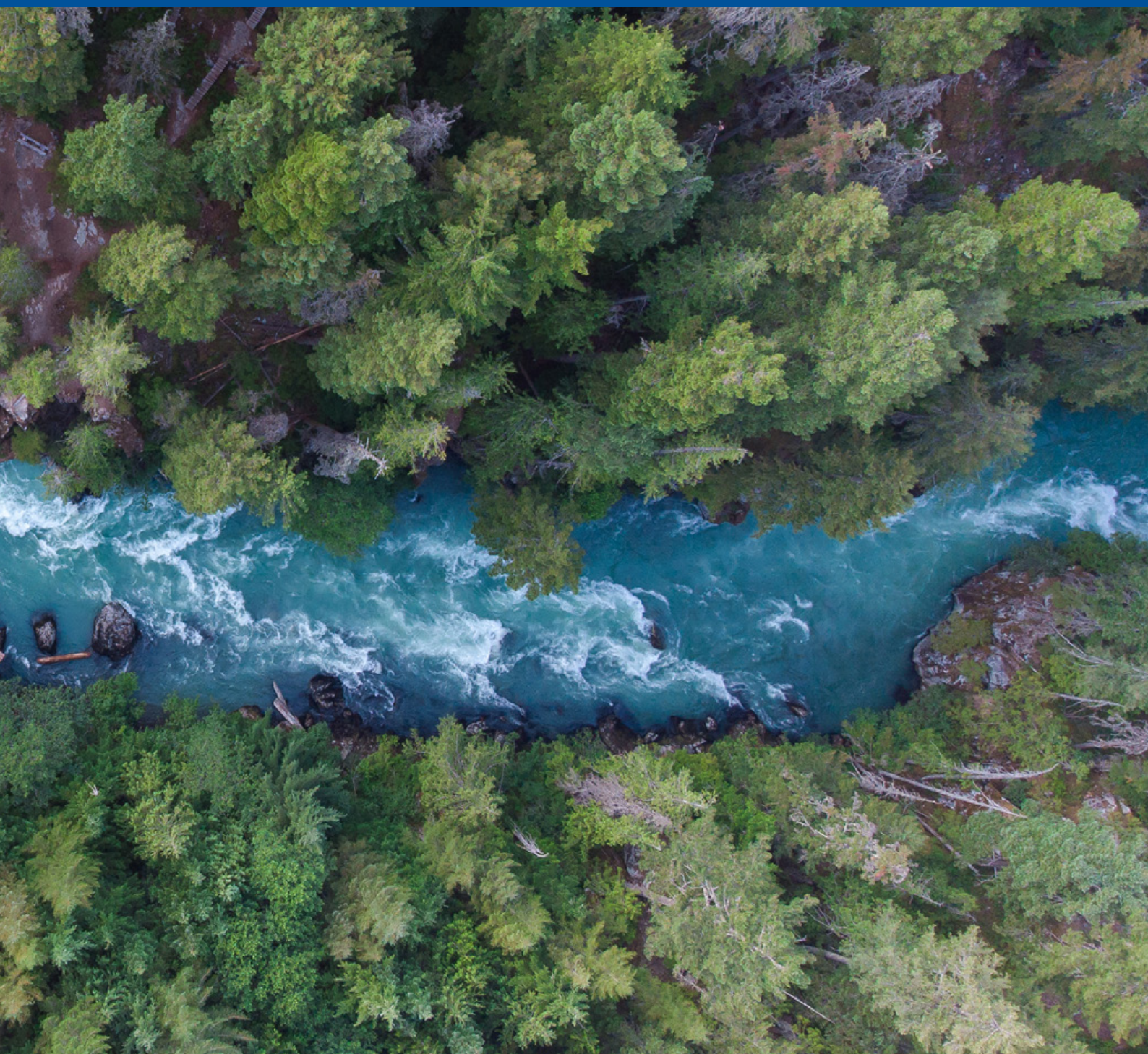
European Bank
for Reconstruction and Development

# TASK FORCE ON CLIMATE-RELATED FINANCIAL DISCLOSURES

## REPORT 2023



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# Foreword

The climate crisis and the degradation of the natural environment continue to gather pace against a backdrop of geopolitical instability and regional conflict. The necessary action can only be achieved with a step-change in ambition, policies and, critically, levels of investment to deliver outcomes. Faced with these challenges, the European Bank for Reconstruction and Development (EBRD) has a key role to play in aiding the regions in which it operates to achieve their carbon transition and climate adaptation goals.

The pace at which these goals are achieved will depend on both capital and capacity building; the EBRD plays a pivotal role in both. The fact that all of the EBRD's activities have been aligned with the goals of the Paris Agreement since 1 January 2023 facilitates and accelerates the transition towards a sustainable future in the economies where it operates.

In 2023, the EBRD mobilised a total of €26.2 billion, more than €20 billion of it for green projects. However, significantly more capital is needed to deliver change on the scale required. This means a global reallocation of capital to those making change happen. A significant key to unlocking this reallocation is the provision of transparent, reliable, climate-related information to enable investors to distinguish between those taking the difficult path of transition and those avoiding it.

Consequently, the EBRD has been a strong supporter of the Task Force on Climate-related Financial Disclosures (TCFD) and has committed itself to not only developing its own compliance, but also participating in industry debate, experimentation and helping to define best practice.

This is the EBRD's fifth TCFD report, in which it continues to expand its content and coverage, sharing the advancements made on the Bank's climate risk stress-testing, as well as further refinements of the Bank's climate risk assessment methodologies.

This may well be the last time the EBRD reports under a TCFD heading, as it is committed to evolving its disclosures in line with emerging international standards and best practices. Accordingly, as the TCFD recommendations are subsumed into the International Sustainability Standards Board (ISSB) standards, the Bank expects to disclose in accordance with ISSB S1 and S2 no later than the 2025 financial year.

The EBRD's commitment to openness and disclosure to international standards, as illustrated here in this foreword and in the document that follows, remains resolute. However, the Bank also realises that despite progress on agreeing a common framework, the work is incomplete. More needs to be done to ensure that disclosures lead to better decisions by investors, in turn supporting a meaningful transition. Disclosure is a necessary condition for redirecting capital, but not a sufficient one. Investors and policymakers need to make wise choices in interpreting and responding to the climate data they receive.

In particular, we all need to make good use of the disclosure of financed emissions. The EBRD believes strongly in transparent disclosure of Scope 3 emissions, including financed and facilitated emissions. The Bank made an initial disclosure of such emissions in the 2022

TCFD report and has expanded the scope of its portfolio coverage this year, refining the quality of its disclosure. It is committed to further improvements in both of these areas.

Financed emissions are an essential metric. However, as a global community, we need to make sure that simplistic use of that measure does not lead to a reduction in private-sector investment for companies in high-emitting sectors that have credible transition plans. Denying such companies the capital to complete the transition will delay decarbonisation. Avoiding this potential hazard will require investor education, more granular and reliable measures, and like-for-like measurement over time to ensure that material progress is made.

The Bank is committed to a balanced approach in supporting the transition to a sustainable future and recognises the need to allocate resources and investment on two fronts: nurturing and accelerating the development of clean and renewable energy sources while simultaneously enabling high-emitting entities to transform their operations through innovative solutions and best practices. This dual focus aims to secure a comprehensive and inclusive transition, ensuring that no sector or company is left behind, while also promoting the rapid adoption of sustainable alternatives. The global community needs a concerted effort by various stakeholders to supply the necessary capital, expertise and capacity to navigate this complex challenge and secure a prosperous and sustainable future for all.

**David Coleman**
Vice President, Chief Risk Officer
European Bank for Reconstruction and Development

# Acronyms

| Abbreviation/acronym | Description |
|---|---|
| **CCG** | corporate climate governance |
| **$CO_2e$** | carbon dioxide equivalent |
| **CRB** | climate resilience bond |
| **CRG** | Climate RiskGauge, part of S&P Global Market Intelligence's Credit Analytics product |
| **CRO** | Chief Risk Officer |
| **CSD** | Climate Strategy and Delivery Department |
| **CSG** | Client Services Group |
| **EBRD** | European Bank for Reconstruction and Development |
| **ECB** | European Central Bank |
| **EIB** | European Investment Bank |
| **ESB** | environmental sustainability bond |
| **ESD** | Environment and Sustainability Department |
| **ESP** | Environmental and Social Policy |
| **EU** | European Union |
| **FOPC** | Financial and Operations Policies Committee |
| **GET** | Green Economy Transition |
| **GEFF** | Green Economy Financing Facility |
| **GHG** | greenhouse gas |
| **GRI** | Global Reporting Initiative |
| **GTB** | green transition bond |
| **ISSB** | International Sustainability Standards Board |
| **KPI** | key performance indicator |
| **LCP** | low-carbon pathway |
| **MDB** | multilateral development bank |
| **NGFS** | Network for Greening the Financial System |
| **NPL** | non-performing loan |
| **PCAF** | Partnership For Carbon Accounting Financials |
| **PD** | probability of default |
| **PFI** | partner financial institution |
| **PRI** | Principles for Responsible Investment |
| **SCF** | Strategic and Capital Framework |
| **TCFD** | Task Force on Climate-related Financial Disclosure |
| **TNFD** | Task Force on Nature-related Financial Disclosures |

# Executive summary

In 2023, the European Bank for Reconstruction and Development (EBRD) continued to act as a catalyst for the low-carbon transition across the economies in which it operates. As a leading provider of climate finance, with established governance overseeing climate-related risks and opportunities, the Bank considers and assesses climate adaptation and mitigation in all of its investment decisions. The EBRD has been committed to applying the recommendations of the Task Force for Climate-Related Financial Disclosures (TCFD) and reporting on its progress since 2020. In this, its fifth TCFD report, the Bank presents its evolution, achievements and progress on integrating climate-related financial risks and opportunities into its strategy, policies and operations. As climate risk practices continue to develop, the availability of sophisticated tools and comprehensive datasets increases and regulatory frameworks become more established, the EBRD will continue to reflect evolving expectations and guidance.

The 2023 climate disclosure showcases how the EBRD continues to mainstream policies and procedures to meet its climate strategy and the expectations of shareholders and stakeholders in the economies where it operates. In line with the core TCFD pillars of governance, strategy, risk management, and metrics and targets, some key highlights of this report are:

- All EBRD activities are aligned with the Paris Agreement approach agreed by multilateral development banks (MDBs) and green finance accounts for 50 per cent of the Bank's annual investment.
- Every EBRD investment is assessed for climate risk and reviewed periodically. The assessment, review and monitoring process will continue to improve, in line with the Bank's planned compliance with International Sustainability Standards Board (ISSB) standards.
- The Bank continuously refines its methodologies and procedures for assessing and managing carbon transition and physical climate risks for all types of financing instrument.
- The carbon transition stress-testing exercise now covers 75 per cent of the corporate and sub-sovereign portfolio, using both a long-term Network for Greening the Financial System (NGFS) scenario and an in-house short-term scenario. The Bank also conducted a pilot physical risk stress test.
- As well as measuring and monitoring its own emissions, the breadth of the Bank's financed emissions measurement has been enhanced and expanded.

The progress the EBRD is making puts it in a strong position to further embed and enhance the management of climate risks and opportunities, to continue piloting assessments of other potential hazards, such as nature and biodiversity, and to report in line with evolving industry standards. The Bank supports its clients in developing and delivering credible transition plans and is establishing a level of appetite for climate-related reputational risk.

The report demonstrates the EBRD's commitment to supporting the low-carbon and climate-resilient transition of its clients and investee economies while ensuring its own financial resilience and stability in the face of growing climate challenges.

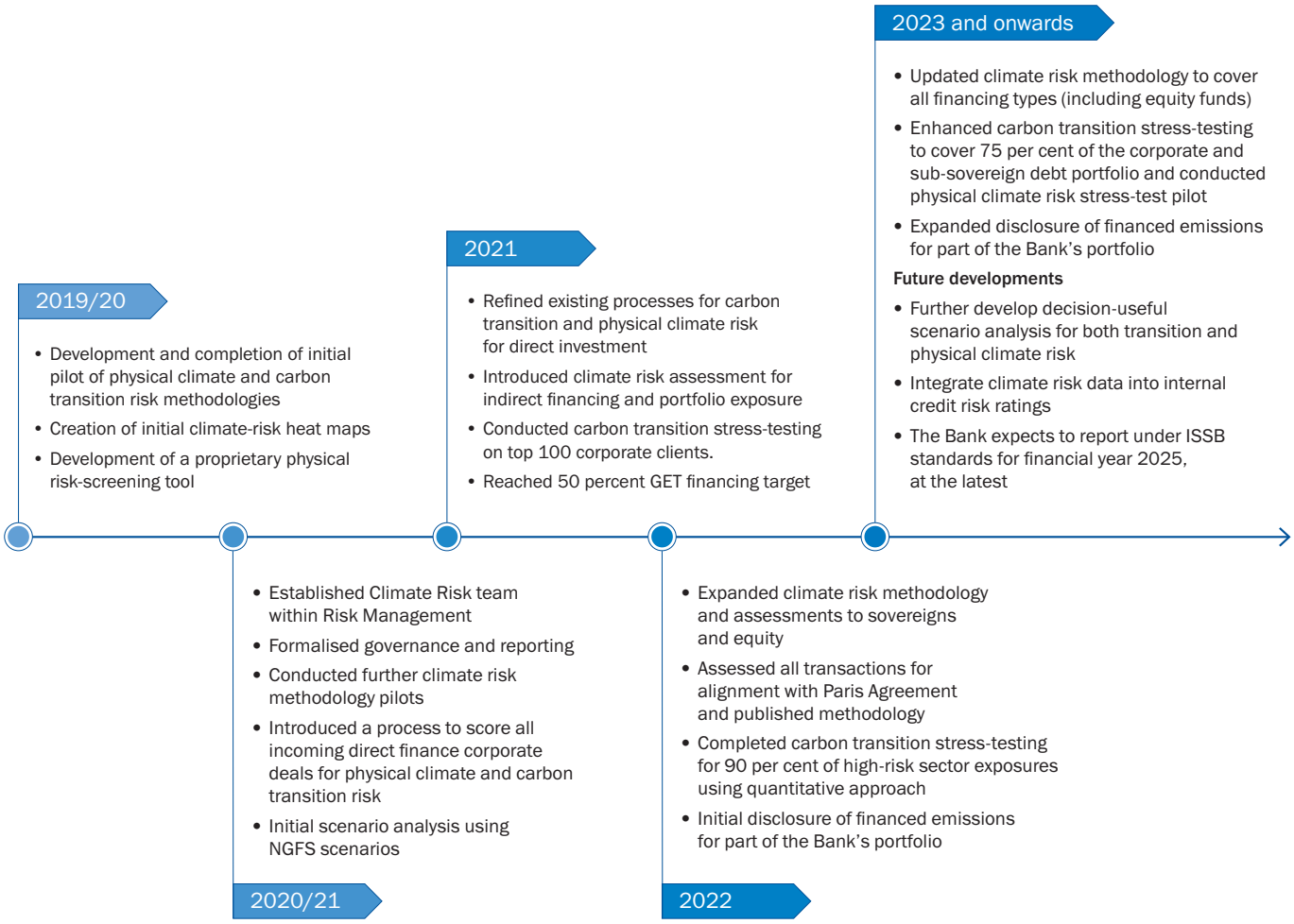
# 1. Introduction

This report provides details on the Bank's assessment of its financial exposure to climate risks based on two primary categories of climate-related risk highlighted by the TCFD:

1. **Carbon transition risks** that arise from the process of adjustment towards a low-carbon economy as governments, consumers and businesses act to reduce greenhouse gas (GHG) emissions. The Bank assesses the potential financial effects of emission costs on its clients.
2. **Physical climate risks** that arise from changes in the Earth-atmosphere energy balance, leading to more frequent and intense acute climate hazards (such as storms, droughts and floods) and shifting long-term climatic patterns (for example, average precipitation, average temperature and sea-level rise). The Bank assesses the potential impact of 10 climate hazards on the financial performance of its clients.

The EBRD utilises the TCFD framework to group climate-related disclosures into four pillars: **governance**, **strategy**, **risk management** and **metrics and targets**.

Figure 1. **The EBRD's TCFD journey**



# 2. Governance

## 2.1. Board oversight of climate-related risks and opportunities

The EBRD is owned by 73 countries, the European Union (EU) and the European Investment Bank (EIB). The **Board of Governors**, which represents the Bank's members, delegates the exercise of much of its authority to the **Board of Directors**, while retaining overall authority.

The **Board of Directors** comprises 23 directors and is chaired by the President of the Bank. It approves the EBRD's high-level policies, as well as its country, sectoral and thematic strategies, and has ultimate responsibility for the oversight of climate-related matters. Documentation for projects submitted to the Board of Directors for approval includes relevant information on financial risks associated with climate change.

### 2.1.1. Board committees

The Board of Directors has established three committees to assist with its work:

- The **Audit and Risk Committee** oversees all risk-related issues and reporting, including climate risk and the Bank's TCFD disclosures. The Audit and Risk Committee receives quarterly reports on the evolving risk profile of the Bank and conducts annual reviews of the risk management function. Quarterly reports cover the Bank's performance against its institutional objectives, including the exposure to and management of climate-related risks.
- The **Financial and Operations Policies Committee (FOPC)** is responsible for reviewing and exercising oversight of the EBRD's financial and operating policies, including those relating to climate issues. In 2023, the FOPC reviewed selected individual projects with exposure to fossil fuels.
- The **Budget and Administrative Affairs Committee (BAAC)** assists the Board of Directors in fulfilling its responsibilities in relation to the approval and oversight of the Bank's budgetary, staff and administrative resources, including those required for the management of climate-related risks and opportunities.

## 2.2. Management's role and management committees

The President is elected by the Board of Governors and is the legal representative and chief of staff of the Bank. Under the guidance of the Board of Directors, the President oversees the day-to-day business of the EBRD. Management's prioritisation and delivery of business activities are guided by the Bank's strategies and policies.

Table 1 lists the committees that directly advise the President or a member of the Bank's Executive Committee on the management of climate-related risks and opportunities. These committees take into account climate-related risks and opportunities when overseeing the EBRD's strategy, investment decisions, risk management processes and related policies. Table 1 also shows how and how often these committees are informed about climate-related risks and opportunities.

