

Otsuka

Otsuka-people creating new products  
for better health worldwide

# Environmental Report 2020



Otsuka Holdings Co., Ltd.

					Material Issues							
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### How to Use This Report

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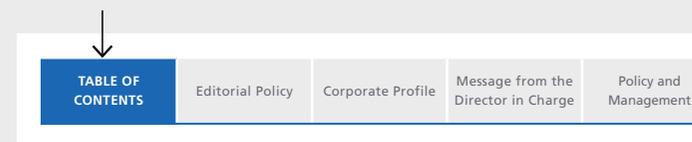


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# Editorial Policy

## Editorial Policy

The editorial policy of this environmental report is to ensure accuracy of information, comprehensiveness, and response to requests from stakeholders. In terms of the environment, the report is based on specific numerical targets and progress in the results of initiatives.

For information on social (S) and governance (G) initiatives, please refer to the Integrated Report or our website.

 [Integrated Report](#)

Information on the environment is available on our website.

 [Environment](#)

## Reporting Period

Data for FY 2020 (from January 1 to December 31 of 2020) are used.

Initiatives reported include the most recent ones.

## Scope of Reporting

In principle, all Otsuka group consolidated production sites are covered.

In case of any limit on the scope of initiatives or data, a note on the details is provided in this report.

## Issuing Date

December 2021 (once a year)

## Guidelines Referenced

- International Integrated Reporting Framework, International Integrated Reporting Council (IIRC)
- GRI Sustainability Reporting Standards, Global Reporting Initiative (GRI)
- ISO 26000
- Environmental Reporting Guidelines 2018, Ministry of the Environment, etc.

## Disclosure of Information on Otsuka Group



 [Integrated Report 2020](#)



 [Investor Relations](#)



 [Sustainability](#)

## Contact Information

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 Section for Environmental Affairs, Sustainability Promotion Department  
 Shinagawa Grand Central Tower, 2-16-4 Konan,  
 Minato-ku, Tokyo 108-8241, Japan  
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## Third-Party Verification

In order to improve reliability, we are verified by third-party organizations.

 [Third-Party Verification](#)

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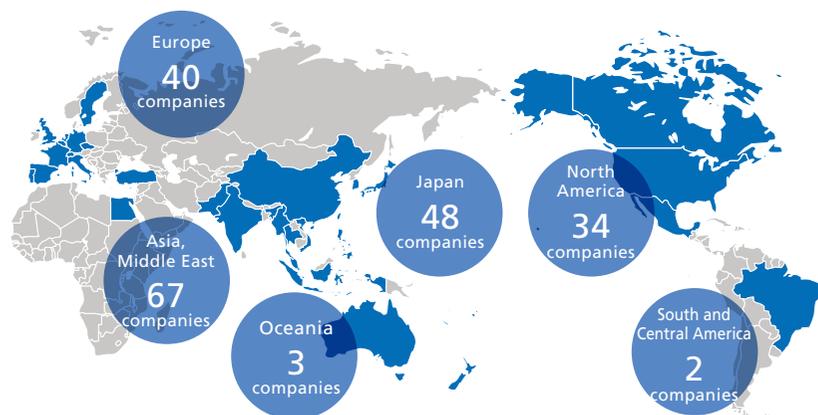
## Corporate Profile

### Corporate Profile (As of December 31, 2020)

Company Name	Otsuka Holdings Co., Ltd.
Established	July 8, 2008
Capital	¥81.69 billion
Head Office	2-9 Kanda-Tsukasamachi, Chiyoda-ku, Tokyo 101-0048, Japan
Tokyo Headquarters	Shinagawa Grand Central Tower, 2-16-4 Konan, Minato-ku, Tokyo 108-8241, Japan
Telephone	+81-3-6717-1410
Number of Employees	111 (Consolidated: 33,151)
Business Description	Control, management and related activities with respect to the Company's subsidiaries and affiliates operating in pharmaceutical, nutraceutical, consumer product, and other businesses

### Global Network (As of December 31, 2020)

Otsuka operates in **32** countries/regions



## Approach to Sustainability

### Corporate Philosophy

Otsuka-people creating new products for better health worldwide

### Otsuka's Goal

To become an indispensable contributor to people's health worldwide

### Sustainability Mission

Address social issues such as the evolution toward a healthier and more sustainable society, while simultaneously achieving growth. These activities are all supported by a comprehensive governance system.

### Contribution to a More Sustainable Society

Otsuka's business is fully synchronized with our efforts to address social issues



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## Message from the Director in Charge of the Environment Affairs



### 2050 Environmental Vision of “Net-Zero” Zero environmental impact of all our business activities. We contribute to making people and the earth healthier.

Based on its corporate philosophy of “Otsuka-people creating new products for better health worldwide,” the Otsuka group works to solve social issues through its businesses and contribute to the creation of a healthy and sustainable society, while achieving its continued growth. As a unique total healthcare company that contributes to maintaining and improving people’s health through a variety of products and services, we will be committed to reducing environmental impact on the global and contributing to a sustainable society that protects nature and the future of the earth.

To support the solution of social issues related to the global environment, the Otsuka group has determined three material issues of the environment to be *climate change*, *resource recycling and conservation*, and *water conservation*. Now that efforts to realize a decarbonized society around the world are accelerating, for promoting the efforts further, we have established a 2050 Environmental Vision of “Net-Zero”. The vision aims to reduce the total environmental impact of our business activities to zero.

The Otsuka group has set up the Otsuka Holdings Environmental Committee, which consists of a variety of operating companies. With the commitment by the executives of Otsuka group companies, the entire Otsuka group works together to carry out initiatives unique to Otsuka.

We will have our employees share common missions and issues, identify the nature of the issues, and continue to take on challenges, to thereby fulfill our responsibilities as a member of society. We as a group will continue to carry out environmental management that will lead to a society in which people and the earth can coexist in the future.

**Yoshiro Matsuo**

Senior Managing Director  
Otsuka Holdings Co., Ltd.

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# Environmental Management

## Sustainability Management

The Otsuka Group Sustainability Promotion Committee was established in 2018 and is chaired by the director in charge of sustainability promotion at Otsuka Holdings. The committee promotes sustainability for the entire Otsuka group, acting as an engine for discussions and decision-making regarding the direction of sustainability-related activities, plans, and other measures. Committee meetings are held regularly to discuss direction and evaluate activities, develop systems in each area of sustainability promotion, and update promotion plans, as necessary. Committee members comprise group officers in charge of various areas such as supply chain, environment, human resources, corporate governance, compliance risk management, and public relations. The Committee, together with persons in charge from group companies, carries out close examination, with the Sustainability Promotion, IR and Corporate Planning Departments of Otsuka Holdings functioning as the secretariat.

### Sustainability Management Structure



\*1 Activities are promoted through various conference bodies, WGs, TFs, and others (including time-limited PJ)

\*2 Consumer Relations: Activities to build trust between companies and consumers

## Otsuka Group's Environmental Policy

The Otsuka group of companies strives to advance as an essential company that contributes to the health of people worldwide. We will help to realize a sustainable society by always taking account of the global environment in the value chain as we pursue our business activities based on our trademark qualities of autonomy, proactiveness and creativity.

### Guidelines

- 1. Climate Change**  
Play a part in controlling global warming by reducing CO<sub>2</sub> emissions.
- 2. Resource Recycling and Conservation**  
Continue to improve resource efficiency and help create a zero-waste society.
- 3. Water Conservation**  
Promote sustainable use of water through conservation, recycling and clean return.
- 4. Environmental Compliance**  
Continue to improve our environmental management system, increase effectiveness of compliance, and reduce risks.

## Environmental management system

### Acquisition of Integrated ISO 14001 Certification for the Otsuka Group

The Otsuka group's first ISO 14001 certification was acquired in 1999.<sup>\*1</sup> Since then, we have worked to acquire certification for the manufacturing sites of each group company, and promoted activities to achieve the environmental goals set by each company.<sup>\*2</sup> With the increasing severity of environmental issues in recent years, companies are being called upon to contribute to the resolution of such issues. To strengthen group-wide efforts toward more efficient and effective environmental activities, the Otsuka group's five of major companies in Japan<sup>\*3</sup> and Otsuka Holdings as the supervising organization acquired ISO 14001 integrated certification in August 2020. Under the integrated environmental goals and management systems outlined in the certification, we will further strengthen our environmental initiatives and make group-wide efforts to achieve the goals.



