

**TOSHIBA**

**2005**  
**[ ENVIRONMENTAL REPORT ]**

**TOSHIBA MEDICAL SYSTEMS CORPORATION**

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## Message

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Toshiba Medical Systems Corporation  
**Masamichi Katsurada, President**

We need to reconsider the conventional disposable-type economic system in order to preserve and utilize the environment effectively. Based on the concept that the invaluable global environment is to be inherited by the next generation in good condition, we are positively trying to address environmental activities for building a sustainable recycling-oriented society.

Since environmental restrictions are becoming stricter worldwide, it is very important that companies implement voluntary environmentally-conscious management and provide products/services as a corporate social responsibility.

In our environmental policy, Toshiba Medical Systems Corporation Group declares that creating environmentally-conscious medical systems is our duty, as we expand our businesses worldwide. We are making efforts to provide environmentally-conscious and patient-friendly medical systems.

As concrete steps, we have been reducing environment-related substances, promoting energy saving, and reducing the total waste discharge in the manufacturing area. As well as "Reduce", "Reuse", and "Recycling designing", we are developing and designing products by taking the environment into consideration, such as reducing power consumption, product weight, and environment-related substances.

In addition to enthusiastic environmental protection activities, we will continue working on global environmental problems as one of the most important business issues.

The environmental report has been issued 5 times now. This report overviews the contents and results of environmental activities by Toshiba Medical Systems Corporation Group in fiscal 2004. We are pleased if you read this report and have a good understanding of our environmental protection activities, and are happy to listen to your opinions.



# Introduction

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Toshiba Medical Systems Corporation Group views global environmental problems as the most important issue in business operation. We are making efforts to reduce environmental impacts over the life cycles of our products. This section outlines the editing policy and coverage of this report detailing our environmental protection activities.

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## ■ Corporate Profile

### Toshiba Medical Systems Corporation

“Pursuing new possibilities of medical systems to meet a wide variety of medical needs”

In order to realize more precise medical treatment, Toshiba Medical Systems Corporation develops, manufactures, sells, and provides technical services for medical systems (including diagnostic imaging systems [such as X-ray systems, CT systems, MRI systems, nuclear medicine systems, and ultrasound systems], radiation therapy systems, biochemical analyzers, and general diagnostic imaging systems).





## Editing Policy

"Environmental Report 2005" of Toshiba Medical Systems Corporation details our environmental protection activities and their results in fiscal 2004 (from April 1, 2004 to March 31, 2005). An environmental report is issued annually and this is the fifth report counting from the old "Environmental Report" of Toshiba Nasu Operations. Based on the "Guideline of Environmental Report" issued by the Ministry of Environment, the company's original contents are included in the report.

## Coverage of the Report

This report covers affiliated companies and in-house companies at the headquarters of Toshiba Medical Systems Corporation, the same as the coverage of review registration for the environmental management system (ISO14001). Note, however, that external affiliated companies such as branches or subsidiaries other than Japan are not included.



### Product Lineup of Toshiba Medical Systems Corporation

- Diagnostic X-ray systems
- Medical X-ray CT systems
- Magnetic resonance imaging systems (MRI)
- Diagnostic ultrasound systems
- Nuclear medicine systems
- Radiation therapy systems
- Biochemical analyzers
- Medical computer systems



◀ The headquarters of Toshiba Medical Systems Corporation is located in a rural area, with a rich natural environment. (Otawara-shi, Tochigi-ken)

Siting environment	
Business offices:	Exclusive industrial district
Neighboring area:	Type two residential area



# Aiming for Harmony with the Natural Environment

## Our Attitude on Environmental Issues

Toshiba Medical Systems Corporation hopes to help people all over the world, not only in Japan, to live healthily through the design, development and support of medical systems.

Based on the Toshiba Group's management philosophy of "respect for people", the environmental policy was specified as one of the CSR activities for conserving and protecting the global and local environments. In particular, our headquarters (Nasu) gained ISO14001 certification at an early stage and is performing further environmental activities.

Accompanying its business reconstruction in October 2003, our company has been expanding its environmental activities. These activities include appropriate management of waste products and materials (such as PCBs), and CO<sub>2</sub> emission management by energy saving as demanded by the Kyoto Protocol, in domestic branches and group companies.

In addition, global environmental activities are also being undertaken for Restriction of Hazardous Substances (RoHS) and Waste Electrical and Electronic Equipment (WEEE).

We are continuously recognizing our stewardship, aiming for coexistence with the global environment and realization of healthy and better lives for people.



Clean water supporting Tanakia tanago, protected species



Headquarters located in a rural area

### Toshiba Medical Systems Corporation Environmental Management

We recognize that providing "environment-conscious medical systems" is a duty and basic managerial commitment for the Toshiba Medical Systems Corporation group, which is expanding its business worldwide. We promote environmental activities, to the extent technically and economically feasible, in accordance with the Toshiba Group's management philosophy, Basic Policy for Environment, and Standards of Conduct agreed by Toshiba and the Toshiba Medical Systems Corporation group.

- (1) The Toshiba Medical Systems Corporation group considers environmental stewardship to be one of management's primary responsibilities. We establish environmental objectives and targets in business activities and environmental issues concerning products/services, review them periodically, and perform appropriate actions at all related stages. Its purpose is to continuously improve the environmental management system and the environmental performance, and to prevent pollution.
- (2) The Toshiba Medical Systems Corporation group complies with all laws and regulations concerning the environment, agreements on pollution prevention, and its own stricter standards.
- (3) The Toshiba Medical Systems Corporation group selectively specifies the following issues to be realized in order to reduce environmental impacts.
  - a) Creating environment-conscious products
  - b) Reducing CO<sub>2</sub> emission by energy saving
  - c) Reducing waste discharge



## History of Environmental Activities

Toshiba Medical Systems Corporation has been implementing pollution-prevention activities since its establishment. To develop environmental protection activities by taking global environmental issues into consideration, we founded environmental-related organizations at an early stage, such as the Environmental Protection Group instituted in 1989.

The headquarters satisfied UK BS7750 (environmental management standards) in March 1996, prior to adoption of the ISO14001 international environmental management system. In the same year, ISO14001 was adopted and the headquarters also gained ISO14001 certification. In May 2005, we received the third renewal review and we are continuously performing environmental protection activities for further improvement.



ISO 14001 certificate

1975	Agreements on pollution prevention were concluded with Otawara-shi and Yaita-shi.
1979	Toshiba Nasu Operations started operating. An advanced biological treatment system (natural purification method) was introduced for wastewater treatment.
1987	Operation of Nasu Electron Tube Works started. The waste water line was separated and a closed system was adopted based on "Plating Facility Guideline Standards" determined by Tochigi-ken.
1989	The Environmental Protection Group was instituted based on Toshiba policy.
1990	Toshiba Group's internal environmental auditing system (EASTER) was established. Nasu Operations received the first audit.
1992	Specified chlorofluorocarbons were fully abolished.
1993	1,1,1-trichloroethane was fully abolished.
1994	NHK reported our environmental protection activities on a TV program.
1996	ISO14001 (environmental management system standards) certification was gained.
1999	A "Factory with Excellent Energy Management" prize was awarded. (Kanto Bureau of International Trade and Industry Manager's prize)
2001	Zero emission of waste was achieved.
2002	The renewal review for ISO14001 certification was carried out and continuous certification was approved. 3Rs(Reduce, Reuse, Recycle) Promotion Council Chairman's prize was awarded.
2003	A "Factory with Excellent Energy Management" prize was awarded. (Director-General of Agency for Natural Resources and Energy Prize) A Prefectural Governor prize for Excellent Pollution Prevention Companies in Tochigi-ken was awarded. Agreements on pollution prevention were concluded again when the company was split into Toshiba Medical Systems Corporation and Toshiba Electron Tubes & Devices.
2004	An Energy Management Contributor's prize was awarded. (Kanto Bureau of Economy Trade and Industry Manager's prize)



## Impacts on the Environment and Our Activities in Fiscal 2004

### Environmental Impacts Caused by Toshiba Medical Systems Corporation

The main factors causing environmental impacts during business activities (development, manufacturing, technical servicing, etc.) are the use of energy, use of chemical substances, discharge of waste water into public water areas, and emission of waste. The environmental impact amounts in

fiscal 2004 are shown in the following flowchart.

