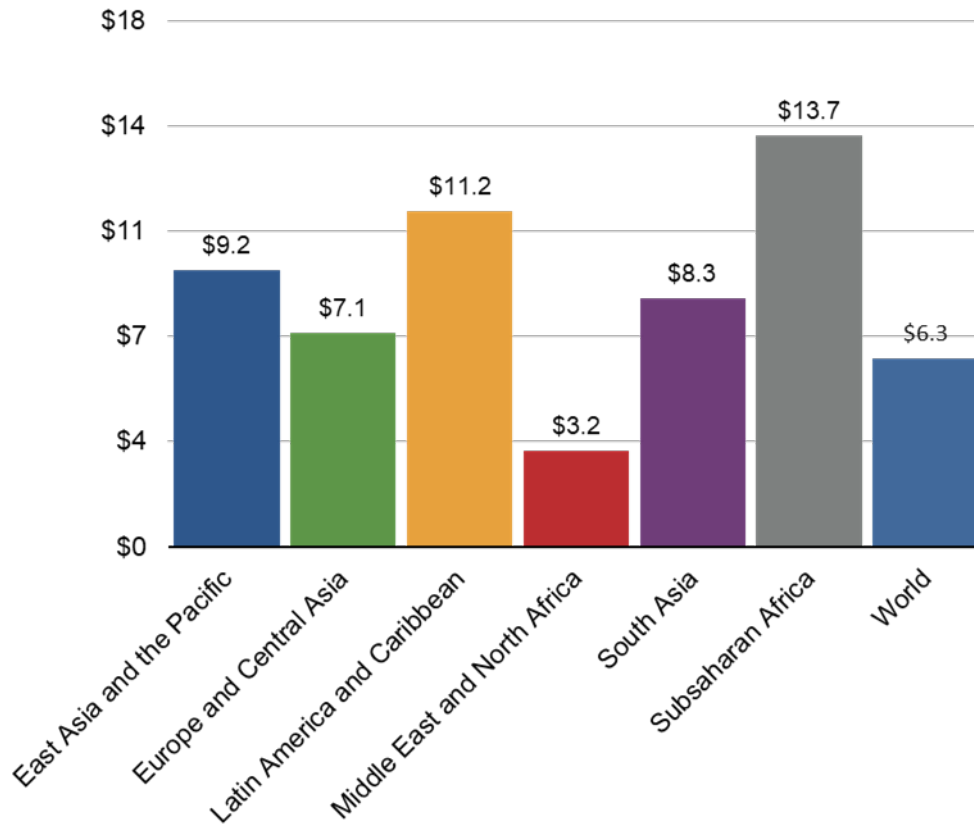
For this research, we will use the complete database of IFC projects filtered by "Active Investment Projects (Summary of Investment Information) and Environmental Documents," from between January 2017 and September 2021.

The database includes 1,534 documents, of which 1,063 are categorized as Summary of Investment Information, and the remaining 471 are Environmental Assessment Documents. The total funds accounted for in the database amount to \$58.9 billion.

## IFC projects and amounts per region

Chart 12 indicates that, similarly to IBRD, most IFC funds are directed to projects in Sub-Saharan Africa, Latin America and Caribbean, and East Asia.

**Chart 12: IFC projects by region, in \$ billions**

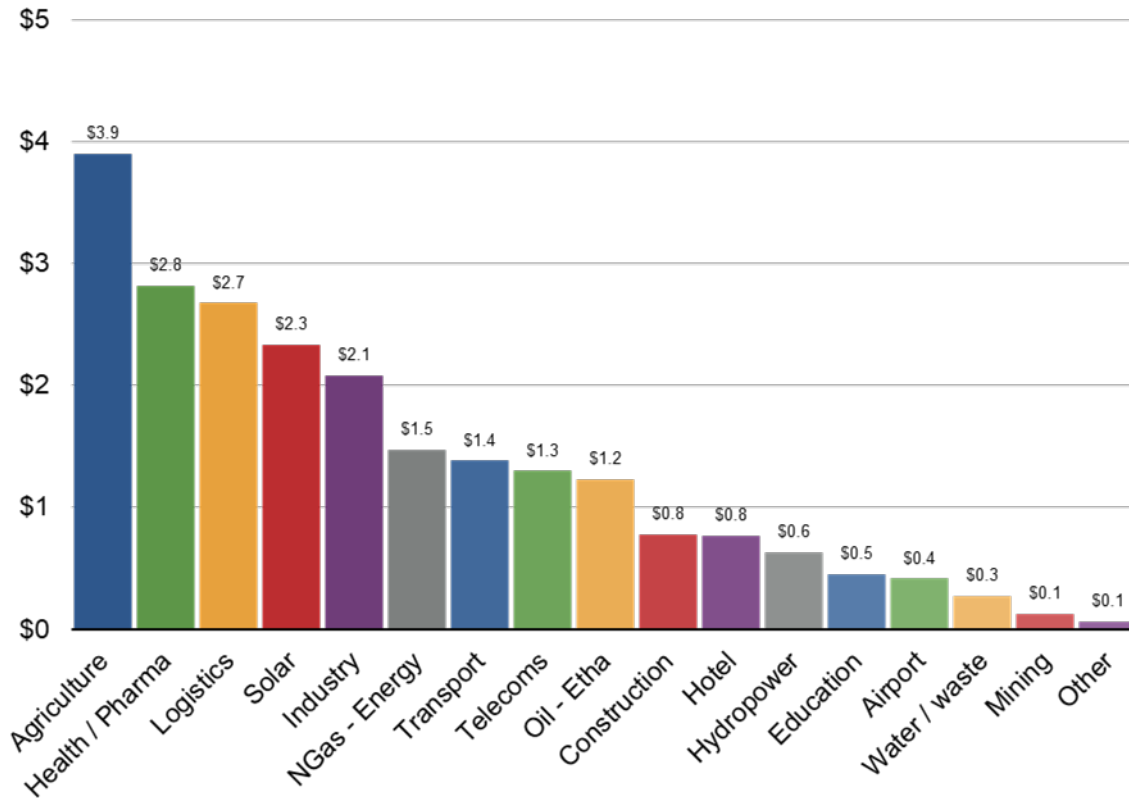


Projects per region	East Asia and the Pacific	Europe and Central Asia	Latin America and Caribbean	Middle East and North Africa	South Asia	Subsaharan Africa	World
\$ in billions	\$9.2	\$7.1	\$11.2	\$3.2	\$8.3	\$13.7	\$6.3
No	165	131	194	78	180	234	66

## Amounts by sector

The IFC has more than 100 categories to classify their project sectors. Based on their description, we summarized them to 18 simplified categories. The IFC's largest share of funds are used for financial intermediaries. Second, with 9 percent, are funds allocated for projects related to agriculture. Logistics comes in third place, with \$2.67 billion (79 projects), while the transport sector comes in ninth place with \$1.38 billion (27 projects).

Chart 13: IFC projects by sector in \$ billions. Chart does not include Finance.



IFC Projects by Sector		Amount (in \$ billions)
Finance	512	\$31.8
Telecoms	44	\$1.3
Industry	72	\$2.1
Agriculture	101	\$3.9
Health/Pharma	67	\$2.8
Logistics	79	\$2.7
Transport	27	\$1.4
Solar	72	\$2.3
Oil - Ethanol	23	\$1.2
Airport	5	\$0.4
Construction	21	\$0.8
Hotel	23	\$0.8
Hydropower	9	\$0.6
Education	15	\$0.5
Natural Gas - Energy	25	\$1.5
Other infrastructure	5	\$0.1
Water/waste	6	\$0.3
Mining	3	\$0.1
Total (in \$ billions)	1,110	\$58.0

## IFC's consideration ICE/ZEV technology

The largest share of IFC's projects are "not specified" in regard to the consideration of ICE/ZEV projects. From the total amount, this report classifies \$40.2 billion as Unspecified. Projects that specify ICE represent a total of \$2.66 billion and ICE Intensive \$10.66 billion. ICE infrastructure adds \$3.15 billion and ICE supplies \$0.5 billion, bringing the total of ICE related projects to \$16.9 billion. As seen on the chart, comparative funding is low for ZEVs, with only \$0.82 billion, while renewable energy receives \$2.72 billion in IFC funds.

Technology	Amount in \$ billions
ICE	\$2.66
ICE intensive	\$10.66
ICE components/production	\$0.54
ICE infrastructure	\$3.25
ZEV	\$0.83
Renewables	\$2.83
Not specified	\$40.27

The following table compiles a list of the IFC's ICE infrastructure projects (2017 - 2021). Projects include the construction of oil refineries and service stations, transportation, fossil gas power plants, ethanol production for the transport sector, and other transport infrastructure (ports and airports).

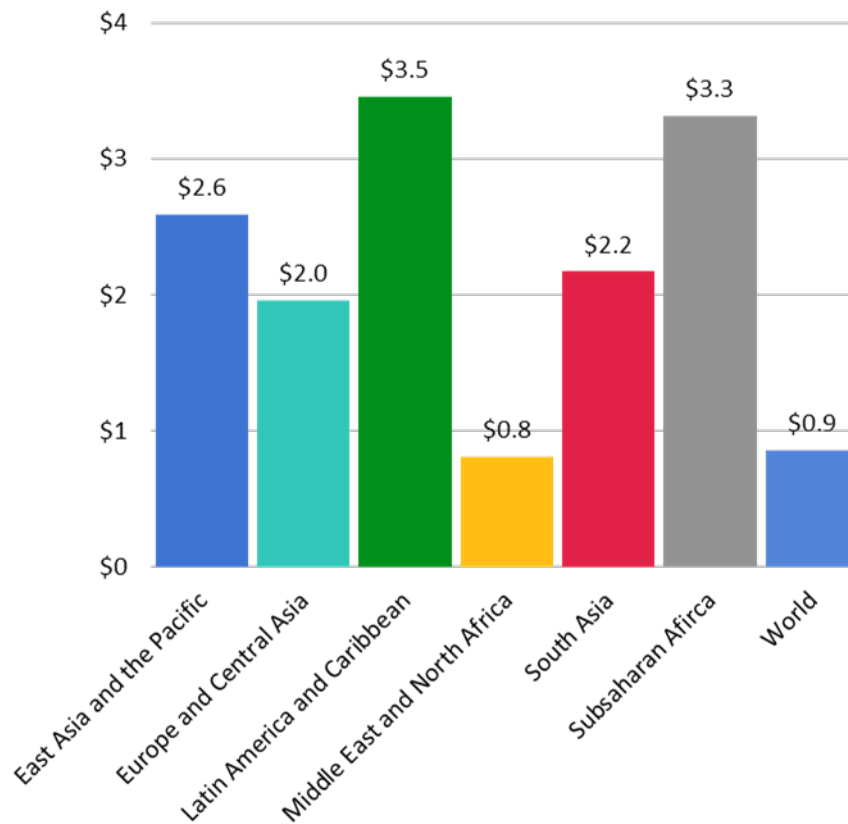
Project Name	Estimated Total Budget (in \$ millions)	Key Project Information
Tabreed District Cooling Company	25	Project includes diesel generators
LPG Mombasa	5	Greenfield liquefied petroleum gas (LPG) terminal in the Port of Mombasa
GTST AESA WAF20	120	Oil transport
Umm Qasr	47.52	Port expansion
Sao Martinho Cogen	90	Producer of ethanol for ICE cars
Monte Rosa Nicaragua	85	Bioethanol
Sofia Airport Cn	36.83	Airport
Airport Almaty	153.5	Airport Modernization
Central Termica de Temane	104	Gas power power plant
COCAL_Bio	40	Ethanol facility
WCS Crisis Response First City Monument Bank	50	Loans for oil related infrastructure
GNG Fuels and Fertilizers	35	Transportation of fuels, service stations
MIGAS SA	-	Natural gas supply for logistics
ND Refineries Ltd	35	Refinery
Maple	80	Multipurpose terminal
Asyaport Extension	12	Shipping terminal
Basrah Gas Co	157.76	Oil infrastructure
InfraV-SA LNG	-	Natural gas plant
EVTL Expansion	40	Liquefied petroleum gas plant expansion