ISO 14001 Certification

\*1 Acquired at Tokushima Factory of Otsuka Chemical (present Tokushima Factory of Otsuka Chemical and Tokushima Factory of Otsuka Foods)

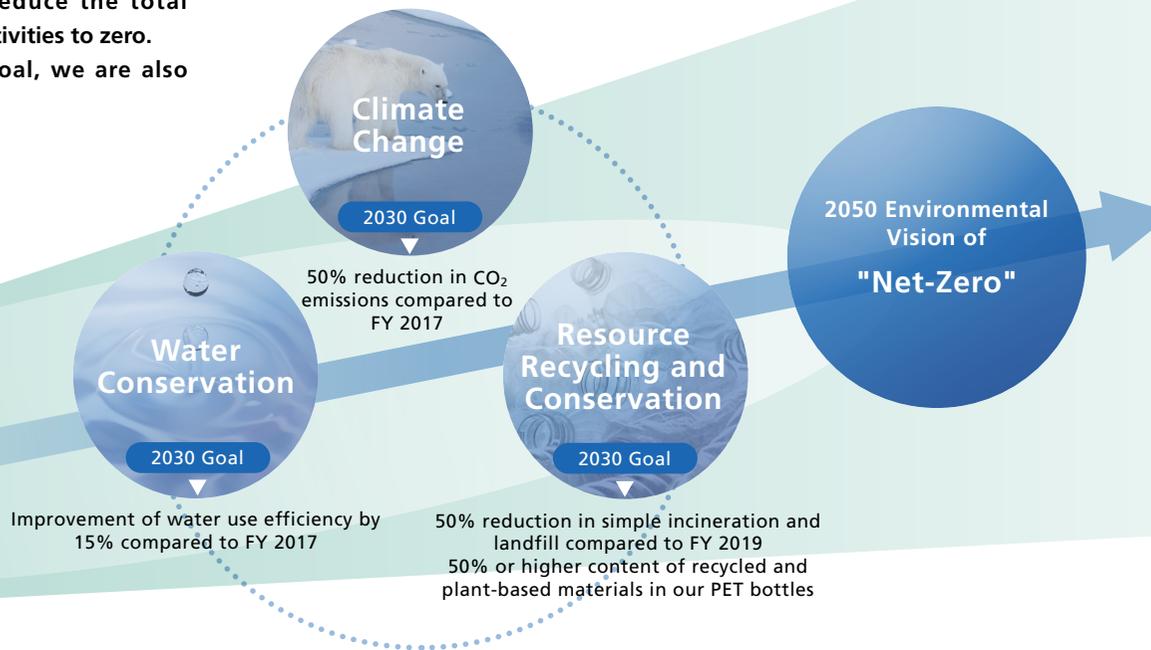
\*2 Acquired certification at 9 companies in Japan and 11 overseas (As of August, 2020)

\*3 Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical (including its subsidiary, Okayama Taiho Pharmaceutical), Otsuka Chemical, and Otsuka Foods

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## Toward a 2050 Environmental Vision of "Net-Zero"

The Otsuka group has established a 2050 Environmental Vision of net-zero, which aims to reduce the total environmental impact of our business activities to zero. While striving to achieve our 2030 goal, we are also working to achieve the 2050 goal.



### Continued Initiatives to Reduce Environmental Impact

Materiality	Social Issues	Our Goals	Our Activities	FY 2020 Progress	Related SDGs
	<p>8 Global warming</p>	<p>FY 2030 Goal</p> <ul style="list-style-type: none"> <li>50% reduction in CO<sub>2</sub> emissions compared to FY 2017</li> </ul>	<ul style="list-style-type: none"> <li>Reduce CO<sub>2</sub> emissions by introducing renewable energy and maximizing energy use efficiency</li> <li>Reduce CO<sub>2</sub> emissions throughout the value chain</li> </ul>	<ul style="list-style-type: none"> <li>Acquired ISO 14001 Integrated Certification</li> <li>Expanded the Introduction of CO<sub>2</sub>-free Electricity<sup>*1</sup></li> <li>Introduced Co-generation Systems and Solar Power Generation Facilities</li> <li>Switched Supply to Green Power for Office Departments of Five Group Companies</li> </ul>	     
	<p>9 Environmental load increase</p>	<p>FY 2030 Goal</p> <ul style="list-style-type: none"> <li>50% reduction in simple incineration and landfill compared to FY 2019</li> <li>50% or higher content of recycled and plant-based materials in our PET bottles</li> </ul>	<ul style="list-style-type: none"> <li>Reduce environmental impact by improving resource efficiency</li> <li>Promotion of business activities aimed at a sustainable state of society and the earth</li> </ul>	<ul style="list-style-type: none"> <li>Established the Otsuka Group Plastic Policy</li> </ul>	
	<p>10 Reducing in freshwater availability due to water resource risks</p>	<p>FY 2030 Goal</p> <ul style="list-style-type: none"> <li>Improvement of water use efficiency by 15% compared to FY 2017</li> </ul>	<ul style="list-style-type: none"> <li>Risk analysis and understanding of sustainable water use</li> <li>Management and effective use of water resources</li> </ul>	<ul style="list-style-type: none"> <li>Carried out Water Resource Risk Assessments Using Aqeduct<sup>*2</sup></li> <li>Formulated water resource risk analysis charts at each manufacturing site, and identified watershed issues around the sites</li> </ul>	

\*1 Including carbon-neutral electricity \*2 Water resource risk assessment tool developed by the World Resources Institute

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# Climate Change

## Approach and Policy to Climate Change

Climate change due to global warming is causing serious environmental issues on a worldwide scale, such as by severely impacting biological and water resources. We recognize it as a major risk to our global operations. The Otsuka group is committed to reduce greenhouse gas (GHG) emissions across the entire value chain for aiming to realize a decarbonized society, and thereby a sustainable society.

### TCFD Recommendations

Otsuka Holdings has announced its support for recommendations issued by the Task Force on Climate-related Financial Disclosure (TCFD) and joined the TCFD Consortium<sup>\*1</sup>, an organization established to facilitate dialogues between financial institutions and other TCFD supporters. We will focus on expanding disclosure of climate-related financial information as outlined in the TCFD recommendations.



[Initiatives for TCFD Recommendations](#)

<sup>\*1</sup> The TCFD Consortium was established to facilitate dialogue between supporting companies and financial institutions regarding effective climate-related financial disclosures and reflection of such disclosures in investment decisions.

## Our Goals

The Otsuka group has established a 2050 Environmental Vision of net-zero, which aims to reduce the total environmental impact of our business activities to zero, along with setting the 2030 goal that aims to reduce CO<sub>2</sub> emissions by 50% compared to FY 2017. We are working to realize an energy mix that is both environmentally friendly and economically efficient, by promoting various initiatives such as improving energy use efficiency, fuel conversion, capital investment in renewable energy facilities, and introduction of CO<sub>2</sub>-free electricity.



Climate Change

<b>Goals</b>	• Goal for FY 2030: 50% reduction in CO <sub>2</sub> emissions compared to FY 2017		
<b>FY 2020 Results</b>	CO <sub>2</sub> emissions reduction through introduction of renewable energy <b>84,000t-CO<sub>2</sub></b>	CO <sub>2</sub> emissions Scopes 1 and 2 <sup>*1</sup> <b>706,000t-CO<sub>2</sub></b>	CO <sub>2</sub> emissions Scope 3 <sup>*1,*2</sup> <b>957,000t-CO<sub>2</sub></b>

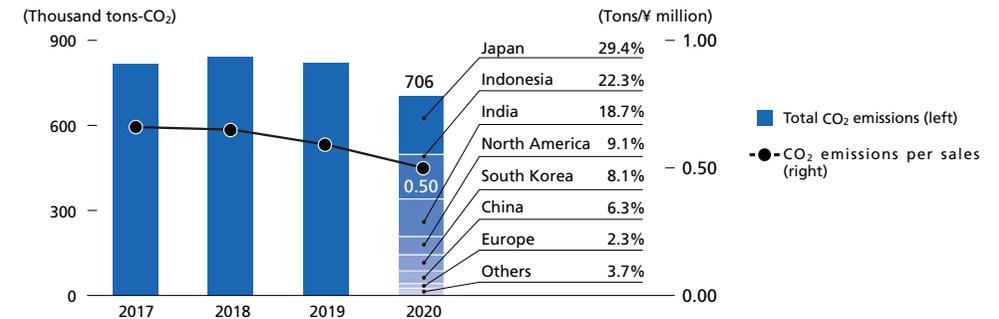
<sup>\*1</sup> Scope 1: Direct emissions, Scope 2: Indirect emissions from energy sources, Scope 3: other indirect emissions  
<sup>\*2</sup> Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

## Initiatives for Climate Change

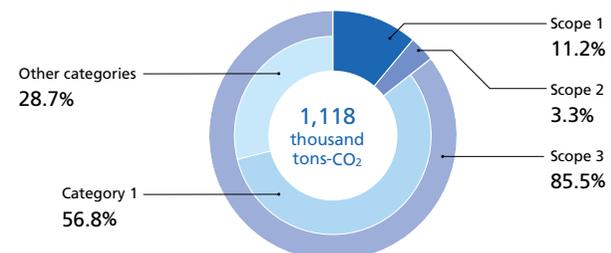
### Initiatives for Efficient Energy Use and CO<sub>2</sub> Reduction

In Tokushima Prefecture, where the Otsuka group's production sites are gathered, co-generation systems have been introduced at Otsuka Chemical and Otsuka Pharmaceutical Factory. The systems generate electricity from natural gas, while converting waste heat that is generated during the process of electricity production into steam and hot water, and supplies them to neighboring group companies. The co-generation system newly installed at the Toyama Plant of Otsuka Pharmaceutical Factory in February 2020 is expected to reduce CO<sub>2</sub> emissions by approximately 1,800 metric tons per year. The system complies with BCP that contributes to energy efficiency and stable supply of pharmaceuticals. In June 2021, Otsuka Holdings completed introduction of CO<sub>2</sub>-free electricity, which is mainly generated by hydropower, at 23 domestic manufacturing facilities of five subsidiary companies: Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods. In other countries, it has been expanded to the plant of Nutrition & Santé in Spain, where initiatives are underway to reduce CO<sub>2</sub> emissions by introducing renewable energy.

