

Energie  
vernünftig  
nutzen

**EVN**

Sustainability Report  
2001/02

# Corporate Responsibility

A photograph of a man in a light blue t-shirt holding a white model airplane against a clear blue sky. In the bottom left corner, a young boy in a striped shirt is looking towards the camera. The overall scene is bright and positive, symbolizing innovation and future generations.

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# EVN corporate policy statement

## The company

We intend to fulfil customer expectations and needs through our range of products and services in the energy supply sector and related business areas. As a result, we also contribute to the general quality of life.

We are a regional supplier of energy and infrastructure services based in the federal province of Lower Austria.

We co-operate with both national and international partners and also carry out assignments via affiliated companies.

## Our product and services range

Our business range primarily involves the supply of electricity, natural gas, heat and water. Apart from supply, we also provide numerous related services.

Our know-how and infrastructure provide us with opportunities for the expansion of our range of activities into additional, related areas of business.

## Our customers

Customer satisfaction is our top priority. Therefore, we deliver high-quality products and prompt service in a customer-friendly manner.

Together with our customers, we realise the basic principle of "Using energy wisely". Consequently, we offer extensive consulting and customised solutions.

We seek to be as competitive as possible, in order to pass on savings to our customers.

## Our owners

We have an obligation to provide our owners with sustained corporate success.

This not only includes the generation of earnings and the payment of appropriate dividends, but also the focused further development of our business.

We aim for an open and long-term relationship with both our Austrian and international shareholders. To this end, we endeavour to achieve maximum transparency through a comprehensive flow of information.

## Our employees

Our claim with regard to the excellent quality of our products and services requires responsible, well-informed and highly qualified employees, who are prepared to provide outstanding performance even under demanding circumstances.

High levels of personal initiative, mutual respect and team spirit contribute to sustained corporate success.

Excellent codes of conduct and levels of commitment play a major role in shaping the company's public image.

## Our responsibilities

We have a responsibility towards the environment. The intelligent use of energy and renewable energy sources, as well as a careful approach to nature, represent the benchmarks for our activities. Our goal is to achieve maximum energy efficiency and introduce innovative environmental protection measures.

We further economically viable alternative energy technologies.

We are answerable to our customers, owners and employees. Therefore, economic prudence is the business principle governing every aspect of company activity.

We have a responsibility to the general public. Accordingly, we feel obliged to provide a high degree of transparency with regard to information about energy industry matters and our corporate activities.

We contribute to the sciences, arts and culture in a manner appropriate to our company.

**Through the implementation of this corporate policy, we fulfil our claim to competence, "Using energy wisely."**

# EVN environmental policy statement

## Minimisation of environmental impact

Naturally, our activities involve a degree of environmental impact. Therefore, EVN minimises such effects and thus makes an important contribution to the maintenance of the general ecological balance in its supply areas.

## Sustainable growth

We feel an obligation to the principle of sustainability and adopt a responsible approach to the resources entrusted to us. Our aim is to secure the long-term quality of the environment for future generations. For us, ecological, economic and social objectives are of equal significance.

## Improved environmental performance

EVN's activities are based on compliance with statutory requirements and state-of-the-art environmental protection technology. In addition, the company is committed to constant improvements in the standard of its environmental performance.

## Renewable energy systems

EVN is engaged in the development and use of additive energy systems and innovative environmental protection installations.

## State-of-the-art environmental engineering

All of EVN's energy generation plants are state-of-the-art. Existing capacity is subject to environmental upgrading as far as this is economically sustainable. At the same time, the company endeavours to exploit resources through the highest possible efficiency levels. This helps to prevent a further intensification of the greenhouse effect.

## Landscape conservation

In the course of its energy transmission activities, EVN pays close attention to preserving the landscape. Local network cabling projects and optimum line routing are two examples of this policy.

## Waste management

The flows of material within our company are carefully monitored and controlled, facilitating waste prevention, recycling and correct disposal, in that order. The company also applies ecological criteria when selecting its material and equipment suppliers, and waste disposal contractors.

## Energy consulting

Efficient, customer-oriented energy consulting is a matter of key importance to EVN. In addition to economic considerations, this increasingly involves ecological aspects. Energy saving is one of the core principles of EVN consulting.

## Optimised customer appliances

EVN helps its customers to enhance the efficiency of their energy systems, thereby contributing to a reduction in pollution levels.

## Work force motivation

The comprehensive range of tasks for an ecologically oriented company is so wide, that it can only be accomplished by well-informed and motivated employees. Therefore, EVN regards staff training and identification with the company's ecological policy as a major priority.

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# Corporate Responsibility

# EVN, a leading supplier of energy, services and infrastructure

EVN is an Austrian energy and services company, which provides its customers, who are mainly located in Lower Austria, the country's largest federal province, with electricity, natural gas, heat, water, telecommunications and related services (e.g. waste incineration). Our product and services range is based on state-of-the-art infrastructure. EVN's strategy is targeted on a sustained increase in corporate and shareholder value.

## A multi-service utility with an extensive product range

EVN responds to competition with environment-friendly products and thus secures its corporate future. Apart from core business expansion, this strategy involves targeted diversification into related business areas. By virtue of its transformation into a modern, multi-service utility, EVN today is able to offer the customer an extensive range of reasonably priced services on a one-stop shop basis. At present, Austria's largest and most modern waste incineration plant with an annual capacity of 300,000 t is being built adjacent to the Dürnröhr power station. The plant will go on-line at the beginning of 2004. In addition, during recent years we have increased our investments in the use of renewable energies such as water, wind power and biomass for electricity generation.

At the same time, EVN relies on co-operation and partnerships with other energy companies in order to deal with increasing competitive pressures.

# Sustainability as a long-term corporate concept

## 80 years of responsibility for energy supply, the environment and society

Founded in 1922, our company was orientated towards economic sustainability long before this became a clearly defined term and a comprehensive concept. The reasons lie primarily in the specific assignments of EVN in the area of public services and its resulting responsibilities to both people and the environment. The development of EVN and its predecessor companies during the past eighty years, as well as the excellent positioning for the future, underlines the success of this approach. However, it also represents an obligation for the future.



As a multi-service utility with a comprehensive range that extends from the supply of electricity, gas and heat, to drinking water, telecommunications and diverse services and consulting packages, EVN constitutes an attractive and reliable partner in questions relating to energy supply and infrastructure services. In this way, EVN creates lasting value for both its customers and shareholders. At the same time, the company offers its work force an attractive working environment and does its utmost to encourage employee motivation and loyalty. Moreover, the company strives to make a considerable contribution in the social sector.

One especially important aspect of sustainability, particularly for an energy supplier, is the careful use of natural resources. Our efforts aimed at achieving an equilibrium between economic and environmental interests did not merely commence with the emergence of the concept of environmental protection. We have long used environment-friendly hydroelectric power to a maximum extent and for many decades have numbered among the leaders in the field of technical thermal power plant design and efficiency. Today, we are increasingly turning to power generation using biomass, wind power and other alternative forms of energy, thus further reducing the environmental impact of our activities. Practically all of EVN's thermal power stations possess environmental certification with the result that we have a holistic environmental management system.

Regular information about these initiatives has been published in the form of Environmental Reports, which have appeared annually since 1990. Last year's report was enlarged considerably and issued as an "Environmental and Social Report". This year's report has been further expanded and represents an initial "Sustainability Report". This makes us one of the first Austrian companies to provide transparency concerning the sustainability of their corporate activities in accordance with international standards.

EVN has already fully accepted the three decisive aspects of sustainability. Namely, responsibility for measured value added in an economic, ecological and social context, which constitutes the benchmark that governs our business activities.

A handwritten signature in black ink, appearing to read "R. Gruber".

Rudolf Gruber

A handwritten signature in black ink, appearing to read "P. Layr".

Peter Layr

A handwritten signature in black ink, appearing to read "H. Pöttschacher".

Herbert Pöttschacher

## A responsible approach towards shareholders and customers

Sustainable economic success is the only means of securing company wealth creation for its shareholders. At the same time, long-term service excellence is essential to a company's ability to attain a strong market position through attractive and competitive offers. EVN therefore has the declared aim of offering equally positive business management performance to shareholders, customers and society in general. Together with the optimisation of our capital structure, on-going growth, a sustained improvement in cost efficiency and a related improvement in operative development all contribute to the achievement of this objective.

In order to make EVN's customer performance as attractive and individual as possible, the company relies on quality products and services in combination with professional customer support. The most modern technologies and infrastructure and EVN's extensive consulting and services range ensure first class standards in this regard.

EVN also sees its research and development activities as a contribution to successful future development. In particular, the company has long been one of the international leaders in the field of power station technology and is constantly involved in numerous, interesting research projects, which are funded partially by the EU.

# Successful company development

In the past 80 years, EVN has developed into a leading regional supplier of energy and infrastructure services. A work force of around 2,200 employees supplies domestic, municipal, commercial and industrial customers mainly in Lower Austria with electricity, gas and heat, and for about a year, also with drinking water. In addition, via its subsidiaries EVN provides telecommunications, consulting and engineering and facility management services, which in future will be supplemented by waste incineration.

Today, EVN operates primarily in Lower Austria. Together with Wien Energie, Energie AG Oberösterreich, Linz AG and the BEWAG and BEGAS energy companies in Burgenland, EVN forms the EnergieAllianz, which is playing a leading role in the consolidation of the Austrian electricity and gas markets ("Austrian solutions") necessitated by the new European competitive situation.

Detailed information concerning business development within the EVN Group is provided in the 2001/02 Annual Report, which is published at the same time as this Sustainability Report. Should you not already have a copy, the current Annual Report is available on-line at [www.investor.evn.at](http://www.investor.evn.at)



Environment-conscious investors also value the EVN share, which was accepted into the FTSE4Good in March 2002.

# Growth and profits

In spite of difficult energy industry and economic conditions, EVN's 2001/02 financial year was characterised by increased sales in virtually every business area. EVN Group sales revenues in the 2001/02 financial year rose by a total of 9.8 %. The decisive factors in this positive development were sales increases in the gas (+21.4 %) and heat (+6.8 %) areas, as well as slightly higher electricity sales (+1.3 %), which were achieved despite strong competitive pressure. Other sales revenues also increased by 18.4 %, not least due to improvements in the water and telecommunications segments. During the period under review, the tangible increase in expenses was more than compensated for by improved sales. Although general economic conditions were difficult, at EUR 127.9 m, the operating result (EBIT) was 5.7 % up on the comparable figure for the preceding year. The result for the year amounted to EUR 89.5 m and was thus EUR 1.7 m, or 1.9 %, higher than in the preceding year. EVN's operative development in the core business sector shows that the company has flourished in the changed economic situation and has been able to take advantage of the new conditions.

In the 2001/02 financial year, the return on equity (ROE), which is a key indicator for shareholder value creation, stood at 8.7 %. The return on capital employed (ROCE), the measurement of the interest on invested capital, amounted to 6.1 %, which was roughly the same level as in the preceding year.

Despite the massive changes in the company's environment following the full liberalisation of the electricity market on October 1, 2001, and the gas market on October 1, 2002, EVN has succeeded in maintaining ROE and ROCE at the high level of the previous business year by means of the active exploitation of market opportunities and targeted expansion into new business areas.

## Solid balance sheet

In the 2001/02 financial year, the EVN Group balance sheet total increased by 12.2 % to a level of EUR 2.8 bn as at September 30, 2002. Apart from continuous investments in assets, the main reason for this rise was the purchase of a strategic interest of around 9.3 % in Energie AG Oberösterreich, an EnergieAllianz partner. On the liabilities side, the issue of a EUR 300 m bond also led to a corresponding increase. At the end of September 2002, the equity ratio stood at 37.1 %. These indicators show that EVN continues to demonstrate a stable and healthy balance sheet structure.

## Sustained dividend and share price development

EVN is committed to a stable and sustained dividend policy. The aim is to offer a reasonable return on shareholder capital, which apart from a positive share price development is secured by dividend returns. Against the background of a solid result development, EVN stands out due to the long-term stability of its dividends. A dividend per share of EUR 0.70 will again be proposed to the Annual General Meeting for the 2001/02 financial year. This corresponds with a pay out ratio of 29.4 % and a dividend return of about 1.7 %.

During the past financial year, the EVN share showed an upward price trend as compared to benchmarks such as the ATX (Austrian Traded Index) and Dow Jones Euro Stoxx Utilities. Therefore, despite the extremely subdued atmosphere on the international stock exchanges, EVN shareholders enjoyed total growth of 2.4 %.

### Key figures EVN Group (IAS)

		2001/02	2000/01	1999/00	1998/99	1997/98 <sup>1)</sup>
Operating result (EBIT)	EUR m	127.9	121.0	119.4	113.6 <sup>2)</sup>	107.3
Electricity sales volumes <sup>3)</sup>	GWh	8,624	7,773	8,826	6,193	6,384
Gas sales volumes	m m <sup>3</sup>	1,895	1,322	1,336	1,381	1,389
Heating sales volumes	GWh	786	721	712	671	573
Return on equity	%	8.7	9.4	11.3	7.7 <sup>2)</sup>	8.5
Equity ratio	%	37.1	40.5	38.4	37.5	40.7

<sup>1)</sup> As a result of a shift in the balance sheet date from August 31 to September 30, 1997/98. The financial year included 13 months (September 1, 1997 – September 30, 1998).

<sup>2)</sup> 1998/99 excluding the exceptional measures taken with regard to electricity market liberalisation.

<sup>3)</sup> From 1999/00 including electricity trading and sales to other energy companies.

# Investments

Investments form the basis for sales and profits in years to come. Accordingly, in the 2001/02 financial year, EVN invested in its future, spending EUR 161.7 m on tangible assets alone.

Around EUR 85.3 m was spent on the electricity sector, EUR 35.0 m on gas and heat supply. This expenditure was used primarily for infrastructure and connecting new customers. The past year also saw a special emphasis on the use of renewable energy sources and the implementation of innovative solutions. EVN invested approximately EUR 12.3 m in the development of wind parks, as well as EUR 32.2 m in a waste incineration plant (see pages 24 and 40).



EVN invests in renewable energy generation.

## EVN as an important regional economic factor

Around 40 % of the value added derived from these investments was obtained locally. As a result, EVN represents a major economic factor within its supply area.



# Creating customer value

As a multi-service utility, EVN offers its customers important energy and infrastructure services on a one-stop shop basis. For the customer, this combined offer not only means a high degree of convenience, but also security. The combination of several product segments, which were previously separated, considerably increases efficiency and the use of synergy effects, thus creating a basis for the design of an attractive and reasonably priced offer range.

## One-stop energy and infrastructure services

In addition to the integrated supply of electricity, gas and heat, EVN, through its subsidiaries, has added drinking water supply, telecommunications, internet and various related services to its product range. In future, waste and wastewater handling will also be offered to customers.



An extensive range of services from a single supplier.

## Professional customer relationship management

In the highly competitive energy market, a close and positive relationship with satisfied customers is precisely the basis required for continued corporate success and, therefore, represents EVN's top priority. Apart from high-quality products and services, EVN endeavours to provide customers with support that is exactly tailored to their needs and thereby create long-term customer ties. This is the reason why EVN employs professional Customer Relationship Management (CRM).

## An emphasis on customer proximity and individual support

EVN has 26 Customer Centres throughout Lower Austria, which means that the company is practically always available "on the doorstep". One contact person advises customers in all matters relating to EVN products and services. Accordingly, EVN fulfils the "One Face to the Customer" concept and relies on personal, individual support. An extensive and partially free range of energy advisory services rounds off the range.

## Innovative Customer Relationship Management (CRM) system

In order to carry out all customer contact procedures in a professional and efficient manner, EVN introduced a Customer Relationship Management system throughout the company as early as 1999.

CRM employees in contact can provide customers with information at any time and from any location regarding the extent to which a customer request has been completed and those responsible for dealing with it. This considerably increases the speed of customer services, sales and distribution, while simultaneously providing valuable information about customer needs.



The EVN Call Centre:  
A modern platform for  
all customer contacts

## A modern call centre as a platform for all customer contacts

Against the background of successful developments in the UK and Scandinavia, EVN started the planning and development of a modern call centre as early as 1998. From the outset, this was planned as a multi-channel communications centre, which would be available to customers by telephone, internet, e-mail and fax throughout the year and around the clock.

## Quality management for on-going improvements

Optimal customer satisfaction is the central aim of EVN's CRM activities. Accordingly, regular surveys are carried out to assess the opinions of EVN customers, with the aim of completing targeted improvement measures with regard to service and accessibility. Within the framework of EVN quality management, telephone interviews are held with customers on a monthly basis by independent market and opinion research institutes. In this way, around 8,000 customers are questioned every year concerning their assessment of EVN's service standards. Over the years, the results have shown a constantly excellent level.