PAE Campana Refinery	150	Refinery expansion
FCS RE CIPREL V	134.62	Natural gas-fired power plant
FCS RE Azito 4	105.23	Natural gas plant
Belgrade WtE	95.57	Waste-to-Energy (WtE) Facility
Agricover SME	9.82	Fuel distribution
Acajutla LNG	88	378 MW gas-fired power plant that will run on fossil gas, and an offshore liquified fossil gas.
Riau IPP	51.5	Natural gas power plant
Canvest Corporate Loan	50	Waste to energy
Sao Manoel		Ethanol expansion plan
GTST Mauritania 2018	40	Finance petroleum products
Gas Natural Acu	288	Natural gas fired plant
SM2PCL	125	Dual fuel fired combined cycle power project with net generation capacity of 589.750 MW on Re-gasified Liquid Natural Gas (RLNG)
Yerevan CCGT	65	250MW greenfield combined-cycle gas turbine power plant
CELSE	200	1,516 MW fossil gas-fired combined cycle power plant
InfraV-SMP		Port infrastructure and vessels
Tupras	100	Oil refinery
Ekurhuleni Muni	50	Airport infrastructure
Jalles Machado	35	Ethanol producer
GTST Ethiopia17	100	Oil logistics
Apex International Limited	75	Oil and gas exploration and production company
Sao Martinho I	60	Ethanol
Tobene IPP Phase 2	9.85	Natural gas power plant

## IFC's ICE funds by region

Most of the funds for ICE/ICE Intensive projects are for projects in Latin America and the Caribbean with \$3.45 billion. Sub-Saharan Africa is second, and East Asia third.

**Chart 15: IFC's ICE funds by region in \$ billions**



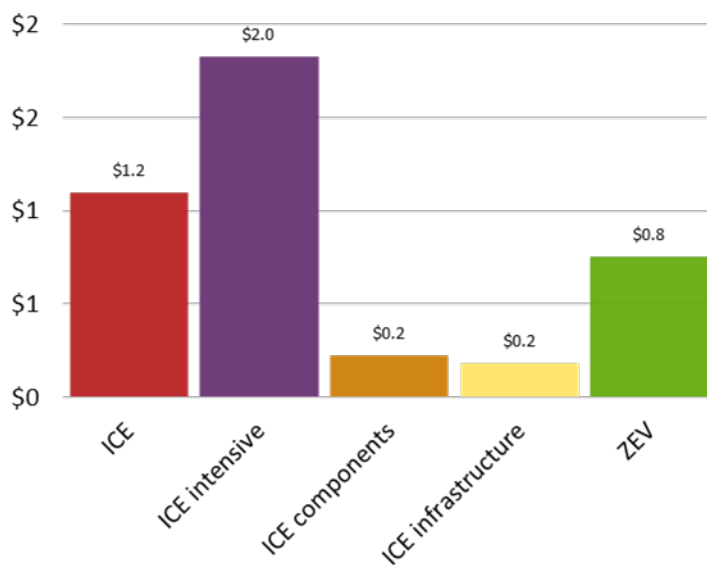
## ICE tech funds per region

Projects per region	East Asia and the Pacific	Europe and Central Asia	Latin America and Caribbean	Middle East and North Africa	South Asia	Sub-Saharan Africa	World (rest of)
Amount, in \$ billions	\$2.6	\$2.0	\$3.5	\$0.8	\$2.2	\$3.3	\$0.9
No	48	38	53	15	45	76	14

## Logistics and passenger transport

In the categories regarding logistics (freight) and passenger transport, \$1.40 billion was used to finance projects that explicitly mention the purchase of ICE vehicles, \$0.24 billion for ICE components, \$2.01 billion for ICE Intensive, while \$0.19 billion were directed to ICE infrastructure. The four ICE categories amount to \$3.85 billion. Only \$0.73 billion was allocated to ZEV projects.

**Chart 16: IFC funding in logistics and transport by technology, in \$ billions**



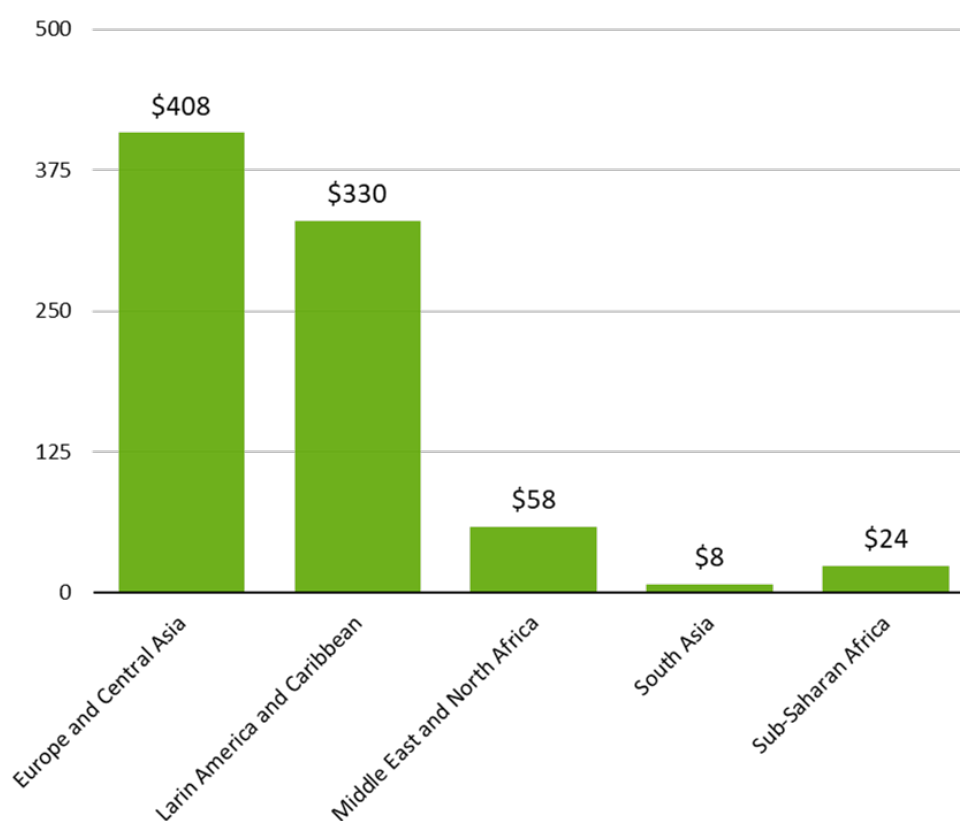
	Amount (in \$ billions)	No
ICE Projects that mention purchase	\$1.4	26
ICE intensive sectors	\$2.0	47
ICE components/production	\$0.2	6
ICE infrastructure	\$0.2	5
Not specified	\$0.1	6
ZEV	\$0.8	13

## Projects supporting ZEV technology

The largest share of ZEV projects financed by the IFC are located in Europe and Central Asia (3 projects in Turkey and 3 in Ukraine, for a total of \$408 million). Two projects are located in Brazil (\$330 million), one in Morocco (\$58 million), one in India (\$7.8 million), and one in the Africa region (\$23.9 million).

The following list shows examples of ZEV finance by the IFC.

**IFC projects supporting ZEV technology by region, in \$ millions**



Project Name	Project Number	Estimated Total Budget (in \$ millions)	Key Project Information
GEM Loan	43250	\$0	Recycler and manufacturer of lithium-based battery materials in China
Banco BV SEF Credit Line	43661	\$150	Climate-smart auto loans (flex-fuel, hybrid and electric vehicles)
Bolt Technology	44246	\$24	E-mobility rentals, food delivery
Zaporizhzhia Smart City	43181	\$40	Transport logistics - procurement of e-buses
Alfa Loan	44697	\$150	Flex car loans + Hybrid and electric

Kryvyi Rih Trams	43194	\$26	Tram modernization
Otosan	43017	\$150	Project to fund sale of of ICE/ZEV vehicles
Lviv E-Buses	42060	\$23	Tram modernization
Casa Tramway	41818	\$58	Tram construction
Bog Transmicable	39772	\$30	Cable transport construction
Anatalya	38506	\$94	Tram
Lithium	40171	\$8	ZEV fleet - corporate transportation
YMI WC	39355	\$75	Constructor of railway projects (including train, metro and tramway projects)

## Findings from IFC:

### Reporting and databases:

- The IFC has a web visualizer that provides general information on commitments, geographic distribution, and sectors.
- There is not a business intelligence (BI) that could provide statistical information on their projects.
- The database of projects is more complete than those of other MDBs, providing details on project descriptions, environmental impact, and risk assessments.
- There are no specific categories on the database regarding fossil fuels, ICE, or ZEV technologies.

### Project funding and ICE technologies:

- Projects that specify ICE represent a total of \$2.66 billion and ICE Intensive \$10.66 billion. ICE infrastructure adds \$3.15 billion and ICE supplies \$0.5 billion, bringing the total of ICE related projects to \$16.9 billion. Comparative funding is low for ZEVs, with only \$0.82 billion.
- The IFC continues to finance the construction and maintenance of large fossil fuel infrastructure, including gas power plants, waste to energy, and diesel generators.
- The IFC also funds fossil fuel infrastructure for a continued reliance on ICE in the transport sector (refineries and service stations), ports

and airports projects, as well as the production and transport of other ICE related fuels (ethanol).

- It finances large and small logistic operations and passenger transport using ICE.
- There are also some projects for the expansion and rehabilitation of railway infrastructure without consideration of electrification technology.
- Through direct purchases, the IFC has funded the acquisition and maintenance of trucks and logistics equipment, cruise ships, barges, machinery and vehicles for the industrial and farming sector as well as personal vehicles.
- The descriptions of infrastructure projects do not have any recommendations for the use of ZEV alternatives.
- There are some positive examples of ZEV funding, most of them involving the construction or modernization of urban railways (trams).