### CO<sub>2</sub> emissions, CO<sub>2</sub> emissions per sales (Scope 1)



### GHG Emissions throughout the Value Chain



Scope: Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

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### Introduced CO<sub>2</sub>-free Electricity\*<sup>1</sup> and Green Power Certificates

Since 2019, the Otsuka group has introduced CO<sub>2</sub>-free and electricity from other renewable energy sources, extending their use to manufacturing sites. In fiscal 2020, we reduced CO<sub>2</sub> emissions by approximately 84,000 metric tons (equivalent to the annual emissions of approximately 29,000 households\*<sup>2</sup>) through the introduction of renewable energy.

In addition, five domestic group companies\*<sup>3</sup> purchased Green Power Certificates for switching to green power at all sales sites and headquarters of the five group companies in Japan, and other offices, thereby reducing CO<sub>2</sub> emissions by approximately 6,000 metric tons/year.

Going forward, the group will work together toward the realization of a decarbonized society, and ultimately of a sustainable society, by optimizing energy use and maximizing energy use efficiency through the introduction of renewable energy and fuel conversion, while exercising synergistic effects among group companies.

\*1 Including carbon-neutral electricity utilizing certificates equal to renewable energy that does not emit CO<sub>2</sub>  
 \*2 Calculated from CO<sub>2</sub> emissions of the residential sector, FY 2018  
 \*3 Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

### Introduction of Solar Power Generation System for In-house Consumption

As a countermeasure against climate change, the Otsuka group is promoting the further utilization of renewable energy and improving energy use efficiency through the introduction of co-generation systems, solar power facilities, etc., in addition to CO<sub>2</sub>-free electricity.

In 2020, we introduced solar power generation systems for in-house consumption at the Kushiro Factory of Otsuka Pharmaceutical Factory and Otsuka Pharmaceutical India. We estimate that this will result in annual CO<sub>2</sub> emission reductions of approximately 10% at Kushiro Factory, and 6% at Otsuka Pharmaceutical India.



Kushiro Factory, Otsuka Pharmaceutical Factory



Otsuka Pharmaceutical India

## Initiatives for TCFD Recommendations

### Governance

As a global group that contributes to the health of people worldwide, the Otsuka group works sincerely to reduce the impact its businesses have on the global environment, and seeks to contribute to the creation of a sustainable society that protects nature and the future of the earth. Therefore, we have built a system of governance.

The Otsuka group's environmental policies and initiatives are discussed and determined by the Otsuka Holdings Environmental Committee, which consists of the directors of Otsuka Holdings and the persons in charge of environmental management in our group companies. Matters on the direction of the entire Otsuka group will be discussed and approved by the Otsuka Holdings Board of Directors, and will be shared with group companies as the Otsuka group's policy. Then, they will be implemented as an implementation scheme of the Otsuka Group Global Environmental Council (hereafter referred to as "OGG Environmental Council"), which consists of directors from the production departments of group companies and persons in charge of environmental management. The OGG Environmental Council assesses the risks and opportunities examined and reports the results of monitoring. The Otsuka Holdings Environmental Committee gives instructions for improvement and approves planning. In addition, if the monitoring results have an impact on business strategy and management resources, they will be incorporated into the management plan as matters to be resolved at the Board of Directors as needed.

The Committee is positioned as a subordinate organization of the Otsuka Group Sustainability Promotion Committee, which decides overall sustainability strategies and directions, and plays a role as one of the group's sustainability initiatives.

### Otsuka Group Environmental Management System



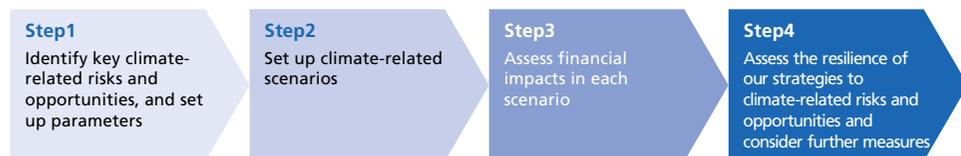
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## Strategy

### Process of Scenario Analysis

With the purpose of assessing the financial and business impacts under various scenarios, as well as assessing the resilience of our strategies to climate-related risks and opportunities, we carry out scenario analysis using IEA World Energy Outlook 2020 and other resources, following the steps below.

### Steps of Scenario Analysis



### Financial Impacts and Responses Associated with Climate-Related Risk and Opportunities

Category	Contents	Business/Financial Impacts		Our Response/Resilience	
		Less than 2°C	4°C		
Transition Risk	Policies and regulations	• Costs due to tightened regulations such as carbon pricing	Large	Large	<ul style="list-style-type: none"> <li>• Introduction of internal carbon pricing</li> <li>• Introduction of CO<sub>2</sub>-free electricity</li> <li>• Introduction of solar power generation systems including mega solar power systems</li> <li>• Improving energy efficiency through energy saving and fuel conversion</li> <li>• Investment in environmental facilities in Japan and overseas</li> </ul>
	Market	• Steep rise in renewable energy prices	Large	Large	
		• Steep rise in energy prices	Large	Large	
Reputation	• Reputation risk and investment-related risk associated with inadequate response to climate change and water risk	Large	Medium		
Physical Risk	Acute	<ul style="list-style-type: none"> <li>• Risks of damage to production facilities and others due to intensification of extreme weather, and cost increase to prepare for them</li> <li>• Risks in raw material procurement such as disruptions of supply chain and stable procurement</li> </ul>	Medium	Large	<ul style="list-style-type: none"> <li>• Decentralized production of major products</li> <li>• Formulation, disclosure, and sharing of procurement policies and guidelines with suppliers</li> <li>• Strengthening communication with our supply chains (Expanding the number of suppliers that are subject to our supply chain questionnaires, improving and enhancing contents of the questionnaires, and holding opportunities to discuss it)</li> </ul>
	Chronic	• Increased energy costs associated with temperature rise	Large	Large	
		• Effects of climate change on drug discovery using crop and natural products	Medium	Medium	• Collection of information about the impacts on drug discovery using crops and natural products, risk assessment, and examination of measures against it

Category	Contents	Business/Financial Impacts		Our Response/Resilience	
		Less than 2°C	4°C		
Opportunities	Resource efficiency	• Reduction of operating costs by introducing energy-efficient equipment	Large	Medium	• Collection of information on new technologies (such as membrane treatment technology that does not require steam) and examination of introduction of such technologies in a timely manner
	Energy sources	• Reduction of energy procurement risk due to proactive introduction of renewable energy	Large	Small	<ul style="list-style-type: none"> <li>• Introduction of internal carbon pricing</li> <li>• Collection of information on next-generation EN (such as hydrogen and ammonia) and examination of introduction of them in a timely manner</li> </ul>
	Products and services	• Increased revenue from increased demand for products that mitigate or address climate change (e.g., products against heat stroke or infectious diseases)	Large	Large	<ul style="list-style-type: none"> <li>• Formulation of the Plastic Policy (FY 2020) that aims at reducing reliance on fossil fuel</li> <li>• Examination of introduction of recycled PET resin or plant-based bio-PET resin into PET bottle beverage containers</li> <li>• Examples: Expand sales of products for preventing heat stroke, and expand sales of products with low environmental impact throughout their life cycles</li> </ul>
	Market	• Increased revenue from expansion of the market into new categories with products that respond to climate change	Medium	Medium	• Development of products that mitigate or respond to climate change (e.g., plant-based products)
	Resilience	• Strengthening BCP (measures against disaster and supply chain disruptions)	Medium	Large	<ul style="list-style-type: none"> <li>• Strengthening of promotion of energy saving and renewable energy through internal carbon pricing</li> <li>• BCP measures at production sites (anti-seismic measures and measures against flooding)</li> </ul>

Assessment of business/financial impacts Large: One billion yen or more (equivalent to 1% of operating income when estimating it at 100 billion yen at the lowest)  
 Medium: (Minor) to less than one billion yen  
 Small: (Minor)

### Risk Management

The Otsuka group examines and evaluates the significant financial and strategic impacts of climate-related risks through the Otsuka Holdings Environmental Committee and the OGG Environmental Council. If we find any significance in the risk assessment, persons in charge of environmental management in the Otsuka Holdings Environmental Committee take up the matter for deliberation by the Board of Directors, and once approved, the matter is shared with group companies as the Otsuka group's response policy to work on management of mitigating climate-related risks for further improvement.

### Indicators and Goals

The Otsuka group has identified climate change as one of its environmental materialities and has set a 2030 goal, and we are promoting initiatives to achieve it.

