

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

ENVIRONMENT

Nissan's environmental philosophy, "a Symbiosis of People, Vehicles and Nature," expresses our ideal picture of a sustainable mobility society.

As a global automaker, Nissan takes active steps to identify the direct and indirect impacts of its businesses on the environment to help minimize them. Our goal is to reduce the environmental impact caused by our operations and Nissan vehicles throughout their lifecycle to a level that can be absorbed naturally by the Earth by promoting effective use and recycling of energy and resources. For the sake of the planet and generations to come, and to help the development of a sustainable mobility society, Nissan provides customers with innovative products.



OUR PRIORITIES

KEY FIGURES

Carbon footprint

Direct greenhouse gas emissions (GHG Protocol Scope 1)	835,766 t-CO₂
Indirect GHG emissions from electricity, heat, steam consumption (Scope 2)	2,432,889 t-CO₂
Other indirect GHG emissions (Scope 3)	468,346 t-CO₂
Water resource use	27,585,000 m³
Total waste produced	170,910 tons



► GRI G3 Indicators
► EN8/EN16/EN17/EN22



► page_118-142
[Click here for detailed information on our environmental data.](#)

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

NISSAN'S APPROACH TO THE ENVIRONMENT

The increasing global population and the rapid growth of the world economy have effects on the global environment, from environmental degradation and climate change to issues of supply and demand of energy, resources, water and food. According to a United Nations forecast, by 2050 the global population will have grown from the present 7 billion to an estimated 9 billion, with 70% of the population living in cities. The demand for natural resources and energy will increase significantly.

Ensuring the balance of economic growth and the natural environment is a major challenge facing humankind as we continue to pursue personal and collective prosperity. The automobile industry must work not only to help reduce CO₂ emissions, but also to reinvent its business structures to reduce reliance on fossil fuels.

According to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (IPCC), it is necessary to stabilize atmospheric CO₂ at 450 parts per million or lower in order to keep average temperatures from rising more than 2 degrees Celsius on a global basis. Based on this assumption, we have calculated that "well-to-wheel" CO₂ emissions for new vehicles will need to be reduced by 90% in 2050 compared with levels in 2000. To help achieve this 90% reduction, the efficiency of our internal combustion engines will need to improve in the short term. Over the long term, we need to increase the adoption of electric vehicles and fuel-cell electric vehicles (EVs and FCEVs) and to make use of renewable energy to power these technologies while each country and region moves toward more renewable energy sources. We are advancing technological development on the basis of this future scenario. Specifically, we are concentrating our efforts on two pillars: zero-emission,¹ which involves widespread use of zero-emission vehicles in a holistic approach to promote a sustainable society, and PURE DRIVE,² which reduces CO₂ emissions by developing fuel-efficient internal combustion engine technologies and introducing them into the market.



► page_20-26

* Click here for more information on our zero-emission efforts.

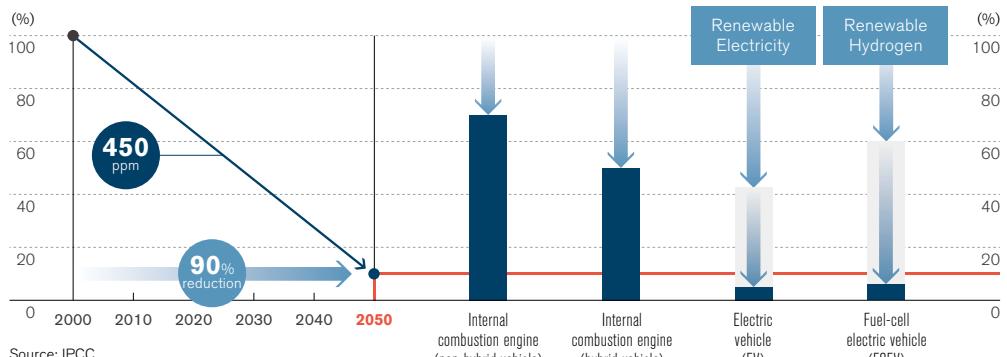


► page_26-28

¹ Click here for more information on PURE DRIVE.

Our CO₂ Reduction Scenario

New cars' well-to-wheel CO₂ emissions



Source: IPCC

FISCAL 2012 PERFORMANCE

- Sales of the all-electric Nissan LEAF were 30,500 units and cumulative sales since its launch through the end of March 2013 exceeded 58,000 units.
- 24.9% improvement in corporate average fuel economy (in Japan, U.S., Europe, China, vs. fiscal 2005)
- 8.3% reduction in CO₂ emissions from corporate activities (t-CO₂/vehicle, vs. fiscal 2005)
- EV motor using less rare earth elements developed and adopted in Nissan LEAF
- CO₂ emission reductions in each phase of the value chain: production 2,822 kton, logistics 1,490 kton, use of Nissan vehicles 91,234 kton, energy use in offices 290 kton, employee commutes 468 kton*



► page_141

* CO₂ emissions of 215 kton from consolidated employee commutes in Japan, U.S. and Europe have received third-party certification. For details, please refer to the environmental data at the end of this report.

FUTURE MEASURES

- Prepare for launch of all-electric commercial vehicle, e-NV200
- Introduce hybrid models: Pathfinder for the Nissan brand; Q50, QX60 for the Infiniti brand
- Reduce CO₂ emissions by introducing three-wet-paint process in plants globally

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

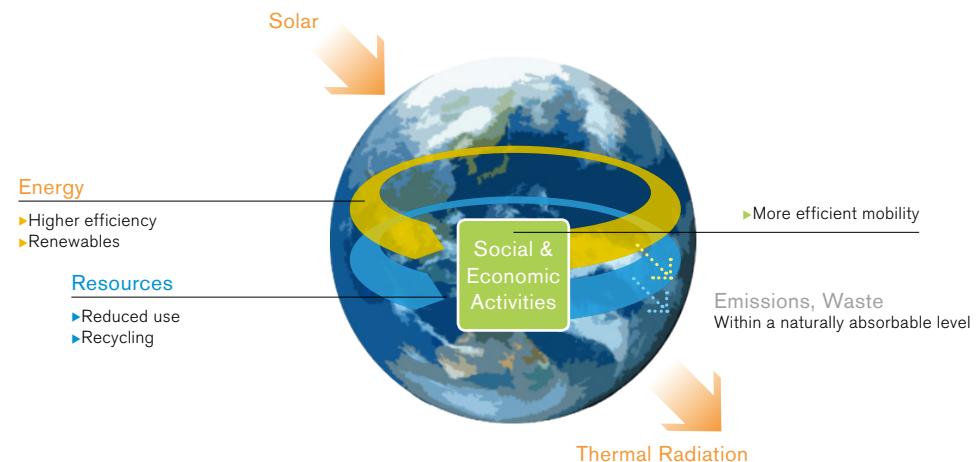
NISSAN GREEN PROGRAM 2016

Nissan launched its new six-year environmental action plan, Nissan Green Program 2016 (NGP2016), in fiscal 2011. NGP2016 is based on thorough materiality assessments focusing on factors with critical impact on the company's business. These assessments include input from energy and resource specialists around the world, as well as survey results, to gauge understanding and opinions on environmental issues and Nissan's activities, in addition to the expectations of employees working in Japan on what Nissan should set as priorities in its business.

NGP2016 focuses on reducing the environmental impact of Nissan's corporate activities and pursuing harmony between resource consumption and ecology. We aim to promote efficient use of energy and resources and to promote and widen the application of green technologies that were developed under NGP2010, our previous environmental action plan. NGP2016 has four specific key actions that involve activities in development, manufacturing, sales, service and all other departments companywide: zero-emission vehicle penetration, fuel-efficient vehicle expansion, corporate carbon footprint minimization and new natural resource use minimization.

In the long term—even taking into account plans to increase sales volume globally—by promoting the Nissan Green Program activities, we forecast that CO₂ emissions from our new vehicles and corporate activities will peak in the 2020s and then subside, while the volume of new natural resource use will be maintained at the level of the 2010s.

Ultimate Goal and Key Issues



CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

NGP2016 Progress List

Main areas	Action plans	FY2012 progress	See page
Zero-emission vehicle penetration	1.5 million cumulative EV sales with Alliance partner Renault	Global Nissan LEAF sales: about 30,500 units in fiscal 2012, and 58,000 units cumulatively since 2010 launch	p. 20
	Introduce four EVs including Nissan LEAF	Promoted field test of the e-NV200	p. 21
	Prepare to introduce fuel-cell electric vehicle (FCEV) into market	Signed agreement for joint development of common fuel-cell system with Daimler AG and Ford Motor	p. 22
	Take global leadership in supplying batteries for electric-drive	Started battery production by Nissan North America and Nissan Motor Manufacturing (UK)	p. 23
	Help create zero-emission society utilizing EVs and their derivative technologies with partners	Launched the "LEAF to Home" power supply system using Nichicon's EV Power Station	p. 23-24
	► Develop EV charge/discharge system and information network ► Demonstrate smart house/community/grid, starting from Yokohama	Promoted rollout of "LEAF to Home" power supply system at public facilities, houses, condominiums	
Fuel-efficient vehicle expansion	Provide energy storage solution with used EV batteries through "4R" business	Promoted use of EV batteries as stationary power units for houses, apartment buildings	p. 25-26
	Improve CAFE* by 35% from FY2005 (Japan, U.S., Europe, China) * Corporate average fuel economy; meet or exceed regulatory requirements	Improved CAFE by 24.9% from FY2005	p. 26
	Introduce top fuel-efficiency models in various classes	These models had top fuel efficiency in their classes: ► Note, Latio in Japan ► Altima in U.S. ► Sylphy in China	p. 27
	Introduce FF-HEV in C class and above; expand FR-HEV offerings	Introduced Cima Hybrid, Serena S-Hybrid in Japan	p. 27
	Introduce plug-in hybrid vehicle (P-HEV)	Promoted P-HEV development	p. 27
	Introduce next-generation CVT globally; expand CVT sales to 20 million cumulative units from 1992	Global CVT-equipped vehicle sales of 2.28 million; cumulative total since 1992 of 13.36 million	p. 27-28
	Develop lightweight technologies with structure optimization, new materials and new manufacturing processes	Developed and used 1.2 gigapascal ultra-high tensile strength, highly formable steel in the Infiniti Q50, achieving weight reduction of about 40 kg	p. 28
	Contribute to CO ₂ reduction by ITS technologies	Worked with Beijing Municipal Commission of Transport to confirm effectiveness of dynamic route guidance to disperse traffic congestion	p. 28
	Collaborate with Beijing city government to improve traffic congestion, promote eco-driving		
Corporate carbon footprint minimization	Reduce CO ₂ emissions of corporate activities by 20% (t-CO ₂ /vehicle, vs. FY2005)	Reduced 8.3% from FY2005	p. 29
	Reduce by 27% in all manufacturing sites (t-CO ₂ /vehicle, vs. FY2005)	Reduced 15.2% from FY2005	p. 29-30
	Promote activities to reduce CO ₂ emissions in inbound/outbound logistics	Promoted measures including introduction of <i>Nissei Maru</i> , our fourth energy-efficient auto shipping vessel	p. 31-32
	Reduce by 1%/year in offices (Japan, North America, Europe, China, t-CO ₂ /unit)	Increased 17.7% from FY2010	p. 32
	Reduce by 1%/year in dealers (Japan, t-CO ₂ /unit)	Increased 1.8% from FY2010	p. 32
New natural resource use minimization	Increase recycled material usage ratio per vehicle by 25% in Japan, US and Europe	Activities promoted	p. 33
	Expand closed-loop recycling scheme with business partners ► Collect and recycle scrap, waste from vehicle production ► Collect and recycle end-of-life vehicles (ELVs)	Started activity to collect steel and aluminum sheet scraps generated during production, recycle them into steel and aluminum sheets for use	p. 34
	Improve ELV recovery rate ► Achieve top level ELV recovery rate (Japan) ► Promote proper treatment and resource recovery globally	Achieved recovery rate of 99.3% in Japan; efforts underway globally	p. 34
	Reduce scarce resource usage	Developed and applied a new electric motor to reduce use of rare earth dysprosium by 40% in Nissan LEAF	p. 34
	Reduce waste	Waste reduced by 10.3% in Japan plants and 3.2% in global plants	p. 35
	Promote water-use management and reduction in all plants	Set targets, started activities to reduce water use in Spain, Egypt and South Africa	p. 36
Environmental management promotion	Enhance and promote environmental management throughout supply chain (consolidated companies, sales companies, suppliers)	Briefing held about NGP2016 with consolidated manufacturers and suppliers; environmental objectives and environmental data, activities reporting added to management items for suppliers to understand and promote reduction of environmental impact upstream in the supply chain	p. 37
	Promote reduction, substitution and management of environment-impacting substances	Added our global policy related to environment-impacting substances in the Nissan Green Purchasing Guidelines and distributed it to our suppliers	p. 38
	Reduce environmental impact of products with lifecycle assessments (LCAs)	CO ₂ assessments underway as part of product LCAs	p. 40

