

# Addressing Risks and Opportunities

To identify the risks for which SEKISUI CHEMICAL Group should prepare, we have broadly categorized each into business environment, strategic, and operational risks, and have further subdivided each category to comprehensively identify each. In light of geopolitical risks, new social demands, and other changes, we regularly conduct quantitative risk level assessments using a risk matrix composed of risk probability (frequency) and impact (result). The various measures for risk reduction are reported to the Board of Directors after deliberation by the Sustainability Committee and are taken into consideration when making management decisions. [▶ P.67 Risk Management](#)

	Major Risks and Opportunities	Major Responses/Actions by SEKISUI CHEMICAL Group
Business environment risks	<b>Major market trends</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Downturn in demand due to economic slowdowns in areas throughout the world where the Group does business, changes in public policy, and unforeseen events</li> </ul> Mobility, electronics, housing, construction, infrastructure, and other markets <a href="#">▶ P.50-57</a>	<ul style="list-style-type: none"> <li>• Capture demand by introducing high-value-added products that solve social issues to the market and by pioneering applications for these</li> <li>• Strengthen earnings power by reducing costs</li> </ul>
	<b>Raw material price volatility and procurement</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Volatility in steel, wood, and petroleum-related (PVC, olefin, etc.) raw material market prices due to fluctuations in the global economy, supply-demand balance, and foreign currency exchange rates</li> <li>• Supply shortages due to fluctuations in scarce resources demand trends</li> </ul>	<ul style="list-style-type: none"> <li>• Implement cost-reduction measures</li> <li>• Maintain the margin between selling and raw material prices</li> </ul>
	<b>Foreign currency, interest rate, and owned asset price fluctuation</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Lower sales and higher raw material procurement costs due to fluctuations in the value of the yen against foreign currencies</li> <li>• Impact on the amounts of interest income and interest expense due to interest rate fluctuations</li> <li>• Losses on owned assets due to changes in the market and business environments, etc.</li> </ul>	<ul style="list-style-type: none"> <li>• Reduce risks by transitioning businesses deployed globally to local production; converting foreign currency holdings to yen, and controlling the balance of the Group's foreign currency holdings through the use of intra-Group loans</li> </ul>
	<b>Major earthquake, natural disaster, industrial accident, and other incidents</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Damage to credibility and opportunity loss due to major industrial accidents affecting the areas surrounding the Group's factories and R&amp;D facilities</li> <li>• Suspension of business activities coinciding with major earthquakes, tsunamis, and other natural disasters, as well as the spread of infectious diseases, at business sites</li> </ul>	<ul style="list-style-type: none"> <li>• Identify natural disaster and other anticipated risks, conduct onsite audits, and make regular improvements to prevent industrial accidents at production sites</li> <li>• Build an emergency contact network and strengthen employee training to ensure an appropriate initial response</li> </ul>
	<b>Climate change and environmental issues</b> <a href="#">▶ P.31</a> Addressing Risks and Opportunities: Climate Change Risks Impact Analyses	
	<b>Politics and Society</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Incidence of social and political turmoil due to terrorism, war, tariff retaliation measures, unexpected changes in policies, laws and regulations, racial discrimination, product boycotts, and other factors</li> </ul>	<ul style="list-style-type: none"> <li>• Collect trends and information in each country through regional headquarters (United States, Europe, China, ASEAN)</li> <li>• Establish swift response measures (ERM)</li> <li>• Human rights initiatives</li> </ul>
	<b>Impact of COVID-19</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Restrictions on business activities due to the spread of infections</li> <li>• Stagnation of and delayed demand in markets</li> </ul> <b>Opportunity</b> <ul style="list-style-type: none"> <li>• Greater demand for COVID-19 diagnostic reagents and new-normal compliant housing, etc.</li> <li>• Fewer working hours due to a shift to online work</li> </ul>	<ul style="list-style-type: none"> <li>• Promote the transition to online meetings, training, and business trips, etc.</li> <li>• Promote remote work <a href="#">▶ P.38</a></li> <li>• Develop and market adaptive products</li> </ul>