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# Resource Recycling and Conservation

## Approach and Policy to Resource Recycling and Conservation

In order to realize both a sustainable society and ongoing corporate growth, a global shift to sustainable business models that grow without impacting the environment is necessary. To continue providing products that contribute to the health of people worldwide, the Otsuka group will raise resource efficiency throughout the value chain and build a sustainable system for recycling and conservation of resources, including biological resources.

## Our Goals

The Otsuka group has established a 2050 Environmental Vision of net-zero, which aims to reduce the total environmental impact of our business activities to zero, along with setting the 2030 goal that aims to reduce simple incineration and landfill by 50% compared to FY 2019. PET bottles for beverage constitute most plastic containers and packaging used for consumer products by the Otsuka group companies. For this reason, we have established the Otsuka Group Plastic Policy to achieve a 50% or higher content of recycled and plant-based materials in our PET bottles globally. We are working to achieve this goal. Our main initiatives include reducing the use of plastic containers and packaging for various products, reducing the use of materials for logistics, and promoting recycling activities to achieve zero waste<sup>\*1</sup>.

\*1 Approach seeking to reduce waste generation and waste of resources to zero



Resource Recycling and Conservation

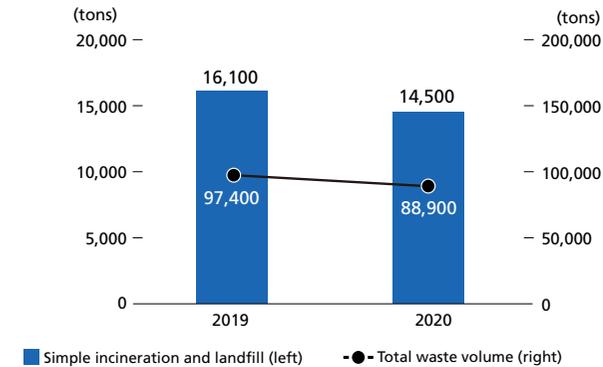
Resource Recycling and Conservation	Goals	<ul style="list-style-type: none"> <li>Goal for FY 2030: 50% reduction in simple incineration and landfill compared to FY 2019</li> <li>Goal for FY 2030: 50% or higher content of recycled and plant-based materials in our PET bottles</li> </ul>	
	FY 2020 Results	Total waste volume <b>88,900t</b>	Simple incineration and landfill <b>14,500t</b>

## Initiatives toward Zero Waste

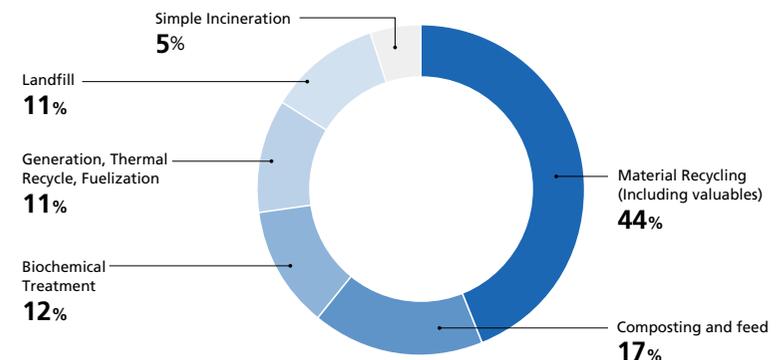
Global emissions in FY 2020 were 88,900 metric tons, and simple incineration and landfill volume was 14,500 metric tons, a 10% decrease from the previous year.

The Otsuka group is working with each group companies in Japan and overseas to achieve the 2030 goal of a 50% reduction in simple incineration and landfill compared with FY 2019.

### Simple Incineration and Landfill Volume, Total Waste Volume



### Total Waste Volume



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## Plastic Policy

The Otsuka group has identified “resource recycling and conservation” as a material issue in its environmental activities. In this regard, we believe it is critical to take prompt actions to advance plastic recycling and curb marine plastic pollution, which have become serious worldwide challenges in recent years.

In 2020, we formulated the Otsuka Group Plastic Policy with the aim of contributing to a sustainable society. The policy guides activities with a focus on PET bottles, which make up a large amount of the plastic used in group company products.

### Otsuka Group Plastic Policy

#### Fundamental Concept

PET bottles comprise the majority of plastic containers and packaging used for consumer products by our group companies. For this reason, we believe that by promoting PET bottle recycling, we can reduce our reliance on fossil fuel and thereby contribute to environmental conservation. Our plan is to use PET bottles manufactured from recycled and plant-based materials and increase the percentage of such sustainable resource use in our production processes globally to 50 percent by 2030 and 100 percent by 2050. Moreover, to advance PET material recycling, it is essential to recycle PET bottles for use as raw material. Together with our various stakeholders, we will advance our global efforts on proper collection and recycling of used PET bottles.

#### Our Vision for 2050

For our entire line of consumer products, we will endeavor to use packaging that supports a sustainable society:

- No use of plastics made from petroleum-based materials
- Promote use of recycled, plant-based, and biodegradable materials
- Promote use of reusable packaging

#### Our Goal for 2030

- Achieve a 50 percent or higher content of recycled and plant-based materials in our PET bottles.
- Introduce alternative packaging (e.g., paper) and increase use of cans for our drink products.
- Step up promotion of drink bottle recycling by introducing reusable packaging through a zero-waste sales and circular distribution model, which also includes the use of sports bottles for our powder products.

We will promote the use of alternative packaging and concurrently pursue using more recyclable materials for drink containers.

Guided by the Otsuka Group Plastic Policy, we are taking swift and appropriate actions regarding every aspect of our use of plastic, and thereby contributing to the sustainable use of plastic and effective resource recycling. Specific initiatives include developing an action plan for PET bottles, using recycled and plant-based materials, and examining options for alternative packaging.

## Initiatives to Use Packaging that Supports a Sustainable Society

### Launch of Label-free PET Bottles

Otsuka Pharmaceutical sells label-free PET bottle versions of POCARI SWEAT and POCARI SWEAT ION WATER 300 mL, and Otsuka Foods sells Sinvino JAVA TEA Straight Red 500 mL in label-free bottles, all of which are available only via e-commerce channels. These products eliminate the need to remove the label, easy to be recycled, and are environmentally friendly. We are working to reduce the use of labels on PET bottles and to reduce the environmental impact through reduction of containers and packaging.



Label-free PET bottle version of POCARI SWEAT 300 mL



Label-free PET bottle version of POCARI SWEAT ION WATER 300 mL



Sinvino JAVA TEA Straight Red 500mL

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# Water Conservation

## Approach and Policy to Water Conservation

Since its establishment, the Otsuka group's operations have had a deep connection to water, a resource essential to life. Through products that use water as a raw material, we have actively contributed not only to the treatment and prevention of diseases, but also the maintenance and promotion of health. We therefore recognize the importance of water to us as a resource, and consider its conservation to be a critical global issue. Moreover, water resources are unevenly distributed across different countries and regions, each of which faces different risks. We cooperate with all stakeholders, and conduct ongoing water conservation initiatives from intake to discharge (including cultivation of water resources, conscientious use and clean return), in the aim of sustainable water use.

## Our Goals

The Otsuka group has established a 2050 Environmental Vision of net-zero, which aims to reduce total environmental impact of our business activities to zero, along with setting the 2030 goal that aims to improve water use efficiency by 15% compared to FY 2017. We are working on the realization of sustainable water use by improving water use efficiency and working to preserve water resources from intake to discharge (including cultivation of water resources, conscientious use of water, and return of clean water to the environment).



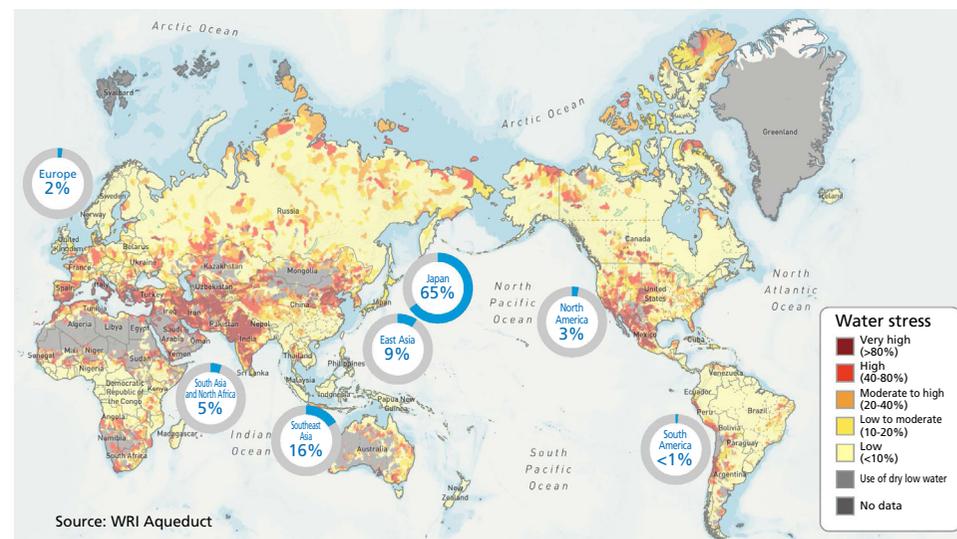
Water Conservation

<b>Goals</b>	• Goal for FY 2030: Improvement of water use efficiency by 15% compared to FY 2017		
<b>FY 2020 Results</b>	<b>Water usage</b>	<b>Water use efficiency</b>	<b>Water resource risk assessment</b>
	17,732,000m <sup>3</sup>	12.5m <sup>3</sup> /¥ million	87 manufacturing sites at 51 companies

## Evaluating Water Risk at Manufacturing Sites

Considering environmental risk in each region is also important for sustainable growth in the diverse business models of the Otsuka group operating around the world. Since 2017, the Otsuka group has conducted primary water risk assessments at all consolidated manufacturing sites using the water risk assessment tool "Aquaduct," developed by the World Resources Institute (WRI), so as to understand and minimize the impact of water-related risk on the group's business activities. We also formulate analysis records for each site and implement comprehensive risk assessment by utilizing more detailed water data and collaborating among group companies. We will pursue the water resource conservation improve and use efficiency by identifying regional risks and promoting more specific research and collaboration among group companies, and by taking measures for region-based management and effective utilization.