Irrespective of these results, EVN is constantly looking to upgrade its service. For example, each year the Customer Relations Centre work force completes a comprehensive training programme involving the topics of customer communications, customer relationship management, sales and distribution, products, services, energy invoicing and consulting.

Internal quality competitions, such as "QUIP" ("Quality Improvement Programme") also serve to enhance standards further. "QUIP", which has already been operating for a number of years, has proved to be most effective and is also much appreciated by the EVN customer service team.



Award of the "QUIP" 2001.

# First class information from EVN energy consultants

Since 2001 four interesting service packages have been available to private EVN customers under the heading "First class information! The building and modernisation advice package".

- **Free initial consultation** lasting 45 minutes on all aspects of energy supply, energy saving, construction and building modernisation.

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- **Construction and energy engineering consulting** – detailed information with regard to energy efficient construction, heating requirement estimates, modernisation, and suggestions for energy savings.

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- **Individual energy concepts** with the computer-aided calculation of heating loads, costs, comparisons between differing heating systems, and supplementary energy certification.

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- **Home grants** – within the framework of additional funding for the construction of homes, the province of Lower Austria supports the use of energy saving building methods and techniques. EVN offers comprehensive consulting in this regard, which includes the provision of applications and the preparation of the required energy certification for the building.

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## Attractive services for local government and companies

- **Energy contracting.** Minimisation of energy consumption and environmental protection improvements in local government and company buildings. EVN undertakes overall responsibility for the planning, construction, financing and operation of energy supply installations. The required investment is subsequently financed from the savings in running costs.

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- **Lighting service.** This integrated EVN package solution consists of planning, refurbishing and overhauls, financing, power supply, operational management, fault correction, maintenance and repairs but also the purchase of all street lighting within a local authority area. Both lighting and traffic demands are taken into account along with economic aspects, townscape questions and environmental considerations. The use of low-energy lamps and modern street lights employing highly efficient mirror technology cuts power consumption and thus eases the burdens on both the local government budget and the environment.

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- **Energy concepts.** An analysis of the status quo, the formulation of targets and the planning of measures as a basis for local and regional energy and environmental policy objectives. The preparation of integrated solutions for the optimal co-ordination of all the available energy sources and systems with the goal of cutting both primary energy demand and emissions.

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# Investments for the future – Research & Development

As an innovative infrastructure supplier, within the scope of its resources, EVN has a special interest in promoting technical progress in the areas of energy supply and public services infrastructure. The range of institutions receiving assistance from EVN ranges from secondary engineering colleges to polytechnics and universities of technology. EVN is also participating in numerous EU-financed projects in co-operation with other companies and institutes. Moreover, EVN also attempts to continuously introduce new energy conversion and utilisation technologies into its own area.

## A history of technological leadership

Since the very beginning of its operations, EVN has made a principle of working on new technical developments and then testing them as to their suitability for industrial use. Numerous examples, particularly in the power station sector, illustrate the fact that EVN has always sought to use the most modern and efficient technology available.



Neusiedl an der Zaya

**1944 Neusiedl an der Zaya power station** Austria's first natural gas fired power station (initial use of natural gas for electricity generation). One of Europe's first industrial gas turbines (use of a turbine group to generate pressure for the VELOX natural gas fired boiler, operated at 1.5–2 bar overpressure).



Korneuburg

**1959 Korneuburg power station** One of the world's first gas and steam (combined cycle) turbine plants – partial use of the waste gases from the gas turbine for steam generation and the powering of a steam turbine.

**1964 Hohe Wand power station** Europe's first integrated steam turbine and gas fired steam boiler – initial full use of the gas turbine waste gases as combustion air in a gas fired steam boiler. Net efficiency level of 39.5 %.

**1978 Theiss power station** Through the hook-up of machine 4 with the newly installed boiler and steam turbine unit, the Theiss combined cycle plant expanded EVN's generation range for trapezoidal and peak demand (quick start combined cycle plant).



Dürnröhr

**1980 Korneuburg power station** Combi-block with the world's highest net efficiency level of 46.7 % (unsurpassed for 8 years).

**1986 Dürnröhr power station** Europe's most modern hard coal/natural gas power station with highly advanced flue gas cleaning for emission reduction. The first, full-scale European application of the catalyst-based, DeNO<sub>x</sub> process developed in Japan (100 % flue gas capture).

**1999 Theiss 2000 power station** World's first combined/integrated power station. Use of the gas turbine waste gases in a gas fired boiler and a waste heat steam generator. The entire steam produced is used in a steam turbine.



Theiß 2000

**2003 (Preview) Kraftwerk Dürnröhr** Europe's first integrated energy system involving waste incineration and a hard coal/natural gas fired power station. Use of the steam from the AVN waste incineration plant in the boiler of the power station in order to reduce fuel consumption.

# Research projects in the environmental protection sector



EVN participates regularly in international research projects relating to the economic and technical aspects of the Dürnröhr power station, as well as matters concerning reductions in ecological impact and the safer use of hard coal in thermal power stations. During the 2001/02 financial year, EVN participated in a total of ten EU-sponsored research projects involving total funding of EUR 2.4 m.

The following two projects are representative of activities during the past financial year.

Project name	Project target	Financed from	Project partners	Total costs in EUR	Time-frame
<b>PRISUB</b>	<p>Reduction in primary fuel consumption due to the use of steam from a waste incineration plant in an existing power station.</p> <p>The steam is supplied from the waste incineration plant to the power station via a 500 m long medium-pressure steam line and then fed into the boiler reheater.</p>	5 <sup>th</sup> EU framework programme/Energy, environment and sustainable development sub-programme	<ul style="list-style-type: none"> <li>• EVN</li> <li>• ALSTOM Power Boiler (conversion of the cold gas system)</li> <li>• AE Industrie Service AG (adaptation of the boiler)</li> <li>• National Technical University of Athens NTUA (evaluation of the conversion measures)</li> </ul>	3.3 m	2000–2004
<b>GEP</b>	<p>Development and evaluation of new electrostatic precipitator materials and forms with regard to their ability to remove fine dusts (grain size &lt;2.5 µm and &lt;10 µm).</p> <p>The innovative filter materials and forms developed during this project were installed in two of the fields of the main filter at Dürnröhr power station and are currently undergoing test runs.</p>	European Community for Steel and Coal (ECSC)	<ul style="list-style-type: none"> <li>• EVN</li> <li>• ABB and Rothemühle (production and delivery of the equipment for one electrostatic precipitator field each)</li> <li>• CRE, Powergen and Lodge Sturtevant (basic research into new materials and forms)</li> <li>• AICIA (support of test runs with measurement technology systems)</li> </ul>	2.3 m	1988–2002



EVN takes part in numerous projects, which are partially EU financed.

# Ecology

## A responsible approach towards the environment and natural resources

EVN attaches increasing importance to the orientation of company development towards the concept of sustainability. The focus of company activities is steadily shifting towards this approach, irrespective of the fact that the sustainability conference held in Johannesburg in August and September 2002, as a follow-up to Rio de Janeiro, failed to make major progress.

The integrated view of economic success, a protective attitude towards the environment and social progress form a platform for the guaranteed continuation of sustainable, environmental protection measures in years to come.

EVN has long allotted great value to a policy involving more than selected, individual activities. Its aim has always been the creation of an environmental management system, which would ensure extensive coverage and the consideration of environmental protection issues during all relevant management decisions.

# The EVN environmental management system

## Comprehensive environmental protection throughout the company

Over the years, the positioning of environmental protection at the very head of the company agenda – e.g. EVN Environmental Controlling has from its inception been directly responsible to the Board – has generated major initiatives in the environmental protection area. These include the refurbishing of the Theiss power station with the latest environmental protection systems, the implementation of an environmental management system in line with EMAS and ISO 14001 for all the production plants of environmental relevance, the construction of numerous biomass district heating plants, diverse initiatives in the alternative energy sector and attendance at climate conferences, etc.

The existing EVN environmental management system represents an ideal means of dealing with the challenges of the future, including those relating to sustainability. Accordingly, work is currently continuing on the expansion of the EVN environmental management system to include aspects of sustainability that have yet to be implemented. The objective is the establishment of a comprehensive sustainability management system.

- 1990** Creation of a **uniform Group environment policy** as a basis for all EVN environmental activities.
- 1990** Issue of the first **Environmental Report**, followed by an annual publication as a supplement to the Annual Report.
- 1991** Creation of the **“Environmental Controlling and Safety”** unit as the organisational foundation stone for EVN environmental management.
- 1992** Formation of an **Environmental Advisory Committee**, comprised of representatives from business, science, health and public authorities, which advises the Executive Board on matters of environmental protection.
- 2001** Expansion of the Environmental Report to include social issues and publication of the first **“Environmental and Corporate Responsibility Report”**.
- 2002** Issue of the first **“Sustainability Report”**.

# Forerunner role with regard to EMAS and ISO 14001 accreditation



The environmental management systems at all of EVN's locations with a major environmental impact has been subjected to EMAS and ISO 14001 accreditation at the earliest possible date. During every audit, the professionalism of the work force, the priority allocated to environmental protection within the company and the first class environmental technology standard of the plants all satisfied the scrutiny of the external auditors.

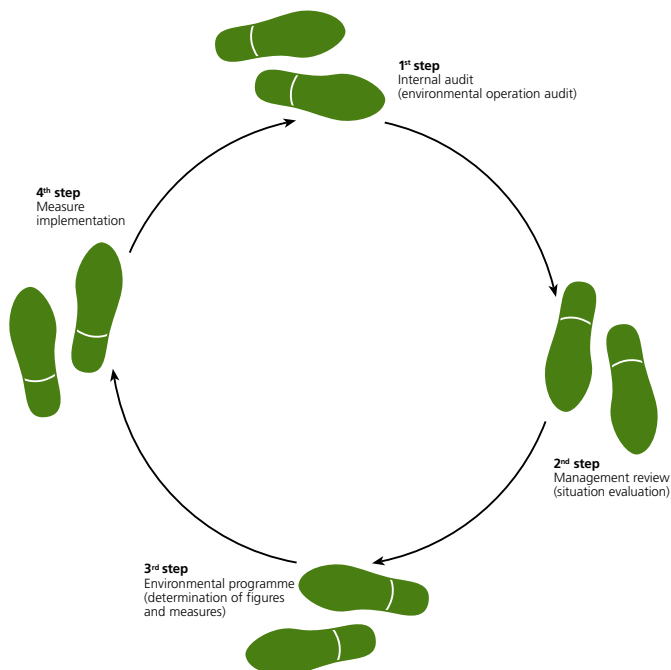
In 1995, Theiss became the first thermal power station in Central Europe to receive ISO 14001 accreditation. This was followed in 1996 by the Dürnrrohr power station. During 1998 and 1999, EVN's entire district heating plants also received accreditation, and were combined to form the Heating Groups East and West. These heating groups include a large number of biomass-fired district heating plants. As a result, EVN became the first Austrian operator of biomass-fired, district heating plants subject to such a system.

## EVN environmental management system – a concept with a wealth of advantages

- Secured and proven environmentally compatible plant operation.
- Continual improvements in environmental protection performance.
- A steady increase in the number of cost reducing environmental protection measures.
- Overview concerning environmental statutes and reliable legal compliance.
- Prompt adjustments to new legislation.
- Long-term orientation.
- Streamlining of internal procedures / integration in the existing management system.
- A dialogue with the authorities based on partnership.
- The efficient use of human and financial resources for a maximum improvement in environmental protection performance.
- Active communications with the general public.

## On-going updates and improvements

### Continuous improvement process



A continuous annual improvement process provides the nucleus for the on-going upgrading of environmental performance at EVN.

# Services in the interests of the environment

## Joint environmental protection measures with customers

As an environmentally conscious energy services company, EVN sees its responsibilities as not only including the provision of efficient economic solutions, but also the reduction of ecological impact in co-operation with customers. Therefore, apart from supplying electricity, natural gas, heat, and water, EVN offers a wide range of consulting and other services, which promote a balanced combination of economic and environmental objectives. In addition to an initial, free advisory meeting with EVN experts, these services mainly consist of the preparation of individual energy concepts, construction and energy engineering consulting and advice in connection with environmental grants and boiler exchange promotions.

In general, the services can be summed up under the heading “demand side management”, in which the careful use of energy and the preparation of low-cost, efficient and environmentally compatible solutions predominate. The services offered by EVN consulting are in great demand from private households, commercial and industrial companies, and local authorities.

## EVN energy consulting – an extensive service range with advantages for the environment

- **Thermography** – determination of thermal weak points in buildings using infrared cameras.
- **Heat pumps** – use of ambient heat for heating and hot water preparation.
- **Heat recovery ventilation** – waste heat recovery from ventilation systems and the enhancement of indoor air quality.
- **Condensing gas furnace technology** – high-efficiency, natural gas heating.
- **Solar energy-based water heating systems** – emission-free hot water preparation using the sun’s power.
- **District heating from biomass** – high-comfort, CO<sub>2</sub>-neutral heat as a contribution to climate protection.
- **Natural gas** – the cleanest fossil fuel with the lowest CO<sub>2</sub> and pollutant emission levels.
- **Ice storage units** – refrigeration plant optimisation through separation from energy generation and demand by means of a cold storage unit.

# Heat loss prevention using thermography

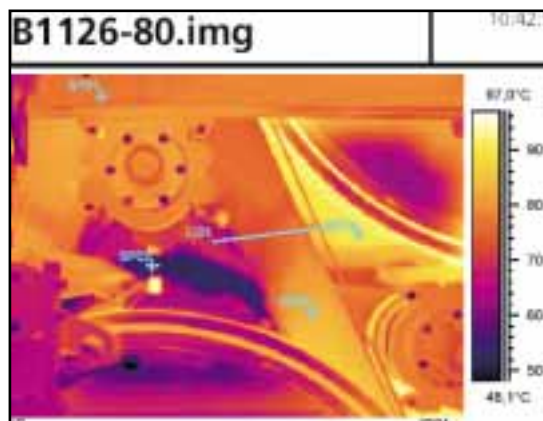
Building renovation frequently offers considerable potential for energy savings. However, in order to achieve a maximum improvement, it is essential that the (thermal) weak spots causing the majority of heat losses are identified in advance.

In this connection, EVN offers its customers a modern measurement process in the shape of thermography, which transforms the invisible thermal radiation emanating from a building into visible images. This enables EVN's experts to examine the building with regard to adherence to modern heating technology requirements and to identify heat losses. Customers can then optimise their investments in renovations and improvements on the basis of these checks and also make certain that the work is carried out correctly.

## Typical applications

- Discovery of all types of thermal weak spots, e.g. heat bridges and defective structural joints.
- Determination of the causes of mould.
- Identification of heat leaks in air-conditioned buildings.
- Location of air leaks.
- Identification of saturated brickwork, e.g. through ground water, piped water or precipitation.

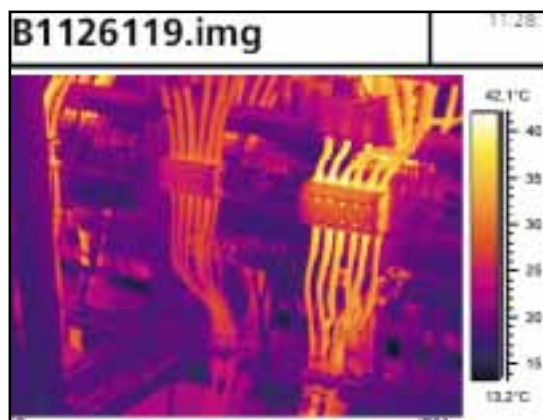
A new application for thermography involves checks on machine systems. EVN has used this method with great success in the paper industry and electrical engineering sector. Heat insulation is not the main factor in this connection, but rather technical aspects such as uniform temperature distribution and the identification of component overheating.



Thermographic checks at the Salzer paper mill in St. Pölten.

Above: Uniform temperature distribution across the entire width of the paper machine is important to the production of quality paper.

Below: Scrutiny of electrical components can prevent overloads and thus overheating and fire hazards.



# New from EVN – the Blower Door Test

## Air-tight design ensures controlled air exchange

During the building of new housing or renovation work, great attention must be paid to careful sealing. Hidden leaks, e.g. in damp courses or windows lead to an uncontrolled exchange of air, which in turn creates a series of negative effects:

- Considerable heat losses.
- The danger of dew formation.
- An excessively dry indoor atmosphere in winter.
- Reduced protection against summer heat.
- Insufficient noise protection.
- Uncontrolled air exchange.

Furthermore, the levels of comfort in the living area are considerably reduced by defective joints, e.g. skirting boards and windows.

## Measurements as a precondition for prevention and repair

Measurements in residential buildings have shown that the type of construction method used has a major influence on the air-tightness of the building. Massive defects are frequently to be found in lightweight structures (prefabricated houses and attic conversions).

