For the Environment

The Asahi Holdings Group complies in good faith with the demands of its customers and society in order to fulfill its responsibilities as a sensible corporate group.

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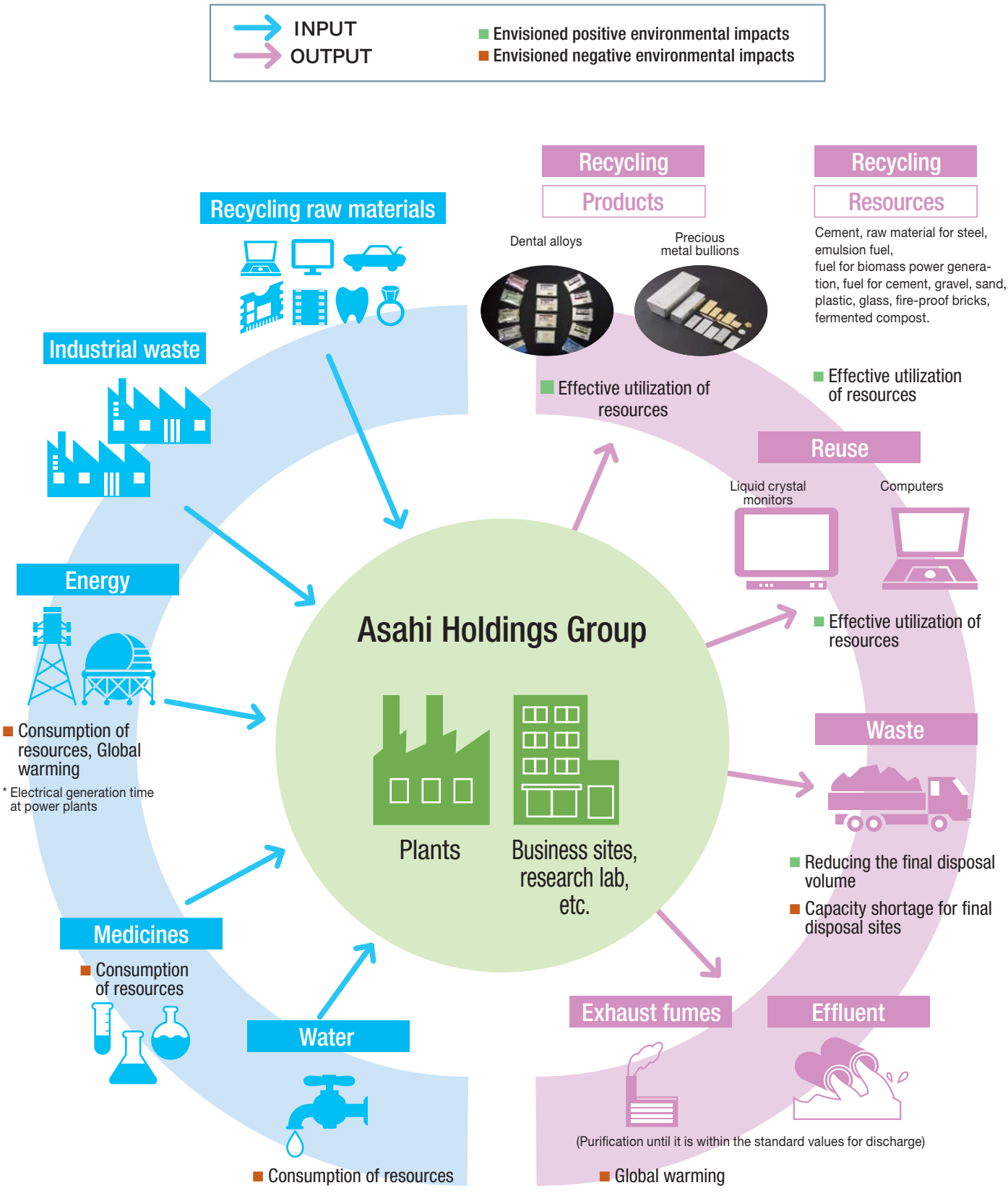
ENVIRONMENTAL IMPACT RESULTING FROM BUSINESS ACTIVITIES

We are expanding business activities on the recycling of precious metals and environmental preservation, thereby contributing to the protection of the earth's environment



Environmental Performance

The energy, resources (water), chemicals, and etc, used in our environmental preservation, precious and rare metal recycling business activities are listed as "INPUT" data, while the environmental burdens given off from performing business activities with the substances are listed as "OUTPUT" data.