## Aquaduct Water Stress Map and Breakdown by Region of Water Consumption by Region in the Otsuka Group



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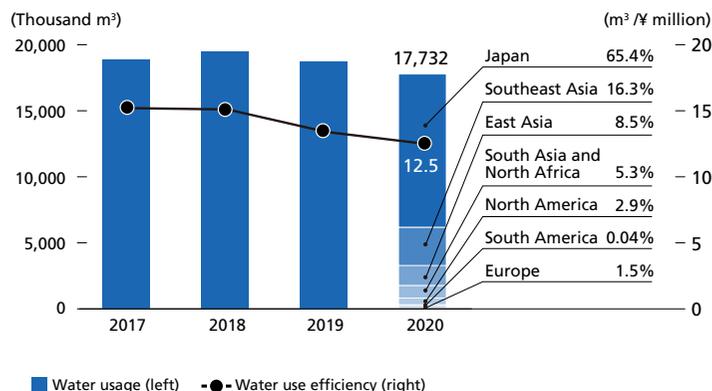
## Initiatives to Reduce Water Usage

The Otsuka group collects water usage data for each plant and works to reduce water usage and improve water use efficiency in accordance with local conditions based on the productivity improvement.

We are also working to reduce the environmental impact of wastewater.

 [Limiting Emissions to the Atmosphere and Water Systems](#)

### Water Usage, Water Use Efficiency



## Initiatives that Protect Water Sources\* through Forestry

One of our initiatives to preserve water resources uses water conscientiously and returns clean water using water source protection through forestry.

Group employees and family members voluntarily participate in conservation drives, such as planting trees, in turn developing a sense of closeness with forests.

### Projects

#### [In Japan]

The Otsuka group has signed a partnership agreement with Tokushima Prefecture's Tokushima Forestry Project, taking part in intensive forest management that is focused on large-scale forests covering 100 ha or more.

#### Tokushima Forests – Forestry in Collaboration with Tokushima Prefecture

In 2010, Otsuka Pharmaceutical Factory and Taiho Pharmaceutical signed partnership agreements with the Tokushima Cooperative Forestry Project, based on Tokushima Prefecture's Ordinance on Promotion of Global Warming Countermeasures. These initiatives have since grown, and currently eight Otsuka group companies\*1 have signed partnership agreements.



#### [Outside Japan]

#### PT Widatra Bhakti Watershed Conservation in Pasuruan Regency

In the Pasuruan Regency region in Indonesia, employees of PT Widatra Bhakti helped protect water sources by planting 6,080 saplings in Andonosari Village in the Tukur subdistrict.



\* Water source protection means nurturing and maintaining water resources, as well as using the natural capacity of forests to mitigate flooding and droughts. Forests soak up falling rain and snow, then allow that water to slowly flow into rivers as groundwater.

\*1 Otsuka Pharmaceutical Factory, Otsuka Pharmaceutical, Taiho Pharmaceutical, Otsuka Warehouse, Otsuka Chemical, Otsuka Foods, Otsuka Packaging Industries, and Otsuka Techno Corporation

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# Biodiversity

## Approach and Policy to Biodiversity

### Otsuka Group's Biodiversity Policy

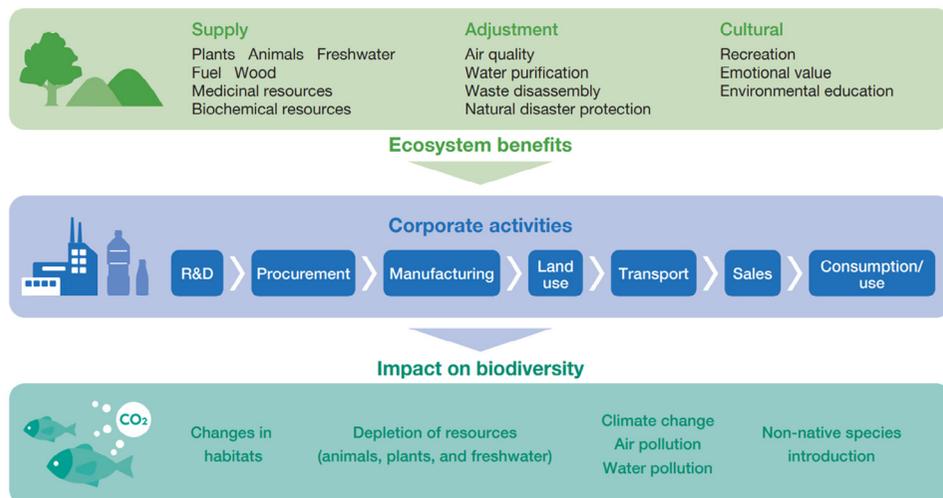
#### Basic Approach

The Otsuka group recognizes the invaluable benefits provided by the global environment, and thus deeply values the wonder of life. It understands that nature's gifts are the key to our future, and is consequently committed to protecting biodiversity worldwide.

#### Guidelines

- 1 The group will deepen its understanding of the relationship between business activities and biodiversity.
- 2 The group will strive to reduce the environmental impact of business activities that impact biodiversity.
- 3 The group will strive for sustainable use of resources (including ecosystem services), and for fair and equitable distribution of genetic resources in accordance with international arrangements.
- 4 The group will work on conservation of biodiversity by communicating, cooperating and collaborating with stakeholders worldwide.
- 5 The group will help foster public awareness of biodiversity.

## Relationship between Biodiversity and Business Activities



## Our main initiatives

### Creating Biotopes<sup>\*1</sup>

Otsuka pharmaceutical's Tokushima Itano Factory has created facilities that are friendly to people and the environment on the basis of building harmonious relationships with the natural environment. The design of the factory complex includes incorporating the pre-construction landscape, and reintroducing native plants in an effort to preserve the original biological habitats. In addition, the biotope that are friendly to people and the environment with a total length of about 450 m, fed by cooling water from the plant, provides an environment for diverse aquatic creatures to flourish, including dragonfly larva, water scorpions, and pygmy water lilies.

Since 2004, we have been supporting the "Extinct Fish Hemigrammocypri rasborella Revitalization Project" in collaboration with industry, government, academia and the private sector, and have been releasing the freshwater fish " Hemigrammocypri rasborella<sup>\*2</sup>" to promote the conservation of rare species. By reviving endangered species, we are also contributing to raising employee awareness. It is also used for social studies tours and is a place for environmental education.

\*1 Biotope : A place has been restored to an ecosystem that was lost due to the establishment of a factory, etc., so that for bring back plants and animals that originally lived in the local area.

\*2 Hemigrammocypri rasborella : Ministry of the Environment Red List: Endangered IB. It is an endemic species of Japan and is a kind of freshwater fish classified in the Cyprinidae. The total length is about 5 cm, and in nature, it is mainly small individuals of about 3-4 cm. It is distributed from Shizuoka prefecture to the Pacific Ocean of Okayama prefecture, the coastal area of the Seto Inland Sea, eastern Shikoku (Tokushima and Kagawa prefectures), and northwestern Kyushu (Fukuoka and Saga prefectures).



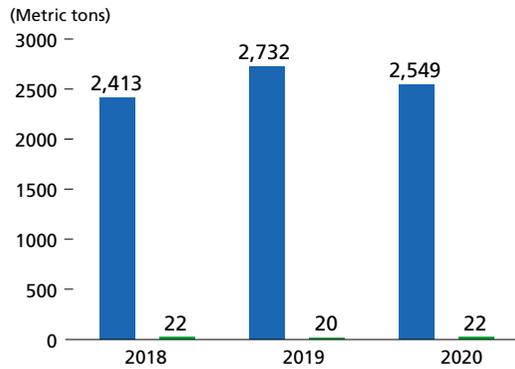
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# Management of Chemical Substances\*

## Proper Management of Chemical Substances

We handled 2,549 metric tons of PRTR substances<sup>\*1</sup> in our business activities. We will continue to strive for proper management of chemical substances.

