Deutsche Bank

Deutsche Bank

Green Financing Framework

June 2022

Table of contents

1. Sustainability at Deutsche Bank

Deutsche Bank's commitment to sustainability is long-standing and means for us a sustainable business performance that balances economic success with environmental and social responsibility. It aims to foster business that enables sustainable economic growth and societal progress, by creating a positive impact for our clients, our employees, our investors, and our communities.

Our business objectives are clear: facilitating capital flows and thereby fueling economic development. This, in turn, supports reaching global goals, such as increased resource productivity and greater use of clean technologies. It is our responsibility to further strengthen these benefits while also taking into consideration and curbing any possible negative consequences of our business activities. Therefore, we monitor global developments and evaluate their impact on our business. We value open dialogue with our stakeholders and respect their diverse expectations. This helps us to make informed decisions while continually shaping our sustainability approach.

We aim to provide products and services that create value for society and respond to global challenges such as climate change. Building on our expert knowledge, we seek to identify, stimulate, and actively support measures that counteract climate change and support sustainable growth. The best way we can support the transformation towards a more viable society is by advising clients in a responsible manner and putting our financial skills for sustainable solutions at their disposal. Therefore, we make financial resources available to clients and sectors that promote sustainable development. As a global bank, we can make an important contribution to raising the capital needed to implement the Paris Agreement.

We help our clients to develop, acquire, and on-sell low-carbon businesses and assets. We are one of the top European private-sector project financiers of clean energy, while our financing and advisory services support other low-carbon and clean-tech businesses. Furthermore, Deutsche Bank is a promoter of the green bond market. We are a member of the International Capital Markets Association (ICMA) Sustainable Finance Organization, and as part of our liquidity reserve investments, we have invested into a portfolio of high-quality green bonds.

Deutsche Bank is highly committed to promoting and financing a paradigm shift towards a low-emissions economy and climate-resilient development pathways. We signed the Paris Pledge for Action, committing us to accelerate the transformational changes needed to reduce global warming to within acceptable limits. Public and private-sector collaboration is, and will continue to be, critical in promoting and financing a shift towards a low-emissions global economy and climate-friendly development.

In April 2021, Deutsche Bank became a founding member of the Net Zero Banking Alliance (NZBA). An initial group of 43 banks have joined the NZBA, each committing to align the operational and attributable emissions from their portfolios with pathways to net-zero by 2050 or sooner. In 2022, we disclosed the financed emissions of our loan portfolio for the first time, which will be further developed as part of our NZBA commitment.

In May 2020, we announced that we intend to achieve €200+ billion in sustainable financing and investment by year-end 2025. As of the first quarter of 2022, we have achieved €177 billion in sustainable financing and investments, putting us ahead of our target. Many of these financing transactions were of high strategic importance to our clients, and moreover helped to advance and develop the sustainable finance market itself. We are now committed to achieving €200 billion in sustainable financing and investment by year-end 2022, and will deliver €100+ billion annually until 2025.

With the issuance of Deutsche Bank Green Financing Instruments, we aim to contribute to the further advancement of the sustainable finance market and raise funds that match those we lend to our clients to achieve their goals in transforming their business in a climate-friendly manner, as well as to profit from the manifold opportunities provided by a low-emissions economy.

Our contribution to a low-carbon economy starts with our own operations, which we try to make as efficient as possible. Our Management Board endorses the bank's commitment to carbon-neutrality. Unavoidable carbon emissions covering GHG Scopes 1 and 2 and business travel have been offset since 2012, by purchasing and retiring high-quality emissions reduction certificates. We actively minimize the environmental impact from our direct business operations by continuously improving our environmental performance, using resources as efficiently as possible, leveraging the advantages of new technology, optimizing building operations, reducing business travel, and increasing the proportion of renewable energy that we use. To reinforce our commitment, we signed the Net Zero Carbon Buildings Commitment and joined the EP100 initiative in the second quarter of 2022.

2. Green Financing Framework

2.1. Structure of the Framework

As part of our broader sustainability strategy, Deutsche Bank AG has established this Green Financing Framework (the **Framework**). Our goals are to ensure that our clients have access to financing that helps them to pursue the necessary transition to an environmentally sustainable future and to ensure that our commitment and beliefs have been put into practice with this Framework.