## WBG'S COUNTRY PARTNERSHIP FRAMEWORK

The WBG aims to make its country-driven model more systematic and focused. For that reason, it undertakes Systematic Country Diagnostics (SCD) and Country Partnership Framework documents (CPF). The WBG's database contained 103 CPFs guiding its policies and projects. We used keywords to find remarks regarding the

decarbonization of transport: electric mobility, the electrification of railways, electric bus systems, and the construction of bicycle roads. Although CPFs usually include statements about climate neutrality and GHG reduction, their documents do not lead to specific paths of action in the transport sector in the countries they serve. From a total of 103 CPF documents, 97 made no specific comments on green mobility or electrification of transport. Four CPFs mentioned the electrification of railways (Mexico, Morocco, Turkey and Uzbekistan) but several BRTs or bus projects were included without consideration of ZEV technologies (Jordan, Lebanon, Mexico, Philippines, Senegal, South Africa and Tanzania).

The positive ZEV examples are summarized in the following list:

- Argentina: Implementation of electro-buses in Buenos Aires.
- Brazil: BRT in Rio de Janeiro - electric.
- Colombia: Bogota's BRT - electric.
- India: Electric vehicles and buses.
- Indonesia: Electric mobility.
- Rwanda - BRT and e-mobility strategies.

### Findings from CPFs:

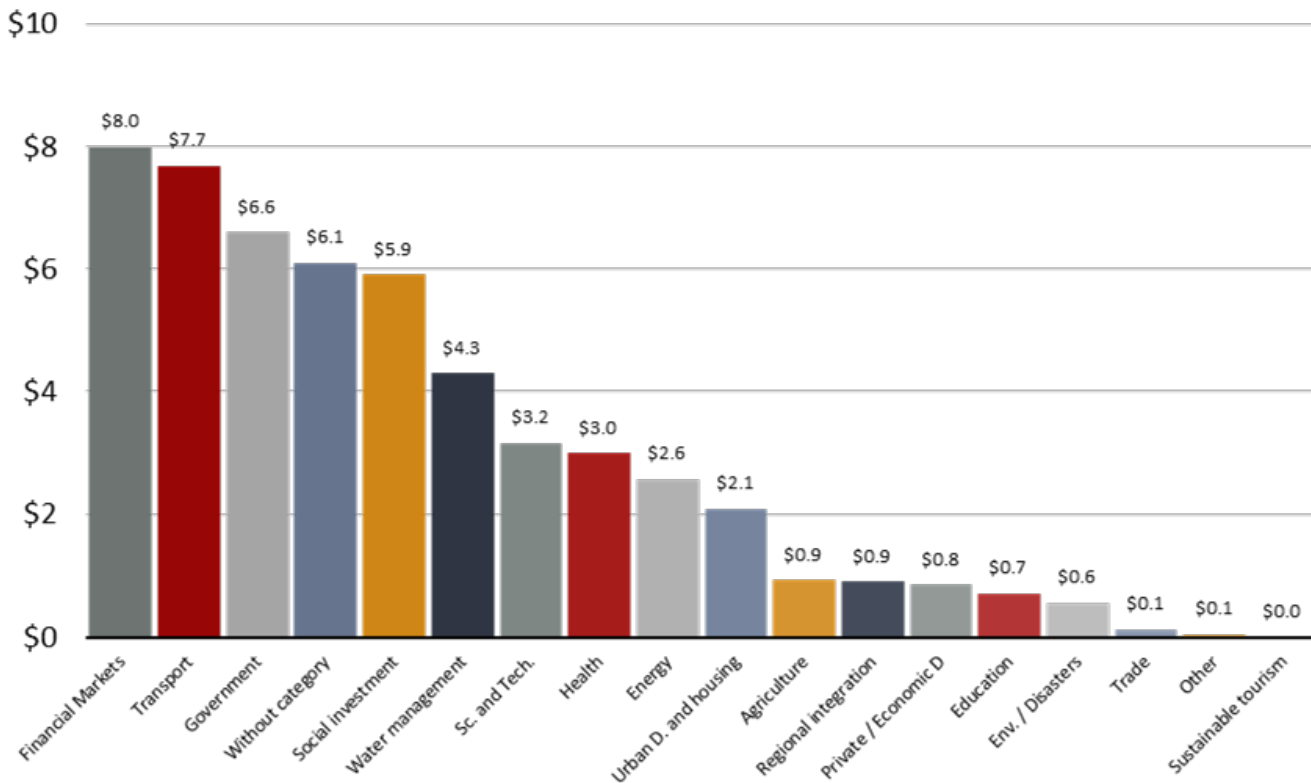
- WBG publishes a simple list of CPF documents on their webpage, but it does not provide an automated export tool for CPF documents.
- There are no elements within CPF documents that show a clear alignment of the WBG's course of action with the projects implemented in each country.
- The documents make only a few observations regarding decarbonization strategies for the transport sector, and how this could translate into specific projects for each country.
- Only five percent of the CPFs mentioned concrete ZEV plans, mostly for small scaled e-mobility strategies and the construction of e-BRTs.
- Several BRT and other transport systems were announced without consideration of sustainable mobility strategies.

## IDB GROUP

For the public-financing arm of the IDB, we downloaded a database of projects from the category 'Under Implementation' on September 29, 2021, composed of projects under implementation between 2017 and September 2021. We only considered 'All Loan Operations', excluding 'Container,' 'Technical cooperation,' 'Guarantees,' and 'Finance Product.' This amounts to a selection of 524 projects from the total list of 2,281 operations in the IDB's database for automated export. This database automatically includes the projects of IDB Lab.

The IDB awarded a total of \$53.5 billion in projects. From that total, the largest amount was used to support Financial Markets (\$7.9 billion), Transport (and logistics) projects (\$7.6 billion), followed by Government (\$6.5 billion), Social Investments (\$5.9 billion), and Water Management (\$4.3 billion).

**Chart 18: IDB funding per type of sector, in billions**

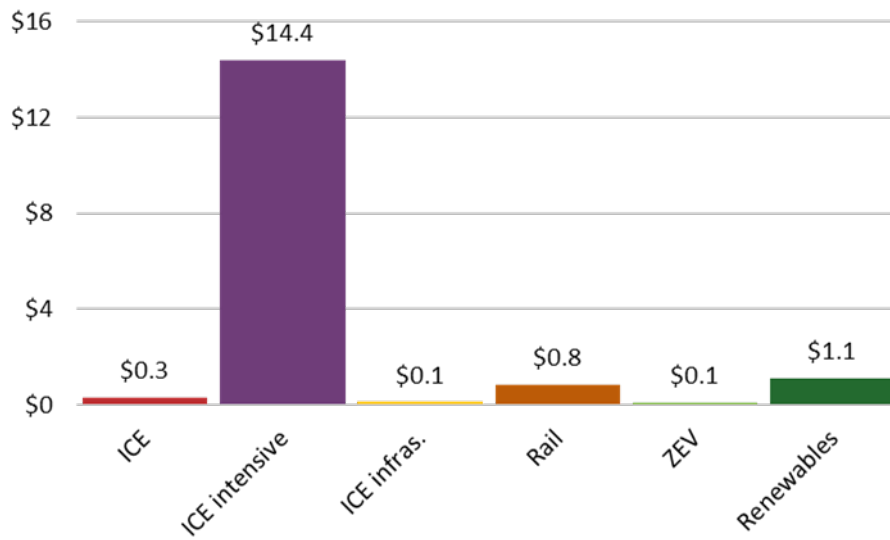


	Amount (in \$ billions)	No. of projects	Percentage
Agriculture	\$0.92	43	1.71
Water management	\$4.29	39	8.0
Science and Technology	\$3.16	15	5.9
Trade	\$0.13	9	0.2
Urban development and housing	\$2.09	23	3.9
Education	\$0.71	13	1.3
Priv companies and economic development	\$0.85	48	1.6
Energy	\$2.57	38	4.8
Regional integration	\$0.90	3	1.7
Social investment	\$5.91	40	11.0
Environment and natural disasters	\$0.56	21	1.0
Financial Markets	\$8.00	63	14.9
Other	\$0.01	5	0.1
Government	\$6.60	67	12.3
Health	\$3.00	43	5.6
Transport	\$7.69	42	14.4
Sustainable tourism	\$0.05	4	0.1
Without category	\$6.10	12	11.4
Total	\$53.51	525	100

## IDB funds by technology

From a total of \$53.4 billion all projects since 2017, \$310 million were directed to projects that explicitly mentioned the purchase of ICE vehicles, \$14.04 billion to ICE vehicle intensive projects, and \$112 million to projects investing in ICE infrastructure. This means \$14.4 billion, or 27 percent of all IDB financing, went to projects supporting ICE vehicles. Only \$97.2 million were supporting projects involving ZEVs (0.18 percent), although another \$1.08 billion (two percent) went to projects involving renewable energy development.

**Chart 19: IDB funds by technology, in \$ billions, excluding not specified projects**

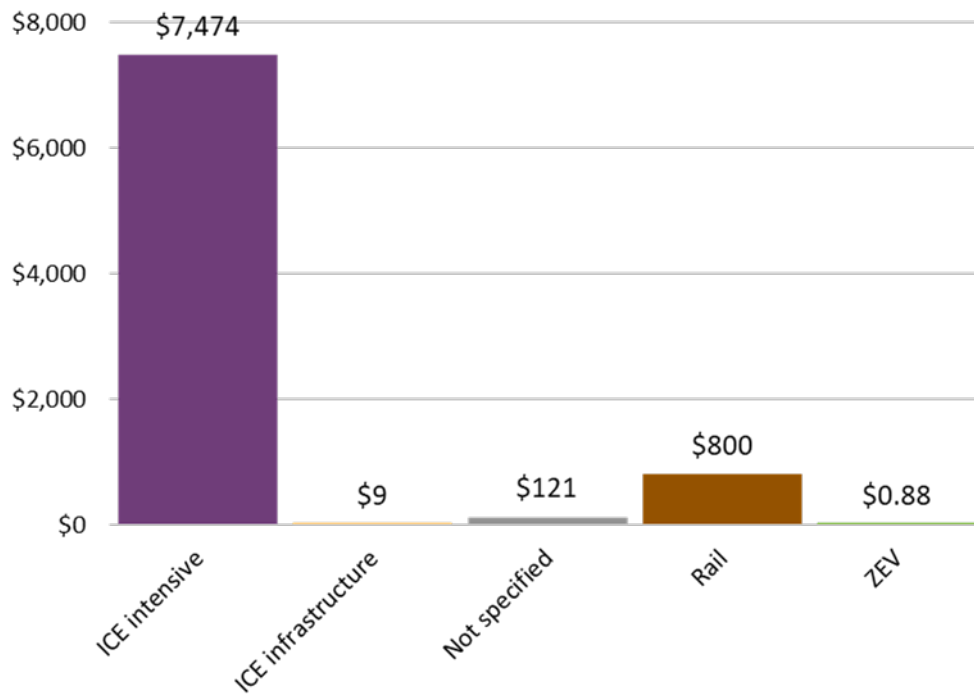


	ICE	Ice intensive	ICE infrastructure	Rail	Not specified	ZEV	Renewables
Amount in \$ billions	\$0.31	\$14.38	\$0.20	\$0.82	\$35.78	\$0.10	\$1.08
No. of projects	5	102	4	4	362	5	20

## IDB funding for the transport sector

Most of the funds for the transport sector are used for ICE projects. From a total of \$7.6 billion of the IDB's own 'Transport' category, \$7.4 billion were directed to ICE intensive projects (97 percent), \$99 million for ICE infrastructure (1.3 percent), \$800 million for Rail Projects (1 percent) and \$880,000 for ZEVs<sup>30</sup> (0.01 percent).

