

## Our actions

### Climate change – global change, global action

Climate change is a major technical challenge in the 21st century. Agilent's greenhouse gas (GHG) emissions are only a very small part of the issue, but we are committed to doing our share by reducing them in our operations and providing products to customers that assist in measurement and control.

### Agilent Action and giving – taking action in the global community

Agilent's citizenship objective is to be an economic, intellectual and social asset to each nation and community where we do business. Being respected and welcome in communities where we operate is critical to our business success and community investment is a core part of our business strategy.

### Hazardous materials – reducing and eliminating hazardous substances

There has been a significant increase in the pressure to remove hazardous substances used in products both in our industry and across our value chain in recent years. Agilent has global efforts to track, manage and eliminate hazardous substances from its products.

### Supplier management – environmental and social responsibility

To build a foundation of expectations for our suppliers, in 2004 Agilent issued our first-ever Supplier Environmental and Social Responsibility Code of Conduct and over the past 18 months we have developed and implemented a Supplier Environmental and Social Responsibility Risk Evaluation process.

## Climate change – global change, global action

Reducing – or even stabilizing – the concentration of carbon dioxide (CO<sub>2</sub>) and other heat-trapping (greenhouse) gases in the atmosphere is a major technical challenge in the 21st century. Agilent’s greenhouse gas (GHG) emissions are only a very small part of the issue, but we are committed to doing our share to reduce them. We have opportunities to contribute to solutions through the design of our products and actions in our operations and supply chain.

### Agilent CO<sub>2</sub> emissions over the last 4 years (kilotons)

	2001	2002	2003	2004
Purchased electricity	359	345	332	308
Employee air travel	73	57	56	52

### Did you know...

In August 2004, Agilent's Santa Clara, California site joined the Sustainable Silicon Valley program, which has pledged to reduce CO<sub>2</sub> emissions in the Silicon Valley region by 20% by 2010, using 1990 as a base year.

## Climate change toolbox

### Operations and processes

#### *Source/type of emissions*

- CO<sub>2</sub> emissions from utilities that generate the electricity we buy (the largest portion of our GHG emissions)
- CO<sub>2</sub> emissions from direct use of natural gas and other energy sources
- Emissions of GHG such as perfluorocompounds (PFCs) from our manufacturing

#### *Agilent actions to reduce*

- Reduce energy use
- Calculate and track CO<sub>2</sub> emissions
- Reduce PFC emissions from semiconductor operations
- Use renewable energy
- Engineer process improvements and evaluate abatement technologies

### Products

#### *Source/type of emissions*

- Our higher-sales-volume products are not major energy consumers, but many use electricity, resulting in indirect CO<sub>2</sub> emissions

#### *Agilent actions to reduce*

- Design for environment
- Developing and marketing energy-efficient products, e.g. light sensors used to reduce battery use in LCD display or lighting solutions that provide energy savings of up to 80%
- Recovery and remanufacturing of used products
- Providing testing equipment customers can use to measure a variety of air pollutants

### Supply chain

#### *Source/type of emissions*

- GHG emissions from Agilent suppliers
- GHG emissions from suppliers to Agilent suppliers, etc
- GHG emissions from new product creation

#### *Agilent actions to reduce*

- Supplier cooperation
- Industry cooperation on PFC reduction
- Supplier Environmental and Social Responsibility Code of Conduct
- Recovering and reselling products

### Business activities

#### *Source/type of emissions*

- CO<sub>2</sub> emissions from fuel used to transport materials, parts and finished products
- CO<sub>2</sub> emissions resulting from employee travel and commuting

#### *Agilent actions to reduce*

- Tracking, reporting and reducing employee travel

## Addressing energy use

Reducing our energy use has many benefits: it lowers operating costs, insulates us from rising energy prices and cuts our GHG emissions. For several years, we have set energy use reduction goals. To emphasize our focus on GHG reduction, in 2004, we converted our energy goal to a CO<sub>2</sub> reduction goal.

We have reduced CO<sub>2</sub> emissions associated with energy use through a variety of means including:

- Our Palo Alto, California headquarters gets 6% of its energy from solar and wind
- The Santa Clara, California site is in the process of replacing old air conditioner chillers and pumps with new equipment that will save 775,000 kilowatt-hours per year
- Our Colorado Springs, Colorado site is upgrading insulation and replacing air conditioner chillers. The project is expected to cut electrical consumption for cooling by half
- Agilent Enterprise Hosting Services is reducing the number of servers used (and associated energy use) by installing lower-cost, better-performing and less resource-intensive equipment.