The purpose of this Framework, which may be updated from time to time, is to have a single robust methodology in place for the future issuance of "use of proceeds"-based **Green Financing Instruments**, which include, but are not limited to **(Covered) Bonds**, **Commercial Papers (CPs)**, **Repurchase Agreements (Repos)**, and **Deposits**. Instruments issued under the Framework can be of any seniority, but in any case, rank pari passu with any other conventional (non-green) instrument of similar status and subordination.

Generally, the Framework is aligned with the ICMA Green Bond Principles (**GBP**)[1], which are a set of voluntary guidelines that recommend transparency and disclosure and promote integrity in the development of the green financing market. The Framework as such consists of the following components:

- Use of proceeds
- Process for asset evaluation and selection
- Management of proceeds
- Reporting
- External review

In formulating and updating the Framework, care was also taken to reflect the United Nations Sustainable Development Goals (**SDGs**), the proposed regulation that provides a standard for the designation of instruments such as European Green Bond Standards (**EU GBS**)[2] and the Delegated Acts of the European taxonomy for sustainable activities (**EU Taxonomy**) on climate change mitigation[3].

Potential changes to the GBP or developments with regards to the EU GBS or EU Taxonomy will be reflected in future versions of the Framework, which will either keep or improve the current levels of transparency and reporting and will provide for external review by an entity that is eligible or accredited under any such prevailing principles or standards.

2.2. Use of proceeds

An amount corresponding to the net proceeds from any Green Financing Instrument issued under the Framework shall be used to finance Deutsche Bank's Green Asset Pool (the **Green Asset Pool**). The pool is composed of both loans to and investments in corporations, assets, or projects that support the transition to a clean, energy-efficient, and environmentally sustainable global economy and are in line with the requirements of this Framework (**Eligible Green Assets**). Deutsche Bank commits, on a best-efforts basis, to reach full allocation within one year following each Green Financing Instrument issuance.

In order to be eligible for inclusion in the Green Asset Pool, the loan or investment must fall into at least one of the sectors described in the table below (**Eligible Sectors**). In the case of general corporate loans, at least 90% of the turnover of the corporation needs to be attributable to Eligible Sectors and fulfill the respective requirements. In addition to outlining the required eligibility criteria, the table below also maps the Eligible Sectors to the relevant GBP category and the SDGs.

[1] https://www.icmagroup.org/green-social-and-sustainability-bonds/green-bond-principles-gbp/
[2] https://ec.europa.eu/info/publications/sustainable-finance-teg-green-bond-standard_en
[3] https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=PI_COM:C(2021)2800

GBP category	SDG mapping	Eligibility criteria

Renewable Energy	7 AFFORDABLE AND CLEAN ENERGY
	13 CLIMATE ACTION
		Loans or investments in corporations, assets, or projects related to renewable energy projects, including, but not limited to, **wind** (onshore/offshore), **solar** (photovoltaic/concentrated solar power), **geothermal energy**, **hydro power** and **biomass.**
		
		<u>Eligibility requirements under the current version of the EU Taxonomy[4] to be considered:</u>
		– Asset/project loans: life-cycle emissions threshold of 100 g CO_2e/kWh for electricity production from geothermal energy, and renewable non-fossil gaseous and liquid fuels
		– Electricity generation facilities that produce electricity from hydropower, meeting at least one of the following criteria
		    ○ electricity generation facility is a run-of-river plant without an artificial reservoir
		    ○ the power density of the electricity generation facility is above 5 W/m^2
		    ○ Life-cycle emissions threshold of 100 g CO_2e/kWh for electricity production
		– Biomass-specific: facilities using certified feedstock and operating above 80% of GHG emissions reduction in relation to the relative fossil fuel comparator set out in RED II, increasing to 100% by 2050