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

COMPANY ORGANIZATIONS FOR THE ENVIRONMENT

To achieve the NGP2016 goals, Nissan organically links its product and technical development, production, logistics, marketing, sales and other divisions to ensure maximum results. Toward this end, the company has created a global framework for environmental management and is setting targets and implementing action plans in all areas of its activity.

To carry out its global environmental management, Nissan has established an organizational approach linking its various functions and regions. The Global Environment Management Committee (G-EMC), headed by the chief operating officer, meets twice annually to determine overall policies and the proposals to be put before the Executive Committee. The Environmental Planning Department, which is a part of the Corporate Planning and Business Development Division, launched in 2007, determines which proposals will be forwarded to the G-EMC and assigns specific actions to each division. This department is also responsible for the efficient management and operation of environmental programs based on the PDCA (plan, do, check, act) cycle. In fiscal 2012, we established the European Environmental Management Committee (E-EMC) to deeper manage and implement measures.

In Japan, we have obtained integrated ISO 14001 certification* for all of our business facilities. Within this system the COO takes direct charge of managing and promoting Nissan's environmental activities. The coordinated goals set by the COO for the entire company are shared with all facilities and employees, allowing the entire company to engage in these activities. The COO also receives reports twice each year on the progress and results of Nissan's activities and on further measures to be implemented. By putting the PDCA cycle to use in this way, we constantly improve our environmental performance.

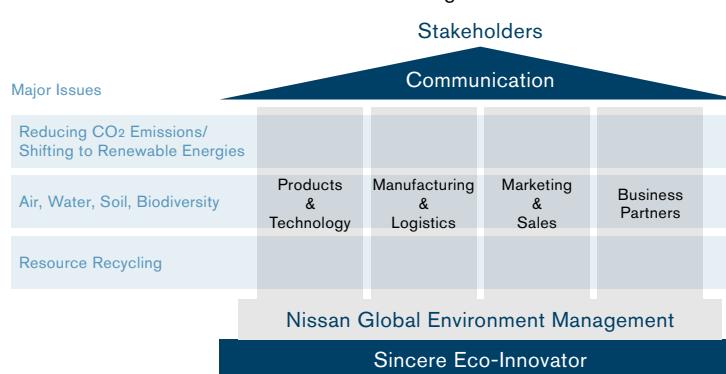
We also hold Advisory Meetings, where we solicit the ideas of leading experts and organizations, and examine assessments from rating organizations. We use this information to better assess Nissan's goals and activities, further enhancing our environmental measures.



► page_36

* Click here for more information on our ISO 14001 certification.

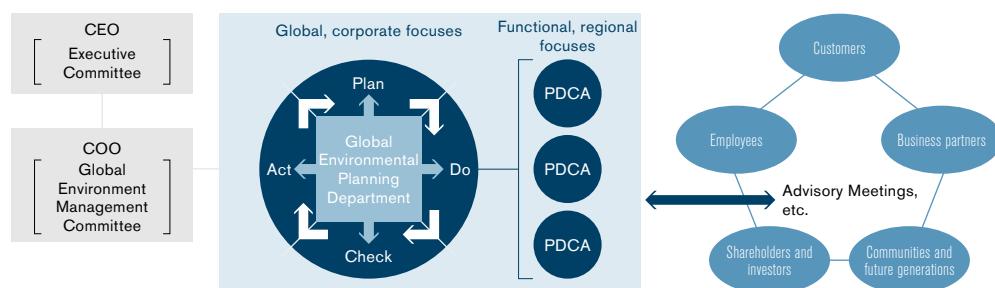
Our Framework for Global Environment Management



► page_37

Click here for more information on Nissan as a Sincere Eco-Innovator.

Environment Management Organization



CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Stakeholder Engagement

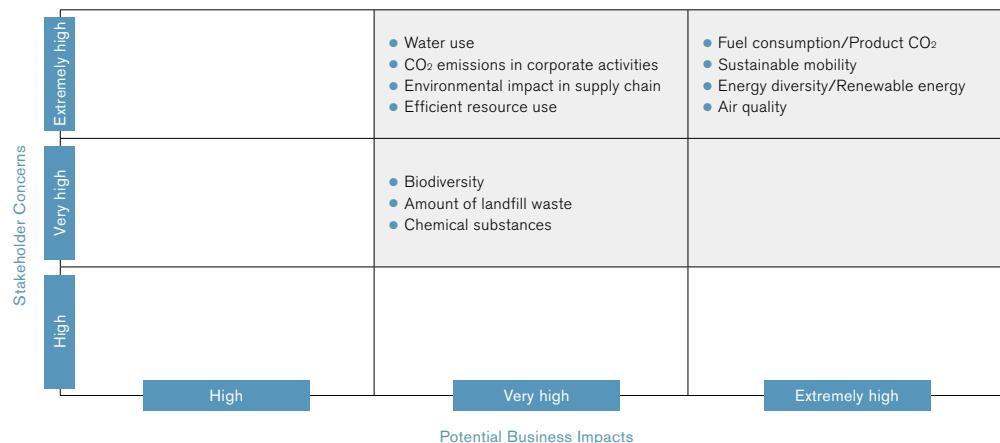
There are many stakeholders in all the stages of the value chain—from the extraction of resources needed to make vehicles to manufacturing, shipping, use and disposal of end-of-life vehicles. Nissan analyzes the reliance on resources and energy, impact on the environment and means of reducing that impact throughout the value chain. Based on this analysis, we position our customers all around the world, shareholders, investors, suppliers and other business partners, employees, governments, NGOs, residents of communities where we do business and even future generations as important stakeholders. Through a broad range of approaches, we identify stakeholder views and the diverse needs of society, taking them into consideration as we develop and implement environmental strategies.

As one example, Nissan holds regular Advisory Meetings with participation by researchers and experts who lead the environmental field in the academic and industrial worlds, as well as leading business people from various sectors. There they discuss the direction and appropriateness of Nissan's business strategies with members of the company's Board of Directors. This input is then considered in those strategies going forward.

Materiality Analysis

To reduce environmental impact, countries around the globe implement various regulations that affect the automotive industry in areas like exhaust emissions, CO₂ output, fuel efficiency, noise, chemical substances and recycling, and these are becoming more stringent year by year. To meet these tougher regulations and to respond to society's demands, Nissan uses materiality assessments to analyze potential opportunities and risks. We make those issues viewed by both Nissan and stakeholders as important our priority areas, working them into our environmental strategy.

Materiality Matrix



Environmental Issues for Nissan

Nissan believes that over the long term, the spread of zero-emission vehicles that produce no CO₂ during operation will be an effective way to reduce CO₂ emissions. With our Alliance partner Renault, we have set the goal of zero-emission leadership and are promoting uptake of zero-emission cars and aiming to bring about a sustainable mobility society. At the same time, we continue to develop new technologies to improve the fuel efficiency of our internal combustion engines.

Nissan also makes full use of the benefits of working together with Renault on environmental technologies and vehicles. This joint approach to technological development is both effective and efficient.

Nissan is also deeply aware of the importance of such issues as management of chemical substances, waste reduction, recycling and the potential depletion of water, energy and resource materials in certain regions, or globally in the future. We are taking steps throughout the value chain to address these issues.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

ZERO-EMISSION VEHICLE PENETRATION

Electric vehicles (EVs) are a product showing that what is good for the public and the planet is also good business. Under the Alliance with Renault, Nissan is engaged in a comprehensive approach involving boosting the production and sales of EVs as well as various activities through a wide range of zero-emission partnerships for popularization of EVs.

Zero-Emission Leadership for the Alliance

Nissan's commitment to sustainable mobility begins by addressing concerns over climate change and supports sustainable profits for Nissan by satisfying customers' demands for more environmentally friendly vehicles. Greater movement toward renewable energy such as solar, wind and hydropower in the future is expected to further enhance this segment, as EVs will be able to use energy from a variety of sources.

Nissan LEAF globally sold about 30,500 units in fiscal 2012, and cumulative sales exceeded 58,000 units from its debut in December 2010 through March 2013, making it the best-selling EV in the world. Nissan is planning to introduce three additional EV models; combined with Renault's four EV models already on the market, this will bring the Alliance total to eight EVs. The Renault-Nissan Alliance will continue to lead the auto industry with the highest level of global EV sales.

The Updated Nissan LEAF

Nissan LEAF, our all-electric vehicle, runs on a lithium-ion battery and electric motor and emits no CO₂ or exhaust during operation. This EV offers excellent performance and driving feel, with smooth, strong acceleration and quiet delivery across a speed range comparable to that of upscale models, as well as great handling stability realized by well-balanced weight distribution. All of this has earned Nissan LEAF high marks from its customers since its debut in 2010. In November 2012, we launched the updated Nissan LEAF in Japan. This improved version achieved weight reduction of up to 80 kg with its combined powertrain unit, integrated functions, and streamlined battery module and case structure. Additional improvements to the regenerative braking system and optimization of the battery controls have enabled a maximum driving range of 228 km on a full charge (as measured in JC08 Japan test mode).

We also show consideration for the environment in Nissan LEAF's manufacturing stage, such as by using a highly capable motor that reduces usage of the rare earth element dysprosium by 40% compared to the previous model. The advanced IT systems onboard the vehicle have allowed the driver to control some functions remotely, via a smartphone or other device, since Nissan LEAF was first launched. In the updated model, we have responded to customer requests with enhanced driver support functions, such as guidance on recharging stations nearby and the most energy-efficient routes to take. The updated Nissan LEAF went on sale in the United States and Europe in 2013.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL



► page_40

* Click here for more information on the lifecycle assessment on Nissan LEAF.

Our calculations show that Nissan LEAF produces considerably less CO₂ emissions over its entire lifecycle, from manufacturing to end-of-life disposal, compared to gasoline-powered vehicles of the same class.* EV batteries can do more than just provide power for driving. As energy storage devices, they can play a key role in supporting the broad rollout of renewable energy. This makes them a promising contributor to the achievement of a low-carbon society as a whole—not just the vehicles within that society.

Nissan plans to bring many new EVs to the market, including the all-electric commercial vehicle e-NV200 and luxury models under the Infiniti brand.