**Chart 20: Transport projects by ICE/Rail/ZEV technology, in \$ millions**



	ICE intensive	ICE infrastructure	Not specified	Rail	ZEV
Amount in \$ millions	\$7,474	\$9	\$121	\$800	\$0.88
No.	35	1	2	3	1

## IDB ZEV projects

The following table shows the complete list of ZEV projects funded by the IDB since 2017. These include the projects in all sectors. Loans for ZEVs include the purchase of e-mobility for a port security, \$20 million for electric buses, and \$76 million for other ZEVs.

Project No.	Title (in their original Spanish)		Approved funding (in \$ millions)	Description
BA-G1003	Barbados: Mejores baterías, un Modelo de Energía como Servicio para Acelerar el Acceso de la Industria Hotelera a la Energía Renovable	Energy	\$0.39	Batteries for hotels
(added, only ZEV purchase, separated) DR-L1141	Rehabilitación y Ampliación del Puerto de Manzanillo	TRANSPORTE (transport)	\$0.88	Port infrastructure - considers purchase of electric vehicles for security (the rest of the project adds to \$10 million, it was considered ICE infrastructure)
PE-L1254	Financiamiento de Soluciones Sostenibles de Transporte Eléctrico	MERCADOS FINANCIEROS (finance)	\$20.00	ZEV buses, infrastructure
EC-L1268	Financiamiento del Transporte Eléctrico Sostenible en Ecuador	MERCADOS FINANCIEROS (finance)	\$33.00	ZEV - loans for purchase
EC-O0009	Línea de Crédito Condicional para Proyectos de Inversión (CCLIP) para la Movilidad Eléctrica	(Unspecified)	\$43.00	Loans for e mobility - unspecified

## IDB renewables

From the total of 523 projects from the IDB's database, 16 (totaling \$712 million) could be classified in the environmental and renewables category, including projects to purchase solar plants, restoration of natural habitats, and green finance.<sup>31</sup>

Project No.	Title (original in Spanish)	Amount, in \$ millions	Observations
PN-L1166	Proyecto de Innovación Agropecuaria Sostenible e Incluyente	\$41.00	Agroecology - solar pumps
BH-G0003	Reconstrucción con resiliencia en el sector energético en Las Bahamas	\$9.01	Solar plant
CO-G1025	Promoción de la Inversión Verde y la Bioeconomía para la Lucha Contra la Deforestación	\$1.63	Green finance - halt on deforestation
CO-G1023	Emprendimiento Social y Económico para la Lucha Contra la Deforestación	\$2.96	Green finance - deforestation
BH-L1048	Reconstrucción con resiliencia en el sector energético en Las Bahamas	\$80.00	Electricity infrastructure - includes solar
BH-O0006	Avanzando la Energía Renovable en Bahamas	\$170.00	Renewable energy program - not enough
BR-L1536	Proyecto de Recuperación del Río Tietê Aguas Arriba de la Presa de la Penha, en el Estado de Sao Paulo Renasce Tietê	\$79.86	Infrastructure construction - reforestation
CO-L1228	Primer Programa para el Financiamiento Empresarial Productivo	\$60.00	Finance - purchase of vehicles. Also includes energy efficiency projects
BA-L1043	Programa de Inversión de Energía Sostenible (SMART FUND II)	\$30.00	Funds for renewable energy studies
RG-G1013	Financiamiento No Reembolsable del Fondo Verde para el Clima (FVC) para la Facilidad de Energía Sostenible Ampliada (FES-Ampliada) para el Caribe Oriental	\$20.00	Green funds for electricity - no detail
RG-L1112	Facilidad de Energía Sostenible (SEF) para el Programa Regional del Caribe Oriental AMPLIADA - (SEF AMPLIADA)	\$60.00	Green funds for electricity - no detail
HO-G1247	Programa de Electrificación Rural en Lugares Aislados	\$6.42	Photovoltaic
GY-L1066	Diversificación de la matriz energética y fortalecimiento institucional del Departamento de Energía.	\$21.16	Solar
AR-L1280	Promoción de Instrumentos de Mitigación de Riesgos y Financiamiento de Inversiones en Energía Renovable y Eficiencia Energética	\$100.00	Electricity small biogas plants
PR-L1146	Promoción de la Inversión Privada en Eficiencia Energética en el Sector Industrial de Paraguay	\$20.00	Green Funds for electricity
JA-G1003	Programa de Gestión y Eficiencia Energética	\$10.00	Solar panels in public buildings

## IDB's awarded contracts

The IDB website publishes a list of Awarded Contracts on their website containing lists of large purchases of equipment and machinery. The availability of purchase plans allows an ex-post analysis of purchases. Between 2017 and September 2021, the IDB spent a total of \$1.22 billion on vehicles or components, which included:

- \$1.0 billion for the purchase of construction machinery<sup>32</sup>
- \$183 million for the purchase of transportation equipment
- \$31 million for the purchase of cars and motorcycles<sup>33</sup>
- \$58 million for the purchase of industrial trucks and tractors

No further documentation is provided on the technology used in those equipment purchases (ICE or ZEV), so it is therefore very likely that those funds were used to purchase ICE technology.

## Findings from IDB's finance in the public sector

Reporting and databases:

- The IDB provides some description of projects in its webpage, reporting on aggregate numbers of projects and sectors.
- There is no BI to process project information directly from their website.
- Database downloads do not automatically export project descriptions and project components, which need to be added manually.

Project information:

- The use of ICE or ZEV technology does not seem to be a relevant element in project design. Almost the entire list of projects makes no relevant mention of the technology used in their equipment.
- Only the projects characterized as ZEV highlight the benefits of decarbonization, while this issue is omitted in most projects.
- There are no projects specifically dedicated to the development of ZEV research and innovation, or for the development of basic infrastructure for the decarbonization of private transportation.
- From a total of \$53.5 billion, \$14.4 billion were

awarded to ICE technologies (27 percent of the total), \$97.2 million supported ZEV technology (0.1 percent), and renewables reached \$1.08 billion (2.02 percent of the total).

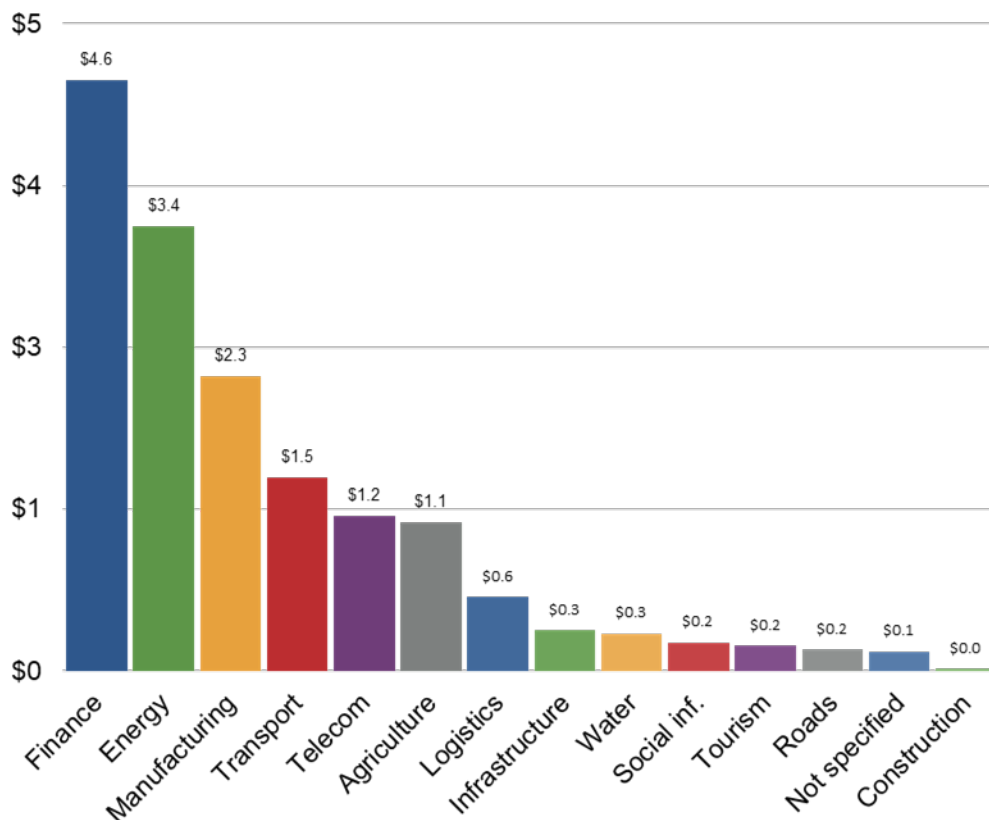
- Most of the funds for the transport sector are used for ICE projects. From a total of \$7.6 billion of the IDB's own 'Transport' category, \$7.4 billion were directed to ICE intensive projects (97 percent), and only \$880,000 for ZEVs (0.01 percent).
- Purchase plans make no reference to ZEV technology in car purchases and other mobility or machinery.

## IDB Invest

The research database includes all projects approved since 2017, with a total amount of 377 projects. The database includes basic data only: Project Name, Number, Country, Date, and Investment Type. The rest of the information (funding and project description) had to be filled manually with the data provided elsewhere in their website.

To analyze the projects, we will only use the Financed Amount (monto financiado) and not Monto Sindicado (Syndicated Amount). The total amount of funds in the database reaches \$16.3 billion, 28 percent of which are funds for projects in the finance category, while 21 percent is used to fund projects in the energy sector. Manufacturing received \$2.2 billion (14.2 percent), and the transport sector is the fourth largest with \$1.4 billion (9.3 percent).