Energy Efficiency	7 AFFORDABLE AND CLEAN ENERGY 13 CLIMATE ACTION	Loans or investments in corporations, assets, or projects related to the **development and implementation of products or technology that reduce the use of energy.** Examples include, but are not limited to, energy efficient lighting (e.g. LEDs), energy storage (e.g. fuel cells), improvement in energy services (e.g. smart grid meters). <u>Eligibility requirements under the current version of the EU Taxonomy to be considered:</u> – Energy efficiency is mentioned across various activities, as such no general threshold can be applied, and decisions need to be made on a case-by-case basis depending on the sector and activity-specific background.
Green Buildings	9 INDUSTRY, INNOVATION AND INFRASTRUCTURE 11 SUSTAINABLE CITIES AND COMMUNITIES 13 CLIMATE ACTION	Loans or investments in corporations, assets, or projects related to the **construction, acquisition, operation, and renovation of new and existing buildings** (with a minimum energy-efficiency upgrade) in the **commercial and residential real estate sector,** meeting at least one of the following criteria: **Buildings that meet at least one of the following certifications:** – BREEAM "Excellent" or higher – DGNB "Gold" or higher – Green Mark "Gold Plus" or higher – Green Star "5 Star" or higher – HQE "Excellent" or higher – LEED "Gold" or higher – NABERS Energy "5 Star" or higher – Where needed, other internationally and/or nationally recognized certification that is comparable to the above thresholds **For buildings built after December 31, 2020:** – Net primary energy demand of the new construction must be at least 10% lower than the primary energy demand resulting from the relevant nearly zero-energy building (NZEB) requirements. **For buildings built before December 31, 2020:** – Buildings within the top 15% of the national or regional building stock expressed as operational Primary Energy Demand (PED) and demonstrated by adequate evidence (see below), which at least compares the performance of the relevant asset to the performance of the national or regional stock built before December 31, 2020, and at least distinguishes between residential and non-residential buildings; or – Buildings[5] with an Energy Performance Certificate (EPC) class of at least A or B; or Buildings[6] that satisfy the minimum requirements as defined in the *Energieeinsparverordnung 2009 (EnEV 2009)*

[4] Delegated act on sustainable activities for climate change adaptation and mitigation objectives: https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32021R2139
[5] Only for German residential real estate buildings.
[6] Only for German residential real estate buildings.

GBP category	SDG mapping	Eligibility criteria
Green Buildings (continued)		For its loan portfolio related to residential real estate activities, Deutsche Bank worked with the engineering consultant Drees & Sommer to develop a robust methodology for selecting energy-efficient residential mortgages from its loan portfolio. It is at Deutsche Bank's discretion whether to also use other information as proxy to derive compliance with the eligibility criteria. The selection process takes into account the national and regional backgrounds in which the buildings are located. Further information on the eligibility threshold and selection process can be found in the Annex of this Framework. **Renovation of existing buildings** that meet at least one of the following criteria: – Energy savings of at least 30% in comparison to the baseline performance of the building before the renovation – Building renovation compliant with energy performance standards set in the applicable building regulations for "major renovations" transposing the Energy Performance of Buildings Directive Loans or investments in assets or projects related to the installation, maintenance, and repair of individual measures that improve the energy efficiency of the buildings, including, but not limited, the upgrade of windows, improvement of insulation, installation of heating, deployment of smart meters, and installation of renewable energy generation capacity. Buildings that are used for the purpose of utilization in the ordinary course of business by fossil fuel extraction or the manufacturing of fossil fuel activities are explicitly excluded.
Clean Transportation		Loans or investments in corporations, assets, or projects related to the development, manufacture, acquisition, financing, leasing, renting, and operation of means of **clean transportation, including required and dedicated components, for rail and road transport (passenger and freight), water transport (passenger and freight), personal mobility or transport devices,** and **infrastructure for low-carbon transport (land and water),** meeting at least one of the following criteria**:** <u>Eligibility requirements under the current version of the EU Taxonomy to be considered:</u> – Any vehicles or vessels with zero direct (tailpipe) CO_2emissions – **Passenger and freight rail transport** using trains and wagons that have zero direct (tailpipe) CO_2emissions when operated on a track with the necessary infrastructure, and use a conventional engine where such infrastructure is not available (bi-mode) – **Other means of transportation in an urban and suburban context** that conform to the respective vehicle-specific thresholds set by the EU Taxonomy – **Until December 31, 2025,** hybrid and dual-fuel vessels that derive at least 25% (**sea and coastal water transport**) and 50% (**inland passenger water transport**) of their energy from fuels that have zero direct (tailpipe) CO_2 emissions or from plug-in power for their normal operation – **Other means of water transportation** that conform to the respective vessel-specific thresholds set by the EU Taxonomy confirmed on an individual basis by third party – **Personal mobility or transport devices** where the propulsion comes from the physical activity of the user, from a zero-emissions motor, or a mix of zero-emissions motor and physical activity, including the provision of freight transport services by (cargo) bicycles – **Infrastructure required for zero direct CO_2 emissions transport and low-carbon transport**, including infrastructure/equipment for electric vehicles and active mobility Activities dedicated to the transportation of fossil fuel are explicitly excluded

