

Environmental Management

Environmental Accounting

The Kyocera Group established an Environmental Accounting System in FY 2003. Since then, we have used it as an environmental management indicator by monitoring the horizontal development of environmental measures, and collecting data by business segment, etc. By introducing quarterly data collection in FY 2005, we now grasp information in a more timely manner and have improved the accuracy of our data.

We will continue to expand the application range of the system and use it as a global environmental management indicator.

Range of data collection: 1. Sites collectively certified for the Kyocera Group Integrated Environmental Management System — 205 sites (refer to page 81)
 2. Dongguan Shilong KYOCERA Optics Co., Ltd. (China), Shanghai KYOCERA Electronics Co., Ltd. (China), AVX Group (19 sites), KII Group (4 sites) — Total of 230 sites

Period covered: April 2006 through March 2007

Guideline for reference: Ministry of the Environment's "Environmental Accounting Guidelines 2005"

Environmental Accounting Analysis Results

The Kyocera Group has introduced consolidated environmental accounting based on the Kyocera Group Environmental Accounting System.

In FY 2007, environmental preservation costs were 2.022 billion yen for the investment amount, and 12.7 billion yen for the expense amount.

The investment amount for FY 2007 was reduced by 2.592 billion yen as compared with that for FY 2006. This is due to the fact that new plants were constructed in FY 2006, resulting in a temporarily elevated investment for pollution control facilities.

The expenses increased by 1.387 billion yen because of the increased depreciation allowance and the running costs of the new facilities, as well as increased research and development expenses, for energy conservation, energy creation, and pollution control measures.

Meanwhile, the economic effects as a result of environmental conservation measures increased by 1.858 billion yen, as compared with last year, including essential measures for the prevention of global warming and the reduction of wastes.

In FY 2006 the economic effects resulting from environmental preservation measures exceeded expenses, excluding research and development costs with the economic effects not allocated, by 215 million yen, allowing us to achieve environmental profitability for the first time. We regard this as the result of our effective environmental protection measures taken to date.

In an analysis by business segment, both the investment amount and expense amount of the businesses related to electronic devices were the highest.

In regard to environmental conservation benefits (cumulative calculations), electricity usage was reduced by installing inverters and improving the operation efficiency of refrigerators, and reducing fuel consumption by introducing centrifugal chillers. These improvements made it possible to increase the effective amount of CO₂ reduction by 20.8% as compared with that in FY 2006.

In the category of reducing waste, the effective amount of waste reduction increased by 10.0% as compared with that in FY 2006, due to the introduction of nitric and hydrofluoric acid waste liquid treatment equipment, changing waste plastics to valuable materials, etc.

For environmental conservation benefits (gross amount), there were more increased items than in FY 2006, but eleven out of the thirteen items were improved on a unit per sale amount.

The main measures for reduction in environmental impact for FY 2007 included reduction of greenhouse gases through the introduction of centrifugal chillers and environmental conservation through a closed system for wastewater containing cyanogens.

We will continue to promote such positive environmental conservation measures.

Concept of Consolidated Environmental Accounting

Double reporting of internal transactions is prevented in companies subject to data collection. For group companies with an equity ratio of other than 100%, data collection is performed by regarding the investment amount, expense amount, and environmental conservation effects as 100%.

Concept of Environmental Conservation Costs

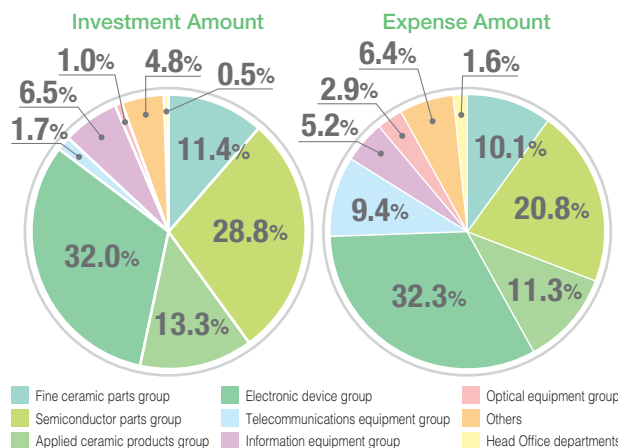
For environmental conservation facilities, the investment amount and running costs are totalled. For environmental conservation activities, expenses accruing from such activities are computed.

Concept of Environmental Conservation Effects and Economic Benefits

The economic benefits of environmental conservation efforts are computed only for cases in which there is clear, quantifiable evidence of the improvement on environmental conservation.

Economic impact resulting from environmental preservation measures on research and development costs are not calculated.