Table 1. **EBRD management committees relevant to climate-related risks and opportunities**

| Management committee | Chair | Purpose | Meeting frequency |
|---|---|---|---|
| Executive Committee | President | Advises the President on all aspects of Bank-wide strategic significance, including issues related to climate risks and financially sound climate-related business opportunities and the setting of targets related to climate-related risks and opportunities, as well as progress on those targets. | Fortnightly |
| Operations Committee | First Vice President and Head of Client Services Group | Considers matters related to the Bank's projects, including climate risks and opportunities on an individual project basis. | Weekly |

Table 1. **EBRD management committees relevant to climate-related risks and opportunities** (continued)

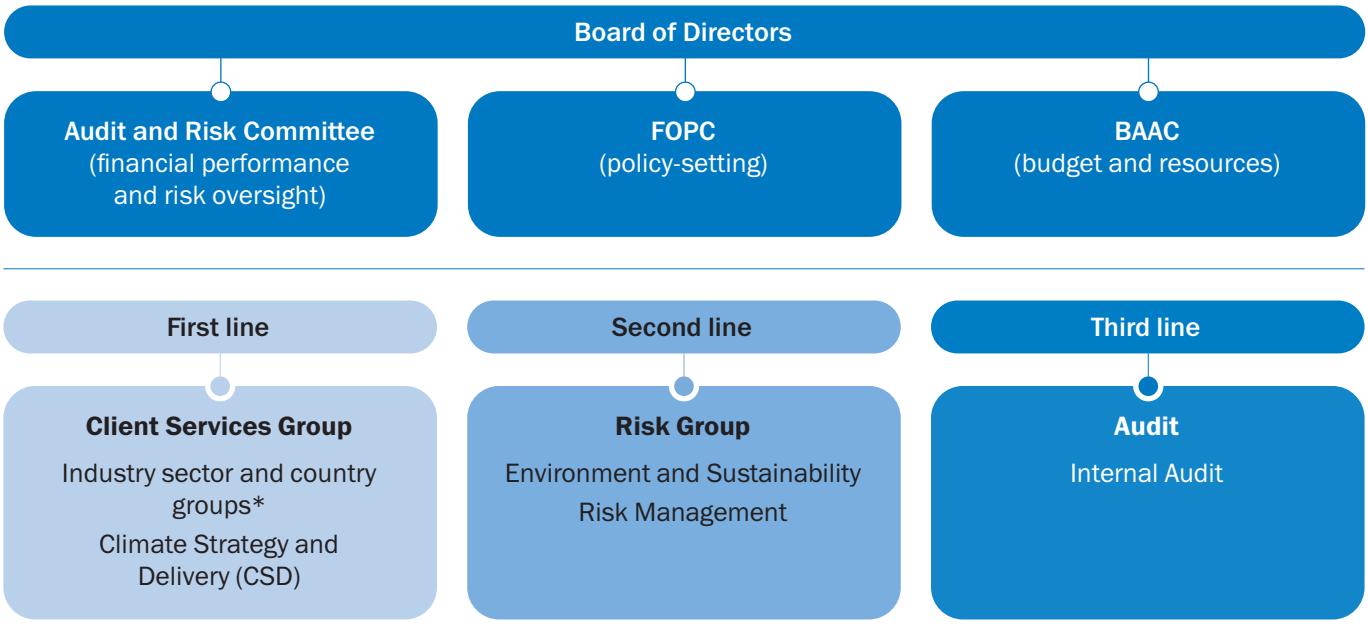
| Management committee | Chair | Purpose | Meeting frequency |
|---|---|---|---|
| Strategy and Policy Committee | Vice President, Policy and Partnerships | Considers matters that fall within the overall responsibility of the Vice President, Policy and Partnerships and certain matters within the responsibility of the Chief Economist; focusing primarily on transition, strategy and policy work, country, industry, sector and thematic strategies, and policy-related research, including climate-related matters. | Fortnightly |
| Risk Committee | Vice President, Chief Risk Officer | Responsible for matters related to Bank-wide risks, including credit and operational risk, with associated follow-up actions, oversees risk aspects of the EBRD's portfolios, approves risk policies and risk reports and considers new products; reviews the Bank's climate risk principles, approves the TCFD report and other pertinent climate risk issues throughout the year. | Fortnightly |

### 2.2.1. "Three lines of defence" model for managing climate-related risks

In its day-to-day operations, the EBRD manages risks, including climate-related risks, using its "three lines of defence" model (see Figure 2). Each line of defence is independent, to provide greater objectivity of assessment, review and oversight of investment decisions and risk management. This approach ensures that controls and procedures are in place to support the oversight of climate-related risks and opportunities and are well-integrated into internal functions. The model encompasses:

- First line of defence: the shared responsibility of all staff members, particularly the **Client Services Group (CSG)**, including **Climate Strategy and Delivery (CSD)**, to identify, assess and manage climate-related risks and opportunities.
- Second line of defence: independent, empowered and appropriately resourced functions led by **Risk Management** and the **Environment and Sustainability Department (ESD)**, with control of and responsibility for matters falling within their respective areas of competence. This includes final accountability for the determination of climate-related risks.
- Third line of defence: the **Internal Audit Department** independently assesses the effectiveness of the processes within the first and second lines of defence.

Figure 2. **Board oversight and "three lines of defence" model**




Note: * The EBRD's Banking sector groups include Financial Institutions, the Sustainable Infrastructure Group (SIG) and Industry, Commerce and Agribusiness (ICA).

### 2.2.2. Coordinating the management of climate-related risks

The Bank's organisational arrangements are designed to facilitate the coordinated management of climate-related risks.

#### First line of defence

Within the **first line of defence**, the CSD team provides operational and centralised support for all frontline activities involving green strategy and policy engagement. CSD works across Banking sector groups to support project origination, integrate mitigation measures into project designs, provide technical assistance and foster policy dialogue with respect to climate-related business operations under the Bank's Green Economy Transition (GET) approach. CSD is also responsible for proposing the alignment of individual projects with the Bank's climate objectives, including the economic assessment of projects with significant GHG emissions. In addition, it analyses, researches and proposes quantitative inputs and approaches to the Bank's climate risk methodologies.

#### Second line of defence

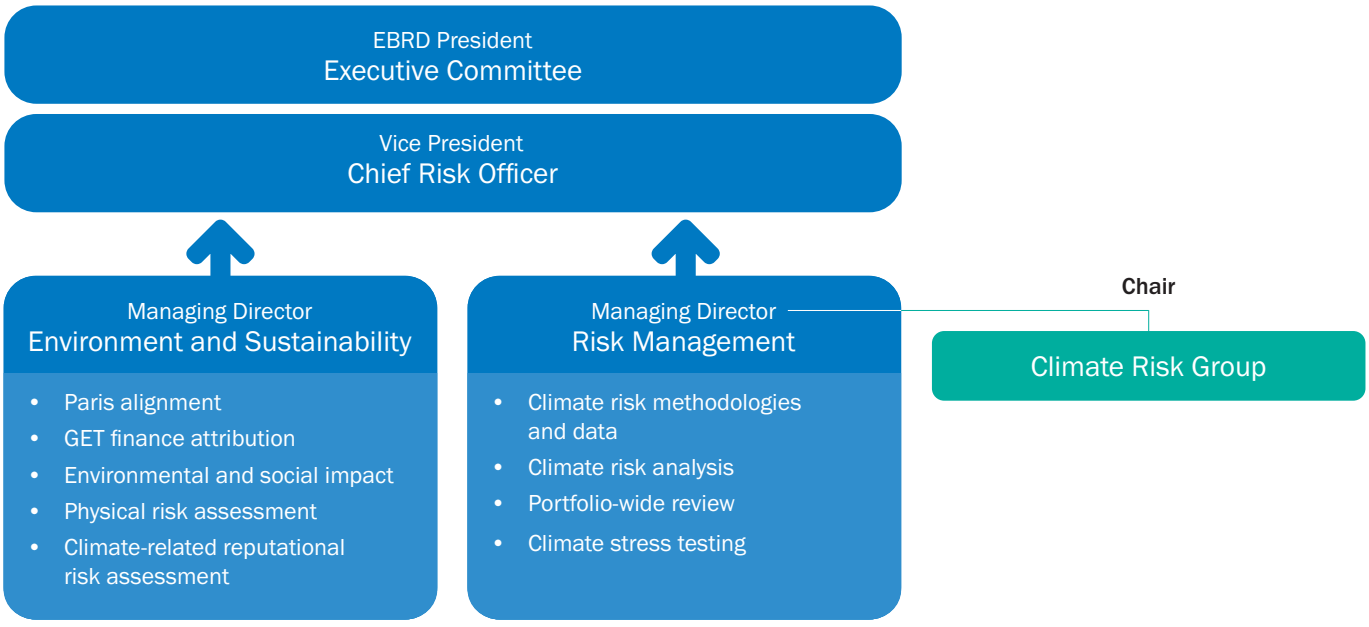
Within the second line of defence, the **Vice President, Chief Risk Officer (CRO)** has overall accountability for the formulation, communication and implementation of the EBRD's risk management strategy and polices, including for climate-related risks. This includes accountability for the final determination of Paris alignment and assessment of client climate risk (see Figure 3). The Vice President, CRO reports to the President, is a member of several management committees, including the Executive Committee, and engages directly with the Board of Directors.

In 2021, Risk Management established a dedicated Climate Risk team to manage the systematic integration of climate risk across the Bank. It acts as the coordinating function for the financial assessment of climate risks. This includes developing, testing and recalibrating climate risk methodologies and overseeing their implementation across the Bank's projects. In addition, the Climate Risk team drives and controls the requisite data collection and analysis, as well as the formulation of new procedures for project screening. The Head of the Climate Risk team reports to the Managing Director, Risk Management.

Among other things, ESD is responsible for:

- **Determining Paris alignment** – final validation of project alignment with the goals of the Paris Agreement for both climate change mitigation and adaptation.
- **Confirming GET finance attribution** – final verification of green finance attribution, based on the contribution a project makes to climate action and other environmental benefits.
- **Environmental and social impact due diligence** – as custodian of the Bank's Environmental and Social Policy (ESP),[1] ESD manages the environmental and social

Figure 3. **Management coordination and second line of defence accountability**




[1] See EBRD (2019a).

due diligence process, including the environmental and social appraisals and assessments of projects, prepares and negotiates environmental and social action plans, and monitors their implementation.

- **Physical climate risk assessments** – validation and final verification of physical climate risk assessments for counterparties.
- **Reputational risk** – ongoing development of a framework for systematically assessing residual climate-related reputational risk associated with investment projects, going beyond the climate-related assessments listed above.

Risk Management is responsible for:

- **Ownership of climate risk methodologies and key data inputs** – the independent design of climate risk and financially related environmental methodologies, reviewing, challenging and approving data inputs, as well as scoring, reviewing and overseeing the assessment process.
- **Climate risk analysis** – independent review, challenge and overall confirmation of the acceptability of EBRD clients' climate-related financial risk.
- **Portfolio-wide reviews and stress-testing** – assessing and proposing ways to manage climate risks arising from correlations and concentrations within the Banking portfolio, along with climate scenario analysis and stress-testing exercises.

The Bank formed a **Climate Risk Group** in 2019 as an important cross-bank coordination group for the dissemination of information and fostering of debate on climate-related financial risks. The group comprises senior representatives from key internal functions, including the Client Services Group, ESD, Finance and the Office of the General Counsel. The group meets periodically, typically quarterly, and is chaired by the **Managing Director, Risk Management**.

### Third line of defence

In the third line of defence, the **Internal Audit Department** independently assesses the effectiveness of the processes within the first and second lines of defence.

## 2.2.3. Climate-related remuneration and rewards policy

**Board**

The remuneration of EBRD Board Directors, as representatives of the Bank's shareholder governments and organisations, is fixed and not linked to specific organisational objectives or to corporate climate-related performance.

**President and Vice Presidents**

The President and Vice Presidents typically receive a fixed-term contract of four years, with fixed annual salaries that are not linked to specific organisational objectives, including climate-related performance. They are not eligible for performance-based compensation awards.

**Senior Management and staff**

The Bank's performance is assessed annually as a basis for proposing the level of performance-based compensation (PBC) budget to be released for payment to eligible staff. This assessment is done relative to each of the Bank's scorecard parameters in accordance with the current framework.

In determining the Bank's overall PBC pool, the Board of Directors considers the quantitative assessment of the Bank's performance against the different elements of the scorecard, in combination with a qualitative assessment, which is focused on the context and exogenous factors impacting the Bank's performance.

The Bank's target of dedicating at least 50 percent of annual investment to green finance is one of the five criteria contributing to the Transition Impact dimension. The share of green investment in the annual volume of EBRD investment has a circa 5 per cent weighting in the evaluation of the quantitative assessment of the Bank's overall performance.

Once the PBC pool is approved by the Board of Directors, the PBC awards are used to recognise and reward high levels of performance by our staff. All Banking teams, including support functions, have specific objectives to fulfil the Bank's green finance target. The levels of PBC awarded to individual staff members are based on their performance against role-specific objectives, which may have a higher or lower component of green deliverables.

Furthermore, senior Risk Management leaders have dedicated objectives when it comes to delivering TCFD reporting and to redesigning processes for the systematic assessment of climate risk. Their performance against these objectives impacts part of their remuneration. These objectives cascade down through the Risk Management Department to ensure climate risk is at the forefront of considerations when critically assessing projects.

# 3. Strategy

## 3.1. Overview of the EBRD's climate-related strategies

The promotion of environmental sustainability has been at the core of the EBRD's mission since its creation in 1991, with a mandate from its founders to promote, in the full range of its activities, "environmentally sound and sustainable development".[2] Furthermore, "green" is one of the Bank's six transition qualities.[3]

The Bank's strategies relevant to climate considerations include:

- The **Strategic and Capital Framework** (**SCF**), the EBRD's primary planning instrument, is approved every five years by the Board of Governors. At the EBRD's 2020 Annual Meeting, the shareholders unanimously approved the SCF 2021-25, which included **supporting the transition to a green, low-carbon economy** as one of its three strategic themes.
- The GET approach, launched in 2015 and re-approved in 2020 for the 2021-25 period, sets out the EBRD's climate and environmental objectives. **Key targets are for green finance to account for at least 50 per cent of the Bank's annual business investment by 2025** and to achieve a net annual GHG emissions reduction in the range of 25-40 million tonnes $CO_2e$ over the 2021-25 period.
- At the EBRD's 2021 Annual Meeting, the Board of Governors resolved that all new activities from the start of 2023 should align fully with the goals of the Paris Agreement, thus accelerating the Bank's support for ambitious low-carbon and climate-resilient pathways in the economies where it operates. **All new activities since January 2023 align with the goals of the Paris Agreement**.[4]
- **Country strategies** cover individual economies in which the EBRD invests and are revised every five years according to country-specific timetables. The strategies identify areas where the Bank can **assess, manage and deliver on its climate-related objectives**, taking into account the country's economic context and risk profile, as well as the Bank's mandate and risk appetite. As of year end 2023, all 37 country strategies addressed climate risk or the green economy transition in at least one of their strategic priorities.
- **Sector strategies** are revised every five years. Of particular relevance is the Energy Sector Strategy 2024-28, approved in December 2023, to scale up renewables and accelerate a just transition away from fossil fuels.[5] Other relevant strategies approved by the Board include: (i) the Agribusiness Sector Strategy 2019-23, approved in 2019;[6] (ii) the Transport Sector Strategy 2019-24, approved in 2019;[7] (iii) the Municipal and Environmental Infrastructure Sector Strategy, approved in 2019;[8] (iv) the Property and Tourism Sector Strategy 2020-24, approved in 2019;[9] (v) the Financial Sector Strategy (2021-25), approved in 2021;[10] and (v) the Mining Strategy 2024-28, approved in 2023.[11]
- The EBRD **engages with stakeholders to support policies that accelerate the green transition**. In 2023, these engagements resulted in close collaboration with other MDBs to develop "country sector platforms" to step up climate action,[12] to support policymakers in designing and delivering competitive bidding processes for renewable energy, to introduce climate-resilient debt clauses to sovereign and municipal loans, and to launch the EBRD Approach to Nature.[13]

To communicate its climate strategy more effectively, in line with emerging market practice, the Bank is considering developing a transition plan.

[2] See EBRD (1990).
[3] For more details, see https://www.ebrd.com/transition/green.html
[4] See EBRD (2022).
[5] See EBRD (2023a).
[6] See EBRD (2019b).
[7] See EBRD (2019c).
[8] See EBRD (2019d).
[9] See EBRD (2019e).
[10] See EBRD (2021a).
[11] See EBRD (2023b).
[12] See EBRD (2023c).
[13] See EBRD (2023d).

## Box 1. **Focus on the EBRD's core climate-related strategies**

### Green Economy Transition (GET) approach

The EBRD's GET approach supports a systematic transition to low-carbon and resilient economies, by:

- ensuring that all projects are aligned with the mitigation and adaptation objectives of the Paris Agreement
- enhancing policy engagement for the development of long-term, low-carbon strategies and the greening of financial systems
- scaling up green investments across a set of thematic intervention areas that cover the entire economy, including greening the financial sector, energy efficiency, natural capital, energy systems, industrial decarbonisation, cities and infrastructure, sustainable food systems, green buildings and sustainable connectivity.

Under the GET approach, the Bank's policy engagement and investments aim to create an enabling regulatory and market environment that can attract green finance at scale, particularly from the private sector. The GET approach uses the full range of the EBRD's financial instruments. The Bank also works closely with donors such as the Climate Investment Funds, the EU, the Global Environment Facility and the Green Climate Fund. In addition, the Bank has developed a range of dedicated programmes to promote green investments.[14]

### Alignment with the Paris Agreement

In putting into practice its Paris alignment commitment, the EBRD is guided by the goal of limiting the temperature increase to 1.5°C above pre-industrial levels.

The EBRD's approach to aligning its own activities with the Paris Agreement is integral to its support for climate action. Since 1 January 2023, all new Bank investments have been subject to assessment and confirmation of Paris alignment.

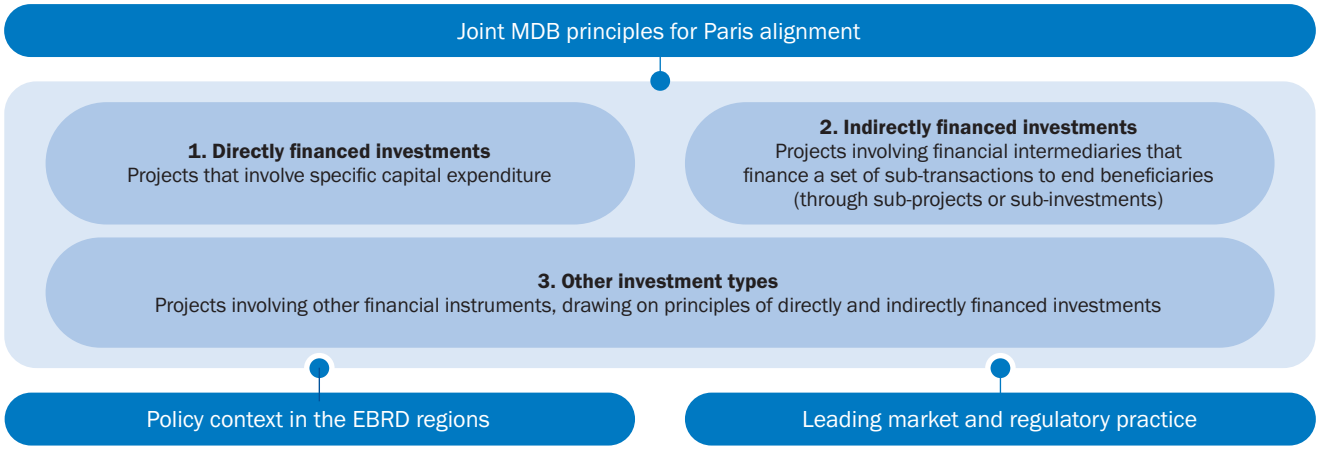
The Paris alignment of the EBRD's financial flows is anchored in Article 2.1 of the Paris Agreement to make "finance flows consistent with a pathway towards low GHG emissions and climate-resilient development".[15] Alignment of finance, therefore, relates to both the mitigation and adaptation goals of the Paris Agreement.

The EBRD's Paris alignment methodology sets out how the Bank determines whether an investment or technical cooperation activity is "aligned" or "not aligned" with the mitigation and adaptation goals of the Paris Agreement. This relates to the first and second building blocks of the MDBs' joint framework for alignment with the objectives of the Paris Agreement.[16]

The methodology aims to ensure a clear approach to alignment determination for all project types, covering the full suite of available financial instruments. It consists of three parts: (1) directly financed investments; (2) indirectly financed investments; and (3) other investment types, including equity and funds.[17] The methodology is also supported by sector-specific guidance on energy (fossil-fuel projects and district energy), buildings, transport (including roads and aviation), waste and agribusiness.