	Major Risks and Opportunities	Major Responses/Actions by SEKISUI CHEMICAL Group
Strategic risk	<b>M&amp;A/New Business/R&amp;D</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Manifestation of business environment risks</li> <li>• Delays in development and business launch</li> </ul> <b>Opportunity</b> <ul style="list-style-type: none"> <li>• Expanded business scale and manifestation of synergy</li> </ul>	<ul style="list-style-type: none"> <li>• Strengthen preliminary investigations of potential M&amp;A targets</li> <li>• Strengthen monitoring after M&amp;A execution</li> <li>• Accelerate development through internal and external technology fusion</li> <li>• Effectively implement business reviews and design reviews</li> </ul>
	<b>Information management</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Customer, technology, and other information leaks</li> <li>• Business suspension due to system failures resulting from cyberattacks or natural disasters, etc.</li> </ul>	<a href="#">▶ P.71</a> <ul style="list-style-type: none"> <li>• Strengthen cybersecurity monitoring systems</li> <li>• Formulate guidelines for handling personal information and build a data protection framework</li> <li>• Regularly strengthen employee training and ensure thorough information management by importance</li> <li>• Completely duplicate mission-critical systems</li> </ul>
Operational risk	<b>Quality</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Higher response costs and damage to reputation due to major product-related incidents</li> <li>• Product recalls or discontinuation due to questions over safety, the environment, or statutory and regulatory compliance</li> </ul>	<a href="#">▶ P.69</a> <ul style="list-style-type: none"> <li>• Implement quality management across the entire process, from product development to design, production, and sales, and work to improve quality levels</li> <li>• Establish systems to thoroughly prevent quality data irregularities and falsification</li> <li>• Prevent quality issues through preliminary reviews at the development stage</li> </ul>
	<b>Safety</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Incidence of major workplace accidents</li> <li>• Fire, explosion, or hazardous substance leaks</li> </ul>	<a href="#">▶ P.68</a> <ul style="list-style-type: none"> <li>• Improve equipment safety</li> <li>• Develop human resources to take the initiatives in safety activities and create a culture for this</li> <li>• Improve emergency response measure skill levels</li> <li>• Implement regular safety and disaster-preparedness audits</li> </ul>
	<b>Laws/Compliance</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Unethical or criminal behavior</li> <li>• Violations of the Monopolies Act or fraudulent transactions</li> <li>• Unauthorized overwriting of data</li> <li>• Bribery</li> <li>• Harassment, etc.</li> </ul>	<a href="#">▶ P.70</a> <ul style="list-style-type: none"> <li>• Instill compliance awareness</li> <li>• Build and employ a whistleblowing system for internal and external use</li> <li>• Provide legal and compliance training for employees</li> <li>• Enact risk management and internal regulations, and provide education on guidelines</li> <li>• Reinforce the global legal affairs structure</li> </ul>
	<b>Intellectual Property</b> <b>Risk</b> <ul style="list-style-type: none"> <li>• Costs involved in fighting disputes related to intellectual property and damage to reputation</li> </ul> <b>Opportunity</b> <ul style="list-style-type: none"> <li>• Management resources that support growth and profits</li> </ul>	<a href="#">▶ P.21</a> <ul style="list-style-type: none"> <li>• Secure strategic intellectual property, and maintain and manage acquired intellectual property</li> <li>• Conduct intellectual property training for employees</li> <li>• Conduct timely investigations to avoid intellectual property infringement</li> <li>• Implement strategic intellectual property management through the use of IP landscaping</li> </ul>

# Addressing Risks and Opportunities Climate Change Risks Impact Analyses\*

\* Since fiscal 2021, we have adopted 1.5°C and 4°C scenarios.

Regarding climate change, we are investigating steps we can take to become aware of risks and opportunities, reduce risks, and turn risks into opportunities. We recognize climate change as a serious external risk. Accordingly, we have considered policies and countermeasures to address this risk when exploring medium- to long-term strategies and established an environmental medium-term plan. The environmental medium-term plan is then approved by the Board of Directors. We have implemented PDCA cycles to pursue climate change-related initiatives, based on the indicators and goals for the plans to promote addressing climate change-related risks. [▶ P.39 Environment](#) [▶ P.65 Sustainability Promotion Framework](#)

