ENVIRONMENT REPORT

At Meiko, we believe that minimizing the environmental burdens of our business activities is our mission and our responsibility as a company helping to achieve a sustainable society.

Major Activities in 2015

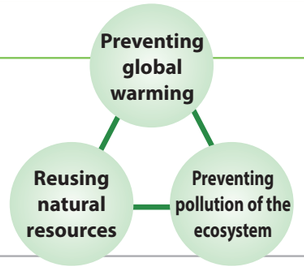
- CO_2 emissions increased slightly compared with the previous year
- Added 16 hybrid cars to the company-owned vehicle fleet
- Maintained a 99% or higher waste recycling rate (Plants in Japan only)
- Employed systems such as our waste exchange system to utilize disused items
- Stayed abreast of the added SVHCs and performed supplier surveys

Future Plans

- Reduce CO_2 emissions by 1% or more
- Promote the replacement of fluorescent lamps with LED lamps
- Strive for 100% waste recycling rate
- Stay abreast of additional restricted substances under the RoHS Directive and perform supplier surveys

Basic Environmental Policy

"Meiko recognizes that protecting the global environment and committing to clean air and water are critical responsibilities that we have for the generations that come after us. We use resources effectively and operate in a way that is compatible with our living environment."



Environmental Action Guideline

Meiko's businesses include the pattern design and manufacturing of printed wiring boards and the manufacturing of metal masks, as well as the development and manufacturing of electronic devices. We consider the implications of these activities for the environment, and emphasize the importance of reducing their impact in terms of prevention of global warming, cyclical use of resources and prevention of contaminating the ecosystem.

In accordance with our basic environmental policy, we fully comprehend the impact our business activities have on the environment. We make every effort to prevent environmental pollution and reduce our environmental footprint through the following measures:

1. We have established a structure for strengthening our environmental conservation activities, and we develop and revise our environmental management system, operate the system appropriately to reduce our impact on the environment, and work continuously to improve both.
2. We contribute to environmental conservation by making efforts to conserve resources and energy, reduce waste, and encourage recycling.
3. We will properly manage chemical substances in products so that the product does not contain harmful chemicals.
4. We properly manage chemical substances contained in our products and make sure our products do not contain toxic chemical substances.
5. We properly manage chemical substances in the production process to limit their usage and reduce their environmental impact.
6. We observe all laws, regulations, ordinances, and other requirements concerning the environment.
7. We set environmental goals and objectives, conduct environmental conservation activities, and strive to improve these activities.
8. We provide training and instruction to all our employees with the aim of instilling a strong awareness of environmental conservation activities in them.
9. We are documenting this environmental policy and distributing it to all our employees, and are also making it available to the public.

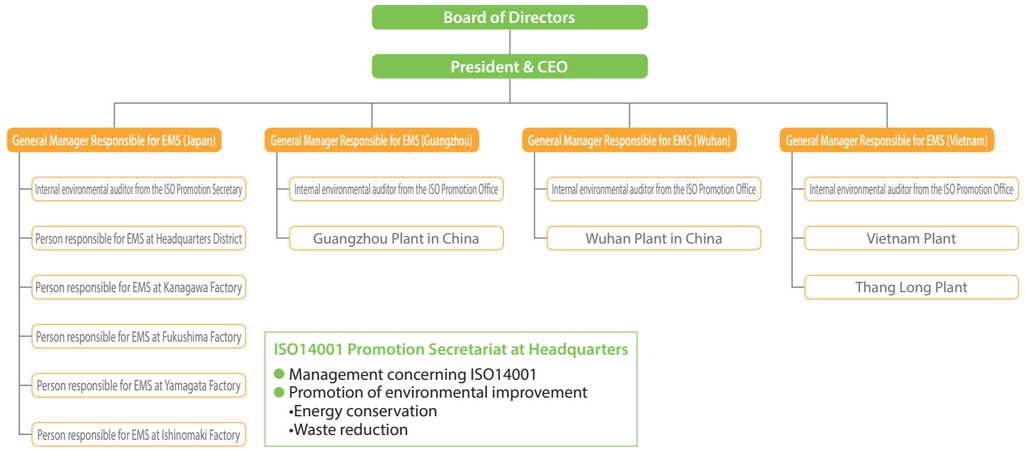
Revised (No. 6) on December 1, 2010
Established on March 6, 2000

President & CEO Yuichiro Naya

System for complying with environmental laws and ordinances

To implement our Basic Environmental Policy, we have established an ISO environmental management system, and have appointed a person responsible for controlling the environmental management system (EMS) at each plant in Japan and overseas. We also strive to protect the environment through CO_2 reduction and zero emissions activities, etc. conducted by the cross-company Energy Saving Committee.