Analysis by Business Segment



Environmental Conservation Costs

(Unit: Million yen)

	Investment		Cost		Main Measures	Appropriate Page
	FY 2007	FY 2006	FY 2007	FY 2006		
Business area costs	1,364	3,299	6,313	5,660		
Pollution prevention costs	771	1,687	3,206	2,988	Introduction and maintenance / management of pollution prevention equipment, Measurement and analysis of environmental load	P56, 67
Global environmental conservation costs	430	961	799	525	Introduction of energy-saving devices, Greenhouse gas reduction activities	P69-71
Resource recycling costs	163	651	2,308	2,147	Resource-saving activities, Introduction and maintenance / management of waste recycling equipment	P65-66, 72-73
Upstream / downstream costs	—	—	264	357	Responding to green procurement, Collection and recycling of used products	P63-64
Management costs	77	49	1,026	1,056	Improvement and application of the environmental management system, Coping with PRTR	P50-56, 68
R & D costs	581	1,266	5,071	4,225	Product development contributing to environmental conservation	P59-63, 76
Social activity costs	—	—	20	8	Co-sponsored donations for environment-related associations, Environmental classes on site	P74-75
Environmental remediation costs	—	—	6	7	Cleanup and monitoring of groundwater	P56
Total	2,022	4,614	12,700	11,313		

Economic Effects of Environmental Preservation Measures

(Unit: Million yen)

	Amount of Money		Main Matters
	FY 2007	FY 2006	
Income	3,225	1,814	Selling of valuable properties
Cutting costs	4,619	4,172	Reduction in electric expenses, Reduction in fuel expenses, Reduction in waste disposal costs
Total	7,844	5,986	

Cost-effectiveness

(Unit: Million yen)

	FY 2007	FY 2006
Expense amount excluding research and development costs (1)	7,629	7,088
Economic effects resulting from environmental preservation measures (2)	7,844	5,986
Cost-effectiveness (2 - 1)	215	△ 1,102

Environmental Conservation Effects (Cumulative Calculation)

Effect Content	Annual Effect			CO ₂ equivalent	CO ₂ Reduction Effect			
	FY 2007	FY 2006	Unit		FY 2007	FY 2006		
Reduction of electricity	77,954	71,852	MWh	→	Amount of reduction	73,977 Ton-CO ₂	61,260 Ton-CO ₂	
Reduction of fuel	8,507	5,505	Kℓ (Crude oil equivalent)			Monetary equivalent	117 million yen	97 million yen
Reduction of greenhouse gases such as PFC	25,572	22,075	Ton-CO ₂					
Reduction of water usage	40,315	39,910	1,000 m ³					
Reduction of chemical substances	12,795	12,627	Ton					
Reduction of waste	36,463	33,157	Ton					

¥1,585/ton-CO₂ is used as the monetary equivalent of the CO₂ reduction effect. (The EU emissions trading average price for the whole financial year of 2006 is employed.)

Environmental Conservation Effects (Gross Amount)

		Unit	FY 2007	FY 2006	Total Environmental Conservation Effects	Benefit of Environmental Conservation Effects per Net Sales*1	
Environmental conservation effects concerning resources used for business activities	Total input of energy	GJ	17,025,100	16,568,377	△ 456,723	7.6%	
	Input energy by type	Electricity	MWh	1,461,307	1,411,569	△ 49,738	6.9%
		Fuel	Kℓ (Crude oil equivalent)	68,640	69,471	831	11.1%
	Handled volume of materials subject to PRTR	Ton	5,434	4,609	△ 825	△ 6.1%	
Environmental conservation effects concerning environmental impact and waste discharged by business activities	Input water resource	m ³	11,449,098	10,820,175	△ 628,923	4.8%	
	Greenhouse gas emissions	Ton-CO ₂	749,690	717,315	△ 32,375	6.0%	
		CO ₂	Ton-CO ₂	746,673	713,985	△ 32,688	5.9%
	Greenhouse gas emission by type	PFC	Ton-CO ₂	3,017	3,330	313	18.5%
	Release / transfer of materials subject to PRTR	Ton	380	286	△ 94	△ 19.4%	
	Total discharge of industrial waste	Ton	28,794	27,739	△ 1,055	6.6%	
	Total drainage volume	m ³	7,301,672	6,856,782	△ 444,890	4.2%	
	NOx emission	Ton	65.8	74.7	8.9	20.8%	
SOx emission	Ton	3.2	7.1	3.9	58.8%		

Note: Since the range of data collection of environmental conservation effects (gross amount) is adjusted to the range of data collection of environmental conservation costs, they are different from the total values on other pages.

*1: Indicates environmental conservation effect values by percentage change per sales amount of 100 million yen in FY 2007 and FY 2006. (Benefit Per Net Sales)

Major Greenhouse Gas Reduction Measures

Plant Name	Subject	Summary	Investment Amount	Effects Expected (annually)	
				Reduction	Economic Effects
Shiga Yohkaichi Plant	Introduction of centrifugal chillers	Reduction of CO ₂ by high-efficiency centrifugal chillers	43 million yen	1,461 ton-CO ₂	13 million yen
Kagoshima Sendai Plant			192 million yen	9,797 ton-CO ₂	158 million yen
Sendai Office, KYOCERA SLC Technologies Corp.			55 million yen	3,728 ton-CO ₂	62 million yen
KYOCERA KINSEKI Yamagata Corp.			27 million yen	611 ton-CO ₂	13 million yen

Major Environmental Conservation Measures

Plant Name	Subject	Summary	Investment Amount	Effects Expected (annually)	
				Reduction	Economic Effects
Shanghai KYOCERA Electronics Co., Ltd.	Introduction of wastewater treatment facility	Cyanogens (closed system) wastewater treatment equipment	78 million yen	Discharge of cyanogens 700g	—
Kagoshima Sendai Plant	Introduction of nitric and hydrofluoric acid treatment facility	Waste liquid treatment by absorption of chemical substances	51 million yen	Amount of discharged material 96 tons	4.8 million yen