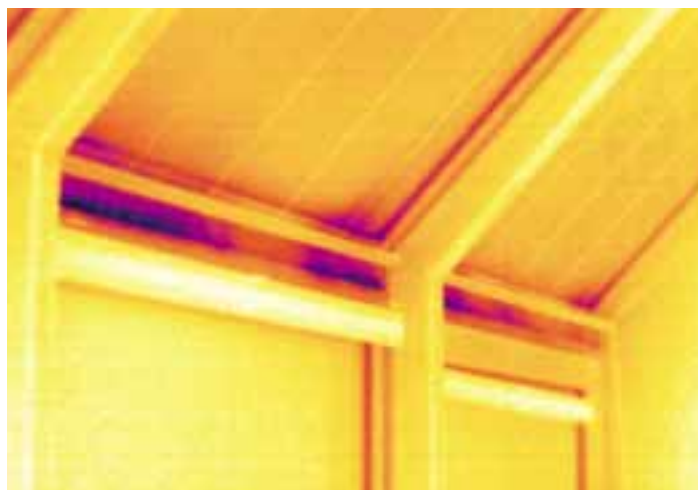
In this area, EVN has recently begun to offer special impermeability measurements. These are intended to ensure:

- The minimisation of energy consumption derived from heat losses caused by leakages.
- The prevention of structural damage due to condensation caused by building sections with poor heat insulation.

## Air exchange measurement (“Blower Door Measurement”)

In the autumn of 2002, EVN launched the innovative Blower Door process. Typical applications include:

- **Grants for new buildings:** increased home grants for ventilation systems with impermeability certification.
- **New buildings in general:** quality controls after completion (“purchase tests”).
- **Stocktaking:** identification of existing air leaks.
- **House renovation:** quality controls following alterations (generally attic conversions).



In order to carry out Blower Door measurements, all the doors and windows in a building must be closed. The main entrance or a window is replaced by a blower, which creates an overpressure or an underpressure of 50 Pa (Pascal) in the building by either blowing or sucking in air. The larger the volume of air transported per time unit, the more permeable the building. A Blower Door measurement takes around 2–3 hours, during which leaks can also be identified, e.g. using thermography.

# Environment-friendly natural gas powered cars

Apart from economic factors such as investment and running costs and service life, when purchasing new vehicles the effects on the environment are of special importance to both "climate alliance" municipalities and other vehicle fleet users (e.g. taxi companies, local public transport enterprises) and private motorists. Therefore, an increasing number of vehicles with alternative drive systems are being used.

## Natural gas offers clear environmental benefits

Above all, the replacement of standard fuels by natural gas offers enormous environmental benefits. As opposed to petrol, natural gas combustion cuts carbon dioxide emissions by up to 30 %, carbon monoxide by up to 90 %, non-methane hydrocarbons by up to 70 %, nitrogen oxides by up to 85 % and ozone precursors by up to 90 %. As compared to diesel, non-methane hydrocarbons are reduced by up to 98 %, nitrogen oxides by 80–90 %, ozone precursors by 70–80 %, and particles by 98 %. A further advantage of natural gas as a fuel lies in the fact that the exhaust gases are completely odourless.



## Model range and safety

Numerous leading automotive manufacturers are already producing natural gas fuelled vehicles in series. These meet the same quality standards as vehicles with conventional drive systems and, above all, offer maximum safety.

Due to the relatively small numbers produced, these vehicles remain rather expensive. However, these costs are compensated for by the far lower price of fuel.

EVN makes an important contribution to a reduction in environmental impact through the assistance of local authorities with the conversion of their vehicle fleets to natural gas.

## EVN promotes the use of natural gas fuelled vehicles

EVN, which since the beginning of the 1990s has had electrically and natural gas fuelled vehicles in its fleet and has long been operating natural gas filling stations, provides extensive support in this technological area. All in all, EVN has seven natural gas filling stations at its centres in Baden, Stockerau, Deutsch Wagram, Krems, Waidhofen an der Ybbs, St. Pölten and Neunkirchen, as well as a station at the Wiener Neustadt municipal utilities and a public filling station in Maria Enzersdorf.

Apart from four electrical cars, EVN has twelve natural gas fuelled cars in operation.

# Sustainable water management

## Ecology

EVN has also been active in the drinking water supply since its take-over of evn wasser (previously NÖSIWAG) in July 2001. This represented a further enlargement of EVN's services portfolio and further enhanced the company image as a multi-service utility.

EVN also attaches great value to sustainability in this area. The preservation of high-quality domestic water reserves for coming generations places major responsibilities on both the company and its employees. In this regard, EVN has continued its systematic, precautionary approach and on this basis, evn wasser has been able to reach exemplary standards.



## Retention of drinking water quality and quantity

A sustainable drinking water supply has to consider that the quality of the drinking water and the volumes required are both assured.

- evn wasser completes continuous testing of the chemical-physical and bacteriological parameters of its water that goes far beyond the statutory requirements and involves the use of considerable financial and personnel resources. This allows both the evidence of the perfect quality of the water as required and a timely reaction to any indications of deterioration.
- In line with the principle of sustainability, equilibrium must be maintained between water replenishment and extraction. In order to secure this balance, evn wasser's well fields are equipped with numerous water level plotters and electronic logging devices, which show water levels in the wells and the readings from various surveillance probes. Care is taken that the well fields are not overexploited and that consumption corresponds with the potential for ground water renewal. Accordingly, evn wasser extraction is in line with the natural water cycle.

# Opening up of additional resources



In order to cover the growing water demand derived from additional connections and rising population numbers, particularly in the municipalities around Vienna, evn wasser has pursued a precautionary securing of resources.

Accordingly, existing well locations are being expanded and new locations explored by means of long-term pump testing in an extensive evidence preservation process. At present, such testing is under way around Mollersdorf (north of Tulln), in Dürnkrot an der March and Petronell an der Donau.

## Comprehensive protection of all plants

evn wasser attaches great importance to the comprehensive protection of all the buildings and plants required for the supply of drinking water. A variety of measures, ranging from remote surveillance and alarm systems as protection against break-ins, to a 24-hour employee stand-by service, safeguard the drinking water plants and not merely since September 11, 2001.

## evn wasser secures drinking water supply during the August floods in Austria

In many areas of Lower Austria, the floods of August 2002 clearly demonstrated the vulnerability of the drinking water supply. In this situation, evn wasser's far-sighted infrastructure and resource planning enabled the company to supply extensive help to the affected population in local authority areas, which at present are not supplied by evn wasser. The existing link lines compensated for wells that had to be shut down due to the floods. Disinfection plants were also operated at defined points on the flood plan, in order to ensure the overall maintenance of perfect quality.



In this way, not only was the water supply to all the municipalities regularly served by evn wasser maintained, but also other additional areas were provided with urgently required drinking water.

- Numerous municipalities, which were only partially supplied with water by evn wasser were forced to close their own wells and had to switch to a full supply from evn wasser. Moreover, other municipalities with whom only an emergency supply agreement exists, in particular Gmünd, Korneuburg and Spillern, were fully supplied by evn wasser for a considerable period.
- At its well field in Neuaigen, evn wasser installed an emergency bottling plant in order to supply the local population, which normally obtains its water from house wells, with clean drinking water.
- In the Kamp Valley, evn wasser was able to maintain a basic water supply to the local inhabitants in the form of emergency water packs.



During the floods of August 2002, emergency water packs provided the population of the Kamp valley with a basic supply.

# Environmentally compatible generation

EVN is building on renewable energy sources for the environment-friendly generation of electricity and heat. This is achieved by numerous hydroelectric power stations, wind power plants, numerous biomass-fired district heating plants, a pilot plant for the generation of electricity using biomass and several photovoltaic plants.

EVN's thermal power generation plays a significant role in securing Lower Austria's power supply. Moreover, in order to keep its environmental impact to a minimum, EVN's thermal power stations are all equipped with the very latest flue gas cleaning installations and are constantly maintained at the latest technological standard. The increases in efficiency attained by these measures cut the fossil fuel requirement and thus represent a contribution to the sustainable use of limited resources.

In the heat generation sector, EVN has taken a calculated step towards sustainability through the increased use of biomass in recent years. As far as the employment of fossil fuels for heat generation is concerned, EVN relies primarily on natural gas, which produces the smallest volume of CO<sub>2</sub> emissions of any fossil fuels. At present, oil is only employed as a substitute fuel for district heating plants outside the gas supply network.



# Renewable energy sources

## Demanding international framework

A major target with regard to sustainability is the greatest possible transition of energy generation to renewable energy sources. The international targets formulated in this regard are highly ambitious:

- At the Climate Conference in Kyoto in 1997, the European Union agreed to an 8 % reduction in greenhouse gases by 2010 on the basis of 1990 levels. In the course of the distribution of burdens within the EU, Austria undertook to cut its CO<sub>2</sub> emissions by 13 % as compared to the 1990 level in the period up to 2010, despite its already exemplary position derived from a high hydro-power share.
- In its white paper, "Energy for the future – renewable sources of energy", the European Union has set itself the highly ambitious target of doubling the share of renewable fuels in energy generation from the current level of 6 % to 12 % by 2010.
- As a consequence, an EU directive was drawn up for the promotion of electrical power generation using renewable energy sources in the single electricity market. The directive foresees a virtual doubling of the share of renewable energy sources in electricity generation from 13.9 % to 22.0 %. On the basis of the directive guidelines, Austria, which already demonstrates a far above-average quota, has to raise the share of renewable energy sources in its electricity generation from around 70.0 % in 1997 to 78.1 % in 2010.

## Hydroelectric power as a contributor to climate protection

As a practically emission-free form of electricity generation, the use of hydro-power makes a considerable contribution to a global reduction in environmental impact. A fact confirmed by numerous publications, including the "Study on the Importance of Harnessing the Hydropower Resources of the World", issued in 1996 by UNIPEDE (the European association of electricity producers and distributors, which in the meantime has been renamed, "EURELECTRIC"). This document demands the increased use of hydroelectric power in view of its role in world climate protection and the reduction of greenhouse gases.

Due to geographic factors, Austria is able to meet around 70 % of its electricity demand with hydroelectric power. If the appropriate design methods are employed, this is a particularly environment-friendly form of generation, as it is both virtually emission-free and naturally sustainable.



Hydroelectric power also represents the most important source of renewable energy for EVN. At present, the company operates five storage power stations. In addition, it has electricity supply rights to and holdings in the three Danube power stations at Melk, Greifenstein and Freudenau. Furthermore, the numerous small-scale hydro-power stations of the fully owned subsidiary, evn naturkraft, as well as plants under private ownership, supply power to the EVN network.

Depending on water levels, the power provided by hydroelectric power stations as a proportion of total EVN generation varies between 18 and 29 % (including the Danube power station electricity supply rights).

The Ottenstein power station, EVN's flagship in the hydroelectric generation sector.

# evn naturkraft – the EVN Group’s ecological power generation company

evn naturkraft, a fully-owned EVN subsidiary, combines all EVN’s activities in the area of electricity generation from renewable energy sources. The company operates small-scale hydro-power plants, wind power and photovoltaic plants and attaches special importance to the highest possible level of environmental protection. For these efforts, evn naturkraft received the “Ecological Electricity Generation” certificate from TÜV Austria, which entitles the company to offer its electricity under this designation.

During the period under review, evn naturkraft owned 59 small-scale hydroelectric power stations, 53 in Lower Austria and six in Styria, as well as a wind park in Gänserndorf. Own production in these plants during the 2001/02 financial year amounted to 125 GWh. This corresponded to the needs of some 35,000 households, which could be supplied on the basis of environment-friendly, emission-free renewable energy.

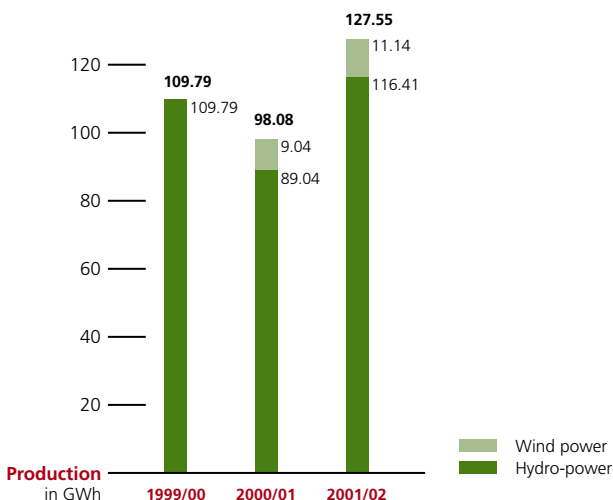
In order to further expand its electricity generation from renewable sources, evn naturkraft is currently involved in a number of projects. The main focus is on the completion of the new “Dorfmühle” small-scale hydro-power plant on the River Ybbs, as well as the building of two new wind parks in Neusiedl an der Zaya and Prellenkirchen. In future, these new plants will enable the supply of an additional 17,500 households with power from regenerative energy sources. These new small-scale power plants and wind parks constitute an important contribution by EVN to the attainment of Austria’s greenhouse gas reduction targets.

In addition to evn naturkraft, some 270 private small-scale hydro-power plants, as well as approximately 100 private wind power plants, supply electricity to the EVN network.

## EVN hydro and wind power initiatives in Lower Austria

- A contribution to climate protection due to negligible levels of greenhouse gas emissions.
- No pollutant atmospheric emissions (SO<sub>2</sub>, NO<sub>x</sub>, etc.).
- A reduction in fossil fuel consumption.
- Reservoirs that can be used as leisure areas and for tourism (e.g. Ottenstein, Dobra power plants ).
- Refurbishment of small-scale hydro-power plants for increased efficiency and economy.
- Enhanced environmental compatibility through water-related, ecological measures (fish ladders, wet biotopes and still waters).
- Retention of historical small-scale, hydro-power plants and canals.

### evn naturkraft production development



# The new Dorfmühle small-scale hydro-power plant

On July 16, 2002, the ground-breaking ceremony was held for the new Dorfmühle small-scale hydro-power plant at Kematen an der Ybbs. The plant is due to go on line in late autumn 2003 and generate 11 GWh of electricity annually. During the planning of the new power station special attention was paid to achieving a high level of ecological efficiency.



Environment-friendly electricity generation at the new Dorfmühle hydro-power plant on the River Ybbs. Extensive, supplementary ecological measures protect the habitat of domestic flora and fauna.

## Extensive supplementary ecological measures

Numerous precautions and special installations will ensure that even following the start-up of the new power plant, the River Ybbs will retain its high ecological quality and hence its suitability as a habitat for domestic animal and plant species. All the measures taken with regard to the preservation of the river and its banks were supervised by Prof. Mathias Jungwirth from the Vienna University of Agricultural Sciences, an ecological building inspector appointed by the authorities.

- A fish ladder, which consists of an ascending series of cascade-like water basins, ensures that the fish species typical to the Ybbs can continue to migrate.
- The special design of the inflexible section of the dam ("solid dam threshold") and the provision of a so-called spillway, permit the river's natural freight (stones, gravel and sand, which is moved along the river bed by the current) to pass the power plant.
- In order to conserve the natural flora, the right-hand river bank upstream of the barrage was partly covered with river sediments and planted with species indigenous to the location. The resulting river bank-like area is intended to offer a wide variety of plants and animals a new habitat. The narrow banks of land upstream of the power plant remain unaffected by the construction work and can continue to fulfil their function as a wetland.
- The installation and operation of a modern rake cleaning system means that any refuse in the water can be collected and properly disposed of.

In order to enhance life on and with the Ybbs, the neighbouring municipalities of Kematen and Allharzberg are also planning to build river adventure pools on both river banks.

## Construction of two new wind parks



The same type of windmill is to be used in both Neusiedl and Prellenkirchen (five windmills in Neusiedl, eight in Prellenkirchen). Each windmill has an output of 1.8 MW. The hub is located at a height of 86 m, while the rotor diameter amounts to 70 m.

In addition to the existing wind park in Gänserndorf, evn naturkraft is currently working on two new facilities in Neusiedl an der Zaya and Prellenkirchen. These are scheduled to go on-line in the autumn of 2002 and the summer of 2003 respectively and will generate a total of around 50 GWh annually.

Apart from the completion of these two projects, further wind power plants are planned for the Wald- and Weinviertel regions.

# Heat from biomass

The generation of heat using biomass, which consists primarily of bark, forestry chippings and sawmill by-products, is seen by EVN as a further contribution to a sustainable energy supply. With 28 plants and annual consumption of some 250,000 piled cubic metres of biomass, which corresponds to around 12.8 m litres of fuel oil and a saving of 35,000 t of CO<sub>2</sub> emissions, EVN has long been Austria's largest producer of heat from biomass. In total, EVN's biomass-fired plants currently provide thermal output of 60.5 MW. This output can be used for the heat and hot water supply of more than 5,000 Lower Austrian homes.