Nissan LEAF

Zero-Emission Taxis Around the World

In January 2013 Nissan announced it would provide 10 Nissan LEAF units for use in the taxi fleet of the city of Zurich. A total of 20 Nissan LEAF taxis are scheduled to be on the roads by the middle of the year. City officials project that EVs will comprise fully 15% of its taxi fleet by 2015, and work is underway to build a network of quick-charging stations to support them. Relying on zero-emission vehicles for taxis is of course a way to reduce CO₂ emissions from this mode of travel. It is also a way to establish the practicality of EVs in real-world testing and to spread these vehicles as a proven means of travel for individuals.

A growing number of large cities around the world are turning to Nissan LEAF as a taxi vehicle, including Amsterdam, New York, Tokyo, Mexico City, Sao Paulo and Guangzhou, China.

Field Testing for the e-NV200

The e-NV200—Nissan's second mass-produced all-electric vehicle, following Nissan LEAF—is scheduled to launch in fiscal 2014. Nissan has road tested the e-NV200 since 2011 with several other major companies, including the Japan Post Service Co., AEON Retail Co., Ltd., Coca-Cola Central in Japan, British Gas in Europe and FedEx Express as a global project. Nissan is using the feedback from the field testing to refine and enhance the final development of the vehicle.

Providing a large, multi-use interior space to both business and private users, the e-NV200 small van will deliver innovation in the commercial vehicle market and further Nissan's leadership in the EV market. Combining the advanced powertrain of Nissan LEAF with the roominess and versatility of the NV200 base vehicle will deliver not only zero CO₂ emissions but also excellent acceleration and quietness.



e-NV200

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Venucia e30 Unveiled at Guangzhou Motor Show

Boosted by a Chinese government plan to develop the industry for energy-efficient and new-energy vehicles, the market in China is seeing growth in EVs and plug-in hybrid vehicles. Dongfeng Nissan Passenger Vehicle Company—a division of Dongfeng Motor Co., our joint venture in China with the Dongfeng Group—will market the Venucia e30, a 100% electricity-powered vehicle, by 2015. With the Venucia mark, Dongfeng Nissan aims to offer high-quality, high-utility models that are within the reach of all Chinese drivers. In 2013 pilot programs will begin in 15 cities, including Guangzhou and Dalian, to put the Venucia e30 to use and test practical use of EVs on China's roads.

Commercial Viability of Fuel-Cell Electric Vehicles

Fuel-cell electric vehicles (FCEVs) are another type of zero-emission vehicle producing no CO₂ or other emissions. Powered by electricity generated from hydrogen and oxygen, they emit only water during driving. FCEVs are the obvious next step to complement today's battery-powered EVs as our industry embraces more sustainable transportation. Our FCEVs make use of the lithium-ion batteries and high-power electric systems refined in our EV development, as well as the control systems from our hybrid vehicles and the high-pressure gas storage technologies from our compressed natural gas vehicles (CNGVs). In 2011, we announced the development of the hydrogen supply infrastructure in Japan with 12 other companies toward the launch of FCEVs.

We also unveiled the next generation fuel-cell stack for our FCEVs. According to our calculations, the new stack provides a power density 2.5 times greater than the previous model, at 2.5 kW per liter. This reduces the use of platinum and the variation of parts to one quarter the levels of the 2005 model, thereby allowing us to reduce its size to less than half and the cost to one-sixth.

In January 2013, Daimler AG, Ford Motor Company and Nissan, under the Alliance with Renault, signed a unique three-way agreement for the joint development of a common fuel-cell system. The goal of the collaboration is to jointly develop an FCEV system while reducing investment costs associated with the engineering of the technology, lowering manufacturing costs through economies of scale and integrating the companies' knowledge. This will help us to launch the world's first affordable, mass-market FCEVs as early as 2017.

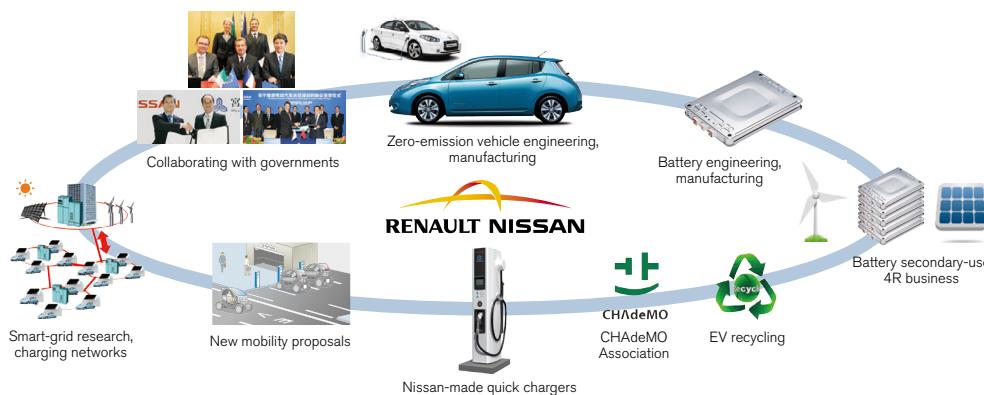
Pursuing a Zero-Emission Society

The widespread use of zero-emission vehicles, which produce no CO₂ emissions during operation, is an effective way of helping to achieve sustainable mobility. The auto industry must go beyond producing and selling zero-emission vehicles to help put the necessary infrastructure in place and assure that the vehicles are economical to use—goals that no company can accomplish on its own. The Renault-Nissan Alliance, with its commitment to zero-emission leadership, is promoting the development and production of EVs, zero-emission mobility and construction of needed infrastructure, forging more than 100 zero-emission partnerships with national and local governments, electric power companies and other partners.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

We are also taking part in a comprehensive range of initiatives focusing on zero-emission mobility, including the production of lithium-ion batteries, secondary use and recycling of batteries, in-house manufacture and sale of quick-charging equipment, construction of vehicle-charging infrastructure and standardization of charging methods with other manufacturers. Increased uptake of zero-emission vehicles will bring changes to people's lifestyles, laying the groundwork for a sustainable mobility society. Nissan provides more than just EVs themselves; we propose the new values that they offer as well.

A Comprehensive Approach to a Zero-Emission Society



Local Production of Nissan LEAF and Its Batteries

In Japan, lithium-ion batteries for Nissan LEAF are produced at the Automotive Energy Supply Corporation (AESC) plant in Zama, Kanagawa Prefecture, a joint venture launched by Nissan and NEC Corporation. This plant builds battery modules, each containing four battery cells, and ships them to the Nissan Oppama facility, where 48 of them are assembled into the electric car's battery pack for installation in a Nissan LEAF.

The production of Nissan LEAF and the EV batteries outside Japan is also underway. In the United States, we began production of the batteries at the all-new Nissan plant in Smyrna, Tennessee, in December 2012. At full production speed, the plant will produce up to 150,000 EVs and 200,000 lithium-ion battery packs per year, creating up to 1,300 new jobs.

For the European market, we have already been manufacturing lithium-ion batteries at the Sunderland Plant in the United Kingdom. In March 2013 Sunderland also began manufacturing EVs themselves. Once fully ramped up, the plant will have annual production capacity of 50,000 EVs and 60,000 battery packs, and will provide jobs directly to 200 workers and indirectly create 600 new jobs in the U.K. supply chain.

"LEAF to Home" Smart Power Supply System

In May 2012, Nissan unveiled a new system in Japan, "LEAF to Home," which lets the lithium-ion batteries installed in Nissan LEAF supply electricity to households through the EV Power Station built by Nichicon Corp. Nissan LEAF can make the electricity in its battery available to a house when the car's quick-charging port is connected to the house's electricity distribution panel. This system provides completely new value made possible by the all-electric vehicle's battery. In addition, the connector complies with the CHAdeMO Association's protocol for quick chargers, known for its versatility, safety and reliability.

With "LEAF to Home," Nissan LEAF can be used as an electricity storage device for houses in times of power outages or shortages. The lithium-ion batteries can store up to a maximum of 24kWh of electricity, making it sufficient to supply a household with a stable amount of electricity throughout the day. The system can also help to reduce the burden on the power grid by charging Nissan LEAF with electricity generated at night (often at lower cost to the consumer), or through sustainable methods such as solar power, and using it during high-demand periods.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

The "LEAF to Home" power supply system has won the Ministry of Economy, Trade and Industry (METI) Minister's Prize in the Grand Prize for Excellence in Energy Efficiency and Conservation program for its high efficiency and energy savings.



The power supply system won the METI Minister's Prize.



"LEAF to Home" with EV power station developed by Nichicon Corp.

Popularization of Power Supply Systems

Nissan is promoting a power supply system that uses a Nissan LEAF battery as its power storage device. In April 2012, we helped the city of Yokosuka, Kanagawa Prefecture, to install systems manufactured by Tsubakimoto Kogyo Co., Ltd. and Tsubakimoto Chain Co. at a public facility. These bidirectional systems can both charge EVs and draw power from EV batteries as needed. By pairing these systems with the EV taxis that are already on Yokosuka's streets, we can help "peak shift" power usage to alleviate shortages in times of heavy demand, as well as make electricity available during a disaster or other emergency.

Nissan is also forming a wide range of partnerships to promote installation of power supply systems at individual homes and apartment complexes.

The Nissan New Mobility Concept

The Nissan New Mobility Concept is a 100% electric vehicle that was developed in response to rising numbers of senior citizens and single-member households, along with increasing use of automobiles for short-distance trips by up to two people. Even smaller than a compact vehicle, it gives the driver excellent views of the surroundings and a better feel for the dimensions of the vehicle, making it an ideal choice for residential neighborhoods and other areas with narrow streets offering poor visibility.

In fiscal 2011, Nissan conducted driving trials on public roads with the authorization from Japan's Ministry of Land, Infrastructure, Transport and Tourism (MLIT) in the city of Yokohama and the prefectures of Aomori and Fukuoka, using local traffic systems and numerous studies. Also, from July 2012 to the end of March 2013, the vehicle was utilized for patrols by the Kanagawa Anticrime Seagull team, a voluntary group operating with approval from the Kanagawa Prefectural Police.

In February 2013, the city of Yokohama and the railway company Tokyu Corp. surveyed monitors using the Nissan New Mobility Concept as part of a program to plan smart communities of the future. Nissan carries out activities like these to produce fresh ideas toward the realization of new EV uses and smooth traffic flows for society, as well as to consider potential ideal forms of tomorrow's communities.



Nissan New Mobility Concept

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Infrastructure to Help the Spread of EVs

Nissan commenced sales of its new proprietary quick-charging unit at Nissan parts dealers throughout Japan in 2011. This unit retains the high performance of the previous version in approximately half the volume, allowing installation in smaller spaces. We have been installing charging units in our dealers since the launch of Nissan LEAF. As of the end of fiscal 2012, all of our dealers had installed ordinary chargers and 800 dealers had also installed quick-charging units in Japan.

In Japan, Nissan, Sumitomo Corp., NEC Corp. and Showa Shell Sekiyu K.K. jointly established a new recharging service company in 2012. This new company, Japan Charge Network Co., Ltd., has already begun trial service. Its infrastructure network now includes Nissan auto dealers, convenience stores in Kanagawa Prefecture and Narita Airport. The company is steadily building up a nationwide recharging infrastructure with full consideration of user convenience and the ways drivers will actually make use of it.

Nissan is also taking part in a program run by the Ministry of Economy, Trade and Industry (METI) to promote next-generation vehicle-charging infrastructure. The plan is to install approximately 36,000 quick-charging units around Japan, a figure to match the number of gas stations operating in the country. We are currently considering ideal installation locations and methods of operation for these units.

