

## Business Operations and Environmental Impact

The FDK Group promotes reduction of the environmental impact generated by its operations throughout the lifecycle of its products by understanding numerically the overall impacts imposed to the environment.

Various products manufactured by the FDK Group used for people's daily life consume resources, such as parts, and energy, such as electricity, at each stage of R&D, design, production and sales. The use, recycling, and disposal of these products also require a certain volume of energy. The FDK Group is committed to reduce such environmental impacts throughout the lifecycle of the products.



### Design/Development Stage

The FDK Group manufactures eco-friendly products through compliance with all the relevant laws and applicable standards, design reviews and product environmental assessments. Through the processes, emissions of hazardous substances are avoided and energy- and resource-saving, as well as recyclability of product designs are checked.



### Procurement Stage

All procurements by the FDK Group are done after checking that the parts and materials to be procured are eco-friendly. Equal considerations are made to reduce energy for transporting these parts and materials.



### Manufacturing Stage

Zero emission is pursued by minimizing the use of resources for materials, energy and water consumption (energy-saving activities) and eliminating disposal of rubbishes by landfill and simple incineration. An effort is being made to reduce emission of chemical substances to the environment.



### Distribution/Sales Stages

Consumption of energy for transportation and delivery of products is reduced to minimize discharging exhaust gas to the environment.



### Use Stage

Energy-saving and long-life products are sought. Wide range of battery types allows users to select appropriate ones depending upon usage, by which the life of batteries can be extended.



### Collection/Reuse/Recycling Stages

Used products are collected back for effective utilization of resources.

## IN

### Energy

Electricity purchased	44,636 MWh
Heavy oil and kerosene	290 kℓ
LPG and LNG	40 tons
Natural gas and city gas	237 km <sup>3</sup>

### Chemical substances

Handled volume	4,438 tons
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### Water

Used volume	1,087,193 m <sup>3</sup>
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(Calculation methods)

- Chemical substances: Volume of PRTR Law target chemicals handled by plants/sites
- Energy : Electricity, gas, oil, etc, consumed by plants/sites
- Water : Volume used by plants/sites

## OUT

### Gases discharged

CO <sub>2</sub>	20,460 tons
SOx	0.0 tons
NOx	0.6 tons

### Chemical substances

Emission volume	1.3 tons
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### Wastes

Landfill and simple incineration	0 tons
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(Calculation methods)

- Chemical substances : Volume of PRTR Law target chemicals handled by plants/sites
- Atmospheric release : Volume of carbon dioxide discharged is calculated by the volume of energy consumed by plants/sites
- : Volume of sulfur oxides and nitrogen oxides is calculated by the concentration of each substances discharged from the boiler outlets at the plants/sites

### Collection, reuse, recycle

Collected volume	919 tons
Resource reuse and recycling rate	92 %