**Chart 21: IDB Invest projects by sector, in \$ billions**

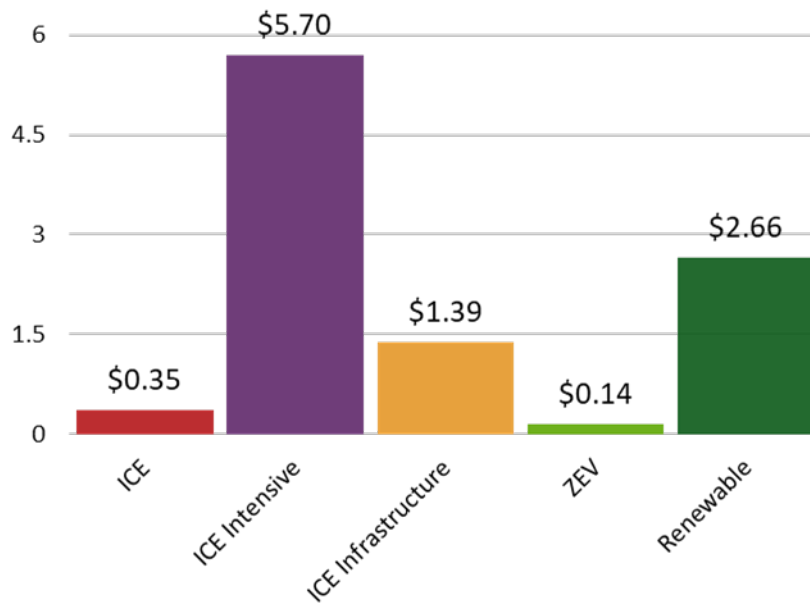


IDB Invest	Amount (in \$ billions)	No.	Percentages
Agriculture	\$1.1	46	7.2
Construction	\$0.0	2	0.1
Energy	\$3.4	49	21.4
Finance	\$4.6	135	28.4
Social infrastructure	\$0.2	14	1.4
Infrastructure	\$0.3	6	2.0
Logistics	\$0.6	7	3.6
Manufacturing	\$2.3	50	14.2
Not specified	\$0.1	6	0.9
Roads	\$0.2	1	1.0
Telecom	\$1.2	24	7.5
Tourism	\$0.2	9	1.2
Transport	\$1.5	22	9.3
Water management	\$0.3	6	1.8
Total	\$16.0	377	100

From a total of \$16.4 billion, \$353 million (21 projects, 0.02 percent of the funds) were directed to ICE projects, \$5.69 billion (79 projects, 35 percent) were for ICE intensive projects, and \$1.39 billion (22 projects, 8.65 percent) were used for ICE infrastructure. This adds to a total of \$7.43 billion or 46 percent of the funds.

Meanwhile, unspecified projects represent \$7.01 billion (223 projects, 43 percent), while ZEV projects represent \$140 million (6 projects, 0.85 percent), and renewables \$ 2.66 billion (42 projects, 16 percent of the funds).

**Chart 22: IDB loans by used technology ICE/ZEV/Renewable in \$ billions. (without Not specified category)**



**IDB Invest projects by technology**

	ICE	ICE Likely	ICE Inf.	Not specified	ZEV	Renewables
Amount in \$ millions	\$0.35	\$5.70	\$1.39	\$7.01	\$0.14	\$2.66

## Transport, logistics and roads

From the total of \$2.27 billion for 'Transport,' 'Logistics,' and 'Roads' sectors (according to the IDB Invest's own categories), \$41.5 million were allocated for projects with ICE specific technology (3 projects), \$1.83 billion was directed to ICE intensive (19 projects), and \$785 million for ICE infrastructure. The total amount of ZEV funds reaches \$140 million, however, the IDB Invest only has one ZEV project under the transport category (the construction of a monorail in Brazil for \$50 million) and another transport project with zero IDB Invest financing (\$7.8 million in syndicate funding).

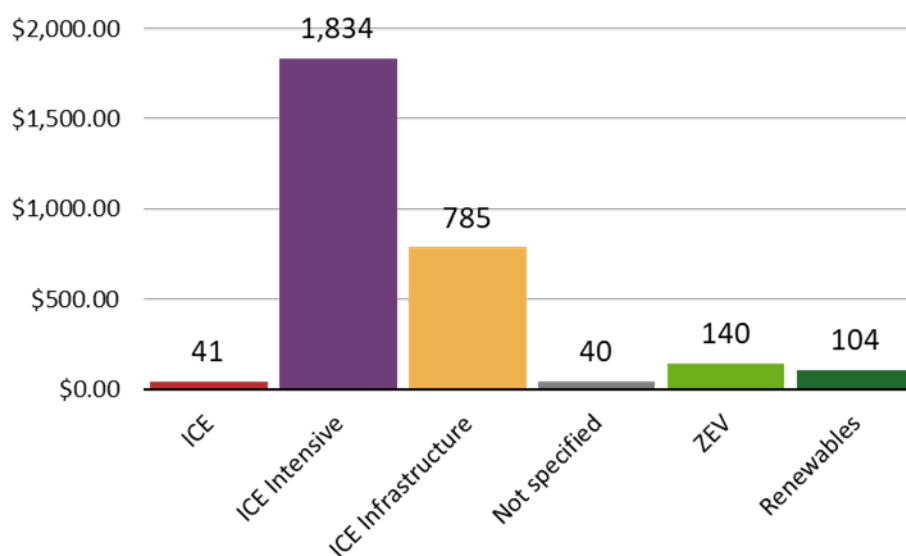
Two other projects included in our report are transport related projects classified as "manufacturing":

- Partial purchase of heavy equipment (electric and hybrid) for \$20 million in Brazil
- Finance for the purchase of ZEV cars for car rentals in Brazil (\$70 million in 3 projects)

	Amount in \$ million	No.
ICE	\$41	3
ICE Intensive	\$1,834	19
ICE Infrastructure	\$785	10
Not specified	\$40	2
ZEV	\$140 (\$50 in transport + 90 (from manufacturing))	1
Renewables	\$104	3

These projects have been included in the transport sector (Roads, Transport and Logistics) in the charts and tables below.

**Chart 23: IDB Invest - Loans by technology, in \$ millions**



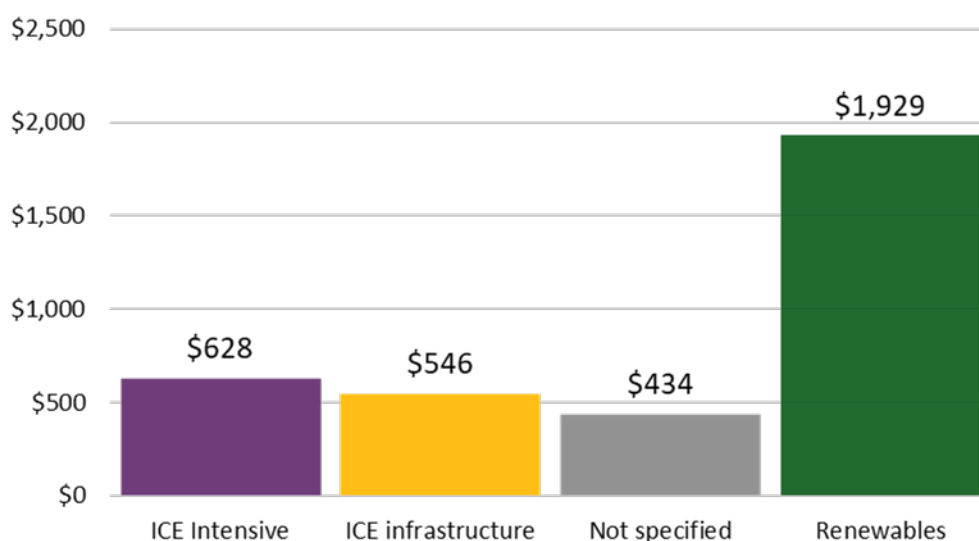
The following list shows all ZEV projects funded by the IDB Invest in the 2017 - 2021 period, in \$ million.

Project Name	No.	Syndicated loan, in \$ millions (Monto sindicado)	Monto financiado, in \$ million	Key Project Information
BYD Salvador	12858-01	\$0	\$50	Monorail project
Electribús Bogotá	13037-01	\$7	\$0	Electric buses
JSL	13009-01	\$10	\$20	Purchase of heavy vehicles; includes ICE and ZEV
Movida	13553-01	\$180	\$30	Purchase of vehicles; includes ICE (hybrid) and ZEV
Vamos	13755-01	\$10	\$20	Purchase of vehicles; includes ICE (hybrid) and ZEV
Cs Brasil	13756-01	\$10	\$20	Purchase of vehicles; includes ICE (hybrid) and ZEV

## Energy

From a total of \$3.4 billion in financing of energy sector projects, \$0.62 billion were used in ICE intensive projects, \$0.5 billion in infrastructure, \$0.4 billion was not specified, and \$1.9 billion in projects related to renewable energy (mainly solar and wind).

**Chart 23: IDB Invest energy projects, in \$ millions**



	ICE Intensive	ICE infrastructure	Not specified	Renewables
Amount, in \$ million	\$629	\$546	\$434	\$1,929
No.	10	8	10	24

Following is a list of the projects classified under the Renewables category.

Project Name	No.	Financed amount, in \$ million	Key Project Information
Atlantic II	12009-03	\$129.5	Wind energy
Atlantic - Santa Vitoria do Palmar	12009-02	\$38.9	Wind energy
Cubico Alten Aguascalientes Solar PV	12083-01	\$90.5	Solar park
Pirapora I Solar PV Project	11924-01	\$72.6	Solar park
Expansión de Fitesa	11786-02	\$44.5	Solar panels
AELA Generación	12111-01	\$174.9	Solar park
Programa de Expansión y Eficiencia Energética del Puerto de Arawak	12081-01	\$3.0	Solar panels
Proyecto Parque Eólico Achiras	12063-02	\$20.0	Solar park
Projeto Complexo Eólico Serra da Babilônia	11994-02	\$66.2	Solar park
Guanajuato Solar PV	11894-02	\$ -	Solar park
Proyecto de Energía Solar de San Juan	12006-02	\$11.0	Solar park
Techos Solares Para Todos	12224-01	\$104.9	Solar roofs
Proyectos Solares Villanueva I & III y Don José	12197-01	\$125.0	Solar park
Bono B de Largo Plazo de La Jacinta	12077-02	\$10.3	Solar park
Banpro: Acceso a Energías Renovables y Eficiencia Energética en Nicaragua	11877-02	\$20.0	Finance for sustainable measures in private companies
Parque Eólico del Bicentenario Wind Project	11575-05	\$50.0	Wind project
Proyecto fotovoltaico de Capella Solar	12232-01	\$30.0	Solar park
Proyectos Eólicos de Parque Arauco	12133-01	\$34.0	Wind project
Navojoa Solar PV	12402-01	\$30.0	Solar park
PLASTECH	12397-01	\$10.0	Plant expansion - including the purchase of solar panels

Sigora Haiti Microuility Project	12190-01	\$1.5	Diesel - solar generation
PH Jilamito	11784-08	\$20.2	Hydroelectric dam construction
American Industrial Park	12362-01	\$8.0	Solar panel in industrial park
Grupo Kattan	12467-01	\$5.0	Solar panel in large warehouse
Ati-Orbe II	12476-01	\$12.1	Telco - solar panel
Green FIDC Origo	12680-01	\$7.8	Solar panels
Casa Mantica - Diano Marina	12725-01	\$ -	Solar panels
Finaciamiento Verde con Sicredi	11488-03	\$ -	Solar panel finance
Puebla Solar PV	12541-01	\$45.0	Solar park
Tiendas TÍA	12789-01	\$104.0	Construction of infrastructure - includes solar panels for logistics center
Green Power Generation Assets	12718-03	\$738.9	Solar park
Huemul Portfolio	12380-02	\$ -	Solar/wind construction
Instrumento de descarbonización de Engie	12995-01	\$74.0	Wind electricity generation
Proyecto solar de bonos A/B La Pimienta	12893-01	\$100.0	Solar park
New Juazeiro Bifacial PV Power Project	12092-02	\$53.9	Solar park
Sabesp Green Capex Facility	13069-01	\$169.5	Solar panels
Barbados Port Inc.	12683-01	\$30.0	Port infrastructure - solar panels
Casablanca PV Solar Power Project	12092-03	\$140.4	Solar park
Guyana Shore Base Inc. Phase 2 Development Project	12990-01	\$71.2	Port construction - includes solar panels
Providencia Solar PV Project	ES-L1091		Solar park
PV Llanos 3	13420-01	\$16.0	Solar park
Orion IP & Free Zone	12362-02	\$25.0	Industrial plant construction - includes solar panels

## Findings from IDB Invest

### Reporting:

- The IDB Invest's website offers a view of their data, which includes basic information (name, code, status, date of approval, type of project, requested loan, syndicated loan, and financed amount).
- The website also provides a short summary of the revision of environmental impact assessments and some additional information.
- There is no tool to make an automated export, thus information needs to be manually entered to a database.
- No web BI is provided to analyze the projects at an aggregated level.