Infrastructure-related efforts are underway overseas as well. At the end of January 2013, Nissan announced it would work together with auto dealerships, local governments, and companies like NRG Energy, Inc. and its eVgo charging network to install more than 500 new quick-charging stations for EVs within the following 18 months, thus quadrupling the number available to U.S. drivers. Earlier in that same month, we also announced our participation in the Workplace Charging Challenge launched by the U.S. Department of Energy, which will see us supporting the installation of charging stations at office buildings and other workplaces across America.

The Nissan Zero Emission Fund

In June 2012, we launched the Nissan Zero Emission Fund for individual Nissan EV owners in Japan. Through this program, Nissan LEAF owners are able to generate CO₂ emission credits that are certified by METI and sold to the Green Investment Promotion Organization, an organization that promotes investment in low-carbon emissions. The system calculates and certifies the amount of CO₂ emissions that are avoided by driving zero-emission vehicles. Profits from the sale of the credits will be invested by the fund to support the installation of quick-charging facilities and forest conservation activities to accelerate the realization of a zero-emission society. The CO₂ emission reductions are calculated by total distance traveled, so the more customers that take part, the more reductions can be achieved.

Nissan will also engage in forest conservation efforts together with More Trees, a general incorporated foundation in Japan. Nissan and More Trees will use part of the profits generated by the fund to facilitate conservation of thinning forests in Japan that need reforestation, to be designated "LEAF Forests." LEAF Forest work will begin in three villages in Yamanashi Prefecture that are riverhead areas for the Kanto region: Tabayama, Kosuge and Doshi.

Joint Venture to Promote Second-life Use for Batteries

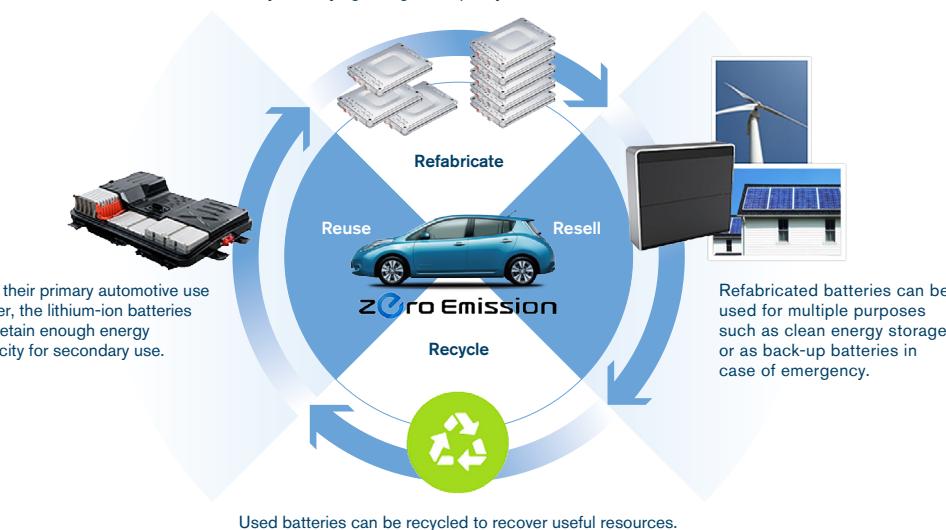
Even after the high-performance lithium-ion batteries used in Nissan's EVs reach the end of their useful life in cars, they retain the capacity to let them play useful roles. "4R" business models—which reuse, resell, refabricate and recycle lithium-ion batteries—allow their effective use for energy storage solutions in a range of applications, thus creating a much more efficient energy cycle of battery use.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

As the EV market expands, Nissan sees a need to utilize reusable lithium-ion batteries more effectively. In 2010 we launched 4R Energy Corporation, a joint venture with Sumitomo Corp. This company is developing and testing stationary power units based on used EV batteries. Japan is expected to see rising demand for stationary batteries as part of energy storage and backup power systems that also feature solar panels on homes or business structures, and 4R Energy is installing such batteries in houses and apartment buildings. 4R Energy home-use lithium-ion battery systems have already been installed in Park Tower Shinonome, a 585-unit residential structure built by Mitsui Fudosan Residential Co., Ltd. in Tokyo, and in Smart Solabo, a "smart house" designed by Sumitomo Forestry Co., Ltd.

4R Concept

Battery module structure will be redesigned to create new packages that satisfy the varying voltage or capacity needs of customers.



FUEL-EFFICIENT VEHICLE EXPANSION

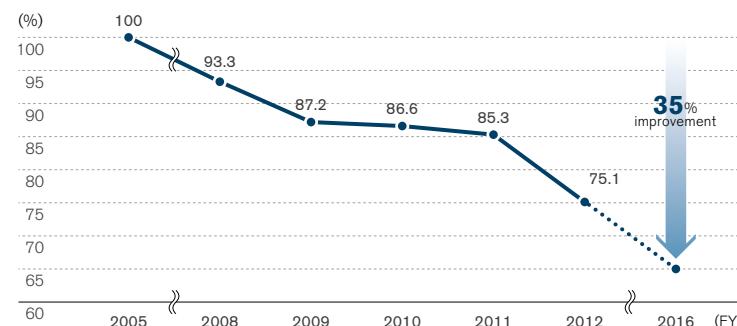
Demand for motor vehicles is expected to continue to rise along with mature market recovery and emerging market expansion. Nissan is making efforts on the greatest possible improvements to the fuel efficiency of gasoline-powered engines and introducing more fuel-efficient vehicles to the market.

Improved Corporate Average Fuel Efficiency

Nissan has been making an ongoing effort to develop technologies to maximize the energy efficiency of vehicles with internal combustion engines and hold CO₂ emissions down. The marketing of vehicles with such technologies is one way that we are helping reduce CO₂ emissions. The name we give to particularly low-emitting, fuel-efficient vehicles is PURE DRIVE. The core technologies in these vehicles include one or more of: lithium-ion batteries; one-motor, two-clutch parallel hybrid systems; and next-generation continuously variable transmission (CVT) systems. Many more of our new cars will be carrying these technologies.

Our target by fiscal 2016 is a 35% improvement in corporate average fuel efficiency from the fiscal 2005 level (as measured in average fuel efficiency in the Japanese, U.S., European and Chinese markets). Our result in fiscal 2012 was 24.9% improvement from the fiscal 2005 level.

Corporate Average Fuel Efficiency



CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Top-level Efficiency in Various Classes

¹ As measured in highway mode used in North America.

² All figures as of time of sale in 2012. The respective classes were: gasoline vehicles with engine displacement of 1.0 liters or more (excluding hybrids and kei "minicars") for Note; 4-door sedans under 1.5 liters (excluding hybrids) for Latio; and 1.5-liter-class 4-door sedans (excluding hybrids) for Sylphy.

³ As measured in the European fuel-economy mode also used in China.

The Altima was one of the best-selling cars in the United States in 2011. In June 2012, Nissan introduced the 2013 Altima in the North American market. With attributes including exterior styling with a strong presence, excellent aerodynamics, an upscale interior as well as ride comfort with best-level acceleration, the all-new model delivers environmentally sound performance. The new Altima achieves best-in-segment fuel economy of 38 mpg¹ in the U.S. mid-size sedan segment thanks to the combination of a newly-designed 2.5-liter inline four-cylinder engine combined with the next-generation Xtronic CVT, as well as a reduction in vehicle weight by around 80 pounds (36 kilograms) by utilizing aluminum in hood and bumper reinforcements, and expanding the use of high-strength steel for more than half of the vehicle body.

Other vehicles achieving class-leading fuel efficiency during fiscal 2012² were the Note (25.2 km/l, JC08 mode) and the Latio (22.6 km/l, JC08 mode) in the Japanese market, and the Sylphy (6.3 liters/100 km³) in the Chinese market. Nissan will continue to introduce models with class-leading fuel economy, making use of the fuel-efficiency technologies that best match vehicle size, use and price.

A Broader Lineup of Hybrid Vehicles

Hybrid vehicles, which run on a combination of a gasoline-powered engine and an electric motor, may allow improvement of fuel efficiency and considerable reductions in CO₂ emissions. Nissan has developed a unique hybrid system using a high-output lithium-ion battery together with a single motor for both drive and regeneration, as well as an Intelligent Dual Clutch Control system in which two clutches are linked in parallel, one to the motor and one directly to the engine and transmission. The system was used for the Fuga Hybrid in 2010, Infiniti M Hybrid in 2011 and the Cima in 2012. These hybrid vehicles deliver both fuel efficiency and powerful responsiveness.

Nissan is also developing a hybrid system for front-wheel-drive vehicles. The single-motor, dual-clutch system now used in rear-wheel-drive vehicles will be incorporated into a next-generation Xtronic CVT, achieving a compact and versatile arrangement that can be featured in a wide range of vehicles.

In August 2012, we added a new version of the Serena with a simpler and more compact hybrid system, achieved by enhancing the energy regeneration capacity of the ECO motor—enabling it to serve as an auxiliary motor—and adding a sub-battery in the engine room to boost storage capacity.

Taking into account factors like roominess of the interior and vehicle use, Nissan will utilize the hybrid system best suited to each model. Fifteen new hybrid models are planned by fiscal 2016.



Serena S-Hybrid

Progress in Plug-in Hybrid Vehicles

Plug-in hybrid electric vehicles (plug-in HEVs) have batteries that are recharged by means of household electrical outlets or other external power sources, and are capable of running on motors similar to those of electric vehicles. Nissan is advancing research and development of plug-in HEVs and will launch such a model during fiscal 2015.

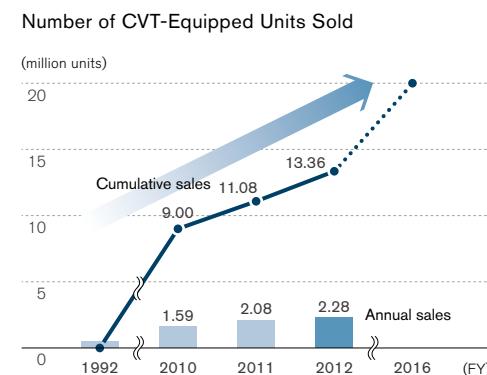
Global Rollout for Our New CVT

The continuously variable transmission (CVT) enables smooth acceleration without noticeable gear changes. It also allows selection of the optimum engine speed to match the vehicle's rate of travel, thus achieving powerful driving with lower fuel consumption. In 2011, Nissan unveiled its new-generation Xtronic CVT for use in cars with 2.0- to 3.5-liter engines. This addition expanded the lineup of Nissan cars with CVT technology from the 1.2- to 3.5-liter classes.

The new Xtronic CVT features a world-leading ratio coverage of 7.0 (specific to 2.0- to 2.5-liter engine vehicles) and has reduced friction by

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

approximately 40% from previous versions. These factors have improved fuel efficiency by up to 10% (in-house measurement using U.S. Environmental Protection Agency combined mode) compared to similar vehicles with older CVTs. The technology was incorporated into the new Altima launched in North America in 2012 and will be featured in vehicles sold around the world. Nissan's goal is to ship 20 million CVT-equipped vehicles, first launched in 1992. We sold 2.28 million CVT vehicles in fiscal 2012, bringing the cumulative total to 13.36 million.