System for furthering Environmental Management



Acquisition of ISO14001 certification

We view ISO14001 as an important standard for environmental management, began to take action toward obtaining certification in Fiscal 2000, and have since continued these initiatives at our plants in Japan and overseas.

Our acquisition of ISO 14001 certification

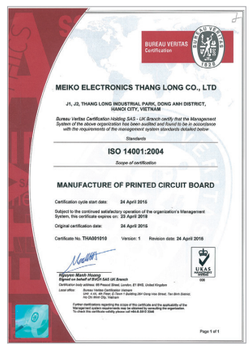
Mar. 27, 2001	Headquarters and Kanagawa Factory
Sept. 25, 2001	Yamagata Factory
Apr. 17, 2003	Extended certification obtained by the Fukushima Factory
Apr. 30, 2003	Guangzhou Plant in China obtained certification
Apr. 22, 2005	Integrated certification obtained by the three Factories in Japan
Apr. 22, 2005	Extended certification obtained by M. D. Systems Co., Ltd.
Apr. 28, 2006	Extended certification obtained by Solder Stencil Dept.
Feb. 20, 2007	Wuhan Plant in China obtained certification
Mar. 26, 2009	Extended certification obtained by Meiko Research and Development Center and Yamato Technology Center
Jun. 18, 2010	Extended certification obtained by Thach That Plant in Vietnam
Jan. 15, 2014	Ishinomaki Branch Factory obtained certification again
Apr. 24, 2015	Thang Long Plant in Vietnam obtained certification

* The factories in Japan obtained certification from Japan Electrical Safety & Environment Technology Laboratories (JET). The plants in China obtained certification from TUV Rheinland. The Vietnam Plant obtained certification from Bureau Veritas Certification (BVC).

ISO14001 Certificate for factories in Japan

ISO14001 Certificate for Guangzhou Plant in China

ISO14001 Certificate for Wuhan Plant in China



ISO14001 Certificate for Thang Long Plant in Vietnam

Complying with environmental laws and Ordinance

Environmental laws and ordinances have been amended due to increasing awareness of environmental impact. We believe that ensuring our compliance with all the amended laws and ordinances of individual regions will lead to our contributing to environmental protection in each local community. In accordance with ISO14001, we identify the laws and ordinances of individual regions that are related to our business activities, and watch for any amendments to ensure full compliance.

Promotion of environmental targets plan

Meiko conducted an assessment of the environmental impact of our corporate activities. As a result, we found that the types of energy that have a significant impact on the environment including electricity, heavy oil, gas, and gasoline. Also closely related to environmental impact are resources such as raw materials, water, and paper, and waste, including plastic waste, sludge, waste acid, and waste alkali. In Fiscal 2015, we reset the benchmark and targets and continued action toward the new targets. We will continue to improve production efficiency and conduct further energy-saving initiatives to achieve steady reductions in per production volume metrics.

General Manager Responsible for EMS / Senior Executive Officer Junya Wada

Based on Meiko's environmental policy, we are taking measures to conserve resources and energy, reduce waste, encourage recycling and properly manage chemical substances contained in products, as well as those in the production processes, to limit their usage and reduce their environmental impact.

These environmental efforts have the best effect when both the tangibles, such as systems and equipment, and the intangibles, such as employees' persistent efforts, work together. Apart from introducing new initiatives, we also encourage the improvement of conventional efforts to produce better results companywide.

The examples of energy-saving improvements presented in last year's CSR report have already been shared with other plants to expand the scope of application. The MEIKO Solar Park Fukushima has been operating favorably since it started power generation.

We will continue to reduce environmental risks to help conserve the global environment and contribute to society as we aim to conduct environmentally friendly manufacturing.