In developing its approach, the Bank consulted widely over the course of 2021 and 2022, including through two public consultations, receiving feedback on all aspects of the methodology.

Figure 4. **The EBRD's Paris alignment methodological framework**




Although the determination of projects' Paris alignment does not necessarily imply that the transactions have low climate-related financial risk, the Paris alignment approach is likely to contribute to a lower level of climate-related financial risk as a result of its primary focus on low GHG emissions and climate-resilient projects.

[14] For more details on the Bank's GET approach, see https://www.ebrd.com/what-we-do/get.html.
[15] See UNFCCC (2016).
[16] See ADB, AfDB, AIIB, CEB, EBRD, EIB, IADB, IsDB, NDB and World Bank Group (2018).
[17] For more details on the Bank's Paris alignment approach, see https://www.ebrd.com/ebrd-activities-paris-alignment.

## 3.2. Strategic priorities in the short, medium and long term

Table 2 summarises the EBRD's climate-related strategies and commitments, with specific objectives over various time horizons. As detailed in section 4.2, these time horizons are defined as short term (less than one year), medium term (one to seven years) and long term (more than seven years).

While some climate commitments are immediate priorities, with specific near-term targets, other strategic priorities are implemented continuously over time.

Delivery of strategic objectives related to green commitments is supported by resourcing fulfilled through the Bank's Strategy Implementation Plan,[18] which is renewed annually.

Table 2. **Strategic priorities over different time horizons**

| Strategy/commitment | Time horizon | Objective | Potential impact | Prioritisation |
|---|---|---|---|---|
| **Paris alignment** | S | From 1 January 2023, all new EBRD investments and activities require alignment with the goals of the Paris Agreement. | Accelerate the sustainable transition of the Bank's clients and the economies in which it operates.<br>Reduced emissions and expenditures from the Bank's own consumption of electricity, gas, water, travel and procurement. | Key priority |
| **GET finance**<br><br>**Climate-related finance mobilisation** | M | Green finance to account for at least 50 per cent of the Bank's annual investment by 2025.<br>Achieve a net annual GHG emissions reduction of at least 25 million tonnes $CO_2e$ by the end of the five-year period (2021-25).<br>Double the mobilisation of private-sector green finance by 2025 to support the Bank's investee economies in their low-carbon transition. | The EBRD finances the transition to a low-carbon alternative for the activities of high-emitting clients, which can result in a temporary increase in balance-sheet volumes from some high-emitting clients.<br>Shift in balance-sheet focus to lower-emitting sectors over time and support for transition projects and activities following low-carbon strategies and initiatives.<br>Increased private-sector climate finance mobilisation. | Key priority |
| **Climate risk culture** | M | Increased awareness and learning to fully embed a climate risk culture. In 2023, training on climate risk and Paris alignment processes continued to be carried out across the Bank.<br>Complement existing project-focused climate risk assessments with counterparty-focused assessments, in line with the overall risk management processes.<br>Widespread ownership of climate risk responsibility. | Increased focus on training and climate-aware professional development.<br>Full embedment of climate risk as part of overall risk assessment.<br>Better structured and managed climate risk in investments. | Continuous |
| **Country strategies** | M | Inclusion of climate risk and opportunity considerations.<br>Encourage and finance low-carbon transition in economies where the Bank operates. | Reduction in climate risk exposure and improvement in the climate resilience of the Bank's clients.<br>More climate-resilient balance sheet, client selection and engagement, with the ability to sustain carbon transition risk and mitigate expected material physical climate hazards. In addition, the EBRD's policy engagement helps mitigate the risk at country level. | Continuous |

[18] For more details on the Bank's Strategy Implementation Plan, see: https://www.ebrd.com/what-we-do/strategy-implementation-plan.

Table 2. **Strategic priorities over different time horizons** (continued)

| Strategy/commitment | Time horizon | Objective | Potential impact | Prioritisation |
|---|---|---|---|---|
| **Green investment initiatives** | S to M | Maintain a leading role in green investment initiatives, declarations and commitments (including Paris alignment, TCFD, carbon neutrality, the Green Bond Principles, Global Reporting Initiative [GRI], Principles for Responsible Investment [PRI] and others). | Driver of market change, greening the financial system and acceleration of transition to low-carbon and climate-resilient economies. | Continuous |
| **Support transformation via corporate climate governance (CCG)** | M | Support the transition and decarbonisation activities of clients through CCG support.<br>Engage with partner banks to develop effective climate-related business practices through their transition planning approach. | Gradual transformation of the corporate sector to identify, manage and assess climate-related risks.<br>Support partner banks to allocate capital in a climate-informed way, with the aim of lowering adverse climate-related financial and economic impacts. | Continuous |

## 3.3. Climate-related opportunities pursued by the EBRD

Climate change and the global response to it may, in addition to posing risks, present opportunities for some firms under certain conditions. The TCFD recommends the assessment and, where appropriate, the disclosure of financially sound climate-related opportunities, together with climate-related risks identified over different time horizons.

The Bank identifies and delivers opportunities over different time horizons as an important aspect of its overall climate change-related operations, as detailed in its GET approach.

The EBRD explores three types of climate-related opportunity:

1. **Project-level opportunities** to finance the transition to a low-carbon and climate-resilient economy, allowing firms to respond to growing demand for low-carbon technologies and climate-adapted products and services, giving them a comparative advantage over competitors.
2. **Client-level opportunities** to support improvements in the way that businesses, financial institutions and other market participants use climate-related information in their business models and decision-making processes, such as risk management, capital allocation and business strategy. These can help clients adjust their business practices and wider market behaviour to internalise climate change objectives and improve long-term financial performance in a changing climate.
3. **Sector-level opportunities** that combine regulatory reforms, technical assistance and green investments to catalyse private finance at scale, such as country sector platforms and support for renewable energy auction schemes. These help countries where the EBRD operates bring together all relevant stakeholders systematically and develop an investment pipeline.

The mainstreaming of green finance initiatives throughout the EBRD's business, strategy and financial planning has allowed the Bank to significantly increase its share of climate financing opportunities. From its Sustainable Energy Initiative (2006) to the GET approach (2016), almost €50 billion in green finance commitments has been approved, with investments spread over the numerous economies and sectors in which the Bank invests.

The GET approach has been effective in delivering climate-related opportunities across entire economies, from small-scale energy-efficiency investments in small and medium-sized enterprises, financed through local intermediaries, to large-scale renewable energy projects. These investments play a particularly important role in supporting the development of the regions where the EBRD operates, which include some of the least energy-efficient economies in the world and, at the same time, some of the most promising locations for solar and wind energy development.

Building on previously successful pilot client engagements, since early 2022, a dedicated Corporate Climate Governance Facility[19] has helped financial-sector and corporate clients to strengthen and develop their disclosure practices, manage their climate-related risk and unlock access to climate finance. CCG recognises the need to assess climate-related risks and opportunities as part of business and financial planning. The support includes aspects such as improving climate governance and disclosure of climate-related risks and opportunities, developing and adopting CCG action plans and low-carbon pathways, and building capacity for climate risk assessments and scenario analyses. It focuses on improving EBRD clients' internal climate risk management and strategies to enhance their overall financial stability over time.

## Specific initiatives associated with climate-related opportunities

The EBRD's *Sustainability Report 2023* details various initiatives in which the Bank engages to promote green transition and investment, a few of which are highlighted below.[20]

### Country sector platforms

Country sector platforms are country led and, with MDB participation, can mobilise private finance for the transition to a low-carbon and climate-resilient economy. The Bank supported Egypt with the launch of the energy pillar of the Nexus-Water-Food-Energy platform, which aims to develop 10 GW of new private renewable energy capacity by 2028 and retire 5 GW of inefficient fossil-fuel capacity by 2026. North Macedonia, supported by the EBRD, launched its Just Energy Transition Investment Platform (JETIP) at COP28, which aims for a full coal phase-out in the electricity sector and the deployment of 1.7 GW of renewable energy by 2030, primarily through private-sector mobilisation.

### Renewable energy auctions

The EBRD's renewable energy programme supports the economies in which the Bank invests in developing enabling policy frameworks and implementing competitive bidding processes for renewable energy auctions. The Bank is currently working in 18 countries and has already directly supported auctions for more than 1,600 MW of capacity in Albania, Egypt, Kazakhstan, Serbia and Uzbekistan.

### Low-carbon pathways

The EBRD aids governments and industries in developing and implementing low-carbon pathways (LCPs) for carbon-intensive sectors, such as energy, aluminium, cement and steel. LCPs help industries reshape their operations towards an economically advantageous and more sustainable future. They outline the industry's climate performance and current emissions and identify key policy actions and investments for decarbonisation.

### EBRD Green Cities

The EBRD Green Cities programme provides an investment framework of more than €5 billion in Bank and donor support for cities in the EBRD regions, in the form of targeted investment, policy actions and capacity building to address cities' transition to green, low-carbon and resilient futures.

The programme, launched in 2016, consists of three central components: (i) the delivery of strategy and policy support through Green City Action Plans; (ii) the facilitation and stimulation of Green Cities infrastructure investments; and (iii) capacity building, technical assistance and knowledge sharing for city administrators and local stakeholders.

### Green Economy Financing Facilities

The EBRD's Green Economy Financing Facilities (GEFFs) support businesses and homeowners wishing to invest in green technologies. They operate through more than 180 local financial institutions in 28 countries, supported by more than €6 billion of EBRD finance. This has enabled more than 130,000 clients to collectively avoid over 9 million tonnes of $CO_2e$ emissions per year.

### Capital market development

Capital markets provide a critical source of funding, contributing to financial resilience and sustainable growth. The EBRD undertakes policy dialogue in the economies where it operates to ensure that green taxonomy standards are uniform and align with globally recognised principles. Furthermore, the Bank helps prospective issuers to prepare for their inaugural green issuance, for example, by improving their ability to identify, monitor and track green assets, thus increasing the supply of green assets over time.

[19] For more details on the EBRD Corporate Climate Governance Facility, please see: https://www.ebrd.com/ccg-facility.

[20] See EBRD (2024a).

### Issuance of theme bonds

In response to demand from socially responsible investment-focused investors, the Bank began issuing green bonds in 2010. The Bank has been a member of the Green Bond Principles since their inception in 2014. The EBRD issues three different types of green bond: environmental sustainability bonds (ESBs), climate resilience bonds (CRBs) and green transition bonds (GTBs). All of its green bonds are underpinned by projects that have been scrutinised by ESD for alignment with the framework established for each bond programme.

### Nature-related risks

At COP28, the EBRD launched its approach to nature, which outlines how nature action will be scaled up across three pillars: protect, invest and disclose.

The Bank is working closely with other MDBs to align on definitions and reporting principles. The EBRD will also support its clients in making nature-related disclosures and sharing biodiversity baseline data through the Global Biodiversity Information Facility, using a technical guidance document the Bank recently developed.[21]

Nature-related data will focus on three areas:

1. Monitoring the Bank's key activities in support of nature.
2. Enhancing access to global biodiversity data by standardising and encouraging client sharing of baseline analyses and impacts of the Bank's projects.
3. Identifying material nature-related risks and opportunities associated with EBRD projects and supporting clients in similar assessments to enable better-informed investment and decision-making. This includes enhancing its technical cooperation and capacity building with clients that will disclose their nature-related risks and opportunities under emerging standards, such as the Corporate Sustainability Reporting Directive, or other disclosures.

## 3.4. Effects of climate-related risk and opportunities on EBRD strategies

The EBRD does not expect its strategies and financial stability to change materially based on the Bank's work to date, including the climate stress test (see section 5.3). The EBRD's strategies will continue to be informed by the outcomes of the climate scenario analyses to ensure ongoing resilience as these continue to increase in scope and sophistication.

[21] See EBRD (2023f).

# 4. Risk management

## 4.1. Integration of climate-related risk management into existing risk management processes and frameworks

The EBRD identifies and manages climate-related risks through its existing risk management framework, underpinned by its independent "second line of defence" control, as described in section 2.2. The core elements of the Bank's risk management framework include processes for assessing and managing credit risk, market risk, liquidity risk and operational risk, as detailed in and in line with the EBRD's *Financial Report 2023*.[22]

The Bank considers climate-related risk to be a cross-cutting risk that impacts financial credit risk, in particular, but also other risk categories, including reputational and operational risk. The links between these types of risk and climate risk are summarised in Table 3.

Table 3. **Impact of climate risk on the EBRD's existing risk management framework**

| Risk type | Time horizons | Impact from climate risk | Response |
|---|---|---|---|
| **Credit risk**<br>Potential loss to a portfolio that could result from either the default of a counterparty or the deterioration of its creditworthiness. | S M L | • Client or project assets could become stranded in the event of a disorderly transition.<br>• Client financial performance could deteriorate as a result of changing demand for its products and services or emission costs.<br>• Client revenues, expenses or assets could be impacted by damages resulting from the changing probability of physical climate events or changing long-term weather patterns. | • Identify, assess and manage climate-related risks in the process of due diligence, preparation and structuring of individual transactions.<br>• Consider how to mitigate climate risk through climate-resilient investments or structures.<br>• Involve Risk Management as part of standard due diligence in reviewing and challenging, where appropriate.<br>• Systematically screen for climate risks faced by clients.<br>• Exposure limits are defined and reviewed by Treasury Credit Risk Management, based on the counterparty's probability of default. |
| **Market risk**<br>Potential loss resulting from adverse market movements, primarily driven by:<br>(i) interest-rate risk<br>(ii) foreign-exchange risk<br>(iii) equity risk<br>(iv) commodity price risk. | S M | • Sudden fluctuations in demand for and supply of financial instruments, changes in rates (exchange rates, interest rates and so on) and commodity indices as a result of physical climate change or disruptive transition. | • The Bank seeks to maintain very low residual market risk on the majority of its Banking transactions, as well as its treasury assets and liabilities. This is achieved by, among other things, hedging foreign-exchange and interest-rate risk. The limits on the maximum amount of market risk accepted in this context are set out in the Bank's Treasury Authority and Liquidity Policy. In the event of climate-related market volatility, the Bank can either further hedge its treasury exposure or carry the increased risk temporarily, thanks to the moderate base level.<br>• The treasury portfolio is monitored using a value-at-risk model. Risk-factor scenarios are calibrated to recent market-data time series and any implicit climate-related risks affecting market observables are taken into account.<br>• The equity portfolio is subject to equity and foreign-exchange risk. The methodology used is independent of that for climate-related risk, but any risks affecting equity index observables (including climate-related risks) are taken into account. |

[22] See EBRD (2024c).

Table 3. **Impact of climate risk on the EBRD's existing risk management framework** (continued)

| Risk type | Time horizons | Impact from climate risk | Response |
|---|---|---|---|
| **Operational risk**<br>All aspects of risk-related exposure other than those falling within the scope of credit, market and liquidity risk, including risk of loss resulting from inadequate or failed internal processes, people and systems, or from external events. | M L | • Bank operations may be disrupted by physical climate events. | • The assessment of risks under this framework considers external events and changes to the Bank's operational risk profile arising from climate change, including the impact on its facilities, infrastructure, vendors and business supply chains. For example, extreme weather may force office closures, disrupt resource distribution or damage crucial resources such as communications and data centres.<br>• The Bank maintains a framework for the continuous identification, monitoring and control of its exposure to operational risks, as well as backup facilities for such eventualities. |
| **Reputational risk**<br>Risks associated with the perception of various stakeholders, including debt and equity investors, customers and external groups, of the Bank's commitment to and reliability on achieving its stated goals. | S M | • Bank operations may be impacted by reputational risk arising from perceived non-conformity with its climate-related pledges. | • The Bank assesses transactions that have the potential to create reputational risk, including those related to climate change. Transactions are reviewed for consistency with the Bank's goal of Paris alignment and climate risk management practices.<br>• Fossil-fuel transactions are reviewed against the Bank's approach to fossil-fuel investments, as described in the Energy Sector Strategy,[23] for their alignment with the goals of the Paris Agreement[24] and for risks that financing assets may become stranded, to assess potential reputational risk. |
| **Liquidity risk**<br>Risk associated with the ability to maintain a prudent level of liquidity. | S M | • Acute physical climate events or natural disasters may result in reduced cash inflows from counterparties and lower liquidity of treasury assets (including bonds) in certain sectors.<br>• Disrupted access to wholesale funding markets resulting from the Bank's activities creating a barrier to finance from institutional investors. | • The treasury portfolio is diversified, comprising mainly short-term instruments issued by highly rated financial institutions.<br>• The Bank actively manages its liquidity position daily and has prudent liquidity management policies in place, requiring compliance at all times with specified short- and medium-term liquidity coverage limits.<br>• The Bank has implemented climate risk screening and adopted the Paris alignment methodology. |

In 2023, the Bank reaffirmed its inclusion of climate-related financial risk in its Risk Appetite Statement.[25] The statement underscores the EBRD's aim to manage exposure to high-emitting industries, encourage transition to a low-carbon economy, and strengthen the climate resilience of its clients and the economies in which it invests. The Risk Appetite Statement is updated annually and is reviewed periodically by the Audit and Risk Committee.

**Box 2. Note on materiality**

Materiality is an important concept in climate-related financial disclosure, requiring detailed deliberation to determine which effects, positive and negative, could influence investment decisions. The Bank has been monitoring regulatory and market developments in this space, including the concepts of "double" materiality and "single" or "financial" materiality.

Unlike the financial materiality assessment supporting other financial disclosures, the EBRD acknowledges the evolving nature of climate-related financial disclosure and uses longer time horizons with a larger number of assumptions to determine material climate-related risks to the Bank. Disclosures in this report include information and metrics that the EBRD deems relevant and/or material to the Bank's strategy, its shareholders and external stakeholders.

Climate-related risks flagged as potentially having higher carbon transition and/or physical climate risk through the screening process (outlined in section 4.4) are prioritised for further analysis.

These methodologies, assessment approaches and related data sources continue to be developed and are likely to change over time, meaning that the statements and disclosures made in this report may evolve in accordance with market practices.

[23] See EBRD (2023a).
[24] Lower-emission substitutions, for example.
[25] See EBRD (2023e).

## 4.2. Climate risk time-horizon considerations

Time horizons are an important factor in understanding and managing climate-related risks. For carbon transition risk, the timing of regulatory action to lower emissions is a useful assessment component. In the short term, firms operating in a jurisdiction that has already introduced an emissions cost may potentially be at higher risk if they are not decarbonising quickly enough. In the longer term, jurisdictions that are moving more slowly on GHG emissions reduction policies are likely to experience greater adverse economic impacts where aggressive and rapid emission reduction policies are introduced. For physical climate risks, in addition to the climate change-induced higher frequency of such events, the occurrence of an acute event is more likely over a longer period, entailing more financial risk. To support the long-term stability of the Bank and the achievement of its development goals, climate strategies and risk management approaches must incorporate all relevant time horizons as part of financial decisions.

The EBRD incorporates time-horizon considerations into climate-related risk assessment by splitting its Banking portfolio[26] on the basis of remaining tenor, in line with other financial risks and industry practice. These time horizons are listed in Table 4, which also provides the percentage of the investment portfolio in each (by remaining tenor).

Table 4. **Debt and equity exposure by time horizon**

| Category | Time horizon | Share of the EBRD's portfolio |
|---|---|---|
| **Short-term transaction**[27] | Less than 1 year | 4% |
| **Medium-term transaction** | 1 to 7 years | 43% |
| **Long-term transaction** | More than 7 years | 42% |
| **Equity** | n/a | 11% |

With the exception of reputational and acute physical risk, the Bank considers most climate-related risks associated with **short-term transactions** less likely to be financially material because of their limited time horizons.