The volume of CO_2 emission has been decreased by reviewing the production efficiency and the disposal process, while we have expanded our business through M&A and have launched new business projects.

INPUT

	Unit	FY2008	FY2009	FY2010	FY2011	FY2012
Electricity	MWh	23,167	21,674	24,097	23,816	22,669
Heavy oil	kl	2,406	1,466	1,465	1,192	891
Kerosene	kl	547	379	440	440	451
Light oil	kl	2,852	2,965	3,216	3,200	2,667
Gasoline	kl	804	848	899	914	883
Urban gas	1,000 m^3	684	527	64	27	13
LPG	t	18	17	20	22	19
Water	1,000 m^3	366	345	378	364	336
Chemical, etc.	t	17,347	13,293	13,189	14,191	13,319

OUTPUT

	Unit	FY2008	FY2009	FY2010	FY2011	FY2012
CO_2 emissions	t	28,050	24,327	24,798	23,683	25,835
Effluent*	1,000 m^3	245	208	246	251	217
Waste	t	20,886	16,644	16,249	17,719	16,174

*Purified until it is within the standard values for discharge.

Environmental Accounting

For the promotion of environmental management, we have introduced environmental accounting starting in FY2005 and publicly disclose costs related to environmental protection. These are prepared in line with the Environmental Accounting Guidelines of the Ministry of the Environment.

● FY2012 Environmental Preservation Costs

(Unit: million yen)

	Category	Major Initiatives	Expenses	Investments
1. Cost within business areas	(1)Cost of preventing pollution	Control and maintenance of gas emission facilities, water drainage, and etc.	376.33	75.45
	(2)Cost of protecting the earth's environment	Energy conservation activities (power-saving, improvement of fuel-efficiency for vehicles, and etc.)	12.74	49.30
	(3) Cost of recycling resources	Entrustment of industrial waste treatment	150.75	0.00
2. Cost of upstream and downstream		—	0.00	0.00
3. Cost of management activities		● SO14001 management activities ● Disclosure cost of environmental information	69.34	0.00
4. Cost of research and development		● Improving efficiency for the precious metal refining process ● Decreasing the volume of landfill disposal	67.53	0.00
5. Cost of social activities		Clean up activities in the neighboring communities	2.53	0.00
6. Cost of handling environmental damages		—	0.18	0.00
Total		—	679.40	124.75

GLOBAL WARMING PREVENTION EFFORTS

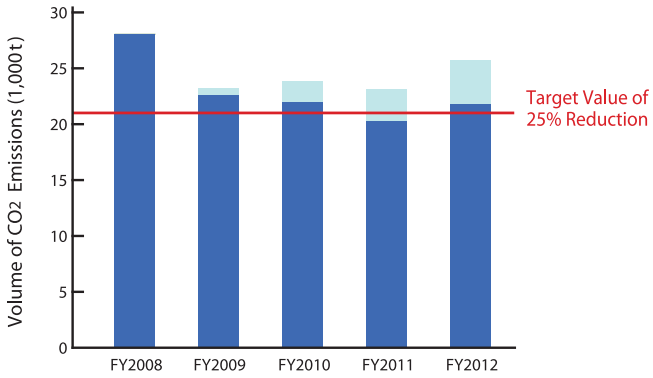
Target: Cutting GHG* emissions by more than 25% by 2020 from a 2008 base of 100

* Energy source CO_2 determined in the Global Warming Countermeasures Law

Major Actions

① Effective use of waste (alternative use for fossil fuels)
② Renewal to energy efficient equipment, facilities and buildings
③ Effective use of waste heat from incinerators
④ Expansion of use of waste fuels

● Greenhouse Gas Emissions (Energy sources : production, transportation and offices, etc.)