### Changes in Handling, Release of PRTR Substances



■ Amount of PRTR handled  
 ■ Amount of PRTR released (atmosphere and water)

\* Five group companies: Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

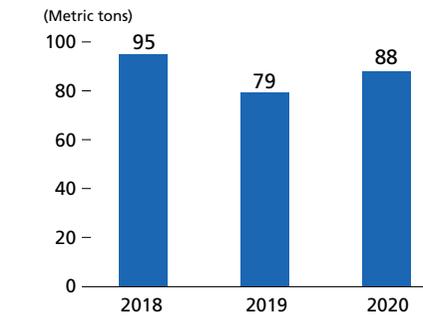
\*1 PRTR (Pollutant Release and Transfer Register): an inventory tracking system to understand, aggregate, and publicize data on various harmful chemical substances: their generation sources, and their quantities released into the environment, or their quantities contained in waste and carried out of the workplace. There are presently 462 substances designated under the PRTR system.

## Limiting Emissions to the Atmosphere and Water Systems

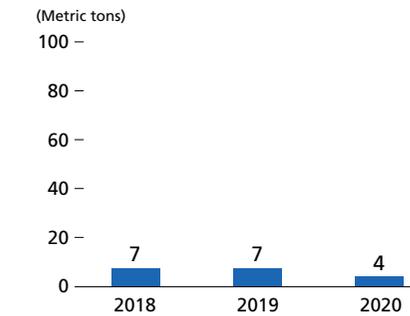
### Prevention of Air Pollution

Emissions of nitrogen oxides and sulfur oxides from our business activities amounted to 88 metric tons and 4 metric tons, respectively. We will continue to consolidate boiler facilities, switch to cleaner fuels, and continue to improve its energy efficiency in an effort to minimize emissions of nitrogen oxides (NOx) and sulfur oxides (SOx) into the atmosphere.

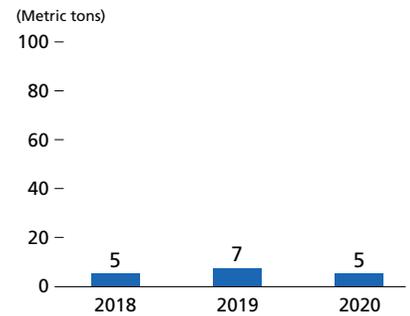
### NOx (Nitrogen Oxides) Emissions



### SOx (Sulfur Oxide) Emissions



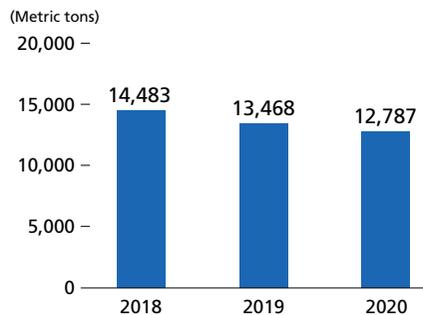
### Dust and Soot Emissions



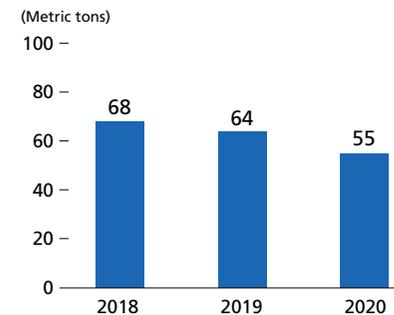
### Prevention of Water Pollution

The total amount of wastewater discharged during business activities was 12,787,000 m<sup>3</sup>, the chemical oxygen demand (COD), which indicates the environmental impact of water quality, was 55 metric tons, and suspended solid (SS) emissions were 41 metric tons.

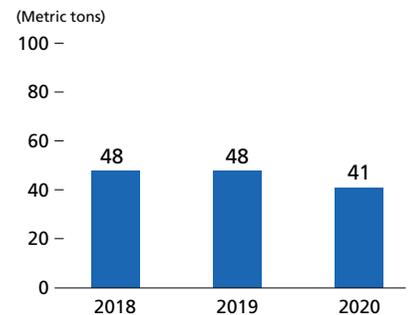
### Total Amount of Wastewater



### Chemical Oxygen Demand (COD)



### Suspended Solids (SS) Emissions



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## Supply Chain

### Measures with Business Collaborators Aimed at Sustainable Procurement

Across the entire value chain, the Otsuka group engages in business activities that are safe, reliable, socially acceptable, and in compliance with laws and regulations. When commencing transactions with a supplier, we perform screening and checks to ensure the quality of raw materials and to guarantee stable procurement. We also conclude a basic transaction agreement. In the case of a new supplier, transactions are determined only after we have carried out due diligence.

We aim for mutually sustainable development through fair, equitable and transparent procurement and the establishment of healthy relationships with business collaborators. To further these efforts, in 2020 we updated the Otsuka Group Procurement Policy, which takes into account factors such as human rights, labor issues, the environment and anti-corruption measures, and formulated the Otsuka Group Sustainable Procurement Guidelines, which provide more specific descriptions of the provisions of the above policy. Both are shared with all business partners.

In order to ensure a stable supply of products, we perform advance risk assessments on key raw materials to clarify the nature of potential risks so that we can take countermeasures. We also make sure to source raw materials from multiple companies, in principle.

#### Otsuka Group Procurement Policy

The Otsuka group of companies, in accordance with our corporate vision, "Otsuka-people creating new products for better health worldwide", and international norms, conducts procurement activities in a responsible way. Otsuka delivers innovative, safe, secure, and high-quality products in order to contribute to the construction and maintenance of a sustainable society, as well as to the health of people around the world.

#### 1. Relationships with suppliers

As a collaborator with many suppliers, the Otsuka group aims to build good relationships for mutual sustainable development through shared understanding, based on a fair exchange of appropriate information and opinions.

#### 2. Supplier selection

The Otsuka group selects suppliers in a fair, and transparent manner based on comprehensive assessments of supplier quality, costs, quantity, delivery terms, compliance with laws and regulations, promotion of environment preservation, etc.

#### 3. Responsibilities toward society

For the realization of sustainable society, the Otsuka group strives to maintain procurement activities that reflect consideration for human rights, labor, the environment, and non-tolerance of corruption.

#### 4. Compliance

The Otsuka group of companies observes all applicable laws and rules, and all Otsuka employees and supplier employees must act at all times with the highest level of ethics, consistent with social norms.

Otsuka Holdings Co., Ltd.

As part of the Otsuka group's efforts to promote sustainable procurement, the Otsuka Sustainable Procurement Task Force, made up of Otsuka Holdings and five group companies,\*<sup>1</sup> was formed in 2019. The task force members are taking steps to promote the group's overall sustainable procurement, including revision of the Otsuka Group Procurement Policy, formulation of sustainable procurement guidelines, and conducting a sustainable procurement self-assessment questionnaire (SAQ\*<sup>2</sup>) and presentations for business partners.

The Otsuka Sustainable Procurement Task Force, which aims to conduct a sustainable procurement self-assessment questionnaire for 200 suppliers of raw materials, containers, packaging, and others in Japan by 2023, has received responses to the questionnaire from 80 suppliers as of the end of 2020. In addition, the Otsuka Sustainable Procurement TF is strengthening communication with our business partners by holding briefings for the business partners who share our procurement policies, and holding follow-up meetings after answering questionnaires, thereby promoting initiatives to realize a sustainable society.

\*1 Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods (Otsuka Packaging Industries, Otsuka Techno Corporation, and EN Otsuka Pharmaceutical joined in March 2021.)

\*2 SAQ (Self-Assessment Questionnaire): A questionnaire for sustainability procurement.

#### Otsuka Group Sustainable Procurement Guidelines

(Excerpts involved environment)

We require the following in accordance with the Otsuka Group Environment Policy :

1. Observance of environmental law as well as international treaty as well as in the countries and areas of business activities
2. Consideration of the impacts of activities on the local environment; and on the health and safety of the community, such as chemical management, reduction of waste and byproducts, and appropriate disposal
3. Consideration of the impacts of activities on the global environment, such as reduction of greenhouse gas emissions, responses to climate change, and environmental load reduction
4. Reduction in consumption of natural resources including water, and promotion of resource recycling (recycle, reuse, thermal recycling)
5. Promotion of comprehensive conservation activities for biodiversity considering the diversity in ecosystems, species, and genetics. Fair and equitable allocation of benefits resulting from utilization of genetic resources

#### Conducting Environmental Questionnaires for Our Suppliers

In addition to the SAQ, the Otsuka group conducts more detailed questionnaires on the environment, based on the understanding that cooperative initiatives with suppliers are important for reducing the impact its businesses have on the global environment throughout the supply chain. We will increase opportunities for dialogue with our business partners to further improve our efforts.

#### Initiatives with Business Partners

The Otsuka group is making concrete efforts to build relationships of trust with various stakeholders, including business partners.

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# Engagement

## Joining in Industry Associations, etc.

### Certification by Science Based Targets (SBT)<sup>\*</sup> Initiative

Greenhouse gas (GHG) emissions reduction targets set by Otsuka Pharmaceutical and Taiho Pharmaceutical have been certified by the Science Based Targets (SBT) initiative.

In order to achieve these new goals, we will optimize energy use and introduce renewable energy, and continue to promote reduction of GHG emissions throughout the value chain.