Toward Lighter Vehicles

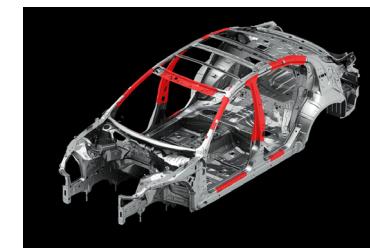
Vehicle weight reduction is an important activity that contributes to improved fuel economy. Nissan is promoting vehicle weight reduction by optimizing vehicle body structure, better forming and joining techniques, and material substitution.

We are seeking weight reduction in steel parts and promoting the use of Advanced High Tensile Strength Steel (AHSS). In March 2013, Nissan announced the development* of 1.2 gigapascal (GPa) Ultra High Tensile Strength Steel with High Formability and its use in the new Infiniti Q50, which goes on sale in North America in 2013. With the use of AHSS and other measures, the total weight reduction for the Infiniti Q50 reached about 40 kg. The jointly developed 1.2GPa Ultra High Tensile Strength Steel with High Formability provides greater elongation through an optimal combination of materials, offers strength and high formability, and can be used in vehicle parts with highly complex shapes. Employing 1.2 GPa Ultra

* Jointly developed by Nissan Motor Co., Nippon Steel & Sumitomo Metal Corp. and Kobe Steel.

High Tensile Strength Steel with High Formability leads to fewer materials used per vehicle produced, and existing production lines can be used without a big modification. This results in a reduction in total cost per unit.

Nissan will expand the use of AHSS up to 25% of the vehicle parts (measured by weight) installed in its new production models starting in 2017.



1.2 GPa Ultra High Tensile Strength Steel with High Formability in the Infiniti Q50 (red shaded areas)

Reducing Traffic Congestion with ITS

An automobile's fuel efficiency depends not just on the car's own capabilities but on the environment in which it drives and the way it is driven as well. Nissan is actively working to create societal infrastructure that will help to improve the traffic environment. Intelligent Transport Systems (ITS) are a particularly important part of our efforts, and we are collaborating with others in a variety of industries to craft solutions to tough problems like road congestion that automakers cannot tackle on their own.

Under commission from Japan's New Energy and Industrial Technology Development Organization (NEDO), Nissan has since 2010 been working with the Beijing Municipal Commission of Transport to conduct experiments with a dynamic route guidance system (DRGS) using IT terminals and eco-driving support to alleviate traffic congestion in the city. Some 12,000 DRGS-equipped vehicles have been monitored in the city's Wangjing district to measure the system's traffic-dispersing impact over two and a half years. The effectiveness of the system in reducing driving time and improving fuel efficiency has been confirmed, and the technology is expected to be applied in broader areas in the future.

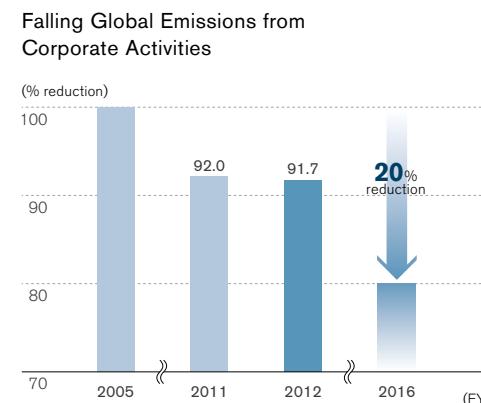
CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

CORPORATE CARBON FOOTPRINT MINIMIZATION

We are said to be in a carbon-constricted world, and reducing CO₂ emissions is a task to be tackled by all companies. Nissan is improving energy efficiency and promoting renewable energy adoption, to reduce CO₂ emissions.

A 20% CO₂ Emission Reduction in Corporate Activities

By fiscal 2016, Nissan aims to reduce the CO₂ emissions associated with its corporate activities by 20% globally from the fiscal 2005 level, as measured by the index of "CO₂ emissions per global vehicle" (total emissions generated from Nissan global corporate activities divided by the total Nissan vehicle sales volume). To achieve this goal, we widened the scope of measurable objectives in fiscal 2011 to include logistics, offices and dealerships in addition to production sites, and strengthened management. Our result in fiscal 2012 was 8.3% (t-CO₂/vehicle) reduction from the fiscal 2005 level.



Energy Saving in Global Production

Most of the CO₂ emissions in the manufacturing process come from the consumption of energy generated with fossil fuels. We are engaging in a variety of energy-saving activities in manufacturing our vehicles.

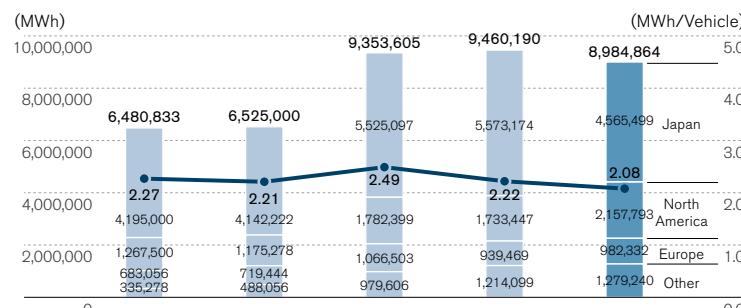
We are promoting the use of renewable energy sources appropriate to the location of each of our global plant sites. Since 2005, we have installed 10 power-generating wind turbines on the grounds of Nissan Motor Manufacturing (UK) Ltd., which together provide 6,500 kW, about 5% of the electricity used at the entire site. In Japan, Nissan is cosponsoring the city of Yokohama's Y-Green Partner program for wind power generation. Nissan Motor Iberica, S.A., in Spain has set up solar energy panels. Nissan Mexicana, S.A. de C.V., has established infrastructure at its Cuernavaca Plant to produce hot water by solar energy, and also started using energy generated from biogas in 2012, and wind power in 2013 in its Aguascalientes assembly plant.

In production technology, we are introducing highly efficient equipment, improving manufacturing techniques and adopting energy-saving lighting. Our plants use finely controlled lighting and air conditioning for low-energy-use, low-loss operations. We are promoting CO₂ emission reduction activities and introducing our cutting-edge energy conservation technology from Japan in Nissan plants worldwide. Meanwhile, our plants in all countries learn and share best practices with each other. In addition, we promote various activities aimed at reducing CO₂ emissions, such as by forming a team of technicians called Nissan Energy Saving Collaboration (N-ESCO); this team surveys the status of energy-loss at our plants in Japan and overseas and proposes new energy-saving countermeasures.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

With these activities, we set a target of reducing CO₂ emissions by 27% below the fiscal 2005 level by fiscal 2016, as measured by the index of "CO₂ emissions per global vehicle" (total emissions generated from global Nissan vehicle manufacturing sites divided by the total Nissan vehicle production volume). In fiscal 2012 our CO₂ emissions per global vehicle were approximately 0.62 tons, a reduction of 15.2% from the fiscal 2005 level.

Global Energy Consumption



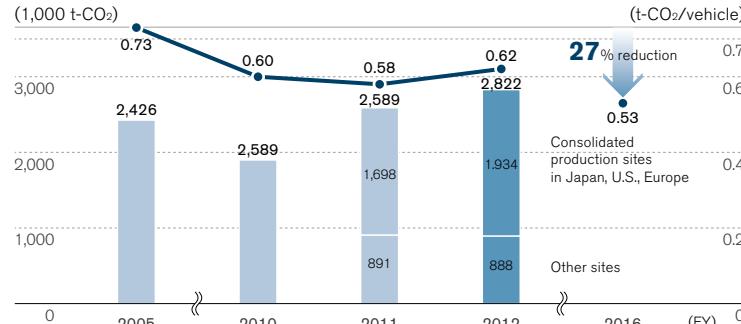
The figures are for the Nissan Group worldwide, including consolidated companies.



► page_141

The figures are for the Nissan Group worldwide, including consolidated companies. CO₂ emissions of 1,934 kton from Japan, U.S. and Europe have received third-party certification. For details, please refer to the environmental data at the end of this report.

Global CO₂ Emissions from Manufacturing Activities



Top-Level Energy Management in North America

In May 2012, Nissan's Smyrna Vehicle Assembly Plant in Tennessee obtained certification under ISO 50001, the international standard for energy usage, and Superior Energy Performance (SEP) certification from ANSI, the American National Standards Institute. As the first automobile manufacturing facility to receive either of these certifications, the Smyrna Plant has established its position as a U.S. leader in energy management.

The U.S. Department of Energy began field tests in 2008 as part of the SEP program to gauge energy management standards in preparation for the introduction of ISO 50001. Nissan was one of seven companies taking part in these field tests, which went on for three years. The Smyrna Plant succeeded in improving its energy efficiency by 7% by implementing three steps: (1) crafting approaches to reduce energy consumption, (2) implementing strategies to conserve energy and (3) sustaining efficient practices.

The U.S. Environmental Protection Agency recognized Nissan North America (NNA) as an Energy Star Partner of the Year for three straight years beginning in 2010 as part of the international Energy Star program. In 2012, NNA also received the Energy Star Partner of the Year—Sustained Excellence award. Since first taking part in the program in 2006, NNA has reduced its energy consumption by a total equivalent to some 800 billion BTUs.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Renewable Energy for the Aguascalientes Plant in Mexico

The Aguascalientes Plant of Nissan Mexicana, S.A. de C.V., is one of Nissan's major global production sites. The plant produced more than 385,000 units in 2012, and has established sustainable production operations.

In 2012 the Aguascalientes facility became the first automotive plant in Mexico, and Nissan's first plant globally, to use biogas-generated electricity for its manufacturing operations. The plant is taking part in a project that uses waste as its main resource, and is registered with the United Nations Clean Development Mechanism (CDM) through a coordinated operation between the city of Aguascalientes and the private sector. The first undertaking of its type in Mexico, this project produces biogas from approximately 3.9 million tons of landfill waste. In 2012 our Aguascalientes Plant used about 9.3 GWh of electricity generated from biogas, bringing its renewable energy use ratio to 5% of all power consumed. In January 2013, the plant also started to source electricity generated by wind-power stations, raising this ratio to 50%. In other words, starting in 2013 one of every two Nissan vehicles produced in Aguascalientes is assembled using sustainable resources. Nissan Mexicana plans to further expand its use of clean energy in line with its "Cleaner and Cheaper" policy.



More Efficient Logistics and Modal Shifts

In 2000, Nissan began sending chartered trucks for pick-up and delivery of parts, an uncommon method among automobile manufacturers in Japan at the time. This approach has been adopted widely at our overseas manufacturing sites, increasing the global efficiency of our operations. We have also worked together with suppliers to optimize the frequency of deliveries and transport routes and to improve packaging specifications in order to improve loading ratios and reduce the number of trucks required.

We devise efficient modes of packaging for the huge number of parts of different shapes and materials that go into our automobiles. Through simultaneous-engineering logistics activities, we work from the design stage to create parts and develop new vehicles with consideration for transportation efficiency, as well as to reduce the part shipments per vehicle. We also monitor the competency levels of packaging design engineers and are cultivating their abilities through global adoption of an original Nissan program.

In the area of container transport, we have long made use of high cube containers and run software-based simulations to reduce wasted space inside of containers. As a result of these activities, our container filling rate of repair parts rose from 89.6% in fiscal 2010 to 93.8% in fiscal 2011.

We constantly review our transport methods and are currently undertaking a modal shift to rail and maritime transport. Some 70% of our completed vehicles in Japan are now transported by sea. Part shipments from the Kanto area around Tokyo to Nissan Motor Kyushu Co., Ltd. are nearly all by rail and ship. The Japanese Ministry of Land, Infrastructure, Transport and Tourism (MLIT) has recognized Nissan as an outstanding enterprise for this modal shift to sea transport.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

At Nissan sites outside Japan, transport methods are selected to best match the local geographical conditions. Transport of completed vehicles is increasingly shifting from truck to rail and ship, depending on the destination. In China, we are increasing the proportion of completed vehicles that are transported domestically by ship or rail.