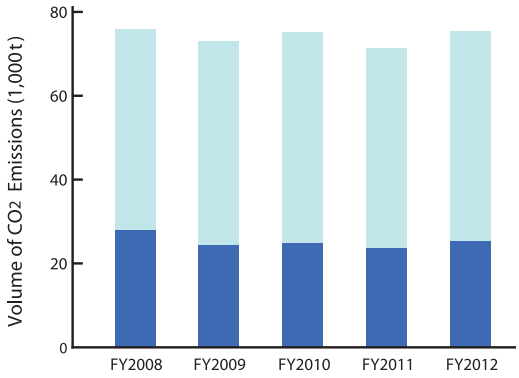
The usage of electricity and fossil fuels was lower than the previous year, while CO2 emission was 5.4% higher than the previous year at our offices* setting targeted values for greenhouse gas emission reduction. Compared to FY2008, CO2 emission reduced by 23.5%, though it was the slight shortage of the targeted values. It is because that CO2 emission coefficient, which was announced in November 2011, was raised largely and electricity-derived CO2 emission increased. FY2012 CO2 emission coefficient, which was calculated by the pre-revised emission coefficient, announced in January 2012, 31% down from FY2008.

* Targets are business lines at offices, which were operated at the time of FY2008

GHG emission volume for reduction target

GHG emission volume in relation to increases in our number of business sites

● Greenhouse Gas Emissions (Net emissions*: production, transportation and offices, etc.)



Group-wide CO2 emission, together with energy source CO2 and non energy source CO2, increased by 8.2%. It is because non energy source CO2 emission increased by 8.9%, coupling with swelling the incineration amount of wastes.

Net Emission of Energy Source CO_2

Net Emission of Non Energy Source CO_2

* Calculation of Greenhouse Gas Emission Volume (comply with Law Concerning the Promotion of the Measures to Cope with Global Warming)
[Energy Origin CO_2]=[CO_2 released in connection with use of electricity and fossil fuels]
[Net Emissions]=[Energy Origin CO_2]+ [CO_2 released in connection with incineration of industrial waste]

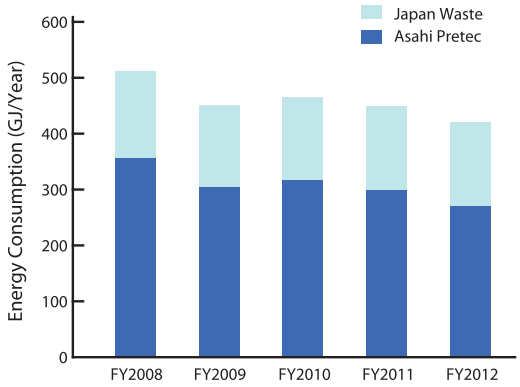
● Installation of Solar Power Generation System

Photovoltaic module (Amagasaki Plant at Hanshin Business Office)

Asahi Pretec Corp. installed a solar power generation system with a generation capacity of 20kW at Technical Research Center in January 1998 and at Kobe Office in September 2001. Recently we have set up a solar power generation system with 100kW capacity on the roof of Amagasaki Plant at Hanshin Office. We will launch a new business selling all the electric power to Kansai Electricity Co., Inc. There is a concern of power supply shortage in summer and winter season within the jurisdiction of Kansai Electricity Co., Inc. We will make contribution to our society through the new solar power generation business.

