

The most significant environmental impact from Oki's production plants and offices is the emission of CO₂ and other greenhouse gases.

Because of this reason, we have put up a goal for the reduction of emissions of CO₂ originating from energy —emitted through the consumption of electric power or fossil fuel— and of emissions of PFC gases used in the semiconductor manufacturing process.

1 Record of Greenhouse Gas Reduction in 2002

(1) Emission of CO₂ originating from energy

The Oki group (including overseas production plants) emitted 297,000 tons of CO₂ originating from energy, which is a slight reduction of 0.8% (2,400 tons of CO₂) compared to 2001.

As for the CO₂ emissions (basic unit,^{Note 1)} per division, the semiconductor manufacturing divisions improved their records by 8% compared to 2001 through energy-conservation activities and productivity improvements. The records for the equipment assembly divisions, however, deteriorated by 10.5% due to a decline in sales.

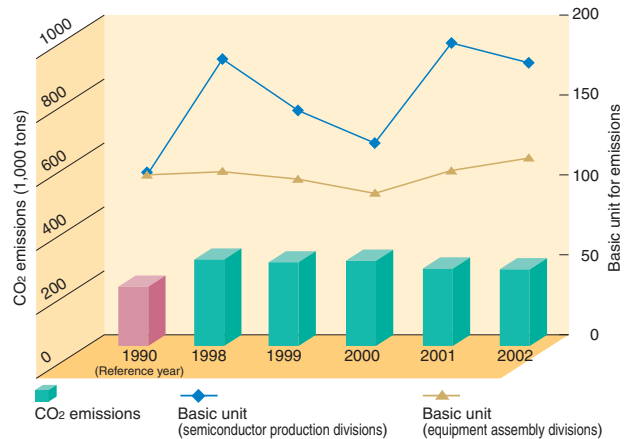
(2) Emission of PFC gases

We took measures such as changing the PFC gases used in the semiconductor manufacturing process to gases with a smaller environmental impact. As a result, we remarkably reduced the global warming potential^{Note 2)} by 23% compared to 1995.

Note 1) Basic unit: CO₂ emissions / net sales

Note 2) Global warming potential: A numerical indicator that converts the impact on global warming into quantity of CO₂

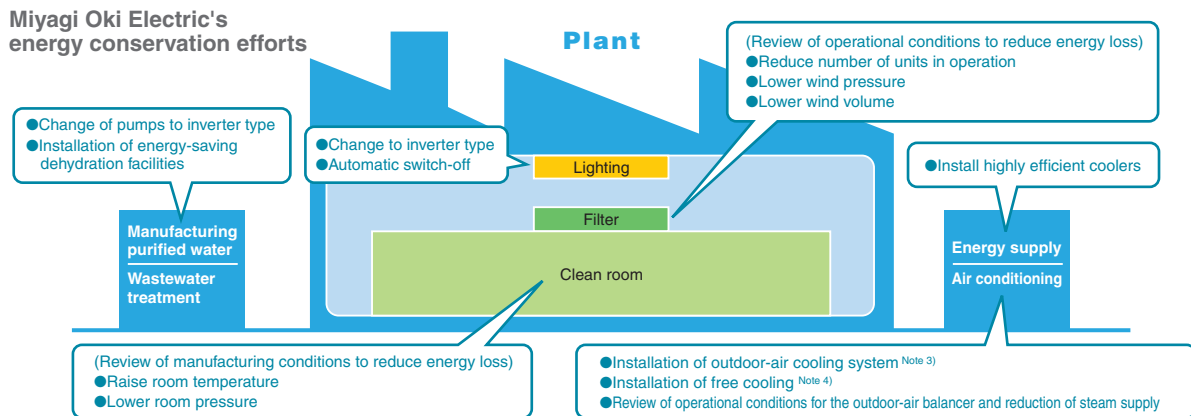
Transition of CO₂ emissions (Oki group major production sites)



2 Energy Conservation Efforts at Semiconductor plants

90% of Oki's energy is consumed by semiconductor plants. For this reason, our efforts for energy conservation focus on our semiconductor plants.

The illustration below shows energy conservation activities at Miyagi Oki Electric that manufactures semiconductors.



Note 3) Outdoor-air cooling: Cooling the indoor air by using cold outdoor air during winter

Note 4) Free cooling: Thermal-exchange the water warmed up in the cooling of production facilities with water cooled in the cold outdoor air during winter.

3 Efforts for Reducing Greenhouse Gas (PFC gas) Emissions

In the semiconductor manufacturing process, perfluoro compound (PFC), which has an effect on global warming, is used and partly emitted into the air. Because of this, the World Semiconductor Council (WSC) proclaimed the goal to reduce the emissions by 10% (as converted into global warming potential) by 2010 in comparison with 1995.

The Oki group is working to reduce emissions by changing to gases with a smaller environmental impact, by installing waste gas treatment equipment or by improving processes.

Transition of PFC gas emissions (converted into global warming potential)