### Providing energy-efficient solutions

Like Agilent, many of our customers (and their customers) are seeking to save energy, costs and GHG emissions. We have opportunities to help meet these needs. For example, Agilent developed a new ambient light photo sensor that cuts the significant amount of battery power needed for LCD displays in cell phones and other consumer electronics.

### Did you know...

Agilent's Santa Clara, California facility was the first corporate sponsor of Silicon Valley Power's Neighborhood Solar Program, which installs solar photovoltaic systems to help power schools and non-profit organizations.

### Related content:

*In this report*

[Energy](#)

[Air emissions](#)

## Reducing PFCs

In concert with other leading companies in the semiconductor industry, Agilent has pledged to reduce the emissions of PFCs from its Semiconductor Products Group Business. PFCs have high global warming potential – thousands of times more than CO<sub>2</sub> on a pound-for-pound basis. Thus, although they are released in minute quantities compared to CO<sub>2</sub>, PFCs are powerful GHGs.

Starting in January 2000, Agilent joined in a Memorandum of Understanding (MOU) with the United States Environmental Protection Agency (EPA) committing the more than 20 signatory companies to track and attempt to reduce their emissions of the seven most common PFC gases used in semiconductor manufacturing. Agilent's PFC emissions comprise a very small percentage of the total reported to the EPA. However, we remain committed to reducing our emissions.

We are also participating in The World Semiconductor Council's (WSC) emission reduction goals for the industry. The current WSC goal is to return to 10% below 1995 emission levels by 2010. According to the EPA, compared to the growth in semiconductor use projected under a business-as-usual scenario, the difference will equate to removing eight million cars from the road.

Agilent's semiconductor business continues to develop new electronic components, many of which contribute to products with greater energy efficiency. However, manufacture of these components often depends on the use of GHGs as does all semiconductor manufacturing.

We are reducing PFC use by implementing process changes to increase the efficiency of PFC use in our manufacturing processes, substituting other substances with less or no global warming potential and using abatement. We also communicate our position on PFC reduction to Agilent's contract manufacturers and encourage them to adopt PFC emissions reduction programs.

### **Related content:**

*In this report*  
[Air emissions](#)

## Collaborating across our supply chain

Recovering and reselling products generally requires only a fraction of the energy used to make a new product. We have developed innovative approaches – including partnering with eBay – to offer our customers reliable used equipment, helping to build the market for remanufactured and refurbished equipment.

### Related content:

*In this report*

[Hazardous materials – reducing and eliminating hazardous substances](#)

## **Agilent Action and giving – taking action in the global community**

**Agilent is a global company in an increasingly interconnected world. For our company to thrive, we must attract and retain top technical and managerial talent, contribute positively to local and national economies, be a respected and welcomed citizen in the communities where we operate and protect the environment. These aspirations are summed up in our citizenship objective to be an economic, intellectual and social asset to each nation and community where we do business.**

### **Agilent Action around the world**

- Colorado Springs, Colorado – Alternative transport demo
- Paris, France – Orsay School water testing
- Beijing, China – Deer Park clean-up
- Mexico City, Mexico – Earth Day puppet show
- Boise, Idaho – Plant restoration
- Mumbai, India – Beach clean-up

### **Did you know...**

In Agilent's 2004 Employee Survey, 75% of employees responded positively about Agilent's citizenship commitment.

## **Agilent Action toolbox**

### **Employee action**

#### *Examples of this strategy*

- Support for volunteers (Agilent allows four hours of volunteer time per employee per month)
- Agilent Action Week
- Agilent AfterSchool

### **Corporate giving**

#### *Examples of this strategy*

- Local community donations
- University cash and equipment grants
- Cash grants to non-governmental partners working on education, diversity, environmental issues, and health and human service

### **Sponsorships**

#### *Examples of this strategy*

- International Science and Engineering Fair
- National Engineers Week

### **Performance measurement**

#### *Examples of this strategy*

- Employee survey
- Community surveys
- Opinion and business leader surveys
- Giving totals (cash, in-kind, number of employees volunteering, number of hours volunteered)



## **Employee action**

The most important resource we commit to our communities is our employees. We support employee involvement by offering them one hour per week, or up to four hours per month, of paid time off to volunteer for Agilent-sponsored or supported activities.