ENERGY-SAVING EFFORTS

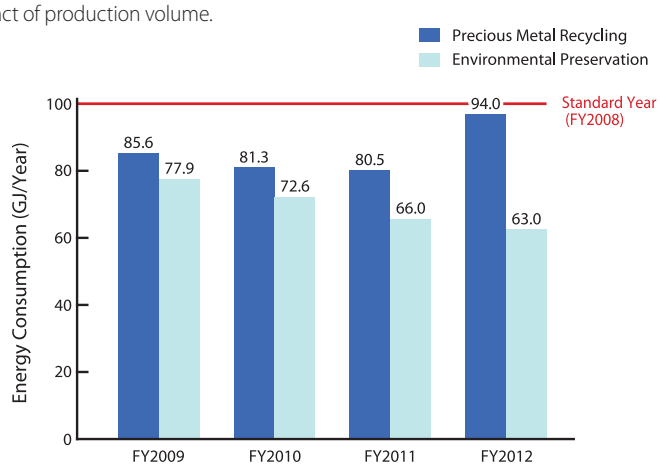
Energy Consumption (production, transportation and offices, etc.)



Group-wide energy consumption decreased by 4.7% year over year. Operating conditions at waste incinerators were improved and we promoted implementation of "saving of energy" by upgrading equipments in the course of precious metal refinery to eco-friendly. At Saitama and Chiba recycling centers, fluorescents and mercury lamps were changed to LED lightning system.

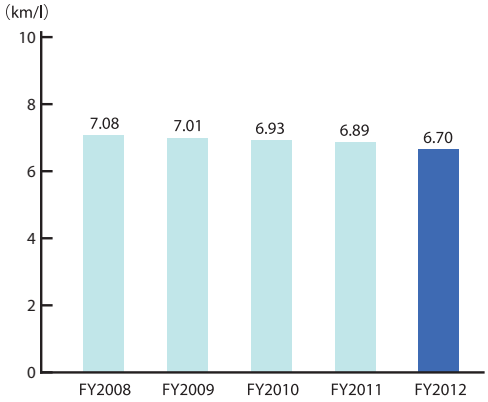
Changes in Specific Energy Consumption compared to FY2008 (Asahi Pretec)

In Environmental Preservation Business, specific energy consumption reduced by 8% due to effective operation of incinerators. In Precious Metal Recycling Business, specific energy consumption was boosted due to impact of production volume.



Vehicle Fuel Consumption (Asahi Pretec)

Eco-friendly drive by utilizing digital tachometer graph has been actively promoted. We make an effort for improving transport efficiency by reviewing the routes for collection. FY2012 vehicle fuel consumption decreased slightly year to year although there were superimposed load increase, which leads to low fuel consumption and auto weight increase by introducing boxy trucks.



Efforts to the Government Request on Power-Energy Saving

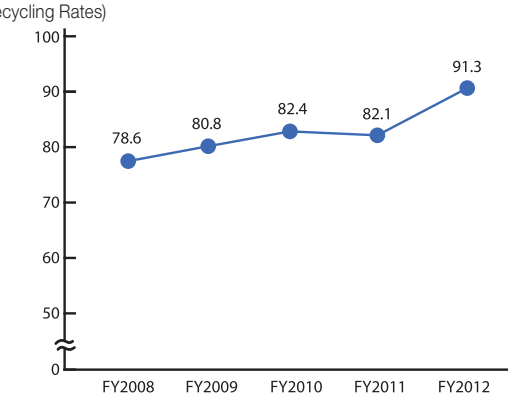
We responded to the energy-saving request from each electric power company, in particular, by optimizing the program for the production equipments, reviewing the operating time and introducing a wide variety of energy-saving devices. Consequently, 10% reduction of the electricity was achieved over the previous year for the summer time request.

LED lighting system on the high ceiling at Saitama RC

Efforts for Improvement of Recycling Rates

Companies in Japan have promoted and made an effort for "Zero Emission", which resulted in decrease of recyclable wastes. Against this backdrop, promotion of using waste oil as alternative fuel and better materials segregation for information equipments, etc. made FY2012 recycling ration 91.3%, improving by 9.2% year to year.

(Recycling Rates)



REDUCTION OF ENVIRONMENTAL BURDEN THROUGH BUSINESS ACTIVITIES

Results of Our Group's Environmental Burden Reduction (FY2012)

We evaluated the major businesses and tasks of the company group to see how much of the environmental burden in the society as a whole has been reduced through our business activities. As the subjects of evaluation, we make calculations in regard to (1) the reduction volume of natural resources, (2) the volume of recycling, (3) the volume of controlled greenhouse gas emissions and (4) the effects of reduction of final disposal in the two business divisions - precious metal recycling and environmental preservation.