**Bold type:** Innovation-related items

Type	Climate Change Risks	Financial Impacts	Business Risks	Business Opportunities	Response/Actions by SEKISUI CHEMICAL Group	
Transition	Policy regulations	Large	<Medium to long term> <ul style="list-style-type: none"> <li>Increase in energy procurement costs</li> <li>Decrease in sales due to adding costs to product prices</li> </ul>	<Medium to long term> <ul style="list-style-type: none"> <li>Acquire business opportunities by differentiating through early response</li> <li>Stabilization of energy costs by introducing renewable energy</li> </ul>	<ul style="list-style-type: none"> <li>Accelerate the conversion to renewable energy and transform internal awareness by implementing an internal carbon pricing scheme under the Policy to Facilitate Renewable Energy Adoption</li> <li>Improve effectiveness through public commitments such as SBT certification</li> </ul>	
	Regulations for energy savings/low carbon	Large	<Short term> <ul style="list-style-type: none"> <li>Increase in capital investment to strengthen energy conservation and renewable energy</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Increase in introduction costs for renewable energy certificates, etc.</li> </ul>	<Short term> <ul style="list-style-type: none"> <li>Increased sales from energy conservation/storage/creation businesses</li> <li>Increased sales from CO<sub>2</sub>-regulation compliant products</li> </ul>	<ul style="list-style-type: none"> <li>Establish an ESG investment framework (¥40 billion/three years), including climate change action</li> <li><b>Develop new energy creation technologies (e.g., perovskite solar cells)</b> <a href="#">▶ P.23</a></li> <li>Review green procurement standards as appropriate</li> <li>Standardize housing with ZEH specifications</li> </ul>	
	Policies	Large	<Short term> <ul style="list-style-type: none"> <li>Increase in renewable energy procurement and waste treatment costs</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Lose market share from loss of differentiation due to mandating of low-carbon products such as ZEH</li> <li>Reduction of business opportunities due to stricter laws and regulations related to resource recycling</li> </ul>	<Short term> <ul style="list-style-type: none"> <li>Increased need for technologies to reduce CO<sub>2</sub> during waste incineration</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Increase in sales of new homes due to expansion of ZEH market from mandatory ZEH specs</li> <li>Expanding opportunities for horizontally recycled products such as in-house and industry-wide collection</li> </ul>	<ul style="list-style-type: none"> <li><b>Develop technology for creating ethanol from garbage (e.g., BR)</b> <a href="#">▶ P.22</a></li> <li>Use purchased power after FIT (e.g., Smart Heim DENKI)</li> <li>Expand Products to Enhance Sustainability <a href="#">▶ P.43</a></li> <li><b>Consideration of expanding horizontal recycling of in-house plastic products (e.g., KYDEX buyback system, etc.)</b></li> <li><b>Development of services to improve the recycling value of housing products (e.g., Be-Heim)</b> <a href="#">▶ P.53</a></li> </ul>	
	Litigation	Medium	<Medium to long term> <ul style="list-style-type: none"> <li>Lawsuits against companies using fossil fuels</li> </ul>	<Medium to long term> <ul style="list-style-type: none"> <li>Increase in business opportunities due to consumer trust earned from commitments to society</li> </ul>	<ul style="list-style-type: none"> <li>Disclose environmental vision and 2050 GHG emissions reduction targets</li> <li>Improve scores in various external benchmarking systems</li> </ul>	
	Technologies	Large	<Short term> <ul style="list-style-type: none"> <li>Increase in re-certification costs due to change of low-carbon materials</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Changeover to lower carbon materials and processes</li> </ul>	<Short to medium term> <ul style="list-style-type: none"> <li>Increase in business opportunities for Products to Enhance Sustainability that contribute to low carbonization</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Business expansion through prioritized procurement of resource recycling friendly designed products</li> </ul>	<ul style="list-style-type: none"> <li>Use of LCA in planning, development and marketing (CFP, environmental impact other than climate change)</li> <li>Use of learn from nature technologies and continuation of researcher subsidies</li> <li>Promotion of renewable energy in factories (e.g., Smart Heim DENKI)</li> <li>Reduction of factory waste and acceleration of resource recycling</li> <li><b>Product development using bio-derived materials</b></li> <li><b>Product development using recycled materials and increasing their use</b></li> </ul>	
	Development of decarbonization technology	Large	<Medium to long term> <ul style="list-style-type: none"> <li>Opportunity loss due to delay in introduction of decarbonization technologies</li> </ul>	<Medium to long term> <ul style="list-style-type: none"> <li>Expand business opportunities by decarbonizing products</li> <li>Creation of new businesses utilizing decarbonization technologies</li> </ul>	<ul style="list-style-type: none"> <li><b>Development of CCU technologies in collaboration with different industries (e.g., collaboration with ArcelorMittal, S.A.)</b> <a href="#">▶ P.23</a></li> </ul>	