For **medium-term transactions**, the longest seven-year tenor is the typical timeframe for which organisations set intermediate climate objectives.[28] The majority of the medium-term portfolio (60 per cent, or €14.5 billion) is in non-EU investee economies where the low-carbon transition is expected to occur over a longer timeframe, reducing the carbon transition risk, although the Bank recognises that a delayed and then rapid transition is likely to be more economically disruptive.

**Medium-term transactions** exposed to physical risk were relatively limited as of December 2023, accounting for 6 per cent (€1.5 billion) of all medium-term transactions in the assessed portfolio.[29] This is mainly due to diversification, with financial institutions and sovereign-guaranteed transactions accounting for 56 per cent of this population. The main hazards identified in the corporate portfolio were increasing water stress and extreme heat. Since 2022, the Bank has been actively monitoring investments in high-climate-risk sectors, with further analysis carried out to determine the materiality of the risk and to engage clients on their transition, mitigation and adaptation plans.

Around half (48 per cent, or €11 billion) of the Bank's **long-term transactions** are sovereign guaranteed, partly limiting the EBRD's financial risk exposure.

The majority of the assessed[30] **equity portfolio** (83 per cent, or €2.7 billion as at December 2023) was in sectors considered low or moderate risk for carbon transition. Financial institutions are the largest sector within the assessed equity portfolio, accounting for 28 per cent (€0.9 billion). This sector is considered less exposed to climate risk due to financial asset diversification. Equity transactions exposed to physical risks are limited, accounting for 4 per cent (or €228 million as at December 2023) of the total assessed equity portfolio.

## 4.3. Financial and economic impacts of climate change on EBRD Banking sectors and regions

The EBRD designed its procedures for identifying, assessing and managing climate-related financial risks in Banking activities to focus on the impacts of these risks in terms of client revenues, costs and asset values.

The Bank will continue to refine its procedures by further integrating the financial and economic impacts associated with climate change into all relevant financial risk considerations for investment decisions. Refinements will focus on improving assessments based on time horizons for the manifestation of different risks at firm level under different climate scenarios and the macroeconomic

[26] Portfolio includes operating assets and undrawn commitments.
[27] In this section, transaction refers to debt and guarantee.
[28] Average remaining tenor in this segment is 3.7 years.
[29] The Bank assessed 83 per cent, or €46.3 billion, of its existing banking portfolio for physical climate risk.
[30] Excluding equity funds.

impacts of those risks. Translating both physical climate and carbon transition risks into quantified financial risk will improve the assessment of materiality and help to better evaluate the options for managing these risks. Figure 5 provides an illustrative example of the interconnection of aspects of climate-related financial risk with relevant time horizons, as well as ways in which climate change can have a financial impact on companies, the macro economy and the EBRD's Banking sectors. Figure 6 provides a high-level overview of the main physical and carbon transition risks to which the Bank's regions and, by extension, the EBRD are financially exposed. The climate risks presented in Figure 6 provide an overview of broad climate considerations for the Bank's strategy and engagement in these regions. However, on individual projects, it reviews clients by assessing their business models, as well as their core locations for carbon transition and physical climate risk. This approach is further detailed in section 4.4.

Figure 5. **Climate risk drivers, time-horizon considerations, and financial and economic impacts**

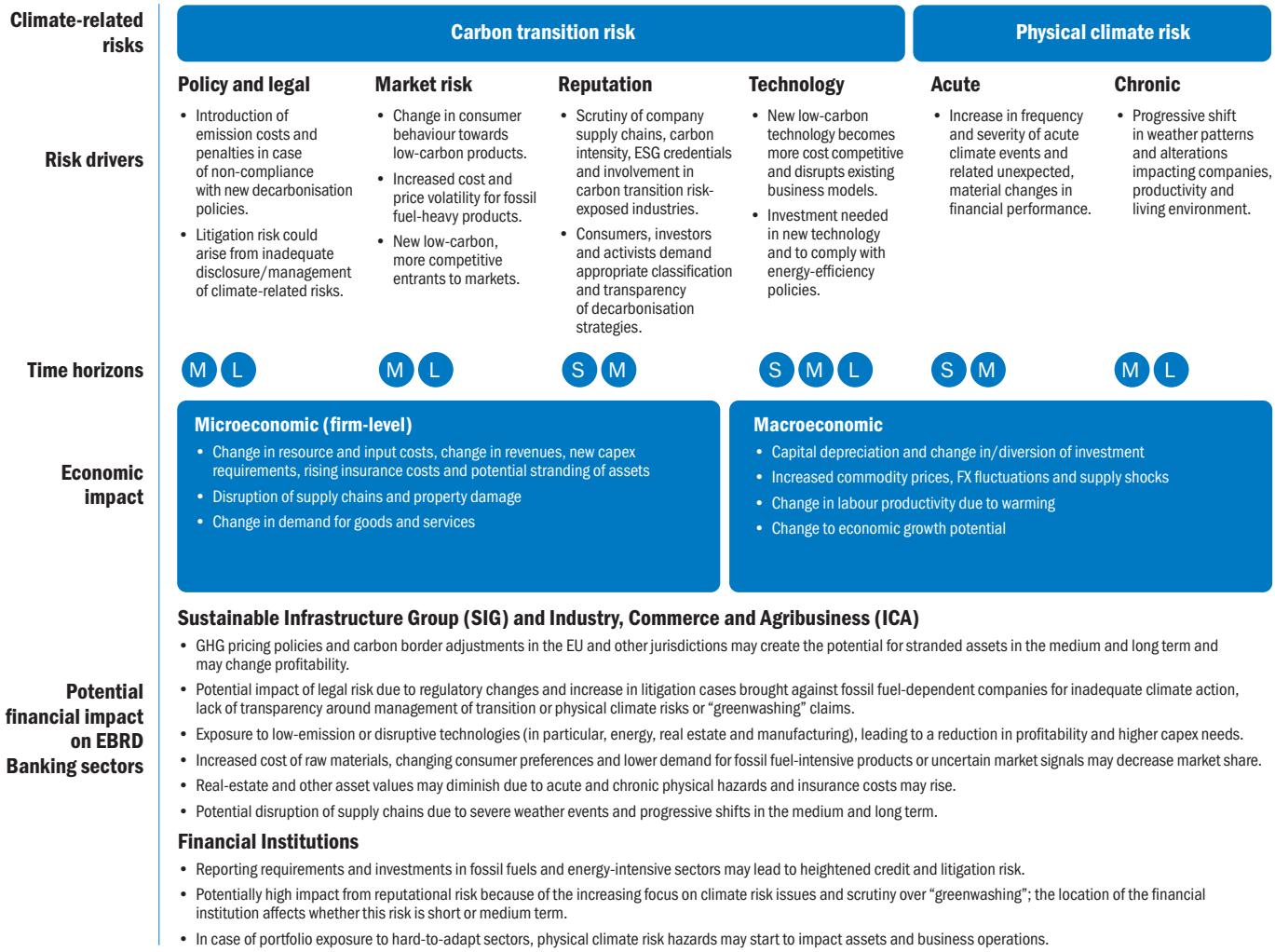
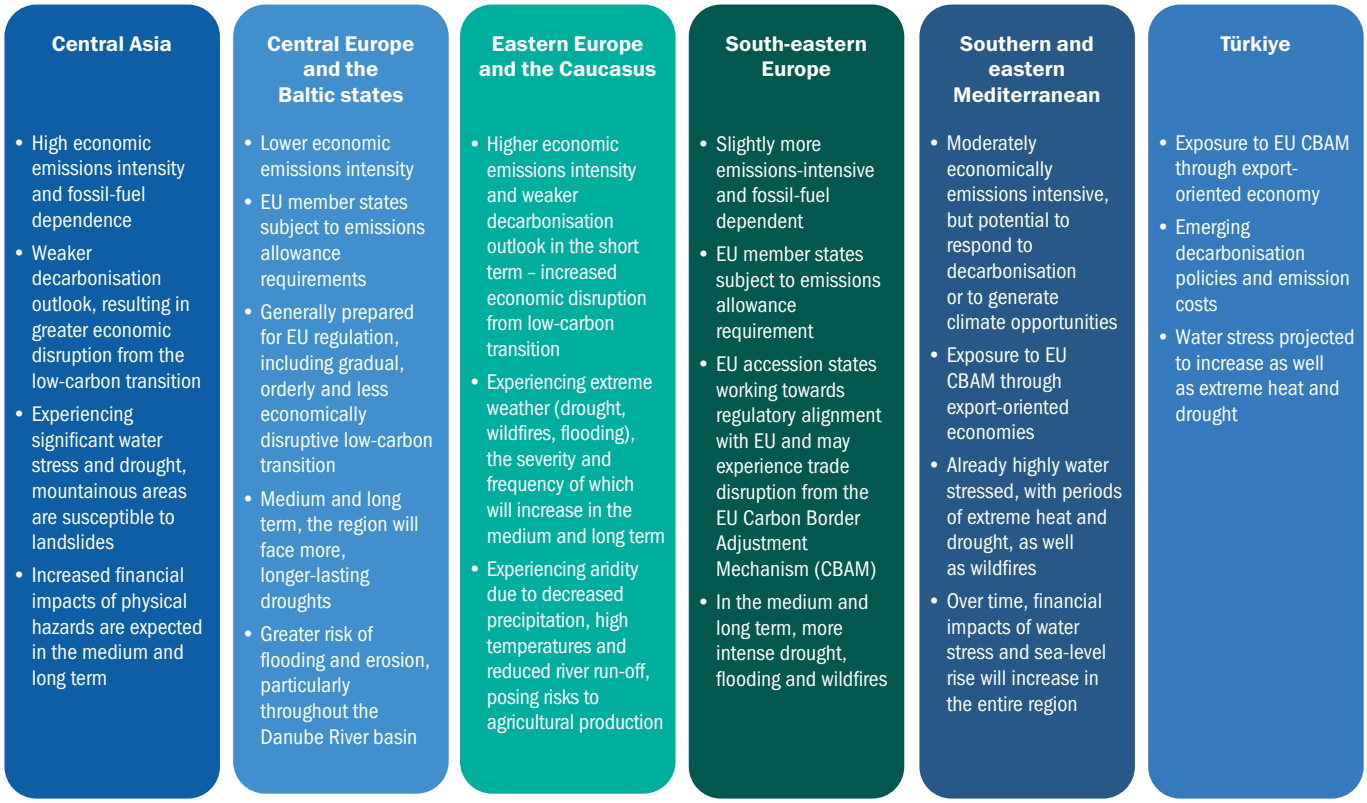


Figure 6. **Overview of climate risks in the EBRD regions**[31]




## 4.4. Assessment of climate-related financial risks in the Banking portfolio

Details of the Bank's process for assessing and managing climate-related risk is embedded in its internal climate risk procedures. In 2023, these procedures were refined and expanded to cover all types of financing instrument, including direct equity investments.

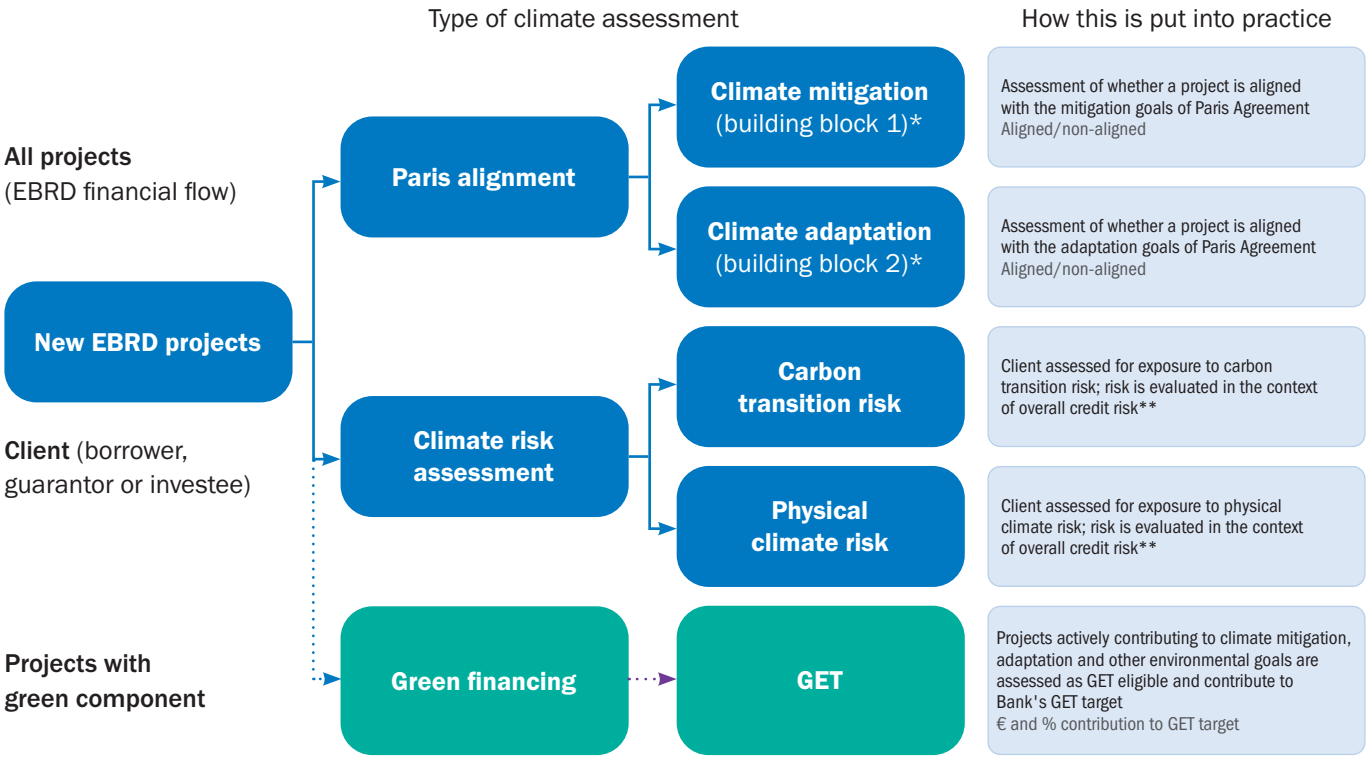
### 4.4.1. Assessment of climate-related financial risks in direct finance and equity projects

The EBRD identifies, assesses and manages climate-related risks in the process of conducting due diligence and structuring individual transactions. The first line of defence proposes measures to mitigate climate risk, including GHG emission reduction plans and climate adaption plans. Climate risks and mitigating factors are then assessed and challenged by Risk Management and ESD. This is complemented by the assessment of other climate-related aspects of individual projects, as illustrated in Figure 7.

While the EBRD has a long history of considering and assessing climate risks at project level, these risks are now reviewed as part of a cross-cutting risk assessment process for clients. The Bank strives to ensure that climate risk is assessed systematically across its portfolio using a standardised approach.

[31] This figure presents an overview of potential climate risks in the EBRD regions. Therefore, each climate risk described in this figure does not necessary apply to every economy in which the EBRD operates in those regions.

Figure 7. **Green assessments for EBRD investment projects**




Note: * The joint MDB approach to alignment with the objectives of the Paris Agreement was presented at the COP24 climate conference in 2018.[32] The approach has six "building blocks" (BBs) for Paris alignment: (BB1) alignment with mitigation goals; (BB2) adaptation and climate-resilient operations; (BB3) accelerated contribution to the transition through climate finance (in the EBRD's case, GET finance); (BB4) strategy, engagement and policy development; (BB5) reporting; and (BB6) alignment of internal activities (for example, administration, procurement and treasury). Therefore, Paris alignment has a project-screening element (BB1 and BB2), a climate finance and policy element (BB3 and BB4) and a corporate element (BB5 and BB6). ** No impact on internal credit rating at this stage.

The scope of the assessment in this figure is based on projected emissions estimated by the Bank's in-house engineers and external consultants during the project's inception. The Bank also assesses the impact of its investments after signing. Sustainable finance considerations are incorporated into institutional policy and strategy development and reflected in the assessments shown (for example, the Bank's Strategic and Capital Framework and its country and sector strategies). This approach ensures that all projects are Paris aligned and comply with Bank policy.

## Carbon transition risk assessment

To facilitate the transaction-level assessment of climate-related risks, the Bank has developed an internal screening approach to better analyse its exposure to carbon transition risk, resulting in a carbon transition risk screening score. These scores comprise: (i) an industry-specific assessment of carbon transition risk using a heat-mapping approach, largely based on classifications by Moody's Investor Service and adjusted by the Bank's specialists, (ii) an internal assessment of a country's preparedness for transition and the impact of climate risk policy and regulatory changes, and (iii) specific modifiers.[33]

Exposure tenor was previously a component of the screening score. This was removed in 2023 as part of procedural refinements, though it continues to be considered on a case-by-case basis as a risk amplifier or mitigant.

The carbon transition screening scores form a numerical heat map of new transactions to flag any potential high-risk exposures requiring further assessment, qualitatively and quantitatively, during due diligence, if the risk is considered material. The carbon transition scores further identify the transition risk exposure of the Bank's existing portfolio. Section 5.1.2 provides details of current and historical exposure to carbon transition risk when applying these scores. Since 1 January 2024, the screening scores have been adjustable after further assessment to better reflect risk associated with this exposure.

## Physical climate risk assessment

The Bank developed a proprietary physical climate risk-screening tool to identify exposure to physical climate risk. The physical climate screening score is based on: (i) a client's industry sector sensitivity to 10 physical climate hazards, (ii) the likelihood of those hazards occurring based

[32] See ADB, AfDB, AIIB, CEB, EBRD, EIB, IADB, IsDB, NDB and World Bank Group (2018).

[33] Industry-sector risk classifications are derived from the industry sectors classified by Moody's Investors Service (2020; 2021) as having very high, high or moderate risk for carbon regulation. Country carbon transition assessment scores are based on proprietary methodology.

on an analysis of the client's core location coordinates, (iii) a tenor adjustment and (iv) a verification step.[34] The likelihood of physical hazards occurring is based on a range of data, listed in Table 5. These data sources were chosen after a detailed review of publicly available physical climate risk data. Since 1 January 2024, projects have also been screened for extreme rainfall events.

Counterparties screened as potentially high risk are subject to further assessment of the potential financial impacts of physical climate risk. In such cases, the Bank's specialists assess potential impact and develop climate resilience plans, as needed. Since 1 January 2024, the screening scores have been adjustable following further assessment to better reflect risk associated with the exposure.

The Bank has gradually increased the coverage of the physical climate risk assessment of its portfolio, complementing the high-level internal expert view of sectoral vulnerabilities described in Section 5. Coverage has increased in line with the continuing assessment of new transactions and through targeted screening of counterparties in the portfolio based on financial exposure. The EBRD has collected asset-level data and screened 83 per cent of its portfolio. Further work is underway to screen the remaining portfolio, focusing on corporate debt and equity clients.

Both the carbon transition and physical climate risk methodologies will be subject to further refinement and adjustment. They will evolve based on operational use and best practice for the assessment of climate-related financial risks. Currently, they act as a scalable and informative tool for focusing on the assessment of clients with a high likelihood of material transition or physical risks. The Bank continues to explore the emerging availability of tools that integrate climate hazard screening and the financial quantification of identified risks.