During 2004, we instituted our second Agilent Action Week. This year, it was timed to correspond with Earth Day. Some 1,700 Agilent volunteers at more than 50 locations around the world came together during Action Week to improve the environment in their communities.

In Burnaby, British Columbia, Canada, Agilent employees painted storm drains throughout the area with fish-shaped stencils to educate the public to the dangers of pollution caused by litter, lawn pesticides, etc.

Another major employee involvement program is the Agilent AfterSchool program, which places Agilent volunteers in after school settings to provide a hands-on science experience for children 9 to 13 years old.

As the program evolves, we are seeking to target girls, at-risk students and other groups that are often under-represented in science education and the technology industry. 1,200 employees participated in 2004, reaching 24,000 students.

### **Did you know...**

In 2004:

1,700 Agilent volunteers at more than 50 locations around the world improved their local environment during Action Week

1,200 Agilent employees participated in Agilent AfterSchool, reaching 24,000 students

Agilent was a major sponsor of the Intel International Science and Engineering Fair

## **Corporate support**

During 2004, Agilent provided support of US\$5.2 million to programs worldwide. Our giving priorities include education and healthy communities. Examples of our support include the following:

- Agilent is a major sponsor of the Intel International Science and Engineering Fair (ISEF). Referred to as the "Olympics of Science Fairs", ISEF is the world's largest pre-college science fair
- Agilent has provided a grant to The Nature Conservancy, a worldwide environmental conservation organization, to help address the ecological and health risks associated with fuel wood use for cooking and heating in Shangri-La County in Yunnan Province, China. The grant provides technology and alternative energy units that range from energy-efficient stoves and solar heaters to micro-hydropower generators
- Agilent is a corporate contributor to National Engineers Week (NEW) and a major sponsor of the Introduce a Girl to Engineering program. NEW, celebrated annually, is an organized approach to increasing student interest in science, math, technology and engineering.

## **Performance measurement**

Community involvement and philanthropy are sometimes thought of as “soft” aspects of a business. Their value is recognized but not always measured. We believe it is important to measure the impacts of our investments on the environmental and social issues we’re tackling – and on our business. We are exploring ways to measure the effect of our major grants.

To assess and set a baseline for our reputation as a community member and global company, in 2004 we commissioned a survey of our reputation in two communities where we have facilities and, more broadly, among business and opinion leaders in the United States, China, Singapore and Korea.

The community study was very useful in identifying strengths in our community engagement as well as areas where we can improve. The survey of business and opinion leaders also identified some important differences between the countries. Stakeholders believe – and we agree – that Agilent can make a positive contribution through developing new products that address societal problems and through community involvement. We are building this feedback into our strategic planning going forward.

## Hazardous materials – reducing and eliminating hazardous substances

Over the past several years, Agilent has launched a global effort to track, manage and, in many cases, eliminate hazardous substances from its products. Spurred by customer interest and global regulatory changes, the effort includes systematic cooperation across our value chain to remove hazardous substances used in our products.

Several factors are driving this change. In 2003, the EU issued two directives affecting the electronics industry. One, the Restriction of Hazardous Substances (RoHS) Directive, bans the use of heavy metals and two classes of brominated fire retardants in electrical and electronic products.

The second, the Waste Electrical and Electronic Equipment (WEEE) Directive, holds manufacturers responsible for ensuring that systems exist to collect and manage electrical and electronic products at the end of their useful lives through recycling and environmentally sound disposal.

We have worked across our value chain to define needs and solutions for reducing and eliminating hazardous substances. Many of our products are exempt from the EU directives or subject to extended deadlines. We surveyed our customers, however, and learned that many of them prefer to purchase products free of the EU-identified hazardous substances.

### Did you know...

During 2004, we took several steps to strengthen our eco-design programs. We updated our Design for the Environment (DfE) guidelines and created DfE training. The training is important for the individuals responsible for issuing the quality sign-off and ensuring that environmental goals set for each product have been met prior to its release to the market.

### Related content:

*In this report*

[Product responsibility](#)  
[Products and services](#)

*Agilent.com*

[PSR policy](#) (PDF, 60Kb)

## Hazardous materials toolbox

Our products, such as our analytical and test equipment, also contribute to identifying and addressing hazardous substances that have entered the environment. Our areas of impact and related initiatives are shown in the “toolbox” below.