Since 2010 we have also been promoting the use of energy-efficient vessels for sea shipments of our vehicles. In January 2013 we introduced our fourth eco-ship, the *Nissei Maru*. This ship uses solar panels, an electronically controlled diesel engine, LED lighting and other features to operate while reducing CO₂ emissions by up to 4,200 tons per year compared to similar vessels from previous generations.

Global CO₂ Emissions from Logistics



Our Efforts at Dealerships and Offices

Nissan is promoting CO₂ emission management at all business locations and dealerships in Japan, as well as at bases of operations in North America, Europe and China. In all four of these markets the aim is to slash emissions by 1% each year. At our offices, we have improved the video and telephone conference facilities, and we use Microsoft's Office Live Meeting web conferencing service to bring participants in multiple locations together when they need to share documents. This not only lessens the number of business trips needed but also improves workplace efficiency and reduces costs.

In Japan we are undertaking a broad range of efforts. For instance, in February 2012 we moved to a paperless system to replace the pay slips that had been distributed to all employees previously. These slips can now be downloaded via the Internet and viewed on computers or mobile phones. Many of our dealers, meanwhile, are making efforts to save energy, including the use of highly efficient air-conditioning, insulation films, ceiling fans and LED lighting.

Solar Power and Monitoring Electricity Consumption

In Japan, Nissan is working to build dealerships with reduced environmental impact. In May 2011, when Chiba Nissan rebuilt its Kita-Narashino dealership, it installed solar panels with a 10 kw generation capacity, as well as an in-store monitor to manage the electricity that is generated. The monitor shows how power is produced by the solar panels and how much power is being generated at the time. This easy-to-understand system has been favorably received by customers and has helped to raise employees' awareness about saving energy. Electricity costs at the dealership have been reduced by about 12% compared to the previous year.



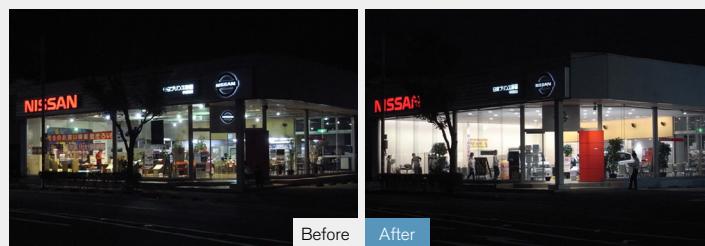
CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Sales Outlets that Stand Out with Less Power

Nissan studied dealership lighting approaches to find a way to keep sales outlets easy to find and attractive to customers while also saving power. The solution was put into action at the Nissan Prince Shizuoka Nakamura-cho sales outlet in Shizuoka Prefecture. This was achieved with support from the company Seikatsu Kankyo Kobo ACT, the Hirate Laboratory in the University of Tokyo's Department of Architecture and Endo Lighting Co., Ltd., all of which collaborated with Nissan in the redesign of the dealer's lighting plans and collectively oversaw the project.

As a first step, the Nakamura-cho dealer changed all its lights to highly efficient LED units and adopted a lighting design with varied brightness levels in different parts of the sales floor. Additionally, it moved vehicles that required strong lighting close to the windows, allowing effective use of natural outside light. Conversely, the lounge space, which benefits from a more relaxed atmosphere, was placed in the rear section of the store. The ceiling and walls were given a more reflective white color, improving interior brightness and saving even more energy. To make it easier for customers to find and enter the outlet, a light spot was installed at the building entrance and the interior walls were illuminated to create a warm-colored ambience.

With these small-yet-innovative ideas, the Nakamura-cho dealer reduced power consumption by up to 50%. In recognition of its energy conservation efforts, the dealer was awarded the 2012 Energy-Efficient Lighting Design Award for power saving and lighting design in January 2013 by Japan's Ministry of the Environment in the "commercial facilities and accommodations" building category.



The outlet exterior before and after introduction of its new lighting system

NEW NATURAL RESOURCE USE MINIMIZATION

To address the risk of rising costs or depletion of mineral resources caused by growing demand for them and to reduce the environmental impact of their extraction, Nissan is making efforts to use resources more efficiently and to diversify its supplies with renewable resources and recycled materials.

Increasing Usage of Recycled Material to 25%

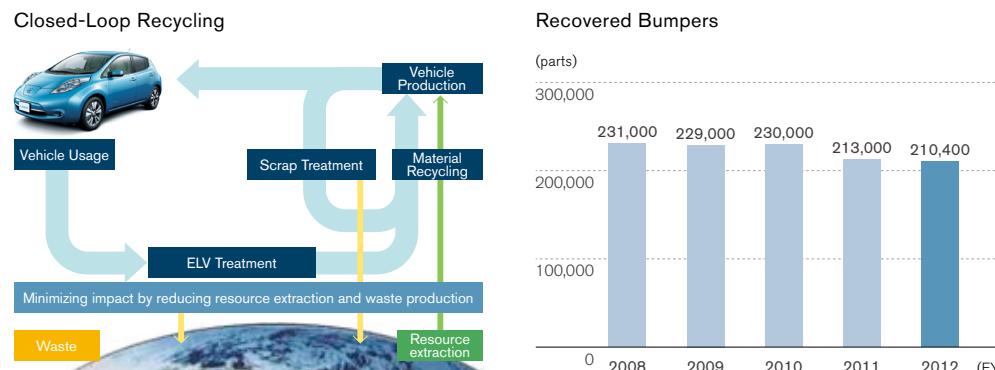
Demand for mineral resources and fossil fuels is growing rapidly as emerging countries develop economically. Some predictions forecast that all currently known mineral resources will have been extracted by 2050 if present trends continue. Some mining sites currently in operation and new exploration sites are located in areas where local ecosystems need to be preserved, and there is concern about the environmental effects of topsoil excavation, deforestation and wastewater.

Nissan is taking measures to address these issues. We are increasing use of renewable resources and recycled materials in addition to the traditional approach of using resources more efficiently to reduce reliance on them. Our efforts with respect to recycled materials are based on the thinking that once a natural resource is extracted it should continue to be used, while maintaining quality, to minimize environmental impact. We have set a target of increasing the usage rate for recycled materials per vehicle to 25% by fiscal 2016. In the long term, by promoting the activities that fall under the Nissan Green Program, we forecast that the volume of new natural resources used will be maintained at the level of the 2010s.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Our Closed-Loop Recycling System

Closed-loop recycling is a method of recycling waste and scrap generated during vehicle production and when end-of-life Nissan products are collected and using it as material in the same type of products while maintaining its quality standards. With this method, the same material can be used repeatedly, thus greatly reducing CO₂ emissions and the environmental impact over the product lifecycle. Together with our business partners, we are putting tremendous effort into collecting and reusing steel and aluminum sheet scraps from the manufacturing process and aluminum wheels from used vehicles. In fiscal 2012, we collected about 250 tons of end-of-life aluminum wheel rims each month. In Japan we are recycling plastic from finished bumper scraps at our plants and from scrap bumpers collected from dealerships. Collected scraps and bumpers are turned into recycled plastics in a finished bumper reprocessing line set up in our Oppama Plant. In fiscal 2012, we collected about 210,400 pieces of bumpers. Recycled plastics have already been given new life as bumpers in Nissan LEAF and many other new vehicles.



Raising the Recovery Rate

To optimize processing and improve the recovery rate for end-of-life vehicles (ELVs), Nissan carries out experimental studies to develop more efficient ways of dismantling its cars. To date, such research has focused on establishing methods of processing waste oil, waste liquids, lead and other substances that impact the valuable materials from ELVs. Feedback from the studies has led to improvements in dismantling techniques and has aided our product design division in choosing suitable materials and designing vehicles that are easier to dismantle. As of fiscal 2012, our own calculations showed that we have achieved a recovery rate of 99.3% in Japan.

Reducing Scarce Resource Usage

Hybrid vehicles and electric vehicles (EVs) emit less CO₂ over the lifecycle of the product than gasoline-powered vehicles, but scarce resources called rare earths are a necessary component of their motors. Uneven distribution of rare earth elements and the forces of demand and supply give rise to concern about price changes, making it important to reduce their usage.

In 2012, in a joint effort with our supplier, we developed a new electric motor that uses 40% less dysprosium (Dy), a rare earth element, compared to conventional EV motors. The new, more environmentally friendly motor powers an updated Nissan LEAF released in Japan in November 2012.

This new electric motor is only the first step in the process to limit the use of rare earth elements. Nissan plans to adopt the reduced-Dy motor for its hybrid vehicles, with the ultimate goal of achieving zero usage of Dy in other components as well.

Furthermore, we aim to reduce and optimize the usage of rare earth elements like cerium (Ce) and lanthanum (La), which are found in exhaust gas catalytic components and in cast iron. Our plans are to reduce annual use of rare earth elements by 30% by fiscal 2016 compared to the projected usage if no particular countermeasures had been implemented from fiscal 2011 onward.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

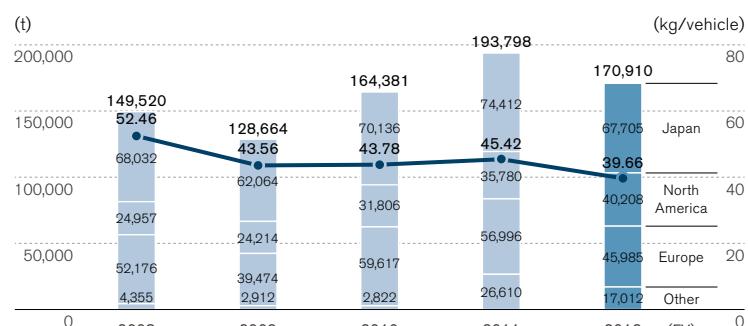
Thorough Measures for Waste Materials

Nissan actively promotes measures based on the three Rs—reduce, reuse and recycle—in its production processes whenever possible, striving to minimize the waste generated and maximize recycling efficiency by means of thorough sorting of waste. Our efforts have paid off. In Japan, since fiscal 2010 we have achieved a 100% recovery rate at all of our production sites: five manufacturing plants, two operations centers and five affiliates. In Mexico, the Aguascalientes plant achieved this in 2011. We are working to bring this rate to an industry-leading level in each region of the globe.

Nissan has been making great efforts to reduce the number of wooden pallets and cardboard boxes used in import and export parts shipping, replacing them with units made from steel for more than 30 years, and plastic for more than 20 years, that are foldable and can be returned for reuse. Since fiscal 2011, the adoption rate for these containers has exceeded 98%. We have also been working with our Alliance partner Renault to expand the use of globally standardized, returnable containers. Through design activities carried out concurrently with logistics operations, we have recently been considering ways to optimize the shape of parts from the development stage, thus helping to reduce the packaging materials we use.

Through these efforts, we plan to reduce the amount of waste from our production factories by 2% annually in Japan and by 1% annually worldwide compared to waste levels expected if no special steps had been taken from fiscal 2011 onward.

Total Waste Produced



The figures are for the Nissan Group worldwide, including consolidated companies. The figures include the waste volume from non-production sites.