### 4.4.2. Assessment of climate-related financial risks in financial institution projects

In 2022, a systematic screening methodology for PFIs was introduced, which included an assessment of the sector concentrations within their gross loan portfolio, as well as internal climate risk management practices. By the end of the year, the Bank had screened 86 per cent (or €9.4 billion) of the in-scope financial institution clients in its portfolio.[35] Approximately 6 per cent of PFIs required further assessment for carbon transition risk, while a similar proportion required further assessment for physical climate risk. This process informed the prioritisation of engagement with PFI clients on climate-related financial risk management at an institutional level, focusing on those deemed to have the highest potential climate-related financial risk.

Table 5. **Physical climate hazards and data sources**

| Category | Chronic or acute | Physical climate hazard | Data source |
|---|---|---|---|
| **Temperature-related** | Chronic | Increasing mean temperatures | World Bank – Climate Change Knowledge Portal (CCKP) |
| | Acute | Extreme heat event | World Bank – CCKP |
| | | Wildfires | Swiss Re – CatNet |
| **Wind-related** | Acute | Extreme wind event | Swiss Re – CatNet |
| **Water-related** | Chronic | Increasing water stress | World Resources Institute – Aqueduct |
| | | Sea-level rise | Climate Central – Coastal Risk Screening Tool |
| | Acute | Drought | World Bank – CCKP |
| | | Flood | Swiss Re – CatNet |
| **Solid mass-related** | Chronic | Erosion | Swiss Re – CatNet |
| | Acute | Extreme mass movement | Swiss Re – CatNet<br>Global Facility for Disaster Reduction and Recovery |

[34] At this stage, counterparties with numerous operational locations are typically deemed to be diversified in relation to the financial impacts of physical climate risk. The Bank's physical climate client risk screening is similar to the process it uses to assess a project's alignment with the climate resilience goals of the Paris Agreement. The Bank plans to continue reviewing this approach as it evolves.

[35] In-scope financial institution clients comprise banks, leasing firms and microfinance organisations financed by the EBRD. These account for 90 per cent of the financial institutions portfolio.

At the start of 2023, assessments of climate risk at the institutional level were incorporated into all new transactions with PFIs.

The Bank screens and assesses both the carbon transition and physical climate risks of PFIs in parallel to its PFI client credit review process. This assessment is based on a climate risk questionnaire aimed at better understanding partner institutions' internal climate risk management, as well as their exposure to climate risk through their loan portfolios. This carbon transition and physical climate risk screening process also considers each PFI's primary country of operation. The institutional level assessment also allows the EBRD to monitor and manage PFI clients' financial exposure to climate risks over time and to prioritise assistance with climate-related risk management.

### 4.4.3. Assessment of climate-related financial risks in sovereign projects

In 2023, the EBRD expanded its climate-related financial risk screening coverage to include sovereign and sovereign-guaranteed loans. Sovereign entities are considered to have relatively lower risk due to their diversified revenue streams, legal rights to raise revenue and capacity to reduce expenditure. The potential climate-related financial risk of sovereign entities will be managed through an annual review and assessment of countries considered to have higher exposure to carbon transition or physical climate risks. This will also apply where the internal probability of default (PD) rating or the EBRD's financial exposure is above set thresholds. The outcomes of this assessment may be included in bank-wide stress tests, the Bank's climate-related policy dialogue with a particular government, or the development of EBRD country strategies.

## 4.5. Monitoring of climate-related financial risks in the Banking portfolio

Risk Management conducts reviews of all counterparties considered highly exposed to carbon transition risk to assess whether there has been any change in the risk profile and recommends actions to mitigate any such risk. It then reconfirms or adjusts the risk rating. It also reviews the fair value of equity investments and loans held at fair value. Where relevant, these reviews include specific monitoring requirements for climate-related risks, informed by the portfolio-wide carbon transition risk review conducted in 2022. Risk Management reports to Senior Management and the Board of Directors on the full portfolio on a quarterly basis. Further adjustments and the integration of climate-related risk monitoring into regular reviews will continue to evolve based on operational experience, industry standards and best practices.

The EBRD also conducts an annual review of progress on green transition in all of the economies where it invests. The indicators and associated assessment of the remaining gaps inform country and industry sector strategies. Where relevant, the Bank may also include physical or transition risk scenarios in planned Bank-wide stress tests, as well as ad hoc sub-portfolio stress tests pursued in the course of regular risk management activities and as part of the annual business and financial planning cycle. The Bank recognises that any resulting risk mitigation is constrained by the geographical limitations of its operations.

## 4.6. Incorporating climate risk into internal risk ratings

The EBRD uses a scorecard approach to assign credit ratings to all corporate and financial institution clients. Work is ongoing to incorporate the outcome of the Bank's climate risk assessment transparently into internal credit ratings. A pilot project is investigating the compatibility of the Bank's climate risk assessment with environmental, social and governance (ESG) scorecards from established ratings agencies to assess the impact on the credit profile of the corporate and financial institution debt portfolio.

## 4.7. The EBRD's reporting commitments

The regulatory landscape is evolving rapidly. Although the EBRD, as an international financial institution, has special status as an unregulated organisation, the Bank strives to follow the most advanced climate-related risk management guidance and regulation. It closely observes emerging international standards and regulatory developments, particularly in the EU and on an international level. The Bank expects to report under ISSB standards for the 2025 financial year, at the latest.

The Bank is an observer at the NGFS, a group of 127 central banks and financial supervisors that aims to accelerate the scaling up of green finance globally and develop recommendations for central banks' role in addressing the systemic risk posed by climate change. It monitors outcomes, feedback and lessons learned, which inform internal climate risk stress-testing exercises and the use of climate scenarios, as reflected in this disclosure (see section 5.3).

# 5. Metrics and targets

In line with the recommendations of the TCFD, the EBRD is developing clear and consistent metrics and targets that enable the Bank and external stakeholders to measure and track the risks and opportunities presented by climate change, as well as the associated financial performance implications.

It reports on findings related to its own operations and investment portfolio and provides additional data, including on activities such as capital market transactions.

## 5.1. Metrics overview

Table 6. **Overview of metrics in this report**

| Section | Subsections | Pages |
|---|---|---|
| **Metrics related to Bank's carbon footprint** | • GHG emissions of own operations<br>• Financed emissions | 25-28 |
| **Investment portfolio metrics** | • Portfolio heatmap<br>• Deep-dive carbon transition and physical climate risk assessment of portfolio<br>• The EBRD's fossil-fuel portfolio | 28-36 |
| **Additional metrics** | • Physical climate risk to EBRD offices<br>• Green project reporting<br>• Capital market transactions | 36-39 |

### 5.1.1. Metrics related to the Bank's carbon footprint

The Bank calculates and reports on the carbon footprint and GHG emissions-intensity ratio of its own operations. These disclosures are included in the Bank's *Global Reporting Initiative Report – Sustainability Disclosures*, which also includes the energy consumption, waste and biodiversity impacts of the Bank's activities.[36]

Table 7 provides a summary of the Bank's carbon emissions, accounting for seven types of GHG gas covered by the Kyoto Protocol, expressed in $CO_2$ equivalent. The emissions accounting follows the Greenhouse Gas Protocol.

The Bank's Scope 1 emissions relate to on-site heating, cooling and fuel use in EBRD-owned vehicles. Scope 2 emissions relate to purchased electricity and district heating. The Scope 3 emissions figures presented in Table 7 principally relate to those emissions from purchased goods and services, business travel, waste, and fuel- and energy-related activities and do not include financed emissions. The Bank's preliminary calculation of financed emissions for part of its portfolio is disclosed separately in the subsequent section.

In 2023, the total emissions of the Bank's operations amounted to 37.4 $ktCO_2e$.[37] Emissions are based on the new spending-based methodology adopted in 2022, which provides a more complete assessment of Scope 3 emissions, particularly those associated with purchased goods and services, by applying industry average emission factors to spending data.

The emissions reported for 2023 mark the Bank's first full year of operation in its new headquarters, to which it moved in late 2022:

- Scope 1 emissions decreased from the previous year, as there is no longer direct gas usage in the new headquarters building.
- Scope 2 location-based[38] emissions decreased as a result of the energy-efficient design of the new headquarters building, which has an Energy Performance Certificate (EPC) A rating. The Bank started to track and disclose its market-based Scope 2 emissions in 2023. These are lower than location-based emissions, reflecting the EBRD's choice to purchase electricity from renewable energy sources for the Bank's London headquarters through the EDF – Renewable for Business 100% tariff. This tariff ensures that all supplied electricity is supported by renewable energy guarantees-of-origin certificates.
- Scope 3 emissions increased from last year if one excludes the one-off emissions of 22 $ktCO_2e$ associated with the fit-out of the EBRD's new headquarters building. This increase is mainly attributed to a rebound in business travel to pre-Covid levels, coupled with enhanced methodology that takes into account the entire lifecycle of emissions from such travel ("well to wheel"), including radiative forcing effects.[39]

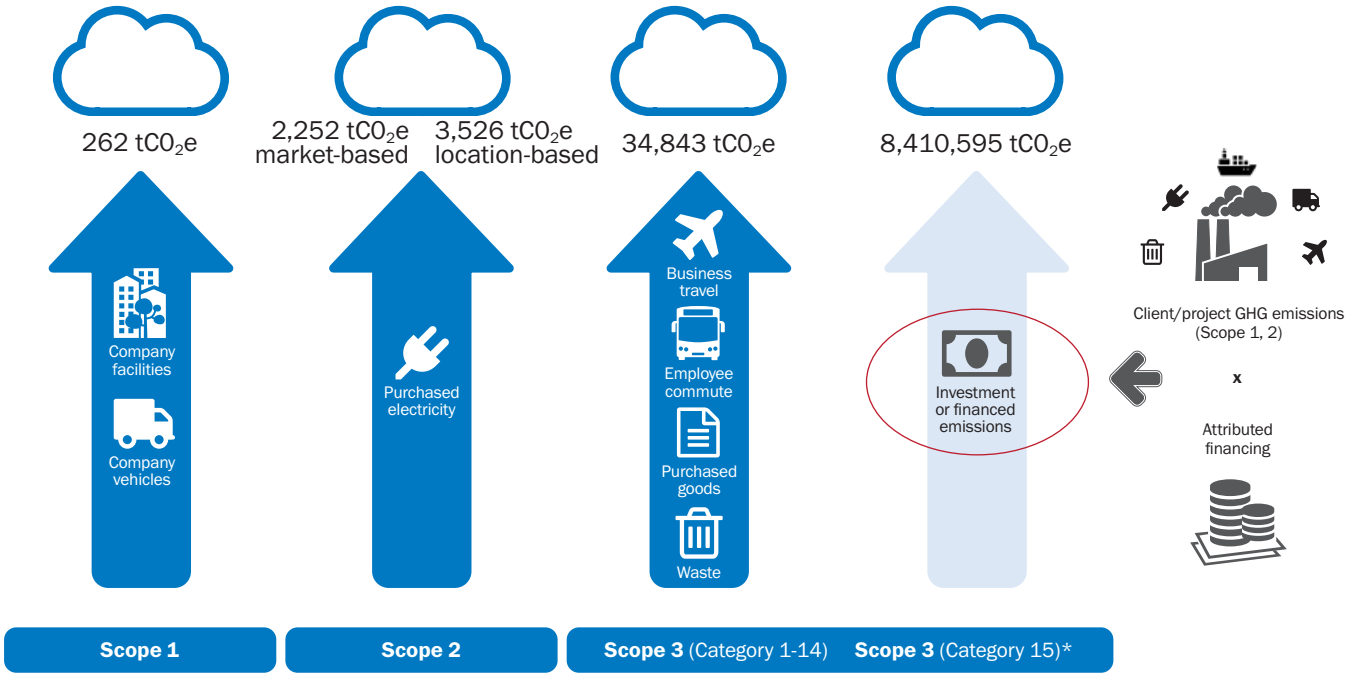
[36] See EBRD (2024b).
[37] Based on market-based Scope 2 emissions.
[38] While Scope 2 market-based emissions derive emission factors from contractual instruments encompassing the EBRD's choice to purchase electricity from renewable energy sources, Scope 2 location-based emissions rely on grid-average emission-factor data to calculate emissions based on the average emissions intensity of the grids where energy consumption occurs.
[39] Including radiative forcing in Scope 3 emissions calculations increases their impact by accounting for the additional warming potential of certain GHG emissions over time.

Table 7. **Selected EBRD sustainability indicators**

| Type | 2019 | 2020 | 2021 | 2022[1] | 2023 |
|---|---|---|---|---|---|
| Scope 1 ($tCO_2e$) | 1,610 | 1,595 | 1,694 | 810 | 262 |
| Scope 2 ($tCO_2e$) – location based | 4,632 | 3,852 | 3,479 | 3,721 | 3,526 |
| Scope 2 ($tCO_2e$) – market based | – | – | – | - | 2,252 |
| Scope 3 ($tCO_2e$)[2] | 15,275 | 8,148 | 7,610 | 50,638[3] | 34,843 |
| Electricity (MWh)[4] | 15,300 | 14,500 | 13,100 | 8,969 | 5,579 |
| Gas (MWh)[4] | 4,500 | 4,500 | 4,300 | 2,290 | 0 |
| Travel (million km) | 46.1 | 7.3 | 3.7 | 23.9 | 35.9 |
| Printer paper consumption[4] (tonnes) | 32.0 | 6.5 | 1.9 | 4.8 | 5.9 |
| Water consumption[4] (thousand $m^3$) | 48.6 | 35.6 | 27 | 26.9 | 3.2 |

[1] In 2022, the EBRD reset its carbon footprint data base, adopting a methodology aligned with the Greenhouse Gas Protocol, working with an independent carbon accounting partner that provides a more complete assessment of its internal emissions, especially those associated with purchased good and services.
[2] Scope 3 emissions figures represent emissions from business travel and estimates of employee commute, waste and purchased goods and services. They do not include the Bank's financed emissions (that is, Greenhouse Gas Protocol, Scope 3, category 15).
[3] Approximately 22,600 tonnes of Scope 3 emissions were associated with the fit-out of the EBRD's new headquarters building.
[4] EBRD headquarters only.

Figure 8. **EBRD GHG emissions breakdown by scope**




Note: * The measurement covers 169 high-emitting clients, corresponding to 20 per cent of the Bank's total operating assets.

## Financed emissions (Scope 3, Category 15), 2023

### Results

In addition to reporting emissions from its own operations, the EBRD is enhancing the measurement of emissions associated with its investments, which the GHG Protocol categorises as Scope 3 Category 15 emissions, or "financed emissions".

Building on the work presented in last year's TCFD report, the Bank doubled the scope of the portfolio under consideration and increased the granularity and quality of its assessment by focusing on project-level emissions. The measurement covers 169 high-emitting clients on 194 projects, corresponding to 20 per cent of the Bank's total operating assets. The measurement considers only Scope 1 and Scope 2 emissions from the assessed clients and projects, resulting in an estimated 8.4 $MtCO_2e$ of financed emissions annually (90 per cent of which originate from high-emitting sectors: oil and gas, power and energy, metals and mining, and agriculture).

### Assessment of emissions and attribution factors

Through its membership of the International Financial Institution (IFI) Technical Working Group on Greenhouse Gas Accounting, the EBRD is liaising with the Partnership for Carbon Accounting Financials (PCAF), the standard-setters for calculating financed emissions. The Bank has had to interpret and, in some cases, diverge from the PCAF standard in order to provide the best estimate of financed emissions, given the limited availability of reported emissions for the projects and clients it finances. The EBRD will continue to collaborate with other IFIs to ensure MDBs' financed emissions measurement is transparent and comparable.

The PCAF's project finance asset class was used for 123 projects accounting for 50 per cent of measured financed emissions. In the project finance approach, the Bank used average annual projected emissions of the individual projects. As part of its comprehensive assessment, the Bank's in-house engineers and external consultants estimated total emissions based on activity data for the project (for example, the amount of fuel required) in a typical year of operation. In the context of current GHG reporting landscapes in regions where the Bank operates, such estimates are a more accurate and reliable way of assessing the absolute emissions of projects the EBRD finances than sector-average or intensity factors.

The PCAF's business loan and unlisted equity asset class approach was used in cases where the EBRD provided general financing to clients, or where project-specific emissions data were not available. In such cases, the measurement is based on published emissions from clients or, where clients do not publish emissions, emission intensity factors derived from sector averages.

Each project's absolute emissions are apportioned to the EBRD as financed emissions based on an attribution factor: the ratio of operating assets (outstanding amount) to total project value (total equity and debt).

The EBRD used PCAF data-quality score guidance to assess the robustness of its financed emission measurements. As the PCAF standard does not include data-quality scores in situations where future estimated emissions are used, interpretations of the standard were made in assessing data quality. Based on its interpretation, the EBRD assigned a rounded weighted average PCAF data-quality score of 2 to the assessed sample.

Table 8. **Sectoral breakdown of financed emissions and percentage of sectors covered by the portfolio in scope**

| Sector | Financed emissions ($MtCO_2e$) | Sectoral coverage (per cent) |
|---|---|---|
| Oil and gas | 2.9 | 71% |
| Metals and mining | 2.4 | 64% |
| Power and energy | 1.8 | 21% |
| Agriculture | 0.4 | 37% |
| Chemicals and fertiliser | 0.2 | 84% |
| Manufacturing | 0.2 | 44% |
| Transport | 0.2 | 11% |
| Auto manufacturing | 0.0 | 96% |
| Other sectors | 0.3 | 13% |
| **Total** | **8.4** | **20%** |

### Period-on-period comparison

The 2023 finance emission calculation represents a doubling of portfolio coverage from the EBRD's previous TCFD report. It also entails a shift in focus away from client-level to project-level emissions.

To compare changes in financed emissions, the Bank performed an analysis using a baseline sample of clients to support a consistent comparison between the previous and current reporting period and the current exercises.

Table 9. **Period-on-period comparison of financed emissions measurement**

| | | Period-on-period comparison | | |
|---|---|---|---|---|
| | | 2022 | 2023 | Disclosure 2023 |
| **Scope** | Number of clients | 78 | 78 | 169 |
| | Number of projects | 91 | 91 | 194 |
| | Percentage of total operating assets | 11%(1) | 10%(1) | 20% |
| **Results** | **Financed emissions ($MtCO_2e$)** | **3.3** | **5.4** | **8.4** |

Note: (1) The percentage of operating assets in the portfolio under consideration (which amortised between 2022 and 2023) and the total banking book operating assets (which grew from 2022 and 2023).

The period-on-period comparison illustrates the impact of changes in measurement approach away from revenue based on emissions intensity towards estimated project-level emissions, revealing an increase of 2.1 $MtCO_2e$. Though immaterial shifts occur throughout the comparison, the bulk of the increase is caused by two projects:

- The emissions from a large metals and mining operation had previously been estimated using revenue-based intensity. In 2023, the client disclosed production forecasts and production-based emission intensity factors, resulting in significantly higher absolute emissions.
- Estimated future emissions from a gas plant for another metals and mining firm were assessed at project level. Because of the power-generation nature of the project in scope, estimated emissions were more significant than the sector average.

### Data limitations disclaimer and next steps

The EBRD's second estimate of financed emissions provided valuable insights into areas for improvement and highlighted challenges in the year-on-year comparison. As the Bank looks to improve the coverage and quality of its approach, it will continue to focus on developing a more consistent methodology and calculation approach, particularly with regard to reducing its reliance on proxy data. The Bank is conscious that the measurement of financed emissions is developing as guidance evolves and will continue to report transparently on any adjustments made to refine its emissions disclosures in future years.

## 5.1.2. Investment portfolio metrics

Climate-related risks have the potential to affect many EBRD clients. Because of the pace of change, the Bank is continuously refining the way it identifies, assesses and quantifies risks in its projects and portfolio, screening each financial exposure for individual carbon transition and physical climate risk.