GBP category	SDG mapping	Eligibility criteria
Information and Communications Technology (ICT)	9 INDUSTRY, INNOVATION AND INFRASTRUCTURE 13 CLIMATE ACTION	Loans or investments in corporations, assets, or projects related to acquisition and capital expenditure relating to **energy-efficient data centers and equipment** (buildings, cooling, power and data distribution equipment, and monitoring systems) for **data processing, hosting, and related activities** – storage, manipulation, management, movement, control, display, switching, interchange, transmission, or processing of data through data centers, including edge computing – meeting one of the criteria below: – The operator of the activity has implemented all relevant practices listed as "expected practices" in the most recent version of the European Code of Conduct on Data Centre Energy Efficiency, or in the CEN-CENELEC document CLC TR50600-99-1 "Data center facilities and infrastructures– Part 99-1: Recommended practices for energy management[7]"; and the implementation of these practices is verified by an independent third party and audited at least every three years – The data center meets the Power Usage Effectiveness (PUE) thresholds defined by the bank as the key metric used under the European Code of Conduct
	THE GLOBAL GOALS For Sustainable Development	Other Eligible Sectors might be added upon future updates of the Framework.

Exclusions

Deutsche Bank explicitly excludes non-committed or non-performing exposures, as well as loans to businesses or projects that are involved in the following operations from being eligible for the Green Asset Pool:

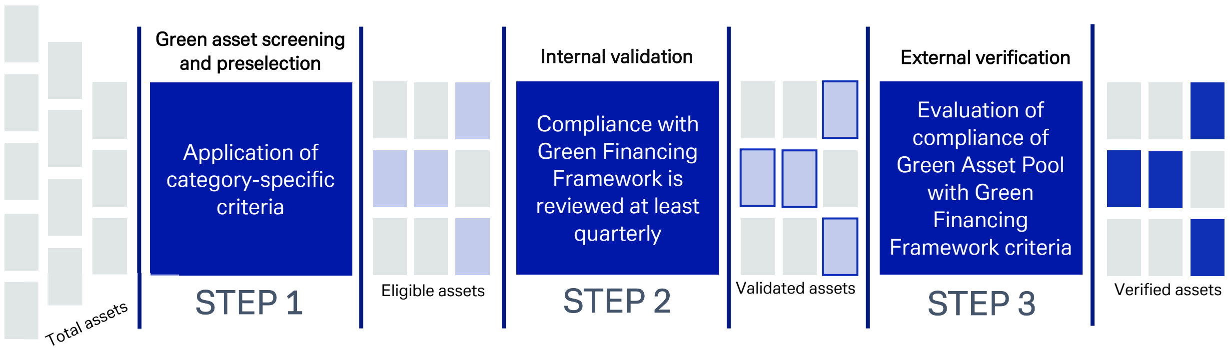
- Activities related to the exploration and production of fossil fuels
- Nuclear and nuclear-related technologies
- Weapons, alcohol, tobacco, gambling, and adult entertainment
- Deforestation and degradation of forests

In addition to the requirements specific to the Eligible Sectors, all loans originated by Deutsche Bank that are potentially eligible for inclusion in the Green Asset Pool are tested against the bank's Environmental and Social Policy Framework (**ES Policy Framework**). The ES Policy Framework evaluates potential environmental and social risks that could arise from transactions or interactions with clients, and with specific principles and guidelines, determine the best course of action.

[7] Issued on July 1, 2019 by the European Committee for Standardization (CEN) and the European Committee for Electrotechnical Standardization (CENELEC), (version of 30 June 2022: https://www.cenelec.eu/dyn/www/f?p=104:110:508227404055501::::FSP_ORG_ID,FSP_PROJECT,FSP_LANG_ID:1258297,65095,25

2.3. Process for asset evaluation and selection

To identify Eligible Green Assets that are in line with the Eligible Sectors and related criteria defined in the "Use of proceeds" section, Deutsche Bank follows a three-step process: 1. Green asset screening and preselection, 2. Internal validation, and 3. External verification.



