Climate Change-Related Disclosure in Accordance with the TCFD Recommendations

ROHM endorsed the recommendations of the Task Force on Climate-related Financial Disclosures (TCFD) in September 2021. In order to achieve the goals of the ROHM Group Environmental Vision 2050, ROHM will promote efforts to reduce its environmental impact and focus on more transparent information disclosure, including the resilience of its strategies based on climate-related scenario analysis.

Disclosure Based on the TCFD Framework https://www.rohm.com/sustainability/environment/climate_change_measures

Governance

In April 2021, we established the ROHM Group Environmental Vision 2050 to fulfill our corporate social responsibility for global environmental issues. In addition, the Medium-Term Management Plan Moving Forward to 2025 announced in May 2021 identifies “addressing climate change” as one of the material issues that ROHM should address.

ROHM has established a system in which the President and Representative Director has the highest responsibility and authority for climate change issues, and the EHSS General Committee*, chaired by the director in charge of sustainability appointed by the President and Representative Director, deliberates and makes decisions with regard to addressing climate change issues. Under the EHSS, eight management systems have been established, one of which is the Environmental Conservation Committee, chaired by a business unit manager and which is in charge of environmental management systems and proactively addressing climate change. The committee formulates our 2030 medium-term environmental targets and deliberates on the progress of environmental management toward achieving these targets, as well as issues related to measures to address climate change, including the introduction of renewable energy. Directors who are members of the Audit and Supervisory Committee attend the EHSS General Committee and the monthly meetings of the Environmental Conservation Committee to continuously monitor and verify the execution status of overall environmental management, led by the President (Representative Director).

In addition, in order to further promote value sharing with our shareholders, we have adopted GHG emissions as one of the performance indicators in our performance-linked transfer-restricted stock-based remuneration system for directors.

Promotional system https://www.rohm.com/sustainability/environment

* EHSS (Environment, Health and Safety, Sustainability) General Committee: A committee composed of executive officers in charge of eight subordinate management systems (environment, health and safety, labor, ethics, information, supply chain, quality, and risk management BCM) and responsible for ensuring that the PDCA cycle for each system is properly implemented.

Strategy (Scenario Analysis)

ROHM is accelerating climate change countermeasures, such as improving the efficiency of semiconductor products and building an environmentally conscious business structure based on the ROHM Group Environmental Vision 2050. In order to do this, we have analyzed the impact of climate change on business activities in all sectors, including automotive, industrial, and consumer applications by referring to scenarios published by the International Energy Agency (IEA) and the UN Intergovernmental Panel on Climate Change (IPCC), among others. Specifically, we analyzed the impact of climate change in 2050 on the ROHM Group’s stakeholders (governments, financial institutions, investors, suppliers, customers, and new technologies) and the value chain (corporate, R&D, procurement, manufacturing, and sales) related to its business activities. This analysis was conducted for the 1.5°C/2°C scenario, in which society as a whole succeeds in transformation toward decarbonization and controlling the global temperature rise, and for the 4°C scenario, in which economic development takes priority and the global temperature rises and its effects continue to worsen.
(See P65 for more details)

Reference information for our scenario analysis is provided below.

	Scenario	Reference
Transition risks Opportunities	1.5°C/2°C scenario	Sustainable Development Scenario (SDS)*1 Net Zero Emissions by 2050 Scenario (NZE)*1
	4°C scenario	Stated Policies Scenario (STEPS)*1
Physical risks	1.5°C/2°C/4°C scenario	Representative Concentration Pathways (RCP)*2 Shared Socioeconomic Pathways (SSP1/5)*2

*1. Source: IEA “World Energy Outlook (WEO) 2021”
*2. Source: IPCC “Fifth Assessment Report”

