

# Risks and opportunities of medium impact or higher

**Baseline scenario** Short-term: around 2027, Medium-term: around 2030, Long-term: around 2050

Category	Type	Climate-related event (Medium to long term)	Impact on business	Main financial impact	Significance
Risk	Chronic	Changes in climate patterns	<ul style="list-style-type: none"> <li>• Migration of natural rubber tree crop zone, decline in quality</li> <li>• Energy supply system instability</li> <li>• Increased demand for fossil fuel</li> </ul>	<ul style="list-style-type: none"> <li>• Increased raw material prices (natural rubber)</li> <li>• Increased R&amp;D costs (alternative raw materials)</li> <li>• Decreased sales, worsened profits (decreased tire production)</li> <li>• Increased distribution costs</li> </ul>	Medium to high
		Temperature rises	<ul style="list-style-type: none"> <li>• Deterioration of roads</li> <li>• Reduced areas of snowfall</li> </ul>	<ul style="list-style-type: none"> <li>• Increased R&amp;D costs (heat resistance)</li> <li>• Decreased sales (winter tires)</li> </ul>	Medium to high
		Sea level rises	<ul style="list-style-type: none"> <li>• Reduced natural rubber harvests</li> <li>• Compromised ports and warehouses</li> </ul>	<ul style="list-style-type: none"> <li>• Increased raw material prices (natural rubber)</li> <li>• Decreased sales (reduced or suspended tire production)</li> <li>• Inventory/product damage (flood damage)</li> </ul>	Medium to high
	Acute	Increase in extreme weather Frequent and severe heavy rainfall	<ul style="list-style-type: none"> <li>• Compromised infrastructure networks</li> <li>• Transport network disruption, loss of commuting options</li> <li>• Flooding of natural rubber plantations</li> <li>• Marine transport delays, accidents</li> </ul>	<ul style="list-style-type: none"> <li>• Decreased sales (overall business slowdown, revision of production plans)</li> <li>• Increased raw material prices (natural rubber)</li> <li>• Increased distribution costs</li> <li>• Inventory/product damage</li> </ul>	Medium to high
			<ul style="list-style-type: none"> <li>• Unpredictable demand trends</li> <li>• Damage to or collapse of company facilities</li> <li>• Increased need for heavy rain products</li> <li>• Transport network disruption</li> </ul>	<ul style="list-style-type: none"> <li>• Decreased sales (supply and demand mismatch, suspended business and operations)</li> <li>• Increased repair costs (damaged facilities)</li> <li>• Increased R&amp;D costs, decreased sales (products for heavy rain)</li> </ul>	Medium
Opportunity	Chronic	Increase and intensification of tropical cyclones	<ul style="list-style-type: none"> <li>• Greater competitiveness (increased share) through development of differentiated products (wet-grip performance)</li> </ul>	<ul style="list-style-type: none"> <li>• Increased profits (increased sales volume)</li> </ul>	High