Although energy use and waste emission have large environmental impacts, we reduced them by our environmental activities in fiscal 2004. (Refer to "Environmentally-Conscious Business Activities".)

Flowchart regarding environmental impacts



\* Values are the actual measured values.

\* The amount of CO<sub>2</sub> discharge is from boilers etc.

### Third Voluntary Environmental Plan: Evaluation of Results in Fiscal 2004

Based on the slogan "Let's make a pioneering contribution to construction of the recycling-based society!", Toshiba has established and published the Toshiba voluntary plan (mid/long-term Toshiba voluntary environment plans). Toshiba Medical Systems Corporation has also established a voluntary plan to reduce environmental impacts. The following table shows the "target values of the third voluntary plan" of Toshiba

and the "actual values in fiscal 2004" of Toshiba Medical Systems Corporation.

In fiscal 2004, we achieved results which were remarkably higher than the targets for zero emission of waste, reduction in release of chemical substances, and reduction in CO<sub>2</sub> release.

Third voluntary plan	Target values	Result values in fiscal 2004	Evaluation
Zero emission of waste	The quantity of final disposal to be <b>1%</b> or less of total discharge in fiscal 2003	<b>0.2%</b> (Continuously-achieved zero emission from fiscal 2001)	⊙
Reduction in release of chemical substances	<b>30%</b> reduction by fiscal 2005 compared with fiscal 2000	<b>65%</b> reduction (by promoting alcohol substitution, etc.)	⊙
Reduction in CO <sub>2</sub> release (Per production unit)	<b>25%</b> reduction in the ratio of CO <sub>2</sub> release to net sales in fiscal 2010 compared with fiscal 1990	Improved by <b>37%</b> (by promoting adoption of high-efficiency compressors, etc.)	⊙
Green procurement	Exceeds <b>70%</b> for business partners of rank A or more	<b>77%</b> (business partners of rank A or more)	⊙
Application of lead-free soldering	Application to all the products in fiscal 2003	Application has started in X-ray, CT, and ultrasound systems in fiscal 2004	△

⊙ : Very good    △ : Needs further improvement



## ■ Environmental Accounting

Toshiba introduced an environmental accounting system in fiscal 1999 in order to clarify the costs required for environmental activities and their effects, and to utilize them as a guideline for business operation. Calculations were performed using the "environmental protection costs", or the costs used for environmental protection activities in fiscal 2004. The "environmental protection benefits" were also used, which are benefits gained by reducing environmental impacts with environmental activities and the power-saving benefits

when customers use environmentally conscious medical systems compared to conventional systems. As an activity for improving the environmental protection effects in fiscal 2004, the fuel used for boilers was switched from general A heavy oil to LSA heavy oil (sulfur element of less than 0.1%) so that the assumed benefits are improved (refer to the following tables). We will continue to improve our environmental protection activities.

## ■ Environmental Protection Costs

Unit: millions of yen

Classification	Content	Expenditure	Budget for expenditure in fiscal 2004	Total
Business area costs	Environmental impact reduction 1) to 3)	68	153	221
Content	1) Pollution prevention costs	9	60	69
	2) Global environmental protection costs	59	38	97
	3) Resource circulation costs	0	55	55
Upstream/downstream costs	Green procurement, recycling, etc.	0	78	78
Administration costs	Costs of environmental education, environmental protection operation, etc.	0	126	126
R&D costs	Development of environmentally-conscious products	0	868	868
Social activity costs	Greenery, information disclosure, etc.	0	0	0
Environmental remediation costs	Burden charge for air pollution	0	0	0
Total		68	1,225	1,293

## ■ Environmental Protection Benefits

Unit: millions of yen

Classification	Content	Total
Actual benefits	Benefits that can be directly converted into monetary value.	-5
Assumed benefits	Reduction of environmental impacts at the usage phase expressed in terms of monetary value	108
Customer benefits	Benefits concerning reduction in environmental impacts expressed in terms of monetary value	384
Risk prevention benefits	The extent to which risks are reduced after the investment, compared with before the investment, is calculated	0
Total		487

## ■ Breakdown of Actual Benefits

Item	Monetary value of benefits	Amount of reduction in environmental impacts*
Actual benefits	-349 KJ	-8.5 millions of yen
Waste	83 t	3.7 millions of yen
Water	-1 170 m <sup>3</sup>	-0.2 millions of yen
Total		-5.0 millions of yen

## ■ Breakdown of Assumed Benefits

Item	Monetary value of benefits	Amount of reduction in environmental impacts*
Waste water	2.9 t	65 millions of yen
Air	1.2 t	43 millions of yen
Total		108 millions of yen

## ■ Breakdown of Customer Benefits

Item	Monetary value of benefits	Amount of reduction in environmental impacts
Amount of environmental impact reduction (during use)	16,690 thousand kWh	384 millions of yen

\*Indicated in the above table are differences in volumes of environmental impacts between fiscal 2003 and fiscal 2004.

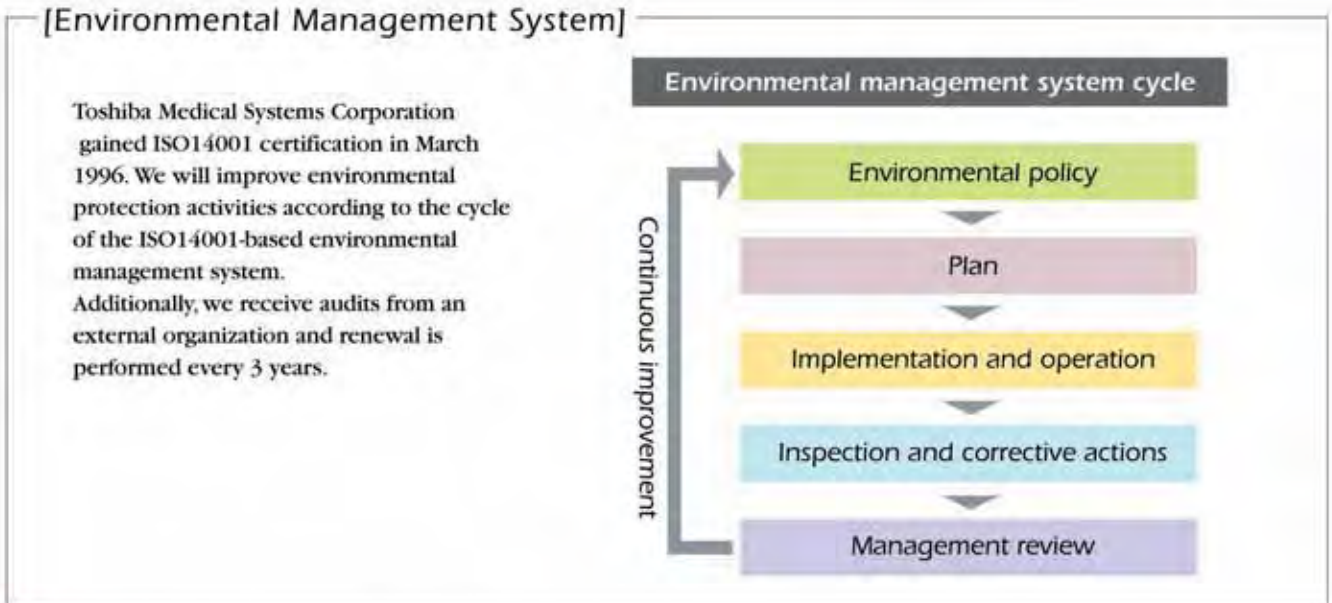
Target companies: Toshiba Medical Systems Corporation  
Headquarters and companies located on-site

Measurement period: April 1, 2004 to March 31, 2005

Measuring method: The environmental protection costs are based on the "Environmental Accounting Guidelines 2005" issued by Japan's Ministry of the Environment. The environmental protection effects were calculated based on Toshiba's original standards.