Prevention of Global Warming

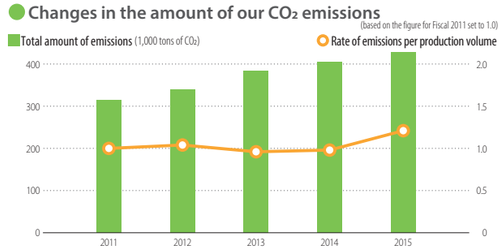
Meiko views the issue of greenhouse gases as a significant threat to our precious earth. Efforts to prevent global warming constitute energy saving activities to reduce the amount of CO_2 emissions generated from energy consumption.

We have formulated and promoted the annual plans and the medium-to-long term plan to reduce the amount CO_2 emissions in accordance with laws and regulations not only in Japan but also in overseas plants, through which we promote global activities to prevent global warming.

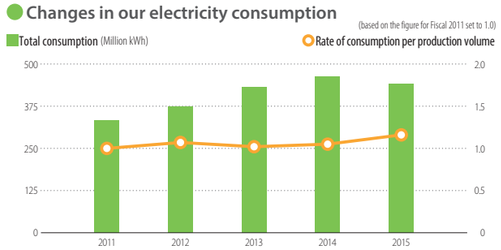
In Fiscal 2015, we could reduce a small amount of CO_2 emissions by the examples of energy saving improvements presented in this report and other similar efforts. We will continue working toward the goal of reducing the amount of CO_2 emissions in accordance with the aforementioned plans by promoting further efforts.

Energy Saving Committee

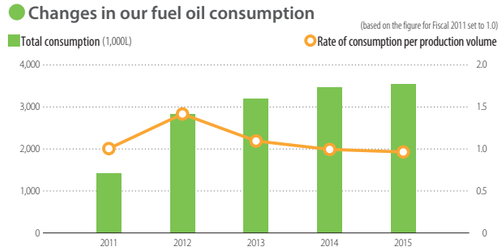
Changes in the amount of our CO_2 emissions



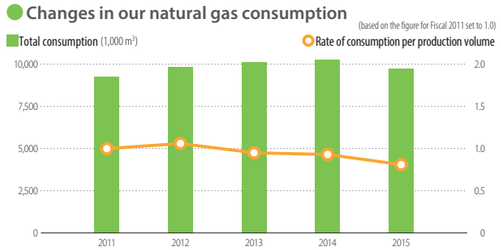
Changes in our electricity consumption



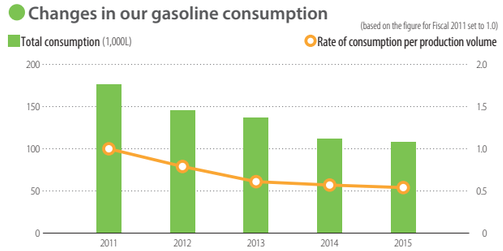
Changes in our fuel oil consumption



Changes in our natural gas consumption



Changes in our gasoline consumption



* Results of the Vietnam Plant and Ishinomaki Branch Factory are included in the data from Fiscal 2012 and Fiscal 2013, respectively.
* Although the volume of energy consumption has recently increased due to growth in production volume, the rate of consumption per production volume remains unchanged.

Examples of energy saving improvements

An example at the Vietnam Plant

Three steam boilers supply steam to the plant.

Although we are already using the system to control the number of boilers in operation and combustion based on the demand for steam, we achieved further reduction of the amount of consumption of fuel by reviewing the pressure control of steam and the number of boilers on standby.

Reduction in CO_2 emissions per year **1,070 tons** (23.5% reduced compared to the past)

Steam boilers

An example at Thang Long Plant

Six compressors supply compressed air to the plant.

Although we used to set the delivery pressure at high for facilities that need high pressure air such as drill machine, we were able to reduce the amount of electric power to operate the compressors by making adjustments to boost pressure at each facility and reviewing the level of air pressure for each facility.

Reduction in CO_2 emissions per year **147 tons** (21.4% reduced compared to the past)

Compressors

Cyclical Use of Resources

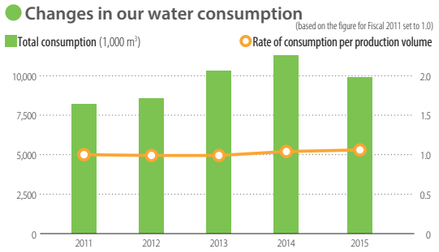
Water consumption

A large amount of water is used in the manufacture of PCBs for cleaning. We have reduced the amount of water used by managing the amount used at each facility and using reverse osmosis (RO) water*.

