

## Active Approach to Environmental Protection Activities and Safety Preparations at Oil Refineries

### Environmental Management Systems at Oil Refinery

ISO14001 certification\*, an international standard for environmental management systems, has been obtained at all four of our refineries and at Cosmo Matsuyama Oil Co., Ltd., whose business involves refining and storing oil products. In accordance with ISO14001, the head of each oil refinery establishes an environmental policy, sets goals, works to save energy and reduce wastes, implements education and training programs and conducts other activities focused on the continuous improvement of environmental protection.

Apart from the external audits by accredited registrars, internal audits are carried out regularly according to the audit standards set by each oil refinery to confirm progress toward targets and to improve our activities continuously. In FY 2001, Cosmo Matsuyama Oil Co., Ltd. renewed its certification.

#### ISO14001 Certification Acquisition at Cosmo Oil Refineries

Refinery name	Location	Accredited registrars	Certification Date
Chiba Oil Refinery	Chiba Prefecture	JQA	March 13, 1998
Yokkaichi Oil Refinery	Mie Prefecture	JQA	March 20, 1998
Sakai Oil Refinery	Osaka Prefecture	JQA	March 20, 1998
Sakaide Oil Refinery	Kagawa Prefecture	JQA	June 18, 1997
Cosmo Matsuyama Oil Co., Ltd.	Ehime Prefecture	JQA	December 28, 1998

#### Number of Personnel Obtaining Environmental Qualification

Air Pollution Control Manager	86
Water Pollution Control Manager	94
Noise Pollution Control Manager	15
Vibration Control Manager	6
Dioxin Control Manager	6
Hazardous Materials Officer (Class A, Class B)	1 878
High-Pressure Gas Production Safety Manager (Class A, Class B)	1 076
Qualified Person for Energy Manager (heat)	89
Qualified Person for Energy Manager (electricity)	22
Personnel in charge of industrial waste subject to special control	18
Technical manager for industrial waste treatment facility	14
Environmental Measurement Staff	7
Boiler Engineer (expert)	24
Boiler Engineer (1st and 2nd class)	1 162

As of March 2002

### Safety Activities at Oil Refineries

At oil refineries, we are actively improving safety by bringing together Cosmo Oil employees and the employees of affiliated companies. To prevent operational accidents and occupational hazards, danger forecasting, research into accident causes and examination of the accident recurrence prevention plan are carried out, and a variety of programs to raise the awareness of all employees are being implemented.

As a result of these efforts, there were no operational accidents and two occupational hazards with no suspension of operation in FY 2001. Chiba Oil Refinery became number-one in the petroleum industry for the total accident-free hours.

Regarding health, physicians who visit the oil refineries, with follow-ups as necessary, conduct periodic employee health checks.

#### Number of Hours without Accident

Refinery name	Hours
Chiba Oil Refinery	14,377,554
Yokkaichi Oil Refinery	57,360
Sakai Oil Refinery	495,635
Sakaide Oil Refinery	38,302
Cosmo Matsuyama Oil Co., Ltd.	6,239,375
As of March 2002	

Yokkaichi Oil Refinery, first in Mie Prefecture, received the Director-General of Fire-Defense Agency Award at the Convention on Hazardous Materials for its efforts in obtaining certification for "certified facility concerning modification work" under the Fire Defense Law, and for its voluntary safety management system.

Chiba Oil Refinery received the Minister of Health, Labor and Welfare Commendation for its activities to improve occupational health and safety.



Yokkaichi Oil Refinery received the Director-General of Fire-Defense Agency Award at the Convention on Hazardous Materials.



Chiba Oil Refinery received the Minister of Health, Labor and Welfare Commendation.

#### \* ISO 14001

An international standard for environmental management systems published by the International Organization for Standardization (ISO). It establishes important points in reducing environmental impacts in business activities, products, and services.