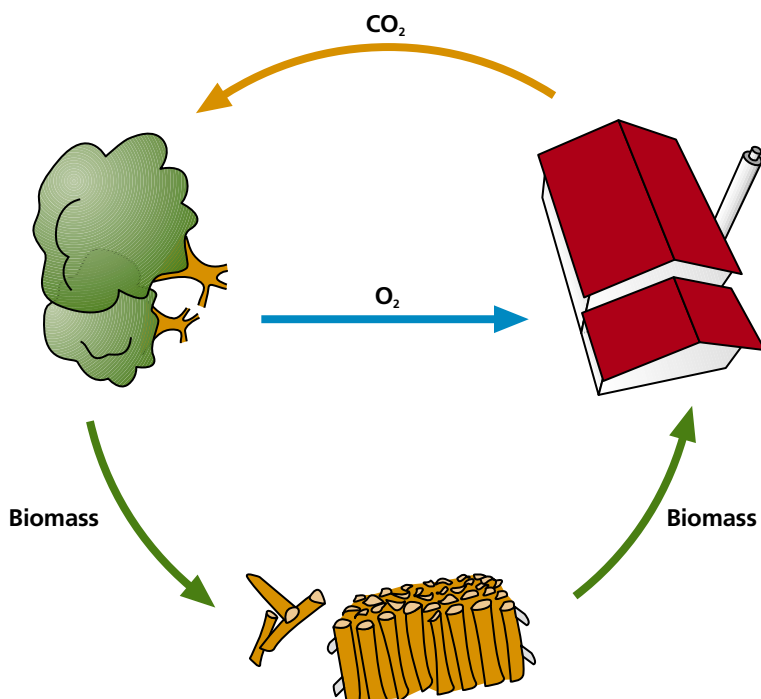
## A contribution to sustainability

In a forest-rich country like Austria, wood is of decisive importance as an energy source. The utilisation of biomass offers many advantages, which apart from a considerable reduction in environmental impact primarily includes an economic boost for the region through the supply of fuel from local sources. Each year, forestry husbandry in Lower Austria alone provides over 760,000 solid cubic metres of waste wood, which provides a low cost fuel for heat generation that is independent of imports. Accordingly, EVN looks to co-operate with local forestry and agricultural enterprises during all of its biomass projects.

## Biomass as a CO<sub>2</sub>-neutral source of energy

Wood is regarded as a renewable energy source when, as is generally the case in Austria, it derives from sustainable forestry operations. This means that (e.g. contrary to the felling of rain forest) the amount of wood removed from a forest is equal to the quantity being grown. The volume of CO<sub>2</sub> created during the burning of the wood can therefore again be absorbed by the trees and converted into timber. In accordance with an internationally recognised definition, the resulting cycle is thus regarded as being CO<sub>2</sub>-neutral.

## CO<sub>2</sub> cycle of biomass



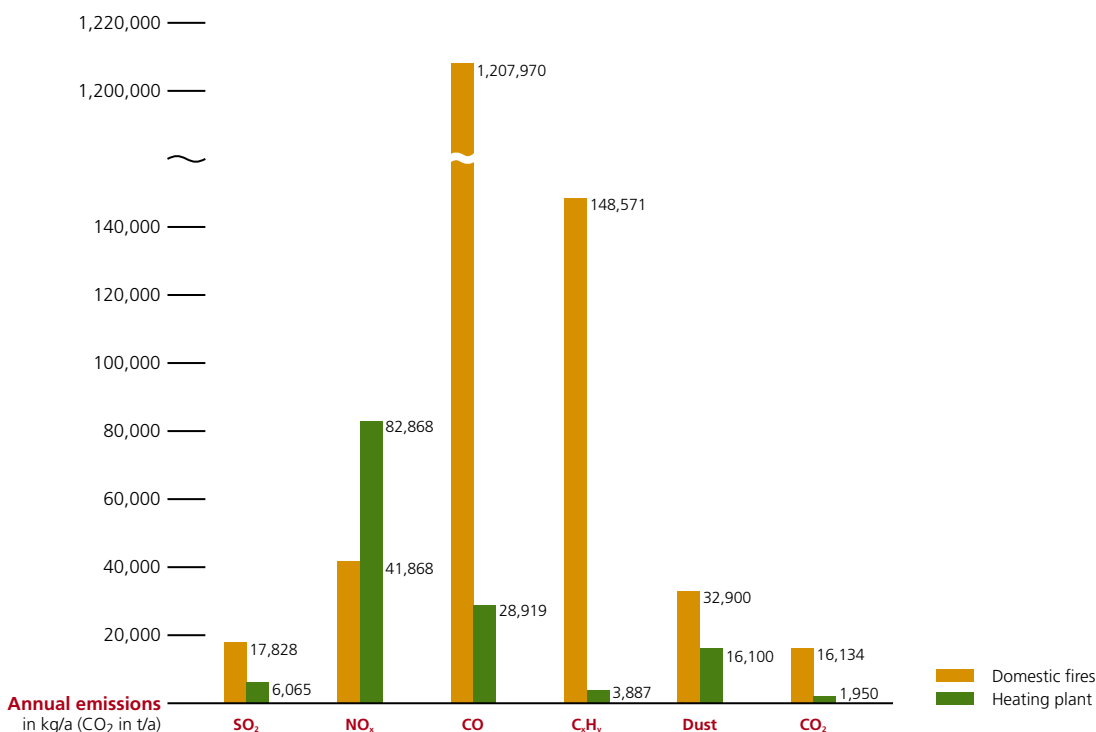
As during growth, biomass absorbs the same amount of CO<sub>2</sub> as is emitted during incineration, it is regarded as being CO<sub>2</sub>-neutral.

# The advantages at a glance

- An active contribution to environmental protection through the use of a renewable energy source.
- A cut in pollutant emissions through a decrease in the number of household fires.
- Optimum incineration through the use of the latest firing technology and regular checks.
- State-of-the-art waste gas cleaning systems.
- Regional value added by means of the use of a local fuel.
- The safeguarding of local jobs.
- Additional income for farmers.
- A reduction in dependence on primary energy imports.
- Improved forest hygiene through the sale of wood residues.
- Raw material utilisation as an incentive for landscape care.
- Comfortable, direct supply of households with ready-to-use heat in the form of hot water.
- Simple and clear invoicing.
- Gaining of additional space due to the fact that fuel storage in the home is no longer required and through compact heat exchanger unit design.

## Heat from biomass provides a considerable reduction in environmental impact

### Emission savings through heat from biomass as opposed to household fires



In the case of practically all atmospheric pollutants, the use of biomass for heat generation provides a sizeable reduction in emissions as opposed to conventional household fires.

# New biomass heating plants in Bad Schönau and Tullnerbach

In co-operation with local agricultural district heating co-operatives, during the period under review EVN built two additional biomass heating plants. The foundation stones for both plants were laid in the spring of 2002 and both went into operation at the beginning of the 2002/03 heating period.



The plant in Bad Schönau, which has an output of 1.7 MW and a highly efficient, electrostatic precipitator for flue gas cleaning, is to supply large hotels and spa facilities, commercial companies, public buildings in the municipality and private homes. With 175,000 guests per year, Bad Schönau is one of the largest tourism centres in Lower Austria. The biomass-fired heating plant will be of major assistance in improving local air quality and hence the preservation of the recuperative value of the region as a whole. In total, the Bad Schönau heating plant will conserve around 1 million litres of heating oil, which means annual savings of around 2,800 t of CO<sub>2</sub>.

The quality of life in the popular Bad Schönau spa is to be further enhanced by a new EVN biomass-fired district heating plant.

In Tullnerbach, a biomass plant with an output of 500 kW has been built, which is primarily intended for the supply of heat to an agricultural school and several neighbouring houses. Around 185,000 litres of heating oil will be saved annually, which will prevent emissions of approximately 450 t of CO<sub>2</sub>.

## Electricity from biomass

In addition to its extensive activities relating to the use of biomass for heat generation, some time ago EVN began to consider the question of the degree to which, as a renewable source of energy, biomass might be used for electricity generation in small-scale plants.

### Wood gasification as a highly promising solution

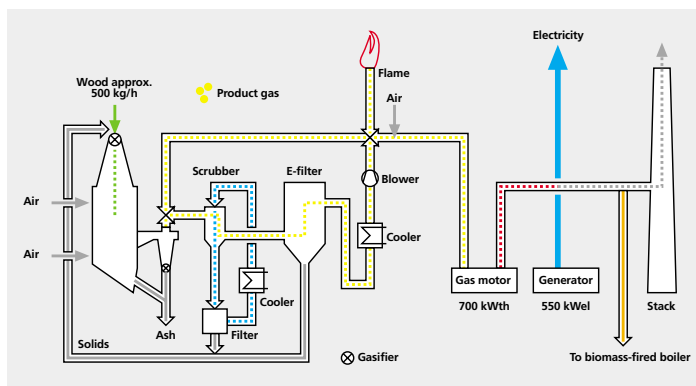
Although biomass has long been used for the generation of electricity and heat in large-scale plants, e.g. in the paper industry, the problem of low efficiency remains as far as small-scale plants are concerned. Innovative concepts are needed and one highly promising new technology is the production of wood gas from forestry chippings. This wood gas can then be employed in a gas engine for the generation of electricity and heat.

### The Civitas Nova pilot plant

An interesting pilot project in this area is currently under completion within the "Renewable Energy Network Austria" (reNet Austria) competence network. In close co-operation with scientists and the plant building industry, EVN is building a demonstration plant in the "Civitas Nova" district of Wiener Neustadt, where the company already operates a large biomass-fired district heating plant. The new plant went into pilot operation in the autumn of 2002. Once technical and economic feasibility testing has been successfully completed, the plan is to retrofit other EVN biomass heating plants with an appropriate plant concept.



### Schematic diagram of wood gas generation



Innovative concept for the environment-friendly production of electricity from biomass

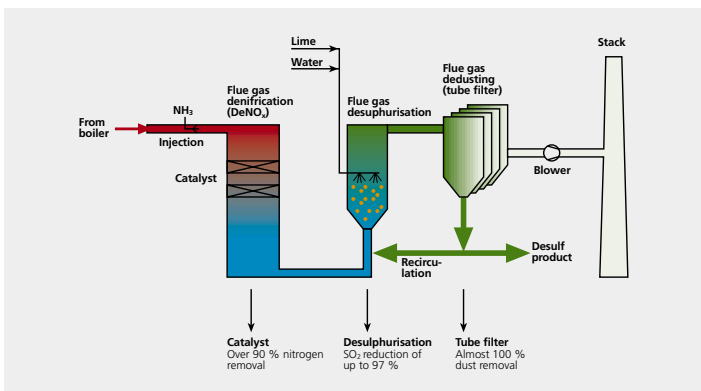
# Conventional energy generation

## High environmental standard of the EVN power stations

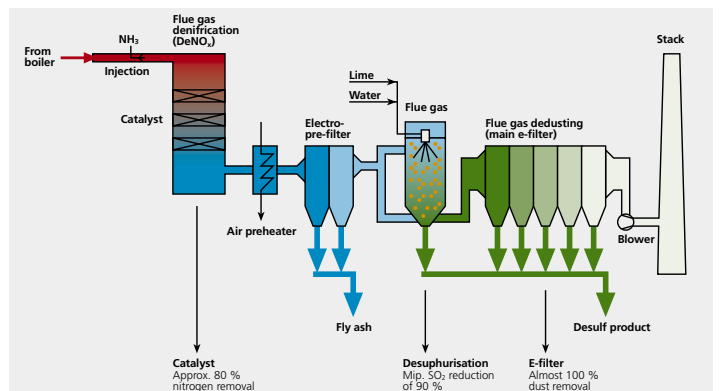
In line with the concept of sustainable energy supply, EVN endeavours to maintain the environmental protection systems of its power stations at the very highest standards, in order to reduce their environmental impact to an economically acceptable minimum. Consequently, just recently the Theiss power station has been subjected to comprehensive modernisation and now represents an international model. The very latest flue gas cleaning system was installed during the building of the Dürnröhr power station. A catalyst-based, DeNO<sub>x</sub> unit, developed in Japan, was used in Europe for the first time. This system provided 100 % flue gas capture (full-scale equipment) and continues to meet all current environmental standards.

The key issue with regard to a sustainable approach to the available resources is optimised efficiency. Among other factors, this involves an increase in plant efficiency and a reduction in distribution network losses. In addition, EVN makes every effort to cut the atmospheric emissions from its plants to a minimum and uses the very latest flue gas cleaning plants for this purpose.

### Flue gas cleaning at the Theiss power station

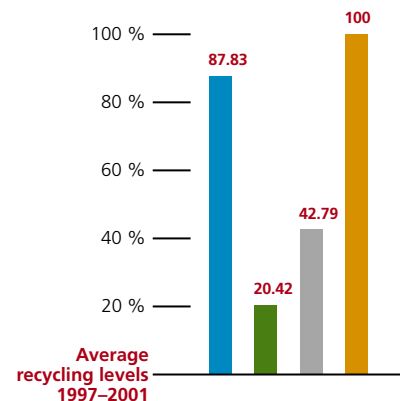
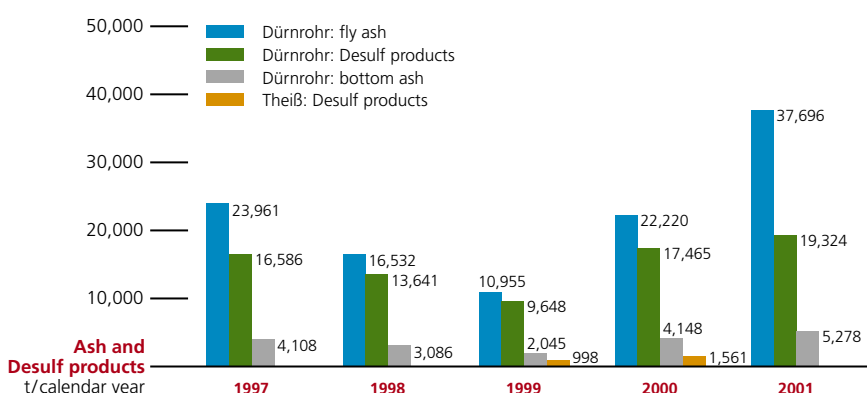


### Flue gas cleaning at the Dürnröhr power station



Furthermore, the bleeding of district heating from the Dürnröhr and Theiss power stations, in particular for the town of Krems, has led to improved fuel utilisation and a marked reduction in emissions due to the replacement of a large number of small boilers. In future, the incineration of waste and the use of biogenous fuels in coal-fired power stations could lead to further fossil fuel savings.

### Sustainable use of by-products from flue gas cleaning



Bottom ash, fly ash and spray dryer FGD by-product are created during the cleaning of flue gases from power stations. EVN tries to recycle these materials to the maximum possible extent and at present the majority go to the building materials industry. Other by-products, which cannot be recycled are currently deposited on power station landfills.

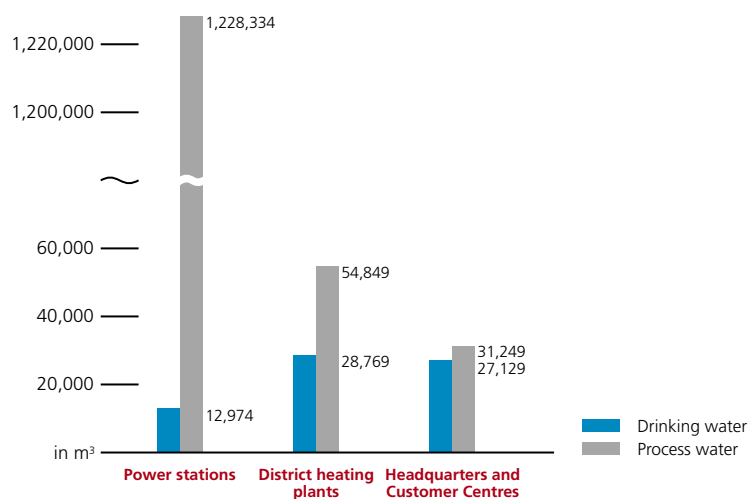
All in all, the quantity of by-products depends on operating levels at the power stations and the degree to which the materials are employed, on the requirements of the building materials industry.

# Careful use of water

In all its power stations, EVN places a special emphasis on the environmentally compatible and sustainable handling of water and wastewater.