Sales of Nissan Green Parts

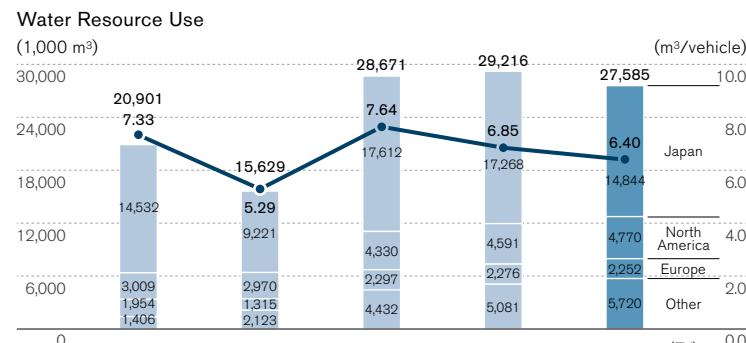
Parts with the potential for recycling include those reclaimed from ELVs as well as those replaced during repairs. In Japan, Nissan collects and thoroughly checks the quality of these secondhand parts. Those that receive a passing grade are sold through our sales outlets as Nissan Green Parts. We sell these parts in two categories: reusable parts, which are cleaned and tested for quality before sale, and rebuilt parts, which are disassembled and have components replaced as needed. Sales of these parts in fiscal 2012 reached ¥1.62 billion.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Water-Use Management

The issue of water resources is becoming ever more serious as water use increases due to global population growth and economic development. Plants producing Nissan vehicles and parts are located all over the world, and they all use water as part of the production process. We are making efforts to manage and reduce water usage at all of our production plants.

We carry out water-use assessments on an ongoing basis at all plants. Based on a Nissan-developed index of water risks, plants are categorized into three levels. Level A is defined as plants that either already have a water-related issue or are expected to face one in the near future; Level B as plants with potential water problems; and Level C as plants at low water risk. We are working to put in place activities matched to the conditions at each plant. We set water use targets for Level A plants in Australia, India, China and Mexico and began activities to reduce water use in fiscal 2011, and in Spain, Egypt and South Africa in fiscal 2012.



The figures are for the Nissan Group worldwide, including consolidated companies.

ENVIRONMENTAL MANAGEMENT PROMOTION

Nissan is introducing environmental management systems at all its operation sites worldwide. We are also working with our consolidated affiliates, sales companies and suppliers to reduce environmental impact during all stages of the supply chain.

Improving Environmental Management

As of January 2011, the Nissan Global Headquarters and all other main Nissan facilities in Japan, including those for R&D, production and logistics, along with all product development processes, acquired integrated ISO 14001 certification for environmental management systems. The ISO secretariat in Nissan, which oversees companywide efforts, and the local offices in Japan, which are responsible for activities at each facility and division and for coordinating the proposals from employees, meet at least once a month. In these meetings, they confirm the progress being made toward established goals, share best practices, improve management systems, draw up plans for the next fiscal year and communicate requests from the local facilities and divisions. The items discussed are reported to the COO, who is in charge of environmental management, twice a year (once during the management review conference) so that decisions on improvements can be made.

To confirm that this management is functioning properly, we undergo audits by third-party organizations, and we carry out our own internal audits of our environmental systems and environmental performance annually to strengthen the company's measures based on the PDCA cycle: plan, do, check and act. We have also obtained ISO 14001 certification at our main production plants outside Japan. Our policy is to extend environmental management systems with these same criteria to regions in which we are newly expanding.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Product Development Policy

We are aiming to become a "sincere eco-innovator," doing everything we can to help our natural environment, by reducing the environmental impact in real-world terms and providing customers with innovative products that contribute to the development of a sustainable mobility society. In order to achieve this goal, Nissan introduced "QCT-C" in 2006, adding a CO₂ component to the traditional QCT indices of quality, cost and time, for its Global CO₂ Management Way. We have set a target for CO₂ emission reduction in all areas of our business. Furthermore, under the Nissan Green Program 2016 (NGP2016), our environmental action plan, Nissan will annually invest 70% of its research and advanced engineering budget in environmental technologies.

Raising Employee Awareness

Nissan's environmental activities are sustained by the environment-related knowledge, awareness and competency of each of its employees. From this perspective, based on ISO 14001 activities, we conduct employee education rooted in NGP2016 regarding reduction of CO₂ emissions, energy and water consumption, and waste. In addition, education regarding environmental accident prevention, including the management of toxic materials, is provided to all employees including those from affiliated companies working in Nissan production facilities. At our production plants, ongoing improvements of employee competency to reduce environmental impact are promoted through not only education and training programs but also the quantitative evaluation of each employee. The content of these training programs is updated once a year.

In Japan, Nissan implements its own curriculum for the education provided to new employees during orientation and to mid-ranking and management personnel during the seminars in order to deepen their understanding of environmental issues surrounding the auto industry, as well as the substance of the NGP2016 program. Employees are kept up-to-date on Nissan's latest environmental initiatives through the intranet, internal newsletters* and in-house video broadcasts. All employees also receive an Environmental Policy Card with a pledge to pursue personal environmental activities, which they carry at all times.

* Nissan publishes a bimonthly newsletter, printing 60,000 copies that are distributed to not only current but also retired employees.

Overseas, we share information and provide education to employees through the intranet and various other communication tools suited to each region. During fiscal 2012, videos were created at Nissan Motor Ibérica in Spain, while Nissan North America hosted various events on Earth Day and other occasions.

Employee-Initiated Activities and Evaluation System

To reduce environmental impact, the perspectives and ingenuity of employees are essential. Therefore, in fiscal 2008, we added the "environment" factor to the range of *kaizen* activities carried out by quality control (QC) circles. This creates a mechanism by which employees are encouraged to think proactively and propose ideas to improve environmental aspects of Nissan's business. These QC circle activities are linked to achieve the goals in Nissan Power 88,* our mid-term business plan through fiscal 2016. The ideas proposed by employees are assessed by managers and QC circle secretariats in terms of such factors as how much they can contribute to environmental improvement; they are then implemented by the company.

Nissan uses various methods to reward employees for their contributions toward environmental improvement activities.

Working with Consolidated Production Companies

Nissan encourages its consolidated production companies both in Japan and overseas to acquire ISO 14001 certification, in addition to undertaking various other environmental initiatives based on their respective policies. Meetings with 10 major consolidated production companies in Japan were held during fiscal 2012 to exchange views on cooperation toward the goals outlined in NGP2016. The meetings lead to a deeper understanding of the details of NGP2016 and the initiatives being undertaken by each company. Approximately 650 people including board directors of these companies participated in fiscal 2012.



► page_87

* Click here for more information on Nissan Power 88.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Working with Sales Companies

Nissan's sales companies in Japan have introduced an original approach to environmental management based on ISO 14001 certification that we call the Nissan Green Shop certification system. This system is managed through internal audits conducted by the sales companies themselves every six months, in addition to regular annual reviews and certification renewal audits carried out every three years by Nissan Motor Co. As of the end of March 2013, 2,800 dealership outlets of 174 sales companies, including parts and forklift dealers, have been certified under the system.

Nissan conducts an annual survey of its sales companies in Japan, collecting comments and requests regarding Nissan's environment-friendly vehicles and other environment-related initiatives. The findings are shared with the presidents of sales companies and incorporated into the PDCA cycle involving Nissan and all sales companies, which is used to guide actions toward improved performance.

Working with Suppliers

The purchasing divisions of Nissan and Renault carry out supply-chain management in a manner consistent with *The Renault-Nissan Purchasing Way*, a booklet outlining policies for dealing with suppliers, and the *Renault-Nissan CSR Guidelines for Suppliers* published in 2010. In the environmental aspect, we adopted the Nissan Green Purchasing Guidelines, a set of standards for the environmental efforts of our automobile parts and material suppliers in 2008.

In fiscal 2012 we added a number of environment-related items in working with our suppliers in an effort to reduce the environmental impact of upstream processes in the supply chain. To do this, we ask suppliers for their environmental targets and data regarding their CO₂ emission levels and

energy use, and consider their management of environmentally hazardous substances, recycling of resources and water-conservation efforts. We also organized briefing sessions on NGP2016 for suppliers during fiscal 2012 to fully share our targets and action plans.



A briefing session for suppliers on NGP2016

Disclosures of Environment-Related Information

Companies today are being called upon to make a wide range of information disclosure about how they are managing risks related to such environmental issues as climate change and natural resources. In addition to advancing efforts to build a sustainable mobility society, since fiscal 2012 Nissan has been making detailed disclosures of its environmental performance on its website for stakeholders including investors, rating agencies and other specialists in accordance with GRI guidelines.¹ Among the data disclosed are CO₂ emission and waste discharge levels, as well as the amount of energy, water, materials and other resources consumed. We are also making communication efforts by organizing briefings to describe our environmental initiatives.

As a result of these activities, Nissan was listed in the Carbon Disclosure Leaders Index as one of the 22 highest scoring companies in the CDP Japan 500 Climate Change Report 2012² and achieved the highest position among automakers (second overall) in the 16th Nikkei Environmental Management Survey,³ conducted by Nikkei Inc.

¹ International guidelines published by the NGO Global Reporting Initiative aimed at promoting the policy formulation, planning and implementation of initiatives for environmental, social and economic development.

² The Carbon Disclosure Project collects, analyzes and discloses major companies' data on business risks and opportunities affected by greenhouse gas (GHG) emissions and climate change annually.

³ The survey, which contains 200 detailed questions about the organizations in place for environmental management, pollution countermeasures, responses to biodiversity, recycling of resources, environmental impact of products and measures to address global warming, was conducted to evaluate companies' balance between environment management and corporate strategy.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Environmental Classes for Kids

Nissan participates in eco-product exhibitions and various other events sponsored by government agencies and unaffiliated groups.

At the Eco-Products 2012 exhibition, Nissan's booth was a place to view the "LEAF to Home" exhibit and hear presentations that educated visitors on how EVs can help address society's energy issues by focusing on electric supply technology that utilizes EV batteries.

In addition, we offered environmental education classes called Nissan Waku-Waku Eco School with a focus on upper grades of elementary school, where students had the opportunity to learn about communities of the near future that utilize the electricity storage capabilities of EVs, through model EV assembly kits and a diorama embodying the smart communities of future cities.



The Nissan Waku-Waku Eco School in Nissan's booth at the Eco-Products 2012 exhibition

Nissan's Tough Voluntary Standards

Stricter controls on the environmental impact of substances are being implemented in countries around the world. Examples include the European ELV Directive and the European Commission's Registration, Evaluation, Authorization and Restriction of Chemicals (REACH) Regulation, which went into force in June 2007. To help minimize the potential release of formaldehyde, toluene and other volatile organic compounds (VOCs) in vehicle cabins, the Japan Automobile Manufacturers Association has launched a voluntary program that calls for all new models launched in Japan from April 2007 to meet standards set by the Japanese Ministry of Health, Labor and Welfare for concentration levels of 13 compounds in vehicle interiors.

Nissan outlined a globally uniform policy in 2007 on reducing the use of environment-impacting substances, strengthening the management of such substances, adhering to a well-planned schedule for their reduction and advancing the use of alternative substances. We voluntarily enforce stricter standards than those required by the domestic laws of the countries where we operate in restricting the use of substances scientifically recognized as being hazardous or carrying high hazard risks, as well as those that advisory NGOs have pointed out as being dangerous.