Step 1: Green asset screening and preselection

For each of the Eligible Sectors, Deutsche Bank has put in place category-specific selection criteria that are used by the respective originating business areas to identify eligible items in their portfolio. The selection criteria are in accordance with conditions outlined under "Use of proceeds" (section 2.2.) and might be extended by the evolving criteria around the do-no-significant-harm assessment as proposed through the EU Taxonomy in the future.

Step 2: Internal validation

Deutsche Bank has formed a Green Financing Forum (the **Forum**) consisting of representatives from Group Sustainability, Treasury, various control functions, and origination/front office units and convenes at least at quarterly intervals. Selected members of the Forum are assigned dedicated responsibility to oversee and perform the governance process of Deutsche Bank's green bond operation.

In fact, Group Sustainability bears the responsibility for performing the internal validation of preselected assets provided by the origination/front office units. The internal validation process ensures compliance of preselected assets with the Framework and an ES due diligence will be conducted to confirm that Eligible Assets do not have material negative environmental and/or social impact. Group Sustainability has full discretion to object to the inclusion of any asset, ultimately blocking them from being included in the Green Asset Pool in case of relevant concerns. Generally, the identification of Eligible Green Assets and inclusion in the Green Asset Pool is a mere designation and does not imply nor prevent any change in ownership, pledge or lien for the benefit of third parties and is a process independent from the allocation of any financial assets as collateral for any financing transactions[8]. Furthermore, Group Sustainability and Treasury are in charge of any further developments of the Deutsche Bank's Green Financing Framework. The Forum will be informed and/or consulted on the inclusion of newly added green assets, as well as on adjustments to the Framework.

Potential future changes to the Framework's selection criteria will not affect the treatment of Eligible Green Assets retroactively, in other words Eligible Green Assets that went successfully through the preselection and validation steps will not be affected by ex-ante Framework changes and will remain in the Green Asset Pool. Ex-post removal (other than through maturity or sale of the asset) or substitution of assets from the Green Asset Pool is generally possible if new information concerning Eligible Green Assets emerge that warrant their removal from the Green Asset Pool. A process for such removal will also be overseen by Group Sustainability and Treasury.

[8] Eligible Green Assets already included in the use of proceeds of an outstanding green financing instrument will be excluded from being eligible for the inclusion into the Green Asset Pool.

Step 3: External verification

A reputable verifier is mandated to evaluate, on an annual basis, the compliance of the Green Asset Pool with the requirements set by this Framework. Any issue regarding one or multiple green assets in the pool raised by the verifier in this process can lead to the ex-ante exclusion of the respective asset(s), following the exclusion process through as described in Step 2.

2.4. Management of proceeds

An amount corresponding to the net proceeds of any Green Financing Instrument issued by Deutsche Bank under the Framework, irrespective of the legal form of the instrument, will be used to finance Deutsche Bank's Green Asset Pool. The Eligible Green Assets stem from all different Eligible Sectors as defined under "Use of proceeds" (section2.2.), subject to the asset selection and evaluation process. The Green Asset Pool is expected to grow in size over time as further sectors are added to the Framework.

Eligible Green Assets validated by Group Sustainability are documented in the Deutsche Bank Green Asset Inventory (the Inventory), which represents the technical mapping of the Green Asset Pool. The Inventory is populated based on information provided by all parties involved in the asset selection process. Flagging assets to be documented in the Inventory is a mere designation and does not imply any change in ownership, pledge, or lien for the benefit of third parties or change in assignment to a legal entity, branch, or division.

Deutsche Bank strives, at any point in time, to maintain a larger total amount of Eligible Green Assets than the total net proceeds of all Green Financing Instruments outstanding. To maintain a buffer of Eligible Green Assets in the Inventory over net proceeds of Green Financing Instruments, Deutsche Bank is dedicated to substituting maturing loans or other financings with an appropriate alternative as timely as practically possible. The Inventory is routinely monitored by Deutsche Bank's Treasury Unit to detect potential shortfalls. Should a shortfall occur, the Treasury Unit will direct, at its own discretion, the shortfall amount towards its liquidity portfolio, consisting of cash and/or cash equivalents, and/or other liquid marketable instruments.