Financial Impact of Risks and Opportunities

Classification		Event	Severity*1	Occurrence*2	Financial impact on business activities			Measures
					Impact item	1.5/2°C impact*3	4°C impact*3	
Transition risks	Policy and regulations	Increase in costs due to introduction of carbon pricing	High	Mid- to long-term	Costs	Med	Med	• Continue to expand installation of PFC abatement equipment • Continue energy-saving/high-efficiency activities for ancillary facilities at plants • Install solar power generation systems (Malaysia) • Convert 100% of electricity used at domestic and overseas production sites to renewable energy • Expand the scope of all electrification at production sites • Stably procure materials by reviewing contracts • Continue updating and upgrading of disclosure content through dialogues with shareholders • Continue response to CDP surveys
		Increase in costs due to energy conservation and GHG emissions reduction initiatives	High	Short- to mid-term	Costs	Low	—	
	Technologies	Increase in R&D costs to maintain and improve market competitiveness	Low	Short- to mid-term	Costs	Med	—	
		Increase in capital investment costs due to increase in production volume and transition of production facilities	Low	Short- to mid-term	Costs	Low	—	
	Markets	Decrease in sales due to changes in customer demand	Med	Short- to mid-term	Sales	Med	—	
		Decrease in demand due to social changes associated with climate change	Low	Short- to mid-term	Sales	—	—	
		Increase in electricity costs due to higher electricity demand in society as a whole	Med	Short- to mid-term	Costs	Med	—	
		Increase in material procurement costs due to a shortage of resources including rare metals	Med	Short- to mid-term	Costs	Med	Low	
	Reputation	Loss of customer reputation due to inadequate response to climate change	Low	Short- to mid-term	Costs	—	—	
Physical risks	Acute	Damage to production facilities or production stagnation due to severe wind and flood damage	Med	Mid- to long-term	Sales	Low	Med	• Create database of primary suppliers (100% coverage) • Multiple purchasing of auxiliary materials • Expand database coverage to secondary suppliers • Make agreements with suppliers on procurement guidelines in case of emergency • Establish alternative production network for substrates • Expand outsourcing and multi-site production to fulfill supply responsibility
		Stagnation of raw material procurement due to supply chain damage	Med	Short- to mid-term	Sales	Med	Med	
		Increase in costs to strengthen measures against natural disasters	Low	Short- to mid-term	Costs	—	Med	
	Chronic	Increase in energy costs due to rising temperatures	Low	Mid- to long-term	Costs	Low	Low	
Opportunities	Products and services	Increase in demand for products that help customers save energy and reduce GHG	High	Short- to mid-term	Sales	High	—	• Secure human resources with expertise in semiconductors • Utilize LCA and other scientific methods and various calculation tools • Appeal miniaturization and other advantages • Strengthen sales of SiC-related products for EV market
	Markets	Increase in revenues from entering new markets	Med	Mid- to long-term	Sales	—	—	
		Increase in demand for products due to extreme weather and other environmental changes	Med	Mid- to long-term	Sales	—	Low	
		Increase in revenues from gaining reputation among customers and investors	High	Short- to mid-term	Costs	—	—	
	Resource efficiency	Decrease in costs by promoting energy conservation	High	Short- to mid-term	Costs	—	—	
	Energy sources	Save costs by achieving GHG emission reductions and earning profits from the sale of carbon credits	Low	Mid- to long-term	Sales	—	—	
	Robustness	Maintain and increase sales volume by strengthening resilience	Low	Mid- to long-term	Sales	—	Med	

*1 Severity: The degree of “high,” “medium,” or “low” is evaluated by considering the “likelihood of occurrence” and “degree of impact” of climate-related risks and opportunities.
*2 Occurrence: “Short-term” is expected to occur between 2022 and 2025, “Medium-term” between 2026 and 2030, and “Long-term” between 2031 and 2050.
*3 Impact: “Small” indicates a financial impact of 1 billion yen or less, “medium” indicates a financial impact of more than 1 billion yen but less than 10 billion yen, and “large” indicates a financial impact of more than 10 billion yen. The impact of risks and opportunities that are difficult to estimate are qualitatively evaluated and shown as "-".