Business process / Reduction of environmental burden	Precious Metal Recycling	Environmental Preservation							
		Treatment of effluent	Construction waste recycling	Recycling of glass and fire-proof bricks	Treatment by incineration	Fermenting and composting	Fuel production for energy generation	Freon detoxification treatment	IT equipment recycling
Saving exhaustible natural resources	●		●	●	●		●		
Recycling		●	●	●		●	●		●
Reduction of greenhouse gases	●							●	
Minimization of the final disposal volume			◆	●	●	●	●		◆

Results of reducing the final disposal volume: Covers the quantity by which the volume of waste brought to us (excluding waste oil, waste acids, and waste alkalis) is reduced (the quantity that could avoid controlled landfill disposal) as a result of going through our waste treatment process.

● Calculated by weight
◆ Not targeted for numerical evaluation

Results of Saving Exhaustible Natural Resources

Through recycling all kinds of raw materials, we are cutting back on the amount of natural resources (precious metals, non-ferrous metal ores, gravel, sand, agalmatolite, quartz sand, plaster, forests, etc.) that are being mined or felled, thus contributing to the protection of the global environment.

Precious Metal Ores (Precious Metal Recycling)

Recycling materials containing a lot of precious and rare metals contributes to saving mineral resources, such as precious metal ores.

2,354.4 Kt /year

Gravel (Construction Waste Recycling)

Materials such as sand, gravel and backfill soil are recycled from construction wastes like concrete waste.

26.4 Kt /year

Fossil Fuels (Effective Use of Waste)

By making effective use of waste heat energy (waste oil and plastics, etc.) in an incinerator, fuels (fossil fuels) required for incineration can be reduced.

13.1 Kt /year

Timber (Construction Waste Recycling)

Wood chips made from wooden construction waste are used as a carbon-neutral fuel in place of fossil fuels.

8.5 Kt /year

Recycling (including reuse products)

A variety of industrial wastes are recycled into raw materials and are mainly used to produce the following recycled/reused products:
Wastes used are shown in parentheses "( )".

Glass cullet (bottles, waste glass sheets)

95.9 Kt /year

Fermented compost (Food wastes, organic sludge)

12.1 Kt /year

Gravel, crushed stone (construction materials)

26.4 Kt /year

Wood chips (Construction scrap wood)

8.5 Kt /year

Non-ferrous metals materials (Liquid waste containing metals)

4.1 Kt /year

Refractory brick paving materials (Furnace waste materials)

3.8 Kt /year

Scrap metals
(Construction metal scrap, OA equipment)

3.9 Kt /year

Fuels/raw materials for cement (Plastic waste, waste oil/liquid waste, wood chips, sludge)

5.1 Kt /year

Clay waste

6.4 Kt /year

Emulsion fuels

2.2 Kt /year

Results of Reducing Greenhouse Gases

123.2 Kt /year

We are making contributions to help reduce greenhouse gas emission through business activities such as the collection of precious metals, glass, fire-proof bricks and CFCs.

● Gold

Amount of CO_2 emitted from mine production — 100

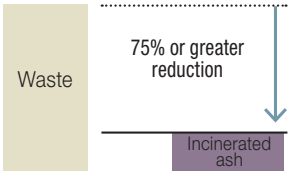
Amount of CO_2 emitted from our company's recycling production — 14

Results of Minimizing the Final Disposal Volume

Waste reduction volume: 32.8 Kt /year

The final disposal volume (landfill disposal) can be reduced by incinerating waste.

Treatment by incineration



TOPICS Awarded for the great contribution to "Eco-ship Modal Shift Project"

Ecomax Co., Ltd. has been making an effort to shift its transportation system to environmentally friendly ocean freight by containers from the traditional land transportation when delivering the No.13 industrial waste to the final disposal site after the concrete solidification treatment. Consequently, Ecomax was accredited as one of the companies who greatly contribute to the "FY2012 Eco-Ship Modal Shift Project", which aims to promote environmental preservation and reduces the effect of environment.