### Hazardous substance elimination

#### *Agilent initiatives / tools*

- General Specification for the Environment
- Tracking and reporting systems
- Lead-free initiative

### Eco-design

#### *Agilent initiatives / tools*

- Design for Environment manual and training
- Product stewards

### Products used in hazardous substance identification

#### *Agilent initiatives / tools*

- Innovative equipment for testing and analyzing hazardous substances in products and the environment
- For more information go to [Environmental Products](#)

### End of life

#### *Agilent initiatives / tools*

- Agilent CertiPrime
- [Agilent Advantage Assurance](#)
- Take-back

## **Hazardous substance elimination**

Where technically feasible, Agilent has proactively eliminated hazardous and environmentally problematic substances from its products. For example, in the early 1990s, we focused on phasing out the use of polybrominated diphenyl ethers (PBDEs), a class of toxic chemicals used as flame retardants found in thousands of consumer products.

### **Lead-free initiative**

Lead is used widely in electronics for applications ranging from solder to finishes for printed circuit boards. In cooperation with the National Electronics Manufacturing Initiative, we have identified acceptable lead-free component finishes. We have made substantial progress in eliminating lead from our products.

### **Tracking and reporting**

Our direct materials suppliers are subject to our General Specification for the Environment (GSE), which spells out the substances that must be avoided entirely or restricted to particular uses. Given the complexity of our supply web, however, a major challenge has been establishing the tracking and reporting systems to enable us to document the use (or absence) of hazardous substances in our products.

We have helped lead an effort by the Electronic Industries Alliance to develop a joint industry guide and voluntary standard addressing hazardous substance reporting. This guide has helped establish a consistent system for reporting within our supply chain.

Internally, we have developed the Agilent Restricted Materials database that tracks restricted substances in our purchased materials. We developed a complementary system, PLANet, which takes information about the substances present in parts and components and aggregates it to provide product-level information analogous to a nutrition label on food packaging.

## Products in use

Societies around the world face challenges in identifying and remediating hazardous substances that have found their way into the environment. Agilent's testing and analysis equipment is playing a role in this important process. For example, in mid-2004, Agilent announced the availability of a highly sensitive method for analyzing PBDEs (see [Hazardous substance elimination](#)).

To help make identification of pesticide residues and other compounds faster and more accurate, Agilent has developed a comprehensive screening tool that speeds, simplifies and automates the process.

Also in 2004, Agilent introduced a new system for analyzing trace metals that is up to five times more sensitive than its predecessor. The new system can measure both trace metals in the parts per trillion level and major elements in the parts per thousand level in a wide range of difficult samples, from wastewater to foods to biological specimens.

## **End of life**

Agilent does have an official program that lets Electronic Products and Solutions Group and Communications Solutions Group customers trade in their used products for credit towards new products (see <http://www.agilent.com/find/trade> for details of our Trade-up, Trade-in and Sell-off programs).

Increasingly, we are looking at our products from a lifecycle perspective. Beginning in 2004, our customers have been offered multiple options to purchase high-quality, pre-owned Agilent test instruments. Through the Agilent CertiPrime program, units are fully remanufactured by Agilent to our standards and include the latest compatible software and firmware updates. Through the Agilent Advantage Assurance program, customers can now purchase pre-owned instruments that are guaranteed to perform to original specifications from authorized resellers.



## **Looking ahead**

Eliminating hazardous substances from our products will take time. Cooperation within our industry and across our value chain will enable the steps required to substitute more environmentally friendly materials while maintaining the quality our customers need. Establishing robust systems for tracking and reporting the use of hazardous substances will play an important role in supporting this cooperation and in pointing to opportunities for eco-design.

## Supplier management – environmental and social responsibility

**Businesses increasingly recognize the interdependence of their environmental and social profiles with those of their suppliers. Suppliers and customers that have high standards and seek value from their social and environmental commitments often benefit from collaborating to address issues and develop new products.**

The common term “supply chain” may be a misnomer for Agilent. Given the nature of the high-tech industry and the diversity of our business groups, we find our suppliers are frequently our customers. Our customers may also be our suppliers. In addition, Agilent’s five business groups often supply each other. Thus, our relationships are better described as a “supply web”.

To establish quality, environmental and social standards, we have built a foundation of expectations for our suppliers. Over the past 18 months, we have focused on environmental, health and safety (EHS) and social areas with our suppliers by adopting a Supplier Environmental and Social Responsibility Code of Conduct and developing and implementing a Supplier Environmental and Social Responsibility Risk Evaluation process. We are also working closely with key indirect suppliers (suppliers of services) to align our policies and practices.