- A wastewater-free system was selected for the flue gas desulphurisation installations at the Theiss and Dürnröhr power stations.
- As far as possible, EVN always seeks to create closed cycle wastewater systems, e.g. the precipitation from the landfill at the Dürnröhr power station is used for the production of a lime suspension for the flue gas desulphurisation installation.
- Water consumption in the wet ash removal installation at the Dürnröhr power station was recently reduced to such an extent by internal recirculation that all the remaining residual wastewater can be used within the power station.
- Unavoidable amounts of wastewater containing ammonia deriving from the condensate scavenging installation are cleaned in municipal sewage treatment plants.
- Wastewater from the feed water treatment plants does not pose an ecological hazard, as it merely shows a higher salt level. The plants are employed for the complete desalination of the water used in the power station's water-steam cycle and the only source of wastewater is the regeneration of the ion exchanger. Following careful neutralisation this wastewater is discharged into the Danube.
- The cooling water for EVN's three thermal power stations is obtained from the Danube to which it is then returned in a slightly warmer condition. No chemicals are added to the cooling water. The strict limits on the discharge temperature are constantly monitored and always adhered to. The use of cooling water is the precondition for high efficiency. It causes steam condensation downstream of the low-pressure section of the steam turbine and it is this underpressure that raises the degree of efficiency.

## Water consumption at EVN



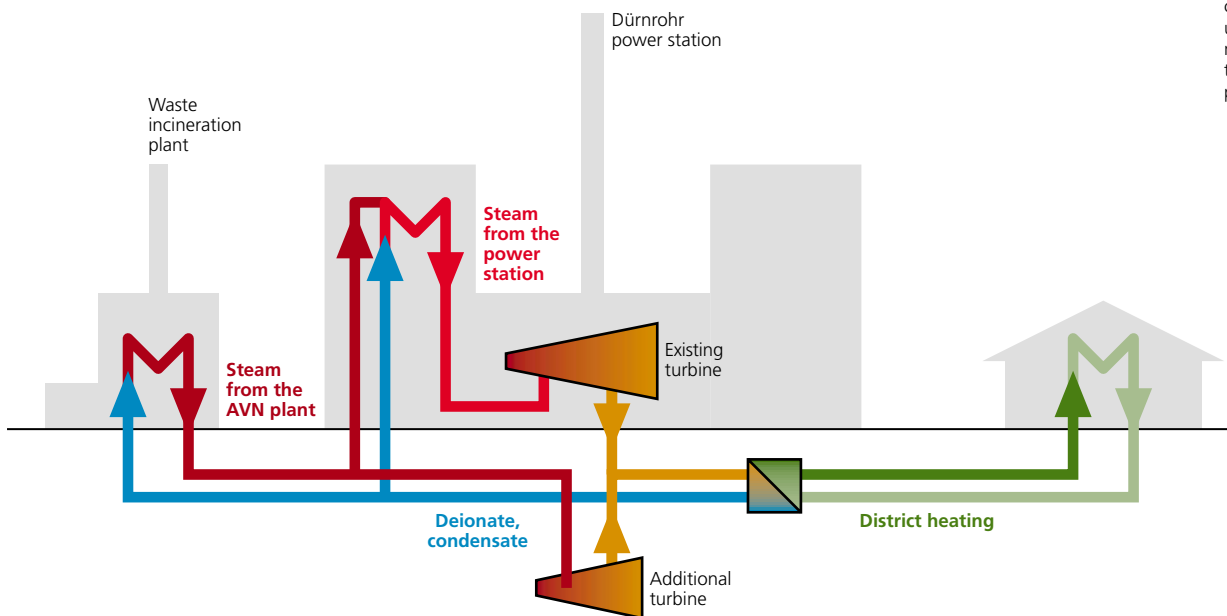
# Dürnrrohr power station – an innovative, integrated energy system with a waste incineration plant

An extremely advantageous ecological and economic solution is currently being created in the form of an integrated energy system involving the Dürnrrohr power station and the adjacent waste incineration plant currently under construction, which is owned by AVN, a fully-owned EVN subsidiary. The new plant can use parts of the existing infrastructure of the power station and, above all, will attain far higher efficiency levels than comparable plants through the integrated system employed for the generation of electricity from the heat created during the waste incineration process. These advantages constituted the decisive reason for the choice of location for the waste incineration plant.

The steam produced in the waste incineration plant will be conducted along a 500 m line to the Dürnrrohr power station where it will be fed into the reheater of the power station boiler. Here, it will be raised to a higher energy level and can then be used for electricity production in the existing power station turbine, which drives a generator. Apart from the relatively high efficiency of electricity production from the steam provided by the waste incineration plant, approximately 50,000 t of coal and around 10 m<sup>3</sup> of natural gas can be saved annually. This will result in the prevention of CO<sub>2</sub> emissions amounting to some 164,000 t annually. Work has already started on the technical aspects of steam integration and the start-up of the waste incineration plant, which will be followed by a six-month pilot operation period, is due to take place in April 2003.

When the power station is off-line, the steam from waste incineration will continue to be used for electricity generation by means of a smaller steam turbine, which has been installed in the plant specifically for this purpose. The relevant systems are currently being installed in the machinery house of the Dürnrrohr power station.

## Schematic diagram: integrated energy system

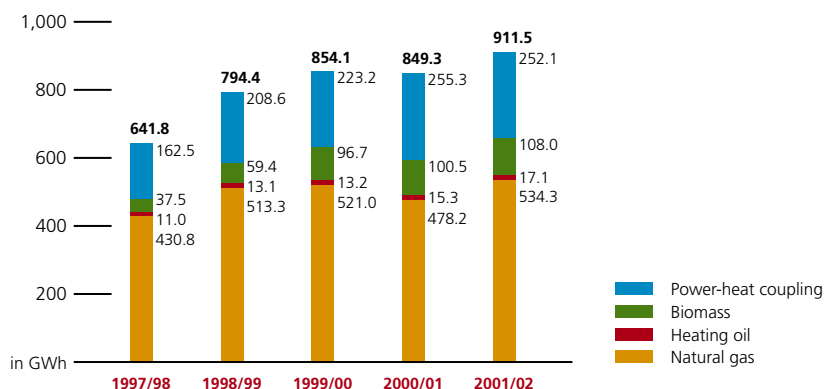


Efficiency levels are raised considerably through the use of the heat from thermal waste incineration by the neighbouring Dürnrrohr power station.

# EVN heating – a concept with a wealth of environmental benefits

EVN also operates numerous heat generation plants, which supply heating networks. The decisive advantage of central generation is that heat is produced in professionally designed and operated plants. High efficiency and optimum operating conditions in these plants create cost savings and a significant cut in pollutant emissions. Moreover, the supply of the finished “heat product” also raises comfort levels. The steadily increasing number of EVN heating customers confirms the numerous advantages offered by this concept.

## EVN heat production



In recent years, EVN has continually expanded its heat production. The amount of heat generated last year amounted to the requirement of around 155,000 households.

## The advantages at a glance

- The very latest environmental protection technology.
- Professional operation by EVN specialists.
- Heat generation using environment-friendly primary energy sources.
- Biomass is CO<sub>2</sub>-neutral and thus makes an important contribution to climate protection.
- The combustion of natural gas creates fewer greenhouse gases and pollutant emissions than any other fossil fuel.
- A cut in emissions as compared with household fires.
- Improved air quality.
- Support of the agricultural industry through the use of biomass from domestic sources.
- Value added remains largely in the region.

# Emission patterns

The comprehensive EVN services portfolio naturally leads to a diverse range of influences on the environment, although these are kept to the best possible minimum. The main factors with regard to environmental impact are:

- The type and quality of the fuels employed.
- The type of plant used.
- General, operational plant management.

The most significant effects on the environment derived from the operation of combustion plants relate to pollutant atmospheric emissions. The differing use of plants also results in partially major fluctuations in yearly emission volumes. However, a study of specific plant emissions can nevertheless provide an evaluation of their environmental performance irrespective of the operational period.

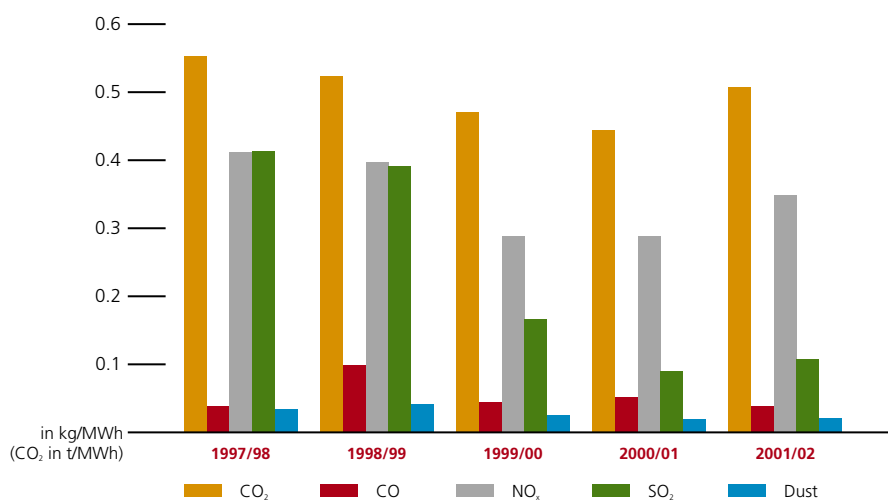
## Specific emissions from EVN thermal electricity and district heating plants

		2001/02	2000/01	+/- %
<b>CO</b>	kg/MWh	0.039	0.052	-25.0
<b>NO<sub>x</sub></b>	kg/MWh	0.348	0.288	20.8
<b>SO<sub>2</sub></b>	kg/MWh	0.107	0.090	18.9
<b>Dust</b>	kg/MWh	0.021	0.020	5.0
<b>CO<sub>2</sub><sup>1)</sup></b>	t/MWh	0.508	0.444	14.4

As is shown in the adjacent table with the exception of CO, specific emissions increased slightly during the past financial year. The main reason was higher coal use at the Dürnröhr power station. However, due to the considerable improvements of recent years, emissions are generally well below the 1999 values (see figure below).

<sup>1)</sup> As previously mentioned, due to its CO<sub>2</sub> neutrality, biomass can be most positively viewed with regard to emissions. The specific CO<sub>2</sub> emissions from biomass combustion are therefore assumed to be zero.

## Specific emissions from EVN's thermal electricity and heating plants



# Environment-friendly distribution

The efficient and secure distribution of network-transmitted energy and communications data requires advanced technologies. In addition to the steady optimisation of transmission performance and the prevention of energy losses, the reduction of the environmental impact of transmission activities plays an important role in further developments.

Specifically, these measures involve the land used, the negative effects on the landscape, emissions and the resources wasted due to transmission losses. On the basis of technical and economic viability, EVN constantly seeks to achieve optimisation in this area through the adoption of a conservationist approach to the environment.

Far-sighted network planning is of major significance with regard to the securing of supply. For example, the floods in August 2002 demonstrated that despite the loss of sizeable network sections, its density meant that supplies of gas and electricity could be largely maintained.



Following recultivation, the only sign of a high-pressure gas pipeline are the markers (see photo).

# A range of initiatives for energy distribution optimisation

## Electricity

- **The replacement of poles with underground cables in the medium- and low voltage networks.** This concept not only contributes to the preservation of townscapes and landscapes, but also to increased security of supply and a reduction in transmission losses.
- **Environment-friendly overhead masts and poles.** In order to prolong their service life, both steel lattice masts and wood poles must be treated prior to employment. During recent years, EVN has increasingly switched to more environment-friendly and resource-conserving processes.
- **Adherence to the recommended WHO electro-smog limits.** EVN has long ensured that all its installations not only meet the recommended protection limits prescribed by the WHO (World Health Organisation) and the Austrian ÖNORM S 1120 standard, but are well below the limits set.

## Natural gas

- **Modernisation of the gas network.** For more than a decade, the EVN natural gas network has been the object of a systematic modernisation process. Apart from greater security of supply, the reduction of natural gas losses plays a decisive role in these improvements both from an ecological and economic viewpoint.
- **The recultivation of line routes.** The installation of new natural gas pipelines, or the replacement of existing pipes, naturally involves excavation work. Following the completion of such activities, EVN makes every effort to restore the landscape to its original condition.

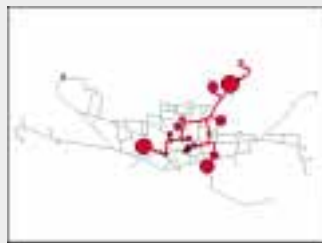
## District heating

- **Minimisation of distribution losses.** During the installation of new heat networks, EVN uses the very latest piping systems, in order to cut transmission losses to a minimum. At the same time, EVN endeavours to obtain new customers, thereby ensuring both a higher use of plant capacity and a further reduction in line losses.
- **Optimum line routing.** During the construction of district heating networks, the conservation of land- and townscapes is taken into consideration by ensuring the best possible routing and co-ordination with other excavation work. Optimised scheduling, the rapid completion of the construction work and exemplary subsequent landscaping, all guarantee positive benefits for both local residents and the environment in general.

## Optimised heating network planning through in-house software development



■ Location and current CO<sub>2</sub> emissions of the individual consumers  
— Possible routing (road network) and heating plant sites



■ District heating network design offering maximum CO<sub>2</sub> reduction at minimum cost

In order to keep the construction and running costs of a heating network to a minimum, a variety of technically viable alternatives must be examined and compared during the planning phase. Numerous parameters, from line routing and the local emissions situation, to the CO<sub>2</sub> savings achieved for individual buildings through a future district heat supply, must all be evaluated.

During several years of research, EVN has created software, which simulates the various possibilities, and enables a quick and targeted evaluation. Construction and operating costs, as well as the environmental effects can be calculated at the push of a button and then used as a basis for the decision-making process involving EVN and the relevant local authorities. In other words, environmental protection and economic considerations are brought into perfect harmony.

Following the identification of the major sources of CO<sub>2</sub>, the computer is able to present a number of network design variations.

# Environmental initiatives in line construction

The installation of new pipelines always has an effect, albeit a temporary one, on the natural world. Therefore, during the realisation phase, EVN makes an effort to restrict the unavoidable effects on the landscape and ecosystem to an absolute minimum. The period under review witnessed numerous initiatives in this connection:

- **Low-impact clearance and reforestation in the Wienerwald.** The installation of the Süd West 2 gas pipeline through the Wienerwald (the green belt to the west of Vienna) required the clearance of a 14 m wide route. As clearings in the forest were accounted for during the planning phase, the clearance width was considerably smaller than had been originally forecast. Following pipe laying, the clearings were replanted on the basis of comprehensive plans regarding the types of trees, spacing and deer grazing areas, which were drawn up by EVN in close co-operation with the Forestry Commission, hunting organisations and those cultivating the forest. Particular attention was paid to detailed solutions. For example, blackthorn and wild cherry trees were planted together with diverse hedges as a periphery, in order to provide the forest fauna with protection and as an ecological niche. At especially exposed points primary groups of larger trees such as oaks and ash were planted with the aim of rounding off the general image of the forest.
- **Ploughing as an alternative excavation method.** EVN is continually looking for practical alternatives to minimise the disruption caused to the natural world by excavation work. One possibility, at least in open spaces free of other installations, is the “ploughing in” of cables and pipelines. The advantages of this system lie in a reduction in damage to the soil and far higher laying speed. During the period under review, EVN successfully used this technique during the laying of a high-pressure gas pipeline from Zistersdorf to Neusiedl and in the Ebreichsdorf area. Fast laying meant that in only a week, 3,800 m of gas pipeline were ploughed in. As the work took place at the beginning of April, harvest losses were also minimal.
- **Gradient stabilisation with coconut matting.** Landslides and erosion occur frequently in the Wienerwald following excavation work on steep slopes. The only safe means of protection is reforestation, but on hilly ground planting trees is sometimes insufficient. Recently, EVN has introduced an innovative landscaping method involving the use of straw mulch seeding and coconut matting. A special grass seed mixture with fertiliser and straw is sprayed onto the slope in liquid form. Coarsely woven coconut matting is then laid on top and “tacked” into the soil. These mats act as a “greenhouse” and stimulate the growth of grass, while also preventing the washing out of the seed. After a certain time, roots run through the entire soil area and the coconut weave rots away to leave a “normal” grassy bank. This system has been proven in practice, demonstrating an ability to withstand even severe rainfall like that of August 2002, during which up to 120 l/h fell on the slopes.



Reduced soil damage and faster laying through the new ploughing process for gas pipeline installation.

# Sustainability-oriented purchasing

EVN also endeavours to show maximum responsibility in the purchasing sector and therefore selects its suppliers on a targeted basis in accordance with economic, environmental and social considerations. The preparation of stipulation catalogues and the classification of all possible producers and service providers form the basis of these principles during every aspect of purchasing procedures. At the same time, EVN ensures that all the statutory regulations covering tenders are observed, in order to fulfil the requirements expected from a serious and fair customer.