Based on this policy, we have developed the Nissan Engineering Standard for the "Restricted Use of Substances." The standards identify the chemical substances whose use is either prohibited or controlled, and they are applied in selecting the materials, components and parts used in Nissan vehicles from the stage of initial development onward. For example, the use of four heavy metal compounds (mercury, lead, cadmium and hexavalent chromium) and the polybrominated diphenyl ether (PBDE) flame retardant has been either prohibited or restricted in all new vehicles (excluding OEM vehicles) launched globally since July 2007. We are registered and submit reports in compliance with REACH about the vehicles and parts produced in or imported to Europe. And we also comply with the Classification, Labeling and Packaging of Substances and Mixtures (CLP) regulations. As for VOCs in a car's interior, we have adopted the voluntary targets of the Japan Automobile Manufacturers Association as our own standards for global operations and are reviewing and reducing their use in the materials and adhesives of our seats, door trim, floor carpet and other items.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

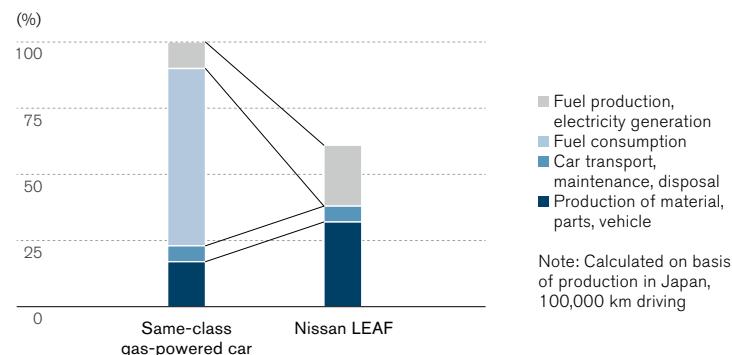
Lifecycle Assessment to Reduce Environmental Impact

Nissan uses the lifecycle assessment (LCA) method to evaluate and comprehensively assess environmental impact in all stages of the vehicle lifecycle, from resource extraction to production, transport, customer use and vehicle disposal. We also carry out LCAs for new technologies as they are introduced.

Our calculations show that Nissan LEAF reduces CO₂ emissions by up to 40% over its lifecycle compared to gasoline-powered vehicles of the same class. This assessment was certified by a third-party LCA assessment organization, the Japan Environmental Management Association for Industry.

We will continue to strive to lower the vehicles' environmental impact by adopting new technology and more efficient processes in manufacturing. We are aiming for further reductions in CO₂ emissions over the lifecycle of our new vehicles.

CO₂ Emissions Over a Vehicle's Lifecycle



Protecting the Air, Water, Soil and Biodiversity

The United Nations Millennium Ecosystem Assessment report issued in 2005 concluded that the ecosystem services evaluated had degraded over the past 50 years. Many scientists believe that humans have changed the Earth's ecosystems more rapidly and extensively than in any comparable period of time in history. Humankind depends on a number of ecosystem services, including provision of food and fresh water, climate regulation and protection from natural disasters. Industry must recognize not just its impact on ecosystems but also its dependence on these services. Companies today face the pressing need to balance environmental preservation and economic progress as they pursue their business activities.

Using the methods identified in the Corporate Ecosystem Services Review,* Nissan has evaluated its value chain from the extraction of material resources to vehicle production and operation. Based on the results, we have identified three priority areas for us as an automobile manufacturer: energy sourcing, mineral material sourcing and water usage. We have since been working to position the business risks and opportunities, reevaluating and further developing our traditional environmental initiatives.

* Developed by the World Resources Institute in cooperation with the World Business Council for Sustainable Development and Meridian Institute, based on the U.N. Millennium Ecosystem Assessment.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Supporting Tennessee Forests

Nissan and the Nature Conservancy's Tennessee Chapter have announced a new alliance to promote tree health in Tennessee's communities and forests. Nissan is supporting the Nature Conservancy's Tennessee Forest Health Program with a \$50,000 grant.

The Nature Conservancy has bought more than 270,000 acres of forestland in Tennessee to protect it. The vast majority of these forests are now open to the public, enabling people to not only enjoy Tennessee's rich and beautiful natural ecosystem but also learn about the importance of conservation activities.

The Nature Conservancy's work in Tennessee's forests now includes strategies to combat invasive insect pests that threaten forest health. Nissan's funding will go toward this work.



Taking part in forest conservation activities

Cleaner Exhaust Emissions

Nissan proactively sets strict environmental goals and targets for the design and production of its vehicles. Building on our research and development, in which we have set ourselves the ultimate goal of emissions as clean as the atmosphere, we have been working to reduce exhaust emissions with the early introduction of vehicles that meet emissions regulations in each country.

Our Sentra CA, released in the United States in January 2000, was the first gasoline-powered vehicle in the world to receive Partial Zero Emissions Vehicle (PZEV) certification in compliance with the emission requirements of the California Air Resources Board. PZEV vehicles must meet the zero-evaporative-emission regulations as well as have an onboard diagnostic system that warns of problems with the catalytic converter or other emission-control systems.

The Bluebird Sylphy, released in Japan in August 2000, became the first vehicle to gain certification from the Ministry of Transport (now the Ministry of Land, Infrastructure, Transport and Tourism) as an Ultra-Low Emission Vehicle (U-LEV).¹ In addition, this model became Japan's first vehicle to receive Super Ultra-Low Emission Vehicle (SU-LEV) certification² in 2003.

Also, the X-TRAIL 20GT became the first vehicle in the world to comply with Japan's strict 2009 Emission Regulations.³ The X-TRAIL 20GT carries a diesel filter that traps and eliminates particulate matter, NOx absorption and oxidation catalysts and an M9R clean diesel engine developed through our Alliance with Renault. We have thus been able to overcome the difficult challenges of making diesel vehicle exhaust cleaner, achieving both energy efficiency and reduced CO₂ emissions. An X-TRAIL 20GT with a 6-speed automatic transmission (including manual mode) was introduced in 2010.

¹ U-LEV: Ultra-Low Emission Vehicles produce 50% less nitrogen oxide (NOx) and nonmethane hydrocarbon (NMHC) than the 2005 emission standards level.

² SU-LEV: Super Ultra-Low Emission Vehicles produce emissions 75% less than the 2005 emission standards level.

³ The 2009 emission standards stipulate reductions of NOx by 47% and particulate matter by 64% from the levels required by the 2005 emission standards (applicable to vehicles weighing more than 1,265 kg). The regulations went into effect for new models in October 2009 and have been applied to existing models and imported cars since September 2010.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Nissan's Green Building Policy

Using the ISO 14001 management processes for evaluating environmental impact, Nissan seeks to optimize its building specifications in the construction and refurbishing stages. Our evaluation metrics in this area include buildings with a smaller environmental footprint, such as lower CO₂ emissions; construction methods that produce less waste and emissions; and reduced use of hazardous materials and other quality control tasks. Ongoing improvements are made through the PDCA cycle.

In Japan we also use a performance index, the Comprehensive Assessment System for Built Environment Efficiency (CASBEE), defined by the Ministry of Land, Infrastructure, Transport and Tourism. Among Nissan's current business facilities, the Nissan Advanced Technology Center (NATC) in Atsugi, Kanagawa Prefecture, and our Global Headquarters in the city of Yokohama have earned CASBEE's highest "S" ranking. The Global Headquarters, in particular, scored a Built Environment Efficiency rating of 5.6, which is a high score for CASBEE ratings of new constructions, earning it the distinction as one of the most environment-friendly and efficient buildings in Japan. In addition to its thoroughgoing environment-friendly design, it was recognized for its efficient use of natural energy sources, CO₂ emissions reductions, recycling of water and drastic waste reductions.

Prevention of Air Pollution

At Nissan production plants, we thoroughly implement systems and control standards to manage air pollutants and undertake activities to reduce the amount of these substances used and emitted in our production operations. We aim for even higher levels of air pollution control than those mandated by the countries in which we operate.

In Japan, we have taken strict measures to reduce emissions of NOx and SOx pollutants from our factories, reducing the amount of these emissions to one-fourth of the levels emitted in the 1970s. Painting lines and other processes in vehicle production consume large amounts of heat. We have lowered NOx and SOx emissions by introducing low-NOx burners in the ovens and boilers that provide heat for our painting lines and by switching from heavy oil and kerosene to fuels with low SOx emissions for these ovens and boilers.

A current challenge is the reduction of volatile organic compounds (VOCs), which readily evaporate and become gaseous in the atmosphere. These compounds account for approximately 90% of the chemicals released in our vehicle production processes. We are working to increase the recovery of cleaning solvents and other chemicals and reduce the amounts of these substances emitted from our plants ahead of the implementation of new regulations in each country where we operate.

VOC emissions from Nissan Motor Kyushu Co., Ltd.'s water-based paint line are now less than 20 grams per square meter of painted surface, and we are maintaining one of the best levels in the industry. Water-based paint lines have also been introduced in our Smyrna and Canton Plants in North America, our Barcelona Plant in Spain and other plants.

Our Efficient New U.S. Paint Plant

In January 2013, Nissan's Smyrna Plant in Tennessee opened the most advanced paint plant in the world. Previous processes required the vehicle to bake in between the primer application and the topcoat layers, but the new plant uses an innovative three-wet paint process that applies all three paint layers in succession, before the vehicle goes into the bake oven, reducing energy consumption and CO₂ emissions by 30% and VOC emissions by 70% while increasing production efficiency.

The Smyrna Paint Plant is Nissan's "showcase project" as part of the Department of Energy's Better Buildings, Better Plants Challenge, where Nissan North America has committed to reducing energy intensity in its three U.S. plants by 25% by 2020.

CONTENTS	INTRODUCTION	CEO MESSAGE	COO MESSAGE	BLUE CITIZENSHIP: NISSAN'S CSR	RENAULT-NISSAN ALLIANCE	CSR DATA	THIRD-PARTY COMMENT
ENVIRONMENT	SAFETY	PHILANTHROPY	QUALITY	VALUE CHAIN	EMPLOYEES	ECONOMIC CONTRIBUTION	CORPORATE GOVERNANCE & INTERNAL CONTROL

Clean Effluent Through Wastewater Treatment

We reuse water within our operations and try to reduce the total volume of water used. Wastewater undergoes processing in our wastewater treatment facilities before being released into rivers or elsewhere.

In preparation for unexpected occurrences, such as the discharge of oil in rainwater, we have installed sensors to detect irregularities and a system to stop effluent from leaving our sites.

At the Oppama Plant in Kanagawa Prefecture, for example, we have installed a system to strengthen our water quality sensors to the discharge ports of the wastewater treatment facility, and discharge of water outside the grounds is automatically suspended if water quality problems are detected.

Wastewater Release



The figures are for the Nissan Group worldwide, including consolidated companies.

Messages from Our Stakeholders

Nissan's Support Helps Keep Tennessee's Forests Healthy

During its 35 years working in Tennessee, the Nature Conservancy has protected more than 280,000 acres of land, the vast majority of it forested. Now, with the help of Nissan, the nonprofit conservation organization has expanded its Forest Health Initiative to restore key forests and combat invasive pests that threaten forest health.

Counteracting insect pests is an important feature of the Conservancy's Tennessee forest work. In one key initiative, the Conservancy leads a group of state and federal agencies that have joined forces to save hemlock trees on the Cumberland Plateau from the deadly hemlock woolly adelgid insect. In addition, the Conservancy and partners have held workshops for private landowners to show them how to treat hemlocks for woolly adelgid. Nissan's contribution enabled crucial treatment on hemlocks across 11 counties in Tennessee.

This summer, the Nature Conservancy will launch another program, "Healthy Trees, Healthy Tennessee," which will enlist tree-care professionals to monitor urban tree health and identify invasive insect pest outbreaks and then empower them to fight back against the outbreaks before they get out of hand. Nissan's support in all of these endeavors will help to conserve the Earth's resources for future generations.



Gina Hancock
State Director
The Nature Conservancy
in Tennessee