*This project was launched by Maritime Bureau, the Japan Ministry of Land, Infrastructure,Transport and Tourism. Qualified companies may put the Eco-Ship Mark, a recognized quality symbol on their vessels and promote their contribution to environmentally friendly logistics services.


表彰状

エコマックス株式会社 殿

certificate of commendation

ENVIRONMENTAL MANAGEMENT

Environmental Policies

We will contribute to the environmental preservation of the earth and establish a sound material-cycle society through the company's businesses on recycling of precious and rare metals and industrial waste treatment.

(1) In all business activities we will strive to conserve resources and energy and reduce, reuse, and recycle waste to minimize the environmental burden.

(2) We will promote the recycling of resources of precious and rare metals to achieve a more effective use of the limited resources of the earth.

(3) We will adequately and safely perform our operations for the collection, transportation, and treatment of industrial waste to prevent environmental pollution.

(4) We will prioritize a harmonious coexistence with nature and regional communities. We will strictly follow the relevant environmental laws and regulations and other requirements which we recognize.

(5) We will establish environmental objectives and targets and periodically review them to continue improving our activities.

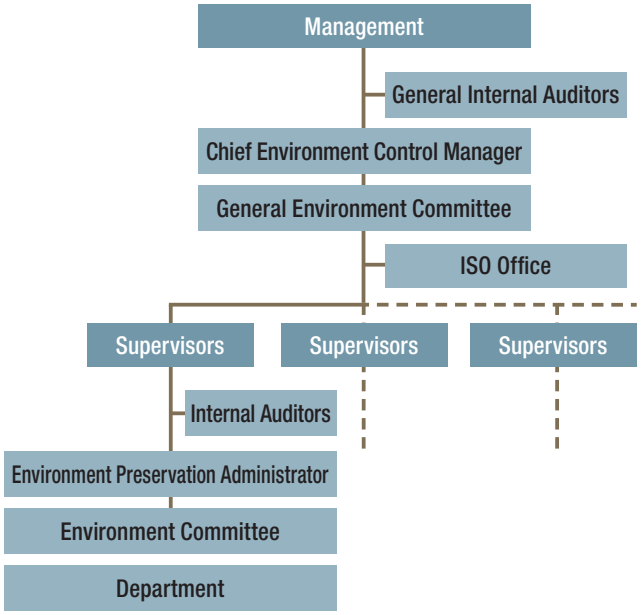
(6) We will educate all our employees and increase their environmental awareness as members of the community, promote their understanding of environmental preservation activities, and participate in such activities.

These environmental policies shall be conveyed to all of our employees and all those working for the company and announced to the public as our commitment.

Environmental Management Promotion System

Our "Company-wide Environmental Purpose/Goal (annual plan)" is devised based on the Environmental Policy that establishes our environmental preservation philosophy.

With this established, the business offices which have acquired ISO 14001 approval, set the "Center Environmental Purpose/Goal (annual plan)" and implement environmental preservation activities closely related to their business tasks. Furthermore, the Environment Committee of each center abides by the regulations set by the environmental law, revises plans and examines environmental education, etc. and provides reports to the management. While the ISO Office controls the environmental management system (EMS), an environmental preservation supervisor is assigned for each business office as an aim to implement thorough promotion of environmental activities.



ISO14001 Approval

Asahi Pretec has newly acquired ISO14001 Certificate at 10 locations in FY2012 and consequently 20 locations of Asahi Pretec have the Certificate.

Consequently, our group companies as a whole have acquried ISO14000 Certificate at 10 companies with 33 locations and continue developing ISO14001 activities.

ISO14001 Authentication Certificate

ISO14001 Environmental Audits

Regular inspections are carried out on the state of compliance with specifications by an external examining authority for ISO14001 activities. Moreover, internal environmental audits are conducted at least once a year at business sites in order to ensure that EMS is being properly administered.

Regular external audit