Waste prevention also begins with sustainability-oriented purchasing. Accordingly, EVN pays very special attention to the ecological characteristics of the products and substances required for operational purposes, in order to make a contribution to the prevention of unnecessary waste and reasonable resource management.



EVN attaches special value to the targeted selection of its suppliers.

## Sourcing principles

As a regional energy supplier, which is under the majority ownership of the Lower Austrian government, EVN is subject to both Lower Austrian tender legislation and the 2002 federal law on tendering.

In line with the procedure foreseen in these statutes, contracts are allocated to efficient and reliable companies at reasonable prices in accordance with the basic provisions of community law, as well as the principles of free and fair competition and equal treatment of all applicants and tenderers.

The environmental compatibility of the service involved is taken into consideration during the tender allocation process. In particular, this is taken into account through the inclusion of ecological aspects in the description of the service, the determination of the technical specifications, or the establishment of definitive award criteria with an ecological connection. Careful attention is also paid to social factors.

# Resource conservation through environment-conscious sourcing

Extensive specification catalogues, minimum requirement lists and exclusion criteria are employed for the assessment of the environmental impact of the materials and substances involved. In numerous product groups such as paints, washing and cleaning agents, photocopier paper, photocopiers, plastic gas pipes, de-icing agents or office materials, this ecological evaluation means that EVN only selects those products for operational use, which not only meet all technical requirements, but also demonstrate the least negative environmental impact.

## Environmental initiatives in the purchasing sector

EVN also continued its efforts towards maximum sustainability in this regard during the period under review. Apart from the conscious selection of individual products and product groups, this also involved the optimisation of the quantities supplied.

- **Reduced paper consumption.** Following an analysis in the 2000/01 financial year, a very high level of paper consumption in EVN's administrative departments was noted. Subsequently, during the past year, various measures were implemented in order to increase the awareness of employees with regard to conserving resources and thus achieve a reduction in the use of paper and related printing and photocopier costs. The entire EVN work force was informed of these high consumption levels and the accompanying expense. At the same time a request was made that both sides of the paper be used for copying and printing and for non-essential print-outs and copies to be avoided. In addition, a reminder was placed on all of EVN's large photocopiers. This has been successful, as extremely high paper consumption has been considerably reduced in comparison to the previous year.
- **Use of ecologically beneficial paper.** As the dream of the paper-free office will not become reality in the years to come, the choice of a copier paper offering high ecological quality will continue to be a matter of major importance. Therefore, for several years EVN has only been using paper treated with 100 % chlorine-free bleach and without added optical brighteners.
- **Environment-friendly pens.** In the extensive lists of office materials which are employed in EVN's administrative departments, environment-friendlier products, made of materials such as polyethylene, have long replaced any items containing PVC. In addition, during the past financial year, environmentally compatible office materials were extended to include fibre tip pens with low solvent levels for use on flip charts.
- **Elastic flooring.** The past year saw EVN's first ecological evaluation of elastic floor coverings. These are employed mainly in offices and are part of the alterations of all the open-plan offices at company headquarters. After the consideration of the negative ecological impact of these products, it was decided that EVN should give priority to linoleum as opposed to rubber, which in turn should be preferred to PVC.



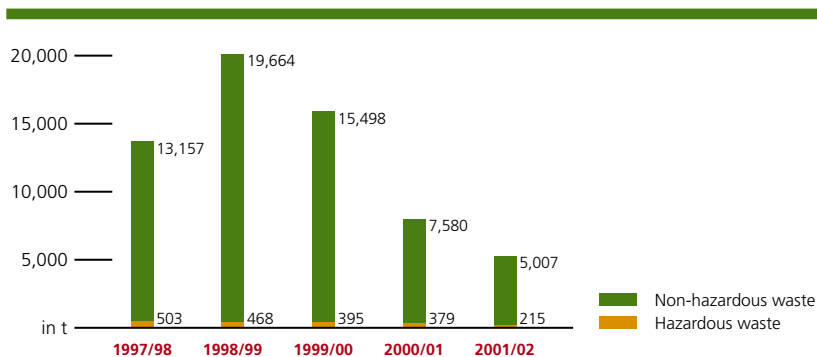
- **Bio-diesel for the EVN vehicle fleet – a contribution to CO<sub>2</sub> reduction.** Following an initial test phase in the raw winter months of 2000/01, during which the RME (rape-seed oil methyl ester) used in five EVN vehicles proved highly effective, at the beginning of summer 2001 this experiment was extended. Up to now, approximately 65,000 l of bio-diesel has been used in EVN vehicles, which corresponds with savings of about 140 t of CO<sub>2</sub>. Other vehicles will be successively switched to this environment-friendly fuel as part of the on-going update of the EVN fleet.
- **Change to extinguishing agents with no climatic impact.** Halon 1301 (bromine trifluoride methane), which has long been "the" extinguishing agent employed in automatic extinguishing systems, offers major advantages. It is highly effective and non-poisonous. However, it is a greenhouse gas, and also contributes to the enlargement of the hole in the ozone layer of the higher atmosphere. For this reason, EVN is successively replacing halon in its extinguishing systems with other agents and by the coming financial year all EVN systems should be "halon-free".

The use of bio-diesel in EVN vehicles has saved up to 140 t of CO<sub>2</sub> and the trend is upwards.

# Environmentally conscious waste management

For more than a decade, EVN has employed a targeted, environmentally compatible waste management system, thereby making a significant contribution to sustainable waste policy in Lower Austria. This system is constantly reviewed and upgraded by means of ongoing optimisation. Moreover, the standard of waste data logging is also regularly enhanced through the very latest EDP applications.

## Falling waste quantities at EVN<sup>1)</sup>



Targeted management has enabled EVN to greatly reduce its amounts of waste in recent years. This relates to non-hazardous and, above all, hazardous waste.

<sup>1)</sup> Without building debris and power station by-products

## Concept for the responsible clearance of a contaminated site

In 1991, EVN started to erect a modern administration building on the site of the former municipal gasworks in Wiener Neustadt. However, during the excavation work hazardous war debris was discovered. In accordance with Austrian law, the site was declared to be contaminated, and was entered into the contaminated site register. The construction work was immediately discontinued. The contaminated site was protected against water penetration and is currently being used partly as a parking area.

EVN has voluntarily agreed to finance the preparation of a site clearance concept and determine a subsequent use for the site in cooperation with the Wiener Neustadt municipal council and the authorities. This project should already deliver initial concrete results at the end of 2002.



Due to wartime effects, residues from the former Wiener Neustadt gasworks contaminated the site. Clearance of the site and concepts for its subsequent use are under examination at present by EVN.

# Thermal waste treatment

## The basis for sustainable waste management in Lower Austria

Eight years ago, Lower Austria took the future-oriented decision to stop the dumping of untreated waste on landfills and thus removed the threat of atmospheric and ground water pollution. Consequently, in 1994 the Lower Austrian government joined forces with EVN to form AVN Abfallverwertung Niederösterreich. AVN, which in the meantime has become a fully owned EVN subsidiary, is in the process of realising a major project comprising the planning, construction and operation of a waste incineration plant. This will secure for Lower Austria an uncontaminated future.

### Optimum alternative to landfill

The most intelligent alternative to the conventional landfill system used up to now has proved to be thermal waste treatment. This involves controlled incineration at over 1,000 °C, which either destroys or concentrates the pollutant content of the waste, while reducing its volume by 90 %. A further major advantage derives from the fact that considerable quantities of energy can be obtained as the result of the unique location of the waste incineration plant adjacent to the Dürnrrohr coal/gas fired power station.

Against this background, AVN started work on the Zwentendorf/Dürnrrohr waste incineration plant in mid-July 2001. The plant, with an annual capacity of 300,000 t, will go on-line on January 1, 2004, in time for the coming into force of the new Austrian Landfill Act and amendments to the Water Rights and Hazardous Waste Decontamination Acts, which stipulate the treatment of all waste prior to dumping throughout Austria.

#### Use of capacity ensured

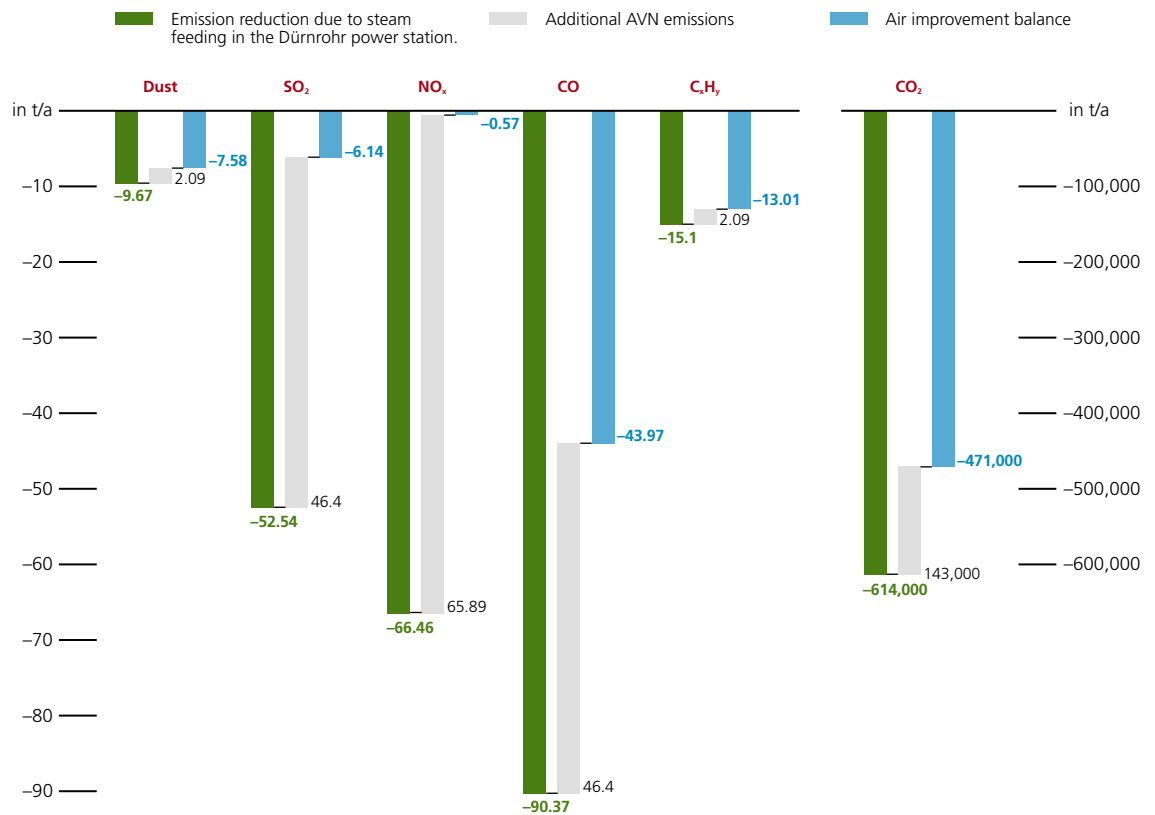
In connection with these regulations, AVN was able to conclude contracts with two major customers prior to the start of construction, which means that full use of the plant capacity is assured. The Lower Austrian BAWU, a union of all Lower Austria's waste management associations, will use the AVN plant for the treatment of the entire residual household refuse produced in Lower Austria. This constitutes around 90 % of Lower Austria's residual and bulk waste and totals some 160,000 t annually.

# A plant with significant ecological advantages

The AVN concept has three main aspects:

- The controlled treatment of the waste leads to the removal of pollutants such as lead, chlorine, cadmium, fluorine, etc. and thus renders the waste harmless.
- The use of the energy contained in the waste for the generation of electricity and district heat in the neighbouring Dürnrrohr thermal power station. The related fossil fuel savings represent a contribution to an improvement in the air quality in Tullnerfeld.
- The delivery of over 90 % of the waste by rail prevents emissions from road transport. The removal of residues also takes place by train.

## Tangible emission reduction



## Clearly beneath the legal limits

		Legal limit	Expected shortfall below the limit
NO <sub>x</sub>	mg/m <sup>3</sup>	100	-72 %
Dust	mg/m <sup>3</sup>	15	-93 %
CO	mg/m <sup>3</sup>	50	-60 %
SO <sub>2</sub>	mg/m <sup>3</sup>	50	-60 %
C <sub>org</sub>	mg/m <sup>3</sup>	20	-95 %
HCl	mg/m <sup>3</sup>	10	-95 %
Pb+Zn+Cr	mg/m <sup>3</sup>	2	-95 %
As+Co+Ni	mg/m <sup>3</sup>	0.5	-80 %
Hg	mg/m <sup>3</sup>	0.05	-80 %
HF	mg/m <sup>3</sup>	0.7	-85 %
Cd	mg/m <sup>3</sup>	0.05	-80 %
Dioxins	ng TE/m <sup>3</sup>	0.1	-50 %

Above all, due to the constellation created by AVN, the aspects of energy exploitation of the project are globally unique. The steam derived from the incineration of the waste is used entirely in the neighbouring Dürnrrohr power station for electricity generation and the supply of the surrounding municipalities with district heating. Apart from the highly modern environment protection and flue gas cleaning technologies employed in the waste incineration plant, this solution offers an extremely environment-friendly possibility for the thermal treatment of waste (please see the separate section concerning the advantages of the integrated energy system with Dürnrrohr power station on page 31).

# Realisation on schedule – topping out in September 2002

The authorities approved the unique AVN concept in June 2001 following a four-year environmental compatibility examination procedure. Work on the project then commenced immediately.

Even though the 18-month construction period for a project of these dimensions is extremely short, AVN continues to be on schedule. Topping out took place in September 2002 and the entire building will be finished at the end of 2002. This means that commissioning can begin in spring 2003 and that following the officially stipulated, 6-month pilot operation period, the plant will go on line punctually on January 1, 2004.

## Environment-friendly technology

The main elements in the thermal waste treatment plant consist of an incineration furnace, a waste heat boiler for energy extraction and a sophisticated flue gas cleaning installation. As a result of lengthy incineration at high temperatures, the waste is rendered inert and harmless. The remaining residues do not represent a hazard to either people or the environment, and are therefore free for landfill deposition or further treatment.

The flue gases pass through a three-stage cleaning process, comprised of a dry, a wet, and a catalytic phase. Fabric filters initially remove the dust particles along with organic pollutants such as dioxins and furans. Heavy metals, chlorides and fluorides are then washed out. In addition, the flue gas is desulphurised, creating gypsum as a by-product, which is used extensively in the construction industry. Finally, in the third stage of the process, nitrogen oxides are cut to a minimum. After multiple cleaning processes, the flue gases are only released into the atmosphere from the stack once they have passed numerous measurement devices, providing permanent checks on both the quantity and quality of the gas emissions.



Pilot operation of AVN's waste incineration plant is due to commence in spring 2003.



## A responsible approach towards employees and the public

As an energy and infrastructure supplier, with responsibilities for the fulfilment of important, basic, day-to-day needs, EVN is well aware of the significance of a functional social framework. Like its predecessor companies, since its foundation EVN has lived up to this task and contributes, as far as it can, to the positive design of living conditions in Lower Austria.

EVN's range of initiatives in this area extends from the care of the company work force, which is provided with an attractive working environment, extensive educational and further training opportunities, careers with interesting perspectives and a comprehensive medical service, to charitable, cultural and sporting impulses.

Accordingly, EVN supports a range of charities, contributes to both exhibitions and other cultural projects in its supply area, has built up a company collection of contemporary art and also participates in sporting and other events of broad public interest.

# Employee health service

Long before the introduction of a statutory obligation to provide corporate medical care, EVN already had a practice at its headquarters headed by a doctor and staffed by a nurse. Subsequently, EVN has considerably expanded this service and currently has four physicians available to employees in Lower Austria. There is one physician at the Theiss and Dürnrrohr power stations, as well as a doctor for the western half of Lower Austria and one for the eastern part of the province and company headquarters.

Prof. Dr. Oswald Jahn, one of Austria's most respected occupational medicine specialists, heads this medical team. With this service, EVN does more than merely fulfil the terms of Austrian employee health legislation, which is based on related EU directives. Instead, the company has assumed responsibility for the welfare, safety and effectiveness of its employees that goes far beyond the statutory occupational medicine services.

## The EVN occupational medical team provides comprehensive employee care



In accordance with a comprehensive occupational medical concept, the surgery door is open to all staff members for both medical advice relating to the workplace and private consultations. Minor examinations are also provided, along with the treatment of slight injuries. Important support is given at company headquarters by the registered nurse, who is on hand for medical advice and care, e.g. blood pressure checks.

Apart from the health care aspects, the advantages with regard to time saving and convenience derived from medical services at the workplace are much appreciated by employees.