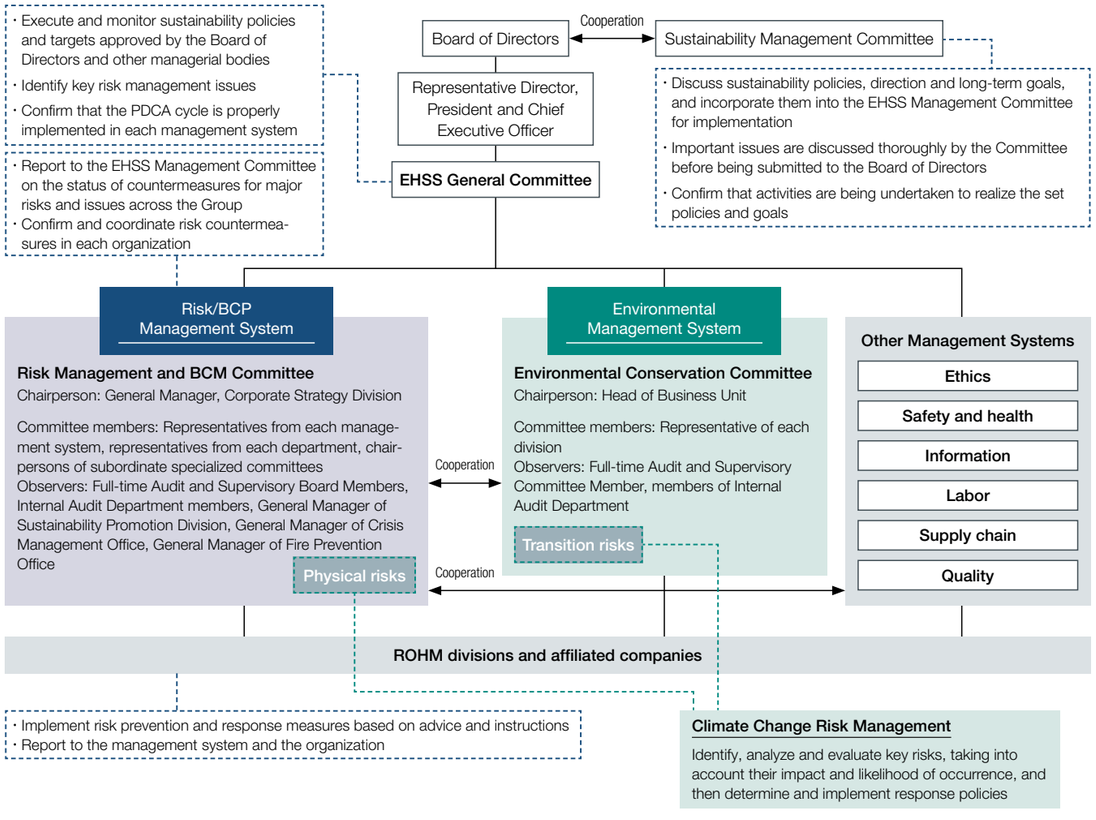
ROHM will take various measures to strengthen its management in light of the identified risks and opportunities and their impacts. Specifically, in order to mitigate risks, ROHM will continue its efforts to reduce GHG emissions throughout the entire value chain, including suppliers, and will also strengthen its business continuity plan (BCP) measures. Additionally, in order to maximize the opportunities identified, we will strengthen R&D and sales of products that contribute to decarbonization, such as components for electric vehicles, and do the same for air-conditioning products.

Risk Management

ROHM oversees and manages all significant risks related to business continuity in the Risk Management and BCP Management System under the EHSS General Committee. Among these risks, “climate change” was identified as a significant risk, and in FY2021, we launched a project involving the entirety of ROHM Co., Ltd., and the Group to identify and analyze risks in multiple scenarios in accordance with the TCFD framework. In our risk management structure, the risk of “climate change” is broken down into physical and transition risks, with the former governed by our risk management and business continuity management system, and the latter governed by our Environmental Management System. The Risk Management and BCM Committee as well as the Environmental Conservation Committee, cross-divisional organizations with participation of all company divisions, including business units, identify critical risks by considering their impact and likelihood of occurrence. Based on analysis and assessment of each risk, they determine and implement response policies.

