

Building a Decarbonized Society

Basic Philosophy

In order to achieve the Paris Agreement's goal of limiting the global average temperature increase to 1.5°C above pre-industrial levels, greenhouse gas emissions must be reduced to virtually zero by 2050. At Toyoda Gosei, we are aiming to achieve the decarbonized society set forth in the TG2050 Environmental Challenge by working throughout our value chain to set targets for CO₂ emissions generated from our own production operations in 2030 (Scopes 1 and 2) and from the procurement of materials and parts (Scope 3).

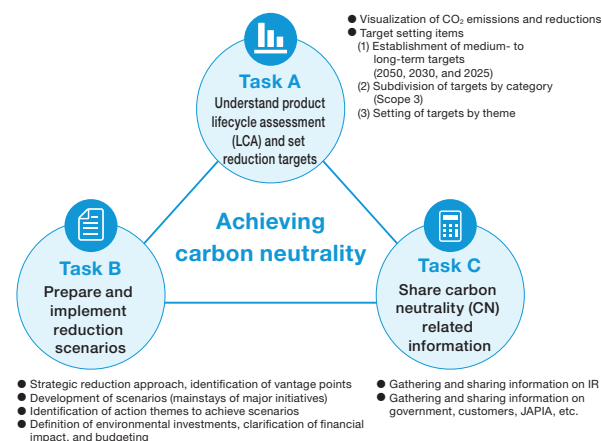
Carbon Neutrality Project

We are conducting initiatives to reduce CO₂ emissions throughout the entire lifecycle of our products, from procurement of materials and parts to product development, production, use, and disposal.

System	With the president at the top, the project leader is the vice president, and the core members consist of department heads and above. This is a system that enables speedy and immediate managerial decisions and their implementation.
Initiative	Each task is led by the head of the relevant department to carry out the initiative.

Endorsement of TCFD Recommendations

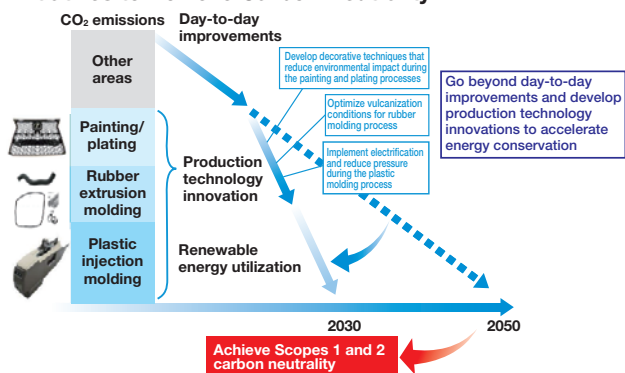
In May 2019, we expressed our endorsement of the recommendations of the Task Force on Climate-related Financial Disclosures (TCFD) and conducted a scenario analysis of risks, opportunities, and responses based on the Guide. We are accelerating our efforts across our business activities and proactively disclosing relevant information, including incorporating the results in our 2030 Business Plan and reviewing our TG2050 Environmental Challenge and 2030 milestones.



Moved up the Timetable for Carbon Neutrality to 2030

Toyoda Gosei has established a new target to achieve carbon neutrality for CO₂ emissions (Scopes 1 and 2) generated from its production operations that is 20 years earlier than the previous target by moving it up from 2050 to 2030. This is a significantly shorter time frame for achieving carbon neutrality that reflects our responsibility as a company to contribute to solving climate change risks that are becoming more serious in various parts of the world. We will continue to implement initiatives to become a leading company in the environmental field.

Initiatives to Achieve Carbon Neutrality



	2030	2050
Scopes 1 and 2	Carbon neutrality	Carbon neutrality
Scope 3	27.5% reduction compared to 2019	Carbon neutrality

Reducing CO₂ Emissions

To achieve our 2030 target, we are reducing CO₂ emissions throughout the entire product lifecycle by improving productivity and efficiency of logistics, in addition to more lightweight designs for products leading to even higher vehicle fuel efficiency.