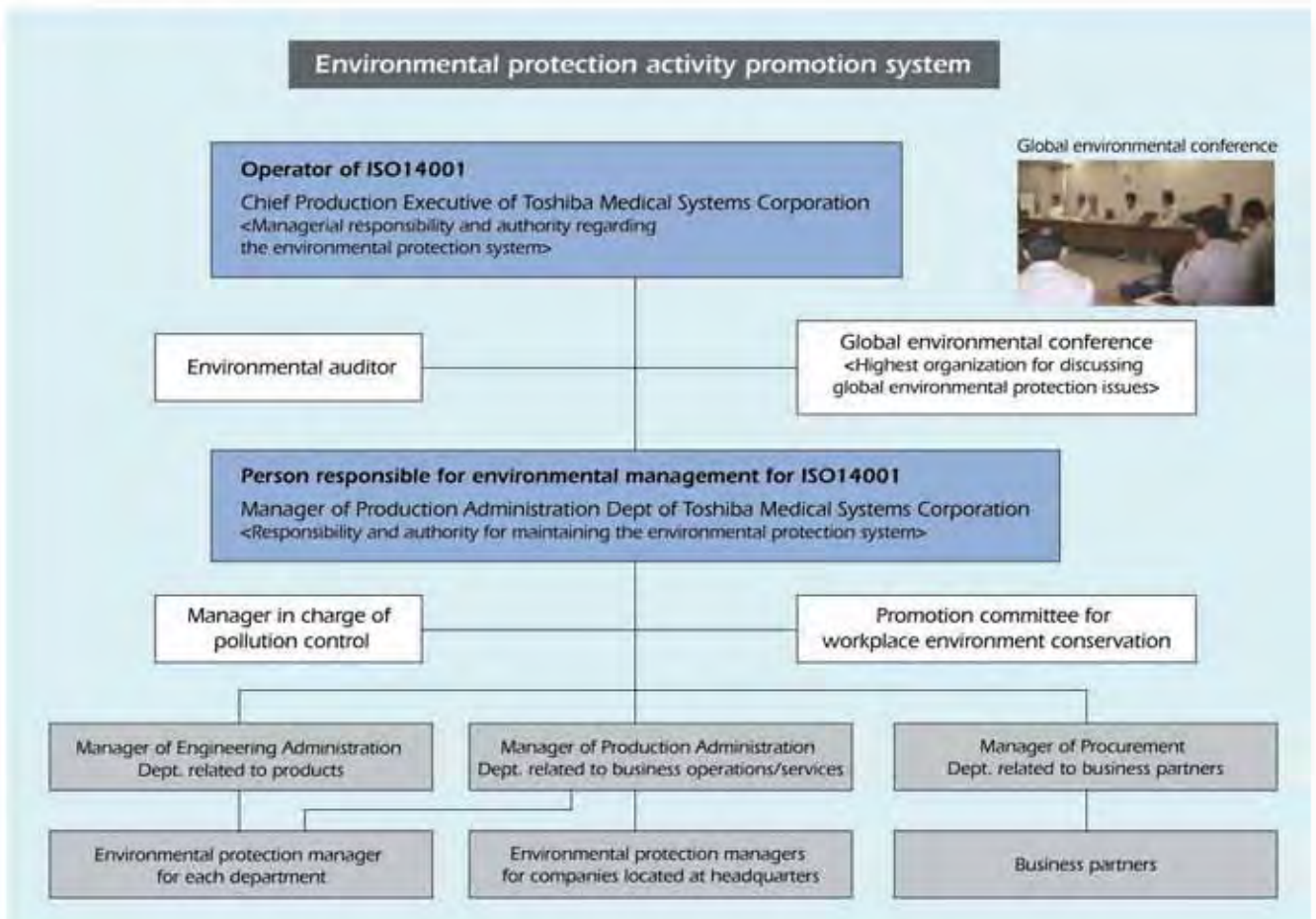


## Environmental Protection Activity Promotion System



### Environmental Protection Activity Promotion System

To achieve continuous improvement in environmental activities, the environmental protection promotion system was established and has been maintained.





## ■ Environmental Audit

Toshiba Medical Systems Corporation implements the periodic 3-phase environmental audit to check whether environmental activities have been promoted properly.

### 1) External audit

The external organization performs an audit based on ISO14001.



▲May 21st, 2004  
[External audit]

### 2) Toshiba environmental audit

Toshiba performs an audit based on EASTER (Environmental Audit System in Toshiba on basis of ECO Responsibility).

(EASTER : Environmental Audit System in TOSHIBA on basis for ECO Responsibility)



▲November 11th, 2004  
[Toshiba environmental audit]

### 3) Internal environmental audit

Toshiba Medical Systems Corporation performs an audit by itself.



▲August 18, 2004  
[Internal environmental audit]

External audits consist of a renewal audit (performed every 3 years) and surveillance audit (performed in intermediate years). In fiscal 2004, we had a second surveillance audit and received a certification of "improved".

With EASTER, Toshiba Medical Systems Corporation has been providing the environmental management system and emphasizing the "5S" rules and "3 Zen (all) 3 Gen (actual)" approach. The "5S" rules specify that organization, management, cleaning, cleanliness, and discipline must be observed, and the "3 Zen (all) 3 Gen (actual)" approach indicates that all employees need to participate in management of all facilities in all areas and the actual situation of items should be checked on-site at workplaces.

## ■ Environmental Training

Toshiba Medical Systems Corporation specified a training system for "Environmental Protection Manual Standards". The purposes of this training are to make people understand the importance of the global environment and management system, and to make people to recognize the necessity of observing laws. The training is performed for all workers including group companies and branches, and workers of affiliated companies at the headquarters. Environmental training by "e-Learning" was adopted in fiscal 2003 and its coverage was expanded to the rank-and-file employees in fiscal 2004. In fiscal 2005, training for environmental-relevant regulations etc. that includes world trends was performed. This will deepen the understanding of environmental protection and help to maintain/improve the environmental awareness level of all workers, and workers of affiliated companies.