### Project information:

- There is no specific reporting on the alignment of projects to the Paris Agreement nor precise information regarding ZEV purchases in the project pages.
- ZEV specific projects do not include any specific information regarding the use of fossil fuel technologies.
- The energy sector is the second largest destination of IDB Invest financing. Most of the energy sector's funds are used for renewable energy (\$1.9 billion).
- From the total of \$2.27 billion for the 'transport,' 'logistics,' and 'roads' sectors, only \$140 million were used for ZEVs.

## Conclusions and recommendations

These research findings suggest that the WBG and the IDB have been unsuccessful in translating their commitments and action plans into concrete and systematic funding for road transport decarbonization.

In the categories selected for this assessment between 2017 and September 2021, only 0.6 percent from a total of \$167 billion of IBRD/IDA financing and less than 0.1 percent from a total of \$53 billion of IDB financing were for projects that explicitly state the use of Zero Emission Technology. Meanwhile, at least 48.9 percent of the IBRD/IDA and 27 percent of the IDB funds continued to finance fossil infrastructure, vehicles, and sectors.

This assessment was conducted on an ex ante evaluation of the project information documents (objectives and component description). A conservative approach was used, in the sense that given uncertainty about the technology that would be used, projects were classified as “not specified.” Therefore, a more exhaustive and granular analysis of each project would probably lead to higher percentages of fossil fuel finance.

These figures do not seem to reflect the optimism reported by MDBs regarding their transport decarbonization strategies, summarized in their climate financing reporting that reported a total of \$12.9 billion for climate financing for transport. The findings of this research and the MDB’s data cannot be compared because of the use of different methodologies in the analysis. However, our findings provide evidence that MDBs need to adopt more rigorous criteria in project selection and reporting if they want to fulfill their role as drivers of global transport decarbonization.

The following section will consider the principles for climate finance set by the MDBs and recommendations submitted by NGOs to the UNFCCC to discuss the extent to which MDBs have successfully implemented their proposed lines of action.

Observations regarding MDBs alignment with Paris mitigation goals:

- MDBs in general, among them the WBG and IDB, have set general goals for the decarbonization of their development policy

lending and projects to “reach Net Zero by 2050.” This target is based on the goals set by the UNFCCC, but it is less demanding as others set by many players in the international community (e.g., Uruguay has committed to carbon neutrality by 2030 and Iceland by 2040).

- Current WBG and IDB CC goals are unspecific and do not provide a framework for the design and evaluation of policies and projects.
- There are no definitions of positive and negative (exclusion) lists regarding project finance for fossil fuel infrastructure and ICE technology.
- The goals reflected in the MDBs’ commitments and their climate action plans have no sector-specific targets or protocols that could provide guidelines for sectoral pathways, which are necessary for key ICE sectors like transport, energy, waste management, and construction.
- The WBG and IDB have not set general or sectoral dates for divesting from existing fossil fuel projects. Even if the WBG has pledged to stop financing upstream oil projects, they continue to finance other initiatives in the fossil fuel industry, including refineries, storage, and transport.
- There is no integrated MDBs methodology to measure the alignment of transport technologies with the Paris Agreement goals to exclude fossil fuel related investments, or protocols for the consideration of ICE and ZEVs in design phases.
- Current WBG and IDB environmental and social standards recommend that project designers and approvers adopt less GHG emitting alternatives “when it is technologically feasible” and cost effective. This is a vague requirement that is usually dismissed in practice, underscored by the large number of ICE projects in regions where ZEV technology is already available. In many of the projects described in this document, ZEV requirements could have been considered in the purchase of vehicles, loans for the private sector, etc.
- Alignment criteria does not yet consider differentiated responsibilities in the light of asymmetries in regional and national circumstances (that developed countries should take the lead by undertaking economy-wide absolute emission reduction targets and developing countries are encouraged to move over time).
- There are no indicated pathways for ending

the use of so-called bridge technologies (using fossil gas, ethanol, and less GHG emitting technologies).

Regarding the recommendations to prioritize, target, and report on climate finance, mobilize private sector investments, and leverage private capital:

- MDBs current project eligibility criteria allows the allocation of funds for fossil fuel-related infrastructure, as well as ICE transport vehicles and machinery.
- Mitigation finance tracking methodology has been developed, but MDBs recognize that it needs to be revised. The current methodology uses the label of climate finance for all relative improvements that “switch from a more GHG-intensive fuel to a different and less GHG-intensive type of fuel”.<sup>34</sup> This means that the purchase of ICE buses as part of “integrated transport systems” is labeled as positive even when it is locking in decades of additional GHGs, a similar issue with so-called bridge energy (fossil gas and biofuels). In practice, the use of this relative approach means that MDBs continue to fund ICE technologies and report them as “climate finance.”
- The role of the private sector and its “mobilization” by MDBs by partnering directly with institutional investors remains unclear, as MDBs have yet to develop specific alignment criteria. In addition, if MDBs are going to describe their climate finance impact in terms of private sector dollars mobilized, they must do the same with respect to private sector financing they mobilize through support of ICE vehicles and other fossil fuels activity.
- Data on private climate finance mobilization is currently provided in an aggregated way. A granular reporting linking aggregated values to individual projects, as was proposed in the 2015 commitments, could improve transparency, as well as statistical analysis.

Engagement and policy development support:

MDBs have pledged to support shared principles for economy-wide LTS and NDC enhancement in country engagement and particularly in the development of MDBs’ country strategies.

- Most of the country strategies of the WBG and IDB consider general elements of NDCs and LTSs.
- However, only a small number of Country

Strategy Documents from the WBG (5 percent) stated any considerations for electric mobility and how it might be integrated to NDCs and LTS.

- There is not enough reporting on a methodologically consistent use of policy-based finance to help countries transition to low-carbon pathways in the transport sector.
- MDBs have made advances in reporting on the progress of their climate finance efforts. The yearly report provides valuable information on mitigation and adaptation figures.
- MDBs project reporting is ex ante project implementation (extracted from Project Documents that were written in design phases). MDBs climate reports do not include an ex post report on aggregated purchases of vehicles and equipment, which would improve accountability and provide tools for a systematic analysis.
- Current project and policy operations’ databases have a number of shortcomings and deficiencies (limits to export lists numbers, relevant project information needs to be copied manually, absence of BI processing).

Regarding the alignment of internal activities, MDBs are not giving an example on the progressive alignment of internal operations with Paris Agreement goals. There is no evidence to support that the WBG and IDB have “replaced carbon intensive or inefficient infrastructure” as well as “fossil-fueled cars and inefficient buildings” from their own purchase plans.

The SuM4All platform provides a set of recommendations to help transport decarbonization, which are noted below as an illustration of some advances and shortcomings in the WBG and IDB’s projects.

- Building momentum: There is a lot of work to do to make sure that the WBG and IDB communication strategies toward the decarbonization of transport are reflected in country commitments. As for WBG and IDB’s reflections that being demand-driven is the obstacle to greater progress, they have failed to catalyze and align the multiple actors involved: governments, organizations, suppliers, operators, and consumers.
- Setting the right policy framework: Our research found relatively few actions of the WBG and IDB to stimulate governments’ and

the private sector to develop ZEV infrastructure, production, and markets. The development of sustainable electric mobility requires a suitable policy and regulatory framework to authorize and promote the sale and use of all types of electric means of transport, to set appropriate incentives, and support the provision of charging facilities, space, and services. The WBG has admitted that current market prices for ZEV need to be overcome by government led incentives. However, this is not observed in the project documents that could support those policies.

- Only a small fraction of the projects from the WBG and IDB databases consider the development of the necessary infrastructure and services for ZEVs, which MDBs acknowledge as a key element in their development.
- From our selection of documents, there were no projects supporting an “industrial transformation” or loans for the development of e-technology manufacturing.
- There were also no loans for research and development of new technologies related to ZEVs. The development of new technologies is especially relevant in sectors in which there are no cost effective alternatives (e.g., machinery for road construction, waste management, agriculture).
- Only one pilot project was identified: The WBG’s support for the development of an electrified bus system in China. Early adopters and communication are necessary to overcome fears and share lessons learned from successful business models based on ZEV.
- The Sum4All and other platforms are useful to establish technical-based guidelines for MDBs, governments, and the private sector on the development of decarbonization pathways for the transport sector, offering a catalogue of more than 180 policy measures to achieve sustainable mobility. It is still necessary to translate these recommendations into policies, guidelines, and evaluation protocols, which should be enforced by MDBs.

## Recommendations

The decarbonization of the transport, which currently represents about a quarter of global CO2 emissions, must be a priority for MDBs. As some leading markets have seen governments recently vow to halt all support for investments that promote

the use of fossil fuels, the WBG and IDB continue to finance fossil fuel related projects and have yet failed to develop consistent criteria for the selection and evaluation of projects, which are necessary to fulfill their role as catalyzers for a global transformation. The climate crisis demands the WBG and IDB to reevaluate their policies and set clear time bound goals for transport decarbonization.

- MDBs must commit to phase out all finance for ICE vehicles for public transport and cars by 2025 to prompt a wider transformation of the mobility sector.
- The technology for a substitution of ICE in the passenger and transit segment of the sector is already technically and financially viable, as demonstrated by WBG’s own pilot experiences. MDBs must commit to immediately stop financing for any ICE vehicles where there are alternatives available now, including for ICE buses, vans and cars, and instead support clients in the transition to all-electric fleets.
- An MDB ban on ICE would be supported by the governments of key international players that have adopted similar decisions, and would open new markets for the development of ZE technology in other parts of the world. MDBs should reallocate funding for intensive ICE projects toward ZE infrastructure and promote the necessary conditions for the government-led development of the private sector.
- MDBs should also promote the consideration of ZE in their country strategies and facilitate means for the development of ZEV in their NDC and LTS. A ban on fossil fuels would be accompanied by agreements from loan recipients in the public and private sector to stop indirect funding for obsolete technologies.
- A strong global communications strategy specifically for transport decarbonization will be necessary to build momentum and overcome fears related to the acquisition of new vehicles.