Product Development Stage: Environmentally-Friendly Product Development Materials Design

In the product development stage, we are making headway in providing products for environmentally-friendly, next-generation vehicles and developing products with lighter weight for greater fuel efficiency and lower energy consumption and CO₂ emissions across the areas of materials technology, product design, and production technology. Examples include the development of high-pressure hydrogen tanks for FCEVs and efforts to switch materials (e.g., from metal

or rubber to plastic), reduce the number of components, integrate functions, and use more lightweight designs while ensuring quality for the strength and other properties of instrument panel peripherals and other interior and exterior components and of functional parts such as hoses. We are also actively working with suppliers to develop materials with low CO₂ emissions, such as bio-materials and recycled materials.

Production Stage: Emission Reduction through Development of New Manufacturing Methods and Day-to-Day Improvements Manufacturing

We have set a 2030 milestone for achieving zero CO₂ emissions at our plants, and are working to achieve this goal through day-to-day improvements at plants, innovations in production technology, higher efficiency

of utilities, expansion of renewable energy, and more. In particular, renewable energy initiatives are underway with the goal of converting all electricity to renewable energy by FY2030.

Logistics Stage: Improving Loading Efficiency Design Manufacturing

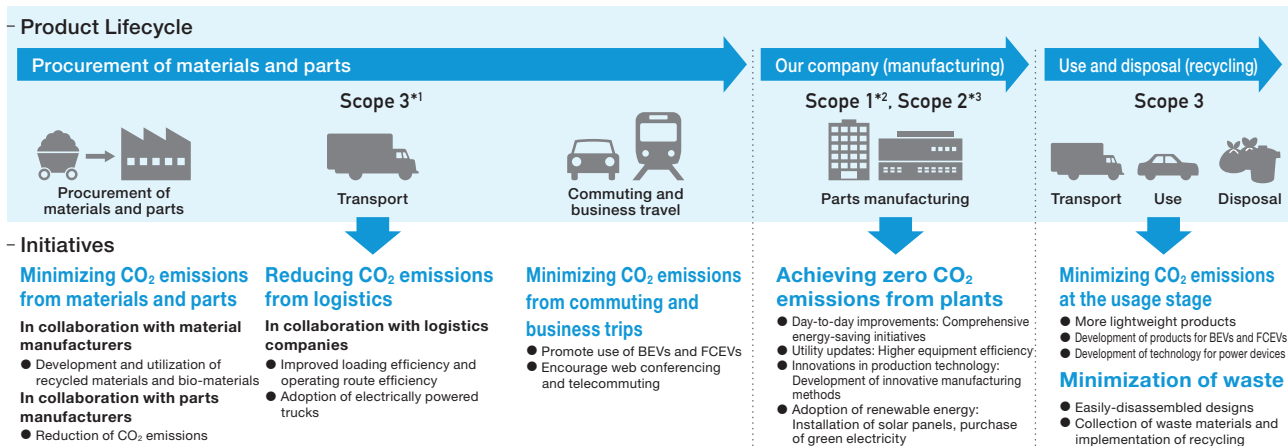
In collaboration with logistics companies, we are reducing CO₂ emissions by improving truck loading capacity and logistics efficiency through the use of AI and other means.

Materials and Parts Procurement Stage: Emission Reduction through Collaboration with Suppliers Materials Manufacturing

We implement CO₂ reduction by sharing good practices with suppliers through the Energy Saving Dojo and supporting actual data measurements.

Initiatives to Reduce CO₂ Emissions in the Value Chain

— Toward Carbon Neutrality in the Value Chain by 2050 —



^{*1} GHG emissions in the supply chain indirectly emitted by the company (e.g., raw material production, transportation, business trips, commuting) ^{*2} GHG emissions directly emitted by the company itself (e.g., fossil fuels, natural gas) ^{*3} GHG emissions indirectly emitted by the company (e.g., purchased electricity)

Reduction of Greenhouse Gas (6 gases)^{*4} Emissions

Of the six greenhouse gases, Toyoda Gosei uses three (HFC, PFC, SF₆) and is conducting initiatives to reduce all of them. By FY2015, we had completed a switch to alternative gases with a low environmental impact for

the shield gas and other gases used in the production of steering wheel cores. We will continue these reduction initiatives going forward.

^{*4} Hydrofluorocarbon (HFC), perfluorocarbon (PFC), sulfur hexafluoride (SF₆), methane (CH₄), nitrous oxide (N₂O), nitrogen trifluoride (NF₃)