## An extensive performance range

- **Physical check-ups for new employees.** New recruits are given a thorough medical check, appropriate to the type of work they will undertake, e.g. eye tests and an appropriate consultation are provided for those working on computers.
- **Special examinations.** Both the initial and regular examinations required under the terms of Austrian employee health and radiation protection legislation are carried out at the company.
- **Periodic health checks.** Internal examinations, ECG, blood pressure measurements, lung function, simple lab tests, eye checks, etc. can all be carried out quickly and smoothly during working hours by the company health team.
- **First aid.** In the case of an accident, minor injuries can be treated on the spot.
- **Work place optimisation / ergonomics.** Workplaces and processes are subject to improvement. Audits are carried out, enhancements are made and individual support offered.
- **Inoculations.** On average, the EVN workforce receives 500 inoculations against insect-borne, meningo-encephalitis annually, as well as 200 against diphtheria-tetanus, 100 against polio and 300 against flu. Prior to foreign travel, the company medical team can also give preventive jabs against typhus, hepatitis, cholera, etc.

# Optimum employee safety

Safety at work is a major EVN priority, as in addition to the usual dangers involved in manual work, the safety aspects relating to electrical power, natural gas, hot water and steam (in the power station and heating supply areas) have to be considered.

EVN attaches great importance to measures aimed at securing optimum safety levels for its employees in every area of the company. First and foremost, it relies on training and the systematic creation of a high level of safety awareness among all workers.

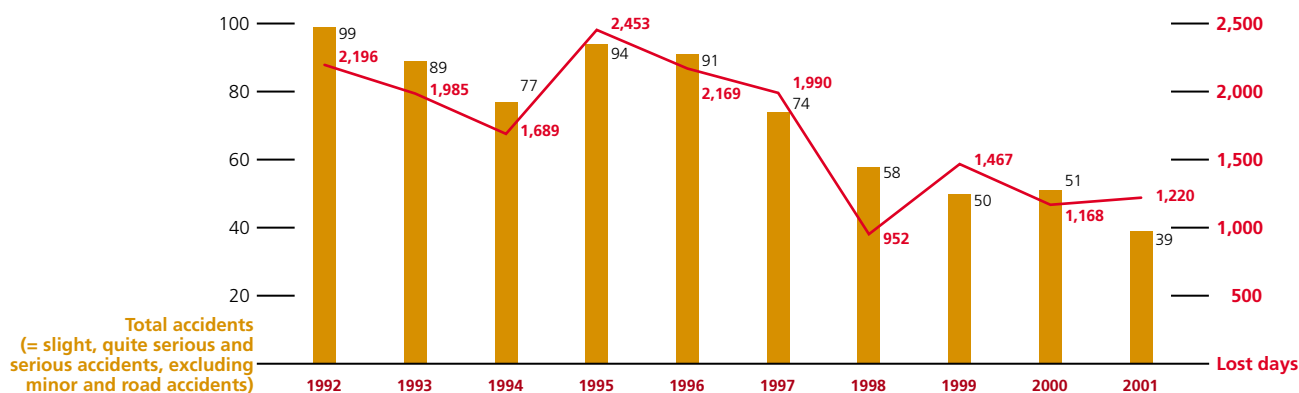
A detailed, internal manual containing directives and instructions supplements the statutory organisational safety regulations. As an additional aid to the work force and as part of the evaluation process, a special manual has been prepared, the "Safety Handbook", which refers to the individual working conditions in the energy industry (electricity, natural gas, heat, water, network and power station operation).

## 2001 accident statistics show a further drop in industrial injuries

Every twelve months, EVN prepares accident statistics for the preceding calendar year, which not only contain all accidents, but also detailed analyses of the causes. This evaluation serves as a platform for the further development of preventive measures. The related success is evidenced by the accident statistic for the 2001 calendar year, which shows the lowest rate since EVN started to keep records and represents a continuation of the positive trend of previous years.

The total number of accidents in 2001 dropped by around 20 % to 65 (including minor and road accidents), although serious accidents increased by 40 %.

### Notable reduction in industrial accidents, excluding minor and road accidents



During the past calendar year there were 21 minor accidents, four road accidents, 26 slight accidents, seven quite serious and six serious accidents, and unfortunately, one fatality. The most frequent cause of accidents at EVN is "assembly work" representing 45 % of all accidents, followed closely by "falls" with 36 %. Of the latter, 4 % relate to falls from working at heights (e.g. on poles) and 32 % to accidents at ground level. 45 % of accidents were caused by personal negligence, followed by "errors or unfortunate circumstances" with 29 %. 8 % of accidents resulted from a "failure to wear personal protection" and the "non-observance of regulations". It is precisely this value that could be further reduced by greater employee vigilance.

## Systematic training and raising of awareness levels

The demands on EVN employees have risen markedly in recent years, but this has not resulted in an increase in accidents at work. The positive trend of accident numbers has primarily been achieved through targeted training, a growing sense of individual responsibility, and the heightening of safety awareness among the staff. In addition, high levels of qualification and the care taken by employees have clearly had a positive effect in this regard. Improved work process planning and preparation has also played a significant role in the reduction of accident frequency.

The number of reported accidents per year at the beginning of the 1990s stood at over 100. However, during the following ten years this figure dropped steadily, with the result that there were only 65 accidents in 2001. Electrical power and gas accidents are already relatively rare, but tend to be more serious.

## "Safety at Work Oscar"

As a special employee incentive, since the 1980s EVN has regularly awarded prizes for outstanding achievement in the preservation and improvement of work safety. In particular, awards are made to those organisational units with accident rates of less than 1 (corresponding to 1 working accident per 100 employees).

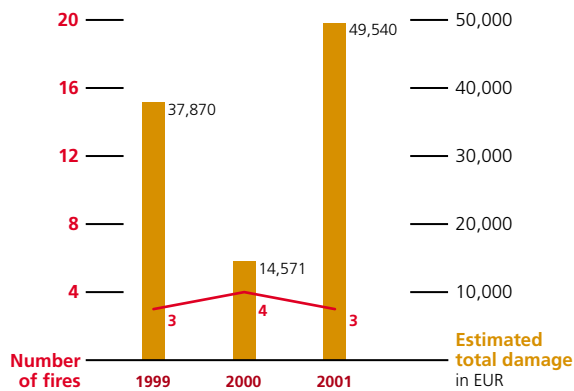
Each year, organisational units with low accident rates are awarded prizes by EVN.



Since 2000, this prize has been awarded under the name "Safety at Work Oscar". The prize-winning employees can celebrate their award at a joint dinner held at the invitation of EVN. In 2001, 15 units, whose accident rates were below 1 % were awarded prizes.

# Preventive fire protection

## Number of fires at EVN



Nine company trained fire officers and 26 fire protection points ensure preventive fire protection at EVN. The officers support the employer in their individual working areas with the implementation and fulfilment of the mandatory regulations.

In accordance with the respective fire regulations, fire extinguishing equipment, e.g. portable fire extinguishers, is installed in all EVN buildings for an immediate response. Like the smoke alarm systems, this equipment is examined and serviced by accredited inspectors from the manufacturers at regular, statutory intervals. Special fire prevention plans exist for many of EVN's plants and these have also been supplied to the local fire brigades.

EVN carries out regular fire drills with its work force, including a fire alarm and evacuation exercise at company headquarters during the period under review. In the past financial year, 560 employees were trained in the use of emergency fire fighting equipment.



The spraying of live lines and installations with water must be practiced. EVN carries out regular training with fire-fighters for this purpose.

## Fire brigade training

In order to minimise the danger to the rescue services, EVN completes regular fire-fighting exercises with fire brigades located in the vicinity of substations. These trials involve the theoretical and practical aspects of spraying live components. During the period under review such exercises took place with eight voluntary fire brigades.

## Helicopter line maintenance

One major contribution to increased work safety is the helicopter tree pruning method, which was developed in Scandinavia and is used by EVN in rough mountain terrain. Helicopter tree pruning, e.g. for lines in the Alpine foothills reduces the increased accident risk that previously appertained to such maintenance work in difficult country. Moreover, this process also means that overhanging trees and branches can be removed quickly and safely. This makes life less dangerous for the employees involved and also safeguards the supply of EVN customers by reducing the possibility of power cuts.



# EVN as an attractive employer

## Initiatives in the interests of the work force

**EVN systematically pursues its goal of positioning itself as an attractive employer. This aim relates to both current company personnel and potential recruits. Apart from the creation of pleasant working conditions, this approach includes, e.g. a flexible working time model.**

**Concrete measures are being taken in the EVN Personnel Marketing area to actively address the best people available on the job market. In line with the concept of long-term personnel planning, EVN looks for lengthy employment relationships with its work force. The company regards itself as an employer that not only furthers and challenges its personnel, but also as an organisation upon which the employee can rely.**

## Human resources management principles

In the course of its efforts to be an attractive and fair employer, EVN sees itself as being obliged to adhere to a number of fundamental principles with regard to its work force:

- EVN endeavours to provide its staff with an ideal balance between their professional and private lives. As a family-friendly company, EVN offers its female personnel maternity leave that extends beyond the statutory period up to the third birthday of the child and carries a reinstatement guarantee.
- In line with the concept of transparency, all major business decisions are taken on the basis of the standard legal statutes and the staff representatives are informed of and integrated into the decision-making process. A high degree of clarity applies to the job advertising process and the award of available positions. Accordingly, all vacancies are advertised on the intranet and can be accessed by the entire work force.
- One matter of course, is the equal treatment of all employees irrespective of gender or nationality.
- As one of just a few Austrian companies, EVN offers its work force a flexi-time model without core time, i.e. without a fixed period of obligatory attendance. Employees are entitled to organise their working time independently and freely, although company requirements are naturally taken into consideration. Flexi-time also facilitates re-entry to employment following maternity leave. Moreover, EVN tries wherever possible to accommodate the individual needs of its employees and hence has a 4.2 % part-time staff quota.



## Personnel development

Particularly in a liberalised market, well-educated, service-oriented and motivated employees constitute a major prerequisite for sustained, successful corporate development. Consequently, EVN utilises a range of measures to improve employees' qualifications, in order to be able to build on just the right personnel in every area of the company. Development of competence and know-how enhancement and further training are the key factors in this regard.

EVN's personnel development programme is designed as an integrated process and has a modular structure. Depending on the specific development target, the "educational event", "e-learning" or "training on the job" modules are employed and either defined as an "obligatory" or a "voluntary" module. The offer extends from IT training, sales seminars, product and branch information, special technical training, language courses, environment and safety schooling, to personality enhancement training.

Some concrete examples:

At EVN new employees are introduced to their working environment by individual mentors.



- In the case of new recruits, the main target is to integrate the new employees into the working process as quickly and efficiently as possible. EVN has introduced a mentor system for this purpose, which guarantees new recruits a positive start at the company and quickly makes them both effective and productive. A mentor is nominated for each new recruit, with tasks that include assistance in the design of the first working day and an introduction to the world of work at EVN. In addition, the mentor is the primary contact person for all questions relating to "standard practice" at EVN. On the first working day, the new recruit receives a "welcome folder" with information concerning the company and life at EVN, as well as a personal e-mail greeting.
- Furthermore, new employees are provided with introductory days, an e-learning module for business management interrelations, as well as acquire a basic knowledge of EVN's technological capabilities. This range is supplemented through training in presentation techniques and teamwork.
- EVN regards structured employee discussions as an important instrument in personnel development. The main objective of these discussions is to agree on targets and to plan work focuses, as well as to determine concrete personal development measures. In addition, such meetings also serve to co-ordinate goals within the company.

# EVN further training 2001/02

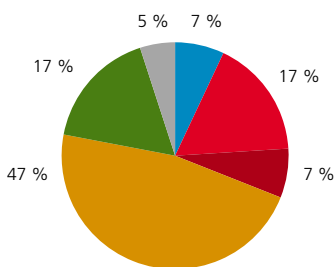


EVN attaches great value to a first class education.

- In line with its claim to offer optimum, individual service, EVN makes every effort to provide its employees in the Customer Centres with multiple training. This is intended to ensure that during the realisation of the "One Face to the Customer" concept, employees are able to provide comprehensive information concerning all of EVN's energy and services activities and can be used in these areas. For these reasons EVN promotes the double and multiple qualification of its work force. Accordingly, the completion of second and third apprenticeships, as well as master certificates, is actively supported through financial payments. During the past financial year, 77 employees concluded additional training (as electricity, gas or heating fitters). In total, over 400 staff members, around 20 % of the EVN work force, possess multiple qualifications.
- Specialists, who are equally important to business operations, also have an opportunity at any time to maintain their know-how at the highest levels by means of external specialist seminars or conferences.
- In addition to activities at a purely professional level, EVN also offers an extensive educational programme. This extends from language courses to a variety of possibilities in the area of social and methodological competence and is intended to assist employees with the improvement of co-operation in teams and organisational units. At a human level, training involves human relations and the constructive management of tensions and conflicts and at a methodology level, the design of working processes with the objective of on-going optimisation.

With expenditure of around EUR 1.05 m, EVN spent slightly more on further training (seminar charges, trainers, e-learning) during the 2001/02 financial year than in the comparable period of 2000/01.

## Educational structure



The vast majority of the EVN work force possesses one or more specialist qualifications.

- University graduates
- A-level graduates
- Polytechnic graduates
- Employees with a complete apprenticeship
- Employees with a masters' certificate
- Others

## EVN further training 2001/02

	Events	Participants
EDP	53	492
Specialist seminars	171	2,189
Behavioural training	20	296
<b>Total internal further training</b>	<b>244</b>	<b>2,977</b>
<b>External further training</b>	<b>402</b>	<b>611</b>
<b>Total further training</b>	<b>646</b>	<b>3,588</b>

# EVN personnel marketing

In order to raise the levels of efficiency and transparency with regard to staff appointments, EVN uses various methods during the recruiting process:

- The personnel page on the EVN website enables employees to make direct personal, written or electronic applications. The website also provides a fundamental presentation of EVN as an employer.
- A special job site under the name “Young Energy” has been installed for graduates and young applicants.
- EVN makes certain that it is represented in leading career guides.



EVN presentation as an employer at the Career Fair of the Vienna University of Economics and Business Administration.

- Thanks to close co-operation with schools, polytechnics and universities, EVN recruits the majority of its apprentices from Lower Austrian vocational schools. EVN also numbers among the sponsors of the Wiener Neustadt Polytechnic, from where several students come each year to complete their professional practice at EVN or one of its subsidiaries. This co-operation has already provided EVN with interesting work from seminars and degree dissertations.
- In line with its medium-term personnel planning, EVN attends job fairs as a potential employer. This was exemplified by a stand at a career fair, held in November 2001 at the Job Planning Centre of the Vienna University of Economics and Business Administration.
- Every year EVN offers summer jobs and internships to approximately 250 pupils and students, thereby enabling them to supplement their theoretical knowledge with practical experience.

## Apprentice training



In September 2002, the 15-year-old Elisabeth Kessler became the first young woman to undertake an EVN apprenticeship as an electrician.

In the interests of medium- and long-term personnel planning, as well as the fulfilment of its responsibilities as a regional employer, traditionally EVN offers apprenticeships in the industrial sector with a primary focus on electricians. Motivated young people are given an opportunity to acquire practical and theoretical knowledge within the scope of a dual training system. EVN works closely with both partner companies, such as various electrical installation companies, as well as the Lower Austria vocational schools and the apprenticeship department of the Lower Austrian Chamber of Commerce.

On September 1, 2002, another 23 young people commenced their apprenticeships as electricians.

## The EVN pension fund – a third pillar for retirement benefits

Since 1995, EVN has offered its work force a modern and attractive form of superannuation in the shape of the EVN pension fund, one of only twelve such company pension schemes in Austria. Designed as a supplement to the statutory state pension, the EVN pension scheme is also open to employees from other EVN Group companies. Accordingly, apart from EVN, five other Group companies are included in the pension fund.

The EVN pension scheme provides an opportunity to create an additional private pillar for retirement benefits on the basis of private initiative supported by the company. EVN is thus making a sizeable contribution to safeguarding its employees' retirement income, which in view of demographic developments, can barely be maintained by the state pension alone. Therefore, the creation of this third pension pillar also represents a socio-political initiative on the part of EVN.

Retirement benefits were deliberately not transferred to an inter-company pension fund, but instead a separate company pension fund was founded in which the right of employees to a share in the decision-making process is guaranteed via their representatives. All the bodies in the EVN pension scheme work on an unpaid basis, in order that staff contributions are not additionally burdened with administrative costs.

As of September 30, 2002, the pension fund comprised around 2,130 people with pension rights and some 90 with an entitlement to payments (retired persons already receiving benefits).

The EVN pension fund is a contribution-oriented pension scheme, in which the amount of the future pension to be paid derives from the annuity on employer and employee contributions up to the date of retirement.