### ■ Main environmental training and number of participants (in fiscal 2004)

Target/Training contents	Number of participants
<b>Training according to class</b>	
○ Managers class - Environmental trends inside/outside Japan and ISO14001 requirements - Establishment, operation of the environmental system, and responsibility/authority of each department - Training contents for rank-and-file workers, and other	31
○ All rank-and-file workers - Understanding of environment protection manual standards (ISO14001 requirements) - Roles and responsibility for attaining the environmental policy, purpose, and goal - Significant effects (including possible effects) on environment related to business activities and improvement effects - Estimated effects when procedures other than those specified are performed	4,651
<b>Training according to function</b>	
○ Specified workers and verifiers - Appropriate handling and inspection of the specified facilities - Expected results when an abnormality occurs in the specified facilities and their corrective actions etc.	188
○ Environmental auditors - Outline of environmental trends inside/outside Japan and related laws and regulations - Duty and responsibility of auditors - On-site training and certification tests	13



# Environmental Protection Activity Promotion System

## ■ Laws/regulations observation status

Waste water from the headquarters has been discharged to the class one Houki river, that splits Otawara-shi and Yaita-shi. Toshiba Medical Systems Corporation concluded agreements on pollution prevention with both cities from when we started business in 1979. In the agreements, we specified strict standards for water quality, facility structure, monitoring of water quality by checking the fish status at the final discharge outlet, and monthly reports.

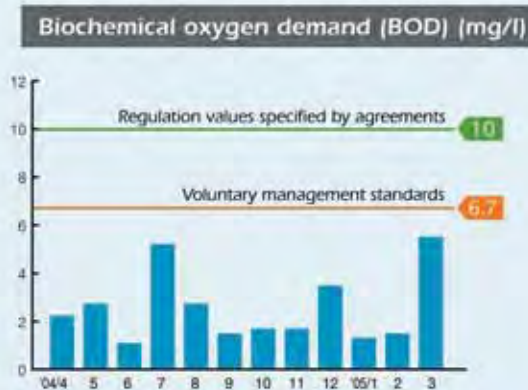
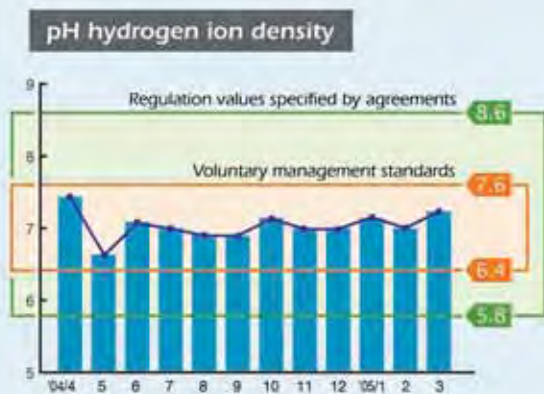
Not only observing the standards specified by laws and regulations, we set more strict voluntary management standards. As the following graphs for the environmental measurement results in fiscal 2004 show all the voluntary management standards for all the items were satisfied. We will change the voluntary management values attained by continuous improvements to more strict target values.



Sampling water at the final discharge outlet by the administration (every 3 months)

## ■ Water quality measurement results (final discharge outlet of the headquarters)

Actual values acquired from April 2004 to March 2005





### Flow of Waste Water Treatment



Waste water treatment plant sand filtration system



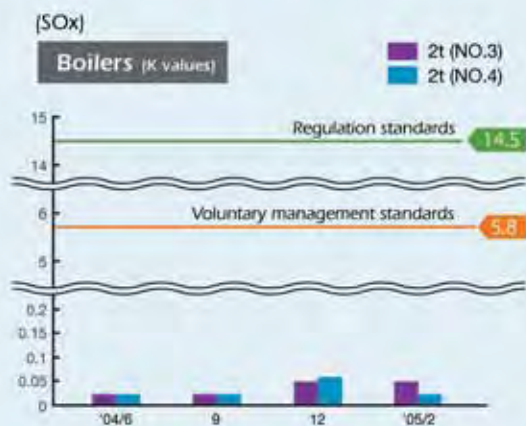
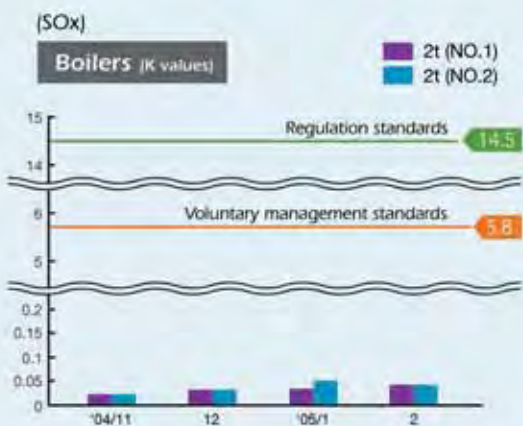
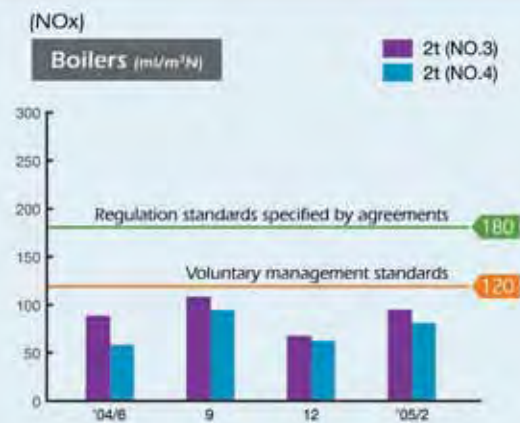
Monitoring using fishes



Emergency cutoff valve at the final discharge outlet

### Waste gas measurement results

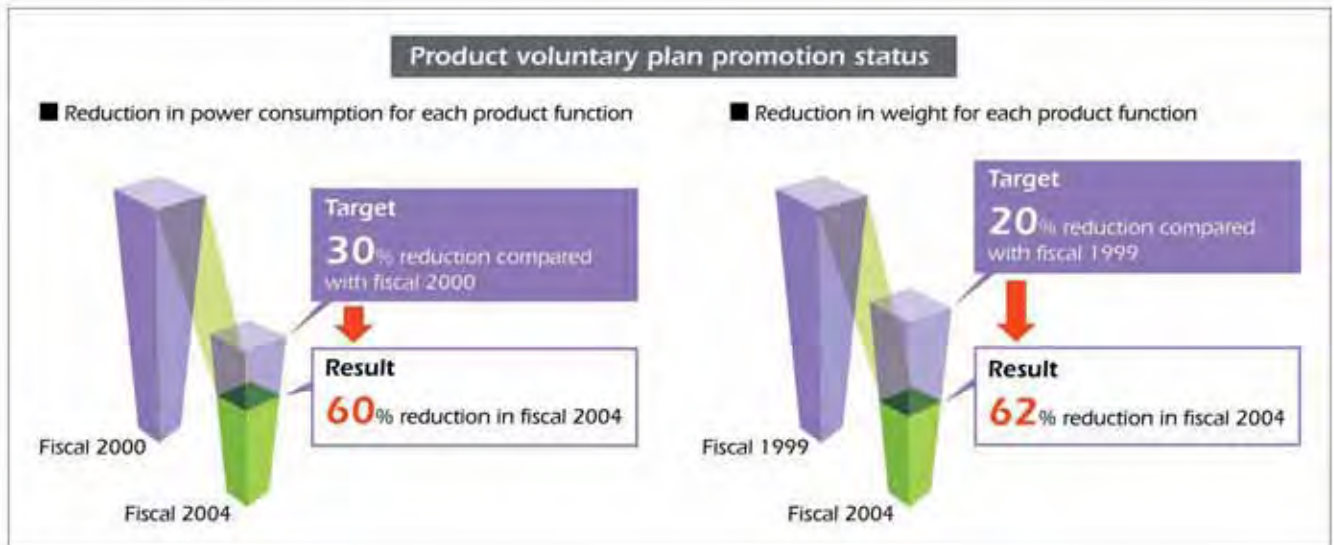
Actual values acquired from April 2004 to March 2005



## Product Voluntary Plans

Toshiba has established product voluntary plans to promote development of ECP. In addition, Toshiba sets its own standards concerning the environment for each product to reduce the environmental impact. We promoted several activities based on the third voluntary plan in fiscal 2004 and attained good results for diagnostic X-ray systems, CT systems, ultrasound systems, MRI systems, and chemical analyzers.