\* An international initiative led by the United Nations Global Compact (UNGC), World Resources Institute (WRI), and World Wide Fund for Nature (WWF). It certifies the CO<sub>2</sub> emission reduction targets of companies that are in line with emissions reduction scenarios based on scientific facts, for achieving the Paris Agreement-mandated objective of limiting the average global temperature rise to below 2°C.

### Support for Climate Change Initiatives

Otsuka Holdings supports for Japan Climate Initiative that declares “joining the front line of global push for decarbonization from Japan,” and participates in various activities.

### Support for the RE100 Initiative

Otsuka Holdings is in the process of applying for RE100, an international initiative that aims to use 100% renewable energy for its business operations.

### Participation in TCFD

The Otsuka group has announced its support for recommendations issued by TCFD in October 2021. Scenario analysis assesses climate-related risks and opportunities, including carbon taxes, physical risks, and crop demand. We promote various measures based on the assessment result.



[PDF Initiatives for TCFD Recommendations](#)

## External Recognition

### CDP Evaluation

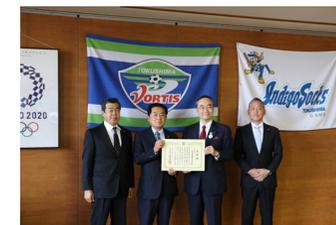
In 2020, CDP, an international NGO that works on environmental issues, scored the Otsuka Holdings “A-” for climate change and water resources respectively, which means we are at the leadership level for these fields.



## Communication with Local Communities

### Five companies of Otsuka Group Received the 2020 Climate Change Award from Tokushima Prefecture

Five subsidiary companies consisting of Otsuka Holdings, Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods received the 2020 Climate Change Award from the Tokushima Prefectural government in recognition of their outstanding efforts to reduce GHG emissions to realize a decarbonized society.



With the aim of shifting to a decarbonized business style, the Climate Change Award was established by the Tokushima Prefectural government to commend companies that are actively working to reduce GHG emissions in their business activities, and to publicize their initiatives. The Otsuka group received this award for its collaborative efforts to reduce GHG emissions through the introduction of CO<sub>2</sub>-free electricity and co-generation systems at its plants.

### Participation in “the Adopt an Eco-School Program,” an Initiative through a Public-private and University Partnership

Concluded agreements with local schools; Otsuka Pharmaceutical, Otsuka Chemical, and Taiho Pharmaceutical have been participating in the Adopt an Eco-School program since 2008. As the name of this initiative represents, three group companies adopt local schools as foster parents to support environmental learning activities.



In spite of the COVID-19 pandemic, the companies continued their activities and provided support activities, including a remote tour of the Tokushima Itano Factory of Otsuka Pharmaceutical (introduction of the factory environment from the air using images taken by a drone, introduction of the factory, explanation of the manufacturing line, live broadcasting of the biotope).

We hope that the Adopt an Eco-School program will serve as an opportunity for students to pay attention to environmental issues around them.

## Relationship with Stakeholders

The Otsuka group is promoting environmentally conscious efforts to build relationships of trust with various stakeholders.



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## Environmental Data

Materiality	Classification	Sources	Scope	Unit	FY2017	FY2018	FY2019	FY2020	
Climate Change	Energies	Electricity	Global total	thousand kWh	792,850	800,413	736,508	533,095	
			Japan		379,647	381,748	311,456	127,521	
			Outside Japan		413,203	418,665	425,052	405,573	
		CO <sub>2</sub> free electricity	Global total	thousand kWh				82,549	201,858
			Japan					74,805	194,051
			Outside Japan					7,744	7,807
		Natural gas & City gas	Global total	thousand m <sup>3</sup>		82,634	75,892	72,075	71,600
			Japan			31,900	32,812	32,014	31,498
			Outside Japan			50,734	43,080	40,061	40,101
		Coal	Global total	t		28,201	58,695	67,707	57,968
			Japan			0	0	0	0
			Outside Japan			28,201	58,695	67,707	57,968
		Steam	Global total	t		366,448	374,805	363,460	343,067
			Japan			158,398	163,871	158,207	152,076
			Outside Japan			208,050	210,934	205,253	190,991
		LNG	Global total	t		12,316	12,061	13,337	14,104
			Japan			12,201	11,887	13,055	13,823
			Outside Japan			115	174	282	281
		A, B-C HFO	Global total	kL		11,762	10,350	9,516	7,945
			Japan			11,326	10,113	9,516	7,945
			Outside Japan			436	237	0	0
		LPG	Global total	t		5,075	5,486	6,046	5,870
			Japan			4,745	5,154	5,776	5,596
			Outside Japan			330	332	270	274
		Diesel	Global total	kL		767	968	543	436
			Japan			44	54	69	58
			Outside Japan			723	914	474	378
		Pet coke	Global total	t		12,882	317	0	0
			Japan			0	0	0	0
			Outside Japan			12,882	317	0	0
Kerosene	Global total	kL		143	148	145	130		
	Japan			143	148	145	130		
	Outside Japan			0	0	0	0		
Gasoline	Global total	kL		52	56	50	115		
	Japan			52	56	50	115		
	Outside Japan			0	0	0	0		
Steam (non industrial)	Global total	GJ		1,253	988	1,033	1,084		
	Japan			1,253	988	1,033	1,084		
	Outside Japan			0	0	0	0		
RPF	Global total	t		29	48	0	0		
	Japan			0	0	0	0		
	Outside Japan			29	48	0	0		
Hot water	Global total	GJ		538	193	2,408	2,567		
	Japan			267	192	163	173		
	Outside Japan			271	1	2,245	2,393		
Cold water	Global total	GJ		11,556	5,842	11,400	11,774		
	Japan			11,556	5,842	11,400	11,774		
	Outside Japan			0	0	0	0		
Renewable Energies	Solar power	Global total	thousand kWh		307	420	1,674	3,869	
		Japan			185	342	356	1,409	
		Outside Japan			122	78	1,318	2,459	
	Solar water heater	Global total	GJ		271	271	222	222	
		Japan			0	0	0	0	
		Outside Japan			271	271	222	222	
Biomass power	Global total	thousand t		22	7	1	7		
	Japan			0	0	0	0		
		Outside Japan		22	7	1	7		

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Materiality	Classification	Sources	Scope	Unit	FY2017	FY2018	FY2019	FY2020	
Climate Change	CO <sub>2</sub>	CO <sub>2</sub> emissions	Global total	thousand t-CO <sub>2</sub>	818	842	821	706	
			Japan	t-CO <sub>2</sub>	325,175	324,162	282,243	207,281	
			Outside Japan	t-CO <sub>2</sub>	492,773	518,329	538,525	498,754	
		CO <sub>2</sub> emissions per sales	Global total	t/¥ million	0.66	0.65	0.59	0.50	
			GHG emissions throughout the value chain		thousand t-CO <sub>2</sub>	1,344	1,399	1,320	1,118
			Scope1		95,612	98,308	138,583	125,038	
		Scope2		178,987	179,389	92,444	36,647		
		Scope3 breakdown	Category 1		714,306	748,933	730,219	635,542	
			Category 2		66,448	84,157	85,119	52,402	
			Category 3		31,100	31,518	29,633	45,579	
			Category 4		74,016	82,176	79,981	70,621	
			Category 5		12,040	12,143	11,851	12,836	
			Category 6		11,918	11,677	10,882	6,030	
			Category 7	Japan**	6,407	5,801	5,888	5,773	
			Category 8		12,137	9,121	8,463	6,356	
Category 9			21,938	22,936	22,484	20,407			
Category 10					N/A				
Category 11					85,262	78,554	81,034	80,209	
Category 12					33,350	34,766	23,681	20,751	
Category 13						N/A			
Category 14						N/A			
Category 15						N/A			
Water Conservation	Water resources	Water usage	Global total	thousand m <sup>3</sup>	18,864	19,463	18,756	17,732	
			Japan	12,353	13,010	12,274	11,605		
		Outside Japan	6,511	6,453	6,482	6,127			
		Water use efficiency	Global total	m <sup>3</sup> /¥ million	15.2	15.1	13.4	12.5	
Water intake by water source	Municipal water (including industrial water)		13,858	14,110	13,561	12,793			
	River water	thousand m <sup>3</sup>	1,241	1,417	1,382	1,312			
	Ground water		3,766	3,936	3,813	3,627			
Resource Recycling and Conservation	Material	Material	Japan**	t	127,473	127,473	125,289	114,847	
			Plastics	PET			16,888	14,376	11,963
				Others			17,660	17,783	16,028
	Packaging	Paper and cardboard	Japan**	t	37,465	36,388	33,149		
			Others			97,843	95,658	89,826	
			Total amount of waste	Global total	t	45,501	38,378	97,441	88,878
	Waste**	Total (Including valuables)	Recycled materials	Global total	t			43,083	35,723
				Japan			54,358	53,155	
				Outside Japan			74,618	64,027	
			Global total	t	41,430	34,930	38,805	30,647	
			Japan			35,813	33,380		
			Outside Japan			11,075	9,632		
		Final disposal (landfill)	Global total	t	358	166	115	99	
			Japan				10,960	9,533	
			Outside Japan				9,761	9,793	
Hazardous**		Total amount of waste	Global total	t	3,628	4,250	3,771	3,836	
			Japan			5,990	5,958		
			Outside Japan			5,318	4,549		
	Recycled materials	Global total	t	2,236	2,480	1,638	1,653		
		Japan				3,680	2,897		
		Outside Japan				1,572	1,824		
Final disposal (landfill)	Global total	t	2	2	9	2			
	Japan				1,563	1,822			
Outside Japan									