**Transition Scenario** Short-term: around 2027, Medium-term: around 2030, Long-term: around 2050

Category	Type	Climate-related event (Medium to long term)	Impact on business	Main financial impact	Significance
Risk	Policy	Introduction of carbon pricing	<ul style="list-style-type: none"> <li>• Increased service prices as costs are passed on</li> <li>• Introduction of carbon border tax</li> <li>• Introduction of environmental taxes to auto-related exports</li> <li>• Increased trading price of carbon credits</li> </ul>	<ul style="list-style-type: none"> <li>• Increased distribution costs</li> <li>• Increased costs of R&amp;D and equipment investment (shift to low-carbon products)</li> <li>• Worsened profits (tariffs)</li> <li>• Increased costs for purchasing carbon credits</li> </ul>	Medium to high
		Sales regulations for fossil fuel vehicles and HEVs <b>Short to long term</b>	<ul style="list-style-type: none"> <li>• Increased demand for next-generation tires</li> <li>• Changes in tire performance requirements</li> <li>• Smaller fossil fuel/hybrid vehicle market</li> </ul>	<ul style="list-style-type: none"> <li>• Increased costs of R&amp;D and equipment investment</li> <li>• Decreased sales (decreased tire demand)</li> </ul>	Medium
		Restrictions on raw materials used	<ul style="list-style-type: none"> <li>• Restrictions on the sale of products containing restricted ingredients</li> </ul>	<ul style="list-style-type: none"> <li>• Increased material costs due to regulatory measures</li> </ul>	Medium
		Obligatory carbon footprint labelling	<ul style="list-style-type: none"> <li>• Demand for lower CO<sub>2</sub> emissions throughout the product life cycle</li> <li>• Elimination of products with high CO<sub>2</sub> emissions, reputational risk</li> </ul>	<ul style="list-style-type: none"> <li>• Increased R&amp;D costs (development of recyclable products)</li> <li>• Increased production costs (reconsideration of raw materials and suppliers)</li> <li>• Decreased sales (decreased product share)</li> </ul>	Medium
	Technology	Adoption of renewable energy technology <b>Short to long term</b>	<ul style="list-style-type: none"> <li>• Greater supply of renewable energy</li> <li>• Decrease in crude oil production</li> <li>• Demand from automakers that suppliers switch to renewable energy</li> </ul>	<ul style="list-style-type: none"> <li>• Increased production costs (increased energy prices)</li> <li>• Increased raw material costs (synthetic rubber and other petrochemical products)</li> <li>• Increased R&amp;D costs (alternative raw materials)</li> <li>• Decreased sales (not responding to automaker demands)</li> </ul>	Medium
		Adoption of energy-saving technology and low-carbon technology	<ul style="list-style-type: none"> <li>• Introduction of equipment with energy-saving technology</li> <li>• Switch to other fuels (hydrogen boilers, etc.)</li> <li>• Greater demand for products adapted to energy-saving technology in new cars</li> <li>• Increased demand for products with low-carbon technology</li> </ul>	<ul style="list-style-type: none"> <li>• Increased costs of equipment investment and repairs</li> <li>• Increased R&amp;D costs (product development)</li> <li>• Increased raw material prices (reconsideration of raw materials)</li> </ul>	Medium
	Market/ reputation	Increased environmental awareness in customers	<ul style="list-style-type: none"> <li>• Increased demand for products that help reduce CO<sub>2</sub> and development of products that help lower environmental impact</li> <li>• Selection of business partners focusing on CO<sub>2</sub> reduction</li> <li>• Need for communications that convey CO<sub>2</sub> reduction efforts</li> <li>• Demand for introduction of equipment utilizing renewable energy</li> </ul>	<ul style="list-style-type: none"> <li>• Increased R&amp;D costs (product development)</li> <li>• Decreased sales (decreased share due to change in customer preferences)</li> <li>• Increased cost of raw materials (reconsideration of raw materials, selection of suppliers)</li> <li>• Increased advertising costs</li> <li>• Increased costs of equipment investment and repairs (equipment using renewable energy)</li> </ul>	Medium
		Slowing demand for EVs	<ul style="list-style-type: none"> <li>• Sluggish sales of EV-specific products</li> </ul>	<ul style="list-style-type: none"> <li>• Decreased sales (EV-specific products)</li> </ul>	Medium
		Increased raw material costs	<ul style="list-style-type: none"> <li>• Fewer rubber plantations due to poor profitability</li> <li>• Skyrocketing prices of fossil fuel-derived raw materials</li> <li>• Increased production costs for raw material manufacturers</li> </ul>	<ul style="list-style-type: none"> <li>• Increased raw material prices due to decreased natural rubber production</li> <li>• Increased production costs due to increased prices of petrochemical products and other materials</li> </ul>	Medium to high
					Medium
Opportunity	Market	Greater eco-conscious behavior by stakeholders	<ul style="list-style-type: none"> <li>• Acquisition of new business partners through focus on the environment</li> <li>• Increased added value of eco-conscious products and demand</li> </ul>	<ul style="list-style-type: none"> <li>• Increased sales and profits (acquisition of new business partners, increased added value)</li> </ul>	High
	Products/ services	Expansion of low-carbon product market	<ul style="list-style-type: none"> <li>• Greater demand for next-generation tires</li> <li>• Early-stage development and sales</li> </ul>	<ul style="list-style-type: none"> <li>• Increased sales and profits (increased added value)</li> </ul>	Medium to high
	Resource efficiency	Promotion of energy saving and efficiency	<ul style="list-style-type: none"> <li>• Introduction of equipment enabling energy saving and efficiency</li> <li>• Labor-saving, improvement of employee working conditions</li> </ul>	<ul style="list-style-type: none"> <li>• Improved profitability (improved production efficiency, low defect rate)</li> <li>• Reduced production costs (improved operational efficiency and plant utilization rate)</li> <li>• Decreased labor costs (decreased turnover rate)</li> </ul>	Medium
		Leveraging of recycling	<ul style="list-style-type: none"> <li>• Development of products made using recycled materials, gain in product share</li> </ul>	<ul style="list-style-type: none"> <li>• Increased sales and profits (increased share, increased added value)</li> </ul>	Medium
		Reducing water usage and consumption	<ul style="list-style-type: none"> <li>• Introduction of equipment that reduces water usage</li> </ul>	<ul style="list-style-type: none"> <li>• Improved profitability (decreased water usage)</li> </ul>	Medium
	Energy	Skyrocketing coal and oil prices	<ul style="list-style-type: none"> <li>• Expansion of next-generation mobility market</li> </ul>	<ul style="list-style-type: none"> <li>• Increased sales and profits (sales of next-generation mobility)</li> </ul>	High