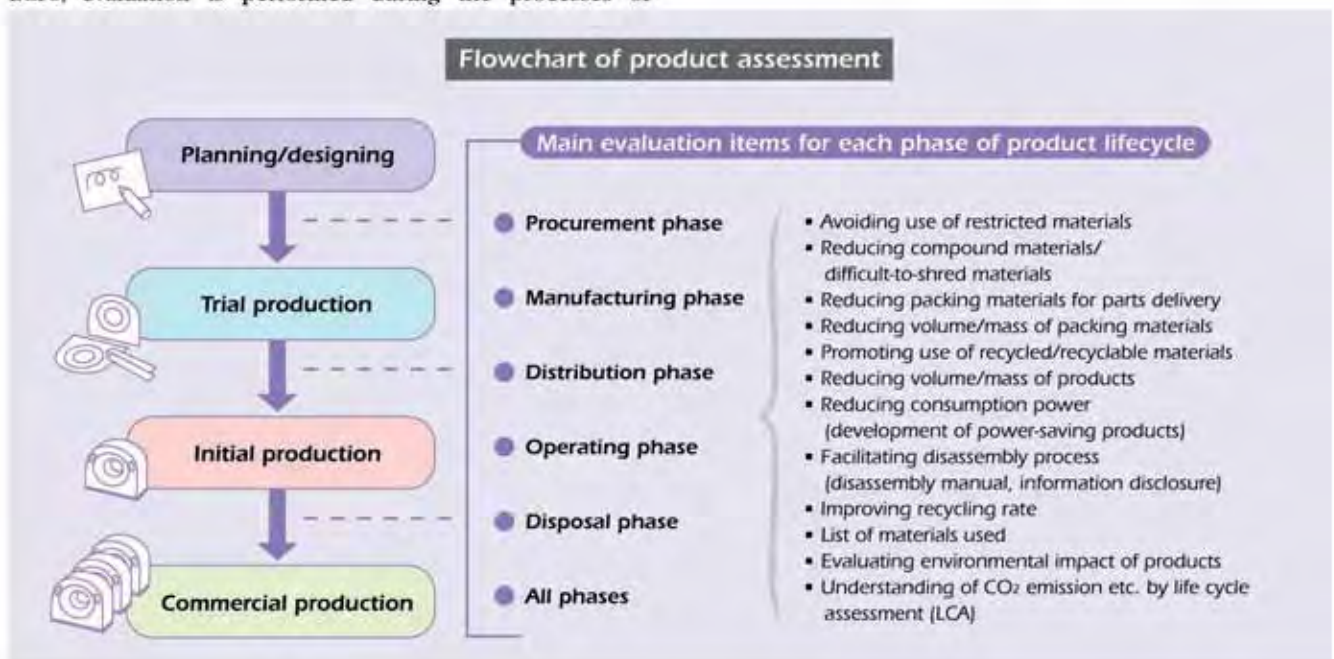
From fiscal 2005, the fourth voluntary plan (fiscal 2005 to fiscal 2010) was established to further consider the global environment, help actualize a recycling-oriented society, and contribute to the local community. To implement the plan, we have set specific goals and continue to develop earth-friendly and patient-friendly products.



## Product Assessment

We perform product assessment based on product voluntary plans. "Product assessment" is a system to evaluate environmental impacts from products in advance. To produce ECPs, evaluation is performed during the processes of

planning/designing, trial production, initial production, and commercial production.





## Environmentally-Conscious Medical Systems

### CT scanners

Related to CT scanners, Toshiba Medical Systems Corporation has been developing new-type units, new user interfaces, and new image reconstruction methods. Since they have reduced the system operating time per patient to less than half, power consumption and mass per function was reduced by 50%. We are also attempting to reduce the patient dose by developing new system software.

#### ■ Resource saving of product



#### ■ Reduction of power consumption



Power saving and resource saving by reducing the system operating time

Power saving and dose reduction by development of new software



### Ultrasound systems

Related to ultrasound systems, power consumption per function was reduced by 33% by introducing a high-speed CPU and reducing the startup time. Additionally, power saving for 33% by introducing a large FPGA and structural design method and consolidating functions. We also stopped using polyvinyl covers and promoted use of lead-free solder in order to reduce environment-related materials.

Power saving by introducing a high-speed CPU and reducing the startup time

Reduction of environment-related materials by introducing lead-free solder

#### ■ Resource saving of product



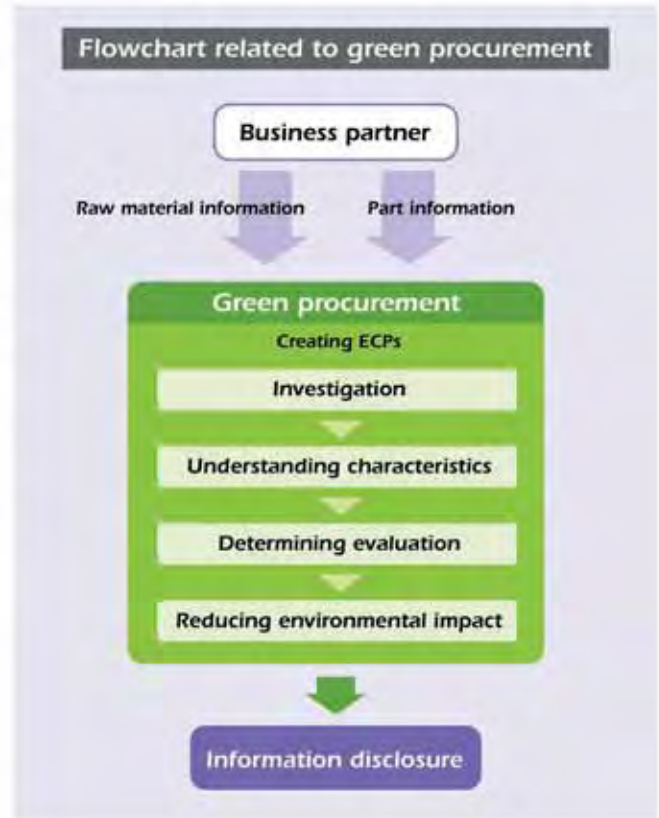
#### ■ Reduction of power consumption



## Green Procurement

Procurement of parts, materials, and raw materials that have small environmental impacts has been promoted to create ECPs. Based on Toshiba's guideline "Green Procurement Guidelines for Products" (revised on June 1, 2003), we are proactively implementing a green procurement process and developing a management system. They will contribute to creation of ECPs and timely information service for the customer (shown in the flowchart on the right). For all the parts/materials of all systems, we are investigating the following environment-related materials in cooperation with our 400 business partners. On the basis of these information items, we are struggling to reduce environment-related materials together with our business partners.

Environmental-related materials	
<b>Rank A</b>	[ Materials where their use is prohibited ] 29 types such as dioxin, PCB (polychlorinated biphenyl), cadmium, hexavalent chromium, mercury, lead, asbestos, and specific CFC
<b>Rank B</b>	[ Substances to be decreased/substituted to reduce environmental impacts, or substances to be retrieved/detoxed by introducing a closed system, etc. ] 18 types such as arsenic, trivalent chromium, and PVC
<b>Rank C</b>	[ Materials whose use amount is to be controlled ] 24 types such as silver compound, bisphenol, and radioactive materials



## R&D Distribution

### Enlarging Modal Shifting

For improvements in transportation in Japan, modal shifting has been enlarged as follows.