In addition, both committees oversee the risk management system and report to the EHSS General Committee, which is composed of those responsible for each management system. These committees also formulate BCPs to handle potential risk emergence and ensure that all Group companies are aware of the plans.

Risk Management Structure



Indicators and Targets

ROHM is promoting environmental management in Japan and overseas based on the ROHM Group Environmental Vision 2050 formulated in April 2021, aiming to achieve net zero GHG emissions and zero emissions by FY2050. In our Medium-Term Management Plan “Moving Forward to 2025,” we presented a plan which calls for 100% of electricity used in all business activities in Japan and overseas to be derived from renewable energy sources by FY2050.

Based on this Medium-Term Management Plan, we are now gradually increasing the amount of renewable energy we use, and by FY2030, we aim for a 65% introduction of renewable energy in our business activities, and by FY2050, we aim to achieve a 100% introduction.

Environmental targets for 2030 have been established for each of the three priority issues of “Climate Change,” “Resource Recycling,” and “Coexistence with Nature,” as stated in the ROHM Group Environmental Vision 2050.

For climate change, we have set the following targets: reducing GHG emissions from business activities (Scope 1 and 2) by at least 50.5% in FY2030 compared to FY2018, reducing GHG emissions per unit of production (Scope 1 and 2) by at least 45%, and reducing emissions from the use of products sold (Scope 3, Category 11) by at least 15% in FY2030 compared to FY2018.

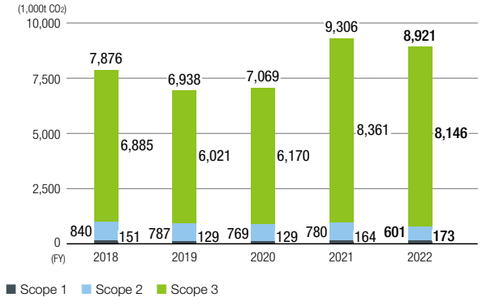
These targets were recognized as having a scientific basis (1.5°C level) for achieving the 2°C target of the Paris Agreement, and in February 2022, ROHM received certification from the Science Based Targets Initiative (SBTi).

In addition, in April 2022, we joined RE100, an international corporate initiative that aims for 100% renewable energy for electricity used in business operations.

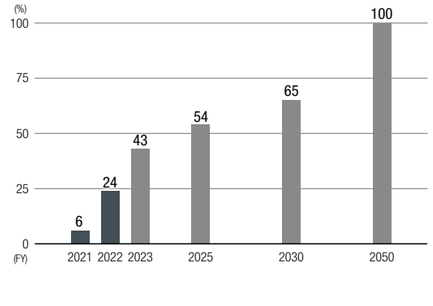
In addition to climate change, we are also working to promote resource recycling by improving our water recovery rate and setting targets related to waste emissions per unit of production.

SCIENCE BASED TARGETS
DRIVING AMBITIOUS CORPORATE CLIMATE ACTION

CO_2 Emissions



Approach to 100% Renewable Energy



Achievements and Plans for Renewable Energy Installations

Introduction Results		Implementation Plan	
FY2017-2022		FY2023-2026	FY2027-2030
・ROHM Apollo Co., Ltd. Chikugo Plant ・SiCrystal GmbH ・Yokohama Technology Center ・Kyoto Technology Center (Kyoto Station) ・Part of ROHM Hamamatsu Co., Ltd. ・ROHM Integrated Systems (Thailand) Co., Ltd. (Thailand Plant)	・ROHM Apollo Co., Ltd. (Yukuhashi Plant) ・ROHM Apollo Co., Ltd. (Nagahama Plant) ・Part of ROHM Wako Co., LTD. ・Part of ROHM head office	ROHM Electronics Philippines, Inc. (Philippines Plant) ROHM Mechatech Philippines, Inc. (Philippines Plant) ROHM-Wako Electronics (Malaysia) Sdn. Bhd. (Part of Malaysia Plant)	Scheduled to be introduced gradually at the remaining overseas and domestic production bases.