	Markets	Medium	<Long term> <ul style="list-style-type: none"> <li>Decrease in sale of new cars</li> <li>Opportunity loss due to inability to recycle resources and use decarbonization incentives</li> </ul>	<Medium term> <ul style="list-style-type: none"> <li>Acquisition of incentives through resource recycling and visualization of decarbonized value</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Increase in profitability from shift to higher-performance products</li> <li>Expansion of market for ICT-related products</li> </ul>	<ul style="list-style-type: none"> <li>Efforts to improve resource recycling value through industry collaboration (e.g., CLOMA (for marine plastic issues))</li> <li><b>Development of highly heat-resistant, durable, and other high-performance products</b></li> <li><b>Development of lightweight solar cells, heat release products</b></li> </ul>	
	Market uncertainty	Medium	<Long term> <ul style="list-style-type: none"> <li>Investments to stabilize power supply for dispersed renewable energies</li> </ul>	<Long term> <ul style="list-style-type: none"> <li>Increase in sales of products to support a more dispersed society</li> </ul>	<ul style="list-style-type: none"> <li>Sales of houses that realize energy self-sufficiency</li> <li><b>Development of resource recycling technologies (e.g., BR, material waste recycle)</b></li> </ul>	
	Reputation	Medium	<Short to medium term> <ul style="list-style-type: none"> <li>Sales decline due to inability to keep up with sustainable lifestyle preferences</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Decrease in sales due to increased preference for sharing over owning</li> </ul>	<Short to medium term> <ul style="list-style-type: none"> <li>Improve corporate brand and expand sales with products that support sustainable living</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Creation of new businesses to meet consumer preferences</li> </ul>	<ul style="list-style-type: none"> <li>Promotion of sustainable town development businesses (e.g., ABINC certification of Asaka Lead Town)</li> <li>Begin services using housing big data (e.g., Smart Heim DENKI)</li> </ul>	
	Industry criticism	Large	<Medium to long term> <ul style="list-style-type: none"> <li>Investor valuation decline for companies that do not decarbonize</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Decline in evaluation of companies that do not understand the biodiversity impact of decarbonization solutions</li> </ul>	<Short to medium term> <ul style="list-style-type: none"> <li>Secure stable financing by demonstrating compatibility with resource circulation</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Consideration of nature-positive decarbonization solutions and high evaluation for product development</li> </ul>	<ul style="list-style-type: none"> <li>Use of renewable energy by purchasing electricity after FIT</li> <li>Promotion of reform and use of in-house system for planning and R&amp;D (product environmental impact assessment)</li> <li>Promotion of efforts to reduce the impact on nature and information disclosure (e.g., use of Land Use Score Card™)</li> </ul>	
Physical	Acute	Large	<Short term> <ul style="list-style-type: none"> <li>Increase in damage such as in plant shutdowns and sales decrease</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Increase in costs to control flooding and overflows</li> <li>Decrease in sales due to supply chain disruption</li> </ul>	<Short term> <ul style="list-style-type: none"> <li>Increase in needs for resilient infrastructure</li> </ul> <Medium to long term> <ul style="list-style-type: none"> <li>Increase in sales of products in areas with a high level of water-related risks</li> </ul> <Long term> <ul style="list-style-type: none"> <li>Increase in needs for equipment/facilities for disaster preparedness</li> </ul>	<ul style="list-style-type: none"> <li>Understand water risks and implement countermeasures</li> <li><b>Development of highly durable infrastructure</b></li> <li>Accelerate infrastructure renewal in developed nations (e.g., SPR method)</li> <li>Expand infrastructural business in developing nations</li> <li><b>Development of disaster response products (e.g., drinking water storage systems)</b> <a href="#">▶ P.46</a></li> <li>In-house fusion mechanism for adaptive product development, task force projects</li> </ul>	
	Chronic	Changes in rainfall patterns	Medium	<Short term> <ul style="list-style-type: none"> <li>Increase in costs for restructuring supply chain</li> </ul>	<Short term> <ul style="list-style-type: none"> <li>Increase in sales of heat insulating/heat shielding products</li> </ul>	<ul style="list-style-type: none"> <li>Explain procurement guidelines to raw material suppliers</li> <li>Globally disperse production bases</li> <li>Reinforcement of OEM structure in accordance with increase in illness</li> </ul>
		Rise in sea level	Medium	<Medium to long term> <ul style="list-style-type: none"> <li>Increase in heat stroke/other illnesses related to warming</li> </ul>	<Medium to long term> <ul style="list-style-type: none"> <li>Increase in needs for pharmaceutical products/diagnostic drugs that contribute to treatments</li> </ul>	
	Rise in average temperatures	Medium	<Medium to long term> <ul style="list-style-type: none"> <li>Increase in air-conditioning/cooling costs</li> </ul>			

The Financial Impacts in the table were evaluated in three categories: large, medium, and small, in light of the magnitude of the impact on related financial indicators. The risks and opportunities that become apparent are described in three stages: Short term (less than 3 years), medium-term (3 to less than 6 years), and long-term (6 years or more).