1) Reduction in the number of cars by mass transportation

2) Enlargement and fixation of rail container transportation

With these improvements, CO<sub>2</sub> emission and transportation costs can be reduced.



Loading scene and JR (Japan Railways) container





### Produce, Use, Return, and Reuse: Recycle

#### Recycling the Medical Products

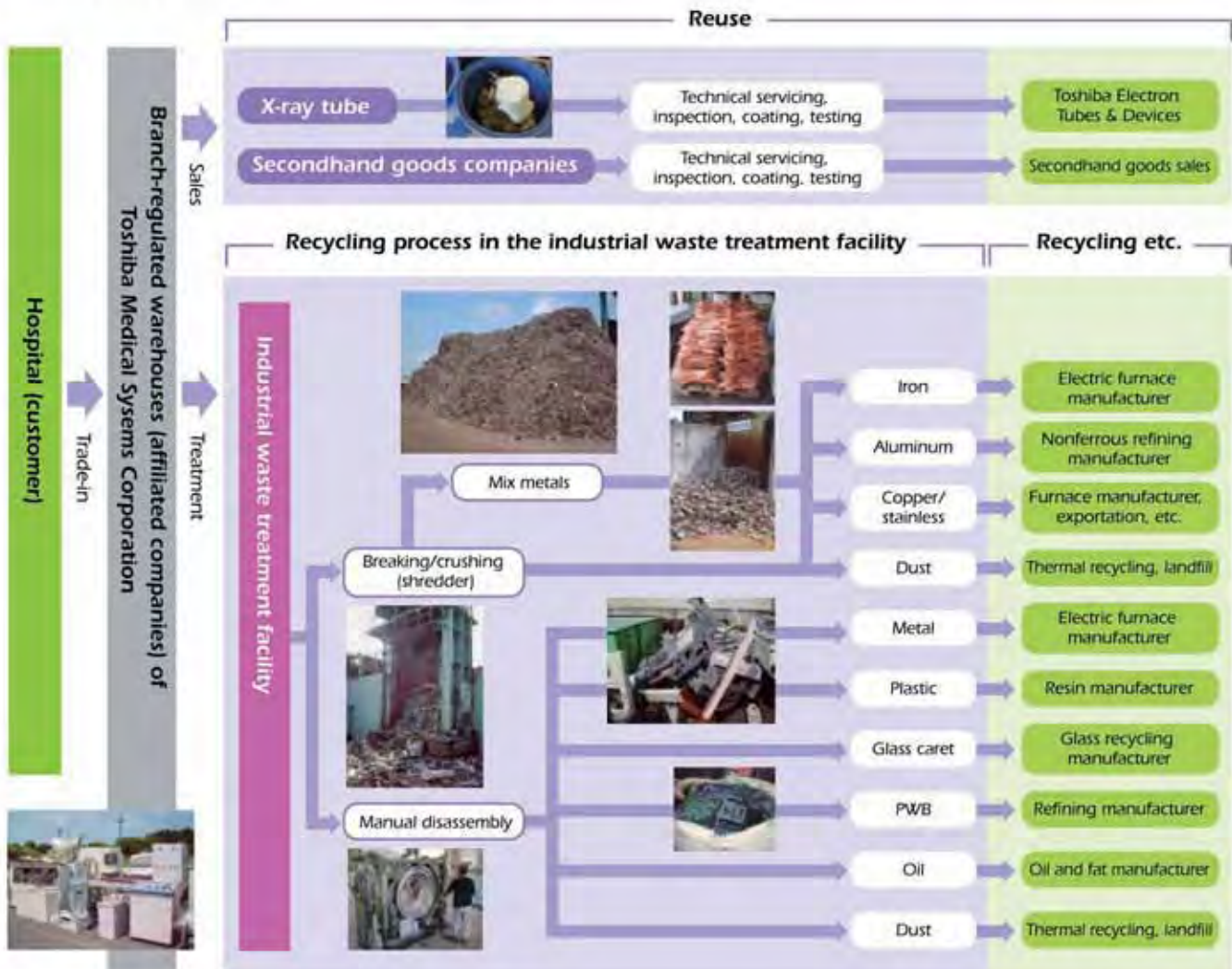
We are recycling medical systems traded-in from hospitals, etc.

The recycling system was started in 1992 and 12 dedicated facilities were established in Japan. At these facilities, traded-in systems are disassembled and separated into component materials (steel, aluminum, plastic, etc.).

For the X-ray tube assembly used in medical systems, some parts are reused after a strict quality check.



#### Recycling Case





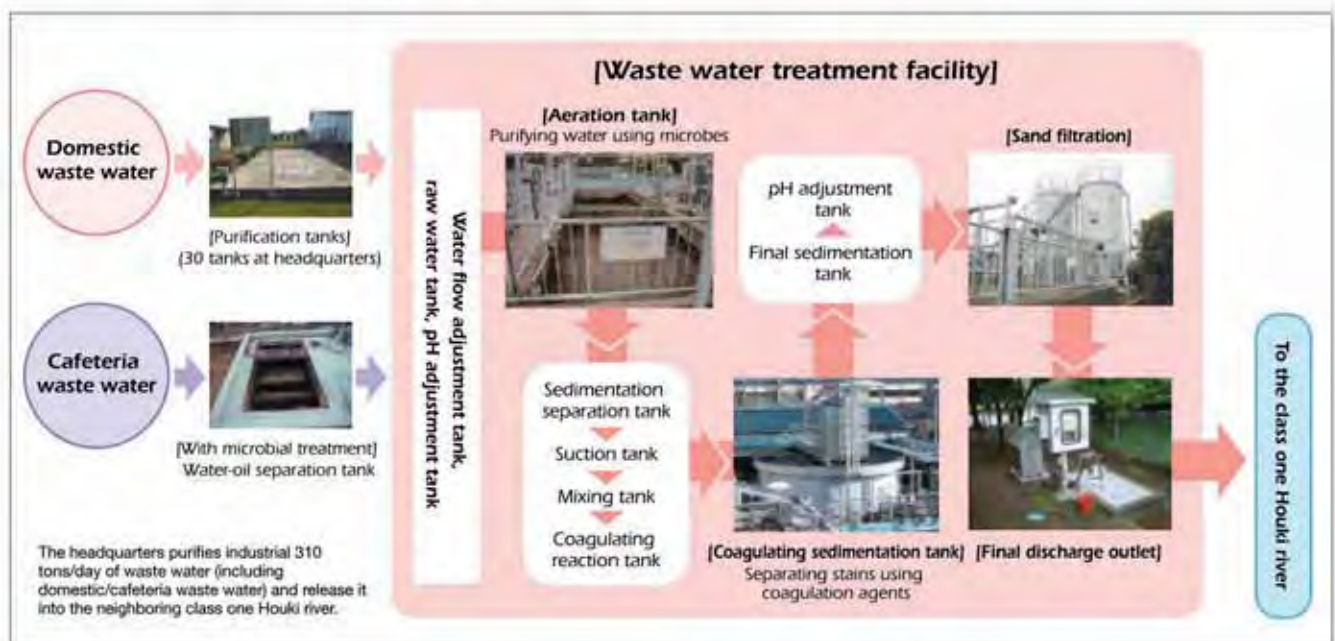
# 4 Environmentally-Conscious Business Activities

## Water/Air Protection and Environmental Facility Management

The headquarters is located in a rural area where melting snow from the Nasu peaks and groundwater are used. Therefore, we pay special attention to maintaining the environmental quality with regard to water. From the very start of operations at the headquarters, we have implemented continuous activities to release clean water. As well as observing laws, we develop activities for improving the water quality.