The Bank has also begun to examine its portfolio for exposure to climate risk by:

(1) using climate-risk heat-mapping to identify financial commitments to high-emitting industry sectors and assets, as well as the share of GET finance
(2) assessing the carbon transition and physical climate risk of parts of the Banking portfolio based on internal climate-risk screening methodologies.

### Portfolio heatmap

The EBRD provides information on the broad industry exposure of its Banking portfolio, the estimated ex ante GET portfolio of each of these broad industry classifications, and a weighted average classification of transition risk and physical risk for each. Physical climate risk classifications are based on an aggregation of the industry's sensitivity to 10 hazards to provide an approximation of potential physical risk. Transaction-specific portfolio assessments of carbon transition and physical climate risks using the Bank's screening methodology are outlined in the following deep-dive sections. Over time, the heatmap in Table 10 will evolve to reflect transaction-specific risk classifications.

Table 10. **EBRD Banking portfolio[40] based on high-level counterparty industry-sector classification for transition and physical climate risk**

| EBRD Banking portfolio at year end | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | 2022 | | | | 2023 | | | | Classification | |
| Counterparty after risk transfer, industry sector | Total portfolio (€ million) | Percentage of portfolio | Share classified as GET | Estimated ex-ante GET Portfolio (€ million) | Total portfolio (€ million) | Percentage of portfolio | Share classified as GET | Estimated ex-ante GET Portfolio (€ million) | Carbon transition risk | Physical climate risk |
| Independent power producers and energy traders | 685 | 1% | 37% | 256 | 298 | 1% | 44% | 130 | Very high | High |
| Coal and consumable fuels | 16 | - | - | - | - | - | - | - | Very high | Moderate |
| Oil and gas | 968 | 2% | 25% | 239 | 580 | 1% | 22% | 128 | Very high | Moderate |
| Chemicals (including fertilisers) | 715 | 1% | 69% | 492 | 725 | 1% | 65% | 468 | High | Moderate |
| Automotive (incl. parts and equipment) | 843 | 2% | 50% | 424 | 840 | 2% | 58% | 490 | High | Moderate |
| Utilities | 1,887 | 4% | 66% | 1,239 | 2,050 | 4% | 60% | 1,224 | High | Moderate |
| Metals and mining, forestry, paper products | 1,380 | 3% | 22% | 309 | 1,397 | 2% | 24% | 338 | High | High |
| Transport and logistics | 2,022 | 4% | 24% | 492 | 2,211 | 4% | 32% | 708 | High | Moderate |
| Construction materials, containers and packaging | 261 | 0% | 14% | 36 | 215 | 0% | 17% | 36 | Moderate | Moderate |
| Real estate investment trusts/ other real estate | 1,129 | 2% | 78% | 876 | 1,159 | 2% | 83% | 963 | Moderate | Moderate |
| Industry and machinery | 696 | 1% | 36% | 248 | 671 | 1% | 54% | 362 | Moderate | Moderate |
| Consumer goods, food and beverages | 1,826 | 3% | 13% | 239 | 1,835 | 3% | 25% | 463 | Moderate | Moderate |
| Retail and tourism | 1,221 | 2% | 36% | 442 | 1,534 | 3% | 42% | 643 | Low | Moderate |
| Healthcare | 984 | 2% | 28% | 278 | 987 | 2% | 44% | 439 | Low | Moderate |
| Technology and telecommunications | 968 | 2% | 37% | 361 | 998 | 2% | 24% | 241 | Low | Moderate |
| Renewable electricity | 3,093 | 6% | 79% | 2,428 | 3,531 | 6% | 82% | 2,889 | Low | Low |
| Sovereign states and municipalities | 17,616 | 33% | 51% | 8,970 | 17,632 | 32% | 53% | 9,300 | Low | Low |
| Financial institutions and funds | 16,582 | 31% | 35% | 5,850 | 18,161 | 33% | 37% | 6,661 | Low* | Low* |
| Other | 576 | 1% | 58% | 333 | 1,052 | 2% | 65% | 682 | N/A** | N/A** |
| Total portfolio | 53,469 | 100% | 44% | 23,513 | 55,878 | 100% | 47% | 26,166 | | |

Note: The coal and consumable fuels and oil and gas categories include only clients classified as such and not the indirect exposures included in the fossil-fuels section. Indicative exposure classifications of carbon transition and physical climate risk are for high-level heatmapping purposes only. Physical climate classifications are based on a high-level aggregation of the industry's sensitivity to 10 physical climate hazards, without taking into account the physical locations of those exposures, although the Bank's internal physical climate risk methodology is based on counterparty core locations. The figures presented for the total portfolio and estimated ex ante GET portfolio are book values and, therefore, not directly comparable to the *Financial Report 2023*.

* The EBRD considers the broad financial institutions and funds sector to be relatively low risk due to factors such as sector diversification in lending portfolios and regulatory requirements, such as capital and liquidity buffers. Although considered lower risk, the Bank assesses climate risk for these clients based on an analysis of their underlying lending portfolio (see section 4.4 on risk management for financial institution transactions).

** The broad "other" category does not include sector-specific carbon transition or physical climate risk classification.

[40] Portfolio includes operating assets and undrawn commitments.

The broad industry classification of transition risk listed in Table 10 also reflects the EBRD's assessment of sensitivity to the low-carbon transition within the current regulatory environment. At the end of 2023, 51 per cent (€28.6 billion) of the EBRD's Banking portfolio (excluding financial institutions and other categories) was broadly classified as moderate or low risk based on these assumptions. A further 32 per cent (€18.1 billion) was exposed to the financial sector, which is considered to have lower climate-related financial risk exposure due to diversification. This adds up to 83 per cent (€46.7 billion) of the total portfolio. It is reasonable to assume that a rapid policy acceleration towards emission reductions, technological breakthroughs or changes in consumer preferences may have a substantial impact on industry transition risk profiles. However, the portfolio review carried out in 2023 and the transition risk assessment of new financing give confidence that the transition risk exposure of the portfolio is acceptable.

Fifteen per cent (€8.1 billion) of the Bank's portfolio covers industries broadly classified as high or very high transition risk. This is a slight decrease from 2022. The share of GET financing to these sectors[41] increased 1 per cent (€36 million) to €3.5 billion in 2023, highlighting the EBRD's continued engagement in fostering the low-carbon transition. Exposure to these industries is not likely to decrease in future due to the EBRD's commitment to supporting decarbonisation and the transition of clients with high emissions or otherwise deemed to have higher risk associated with the low-carbon transition. However, over time, the Bank's support is likely to lower the risk profile of clients that fall into these categories.

The Bank's transition support is evident in the continued increase in the GET share of its investments. In 2023, the GET share of the overall portfolio grew to 47 per cent from 44 per cent in 2022, while the GET share for newly signed deals was 50 per cent.

The legacy fossil-fuel portfolio, such as exposure to coal, continues to fall as these loans mature. In addition, direct exposure to the oil and gas sector declined by around €387 million over the course of 2023, while the Bank maintained about the same share of GET financing to the sector in a clear demonstration of its support for clients' low-emission investments.

Other significant increases in GET share, indicating investment in the low-carbon transition, are evident in the utilities, transport, industry and consumer goods sectors. The Bank also continues to expand its direct investments with clients exclusively active in the renewable energy sector. These grew to €438 million by year end 2023, an increase of more than 14 per cent.

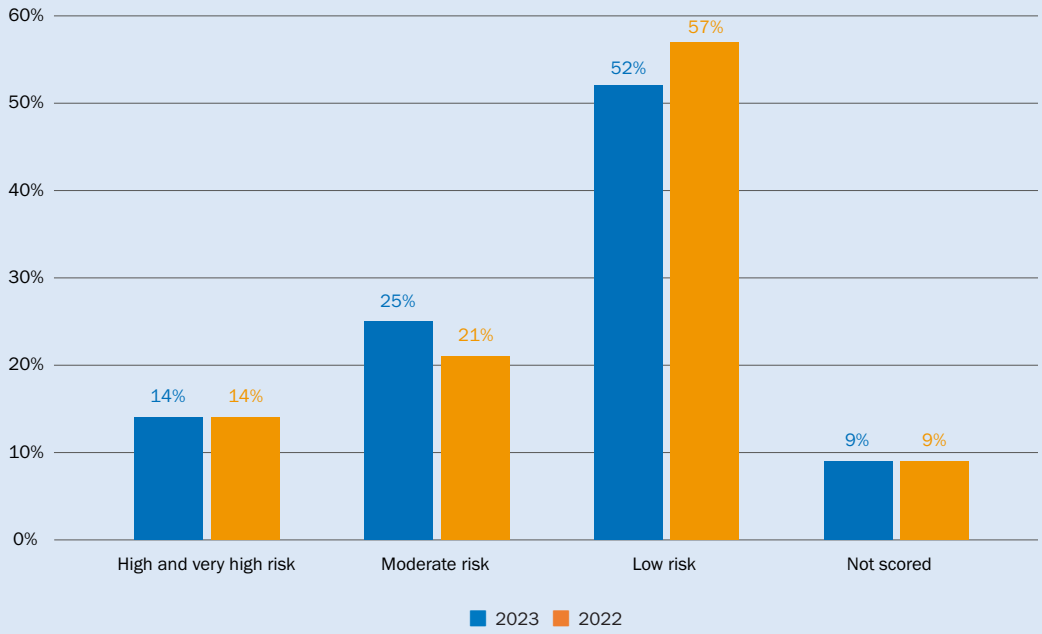
[41] Note that the Bank's broad transition risk categorisation for "transport and logistics" was updated to "high" from "moderate" in 2023, so this category is included in the "very high/high" carbon transition risk category in this report.

## **Deep dive 1:** Bank expands assessment of carbon transition risk in the banking portfolio

In 2023, the Bank screened 91 per cent[42] (€50.8 billion) of its Banking portfolio for carbon transition risk using internal scoring methodologies. This includes all of the EBRD's corporate debt and equity, sovereign or sovereign-guaranteed loans, as well as most financial institution transactions. Counterparties screened as high risk are typically further assessed and, where applicable, subject to ongoing monitoring.

Figure 9 shows the distribution of carbon transition risk scores in December 2023 compared with December 2022.

Figure 9. **High-level carbon transition risk classifications in the Banking portfolio, December 2022-23**




As outlined in Figure 9, 14 per cent (€7.8 billion) of the financing to counterparties was screened as having potentially high or very high carbon transition risk as at December 2023, while 77 per cent (€43 billion) was deemed to have moderate or low risk. This is largely in line with 2022, with a slight shift in the moderate risk category, mainly due to sovereign counterparties falling within scope. Corporate counterparties accounted for 94 per cent of the high or very high risk categories. The key sectors represented were agricultural products, airport services and electric power generation. Counterparties from Ukraine, Kazakhstan and Türkiye accounted for the largest portfolio exposure in the high or very high carbon transition risk categories, although this was also a function of the Bank's larger overall exposure to the Turkish and Ukrainian economies in general.

Furthermore, counterparties screened as having high or very high carbon transition risk typically had a relatively short average remaining tenor of five years at the end of 2023. In 2023, new projects with counterparties screened as having potentially high or very high carbon transition risk underwent further assessment. For corporate counterparties, the Bank assesses GHG emissions impact, among other factors, by applying scenarios to understand the potential financial impact of introducing an emissions cost. This analysis also considers any decarbonisation plans or climate risk management strategy. For financial institution counterparties, individual assessments are carried out for each of the EBRD's partner financial institutions to assess the materiality of climate risk at firm level and to take appropriate steps to manage any material risks.

[42] This excludes equity funds and some financial institution counterparties.

## **Deep dive 2:** Assessment of physical climate risk in the Banking portfolio

The Bank has assessed 83 per cent (€46.3 billion) of its existing Banking portfolio for physical climate risk. This covers around 80 per cent of direct debt and equity transactions, all sovereign or sovereign-guaranteed transactions, and most financial institution transactions. Similar to carbon transition risk, an internal scoring methodology is used, specific to each type of counterparty. Only corporate debt and equity clients are currently screened using a location-based physical climate risk screening approach, which identifies the physical hazards to which each client may be exposed, while sovereign and financial institution exposure screening currently does not take specific geolocation information (other than country) into account. The overall screening results are summarised in Table 11.

Table 11. **Distribution of physical climate risk scores for the assessed EBRD portfolio (including sovereigns and financial institutions)**

| Percentage of total portfolio scored | Physical climate risk level |
|---|---|
| 46% | Low |
| 28% | Moderate |
| 9% | High or very high |
| 17% | Not scored |

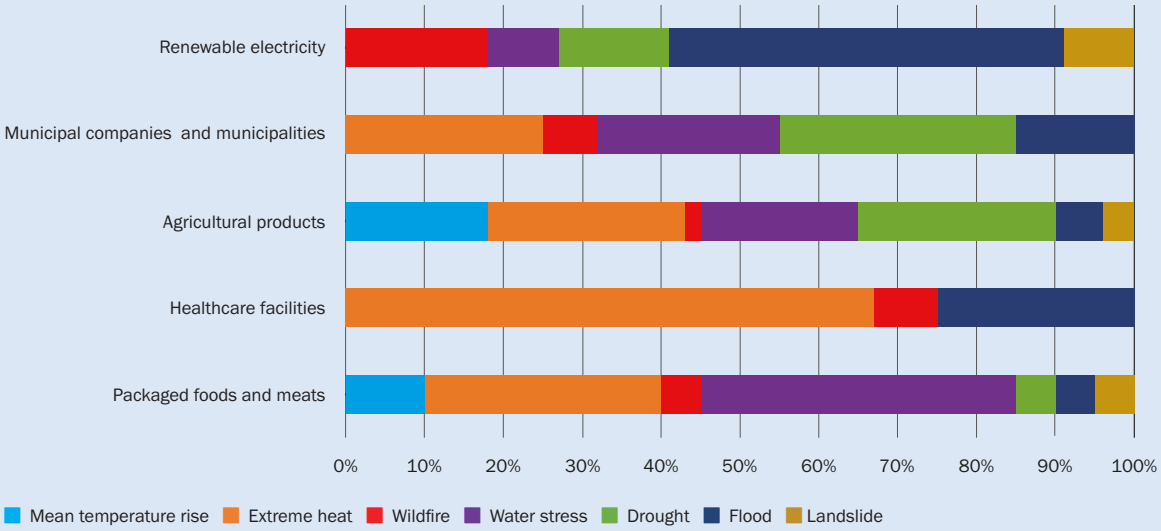
Of the counterparties assessed, 9 per cent (€4.7 billion) were screened as potentially high or very high for physical climate risk, while 74 per cent (€42 billion) were screened as moderate or low risk. Where the corporate debt and equity portfolio was concerned, diversification of location was a leading factor in assessing counterparties as very low risk. The top three physical climate risks for the corporate portfolio (by frequency of occurrence) were: i) flooding, ii) extreme heat events and iii) increased water stress, as illustrated in Figure 10. This was in line with 2022. Unassessed counterparties include those out of scope (equity funds and insurance companies) or with small exposures or short remaining tenors.

Figure 10. **Relative frequency of hazards in high/very high physical climate risk screening scores for the corporate debt and equity portfolio**


In the corporate debt and equity portfolio, the sectors with the highest physical climate risk are renewable energy, municipal companies and municipalities, agricultural production, healthcare facilities, and packaged food and meats. Among these, renewable energy has the greatest number of corporate clients assessed as having potentially high or very high risk. However, this reflects the high volume of projects in this sector, with only 26 per cent of corporate clients being considered potentially high or very high risk compared with 100 per cent of healthcare facility clients. This is broadly in line with the results of the previous report.

The specific hazards that triggered the high or very high physical climate risk score in these sectors are summarised in Figure 11. While the breakdown of hazards reflects those seen in the portfolio overall in Figure 10, it illustrates the degree of variation between sectors, reflecting the specific sensitivities of underlying activities to certain climate hazards.

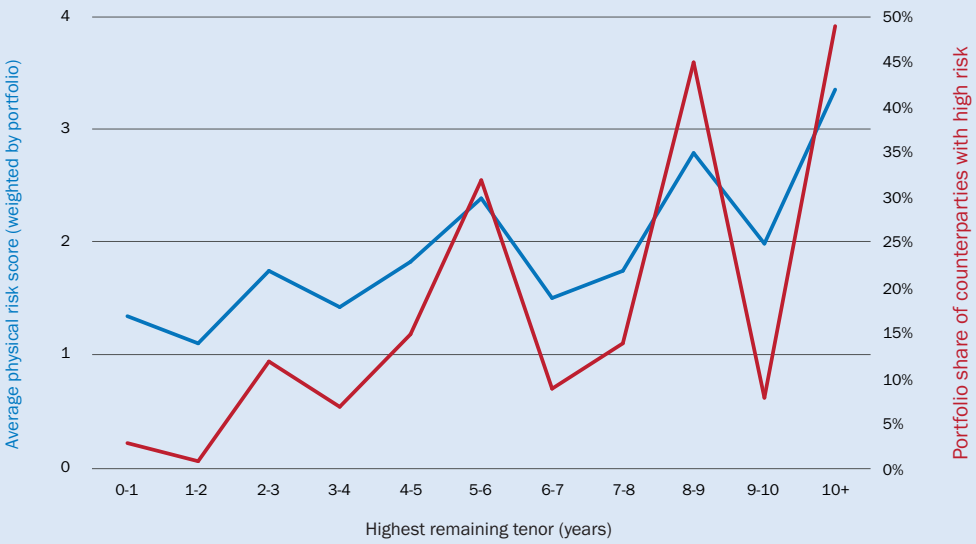
Figure 11. **Overview of hazards identified in industry screening as high/very high physical climate risk for the corporate debt and equity portfolio**




The top five economies in the Bank's regions where corporate debt and equity clients with high or very high physical climate risk are located are Türkiye, Kazakhstan, Ukraine, Romania and Poland. This reflects the portfolio's overall geographical concentration. In 2023, the Bank financed €3.0 billion in projects to support climate change mitigation and adaptation goals in these countries (an increase of 36 per cent from €2.2 billion in 2022).

For corporate debt and equity clients, the Bank's approach to assessing physical climate risk includes a specific weighting for the tenor of direct-finance projects to reflect the increase in exposure to climate risks over time as the impact of higher global temperatures worsens the effects of climate change. This is reflected in the distribution of scores shown in Figure 12 and the high frequency of high-risk counterparties at tenors of more than 10 years.

Figure 12. **Average physical climate risk scores by highest remaining tenor for the corporate debt and equity portfolio**




The majority of clients screened as potentially high or very high risk have been subject to further assessment. Those clients flagged as higher risk in the portfolio whose transactions pre-date the implementation of climate risk assessment procedures will be subject to increased scrutiny during any proposed new financing.

The Bank will continue to assess the consistency of findings from the screening of new transactions with portfolio results in order to test and refine the physical climate risk methodology and assess whether portfolio management adjustments are required.

## The EBRD's fossil-fuel portfolio (oil, gas and coal) at year end 2023

The fossil-fuel portfolio disclosure covers the Bank's lending exposure related to the coal, oil and gas sectors.[43] It spans the upstream, midstream and downstream subsectors, including gas-fuelled electricity and heat generation. It includes exposures where proceeds are used for such activities and where the Bank's financing is to a company that operates in one of these sub-sectors and which generate more than 20 percent of its revenue from fossil fuel-related activities, but the proceeds are not used for those business lines.