## Initiatives for increased employee job satisfaction

### Broad-based employee information



The supply of up-to-date and comprehensive employee information concerning developments at the company is one of the most important tasks of communications at EVN. For many years, the EVN work force has been able to obtain an insight into current company, energy and employee representative matters via the employee magazine, "EVN Intern". In addition, via the intranet, employees have access to further information concerning all internally advertised appointments, their personal flexi-time data and an overview of booked and completed seminars and educational events.

The transparency provided by the EVN intranet is an important motivating factor.

### Structured employee suggestion system

In a highly competitive market, good ideas from the employees can play an important role in increasing a company's success. The liberalisation of the energy markets and the permanent changes in EVN's social, economic and technological environment mean that the company faces an increasing challenge to provide high quality, reasonable priced and innovative products, in order to secure an essential competitive lead. Equally, these circumstances also underline the importance of using the creative potential of the work force to the full in the form of improvement suggestions. At the same time, the opportunity to introduce and implement one's own ideas constitutes a significant motivating factor.

In July 2000, the long-standing EVN employee suggestion scheme was repositioned in the course of a re-launch, which primarily involved the introduction of an attractive bonus system. Transparency and communications relating to the ideas submitted were also markedly improved. All information concerning the employee suggestion scheme in general and details concerning the individual suggestions are now available to the entire EVN staff, both via a central access point in the intranet and publications in the employee magazine.

Last year, 254 ideas were submitted, of which 93 won bonuses and were put into effect. The idea competition, which focuses on environmental protection, work safety and fire protection, provided a successful means of using employee potential in a targeted manner for the improvement of individual processes and service areas.

Naturally, the commitment shown by those participating is rewarded appropriately.

Substations are repeatedly subject to failures caused by small animals (birds, weasels, etc.) or air-borne material (e.g. hay) accidentally coming into contact with the exposed 20 kV rail. The resulting power cuts mostly affect large areas, e.g. several villages, towns or city quarters. This gave Karl Groher from Pressbaum and his colleagues the idea of covering the bare power supply lines with high-voltage insulating tape and thus preventing short-circuits of the above type. The results are greater security of supply and increased customer satisfaction.



## The EVN canteen and cafeteria

In order to offer EVN employees an attractive lunch at a reasonable price, as well as suitable surroundings for meetings, company headquarters has a canteen and since 2000, a separate cafeteria.

- The canteen, which was part of the headquarters building completed in 1963, was completely renovated in 1994 and redesigned as a modern free-flow system (self-service) with a drinks and salad bar. Balanced meals are on offer, primarily consisting of local produce, which are supplemented by an extensive salad buffet. The canteen provides a total of around 75,000 meals annually.
- While the company canteen is only open at lunchtime, the EVN cafeteria is open around the clock. As opposed to the former canteen buffet, which was only open for an hour in the morning, the cafeteria also offers a far larger range of non-alcoholic beverages and snacks.

## EVN Culture and Sports Association

One staff initiative with long traditions is the EVN Culture and Sports Association (KSV). Founded soon after World War II under the former NEWAG, KSV clubs have developed steadily over many years and now offer an extensive range of activities. In their leisure time, EVN employees can enjoy curling, soccer, gymnastics, walking, or tennis, to name just a few activities. All the clubs have strong links with their respective regions and are largely managed autonomously. They are sponsored by EVN in line with employee communications and the related promotion of social ties within the company.



Balanced meals at attractive prices in the EVN canteen.

# Key figures from the personnel sector

### Staff development since 1989

Average Group personnel numbers in terms of capacity (part-time employees are only included in this statistic on an aliquot basis in accordance with the extent of their employment) have been reduced by around 35 % from 3,362 employees in 1989, to 2,199 in the 2001/02 financial year. This was achieved despite the sizeable, simultaneous increase in the scope and volume of the activities of EVN and its subsidiaries.

### Sales per employee

Sales per employee in the 2001/02 financial year amounted to about EUR 506,500 and had therefore risen by 10.1 % during the same period. This means that today EVN occupies first place among Austria's energy suppliers.

### Personnel expenses in ratio to sales

Personnel expenses amounted to approximately 16.2 % of sales. As compared with the remaining national and international energy producers, this represents a top position. In the 1991/92 financial year, this figure had totalled 26.7 % at EVN.

### Age structure

The average age of EVN employees is approximately 44. This relatively high figure is the result of the massive rationalisation measures of recent years and in particular, the policy of not filling job vacancies. EVN employees have an average of 22 years of service, which underlines the level of company loyalty. Logically, the fluctuation rate (< 1 %) is also extremely low.

# Initiatives for quality of life in Lower Austria

## Involvement in social, cultural, sporting and local matters

As a significant player in the Lower Austrian economy, EVN accepts its responsibility to become engaged in social matters in a manner appropriate to the company and its activities. Therefore, within the scope of its possibilities, EVN contributes to both social and charitable initiatives in its supply area and thus underlines its local origins.

EVN also sponsors regional exhibitions and other cultural events. Since the mid-1990s, the core of company involvement in this sector has been formed by the EVN Collection, which consists of contemporary works of art of international calibre.

Numerous other EVN initiatives within its social environment such as the support of diverse sporting events, co-operation with schools and technical colleges and the consideration of current developments in the fields of science, technology and the energy industry round off the company's activities in this area.

## Regular support of the SOS Kinderdorf Hinterbrühl

EVN has been a regular supporter of the SOS Kinderdorf Hinterbrühl for many years, thereby fulfilling the company's social responsibility as one of Lower Austria's largest enterprises. Indeed, EVN's predecessor companies, NEWAG and NIOGAS, were among the sponsors that enabled the building of this Kinderdorf near the Austrian capital of Vienna. The companies assumed the patronage of two houses, which like the rest of the village were started in 1956 and handed over in 1958.

EVN continues to contribute to the upkeep of both houses. The "Zu den sieben Geißlein" house (donated by NIOGAS) is home to four children as is the "Ottenstein" house (donated by NEWAG).

# Senior citizens Christmas celebration at the Theiss power station



The 2001 Christmas celebration at the EVN power station in Theiss was enjoyed thoroughly by some 60 senior citizens.

In December 2001, EVN issued an initial invitation to senior citizens from the neighbouring municipalities of Gedersdorf and Rohrendorf and the Krems home for the aged to attend a reflective Christmas celebration at the Theiss power station Information Centre. The highlight of the event was a look back in pictures and sound to the festive seasons of the past, leading up to the touching Christmas address given by the federal chancellor, Leopold Figl, in 1945. In addition, the Gedersdorf parish priest told a Christmas story with the assistance of ministrants from Rohrendorf. The world's most famous carol, "Silent Night" and the presentation of small gifts rounded off a very pleasant afternoon.

# Children's Safety Olympics at the Theiss power station



A great atmosphere in combination with safety training characterised the heats of the "Safety Tour 2002" competition organised by the Austrian Civil Defence Association at Theiss power station.

Fun and games in an Olympic competition – and increased safety for all! This is the motto of the Children's Safety Olympics, which is organised annually by the Austrian Civil Defence Association and involves more than 10,000 primary school children.

Following an invitation from EVN, the "Safety Tour 2002" knock-out heats for the districts of Krems Stadt, Krems Land and Zwettl took place in May 2002 at the Theiss power station. Where heat and power are normally generated for Lower Austria, young athletes from twelve primary schools convened to participate in numerous competitions and games, including cycling, a safety quiz, first aid, fire extinguishing and a danger sign puzzle. The especially courageous had the chance to climb to dizzy heights on the rescue ladder of the Krems fire brigade. Naturally, the power station was open for viewing and the children were able to surf on the internet islands in the EVN Information Centre. During the long competition break, the "EVN Young Energy Disco" provided a special surprise.

# James Bond on charity mission at EVN

On the occasion of the EVN Cup 2002, Roger Moore in his function as a UNICEF ambassador, and Martha Kyrle, the president of UNICEF Austria, received a cheque for EUR 10,000 from the EVN Chairman, Rudolf Gruber. EVN also doubled the revenues from the ORF summer party and donated it to the ORF "Flood Victim Fund". For the first time, the international race for electric vehicles, which is organised annually by EVN and ÖAMTC (Austrian Automobile Association), was held in the Arena Nova in Wiener Neustadt. Roger Moore was also unable to resist the temptation of completing a number of laps in one of the innovative and environment-friendly racers.



# Employee involvement in social matters

Besides their professional activities, many EVN employees make a sizeable contribution to Lower Austrian society. Large numbers of the workforce are members of organisations such as the Red Cross and volunteer fire brigades. In the main, employees carry out these activities outside working hours. However, should extra free time be required, EVN does as much as possible as an employer to ensure that this can be worked in through the flexi-time scheme.

Employees called out on emergencies with the fire brigade are also supported by the payment of their wages during their enforced absence. Therefore, the roughly 530 EVN employees who are members of the voluntary fire brigade in Lower Austria were granted around 1,250 hours of paid leave during the flood disaster in August 2002.

## Regional cultural highlights

In accordance with the assignments contained in its mission statement regarding the sponsorship of the arts and culture in Lower Austria, apart from several on-going projects, during the 2001/02 financial year EVN primarily supported regional, cultural events. For the local people these events all shared a strong, emotional and meaningful content and thus provided a sustained positive image transfer for EVN.

Worthy of special mention in the past financial year were the "1000 Jahre Wienerwald" exhibition, the special "Cisto 2002" exhibition in Lilienfeld monastery and various summer festivals.

## The EVN Collection

The EVN Collection was founded in 1995 and is administered by the curators, Brigitte Huck, Georg Kargl, Paul Katzberger, Wolfgang Kos and Hans Ulrich Obrist. The artists and works represented in the EVN Collection are intended to offer a wide range of possibilities for reception, both from their technical selection and with regard to their content.

The works in the collection range from approaches to the phenomena of mass culture (Muntean/Rosenblum) and a poetic consideration of day-to-day existence (Wolfgang Tillmans, Lois Weinberger), to a confrontation with fundamental architectural and social principles (Luca Vitone, Joep van Lieshout). This selection represents a mere fraction of the multiplicity of topics contained in the EVN Collection, but does indicate the underlying theme of a constant relationship to the immediate present.



The demand for the exhibition of many works both nationally and internationally, as well as the lively presence of virtually all the artists represented in the Collection in the international art world, point to the high standing of the Collection, its actuality and meaningfulness.

MUNTEAN/ROSENBLUM  
 Untitled ("You could complain..."), 2001  
 Acrylic on canvas  
 200 x 250 cm  
 Purchase 2002  
 Photo: Fotostudio Otto,  
 Vienna

Since the spring of 2002, the presentation of the works is no longer limited to the EVN FORUM, the lobby area and various floors of EVN headquarters, but is also displayed in the lounge areas on the southern stairwell. This offers EVN employees a greater opportunity for the consideration and direct observation of these pieces of art. The presentation of the works on the intranet also provides employees with an immediate opportunity for more detailed insights and information. In addition, guided tours, discussions with artists and exhibition visits relating to the EVN Collection are all available (evn.sammlung@evn.at).



Wolfgang TILLMANS  
blue jacket, grey jeans,  
1995  
Photo, Edition of 3  
50 x 60 cm  
Purchase 2001  
Photo: Fotostudio Otto,  
Vienna



Lois WEINBERGER  
Verlauf/Drift, 1999  
Oil on molino  
150 x 250 cm  
Purchase 2002  
Photo: Fotostudio Otto,  
Vienna

## “Eco-sport” – the EVN Spinning Marathon



In May 2002, EVN held the third EVN Spinning Marathon in Wiener Neustadt. Around 150 athletes (of which half were women) pedalled more than 30 specially converted Spinning Bikes for twelve hours, thereby generating environment-friendly electricity, which was fed into the EVN network. For the first time, this event was coupled with a successful attempt on the world natural power generation record. The target was to enter the Guinness Book of Records with a maximum amount of “muscle power electricity”. The 5 kWh of electricity generated brought the required entry and was also sufficient for 50 hours of television or morning shaves for 200 men.

## More EVN teams at the company run in Wiener Neustadt

Full of energy, even during their leisure time. 27 EVN employees in nine teams held the company flag high during the company run in Wiener Neustadt.



## The EVN school service – an investment in the future

EVN co-operation with Lower Austrian schools has a long and successful 40-year history. Numerous teaching aids for primary and secondary schools on the subject of energy, a wide range of excursions and power station tours, as well as more than 800 talks annually by EVN advisors in schools throughout Lower Austria, form the focal points of EVN’s activities in this area.

This represents clear recognition by EVN of its responsibilities towards people and the environment and above all, a contribution to the education of future generations. Simultaneously, active contacts with schools allow the customers of tomorrow to be addressed at a very early age. The long tradition of the EVN schools service is unique among Austrian energy companies, as is the extent of the school range on offer. In Lower Austria, there is already a current generation of parents, who themselves were able to research the secrets of electricity during their own school years, using teaching aids from EVN.



Over the years, the first further training seminars for Lower Austrian teachers, which were organised by EVN at the beginning of the 1960s, have developed into an extensive range for every pupil age group. The design and didactic structure of the teaching aids and experimental materials from EVN have also evolved to reflect current taste and above all, the state of the art. Nonetheless, they continue to convey messages concerning the careful use of energy and communicate the basic principles of energy supply in a lively manner.

More than 30,000 differing EVN teaching aids are distributed among Lower Austrian schoolchildren free of charge. Even more young people come into personal contact with EVN by taking advantage of the selection of guided tours on offer, or by attending a presentation given by an EVN expert to their class. The attractive programme for children at EVN events, as well as the separate internet site for young people, also allow a growing number of contacts with children outside the school premises.

# An exchange of opinions with experts



Always keeping people up-to-date through information events and expert discussions. The photo shows an information event for EVN's partner electricians concerning new products and services

The exchange of information with experts, market partners and opinion leaders is of considerable importance to EVN. Therefore, each year, a series of events takes place, which facilitates the examination of current developments in the sciences, technology and energy industry in pleasant surroundings.

For example, in November 2001, EVN held a seminar concerning the use of biomass and was able to play host to students and academics from nine European countries at the international Vienna University symposium, "European Energy". Special interest was aroused among the international audience at this event by the demonstration of a pilot plant for electricity generation using biomass in Wiener Neustadt.

## Co-operation with the Donauauen National Park – barn owls nest in EVN transformer stations



The barn owl not only enjoys a great deal of interest in the world of Harry Potter, but also in the area to the north of the Danube between Orth and Hainburg, east of Vienna. Within the scope of a joint conservation project with the Donauauen National Park, the Haringsee bird of prey station and zoologists, nesting boxes are being installed in 15 EVN tower transformer stations in order to provide this threatened species with possibilities for breeding. As a result of the modern design of farm buildings and the increasing number of closed church attics, barn owls find it virtually impossible to discover "natural" nesting sites. The EVN transformer stations represent an ideal alternative for the barn owls as civilisation commensals, not only due to their height, but also their general proximity to developed areas, which offers plentiful opportunities for mouse hunting. The first nesting boxes were put in place at the end of September 2002.

# Statement of the environmental auditors

As environmental auditors accredited in accordance with Section I of the Environmental Management Act (UMG) pursuant to the Directive 92.770/233-IX/I/96 from December 17, 1996, subsequently 92.770-IV/9/00 from March 9, 2000 (BMwA), we have examined the content of the "Ecology" and "Society" sections of the EVN Sustainability Report which relates to the period from October 1, 2001 to September 30, 2002, and following random sampling and the completion of an audit on November 18, 2002 can verify both the content and the derivative sustainable effects.

Vienna, November 18, 2002



ÖKO-CERT AUSTRIA  
Environmental Auditing Association

Franz W. Mayer m.p.  
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for air, waste and  
industrial waste cleanliness

Hans Kolb m.p.  
Judicially accredited expert  
for mining and metallurgy

Georg Schörner m.p.  
Judicially accredited expert  
for ecology and environmental  
compatibility

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## Verifiers' Report

We were instructed by EVN AG to verify the figures contained in the EVN AG Corporate Responsibility Report for the 2001/02 financial year. The Corporate Responsibility Report itself is the responsibility of the EVN AG management.

On the basis of the assignment allocated to us, we express the following opinion:

The financial figures contained in the "Economy" section of this report are taken from the consolidated financial statements of EVN AG as at September 30, 2002, September 30, 2001 and September 30, 2000, which were prepared in accordance with the International Accounting Standards and received our unqualified auditor's opinion. The financial data in the afore mentioned section is correctly repeated.

In addition, we would like to point out that for an understanding of the financial figures, the consolidated financial statements of EVN AG for the 2001/02 financial year should be read together with the notes to the financial statements.

Vienna, November 26, 2002



KPMG Austria GmbH

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### **Informationen on the Internet**

[www.evn.at](http://www.evn.at)  
[www.investor.evn.at](http://www.investor.evn.at) (NEW!)