### Water Conservation

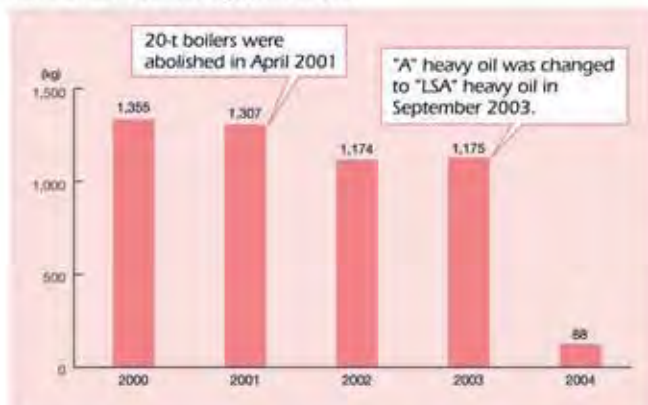
A waste water treatment facility is provided to purify water via several processes. We reinforce day-to-day control of the facility and maintain a thorough water quality check system.



### Air Quality Preservation

To preserve air quality, we have continuously been switching conventional boilers to through flow boilers with low emissions. From 2003, LSA heavy oil with less sulfur content has been used. In 2004, SOx emission was reduced by 92%.

### Transition of SOx emission



### Ozone Layer Protection

Before the "Fluorocarbons Recovery and Destruction Law" was established, headquarters performed several actions related to CFCs, HCFCs, and HFCs. These actions include indication and registration of equipment using these compounds (air-conditioners, refrigerators, etc.), understanding of the amount of these compounds contained in systems, and retrieval of these compounds when systems are disposed of.

### Emergency Response Training



Training in fiscal 2004

Our headquarters performs planned training for emergency situations. Training was performed at 30 facilities in fiscal 2004.



## Global Warming Prevention (Energy-Saving Activities)

Preventing global warming is a universal issue to protect the precious global environment. Our headquarters is working on activities to reduce emission of CO<sub>2</sub>, a greenhouse gas having a major impact on global warming. By setting energy-saving activities as an important issue, we try to decrease CO<sub>2</sub> emission per production unit by 1% a year. Additionally, we do our best to provide products with high energy efficiency so that energy is reduced in system use, and to reduce other greenhouse gases such as sulfur hexafluoride (SF<sub>6</sub>).

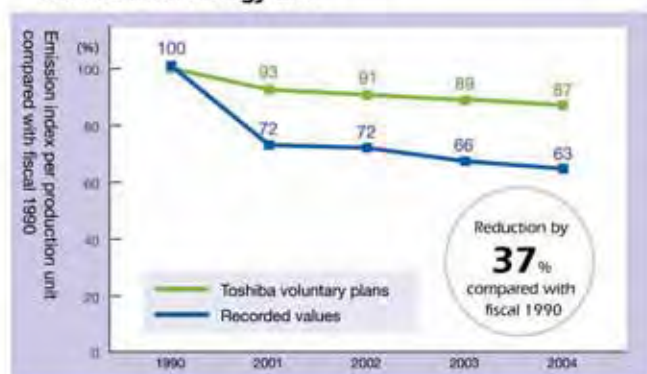
### Energy-Saving Activities

The activities performed in fiscal 2004 are as follows.

- 1) Fixed energy reduction by power plant energy saving due to facility investment
- 2) Reduction in energy waste by changing the air-conditioning method
- 3) Promotion of energy saving by all staff by setting energy-saving goals for all departments

CO<sub>2</sub> emission per production unit in fiscal 2004 was reduced by 5% in comparison with that in the previous year, and by 63% in comparison with that in fiscal 1990, significantly exceeding the goals set in Toshiba voluntary plans.

### Transition of CO<sub>2</sub> emission per production unit caused from energy use



(Description of graph) 1) For CO<sub>2</sub> emission, the CO<sub>2</sub> emission factors of electrical power, heavy oil, and LPG (liquefied petroleum gas) are used.  
2) The "emission index per production unit compared with fiscal 1990" is a comparison index where the emission per production unit in fiscal 1990 is set as 100.

### Case Example of Energy-Saving Activities

#### Improving the efficiency of the power plant



By separately installing dedicated boilers for the coating process, the demand load became appropriate and heat dissipation loss was reduced, achieving energy saving.

Annual effect  
**-98**  
(t-CO<sub>2</sub>)

#### Improving the efficiency of the air conditioning



A large water-cooled air conditioner system had been used with central control. The system was replaced with a distributed air conditioner system using the "building multiple air conditioner (\*)" method in the office/design buildings. This permits air conditioning in individual areas and has significantly improved the energy consumption efficiency and reduced the energy required for air conditioning.

Annual effect  
**-58**  
(t-CO<sub>2</sub>)



### Hybrid outdoor light using natural energy introduced on the headquarters premises

We installed a hybrid outdoor light that utilizes natural energy on our premises. This light stores electricity made by sunlight and wind power in a battery and use the electricity to produce light. The light uses clean energy and greenhouse gases (such as CO<sub>2</sub>) are not generated.

We believe that the light shows our positive attitude towards global warming prevention and improves the environmental awareness of Toshiba Medical Systems Corporation employees.



(\*) "Building multiple air conditioner" method; Method in which several interior air conditioners are controlled by one set of external air conditioning units.



## Waste Reduction (Promoting Zero Emission)

### Further Activities Aiming for Zero Emission

To achieve zero emission of waste, Toshiba is implementing activities toward the goal of the quantity of final disposal being 1% or less of total discharge in fiscal 2003 in the Third Voluntary Environmental Plan.

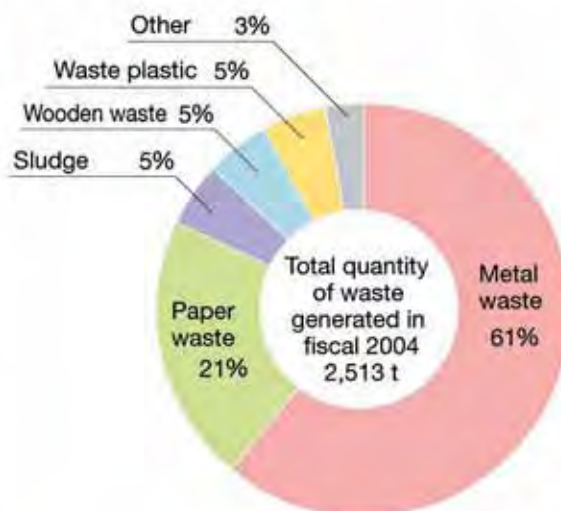
We have achieved the goal more than 2 years earlier than originally planned in fiscal 2001.

### Transition of total quantity of waste generated by Toshiba Medical Systems Corporation



Regarding the record in fiscal 2004, the total quantity of final waste disposal is 6 t (0.2 %) of a total emission of 2,513 t, advancing work for zero emission. In the years ahead, we will try to reduce the total quantity of waste generated so that emission of waste is reduced as far as possible.

### Item composition of total quantity of waste generated in fiscal 2004



### Main Improvements in Fiscal 2004

To promote recycling/reuse of waste generated in Toshiba Medical Systems Corporation we provided several internal waste accumulation sites on the premises. At these sites, wastes are managed so that they are separated into about 50 items. We have created a "waste separation guide" so that employees can dispose of waste correctly. This separation guide was reviewed for improving the employee's consciousness regarding waste separation. For example, photos of wastes have been newly entered in the guide and the waste names now can be searched by order of the

#### ▼ Waste Separation Guide

Japanese syllabary.