2.5. Reporting

As long as there is any Green Financing Instrument outstanding, Deutsche Bank is committed to publishing relevant information and documents regarding our Green Financing Instruments in a dedicated Green Financing Report, which will be made available on our investor relations website (www.db.com/ir/) on an annual basis. The report is split into two parts – the allocation reporting and the impact reporting – whereby each report will contain details including, but not limited to:

Allocation reporting

- Confirmation that the use of proceeds of Green Financing Instruments outstanding are in alignment with the eligibility criteria set by the Framework
- The total amount of outstanding Green Financing Instruments in the respective categories (bonds, deposits, etc.) and the share of proceeds used for financing or refinancing purposes
- The amount of net proceeds allocated within each Eligible Sector, as well as the balance of net proceeds not yet allocated to Eligible Green Assets (if any)
- In addition, the reporting may include, but is not required to, illustrative examples describing Eligible Green Assets to which net proceeds of Green Financing Instruments have been allocated, which are subject to confidentiality commitments to clients

Impact reporting

Subject to feasibility and data availability, the impact reporting will focus on the following information:

- Asset-specific results (where possible) and related environmental impact indicators (such as CO_2 emissions avoided)
- Asset category aggregated results and related environmental impact indicators (such as CO_2 emissions avoided)

An overview of selected impact indicators for the respective categories to be financed are outlined in the Appendix of this Framework. In the event that other Eligible Sectors are added in the future, the Framework update would also include the addition of the respective impact reporting indicators for those asset categories.

2.6. External review

This Framework has been reviewed by ISS ESG. The results are documented in a Second Party Opinion, which confirms that the Framework meets the GBP at the time of its publication. The Second Party Opinion will be made available on Deutsche Bank's investor relations webpage (www.db.com/ir/).

In order to ensure sustained compliance of all issued Green Financing Instruments with the methodology set out in this Framework, Deutsche Bank will further appoint ISS ESG or any other party as successor for ISS ESG as an annual verifier.

3. Appendix

3.1. Eligibility criteria for residential real estate buildings located in Germany

To meet the eligibility criteria, the energy demand of residential real estate buildings located in Germany should not exceed the thresholds shown below:

Property type	Primary energy demand (PED)
For residential buildings built after December 31, 2020:	
Small single-family house (up to 149 m^2)	63.9 kWh per m^2 p.a.
Large single-family house (up to 296 m^2)	37.8 kWh per m^2 p.a.
Small multi-family house (up to 474 m^2)	45.9 kWh per m^2 p.a.
Large multi-family house (up to 3,811 m^2)	39.6 kWh per m^2 p.a.
For residential buildings built before December 31, 2020:	
All buildings	75 kWh per m^2 p.a.

In addition to the information on primary energy demand, it is at Deutsche Bank’s discretion to also use other information as proxy to derive compliance with the eligibility criteria. The information may include, but is not limited to, building certification, energy performance certificates, compliance with minimum requirements as defined by applicable legislation, as well as information of the promotional program for energy-efficient housing provided by promotional banks.

3.2 Impact reporting

GBP category, incl. Eligible Green Assets	Exemplary result indicators	Environmental impact indicators
Renewable Energy	– Share of renewable energy in electricity consumption – Number of renewable energy projects being financed	– Annual GHG emissions reduced/avoided in tonnes of CO_2e – Annual renewable energy generation in MWh/GWh (electricity) (other energy savings) – Capacity of renewable energy plant(s) (incl. windmills) constructed or rehabilitated in MW
Energy Efficiency	– Number of projects being financed – Number of LEDs, smart meter grids, or any other energy-saving applications installed	– Annual energy consumption saved through measures in kWh – Annual GHG emissions reduced/avoided in tonnes of CO_2e
Green Buildings	– Number of newly constructed buildings being financed – Number of buildings for which upgrades/renovations were financed	– Annual energy consumption in kWh/m² of gross building area; and % of energy use reduced/avoided vs. local baseline/building – If relevant, % of renewable energy generated on-site (specifying the relevant renewable energy form)
Clean Transportation	– Number of projects being financed – Number of vehicles/vessels being financed – Number of vehicles for which the provision of components was financed – Number of infrastructures for clean and low-carbon transportation being financed	– Annual tailpipe GHG emissions reduced/avoided in tonnes of CO_2e – Weighted average fleet carbon intensity based on the manufacturer data
Information and Communications Technology (ICT)	– Number of newly constructed data centers being financed – Number of upgraded/funded data centers being financed	– Annual energy consumption saved through measures in kWh – Annual GHG emissions reduced/avoided in tonnes of CO_2e – Design average annual PUE