As of December 2023, the Bank's portfolio exposure to fossil-fuel sectors and fossil fuel-based energy generation came to €6.3 billion. This was an increase of €0.5 billion from 2022, mainly due to an increase in emergency response loans to support energy security as a result of the war on Ukraine. Legacy exposures continue to decrease. The fossil-fuel sector accounted for 11 per cent of the total banking portfolio, with 46 per cent sovereign, 28 per cent state-owned and municipal companies, and 26 per cent private sector. Geographically, in addition to a regional gas pipeline project, the largest projects were located in Ukraine, Kazakhstan, Moldova, Uzbekistan and Egypt. Table 12 provides a detailed breakdown of the Bank's fossil-fuel portfolio (including energy generation).

Table 12. **Fossil-fuel portfolio breakdown, December 2023 (€ million)**[44]

| | Use of proceeds | | | | | |
|---|---|---|---|---|---|---|
| **Client subsector** | **Legacy** | **Facilitating low-carbon transition** | **Energency response** | **Other** | **Total** | **Per cent** |
| Vertically integrated | – | 75 | 903 | 158 | **1,136** | **18%** |
| Upstream | 92 | – | – | – | **92** | **1%** |
| Midstream | 985 | 284 | 644 | 49 | **1,961** | **31%** |
| Downstream | 929 | 1,617 | 554 | 37 | **3,137** | **50%** |
| **Total** | **2,005** | **1,977** | **2,100** | **244** | **6,326** | **100%** |
| % | **32%** | **31%** | **33%** | **4%** | **100%** | |

- **Legacy:** Where the proceeds are directed to fossil fuel-related activities and do not contribute to a reduction in the GHG emissions of the counterparty or to its progression to a low-carbon pathway. This type of financing was signed prior to the introduction of the Bank's climate risk assessments, Paris alignment approach, Fossil Fuel Approach update in 2021 and the exclusion of direct coal financing. At end 2023, 69 per cent of the EBRD's legacy portfolio was concentrated in only six projects: three gas pipelines (43 per cent), two combined-cycle gas turbine power plants (16 per cent) and one crude oil producer/refinery (10 per cent). Sovereign or sovereign-guaranteed transactions accounted for 50 per cent of legacy transactions and state-owned companies a further 12 per cent, in line with the 2022 portfolio.

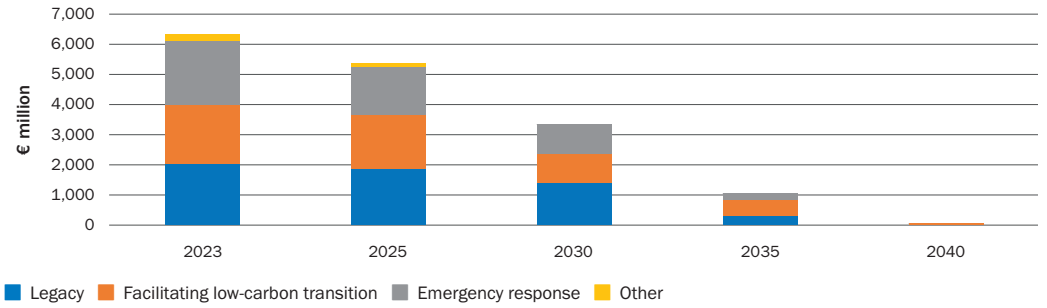
[43] The fossil fuel portfolio exposures outlined here include direct exposure to the industry, as well as exposure to other sectors, such as utilities, municipal heating, electric power producers, marine ports and so on, where the client or the Bank's financing is substantially exposed to the fossil-fuel industry. These figures also include equity positions and debt guaranteed by a sovereign state, so they may not align with portfolio fossil-fuel exposures outlined in the portfolio project heatmap.

[44] Category definitions:
**Upstream:** Fossil-fuel exploration, extraction and related services.
**Midstream:** Fossil-fuel transportation, storage, (distribution, regasification and liquefaction for gas).
**Downstream:** Fossil-fuel electricity and heat generation, supply of district networks, gasoline stations, refineries.

- **Facilitating low-carbon transition:** Where the client conducts activities related to fossil-fuel activities, but EBRD financing specifically supports the client in executing its low-carbon pathway strategy or facilitates a switch to lower-carbon alternatives that result in GHG emission reductions. This includes financing energy-efficiency improvements, renewables or infrastructure upgrades to facilitate the transition to a low-carbon economy (for example, investments in electric vehicle charging stations at petrol stations). Many of these clients have decarbonisation plans in place, such as coal exit strategies. In some cases, the EBRD provides further support by facilitating policy dialogue for the rollout of renewables or the enhancement of energy-efficiency strategies.
- **Emergency response:** These are loans provided in response to an acute situation, such as threats to energy security (for example, as a result of the war on Ukraine) or Covid-19.
- **Other:** Where the use of proceeds does not finance fossil fuel-related activities, the project does not facilitate the low-carbon transition or does not fall into the emergency response category. However, the client or counterparty still has some fossil fuel-related dependencies (for example, rail transportation). Typically, the EBRD's use of proceeds in these cases is ring-fenced from any fossil fuel-related activities and has to be in accordance with the Bank's Paris Alignment commitment and Energy Sector Strategy.

Figure 13 shows the expected reduction in the EBRD's fossil-fuel portfolio, based on final facility maturity date.

Figure 13. **Reduction in fossil-fuel portfolio by expected maturity (€ million, year end)**




The volume of legacy portfolio exposure is set to decline rapidly in the coming years due to the Bank's climate change mitigation priority, as can be seen in Figure 13. Of the fossil-fuel portfolio at year end 2023, 15 per cent will be repaid by the end of 2025 and 84 per cent will be repaid by 2035. The long-term (post-2035) exposures in the legacy portfolio are concentrated in two projects: a combined-cycle gas turbine power plant and a gas pipeline. More than half of the post-2035 portfolio exposure is sovereign owned or guaranteed, limiting financial risk exposure.

Conversely, investments in facilitating the low-carbon transition are expected to continue to increase over the coming years as the Bank's new Energy Sector Strategy focuses on accelerating the decarbonisation of energy, notably by scaling up renewables and phasing out unabated fossil fuels.[45]

In line with the Energy Sector Strategy 2024-28, approved in December 2023, the EBRD will not finance thermal coal mining or coal-fired electricity generation capacity[46] and will not invest in the upstream oil and gas sector.[47] In exceptional cases, the Bank might consider targeted support for fossil-fuel investments in the mid-[48] and downstream[49] oil and gas sectors. Such investments must not only be aligned with the goals of the Paris Agreement, but also, among other things, demonstrate strong ambition to accelerate the low-carbon transition, a low risk of carbon lock-in, not displace renewable sources or low-emission alternatives, use the Best Available Techniques, meet the highest environmental and social standards, and be subject to an assessment of physical and carbon transition risk, or otherwise target exclusively the decommissioning of existing assets or repurposing for lower-carbon fuels.

[45] See EBRD (2023a).
[46] Including upgrades to existing plants or the construction of new capacity.
[47] Where upstream means exploration, production, extraction or related services.
[48] Excluding investment in infrastructure dedicated to oil transportation and/or storage.
[49] Excluding the financing of oil-fired electricity generation.

Where the Bank provides financing that is not related to specific capital expenditures to a company with significant fossil-fuel assets operating in the energy sector,[50] it will only do so if the company has in place, or is committed to adopting, high climate governance standards and operates in a regulatory or corporate context that embeds strong commitments to decarbonisation.

### 5.1.3. Additional metrics

#### Physical climate risks to EBRD offices

The EBRD's assessment of physical climate risk in its own operations is measured against the likelihood of 10 climate change hazards. In 2023, building on the work completed in 2022 to review its three largest offices, the EBRD expanded its analysis to include its 10 largest Resident Offices and its data centres.

The analysis showed common issues related to increasing temperatures, extreme heat, water stress, drought and erosion in the regions where these sites are located, but they are not considered to have material consequences on operations. The potentially material risks identified were floods for the Belgrade, Bishkek and Casablanca Regional Offices, landslides for the Almaty Regional Office, wildfires for the Tbilisi Regional Office and extreme wind for the Bank's data centres.

The outcomes of this work are being taken to the individual offices to be discussed as part of Business Continuity Planning and operational risk processes. The EBRD will continue to expand its analysis to cover other operating locations in 2024.

#### Green project reporting

Under its GET 2.1 approach, the Bank introduced an enhanced set of indicators that have been tracked and reported for projects that accelerate the transition to a green, low-carbon, resilient economy since 2021. Various key indicators are presented in Table 13 and grouped as follows:

- **Compositional indicators** relate to specific Bank strategic parameters including: private share of GET finance, level of climate finance, and level of adaptation finance.

  The EBRD monitors and reports climate finance in line with joint MDB climate finance tracking methodology. The Bank tracks climate change mitigation[51] and climate change adaptation[52] projects, as well as other environmental activities.

- **Performance indicators** reflect key inputs and outcomes of GET projects, such as GHG reduction, water efficiency, renewable energy investment, climate adaptation and so on, as well as private-sector climate change mobilisation.

- **Process indicators** monitor progress on the implementation of specific GET 2.1 processes and organisational arrangements.

  The EBRD has been undertaking assessments of the Paris alignment[53] of directly financed projects since June 2021. As of January 2023, all new investments have been Paris aligned.

Details of the full list of impact indicators reported by the Bank for 2023 are presented in the EBRD's *Sustainability Report*.[54]

Table 13. **Green projects indicators**

| **Compositional indicators** | **2022** | **2023** |
|---|---|---|
| GET finance commitments (€ million) | 6,360 | 6,543 |
| GET finance private-sector share (per cent) | 75% | 79% |
| Climate finance (EBRD resources) (€ million) | 6,081 | 6,360 |
| Adaptation finance (€ million) | 246 | 372 |
| Mitigation finance (€ million) | 5,943 | 6,201 |
| **Performance indicators** | **2022** | **2023** |
| $CO_2e$ emissions reduced (kt/y) | 11,141 | 10,710 |
| **Process indicators** | **2022** | **2023** |
| Paris alignment assessment (no. of projects assessed) | 170 | 426 |

[50] For example, privatisations, working capital facilities and refinancing.
[51] Climate change mitigation involves activities that are compatible with low-emission pathways that reduce, avoid, limit or sequester GHG emissions to mitigate climate change.
[52] Climate change adaptation involves activities to reduce the risks or vulnerabilities posed by climate change and to increase climate resilience.
[53] For more details about the Bank's Paris alignment approach, see: https://www.ebrd.com/ebrd-activities-paris-alignment.
[54] See EBRD (2024a).

## Capital market finance and participation metrics

### EBRD issuance of themed bonds

The Bank has issued **environmental sustainability bonds** (ESBs) since 2010. These are bonds issued against a portfolio of the EBRD's green, climate-relevant and sustainable resource projects, such as renewable energy, energy efficiency, water and waste management, and sustainable transportation.

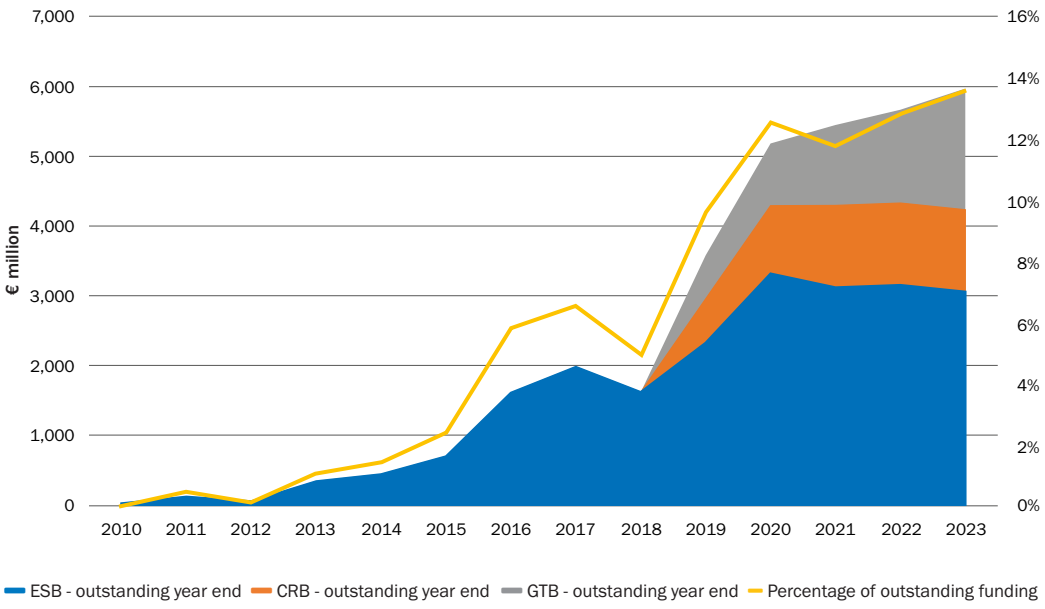
The Bank first issued **climate resilience bonds** (CRBs) in 2019, designed to align with both the Green Bond Principles and the Climate Bonds Initiative's Climate Resilience Principles, published in September 2019. CRBs provide an opportunity to finance projects aimed at building climate resilience by addressing physical climate-change vulnerabilities and risks identified in public- and private-sector projects in the economies where the EBRD operates. Some key sectors for CRB issuance are infrastructure, business and commercial operations, as well as agriculture and ecological services.

The Bank started issuing **green transition bonds** (GTBs) in 2019 to focus on key economic sectors that are highly dependent on the use of fossil fuels, to enable their transition to low-carbon and resource-efficient operations.

In assessing these investments, it is vitally important to go beyond the typical green bond's primary focus on projects' environmental and sustainability goals and to contextualise the investments within the overarching mandate, strategies and policies of the borrower. Projects financed through GTBs must also incorporate the broader context of better climate governance and the low-carbon transition of the borrower. This structure ensures that financing is redirected from carbon-intensive assets or processes to activities that enable a country to fulfil its climate commitments and objectives. Projects under the GTB framework concentrate on manufacturing, food production, and the construction and renovation of buildings.

In light of the growing importance the socially responsible investment-focused investor community is placing on the impact of projects underlying green bond issuance, the EBRD has continued to develop its annual impact reporting for all three green bond programmes, referencing the best-practice and impact metrics of the Green Bond Principles.[55] Figure 14 provides an overview of the evolution of the Bank's issuance of climate- and sustainability-related bonds.[56]

Figure 14. **Issuance of green bonds**



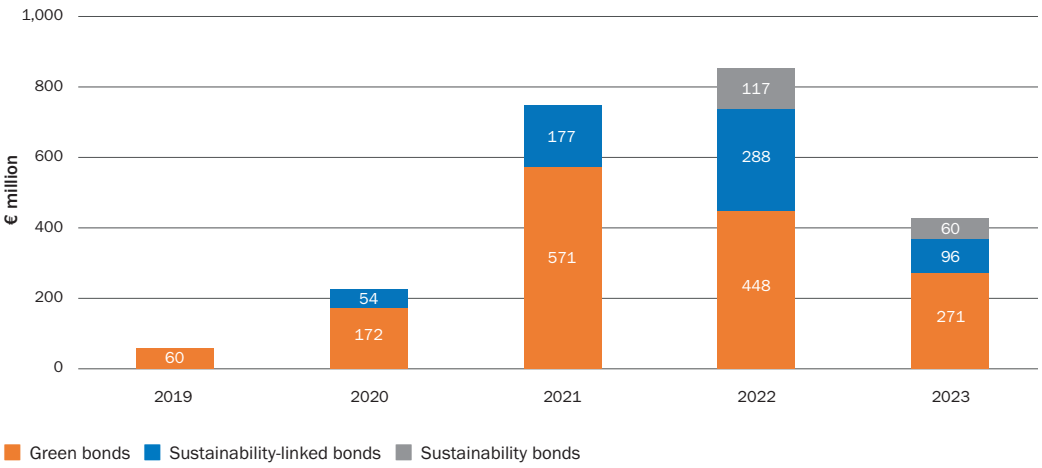

[55] See ICMA (2021) and EBRD (n.d.).
[56] For more details, see EBRD (2023a).

## EBRD participation in labelled bonds

In 2023, the EBRD invested in 14 green, sustainability and sustainability-linked bonds for a total of €427 million. This corresponded to a drop of 50 per cent in such investments year on year (see Figure 15). Macroeconomic uncertainty, amid higher interest rates, rising inflation and geopolitical tensions, brought some of the EBRD's capital market transactions to a halt, with international investors more reluctant to invest.

However, the EBRD's role as an anchor investor remained significant; it supported its clients in raising more than €5.4 billion in 2023, a 38 per cent increase year on year. The average investment ticket in each project decreased from 22 per cent to 8 per cent, in part due to the Bank's strategy of scaling down its investment bid in the event of high private investor demand. The EBRD continues to support first-time issuers, preparing them for future and repeat issuance.

Figure 15. **Evolution of EBRD investments in green, sustainability and sustainability-linked bonds, 2019-23 (€ million)**

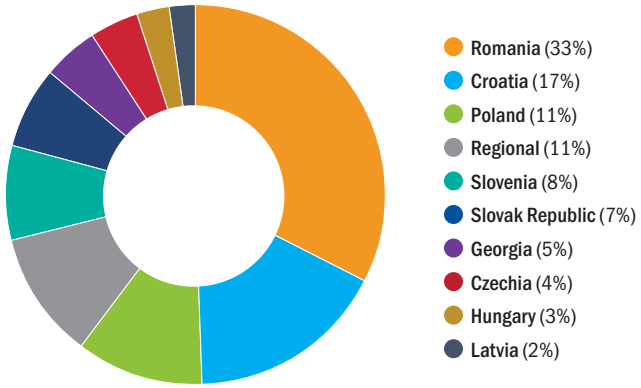



Figures 16 and 17 show the key countries and sectors for EBRD investments in green, sustainability and sustainability-linked bonds. Financial institutions were the main issuers of the bonds in which the EBRD invested.

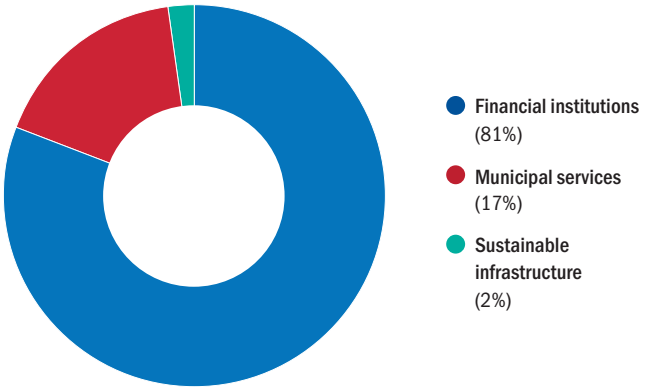
In 2023, the EBRD supported debut green covered bond issuance by a Polish mortgage bank, as well as an inaugural green covered bond in Slovakia. There has been a rapidly expanding trend in green covered bond issuance in the economies where the Bank operates. Green covered bonds accounted for 17 per cent of the green bonds in which the Bank invested in 2023 (up from 7 per cent in 2022). This trend is expected to continue.

Figures 16 and 17. **EBRD green, sustainability and sustainability-linked bond investment characteristics, 2023**

**EBRD green, sustainability-linked and sustainability bond investments in 2023, by country**




**EBRD green, sustainability-linked and sustainability bond investments in 2023, by sector**



Sustainability-linked loans and bonds have recently attracted attention from regulators worldwide. Market concerns include a lack of ambition when it comes to sustainability targets and issuers taking short cuts to achieve key performance indicators (KPIs) and avoid step-ups in coupon. There is also a view that the coupon step-ups in the event of failure to meet KPIs need to be more substantial to ensure compliance. EBRD investments in sustainability-linked instruments are subject to comprehensive appraisal of KPIs and enforcement mechanisms supported by second-party opinions. Investors with a strong environmental mandate, such as the EBRD, have a critical role to play in ensuring the integrity of these instruments for this market to grow and deliver meaningful sustainability outcomes. The EBRD continues to closely monitor regulatory developments in this space.