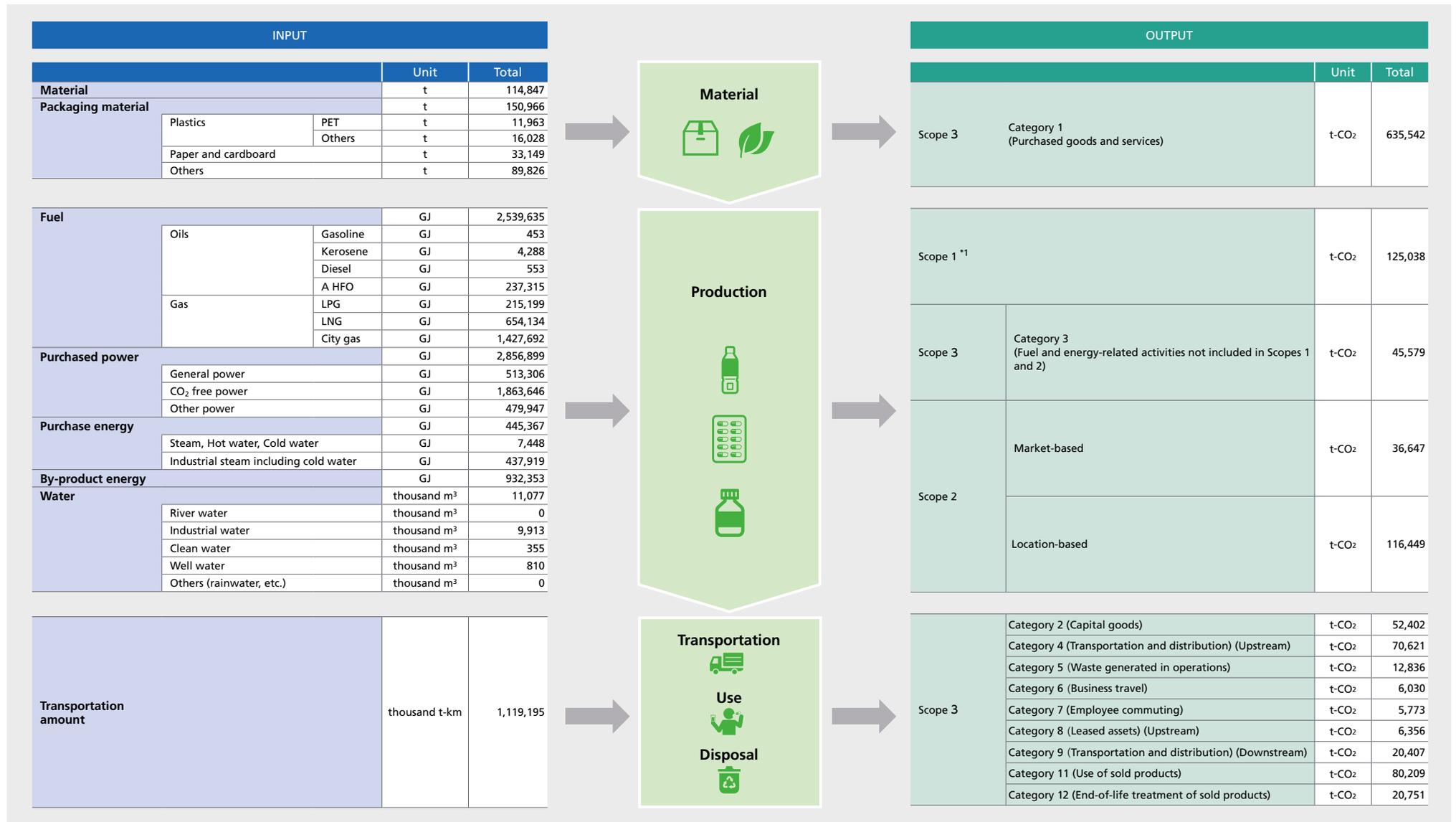
\*1: Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

\*2: Since 2019, the scope of disclosure has expanded from Japan to Global.

\*3: Hazardous Waste is count by Japanese regulation, Outside of Japan is sorted by their country's rules.

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					Climate Change	Resource Recycling and Conservation	Water Conservation					

## Material balance over the life cycle of the business\*



\* 5 companies of Otsuka Pharmaceutical, Otsuka Pharmaceutical Factory, Taiho Pharmaceutical, Otsuka Chemical, and Otsuka Foods

\*1 Indirect emissions from energy sources and indirect emissions from freon leak volume and during the production of carbonated beverages, etc.

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## Otsuka Group's subsidiaries' acquisition of ISO 14001 certification

**Acquisition rate 51% (Japan 75%, Outside Japan 31%)** \* All production sites of the consolidated Otsuka Group

**Japan : 9 Companies**

① Otsuka Pharmaceutical Co., Ltd. ② Otsuka Pharmaceutical Factory, Inc ③ Taiho Pharmaceutical Co., Ltd. ④ Otsuka Chemical Co., Ltd. ⑤ Otsuka Food Co., Ltd. ⑥ Otsuka Techno Corporation. ⑦ EN Otsuka Pharmaceutical Co., Ltd. ⑧ Otsuka Packaging Industries Co., Ltd. ⑨ Higashiyama Film Co., Ltd.

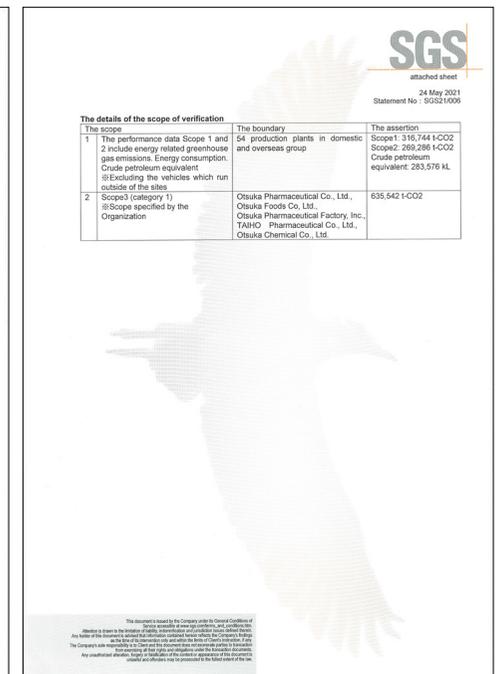
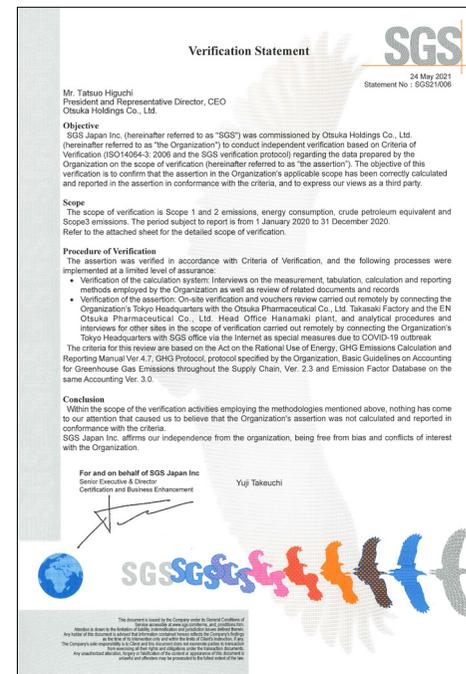
**Outside Japan : 13 Companies**

① Euriso-Top SAS ② Korea Otsuka Pharmaceutical Co., Ltd. ③ Nutrition & Sante SAS ④ Nutrition & Sante Iberia SL ⑤ Otsuka Pakistan Ltd. ⑥ PT Amerta Indah Otsuka ⑦ PT Otsuka Indonesia ⑧ Zhejiang Otsuka Pharmaceutical Co., Ltd. ⑨ Egypt Otsuka Pharmaceutical Co., S.A.E. ⑩ PT Widatra Bhakti ⑪ P.T. Lautan Otsuka Chemica ⑫ Zhangjiagang Otsuka Chemical Co., Ltd. ⑬ Hebron S.A.

As of December, 2020

## Third-Party Verification

In order to improve the transparency and reliability of its environmental data, the Otsuka group has its GHG emissions Scopes 1 and 2 (CO<sub>2</sub> emissions from energy sources, including energy consumption), and Scope 3 (Category 1) verified by third-party organizations. This helps us identify emissions trends and implement improvements. We will continue to expand the scope of verification and further enhance the reliability of our data.



# For L i f e .

Realizing  
the hidden power  
within.



HUNDRED YEAR  
OTSUKA QUALITY

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Otsuka Holdings Co., Ltd.