We continue to carry out efforts to use the minimum amount of water required to maintain product quality in each process and to use discharged water through the introduction of a RO concentrated water system. These efforts have proven effective in achieving reductions.

* RO water refers to water purified using reverse osmosis. It is used for cleaning the PCBs.

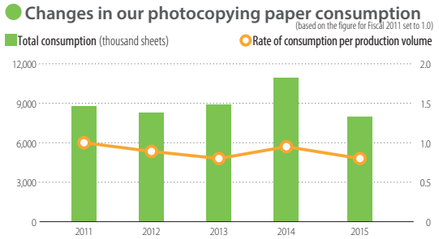
Changes in our water consumption



Paper consumption

We have been making comprehensive efforts by employing electronic media for all company data, eliminating unnecessary copying, and introducing electronic certification system, etc., to help protect forest resources.

Changes in our photocopying paper consumption



Reduction and recycling of waste

We have been reducing waste based on the 3R strategy (reuse, reduce, and recycle). Continuing on from Fiscal 2014, efforts were actively made to recycle waste into valuable resources. The recycling rate of waste, the percentage of waste that was used for purposes other than landfill, exceeded 99% at our plants in Japan in Fiscal 2015.

* "Recycling" above includes thermal recycling
* The recycling rates at our plants in China (Guangzhou and Wuhan) and Vietnam (Vietnam and Thang Long) are excluded.

Examples of waste reduction efforts

Internal resource recovery

We collect resources from some industrial wastes generated in our plants through treatment plants and facilities established within the premises of the Company.

1. Collecting gold from gold plating waste liquid
2. Collecting copper from soft etching waste liquid
3. Collecting copper carbonate and copper sulfate generated from copper collected from etching waste liquid

The cyclical use of resources prevents the exhaustion of natural resources and contributes to the protection of the global environment.

Photo: Soft etching waste liquid processing equipment in Guangzhou Plant.

Preventing pollution of the ecosystem

Measures for Reducing Environmental Burdens

Meiko is aware of the significance of the impact of its plant operations on the local environment and believes it has a duty to reduce these burdens. Specifically, we comply strictly with laws and ordinances for preventing pollution and the standards agreed on with local communities. We are also striving to reduce the total emissions, water consumption, and paper consumption confirmed in accordance with the PRTR Act.

Activities for reducing environmentally hazardous emissions

We control the quality of the water we discharge and the state of the gases we emit into the atmosphere by measuring them on a regular basis to help maintain the local environment. The table below shows the levels of the substances we have emitted from our plants, all of which are below the standard.

Measured values for discharged water quality and atmospheric measurements

Plant name	Water quality					Atmosphere			
		pH	BOD	COD	SS	Equipment	Substance	Soot and dust concentration	Nitrogen oxide concentration (NOx)
Kanagawa Plant	Measurement unit	—	mg/L	mg/L	mg/L	Steam boiler	Measurement unit	g/m³N	v/vppm
	Actual value	7.27	12.6	17.8	—		Actual value	0.0012	59
	Standard value	5.7-8.6	25	25	70		Standard value	0.3 (Air Pollution Control Act)	180 (Air Pollution Control Act)
Fukushima Plant	Measurement unit	—	mg/L	mg/L	mg/L	Steam boiler	Measurement unit	g/m³N	v/vppm
	Actual value	6.65	12.1	9.1	0.9		Actual value	0.0040	58
	Standard value	5.8-8.6	25	25	70		Standard value	0.3 (Air Pollution Control Act)	180 (Air Pollution Control Act)
Yamagata Plant	Measurement unit	—	mg/L	mg/L	mg/L	Steam boiler	Measurement unit	g/m³N	v/vppm
	Actual value	6.80	8.5	8.8	2.0		Actual value	0.0040	63
	Standard value	5.8-8.6	25	160	60		Standard value	0.3 (Air Pollution Control Act)	180 (Air Pollution Control Act)
Ishinomaki Factory	Measurement unit	—	mg/L	mg/L	mg/L	Steam boiler	Measurement unit	g/m³N	v/vppm
	Actual value	6.84	17.1	16.6	3.7		Actual value	0.0120	46
	Standard value	5.8-8.6	25(20)	160(120)	60(50)		Standard value	0.3 (Air Pollution Control Act)	180 (Air Pollution Control Act)
Guangzhou Plant	Measurement unit	—	mg/L	mg/L	mg/L	Boiler	Measurement unit	mg/m³N	mg/m³N
	Actual value	6.98	5.1	74.0	17.0		Actual value	14.3	123
	Standard value	6-9	300	500	400		Standard value	National std: 100 Local std:80	400
Wuhan Plant	Measurement unit	—	mg/L	mg/L	mg/L	Steam boiler	Measurement unit	mg/m³N	mg/m³N
	Actual value	7.01	6.1	21.1	18.0		Actual value	17.2	128
	Standard value	6-9	20	80	50		Standard value	50	400
Vietnam Plant	Measurement unit	—	mg/L	mg/L	mg/L	Boiler	Measurement unit	mg/m³N	mg/m³N
	Actual value	7.16	7.9	16.5	5.1		Actual value	41.8	65
	Standard value	6-9	30	75	50		Standard value	200	850