## 5.2. Target overview

Table 14. **Target overview**

| Section | Target and timeline | Progress | Pages |
|---|---|---|---|
| **Paris alignment** | • Alignment of Bank activities with the Paris Agreement<br>• Timeframe: from 1 January 2023 | Achieved and ongoing | 39 |
| **GET** | • Green finance to account for at least 50 per cent of Annual Bank Investment<br>• Timeframe: 2021-25 | Target reached annually since 2021 | 39-40 |
| **Emissions reduced through financing** | • GHG emission reduction of 25-40 million tonnes $CO_2e$/year over 2021-25 (cumulative, based on estimated projections)<br>• Timeframe: 2025 | Cumulative based on estimated projections of $CO_2e$ emission reductions from 2021 to 2023 of 28.8 $MtCO_2e$/year | 40 |
| **Carbon neutral in internal operations** | • The EBRD has been carbon neutral in its own operations since 2017; future approach under review<br>• Remain carbon neutral in future<br>• Timeframe: ongoing | Work in progress | 40 |

### 5.2.1. **Target:** Paris alignment

The EBRD's approach to aligning its investments and internal activities with the Paris Agreement is integral to its support of climate action. Since 1 January 2023, all new EBRD investments and activities have been aligned with the mitigation and adaptation goals of the Paris Agreement.

### 5.2.2. **Target:** Green Economy Transition (GET)

The GET approach for 2016-20 (GET 1.0) aimed to increase the Bank's green financing to 40 per cent of total financing. The Bank managed to remain at or above the target GET ratio for each year between 2016 and 2019. The highest GET share of 46 per cent of total EBRD annual financing was recorded in 2019, but this dipped to 29 per cent in 2020 due to the Covid-19 pandemic and the need to provide short-term liquidity to clients during this period. This resulted in an average GET ratio over these four years of 40 per cent, reflecting an overall strong performance by the Bank, in line with GET 1.0 objectives.

In 2020, the Board of Directors approved the new GET approach for 2021-25 (GET 2.1) as part of the SCF 2021-25.[57] The new approach aims to scale up the Bank's contribution to addressing the climate and environmental crisis. Under the new GET approach, the EBRD will increase green finance to at least 50 per cent of its annual business volume by 2025.

In 2023, the EBRD invested €6.5 billon in green finance, corresponding to a GET share of 50 per cent of the Bank's annual business volume. It spanned climate mitigation, climate adaptation and other environmental activities. The Bank's 2023 GET results are further detailed in the EBRD's 2023 *Sustainability Report*.[58]

[57] See EBRD (2020a) and EBRD (2020b).
[58] See EBRD (2024a).

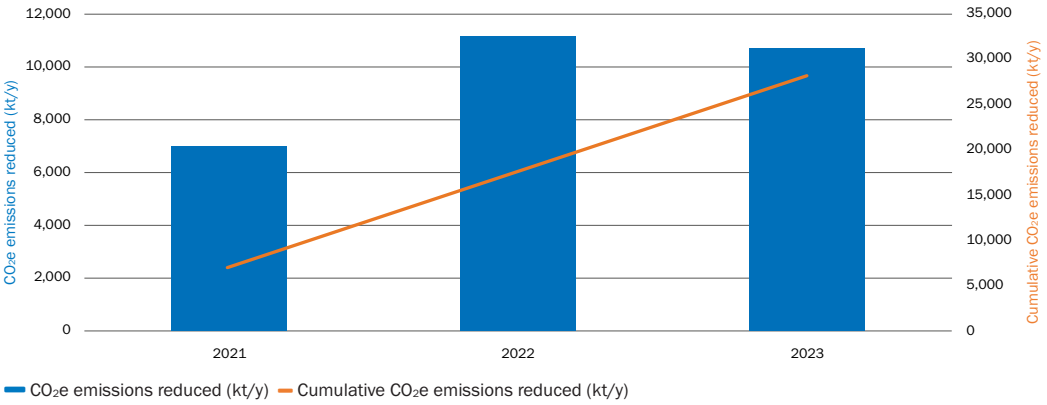
Table 15. **EBRD annual GET finance commitments, 2016-23**

| | GET | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| | 2016 | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 |
| GET finance commitments (€ million) | 2,942 | 4,054 | 3,344 | 4,618 | 3,192 | 5,366 | 6,360 | 6,543 |
| GET share of Annual Bank Investment (%) | 34% | 43% | 36% | 46% | 29% | 51% | 50% | 50% |

### 5.2.3. **Target:** Emission reductions through financing

The Bank seeks to achieve net GHG emission reductions of 25-40 million tonnes $CO_2e$/year through the projects it finances between 2021 and 2025, based on cumulative projected estimated emissions in a typical year, from comprehensive assessments by in-house engineers and external consultants. GET projects approved in 2023 are expected to reduce approximately 10 million tonnes of $CO_2e$ emissions annually. The cumulative emission reduction as of 2023 reached 28.4 $MtCO_2e$/year, within target. The Bank's estimated emission reductions in recent years are presented in Figure 18.

Figure 18. **Cumulative $CO_2e$ emission reductions (kt/year) through projects financed, 2021-23**




### 5.2.4. **Target:** EBRD internal operations – carbon-neutral GHG emissions

The EBRD has been carbon neutral in its own operations since 2017. This has been achieved through a combination of efficiency measures to reduce energy consumption and the purchase of carbon credits certified by the Gold Standard[59] and Clean Development Mechanism[60] to offset the balance of emissions. As part of its commitment to Paris alignment, the Bank is reviewing its approach to emissions offsets and will establish long-term targets for GHG reductions. Further details will be published on the Bank's website before the end of 2024.

## 5.3. Climate risk stress-test

### 5.3.1. Bottom-up carbon transition risk stress-test

#### Introduction and approach

In 2023, the scope of the stress-test expanded to cover 75 per cent of corporate and sub-sovereign debt and the equity portfolio.[61] The aim was to assess whether carbon transition risk is concentrated predominantly in high-carbon-risk industries or is more widespread.

The majority of the EBRD's overall banking book portfolio is made up of exposure to sovereign and financial institutions that are not yet included in the scope of its climate stress-testing exercises. The Bank plans to widen the coverage beyond corporate and sub-sovereign exposure in future stress-tests as better tools and data become available.

[59] For more details about the Gold Standard, see: www.goldstandard.org.
[60] For more details about the Clean Development Mechanism, see: https://cdm.unfccc.int/.
[61] Based on H1 2023, 5 per cent of the exposure is equity.

### Using the Climate RiskGauge tool

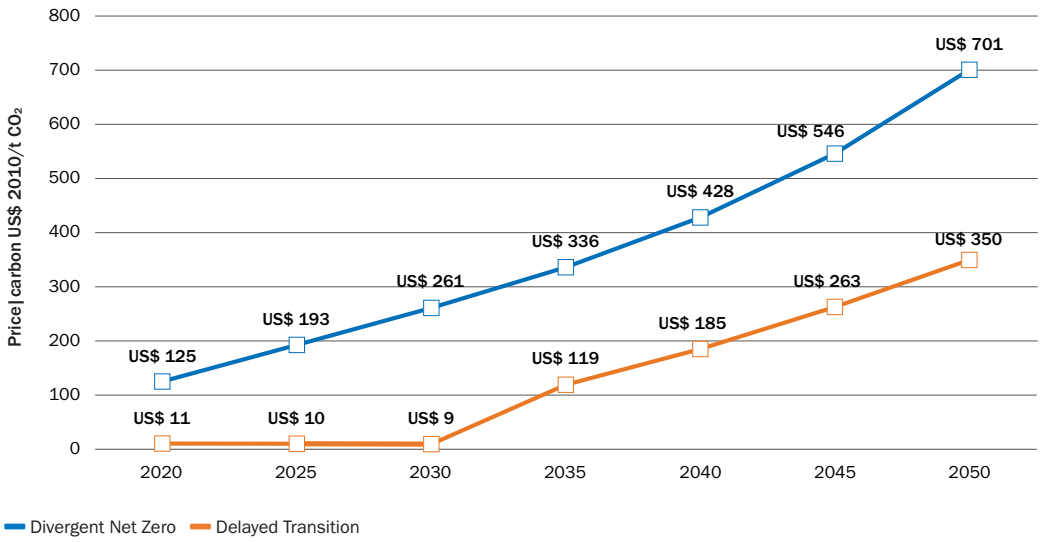
To enable comparison with previous years, the climate stress test was carried out using Climate RiskGauge (CRG), part of S&P Global Market Intelligence's Credit Analytics product. CRG estimates how the climate scenarios impact the PD and the implied movements in the PD rating of the Bank's clients. The resulting stressed PD ratings serve as an input for projecting the amount of non-performing loans and specific and general provisions, in line with the Bank's overall stress-testing framework.

### Scenario description

In November 2023, the NGFS published the fourth phase of its climate scenarios. The phase 4 NGFS release was used to select long-term baseline and stress scenarios and to define an in-house short-term scenario (outlined in Table 16).

For the previous stress-test, the phase 3 NGFS **Divergent Net Zero** scenario was used as the central long-term carbon-transition risk narrative. This scenario was removed from the phase 4 NGFS release. Consequently, the fourth-phase **Delayed Transition** scenario was adopted for the 2023 climate stress-test. The ultimate difference is the scenarios' end-of-century temperature outcomes. While the **Divergent Net Zero** limits warming to 1.5 °C by 2050 (using higher shadow carbon prices), the **Delayed Transition** scenario reaches temperatures in excess of 1.75 °C by 2050, settling to 1.6 °C by the end of the century.

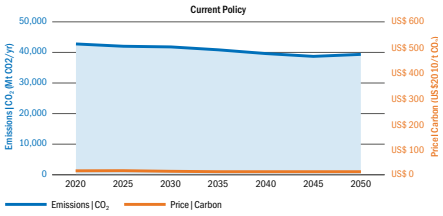
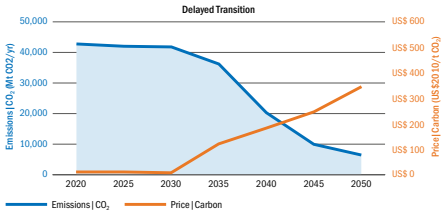
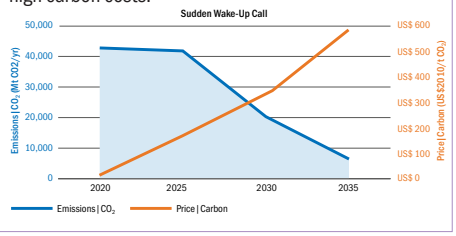
Figure 19. **Carbon price comparison – Divergent Net Zero (NGFS phase 3) and Delayed Transition Scenarios (NGFS phase 4)**




The EBRD continues to refine its use of short-term carbon transition scenarios. The in-house short-term (up to 2035) **Sudden Wake-Up Call** scenario was developed using the long-term NGFS phase 4 scenario data. It reflects the accelerated application of carbon prices to reach net zero, but the corresponding emissions reduction does not keep pace. This results in companies in high-emitting sectors facing higher carbon taxes, as well as stunted growth throughout the economy.

As in previous years, the REMIND Integrated Assessment Model was selected along with the **Current Policies** scenario to be used as the baseline. The financial impact of both the **Delayed Transition** and **Sudden Wake-Up Call** scenarios was assessed under **static and dynamic balance-sheet** assumptions.

Table 16. **NGFS scenarios used in stress testing**[62]

| **Scenario** (Temperature outcome) | | |
|---|---|---|
| **Baseline**<br>**Current Policies** (Source NGFS)<br>**2.9°C by 2100**<br>**Description**<br>**Current Policies** assume that only currently implemented policies are preserved, leading to high physical risks. The scenario is within the Hot House World category, leading to high physical risk due to insufficient action to halt global warming.<br>  <br> | **Long-term carbon risk**<br>**Delayed Transition** (Source NGFS)<br>**1.7°C by 2100**<br>**Description**<br>**Delayed Transition** (within the Disorderly category of scenarios) assumes annual emissions do not decrease until 2030, with stringent policies needed from then on to limit warming to less than 2°C. Negative emissions are limited.<br>  <br> | **Short-term carbon risk**<br>**Sudden Wake-Up Call** (Source NGFS)<br>**1.5°C by 2100**<br>**Description**<br>**Sudden Wake-Up Call** is an interpretation of the NGFS scenario short-term narrative. An unanticipated and accelerated transition occurs, we see net-zero carbon prices being applied hastily. However, industry and power generation cannot decarbonise fast enough and face high carbon costs.<br>  <br> |

## Stress-test results

The population scope of this year's stress-test is broader and more diverse than in previous years. The results are, therefore, less severe and more reflective of the actual risk profile of the portfolio, with non-performing loan (NPL) ratios ranging from 4 per cent in the long-term **Delayed Transition** scenario to 8 per cent in the short-term **Sudden Wake-Up Call** scenario.

The deferred effect of the transition in the long-term **Delayed Transition** scenario means that most of the customers significantly impacted by decarbonisation and increased carbon prices only become distressed once they have paid back significant portions of their exposure. Thus, the NPLs are negligible when amortisation is taken into account under dynamic balance-sheet assumptions.

The accelerated nature of the **Sudden Wake-Up Call** scenario sees specific regions significantly, if not completely, decarbonise by 2030. This leads to additional financial distress caused by high emission abatement costs. However, companies that can withstand this stress recover their creditworthiness in 2035.

Even in the short-term **Sudden Wake-Up Call** scenario, NPL ratios are lower when taking amortisation into account, but are more significant than in the longer-term scenario, as companies become distressed earlier in the exposure lifetime.

More than three-quarters of clients are not impacted by the scenario dynamics when it comes to their credit rating. Most of these clients are in low or moderate carbon transition risk industry sectors, spread across different regions.

### 5.3.2. Physical climate risk pilot

An initial physical climate risk stress-test pilot was conducted on the expanded corporate and sub-sovereign portfolio used for the carbon transition risk stress-test. The pilot drew on the latest physical risk assessment features of the EBRD's selected stress-testing engine, as well as the NGFS **Current Policy** scenario, which has the highest temperature rise (of 2.9°C by the end of the century). Some of the assumptions about economic growth and changes in energy markets in the **Current Policy** scenario were retained in the stress-testing process, making the specific impact physical damage from climate change challenging to isolate.

To address the limited availability of asset-level data, the physical impact was assessed using a country-specific damage function. This approach proved too coarse-grained to yield meaningful insights, as highlighted in Box 3.

Table 17. **Summary of results**

| | | |
|---|---|---|
| **Scope** | 75 per cent of corporate and sub-sovereign portfolio, by portfolio asset | |
| **Scenario** | **Delayed Transition** | **Sudden Wake-Up** |
| **Horizon** | **Long-term: 2050** (five-year time steps) | **Sudden Wake-Up** Short-term: 2035 (five-year time steps) |
| **Results** | 4 percentage point increase in NPL ratio* | 8 percentage point increase in NPL ratio* |

Note: *Increase in the ratio of non-performing loans (NPLs) within the stressed population scope (75 per cent of the corporate and sub-sovereign portfolio).

[62] See NGFS (n.d.).

Box 3. **Country-specific physical impact of climate change**

Applying a country-level physical impact damage function causes all companies in a specific country to be impacted uniformly, dependent only on the company's starting balance-sheet assets.

Half of the stress-test portfolio exposures are located in six countries (see Figure 20): Türkiye, Poland, Kazakhstan, Greece, Uzbekistan and Ukraine. Most of these countries suffer higher-than-average physical damage, as illustrated in Figure 21. Consequently, companies located in these countries experience deteriorations in their creditworthiness.

Figure 20. **Top six countries in the stress-testing portfolio (by portfolio assets)**

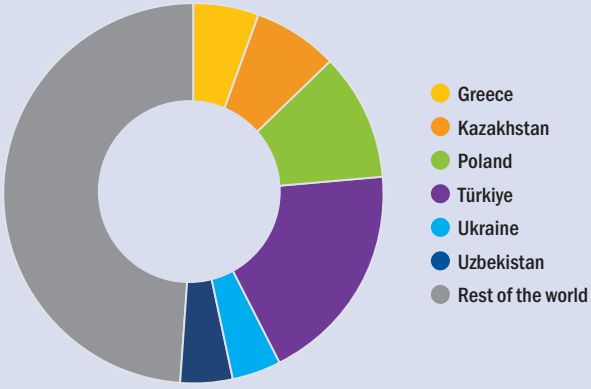
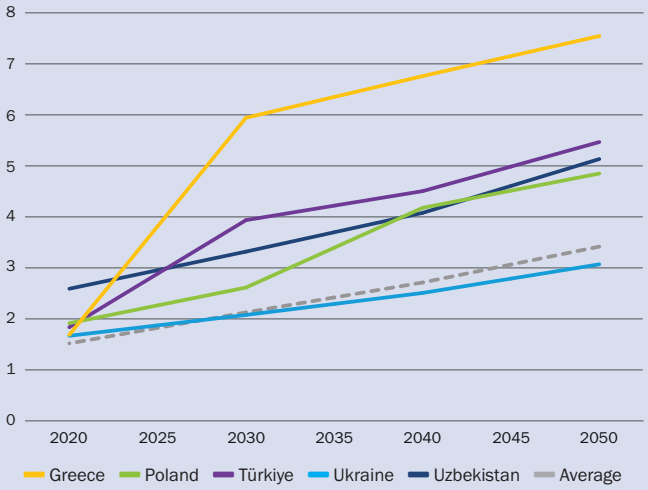



Figure 21. **Damage function for top five countries in the stress-testing portfolio**




Asset-level information about the nature, worth or geolocation of company assets is actively being collated and will inform more fine-grained physical climate scenario analysis in future.

### 5.3.3. Overall stress-test conclusions

The enhanced scope of the 2023 stress-test population yields a milder overall portfolio impact. Losses continue to be concentrated in high-carbon-risk sectors, and carbon transition risk does not seem to be more widespread within the corporate and sub-sovereign portfolio. However, the EBRD continues to monitor emerging carbon transition risks and strives to address gaps in data and potential limitations to its models.

The 2023 stress-testing exercise reinforces the Bank's view that its financial exposure to carbon transition risk is low to moderate. The Bank's capital levels could adequately absorb the impact of non-performing loans resulting from short-term and long-term carbon transition scenarios.

However, climate stress-testing and the application of short-term scenarios using dynamic balance-sheet assumptions is an emerging discipline that cannot yet comprehensively capture all vulnerabilities to climate risk.

The analysis of the results of the EBRD's climate stress-test once again highlights the importance of supporting clients in transitioning effectively to a low-carbon economy.

The 2023 stress-test is subject to the following limitations:

- The focus remains on exposures to corporate and sub-sovereign clients and has not yet been expanded to sovereigns and financial institutions.
- Some of the required input data were not available for all clients, in particular, reliable emissions data, which had to be estimated based on sectoral averages.
- Without detailed location and asset-level data, the physical climate risk pilot lacks granularity and can only reflect country-level impact.

The Bank aims to keep expanding the scope and sophistication of the stress-testing in line with industry developments, as well as to better assess transition and physical climate risk.

The EBRD remains committed to further developing its stress-testing capabilities and following the latest best-practice guidance from the NGFS, as well as regulators such as the European Central Bank and the European Banking Authority.

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Due to rounding, the numbers shown in some charts in this report may not add up to 100 per cent.

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