With the Environment

The ADEKA Group, which uses chemical substances and palm oil as raw materials, cares about the environment throughout the process of procurement and from production to disposal. Toward realizing a sustainable society, we are developing products with less environmental impact and engaging in energy-saving initiatives.

Basic Environmental Policy

1. Strive to conserve resources and energy, recycle resources, and reduce the generation of waste, in order to prevent environmental pollution.
2. Comply with domestic and foreign laws and regulations related to the environment, and at the same time strive to strengthen voluntary management and achieve further environmental conservation.
3. Be aware that corporate activities are dependent upon the blessings produced through biodiversity, and seek to protect biodiversity.
4. Take a proactive stance in procuring raw materials that impose a low burden on the environment, and contribute to the realization of a recycling-oriented society.
5. Disclose the results of environmental conservation activities.
6. Communicate with stakeholders and provide support to society and local communities in environmental conservation activities.

Environmental Initiative System

- **President**
- **Environmental and Safety Division**
  - Environmental Safety & Quality Assurance Department
  - Central Health and Safety Committee
  - Chemical Substance Management Committee
  - Energy Conservation Promotion Committee
  - Meeting on Countermeasures for Industrial Waste
  - Environmental/safety headquarters audit
- **Management**
- **Manufacturing**
- **Sales**
- **R&D**
- **Group companies**

<table>
<thead>
<tr>
<th>Item</th>
<th>Targets for Fiscal 2018</th>
<th>Targets for Fiscal 2019</th>
<th>Self-evaluation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Promote energy conservation</td>
<td>Reduce energy intensity by 3.0% or more on year-to-year basis (trend from FY2017 level)</td>
<td>Reduce energy intensity by 1.0% or more on year-to-year basis (trend from FY2017 level)</td>
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<td>Reduce industrial waste</td>
<td>Promote and maintain zero emissions through recycling</td>
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<td>Promote green purchasing</td>
<td>Achieve a green purchasing rate of 40% or more for 43 designated stationary items</td>
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<td>Chiba Plant</td>
<td>■ Reduced electricity consumption by upgrading to more energy efficient equipment</td>
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<td>■ Reduced steam consumption through thermal recovery of exhaust gases</td>
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**Environmental Initiative System**

Under the annual policy determined by the Environmental and Safety Division, each office of the ADEKA Group formulates an execution plan and conducts environmental management activities that meet local needs. The Environmental and Safety Division conducts an annual audit of the Group companies which have offices and plants inside Japan.

In fiscal 2018, the annual audits were expanded to overseas subsidiaries and conducted at three companies in Europe, the U.S., and Middle East. In fiscal 2019, the Group is planning to convene a Global Meeting on the Safety Quartet, for environmental and safety managers of overseas companies to share their knowledge and perspectives.

**Energy Saving Activities**

The Energy Conservation Promotion Committee organized a visit to the Mie Plant in order to share information on energy conservation initiatives.

In fiscal 2018, ADEKA saved 760 kl of energy through the implementation of energy conservation initiatives, despite an increase in energy consumption at ADEKA plants due to changes in the product mix and bringing new facilities online.

**Initiatives by Major Sites in Fiscal 2018**

- **Kashiwa Plant**
  - Reduced electricity consumption by turning off lighting and HVAC systems when not needed
  - Reduced steam consumption by insulating steam pipes
- **Chiba Plant**
  - Reduced electricity consumption by upgrading to more energy efficient equipment
- **Mie Plant**
  - Reduced steam consumption by improving boiler operation control settings
  - Reduced electricity consumption by upgrading utility equipment
- **Fuji Plant**
  - Reduced steam consumption through thermal recovery of exhaust gases

**CO2 reduction from our products**

The ADEKA Group develops highly eco-efficient products as well as those that protect the environment. ADEKA SAKURA-LUBE is an automotive lubricant additive used in engine oil and grease that excels in raising fuel efficiency when added to engine oils. It indirectly contributed to the CO2 reduction of approximately 1.58 million tonnes during fiscal 2018, a volume equivalent to six times the volume of CO2 emitted by ADEKA’s plants that year.

**Initiatives on Global Warming Prevention**

**Initiatives for Reducing CO2 Emissions**

The ADEKA Group seeks to reduce its emissions of CO2, a greenhouse gas that wreaks havoc on a global scale. Each of the Group operation sites has its own annual reduction target and is engaged in raising production efficiency or other improvement activities. The progress of those activities is checked through plant audits conducted by the president and the Environmental and Safety Division.

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**CO2 Reduction through our Products**

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ADEKA Joins the Clean Ocean Material Alliance

In accordance with the ADEKA Group Biodiversity Policy, the Group conducts initiatives to promote the preservation of biodiversity and its sustainable use. ADEKA has joined the Japan Business Initiative for Biodiversity and is exchanging information and building connections with various member companies.

ADEKA Group Biodiversity Policy

1. Consider biodiversity when procuring naturally derived raw materials.
2. Promote activities for conserving biodiversity at our business premises.
4. Work in collaboration with local communities.

Promoting Biodiversity

In addition to recycling wastewater from its manufacturing processes to preserve water resources, ADEKA is exchanging information and building connections with companies mining natural resources. ADEKA has joined the Japan Business Initiative for Biodiversity and its sustainable use. ADEKA has also conducted initiatives to promote the preservation of biodiversity.