* The water quality measurement items are partial disclosures of the living environment items of the Water Pollution Control Act.
* The water quality measurement values are average values.

Table showing environmental burdens

At Meiko, we take measures to gain an understanding of the full scope of our environmental burdens. The table below shows our environmental burdens for Fiscal 2015. We will aim to achieve greater by accurately classifying the inputs into energy, water, materials, and chemical agents, and the outputs into atmospheric release, water discharge, waste and resources, and recycling.

Environmental burdens of our business activities

Scope: Headquarters and the 7 major plants **Period**: Fiscal 2015 (April 1, 2015-March 31, 2016) **Outline of business**: Manufacture of PCBs

INPUT

Energy input	Electricity	(MWh)	441,088
	Heavy oil	(kl)	1,128
	Natural gas	(km^3)	9,748
	Light oil	(kl)	2,400
	Gasoline	(kl)	108
Resources	Water	(km^3)	9,884
	Photocopying paper (thousand sheets)		8,015
Chemical substances	PRTR substances	(t)	329

OUTPUT

Atmospheric release	CO_2 emissions	(kt)	429
	NOx emissions	(t)	105
	Soot and dust	(t)	6.3
	PRTR substances	(t)	3.6
Discharge into water table	PRTR substances	(t)	0.21
Chemical substances	Amount of waste generated	(t) (in Japan only)	3,435
	PRTR substances	(t)	18

Management of Chemical Substances Contained in Products

In accordance with our Environmental Action Guidelines, we strictly manage our production process in accordance with our chemical substance control rules that stipulate prohibited substances to ensure that our products do not contain hazardous substances prohibited by the RoHS Directive and other laws and regulations. We request that our business partners submit environmental data such as guarantees of non-use and analysis reports, so that we can properly communicate this information in response to our customers' requests for research.

Management system for chemical substances contained in products

Rules for chemical substances contained in products
* RoHS Directive: An EU regulation on hazardous substances used in electrical and electronic equipment
* ELV Directive: An EU directive aimed at reducing the burden of end of life vehicles (ELV) on the environment
* REACH Regulations: An EU regulation aimed at protecting people's health and the environment Chemical substance

VOICE

Employee's VOICE

The Thang Long Plant began operations in September 2014 after passing the Vietnamese government's environmental assessment. In April 2015, the plant acquired the ISO 14001 certification.

Currently, I am engaged in environment-related jobs which include the operation of wastewater and exhaust treatment facilities, efforts for waste reduction, proper disposal of waste and energy conservation. Through these efforts to reduce the environmental burden, I would like to contribute not only to our plant but also to the betterment of Vietnamese society.

Nguen Ba Cuong
Manager, Production Engineering Section
Thang Long Plant

MANAGEMENT REPORT

To ensure that operations are efficient and appropriate, Meiko has improved its transparency and established a management framework that will earn the trust of its stakeholders, establishing a system that allows audits and internal control to function appropriately.

Corporate Governance

Our organization

At the Meiko Group, the Board of Directors and the Executive Board is the principal decision-making body.

Our auditors audit and check the execution of duties by each Director and Executive Officers in accordance with the policies of our Board of Auditors. The Internal Audit Department improves and expands our internal check system and ensures that corporate governance and compliance function effectively based on the policy for our internal control system.

Corporate Governance Framework at Meiko