### **Related content:**

*In this report*

[Suppliers](#)

[Supplier ESR Code of Conduct](#)

*Agilent.com*

[General Specification on the Environment](#) (PDF, 117Kb)

## Environmental and Social Responsibility Code of Conduct

To confirm our commitments, and to clarify our expectations, we developed the Agilent Technologies Supplier Environmental and Social Responsibility (ESR) Code of Conduct. To help ensure that the principles within our Code of Conduct are understood globally, we incorporate eight International Labour Organization (ILO) Conventions that have been identified as fundamental to the rights of human beings at work.

The Code reiterates Agilent's expectation that suppliers will comply with applicable EHS and labor laws, rules and regulations. It states that suppliers will have an EHS management system that conforms to ISO 14001 and OHSAS 18001. It also addresses:

- Not using child, forced or compulsory labor
- Freedom of association
- Non-discrimination.

Finally, it asks Agilent's suppliers to encourage adherence to similar principles with their own suppliers.

### Related content:

*Agilent.com*

[Agilent Supplier ESR Code of Conduct](#) (PDF, 77Kb)

## Supplier Environmental and Social Responsibility Risk Evaluation process

We regularly evaluate strategic suppliers using a supplier performance measurement process. Suppliers are selected for this review based on supply assurance risks, amount of business and recommendations of the Agilent business procurement organizations. Beginning in 2003, Agilent implemented a new process to identify, assess and manage potential EHS and social responsibility risks from our direct suppliers.

### Screening our supply base

Our first challenge was devising a screening process to set priorities among our thousands of direct suppliers. We set up four screens:

1. Chemical-intensive or labor-intensive operations
2. Agilent orders worth at least US\$50,000 per quarter for these commodities
3. Suppliers located in countries where EHS and labor laws are not robust or strictly enforced
4. In-depth evaluation to determine whether the supplier is certified to ISO 14001 and whether a supplier performance measurement review has been conducted.

From this evaluation, suppliers were identified for an EHS and Social Responsibility Site Survey to obtain first-hand information. We also added company-wide strategic contract manufacturers to the list of suppliers recommended for a site survey. A total of 26 site surveys were conducted in 2004.

### Conducting evaluations and site surveys

We began conducting site surveys in March 2004. The on-site visits used a questionnaire and an independent third party that performs on-site visits to gather information on:

- EHS Management Systems and Social Accountability
- Emergency Preparedness and Response, Fire and Electrical Safety
- EHS Programs
- Labor
- Adherence to Agilent's General Specification for the Environment.

Following the surveys, we provided the suppliers with a summary of our findings and recommended corrective actions. In 2004, we required corrective actions – a plan and schedule for addressing the issues identified – from about two-thirds of the suppliers surveyed. All suppliers requiring corrective action plans in 2004 responded.

### Survey findings and follow-up

We are finding that most of the areas needing corrective action are in traditional EHS program areas (e.g. emergency egress, chemical and/or hazardous waste storage, safety programs and personal protection equipment training).

In cases where the required corrective actions are significant and Agilent is a large customer, we are conducting follow-up site surveys.

We are receiving a positive response from the surveyed suppliers regarding this process.

## **Cooperation with key indirect suppliers**

Agilent's indirect (non-production) suppliers provide services like facility management and waste management that can pose potential EHS and social risks. We establish EHS requirements for suppliers in these areas through our contracts with them.

In 2002 we contracted with Johnson Controls, Inc. to manage our facilities operations worldwide. This approach centralizes accountability for the environmental and social performance of facility-related services and allows Agilent to focus on its core priorities. Johnson Controls, which is ISO 14001 and OHSAS 18001 compliant, shares our commitment to environmental and social excellence and diverse supplier subcontracting.

As part of our 2005 waste objective, we are also working closely with our supplier of copying services to explore innovative ways to improve efficiency and reduce the use of paper and other resources.

## **Looking ahead**

We will complete the site surveys and follow-up site surveys from our initial Environmental and Social Responsibility Risk Evaluations and will continue to conduct the screening evaluations, site surveys and supplier corrective actions in the future as our supply base evolves. In 2005, another priority is raising awareness internally of our recently adopted Supplier Environmental and Social Responsibility Code of Conduct.