MDBs should also follow recommendations on mainstreaming Paris alignment:

- MDBs must have clear commitments on how they are aligning with the Paris Agreement, and set a clear path to decarbonization. The current goal of reaching net zero by 2050 needs to be overcome by more demanding goals and clear pathways.
- Net zero cannot mean “pollute now, pay later.” Net zero should be defined rather as a

coordinated global effort for GHG mitigation, which MDB financing must help expedite.<sup>35</sup>

- MDBs must end financing for all projects that support fossil fuels for road passenger transport as of 2025, setting a clear message through the incorporation of ICE technologies in their exclusion lists.
- Only a few exceptions might be considered for sectors and regions in which there are no viable substitutes, in particular for heavy duty vehicles in rural areas of the least developed countries. However, exceptions should be specific and justified.
- MDBs should be clear on how they will translate exclusion lists into specific provisions in the due diligence process and reporting for project and policy-based lending.
- MDBs should develop an integrated methodology to measure Paris alignment.
- Current GHG measuring and reporting should incorporate improved methods that could consider both aggregate and individual levels and how they interact.
- Methodologies should stop considering technology shifts that still consider ICE as climate finance. New BRT systems or other less GHG-emitting technologies should be avoided whenever possible.
- The broad exception of “whenever possible,” with respect to consideration of alternatives, should be replaced with clear protocols of operation that reduce the subjectivity in fund allocation that could be used for fossil fuel projects.
- MDBs should be clearer about the current use of so-called bridge technologies in transport related activities (such as fossil gas or ethanol) and how they will be phased out in the future.
- Climate financing reporting indicators should be improved to only consider ZEV projects.
- MDBs should provide BI platforms to analyze their information without the need of further processing tools. This would facilitate the improvement of transparency and accountability of operations.
- MDBs should step up efforts to build momentum and work with national governments to identify bottlenecks in technology development, the construction of infrastructure, and development of

manufacturing of ZEV technology.

- MDBs need to improve their communications efforts and provide actors with clear information and viable pathways toward the decarbonization of the transport sector.
- MDBs should also set clear goals in their work with the private sector to improve transparency and promote a regional transfer of technology to prevent ZEV transformation from causing a massive transfer of resources to countries already producing those technologies.
- MDBs should generate funds for researchers and academia to develop technologies in key sectors.
- MDBs should start by setting an example and aligning all internal purchases to ZEV technologies.

# Appendix I

## PROJECTS EXAMINED AND SELECTION CRITERIA

### 1. IBRD and IDA

The exported database includes all “active” documents approved between January 1, 2017 and September 21, 2021 in the following categories:

Agricultural Extension, Research and Other Support Activities, Agricultural Markets, Central Government, Public Administration (all categories), Livestock, Manufacturing, Non-renewable Energy Generation, Oil and Gas, Urban Transport, Other Transport, Railways, Rural and Inter-Urban Roads and Waste Management.

This includes all Adaptable Program Loans, Development Policy Lending, Emergency Recovery Loans, Investment Project Financing, Program-for-Results Financing, Sector Investment and Maintenance Loan, Specific Investment Loans and Technical Assistance Loans.

The total amounts to 1127 projects, from a total of 2994 documents in the entire WBG project database (since January 2017).

The database also includes IDA projects. There are a total of 344 IDA documents in the database.

### 2. IFC

Database includes all “Active Investment Projects (Summary of Investment Information) and Environmental Documents” from between January 2017 and September 2021.

Database includes 1534 documents, of which 1063 are Summary of Investment information and the remaining 471 are Environmental Documents.

### 3. Country Strategies

The Country Strategies documents of the WBG includes a list of 103 countries. The database was compiled from their website on October 1, 2021. Additional columns were added on the right, with specific information extracted from each of the documents in the links.

## LISTS OF PROJECTS OF THE IDB

### 4. IDB

We will consider all Loan Operations in the category “under implementation” on September 29, 2021, approved between 2017 and September 2021. This amounts to a selection of 524 projects from the total list 2,281 operations reported by the IDB. Non-Loan Operations have been omitted (Container, Technical cooperation, guarantees, Finance Product).

This database includes the projects of IDB Lab.

For IDB, this report also analyzed the Database of Contracts Awarded, which is also published by IDB’s website. This database provides information on the large purchases from projects, which includes sector and type of equipment.

The list includes 5,464 contracts awarded between 2017 and September 2021.

### 5. IDB Invest

All projects approved since 2017, with a total amount of 381 projects.

The original database includes only basic information: Project Name, Number, Country, Date and Investment Type. Other information, such as funding and project description, was entered manually with information provided in their website.

## Appendix II

Table of the MDBs methodology for Climate Finance reporting, extracted from MDB's Climate Finance report in 2021

Category	Sub-category	Eligible Activities
1. RENEWABLE ENERGY	1.1. Electricity generation	Wind power
		Geothermal power (only if net emission reductions can be demonstrated)
		Solar power (concentrated solar power, photovoltaic power)
		Biomass or biogas power (only if they result in net reductions in emissions, taking into account production, processing and transportation)
		Ocean power (wave, tidal, ocean currents, salt gradient, and so on)
		Hydropower plants (only if net emission reductions can be demonstrated)
		Renewable energy power plant retrofits
	1.2. Heat production or other renewable energy application	Solar water heating and other thermal applications of solar power in all sectors
		Thermal applications of geothermal power in all sectors
		Wind-driven pumping systems or similar applications
		Thermal applications of sustainably produced bioenergy in all sectors
	1.3. Measures to facilitate integration of renewable energy into grids	New, expanded and improved transmission systems (lines, substations)
		Storage systems (battery, mechanical, pumped storage) that facilitate integration of renewables, or increase renewable energy production
New information and communication technology, smart grid and mini grid		
2. LOWERCARBON AND EFFICIENT ENERGY GENERATION	2.1. Transmission and distribution systems	Retrofit of transmission lines or substations and/or distribution systems to reduce energy use and/or technical losses including improving grid stability or reliability (in the case of capacity expansion, only the portion of the investment that is reducing existing losses is included)
	2.2. Power plants	Thermal power plant retrofit to switch from a more GHG-intensive fuel to a different and less GHG-intensive type of fuel
		Conversion of existing fossil-fuel-based power plant to co-generation technologies that generate electricity in addition to providing heating or cooling
		Energy efficiency improvement in existing thermal power plant

3. ENERGY EFFICIENCY	3.1. Energy efficiency in industry in existing facilities	Industrial energy-efficiency improvement through the installation of more efficient equipment, changes in processes, reduction of heat losses and/or increased wasteheat recovery and/or resource efficiency
		Installation of co-generation plants that generate electricity in addition to providing heating or cooling
		Replacement of an older facility (old facility retired) with a more efficient facility
	3.2. Energy efficiency improvements in existing commercial, public and residential buildings	Energy efficiency improvement in lighting, appliances and equipment, including energy-management systems
		Substitution of existing heating or cooling systems for buildings by co-generation plants that generate electricity in addition to providing heating or cooling
		Retrofit of existing buildings: architectural or building changes that enable reduction of energy consumption
	3.3. Energy efficiency improvements in the utility sector and public services	Energy efficiency improvement in utilities and public services through the installation of more efficient lighting or equipment
		Rehabilitation of district heating and cooling systems
		Reduction of heat loss in utilities and/or increased recovery of waste heat
		Improvement in utility-scale energy efficiency through efficient energy use and loss reduction, or resource efficiency improvements
	3.4. Vehicle fleet energy efficiency and low-carbon fuels	Existing vehicle, rail or boat fleet retrofit or replacement (including the use of lowercarbon fuels, electric or hydrogen technologies), or new vehicle, rail or boat fleets with ultra-low carbon emissions, exceeding available standards
	3.5. Energy efficiency in new commercial, public and residential buildings	Use of highly efficient architectural designs, energy-efficient appliances and equipment, and building techniques that reduce the energy consumption of buildings, exceeding available standards and complying with high energy efficiency certification or rating schemes
	3.6. Energy audits	Energy audits of energy end-users, including industries, buildings and transport systems

4. AGRICULTURE, AQUACULTURE, FORESTRY AND LAND-USE	4.1. Agriculture	Reduction in energy use in traction (such as efficient tillage), irrigation and other agricultural processes
		Agricultural projects that improve existing carbon pools (such as rangeland management, collection and use of bagasse, rice husks or other agricultural waste, reduced tillage techniques that increase carbon content of soil, rehabilitation of degraded lands, peatland restoration, and so on)
		Reduction of non-CO2 GHG emissions from agricultural practices and technologies (for example, paddy rice production, reduction in fertilizer use)
		Resource efficiency in agricultural processes and supply chains
	4.2. Afforestation and reforestation and biosphere conservation	Afforestation (plantations) and agroforestry on non-forested land
		Reforestation on previously forested land
		Sustainable forest management activities that increase carbon stocks or reduce the impact of forestry activities
		Biosphere conservation and restoration projects (including payments for ecosystem services) seeking to reduce emissions from the deforestation or degradation of ecosystems
	4.3. Livestock	Livestock projects that reduce methane or other GHG emissions (for example, manure management with biodigesters, and improved feeding practices to reduce methane emissions)
	4.4. Biofuels	Production of biofuels, including biodiesel and bioethanol (only if net emission reductions can be demonstrated)
4.5. Aquaculture	Reduction in energy use or resource efficiency in aquaculture	
5. NONENERGY GHG REDUCTIONS	5.1. Fugitive emissions	Reduction of gas flaring or fugitive methane emissions in the oil and gas industry
		Coal-mine methane capture
	5.2. Carbon capture and storage	Projects for carbon capture and storage technology that prevent the release of large quantities of CO2 into the atmosphere from fossil fuel use in power generation and process emissions in other industries
	5.3. Air conditioning and refrigeration	Reduction in GHG emissions resulting from industrial process improvements and cleaner production (for example, of cement or chemicals), excluding carbon capture and storage
5.4. Industrial processes	Industrial processes Reduction in GHG emissions resulting from industrial process improvements and cleaner production (for example, of cement or chemicals), excluding carbon capture and storage	

