

● Using Environmental accounting system

The Hitachi Chemical Group has introduced an environmental accounting system based on the Ministry of the Environment's Environmental Accounting Guidelines, and publishes the outcomes produced by the system. We systematically and effectively allocate management resources to environmental

activities based on the results of environmental accounting for each fiscal year, working at the same time to make our environmental investments and environmental activities more efficient and realize continuous environmental improvements.

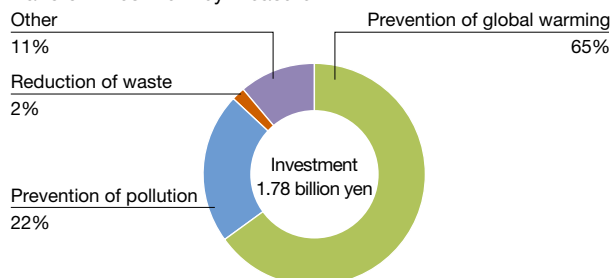
Environmental protection costs

Category	Costs (100 millions of yen)		Main details
	FY2009	FY2010	
1. Total costs	100.4	96.6	
Direct costs for production	44.1	39.8	Maintenance and management costs, depreciation costs, etc. for equipment to reduce environmental burden
Upstream/downstream costs	2.8	1.5	Green procurement costs, recycling-related costs, etc.
Management activity costs	7.9	7.5	Costs for environmental managers, operating and maintenance costs for environmental management system, etc.
Research and development costs	43.4	46.8	Costs for research and development and product design for reduction of the environmental burden of products and manufacturing processes
Social activity costs	0.7	0.7	Costs for environmental improvements such as greenification and beautification
Environmental damage costs	1.5	0.3	Costs for environment-related measures, and environment-related contributions and charges
2. Environmental investment	6.2	17.8	Investments in equipment that directly reduces environmental burden (energy-saving equipment, etc.)

Economic effects of environmental accounting

Details of effect	Economic effect (100 millions of yen)	
	FY2009	FY2010
Energy conservation	3.0	3.2
Increased yields	21.0	16.8
Recycling of waste products	6.3	5.8
Other	6.8	6.1
Total	37.1	31.9

Ratio of investment by measure



Topics

Initiatives for the protection of ecosystems

Hitachi Chemical participates in the World Business Council for Sustainable Development (WBCSD), and has pursued initiatives for the protection of ecosystems since fiscal 2007.

From fall 2009 to summer 2010, we conducted a trial evaluation of our copper-clad laminates as a road tester for the Guide to Corporate Ecosystem Valuation (CEV¹; a guide for the quantitative evaluation of the relationship between ecosystem services and companies) developed by the WBCSD and Environmental Resources Management (ERM). This is part of an initiative to introduce the CEV to a variety of actual company activities, which is being conducted in collaboration with 13 other global companies.

In this trial evaluation, R&D, CSR and environmental safety divisions collaborated, also taking advice from outside experts, in evaluating the cost of CO₂ emissions in the production process from use of raw materials to completion of product. The purpose was to seek a more sustainable manufacturing method, controlling CO₂ emissions by changing the energy used in the manufacturing process, and to quantitatively evaluate and verify the impact of

the manufacturing process on ecosystem protection. Having achieved these goals, we compiled a study concerning the types of investment that would enable us to reduce CO₂ emissions, and published the results as a CEV test case study.

We also supported a business dialogue held by the WBCSD, the IUCN² and Japan Federation of Economic Organizations at the 10th meeting of the Conference of the Parties to the Convention on Biological Diversity (COP10) in October 2010.

In April 2011, a press release concerning CEV was issued in Geneva. The Hitachi Chemical Group intends to increase its focus on CEV-related activities in the future.



CEV press release

*1 CEV: Guide to Corporate Ecosystem Valuation

*2 IUCN: International Union for Conservation of Nature