To decrease the total quantity of waste generated, in cooperation with the procurement department, we asked the delivery manufacturers to bring back wooden pallets for reuse from last fiscal year. This was very effective and the waste was reduced by 33 t/year. As a future activity, a returnable box system is to be promoted to reduce the amount of packing material (shock-absorbing material, etc.).

#### ▼ Reused wooden pallets





## Reduction in Chemical Substances

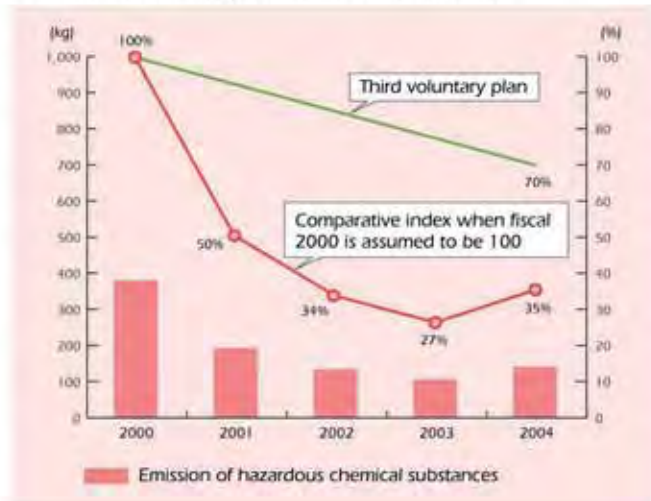
### Reduction in chemical substance emission

Based on the Toshiba third voluntary plan, the headquarters has been reducing emission of hazardous chemical substances used in the manufacturing process and reinforcing their management. As a result, emission was reduced by 65% compared with that in fiscal 2000 (benchmark year), significantly exceeding the target standards.

From fiscal 2005, we will advance further activities based on the fourth Toshiba voluntary plan in which new substances are also targeted.

Reduction by  
**65%** compared  
with that in  
fiscal 2000

### Third voluntary plan achievement status



## PRTR

Before the PRTR law (Pollutant Release and Transfer Registration law, which is a law regarding emission of specified chemical substances and promotion for managerial improvement) was established, Toshiba implemented unique activities regarding emission, transfer, and reduction of specified chemical substances.

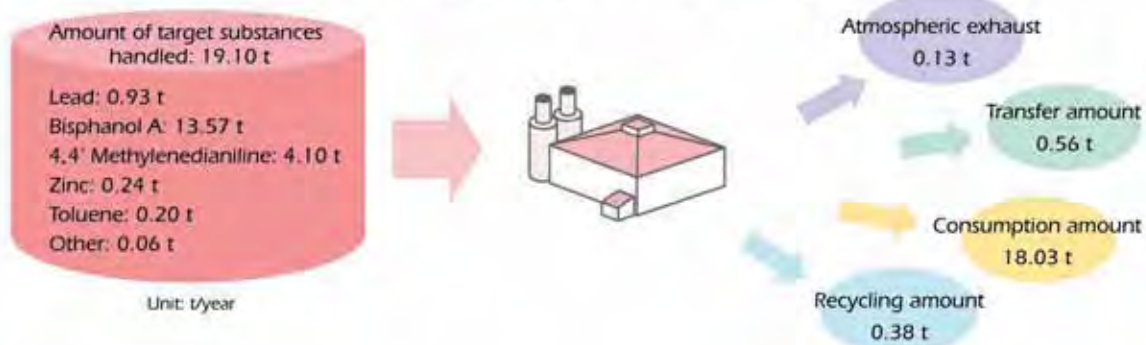
Our amounts of chemical substances handled as specified in the PRTR law in fiscal 2004 are as specified in the following figure. We reported 2 materials that exceeded the reporting standards specified by law (1 t/year) to the governmental agency. The amount of the lead compound used for manufacturing PWBs of medical systems will be reduced because "lead-free solder" is officially being used in fiscal 2005.



"Lead-free solder"  
(first used in PWBs for CT systems)

### Emission and transfer amounts of chemical substances (fiscal 2004)

\* PRTR for target substances of which 10 kg or more/year is used, according to the Toshiba guidelines





# Environmental Protection-Related Communication with Local Residents and Our Employees

## Earth-Conscious Activities/Communication

Toshiba Medical Systems Corporation attaches a high value to communication both inside and outside the company throughout the year, such as the "Environmental month" of June and "Energy-saving month" of February.

### Tree planting



May 22, 2004  
Joined in "green planting in Ashio town" for consecutive 2 years

### Cleaning in industrial complex



June 8, 2004  
Joined in "Cleaning of industrial complex" in Shimoishigami area

### Nozaki mayor checking water quality



July 6, 2004  
The Nozaki mayor checked the water quality management system at headquarters.

### Environmental lecture



July 8, 2004  
Environmental lecture entitled "Green Environment, Earth Environment" delivered by Prof. Okubo of Nasu Univ.

### Visit to waste product recycle repository



October 27, 2004  
Visited NNY repository in Shimoishigami industry complex

### Tochigi Industrial Environmental Management Association



March 13, 2005  
Members of Tochigi Industrial Environmental Management Association visited the environmental facility.

## Support of Training for Business Partners/Expansion of Environmental Activities in Branches

Toshiba Medical Systems Corporation has periodic communication with main component procurement partners regarding environmental protection, and guides/supports them in reducing environmental impacts and observing laws. In fiscal 2004, we guided and supported 6 companies. From fiscal 2004, we expanded environmental activities to Japanese branches and environmental inspections were performed at 9 branches.

### ◆ Environmental inspection in branches in fiscal 2004 Planning ○ Completed ◆

Main branches/ Affiliated companies	Fiscal 2004												Fiscal 2005 Planning	
	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.		
Hokkaido														
Tohoku														
Kanto														
Chiba														○
Tokyo														○
Kanagawa														○
Shizuoka														
Chubu														
Kansai														
Hyogo														
Chugoku														
Shikoku														
Kyushu														
TMI														○
Toshiba Medical Supply														○
Okinawa Medical														○
MSJ														○
CFC														○
TSMED														○
Tokyo office														○



▲ Guiding/supporting business partner

▼ Environmental inspection for branch



▲ Inspection of branch



▲ Medical systems to be recycled





## Corporate Profile

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Company name: Toshiba Medical Systems Corporation  
Founded: 1930  
Incorporation: 1948  
Capitalization: 14.7 billion yen  
Area: 246,528 m<sup>2</sup> (Headquarters)  
Green area of 52,764 m<sup>2</sup>  
[Green space ratio of 21%]  
Employees: 3235 (as of April 2005)

## Website

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<http://www.toshiba-medical.co.jp>

## Contacts

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Regarding the contents of this report and our environmental activities, please feel free to ask persons of the department in charge.

## Editor's Postscript

The "Environmental report 2005" was edited to improve understanding of environmental activities in our business operations. In this 5th edition, the data for Toshiba Electron Tubes & Devices included in the previous edition was separated and "Expansion of Environmental Activities in Branches" was added to introduce the active participation in environmental activities of the Toshiba Medical Systems Corporation group. In fiscal 2005, we are planning to modify the report so that CSR activities are included. We would like to express our appreciation to people who returned the questionnaire and to those who cooperated in the editing.



Toshiba Group Earth Protection Mark

## **TOSHIBA MEDICAL SYSTEMS CORPORATION**

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Toshiba Medical Systems Corporation (Nissu Wenko) meets  
the Environmental Management System standard, ISO 14001