6. WASTE AND WASTEWATER	6.1. Wastewater	Treatment of wastewater, including wastewater collection networks, that reduces GHG emissions (only if substantial net GHG emission reductions can be demonstrated)
	6.2. Solid waste management	Waste management projects that capture or combust methane emissions
		Waste-to-energy projects
7. TRANSPORT	7.1. Urban transport modal change	Urban mass transit
		Non-motorized transport (bicycles and pedestrian mobility)
	7.2. Transport-oriented urban development	Integration of transport and urban development planning (dense development, multiple land-use, walking communities, transit connectivity, and so on), leading to a reduction in the use of passenger cars
		Transport and travel demand-management measures dedicated to reducing pollutant emissions, including GHG emissions (such as high-occupancy vehicle lanes, congestion charging or road pricing, parking management, restriction or auctioning of licence plates, car-free city areas, low-emission zones)
	7.3. Inter-urban transport	Railway transport ensuring a modal shift of freight and/or passenger transport from road or air to rail (improvement of existing lines or construction of new lines)
		Waterway transport ensuring a modal shift of freight and/or passenger transport from road or air to waterways (improvement of existing infrastructure or construction of new infrastructure)
		Bus passenger transport ensuring a modal shift from a higher-carbon mode of public transport
	7.4. Infrastructure for low-carbon and efficient transport	Charging stations and other infrastructure for electric vehicles, hydrogen or dedicated biofuel fuelling
Digital solutions and programmes dedicated to reducing GHG emissions		
8. LOWCARBON TECHNOLOGIES	8.1. Products or equipment	Projects producing components, equipment or infrastructure dedicated to the renewable and energy efficiency sectors, or low-carbon technologies
	8.2. Research and development	Research and development of renewable-energy or energy-efficiency technologies, or low-carbon technologies

9. CROSSCUTTING ISSUES	9.1. Support for national, regional or local policy, through technical assistance or policy lending	National, sectoral or territorial policies/planning/action plans/ planning/institutions dedicated to mitigation, such as NDCs, NAMAs and plans for scaling up renewable energy
		Energy sector policies and regulations leading to climate change mitigation or the mainstreaming of climate action, such as energy efficiency standards or certification schemes; energy-efficiency procurement schemes; renewable energy policies, power market reform specifically designed to enable renewable energy
		Systems for monitoring the emission of greenhouse gases
		Efficient pricing of fuels and electricity (such as subsidy rationalisation, efficient end-user tariffs, and efficient regulations on electricity generation, transmission or distribution, and on carbon pricing)
		Education, training, capacity-building and awareness-raising on climate change mitigation or sustainable energy or sustainable transport; mitigation research
		Other policy and regulatory activities, including those in non-energy sectors, leading to climate change mitigation or mainstreaming of climate action, such as fiscal incentives for low-carbon vehicles, sustainable afforestation standards
	9.2. Carbon finance	Carbon markets and finance (purchase, sale, trading, financing and other technical assistance); includes all activities related to compliance-grade carbon assets and mechanisms
9.3. Supply chain	Measures in existing supply chains dedicated to improvements in energy efficiency or resource efficiency upstream or downstream, leading to an overall reduction in GHG emissions	
10. MISCELLANEOUS	10.1. Other activities with net greenhouse-gas reduction	Any other activity if agreed by MDBs may be counted as climate mitigation finance when the results of ex-ante GHG accounting (undertaken according to commonly agreed methodologies) show emission reductions that are higher than a commonly agreed threshold, and the project is consistent with a pathway towards development characterized by low GHG emissions

## Notes and bibliography

All websites were checked in October 2021

- 1 Pangestu, Mari Elka “Time to decarbonize transport for a green, resilient and inclusive recovery”, 2021 <https://blogs.worldbank.org/voices/time-decarbonize-transport-green-resilient-and-inclusive-recovery>
- 2 UNFCCC, Paris Agreement, 2015 <https://unfccc.int/process-and-meetings/the-paris-agreement/the-paris-agreement>
- 3 IPCC 2019, Global Warming of 1.5 [https://www.ipcc.ch/site/assets/uploads/sites/2/2019/06/SR15\\_Summary\\_Volume\\_Low\\_Res.pdf](https://www.ipcc.ch/site/assets/uploads/sites/2/2019/06/SR15_Summary_Volume_Low_Res.pdf)
- 4 UNFCCC, List of International Governmental Organizations, 2021 <https://unfccc.int/process/parties-non-party-stakeholders/non-party-stakeholders/admitted-igos/list-of-admitted-igos>
- 5 MDBs, Mainstreaming Climate Action Within Financial Institutions <https://www.worldbank.org/content/dam/Worldbank/document/Climate/5Principles.pdf>
- 6 MDBs, Common Principles for Climate Mitigation Finance Tracking, 2015 [https://www.eib.org/attachments/documents/mdb\\_idfc\\_mitigation\\_common\\_principles\\_en.pdf](https://www.eib.org/attachments/documents/mdb_idfc_mitigation_common_principles_en.pdf)
- 7 MBDs, The MDBs’ alignment approach to the objectives of the Paris Agreement: working together to catalyze low-emissions and climate-resilient development <https://thedocs.worldbank.org/en/doc/784141543806348331-0020022018/original/JointDeclarationMDBsAlignmentApproachtoParisAgreementCOP24Final.pdf>
- 8 MDBs High Level MDB Statement 2019 <https://www.adb.org/sites/default/files/page/41117/climate-change-finance-joint-mdb-statement-2019-09-23.pdf>
- 9 World Bank Group: Environmental and Social Framework <https://www.worldbank.org/en/projects-operations/environmental-and-social-framework>
- 10 WBG, Climate Change Action Plan 2016–2020 <https://openknowledge.worldbank.org/handle/10986/35799>
- 11 WBG, Change Action Plan 2021–2025 <https://openknowledge.worldbank.org/handle/10986/35799?ltclid=&locale-attribute=es>
- 12 WBG, Green, Resilient and Inclusive Development (GRID) <https://thedocs.worldbank.org/en/doc/9385bfef1c330ed6ed972dd9e70d0fb7-0200022021/green-resilient-and-inclusive-development-grid>
- 13 The WBG has focused its transport sector on EVs, without specific mention of other solutions, like hydrogen.
- 14 WBG, UITP, ESMAP, Electric Mobility & Development, 2018 <https://documents1.worldbank.org/curated/en/193791543856434540/pdf/132636-EMADv4-web.pdf>
- 15 IFC Climate implementation Plan, 2016 [https://www.ifc.org/wps/wcm/connect/cf8ac00f-7abc-4e67-9cd5-3c473052be08/IFC\\_Climate\\_Implementation\\_Plan\\_03152016\\_WBG\\_v2.pdf?MOD=AJPERES&CVID=lgbHEjb](https://www.ifc.org/wps/wcm/connect/cf8ac00f-7abc-4e67-9cd5-3c473052be08/IFC_Climate_Implementation_Plan_03152016_WBG_v2.pdf?MOD=AJPERES&CVID=lgbHEjb)
- 16 IFC has an exclusion list, 2007 [https://www.ifc.org/wps/wcm/connect/topics\\_ext\\_content/ifc\\_external\\_corporate\\_site/sustainability-at-ifc/company-resources/ifcexclusionlist](https://www.ifc.org/wps/wcm/connect/topics_ext_content/ifc_external_corporate_site/sustainability-at-ifc/company-resources/ifcexclusionlist)
- 17 IFC: Performance Standards, 2012 [https://www.ifc.org/wps/wcm/connect/Topics\\_Ext\\_Content/IFC\\_External\\_Corporate\\_Site/Sustainability-At-IFC/Policies-Standards/Performance-Standards](https://www.ifc.org/wps/wcm/connect/Topics_Ext_Content/IFC_External_Corporate_Site/Sustainability-At-IFC/Policies-Standards/Performance-Standards)
- 18 IDB Bahamas Resolution [https://iadb.libguides.com/ld.php?content\\_id=43317923](https://iadb.libguides.com/ld.php?content_id=43317923)
- 19 IDB Delivering a Climate Agenda for LAC: 2020 <https://publications.iadb.org/publications/english/document/Delivering-Climate-Agenda-for-LAC-IDB-Group-Actions-to-2020.pdf>
- 20 IDB Climate Change Action Plan 2021 <https://publications.iadb.org/publications/english/document/Inter-American-Development-Bank-Group-Climate-Change-Action-Plan-2021-2025.pdf>
- 21 Global Initiative to Decarbonize Transport, 2019 <https://blogs.worldbank.org/voices/time-decarbonize-transport-green-resilient-and-inclusive-recovery>
- 22 Glasgow Financial Alliance for Net Zero (GFANZ), 2021 <https://unfccc.int/news/new-financial-alliance-for-net-zero-emissions-launches>

- 23 Sustainable Electric Mobility: Building Blocks and Policy Recommendations, 2021 [https://www.sum4all.org/data/files/buildingblocksandpolicyrecommendations\\_english.pdf](https://www.sum4all.org/data/files/buildingblocksandpolicyrecommendations_english.pdf)
- 24 IEA World Energy Outlook 2021 <https://iea.blob.core.windows.net/assets/88dec0c7-3a11-4d3b-99dc-8323ebfb388b/WorldEnergyOutlook2021.pdf>
- 25 United States Department of the Treasury Department, Fossil Fuel Energy Guidance for MDBs 2021 - Executive Order 140008 <https://home.treasury.gov/news/press-releases/jy0323>
- 26 WBG: Electrification of Public Transport: A Case Study of the Schenzhen Bus Group <https://openknowledge.worldbank.org/bitstream/handle/10986/35935/Electrification-of-Public-Transport-A-Case-Study-of-the-Shenzhen-Bus-Group.pdf?sequence=1&isAllowed=y>
- 27 IEA World Energy Outlook 2021 <https://iea.blob.core.windows.net/assets/88dec0c7-3a11-4d3b-99dc-8323ebfb388b/WorldEnergyOutlook2021.pdf>
- 28 Germanwatch, New Climate Institute Submission to the call for evidence: information and data for the preparation of the 2020 Biennial Assessment and Overview of Climate Finance Flows <https://unfccc.int/sites/default/files/resource/MDBmemos-All-with-letter.pdf>
- 29 From the total amount of 2,994 projects, we made a selection of the projects in these categories:  
This comprises all Adaptable Program Loans, Development Policy Lending, Emergency Recovery Loans, Investment Project Financing, Program-for-Results Financing, Sector Investment and Maintenance Loan, Specific Investment Loans and Technical Assistance Loans.  
Agricultural Extension, Research and Other Support Activities, Agricultural Markets, Central Government, Public Administration (all sub-categories), Livestock, Manufacturing, Non-renewable Energy Generation, Oil and Gas, Urban Transport, Other Transport, Railways, Rural and Inter-Urban Roads and Waste Management.
- 30 In a subcomponent of the project, \$880,000 will be used to purchase electric vehicles for security within DRL1141, rehabilitation of Port of La Manzanilla. The rest of this project was considered ICE infrastructure.
- 31 Some projects related to electricity efficiency were not considered as there was no information on the adoption of renewable energy.
- 32 This includes Construction Machinery and related equipment and Heavy Construction categories.
- 33 This includes the categories: Motor vehicles, Motor parts and accessories, Motor vehicles and equipment, Motorcycles, bicycles and parts.
- 34 The eligible categories and activities that are classified as climate finance are Urban transport modal change, transport oriented urban development (integration of transport and planning), and transport and travel demand management, Interurban railway transport ensuring a modal shift or improvement of existing lines, Waterway transport ensuring modal shift, Bus passenger transport ensuring shift from higher carbon mode of public transport, Charging stations and infrastructure for ZEVs, Hydrogen or biofuels, Digital solutions.
- 35 Corporate Accountability, Still a Big Con, 2021 <https://www.corporateaccountability.org/resources/fact-file-still-a-big-con/>

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